# Analysis of the Phenomena of the Human Mind

[Produced by Ed Brandon  
  
  
  
  
  
  
  
ANALYSIS  
  
  
OF THE PHENOMENA OF THE  
  
  
HUMAN MIND  
  
  
BY JAMES MILL  
  
  
WITH NOTES ILLUSTRATIVE AND CRITICAL BY  
ALEXANDER BAIN  
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AND  
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EDITED WITH ADDITIONAL NOTES BY  
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"In order to prepare the way for a just and comprehensive system of Logic, a previous survey of our nature, considered as a great whole, is an indispensable requisite."--\_Philosophical Essays\_ (\_Prelim. Dissert.\_) p. lxvii. \_by Dugald Stewart, Esq.\_  
"Would not Education be necessarily rendered more systematical and enlightened, if the powers and faculties on which it operates were more scientifically examined, and better understood?" \_Ibid.\_ p. xlviii.  
  
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PREFACE  
TO  
THE PRESENT EDITION.  
  
IN the study of Nature, either mental or physical, the aim of the scientific enquirer is to diminish as much as possible the catalogue of ultimate truths. When, without doing violence to facts, he is able to bring one phenomenon within the laws of another; when he can shew that a fact or agency, which seemed to be original and distinct, could have been produced by other known facts and agencies, acting according to their own laws; the enquirer who has arrived at this result, considers himself to have made an important advance in the knowledge of nature, and to have brought science, in that department, a step nearer to perfection. Other accessions to science, however important practically, are, in a scientific point of view, mere additions to the materials: this is something done towards perfecting the structure itself.  
The manner in which this scientific improvement takes place is by the resolution of phenomena which {vi} are special and complex into others more general and simple. Two cases of this sort may be roughly distinguished, though the distinction between them will not be found on accurate examination to be fundamental. In one case it is the order of the phenomena that is analysed and simplified; in the other it is the phenomena themselves. When the observed facts relating to the weight of terrestrial objects, and those relating to the motion of the heavenly bodies, were found to conform to one and the same law, that of the gravitation of every particle of matter to every other particle with a force varying as the inverse square of the distance, this was an example of the first kind. The order of the phenomena was resolved into a more general law. A great number of the successions which take place in the material world were shewn to be particular cases of a law of causation pervading all Nature. The other class of investigations are those which deal, not with the successions of phenomena, but with the complex phenomena themselves, and disclose to us that the very fact which we are studying is made up of simpler facts: as when the substance Water was found to be an actual compound of two other bodies, hydrogen and oxygen; substances very unlike itself, but both actually present in every one of its particles. By processes like those employed in this case, all the variety of substances which meet our senses and compose the planet on which we live, have been shewn to be {vii} constituted by the intimate union, in a certain number of fixed proportions, of some two or more of sixty or seventy bodies, called Elements or Simple Substances, by which is only meant that they have not hitherto been found capable of further decomposition. This last process is known by the name of chemical analysis: but the first mentioned, of which the Newtonian generalization is the most perfect type, is no less analytical. The difference is, that the one analyses substances into simpler substances; the other, laws into simpler laws. The one is partly a physical operation; the other is wholly intellectual.  
Both these processes are as largely applicable, and as much required, in the investigation of mental phenomena as of material. And in the one case as in the other, the advance of scientific knowledge may be measured by the progress made in resolving complex facts into simpler ones.  
The phenomena of the Mind include multitudes of facts, of an extraordinary degree of complexity. By observing them one at a time with sufficient care, it is possible in the mental, as it is in the material world, to obtain empirical generalizations of limited compass, but of great value for practice. When, however, we find it possible to connect many of these detached generalizations together, by discovering the more general laws of which they are cases, and to the operation of which in some particular sets of {viii} circumstances they are due, we gain not only a scientific, but a practical advantage; for we then first learn how far we can rely on the more limited generalizations; within what conditions their truth is confined; by what changes of circumstances they would be defeated or modified.](56441.docx#chunk3370)

[Not only is the order in which the more complex mental phenomena follow or accompany one another, reducible, by an analysis similar in kind to the Newtonian, to a comparatively small number of laws of succession among simpler facts, connected as cause and effect; but the phenomena themselves can mostly be shewn, by an analysis resembling those of chemistry, to be made up of simpler phenomena. "In the mind of man," says Dr. Thomas Brown, in one of his Introductory Lectures, "all is in a state of constant and ever-varying complexity, and a single sentiment may be the slow result of innumerable feelings. There is not a single pleasure, or pain, or thought, or emotion, that may not, by the influence of that associating principle which is afterwards to come under our consideration, be so connected with other pleasures, or pains, or thoughts, or emotions, as to form with them, for ever after, an union the most intimate. The complex, or seemingly complex, phenomena of thought, which result from the constant operation of this principle of the mind, it is the labour of the intellectual inquirer to analyse, as {ix} it is the labour of the chemist to reduce the compound bodies on which he operates, however close and intimate their combination may be, to their constituent elements.... From the very instant of its first existence, the mind is constantly exhibiting phenomena more and more complex: sensations, thoughts, emotions, all mingling together, and almost every feeling modifying, in some greater or less degree, the feelings that succeed it; and as, in chemistry, it often happens that the qualities of the separate ingredients of a compound body are not recognizable by us in the apparently different qualities of the compound itself,--so in this spontaneous chemistry of the mind, the compound sentiment that results from the association of former feelings has, in many cases, on first consideration, so little resemblance to these constituents of it, as formerly existing in their elementary state, that it requires the most attentive reflection to separate, and evolve distinctly to others, the assemblages which even a few years may have produced. It is, therefore, scarcely possible to advance even a single step, in intellectual physics, without the necessity of performing some sort of analysis, by which we reduce to simpler elements some complex feeling that seems to us virtually to involve them."  
These explanations define and characterize the task which was proposed to himself by the author of the {x} present treatise, and which he concisely expressed by naming his work an Analysis of the Phenomena of the Human Mind. It is an attempt to reach the simplest elements which by their combination generate the manifold complexity of our mental states, and to assign the laws of those elements, and the elementary laws of their combination, from which laws, the subordinate ones which govern the compound states are consequences and corollaries.](56441.docx#chunk3371)

[The conception of the problem did not, of course, originate with the author; he merely applied to mental science the idea of scientific inquiry which had been matured by the successful pursuit, for many generations, of the knowledge of external nature. Even in the particular path by which he endeavoured to reach the end, he had eminent precursors. The analytic study of the facts of the human mind began with Aristotle; it was first carried to a considerable height by Hobbes and Locke, who are the real founders of that view of the Mind which regards the greater part of its intellectual structure as having been built up by Experience. These three philosophers have all left their names identified with the great fundamental law of Association of Ideas; yet none of them saw far enough to perceive that it is through this law that Experience operates in moulding our thoughts and forming our thinking powers. Dr. Hartley was the man of genius who first clearly {xi} discerned that this is the key to the explanation of the more complex mental phenomena, though he, too, was indebted for the original conjecture to another wise forgotten thinker, Mr. Gay. Dr. Hartley's treatise ("Observations on Man") goes over the whole field of the mental phenomena, both intellectual and emotional, and points out the way in which, as he thinks, sensations, ideas of sensation, and association, generate and account for the principal complications of our mental nature. If this doctrine is destined to be accepted as, in the main, the true theory of the Mind, to Hartley will always belong the glory of having originated it. But his book made scarcely any impression upon the thought of his age. He incumbered his theory of Association with a premature hypothesis respecting the physical mechanism of sensation and thought; and even had he not done so, his mode of exposition was little calculated to make any converts but such as were capable of working out the system for themselves from a few hints. His book is made up of hints rather than of proofs. It is like the production of a thinker who has carried his doctrines so long in his mind without communicating them, that he has become accustomed to leap over many of the intermediate links necessary for enabling other persons to reach his conclusions, and who, when at last he sits down to write, is unable to recover them. It was another great disadvantage to Hartley's theory, that its {xii} publication so nearly coincided with the commencement of the reaction against the Experience psychology, provoked by the hardy scepticism of Hume. From these various causes, though the philosophy of Hartley never died out, having been kept alive by Priestley, the elder Darwin, and their pupils, it was generally neglected, until at length the author of the present work gave it an importance that it can never again lose. One distinguished thinker, Dr. Thomas Brown, regarded some of the mental phenomena from a point of view similar to Hartley's, and all that he did for psychology was in this direction; but he had read Hartley's work either very superficially, or not at all: he seems to have derived nothing from it, and though he made some successful analyses of mental phenomena by means of the laws of association, he rejected, or ignored, the more searching applications of those laws; resting content, when he arrived at the more difficult problems, with mere verbal generalizations, such as his futile explanations by what he termed "relative suggestion." Brown's psychology was no outcome of Hartley's; it must be classed as an original but feebler effort in a somewhat similar direction.](56441.docx#chunk3372)

[It is to the author of the present volumes that the honour belongs of being the reviver and second founder of the Association psychology. Great as is this merit, it was but one among many services which he rendered to his generation and to mankind. When {xiii} the literary and philosophical history of this century comes to be written as it deserves to be, very few are the names figuring in it to whom as high a place will be awarded as to James Mill. In the vigour and penetration of his intellect he has had few superiors in the history of thought: in the wide compass of the human interests which he cared for and served, he was almost equally remarkable: and the energy and determination of his character, giving effect to as single-minded an ardour for the improvement of mankind and of human life as I believe has ever existed, make his life a memorable example. All his work as a thinker was devoted to the service of mankind, either by the direct improvement of their beliefs and sentiments, or by warring against the various influences which he regarded as obstacles to their progress: and while he put as much conscientious thought and labour into everything he did, as if he had never done anything else, the subjects on which he wrote took as wide a range as if he had written without any labour at all. That the same man should have been the author of the History of India and of the present treatise, is of itself sufficiently significant. The former of those works, which by most men would have been thought a sufficient achievement for a whole literary life, may be said without exaggeration to have been the commencement of rational thinking on the subject of India: and by that, and his subsequent {xiv} labours as an administrator of Indian interests under the East India Company, he effected a great amount of good, and laid the foundation of much more, to the many millions of Asiatics for whose bad or good government his country is responsible. The same great work is full of far-reaching ideas on the practical interests of the world; and while forming an important chapter in the history and philosophy of civilization (a subject which had not then been so scientifically studied as it has been since) it is one of the most valuable contributions yet made even to the English history of the period it embraces. If, in addition to the History and to the present treatise, all the author's minor writings were collected; the outline treatises on nearly all the great branches of moral and political science which he drew up for the Supplement to the Encyclopaedia Britannica, and his countless contributions to many periodical works; although advanced thinkers have outgrown some of his opinions, and include, on many subjects, in their speculations, a wider range of considerations than his, every one would be astonished at the variety of his topics, and the abundance of the knowledge he exhibited respecting them all. One of his minor services was, that he was the first to put together in a compact and systematic form, and in a manner, adapted to learners, the principles of Political Economy as renovated by the genius of Ricardo: whose great {xv} work, it may be mentioned by the way, would probably never have seen the light, if his intimate and attached friend Mr. Mill had not encouraged and urged him, first to commit to paper his profound thoughts, and afterwards to send them forth to the world. Many other cases might be mentioned in which Mr. Mill's private and personal influence was a means of doing good, hardly inferior to his public exertions. Though, like all who value their time for higher purposes, he went little into what is called society, he helped, encouraged, and not seldom prompted, many of the men who were most useful in their generation: from his obscure privacy he was during many years of his life the soul of what is now called the advanced Liberal party; and such was the effect of his conversation, and of the tone of his character, on those who were within reach of its influence, that many, then young, who have since made themselves honoured in the world by a valuable career, look back to their intercourse with him as having had a considerable share in deciding their course through life. The most distinguished of them all, Mr. Grote, has put on record, in a recent publication, his sense of these obligations, in terms equally honourable to both. As a converser, Mr. Mill has had few equals; as an argumentative converser, in modern tunes probably none. All his mental resources seemed to be at his command at any moment, and were then freely {xvi} employed in removing difficulties which in his writings for the public he often did not think it worth while to notice. To a logical acumen which has always been acknowledged, he united a clear appreciation of the practical side of things, for which he did not always receive credit from those who had no personal knowledge of him, but which made a deep impression on those who were acquainted with the official correspondence of the East India Company conducted by him. The moral qualities which shone in his conversation were, if possible, more valuable to those who had the privilege of sharing it, than even the intellectual. They were precisely such as young men of cultivated intellect, with good aspirations but a character not yet thoroughly formed, are likely to derive most benefit from. A deeply rooted trust in the general progress of the human race, joined with a good sense which made him never build unreasonable or exaggerated hopes on any one event or contingency; an habitual estimate of men according to their real worth as sources of good to their fellow-creatures, and an unaffected contempt for the weaknesses or temptations that divert them from that object, making those with whom he conversed feel how painful it would be to them to be counted by him among such backsliders; a sustained earnestness, in which neither vanity nor personal ambition had any part, and which spread from him by a sympathetic contagion to those {xvii} who had sufficient moral preparation to value and seek the opportunity; this was the mixture of qualities which made his conversation almost unrivalled in its salutary moral effect. He has been accused of asperity, and there was asperity in some few of his writings; but no party spirit, personal rivalry, or wounded \_amour-propre\_ ever stirred it up. Even when he had received direct personal offence, he was the most placable of men. The bitterest and ablest attack ever publicly made on him was that which was the immediate cause of the introduction of Mr. Macaulay into public life. He felt it keenly at the time, but with a quite impersonal feeling, as he would have felt any thing that he thought unjustly said against any opinion or cause which was dear to him; and within a very few years afterwards he was on terms of personal friendship with its author, as Lord Macaulay himself, in a very creditable passage of the preface to his collected Essays, has, in feeling terms, commemorated.](56441.docx#chunk3373)

[At an early period of Mr. Mill's philosophical life, Hartley's work had taken a strong hold of his mind; and in the maturity of his powers he formed and executed the purpose of following up Hartley's leading thought, and completing what that thinker had begun. The result was the present work, which is not only an immense advance on Hartley's in the qualities which facilitate the access of recondite {xviii} thoughts to minds to which they are new, but attains an elevation far beyond Hartley's in the thoughts themselves. Compared with it, Hartley's is little more than a sketch, though an eminently suggestive one: often rather showing where to seek for the explanation of the more complex mental phenomena, than actually explaining them. The present treatise makes clear, much that Hartley left obscure: it possesses the great secret for clearness, though a secret commonly neglected--it bestows an extra amount of explanation and exemplification on the most elementary parts. It analyses many important mental phenomena which Hartley passed over, and analyses more completely and satisfactorily most of those of which he commenced the analysis. In particular, the author was the first who fully understood and expounded (though the germs of this as of all the rest of the theory are in Hartley) the remarkable case of Inseparable Association: and inasmuch as many of the more difficult analyses of the mental phenomena can only be performed by the aid of that doctrine, much had been left for him to analyse.  
I am far from thinking that the more recondite specimens of analysis in this work are always successful, or that the author has not left something to be corrected as well as much to be completed by his successors. The completion has been especially the work of two distinguished thinkers in the present {xix} generation, Professor Bain and Mr. Herbert Spencer; in the writings of both of whom, the Association Psychology has reached a still higher development. The former of these has favoured me with his invaluable collaboration in annotating the present work. In the annotations it has been our object not only to illustrate and enforce, but to criticise, where criticism seemed called for. What there is in the work that seems to need correction, arises chiefly from two causes. First, the imperfection of physiological science at the time at which it was written, and the much greater knowledge since acquired of the functions of our nervous organism and their relations with the mental operations. Secondly, an opening was made for some mistakes, and occasional insufficiency of analysis, by a mental quality which the author exhibits not unfrequently in his speculations, though as a practical thinker both on public and on private matters it was quite otherwise; a certain impatience of detail. The bent of his mind was towards that, in which also his greatest strength lay; in seizing the larger features of a subject--the commanding laws which govern and connect many phenomena. Having reached these, he sometimes gives himself up to the current of thoughts which those comprehensive laws suggest, not stopping to guard himself carefully in the minutiae of their application, nor devoting much of his thoughts to anticipating all the objections that {xx} could be made, though the necessity of replying to some of them might have led him to detect imperfections in his analyses. From this cause (as it appears to me), he has occasionally gone further in the pursuit of simplification, and in the reduction of the more recondite mental phenomena to the more elementary, than I am able to follow him; and has left some of his opinions open to objections, which he has not afforded the means of answering. When this appeared to Mr. Bain or myself to be the case, we have made such attempts as we were able to place the matter in a clearer light; and one or other, or both, have supplied what our own investigations or those of others have provided, towards correcting any shortcomings in the theory.  
Mr. Findlater, of Edinburgh, Editor of Chambers' Cyclopaedia, has kindly communicated, from the rich stores of his philological knowledge, the corrections required by the somewhat obsolete philology which the author had borrowed from Horne Tooke. For the rectification of an erroneous statement respecting the relation of the Aristotelian doctrine of General Ideas to the Platonic, and for some other contributions in which historical is combined with philosophical interest, I am indebted to the illustrious historian of Greece and of the Greek philosophy. Mr. Grote's, Mr. Bain's and Mr. Findlater's notes are distinguished by their initials; my own, as those of the Editor. {xxi}  
The question presented itself, whether the annotations would be most useful, collected at the end of the work, or appended to the chapters or passages to which they more particularly relate. Either plan has its recommendations, but those of the course which I have adopted seemed to me on the whole to preponderate. The reader can, if he thinks fit, (and, if he is a real student, I venture to recommend that he should do so) combine the advantages of both modes, by giving a first careful reading to the book itself, or at all events to every successive chapter of the book, without paying any attention to the annotations. No other mode of proceeding will give perfectly fair play to the author, whose thoughts will in this manner have as full an opportunity of impressing themselves on the mind, without having their consecutiveness broken in upon by any other person's thoughts, as they would have had if simply republished without comment. When the student has done all he can with the author's own exposition--has possessed himself of the ideas, and felt, perhaps, some of the difficulties, he will be in a better position for profiting by any aid that the notes may afford, and will be in less danger of accepting, without due examination, the opinion of the last comer as the best.  
  
  
  
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INTRODUCTION  
  
"I shall inquire into the original of those ideas, notions, or whatever else you please to call them, which a man observes and is conscious to himself he has in his mind; and the ways whereby the understanding comes to be furnished with them." \_Locke\_, i. 1, 3.  
PHILOSOPHICAL inquiries into the human mind have for their main, and ultimate object, the exposition of its more complex phenomena.  
It is necessary, however, that the simple should be premised; because they are the elements of which the complex are formed; and because a distinct knowledge of the elements is indispensable to an accurate conception of that which is compounded of them.  
The feelings which we have through the external senses are the most simple, at least the most familiar, of the mental phenomena. Hence the propriety of commencing with this class of our feelings. {2}  
  
  
  
CHAPTER I.  
SENSATION.  
  
"I shall not at present meddle with the physical consideration of the mind, or trouble myself to examine wherein its essence consists; or by what motions of our spirits, or alterations of our bodies, we come to have any Sensation by our organs, or any Ideas in our understandings; and whether those ideas do in their formation, any or all of them, depend on matter or no. These are speculations which, however curious and entertaining, I shall decline, as lying out of my way in the design I am now upon."--\_Locke\_, i. 1, 2.  
MY object, in what I shall say respecting the phenomena classed under the head of SENSATION, is, to lead such of my readers as are new to this species of inquiry to conceive the feelings distinctly. All men are familiar with them; but this very familiarity, as the mind runs easily from one well known object to another, is a reason why the boundary between them and other feelings is not always observed. It is necessary, therefore, that the learner should by practice acquire the habit of reflecting upon his Sensations, as a distinct class of feelings; and should be hence prepared to mark well the distinction between them and other states of mind, when he {3} advances to the analysis of the more mysterious phenomena.  
What we commonly mean, when we use the terms Sensation or phenomena of Sensation, are the feelings which we have by the five senses,--SMELL, TASTE, HEARING, TOUCH, and SIGHT. These are the feelings from which we derive our notions of what we denominate the external world;--the things by which we are surrounded: that is, the antecedents of the most interesting consequents, in the whole series of feelings, which constitute our mental train, or existence.  
The feelings, however, which belong to the five external Senses are not a full enumeration of the feelings which it seems proper to rank under the head of Sensations, and which must be considered as bearing an important part in those complicated phenomena, which it is our principal business, in this inquiry, to separate into their principal elements, and explain. Of these unnamed, and generally unregarded, Sensations, two principal classes may be distinguished:--first, Those which accompany the action of the several muscles of the body; and, secondly, Those which have their place in the Alimentary Canal.[1]](56441.docx#chunk3375)

[[Bain's footnote 1: Important points of Psychology are raised in classifying the senses, and in assigning the order of their exposition. The author justly animadverts on the insufficiency of the common enumeration of the Five Senses, and indicates two grand omissions--the Muscular Sensibilities, and the feelings associated with Digestion.  
With regard to the first omission--the Muscular Feelings,--a further advance has been found requisite. Instead of adding these to the list, as a sixth sense, they are made a genus apart {4} and put in contrast to the Sensations as commonly understood. They are the feelings of our ACTIVITY, of the Active side of our nature, and are in relation to the Motor or Outcarrying nerves of the body. The Sensations proper, such as Smell and Hearing, are the feelings of our RECEPTIVITY, or Passivity, and arise in connection with the Sentient, or Incarrying nerves. In the exercise of the senses, however, a muscular element is almost always combined. This is conspicuous in Touch, which is most frequently accompanied with movements of the hand, or other parts touched; it is also the case with Sight, there being six muscles constantly engaged in moving the eye-ball. There is least muscularity in Hearing and Smell, but in neither is it wholly absent. Thus in Hearing, there are certain small muscles for adjusting the tightness of the membrane of the tympanum; apart from which, there are movements of the head in conjunction with hearing. So in Smell; the sniffing action with the breath is muscular. Nevertheless, it is easy to separate, in all the senses, the passive and proper sensibility of the sense, (called by Hamilton the \_idiopathic\_ sensibility) from the active accompaniment. We can make experiments upon passive touch, or pure contact; we can isolate in our consciousness the optical sensibility of the eye; we can eliminate activity from the ear; and we can attend to the sensations of smell in their pure passivity.  
The best course of proceeding is to deal with Muscularity apart, in the first instance, and to give it the priority in the order of exposition. Chronologically it is an earlier fact of our being; we move before we feel; there is an inborn energy of action in the animal system, which goes out, as it were, and meets the objects of sensation. This is one reason of priority. Another is the fact just stated that movement accompanies all the senses, or is a common factor in sensation. To discuss its peculiar sensibility is thus a preparation for treating of the senses.  
The importance of drawing a broad line between the active and the passive branches of our primary sensibilities is seen in various applications, but most especially in the problem of {5} External Perception. The great distinction that this problem requires us to draw between the external and the internal sides of our being (so described by an imperfect metaphor) has its deepest foundation in the distinction between the sense of expended muscular energy and the feelings that are neither energy in themselves, nor vary definitely according to our energies. The qualities of things admitted on all hands to be qualities of the external (or object) world--called the Primary Qualities, Resistance and Extension,--are modes of our muscular energies; the qualities that do not of themselves suggest externality, or objectivity,--the secondary qualities, as Heat, Colour, &c.--are our passive sensibilities, and do not contain muscular energy. When these secondary qualities enter into definite connections with our movements, they are then referred to the external, or object world. Light and colour, when varying definitely with our various movements, as postures and actions, are from that circumstance referred to the external, or \_non-ego\_; without such connections they would be called internal or subjective states.  
The contrasted terms 'Object' and 'Subject' are the least exceptionable for expressing the fundamental antithesis of consciousness and of existence. Matter and Mind, External and Internal, are the popular synonyms, but are less free from misleading suggestions. Extension is the Object fact by pre-eminence; Pleasure and Pain are the most marked phases of pure Subjectivity. Between the consciousness of extension and the consciousness of a pleasure there is the broadest line that can be drawn within the human experience; the broadest distinction in the whole universe of being. These then are the Object and Subject extremes; and, in the final analysis, the object extreme appears to be grounded on the feeling of expended muscular energy.  
The second omission alluded to is the Digestive Sensibility, which ought undoubtedly to be included among sensations, having all the constituents of a sense; an object--the food; a sensitive organ--the stomach; and a characteristic form of sensibility or feeling. The author farther takes notice of {6} 'Sensations of Disorganization, or of the approach to Disorganization, in any part of the body,' which too deserve to be reckoned among mental facts. He might farther have adverted to the acute and depressing feelings of the Lungs, in case of partial suffocation, with the exhilaration attending the relief from such a state, and the change from a close to a fresh atmosphere. Moreover, there are states of purely physical comfort, associated with a vigorous circulation, with healthy innervation, with the proper action of the skin; and feelings of discomfort and depression from the opposite states. A slight allusion to these various feelings occurs in chapter second towards the close.  
These various modes of sensibility seem to be fitly grouped together under the common head of Sensations of Organic Life: their detail being arranged according to the several organs--viz.--the Alimentary Canal, Lungs, Circulation, Nervous System, &c. These would make a sixth Sense properly so called, or a department of passive sensibility.--\_B.\_] {7}  
  
SECTION I.  
SMELL.](56441.docx#chunk3376)

[It is not material to the present purpose in what order we survey the subdivisions of this elementary class of the mental phenomena. It will be convenient to take those first, which can be most easily thought of by themselves; that is, of which a conception, free from the mixture of any extraneous ingredient, can be most certainly formed. For this reason we begin with SMELL.[2]  
[Bain's footnote 2: The order of exposition of the senses is not a matter of indifference. The author, like Condillac, selected Smell to begin with, as being a remarkably simple and characteristic feeling; he has found another expository advantage in it, by disturbing our routine mode of regarding the intellect as principally made up of sensations of sight. It has a startling effect on the reader, to suggest a mental life consisting wholly of smells and ideas of smell.  
There are two principles of arrangement of the senses, each good for its own purpose; it being understood that the active or muscular sensibility is taken apart from, and prior to, sensation proper.  
The first is to take them in the order of Intellectual development. Some of the senses are evidently intellectual in a high degree, as Sight and Hearing, others are intellectual in a much smaller degree, as Smell and Taste. The organic sensations are still less connected with the operations of the intellect. Many of the least intellectual sensations are remarkably intense, as pleasure and pain; perhaps more so than the intellectually higher class. The organic pains are more unendurable than the worst pains of hearing or of sight, unless these are assimilated to the other class, by injury of the organs.  
The intellectual superiority of the higher senses shows itself in two ways, the one strictly in the domain of Intellect, the other in the domain of Feeling. As regards Intellect, it is shown in the predominance of the ideas of the higher senses. Our intellectual or ideal trains, the materials of thought and knowledge, are made up most of all of ideas of sight, next of ideas of hearing, to a less degree of ideas of touch or skin contact, and, least of all, of ideas of stomach and lung sensations or other organic states. The trains of the scientific man, of the man of business, and even of the handicraft worker, are almost entirely made up of ideas of sight and of hearing (with active or muscular ideas). Our understanding of the order of nature, our very notion of the material universe, is a vast and complex scheme of ideas of sight.  
The intellectual superiority of the higher senses in the domain of Feeling is connected with the remembrance or ideal persistence of pleasures and pains. The pleasures of Digestion are weakly and ineffectively remembered, in the absence of the actuality. The pleasures of Smell are remembered better. The pleasures and pains of Hearing and Sight are remembered best of any. This gives them a higher value in life; the addition made to the actual, by the ideal, is, in their case, the greatest of all. They are said, for this among other reasons, to be more refined.  
The arrangement dictated by the gradation of intellectuality would be as follows:--1. Sensations of Organic Life. 2. Taste. 3. Smell. 4. Touch. 5. Hearing. 6. Sight.  
The second principle of arrangement starts with Touch, as the most simple in its mode of action, and the most diffused in its operation. Touch consists in mere mechanical pressure on a sensitive surface; this is the most simple and elementary of all stimuli. The other senses are regarded as specialised modifications of Touch.  
In Hearing, the mode of action is touch or mechanical contact. In the remaining senses, the contact is accompanied with other forces. Taste and Smell involve chemical change, as well as contact. The action of Light on the eye is probably some species of molecular disturbance involving chemical action. This mode of viewing the order and dependence of the senses belongs more especially to the theory of the development of the organic system, which is made prominent in the Psychology of Mr. Herbert Spencer. The arrangement might be variously expressed:--it might be Touch, Hearing, Sight, Taste, Smell, Organic Sensibility; or Touch, Hearing, Taste, Smell, Organic Sensibility, Sight.--\_B.\_]  
{8} In the Smell three things are commonly distinguished. There is the ORGAN, there is the SENSATION, and there is the antecedent of the Sensation, the {9} external OBJECT, as it is commonly denominated,[1\*] to which the Sensation is referred as an effect to its cause.  
[Mill's footnote 1: It is necessary here to observe, that I use, throughout this Inquiry, the language most commonly in use. This is attended with its disadvantages; for on the subject of mind the ordinary language almost always involves more or less of theory, which may or may not appear to me to correspond with the true exposition of the phenomena. The advantages, however, of not departing from familiar terms still appeared to me to preponderate; and I am willing to hope, that such erroneous suggestions, as are sometimes inseparable from the language I have thought it best upon the whole to employ, will be corrected, without any particular notice, by the analysis which I shall present.--(\_Author's Note\_.)]](56441.docx#chunk3377)

[These three distinguishable particulars are common to all the five Senses. With regard to the ORGAN, which is a physical rather than a mental subject of inquiry, I shall have occasion to say little more than is required to make my reader distinguish, with sufficient accuracy, the part of his body to which the {10} separate feelings of his five Senses belong. And with regard to the antecedent of the Sensation, or OBJECT of the Senses, the proper place for explaining what is capable of being known of it is at a subsequent part of this inquiry. My desire at present is, to fix the attention of the reader upon the SENSATION; that he may mark it as a mental state of a particular kind, distinct from every other feeling of his nature.  
The ORGAN of Smell, as every body knows, is situated in the mouth and nostrils, or in the nerves, appropriated to smelling, which are found in the passage between the mouth and nostrils, and in the vicinity of that passage.  
Though it appears to be ascertained that the nerves are necessary to sensation, it is by no means ascertained in what way they become necessary. It is a mystery how the nerves, similar in all parts of the body, afford us, in one place, the sensation of sound; in another, the sensations of light and colours; in another, those of odours, in another those of flavours, and tastes, and so on.  
With respect to the external OBJECT, as it is usually denominated, of this particular sense; in other words, the antecedent, of which the Sensation Smell is the consequent; it is, in vulgar apprehension, the visible, tangible object, from which the odour proceeds. Thus, we are said to smell a rose, when we have the sensation derived from the odour of the rose. It is more correct language, however, to say, that we smell the odorous particles which proceed from the visible, tangible object, than that we smell the object itself; for, if any thing prevents the odorous particles, which the body emits, from reaching the organ of smell, the {11} sensation is not obtained. The object of the sense of smelling then are odorous particles, which only operate, or produce the sensation, when they reach the organ of smell.  
But what is meant by odorous particles we are still in ignorance. Something, neither visible nor tangible, is conveyed, through the air, to the olfactory nerves; but of this something we know no more than that it is the antecedent of that nervous change, or variety of consciousness, which we denote by the word smell.  
Still farther, When we say that the odorous particles, of which we are thus ignorant, reach the nerves which constitute the organ of smell, we attach hardly any meaning to the word reach. We know not whether the particles in question produce their effect, by contact, or without contact. As the nerves in every part of the body are covered, we know not how any external particles can reach them. We know not whether such particles operate upon the nerves, by their own, or by any other influence; the galvanic, for example, or electrical, influence.  
These observations, with regard to the organ of smell, and the object of smell, are of importance, chiefly as they show us how imperfect our knowledge still is of all that is merely corporeal in sensation, and enable us to fix our attention more exclusively upon that which alone is material to our subsequent inquiries--that point of consciousness which we \*denominate the sensation of smell, the mere feeling, detached from every thing else.  
When we smell a rose, there is a particular feeling, a particular consciousness, distinct from all others, which we mean to denote, when we call it the smell {12} of the rose. In like manner we speak of the smell of hay, the smell of turpentine, and the smell of a fox. We also speak of good smells, and bad smells; meaning by the one, those which are agreeable to us; by the other, those which are offensive. In all these cases what we speak of is a point of consciousness, a thing which we can describe no otherwise than by calling it a feeling; a part of that series, that succession, that flow of something, on account of which we call ourselves living or sensitive creatures.  
We can distinguish this feeling, this consciousness, the sensation of smell, from every other sensation. Smell and Sound are two very different things; so are smell and sight. The smell of a rose is different from the colour of the rose; it is also different from the smoothness of the rose, or the sensation we have by touching the rose.  
We not only distinguish the sensations of smell from those of the other senses, but we distinguish the sensations of smell from one another. The smell of a rose is one sensation; the smell of a violet is another. The difference we find between one smell and another is in some cases very great; between the smell of a rose, for example, and that of carrion or assafoetida.  
The number of distinguishable smells is very great. Almost every object in nature has a peculiar smell; every animal, every plant, and almost every mineral. Not only have the different classes of objects different smells, but probably different individuals in the same class. The different smells of different individuals are perceptible, to a certain extent, even by the human organs, and to a much greater extent by those of the {13} dog, and other animals, whose sense of smelling is more acute.](56441.docx#chunk3378)

[We can conceive ourselves, as endowed with smelling, and not enjoying any other faculty. In that case, we should have no idea of objects as seeable, as hearable, as touchable, or tasteable. We should have a train of smells; the smell at one time of the rose, at another of the violet, at another of carrion, and so on. The successive points of consciousness, composing our sentient being, would be mere smells. Our life would be a train of smells, and nothing more. Smell, and Life, would be two names for the same thing.  
The terms which our language supplies, for speaking of this sense, are exceedingly imperfect. It would obviously be desirable to have, at any rate, distinct names for the ORGAN, for the OBJECT, and for the SENSATION; and that these names should never be confounded. It happens, unfortunately, that the word SMELL is applicable to all the three. That the word smell expresses, both the quality, as we vulgarly say, of the object smelt; and also the feeling of him by whom it is smelt, every one is aware. If you ask whether the smell, when I hold a violet to my nostrils, is in me or in the violet, it would be perfectly proper to say, in both. The same thing, however, is not in both, though the two things have the same name. What is in me is the sensation, the feeling, the point of consciousness; and that can be in nothing but a sentient being. What is in the rose, is what I call a quality of the rose; in fact, the antecedent of my sensation; of which, beside its being the antecedent of my sensation, I know nothing. If I were speaking of a place in which my senses had been {14} variously affected, and should say, that, along with other pleasures, I had enjoyed a succession of the most delightful smells, I should be understood to speak of my \_sensations\_. If I were speaking of a number of unknown objects, and should say of one, that it had a smell like that of honey; of another, that it had a smell like that of garlick; I should be understood as speaking of the \_object\_ of each sensation, a quality of the thing smelt.  
The word smell, beside denoting the \_sensation\_ and the \_object\_, denotes also the \_organ\_, in such phrases as the following; "Sight and Hearing are two of the inlets of my knowledge, and Smell is a third;" "The faculty by which I become sensible of odour is my Smell."[3]  
[Editor's footnote 3: It may be questioned whether, in the phrases here cited, the word Smell stands for the olfactory organ. It would perhaps be most correct to say, that in these cases it denotes the abstract capacity of smelling, rather than the concrete physical instrument. Even when smell is said to be one of the five senses, it may fairly be doubted whether a part of the meaning intended is, that it is one of the five \_organs\_ of sensation. Nothing more seems to be meant, than that it is one of five distinguishable \_modes\_ of having sensations, whatever the intrinsic difference between those modes may be.  
In the author's footnote he recognises that the abstract power of smelling enters into this particular application of the word Smell; and refers to a subsequent part of the treatise for the meaning of Power. But he thinks that along with the power, or as part of the conception of Power, the material organ is also signified. It seems to me that the organ does not enter in either of these modes, into the signification of the word. We can imagine ourselves ignorant that we possess physical organs; or aware that we possess them, but not aware that our sensations of smell are connected with them. Yet on either of these suppositions the "power of smelling" would be perfectly intelligible, and would have the same meaning to us which it has now.--\_Ed.\_]  
{15} In the phrases in which smell is called a SENSE, as when we say, that smell is one of the five senses, there is considerable complexity. The term here imports the \_organ\_, it imports the \_sensation\_, and, in a certain way, it imports also the \_object\_. It imports the organ as existing continuously, the sensation as existing only under a certain condition, and that condition the presence of the object.[2\*]  
[Mill's footnote 2: It will naturally occur to some of my readers, that, in the term sense of smelling, the idea of power is also included. They will say, that when we speak of the sense of smelling, we mean not only the organ, but the function of the organ, or its power of producing a certain effect. This is undoubtedly true; but when the real meaning of the language is evolved, it only amounts to that which is delivered in the text. For what does any person mean when he says that, in the sense of smelling, he has the power of smelling? Only this, that he has an organ, and that when the object of that organ is presented to it, sensation is the consequence. In all this, there is nothing but the organ, the object, and the sensation, conceived in a certain order. This will more fully appear when the meaning of the relative terms, cause and effect, has been explained.--(\_Author's Note\_.)]  
  
{16} SECTION II.  
HEARING.  
  
In Hearing, the same three particulars, the ORGAN, the OBJECT, and the FEELING, require to be distinguished.  
The name of the organ is the Ear; and its nice and complicated structure has been described with minuteness and admiration by anatomists and physiologists.](56441.docx#chunk3379)

[In vulgar discourse, the object of our Sense of Hearing is a sounding body. We say that we hear the bell, the trumpet, the cannon. This language, however, is not correct. That which precedes the feeling received through the ear, is the approach of vibrating air to the ear. Certain bodies, made to vibrate in a certain way, communicate vibrations to the air, and the vibrating air, admitted into the ear, is followed by the sensation of hearing. If the air which the body makes to vibrate does not enter the ear, however the body itself may vibrate, sensation does not follow; hearing does not take place. There is, in fact, no sound. Of the circumstances in which sound is generated, part only were present. There was the organ, and there was the object, but not that juxta-position which is needed to make the antecedent of the sensation complete. Air vibrating in juxta-position to the organ, is the object of Hearing.  
How air in vibration should produce the {17} remarkable effect, called hearing, in the nerves of the ear, and no effect in those of the eye, in those of smelling, or those of taste, our knowledge does not enable us to tell.  
It is not very difficult to think of the sensation of hearing, apart from the organ, and from the object, as well as from every other feeling. I hear the hum of bees. The feeling to which I give this name is a point of my own consciousness; it is an elementary part of my sensitive being; of that thread of consciousness, drawn out in succession, which I call myself. I have the hearing; it is a sensation of my own; it is my feeling, and no other man's feeling; it is a very different feeling from taste, and a very different feeling from smell, and from all my other feelings.  
I hear the song of birds, I hear the lowing of oxen, I hear the sighing of the wind, I hear the roaring of the sea. I have a feeling, in each of these cases; a consciousness, which I can distinguish not only from the feelings of my other senses, but from the other feelings of the same sense. If I am asked, what takes place in me, when a trumpet is unexpectedly sounded in the next room, I answer, a sensation, a particular feeling. I become conscious in a particular way.  
The number of those feelings which we are able to distinguish is very great. In this respect, the organ of hearing in man, is much more perfect than the organ of smell. The organ of hearing can distinguish, not only the voices of different classes, but of different individuals in the same class. There never, probably, {18} was a man whose voice was not distinguishable from that of every other man, by those who were familiarly acquainted with it.  
The most simple case of sound is that perhaps of a single note on a musical instrument. This note may be sounded on an endless number of instruments, and by an endless number of human voices, from no two of which will the same sound exactly be returned.  
We can think of ourselves as having the feelings of this class, and having no other. In that case, our whole being would be a series of Hearings. It would be one sensation of hearing, another sensation of hearing, and nothing more. Our thread of consciousness would be the sensation, which we denominate sound. Life and sound would be two names for the same thing.  
The language by which we speak of the "sense of hearing," is also imperfect. We have, indeed, the term Ear, to express the ORGAN, but we have no appropriate name for the SENSATION, nor for the OBJECT. The term sound is a name both of the sensation and the object. If I were asked, when the bell rings, whether the sound is in me, or in the bell, I might answer, in both; not that the same thing is in both; the things are different; having the same name. The sensation called a sound is in me, the vibration called a sound is in the bell. Hearing is equally ambiguous; a name both of the organ and the feeling. If asked, by which of my organs I have the knowledge of sound, I should answer, my hearing. And if asked what feeling it is I have by the ear, I still should say, hearing. Hearing is rarely made use of to denote {19} the object of hearing, and hardly at all except by figure.  
Noise is a name which denotes the object, in certain cases. There is a certain class of sounds, to which we give the name noise. In those cases, however, noise is also the name of the sensation. In fact, it is the name of the sensation first, and only by transference that of the object.  
In the phrase, sense of hearing, the word has the same complexity of meaning, which we found in the word smelling, in the corresponding application of that term. When I say that I have the sense of hearing, I mean to say, that I have an organ, which organ has an appropriate object; and that when the organ and the object are in the appropriate position, the sensation of hearing is the consequent. In the term, sense of hearing, then, is included, the organ, the object, and the sensation, with the idea of a synchronous order of the two first, and a successive order of the third. "Sense of hearing" is thus seen to be the name of a very complex idea, including five distinguishable ingredients, the idea of the organ of hearing, the idea of the sensation, the idea of the object of hearing, the idea of a synchronous order, and the idea of a successive order.[4]](56441.docx#chunk3380)

[[Editor's footnote 4: In the case of hearing, as of smell, one of the ambiguities brought to notice by the author is of questionable reality. It is doubtful if "hearing" is ever used as a name of the organ. To the question supposed in the text, "by which of my organs do I have the knowledge of sound" the correct answer would surely be, not "my hearing"--an expression which, so {20} applied, could only be accepted as elliptical,--but "my organ of hearing," or (still better) "my ear." Again, the phrase "I have the sense of hearing" signifies that I have a capacity of hearing, and that this capacity is classed as one of sense, or in other words, that the feelings to which it has reference belong to the class Sensations: but the organ, though a necessary condition of my having the sensations, does not seem to be implied in the name.--\_Ed.\_]  
  
{21} SECTION III.  
SIGHT.  
  
In SIGHT, the organ is very conspicuous, and has an appropriate name, the Eye.  
In ordinary language, the object of sight is the body which is said to be seen. This is a similar error to those which we have detected in the vulgar language relating to the senses of smell and hearing. It is Light alone which enters the eye; and Light, with its numerous modifications, is the sole object on sight.  
How the particles of light affect the nerves of the eye, in the peculiar manner in which they are affected in sight, without affecting the other nerves of the body, in any similar manner, we can render no account.  
That the feeling we have in sight, is very different from the feeling we have in hearing, in smelling, in tasting, or touching, every man knows. It is difficult, however, to detach the feeling we have in sight from every other feeling; because there are other feelings which we are constantly in the habit of connecting with it; and the passage in the mind from the one to the other is so rapid, that they run together, and can not easily be distinguished. The different modifications of light we call colour. But we cannot think of the sensation of colour, without at the same time {22} thinking of something coloured, of surface or extension, a notion derived from another sense.  
That the feelings of sight which we are capable of distinguishing from one another, are exceedingly numerous, is obvious from this, that it is by them we distinguish the infinite variety of visible objects. We have the sensation; the sensation suggests the object; and it is only by the difference of sensation, that the difference of object can be indicated.  
Some of the things suggested by the sensations of sight, as extension and figure, are suggested so instantaneously, that they appear to be objects of sight, things actually seen. But this important law of our nature, by which so many things appear to be seen, which are only suggested by the feelings of sight, it requires the knowledge of other elements of the mental phenomena to explain.  
The imperfections of the language, by which we have to speak of the phenomena of sight, deserve the greatest attention.  
We have an appropriate name for the organ; it is the Eye. And we have an appropriate name for the Object; it is light. But we have no appropriate name for the Sensation. From confusion of names, proceeds confusion of ideas. And from misnaming, on this one point, not a little unprofitable discourse on the subject of the human mind has been derived.  
The word sight, in certain phrases, denotes the sensation. If I am asked, what is the feeling which I have by the eye? I answer, sight. But sight is also a name of the object. The light of day is said to be a beautiful sight. And sight is sometimes employed as a name of the organ. An old man informs us, {23} that his sight is failing, meaning that his eyes are failing.[5]  
[Editor's footnote 5: The example given does not seem to me to prove that sight is ever employed as a name of the organ. When an old man says that his sight is failing, he means only that he is less capable of seeing. His eyes might be failing in some other respect, when he would not say that his sight was failing. The term "sense of sight," like sense of hearing or of smell, stands, as it seems to me, for the capability, without reference to the organ.--\_Ed.\_]  
Colour is a name, as well of the object, as of the sensation. It is most commonly a name of the object. Colour is, properly speaking, a modification of light, though it is never conceived but as something spread over a surface; it is, therefore, not the name of light simply, but the name of three things united, light, surface, and a certain position of the two. In many cases, however, we have no other name for the sensation. If I am asked, what feeling I have when a red light is presented to my eyes, I can only say, the colour of red; and so of other visual feelings, the colour of green, the colour of white, and so on.  
In the term sense of sight, the same complexity of meaning is involved which we have observed in the terms sense of smell, and sense of hearing. When I speak of my sense of sight, as when I speak of the attraction of the load-stone, I mean to denote an antecedent, and a consequent; the organ with its object in appropriate position, the antecedent; the sensation, the consequent. This is merely the philosophical statement of the fact, that, when light is received into the eye, the sensation of sight is the consequence.](56441.docx#chunk3381)

[Vision, a word expressive of the phenomena of {24} sight, is ambiguous in the same manner. It is sometimes used to denote the sense of seeing; that is, the antecedent and consequent, as explained in the preceding paragraph. Thus we say, the phenomena of vision, with the same propriety as we say the phenomena of sight. It is sometimes employed to denote the sensation. If we ask what feeling a blind man is deprived of, it would be perfectly proper to say, vision is the feeling of which he is deprived. It is, also, employed to denote the object. What vision was that? would be a very intelligible question, on the sudden appearance and disappearance of something which attracted the eye.[6]  
[Editor's footnote 6: Vision, I believe, is used to denote the object of sight, only when it is supposed that this object is something unreal, \_i.e.\_, that it has not any extended and resisting substance behind it: or rhetorically, to signify that the object looks more like a phantom than a reality; as when Burke calls Marie Antoinette, as once seen by him, a delightful vision.--\_Ed.\_]  
  
{25} SECTION IV.  
TASTE.  
  
The ORGAN of TASTE is in the mouth and fauces.  
In ordinary language, the OBJECT of taste is any thing, which, taken into the mouth, and tasted, as it is called, produces the peculiar SENSATION of this sense. Nor has philosophy as yet enabled us to state the object of taste more correctly. There are experiments which show, that galvanism is concerned in the phenomena, but not in what way.  
The SENSATION, in this case, is distinguished by every body. The taste of sugar, the taste of an apple, are words which immediately recall the ideas of distinct feelings. It is to be observed, however, that the feelings of this sense are very often united with those of the sense of smell; the two organs being often affected by the same thing, at the same time. In that case, though we have two sensations, they are so intimately blended as to seem but one; and the flavour of the apple, the flavour of the wine, appears to be a simple sensation, though compounded of taste and smell.[7]  
[Editor's footnote 7: Some physiologists have been of opinion that a large proportion of what are classed as tastes, including all flavours, as distinguished from the generic tastes of sweet, sour, bitter, &c., are really affections of the nerves of smell, and are mistaken for tastes only because they are experienced along with tastes, as a consequence of taking food into the mouth.--\_Ed.\_]  
{26} It is not so easy, in the case of this, as of some of the other senses, to conceive ourselves as having this class of feelings and no other. Antecedent to the sensation of taste, there is generally some motion of the mouth, by which the object and the organ are brought into the proper position and state. The sensation can hardly be thought of without thinking of this motion, that is, of other feelings. Besides, the organ of taste is also the organ of another sense. The organ of taste has the sense of touch, and most objects of taste are objects of touch. Sensations of touch, therefore, are intimately blended with those of taste.  
By a little pains, however, any one may conceive the sensations of tasting, while he conceives his other organs to remain in a perfectly inactive state, and himself as nothing but a passive recipient of one taste after another. If he conceives a mere train of those sensations, perfectly unmixed with any other feeling, he will have the conception of a being made up of tastes; a thread of consciousness, which maybe called mere taste; a life which is merely taste.  
The language employed about this sense is not less faulty, than that employed about the other senses, which we have already surveyed.  
There is no proper name for the organ. The word Mouth, which we are often obliged to employ for that purpose, is the name of this organ and a great deal more.  
There is no proper name for the object. We are obliged to call it, that which has taste. The word flavour is used to denote that quality, which is more peculiarly the object of taste, in certain articles of food; and sometimes we borrow the word sapidity, {27} from the Latin, to answer the same purpose more extensively.  
The word taste is a name for the sensation. We generally call the feeling, which is the point of consciousness in this case, by the name taste. Thus we say one taste is pleasant, another unpleasant; and nothing is pleasant or unpleasant but a feeling.  
The word taste is also a name for the object, as when we say, that any thing has taste.  
It is further employed as a name of the organ. As we are said to perceive qualities by the eye, the ear, and the touch; so we are said to perceive them by the taste.  
In the phrase, sense of taste, there is the same complexity of meaning as we have observed in the corresponding phrase in the case of the other senses. In this phrase, taste expresses all the leading particulars; the organ, the object, and the sensation, together with the order of position in the two first, and the order of constant sequence in the last.[8]  
[Editor's footnote 8: The statement that "taste" is sometimes employed as a name of the organ, seems to me, like the similar statements respecting the names of our other senses, disputable.--\_Ed.\_]  
  
{28} SECTION V.  
TOUCH.  
  
In discoursing about the ORGAN, the SENSATIONS, and the OBJECTS, of touch, more vagueness has been admitted, than in the case of any of the other senses.](56441.docx#chunk3382)

[In fact, every sensation which could not properly be assigned to any other of the senses, has been allotted to the touch. The sensations classed, or rather jumbled together, under this head, form a kind of miscellany, wherein are included feelings totally unlike.  
The ORGAN of TOUCH is diffused over the whole surface of the body, and reaches a certain way into the alimentary canal. Of food, as merely tangible, there is seldom a distinct sensation in the stomach, or any lower part of the channel, except towards the extremity. The stomach, however, is sensible to heat, and so is the whole of the alimentary canal, as far at least as any experiment is capable of being made. It may, indeed, be inferred, that we are insensible to the feelings of touch, throughout the intestinal canal, only from the habit of not attending to them.[9]  
[Bain's footnote 9: The surface of the sense of Touch properly so called is the skin, or common integument of the body, the interior of the mouth and the tongue, and the interior of the nose. There are common anatomical peculiarities in these organs; which distinguish them from the alimentary canal and all the other interior surfaces of the body. Moreover, although, in the alimentary canal, there is solid or liquid contact with a sensitive surface, the mode of exciting the sensitive nerves, and the resulting sensibility, are peculiar and distinct. The mode of action in touch is mechanical contact or pressure, mainly of solid and resisting bodies; in digestion, the nerves are affected through chemical and other processes--solution, absorption, assimilation, &c. In touch, there is the peculiar feeling known as hard contact, together with the varying discrimination of plurality of points. In digestion, when healthy, the feeling of contact is entirely absent.--\_B.\_]  
{29} We have next to consider the OBJECT of TOUCH. Whatever yields resistance, and whatever is extended, figured, hot, or cold, we set down, in ordinary language, as objects of touch.  
I shall show, when the necessary explanations have been afforded, that the idea of resistance, the idea of extension, and the idea of figure, include more than can be referred to the touch, as the ideas of visible figure and magnitude include more than can be referred to the eye. It has been long known, that many of the things, which the feeling by the eye seems to include, it only suggests. It is not less important to know, that the same is the case with the tactual feeling; that this also suggests various particulars which it has been supposed to comprehend.  
In the present stage of our investigation, it is not expedient to push very far the inquiry, what it is, or is not, proper, to class as sensations of touch, because that can be settled with much greater advantage hereafter.  
The sensations of heat and cold offer this advantage,--that being often felt without the accompaniment of {30} any thing visible or extended, which can be called an object, they can be more distinctly conceived as simple feelings, than most of our other sensations.[10] They are feelings very different from the ordinary sensations of touch; and possibly the only reason for classing them with those sensations was, that the organ of them, like that of touch, is diffused over the whole body. We know not that the nerves appropriated to the sensations of heat and cold are the same with those which have the sensation of touch. If they be the same, they must at any rate be affected in a very different manner.  
[Bain's footnote 10: The sensations of heat and cold are, of all sensations, the most \_subjective\_. The reason is that they are least connected with definite muscular energies. The rise and fall of the temperature of the surrounding air may induce sensations wholly independent of our own movements; and to whatever extent such independence exists, there is a corresponding absence of objectivity. This independence, however, is still only partial, even in the case of heat and cold; in a great number, perhaps a majority, of instances, they depend upon our movements; as in changing our position with reference to a fire, in our clothing, and so on. It is the possibility of conceiving them in the pure subject character, and apart from object relations, that constitutes them simple feelings, in the acceptation of the text. Although not in an equal degree, the same is true of sensations of hearing, on which the author made a similar remark.--\_B\_].  
To whatever class we may refer the sensations of heat and cold, in their moderate degrees, it seems that good reasons may be given for not ranking them with the sensations of touch, when they rise to the degree of pain. All those acute feelings which attend the disorganization, or tendency toward disorganization, {31} of the several parts of our frame, seem entirely distinct from the feelings of touch. Even in the case of cutting, or laceration, the mere touch of the knife or other instrument is one feeling, the pain of the cut, or laceration, another feeling, as much as, in the mouth, the touch of the sugar is one feeling, the sweetness of it another.  
As we shall offer reasons hereafter to show, that the feelings of resistance, extension, and figure, are not feelings of touch, we should endeavour to conceive what feeling it is which remains when those feelings are taken away.](56441.docx#chunk3383)

[When we detach the feeling of resistance, we, of course, detach those of hardness and softness, roughness and smoothness, which are but different modifications of resistance. And when these, and the feelings of extension and figure, are detached, a very simple sensation seems to remain, the feeling which we have when something, without being seen, comes gently in contact with our skin, in such a way, that we cannot say whether it is hard or soft, rough or smooth, of what figure it is, or of what size. A sense of something present on the skin, and perhaps also on the interior parts of the body, taken purely by itself, seems alone the feeling of touch.  
The feelings of this sense are mostly moderate, partaking very little of either pain or pleasure. This is the reason why the stronger feelings, which are connected with them, those of resistance, and extension, predominate in the groupe, and prevent attention to the sensations of touch. The sensations of touch operate as signs to introduce the ideas of resistance and extension, and are no more regarded.  
{32} The imperfection of the language which we employ, in speaking of this sense, deserves not less of our regard, than that of the language we employ, in speaking of our other senses.  
We need distinct and appropriate names, for the organ, for the object, and for the sensation. We have no such name for any of them.  
The word touch is made to stand for all the three. I speak of my touch, when I mean to denote my organ of touch. I speak also of my touch, when I mean to denote my sensation. And in some cases, speaking of the object, I call it touch. If I were to call a piece of fine and brilliant velvet a fine sight, another person might say, it is a fine touch as well as fine sight.[11]  
[Editor's footnote 11: It is more true of the word touch, than of the names of our other senses, that it is occasionally employed to denote the organ of touch; because that organ, being the whole surface of the body, has not, like the organs of the special senses, a compact distinctive name. But it may be doubted if the word touch ever stands for the object of touch. If a person made use of the phrase in the text, "it is a fine touch as well as a fine sight," he would probably be regarded as purchasing an epigrammatic turn of expression at the expense of some violence to language.--\_Ed.\_]  
In ordinary language, the word feeling is appropriated to this sense; though it has been found convenient, in philosophical discourse, to make the term generical, so as to include every modification of consciousness.[3\*]  
[Mill's footnote 3: "The word \_feeling\_, though in many cases we use it as synonymous to \_touching\_, has, however, a much more extensive signification, and is frequently employed to denote our internal, as well as our external, affections. We feel hunger and thirst, we feel joy and sorrow, we feel love and hatred."--\_Ad. Smith\_, \_on the External Senses\_.--(\_Author's Note\_.)]  
When I say that I feel the table, there is a considerable complexity of meaning. Dr. Reid, and his followers, maintain, that I have not one point of {33} consciousness only, but two; that I feel the sensation, and that I feel the table; that the sensation is one thing, the feeling of the table another. Expositions which will be given hereafter are necessary to the complete elucidation of what takes place. But the explanations which have been already afforded will enable us to state the facts with considerable clearness. In what is called feeling the table, my organ of touch, and an object of touch, in the appropriate position, are the antecedent; of this antecedent, sensation is the consequent. The expression, "I feel the table," includes both the antecedent and the consequent. It does not mark the sensation alone; it marks the sensation, and, along with the sensation, its antecedent, namely, the organ, and its object in conjunction.  
The phrase, sense of touch, or the word feeling, often synonymous, has the same complexity of meaning, which we have observed in the phrases, sense of hearing, sense of sight, and the rest of the senses.  
When I say that I touch, or have the sense of touch, I mean to say, that I have a certain feeling, consequent upon a certain antecedent. The phrase, therefore, \_notes\_ the sensation, and at the same time \_connotes\_[4\*] the following things: 1st, the organ; 2dly, {34} the object of the organ; 3dly, the synchronous order of the organ and object; 4thly, the successive order of the sensation; the synchronous order being, as usual, the antecedent of the successive order.[5\*] [12]  
[Mill's footnote 4: The use, which I shall make, of the term \_connotation\_, needs to be explained. There is a large class of words, which denote two things, both together; but the one perfectly distinguishable from the other. Of these two things, also, it is observable, that such words express the one, \_primarily\_, as it were; the other, in a way which may be called \_secondary\_. Thus, \_white\_, in the phrase \_white horse\_, denotes two things, the colour, and the horse; but it denotes the colour \_primarily\_, the horse \_secondarily\_. We shall find it very convenient, to say, therefore, that it \_notes\_ the primary, \_connotes\_ the secondary, signification.--(\_Author's Note\_.) [Reasons will be assigned further on, why the words \_to connote\_ and \_connotation\_ had better be employed, not as here indicated, but in a different and more special sense.--ED.]]](56441.docx#chunk3384)

[[Mill's footnote 5: The terms \_synchronous\_ order, and \_successive\_ order, will be fully explained hereafter, when any obscurity which may now seem to rest upon them will be removed; it may be useful at present to say, that, by synchronous order, is meant order in space, by successive order, order in time; the first, or order in space, being nothing but the placing or position of the objects at any given time; the second, or order in time, being nothing but the antecedence of the one, and the consequence of the other.--(\_Author's Note\_.)]  
[Bain's footnote 12: \_Additional Observations on the Sense of Touch\_.--The author is right in drawing a distinction between Touch proper and the sensibility to Heat and Cold, which, though principally found in the skin, extends beyond the seat of tactile sensibility, as, for example, to the alimentary canal, and to the lungs. It is a debated point, whether the nerves of Touch are also the nerves of Heat and Cold; some persons contending for special nerves of Temperature. Such special nerves, however, have not been proved to exist.  
The remark is also correct, that the feelings of temperature can be more easily attended to, as simple feelings, than the {35} feelings of touch proper. The reason is not precisely stated. It is that radiant heat may affect the surface of the body without occasioning resistance or movement, and is thus a purely passive sensibility; a subject-state without an object-accompaniment. When the degree of the sensation varies definitely with definite movements, it is treated as an object sensibility, or as pointing to the object world. Thus when we grow warmer as we move in one direction, and colder as we move in another, we no longer think of the feeling as a purely subject fact, but as having an object, or external embodiment.  
It is also justly remarked in the text, that the severe sensations of heat, and cold, as well as those from laceration of the skin, may be properly classed with feelings of disorganization generally. At the same time, these painful feelings have a character varying with the organ affected; the fact of injury of tissue may be the same, but the feeling will not be the same, in the skin, the nostrils, the ear, the eye, the alimentary canal.  
The description above given of the feeling that remains, when the different modifications of resistance are deducted, is scarcely adequate to represent the reality. Frequently it is true of them, that they 'are mostly moderate, partaking very little of either pain or pleasure,' but there are occasions when they rise into prominence and power. We may refer to the contact of the bedclothes at night, when the body is relieved from the tight and deadening embrace of the ordinary clothing. The case of greatest moment, however, is the contact of one human being or animal with another; such contact being the physical element in the tender as well as in the sexual affections. There is a combination of tactile sensibility and warmth in this instance, each counting for a part of the pleasure. The influence is well enough known as experienced among human beings; but the sphere of its operation in animals has been but imperfectly explored.  
If we observe carefully the first movements of a new-born animal, a mammal for example, we find that the guiding and {36} controlling sensation of its first moments, is the contact with the mother. In that contact, it finds satisfaction and repose; in separation, it is in discomfort and disquiet. Its earliest volitions are to retain and to recover the soft warm touch of the maternal body. When it commences sucking, and has the sensation of nourishment, a new interest springs up, perhaps still more powerful in its attractions, and able to supersede the first, or at least to put it into a second place; yet, during the whole period of maternal dependence, the feeling of touch is a source of powerful sensibility both to the mother and to the offspring. Among animals born in litter, as pigs, kittens, &c., the embrace is equally acceptable between the fellow-progeny themselves. The sensual pleasure of this contact is the essence, the fact, of animal affection, parental and fraternal; and it is the germ, or foundation, and concomitant of tender affection in human beings. It is the experience of this agreeable contact that prepares the way for a still closer conjunction after the animal reaches puberty. Independent of, and antecedent to, that still more acute sensibility, there is a pleasure in the warm embrace of two animals, and they are ready to enter upon it, at all times when the other interests, as nourishment, exercise and repose, are not engrossing. The play of animals with one another clearly involves the pleasure of the embrace, even without sexuality; and it leads to the sexual encounter at the ripe moment.--\_B.\_]  
  
{37} SECTION VI.  
SENSATIONS OF DISORGANIZATION, OR OF THE APPROACH TO DISORGANIZATION, IN ANY PART OF THE BODY.  
  
That we have sensations in parts of the body suffering, or approaching to, disorganization, does not require illustration. The disorganizations of which we speak proceed sometimes from external, sometimes from internal, causes. Lacerations, cuts, bruises, burnings, poisonings, are of the former kind; inflammation, and other diseases in the parts, are the latter.  
These sensations are specifically different from those classed under the several heads of sense. The feelings themselves, if attended to, are evidence of this. In the next place, they have neither organ, nor object, in the sense in which those latter feelings have them. We do not talk of an organ of burning; an organ of pain; nor do we talk of an object of any of them; we do not say the object of a cut, the object of an ache, the object of a sore.](56441.docx#chunk3385)

[Most of those sensations are of the painful kind; though some are otherwise. Some slight, or locally minute inflammations, produce a sensation called itching, which is far from disagreeable, as appears from the desire to scratch, which excites it.[13]  
[Editor's footnote 13: The author, in this passage, uses the word itching out of its ordinary sense; making it denote the pleasant sensation accompanying the relief by scratching, instead of the slightly painful, and sometimes highly irritating, sensation which the scratching relieves.--\_Ed.\_]  
{38} The scratching, which excites the pleasure of itching, is a species of friction, and friction, in most parts of the body, excites a sensation very different from the mere sense of touching or the simple feeling of the object. The tickling of the feather in the nose, for example, is very different from the mere feeling of the feather in touch. In some parts of the body the most intense sensations are produced by friction.  
There is difficulty in classing those sensations. They are not the same with those of any of the five senses: and they are not the same with those which rise from any tendency to disorganization in the parts of the body to which they are referred. Great accuracy, however, in the classification of the sensations, is not essential to that acquaintance with them, which is requisite for the subsequent parts of this inquiry. It will suffice for our purpose, if the reader so far attend to them, as to be secure from the danger of overlooking or mistaking them, where a distinct consideration of them is necessary for developing any of the complicated phenomena in which they are concerned.[14]  
[Bain's footnote 14: \_Organic Sensibilities\_.--The author did well to signalize these sensibilities, so powerful in their influence on human life. They are not confined to the side of pain. The same organs whose disorganization is connected with pain, are, in their healthy and vigorous working, more or less connected with pleasure. This is true not merely of the digestive functions, but of the respiration, the circulation, and others.  
Nor is it difficult in their case to make up the full analogy {39} of a sense, as having an Object, an Organ, and a characteristic Sensation. In digestion, the object is the food, the organ is the alimentary canal; in respiration, the object is the air, and the organ the lungs. If it be said that the air is an impalpable agent and not discovered to the mind by its mode of operating, so is heat, the object of an admitted sense.  
The accurate classification of these feelings may not have much speculative interest, in Psychology, but it has a great practical interest in the diagnosis of disease. For want of subjective knowledge on the part of the patient, and of a well understood nomenclature of subjective symptoms, the discrimination of disease by the feelings is usually very rough.  
The best mode of arranging these sensibilities seems to be to connect them with their organs, or seats--Muscular Tissue, Bones and Ligaments, Nerves, Heart and Circulation, Lungs, Alimentary Canal. The sensations of itching and tickling are modes of skin sensibility. Tickling is an effect not well understood, although some interesting observations have been made upon it.--\_B.\_]  
  
{40} SECTION VII.  
MUSCULAR SENSATIONS, OR THOSE FEELINGS WHICH ACCOMPANY THE ACTION OF THE MUSCLES.  
  
There is no part of our Consciousness, which deserves greater attention than this; though, till lately, it has been miserably overlooked. Hartley, Darwin, and Brown, are the only philosophical inquirers into Mind, at least in our own country, who seem to have been aware that it fell within the province of their speculations.  
The muscles are bundles of fibres, which, by their contraction and relaxation, produce all the motions of the body. The nerves, with which they are supplied, seem to be the immediate instruments of the muscular action.  
That these muscles have the power of acute sensation, we know, by what happens, when they are diseased, when they suffer any external injury, or even when, the integuments being removed, they can be touched, though ever so gently.  
It has been said,[6\*] that if we had but one sensation, {41} and that uninterrupted, it would be as if we had no sensation at all; and, to the justice of this observation, some very striking facts appear to bear evidence. We know that the air is continually pressing upon our bodies. But, the sensation being continual, without any call to attend to it, we lose, from habit, the power of doing so. The sensation is as if it did not exist. We feel the air when it is in motion, or when it is hotter or colder, to a certain degree, than our bodies; but it is because we have the habit of attending to it in those states. As the muscles are always in contact with the same things, the sensations of the muscles must be almost constantly the same. This is one reason why they are very little attended to, and, amid the crowd of other feelings, are, in general, wholly forgotten. They are of that class of feelings which occur as antecedents to other more interesting feelings. To these the attention is immediately called off, and those which preceded and introduced them are forgotten. In such cases the thought of the less interesting sensations is merged in that of the more interesting.](56441.docx#chunk3386)

[[Mill's footnote 6: Itaque et sensioni adhaeret, proprie dictae, ut ei aliqua insita sit perpetuo phantasmatum varietas, ita ut aliud ab alio discerni posset. Si supponeremus, enim, esse hominem, oculis quidem claris caeterisque videndi organis recte se habentibus compositum, nullo autem alio sensu praeditum, eumque ad eandem rem eodem semper colore et specie sine ulla vel minima varietate apparentem obversum esse, mihi certe, quicquid dicant alii, non magis videre videretur, quam ego videor mihi per tactus organa sentire lacertorum meorum ossa. Ea tamen perpetuo et undequaque sensibilissima membrana continguntur.--Adeo sentire semper idem, et non sentire, ad idem recidunt. \_Hobbes\_, \_Elem. Philos.\_ Pars IV. c. xxv. SS 5.--(\_Author's Note\_.)]  
If we had not direct proof, analogy would lead us to conclude, that no change could take place, in parts of so much sensibility as the muscles, without a change of feeling; in particular, that a {42} distinguishable feeling must attend every contraction, and relaxation. We have proof that there is such a feeling, because intimation is conveyed to the mind that the relaxation or contraction is made. I will, to move my arm; and though I observe the motion by none of my senses, I know that the motion is made. The feeling that attends the motion has existed. Yet so complete is my habit of attending only to the motion, and not to the feeling, that no attention can make me distinctly sensible that I have it. Nay, there are some muscles of the body in constant and vehement action, as the heart, of the feelings attendant upon the action of which we seem to have no cognisance at all. That this is no argument against the existence of those feelings, will be made apparent, by the subsequent explanation of other phenomena, in which the existence of certain feelings, and an acquired incapacity of attending to them, are out of dispute.[15]  
[Editor's footnote 15: The paradox, of feelings which we have no cognisance of--feelings which are not felt--will be discussed at large in a future note.--\_Ed.\_]  
In most cases of the muscular feelings, there is not only that obscurity, of which we have immediately spoken, but great complexity; as several muscles almost always act together; in many of the common actions of the body, a great number.  
The result of these complex feelings is often sufficiently perceptible, though the feelings, separately, can hardly be made objects of attention. The unpleasant feeling of fatigue, in part at least a muscular feeling, is one of those results. The pleasure which almost all the more perfect animals, especially the {43} young, appear to feel, in even violent exercise, may be regarded as another. The restlessness of a healthy child; the uneasiness in confinement, the delight in the activity of freedom, which so strongly distinguish the vigorous schoolboy; seem to indicate, both a painful state of the muscular system in rest, and a pleasurable state of it in action. Who has not remarked the playful activity of the kitten and the puppy? The delight of the dog, on being permitted to take exercise with his master, extends through the greater part of his life.  
One of the cases in which the feeling of muscular action seems the most capable of being attended to, is the pleasure accompanying the act of stretching, which most animals perform in drowsiness, or after sleep.  
A very slight degree of reflection is sufficient to evince, that we could not have had the idea of resistance, which forms so great a part of what we call our idea of matter, without the feelings which attend muscular action. Resistance means a force opposed to a force; the force of the object, opposed to the force which we apply to it. The force which we apply is the action of our muscles, which is only known to us by the feelings which accompany it. Our idea of resistance, then, is the idea of our own feelings in applying muscular force. It is true, that the mere feeling of the muscles in action is not the only feeling concerned in the case. The muscles move in consequence of the Will; and what the Will is, we are not as yet prepared to explain. What is necessary at present is, not to shew all the simple feelings which enter into the feeling of resistance; but to shew {44} that the simple feeling of muscular action is one of them.  
The feeling of resistance admits of great varieties. The feeling of a plate of iron is one thing, the feeling of a blown bladder is another, the feeling of quicksilver is a third, the feeling of water a fourth, and so on. The feeling of weight, or attraction, is also a feeling of resistance.  
  
{45} SECTION VIII.  
SENSATIONS IN THE ALIMENTARY CANAL.  
  
When the sensations in the alimentary canal become acutely painful, they are precise objects of attention to every body.  
There is reason to believe that a perpetual train of sensations is going on in every part of it. The food stimulates the stomach. It undergoes important changes, and, mixed with some very stimulating ingredients, passes into the lower intestines; in every part of which it is still farther changed. The degree, and even the nature, of some of the changes, are different, according as the passage through the canal is slower, or quicker; they are different, according to the state of the organs, and according to the nature of the food.](56441.docx#chunk3387)

[Of the multitude of sensations, which must attend this process, very few become objects of attention; and, in time, an incapacity is generated, of making them objects of attention. They are not, however, as we shall afterwards perceive, feeble agents, or insignificant elements, in the trains of thought. They are of that class of feelings, to which we have already been under the necessity of alluding; a class, which serve as antecedents, to feelings more interesting than themselves; and from which the attention is so instantaneously drawn, to the more interesting feelings by which they are succeeded, that we are as little sensible of their existence, as we often are of the {46} sound of the clock, which may strike in the room beside us, and of course affect our ear in the usual manner, and yet leave no trace of the sensations behind.  
The complicated sensations in the intestinal canal, like those in the muscles, though obscure, and even unknown, as individual sensations, often constitute a general state of feeling, which is sometimes exhilarating, and sometimes depressing. The effects of opium, and of inebriating liquors, in producing exhilaration, are well known; and though much of the pleasure in these states is owing to association, as we shall afterwards explain, yet the agreeable feelings in the stomach, are the origin and cause of the joyous associations.[16] The state of feeling in the stomach in seasickness, or under the operation of an emetic, is, on the contrary, one of the most distressing within our experience; though we can neither call it a pain, nor have any more distinct conception of it, than as a state of general uneasiness.  
[Bain's footnote 16: The exact mode of operation of opium and alcohol is still unknown; but the part affected is probably the nervous substance and not the stomach. It can hardly be said with propriety that any part of the pleasure of these stimulants is due to association. No doubt the exhilarated tone of the mind is favourable to the flow of joyful ideas, which serve to heighten the pleasure; but that pleasure could not be arrested or subdued through the absence of any supposable associations.--\_B.\_]  
The general effects of indigestion are well known. When the organs of digestion become disordered, and indigestion becomes habitual, a sense of wretchedness is the consequence; a general state of feeling composed of a multitude of minor feelings, none of {47} which individually can be made an object of attention.  
In the sense of wretchedness, which accompanies indigestion, and which sometimes proceeds to the dreadful state of melancholy madness, it is difficult to say, how much is sensation, and how much association. One thing is certain; that sensations which are the origin of so much misery are of high importance to us; whether they, or the associations they introduce, are the principal ingredient in the afflicting state which they contribute to create.  
The effects of indigestion in producing painful associations, is strikingly exemplified by the horrible dreams which it produces in sleep; not only in those whose organs are diseased; but in the most healthy state of the stomach, when it has received what, in ordinary language, is said, whether from quantity or quality, to have disagreed with it.  
The general states of feeling composed of the multitude of obscure and unnoticed feelings in the alimentary canal, though most apt to be noticed when they are of the painful kind, are not less frequently of the pleasurable kind. That particular sorts of foods, as well as liquors, have an exhilarating effect, needs hardly to be stated. And it is only necessary to revive the recollection of the feeling of general comfort, the elasticity, as it seems, of the whole frame, the feeling of strength, the disposition to activity and enjoyment, which every man must have experienced, when his digestion was vigorous and sound.[17]  
[Bain's footnote 17: These effects pass beyond the influence of mere digestion. All the viscera contribute to the condition of high general {48} vigour and comfort here supposed. If one were to venture upon a scale of relative importance of the different organs, one would place the nervous centres first, and the digestion second.  
The present section is open to several remarks. Some qualification must be given to the author's surmise 'that a perpetual train of sensations is going on in every part of the alimentary canal.' It is hardly correct to say that there are perpetual sensations in \_any\_ part of it: during a great part of our time we are in a state of indifference as to stomachic changes; and not merely because we are not disposed to attend to them, but because they scarcely exist. The sensibility of the organ is shown, on anatomical grounds, to be mainly in the stomach, and in the rectum; these parts are supplied by the nervus vagus; and very few nerves, besides those of the sympathetic system, are found in the smaller, or in the larger intestine, so that the sensitiveness of those parts is manifested only in case of violent disorganization, as cramp, stoppage, or inflammation. Hence the feelings are principally attendant on the changes in the stomach, as when food has just been taken, and after long privation, when the state called hunger shows itself.  
It is not correct to class the sensations of the alimentary canal, as a whole, with those that lose their hold of the attention, that become unheeded in themselves, and are valued only as the antecedents of other more pleasurable feelings. The remark is inapplicable to the sensations mainly characterized as pleasure or pain; nothing can be more interesting than a pleasure, except a still greater pleasure. It applies only to those slight irritations that are in themselves nothing, but may be the symptoms or precursors of ill health, or of returning good health.](56441.docx#chunk3388)

[The author's doctrine as to our acquiring artificially the habit of not attending to alimentary states, demands a fuller explanation. The usual cause of inattention to impressions is unbroken continuance; in accordance with the universal law {49} of Relativity or Change, we are usually insensible to the contact of our clothing with the skin, except at the moments when we put on or take off any part of it. In walking, and in standing, for a length of time, we are insensible to the body's weight; on rising from the recumbent position we are rendered in some degree conscious of it. Now as the alimentary sensations--Hunger and Repletion--are intermitted and alternated with other states, they fulfil the chief condition of wakeful consciousness.  
The example of the striking of the clock, adduced in the text, brings into operation a different power of the mind, which may go far to counteract the influence of change. Under a very engrossing sensation, or occupation, we become insensible to the stimulation of the senses by other agents. The strain of the mind in some one direction causes a sort of incapacity for going out in any other direction while the strain lasts. This is the explanation of the indifference to the striking of the clock. By the farther influence of habit, inattention to a certain class of impressions may become habitual; as in the power of carrying on mental work in the midst of distracting noises.  
The same effect may arise in connection with the alimentary feelings. A person very much engrossed with a subject is unconscious of hunger, and does not feel the pleasures of eating. Should any one be absorbed habitually with some occupation or pursuit, such an one may contract a settled indifference to the recurring phases of alimentary sensation; but this is an extreme and unusual case. Any ordinary degree of interest in the avocations and pursuits of business is compatible with full attention to the feelings of hunger, and of repletion, as well as to the occasional pains and discomforts of indigestion. We do not often choose to contract an indifference to pleasures, and we seldom succeed in acquiring an indifference to pains, although we may have moments of such indifference, under some special engrossment of mind by other things.  
It is over-rating the influence of association to make it a {50} chief element in the pleasure of intoxicating stimulants, or in the wretched feelings of diseased digestion. These states are direct results of physical agency, and are the same throughout all stages of life, with many or with few opportunities of being associated with other feelings. They are not the cases favourable for illustrating the power of association, in the important department of the feelings.--\_B.\_]  
  
  
  
{51} CHAPTER II.  
IDEAS.  
  
"Haec in genere sors esse solet humana, ut quid in quovis genere recte aut cogitari aut effici possit sentiant prius quam perspiciant. Laborem autem haud ita levem illum veriti, qui in eo impendendus erat ut, ideas operatione analytica penitus evolventes, quid tandem velint, aut quaenam res agatur, sibi ipsis rationem sufficientem reddant, confusis, aut saltem haud satia explicatis rationibus, ratiocinia, et scientiarum adeo systemata superstruere solent communiter, eoque confidentius, quo ejus quam tractant scientiae fundamentum solidum magis ignorant."--\_Schmidt-Phiseldek\_, \_Philos. Criticae Expositio Systematica\_, t. i. p. 561.  
"Pour systematiser une science, c'est-a-dire, pour ramener une suite de phenomenes a leur principe, a un phenomene elementaire qui engendre successivement tous les autres, il faut saisir leurs rapports, le rapport de generation qui les lie; et pour cela, il est clair qu'il faut commencer par examiner ces differens phenomenes separement."--\_Cousin\_, \_Fragm. Philos.\_, p. 8.  
THE sensations which we have through the medium of the senses exist only by the presence of the object, and cease upon its absence; nothing being here meant by the presence of the object, but that position of it with respect to the organ, which is the antecedent of the sensation; or by its absence, but any other position.  
It is a known part of our constitution, that when our sensations cease, by the absence of their objects, something remains. After I have seen the sun, and {52} by shutting my eyes see him no longer, I can still think of him. I have still a feeling, the consequence of the sensation, which, though I can distinguish it from the sensation, and treat it as not the sensation, but something different from the sensation, is yet more like the sensation, than anything else can be; so like, that I call it a copy, an image, of the sensation; sometimes, a representation, or trace, of the sensation.  
Another name, by which we denote this trace, this copy, of the sensation, which remains after the sensation ceases, is IDEA. This is a very convenient name, and it is that by which the copies of the sensation thus described will be commonly denominated in the present work. The word IDEA, in this sense, will express no theory whatsoever; nothing but the bare fact, which is indisputable. We have two classes of feelings; one, that which exists when the object of sense is present; another, that which exists after the object of sense has ceased to be present. The one class of feelings I call SENSATIONS; the other class of feelings I call IDEAS.  
It is an inconvenience, that the word IDEA is used with great latitude of meaning, both in ordinary, and in philosophical discourse; and it will not be always expedient that I should avoid using it in senses different from that which I have now assigned. I trust, however, I shall in no case leave it doubtful, in what sense it is to be understood.  
The term Sensation has a double meaning. It signifies not only an individual sensation; as when I say, I smell this rose, or I look at my hand: but it also signifies the general faculty of sensation; that is, {53} the complex notion of all the phenomena together, as a part of our nature.](56441.docx#chunk3389)

[The word Idea has only the meaning which corresponds to the first of those significations; it denotes an individual idea; and we have not a name for that complex notion which embraces, as one whole, all the different phenomena to which the term Idea relates. As we say Sensation, we might say also, Ideation; it would be a very useful word; and there is no objection to it, except the pedantic habit of decrying a new term. Sensation would in that case be the general name for one part of our constitution, Ideation for another.  
It is of great importance, before the learner proceeds any farther, that he should not only have an accurate conception of this part of his constitution; but should acquire, by repetition, by complete familiarity, a ready habit of marking those immediate copies of his sensations, and of distinguishing them from every other phenomenon of his mind.  
It has been represented, that the sensations of sight and hearing leave the most vivid traces; in other words, that the ideas corresponding to those sensations, are clearer than others. But what is meant by clearer and more vivid in this case, is not very apparent.  
If I have a very clear idea of the colour of the trumpet which I have seen, and a very clear idea of its sound which I have heard, I have no less clear ideas of its shape, and of its size; ideas of the sensations, neither of the eye, nor of the ear.  
It is not easy, in a subject like this, to determine what degree of illustration is needful. To those who are in the habit of distinguishing their mental {54} phenomena, the subject will appear too simple to require illustration. To those who are new to this important operation, a greater number of illustrations would be useful, than I shall deem it advisable to present.  
It is necessary to take notice, that, as each of our senses has its separate class of sensations, so each has its separate class of ideas. We have ideas of Sight, ideas of Touch, ideas of Hearing, ideas of Taste, and ideas of Smell.  
1. By Sight, as we have sensations of red, yellow, blue, &c., and of the innumerable modifications of them, so have we ideas of those colours. We can think of those colours in the dark; that is, we have a feeling or consciousness, which is not the same with the sensation, but which we contemplate as a copy of the sensation, an image of it; something more like it, than any thing else can be; something which remains with us, after the sensation is gone, and which, in the train of thought, we can use as its representative.  
2. The sensations of Touch, according to the limitation under which they should be understood, are not greatly varied. The gentle feeling, which we derive from the mere contact of an object, when we consider it apart from the feeling of resistance, and apart from the sensation of heat or cold, is not very different, as derived from different objects. The idea of this tactual feeling, therefore, is not vivid, nor susceptible of many modifications. On the other hand, our ideas of heat and cold, the feelings which we call the thought of them, existing when the sensations no longer exist, are among the most distinct of the feelings which we distinguish by the name of ideas.  
{55} 3. I hear the Sound of thunder; and I can think of it after it is gone. This feeling, the representative of the mere sound, this thinking, or having the thought of the sound, this state of consciousness, is the idea. The hearing of the sound is the primary state of consciousness; the idea of the sound is the secondary state of consciousness; which exists only when the first has previously existed.  
The number of sounds, of which we can have distinct ideas, as well as distinct sensations, is immense. We can distinguish all animals by their voices. When I hear the horse neigh, I know it is not the voice of the ox. Why? Because I have the idea of the voice of the ox, so distinct, that I know the sensation I have, is different from the sensation of which that is the copy or representative. We can distinguish the sounds of a great number of different musical instruments, by the same process. The men, women, and children, of our intimate acquaintance, we can distinguish, and name, by their voices; that is, we have an idea of the past sensation, which enables us to declare, that the present is the voice of the same person.  
4. That the sensations of Taste recur in thought, when the sensation no longer exists, is a point of every man's experience. This recurring, in thought, of the feeling which we have by the sense, when the feeling by the sense is gone, is the idea of that feeling, the secondary state of consciousness, as we named it above.[18] That we can distinguish a very {56} great number of tastes, and distinguish them accurately, is proof that we have a vast number of distinct ideas of taste; because, for the purpose of making such distinction, we have just seen that there must be a sensation and an idea; the sensation of the present object, and the idea of the sensation of each of the other objects from which we distinguish it. You have tasted port wine, and you have tasted claret; when you taste claret again, you can distinguish it from port wine; that is, you have the idea of the taste of port wine, in conjunction with the sensation of claret. You call it bad claret. Why? Because, along with the present taste, you have the idea of another, which, when it was sensation, was more agreeable than the present sensation.](56441.docx#chunk3390)

[[Bain's footnote 18: Discrimination and Retentiveness (the having of Ideas as the produce of Sensations) are different functions, although mutually involved, and, in all likelihood, developed in proportionate degrees in the same organ. We begin by discriminating changes of impression; this process is necessary in order to our having even a sensation; the more delicate the discriminating power, the greater the number of our primary sensations. He that can discriminate twenty shades of yellow has twenty sensations of yellow; the two statements express the same fact. These various sensations being often repeated, acquire at last an ideal persistence; they can be maintained as ideas, without the originals. The function or power of the Intellect whereby they are thus rendered self-subsisting as ideas, is not the same function as discrimination; we call it Memory, Retentiveness, Adhesiveness, Association, and so on. What may be affirmed about it, on the evidence of induction, is, that where discrimination is good, memory or retentiveness is also good. The discriminative eye for colour is accompanied with a good memory for colour; the musical ear is both discriminative and retentive.--\_B.\_]  
5. Since we distinguish smells, as well as tastes, {57} we have the same proof of the number and distinctness of the ideas of this class of sensations. There is none of the numerous smells to which we have been accustomed, which we do not immediately recognise. But for that recognition the idea of the past sensation must be conjoined with the present sensation.  
6. Of that class of sensations, which I have called sensations of disorganization, we have also ideas. We are capable of having the thought of them when the sensation is gone; and that thought is the idea. A spark from the candle flew upon my hand: I had the sensation of burning. I at this moment think of that sensation; that is, I have the idea of that sensation; and I can think of it, as different from ten thousand other painful sensations: that is, I have ideas of as many other sensations of this class.  
7. The ideas of the sensations which attend the action of the muscles are among the most important of the elements which constitute our being. From these we have the ideas of resistance, of compressibility, of hardness, of softness, of roughness, of smoothness, of solidity, of liquidity, of weight, of levity, of extension, of figure, of magnitude, of whole and of parts, of motion, of rest. It is, indeed, to be observed, that these are all complex ideas, and that other feelings than the mere muscular feeling are concerned in their composition. In almost all the ideas referrible to the muscular feelings, of sufficient importance to have names, the Will is included. The muscular action is the consequent, the Will the antecedent; and the name of the idea, includes both. Thus the idea of resistance is the thought, or idea, of {58} the feelings we have, when we will to contract certain muscles, and feel the contraction impeded.[19] [20]  
[Editor's footnote 19: Rather, when we will to contract certain muscles, and the contraction takes place, but is not followed by the accustomed movement of the limb; what follows, instead, being a sensation of pressure, proportioned to the degree of the contraction. It is not the muscular contraction itself which is impeded by the resisting object: that contraction takes place: but the outward effect which it was the tendency, and perhaps the purpose, of the muscular contraction to produce, fails to be produced.--\_Ed.\_]  
[Bain's footnote 20: It is unnecessary to advert to the operation of the Will, (in the first instance at least,) in considering the feelings of muscular action. The will is the principal, but not the only, source of our activity. The mere spontaneous vigour of the system may put the muscles in motion. Likewise the muscular pleasure itself operates, by the fundamental law of the will, for its own continuance; a process not commonly called voluntary. In these circumstances, it seems advisable to consider and describe the consciousness of muscular exertion by itself, and without reference to the will.--\_B.\_]  
There is no feeling of our nature of more importance to us, than that of resistance. Of all our sensations, it is the most unintermitted; for, whether we sit, or lie, or stand, or walk, still the feeling of resistance is present to us. Every thing we touch, at the same time resists; and every thing we hear, see, taste, or smell, suggests the idea of something that resists. It is through the medium of resistance, that every act by which we subject to our use the objects and laws of nature, is performed. And, of the complex states of consciousness, which the philosophy of mind is called upon to explain, there is hardly one, in which the feeling or idea of resistance is not included.  
It is partly owing to this combination of something {59} else with the muscular feeling, in all the states of consciousness to which we have given names, that it is so difficult to think of the mere muscular feeling by itself; that our notion of the muscular sensations is so indistinct and obscure; and that we can rather be said to have ideas of certain general states of muscular feeling, as of fatigue, or activity, composed of a great number of individual feelings, than of the individual feelings themselves.](56441.docx#chunk3391)

[8. As the feelings, or sensations which we have in the intestinal canal, are almost always mixed up indistinctly with other feelings, and, except in the cases of acute pain, are seldom taken notice of but as constituting general states, we hardly have the power of thinking of those sensations one by one; and, in consequence, can hardly be said to have ideas of them. They are important, as forming component parts of many complex ideas, which have great influence on our happiness. But to unfold the mystery of complex ideas, other parts of our mental process have yet to be explained.  
There is a certain distressful feeling, called the feeling of bad health, which is considerably different in different cases, but in which sensations of the intestinal canal are almost always a material part.  
Indigestion is the name of an idea, in which the feelings of the intestinal canal are mainly concerned.  
Hunger, and thirst, are also names of ideas, which chiefly refer to sensations in the same part of our system.[21] [22]  
[Bain's footnote 21: Thirst is a sensation of the fauces and of the stomach; it is also a feeling of the body generally, due to a deficiency of water in the blood. It is also caused by an excess of saline ingredients in the system. In like manner, a distinction is to be drawn between Inanition, from deficiency of nutritive material in the body, and Hunger, or the state of the stomach preparatory to the act of eating. The two states must in a great measure concur: yet they may be distinct.  
The account of the organic states given in this chapter would have come in appropriately under Sensation--\_B.\_]  
[Editor's footnote 22: I venture to think that it is not a philosophically correct mode of expression, to speak of indigestion, or of hunger and thirst, as names of ideas. Hunger and thirst are names of definite sensations; and indigestion is a name of a large group of sensations, held together by very complicated laws of causation. If it be objected, that the word indigestion, and even the words hunger and thirst, comprehend in their meaning other elements than the immediate sensations; that the meaning, for instance, of hunger, includes a deficiency of food, the meaning of indigestion a derangement of the functions of the digestive organs; it still remains true that these additional portions of meaning are physical phenomena, and are not our thoughts or ideas of physical phenomena; and must, therefore, in the general partition of human consciousness between sensations and ideas, take their place with the former, and not with the latter.--\_Ed.\_]  
{60} It is proper to remark, that, beside the internal feelings to which I have hitherto directed the reader's attention, there are others, which might be classed, and considered apart. The blood-vessels, for example, and motion of the blood, constitute an important part of our System, not without feelings of its own; feelings sometimes amounting to states which seriously command our attention. Of the feelings which accompany fever, a portion may reasonably be assigned to the change of action in the blood-vessels.  
There are states of feeling, very distinguishable, {61} accompanying diseased states of the heart, and of the nervous and arterial systems.  
Beside the blood and its vessels, the glandular system is an important part of the active organs of the body; not without sensibility, and of course, not without habitual sensations. The same may be said of the system of the absorbents, of the lymphatics, and of the vascular system in general.  
The state of the nerves and brain, the most wonderful part of our system, is susceptible of changes, and these changes are accompanied with known changes of feeling. There is a class of diseases which go by the name of nervous diseases: and though they are not a very definite class; though it is not even very well ascertained how far any morbid state of the nerves has to do with them; it is not doubtful that in some of those diseases there are peculiar feelings, which ought to be referred to the nerves. The nerves and brain may thus be, not only the organs of sensations, derived from other senses, but organs of sensations, derived from themselves. On this subject we cannot speak otherwise than obscurely, because we have not distinct names for the things which are to be expressed.  
It is not, however, necessary, in tracing the simple feelings which enter into the more complex states of consciousness, to dwell upon the obscurer classes of our inward sensations; because it is only in a very general way that we can make use of them, in expounding the more mysterious phenomena. Having never acquired the habit of attending to them, and having, by the habit of inattention, lost the power of remarking them, except in their general results, we {62} can do little more than satisfy ourselves of the cases in which they enter for more or less of the effect.  
We have now considered what it is to have sensations, in the simple, uncompounded cases; and what it is to have the secondary feelings, which are the consequences of those sensations, and which we consider as their copies, images, or representatives. If the illustrations I have employed have enabled my reader to familiarize himself with this part of his constitution, he has made great progress towards the solution of all that appears intricate in the phenomena of the human mind. He has acquainted himself with the two primary states of consciousness; the varieties of which are very numerous; and the possible combinations of which are capable of composing a train of states of consciousness, the diversities of which transcend the limits of computation.[23] [24]](56441.docx#chunk3392)

[[Bain's footnote 23: \_The Sensation and the Idea compared\_.--Great importance, in every way, attaches to the points of agreement and of difference of the Sensation and of the Idea. By the Sensation, we mean the whole state of consciousness, under an actual or present impression of sense, as in looking at the moon, in listening to music, in tasting wine. By the Idea is meant the state of mind that remains after the sensible agent is withdrawn, or that may be afterwards recovered by the force of recollection.  
1. For many purposes the sensation and the idea are identical. They are compared to original and copy, which, although not in all respects of equal value, can often answer the same ends. A perfect recollection of a process that we wish to repeat, is as good as actually seeing it. For all purposes of knowledge, and of practical guidance, a faithful remembrance is equal to the real presence. So, as regards the emotional ideas, or the recollection of states of pleasure and of pain, which {63} prompt our voluntary actions, in pursuit and in avoidance, the memory operates in the same way as the original fact, allowance being made for difference of degree. A pleasing melody induces us to listen to it, and to crave for its repetition; the after recollection of it, also moves us to hear it again. If we find ourselves in the midst of distracting noises, we are impelled to escape; the mere remembrance, at an after time, has the same influence on the will.  
2. It is highly probable, if not certain, that the same nervous tracks of the brain are actuated during the sensation, and during the idea, with difference of degree corresponding to the difference of vivacity or intensity of the actual and remembered states.  
Of the points wherein the Sensation and the Idea are found to differ, the most obvious is their degree of intensity. We are able to maintain in idea, the state of mind corresponding to the sight of the sun, the sound of a bell, or the smell of a rose, but we are conscious of a great inferiority in the degree or vividness of the state. The bright luminosity of the original sun turns into a feeble effect, without dazzle or excitement. The thrill of a fine musical air cannot be sustained by the mere memory of it, even in the freshness of the immediately succeeding moment. A certain pleasing remembrance attaches to a good dinner, but how far below the original! Moreover, in a complicated object of sense, a great many of the parts and lineaments drop entirely out of view. Memory is unequal to retaining, without long familiarity and practice, the exact picture of a landscape, a building, or an interior. The difference in the fulness of the idea, as compared with the sensation, is no less remarkable than the difference of vivacity or intensity. This inferiority in the idea as compared with the actuality is of very various amount; being in some cases very great, and in others very slight. The difference is in proportion to the mind's power of retentiveness, a power varying according to several circumstances or conditions, which have to be distinctly enunciated by the Psychologist. For example, it is well known, that frequency of repetition enables the idea to {64} grow in vivacity and in fulness, and to approximate in those respects to the original. It is also known, that some minds are by nature retentive, and, by a small number of repetitions, gain the point that others reach only by a greater number.  
Now, that the vivacity and fulness of a remembered idea should constitute the exact measure of the mind's retentiveness in that particular instance, is a thing of course. There is no other measure of retentiveness but the power of reproducing in idea, what has been before us, in actuality, or as sensation; and the greater the approach of the idea to the original sensation, the better is the retaining faculty.  
There is an apparent exception to this general principle. The memory of the same idea, or the same feeling, in the same person, may be at one time full and vivid, and at another time meagre and faint. In particular moments, we may recall former experiences with especial force, as if there were something that co-operated with the proper force of retentiveness. What, then, are these additional or concurring forces? Hume recognises the influence of disease in giving preternatural intensity to ideas.  
The answer is that some other recollection concurs with, and adds its quota to the support of, the one in question. When, in the view of one natural prospect, we recall another with great fulness, the present sensation supplies or fills in the parts of the remembered scene; which scene, therefore, does not exist in the mind by memory alone, but as a compound of memory and actuality. So while listening with pleasure to a band of music, we remember strongly the pleasure of some previous musical performance; yet, the vivid consciousness of the past is not dependent upon the memory of the past, but upon the stimulus of the present; we are more properly under sensation, than under idea. In all mental resuscitation, there is a degree of vividness and of fulness, due to the proper retentiveness of the mind for each particular thing, according to natural power, repetition, &c. Whatever is beyond this, must be ascribed to the accidental concurrence of other stimulants, either of present sensation, or of remembered impressions.](56441.docx#chunk3393)

[{65} In recollection, there is an influence designated by the term "excitement," which means that portions of the brain are in a state of exalted activity. Any ideas embodied in the parts so excited, if in operation at all, are more than ordinarily vivid. Thus in fever, faded memories brighten up into vivacity and clearness. To this case the same remark applies; the result is partly memory, or the proper retentiveness of the system, and partly an excitation of the brain, through present influences. The proper power of memory is a constant quantity, varying only with repetition, and the strict conditions of memory; the intensity or fulness of a resuscitated idea is a complex result of memory proper and present stimulants, or sensations.  
Difference of vividness was the only distinction adverted to by Hume in his Psychology, which resolved all our intellectual elements into Impressions and Ideas. His opening words are:--"All the perceptions of the human mind resolve themselves into two distinct kinds, which I shall call \_impressions\_ and \_ideas\_. The difference between these consists in the degrees of force and liveliness, with which they strike upon the mind, and make their way into our thought or consciousness." He afterwards allows that in particular circumstances, as in sleep, in fever, or in madness, our ideas may approach in vividness to our sensations.  
Another distinction between the Sensation and the Idea, is of the most vital importance. To the Sensation belongs Objective Reality; the Idea is purely Subjective. This distinction lies at the root of the question of an External World; but on every view of that question, objectivity is connected with the Sensation; in contrast to which the Idea is an element exclusively mental or subjective.  
\_Meanings of Sensation\_.--The word Sensation has several meanings, not always clearly distinguished, and causing serious embroilments in philosophical controversy.  
1. There being, in Sensation, the concurrence of a series of physical or physiological facts with a mental fact, the name may be inadvertently employed to express the physical, as well {66} as the mental element, or at all events to include the physical part as well as the mental.  
The change made on the retina by light, and the nervous influences traversing the brain, may very readily be considered as entering into the phenomenon of sensation. This, however, is an impropriety. The proper use of "Sensation" is to signify the mental fact, to the exclusion of all the physical processes essential to its production.  
2. In ordinary Sensation, as in looking round a room, there is a double consciousness,--objective and subjective. In the objective consciousness, we are affected with the qualities named magnitude, distance, form, colour, &c. these are called object properties, properties of the external and extended universe. In the subject consciousness, we are alive to states of pleasure or of pain, which may go along with the other. We do not usually exist in both modes at one instant; we pass out of one into the other. Now the word Sensation covers both, although, to the object consciousness, "Perception" is more strictly applicable; and in contrast to Perception, Sensation would mean the subjective consciousness, the moments when we relapse from the object attitude and become subjective or self-conscious, or alive to pleasure and pain. When the mind is in the object phase, it is neutral or indifferent as respects enjoyment.  
3. In Sensation, a distinction may be drawn between the present effect upon the mind, or the impression that would arise if the outward agent had operated for the first time, and the total of the past impressions of the same agent, which by its repetition are recalled to fuse with the present effect. The present view of the moon reinstates the sum total of the previous views held by memory, and is not what we should experience if we saw the moon for the first time. Now, if the recall of the previous impressions, or of the joint and iterated idea, be considered an addition made by the Intellect, being dependent on the retentive power of the mind, Sensation, as opposed to Intellect, would mean the force of the present impression and nothing more; or the difference between the {67} vividness of reality, and the inferior vividness of recollection. What we can retain when we shut our eyes would represent the force of our intelligence; the additional intensity when we resume our gaze, would represent the power of sensation or the actual experience.  
This distinction suggests an important remark as to the whole nature of Sensation, namely, that there can hardly be such a thing as pure Sensation, meaning Sensation without any admixture of the Intellect. We may attribute this purity to the earliest impressions made upon the mind, but not to anything known in the experience of the adult. This mixture of Intellect with Sense is not confined to Retentiveness; the other intellectual functions, Discrimination and perception of Agreement, are inseparable from the exercise of the senses. We cannot have a sensation without a feeling of difference; warmth is a transition from cold, and a conscious discrimination of the two facts. So, whenever we repeat a sensation, we have the consciousness of the repetition, or agreement. Were not these modes of consciousness present, we should have no sensation, indeed no consciousness. There is thus no hard line between sense and intellect. The question as to the origin of our Ideas in Sense is not a real question, until we explain what we mean by Sense, and make allowance for this unavoidable participation of Intellect in sensation.](56441.docx#chunk3394)

[4. Sensation is commonly used to employ the whole of our primary feelings and susceptibilities, as opposed to the Emotions which are secondary or derived. It thus confounds together two different sides of our susceptibility, the active and the passive; the feelings arising in connection with our exertion of inward force or energy, and those arising under impressions from external things. Both are primary states of consciousness; they are alike dependent on modifications of our sensitive tissues. But, between the two, there is a contrast, wide, deep, and fundamental, completely missed by the older Psychologists, to the detriment of their handling of such vital questions as the origin of knowledge, and the perception of a material world. The name Sensation, pointing immediately to {68} the operation of the five senses, gave the slip to the feelings of energy, or brought them in partially and inadequately. Yet it is the only name we have for the primary susceptibilities of the organism including both movement and passive sensibility.--\_B.\_]  
[Editor's footnote 24: A question which, as far as I know, has been passed over by psychologists, but which ought not to be left unanswered, is this: Can we have ideas of ideas? We have sensations, and we have copies of these sensations, called ideas of them: can we also have copies of these copies, constituting a second order of ideas, two removes instead of one from sensation?  
Every one will admit that we can think of a thought. We remember ourselves remembering, or imagine ourselves remembering, an object or an event, just as we remember or imagine ourselves seeing one. But in the case of a simple idea of sensation, \_i.e.\_ the idea or remembrance of a single undivided sensation, there seems nothing to distinguish the idea of the idea, from the idea of the sensation itself. When I imagine myself thinking of the colour of snow, I am not aware of any difference, even in degree of intensity, between the image then present to my mind of the white colour, and the image present when I imagine myself to be seeing the colour.  
The case, however, is somewhat different with those combinations of simple ideas which have never been presented to my mind otherwise than as ideas. I have an idea of Pericles; but it is derived only from the testimony of history: the real Pericles never was present to my senses. I have an idea of Hamlet, and of Falstaff; combinations which, though made up of ideas of sensation, never existed at all in the world of sense; they never were anything more than ideas in any mind. Yet, having had these combinations of ideas presented to me through the words of Shakespeare, I have formed what is properly an idea not of an outward object, but of an idea in Shakespeare's mind; and I may communicate my idea to others, whose idea will then be an idea of an idea in my mind. My idea of Pericles, or my idea of any person now alive whom I have never seen, differs from these in the circumstance that I {69} am persuaded that a real object corresponding to the idea does now, or did once, exist in the world of sensation: but as I did not derive my idea from the object, but from some other person's words, my idea is not a copy of the original, but a copy (more or less imperfect) of some other person's copy: it is an idea of an idea.  
Although, however, the complex idea I have of an object which never was presented to my senses, is rightly described as an idea of an idea; my remembrance of a complex idea which I have had before, does not seem to me to differ from the remembered idea as an idea differs from a sensation. There is a distinction between my visual idea of Mont Blanc and the actual sight of the mountain, which I do not find between my remembrance of Falstaff and the original impression from which it was derived. My present thought of Falstaff seems to me not a copy but a repetition of the original idea; a repetition which may be dimmed by distance, or which may, on the contrary, be heightened by intermediate processes of thought; may have lost some of its features by lapse of time, and may have acquired others by reference to the original sources; but which resembles the first impression not as the thought of an object resembles the sight of it, but as a second or third sight of an object resembles the first. This question will meet us again in the psychological examination of Memory, the theory of which is in no small degree dependent upon it.--\_Ed.\_]  
  
  
  
{70} CHAPTER III.  
THE ASSOCIATION OF IDEAS.  
  
"To have a clear view of the phenomena of the mind, as mere affections or states of it, existing successively, and in a certain series, which we are able, therefore, to predict, in consequence of our knowledge of the past, is, I conceive, to have made the most important acquisition which the intellectual inquirer can make." \_Brown\_, \_Lectures\_, i. 544.](56441.docx#chunk3395)

[THOUGHT succeeds thought; idea follows idea, incessantly. If our senses are awake, we are continually receiving sensations, of the eye, the ear, the touch, and so forth; but not sensations alone. After sensations, ideas are perpetually excited of sensations formerly received; after those ideas, other ideas: and during the whole of our lives, a series of those two states of consciousness, called sensations, and ideas, is constantly going on. I see a horse: that is a sensation. Immediately I think of his master: that is an idea. The idea of his master makes me think of his office; he is a minister of state: that is another idea. The idea of a minister of state makes me think of public affairs; and I am led into a train of political ideas; when I am summoned to dinner. This is a new sensation, followed by the idea of dinner, and of the company with whom I am to partake it. The sight of the company and of the food are other {71} sensations; these suggest ideas without end; other sensations perpetually intervene, suggesting other ideas: and so the process goes on.  
In contemplating this train of feelings, of which our lives consist, it first of all strikes the contemplator, as of importance to ascertain, whether they occur casually and irregularly, or according to a certain order.  
With respect to the SENSATIONS, it is obvious enough that they occur, according to the order established among what we call the objects of nature, whatever those objects are; to ascertain more and more of which order is the business of physical philosophy in all its branches.  
Of the order established among the objects of nature, by which we mean the objects of our senses, two remarkable cases are all which here we are called upon to notice; the SYNCHRONOUS ORDER, and the SUCCESSIVE ORDER. The synchronous order, or order of simultaneous existence, is the order in space; the successive order, or order of antecedent and consequent existence, is the order in time. Thus the various objects in my room, the chairs, the tables, the books, have the synchronous order, or order in space. The falling of the spark, and the explosion of the gunpowder, have the successive order, or order in time.  
According to this order, in the objects of sense, there is a synchronous, and a successive, order of our sensations. I have SYNCHRONICALLY, or at the same instant, the sight of a great variety of objects; touch of all the objects with which my body is in contact; hearing of all the sounds which are reaching my ears; smelling of all the smells which are reaching my {72} nostrils; taste of the apple which I am eating; the sensation of resistance both from the apple which is in my mouth, and the ground on which I stand; with the sensation of motion from the act of walking. I have SUCCESSIVELY the sight of the flash from the mortar fired at a distance, the hearing of the report, the sight of the bomb, and of its motion in the air, the sight of its fall, the sight and hearing of its explosion, and lastly, the sight of all the effects of that explosion.[25]  
[Bain's footnote 25: There is here raised the interesting and important question, how far are we able to entertain synchronous sensations; in other words, whether or not we can be cognisant of a plurality of sensations at the same instant of time. There are various circumstances tending to obscure this point; the chief being the extreme rapidity of our mental transitions.  
It is requisite to view the question from two sides, the side of sensation and the side of action. On the first, the appearances are more in favour of plurality; on the second, more in favour of unity.  
As regards Sensation, we are incessantly solicited by a variety of agencies, outward and inward. We may be roused into consciousness, through the eye, through the ear, through the touch, through the taste, through the smell, through the organic sensibilities; and all this at the same time with the rise of emotions or ideas through purely mental causes. Nay more; even under a single sense, we may have a plurality of distinguishable impressions. Sight is the greatest example. Hearing is little inferior; witness the complexity of a band of music, and the tumult of a stormy sea. In Touch, likewise, we may have a plurality of distinguishable feelings of contact over the body.  
The point to be considered, then, is, how many of these multitudinous effects, strictly synchronous in their occurrence, are capable of operating synchronously, either in directing the thoughts, or in impressing the memory. How many of them are able to work the smallest assignable change upon the consciousness? To all appearance, more than one at a time.](56441.docx#chunk3396)

[Consider first the two senses most concerned in developing (out of muscular feeling as the basis) the notion of Space or Extension; that is, Touch and Sight. It will be enough to comment upon Sight. The eye, as is known, takes in a wide prospect; the retinas of the two eyes combined can embrace a large fraction of the surrounding visible sphere. Now, the attention at any one moment is confined to a limited portion: the precise limits are not here considered; there being a complication of action with sensation proper, which will be adverted to afterwards. But, notwithstanding this confinement of the attention, there is a consciousness of the whole visible expanse; as is proved in the case of any sudden change at any part; the attention is then instantly diverted to that part. We might say that there is, at every moment, a ramified area of sensibility, at its maximum in the centre--the line of direction of the eyes, and decreasing to the extremity or circumference of the visible expanse. To one gazing at the heavens, the flash of a meteor would be felt throughout the whole area of visibility; while it would be more certain in its effect, the nearer it was to the line of perfect vision, which is the place of special attention. A faint corruscation arising near the circumference might pass unheeded.  
Next as to the sense of Hearing. Peculiar difficulties attend the explanation of this sense. There is only one main line of access to the inner ear, where the nerves are distributed, namely, the solid chain of bones of the middle ear; and that line can hardly be supposed capable of conveying at the same instant a plurality of different series of vibrations. Yet we fancy that we hear a concurring plurality of sounds. Of what avail would be a band of a hundred performers if there were no power of taking in simultaneous pulses of sound? There is, however, an absence of accurate investigation of this point; no one has endeavoured to ascertain how much of the complex effect is due to the rapid transitions of the ear from one sound to another, how much to the concurrence of several series of pulses in one augmented series, and how much to the composition of successive effects in the ear into a synchronous whole in the emotional wave, or general excitement of the brain. It will be found, by any careful observer, that in listening to a band, we are really occupied with very few of the sounds at the same instant of time; we perform a number of rapid movements of the attention from one to another; while, at each moment, we are under an influence remaining from the recently occurring beats, to which we are not now giving our full attention.  
Touch is exactly parallel to Sight, and need not be dwelt upon. In Smell, and in Taste, we may have a plurality of distinguishable effects at one moment: we often experience complex odours and tastes. The above remarks will apply to these. The undoubted tendency of the mind is to single out, for attention, the separate constituents by turns, and to pass with rapidity from one to another; while it is also true that the individual effects that are for the moment seemingly neglected, still exercise an influence on the consciousness; which would be decisively shown (as in the case of sight) on any occasion of their suddenly increasing in force, or suddenly vanishing. Also, in their state of having fallen out of attention, they still leave an influence to modify the present sensation, the effect of their being attended to in the previous instant. Until we can measure the rapidity of those transitions of the attention, we are not in a position to affirm absolutely the power of double, triple, or multiple attention, although to all practical intents such a power is possessed.  
It is certain that the mind is every moment actuated and determined by a plurality of influences, impressions, considerations, thoughts. Almost every act of the will is a resultant of many motives. Our thoughts seldom spring up at the instance of a simple link of association; although it may happen that some one link is sufficing and overpowering, and therefore governs the recall; yet there are almost always others aiding or checking the particular resuscitation. Nevertheless, such complication of antecedents is not inconsistent with the theory of very rapid transitions of attention, there being a certain persisting influence from each separate act. There would, however, be a greater theoretical simplicity, as well as a less appearance of straining a point, if we could suppose that the several conspiring agencies unite in a strictly synchronous whole.  
Let us next view the question from the side of Activity. Here the circumstance that would most decisively limit the power of attention, and impose an absolute unity (qualified by rapidity of transition) is the singleness of the muscular executive. No one organ can perform two movements at the same instant. Plurality can arise only by the separate organs performing separate actions.](56441.docx#chunk3397)

[In such a case as playing on the pianoforte, there is a very complicated series of muscular exertions. The eyes are occupied with the printed music; both hands are exerted, and every finger performs a separate note; the foot also may be brought into action. At the same time, the ear has to be on the alert. The plurality is here very great; yet it seems much greater than it is. For, at the stage when such a performance is possible, there is a great amount of acquirement; many synchronous groupings have been made by long repetition, so as to dispense with attending to the several acts in separation. The real attention is concentrated on one, or on a very few acts; so few that it is not impossible for them to be commanded by the mere rapidity of transition from one to another. The performer need not attend to the notes of the music, and to the action of the fingers at the same absolute instant of time.  
It is in the case of commencing some act entirely new to us, that the limitation of the muscular executive is most apparent. In learning the first elements of any accomplishment by imitating a master, the whole attention is concentrated on single movements; at one instant on the master, and the next instant on the act of imitating; the only synchronous addition to this last being the remaining trace of the impression of the model. If the act is complicated, and requires concurring movements of different organs, the attention, at the outset, must be given to one at a time; the conjunction of independent movements is not a primitive, but an acquired power. Previous to acquired groupings, the restriction of the attention to one movement is the rule.  
Let us now consider the senses as compounded of passive sensation and movement. The eye, for example, is a moving organ under the command of the will; both eyes being moved in one indivisible volition. Visual attention consists sometimes in moving the eyes to and fro, at other times, in fixing them in one immoveable attitude. We have seen that so far as the optical sensibility is concerned, there is at each instant an effective impression of a wide area, although of very unequal distinctness. The impressions derived from the movements of the eye are much more limited. At the same absolute instant of time, we can scan only a very small portion; say the outline of some isolated form, or the trace of an isolated movement. We can run rapidly round the circumference of a round body, or along the edge of a cubical block. In looking at a tree, we perform a series of muscular sweeps, scarcely including, at one time, more than a single outline course. No doubt our optical sensibility is receiving, in a faint way, a complicated superficies; yet the ocular sweep, on which we depend for our ideas of form, can hardly be supposed to take more than one line at the same instant. The rapidity of transition is very great; but there is a conscious transition when we wish to combine the impression of a circle inscribed in a square.--\_B.\_]  
{73} Among the objects which I have thus observed synchronically, or successively; that is, from which I {74} have had synchronical or successive sensations; there are some which I have so observed frequently; others {75} which I have so observed not frequently: in other words, of my sensations some have been frequently {76} synchronical, others not frequently; some frequently successive, others not frequently. Thus, my sight of {77} roast beef, and my taste of roast beef, have been frequently SYNCHRONICAL; my smell of a rose, and my sight and touch of a rose, have been frequently synchronical; my sight of a stone, and my sensations of its hardness, and weight, have been frequently synchronical. Others of my sensations have not been frequently synchronical: my sight of a lion, and the hearing of his roar; my sight of a knife, and its stabbing a man. My sight of the flash of lightning, and my hearing of the thunder, have been often SUCCESSIVE; the pain of cold, and the pleasure of heat, have been often successive; the sight of a trumpet, and the sound of a trumpet, have been often successive. On the other hand, my sight of hemlock, and my taste of hemlock, have not been often successive: and so on.  
It so happens, that, of the objects from which we derive the greatest part of our sensations, most of those which are observed synchronically, are frequently observed synchronically; most of those which are observed successively, are frequently observed successively. In other words, most of our synchronical sensations, have been frequently synchronical; most of our successive sensations, have been frequently successive. Thus, most of our synchronical sensations are derived from the objects around us, the objects which we have the most frequent occasion to hear and see; the members of our family; the furniture of our houses; our food; the instruments of {78} our occupations or amusements. In like manner, of those sensations which we have had in succession, we have had the greatest number repeatedly in succession; the sight of fire, and its warmth; the touch of snow, and its cold; the sight of food, and its taste.  
Thus much with regard to the order of SENSATIONS; next with regard to the order of IDEAS.  
As ideas are not derived from objects, we should not expect their order to be derived from the order of objects; but as they are derived from sensations, we might by analogy expect, that they would derive their order from that of the sensations; and this to a great extent is the case.  
Our ideas spring up, or exist, in the order in which the sensations existed, of which they are the copies.](56441.docx#chunk3398)

[This is the general law of the "Association of Ideas"; by which term, let it be remembered, nothing is here meant to be expressed, but the order of occurrence.  
In this law, the following things are to be carefully observed.  
1. Of those sensations which occurred synchronically, the ideas also spring up synchronically. I have seen a violin, and heard the tones of the violin, synchronically. If I think of the tones of the violin, the visible appearance of the violin at the same time occurs to me. I have seen the sun, and the sky in which it is placed, synchronically. If I think of the one, I think of the other at the same time.  
One of the cases of synchronical sensation, which deserves the most particular attention, is, that of the several sensations derived from one and the same {79} object; a stone, for example, a flower, a table, a chair, a horse, a man.  
From a stone I have had, synchronically, the sensation of colour, the sensation of hardness, the sensations of shape, and size, the sensation of weight. When the idea of one of these sensations occurs, the ideas of all of them occur.[26] They exist in my mind synchronically; and their synchronical existence is called the idea of the stone; which, it is thus plain, is not a single idea, but a number of ideas in a particular state of combination.  
[Bain's footnote 26: This must be qualified by the fact that the same individual sensation may be found in many groupings, and therefore may not bring up any one aggregate or concrete object in particular. The colour, white, is seen in conjunction with many different shapes, magnitudes, and weight; consequently it does not suggest a specific shape or magnitude. In such a case, the recall may be very various according to circumstances; some individual may have a greater prominence than the rest, and be singled out on that ground; two or three may be brought to view; or a still greater number may be revived.  
This is an important limitation of the working of the associating principle. An individual thing is not restored, as a matter of course, unless the link of connexion points to it alone; as is often effected by a plurality of bonds. Thus a musical air is not suggested until as many notes are heard as to distinguish it from every other known air.--\_B.\_]  
Thus, again, I have smelt a rose, and looked at, and handled a rose, synchronically; accordingly the name rose suggests to me all those ideas synchronically; and this combination of those simple ideas is called my idea of the rose.  
My idea of an animal is still more complex. The {80} word thrush, for example, not only suggests an idea of a particular colour and shape, and size, but of song, and flight, and nestling, and eggs, and callow young, and others.  
My idea of a man is the most complex of all; including not only colour, and shape, and voice, but the whole class of events in which I have observed him either the agent or the patient.  
2. As the ideas of the sensations which occurred synchronically, rise synchronically, so the ideas of the sensations which occurred successively, rise successively.  
Of this important case of association, or of the successive order of our ideas, many remarkable instances might be adduced. Of these none seems better adapted to the learner than the repetition of any passage, or words; the Lord's Prayer, for example, committed to memory. In learning the passage, we repeat it; that is, we pronounce the words, in successive order, from the beginning to the end. The order of the sensations is successive. When we proceed to repeat the passage, the ideas of the words also rise in succession, the preceding always suggesting the succeeding, and no other. \_Our\_ suggests \_Father\_, \_Father\_ suggests \_which\_, \_which\_ suggests \_art\_; and so on, to the end. How remarkably this is the case, any one may convince himself, by trying to repeat backwards, even a passage with which he is as familiar as the Lord's Prayer. The case is the same with numbers. A man can go on with the numbers in the progressive order, one, two, three, &c. scarcely thinking of his act; and though it is possible for him to repeat them backward, because he is accustomed {81} to subtraction of numbers, he cannot do so without an effort.  
Of witnesses in courts of justice it has been remarked, that eye-witnesses, and ear-witnesses, always tell their story in the chronological order; in other words, the ideas occur to them in the order in which the sensations occurred; on the other hand, that witnesses, who are inventing, rarely adhere to the chronological order.  
3. A far greater number of our sensations are received in the successive, than in the synchronical order. Of our ideas, also, the number is infinitely greater that rise in the successive than the synchronical order.  
4. In the successive order of ideas, that which precedes, is sometimes called the suggesting, that which succeeds, the suggested idea; not that any power is supposed to reside in the antecedent over the consequent; suggesting, and suggested, mean only antecedent and consequent, with the additional idea, that such order is not casual, but, to a certain degree, permanent.](56441.docx#chunk3399)

[5. Of the antecedent and consequent feelings, or the suggesting, and suggested; the antecedent may be either sensations or ideas; the consequent are always ideas. An idea may be excited either by a sensation or an idea. The sight of the dog of my friend is a sensation, and it excites the idea of my friend. The idea of Professor Dugald Stewart delivering a lecture, recals the idea of the delight with which I heard him; that, the idea of the studies in which it engaged me; that, the trains of thought which succeeded; and each epoch of my mental history, the succeeding one, till the present moment; in which I am endeavouring to present to others what appears to me valuable among {82} the innumerable ideas of which this lengthened train has been composed.  
6. As there are degrees in sensation, and degrees in ideas; for one sensation is more vivid than another sensation, one idea more vivid than another idea; so there are degrees in association. One association, we say, is stronger than another: First, when it is more permanent than another: Secondly, when it is performed with more certainty: Thirdly, when it is performed with more facility.  
It is well known, that some associations are very transient, others very permanent. The case which we formerly mentioned, that of repeating words committed to memory, affords an apt illustration. In some cases, we can perform the repetition, when a few hours, or a few days have elapsed; but not after a longer period. In others, we can perform it after the lapse of many years. There are few children in whose minds some association has not been formed between darkness and ghosts. In some this association is soon dissolved; in some it continues for life.[27]  
[Bain's footnote 27: The difference between transient and permanent recollections turns entirely upon the strength of the association. There is not one specific mode of association suited to temporary recollection and another to permanent; the permanent contains the temporary, as the greater does the less. The reason why a feebler association will suffice for temporary purposes, is that a recent impression still retains something of the hold of a present reality. The chords struck during the actual presence have not ceased to vibrate. It is difficult to estimate with precision the influence of recency; we know it to be very considerable. A thing distinctly remembered for a few hours will be forgotten, or else held as a mere fragment, at the end of a month; while anything that persists for two or three months may be considered as independent of the power of recency, and may last for years.--\_B.\_]  
In some cases the association takes place with less, in some with greater certainty. Thus, in repeating words, I am not sure that I shall not commit mistakes, if they are imperfectly got; and I may at one {83} trial repeat them right, at another wrong: I am sure of always repeating those correctly, which I have got perfectly. Thus, in my native language, the association between the name and the thing is certain; in a language with which I am imperfectly acquainted, not certain. In expressing myself in my own language, the idea of the thing suggests the idea of the name with certainty. In speaking a language with which I am imperfectly acquainted, the idea of the thing does not with certainty suggest the idea of the name; at one time it may, at another not.  
That ideas are associated in some cases with more, in some with less facility, is strikingly illustrated by the same instance, of a language with which we are well, and a language with which we are imperfectly, acquainted. In speaking our own language, we are not conscious of any effort; the associations between the words and the ideas appear spontaneous. In endeavouring to speak a language with which we are imperfectly acquainted, we are sensible of a painful effort: the associations between the words and ideas being not ready, or immediate.  
7. The causes of strength in association seem all to be resolvable into two; the vividness of the associated feelings; and the frequency of the association.  
In general, we convey not a very precise meaning, {84} when we speak of the vividness of sensations and ideas. We may be understood when we say that, generally speaking, the sensation is more vivid than the idea; or the primary, than the secondary feeling; though in dreams, and in delirium, ideas are mistaken for sensations. But when we say that one sensation is more vivid than another, there is much more uncertainty. We can distinguish those sensations which are pleasurable, and those which are painful, from such as are not so; and when we call the pleasurable and painful more vivid, than those which are not so, we speak intelligibly. We can also distinguish degrees of pleasure, and of pain; and when we call the sensation of the higher degree more vivid than the sensation of the lower degree, we may again be considered as expressing a meaning tolerably precise.](56441.docx#chunk3400)

[In calling one IDEA more vivid than another, if we confine the appellation to the ideas of such SENSATIONS as may with precision be called more or less vivid; the sensations of pleasure and pain, in their various degrees, compared with sensations which we do not call either pleasurable or painful; our language will still have a certain degree of precision. But what is the meaning which I annex to my words, when I say, that my idea of the taste of the pine-apple which I tasted yesterday is vivid; my idea of the taste of the foreign fruit which I never tasted but once in early life, is not vivid? If I mean that I can more certainly distinguish the more recent, than the more distant sensation, there is still some precision in my language; because it seems true of all my senses, that if I compare a distant sensation with a present, I am less sure of its being or not being a repetition of the same, than {85} if I compare a recent sensation with a present one. Thus, if I yesterday had a smell of a very peculiar kind, and compare it with a present smell, I can judge more accurately of the agreement or disagreement of the two sensations, than if I compared the present with one much more remote. The same is the case with colours, with sounds, with feelings of touch, and of resistance. It is therefore sufficiently certain, that the idea of the more recent sensation affords the means of a more accurate comparison, generally, than the idea of the more remote sensation. And thus we have three cases of vividness, of which we can speak with some precision: the case of sensations, as compared with ideas; the case of pleasurable and painful sensations, and their ideas, as compared with those which are not pleasurable or painful; and the case of the more recent, compared with the more remote.[28]  
[Editor's footnote 28: If it be admitted that in the three cases here specified the word vividness, as applied to our impressions, has a definite meaning, it seems to follow that this meaning may be extended in the way of analogy, to other cases than these. There are, for example, sensations which differ from some other sensations like fainter feelings of the same kind, in much the same manner as the idea of a sensation differs from the sensation itself: and we may, by extension, call these sensations less vivid. Again, one idea may differ from another idea in the same sort of way in which the idea of a sensation had long ago differs from that of a similar sensation received recently: that is, it is a more faded copy--its colours and its outlines are more effaced: this idea may fairly be said to be less vivid than the other.  
The author himself, a few pages farther on, speaks of some complex ideas as being more "obscure" than others, merely on account of their greater complexity. Obscurity, indeed, in this case, means a different quality from the absence of vividness, but a quality fully as indefinite.  
Mr. Bain, whose view of the subject will be found further on, draws a fundamental distinction (already indicated in a former note) between the attributes which belong to a sensation regarded in an intellectual point of view, as a portion of our knowledge, and those which belong to the element of Feeling contained in it; Feeling being here taken in the narrower acceptation of the word, that in which Feeling is opposed to Intellect or Thought. To sensations in their intellectual aspect Mr. Bain considers the term vividness to be inapplicable: they can only be distinct or indistinct. He reserves the word vividness to express the degree of intensity of the sensation, considered in what may be called its emotional aspect, whether of pleasure, of pain, or of mere excitement.  
Whether we accept this restriction or not, it is in any case certain, that the property of producing a strong and durable association without the aid of repetition, belongs principally to our pleasures and pains. The more intense the pain or pleasure, the more promptly and powerfully does it associate itself with its accompanying circumstances, even with those which are only accidentally present. In the cases mentioned in the text, a single occurrence of the painful sensation is sufficient to produce an association, which neither time can wear out nor counter-associations dissolve, between the idea of the pain and the ideas of the sensations which casually accompanied it in that one instance, however intrinsically indifferent these may be.--\_Ed.\_]  
{86} That the association of two ideas, but for once, does, in some cases, give them a very strong connection, is within the sphere of every man's experience. The most remarkable cases are probably those of pain and pleasure. Some persons who have experienced a very painful surgical operation, can never afterwards bear the sight of the operator, however strong the {87} gratitude which they may actually feel towards him. The meaning is, that the sight of the operator, by a strong association, calls up so vividly the idea of the pain of the operation, that it is itself a pain. The spot on which a tender maiden parted with her lover, when he embarked on the voyage from which he never returned, cannot afterwards be seen by her without an agony of grief.  
These cases, also, furnish an apt illustration of the superiority which the sensation possesses over the idea, as an associating cause. Though the sight of the surgeon, the sight of the place, would awaken the ideas which we have described, the mere thought of them might be attended with no peculiar effect. Those persons who have the association of frightful objects with darkness, and who are transported with terrors when placed in the dark, can still think of darkness without any emotion.](56441.docx#chunk3401)

[The same cases furnish an illustration of the effect of recency on the strength of association. The sight, of the affecting spot by the maiden, of the surgeon by the patient, would certainly produce a more intense emotion, after a short, than after a long interval. With most persons, time would weaken, and at last dissolve, the association.  
So much with regard to vividness, as a cause of strong associations. Next, we have to consider frequency or repetition; which is the most remarkable and important cause of the strength of our associations.  
Of any two sensations, frequently perceived together, the ideas are associated. Thus, at least, in the minds of Englishmen, the idea of a soldier, and the idea of a red coat are associated; the idea of a {88} clergyman, and the idea of a black coat; the idea of a quaker, and of a broad-brimmed hat; the idea of a woman and the idea of petticoats. A peculiar taste suggests the idea of an apple; a peculiar smell the idea of a rose. If I have heard a particular air frequently sung by a particular person, the hearing of the air suggests the idea of the person.  
The most remarkable exemplification of the effect of degrees of frequency, in producing degrees of strength in the associations, is to be found in the cases in which the association is purposely and studiously contracted; the cases in which we learn something; the use of words, for example.  
Every child learns the language which is spoken by those around him. He also learns it by degrees. He learns first the names of the most familiar objects; and among familiar objects, the names of those which he most frequently has occasion to name; himself, his nurse, his food, his playthings.  
A sound heard once in conjunction with another sensation; the word mamma, for example, with the sight of a woman, would produce no greater effect on the child, than the conjunction of any other sensation, which once exists and is gone for ever. But if the word mamma is frequently pronounced, in conjunction with the sight of a particular woman, the sound will by degrees become associated with the sight; and as the pronouncing of the name will call up the idea of the woman, so the sight of the woman will call up the idea of the name.  
The process becomes very perceptible to us, when, at years of reflection, we proceed to learn a dead or foreign language. At the first lesson, we are told, or {89} we see in the dictionary, the meaning of perhaps twenty words. But it is not joining the word and its meaning once, that will make the word suggest its meaning to us another time. We repeat the two in conjunction, till we think the meaning so well associated with the word, that whenever the word occurs to us, the meaning will occur along with it. We are often deceived in this anticipation; and finding that the meaning is not suggested by the word, we have to renew the process of repetition, and this, perhaps, again, and again. By force of repetition the meaning is associated, at last, with every word of the language, and so perfectly, that the one never occurs to us without the other.  
Learning to play on a musical instrument is another remarkable illustration of the effect of repetition in strengthening associations, in rendering those sequences, which, at first, are slow, and difficult, afterwards, rapid, and easy. At first, the learner, after thinking of each successive note, as it stands in his book, has each time to look out with care for the key or the string which he is to touch, and the finger he is to touch it with, and is every moment committing mistakes. Repetition is well known to be the only means of overcoming these difficulties. As the repetition goes on, the sight of the note, or even the idea of the note, becomes associated with the place of the key or the string; and that of the key or the string with the proper finger. The association for a time is imperfect, but at last becomes so strong, that it is performed with the greatest rapidity, without an effort, and almost without consciousness.  
In few cases is the strength of association, derived {90} from repetition, more worthy of attention, than in performing arithmetic. All men, whose practice is not great, find the addition of a long column of numbers, tedious, and the accuracy of the operation, by no means certain. Till a man has had considerable practice, there are few acts of the mind more toilsome. The reason is, that the names of the numbers, which correspond to the different steps, do not readily occur; that is, are not strongly associated with the names which precede them. Thus, 7 added to 5, make 12; but the antecedent, 7 added to 5, is not strongly associated with the consequent 12, in the mind of the learner, and he has to wait and search till the name occurs. Thus, again, 12 and 7 make 19; 19 and 8 make 27, and so on to any amount; but if the practice of the performer has been small, the association in each instance is imperfect, and the process irksome and slow. Practice, however; that is, frequency of repetition; makes the association between each of these antecedents and its proper consequent so perfect, that no sooner is the one conceived than the other is conceived, and an expert arithmetician can tell the amount of a long column of figures, with a rapidity, which seems almost miraculous to the man whose faculty of numeration is of the ordinary standard.](56441.docx#chunk3402)

[8. Where two or more ideas have been often repeated together, and the association has become very strong, they sometimes spring up in such close combination as not to be distinguishable. Some cases of sensation are analogous. For example; when a wheel, on the seven parts of which the seven prismatic colours are respectively painted, is made to revolve rapidly, it appears not of seven colours, but of one {91} uniform colour, white. By the rapidity of the succession, the several sensations cease to be distinguishable; they run, as it were, together, and a new sensation, compounded of all the seven, but apparently a simple one, is the result. Ideas, also, which have been so often conjoined, that whenever one exists in the mind, the others immediately exist along with it, seem to run into one another, to coalesce, as it were, and out of many to form one idea; which idea, however in reality complex, appears to be no less simple, than any one of those of which it is compounded.  
The word gold, for example, or the word iron, appears to express as simple an idea, as the word colour, or the word sound. Yet it is immediately seen, that the idea of each of those metals is made up of the separate ideas of several sensations; colour, hardness, extension, weight. Those ideas, however, present themselves in such intimate union, that they are constantly spoken of as one, not many. We say, our idea of iron, our idea of gold; and it is only with an effort that reflecting men perform the decomposition.  
The idea expressed by the term weight, appears so perfectly simple, that he is a good metaphysician, who can trace its composition. Yet it involves, of course, the idea of resistance, which we have shewn above to be compounded, and to involve the feeling attendant upon the contraction of muscles; and the feeling or feelings, denominated Will; it involves the idea, not of resistance simply, but of resistance in a particular direction; the idea of direction, therefore, is included in it, and in that are involved the ideas of extension, and of place and motion, some of the most complicated phenomena of the human mind.  
{92} The ideas of hardness and extension have been so uniformly regarded as simple, that the greatest metaphysicians have set them down as the copies of simple sensations of touch. Hartley and Darwin, were, I believe, the first who thought of assigning to them a different origin.  
We call a thing hard, because it resists compression, or separation of parts; that is, because to compress it, or separate it into parts, what we call muscular force is required. The idea, then, of muscular action, and of all the feelings which go to it, are involved in the idea of hardness.  
The idea of extension is derived from the muscular feelings in what we call the motion of parts of our own bodies; as for example, the hands. I move my hand along a line; I have certain sensations; on account of these sensations, I call the line long, or extended. The idea of lines in the direction of length, breadth, and thickness, constitutes the general idea of extension. In the idea of extension, there are included three of the most complex of our ideas; motion; time, which is included in motion; and space, which is included in direction. We are not yet prepared to explain the simple ideas which compose the very complex ideas, of motion, space, and time; it is enough at present to have shewn, that in the idea of extension, which appears so very simple, a great number of ideas are nevertheless included; and that this is a case of that combination of ideas in the higher degrees of association, in which the simple ideas are so intimately blended, as to have the appearance, not of a complex, but of a simple idea.  
It is to this great law of association, that we trace {93} the formation of our ideas of what we call external objects; that is, the ideas of a certain number of sensations, received together so frequently that they coalesce as it were, and are spoken of under the idea of unity. Hence, what we call the idea of a tree, the idea of a stone, the idea of a horse, the idea of a man.  
In using the names, tree, horse, man, the names of what I call objects, I am referring, and can be referring, only to my own sensations; in fact, therefore, only naming a certain number of sensations, regarded as in a particular state of combination; that is, concomitance. Particular sensations of sight, of touch, of the muscles, are the sensations, to the ideas of which, colour, extension, roughness, hardness, smoothness, taste, smell, so coalescing as to appear one idea, I give the name, idea of a tree.  
To this case of high association, this blending together of many ideas, in so close a combination that they appear not many ideas, but one idea, we owe, as I shall afterwards more fully explain, the power of classification, and all the advantages of language. It is obviously, therefore, of the greatest moment, that this important phenomenon should be well understood.  
9. Some ideas are by frequency and strength of association so closely combined, that they cannot be separated. If one exists, the other exists along with it, in spite of whatever effort we make to disjoin them.](56441.docx#chunk3403)

[For example; it is not in our power to think of colour, without thinking of extension; or of solidity, without figure. We have seen colour constantly in combination with extension, spread, as it were, upon a {94} surface. We have never seen it except in this connection. Colour and extension have been invariably conjoined. The idea of colour, therefore, uniformly comes into the mind, bringing that of extension along with it; and so close is the association, that it is not in our power to dissolve it. We cannot, if we will, think of colour, but in combination with extension. The one idea calls up the other, and retains it, so long as the other is retained.  
This great law of our nature is illustrated in a manner equally striking, by the connection between the ideas of solidity and figure. We never have the sensations from which the idea of solidity is derived, but in conjunction with the sensations whence the idea of figure is derived. If we handle any thing solid, it is always either round, square, or of some other form. The ideas correspond with the sensations. If the idea of solidity rises, that of figure rises along with it. The idea of figure which rises, is, of course, more obscure than that of extension; because, figures being innumerable, the general idea is exceedingly complex, and hence, of necessity, obscure. But, such as it is, the idea of figure is always present when that of solidity is present; nor can we, by any effort, think of the one without thinking of the other at the same time.  
Of all the cases of this important law of association, there is none more extraordinary than what some philosophers have called, the acquired perceptions of sight.  
When I lift my eyes from the paper on which I am writing, I see the chairs, and tables, and walls of my room, each of its proper shape, and at its proper {95} distance. I see, from my window, trees, and meadows, and horses, and oxen, and distant hills. I see each of its proper size, of its proper form, and at its proper distance; and these particulars appear as immediate informations of the eye, as the colours which I see by means of it.  
Yet, philosophy has ascertained, that we derive nothing from the eye whatever, but sensations of colour; that the idea of extension, in which size, and form, and distance are included, is derived from sensations, not in the eye, but in the muscular part of our frame. How, then, is it, that we receive accurate information, by the eye, of size, and shape, and distance? By association merely.[29]  
[Bain's footnote 29: We derive through the eye (1) sensations of light in its various degrees, and of colours and their shades; (2) visible form and visible magnitude, together with their changes; and also visible movements. The second group of feelings depends on the movements of the eyes; and they are feelings of activity, or of muscular expenditure. We have, besides, a certain internal muscular sensibility to the alterations of the eye ball in adjusting for distance--\_B.\_]  
The colours upon a body are different, according to its figure, its distance, and its size. But the sensations of colour, and what we may here, for brevity, call the sensations \*of extension, of figure, of distance, have been so often united, felt in conjunction, that the sensation of the colour is never experienced without raising the ideas of the extension, the figure, the distance, in such intimate union with it, that they not only cannot be separated, but are actually supposed to be seen. The sight, as it is called, of figure, or {96} distance, appearing, as it does, a simple sensation, is in reality a complex state of consciousness; a sequence, in which the antecedent, a sensation of colour, and the consequent, a number of ideas, are so closely combined by association, that they appear not one idea, but one sensation.  
Some persons, by the folly of those about them, in early life, have formed associations between the sound of thunder, and danger to their lives. They are accordingly in a state of agitation during a thunder storm. The sound of the thunder calls up the idea of danger, and no effort they can make, no reasoning they can use with themselves, to show how small the chance that they will be harmed, empowers them to dissolve the spell, to break the association, and deliver themselves from the tormenting idea, while the sensation or the expectation of it remains.  
Another very familiar illustration may be adduced. Some persons have what is called an antipathy to a spider, a toad, or a rat. These feelings generally originate in some early fright. The idea of danger has been on some occasion so intensely excited along with the touch or sight of the animal, and hence the association so strongly formed, that it cannot be dissolved. The sensation, in spite of them, excites the idea, and produces the uneasiness which the idea imports.  
The following of one idea after another idea, or after a sensation, so certainly that we cannot prevent the combination, nor avoid having the \_consequent\_ feeling as often as we have the \_antecedent\_, is a law of association, the operation of which we shall afterwards find to be extensive, and bearing a principal part in {97} some of the most important phenomena of the human mind.](56441.docx#chunk3404)

[As there are some ideas so intimately blended by association, that it is not in our power to separate them; there seem to be others, which it is not in our power to combine. Dr. Brown, in exposing some errors of his predecessors, with respect to the acquired perceptions of sight, observes: "I cannot blend my notions of the two surfaces, a plane, and a convex, as one surface, both plane and convex, more than I can think of a whole which is less than a fraction of itself, or a square of which the sides are not equal." The case, here, appears to be, that a strong association excludes whatever is opposite to it. I cannot associate the two ideas of assafoetida, and the taste of sugar. Why? Because the idea of assafoetida is so strongly associated with the idea of another taste, that the idea of that other taste rises in combination with the idea of assafoetida, and of course the idea of sugar does not rise. I have one idea associated with the word pain. Why can I not associate pleasure with the word pain? Because another indissoluble association springs up, and excludes it. This is, therefore, only a case of indissoluble association; but one of much importance, as we shall find when we come to the exposition of some of the more complicated of our mental phenomena.[30]  
[Editor's footnote 30: Some further elucidation seems needful of what is here said, in so summary a manner, respecting ideas which it is not in our power to combine: an inability which it is essential to the analysis of some of the more complex phenomena of mind that we should understand the meaning of. The explanation is indicated, but hardly more than indicated, in the text.  
It seems to follow from the universal law of association, that any idea could be associated with any other idea, if the corresponding sensations, or even the ideas themselves, were presented in juxtaposition with sufficient frequency. If, therefore, there are ideas which cannot be associated with each other, it must be because there is something that prevents this juxtaposition. Two conditions hence appear to be required, to render ideas incapable of combination. First, the sensations must be incapable of being had together. If we cannot associate the taste of assafoetida with the taste of sugar, it is implied, that we cannot have the taste of assafoetida along with the taste of sugar. If we could, a sufficient experience would enable us to associate the ideas. Here, therefore, is one necessary condition of the impossibility of associating certain ideas with one another. But this condition, though necessary, is not sufficient. We are but too capable of associating ideas together though the corresponding external facts are really incompatible. In the case of many errors, prejudices, and superstitions, two ideas are so closely and obstinately associated, that the man cannot, at least for the time, help believing that the association represents a real coexistence or sequence between outward facts, though such coexistence or sequence may contradict a positive law of the physical world. There is therefore a further condition required to render two ideas unassociable, and this is, that one of them shall be already associated with some idea which excludes the other. Thus far the analysis is carried in the author's text. But the question remains, what ideas exclude one another? On careful consideration I can only find one case of such exclusion: when one of the ideas either contains, or raises up by association, the idea of the absence of the other. I am aware of no case of absolute incompatibility of thought or of imagination, except between the presence of something and its absence; between an affirmative and the corresponding negative. If an idea irresistibly raises up the idea of the absence of a certain sensation, it cannot become associated with the idea of that sensation; for it is impossible to combine together in the same mental representation, the presence of a sensation and its absence.  
We are not yet, however, at the end of the difficulty; for it may be objected, that the idea of the absence of anything is the idea of a negation, of a nullity; and the idea of nothing must itself be nothing--no idea at all. This objection has imposed upon more than one metaphysician; but the solution of the paradox is very simple. The idea of the presence of a sensation is the idea of the sensation itself along with certain accompanying circumstances: the idea of the absence of the sensation is the idea of the same accompanying circumstances without the sensation. For example: my idea of a body is the idea of a feeling of resistance, accompanying a certain muscular action of my own, say of my hand; my idea of no body, in other words, of empty space, is the idea of the same or a similar muscular action of my own, not attended by any feeling of resistance. Neither of these is an idea of a mere negation; both are positive mental representations: but inasmuch as one of them includes the negation of something positive which is an actual part of the other, they are mutually incompatible: and any idea which is so associated with one of them as to recall it instantly and irresistibly, is incapable of being associated with the other.](56441.docx#chunk3405)

[The instance cited by the author from Dr. Brown, is a good illustration of the law. We can associate the ideas of a plane and of a convex surface as two surfaces side by side; but we cannot fuse the two mental images into one, and represent to ourselves the very same series of points giving us the sensations we receive from a plane surface and those we receive from a convex surface both at once. That this cannot but be so, is a corollary from the elementary law of association. Not only has no instance ever occurred in our experience of a surface which gave us at the same moment both these sets of sensations; but whenever in our experience a surface originally plane, came to give us the sensations we receive from a convex surface (as for instance when we bend a flat sheet of paper), it, at the very same moment, ceased to be, or to appear, a plane. The commencement of the one set of sensations has always been simultaneous with the cessation of the other set, and this experience, not being affected by any change of circumstances, has the constancy and invariability of a law of nature. It forms a correspondingly strong association; and we become unable to have an idea of either set of sensations, those of planeness or those of convexity, without having the idea of the disappearance of the other set, if they existed previously. I believe it will be found that all the mental incompatibilities, the impossibilities of thought, of which so much is made by a certain class of metaphysicians, can be accounted for in a similar manner.--\_Ed.\_]  
{98} 10. It not unfrequently happens in our associated feelings, that the antecedent is of no importance {99} farther than as it introduces the consequent. In these cases, the consequent absorbs all the attention, {100} and the antecedent is instantly forgotten. Of this a very intelligible illustration is afforded by what happens in ordinary discourse. A friend arrives from a distant country, and brings me the first intelligence of the last illness, the last words, the last acts, and death of my son. The sound of the voice, the articulation of every word, makes its sensation in my ear; but it is to the ideas that my attention flies. It is my son that is before me, suffering, acting, speaking, dying. The words which have introduced the ideas, and kindled the affections, have been as little heeded, as the respiration which has been accelerated, while the ideas were received.  
It is important in respect to this case of association {101} to remark, that there are large classes of our sensations, such as many of those in the alimentary duct, and many in the nervous and vascular systems, which serve, as antecedents, to introduce ideas, as consequents; but as the consequents are far more interesting than themselves, and immediately absorb the attention, the antecedents are habitually overlooked; and though they exercise, by the trains which they introduce, a great influence on our happiness or misery, they themselves are generally wholly unknown.  
That there are connections between our ideas and certain states of the internal organs, is proved by many familiar instances. Thus, anxiety, in most people, disorders the digestion. It is no wonder, then, that the internal feelings which accompany indigestion, should excite the ideas which prevail in a state of anxiety. Fear, in most people, accelerates, in a remarkable manner, the vermicular motion of the intestines. There is an association, therefore, between certain states of the intestines, and terrible ideas; and this is sufficiently confirmed by the horrible dreams to which men are subject from indigestion; and the hypochondria, more or less afflicting, which almost always accompanies certain morbid states of the digestive organs. The grateful food which excites pleasurable sensations in the mouth, continues them in the stomach; and, as pleasures excite ideas of their causes, and these of similar causes, and causes excite ideas of their effects, and so on, trains of pleasurable ideas take their origin from pleasurable sensations in the stomach. Uneasy sensations in the stomach, produce analogous effects. Disagreeable sensations are {102} associated with disagreeable circumstances: a train is introduced, in which, one painful idea following another, combinations, to the last degree afflictive, are sometimes introduced, and the sufferer is altogether overwhelmed by dismal associations.[31] [32]  
[Bain's footnote 31: There is more than association in the case here supposed. Fear, anxiety, and painful emotions generally, cause disorder in the digestive and other vital functions, as a part of their nature. Every mental state can be proved to have its counterpart physical state; joy, sorrow, fear, are each embodied in a distinct group of physical effects in the nervous system, the muscular movements, and the organic processes. The physical side of agreeable emotions, as a rule, is a heightened tone of the purely animal functions. The physical side of fear is a complicated series of effects, one of them being the depression of the organic processes, digestion among the rest. In this respect, however, it more or less resembles severe pain, sorrow, shame, remorse, and other states, characterised by the general phrase "depressing passions;" the depression being both mental and physical.  
The reciprocal agency described in the text, whereby the painful sensations of indigestion induce fear, is not dependent on the association of ideas, but on the deep connections of the emotional states with one another, through their physical accompaniments. A painful feeling of indigestion has much in common with states of depression due to mental causes, as, for example, the shock of a misfortune, fear, sorrow, and the like. From this alliance it favours the ideas of depressing states. It does more; it directly reduces that vigorous tone of the system, which is the support of the courageous and sanguine disposition; and hence, surrenders the mind an easy prey to any chance incentive of alarm or anxiety.--\_B.\_]](56441.docx#chunk3406)

[[Editor's footnote 32: The law of association laid down in this section ranks among the principal of what may be termed the laws of Obliviscence. It is one of the widest in its action, and most important in its consequences of all the laws of the mind; and the merit of the author, in the large use he makes of it is very great, as, though it is the key that unlocks many of the more mysterious phenomena of the mind, it is among the least familiar of the mental laws, and is not only overlooked by the great majority of psychologists, but some, otherwise of merit, seem unable to see and understand the law after any quantity of explanation.  
The first, however, of the examples by which the author illustrates this law, is not marked by his usual felicity. Its shortcomings are pointed out by Mr. Bain in the preceding note. The internal feelings (says the author) which accompany indigestion, introduce trains of ideas (as in the case of horrible dreams, and of hypochondria) which are acutely painful, and may embitter the whole existence, while the sensations themselves, being comparatively of little interest, are unheeded and forgotten. It is true that the sensations in the alimentary canal, directly produced by indigestion, though (as every one knows) in some cases intense, are in others so slight as not to fix the attention, and yet may be followed by melancholy trains of thought, the connection of which with the state of the digestion may be entirely unobserved: but by far the most probable supposition appears to be, that these painful trains are not excited by the sensations, but that they and the sensations are joint or successive effects of a common organic cause. It is difficult to comprehend how these obscure sensations can excite the distressing trains of ideas by the laws of association; for what opportunity have these sensations usually had of becoming associated, either synchronously or successively, with those ideas? The explanation, in the text, of this difficulty, seems surprisingly insufficient. Anxiety, in most people, disorders the digestion; and consequently, according to the author, the sensations of indigestion excite the ideas which prevail in a state of anxiety. If that were the true explanation, the only persons with whom indigestion would depress the spirits, would be those who had suffered previous depression of spirits, sufficient in duration and intensity to disorder the digestion, and to keep it disordered long enough to effect a close and inseparable cohesion between even very slight sensations of indigestion and painful ideas excited by other causes. Surely this is not the fact. The theory has a true application in the case of the confirmed hypochondriac. When the sensations have been repeatedly experienced along with the melancholy trains of thought, a direct association is likely to grow up between the two; and when this has been effected, the first touch of the sensations may bring back in full measure the miserable mental state which had coexisted with them, thus increasing not only the frequency of its recurrence, but, by the conjunction of two exciting causes, the intensity of the misery. But the origin of the state must be looked for elsewhere, and is probably to be sought in physiology.  
The other example in the text seems still less relevant. Fear tends to accelerate the peristaltic motion, therefore there is a connection between certain states of the intestines and terrible ideas. To make this available for the author's purpose, the consequence of the connection ought to be, that acceleration of the peristaltic motion excites ideas of terror. But does it? The state of indigestion characteristic of hypochondria is not looseness of the bowels, but is commonly attended with the exact opposite. The author's usual acuteness of discernment seems to have been, in these cases, blunted by an unwillingness to admit the possibility that ideas as well as sensations may be directly affected by material conditions. But if, as he admits, ideas have a direct action on our bodily organs, a \_prima facie\_ case is made out for the localization of our ideas, equally with our sensations, in some part of our bodily system; and there is at least no antecedent presumption against the supposition that the action may be reciprocal--that as ideas sometimes derange the organic functions, so derangements of organic functions may sometimes modify the trains of our ideas by their own physical action on the brain and nerves, and not through the associations connected with the sensations they excite.--\_Ed.\_]  
{103} In illustration of the fact, that sensations and ideas, which are essential to some of the most important {104} operations of our minds, serve only as antecedents to more important consequents, and are themselves so {105} habitually overlooked, that their existence is unknown, we may recur to the remarkable case which we have just explained, of the ideas introduced by the sensations of sight. The minute gradations of colour, which accompany varieties of extension, figure, and distance, are insignificant. The figure, the size, the distance, themselves, on the other hand, are matters of the greatest importance. The first having introduced the last, their work is done. The consequents remain the sole objects of attention, the antecedents are forgotten; in the present instance, not completely; in other instances, so completely, that they cannot be recognised.[33] [34]](56441.docx#chunk3407)

[[Bain's footnote 33: Perhaps the most remarkable case of sensations overlooked on their own account, and considered only as a means of suggesting something else, is the visual, or retinal, magnitude of objects seen by the eye. This is probably the most delicate sensibility within the compass of the mind; and yet we habitually disregard it for all things near us, and use it solely for perceiving real magnitude as estimated by our locomotive and other members. The visual magnitude of a table, or other article in a room, is never thought of for itself; although incessantly fluctuating we never think of the fluctuations; we pass from these to the one constant perception, named the true or real magnitude. It is only for remote objects, as the sun and moon, the clouds, the distant hills, that the retinal magnitude abides with us in its own proper character. In looking down a vista, we may also be aroused to the feeling of retinal magnitude. For perspective drawing, it is necessary that we should arrest the strong tendency to pass from the visible, to the real, forms and dimensions of things.--\_B.\_]  
[Editor's footnote 34: The reader, it may be hoped, is now familiar with the important psychological fact, so powerfully grasped and so discerningly employed by Hartley and the author of the Analysis,--that when, through the frequent repetition of a series of sensations, the corresponding train of ideas rushes through the mind with extreme rapidity, some of the links are apt to disappear from consciousness as completely as if they had never formed part of the series. It has been a subject of dispute among philosophers which of three things takes place in this case. Do the lost ideas pass through the mind without consciousness? Do they pass consciously through the mind and are they then instantly forgotten? Or do they never come into the mind at all, being, as it were, overleaped and pressed out by the rush of the subsequent ideas?  
It would seem, at first sight, that the first and third suppositions involve impossibilities, and that the second, therefore, is the only one which we are at liberty to adopt. As regards the first, it may be said--How can we have a feeling without feeling it, in other words, without being conscious of it? With regard to the third, how, it may be asked, can any link of the chain have been altogether absent, through the pressure of the subsequent links? The subsequent ideas are only there because called up by it, and would not have arisen at all unless it had arisen first, however short a time it may have lasted. These arguments seem strong, but are not so strong as they seem.  
In favour of the first supposition, that feelings may be unconsciously present, various facts and arguments are adduced by Sir William Hamilton in his Lectures; but I think I have shewn in another work, that the arguments are inconclusive, and the facts equally reconcilable with the second of the three hypotheses. That a feeling should not be felt appears to me a contradiction both in words and in nature. But, though a feeling cannot exist without being felt, the organic state which is the antecedent of it may exist, and the feeling itself not follow. This happens, either if the organic state is not of sufficient duration, or if an organic state stronger than itself, and conflicting with it, is affecting us at the same moment. I hope to be excused for quoting what I have said elsewhere on this subject (Examination of Sir William Hamilton's Philosophy, ch. 15).](56441.docx#chunk3408)

["In the case, for instance, of a soldier who receives a wound in battle, but in the excitement of the moment is not aware of the fact, it is difficult not to believe that if the wound had been accompanied by the usual sensation, so vivid a feeling would have forced itself to be attended to and remembered. The supposition which seems most probable is, that the nerves of the particular part were affected as they would have been by the same cause in any other circumstances, but that, the nervous centres being intensely occupied with other impressions, the affection of the local nerves did not reach them, and no sensation was excited. In like manner, if we admit (what physiology is rendering more and more probable) that our mental feelings, as well as our sensations, have for their physical antecedents particular states of the nerves; it may well be believed that the apparently suppressed links in a chain of association, those which Sir William Hamilton considers as latent, really are so; that they are not, even momentarily, felt; the chain of causation being continued only physically, by one organic state of the nerves succeeding another so rapidly that the state of mental consciousness appropriate to each is not produced. We have only to suppose, either that a nervous modification of too short duration does not produce any sensation or mental feeling at all, or that the rapid succession of different nervous modifications makes the feelings produced by them interfere with each other, and become confounded in one mass. The former of these suppositions is extremely probable, while of the truth of the latter we have positive proof. An example of it is the experiment which Sir W. Hamilton quoted from Mr. Mill, and which had been noticed before either of them by Hartley. It is known that the seven prismatic colours, combined in certain proportions, produce the white light of the solar ray. Now, if the seven colours are painted on spaces bearing the same proportion to one another as in the solar spectrum, and the coloured surface so produced is passed rapidly before the eyes, as by the turning of a wheel, the whole is seen as white. The physiological explanation of this phenomenon may be deduced from another common experiment. If a lighted torch, or a bar heated to luminousness, is waved rapidly before the eye, the appearance produced is that of a ribbon of light; which is universally understood to prove that the visual sensation persists for a certain short time after its cause has ceased. Now, if this happens with a single colour, it will happen with a series of colours: and if the wheel on which the prismatic colours have been painted, is turned with the same rapidity with which the torch was waved, each of the seven sensations of colour will last long enough to be contemporaneous with all the others, and they will naturally produce by their combination the same colour as if they had, from the beginning, been excited simultaneously. If anything similar to this obtains in our consciousness generally (and that it obtains in many cases of consciousness there can be no doubt) it will follow that whenever the organic modifications of our nervous fibres succeed one another at an interval shorter than the duration of the sensations or other feelings corresponding to them, those sensations or feelings will, so to speak, overlap one another, and becoming simultaneous instead of successive, will blend into a state of feeling, probably as unlike the elements out of which it is engendered, as the colour white is unlike the prismatic colours. And this may be the source of many of those states of internal or mental feeling which we cannot distinctly refer to a prototype in experience, our experience only supplying the elements from which, by this kind of mental chemistry, they are composed. The elementary feelings may then be said to be latently present, or to be present but not in consciousness. The truth, however, is that the feelings themselves are not present, consciously or latently, but that the nervous modifications which are their usual antecedents have been present, while the consequents have been frustrated, and another consequent has been produced instead."](56441.docx#chunk3409)

[In this modified form, therefore, the first of the three hypotheses may possibly be true. Let us now consider the third, that of the entire elision of some of the ideas which form the associated train. This supposition seemed to be inadmissible, because the loss of any link would, it was supposed, cause the chain itself to break off at that point. To make the hypothesis possible, it is only, however, necessary to suppose, that, while the association is acquiring the promptitude and rapidity which it ultimately attains, each of the successive ideas abides for a brief interval in our consciousness after it has already called up the idea which is to succeed it. Each idea in the series, though introduced, not by synchronous, but by successive association, is thus, during a part of its continuance, synchronous with the idea which introduced it: and as the rapidity of the suggestions increases by still further repetition, an idea may become synchronous with another which was originally not even contiguous to it, but separated from it by an intervening link; or may come into immediate instead of mediate sequence with such an idea. When either of these states of things has continued for some time, a direct association of the synchronous or of the successive kind will be generated between two ideas which are not proximate links in the chain; A will acquire a direct power of exciting C, independently of the intervening idea B. If, then, B is much less interesting than C, and especially if B is of no importance at all in itself, but only by exciting C, and has therefore nothing to make the mind dwell on it after C has been reached, the association of A with C is likely to become stronger than that of A with B: C will be habitually excited directly by A; as the mind runs off to the further ideas suggested by C, B will cease to be excited at all; and the train of association, like a stream which breaking though its bank cuts off a bend in its course, will thenceforth flow in the direct line AC, omitting B. This supposition accounts more plausibly than either of the others for the truly wonderful rapidity of thought, since it does not make so large a demand as the other theories on our ability to believe that a prodigious number of different ideas can successively rush through the mind in an instant too short for measurement.  
The result is, that all the three theories of this mental process seem to be quite possible; and it is not unlikely that each of them may be the real process in some cases, either in different persons, or in the same persons under different circumstances. I can only remit the question to future psychologists, who may be able to contrive crucial experiments for deciding among these various possibilities.--\_Ed.\_]  
{106} 11. Mr. Hume, and after him other philosophers, have said that our ideas are associated according to {107} three principles; Contiguity in time and place, Causation, and Resemblance. The Contiguity in time and {108} place, must mean, that of the sensations; and so far it is affirmed, that the order of the ideas follows that {109} of the sensations. Contiguity of two sensations in time, means the successive order. Contiguity of two {110} sensations in place, means the synchronous order. We have explained the mode in which ideas are associated, in the synchronous, as well as the successive order, and have traced the principle of contiguity to its proper source.  
Causation, the second of Mr. Hume's principles, is the same with contiguity in time, or the order of succession. Causation is only a name for the order established between an antecedent and a consequent; that is, the established or constant antecedence of the one, {111} and consequence of the other. Resemblance only remains, as an alleged principle of association, and it is necessary to inquire whether it is included in the laws which have been above expounded. I believe it will be found that we are accustomed to see like things together. When we see a tree, we generally see more trees than one; when we see an ox, we generally see more oxen than one; a sheep, more sheep than one; a man, more men than one. From this observation, I think, we may refer resemblance to the law of frequency, of which it seems to form only a particular case.[35]  
[Editor's footnote 35: The reason assigned by the author for considering association by resemblance as a case of association by contiguity, is perhaps the least successful attempt at a generalisation and simplification of the laws of mental phenomena, to be found in the work. It ought to be remembered that the author, as the text shows, attached little importance to it. And perhaps, not thinking it important, he passed it over with a less amount of patient thought than he usually bestowed on his analyses.](56441.docx#chunk3410)

[Objects, he thinks, remind us of other objects resembling them, because we are accustomed to see like things together. But we are also accustomed to see like things separate. When two combinations incompatible with one another are both realised in familiar experience, it requires a very great preponderance of experience on one side to determine the association specially to either. We are also much accustomed to see unlike things together; I do not mean things contrasted, but simply unlike. Unlikeness, therefore, not amounting to contrast, ought to be as much a cause of association as likeness. Besides, the fact that when we see (for instance) a sheep, we usually see more sheep than one, may cause us, when we think of a sheep, to think of an entire flock; but it does not explain why, when we see a sheep with a black mark on its forehead, we are reminded of a sheep with a similar mark, formerly seen, though we never saw two such sheep together. It does not explain why a portrait makes us think of the original, or why a stranger whom we see for the first time reminds us of a person of similar appearance whom we saw many years ago. The law by which an object reminds us of similar objects which we have been used to see along with it, must be a different law from that by which it reminds us of similar objects which we have not been used to see along with it. But it is the same law by which it reminds us of dissimilar objects which we have been used to see along with it. The sight of a sheep, if it reminds us of a flock of sheep, probably by the same law of contiguity, reminds us of a meadow; but it must be by some other law that it reminds us of a single sheep previously seen, and of the occasion on which we saw that single sheep.  
The attempt to resolve association by resemblance into association by contiguity must perforce be unsuccessful, inasmuch as there never could have been association by contiguity without a previous association by resemblance. Why does a sensation received this instant remind me of sensations which I formerly had (as we commonly say), along with it? I never had them along with this very sensation. I never had this sensation until now, and can never have it again. I had the former sensations in conjunction not with it, but with a sensation exactly like it. And my present sensation could not remind me of those former sensations unlike itself, unless by first reminding me of the sensation like itself, which really did coexist with them. There is thus a law of association anterior to, and presupposed by, the law of contiguity: namely, that a sensation tends to recall what is called the idea of itself, that is, the remembrance of a sensation like itself, if such has previously been experienced. This is implied in what we call \_recognising\_ a sensation, as one which has been felt before; more correctly, as undistinguishably resembling one which has been felt before. The law in question was scientifically enunciated, and included, I believe for the first time, in the list of Laws of Association, by Sir William Hamilton, in one of the Dissertations appended to his edition of Reid: but the fact itself is recognised by the author of the Analysis, in various passages of his work; more especially in the second section of the fourteenth chapter. There is, therefore, a suggestion by resemblance--a calling up of the idea of a past sensation by a present sensation like it--which not only does not depend on association by contiguity, but is itself the foundation which association by contiguity requires for its support.  
When it is admitted that simple sensations remind us of one another by direct resemblance, many of the complex cases of suggestion by resemblance may be analysed into this elementary case of association by resemblance, combined with an association by contiguity. A flower, for instance, may remind us of a former flower resembling it, because the present flower exhibits to us certain qualities, that is, excites in us certain sensations, resembling and recalling to our remembrance those we had from the former flower, and these recall the entire image of the flower by the law of association by contiguity. But this explanation, though it serves for many cases of complex phenomena suggesting one another by resemblance, does not suffice for all. For, the resemblance of complex facts often consists, not solely, or principally, in likeness between the simple sensations, but far more in likeness of the manner of their combination, and it is often by this, rather than by the single features, that they recall one another. After we had seen, and well observed, a single triangle, when we afterwards saw a second there can be little doubt that it would at once remind us of the first by mere resemblance. But the suggestion would not depend on the sides or on the angles, any or all of them; for we might have seen such sides and such angles uncombined, or combined into some other figure. The resemblance by which one triangle recalls the idea of another is not resemblance in the parts, but principally and emphatically in the manner in which the parts are put together. I am unable to see any mode in which this case of suggestion can be accounted for by contiguity; any mode, at least, which would fit all cases of the kind.--\_Ed.\_]  
{112} Mr. Hume makes contrast a principle of association, but not a separate one, as he thinks it is compounded {113} of Resemblance and Causation. It is not necessary for us to show that this is an unsatisfactory account {114} of contrast. It is only necessary to observe, that, as a case of association, it is not distinct from those which we have above explained.](56441.docx#chunk3411)

[A dwarf suggests the idea of a giant. How? We call a dwarf a dwarf, because he departs from a certain standard. We call a giant a giant, because he departs from the same standard. This is a case, therefore, of resemblance, that is, of frequency.  
Pain is said to make us think of pleasure; and this is considered a case of association by contrast. There is no doubt that pain makes us think of relief from it; because they have been conjoined, and the great vividness of the sensations makes the association strong. Relief from pain is a species of pleasure; and one pleasure leads to think of another, from the resemblance. This is a compound case, therefore, of vividness and frequency. All other cases of contrast, I believe, may be expounded in a similar manner.  
I have not thought it necessary to be tedious in expounding the observations which I have thus stated; for whether the reader supposes that resemblance is, or is not, an original principle of association, will not affect our future investigations.  
12. Not only do simple ideas, by strong association, run together, and form complex ideas: but a {115} complex idea, when the simple ideas which compose it have become so consolidated that it always appears as one, is capable of entering into combinations with other ideas, both simple and complex. Thus two complex ideas may be united together, by a strong association, and coalesce into one, in the same manner as two or more simple ideas coalesce into one. This union of two complex ideas into one, Dr. Hartley has called a duplex idea.[37] Two also of these duplex, or doubly compounded ideas, may unite into one; and these again into other compounds, without end. It is hardly necessary to mention, that as two complex ideas unite to form a duplex one, not only two, but more than two may so unite; and what he calls a duplex idea may be compounded of two, three, four, or any number of complex ideas.  
[Editor's footnote 37: I have been unable to trace in Hartley the expression here ascribed to him. In every passage that I can discover, the name he gives to a combination of two or more complex ideas is that of a \_decomplex\_ idea.--\_Ed.\_]  
Some of the most familiar objects with which we are acquainted furnish instances of these unions of complex and duplex ideas.  
Brick is one complex idea, mortar is another complex idea; these ideas, with ideas of position and quantity, compose my idea of a wall. My idea of a plank is a complex idea, my idea of a rafter is a complex idea, my idea of a nail is a complex idea. These, united with the same ideas of position and quantity, compose my duplex idea of a floor. In the same manner my complex idea of glass, and wood, and others, compose my duplex idea of a window; and {116} these duplex ideas, united together, compose my idea of a house, which is made up of various duplex ideas. How many complex, or duplex ideas, are all united in the idea of furniture? How many more in the idea of merchandize? How many more in the idea called Every Thing?[38] [39]  
[Bain's footnote 38: This chapter raises questions of the most fundamental kind relating to our intellectual constitution. The Association of Ideas, comprehensively viewed, involves everything connected with the mental persistence and reproduction of ideas; being offered as adequate to explain the operations named Memory, Reason, and Imagination.](56441.docx#chunk3412)

[\_Conditions of the Growth of Association, or of the Retentiveness of the Mind\_.--A practical, as well as a theoretical, interest attaches to the precise statement of the conditions or circumstances that regulate the growth of our associations, in other words our mental culture generally. All agree in the efficacy of the two conditions mentioned in the text; the vividness of the feelings associated, and the frequency of the association, that is repetition or practice. It is well remarked, however, that the phrase "vividness of the sensations or ideas" does not convey a very precise meaning. The proper attribute of a sensation, or an idea, considered as an \_intellectual\_ element, is greater or less distinctness; when an object seen or remembered is seen or remembered distinctly and fully, and without any unusual labour or effort, there is nothing more to be desired, so far as concerns our intelligence. If, however, the object is accompanied with \_feeling\_--with pleasure or pain--a new element is introduced, to which other epithets are applicable. A feeling is more or less strong or intense; and the addition of an intense feeling to an intellectual conception is a sum, combining both sets of attributes--distinctness and adequacy in the conception, and intensity in the feeling. An object whose perception or conception is thus accompanied with the animation of strong feeling, is called lively, or vivid; {117} in the absence of feeling, these epithets are unsuitable. Hence, the associating stimulus expressed by "vividness" is better expressed by the "strength of the feelings." Any strong feeling impresses on the mind whatever is the object of it, or is in any way mixed up with it. We remember by preference the things that have given us either pleasure or pain; and the effect may be produced by mere excitement although neither pleasurable nor painful; the influence of a surprise being a case in point. Our \_interest\_ in a thing is but another name for the pleasure that it gives us; and to inspire interest is to aid the memory. Hamilton's Law of Preference refers to this source; and appears to exclude, or not to recognise, the efficacy of feelings not pleasurable, namely, such as are either painful or neutral. The comprehensive law should include all the feelings, although there are specific characters attaching to the influence of each of the three modes. Pleasure is the most effectual in stamping the memory, as it is the most powerful in detaining the attention and the thoughts. Pain has a conflicting operation; as affecting the will, it repels the object; but as mere excitement it retains it; we cannot forget what is disagreeable, merely because we wish to forget it. The stimulant of pain, as applied in education, is an indirect pleasure. It is not intended to make the subject of the lesson disagreeable, but to render painful all diversions from that towards other subjects; so that comparatively the most pleasing course to a pupil may be to abide by the task prescribed.  
The influence of the Feelings upon Retentiveness is not throughout in proportion to their degree, whether they are pleasurable, painful, or neutral. We have to introduce a modifying circumstance into the case, namely, that great strength of feeling absorbs the forces of the system, and diminishes the power available for cementing an intellectual association. A strong feeling once aroused, while inflaming the attention upon whatever is bound up with it, necessarily engages us with itself. The plastic process of fixing a train or aggregate of ideas has but a share of the energies awakened under feeling.  
It is possible also to stimulate attention, and thereby to {118} quicken memory, without the excitement of the feelings, as in pure voluntary attention. For although the will, in the last resort, is stimulated by an end (which must involve the feelings), yet we may be strongly moved without being under the excitement of the feelings that enter into the final end. Our volitions may be energetic, without the presence of strong emotions, notwithstanding that, apart from our possessing such emotions, we should not be strongly moved to action. Thus, a difference is made between the influence of the feelings and the influence of the will; both being powers to impress the memory.](56441.docx#chunk3413)

[The two considerations now advanced, namely, the want of strict concomitance between strength of feeling and the stimulus to memory, and the operation of the will in the abeyance of present feeling, make it desirable to find some other mode of stating the element or condition that qualifies the influence of Frequency or Repetition, in the growth of memory and association. Perhaps the best mode of singling out the operative circumstance is to describe it as "Concentration of Mind;" the devotion of the mental forces to the thing to be done or remembered--the withdrawal of power from other exercises, to expend it on the exercise in hand. Every circumstance that at once rouses the mental and nervous energies, and keeps them fixed upon any subject of study or the practice of any art, is a circumstance in aid of acquisition. No fact more comprehensive, more exactly in point, can be assigned than the one now stated. What remains is to apply it in the detail, or to point out the occasions and conditions that favour, and those that obstruct, the concentration of the mental energy. It is under this view that we can best appreciate the efficacy of pleasure (interest in the subject), of pain, of mere excitement, and of voluntary attention. We can also see, as an obvious corollary, the advantage of having the mind unoccupied, or disengaged for the work, and the disadvantage of being diverted, or distracted by other objects. Fear, care, anxiety, are hostile to culture by lowering the tone or energy of the mind; while what power is left concentrates itself upon the subject matter of the anxious feeling. On the other hand, general vigour of the {119} system, good health, easy circumstances, are all in favour of mental improvement, provided the force thus made available can be reserved and devoted to that end.  
Thus the two leading conditions of the plastic process are Frequency of Repetition, and Mental Concentration. For practical purposes, these are all that we need to consider, at least as regards the same individual. We have no art or device for training either body or mind but what is comprised under one or other of these heads. There are methods of superseding the labour of new acquirement, by adapting existing acquirements to new cases; but no means can be assigned for the original construction of adhesive links, apart from these two circumstances.  
Still, in a large and exhaustive view of the Retentive power of the mind, we should not omit to allow for the differences between one mind and another in respect of Natural Aptitude for acquiring. When two persons engaged in the same lesson, for equal periods of time, and with about equal concentration of mind, make very unequal progress, we must admit a difference in natural or constitutional plasticity on that particular subject. Sometimes we find extraordinary progress made in acquisition generally; the same person excelling in languages, in sciences, in practical arts, and in fine arts. More commonly, however, we find an aptitude for some subject in particular, combined with deficiency in other things. One person has great mechanical acquirements, another lingual, and so on.  
The first case is sufficiently common to justify the assumption of degrees of acquisitive or plastic aptitude on the whole, or a variety in the cerebral endowment corresponding to the adhesion of trains of actions and ideas that have been more or less frequently brought together. If the differences among human beings are not so broad as to make this apparent, we may refer to the differences between the lower animals and man. The animals have the power of acquiring, but so limited is that power in comparison with human beings, that people have often doubted its existence.  
{120} The second case, the inequality of the same person's progress in different subjects, may be looked at in another way. We may view it as incident to the better or worse quality, for all purposes, of the special organs concerned. Thus to take musical acquisition. This is commonly attributed to a good ear, meaning a delicate sense of musical notes, as shown in their nice discrimination. Discriminating is a different function from remembering; yet, we can only doubt that the fact of being able to discriminate acutely is accompanied by the power of remembering or retaining the impressions of the sense. The superiority of endowment that shows itself in the one function, embraces also the other. Hence we are entitled to say that the special retentiveness for any one subject, or department of training, varies with the local endowment involved: which is not to maintain an identical proposition, for the local endowment may be held as tested by delicacy of discrimination, a distinct fact from memory. Thus, a delicate sense of shades of colour would entail a good visual memory for spectacle; a delicate ear for articulation would indicate a memory for shades and varieties of pronunciation, thereby counting as a part of the verbal memory. So, delicate discrimination in the tactile muscles would be followed by rapid acquirements in manipulative or manual art.  
\_The Ultimate Analysis of the Laws of Association\_.--It is easy to reduce all the laws ever assigned, as governing the reproduction of our ideas, to three, Contiguity, Similarity, and Contrast. It is open to question whether these can be resolved any farther. The author has endeavoured to reduce Similarity to Contiguity, but his reasons show that he had not deeply considered the workings of similarity. Hamilton's criticisms on the attempt (Reid, p. 914) are just and irrefragable. By far the most important examples of the working of similarity are such as, by their very nature, preclude a former contiguity: as, for example, Franklin's identification of Electricity and lightning.](56441.docx#chunk3414)

[There is, nevertheless, a considerable degree of subtlety in the relationship of the two principles. There may be good reasons {121} for treating them as distinct, but in their working they are inextricably combined. There can be no contiguity without similarity, and no similarity without contiguity. When, looking at a river, we pronounce its name, we are properly said to exemplify contiguity; the river and the name by frequent association are so united that each recalls the other. But mark the steps of the recall. What is strictly present to our view is the impression made by the river while we gaze on it. It is necessary that this impression should, by virtue of similarity or identity, re-instate the previous impression of the river, to which the previous impression of the name was contiguous. If one could suppose failure in the re-instatement of the former idea of the river, under the new presentation, there would be no opportunity given to the contiguous bond to come into operation. In that accumulation of the impressions of contiguous ideas, ending at last in a firm association, there must be a process of similarity to the extent of reviving the sum of the past at the instance of the present. This is a case of similarity that we give little heed to, because it is sure and unfailing; we concern ourselves more with what is liable to uncertainty, the acquired strength of the contiguous adhesion. Yet it strictly comes under the case of reproduction through similarity.  
Consider again, what may be called a case of Similarity proper, as when a portrait recalls the original. The sensuous effects possessed in common by the portrait and by its subject bring about a restoration of the idea of the subject, in spite of certain differences or discrepancies. The interest of this case is owing to the fact that a partial likeness, a likeness in unlikeness, will often reproduce a past idea; thus enabling us to assemble in the mind a number of things differing in some respects because they agree in other respects. This is not identifying a thing with itself, viewed at a former time, but assimilating one thing with other things placed far asunder in nature, and having many features of difference.  
Let us try and express the consecutive steps of this case of reproduction. The thing now present to the mind has certain {122} peculiarities in common with one or more things formerly present; as when, in a portrait, the outline and colouring resembles a subject original. These sensible effects make alive the previous recurrence of them, or put us in the cerebral and mental attitude formerly experienced by the corresponding effects of the resembling object. We are aware, by the liveliness of our impression, that we have gone in upon an old track; we have the peculiar consciousness called the consciousness of Identity or Agreement. This is one step, but not the whole. In order that the complete restoration may be effected, the features of community must be in such firm contiguous alliance with the features of difference--the \_special\_ part of the previous subject that the one shall reinstate the idea of the other. The points common to a present portrait and a past original must be so strongly coherent with the remaining features of the original, that the one cannot be awakened without the other following. Here, then, in the very heart of Similarity, is an indispensable bond of Contiguity; showing that it is not possible for either process to be accomplished in separation from the other. The mutual coherence of parts, now described as essential to reproduction, may be too weak for the purpose, and the recovering stroke of similarity will in that case fail.  
It might, therefore, be supposed that Similarity is, after all, but a mode of Contiguity, namely, the contiguity or association of the different features or parts of a complex whole. The inference is too hasty. Because contiguity is a part of the fact of the restoration of similars, it is not the entire fact. There is a distinct and characteristic step preceding the play of this mutual coherence of the parts of the thing to be recovered. The striking into the former track of the agreeing part of the new and the old, is a mental movement by itself, which the other follows, but does not do away with. The effect above described, as the consciousness of agreement or identity, the flash of a felt similarity, is real and distinct. We are conscious of it by itself; there are occasions when we have it without the other, that is to say, without the full re-instatement of the former {123} object in its entireness. We often aware of an identity without being able to say what is the thing identified; as when a portrait gives us the impression that we have seen the original, without enabling us to say who the original is. We have been affected by the stroke of identity or similarity; but the restoration fails from the feebleness of the contiguous adherence of the parts of the object identified. There is thus a genuine effect of the nature of pure similarity, or resemblance, and a mode of consciousness accompanying that effect; but there is not the full energy of reproduction without a concurring bond of pure contiguity. A portrait may fail to give us the consciousness of having ever seen the original. On the supposition that we have seen the original, this would be a failure of pure similarity.](56441.docx#chunk3415)

[Thus in every act of reproducing a past mental experience, there is a complication, involving both contiguity proper and similarity proper. When the similarity amounts to identity, as when a new impression of a thing puts us in the track of the old impressions of the same thing, the effect is so sure, so obvious, so easily arrived at, that we do not need to think of it, to make a question of it. It does not prevent us from regarding the operation of recalling a name when we see the thing, or recalling a thing when we hear the name, as pure contiguity. The strength of the coherence may be deficient, and the restoration may fail on this account; it can never fail on account of insufficient similarity. No inconvenience will arise from speaking of this case as if it were Contiguity and nothing else.  
The situation of Similarity in Diversity is quite distinct. The diversity obstructs the operation of similarity; we cannot be sure that the new shall put us on the track of the old. It is always a question whether such similarities shall be felt at all; whether we shall experience the flash, the peculiar consciousness, of agreement in difference. It is a farther question, whether the internal coherence of the thing identified is enough to restore it in completeness. This last step may be allowed to be a case of proper contiguity; while the flash of identity struck between a present and a past, never coupled in the {124} mind before, is an effect \_sui generis\_, and not resolvable into any mode or incident of contiguity.  
The circumstances of this identifying stroke are so numerous and far-reaching as to demand a special exemplification. Some of the broadest distinctions of intellectual character can be grounded on the distinctive aptitudes of the mind for Contiguity and for Similarity.  
Learning, Acquisition, Memory, Habit, all designate the plastic adherence of contiguous impressions. The processes of Classification, Reasoning, Imagination, and the Inventive faculty generally, depend upon the identifying stroke of likeness in unlikeness. Some forms of intellectual strength, as a whole, are best represented by a highly energetic Adhesiveness; distinction as a learner, a follower of routine, turns upon this power. Other, and higher, forms of intelligence depend upon far-reaching strokes of similarity; the identification of likeness shrouded in diversity, expresses much of the genius of the poet, the philosopher, the man of practice.  
There remains the consideration of Contrast, as a link of association. It is easy to show that both Contiguity and Similarity may enter into the association of contrasts. All contrasts that we are interested in are habitually coupled in language, as light and dark, heat and cold, up and down, life and death. Again contrasts suppose a common genus, that is a generic similarity; at least until we ascend to the highest contrast of all, the subject mind, and the object or extended world. Cold and Hot are grades of the common attribute called Temperature. As these links of contiguity and similarity are present, and of considerable strength, they practically lead to the mutual suggestion of contrasting things.  
Still, we cannot overlook the deeper circumstance that in contrast there is \_relation\_, and therefore mutual implication, so that the two members must always be virtually present, although they are not equally attended to. Heat has no meaning, no existence, but as a change from cold; the north implicates the south. We have two modes of regarding these relationships, which are distinguished by language, as if we {125} could abstract the one side from the other; that is, we think of heat apart from cold, and of the north apart from the south. But if one side is present, both must be present, and nothing is wanted but a motive, to make us reverse the conception, and bring into prominence the side that was in abeyance, cold instead of heat, south instead of north.  
This view of Contrast is variously expressed by Hamilton. (Reid, Note D \* \* \*).  
Contrast, therefore, as an associating link, would draw from three sources, Relativity, Contiguity, and Similarity. It would also be heightened, in many instances, by the presence of strong feelings or emotions, as in the contemplation of startling changes, and the vicissitudes of things. Being one of the effects habitually introduced in Art and in Oratory, we are more than ordinarily impressed by the things so made use of--infancy beside old age, squalor following on splendour, abasement succeeding to elevation.  
The associating principle of Contrast cannot be put forward as a basis of distinction in intellectual character. There is no such a thing as a special aptitude for Contrasts. There may be, in certain minds given to emotion, a fondness for the impressive or emotional contrasts; but there is no intellectual gift, subsisting apart from other powers and rising and falling independently, for the mutual recall of contrasting qualities. Whenever we feel a difference we make a contrast; the two differing things, are contrasting things, and are both known in one indivisible act of thought. To be unable to bring up the contrast of a subject present to the view, is not to know the subject; we cannot possess intelligently the conception of "up," and be oblivious to, or incapable of remembering, "down." Forgetfulness in this department is not the snapping of a link, as in Contiguity, or the dulness that cannot reach a similitude; it is the entire blank of conception or knowledge. The north pole of a magnet cannot be in the view, and the south pole in oblivion.--\_B.\_]](56441.docx#chunk3416)

[[Editor's footnote 39: The author and Mr. Bain agree in rejecting Contrast as an independent principle of association. I think they might {126} have gone further, and denied it even as a derivative one. All the cases considered as examples of it seem to me to depend on something else. I greatly doubt if the sight or thought of a dwarf has intrinsically any tendency to recall the idea of a giant. Things certainly do remind us of their own absence, because (as pointed out by Mr. Bain) we are only conscious of their presence by comparison with their absence; and for a further reason, arising out of the former, viz. that, in our practical judgments, we are led to think of the case of their presence and the case of their absence by one and the same act of thought, having commonly to choose between the two. But it does not seem to me that things have any special tendency to remind us of their positive opposites. Black does not remind us of white more than of red or green. If light reminds us of darkness, it is because darkness is the mere negation, or absence, of light. The case of heat and cold is more complex. The sensation of heat recalls to us the absence of that sensation: if the sensation amounts to pain, it calls up the idea of relief from it; that is, of its absence, associated by contiguity with the pleasant feeling which accompanies the change. But cold is not the mere absence of heat; it is itself a positive sensation. If heat suggests to us the idea of the sensation of cold, it is not because of the contrast, but because the close connection which exists between the outward conditions of both, and the consequent identity of the means we employ for regulating them, cause the thought of cold and that of heat to be frequently presented to us in contiguity.--\_Ed.\_]  
  
  
  
{127} CHAPTER IV.  
NAMING.  
  
"I endeavour, as much as I can, to deliver myself from those fallacies which we are apt to put upon ourselves, by taking words for things. It helps not our ignorance to feign a knowledge where we have none, by making a noise with sounds without clear and distinct significations. Names made at pleasure, neither alter the nature of things, nor make us understand them, but as they are signs of, and stand for, determined ideas."--\_Locke, Hum. Und.\_ b. ii. ch. 13, SS 18.  
WE have now surveyed the more simple and obvious phenomena of the human mind. We have seen, first, that we have SENSATIONS; secondly, that we have IDEAS, the copies of those sensations; thirdly, that those ideas are sometimes SIMPLE, the copies of one sensation; sometimes COMPLEX, the copies of several sensations so combined as to appear not several ideas, but one idea; and, fourthly, that we have TRAINS of those ideas, or one succeeding another without end.  
These are simple facts of our nature, attested by experience; and my chief object in fixing upon them the attention of the reader has been, to convey to him that accurate and steady conception of them, which is requisite for the successful prosecution of the subsequent inquiries.  
{128} After delineating the simple and elementary states of consciousness, it follows, in order, that we should endeavour to show what is contained in those that are complex. But in all the more complicated cases of human consciousness something of the process of Naming is involved. These cases, of course, cannot be unfolded, till the artifice of Naming is made known. This, therefore, is necessarily an intermediate inquiry; and one to which it is necessary that we should devote a particular degree of attention.  
There are two purposes, both of great importance, for which marks of our ideas, and sensations; or signs by which they may be denoted; are necessary. One of these purposes is, That we maybe able to make known to others what passes within us. The other is, That we may secure to ourselves the knowledge of what at any preceding time has passed in our minds.  
The sensations and ideas of one man are hidden from all other men; unless they have recourse to some expedient for disclosing them. We cannot convey to another man our sensations and ideas directly. Our means of intercourse with other men are through their senses exclusively. We must therefore choose some SENSIBLE OBJECTS, as SIGNS of our inward feelings. If two men agree, that each shall use a certain sensible sign, when one of them means to make known to the other that he has a certain sensation, or idea, they, in this, and in no other way, can communicate a knowledge of those feelings to one another.  
Almost all the advantages, which man possesses above the inferior animals, arise from his power of acting in combination with his fellows; and of accomplishing, by the united efforts of numbers, what could {129} not be accomplished by the detached efforts of individuals. Without the power of communicating to one another their sensations and ideas, this co-operation would be impossible. The importance, therefore, of the invention of signs, or marks, by which alone that communication can be effected, is obvious.  
Among sensible objects, those alone which are addressed to the senses of seeing and hearing have sufficient precision and variety to be adapted to this end. The language of Action, as it has been called, that is, certain gesticulations and motions, has very generally, especially among rude people, whose spoken language is scanty, been found in use to indicate certain states, generally complicated states, of mind. But, for precision, variety, and rapidity, the flexibility of the voice presented such obvious advantages, not to mention that visible signs must be altogether useless in the dark, that sounds, among all the varieties of our species, have been assumed as the principal medium by which their sensations and ideas were made known to one another.](56441.docx#chunk3417)

[There can be little doubt that, of the two uses of marks, Communicating our thoughts, and Recording them, the advantage of the first would be the earliest felt; and that signs for Communicating would be long invented, before any person would see the advantage of Recording his thoughts. After the use of signs for Communication had become familiar, it would not fail, in time, to appear that signs might be employed for Recordation also; and that, from this use of them, the highest advantages might be derived.  
In respect to those advantages, the following particulars are to be observed.  
{130} 1. We cannot recall any idea, or train of ideas, at will. Thoughts come into the mind unbidden. If they did not come unbidden, they must have been in the mind before they came into it; which is a contradiction. You cannot bid a thought come into the mind, without knowing that which you bid; but to know a thought is to have the thought: the knowledge of the thought, and the thought's being in the mind, are not two things but one and the same thing, under different names.  
If we cannot recall at pleasure a single idea, we are not less unable to recall a train. Every person knows how evanescent his thoughts are, and how impossible it is for him to begin at the beginning of a past train, if it is not a train of the individual objects familiar to his senses, and go on to the end, neither leaving out any of the items which composed it, nor allowing any which did not belong to it, to enter in.  
2. It is most obvious that, by ideas alone, the events which are passed, are to us any thing. If the objects which we have seen, heard, smelt, tasted, and touched, left no traces of themselves; if the immediate sensation were every thing, and a blank ensued when the sensation ended, the past would be to us as if it had never been. Yesterday would be as unknown as the months we passed in the womb, or the myriads of years before we were born.  
3. It is only by our ideas of the past, that we have any power of anticipating the future. And if we had no power of anticipating the future, we should have no principle of action, but the physical impulses, which we have in common with the brutes. This great law of our nature, the anticipation of the future from the {131} past, will be fully illustrated in a subsequent part of this inquiry: at present, all that is required is, the admission, which will probably not be refused, of this general truth: That the order, in which events have been observed to take place, is the order in which they are expected to take place; that the order in which they have taken place is testified to us only by our ideas; and that upon the correctness, with which they are so testified, depends the faculty we possess of converting the powers of nature into the instruments of our will; and of bringing to pass the events which we desire.  
4. But all this power depends upon the order of our ideas. The importance, therefore, is unspeakable, of being able to insure the order of our ideas; to make, in other words, the order of a train of ideas correspond unerringly with a train of past sensations. We have not, however, a direct command over the train of our ideas. A train of ideas may have passed in our minds corresponding to events of great importance; but that train will not pass again, unvaried, except in very simple cases, without the use of \_expedients\_.  
5. The difference between the occasions of our IDEAS, and the occasions of our SENSATIONS, affords a resource for this purpose. Over the occasions of our sensations; we have an extensive power. We can command the smell of a rose, the hearing of a bell, the sight of a tree, the sensation of heat or of cold, and so on. Over the occasions of our ideas we have little or no direct power. Our ideas come and go. There is a perpetual train of them, one succeeding another; but we cannot will any link in that chain of ideas; each link is determined by the foregoing; and every man knows, how impossible {132} it is, by mere willing, to make such a train as he desires. Thoughts obtrude themselves without his bidding; and thoughts which he is in quest of will not arise.  
By the power, however, which we have over the occasions of our sensations, we can make sure of having a train of sensations exactly the same as we have had before. This affords us the means of having a train of ideas exactly the same as we have had before. If we choose a number of sensible objects, and make use of them as marks of our ideas, we can ensure any succession which we please of the sensible objects; and, by the association between them and the ideas, a corresponding succession of the ideas.](56441.docx#chunk3418)

[6. To one of the two sets of occasions, upon which Signs are thus useful, \_evanescent\_ Signs are the best adapted; \_permanent\_ signs are absolutely necessary for the other. For the purposes of speech, or immediate communication, sounds are the most convenient marks. Sounds, however, perish in the making. But for the purpose of retracing a train of ideas, which we have formerly had, it is necessary we should have marks which do not perish. Marks, addressed to the sight, or the touch, have the requisite permanence; and, of the two, those addressed to the eye have the advantage. Of marks addressed to the eye, two kinds have been adopted; either marks immediately of the ideas intended to be recalled; such as the picture-writing, or hieroglyphics, of some nations: or, visible marks, by letters, of the audible marks employed in oral communication. This latter kind has been found the most convenient, and in use among the largest, and most intelligent portion of our species.  
{133} According to this scheme, spoken language is the use of immediate marks of the ideas; written language, is the use of secondary marks of the ideas. The written marks are only signs of the audible marks; the audible marks, are signs of the ideas.[40]  
[Editor's footnote 40: This exposition of Naming in its most general aspect, needs neither explanation nor comment. It is one of those specimens of clear and vigorous statement, going straight to the heart of the matter, and dwelling on it just long enough and no longer than necessary, in which the Analysis abounds.--\_Ed.\_]  
  
{134} SECTION I.  
NOUNS SUBSTANTIVE.  
  
The power of Language essentially consists, in two things; first, in our having marks of our SENSATIONS, and IDEAS: and, secondly, in so arranging them, that they may correctly denote a TRAIN of those mental states or feelings. It is evident, that if we convey to others the ideas which pass in our own minds, and also convey them in the order in which they pass, the business of COMMUNICATION is completed. And, if we establish the means of reviving the ideas which we have formerly had, and also of reviving them in the order in which we formerly had them, the business of RECORDATION is completed. We now proceed to show, by what contrivances, the expedient of Marking is rendered efficient to those several ends.  
The primary importance to men, of being able to make known to one another their SENSATIONS, made them in all probability begin with inventing marks for that purpose; in other words, making Names for their SENSATIONS. Two modes presented themselves. One was to give a name to each single sensation. Another was to bestow a name on a cluster of sensations, whenever they were such as occur in a cluster. Of this latter class, are all names of what are called External Objects; rose, water, stone, and so on. Each of these names is the mark of as many sensations (sight, touch, smell, taste, sound) as we are said to derive from those objects. The name rose, is the {135} mark of a sensation of colour, a sensation of shape, a sensation of touch, a sensation of smell, all in conjunction. The name water, is the mark of a sensation of colour, a sensation of touch, a sensation of taste, and other sensations, regarded not separately, but as a compound.[41]  
[Findlater's footnote 41: It is not intended to be understood that all this complex meaning entered into the names as originally given. The process of naming seems to have been this: Each object was designated by a term expressive of some one prominent quality, and of that only. Thus \_rose\_ is referred with every probability to the same root as the adjective \_red\_ (compare Greek [Greek: r(o/don], a rose, [Greek: e(ruthro\s] red, German \_roth\_, Latin \_rutilus\_), and thus meant "the ruddy" (flower). Other objects would doubtless also be called "ruddy," and would dispute the epithet with the rose; but by a process of natural selection, each would settle down in possession of the term found best suited to distinguish it; which would thus cease to be an attributive, and become a name substantive with a complex connotation derived from association. All names of objects whose origin can be traced are found to be thus simple in their primary signification. The stars (Sans. \_staras\_) were so called because they were "strewers" (of light).--\_F.\_]  
There is a convenience in giving a single mark to any number of sensations, which we thus have in clusters; because there is hence a great saving of marks. The sensations of sight, of touch, of smell, and so on, derived from a rose, might have received marks, and have been enumerated, one by one; but the term rose, performs all this much more expeditiously, and also more certainly.  
The occasions, however, are perpetual, on which we need marks for sensations, not in clusters, but taken separately. And language is supplied with {136} names of this description. We have the terms, red, green, hot, cold, sweet, bitter, hard, soft, noise, stench, composing in the whole a numerous class. For many sensations, however, we have not names in one word; but make a name out of two or more words: thus, for the sensation of hearing, derived from a trumpet, we have only the name, "sound of a trumpet;" in the same manner, we have "smell of a rose," "taste of an apple," "sight of a tree," "feeling of velvet."  
Of those names which denote clusters of sensations, it is obvious (but still very necessary) to remark, that some include a greater, some a lesser number of sensations. Thus, stone includes only sensations of touch, and sight. Apple, beside sensations of touch and sight, includes sensations of smell and taste.](56441.docx#chunk3419)

[We not only give names to clusters of sensations, but to clusters of clusters; that is, to a number of minor clusters, united into a greater cluster. Thus we give the name wood to a particular cluster of sensations, the name canvas to another, the name rope to another. To these clusters, and many others, joined together in one great cluster, we give the name ship. To a number of these great clusters united into one, we give the name fleet, and so on. How great a number of clusters are united in the term House? And how many more in the term City?  
Sensations being infinitely numerous, all cannot receive marks or signs. A selection must be made. Only those which are the most important are named.  
Names, to be useful, cannot exceed a certain number. They could not otherwise be remembered. It is, therefore, of the greatest importance that each name should accomplish as much as possible. To this end, {137} the greater number of names stand, not for individuals only, but classes. Thus the terms red, sweet, hot, loud, are names, not of one sensation only, but of classes of sensations; that is, every sensation of a particular kind. Thus also the term, rose, is not the name of one single cluster, but of every cluster coming under a certain description. As rose denotes one class, stone denotes another, iron another, ox another, and so on.[42]  
[Editor's footnote 42: Economy in the use of names is a very small part of the motive leading to the creation of names of classes. If we had a name for every individual object which exists in the universe, and could remember all those names, we should still require names for what those objects or some of them have in common; in other words, we should require classification, and class names. This will be obvious if it is considered that had we no names but names of individuals, we should not have the means of making any affirmation respecting any object; we could not predicate of it any qualities. But of this more largely in a future note.--\_Ed.\_]  
As we need marks for SENSATIONS, we need marks also for IDEAS.  
The Ideas which we have occasion to name, are first, Simple Ideas, the copies of simple sensations; secondly, Complex Ideas, the copies of several sensations, combined. Of those complex ideas, also, there is one species, those copied directly from sensations, in the formation of which the mind has exercised but little control; as the ideas of rose, horse, stone, and of what are called the objects of sense in general. There is another species of complex ideas which, though derived also from the senses, are put together in a great degree at our discretion, as the ideas of a {138} centaur, a mountain of gold, of comfort, of meanness; all that class of ideas in short which Mr. Locke has called mixed modes.  
We may thus distinguish three classes of ideas, which we have occasion to name: 1, simple ideas, the copies of single sensations: 2, complex ideas, copied directly from sensations: 3, complex ideas, derived indeed from the senses, but put together in arbitrary combinations. The two former classes may be called Sensible, the last Mental Ideas.  
With respect to ideas, of the first two classes, those which are the direct copies of our sensations, either singly, or in groups; it is of great importance to observe, and also to remember, that, for the most part, the words, which are employed as marks of the Sensations, are made to serve the further purpose of being marks also of the Ideas. The same word is at once the name of the sensations, and the ideas.  
If any person were asked, whether the word BEING is the name of a Sensation, or of an Idea; he would immediately reply, that it is the name of an Idea. In like manner, if he were asked, whether the word ANIMAL is the mark of a cluster of Sensations, or of a cluster of Ideas; he would with equal readiness say, of a cluster of Ideas. But if we were to ask, whether the name Sheep is the name of a cluster of Sensations, or of a cluster of Ideas; he would probably say, that Sheep is the name of Sensations; in the same manner as rose, or apple. Yet, what is the difference? Only this, that ANIMAL is the more general name, and includes sheep along with other species; and that BEING is still more general, and includes animal along with vegetable, mineral, and other {139} \_genera\_. If sheep, therefore, or stone, be a name of sensations, so is animal or being; and if animal, or being, be a name of ideas, so is sheep or stone a name of ideas. The fact is, they are all names of both. They are names of the Sensations, primarily; but are afterwards employed as names also of the Ideas or copies of those sensations.  
It thus appears, that the names generally of what are called the objects of sense are equivocal; and whereas it would have been a security against confusion to have been provided with appropriate names, one, in each instance, for the Sensation, and one for the Idea, the same name has been made to serve as the mark for both. The term horse is not only made to stand for the sensations of sight, of hearing, of touch, and even of smell, which give me occasion for the use of the term horse; but it stands also for the ideas of those sensations, as often as I have occasion to speak of that cluster of ideas which compose my notion of a horse. The term tree denotes undoubtedly the Idea in my mind, when I mean to convey the idea tree into the mind of another man; but it also stands for the sensations whence I have derived my idea of a tree.](56441.docx#chunk3420)

[Thus, too, if I mean to name my simple ideas; those, for example, of sight; I have no other names than red, blue, violet, &c. but all these are names of the sensations. When forced to distinguish them, I must use the awkward expressions, my sensation of red, my idea of red. Again; sound of a trumpet, is the name, as well of the sensation, as the idea; flight of a bird, the name, as well of the sensation, as the idea; light the name as well of the sensation as the idea; pain {140} the name as well of the sensation as the idea; heat the name as well of the sensation as the idea.[43]  
[Editor's footnote 43: In strict propriety of language all these are names only of sensations, or clusters of sensations; not of ideas. A person studious of precision would not, I think, say heat, meaning the idea of heat, or a tree, when he meant the idea of a tree. He would use heat as the name only of the sensation of heat, and tree as the name of the outward object, or cluster of sensations; and if he had occasion to speak of the idea, he would say, my idea (or the idea) of heat; my idea (or the idea) of a tree.--\_Ed.\_]  
As we have remarked, in regard to SENSATIONS, singly, or in clusters, that they are too numerous to receive names but in classes, that is names common to every individual of a class, the same is obviously true of the IDEAS. The greater number of names of Sensible Ideas are names of classes: man is the name of a class; lion, horse, eagle, serpent, and so on, are names of classes.  
Ideas, of the third class, those which the mind forms arbitrarily, are innumerable; because the combinations capable of being formed of the numerous elements which compose them, exceed computation. All these combinations cannot receive names. The memory can manage but a moderate number. Of possible combinations, therefore, a small proportion must be selected for naming. These, of course, are the combinations which are suggested by the occasions of life, and conduce to the ends which we pursue.  
We arrange those ideas, also, in classes; to the end that every name may serve the purpose of marking, as extensively as possible. Thus the term fear is {141} applicable to a state of mind, of which the instances form a class. In like manner, courage is the name of a class; temperance, ignorance, piety, and so on, names of classes. Republic, aristocracy, monarchy, are names, each of them, not of an individual government, a government at one time and place, but of a class, a sort of government, at any time and place.  
The names of the ideas which are thus mentally clustered, are exempt from that ambiguity which we saw belonged to the names of both classes of sensible ideas. The names of sensible ideas generally stand for the sensations as well as the ideas. The names of the mental ideas are not transferable to sensations. But they are subject to another uncertainty, still more fertile in confusion, and embarrassment.  
As the combinations are formed arbitrarily, or in other words, as the ideas of which they are composed, are more or less numerous, according to pleasure, and each man of necessity forms his own combination, it very often happens, that one man includes something more or something less than another man in the combination to which they both give the same name. Using the same words, they have not exactly the same ideas. In the term piety, for example, a good catholic includes many things which are not included in it by a good protestant. In the term good manners, an Englishman of the present day does not include the same ideas which were included in it by an Englishman two centuries ago; still less those which are included in it by foreigners of habits and usages dissimilar to our own. Prudence, in the mind of a man of rank and fortune, has a very different meaning from what it bears in the minds of the {142} frugal and industrious poor. Under this uncertainty in language, it not only happens that men are often using the same expressions when they have different ideas; but different, when they have the same ideas.[44]](56441.docx#chunk3421)

[[Editor's footnote 44: There is some need for additional elucidation of the class of complex ideas distinguished (under the name of Mixed Modes) by Locke, and recognised by the author of the Analysis, as "put together in a great degree at our discretion;" as "those which the mind forms arbitrarily," so that "the ideas of which they are composed are more or less numerous according to pleasure, and each man of necessity forms his own combination." From these and similar phrases, interpreted literally, it might be supposed that in the instances given, a centaur, a mountain of gold, comfort, meanness, fear, courage, temperance, ignorance, republic, aristocracy, monarchy, piety, good manners, prudence--the elements which constitute these several complex ideas are put together premeditatedly, by an act of will, which each individual performs for himself, and of which he is conscious. This, however, happens only in cases of invention, or of what is called creative imagination. A centaur and a mountain of gold are inventions: combinations intentionally made, at least on the part of the first inventor; and are not copies or likenesses of any combination of impressions received by the senses, nor are supposed to have any such outward phenomena corresponding to them. But the other ideas mentioned in the text, those of courage, temperance, aristocracy, monarchy, &c., are supposed to have real originals outside our thoughts. These ideas, just as much as those of a horse and a tree, are products of generalization and abstraction: they are believed to be ideas of certain points or features in which a number of the clusters of sensations which we call real objects agree: and instead of being formed by intentionally putting together simple ideas, they are formed by stripping off, or rather, by not attending to, such of the simple sensations or ideas entering into the {143} clusters as are peculiar to any of them, and establishing an extremely close association among those which are common to them all. These complex ideas, therefore, are not, in reality, like the creations of mere imagination, put together at discretion, any more than the complex ideas, compounded of the obvious sensible qualities of objects, which we call our ideas of the objects. They are formed in the same manner as these, only not so rapidly or so easily, since the particulars of which they are composed do not obtrude themselves upon the senses, but suppose a perception of qualities and sequences not immediately obvious. From this circumstance results the consequence noticed by the author, that this class of complex ideas are often of different composition in different persons. For, in the first place, different persons abstract their ideas of this sort from different individual instances; and secondly, some persons abstract much better than others; that is, take more accurate notice of the obscurer features of instances, and discern more correctly what are those in which all the instances agree. This important subject will be more fully entered into when we reach that part of the present work which treats of the ideas connected with General Terms.--\_Ed.\_]  
  
{144} SECTION II.  
NOUNS ADJECTIVE.  
  
As the purpose of language is to denote sensations and ideas; to mark them for our own use, or to give indication of them to our fellow men; it is obvious that the names of sensations and ideas are the fundamental parts of language. But as ideas are very numerous, and the limits of the human memory admit the use of only a limited number of marks or names, various contrivances are employed to make one name serve as many purposes as possible.  
Of the contrivances for making the use of each word as extensive as possible, we have already adverted to one of great importance; that of arranging ideas in classes, and making one name stand for each individual of the class. When the classes are large, one word or mark serves to name or indicate many individuals.  
But when, for the sake of economizing names, those classes have been made as large as possible, we often find occasion for breaking them down into smaller parcels, or sub-classes, and speaking of these sub-classes by themselves.  
An example will render what is here expressed sufficiently plain. The term sound, is the name of a large class of ideas or sensations; for it is equally the name of both; the sound of thunder, the sound of a cannon, the whistling of the wind, the voice of a man, the howling of a dog, and so on.  
{145} Among these sounds I perceive differences; some affect me in one way, and I wish to mark them as doing so; some affect me in another way, and I wish to mark them as affecting me in that particular way.  
It is obvious that names might be invented for these subordinate classes, to mark such of them as we have occasion to mark; and the cases are numerous, in which this is the expedient adopted. Thus the term animal is the name of a large class. But we have occasion to speak apart of various portions of this class, to all the more important of which portions, we have given particular names. Horse is the name of one portion, man of another, sheep of another, and so of the rest.  
There is, however, another mode of naming subordinate classes; a mode by which the use of names is greatly economized, and of which the utility is therefore conspicuous.](56441.docx#chunk3422)

[The subordinate class is distinguished from they rest of the greater class by some peculiarity, something in which the individuals of it agree with one another, and do not agree with the rest. Thus to recur to the example of sound. One set of sounds affect me in a certain way, a way peculiar to that set. Wishing to distinguish these sounds from others by a mark, I call them \_loud\_. Another set of sounds affect me in another way, and I call them \_low\_; a third set in another way, and I call them \_harsh\_; a fourth in another way, and I call them \_sweet\_. By means of those adjectives applied as marks upon the mark of the great class, I have the names of four species, or sub-classes; 1, loud sounds; 2, low sounds; 3, harsh sounds; 4, {146} sweet sounds; and the number might be greatly enlarged.  
It thus appears that, as nouns substantive are marks of ideas, or sensations, nouns adjective are marks put upon nouns substantive, or marks upon marks; in order to limit the signification of the noun substantive; and instead of its marking a large class, to make it mark a subdivision of that class. Thus the word, rose, is the mark of a large class: apply to it the adjective \_yellow\_, that is, put the mark yellow upon the mark rose, and you have the name, yellow rose, which is a sub-division, or species, of the class Rose.  
This peculiarity of naming, this putting of marks upon marks, in order to modify the meaning of a certain mark, is a contrivance which deserves the greatest attention. It is one of the principal expedients for the great purpose of economizing names, and performing the business of marking with the smallest number of marks; but, like the rest of the contrivances for this purpose, it contributes to obscure the simple process of naming; and when not distinctly known and attended to, operates as a source of confusion and error.  
The use of adjectives, in economizing names, is most conspicuous, in the case of those subdivisions which apply to the greatest number of classes. There is one distinction which applies to most classes; the distinction between what pleases, and what does not please us, no matter on what account. The first we call good, the second evil. These two terms serve to mark a very great number of subordinate classes, and, of course, save, to a great extent, the multiplication of names.  
{147} Thus, in the case of the senses, we have the word taste, the mark of one great class of sensations. Tastes we divide into sub-classes by the words good and evil; good tastes being one class, bad tastes another. If we had invented separate marks for each of these two classes, we should have had three names, to mark the class taste with these its two primary subdivisions; and we should have had occasion for the same number of names in the case of each of the five senses; or, fifteen different names. But the adjectives, good, and evil, they being applicable to all the senses, save us the invention of names for the sub-classes of the other four senses; as we say good smells, bad smells, in the same manner as good tastes, and bad tastes. They save, therefore, eight names out of fifteen, or more than one-half.  
The economizing power of adjectives is still more remarkable, when we depart from simple sensations and ideas, and apply them as marks upon the names of the complex, which are far more numerous. Thus, the term horse is the mark of a complex idea, and the name of a class of objects. We say good horse and bad horse, good dog and bad dog, good house and bad house, and so in cases without number; in each of which, the repetition of the two adjectives, good, and bad, saves us the use and embarrassment of separate names.  
It deserves to be remarked, that the terms good and evil apply much more generally to that class of complex ideas, in the formation of which the mind has but little control; namely, those of external objects; than they do to the other class of complex ideas which the mind makes up in an arbitrary {148} manner to suit its own convenience. Ideas of the latter description are very often made up according to the distinction of good and evil. Thus, the idea glory, is composed of ingredients all of which belong to the classes, good; and the idea good, is multifariously included in the name. After the same manner, the idea of evil is multifariously included in the complex idea disgrace. Good is implied in the term virtue, evil in the term vice; good is implied in the term wealth, evil in the term poverty; good is implied in the term power, evil in the term weakness. In some cases, the ideas of this class are so general, that good and evil are both included; and, in such cases, adjectives are necessary to mark the subdivisions or species. Thus, we say good manners, bad manners; good sense, bad sense; good conduct, bad conduct; and so on.  
Next to the adjectives which form the numerous sub-classes of good and evil, those which mark degrees are of the most extensive application, and in the operation of sub-marking save the greatest number of names. Thus the terms, great, and little, are applicable to a great proportion of the marks of complex ideas of both formations. We say a great tree, a little tree; a great man, a little man; a great crime, a small crime; great blame, little blame; great honour, little honour; great value, little value; great weight, little weight; great strength, little strength, and so on.](56441.docx#chunk3423)

[Different adjectives differ in the number of classes to the subdivision of which they are subservient. Thus hot and cold are only applicable where diversities of temperature are included; round, square, and {149} so on, where figure is included; white or black, where colour; and so on.  
Beside the use of adjectives, in dividing great classes into smaller ones, without multiplication of names; they sometimes answer another purpose. It often happens that, in the cluster of sensations or ideas which have one name; we have occasion to call attention particularly to some one ingredient of the cluster. Adjectives render this service, as well as that of marking a class. This rose, I say, is red; that rose is yellow: this stone is hot, that stone is cold. The term, red rose, or yellow rose, is the name of a class. But when I say, this rose is red, where an individual is named, I mark emphatically the specific difference; namely, red, or yellow; which constitutes that subdivision of the genus rose, to which the individual belongs.[45]  
[Editor's footnote 45: In the concluding paragraph we find the first recognition by the author that class names serve any purpose, or are introduced for any reason, except to save multiplication of names. Adjectives, it is here said, answer also the purpose of calling attention to some one ingredient of the cluster of sensations combined under one name. That is to say, they enable us to affirm that the cluster contains that ingredient: for they do not merely call attention to the ingredient, or remind the hearer of it: the hearer, very often, did not know that the cluster contained the ingredient, until he was apprised by the proposition.  
But surely it is not only adjectives which fulfil either office, whether of giving information of an ingredient, or merely fixing the attention upon it. All general names do so, when used as predicates. When I say that a distant object which I am pointing at is a tree, or a building, I just as much call attention to certain ingredients in the cluster of sensations constituting the object, as I do when I say, This rose is red. So {150} far is it from being true that adjectives are distinguished from substantives by having this function in addition to that of economizing names, that it is, on the contrary, much more nearly true of adjectives than of the class-names which are nouns substantive, that the economizing of names is the principal motive for their institution. For though general names of some sort are indispensable to predication, adjectives are not. As is well shewn in the text, the peculiarity, which really distinguishes adjectives from other general names, is that they mark cross divisions. All nature having first been marked out into classes by means of nouns substantive, we might go on by the same means subdividing each class. We might call the large individuals of a class by one noun substantive and the small ones by another, and these substantives would serve all purposes of predication; but to do this we should need just twice as many additional nouns substantive as there are classes of objects. Since, however, the distinction of large and small applies to all classes alike, one pair of names will suffice to designate it. Instead therefore of dividing every class into sub-classes, each with its own name, we draw a line across all the classes, dividing all nature into large things and small, and by using these two words as adjectives, that is, by adding one or other of them as the occasion requires to every noun substantive which is the name of a class, we are able to mark universally the distinction of large and small by two names only, instead of many millions.--\_Ed.\_]  
  
{151} SECTION III.  
VERBS.  
  
1. There is one class of complex ideas, of so particular a nature, and of which we have so frequent occasion to speak, that the means of sub-dividing them require additional contrivances. Marks put upon marks are still the instrument. But the instrument, to render it more effectual to this particular purpose, is fashioned in a particular way. I allude to the class of words denominated Verbs: which are, in their essence, adjectives, and applied as marks upon marks; but receive a particular form, in order to render them, at the same time, subservient to other purposes.  
The mode of their marking, and the peculiarity of their marking power may easily, I hope, be thus conceived.  
A billiard-ball affects my senses, in a particular manner. On account of this, I call it round; and the term round is ever after a mark to me of a portion of the sensations which I derive from it. It affects me in another manner. I call it on that account white, and the term white is to me a mark of this other mode in which it affects me: and in the same manner as I call it white, round, on account of such and such sensations, I call it Moving, on account of certain other sensations, of which the term Moving is to me a perpetual mark.  
{152} The manner of affecting me on account of which I call it moving, I learn from experience to be peculiarly entitled to my regard. I find that it is a mode of affecting me, which belongs to almost all bodies; and I find that upon this attribute of theirs the greatest part of my interesting sensations depend. I am therefore deeply concerned in the knowledge of motions; and have the strongest inducement to divide them into such classes as may in the highest degree facilitate that knowledge.](56441.docx#chunk3424)

[Motions are divided in a great variety of ways for a variety of purposes. Sometimes we divide them according to their subjects. Thus, the motion of a bird is one class of motions; the motion of a horse another; so the motion of a serpent, the motion of an arrow, the motion of a wheel. At other times we form classes of motions according to the manner. Thus we have running, flying, rolling, leaping, staggering, throwing, striking, and so on.  
Of all the classifications of motions, however, that which deserves the greatest attention is the distinction of them into the motions which originate within the moving body, and those which originate without it. Of the motions which originate within the moving body, the principal are the living motions of animals. We find, also, that of all the motions of animals, those of men are the most important to men. The motions of men are divided into a great number of classes. On account of one set of motions we call a man walking; on account of another sort we call him running; another, writing; another, dancing; another, fencing; another, boxing; another, building; and so on. We have also frequent occasion for a name which shall {153} embrace all these motions of men. For this purpose the word Acting is employed: and the term Action denotes any of the motions, which originate within a man as the moving body. It is no objection to this account of the use of the word action, that it is sometimes employed in cases in which the motion is not the principal object of attention; as in the act of singing, or that of speaking. Here, though it is not the motion, but the effect of the motion, which is the object of attention to the hearer, the act of the singer or speaker is not the less truly a motion.  
The word action, when thus invented, and used, is afterwards applied metaphorically to motions which do not originate in the moving body, as when we say the action of a sword; and also to certain processes of the mind, which, as they are accompanied with the feeling we call effort, resembling that which accompanies the voluntary motions, are sometimes classed along with them, and, by an extension of the meaning of the word, receive the name of actions. In this manner, remembering, computing, comparing, even hearing, and seeing, are denominated actions.  
2. In applying the term Acting, or the terms expressive of the several kinds of acting, the Time the action is a material circumstance. The grand divisions of time are the Past, the Present, and the Future. There is great utility in a short method of marking these divisions of time in conjunction with the mark of the action. This is effected by the Tenses of Verbs.  
3. When the name of an act is applied to an agent the agent is either the person speaking, the person spoken to, or some other person. The word denoting {154} the action is, by what are called the Persons of the verb, made to connote these diversities. Thus \_amo\_ notes the act, and connotes the person speaking as the actor; \_amas\_ notes the act, and connotes the person spoken to, as the actor; \_amat\_ notes the act, and connotes some person, as the actor, who is neither the person speaking, nor the person spoken to.[46]  
[Editor's footnote 46: There is here a fresh instance of the oversight already pointed out, that of not including in the function for which general names are required, their employment in Predication. Amo, amas, and amamus, cannot, I conceive, with any propriety be called names of actions, or names at all. They are entire predications. It is one of the properties of the kind of general names called verbs, that they cannot be used except in a Proposition or Predication, and indeed only as the predicate of it: (for the infinitive is not a verb, but the abstract of a verb). What else there is to distinguish verbs from other general names will be more particularly considered further on.--\_Ed.\_]  
4. When the names of actions are applied to agents, they are applied to one or a greater number. A short method of connoting this grand distinction of numbers is effected by the marks of the Singular and Plural number. Thus \_amo\_ notes the act, and connotes one actor; \_amamus\_ notes the act, and connotes more than one actor.  
5. In applying the names of actions to the proper subjects of them, there are three Modes of the action, one or other of which is always implied. The first is, when the action has no reference to any thing previously spoken of. The second is, when it has a reference to something previously spoken of. The third is, when it has a reference to some state of the will of {155} the speaker or person spoken of. These diversities of mode are connoted by the Moods of the verb. The Indicative is used when no reference is made to any thing which precedes: the Subjunctive, when a reference is made to something which precedes: and the Optative, and Imperative, when the reference is to the state of the will of the speaker or the person spoken of.  
Such are the contrivances to make the marks or names of action, by their connotative powers, a more and more effectual instrument of notation. Accurately speaking, they are adjectives, so fashioned as to connote, a threefold distinction of agents, with a twofold distinction of their number, a threefold distinction of the manner of the action, and a threefold distinction of its time; and, along with all this another important particular, about to be explained, namely, the COPULA in PREDICATION.[47]](56441.docx#chunk3425)

[[Editor's footnote 47: The imperfection of this theory of Verbs is sufficiently apparent. They are, says the author, a particular kind of Adjectives. Adjectives, according to the preceding Section, are words employed to enable us, without inconvenient multiplication of names, to subdivide great classes into smaller ones. Can it be said, or would it have been said by the author, that the only, or the principal reason for having Verbs, is to enable us to subdivide classes of objects with the greatest economy of names?  
Neither is it strictly accurate to say that Verbs are always marks of motion, or of action, even including, as the author does, by an extension of the meaning of those terms, every process which is attended with a feeling of effort. Many verbs, of the kind which grammarians call neuter or intransitive verbs, express rest, or inaction: as sit, lie, and in some cases, stand. It is true however that the verbs first invented, as far as we know anything of them, expressed forms of motion, and the principal function of verbs still is to affirm or deny action. Or, to speak yet more generally, it is by means of verbs that we predicate events. Events, or changes, are the most important facts, to us, in the surrounding world. Verbs are the resource which language affords for predicating events. They are not the names of events; all names of events are substantives, as sunrise, disaster, or \*infinitives, as \_to rise\_, and infinitives are logically substantives. But it is by means of verbs that we assert, or give information of, events; as, The sun rises, or, Disaster has occurred. There is, however, a class of neuter verbs already referred to, which do not predicate events, but states of an unchanging object, as lie, sit, remain, exist. It would be incorrect, therefore, to give a definition of Verbs which should limit them to the expression of events. I am inclined to think that the distinction between nouns and verbs is not logical, but merely grammatical, and that every word, whatever be its meaning, must be reputed a verb, which is so constructed grammatically that it can only be used as the predicate of a proposition. Any meaning whatever is, in strictness, capable of being thrown into this form: but it is only certain meanings, chiefly actions or events, which there is, in general, any motive for putting into this particular shape.--\_Ed.\_]  
{156} 6. We have, last of all, under this head, to consider the marking power of a very peculiar, and most comprehensive word, the SUBSTANTIVE VERB, as it has been called by grammarians, or the word expressive of BEING. The steps, which we have already traced, in the process of naming, will aid us in obtaining a true conception of this, which is one of the most important steps, in that process.  
We have seen that, beside the names of particular species of motions, as walking, running, flying, there was occasion for a general name which might include {157} the whole of those motions. For this purpose, the names Action and Acting were employed. It is now to be remembered, that those sensations which we mark by the names of action, as walking, running, &c., are but part of the sensations which we derive from objects; that we have other sensations, and clusters of sensations, from them, on account of which we apply to them other names; as when we call a man tall, on account of certain sensations; dark, on account of certain other sensations, and so on. Now, as we had occasion for a name to include the separate clusters, called walking, running, flying, rolling, falling, and so on, and for that purpose adopted the name Acting; so, having from objects other sensations than those marked by the word acting, we have occasion for a name which shall include both those sensations, and those comprehended in the word acting along with them: in short, a word that shall embrace all sensations, of whatever kind, which any object is capable of exciting in us. This purpose is effected by the word affirmative of Existence. When we affirm of any thing that it EXISTS, that it IS: what we mean, is, that we may have sensations from it; nothing, without ourselves, being known to us, or capable of being known, but through the medium of our senses.  
There is the same occasion for making the Substantive Verb connote the three distinctions of TIME PAST, TIME PRESENT, and TIME FUTURE, as in the case of other verbs; also to connote the distinctions of PERSONS and NUMBERS; and, lastly, to connote the THREE MODES, that in which there is no reference to any thing preceding, that in which there is a reference to something preceding, and that in which reference {158} is made to the will of one of the PERSONS. Accordingly the Substantive Verb has TENSES, MOODS, NUMBERS, and PERSONS, like any other verb.  
Such is the nature and object of the Substantive Verb. It is the most GENERICAL of all the words, which we have characterized, as marks upon marks. These are the words usually called ATTRIBUTIVES. According to the view which we have given of them, they may be more appropriately denominated, SECONDARY MARKS. The names of the larger classes, as tree, horse, strength, we may call PRIMARY MARKS. The subsidiary names by which smaller classes are marked out of the larger; as when we say, tall tree, great strength, running horse, walking man; that is, all attributives, or marks applied upon marks; we may call SECONDARY MARKS.  
  
{159} SECTION IV.  
PREDICATION.](56441.docx#chunk3426)

[The purposes of language are two. We have occasion to mark sensations or ideas singly; and we have occasion to mark them in trains; in other words, we have need of contrivances to mark not only sensations and ideas; but also the order of them. The contrivances which are necessary to mark this order are the main cause of the complexity of language.  
If all names were names of one sort, there would be no difficulty in marking a train of the feelings which they serve to denote. Thus, if all names were names of individuals, as John, James, Peter, we should have no difficulty in marking a train of the ideas of these individuals; all that would be necessary would be to set down the marks, one after another, in the same order in which, one after another, the ideas occurred.  
If all names were names of Species, as man, horse, eagle, the facility of marking the order of the ideas which they represent would be the same. If the idea man occurred first, the idea horse second, the idea eagle third; all that would be necessary would be to put down the name or mark man the first, the name or mark horse the second, and the order of marks would represent the order of ideas.  
But we have already seen, that the facility of communication requires names of different degrees of {160} comprehensiveness; names of individuals, names of classes, and names both of the larger and the smaller classes. For the younger and less instructed part of my readers, it may be necessary to mention, that the names of the smaller classes, are called names of Species, or specific names; the names of the larger classes, names of Genera, or generic names. Thus, the term animal, denotes a large class; a class which contains the smaller classes, man, horse, dog, &c. The name animal, therefore, is called a Genus, or a generic name; the name man, a Species, or a specific name.  
In using names of these different kinds; names of individuals when the idea is restricted to one individual; and, for brevity, the names of classes; the names of the less when necessary, of the large when practicable; there is perpetual need of the substitution of one name for another. When I have used the names, James and John, Thomas and William, and many more, having to speak of such peculiarities of each, as distinguish him from every other, I may proceed to speak of them in general, as included in a class. When this happens, I have occasion for the name of the class, and to substitute the name of the class, for the names of the individuals. By what contrivance is this performed? I have the name of the individual, \_John\_; and the name of the class \_man\_; and I can set down my two names; \_John\_, \_man\_; in juxta-position. But this is not sufficient to effect the communication I desire; namely, that the word man is a mark of the same idea of which John is a mark, and a mark of other ideas along with it, those to wit, of which James, Thomas, &c. are marks. To complete my contrivance, I invent a mark, which, placed between my marks, {161} \_John\_ and \_man\_, fixes the idea I mean to convey, that \_man\_, is another mark to that idea of which \_John\_ is a mark, while it is a mark of the other ideas, of which \_James\_, \_Thomas\_, &c., are marks. For this purpose, we use in English, the mark "is." By help of this, my object is immediately attained. I say, \_John\_ "is" a \_man\_. I, then, use the word \_man\_, instead of the word \_John\_, with many advantages; because every thing which I can affirm of the word \_man\_, is true not only of \_John\_, but of \_James\_, and \_Peter\_, and every other individual of the class.  
The joining of two names by this peculiar mark is the act which has been denominated, PREDICATION; and it is the grand contrivance by which the marks of sensations and ideas are so ordered in discourse, as to mark the order of the trains, which it is our purpose to communicate, or to record.  
The form of expression, "John is a man," is called a Proposition. It consists of three marks. Of these, "John," is denominated the SUBJECT; "man," the PREDICATE; and "is," the COPULA. To speak generally, and in the language of the grammarians, the nominative of the verb is the \_subject\_ of the proposition; the substantive, or adjective, which agrees with the nominative, is the \_predicate\_, and the verb is the \_copula\_.  
By a few simple examples, the reader may render familiar to himself the use of PREDICATION, as the grand expedient, by which language is enabled to mark not only sensations and ideas, but also the order of them.[48]  
[Editor's footnote 48: The theory of Predication here set forth, stands in need of further elucidation, and perhaps of some correction and addition.  
The account which the author gives of a Predication, or Proposition, is, first, that it is a mode of so putting together the marks of sensations and ideas, as to mark the order of them. Secondly, that it consists in substituting one name for another, so as to signify that a certain name (called the predicate), is a mark of the same idea which another name (called the subject) is a mark of.](56441.docx#chunk3427)

[It must be allowed that a predication, or proposition, is intended to mark some portion of the order either of our sensations or of our ideas, \_i.e.\_, some part of the coexistences or sequences which take place either in our minds, or in what we term the external world. But what sort of order is it that a predication marks? An order supposed to be believed in. When \_John\_, or \_man\_, are said to be marks of an individual object, all there is in the matter is that these words, being associated with the idea of the object, are intended to raise that idea in the mind of the person who hears or reads them. But when we say, John is a man, or, John is an old man, we intend to do more than call up in the hearer's mind the images of John, of a man, and of an old man. We intend to do more than inform him that we have thought of, or even seen, John and a man, or John and an old man, together. We inform him of a fact respecting John, namely, that he \_is\_ an old man, or at all events, of our belief that this is a fact. The characteristic difference between a predication and any other form of speech, is, that it does not merely bring to mind a certain object (which is the only function of a mark, merely as such); it asserts something respecting it. Now it may be true, and I think it is true, that every assertion, every object of Belief,--everything that can be true or false--that can be an object of assent or dissent--is some order of sensations or of ideas: some coexistence or succession of sensations or ideas actually experienced, or supposed capable of being experienced. And thus it may appear in the end that in expressing a belief, we are after all only declaring the order of a group or series of sensations or ideas. But the order which we declare is not an imaginary order; it is an order believed to be real. Whatever view we adopt of the psychological nature of Belief, it is necessary to distinguish between the mere suggestion, to the mind of a certain order among sensations or ideas such as takes place when we think of the alphabet, or the numeration table and the indication that this order is an actual fact, which is occurring, or which has occurred once or oftener, or which, in certain definite circumstances, always occurs; which are the things indicated as true by an affirmative predication, and as false by a negative one.  
That a predication differs from a name in doing more than merely calling up an idea, is admitted in what I have noted as the second half of the author's theory of Predication. That second half points out that every predication is a communication, intended to act, not on the mere ideas of the listener, but on his persuasion or belief: and what he is intended to believe, according to the author, is, that of the two names which are conjoined in the predication, one is a mark of the same idea (or let me add, of the same sensation or cluster of sensations) of which the other is a mark. This is a doctrine of Hobbes, the one which caused him to be termed by Leibnitz, in words which have been often quoted, "plus quam nominalis." It is quite true that when we predicate B of A--when we assert of A that it is a B--B must, if the assertion is true, be a name of A, \_i.e.\_, a name applicable to A; one of the innumerable names which, in virtue of their signification, can be used as descriptive of A: but is this the information which we want to convey to the hearer? It is so when we are speaking only of names and their meaning, as when we enunciate a definition. In every other case, what we want to convey is a matter of fact, of which this relation between the names is but an incidental consequence. When we say, John walked out this morning, it is not a correct expression of the communication we desire to make, that "having walked out this morning" or "a person who has walked out this morning" are two of the innumerable names of John. They are only accidentally and momentarily names of John by reason of a certain event, and the information we mean to give is, that this event has happened. The event is not resolvable into an identity of meaning between names, but into an actual series of sensations that occurred to John, and a belief that any one who had been present and using his eyes would have had another series of sensations, which we call seeing John in the act of walking out. Again, when we say, Negroes are woolly-haired, we mean to make known to the hearer, not that woolly-haired is a name of every negro, but that wherever the cluster of sensations signified by the word negro, are experienced, the sensations signified by the word woolly-haired will be found either among them or conjoined with them. This is an order of sensations: and it is only in consequence of it that the name woolly-haired comes to be applicable to every individual of whom the term negro is a name.](56441.docx#chunk3428)

[There is nothing positively opposed to all this in the author's text: indeed he must be considered to have meant this, when he said, that by means of substituting one name for another, a predication marks the order of our sensations and ideas. The omission consists in not remarking that what is distinctively signified by a predication, as such, is Belief in a certain order of sensations or ideas. And when this has been said, the Hobbian addition, that it does so by declaring the predicate to be a name of everything of which the subject is a name, may be omitted as surplusage, and as diverting the mind from the essential features of the case. Predication may thus be defined, a form of speech which expresses a belief that a certain coexistence or sequence of sensations or ideas, did, does, or, under certain conditions, would take place: and the reverse of this when the predication is negative.--\_Ed.\_]  
{162} For the more complete elucidation of this important part of the business of Naming, it is necessary to {163} remark, that Logicians have classed Predications, under five heads; 1st, when the \_Genus\_ is predicated, {164} of any subject; 2dly, when the \_Species\_ is predicated; 3dly, when the \_Specific Difference\_ is predicated; 4thly, {165} when a \_Property\_ is predicated; 5thly, when an \_Accident\_ is predicated. These five classes of names, the things capable of being predicated, are named PREDICABLES. The five Predicables, in Latin, the language in which they are commonly expressed, are named \_Genus\_, \_Species\_, \_Differentia\_, \_Proprium\_, \_Accidens\_.  
We have already seen, perhaps at sufficient length, the manner in which, and the end for which, the Genus, and the Species are predicated of any subject. It is, that the more comprehensive name, may be substituted for the less comprehensive; so that each of our marks may answer the purpose of marking, to as great an extent as possible. In this manner we substitute the word \_man\_, for example, for the word \_Thomas\_, when we predicate the Species of the individual, in the proposition, "Thomas is a man;" the word \_animal\_, for the word \_man\_, when we predicate the Genus of the Species, in the proposition, "man, is an animal."[49]  
[Editor's footnote 49: If what has been said in the preceding note is correct, it is a very inadequate view of the purpose for which a generic or specific name is predicated of any subject, to say that it is in order that "the more comprehensive name may be substituted for the less comprehensive, so that each of our marks may answer the purpose of marking to as great an extent as possible." The more comprehensive and the less comprehensive name have each their uses, and the function of each not only could not be discharged with equal convenience by the other, but could not be discharged by it at all. The purpose, in predicating of anything the name of a class to which it belongs, is not to obtain a better or more commodious name for it, but to make known the fact of its possessing the attributes which constitute the class, and which are therefore signified by the class-name. It is evident that the name of one class cannot possibly perform this office vicariously for the name of another.--\_Ed.\_]  
{166} We have already, also, taken notice of the artifice, by which smaller classes are formed out of larger, by the help of secondary marks. Of these secondary marks, the principal classes are designated by the terms \_Differentia\_, \_Proprium\_, \_Accidens\_. No very distinct boundaries, are, indeed, marked by these terms; nor do they effect a scientific division; but, for the present purpose, the elucidation of the end to which Predication is subservient, they are sufficient.  
\_Differentia\_ is always an Attributive, applicable to a Genus, and which, when combined with it, marks out a Species; as the word \_rational\_, which is applicable to the Genus \_animal\_, and when applied to it, in the phrase "rational animal," marks out a Species, and is synonymous with the word \_man\_. In a similar manner the word \_sensitive\_ is applicable to \_body\_, and marks out the subordinate Genus, \_animal\_.  
\_Proprium\_ is also an Attributive, and the Attributives classed under this title differ from those classed under the title \_differentia\_, chiefly in this; That those classed under \_differentia\_, are regarded as more expressly involved in the definition of the Species which they seem to cut out from the Genus. Thus, both \_rational\_, and \_risible\_, when applied to \_animal\_, cut out of it the class Man; but \_rational\_ is called DIFFERENTIA, \_risible\_ PROPRIUM, because \_rational\_, is strictly involved in the definition of \_man\_; \_risible\_ is not. Some Attributives are classed under the title \_proprium\_, which, when applied to the genus, do not constitute the same Species, constituted by the \_differentia\_, but a different Species; as \_bipes\_, two-footed animal, is the name of a class including at least the two classes of men, and birds; \_hot-blooded animal\_, is the name of a class so {167} large as to include man, horse, lion, dog, and the greater part of the more perfectly organized Species. There are some Attributives, classed under the title \_proprium\_, which cut out of the Genus a class even less than that which is cut by the \_differentia\_; as, for example, the word \_grammatical\_. This word grammatical, applied to the word animal, in the term "grammatical animal," separates a class so small, as to include only part of the Species man, those who are called Grammarians. Such Attributives, for an obvious reason, are applicable, as well to the name of the Species, as to that of the Genus. Thus, we say, "a grammatical man," as well as "a grammatical animal," and that with greater propriety, as cutting out the sub-species from the Species more immediately.](56441.docx#chunk3429)

[The Attributives, classed under the title \_accidens\_, are regarded, like those classed under \_differentia\_, and \_proprium\_, as applicable to the class cut out by the \_differentia\_, but applicable to it rather fortuitously than by any fixed connection. The term \_lame\_ is an example of such Attributives. The term \_lame\_, however, applied to the name of the Species, does not the less take out of it a sub-species, as "lame man," "lame horse."  
With respect to these classes of Attributives (\_Differentia\_, \_Proprium\_, \_Accidens\_) this is necessary to be observed, and remembered; that they differ from one another only by the accident of their application. Thus, when \_rational\_, applied to the Genus \_animal\_, constitutes the Species man, all other Attributives applied to that Species are either \_accidens\_, or \_proprium\_; but these Attributives themselves may be the \_differentia\_ in the case of other classes. Thus, \_warm-blooded\_, applied to \_man\_, stands under the class \_proprium\_; but {168} when applied to the animals which stand distinguished from the cold-blooded, as constituting a class, it becomes the \_differentia\_, and \_rational\_, with respect to this comprehensive class, is only an \_accidens\_.[50]  
[Editor's footnote 50: The author says, that no very distinct boundaries are marked by the three terms, Differentia, Proprium, and Accidens, nor do they effect a scientific division. As used, however, by the more accurate of the school logicians, they do mark out distinct boundaries, and do effect a scientific division.  
Of the attributes common to a class, some have been taken into consideration in forming the class, and are included in the signification of its name. Such, in the case of man, are rationality, and the outward form which we call the human. These attributes are its Differentiae; the fundamental differences which distinguish that class from the others most nearly allied to it. The school logicians were contented with one Differentia, whenever one was sufficient completely to circumscribe the class. But this was an error, because one attribute may be sufficient for distinction, and yet may not exhaust the signification of the class-name. All attributes, then, which are part of that signification, are set apart as Differentiae. Other attributes, though not included among those which constitute the class, and which are directly signified by its name, are consequences of some of those which constitute the class, and always found along with them. These attributes of the class are its Propria. Thus, to be bounded by three straight lines is the Differentia of a triangle: to have the sum of its three angles equal to two right angles, being a consequence of its Differentia, is a Proprium of it. Rationality is a Differentia of the class Man: to be able to build cities is a Proprium, being a consequence of rationality, but not, as that is, included in the meaning of the word Man. All other attributes of the class, which are neither included in the meaning of the name, nor are consequences of any which are included, are Accidents, however universally and constantly they may be true of the class; as blackness, of crows.  
The author's remark, that these three classes of Attributives differ from one another only in the accident of their application, is most just. There are not some attributes which are always Differentiae, and others which are always Propria, or always Accidents. The same attribute which is a Differentia of one genus or species, may be, and often is, a Proprium or an Accidens of others, and so on.--\_Ed.\_]  
{169} We now arrive at a very important conclusion; for it thus appears, that all Predication, is Predication of Genus or Species, since the Attributives classed under the titles of \_Differentia\_, \_Proprium\_, \_Accidens\_, cannot be used but as part of the name of a Species. But we have seen, above, that Predication by Genus and Species is merely the substitution of one name for another, the more general for the less general; the fact of the substitution being marked by the \_Copula\_. It follows, if all Predication is by Genus and Species, that all Predication is the substitution of one name for another, the more for the less general.  
It will be easy for the learner to make this material fact familiar to himself, by attending to a few instances. Thus, when it is said that man is rational, the term rational is evidently elliptical, and the word animal is understood. The word rational, according to grammatical language, is an adjective, and is significant only in conjunction with a substantive. According to logical language, it is a connotative term, and is without a meaning when disjoined from the object, the property or properties of which it connotes.[51]  
[Editor's footnote 51: I am unable to feel the force of this remark. Every predication ascribes an attribute to a subject. Differentiae, Propria, and Accidents, agree with generic and specific names in expressing attributes, and the attributes they express are the whole of their meaning. I therefore cannot see why there should not be Predication of any of these, as well as of Genus and Species. These three Predicables, the author says, cannot be used but as part of the name of a genus or species: they are adjectives, and cannot be employed without a substantive understood. Allowing this to be logically, as it is grammatically, true, still the comprehensive and almost insignificant substantive, "thing" or "being," fully answers the purpose; and the entire meaning of the predication is contained in the adjective. These adjectives, as the author remarks, are connotative terms; but so, on his own shewing elsewhere, are all concrete substantives, except proper names. Why, when it is said that man is rational, must "the word animal" be "understood?" Nothing is understood but that the being, Man, has the attribute of reason. If we say, God is rational, is animal understood? It was only the Greeks who classed their gods as [Greek: zo=a a)tha/nata].](56441.docx#chunk3430)

[The exclusion of the three latter Predicables from predication probably recommended itself to the author as a support to his doctrine that all Predication is the substitution of one name for another, which he considered himself to have already demonstrated so far as regards Genus and Species. But proofs have just been given that in the predication of Genus and Species no more than in that of Differentia, Proprium, or Accidens, is anything which turns upon names the main consideration. Except in the case of definitions, and other merely verbal propositions, every proposition is intended to communicate a matter of fact: This subject has that attribute--This cluster of sensations is always accompanied by that sensation.  
Let me remark by the way, that the word \_connote\_ is here used by the author in what I consider its legitimate sense--that in which a name is said to connote a property or properties belonging to the object it is predicated of. He afterwards casts off this use of the term, and introduces one the exact reverse: but of this hereafter.--\_Ed.\_]  
{170} With respect, however, to such examples as this last, namely, all those in which the predicate consists {171} of the genus and differentia, the proposition is a mere definition; and the predicate, and the subject, are precisely equivalent. Thus, "rational animal" is precisely the same class as "man;" and they are only two names for the same thing; the one a simple, or single-worded name; the other a complex, or double-worded, name. Such propositions therefore are, properly speaking, not Predications at all. When they are used for any other purpose than to make known, or to fix, the meaning of a term, they are useless, and are denominated identical propositions.[52]  
[Editor's footnote 52: In this passage the author virtually gives up the part of his theory of Predication which is borrowed from Hobbes. According to his doctrine in this place, whenever the predicate and the subject are exactly equivalent, and "are only two names for the same thing," the predication serves only "to make known, or to fix, the meaning of a term," and "such propositions are, properly speaking, not Predications at all."--\_Ed.\_]  
The preceding expositions have shown the peculiar use of the \_Copula\_. The Predication consists, essentially, of two marks, whereof the first is called the Subject, the latter the Predicate; the Predicate being set down as a name to be used for every thing of which the Subject is a name; and the \_Copula\_ is merely a mark necessary to shew that the Predicate is to be taken and used as a substitute for the Subject.  
There is a great convenience in giving to the \_Copula\_ the same powers of connotation, in respect of Time, {172} Manner, Person, and Number, as we have seen to be usefully annexed to the Verb.  
It is necessary to explain a little this convenience; and the explanation will have another advantage, that it will still farther illustrate the manner in which Predication serves the great purpose of marking the Order of ideas in a Train.  
If the sensations or ideas in a train were to be marked as merely so many independent items, the mode of marking the order of them would be simple; the order of the marks itself might suffice. If this, for example, were the train; smell of a rose, sight of a rat, sound of a trumpet, touch of velvet, prick of a pin, these names placed in order might denote the order of the sensations.  
In the greater number of instances, however, it is necessary to mark the train as the train of somebody; and for this purpose additional machinery is required. Suppose that the train I have to mark is the train of John, a train of the sensations of John; what are the marks for which I shall have occasion? It is first of all evident that I must have a mark for John, and a mark for each of the sensations. Suppose it is my purpose to represent John as having a sensation by each of his senses, sight, smell, &c., how must I proceed? I have first the word John, for the mark of the person; and I have the word seeing, for the mark of the sensation. But beside the marks, "John," "seeing," I have occasion for a mark to show that I mean the mark "seeing" to be applied to the mark "John," and not to any other. For that purpose I use the word "is." I say "John is seeing," and the first sensation of John's train is now sufficiently {173} denoted. In the same manner I proceed with the rest; John is smelling, John is tasting, John is hearing, John is touching.  
But I have often occasion to speak not only of John's present sensations, but of his past or his future sensations; not of John as merely now seeing, hearing, &c., but as having been, or as going to be, the subject of these sensations. The \_Copula\_ may be so contrived as most commodiously to connote the main distinctions of Time: not merely to mark the connection between the two marks which form the subject and the predicate of the proposition, but to mark, along with this, either past, or present, or future, Time. Thus, if I say John is seeing, the copula marks present time along with the peculiar connection between the predicate and the subject; if I say John was seeing, it connotes past time; if I say John will be seeing, it connotes future time.](56441.docx#chunk3431)

[As, in explaining the functions of verbs, there appeared a convenience in the contrivance by which they were made to connote three Manners; first, when no reference is made to any thing which is previously spoken of; secondly, when a reference is made to something which is previously spoken of; thirdly, when a reference is made to the will of one of the PERSONS; it will now be seen that there is the same convenience in making the \_Copula\_ connote these references by a similar contrivance. Thus, when we speak of a man having sensations, we may speak of him as having them or as not having them, in consequence of something previously spoken of; or we may speak of him as having them in consequence of our will. It is, therefore, useful, that the \_Copula\_ should {174} have moods as well as tenses. The same thing may be said of persons and numbers; of which no illustration seems to be required.  
We come next to an observation respecting the \_Copula\_, to which the greatest attention is due. In all Languages, the Verb which denotes EXISTENCE has been employed to answer the additional purpose of the \_Copula\_ in Predication. The consequences of this have been most lamentable. There is thus a double meaning in the \_Copula\_, which has produced a most unfortunate mixture and confusion of ideas. It has involved in mystery the whole business of Predication; the grand contrivance by which language is rendered competent to its end. By darkening Predication, it has spread such a veil over the phenomena of mind, as concealed them from ordinary eyes, and allowed them to be but imperfectly seen by those which were the most discerning.  
In our own language, the verb, TO BE, is the important word which is employed to connote, along with its Subject, whatever it be, the grand idea of EXISTENCE. Thus, if I use the first person singular of its indicative mood, and say, "I am," I affirm EXISTENCE of myself. "I am," is the equivalent of "I am EXISTING." In the first of these expressions, "I am," the mark "am" involves in it the force of two marks; it involves the meaning of the word "existing," and the marking power or meaning of the \_Copula\_. In the second expression "I am existing," the word "am" ought to serve the purpose of the \_Copula\_ only. But in reality its connotation of EXISTENCE still adheres to it; and whereas the expression ought to consist of the three established parts of a Predication; 1, the \_subject\_ {175} "I;" 2, the \_predicate\_ EXISTING; and 3, the \_copula\_; it in reality consists of, 1, the subject "I;" 2, the predicate EXISTING; 3, the \_Copula\_; which signifies, 4, EXISTING, over again.  
Let us take, as another case, that in which the subject and predicate of my intended proposition are, the word "I" and "reading." I want for the purpose of predication only a \_Copula\_ to signify nakedly that the mark "reading" is applied to the mark "I;" but instead of this I am obliged to use a word which connotes EXISTENCE, along with the force of the \_Copula\_; and when I say "I am reading," not only \_reading\_ is predicated of me, but EXISTING also. Suppose, again, my subject is "John," my predicate "dead," I am obliged to use for my \_Copula\_ the word "is," which connotes EXISTENCE, and I thus predicate of John both \_existence\_ and \_death\_.  
It may be easily collected, from this one example, what heterogeneous and inconsistent ideas may be forced into connection by the use of the Substantive Verb as the \_Copula\_ in Predication; and what confusion in the mental processes it tends to produce. It is in the case, however, of the higher abstractions, and the various combinations of ideas which the mind, in the processes of enquiring and marking, forms for its own convenience, to obtain a greater command over its stores and greater facility in communicating them, that the use of the verb which conjoins the Predication of EXISTENCE with every other Predication, has produced the wildest confusion, and been the most deeply injurious. Is it any wonder, for example, that \_Chance\_, and \_Fate\_, and \_Nature\_, have been personified, and have had an EXISTENCE ascribed {176} to them, as objects, when we have no means of predicating anything whatsoever of them, without predicating such EXISTENCE at the same time. If we say that "chance is nothing;" we predicate of it, by the word "is," both \_existence\_ and \_nothingness\_.  
When this is the case, it is by no means to be wondered at, that philosophers should so long have inquired what those EXISTENCES are which abstract terms were employed to express; and should have lost themselves in fruitless speculations about the nature of entity, and quiddity, substance, and quality, space, time, necessity, eternity, and so on.  
It is necessary here to take notice of a part of the marking power of Verbs, which could not be explained till the nature of the \_copula\_ was understood.  
Every Verb involves in it the force of the \_copula\_. It combines the marking powers of an \_adjective\_, and of the \_copula\_; and all Verbs may be resolved into those elements. Thus, "John walks," is the same with "John is walking." Verbs, therefore, are attributives, of the same nature as adjectives, only with additional connotative powers; and they cut smaller classes out of larger, in the manner of adjectives. Thus "John walks," is an expression, the same in import as the Predication "John is a walking man;" and, walking men, standing men, running men, lying men, are all sub-species of the Species Man.  
The same unhappy duplicity of meaning, which is incurred by using the \_Substantive\_ Verb as the \_copula\_ in Predication, is inflicted on \_other\_ Verbs, in that part of their marking power by which they exhibit the connection between the two terms of a Predication.](56441.docx#chunk3432)

[The \_copula\_, included in Verbs, is not the PURE \_copula\_, {177} but the ACTUAL \_copula\_; the \_copula\_ familiar and in constant use; namely, the Substantive Verb. From this it results, that whatever the peculiar attribute, which is predicated by means of any verb, EXISTENCE is always predicated along with it. Thus, when I say "John walks," which is equivalent to "John is walking," I predicate both existence, and walking, of John. When I say, "Caliban existed not," which is the same as "Caliban was not existing," I predicate both existence, and non-existence, of the imaginary being Caliban. By the two first words of the Predication, "Caliban was," existence is predicated of him; by the addition of the compound term "not existing," the opposite is predicated of him.  
The instances, in which the more complicated formations of the mind are the subjects of this double Predication, are those which, from the importance of their consequences, deserve the greatest degree of attention. Thus, when we say "virtue exalts," both \_existing\_, and \_exalting\_, are predicated of virtue. When we say that "passion impels," both \_existence\_, and \_impulsion\_, are predicated of passion. When we say that "Time generates," and "Space contains all things," we affirm \_existence\_ of space and time, by the same expression by which we affirm of the one, that it generates; of the other, that it contains. This constancy of Predication, forcing the same constancy in the junction of the ideas, furnishes a remarkable instance of that important case of association, of which we took notice above, where, by frequency of association, two ideas become so joined, that the one constantly rises, and cannot be prevented from rising, in combination with the other. Thus it is, {178} that Time forces itself upon us as an \_object\_. So it is with Space. We cannot think of Space, we cannot think of Time, without thinking of them as existent. With the ideas of space and time, the idea of EXISTENCE, as it is predicated of objects, is so associated, by the use of the Substantive Verb as the \_copula\_ in predication, that we cannot disjoin them. The same would have been the case with Chance, and Fate, and Nature; if our religious education did not counteract the association. It was precisely the same, among the Greeks and Romans, whose religious education had not that effect.[53] [54]  
[Findlater's footnote 53: The account of predication above given is in conformity with the phenomena of the family of languages known as the Indo-European. Logicians, in fact, in treating of this subject have had almost exclusive regard to Greek and Latin and the literary languages of modern Europe, which are all of one type. It might therefore be presumed that the theory thus formed would be found not to fit in all its parts when applied to languages of an altogether different structure. The mental process must doubtless be the same in all; but the words that express the several parts may be used in new and unprecedented ways. Were naturalists to construct a scheme of the animal organism without ever having seen any other animals than those of the vertebrate type, the theory would certainly fail in generality; certain organs or functions would be set down as essential to animal existence which acquaintance with other classes of creatures shows can be quite well dispensed with. Similarly, the current theory of predication, when viewed in the light of a wider and deeper knowledge of the organism of speech, seems to attach an exaggerated importance to the peculiar predicative power presumed to be inherent in verbs, and especially in the verb of existence. It is now a well known fact that in the monosyllabic class of languages, in which a third part of the human race express their thoughts, there is no distinction among the parts of speech. In Chinese, for example, the word \_ta\_ expresses indifferently great, greatness, to be great, to make great or magnify, greatly. It is only position that determines in each case how the word is to be understood; thus traditional convention assigns to \_ta fu\_ the meaning of "a great man," and to \_fu ta\_ that of "the man is great." Being habituated to the constant use of the verb \_is\_ in such a case as the latter, we are apt to suppose that the expression derives its predicative force from its suggesting the verb of existence, which the mind instinctively and necessarily supplies for itself. How little ground there is for this presumed necessity, has been conclusively shown by the late Mr. Garnett, in his profound and exhaustive essay on the Nature and Analysis of the Verb. Speaking of the theory that makes the essential difference between the verb and other parts of speech to reside in the verb substantive, which is to be supplied by the mind in all cases where the functions of the verb proper are to be called into requisition, he observes: "This theory presupposes the existence of a verb substantive in the languages in question, and consciousness of that existence and of the force and capabilities of the element in those who speak them. Unfortunately the Spanish grammarians, to whom we are indebted for what knowledge we possess of the Philippine dialects, unanimously concur in stating that there is no verb substantive either in Tagala, Pampanga, or Bisaya, nor any means of supplying the place of one, except the employment of pronouns and particles. Mariner makes a similar remark respecting the Tonga language; and we may venture to affirm that there is not such a thing as a true verb substantive in any one member of the great Polynesian family.](56441.docx#chunk3433)

["It is true that the Malayan, Javanese and Malagassy grammarians talk of words signifying \_to be\_; but an attentive comparison of the elements which they profess to give as such, shows clearly that they are no verbs at all, but simply pronouns or indeclinable particles, commonly indicating the time, place or manner of the specified action or relation. It is not therefore easy to conceive how the mind of a Philippine islander, or of any other person, can supply a word totally unknown to it, and which there is not a particle of evidence to show that it ever thought of."  
Of the substitutes put in place of the substantive verb, by far the most common are pronouns, and particles indicating position. Thus in Coptic, the descendant of the ancient Egyptian, the demonstrative \_pe\_, "this," after a noun singular masculine, or \_te\_ when the noun is feminine, is equivalent to \_is\_; and \_ne\_, "these," after a plural, to \_are\_. In the ancient hieroglyphic monuments the function of the substantive verb is performed by the same means. Even in the Semitic languages, which have substantive verbs, pronouns are habitually used instead of them; so that \_I I\_, or \_I he\_, stands for \_I am\_, and \_we we\_ or \_we they\_, for \_we are\_. "Thou art my King" (Ps. 44, 5) is in the Hebrew "Thou \_he\_ my King;" "We are the servants of the God of heaven" (Ezra 5, 11) is in Chaldee "We \_they\_ servants of the God of heaven;" "I am the light of the world," is in Arabic "I \_he\_ the light of the world."  
Although such modes of expression are foreign to the Indo-European languages, even they furnish abundant evidence of the predicative power of pronouns and particles. If any word required to have inherent in it the peculiar affirmative power attributed to verbs, it is the word \_yes\_. Accordingly Tooke derives it from the French imperative \_a-yez\_: forgetting, or not knowing, that the Anglo-Saxon \_gese\_ or \_yea\_ (cognate with the Sanscrit pronoun \_ya\_) was in existence long before the French \_ayez\_. The fact is that Eng. \_yes\_, Ger. \_ja\_, and the corresponding words in the other European languages are oblique cases of demonstrative pronouns, and mean simply "in this (manner)," or "thus." The Italian \_si\_ (yes) is from Lat. \_sic\_, (thus); the Provencal \_oc\_ is from Lat. \_hoc\_; and the modern Fr. \_oui\_ was originally a combination of \_hoc illo\_, and passed through the stages of \_ocil\_ and \_oil\_ into its present form.  
The consideration of these and a multitude of similar phenomena suggests, that the Sanscrit \_as-mi\_, Gr. \_ei-mi\_, Lat. \_s-um\_ (for \_es-um\_), Eng. \_a-m\_, may have had for its root the demonstrative pronoun \_sa\_, and meant primarily "that (or there) as to me." Be that as it may, all philologists are agreed that the verbs now used to express \_being\_ in the abstract, expressed originally something physical and palpable. Thus Ital. \_stato\_, Fr. \_ete\_, \_been\_, are from the Lat. \_statum\_, the participle of \_sto\_, "to stand;" and \_exist\_ itself meant "to stand out or be prominent." Eng. \_be\_, Lat. \_fu-\_ is identical with Gr. \_phy-\_ "to grow;" and, according to Max Muller, as the root of \_as-mi\_ meant "breath" or "breathing." It may then be safely affirmed that no word had for its primary function to express mere existence; it seems enough for the purpose of predication that existence be implied.  
With regard to ordinary verbs, the analytic processes of comparative grammar show no traces of a substantive verb entering into their structure. It is now an accepted doctrine of philology that, as a rule, the root of a verb is of the nature of an abstract noun; and that it became a verb simply by the addition of a pronominal affix--as in the Greek [Greek: di/-do-mi, di/-do-s, di/-do-si], in which the terminations were originally [Greek: -mi, -si, -ti]. The habits of thought arising out of the present analytic state of the Indo-European languages naturally lead us to conceive these pronominal affixes as nominatives. But \_gift I\_ does not seem a very natural way of getting at the meaning "I give;" and therefore Mr. Garnett maintains that the affixes were originally in an oblique case--the genitive or the instrumental--so that the literal meaning was "gift of me," or "giving by me." That this is the nature of the verb in the agglutinate languages--by far the most numerous class--it seems hardly possible to dispute; for in these the affixes remain rigidly distinct and little disguised. Thus, according to Garnett, the Wotiak, in order to express "my son," "thy son," &c., joins oblique cases of the personal pronouns to the noun \_pi\_ in the following way:--  
pi-[)i] .... son of me pi-ed . . . son of thee pi-ez . . . son of him pi-mi . . . son of us pi-dy . . . son of you pi-zy . . . son of them  
In an exactly similar way the preterite of the verb to speak stands thus--  
bera-i . . . speech of me == I spoke bera-d . . . speech of thee bera-z . . . speech of him bera-my . . speech of us bera-dy . . speech of you bera-zy . . speech of them  
In the Fiji language \_loma\_ means "heart" or "will;" and \_loma-qu\_ (heart of me) may, according to the connection, signify either "my heart or will," or "I will."  
In the inflected languages the affixes are so amalgamated with the root and otherwise obliterated that there is no such direct evidence of their nature; but a great many facts tend to show that the structure of the verb was originally the same as in the agglutinate family.  
If this analysis of the verb is correct, the affirmation of existence found no expression in the early stages of language; \_the real copula connecting the subject with the predicate was the proposition contained in the oblique case of the pronominal affix\_.--\_F.\_]](56441.docx#chunk3434)

[[Editor's footnote 54: The interesting and important philological facts adduced by Mr. Findlater, confirm and illustrate in a very striking manner the doctrine in the text, of the radical distinction between the functions of the copula in predication, and those of the substantive verb; by shewing that many languages have no substantive verb, no verb expressive of mere \*existence, and yet signify their predications by other means; and that probably all languages began without a substantive verb, though they must always have had predications.  
The confusion between these two different functions in the European languages, and the ambiguity of the verb To Be, which fulfils them both, are among the most important of the minor philosophical truths to which attention has been called by the author of the Analysis. As in the case of many other luminous thoughts, an approach is found to have been made to it by previous thinkers. Hobbes, though he did not reach it, came very close to it, and it was still more distinctly anticipated by Laromiguiere, though without any sufficient perception of its value. It occurs in a criticism on a passage of Pascal, and in the following words. "Quand on dit, l'etre est, \_etc.\_ le mot \_est\_, ou le verbe, n'exprime pas la meme chose que le mot etre, sujet de la definition. Si j'enonce la proposition suivante: Dieu est existant, je ne voudrais pas dire assurement, Dieu existe existant: cela ne ferait pas un sens; de meme, si je dis que Virgile est poete, je ne veux pas donner a entendre que Virgile existe. Le verbe \_est\_, dans la proposition, n'exprime donc pas l'existence reelle; il n'exprime qu'un rapport special entre le sujet et l'attribut, le rapport du contenant au contenu," &c. (Lecons de Philosophie, 7^{me} ed. vol. i. p. 307.) Having thus hit upon an unobvious truth in the course of an argument directed to another purpose, he passes on and takes no further notice of it.  
It may seem strange that the verb which signifies existence should have been employed in so many different languages as the sign of predication, if there is no real connection between the two meanings. But languages have been built up by the extension of an originally small number of words, with or without alterations of form, to express new meanings, the choice of the word being often determined by very distant analogies. In the present case, the analogy is not distant. All our predications are intended to declare the manner in which something affects, or would affect, ourselves or others. Our idea of existence is simply the idea of something which affects or would affect us somehow, without distinction of mode. Everything, therefore, which we can have occasion to assert of an existing thing, may be looked upon as a particular mode of its existence. Since snow is white, and since snow exists, it may be said to exist white; and if a sign was wanted by which to predicate white of snow, the word exists would be very likely to present itself. But most of our predications do relate to existing things: and this being so, it is in the ordinary course of the human mind that the same sign should be adhered to when we are predicating something of a merely imaginary thing (an abstraction, for instance) and that, being so used, it should create an association between the abstraction and the notion of real existence.--\_Ed.\_]  
{179} We have now observed, wherein Predication consists, and the instruments by which it is performed. {180} We have also, in part, contemplated the End which it is destined to fulfil; that is, to mark the order in which sensations and ideas follow one another in a {181} train. On this last part of the subject, however, the following observations are still required.  
The trains, the order of which we have occasion to {182} mark, may for the elucidation of the present subject, be divided into two classes. We have occasion to {183} mark, either, first, The series of the objects we have seen, heard, or otherwise perceived by our senses; or, {184} secondly, A train of thoughts which may have passed in our minds.  
1. When we come to record a train of the objects we have perceived, that is, a train of sensations, the sensations have become ideas; for the objects are not now acting on our senses, and the sensations are at an end.  
The order of the objects of our senses, is either the order of time, or the order of place. The first is the order of SUCCESSION; when one object comes first, another next, and so on. The second is the order of POSITION; when the objects are considered as simultaneous, but different in distance and direction from a particular point.  
Let us observe in what manner the artifice of {185} Predication is adapted to the marking of a train in either of those orders: and first, with respect to a train in the order of Time.](56441.docx#chunk3435)

[Of this the following may be taken as a simple example. "The sun rises; clouds form; clouds cover the sky; lightning flashes; thunder roars." It is easy in these expressions to observe, what were the sensations, and in what order they succeeded one another. It is also observable, that the order is denoted by so many Predications; and that Predication is our only expedient for denoting their order. First sensation, "sight of the sun;" second sensation, "rising of the sun;" these two denoted shortly and in their order by the Predication, "the sun rises." Third sensation, "sight of clouds;" fourth sensation, "forming of clouds;" these two again shortly denoted in their order by the Predication, "clouds form." The next, "clouds cover the sky," needs no further explanation; but there is a peculiar artifice of language in the two following Predications; "lightning flashes," "thunder roars," which deserves to be well understood. "Lightning flashes;" here there is but one sensation, the sensation of sight, which we call a flash. But there are various kinds of flashes; this is a peculiar one, and I want to mark peculiarly what it is. It is not a flash on the earth, but a flash in the sky; it will not, however, sufficiently distinguish the flash in question, to say, the sky flashes, because other flashes come from the sky. What then is my contrivance? I form the fancy of a cause of this particular flash, though I know nothing concerning it, and for this unknown cause I invent a name, and call it lightning. I have then an expression which always accurately {186} marks the sensation I mean to denote: I say, "the lightning flashes," "a flash of lightning," and so on. "Thunder roars," is another case of the same artifice. The noise here is the only sensation; but in order to distinguish it from all other noises, I invent a name for its unknown cause, and by its means can mark the sensation with perfect precision.  
The Fictions, after this manner resorted to, for the purpose of marking; though important among the artifices of naming; have contributed largely to the misdirection of thought.  
By the unfortunate ambiguity of the \_Copula\_, EXISTENCE is affirmed of them in every Predication into which they enter. The idea of EXISTENCE becomes, by this means, inseparable from them; and their true nature, as Creatures of the mind, and nothing more, is rarely, and not without difficulty, perceived.  
The mode in which a train, in the order of place, is marked by the artifice of Predication, may be thus exemplified: "The house is on a hill; a lawn is in front; a stable is on the left hand; a garden is on the right; a wood is behind." It is not necessary, after the exposition of the preceding example, to exhibit the detail of the marking performed by these Predications. The reader can trace the sensations, the order of them, and the mode of the marking, according to the specimen which has just been exhibited.  
2. The trains of thought which pass in our minds, are sequences, the items of which are connected in three principal ways: 1st, as cause and effect; 2dly, as resembling; 3dly, as included under the same name. A short illustration of each of these cases will {187} complete the account of predication, as a contrivance for marking the order of ideas.  
To illustrate a sequence, connected as Cause and Effect, let me suppose that I have a flint and steel in my hand, which I am about to strike, one against the other, but at that instant perceive a barrel of gunpowder open, close before me. I withhold the stroke in consequence of the train of thought which suggests to me the ultimate effect. If I have occasion to mark the train, I can only do it by a series of Predications, each of which marks a sequence in the train of causes and effects. "I strike the flint on the steel," first sequence. "The stroke produces a spark," second sequence. "The spark falls on gunpowder," third sequence. "The spark ignites the gunpowder," fourth sequence. "The gunpowder ignited makes an explosion," fifth sequence. The ideas contained in these propositions must all have passed through my mind, and this is the only mode in which language enables me to mark them in their order.[55]  
[Editor's footnote 55: It is necessary again to notice the consistent omission, throughout the author's theory of Predication, of the element Belief. In the case supposed, the ideas contained in all the propositions might have passed through the mind, without our being led to assert the propositions. I might have thought of every step in the series of phenomena mentioned, might have pictured all of them in my imagination, and have come to the conclusion that they would not happen. I therefore should not have made, either in words or in thought, the predication, This gunpowder will explode if I strike the flint against the steel. Yet the same ideas would have passed through my mind in the same order, in which they stand in the text. The only deficient link would have been the final one, the Belief.--\_Ed.\_]  
{188} The sequences of which the items are connected by Resemblance will not require much illustration. I see A, who suggests B to me by his stature. B suggests C by the length of his nose. C suggests D by the similarity of their profession, and so on. The series of my thoughts is sufficiently obvious. How do I proceed when I have occasion to mark it? I use a series of predications. "I see A;" this predication marks the first item, my sight of A. "A is tall," the second. "A man of like tallness is B," the third; and so on.](56441.docx#chunk3436)

[The mode in which thoughts are united in a Syllogism, is the leading example of the third case. Let us consider the following very familiar instance. "Every tree is a vegetable: every oak is a tree: therefore, every oak is a vegetable." This is evidently a process of naming. The primary idea is that of the object called an oak; from the name oak, I proceed to the name tree, finding that the name oak, is included in the name tree; and from the name tree, I proceed to the name vegetable, finding that the name tree is included in the name vegetable, and by consequence the name oak. This is the series of thoughts, which is marked in order, by the three propositions or predications of the syllogism.[56]  
[Editor's footnote 56: For the present I shall only remark on this theory of the syllogism, that it must stand or fall with the theory of Predication of which it is the sequel. If, as I have maintained, the propositions which are the premises of the syllogism are not correctly described as mere processes of naming, neither is the formula by which a third proposition is elicited from these two a process of mere naming. What it is, will be considered hereafter.--\_Ed.\_]  
{189} The Predications of Arithmetic are another instance of the same thing. "One and one are two." This again is a mere process of naming. What I call one and one, in numbering things, are objects, sensations, or clusters of sensations; suppose, the striking of the clock. The same sounds which I call one and one, I call also two; I have for these sensations, therefore, two names which are exactly equivalent: so when I say, one and one and one are three: or when I say, two and two are four: ten and ten are twenty: and the same when I put together any two numbers whatsoever. The series of thoughts in these instances is merely a series of names applicable to the same thing, and meaning the same thing.  
Beside the two purposes of language, of which I took notice at the beginning of this inquiry; the recording of a man's thoughts for his own use, and the communication of them to others; there is a use, to which language is subservient, of which some account is yet to be given. There are complex sensations, and complex ideas, made up of so many items, that one is not distinguishable from another. Thus, a figure of one hundred sides, is not distinguishable from one of ninety-nine sides. A thousand men in a crowd are not distinguishable from nine hundred and ninety-nine. But in all cases, in which the complexity of the idea arises from the repetition of the same idea, names can be invented upon a plan, which shall render them distinct, up to the very highest degree of complication. Numbers are a set of names contrived upon this plan, and for this very purpose. Ten and the numbers below ten, are the repetition of so many ones: twenty, thirty, forty, &c., up to a hundred, are {190} the repetition of so many tens: two hundred, three hundred, &c., the repetition of so many hundreds; and so on. These are names, which afford an immediate reference to the ones or units, of which they are composed; and the highest numbers are as easily distinguished by the difference of a unit as the lowest. All the processes of Arithmetic are only so many contrivances to substitute a distinct name for an indistinct one. What, for example, is the purpose of addition? Suppose I have six numbers, of which I desire to take the sum, 18, 14, 9, 25, 19, 15; these names, eighteen, and fourteen, and nine, &c., form a compound name; but a name which is not distinct. By summing them up, I get another name, exactly equivalent, one hundred, which is in the highest degree distinct, and gives me an immediate reference to the units or items of which it is composed; and this is of the highest utility.  
That the Predications of Geometry are of the same nature with those of Arithmetic, is a truth of the greatest importance, and capable of being established by very obvious reasoning. It is well known, that all reasoning about quantity can be expressed in the form of algebraic equations. But the two sides of an algebraic equation are of necessity two marks or two names for the same thing; of which the one on the right-hand side is more distinct, at least to the present purpose of the inquirer, than the one on the left-hand side; and the whole purpose of an algebraic investigation, which is a mere series of changes of names, is to obtain, at last, a distinct name, a name the marking power of which is perfectly known to us, on the right-hand side of the equation. The language of geometry {191} itself, in the more simple cases, makes manifest the same observation. The amount of the three angles of a triangle, is twice a right angle. I arrive at this conclusion, as it is called, by a process of reasoning: that is to say, I find out a name "twice a right angle," which much more distinctly points out to me a certain quantity, than my first name, "amount of the three angles of a triangle;" and the process by which I arrive at this name is a successive change of names, and nothing more; as any one may prove to himself by merely observing the steps of the demonstration.[57]](56441.docx#chunk3437)

[[Editor's footnote 57: I cannot see any propriety in the expression that when we infer the sum of the three angles of a triangle to be twice a right angle, the operation consists in finding a second name which more distinctly points out the quantity than the first name. When we assent to the proof of this theorem, we do much more than obtain a new and more expressive name for a known fact; we learn a fact previously unknown. It is true that one result of our knowledge of this theorem is to give us a name for the sum of the three angles, "the marking power of which is perfectly known to us:" but it was not for want of knowing the marking power of the phrase "sum of the three angles of a triangle" that we did not know what that sum amounted to. We knew perfectly what the expression "sum of the three angles" was appointed to mark. What we have obtained, that we did not previously possess, is not a better mark for the same thing, but an additional fact to mark the fact which is marked by predicating of that sum, the phrase "twice a right angle."--\_Ed.\_]  
There is one important class of words, the NAMES of NAMES; of which we shall have occasion to take account more particularly hereafter, and of which it is necessary here to speak only as they form a variety of Predication. A few examples will make the case {192} intelligible. WORD is a generical name for all Names. It is not the name of a Thing, as chair is the name of a thing, or watch, or picture. But word is a \_name\_ for these several \_names\_; chair is a word, watch is a word, picture is a word, and so of all other names. Thus grammatical and logical terms are names of names. The word \_noun\_, is the name of one class of words, \_verb\_ of another, \_preposition\_ of another, and so on. The word \_sentence\_, is the name of a series of words put together for a certain purpose; the word \_paragraph\_ the same; and so \_oration\_, \_discourse\_, \_essay\_, \_treatise\_, &c. The words \_genus\_ and \_species\_, are not names of things, but of names. Genus is not the name of any thing called animal or any thing called body; it is a name of the \_names\_ animal, body, and so on; the \_name\_ animal is a \_genus\_, the name \_body\_ is a \_genus\_; and in like manner is the \_name\_ man a \_species\_, the \_name\_ horse, the name crow, and so on. The name \_proposition\_, the name \_syllogism\_, are names of a series of words put together for a particular purpose; and so is the term \_definition\_; and the term \_argument\_. It will be easily seen that these words enter into Predication precisely on the same principles as other words. Either the more distinct is predicated of the less distinct, its equivalent; or the more comprehensive of the less comprehensive. Thus we say, that nouns and verbs are declinables; preposition and adverb indeclinables; where the more comprehensive terms are predicated of the less. Thus we say, that adjectives and verbs are attributes; where the more distinct is predicated of the less.[58]  
[Editor's footnote 58: This exposition of the class of words which are properly names of names, belongs originally to Hobbes, and is highly {193} important. They are a kind of names, the signification of which is very often misunderstood, and has given occasion to much hazy speculation. It should however be remarked that the words genus and species are not solely names of names; they are ambiguous. A genus never indeed means (as many of the schoolmen supposed) an abstract entity, distinct from all the individuals composing the class; but it often means the sum of those individuals taken collectively; the class as a whole, distinguished on the one hand from the single objects comprising it, and on the other hand from the class name.--\_Ed.\_]  
  
{194} SECTION V.  
PRONOUNS.  
  
The principal part of the artifice of Naming is now explained. We have considered the nature of the more necessary marks, and the manner in which they are combined so as to represent the order of a train. Beside those marks, which are the fundamental part of language, there are several classes of auxiliary words or marks, the use of which is, to abbreviate expression, and to render it, what is of great importance, a more rapid vehicle of thought. These are usually comprehended under the titles of pronoun, adverb, preposition, and conjunction; a classification which, for our present purpose, has the best recommendation, that of being familiarly known.  
It is to be distinctly understood, that in the account which is here to be given of the subsidiary parts of speech, it is but one part of the explanation of them which will be attempted. The ideas, which many of them stand for, are of the most complicated kind, and have not yet been expounded. We are, therefore, not yet prepared to point out the items which they mark. Our present business is only to indicate the mode in which they are used in Predication, as part of the great contrivance for marking the order of a train of ideas, and for economizing the number of words.  
It is also necessary to observe, that I have limited myself, in this part, to brief indications, without {195} going into minute development, the length of which, it appeared to me, would not be compensated by the advantage.](56441.docx#chunk3438)

[In all speech \*there is a \_speaker\_; there is some \_person spoken to\_; and there is some \_person\_ or \_thing spoken of\_. These objects constitute three Classes, marks of which are perpetually required. Any artifice, therefore, to abridge the use of marks, of such frequent recurrence, was highly to be desired. One expedient offered itself obviously, as likely to prove of the highest utility. Speakers constituted one class, with numerous names; persons spoken to, a second class; persons and things spoken of, a third. A generical name might be invented for each class; a name, which would include all of a class, and which singly might be used as the substitute of many. For this end were the Personal Pronouns invented and such is their character and office. "I," is the generical mark which includes all marks of the class, \_speakers\_. "Thou," is a generical mark, which includes all marks of the class, \_persons spoken to\_. "He," "she," "it," are marks, which include all marks of the class, \_persons\_ or \_things spoken of\_.  
By forming Adjectives from certain kinds of Nouns we obtain a useful class of specific names. From wool we make woollen; and woollen, attached to various generic names, furnishes us with specific names; thus we say woollen cloth, which is a species of cloth; woollen yarn, which is a species of yarn; woollen garment, which is a species of garment. So, from the word gold we make golden, which furnishes us with a greater number of specific names; from wood wooden, which furnishes us with a still greater number. Adjectives are {196} formed in like manner from the personal pronouns: from I, my or mine; from Thou, thy or thine; from He, She, It, his, hers, its; also from the plurals of them, ours, yours, theirs. These adjectives answer a purpose of very frequent recurrence; that of singling out, from any class of objects, a sub-class, or an individual, bearing a peculiar relation, to the \_person speaking\_, the \_person spoken to\_, or the \_person\_ or \_thing spoken of\_. Thus, when I say, my sheep or my oxen, I denote a sub-class of those animals, those which stand in the relation of property to the speaker; when I say thy sheep or oxen, I denote a sub-class in the same relation to the person spoken to; and when I say his sheep or oxen, a sub-class, standing in that relation to the person spoken of. When I say my son, thy wife, his father, I single out individuals having that relation.  
The Demonstrative Pronouns, This and That, are of great utility. They serve to individualize any thing in a class. One of these marks put upon a specific mark, makes it an individual mark. Thus, the mark "man," is the name of a class: put upon it the mark this, or that; this man, and that man, are marks, signs, or names, of individuals. In this manner innumerable individual names can be made, without adding a single word to the cumbrous materials of language.  
The nature of the Relative Pronoun is not difficult to understand. It supplies the place of a personal pronoun and a conjunction, in connecting a Predication with the subject, or predicate of another proposition. Thus, "John received a wound, which occasioned his death," is of the same import as "John received a wound, \_and it\_ occasioned his death." This {197} is a case in which the Relative connects a subsequent predication with the \_predicate\_ of an antecedent predication. The following are cases in which it connects a subordinate predication with the \_subject\_ of the principal one: "Erasmus, \_who\_ was a lover of truth, but of a timid character, hesitated between the new and the old religion." Erasmus, \_and he\_ was a lover of truth, &c. "The man \_who\_ spoke to you is my father." "The man spoke to you, \_and he\_ is my father."[59]  
[Findlater's footnote 59: There is really no well marked distinction between relative pronouns and demonstrative pronouns, either in their origin or in their use. Of the demonstrative roots \_ka\_, \_sa\_, \_ta\_, \_ja\_, derivatives from the \*guttural \_ka\_ prevail as relatives in Latin and its modern descendants (Lat. \_qui\_, It. \_che\_, Fr. \_qui\_), and in the Teutonic languages (Goth. \_hva\_, Eng. \_who\_, Ger. \_wer\_, \_welch\_), but by no means exclusively. In Greek the relative differs little from the article, which is also used as a demonstrative and a personal pronoun. Modern Italian uses as a demonstrative a compound of the Latin \_qui\_ with \_iste\_ and \_illa\_--\_questo\_, \_quella\_. In German the relative proper, viz. \_welch\_, is comparatively little used, its place being supplied by the article \_der\_, which is merely an unemphatic demonstrative; and in English \_that\_ is perhaps as often used as who or which.](56441.docx#chunk3439)

[The relative serves for two purposes, which it is useful to distinguish. (1) It may add on either a clause containing an independent proposition, as in the example in the text, "John received a wound, which occasioned his death;" or a clause dependent in some way upon the preceding--\_e.g.\_ assigning the reason of it, as, "It was unjust to punish the servant, who only did what he was ordered." (2) The clause introduced by the relative may serve simply to limit or define a noun, in the way that an adjective or another noun in apposition does, as "The man who spoke to you is my father." It is in this latter use of the relative, and in no other, that it is permissible in English to use \_that\_; to substitute \_that\_ for \_which\_ in the first of the other two sentences, or for \_who\_ in the second, would give a different meaning. Now it is only in the cases in which \_that\_ could not be substituted for who or which that the relative involves the force of a conjunction; and it is not always \_and\_ that is the conjunction involved. The conjunction has no verbal expression, and never had; it is only suggested, and the mind supplies that which best suits the logical connection. When the predication of the relative clause is co-ordinate with the preceding, as in the first example, \_and\_ is the proper conjunction to supply. In the sentence about the punishment of the servant, \_who\_ is equivalent to \_for he\_; and in that about Erasmus, in the text, to \_inasmuch as he\_. When the relative clause merely defines, no conjunction of any kind is even implied. In such a sentence as "He rewarded the man that rescued him," the relative clause is the answer to a question naturally suggested by "He rewarded the man"--what man? "The or that (man) rescued him;" which is equivalent to, "his rescuer." To resolve it into "And that man rescued him," gives quite a different meaning; namely, that he rewarded some man (otherwise known to the hearers) for something (likewise known to them), and that this man now rescued him.--\_F.\_]  
{198} The Interrogative is easily explained. It is merely the Relative, in a very elliptical form of expression. The interrogative sentence, "\_Who\_ gave you that book?" when the subaudition is supplied, is thus expressed: The person gave you the book, \_and him\_ I will you to name to me. "\_What\_ is the hour of the day?" is an elliptical form of,--It is an hour of the day, \_and it\_ I will you to tell me.  
  
{199} SECTION VI.  
ADVERBS.  
  
The power of this class of words, in the great business of marking, and the extent of the service rendered by them, will be so easily seen, that a few words will suffice to explain them. Adverbs may be reduced under five heads; 1, Adverbs of Time; 2, Adverbs of Place; 3, Adverbs of Quantity; 4, Adverbs of Quality; 5, Adverbs of Relation. They are mostly abridgments, capable of being substituted for longer marks. And they are always employed for the purpose of putting a modification upon the Subject, or the Predicate, of a Proposition. A few examples will suffice for the further elucidation of this subject. "Anciently," is an adverb of time. It is of the same import as the expression, "In distant past time." It is applied to modify the subject, or predicate, of a proposition, as in the following example: "A number of men anciently in England had wives in common." "Had wives in common," is the predicate of the above proposition, and it is modified, or limited, in respect to time, by the word "anciently." Adverbs of place it is easy to exemplify in the same manner. Under adverbs of quantity all those which mark degrees may be included; as greatly, minutely: Thus, "He enlarged greatly upon patriotism:" "Greatly" here means "in many words;" and it modifies the predicate, "enlarged," &c. Adverbs of {200} quality and relation are exceedingly numerous, because they are easily made from the words which connote the quality or relation: thus, from hard, hardly; from loud, loudly; from sweet, sweetly; from warm, warmly: again, from father, paternally; from son, filially; from magistrate, magisterially; from high, highly; from expensive, expensively; and so on. In all this no difficulty is presented which requires removing.[60]  
[Editor's footnote 60: In many cases, and even in some of the examples given, the adverb does not modify either the subject or the predicate, but the application of the one to the other. "Anciently," in the proposition cited, is intended to limit and qualify not men, nor community of wives, but the practice by men of community of wives: it is a circumstance affecting not the subject or the predicate, but the predication. The qualification of past and distant time attaches to the fact asserted, and to the copula, which is the mark of assertion. The reason of its seeming to attach to the predicate is because, as the author remarked in a previous section, the predicate, when a verb, includes the copula.--\_Ed.\_]  
  
{201} SECTION VII.  
PREPOSITIONS.  
  
It is easy to see in what manner Prepositions are employed to abridge the process of discourse. They render us the same service which, we have seen, is rendered by adjectives, in affording the means of naming minor classes, taken out of larger, with a great economy of names. Thus, when we say, "a man with a black skin," this compound name, "a man with a black skin;" is the name of a sub-class, taken out of the class man; and when we say, "a black man with a flat nose and woolly hair;" this still more compound name is the name of a minor class, taken out of the sub-class, "men with a black skin."](56441.docx#chunk3440)

[Prepositions always stand before some word of the class called by grammarians nouns substantive. And these nouns substantive they connect with other nouns substantive, with adjectives, or with verbs. We shall consider the use of them, in each of those cases.  
1. Substantives are united to Substantives by prepositions, on purpose to mark something added, something taken away, something possessed or owned. Thus, a man with a dog, a horse without a saddle, a man of wealth, a man of pleasure, and so on.  
It was first shewn by Mr. Horne Tooke, that prepositions, in their origin, are verbs, or nouns. Thus the prepositions in English, which note the modifications effected by adding to, or taking from, were {202} originally concrete words, which, beside something connoted by them, marked particularly \_junction\_, or \_disjunction\_. In the use of them as prepositions, that part of their signification, which we have called the connotation, has been dropped; and the notation alone remains. Prepositions, therefore, are a sort of abstract terms, to answer a particular purpose. To express my idea of a man with a dog (a very complex idea, consisting of two clusters; one, that which is marked by the term man; the other, that which is marked by the term dog); it is not enough that I set down the term Man, and the term Dog; it is necessary, besides, that I have a mark for that particular \_junction\_ of them, which my mind is making. For that mark I use the preposition "with." "Without" denotes disjunction in a similar manner, and requires no further explanation. The preposition "of," by which possession or ownership is denoted, (formerly, as remarked by Mr. Gilchrist, written \_og\_, \_oc\_, \_ac\_, &c.), is \_eke\_, or add. If we suppose that our verb \_have\_ is of the same origin, \_of\_ is merely the verb, which signifies possessing; and the learner may thus conceive the nature of its different applications.[7\*] "A man of wealth," a man hav(ing) wealth; "a field of ten acres," a field hav(ing) ten acres; so, "a house of splendour;" "a woman of gallantry;" in all of which cases, beside the two clusters of ideas, marked by the two names which the preposition connects, there is an idea of possession coming between.  
[\*Mill's footnote 7: See note at p. 209.]  
Here, however, a peculiarity is to be noted. When there is a possessor, there is something possessed. {203} The preposition, therefore, which marks the relation between the possessor and the possessed, stands ambiguously between the active and the passive power. It, therefore, partakes more of the active or the passive signification, according to the position of the words which it is employed to connect. In the instances previously given, we have seen that it had clearly an active signification. In the following it has clearly a passive. "The book of John;" the book \_of\_, hav(ed) John. "The Creator of the world;" Creator hav(ed). "The wealth of Croesus;" wealth hav(ed).  
Of is employed in a partitive sense, when one of the words denotes a part of the other; as "half of the army;" "many of the people;" "much of the loss." In this case the idea of possession is sufficiently obvious to support the analogy. The parts are possessed, had, by the whole. "Part of the debt," part hav(ed) the debt.  
It is easy to see how the preposition with a substantive, serves the purpose of a new adjective. Thus, in the expression, "a man with one eye," the words, "with one eye," might have been supplied by an adjective, having the same meaning or marking power; and the French language actually has such an adjective, in the mark \_borgne\_. We say, a man with red hair, and we have the adjective, red-haired; a man of wealth, and we have the adjective, wealthy; a man of strength, and we have the adjective, strong; cases which distinctly exemplify our observation.  
2. We come now to shew in what manner, and with what advantage, prepositions are employed to connect Substantives with Adjectives. The following {204} classes of adjectives will furnish sufficient illustration of this part of the subject: 1, Adjectives of place or position; \*2, Adjectives of time or succession; 3, Adjectives signifying profit or disprofit; 4, Adjectives of plenty or want; 5, Adjectives signifying an affection or state of the mind.  
Adjectives of position, such as near, distant, high, low, have the ordinary power of adjectives, as marks upon marks; and an additional power, which will best be explained by examples. When we say "a distant house," "a neighbouring town;" the words "distant," and "neighbouring," are not only marks upon "house," and "town," but refer to something else: "a \_distant\_ house," is a house distant from \_something\_; "a \_neighbouring\_ town," is a town neighbouring \_something\_: it may mean "a house distant from my house," "a town neighbouring my house:" in these cases, we should say that the adjective has both a notation, and a connotation. The adjective \_distant\_, for example, notes \_house\_, and connotes \_my house\_; neighbouring, notes \_town\_, connotes \_my house\_. It is next, however, to be observed, that the connotation, in such cases, would be vague without a mark to determine it. The expression would be very imperfect, if, after the word high, we were merely to put the word "hill;" and say, "the house is high the hill;" or, "the house is distant the post-town." Prepositions supply this defect. We say, "the house is high \_on\_ the hill;" "the house is distant \_from\_ the post-town." In the case of some adjectives, their juxta-position makes the reference sufficiently precise; and in that case, the preposition may be dispensed with; as, near the town, near the road, &c.](56441.docx#chunk3441)

[{205} It is observable, that the adjectives of position are not numerous. Some very general ones are used; and the sub-species are formed out of them by the aid of prepositions. Thus we have the word placed, which includes all positions; and this, joined with a substantive and a preposition, marks positions of all kinds: thus we can say, placed on the right hand, placed on the left hand, placed behind the house, placed before the house, placed above it, placed below it, placed in it, and so on.  
It is not my intention to inquire into the precise meaning of each of the prepositions. It is sufficient to have given a sample of the inquiry, as in the case of the prepositions which connect substantives with substantives; and to have shewn the mode of their signification, as a kind of abstract terms, either active or passive.  
The varieties of time or succession are not many, and the words to denote them, proportionally few. Previous, simultaneous, posterior, are the principal adjectives; and the terms to which these words of reference point, are marked by prepositions: thus we say, previous to, simultaneous to, and also with; "with," as we have seen, denoting junction, sameness of time.  
Adjectives of profit or disprofit, need prepositions to mark their connexion with the things benefited or hurt; as, hurtful to the crop; good for the health. These adjectives afford a good example of the manner in which generical adjectives are divided into numerous sub-species, without the inconvenience of new names, by the aid of the prepositions: thus, hurtful, which notes all kinds of hurtfulness, is made to note {206} its various species, in the following manner: hurtful to the health, hurtful to the eyes, hurtful to the stomach, hurtful to the crops, hurtful to the reputation: all different species of hurtfulness, which might be noted by adjectives severally appropriated to them.  
There is nothing particular to be remarked of the manner in which adjectives of plenty, or want, or those signifying an affection of the mind, are connected with the objects they connote, by prepositions; we shall, therefore, proceed to shew the manner in which verbs are connected with substantives, by their means.  
3. All verbs are adjectives, either active or passive, put into a particular form, for the sake of a particular connotation. All actions, saving those which begin and end in the actor, have a reference to a patient, or something acted on; and the being acted on; the passion as it is called; has a reference to the actor. Action, therefore, and passion, are relative terms, standing in the order of cause and effect; agent and patient, are the names of the subjects of the action and the passion, the cause and the effect.  
Most actions are motions, or named by analogy to motions. In applying terms denoting motion, there is particular occasion for marking the two points of termination; the point at which it began, and the point at which it ended. This is effected by the name of the two places, and a preposition. The contrivance will be sufficiently illustrated by an obvious example: "John travelled from London to Dover:" "Travelled," the name of the motion; London, the point of commencement; Dover, the point of termination: from, a word denoting commencement, {207} connecting London with travelled; to, a word signifying completion, connecting the word Dover, with the word travelled.  
Some verbs, which imply motion, have their main, or only reference, to the point of its termination. Thus, he stopped at Dover: he struck him on the head: he stabbed him in the side. These prepositions, whatever their precise import, which we shall not now stop to inquire, mark, when thus applied to the name of the place at which the respective motions terminated, the connexion of the two names, that of the motion, and that of its point of termination.  
With respect to motions, we have occasion to mark, not only the points of their commencement and termination, but also their direction. The direction of a motion, by which we mean the position of the moving body, at the several points of its course, can only be marked by a reference to other bodies, whose position is known. Thus, "He walked through the field." The direction of the walk, or the position of the walking man, at the several moments of it, is marked by a reference to the field whose position is known to me, and a word which means from side to side. The expression, "It flew in a straight line," is less full and particular in its marking, but clear and distinct, as far as it goes, by reference to a modification of position; namely, a line, with which I am perfectly familiar.](56441.docx#chunk3442)

[In using verbs of action and passion, that is, words which mark a certain cluster of ideas, we have occasion to modify such clusters, by adding to, or taking from them, not only ideas of Position, as above, but various other ideas; of which the idea of {208} the Cause, or End, of the action, the idea of the Instrument with which it was performed, and the idea of the Manner of the performance, are among the principal. "John worked;" to this, a mark of a certain cluster of ideas, I want to make an addition, that of the Cause or End of his working. That End is, Bread. To mark this as the cause of his working, it is not enough to set down the name bread; I need a mark to fix its connexion with the working, and the kind of its connexion. I say, "John worked for (cause) bread." "John was robbed for (cause of the robbery) his money." The ideas of manner and instrument are commonly annexed by one preposition; "John worked with (joining) diligence," the manner; "John worked with a spade," the same idea, as "John with (joined) a spade worked;" spade, the instrument. "John worked by the job, worked by the day;" manner: "John worked by machinery," the instrument. "He was killed with barbarity, with a cudgel."  
We say, done with hurry, or in a hurry, done in haste. "In," which seems to mark a modification of position, is here applied to that which does not admit of position. Hurry and haste seem in such expressions to be personified; to be things which surround an action, and in the midst of which it is done.  
We have compound names for many actions. Thus we may say, "he hurt John," or "he did hurt to John," "he gave a lecture to John," or, "he lectured John." The reason why a preposition is required before the patient, in the case of the compound name of the action, and not of the single name, is, that the word which stands with respect to the verb in the {209} immediate relation of the recipient or patient of the action, is not the man, but the thing done. Thus, in the phrase, "he did hurt to John," it is not John which is done, but hurt: in the phrase, "he gave a lecture to John," it is not John who is given, but a lecture. There are here as it were, two patients, lecture, the primary, John, the secondary; juxta-position marks the connexion of the primary; but a preposition is necessary, to mark that of the secondary.  
The following phrases seem to admit of a similar explanation. "He reminded him of his promise;" "he accused him of perjury;" "he deprived him of his wife:" the secondary patients being "promise," "perjury," "wife." He reminded him of his promise (hav(ed) his promise); the promise being the thing had or conceived in the reminding: accused him of perjury; perjury being the thing had in the accusation, the matter of the accusation: deprived him of his wife; his wife being the matter of the deprivation; the thing hav(ed) in it.[61]](56441.docx#chunk3443)

[[Findlater's footnote 61: The ingenious speculations of Mr. Tooke did great service to the cause of philology in England, by awakening a very general interest in the subject. But his knowledge of the cognate languages was far too circumscribed to warrant his sweeping inductions. In his day, in fact, the accesses had not yet been opened up to this new mine, nor the right veins struck that have since yielded such rich results. Accordingly nearly all Tooke's derivations are now discredited, and among others his account of prepositions. One or two English prepositions, of comparatively recent formation, seem to be formed from nouns; as \_among\_ Ang. Sax. \_gemang\_ or \_ongemang\_, \_gemang\_ meaning "mixture;" and \_against\_, Ang. Sax. \_on-gegen\_ in which \_gegen\_, from its use in cognate dialects, appears to be {210} a noun, though its primary meaning is not very clear. These however still involve a preposition which has to be accounted for. \_Between\_, again, is \_by twain\_, "near two;" and \_except\_, \_save\_, \_during\_ were originally participles in the case absolute; "except this" was originally "this excepted," Lat. hoc excepto. But the simple prepositions \_in\_, \_of\_, \_by\_ belong to the radical elements of language, and are more independent of nouns and verbs than nouns and verbs are of them. Comparative philology, which did not exist in Tooke's days, has shewn, that, besides predicative roots, as they are called--that is syllables expressive of some action or property, such as "to go," "to eat," "to be bright," "to speak," &c., which form the bases of nouns, adjectives, and verbs--there was a class of roots denoting simply relations in space, that is, place or direction (here or this, there or that, up, down, away, &c.). It is easy to see how the audible marks of such notions, at first, doubtless, vague enough, would be rendered precise and intelligible by gesticulations; or perhaps the gesticulations were the original signs, and the words mere involuntary exclamations accompanying them, and in time taking their place. These syllables have been called local, demonstrative, or pronominal roots, and play a most important part in language. They are joined to other roots to form derivatives of various kinds; and it is of them that the inflexional endings of nouns and verbs are built up. Singly or in combination, they constitute the pronouns, personal as well as demonstrative. Abstract as are now the meanings of \_I\_, \_he\_, they were once patent to the senses; \_ma\_ was an emphatic "here," calling attention to the speaker; \_sa\_ or \_ta\_, "there, that," something different from both speaker and hearer. Most of the prepositions originated in roots of this class. The roots of some of them, at least, are identical with those of pronouns; others express direction, and thus imply motion. Thus \_up\_ means, "(motion) from below to above;" in the root FR (as in \_for\_, \_from\_), which is represented in Sans. Gr. and Lat. by PR (pro), the ground idea is, motion or removal from the speaker, in the front direction. \_Of\_ is the Gothic \_af\_, Old Ger. \_aba\_ or \_apa\_, Sans. \_apa\_, Gr. [Greek: a)po\] {211} Lat. \_a\_ or \_ab\_. It is not easy to determine the precise physical relation primarily expressed by this particle; probably "proceeding from," or "descending or depending from." If there is any connection between \_of\_ and \_have\_, it is more likely that \_have\_ is derived from \_of\_ than the reverse. That not a few verbs have this kind of origin, is now recognised; the English \_utter\_ from \_out\_ is a signal example.  
The primary relations expressed by prepositions were always physical or sensible; but the transition to the abstruse mental relations which they now serve to mark (cause instrumentality, superiority, &c.) is, as a rule, sufficiently obvious. For example, "issuing or proceeding from" passes insensibly into "being part of," "belonging to," "in the possession of."--\_F.\_]  
  
{212} SECTION VIII.  
CONJUNCTIONS.  
  
The Conjunctions are distinguished from the Prepositions, by connecting Predications; while the Prepositions connect only Words.  
There are seeming exceptions, however, to this description, the nature of which ought to be understood. They are all of one kind; they all belong to those cases of Predication, in which either the subject or the predicate consists of enumerated particulars; and in which the Conjunction is employed to mark the enumeration. Thus we say, "Four, and four, and two, are ten." Here the \_subject\_ of the predication consists of three enumerated particulars, and the conjunction seems to connect words, and not predications. In like manner, we say, "His bag was full of hares, and pheasants, and partridges." In this last case, the \_predicate\_ is composed of enumerated particulars. In these instances, the words called conjunctions, appear to perform the business of prepositions, in joining \_words\_: and in fact, they may be supplied by prepositions. Thus, instead of "four, and four, and two, are ten," we may say "four, with four, with two, are ten:" and, in the same way, "His bag was full of hares, and pheasants, and partridges," may be put "full of hares, with pheasants, with partridges." And nothing can be more simple than such a variety in the use of such words.  
{213} \_With\_ means \_join\_; \_and\_ means \_add\_.[62] These are words of the same kind, and the same import; and nothing but use has appropriated the one to the joining of words rather than predications, the other to the joining of predications rather than words.  
[Findlater's footnote 62: This is according to Tooke's etymology, who traces \_and\_ to an Ang. Sax. verb \_anan\_, to add. Unfortunately, Anglo-Saxon scholars deny that there is such a verb. The nearest to it is \_unnan\_, which means, however, merely "to wish well to," "to favour." No satisfactory account has been given of \_and\_, but the analogy of other conjunctions would connect it with a demonstrative root. J. Grimm is inclined to consider it as a nasalised form of the Lat. \_et\_; which in its turn may be an inversion of Greek [Greek: ti\], just as \_ac\_, is of [Greek: kai\].](56441.docx#chunk3444)

[All conjunctions are essentially adverbs, and derive their connective power from their adverbial meaning. This is well seen in \_also\_, the radical meaning of which is "all (quite) in that (the same) way." Most of the adverbs used as conjunctions are obviously oblique cases of pronouns; so, as, than, when, where, tum, ubi, quam, quum. In Gothic, \_jah\_, (Old Ger. \_ja\_, Finnish \_ja\_; of the same origin as Eng. \_yes\_) takes the place of \_and\_, and means "in that or the same (manner)." The Gr. [Greek: kai\] and the Lat. que, "and," are similarly oblique cases from the root \_ka\_, and equivalent to "in which or that (manner)." The identity of manner or circumstance constitutes the mental bond. It is easy to see how a preposition used adverbially and expressing proximity, distance, or other relative position, would connect predications or ideas; \_e.g.\_ "\_After\_ he had rested a little, he began again."--\_F.\_]  
Our object, however, on the present occasion, is distinct, both from that of the grammarian, and that of the etymologist. We have shewn, that a set of marks are exceedingly useful to connect single words, and by what contrivances this end is accomplished; it remains for us to shew, what use there is of marks {214} to connect Predications; and by what contrivances that object is attained.  
The occasions for the use of marks to connect Predications, seem to be of two kinds.  
First, When two Predications are to be marked, as following one another.  
Secondly, When they are to be marked, as modified, the one by the other.  
1. Those of the first kind need but few words for their explanation.  
I may say, "Newton was a mathematician," "Locke was a metaphysician," "Milton was a poet." So stated, these Predications do not mark any particular order in my thoughts. I desire, however, to show, that the ideas thereby expressed, were proximate parts of the train in my mind. The word \_and\_, which means \_add\_, placed between every pair, affords the requisite indication.  
Like \_and\_, the conjunction \_nor\_ marks predications in sequence. It differs from \_and\_ only in uniting negative predications. "The act is not honourable, \_nor\_ is the man honest." In this case, it is obvious that \_nor\_, whatever its origin, has the meaning of \_and not\_. The predications then are two negative predications, the sequence of which, is marked by the word \_and\_.  
\_But\_, though it has been otherwise classed, and called adversative, is of the same kind, and simply marks the sequence. Thus we say, "Catiline was a brave man, but Catiline was a wicked man." The meaning of \_but\_ is scarcely different from that of \_and\_, addition being the fundamental idea signified by both of them. The \_opposition\_ between the two predications is signified by the predications themselves, not by the {215} connective.[63] In fact, the sense would not be changed, if we substituted \_and\_ for \_but\_. It is only because, in use, \_but\_ has been commonly confined to the sequence of two \_opposing\_ predications, that the word \_but\_ is no sooner expressed, than an \_opposing\_ predication is anticipated. This is a simple case of association.  
[Findlater's footnote 63: This is not strictly correct. \_But\_ is compounded of the two prepositions or local particles \_by\_ and \_out\_ (Ang. Sax. \_bi utan\_); and the force of it, in the example given in the text, may be thus paraphrased: "Catiline was a brave man; \_but\_ (\_by\_, near or beside that fact, put another fact, which is \_out\_, away, or different from it, namely) Catiline was a wicked man." This is something more than a simple case of association; the opposition is expressed as well as the addition.--\_F.\_]  
2. It is not necessary for us to do more than exemplify the principal cases in which one Predication is modified by another.  
"The space is triangular, \_if\_ it is bounded by three straight lines."  
"The space is triangular, \_because\_ it is bounded by three straight lines."  
"The space is bounded by three straight lines, \_therefore\_ it is triangular."  
In each of these three propositions, there are two predications; the one of which is dependent on the other. The dependence is that of necessary consequence. The triangularity is the consequence of being bounded by three straight lines.  
In order to have names for two Predications thus related, we may call the one the \_conditioning\_, the other the \_conditioned\_. In the above instances, "The space is bounded by three straight lines," is the \_conditioning\_ {216} predication; "The space is triangular," is the \_conditioned\_.  
There are two states of the conditioning predication; one, in which it is contingent; another, in which it is positive. Observe, now, the simple contrivance for marking the dependence of the \_conditioned\_ upon the \_conditioning\_ predication, in all the above cases.  
In the first of the examples, "The space is triangular, \_if\_ it is bounded by three straight lines," the \_conditioning\_ predication is contingent. The word \_if\_, which is equivalent to \_give\_,[64] prefixed to the conditioning predication, marks it both as the conditioning predication, and as contingent.  
[Findlater's footnote 64: That \_if\_ has no connection with \_give\_, is manifest from the cognate forms; Goth. \_jabai\_, Frisic \_jef\_, Ang. Sax. \_gif\_, Old Ger. \_ibu\_, Lettish \_ja\_, all meaning primarily "in which or in that case, or supposition." "\_Jabai\_--from which the other Germanic forms are descended--appears to have originally been a dative or instrumental case of \_ja\_, analogous to \_tubya\_ = Latin \_tibi\_: compare \_ibi\_, \_ubi\_, Gr. [Greek: bi/e|phi], Slavonic \_tebje\_ = tibi."--Garnett.--\_F.\_]  
In the second of the examples, "The space is triangular, because it is bounded by three straight lines," the \_conditioning\_ predication is positive; the word \_because\_ (having the meaning of, \_cause be\_, or \_cause is\_)[65] prefixed to it, marks it as at once the conditioning predication, and also positive. If \_for\_ had been the {217} mark instead of because, the artifice would have been still the same, as \_for\_ has the meaning of \_cause\_.](56441.docx#chunk3445)

[[Findlater's footnote 65: The syllable \_be\_, in "because," "before," &c., is the simple preposition \_by\_, Sans. \_abhi\_, Gr. [Greek: epi\], "near," "close to." \_Therefore\_ is \_for that\_; in which \_for\_ is a preposition, meaning primarily "position in front," and thence, by metaphor, the relation of motive or cause.--\_F.\_]  
In the third of the examples, "The space is bounded by three straight lines, \_therefore\_ it is triangular;" the order of the predications is inverted, the \_conditioning\_ being put first. In this case, therefore, we need a mark to show that the last predication is conditioned, and conditioned by the preceding. This is done by prefixing to it the compound word, \_therefore\_, of which the first part \_there\_ is equivalent to \_that\_, and \_fore\_ or \_for\_ means \_cause\_. The expression in its elementary form being, "The space is bounded by three straight lines; for that, or cause that, the space is triangular."  
In these cases we have examples of what are called, the Suppositive, the Causal, and the Illative conjunctions.  
The following are examples of what are called the Disjunctive.  
"The ship was well manned; \_else\_ it would have been lost."  
"\_Unless\_ the ship had been well manned, it would have been lost."  
In these two examples, the conditioning \*predications are, "The ship was well manned;" "The ship had been well manned:" the \_conditioned\_ is, "it would have been lost," in both instances.  
The dependence here, between the \_conditioning\_ and \_conditioned\_, is that of physical consequence. The ship's not being lost, was the consequence of its being well manned. The contrivance for marking this dependence is akin to that which we have traced in the former instance.  
In the first of the two examples, the \_conditioning\_ {218} predication stands first. How do I mark that the next is \_conditioned\_, and conditioned as a physical consequent? I interpose the word \_else\_. This is part of an obsolete verb, signifying, \_to dismiss\_, \_to turn out\_, \_to take away\_.[66] And the sentence is thus resolved: "The ship was well manned," \_take away that\_ (take away the cause, the effect is taken away also) "she would have been lost."  
[Findlater's footnote 66: \_Else\_ is the genitive of an obsolete adjective, in Gothic \_alis\_, corresponding to Lat. \_alius\_; and is analogous with Lat. \_alias\_.--\_F.\_]  
Other conjunctions of the disjunctive kind, as they are called, would here have answered the same purpose with \_else\_. "The ship was well manned, \_otherwise\_, she would have been lost." \_Otherwise\_ here is precisely of the same import as \_else\_. "The ship was well manned;" that being dismissed, that being \_other\_ than it was; "it would have been lost."  
"The ship was well manned, \_or\_ it would have been lost." \_Or\_, in German \_oder\_, is \_other\_. The resolution of this sentence, therefore, is the same as the former.  
In the second of the two examples, "\_Unless\_ the ship had been well manned, it would have been lost," the contrivance is the same, with a mere change of position. \_Unless\_, is a word of the same import, rather the same word, as \_else\_. \_Unless\_ is PREFIXED to the \_conditioning\_ predication, whereas \_else\_ is SUFFIXED; and that is the difference.[67] The word \_except\_, which signifies \_take\_ {219} \_away\_, may be substituted for \_unless\_. A peculiar application of \_if\_ (\_give\_) may here also be exemplified. \_If\_ with the negative, (\_if not\_,) has a similar signification with unless, except; "\_If\_ the ship had not been well manned, &c."  
[Findlater's footnote 67: \_Unless\_ is simply \_on less\_, corresponding to Fr. \_a moins\_, and is equivalent to \_if not\_.--\_F.\_]  
Let us now pass to another case.  
"\_Although\_ the ship was well manned, it was lost." The two predications may change places, without change of meaning. "The ship was lost, \_although\_ it was well manned."  
What (as above) was to be marked by \_else\_, \_unless\_, \_if not\_, \_except\_, and so on, was the connexion between a cause and its usual effect; that is, the manning of a ship, and the safety of the ship. What is to be marked in this case is the want of connexion between a cause and its usual effect. It is done by similar means.  
\_Although\_ is part of an obsolete verb, \_to allow\_, \_to grant\_.[68] The two predications are: "The ship was well manned," "The ship was lost." I want to mark between my two predications not only a connexion, that of the antecedence and consequence of the predicated events, but the existence of a consequent differing from that by which the antecedent is usually followed. \_Although\_, prefixed to the predication of the antecedent event, gives notice of another predication, that of the consequent, and of a consequent differing from that by which the antecedent might have been {220} followed: \_Grant\_ such an antecedent, such and not such was the consequent.  
[Findlater's footnote 68: \_Although\_ is a compound pronominal adverb resembling Lat. \_tamen\_, and means "(the case being) quite thus (yet)."--\_F.\_]  
The same connection is marked by other conjunctions. "The ship was well manned, \_nevertheless\_ it was lost." \_Nevertheless\_, means \_not less for that\_.[69] "\_Notwithstanding\_ the ship was well manned, it was lost." \_Notwithstanding\_, is, \_not being able to prevent\_, \_maugre\_, \_in spite of\_. The resolution of the above sentences is obvious. "The ship was well manned, \_yet\_ it was lost." \_Yet\_ is the verb \_get\_, and has here the force of \_although\_, \_grant\_. "The ship was well manned, \_yet\_ (or got, that being got, had, granted) it was lost."[70] "The ship was well manned, \_still\_, it was lost." \_Still\_ is part of an obsolete verb, \_to put\_, \_to fix\_, \_to establish\_. "The ship was well manned, \_still\_ (that put, that supposed) it was lost."[71]  
[Findlater's footnote 69: \_Nevertheless\_ means literally, "not less by (or for) that." In this compound \_the\_ is not the article, but an adverb, in Ang. Sax. \_thy\_, "by that much," and corresponds to Lat. \_eo\_ in the expression \_eo minus\_.--\_F.\_]](56441.docx#chunk3446)

[[Findlater's footnote 70: \_Yet\_ is of pronominal origin like Gr. [Greek: i)/ti], Ger. \_jetzt\_, and has no connection with the verb \_get\_.--\_F.\_]  
[Findlater's footnote 71: \_Still\_ seems to be the adjective \_still\_, quiet, used adverbially, and having the force of "undisturbed, uninterrupted by that."--\_F.\_]  
A few more cases will exemplify all that is material in the marking power of the conjunctions.  
"We study, \_that\_, we may be learned." The connexion here, again, is that of cause and effect. "We study:" "We may be learned," are the two predications, between which the connexion in question is to {221} be marked. The demonstrative pronoun performs the service. "We may be learned, \_that\_ we study:" we study; what? to be learned.  
"John is more learned than James is eloquent." The conjunction here is a relative term, and consists of the two words, \_more than\_. The two predications are, "John is learned," "James is eloquent." The connexion between them is, that they are the two parts of a comparison turning upon the point of greatness in degree. The two words \_more than\_, suffice to mark that connexion. \_Than\_ is but a mode of spelling and pronouncing \_that\_, which use has appropriated to this particular case. "John is learned, more that (that being the more, the other of course is the less), James is eloquent."[72]  
[Findlater's footnote 72: \_Than\_ is only another form of \_then\_, and marks that the one comes after the other, and is therefore inferior.--\_F.\_]  
\_As\_, obsolete as a pronoun, only exists as a conjunction. It is a word of the same import with \_that\_. The following will suffice in exemplification of the marking property which it retains. "Virgil was \_as\_ great a poet as Cicero an orator." The two predications are, "Virgil was a great poet," "Cicero was a great orator." They also are connected as the two parts of a comparison, turning upon the point of equality in degree. \_As\_, or \_that\_, suffices to mark that connexion. "Virgil was a great poet," \_that\_ (namely great) Cicero was an orator. We shall see afterwards, in the composition of RELATIVE TERMS, that every such term consists of two words, or the same word taken twice. The conjunction here is a relative term, and consists {222} of two words, namely, \_as\_, or \_that\_, taken twice. "Virgil was a poet great, that that, an orator was Cicero;" the first \_that\_ marking \_great as poet\_; the second \_that\_, marking \_great as orator\_.[73]  
[Findlater's footnote 73: \_As\_ is an oblique case of the demonstrative root \_sa\_, and is equivalent to "in this (degree);" and the nature of the connection is this: Virgil was a poet great in this degree; Cicero was an orator great in this degree; that is, the degree of greatness was the same in both.--\_F.\_]  
  
  
  
{223} CHAPTER V.  
CONSCIOUSNESS.  
  
"It is not easy for the mind to put off those confused notions and prejudices it has imbibed from custom, inadvertency, and common conversation. It requires pains and assiduity to examine its ideas, till it resolves them into those clear and distinct simple ones out of which they are compounded; and to see which, amongst its simple ones, have or have not a necessary connexion and dependence one upon another. Till a man doth this in the primary and original notions of things, he builds upon floating and uncertain principles, and will often find himself at a loss."--\_Locke\_, \_Hum. Und.\_ b. ii. c. 13. s. 28.  
IT will now be instructive to retrace our steps, to look back upon the space we have passed, and contemplate the progress we have made toward our journey's end.  
We have become acquainted with the elementary feelings of our nature; \_first\_, those derived immediately from our bodies, whether by impressions made on the surface of them, or unseen causes operating on them within; \_secondly\_, the feelings which, after the above mentioned feelings have ceased, are capable of existing as copies or representatives of them.  
We have also observed the manner in which those \_secondary\_ Feelings, to which we have given the name of IDEAS, flow, either into \_groups\_, or into \_trains\_. And {224} we have explored the system of contrivances, to which mankind have had recourse, for MARKING those feelings, and the trains of them; so as either to fix the knowledge of them for one's own use, or to make communication of them to others.  
In what has been thus already presented, it will be seen that several expositions of considerable importance are included.  
Sensations, and Ideas, are both feelings. When we have a sensation we feel, or have a feeling; when we have an idea we feel, or have a feeling.](56441.docx#chunk3447)

[Having a SENSATION, and having a feeling, are not two things. The thing is one, the names only are two. I am pricked by a pin. The sensation is one; but I may call it sensation, or a feeling, or a pain, as I please. Now, when, having the sensation, I say I feel the sensation, I only use a tautological expression: the sensation is not one thing, the feeling another; the sensation is the feeling. When, instead of the word feeling, I use the word conscious, I do exactly the same thing, I merely use a tautological expression. To say I feel a sensation, is merely to say I feel a feeling; which is an impropriety of speech. And to say I am conscious of a feeling, is merely to say that I feel it. To have a feeling is to be conscious; and to be conscious is to have a feeling. To be conscious of the prick of the pin, is merely to have the sensation. And though I have these various modes of naming my sensation, by saying, I feel the prick of a pin, I feel the pain of a prick, I have the sensation of a prick, I have the feeling of a prick, I am conscious of the feeling; the thing named in all these various ways is one and the same.  
{225} The same explanation will easily be seen to apply to IDEAS. Though, at present, I have not the sensation, called the prick of a pin, I have a distinct idea of it. The having an idea, and the not having it, are distinguished by the existence or non-existence of a certain feeling. To have an idea, and the feeling of that idea, are not two things; they are one and the same thing. To feel an idea, and to be conscious of that feeling, are not two things; the feeling and the consciousness are but two names for the same thing. In the very word feeling all that is implied in the word Consciousness is involved.  
Those philosophers, therefore, who have spoken of Consciousness as a feeling, distinct from all other feelings, committed a mistake, and one, the evil consequences of which have been most important; for, by combining a chimerical ingredient with the elements of thought, they involved their inquiries in confusion and mystery, from the very commencement.  
It is easy to see what is the nature of the terms CONSCIOUS, and CONSCIOUSNESS, and what is the marking function which they are destined to perform. It was of great importance, for the purpose of naming, that we should not only have names to distinguish the different classes of our feelings, but also a name applicable equally to all those classes. This purpose is answered by the concrete term Conscious; and the abstract of it, Consciousness. Thus, if we are in any way sentient; that is, have any of the feelings whatsoever of a living creature; the word Conscious is applicable to the feeler, and Consciousness to the feeling: that is to say, the words are GENERICAL marks, under which all the names of the subordinate classes {226} of the feelings of a sentient creature are included. When I smell a rose, I am conscious; when I have the idea of a fire, I am conscious; when I remember, I am conscious; when I reason, and when I believe, I am conscious; but believing, and being conscious of belief, are not two things, they are the same thing; though this same thing I can name, at one time without the aid of the generical mark, while at another time it suits me to employ the generical mark.[74] [75]  
[Bain's footnote 74: The mistake of Reid in raising Consciousness to a separate faculty has been commented on by Brown, Hamilton, and others. It must be allowed that to feel and to be conscious are not two things but the same thing: that is to say, the use of the term consciousness, whether in common life or in philosophical discussion, does not point to knowing, and exclude feeling.  
Consciousness is the widest word in our vocabulary. By common consent it embraces everything that "mind" embraces; while one mode of extricating the great problem of Perception from self-contradictions, makes it mean more than mind strictly means. We speak of the \_object-consciousness\_ as our attitude in being cognisant of the extended universe; while our attitude under feeling, and thought, we call \_subject-consciousness\_, or mind.  
The object-consciousness follows one set of laws, the laws of matter and space, as propounded in Mathematics, Natural Philosophy, and so on. The subject-consciousness follows a different set of laws, such as the laws of pleasure and pain, and the association of ideas, treated of in Psychology. We are conscious objectively, in counting the stars, we are conscious subjectively, in feeling oppressed by their number.](56441.docx#chunk3448)

[The subject-consciousness comprises all our feelings and thoughts; it enters into volition; and it makes a part of sensation, in which both attitudes are conjoined. This {227} consciousness may be faint and limited, or it may be intense and variegated. We may be in a state of pleasure with little or nothing of thought accompanying; we are still properly said to be conscious or under consciousness. But we may add to the mere fact of pleasure, the \_cognition of the state\_, as a state of pleasure, and as a state belonging to us at the time. This is not the same thing as before: it is something new superposed upon the previous consciousness. When we take note of the fact that we are pleased, we proceed beyond the bare experience of the present pleasure, to an intellectual act of comparison, assimilation, or classification with past pleasures; we probably introduce the machinery of language to express ourselves as pleased; all this is so much \_extra\_ consciousness. These knowing operations are not involved in mere feeling; we may feel without them. Indeed, if the cognitive powers are brought into very active exercise upon our feelings, as in the self-dissection of the Psychologist, the feelings themselves are apt to subside.  
It is thus correct to draw a line between feeling, and knowing that we feel; although there is great delicacy in the operation. It may be said, in one sense, that we cannot feel without knowing that we feel, but the assertion is verging on error; for feeling may be accompanied with a minimum of cognitive energy, or as good as none at all; or it may be accompanied with an express application of our knowing powers, which is purely optional on our part, and even hostile to the full development of the feeling as feeling, as pleasure or pain.  
Reid wanted a name to express the act of scrutinizing or examining the mind, and to correspond with such names as Perception, Observation, for the study of the extended or object universe. He used Consciousness for this purpose; a word that had been probably more applied to our cognitive energies than to our experience of mere feeling in its simplest manifestation. It is not often that "consciousness" is employed as the popular designation of states of feeling as such, states of marked enjoyment or suffering. On the other hand, the word is frequently made use of to designate the act of cognizing or {228} thinking of our states of feeling; for which, however, self-consciousness is undoubtedly the more proper appellative.  
Hamilton terms "consciousness" a "condition" of our feelings and mental operations; more correctly it is the operations themselves; the consciousness is not the condition of the feeling, but the feeling itself. More material is the opinion, held by Hamilton in common with most of the German philosophers, that the foundation of all consciousness is knowing; that we feel, only as we know that we feel. He says, "It is evident that every mental phenomenon is either an act of knowledge, or only possible through an act of knowledge: for \_consciousness is a knowledge--a phenomenon of cognition\_." ("Metaphysics," Lect xi.) Now although we may not be able to rebut this singular assertion by pointing to a state of feeling such as to entirely exclude knowledge, we may ask, do the two properties, said to be thus implicated, rise and fall in steady concomitance; the more the knowledge, the greater the feeling? The answer must be negative. A favourite doctrine of Hamilton, containing a certain amount of truth, affirms an inverse ratio between knowing and feeling; which it is difficult to reconcile with the present doctrine. A new distinction must be laid down between the kind of knowing that constitutes "feeling," and the kind of knowing that constitutes "knowing" in the strict sense of knowledge. We may concede to Hamilton that feeling must always be within reach of a cognitive exertion, but it cannot be conceded that an actual cognitive exertion is essential to the manifestation of the feeling. Such exertion unless kept within narrow limits of intensity cools down instead of promoting the emotional state.  
The facts of the case appear to be best represented, by allowing the state of Feeling to stand on its own independent foundation as a mode of the subject-consciousness, or of mind. There may, and almost always does, go along with it a certain degree of cognitive effort. We can scarcely be under feeling, without performing some function of an intellectual kind; the divisions of the mental energies do not imply that they can exist in absolute separation. The act of discriminating the {229} degree of feeling,--of pronouncing a pleasure to be greater than, or equal to, some other pleasure,--is properly an intellectual, or cognitive exercise; but this discrimination does not make the feeling. So a feeling cannot exist without impressing the memory in some degree, which is an intellectual function; one may truly affirm that we do not feel unless, immediately afterwards, we remember that we felt. It is an incident or concomitant of feeling to leave an impression behind, but this does not characterize or define the state of feeling. Being an accompaniment or concomitant of an emotional excitement, we may point to memory as a proof of its existence and a criterion of its degree, but we should confuse all the boundaries of mental phenomena, if we treated memory or retentiveness otherwise than as an intellectual property, a property whose sphere is intellect and not feeling.--\_B.\_]](56441.docx#chunk3449)

[[Editor's footnote 75: Those psychologists who think that being conscious of a feeling is something different from merely having the feeling, generally give the name Consciousness to the mental act by which we refer the feeling to ourself; or, in other words, regard it in its relation to the series of many feelings, which constitutes our sentient life. Many philosophers have thought that this reference is necessarily involved in the fact of sensation: we cannot, they think, have a feeling, without having the knowledge awakened in us at the same moment, of a Self who feels it. But of this as a primordial fact of our nature, it is impossible to have direct evidence; and a supposition may be made which renders its truth at least questionable. Suppose a being, gifted with sensation but devoid of memory; whose sensations follow one after another, but leave no trace of their existence when they cease. Could this being have any knowledge or notion of a Self? Would he ever say to himself, \_I\_ feel; this sensation is \_mine\_? I think not. The notion of a Self is, I apprehend, a consequence of Memory. There is no meaning in the word Ego or I, unless the I of to-day is also the I of yesterday; a permanent element which abides through a succession of feelings, and connects the feeling of each moment with the remembrance of previous feelings. We have, no {230} doubt, a considerable difficulty in believing that a sentient being can exist without the consciousness of Itself. But this difficulty arises from the irresistible association which we, who possess Memory, form in our early infancy between every one of our feelings and our remembrance of the entire series of feelings of which it forms a part, and consequently between every one of our feelings and our Self. A slight correction, therefore, seems requisite to the doctrine of the author laid down in the present chapter. There is a mental process, over and above the mere having a feeling, to which the word Consciousness is sometimes, and it can hardly be said improperly, applied, viz. the reference of the feeling to our Self. But this process, though separable in thought from the actual feeling, and in all probability not accompanying it in the beginning, is, from a very early period of our existence, inseparably attendant on it, though, like many other mental processes, it often takes place too rapidly to be remembered at the next instant.  
Other thinkers, or perhaps the same thinkers on other occasions, employ the word Consciousness as almost a synonyme of Attention. We all know that we have a power, partly voluntary, though often acting independently of our will, of \_attending\_ (as it is called) to a particular sensation or thought. The essence of Attention is that the sensation or thought is, as it were, magnified, or strengthened: it becomes more intense as a whole, and at the same time more distinct and definite in its various parts, like a visible object when a stronger light is thrown upon it: while all other sensations or thoughts which do or which might present themselves at the same moment are blunted and dimmed, or altogether excluded. This heightening of the feeling we may call, if we please, heightening the consciousness of the feeling; and it may be said that we are made more conscious of the feeling than we were before: but the expression is scarcely correct, for we are not more conscious of the feeling, but are conscious of more feeling.](56441.docx#chunk3450)

[In some cases we are even said to be, by an act of attention, made conscious of a feeling of which we should otherwise have {231} been unconscious: and there is much difference of opinion as to what it is which really occurs in this case. The point has received some consideration in a former Note, but there may be advantage in again recalling it to remembrance. It frequently happens (examples of it are abundant in the Analysis) that certain of our sensations, or certain parts of the series of our thoughts, not being sufficiently pleasurable or painful to compel attention, and there being no motive for attending to them voluntarily, pass off without having been attended to; and, not having received that artificial intensification, they are too slight and too fugitive to be remembered. We often have evidence that these sensations or ideas have been in the mind; because, during their short passage, they have called up other ideas by association. A good example is the case of reading from a book, when we must have perceived and recognized the visible letters and syllables, yet we retain a remembrance only of the sense which they conveyed. In such cases many psychologists think that the impressions have passed through the mind without our being conscious of them. But to have feelings unconsciously, to have had them without being aware, is something like a contradiction. All we really know is that we do not remember having had them; whence we reasonably conclude that if we had them, we did not attend to them; and this inattention to our feelings is what seems to be here meant by being unconscious of them. Either we had the sensations or other feelings without attending to them, and therefore immediately forgot them, or we never, in reality, had them. This last has been the opinion of some of the profoundest psychologists. Even in cases in which it is certain that we once had these feelings, and had them with a lively consciousness (as of the letters and syllables when we were only learning to read) yet when through numberless repetitions the process has become so rapid that we no longer remember having those visual sensations, these philosophers think that they are elided,--that we cease to have them at all. The usual impressions are made on our organs by the written characters, and are transmitted to the brain, but these organic states, {232} they think, pass away without having had time to excite the sensations corresponding to them, the chain of association being kept up by the organic states without need of the sensations. This was apparently the opinion of Hartley; and is distinctly that of Mr. Herbert Spencer. The conflicting suppositions are both consistent with the known facts of our mental nature. Which of them is the true, our present knowledge does not, I think, enable us to decide.  
The author of the Analysis often insists on the important doctrine that we have many feelings, both of the physical and of the mental class, which, either because they are permanent and unchangeable, or for the contrary reason, that they are extremely fugitive and evanescent, and are at the same time uninteresting to us except for the mental processes they originate, we form the habit of not attending to; and this habit, after a time, grows into an incapacity; we become unable to attend to them, even if we wish. In such cases we are usually not aware that we have had the feelings; yet the author seems to be of opinion that we really have them. He says, for example, in the section on Muscular Sensations (ch. i. sect. vii.) "We know that the air is continually pressing upon our bodies. But the sensation being continual, without any call to attend to it, we lose from habit, the power of doing so. The sensation is as if it did not exist." Is it not the most reasonable supposition that the sensation does not exist; that the necessary condition of sensation is change; that an unchanging sensation, instead of becoming latent, dwindles in intensity, until it dies away, and ceases to be a sensation? Mr. Bain expresses this mental law by saying, that a necessary condition of Consciousness is change; that we are conscious only of changes of state. I apprehend that change is necessary to consciousness of feeling, only because it is necessary to feeling: when there is no change, there is, not a permanent feeling of which we are unconscious, but no feeling at all.  
In the concluding chapter of Mr. Bain's great work, there is an enumeration of the various senses in which the word Consciousness is used. He finds them no fewer than thirteen.--\_Ed.\_]  
  
  
  
{233} CHAPTER VI.  
CONCEPTION.  
  
"The generalizations of language are already made for us, before we have ourselves begun to generalize; and our mind receives the abstract phrases without any definite analysis, almost as readily as it receives and adopts the simple names of persons and things. The separate co-existing phenomena, and the separate sequences of a long succession of words, which it has been found convenient to comprehend in a single word, are hence, from the constant use of that single word, regarded by the mind almost in the same manner, as if they were only one phenomenon, or one event."--\_Inquiry into the Relation of Cause and Effect\_. \_By Thomas Brown, M.D.\_ Note M, p. 567.  
THE philosophers, who erected CONSCIOUSNESS into what they called a Power of the mind, have bestowed the same rank upon CONCEPTION.](56441.docx#chunk3451)

[When we have a Sensation, we are not said, in the ordinary use of the word, to Conceive. If burned with the candle, I do not say, "I conceive the pain;" I do not say, if I smelt putrescence, that "I conceive the stench." It even seems to be not without a sort of impropriety, if the term is ever applied to mark a simple Idea. We should not, in ordinary language, say, "I conceive red," "I conceive green." We say, however, "I conceive a horse," "I conceive a tree,"; I conceive a ship;" we say also, "I conceive an {234} argument," "I conceive a plan." In these examples, which may be taken as a sufficient specimen of the manner in which the term Conception is used, we see that it is applied exclusively to cases of the secondary feelings; to the Idea, not the Sensation; and to the case of compound, not of single ideas. With this use, the etymology of the word very accurately corresponds: I conceive, that is, \_I take together\_, a horse; that is, the several ideas, combined under the name horse, and constituting a compound idea. The term conception, we have seen, applies not only to those combinations of ideas, which we call the ideas of external objects, but to those combinations which the mind makes for its own purposes.  
It thus appears, that the word CONCEPTION is a \_generical\_ name, like CONSCIOUSNESS; but less comprehensive. We call ourselves conscious, when we have any sensation, or any idea. We say that we conceive, only when we have some complex idea. It remains to be inquired, whether by saying we conceive, or have a conception, we mean any thing whatsoever beside having an idea.  
If I say, I have the idea of a horse, I can explain distinctly what I mean. I have the ideas of the sensations of sight, of touch, of hearing, of smelling, with which the body and actions of a horse have impressed me; these ideas, all combined, and so closely, that their existence appears simultaneous, and one. This is my IDEA of a horse. If I say, I have a CONCEPTION of a horse, and am asked to explain what I mean, I give the same account exactly, and I can give no other. My CONCEPTION of the horse, is merely my taking together, in one, the simple ideas of the {235} sensations which constitute my knowledge of the horse; and my IDEA of the horse is the same thing.  
We may notice here, however, one of those curious illusions, which the intimate associations of ideas with words, so often, and sometimes so inconveniently, occasion. The term "I conceive," has the form of an active verb; and with \_the form of an active verb\_ THE IDEA OF ACTION is so frequently conjoined, that we are rarely able to separate them. By this means, the idea of activeness is often mixed up with other ideas, when it is wholly misplaced and illusive. I use the same form of expression when I say, I dream; as when I say, I study, I argue, I imagine. In these cases the idea of what I call activity is properly included: in the expression I dream, it is not properly included; though the active form of the verb so invariably calls up a certain idea of activity, and so strongly tends to mix it with the other ideas, that in using the term, "I dream," we seem to consider ourselves as, somehow, agents. Even in using the term, "I die," we cannot escape the illusion; though the ideas are so highly incongruous. It would be obviously absurd to affirm that we are less active when we say we have an idea, than when we say we have a conception, yet there is constantly a feeling, when we use the phrase "I conceive," as if we were in some manner active; and no such feeling, when we use the phrase "I have an idea." The terms, therefore, the concrete "conceive," and its abstract "conception," are somewhat inconvenient, and misguiding, as they infuse into the complex ideas to which they are applied, an ingredient which does not belong to them.  
The relation which the words, CONSCIOUSNESS, and {236} CONCEPTION, bear to one another, is now, therefore, apparent. Consciousness is the more \_generical\_ of the two names. Conception is the name of a class \_included under\_ the name Consciousness. Consciousness applies to sensations, and to ideas, whether simple or complex; to all the feelings, whatsoever they may be, of our sentient nature. Conception applies only to ideas; and to ideas, only in a state of combination. It is a generical name including the several classes of complex ideas.[76]](56441.docx#chunk3452)

[[Editor's footnote 76: The doctrine of this chapter is as just as it is admirably stated. A conception is nothing whatever but a complex idea, and to conceive is to have a complex idea. But as there must always have been some cause why a second name is used when there is already a first, there is generally some difference in the occasions of their employment: and a recognition of this difference is necessary to the completeness of the exposition. It seems to me that conception and to conceive are phrases appropriated to the case in which the thing conceived is supposed to be something external to my own mind. I am not said to conceive my own thoughts; unless it be in the ease of an invention, or mental creation; and even then, to conceive it, means to imagine it realized, so that it may be presented to myself or others as an external object. To conceive something is to understand what it is; to adapt my complex idea to something presented to me objectively. I am asked to conceive an iceberg: it is not enough that I form to myself some complex idea; it must be a complex idea which shall really resemble an iceberg, \_i.e.\_, what is called an iceberg by other people. My complex idea must be made up of the elements in my mind which correspond to the elements making up the idea of an iceberg in theirs.  
This is connected with one of the most powerful and misleading of the illusions of general language. The purposes of general names would not be answered, unless the complex idea {237} connected with a general name in one person's mind were composed of essentially the same elements as the idea connected with it in the mind of another. There hence arises a natural illusion, making us feel as if, instead of ideas as numerous as minds, and merely resembling one another, there were one idea, independent of individual minds, and to which it is the business of each to learn to make his private idea correspond. This is the Platonic doctrine of Ideas in all its purity: and as half the speculative world are Platonists without knowing it, hence it also is that in the writings of so many psychologists we read of the conception or the concept of so and so; as if there was a concept of a thing or of a class of things, other than the ideas in individual minds--a concept belonging to everybody, the common inheritance of the human race, but independent of any of the particular minds which conceive it. In reality, however, this common concept is but the sum of the elements which it is requisite for the purposes of discourse that people should agree with one another in including in the complex idea which they associate with a class name. As we shall presently see, these are only a part, and often but a small part, of each person's complex idea, but they are the part which it is necessary should be the same in all.--\_Ed.\_]  
  
  
  
{238} CHAPTER VII.  
IMAGINATION.  
  
THE IMAGINATION is another term, the explanation of which will be found to be included in the expositions which have previously been given.  
The phenomena classed under this title are explained, by modern Philosophers, on the principles of Association. Their accounts of the mental process, to which the name Imagination is applied, include their explanation of the laws of Association, or the manner in which ideas succeed one another in a train, with little else, except remarks on the causes to which diversity in the several kinds of Imagination may be traced.  
It is not to be overlooked that the term IMAGINATION is here used in the sense which is given to it by philosophers when they rank it as a particular power of the mind; for it is no doubt true, that it is often used, in vulgar speech, as synonymous with Conception, and with Supposition, and with Conjecture; as the verb, to imagine, is, with the verbs, to discover, to suppose, conjecture, believe, and perhaps others.  
We have seen that Consciousness, and Conception, are names of feelings, \_taken one by one\_: Consciousness {239} of \_any\_ of our feelings so taken; Conception of a \_particular class\_ of them, namely, complex ideas. IMAGINATION is not a name of any one idea. I am not said to imagine, unless I combine ideas successively in a less or greater number. An imagination, therefore, is the name of a \_train\_. I am said to have an imagination when I have a train of ideas; and when I am said to imagine, I have the same thing; nor is there any train of ideas, to which the term imagination may not be applied.  
In this comprehensive meaning of the word Imagination, there is no man who has not Imagination, and no man who has it not in an equal degree with any other. Every man imagines, nay, is constantly, and unavoidably, imagining. He cannot help imagining. He can no more stop the current of his ideas, than he can stop the current of his blood.  
In the phrase we have just employed, "there is no man who has not imagination," it is meant, that there is no man who now has not, who has not always had, and who will not always have a train of ideas. Imagination, therefore, is a word connoting \_indefinite time\_; it is, to use the language of the Greek grammarians, aoristical. When it connotes, which by the strain of the passage it may be made to do, a \_particular time\_, it marks a \_particular train\_. When it connotes \_time indefinitely\_, it marks \_trains indefinitely\_, any train at any time.](56441.docx#chunk3453)

[The having or doing a thing at any time, means the potentiality of having or doing it. Imagination, then, has two meanings. It means either some one train, or the potentiality of a train. These are two meanings which it is very necessary not to confound.  
{240} There is great diversity of trains. Not only has the same individual an endless variety of trains; but a different character belongs to the whole series of trains which pass through the minds of different individuals or classes of individuals. The different pursuits in which the several classes of men are engaged, render particular trains of ideas more common to them than other trains. One man is a merchant; and trains respecting the goods in which he deals, the markets in which he buys, and those in which he sells, are habitual in his mind. Another man is a lawyer, and ideas of clients, and fees, and judges, and witnesses, and legal instruments, and points of contestation, and the practice of his court, are habitually passing in his mind. Ideas of another kind occupy the mind of the physician; of another kind still, the mind of the warrior. The statesman is occupied with a train different from that of any of the classes that have been mentioned; and one statesman with a very different train from another, according as his mind is running upon expedients which may serve the purpose of the day, or arrangements which may secure the happiness of the population from generation to generation. A peculiar character belongs to the train which habitually occupies the mind of the mathematician. The mind of the metaphysician is also occupied by a train distinguished from that of other classes. And there is one man, yet to be mentioned, the poet, the peculiarity of whose trains has been a subject of particular observation. To such a degree, indeed, have the trains of the poet been singled out for distinction, that the word Imagination, in a more restricted sense, is appropriated to them. We do not {241} call the trains of the lawyer, or the trains of the merchant, imagination. We do not speak of them as imagining, when they are revolving, each, the ideas which belong to his peculiar occupation; it is only to the poet, that the epithet of imagining is applied. His trains, or trains analogous to his, are those which receive the name of Imagination.  
It is then a question, to which we should find an answer, whether, in that by which the trains of the poet differ from the trains of other men, there be any thing which, being wholly absent from that by which the trains of other classes are distinguished, lays a foundation for this peculiarity of naming.](56441.docx#chunk3454)

[The trains of one class differ from those of another, the trains of the merchant, for example, from those of the lawyer, not in this, that the ideas follow one an other by any other law, in the mind of the one, and the mind of the other; they follow by the same laws exactly; and are equally composed of ideas, mixed indeed with sensations, in the minds of both. The difference consists in this, that the ideas which flow in their minds, and compose their trains, are ideas of different things. The ideas of the lawyer are ideas of the legal provisions, forms, and distinctions, and of the actions, bodily, and mental, about which he is conversant. The ideas of the merchant are equally ideas of the objects and operations, about which he is concerned, and the ends toward which his actions are directed; but the objects and operations themselves, are remarkably different. The trains of poets, also, do not differ from the trains of other men, but perfectly agree with them, in this, that they are composed of ideas, and that those ideas succeed one another, {242} according to the same laws, in their, and in other minds. They are ideas, however, of very different things. The ideas of the poet are ideas of all that is most lovely and striking in the visible appearances of nature, and of all that is most interesting in the actions and affections of human beings. It thus, however, appears most manifestly, that the trains of poets differ from those of other men in no other way, than those of other men differ from one another; that they differ from them by this only, that the ideas of which they are composed, are ideas of different things. There is also nothing surprising in this, that, being trains of pleasurable ideas, they should have attracted a peculiar degree of attention; and in an early age, when poetry was the only literature, should have been thought worthy of a more particular naming, than the trains of any other class. These reasons seem to account for a sort of appropriation of the name Imagination, to the trains of the poet. An additional reason may be seen in another circumstance, which also affords an interesting illustration of a law of association already propounded; namely, the obscuration of the antecedent part of a train, which leads to a subsequent, more interesting than itself. In the case of the lawyer, the train leads to a decision favourable to the side which he advocates. The train has nothing pleasurable in itself. The pleasure is all derived from the end. The same is the case with the merchant. His trains are directed to a particular end. And it is the end alone, which gives a value to the train. The end of the metaphysical, and the end of the mathematical inquirer, is the discovery of truth: {243} their trains are directed to that object; and are, or are not, a source of pleasure, as that end is or is not attained. But the case is perfectly different with the poet. His train is its own end. It is all delightful, or the purpose is frustrate. From the established laws of association, this consequence unavoidably followed; that, in the case of the trains of those other classes, the interest of which was concentrated in the end, attention was withdrawn from the train by being fixed upon the end; that in the case of the poet, on the other hand, the train itself being the only object, and that pleasurable, the attention was wholly fixed upon the train; that hence the train of the poet was provided with a name; that in the cases of the trains of other men, where the end only was interesting, it was thought enough that the end itself should be named, the train was neglected.  
In conformity with this observation, we find, that wherever there is a train which leads to nothing beyond itself, and has any pretension to the character of pleasurable (the various kinds of reverie, for example), it is allowed the name of Imagination. Thus we say that Rousseau indulged his imagination, when, as he himself describes it, lying on his back, in his boat, on the little lake of Bienne, he delivered himself up for hours to trains, of which, he says, the pleasure surpassed every other enjoyment.  
Professor Dugald Stewart has given to the word Imagination, a technical meaning; without, as it appears to me, any corresponding advantage. He confines it to the cases in which the mind forms new combinations; or, as he calls them, creations; that is, {244} to cases in which the ideas which compose the train do not come together in the same combinations in which sensations had ever been received. But this is no specific difference. This happens, in every train of any considerable length, whether directed to any end, or not so directed. It is implied in every wish of the child to fly, or to jump over the house; in a large proportion of all his playful expressions, as puss in boots, a hog in armour, a monkey preaching, and so on. It is manifested in perfection in every dream. It is well known that, for the discovery of truths in philosophy, there is a demand for new trains of thought, multitudes of which pass in review before the mind, are contemplated, and rejected, before the happy combination is attained, in which the discovery is involved. If imagination consists in bringing trains before the mind involving a number of new combinations, imagination is probably more the occupation of the philosopher than of the poet.](56441.docx#chunk3455)

[Mr. Stewart appears not to have understood the real distinction between the use of the words Conception, and Imagination; that the one is the name of a single idea, the other that of a train. He also involves, without seeming to be wholly aware of it, the idea of a train destined to a particular end in the meaning which he bestows on the word Imagination. Imagination is with him, not the name of a train having merely new combinations, but of a train having new combinations, and those destined to some end. But this is not more the character of the trains which belong to the painter and the poet, as his language appears to imply, than it is of the lawyer, or the metaphysician; or, indeed, the professors of many {245} of the vulgar arts; the tailor, for example, and the mantua-maker.[77]  
[Bain's footnote 77: The foregoing analysis of the Imagination brings to view some of the important points of distinction between it and the other faculties; for example, the circumstance that the trains and constructions of the Imagination are their own ends, and not a means to farther ends, as in the constructions of science and of the industrial arts. All creative originality is not imagination; the steam-engine was not a product of this faculty.  
The main features that distinguish the Imagination seem to be these three:--  
1. It is a faculty of the CONCRETE, like Perception and Memory, and not of the Abstract, as the scientific faculties. When we imagine a thing, we picture it to the mind, as far as we are able, in its full concrete reality. Our imagination of a scene in the tropics is of the character of an actual perception; it embraces, or should embrace, whatever would strike the view of any one surveying the reality.  
2. Imagination rises above Perception and Memory, in being a CONSTRUCTIVE faculty. It alters, re-arranges, puts together the materials of perception and memory to satisfy certain demands of the mind. In this respect, it is more than Conception, which as viewed by the author, is also a faculty of the concrete, but introduces no novelty of combination. Conception may involve a great constructive effort, as when we try to picture to ourselves a poet's creation by the help of his language; nevertheless, the term imagination loses its characteristic force, and leaves an important meaning without a name, if applied to this conceiving or realizing effort. The imaginative stretch belongs to the poet or artist; the power of conceiving is what the reader of a poem brings into exercise.  
3. Imagination is swayed by some PRESENT EMOTION. This is another way of expressing the author's view that it is an end in itself. If we were to use the general word "feeling," we should encounter the difficulty of separating imagination {246} from common industry, which is all intended to gain pleasures or ward off pains.  
The brief designation "present emotion" approximates to, but does not fully bring out, the precise operation of the feelings in the constructions of Imagination. When, actuated by the love of the marvellous, any one invents a fabulous story, or highly exaggerates a real occurrence, the process is a typical instance of the imaginative workings.  
The Fine Arts are the domain of Imagination; the one goes far to specify the other. If the coincidence were exact, Imagination would be defined by a definition of the AEsthetic emotions. Now, although any original construction, selected and put together to gratify an AEsthetic emotion, is a work of Imagination, yet imagination is not exhausted by fine art. The picture that an angry man draws of his enemy would be called an effort of imagination, but not a work of fine art. All our emotions,--Wonder, Fear, Love, Anger, Vanity--determine the constructions of the intellect, when called into active exercise; and for these constructions we have no other name but imagination, whether they may, or may not give pleasure as works of art.  
Perhaps this exceptional region may be marked out by a statement of the perverting influence, or bias, of the feelings in matters of truth and falsehood, or in works of utility. When the true and the useful, instead of being determined by their own ends, or their proper criteria, are swayed by extraneous emotions--giving birth to mythical or fictitious creations--we have the corrupting substitution of Imagination for Reason in men's judgments and opinions.  
Thus, Fear is a potent spur to Imagination; its creations may not be aesthetically agreeable, and therefore may not come under the definition of Fine Art; yet they are fairly to be described as perverting the judgment of true and false.--\_B.\_]  
  
  
  
{247} CHAPTER VIII.  
CLASSIFICATION.  
  
"Dans l'ordre historique, la philosophie transcendante a devance la philosophie elementaire. Il ne faut point s'en etonner; les grands problemes de la metaphysique et de la morale se presentent a l'homme, dans l'enfance meme de son intelligence, avec une grandeur et une obscurite qui le seduisent et qui l'attirent. L'homme, qui se sent fait pour connoitre, court d'abord a la verite avec plus d'ardeur que de sagesse; il cherche a deviner ce qu'il ne peut comprendre, et se perd dans des conjectures absurdes ou temeraires. Les theogonies et les cosmogonies sont anterieures a la saine physique, et l'esprit humain a passe a travers toutes les agitations et les delires de la metaphysique transcendante avant d'arriver a la psychologie."--\_Cousin\_, \_Frag. Philos.\_ p. 75.](56441.docx#chunk3456)

[THE process by which we connect what we call the objects of our senses, and also our ideas, into certain aggregates called classes, is of too much importance not to have attracted the attention of those who have engaged in the study of mind. Yet it is doubtful, whether metaphysicians have regarded CLASSIFICATION as an original power of the mind, or have allowed that what is included under that name might be resolved into simpler elements. The term Abstraction, I think, they have generally taken as the name of a distinct, and original, power, not susceptible of further analysis. But, in doing so, it seems (for the language of writers {248} is too loose on this subject, to allow us the use of more affirmative terms), they have restricted the name to the power of forming such ideas as are represented by the terms, hardness, softness, length, breadth, space, and so on. And this operation they rather consider as subservient to classification, than as that operation itself. The process, however, of grouping individuals into classes, has been regarded as sufficiently mysterious. The nature of it has been the object of deep curiosity; and the erroneous opinions which were entertained of it bewildered, for many ages, the most eminent philosophers; and enfeebled the human mind.  
What (it was inquired) is that which is really done by the mind, when it forms individuals into classes; separates such and such things from others, and regards them, under a certain idea of unity, as some thing by themselves? Why is the segregation thought of? And for what end is it made? These questions all received answers; but it was many ages before they received an answer approaching the truth; and it is only necessary to read with care the writings of Plato and of Aristotle, and of all philosophers, with very few exceptions, from theirs to the present time, to see, that a misunderstanding of the nature of General Terms is that which chiefly perplexed them in their inquiries, and involved them in a confusion, which was inextricable, so long as those terms were unexplained.  
The process in forming those classes was said to be this. The Mind leaves out of its view this, and that, and the other thing, in which individuals differ from one another; and retaining only those in which they all agree, it forms them into a class. But what is {249} this forming of a class? What does it mean? When I form a material aggregate; when I collect a library; when I build a house; when I even raise a heap of stones; I move the things, whatever they may be, and place them, either regularly or irregularly, in a mass together. But when I form a class, I perform no operation of this sort. I touch not, nor do I in any way whatsoever act upon the individuals which I class. The proceeding is all mental. Forming a class of individuals, is a mode of regarding them. But what is meant by a mode of regarding things? This is mysterious; and is as mysteriously explained, when it is said to be the taking into view the particulars in which individuals agree. For what is there, which it is possible for the mind to take into view, in that in which individuals agree? Every colour is an individual colour, every size is an individual size, every shape is an individual shape. But things have no individual colour in common, no individual shape in common, no individual size in common; that is to say, they have neither shape, colour, nor size in common. What, then, is it which they have in common, which the mind can take into view? Those who affirmed that it was something, could by no means tell. They substituted words for things; using vague and mystical phrases, which, when examined, meant nothing. Plato called it [Greek: i)de/a], Aristotle, [Greek: ei)=dos], both, words taken from the verb to see; intimating, something as it were seen, or viewed, as we call it. At bottom, Aristotle's [Greek: ei)=dos], is the same with Plato's [Greek: i)de/a], though Aristotle makes a great affair of some very trifling differences, which he creates and sets up between them. The Latins, translated both [Greek: i)de/a], and {250} [Greek: ei)=dos], by the same words, and were very much at a loss for one to answer the purpose; they used \_species\_, derived in like manner from a verb to see, but which, having other meanings, was ill adapted for a scientific word; they brought, therefore, another word in aid, \_forma\_, the same with [Greek: o(/rama], derived equally from a verb signifying to see, which suited the purpose just as imperfectly as \_species\_; and as writers used both terms, according as the one or the other appeared best to correspond with their meaning, they thickened by this means the confusion.](56441.docx#chunk3457)

[After a time, unfortunately a long time, it began to be perceived, that what was thus represented as the object of the mind in the formation of classes, was chimerical and absurd; when a set of inquirers appeared, who denied the existence of all such objects, affirmed that ideas were all individual, and that nothing was general but names. The question rose to the dignity of a controversy; and to the hateful violence of a religious controversy. They who affirmed the existence of general ideas were called Realists, they who denied their existence Nominalists. There can be no doubt, that of the two the Nominalists approached, by far, the nearest to the truth; and their speculations tended strongly to remove from mental science the confusion in which the total misapprehension of abstract terms had involved it. But the clergy brought religion into the quarrel, and as usual on the wrong side. Realism was preached as the doctrine which alone was consistent with orthodoxy; the Nominalists were hunted down; and persecution, well knowing her object, clung to the books as well as the men; so that the books of the Nominalists, {251} though the art of printing tended strongly to preserve them, were suppressed and destroyed, to such a degree, that it is now exceedingly difficult to collect them; and not easy to obtain copies even of the most remarkable.  
The opinion, that the particulars in which the individuals of a class agree were distinct Objects of the Mind, soon made them distinct EXISTENCES; they were the Essence of things; the Eternal Exemplars, according to which individual things were made; they were called UNIVERSALS, and regarded as alone the Objects of the Intellect. They were invariable, always the same; individuals, not the objects of intellect but only the low objects of sense, were in perpetual flux, and never, for any considerable period, the same. Universals alone have Unity; they alone were the subject of science; Individuals were innumerable, every one different from another; and cognoscible only by the lower, the sensitive part of our nature.  
Endless were the subtleties into which ingenious men were misled, in the contemplation of those Fictions; and wonderful were the attributes which they bestowed upon them. "It is, then, on these \_permanent\_ Phantasms," says Mr. Harris, copying the ancient Philosophers, "that the human mind first works, and by an energy as spontaneous and familiar to its nature, as the seeing of colour is familiar to the eye, it discerns at once what in MANY is ONE; what in things DISSIMILAR and DIFFERENT is SIMILAR and the SAME. By this it comes to behold a kind of \_superior\_ Objects; a new Race of Perceptions, more comprehensive than those of sense; a Race of Perceptions, \_each one of which, may be found entire and whole in the separate\_ {252} \_individuals of an infinite and fleeting multitude, without departing from the unity and permanence of its own nature\_."[8\*] Here we have something sufficiently mystical; a thing which is, at once, ONE, and MANY; which is ONE, it seems, by its very nature, and yet may exist, entire and whole, in the separate individuals of an infinite MULTITUDE. This is a specimen of their Doctrine; a specimen of what they call THE SUBLIME in Intellection.  
[Mill's footnote 8: Hermes, b. iii. ch. 4.]  
But this is not all. For as, when we form a minor class, as \_man\_, there is a certain ONE, the object of intellect, complete in every individual; MANY, therefore, and at the same time, ONE; so when we form a larger class, \_animal\_, there is a certain ONE, the object of intellect, complete in every one of those individuals. And when we go still higher, as to the grand class, BODY, there is always a ONE, the object of intellect, complete in every one of those more numerous individuals. When we mount up to the very summit, and embrace all things in one class, BEING, there is in like manner a ONE, the object of intellect, complete in every individual that exists. This is the grand ONE; the ONE pre-eminently. This is \_the\_ ONE; [Greek: to/ e(/n]; ONENESS; ONE in the abstract. This was a conception deemed truly SUBLIME. The loftiest epithets were bestowed upon [Greek: to/ e(/n], \_the\_ ONE. It was DIVINE; it was more than that; for being not concrete, but abstract, it was DIVINITY. All things were contained in \_the\_ ONE; and \_the\_ ONE was in all things. \_The\_ ONE was the source and principle of Being. It was immutable, eternal.  
{253} These ONES they also called by the names of \_Internal Forms\_, and \_Intelligible Forms\_. Thus Harris: "Let us suppose any man to look for the first time upon \_some Work of Art\_; as, for example, upon a Clock; and, having sufficiently viewed it, at length to depart. Would he not retain, when absent, an Idea of what he had seen? And what is it, \_to retain such Idea\_? \_It is to have\_ A FORM INTERNAL \_correspondent to\_ THE EXTERNAL; only with this difference, that the \_Internal Form is devoid of the Matter; the External is united with it\_, being seen in the metal, the wood, and the like. Now, if we suppose this Spectator to view \_many such Machines\_, and not simply to view, but to consider every part of them, so as to comprehend how those parts all operate to one End, he might be then said to possess a kind of INTELLIGIBLE FORM, by which he would not only understand and know the clocks, which he had seen \_already\_, but every Work, also, of like Sort, which he might see \_hereafter\_."](56441.docx#chunk3458)

[We might here remark upon the mystical jargon, which is thus employed to obscure the simple fact, that after a man has seen an individual of a particular kind he has the idea of that individual; and after he has seen various individuals of the same kind, he has ideas of the various individuals, and has them combined by association. But we must hear Mr. Harris a little further.  
After telling us that there are two orders of these \_immutable\_ INTELLIGIBLE FORMS; \_one\_ belonging to the Contemplator of objects, and subsequent to their existence; \_another\_ belonging to the Maker of them, being the archetype, according to which they were formed; he thus proceeds: "The WHOLE VISIBLE {254} WORLD, exhibits nothing more than so many passing pictures of these IMMUTABLE ARCHETYPES. Nay, through these it attains even a Semblance of Immortality, and continues throughout ages to be SPECIFICALLY ONE, amid those infinite particular changes, that befall it every moment. May we be allowed then to credit those speculative men, who tell us, \_it is in these permanent and comprehensive\_ FORMS \_that the\_ DEITY \_views at once, without looking abroad, all possible productions both present, past, and future; that this great and stupendous view is but a view of himself, where all things lie enveloped in their Principles and Exemplars, as being essential to the fulness of this universal Intellection\_?"  
I shall exhibit but one other specimen of the mode of speculating about these imaginary Beings, from another great master of the ancient philosophy, Cudworth. Both Aristotle and Plato, he says, "acknowledged two sorts of Entities, the one mutable, or subject to flux and motion, such as are especially individual corporeal things; the other immutable, that always rest or stand still, which are the proper objects of certain, constant, and immutable knowledge, that therefore cannot be mere nothings, non-entities.  
"Which latter kind of being, that is, the immutable essence, as a distinct thing from individual sensibles, Aristotle plainly asserts against Heraclitus, and those other flowing philosophers in these words: 'We would have these philosophers to know, that besides sensible things that are always mutable, there is another kind of being or entity of such things as are neither subject to motion, corruption, nor generation.' And elsewhere he tells us, that this immovable essence {255} is the object of theoretical knowledge, of the first philosophy, and of the pure mathematics.  
"Now these immutable entities are the universal \_rationes\_, or intelligible natures and essences of all things, which some compare to unities, but Aristotle to numbers; which formally considered, are indivisible: saith he, 'The essences of things are like to numbers;' because if but the least thing be added to any number, or subtracted from it, the number is destroyed.  
"And these are the objects of all certain knowledge. As for example, the objects of geometry are not any individual material triangles, squares, circles, pyramids, cubes, spheres, and the like; which because they are always mutable, nothing can be immutably affirmed of them; but they are those indivisible and unchangeable \_rationes\_ of a triangle, square, circle; which are ever the same to all geometricians, in all ages and places, of which such immutable theorems as these are demonstrated, as that a triangle has necessarily three angles equal to two right angles.  
"But if any one demand here, where this [Greek: a)ki/netos ou)si/a], these immutable entities do exist? I answer, first, that as they are considered formally, they do not properly exist in the individuals without us, as if they were from them imprinted upon the understanding, which some have taken to be Aristotle's opinion; because no individual material thing is either universal or immutable. And if these things were only lodged in the individual sensibles, then they would be unavoidably obnoxious to the fluctuating waves of the same reciprocating Euripus, in which all individual material things are perpetually whirled. But because {256} they perish not together with them, it is a certain argument that they exist independently upon them. Neither in the next place, do they exist somewhere else apart from the individual sensibles, and without the mind, which is that opinion that Aristotle justly condemns, but either unjustly or unskilfully attributes to Plato. For if the mind looked abroad for its objects wholly without itself, then all its knowledge would be nothing but sense and passion. For to know a thing is nothing else but to comprehend it by some inward ideas that are domestic to the mind, and actively exerted from it. Wherefore these intelligible ideas or essences of things, those forms by which we understand all things, exist no where but in the mind itself; for it was very well determined long ago by Socrates, in Plato's Parmenides, that these things are nothing but \_noemata\_: these species or ideas are all of them nothing but \_noemata\_, or notions that exist no where but in the soul itself.' Wherefore, to say that there are immutable natures and essences, and \*\_rationes\_ of things, distinct from the individuals that exist without us, is all one as if one should say, that there is in the universe above the orb of matter and body, another superior orb of intellectual being, that comprehends its own immediate objects, that is, the immutable \_rationes\_ and ideas of things within itself, by which it understands and knows all things without itself.](56441.docx#chunk3459)

["And yet notwithstanding though these things exist only in the mind, they are not therefore mere figments of the understanding: for if the subjects of all scientifical theorems were nothing but figments, then all truth and knowledge that is built upon them would {257} be a mere fictitious thing; and if truth itself, and the intellectual nature be fictitious things, then what can be real or solid in the world? But it is evident, that though the mind thinks of these things at pleasure, yet they are not arbitrarily framed by the mind, but have certain, determinate, and immutable natures of their own, which are independent upon the mind, and which are not blown away into nothing at the pleasure of the same being that arbitrarily made them.  
"But we all naturally conceive that those things have not only an eternal, but also a necessary existence, so that they could not ever but be, such and so many as they are, and can never possibly perish or cease to be, but are absolutely undestroyable.  
"Which is a thing frequently acknowledged in the writings of both those famous philosophers, Plato and Aristotle. The former of them calling those things, 'things that were never made, but always are,' and 'things that were never made, nor can be destroyed.' 'Things ingenerable and unperishable;' \_Quae\_ Plato \_negat gigni sed semper esse\_ (as Tully expresseth it) \_et ratione et intelligentia contineri\_. And Philo the Platonical Jew, calls the [Greek: ta\ Noeta\], which are the same things we speak of, [Greek: a)nagkaio/tatai ou)si/ai], the most necessary essences, that is, such things as could not but be, and cannot possibly not be. And Aristotle himself calls the \_rationes\_ of things in his metaphysics, not only [Greek: chorista\] and [Greek: a)ki/neta], things separate from matter and immutable, but also [Greek: a)i/dia], or eternal; and in his ethics likewise, he calls geometrical truths [Greek: a)i/dia], eternal things, 1. 3, c. 5; 'where he makes the geometrical truth concerning the incommensurability betwixt the {258} diameter and the side of a square, to be an eternal thing.' Elsewhere he tells us, that 'Science, properly so called, is not of things corruptible and contingent,' but of things necessary, incorruptible and eternal. Which immutable and eternal objects of science, in the place before quoted, he described thus: 'Such a kind of entity of things has neither motion nor generation, nor corruption,' that is, such things as were never made, and can never be destroyed. To which, he saith, the mind is necessarily determined. For science or knowledge has nothing either of fiction or of arbitrariness in it, but is 'the comprehension of that which immutably is.'  
"Moreover, these things have a constant being, when our particular created minds do not actually think of them, and therefore they are immutable in another sense likewise, not only because they are indivisibly the same when we think of them, but also because they have a constant and never-failing entity; and always are, whether our particular minds think of them or not. For the intelligible natures and essences of a triangle, square, circle, pyramid, cube, sphere, &c., and all the necessary geometrical verities belonging to these several figures, were not the creatures of Archimedes, Euclid, or Pythagoras, or any other inventors of Geometry; nor did then first begin to be; but all these \_rationes\_ and verities had a real and actual entity before, and would continue still, though all the geometricians in the world were quite extinct, and no man knew them or thought of them. Nay, though all the material world were quite swept away, and also all particular created minds annihilated together with it; yet there is no doubt but the {259} intelligible natures or essences of all geometrical figures, and the necessary verities belonging to them, would notwithstanding remain safe and sound. Wherefore these things had a being also before the material world and all particular intellects were created. For it is not at all conceivable, that ever there was a time when there was no intelligible nature of a triangle, nor any such thing cogitable at all, and when it was not yet actually true that a triangle has three angles equal to two right angles, but that these things were afterward arbitrarily made and brought into being out of an antecedent nothing or non-entity; so that the being of them bore some certain date, and had a youngness in them, and so by the same reason might wax old, and decay again; which notion he often harps upon, when he speaks of the [Greek: Ei)/de], or forms of things, as when he says, 'there is no generation of the essence of a sphere,' that is, it is a thing that is not made; but always is: and elsewhere he pronounces universally of the [Greek: Ei)/de], 'The forms of material things are without generation and corruption,' and 'that none makes the form of any thing, for it is never generated.' Divers have censured Aristotle in some of such passages too much to confound physics and metaphysics together; for indeed these things are not true in a physical, but only in a metaphysical sense. That is, the immediate objects of intellection and science, are eternal, necessarily existent, and incorruptible."[9\*]  
[Mill's footnote 9: "A Treatise concerning Eternal and Immutable Morality. By Ralph Cudworth, D.D."--pp. 241--250.]  
Under the influence of such notions as these, men {260} were led away from the real object of Classification; which remained, till a late period in metaphysical inquiry, not at all understood. Yet the truth appears by no means difficult to find, if we only observe the steps, by which the mind acquires its knowledge, and the exigencies which give occasion to the contrivances to which it resorts.](56441.docx#chunk3460)

[Man first becomes acquainted with individuals. He first names individuals. But individuals are innumerable, and he cannot have innumerable names. He must make one name serve for many individuals. It is thus obvious, and certain, that men were led to class solely for the purpose of economizing in the use of names. Could the processes of naming and discourse have been as conveniently managed by a name for every individual, the names of classes, and the idea of classification, would never have existed. But as the limits of the human memory did not enable men to retain beyond a very limited number of names; and even if it had, as it would have required a most inconvenient portion of time, to run over in discourse, as many names of individuals, and of individual qualities, as there is occasion to refer to in discourse, it was necessary to have contrivances of abridgment; that is, to employ names which marked equally a number of individuals, with all their separate properties; and enabled us to speak of multitudes at once.[78]  
[Editor's footnote 78: The doctrine that "men were led to class solely for the purpose of economizing in the use of names," is here reasserted in the most unqualified terms. The author plainly says that if our memory had been sufficiently vast to contain a name for every individual, the names of classes and the idea of classification would never have existed. Yet how (I am obliged to ask) could we have done without them? We could not have dispensed with names to mark the points in which different individuals resemble one another: and these are class-names. The fact that we require names for the purpose of making affirmations--of predicating qualities--is in some measure recognised by the author, when he says "it would have required a most inconvenient portion of time to run over in discourse as many names of individuals \_and of individual qualities\_ as there is occasion to refer to in discourse." But what is meant by an individual quality? It is not \_individual\_ qualities that we ever have occasion to predicate. It is true that the qualities of an object are only the various ways in which we or other minds are affected by it, and these affections are not the same in different objects, except in the sense in which the word same stands for exact similarity. But we never have occasion to predicate of an object the individual and instantaneous impressions which it produces in us. The only meaning of predicating a quality at all, is to affirm a resemblance. When we ascribe a quality to an object, we intend to assert that the object affects us in a manner similar to that in which we are affected by a known class of objects. A quality, indeed, in the custom of language, does not admit of individuality: it is supposed to be one thing common to many; which, being explained, means that it is the name of a resemblance among our sensations, and not a name of the individual sensations which resemble. Qualities, therefore, cannot be predicated without general names; nor, consequently, without classification. Wherever there is a general name there is a class: classification, and general names, are things exactly coextensive. It thus appears that, without classification, language would not fulfil its most important function. Had we no names but those of individuals, the names might serve as marks to bring those individuals to mind, but would not enable us to make a single assertion respecting them, except that one individual is not another. Not a particle of the knowledge we have of them could be expressed in words.--\_Ed.\_]  
{261} It was impossible that this process should not be involved in obscurity, and liable to great {262} misapprehension, so long as the manner, in which words become significant, was unexplained. After this knowledge was imparted, and pretty generally diffused, the value of it seemed for a long time to be little understood.  
Words become significant purely by association. A word is pronounced in conjunction with an idea; it is pronounced again and again; and, by degrees, the idea and the word become so associated, that the one can never occur without the other. To take first the example of an individual object. The word, St. Paul's, has been so often named in conjunction with the idea of a particular building, that the word, St. Paul's, never occurs without calling up the idea of the building, nor the idea of the building without calling up the name, St. Paul's. The effect of association is similarly exemplified in connecting the visible mark with the audible. Children learn first to speak. They learn next to read. In learning to speak, they associate the audible mark with their sensations and ideas; the sound tree is associated with the sight of the tree, or the idea of the tree. In learning to read, a new association has to be formed. The \_written word\_ is a \_visible\_ sign of the \_audible\_ sign. What reading accomplishes, by degrees, is, to associate the visible sign so closely with the audible, that at the same instant with the sight of the word the sound of it, and with the sound of it the sense, occurs.  
After the explanations which have been already {263} given, no difficulty can remain about the manner in which names come to signify the \_individuals\_ of which they are appointed to be the marks.](56441.docx#chunk3461)

[Let us now, proceeding to the simplest cases first, and by them expounding such as are more complicated, suppose that our name of one individual is applied to another individual. Let us suppose that the word, foot, has been first associated in the mind of the child with one foot only; it will in that case call up the idea of that one, and not of the other. Here is one name, and one thing named. Suppose next, that the same name, foot, begins to be applied to the child's other foot. The sound is now associated not constantly with one thing, but sometimes with one thing, and sometimes with another. The consequence is, that it calls up sometimes the one, and sometimes the other. Here two things, the two feet, are both of them associated with one thing, the name. The one thing, the name, has the power of calling up both, and in rapid succession. The word foot suggests the idea of one of the feet; this foot with its name, is a complex idea; and this complex idea suggests its like, the other foot with its name.  
This is a peculiar and a highly important case of association; but not the less simple and indisputable. We have already sufficiently exemplified the two grand cases of the formation of complex ideas by association;--that in which the ideas of synchronous sensations are so concreted by constant conjunction as to appear, though numerous, only one; of which the ideas of sensible objects, a rose, a plough, a house, a ship, are examples;--and that in which the ideas of successive sensations are so concreted; of which, the idea of a {264} tune in music, the idea of the revolution of a wheel, of a walk, a hunt, a horse-race, are instances.  
It is easy to see wherein the present case agrees with, and wherein it differs from, those familiar cases. The word, man, we shall say, is first applied to an individual; it is first associated with the idea of that individual, and acquires the power of calling up the idea of him; it is next applied to another individual, and acquires the power of calling up the idea of him; so of another, and another, till it has become associated with an indefinite number, and has acquired the power of calling up an indefinite number of those ideas indifferently. What happens? It does call up an indefinite number of the ideas of individuals, as often as it occurs; and calling them up in close connexion, it forms them into a species of complex idea.  
There can be no difficulty in admitting that association does form the ideas of an indefinite number of individuals into one complex idea; because it is an acknowledged fact. Have we not the idea of an army? And is not that precisely the ideas of an indefinite number of men formed into one idea? Have we not the idea of a wood, or a forest; and is not that the idea of an indefinite number of trees formed into one idea? These are instances of the concretion of synchronous ideas. Of the concretion of successive ideas indefinite in number, the idea of a concert is one instance, the idea of a discourse is another, the idea of the life of a man is another, the idea of a year, or of a century, is another, and so on. The idea, which is marked by the term "race of man," is complex in both ways, for it is not only the idea of the present generation, but of all successive generations.  
{265} It is also a fact, that when an idea becomes to a certain degree complex, from the multiplicity of the ideas it comprehends, it is of necessity indistinct. Thus the idea of a figure of one thousand sides is incurably indistinct; the idea of an army is also indistinct; the idea of a forest, or the idea of a mob. And one of the uses of language, is, to enable us, by distinct marks, to speak with distinctness of those combinations of ideas, which, in themselves, are too numerous for distinctness. Thus, by our marks of numbers, we can speak, with the most perfect precision, of a figure not only of a thousand, but of ten thousand sides, and deduce its peculiar properties; though it is as impossible, by the idea, as by the sensations, to distinguish one of a thousand, from one of a thousand and one, sides.  
Thus, when the word man calls up the ideas of an indefinite number of individuals, not only of all those to whom I have individually given the name, but of all those to whom I have in imagination given it or imagine it will ever be given, and forms all those ideas into one,--it is evidently a very complex idea, and, therefore, indistinct; and this indistinctness has, doubtless, been the main cause of the mystery, which has appeared to belong to it. That this, however, is the process, is an inevitable result of the laws of association.  
It thus appears, that the word, \_man\_, is not a word having a very simple idea, as was the opinion of the Realists; nor a word having no idea at all, as was that of the Nominalists; but a word calling up an indefinite number of ideas, by the irresistible laws of association, and forming them into one very {266} complex, and indistinct, but not therefore unintelligible, idea.](56441.docx#chunk3462)

[It is thus to be seen, that appellatives, or general names, are significant, in two modes. We have frequently had occasion to recur to the mode in which the simple ideas of sensation are associated or concreted, so as to form what we call the complex ideas of objects. Thus, I have the complex ideas of this pen, this desk, this room, this man, this handwriting. The simple ideas, so concreted into a complex idea in the case of each individual, are one thing signified by each appellative; and this complex idea of the individual, concreted with another, and another of the same kind, and so on without end, is the other of the things which are signified by it. Thus, the word rose, signifies, first of all, a certain odour, a certain colour, a certain shape, a certain consistence, so associated as to form one idea, that of the individual; next, it signifies this individual associated with another, and another, and another, and so on; in other words, it signifies the class.  
The complexity of the idea, in the latter of the two cases, is distinguished by a peculiarity from that of the former. In applying the name to the odour, and colour, and so on, of the rose, concreted into one idea, the name is not the name of each of the sensations taken singly, only of all taken together. In applying the name to rose, and rose, and rose, without end, the name is at once a name of each of the individuals, and also the name of the complex association which is formed of them. This too, is itself a peculiar association. It is not the association of a name with a number of particulars clustered together {267} as one; but the association of a name with each of an indefinite number of particulars, and all those particulars associated back again with the name.  
This peculiarity may require a little further explanation. It is well known, that between an idea, and the name which stands for it, there is a double association. The name calls up the idea in close association, and the idea calls up the name in equally close association; and this they have a tendency to do in a series of repetitions; the name bringing up the idea, the idea the name, and then the name the idea again, and so on, for any number of times. This is, in great part, the way in which language is learned, as we observe by the repetitions to which children are prone. And this, indeed, is what, in many cases, we mean when we speak of dwelling upon an idea. It is a familiar observation, that no idea dwells in the mind, or can; for it has innumerable associations, and whatever association occurs, of course, displaces that by which it is introduced. But if the idea which thus displaces it, again calls it up, and these two go on calling up one another, that which is the more interesting of the two appears to be that which alone is occupying the attention. This alternation is frequent between the name and the idea.  
Now, then, let the word, man, be supposed, first of all, the name of an individual; it becomes associated with the idea of the individual, and acquires the power of calling up that idea. Let us next suppose it applied to one other individual, and no more: it becomes associated with this other idea; and it now has the power of calling up either. The following is, then, a very natural train:-- 1, The name occurs; 2, the name {268} suggests the idea of one of the individuals; 3, that idea suggests the name back again; 4, the name suggests the idea of the second individual. All this may pass, and, after sufficient repetition, does pass, with the rapidity of lightning. Suppose, now, that the name is associated, with the ideas not of two individuals, but of many; the same train may go on; the name exciting the idea of one individual, that idea the name, the name another individual, and so on, to an indefinite extent; all in that small portion of time of which the mind takes no account. The combination thus formed stands in need of a name. And the name, man, while it is the name of every individual included in the process, is also the name of the whole combination; that is, of a very complex idea.  
One other question, respecting classification, may still seem to require solution; namely, what it is by which we are determined in placing such and such things together in a class in preference to others; what, in other words, is the principle of Classification? I answer, that, as it is for the purpose of naming, of naming with greater facility, that we form classes at all; so it is in furtherance of that same facility that such and such things only are included in one class, such and such in another. Experience teaches what sort of grouping answers the purposes of naming best; under the suggestions of that experience, the application of a general word is tacitly and without much of reflection regulated; and by this process, and no other, it is, that Classification is performed. It is the aggregation of an indefinite number of individuals, by their association with a particular name.](56441.docx#chunk3463)

[It may seem that this answer is still very general {269} and that to make the explanation sufficient, the suggestions by which experience recommends this or that classification should be particularized. For the purpose of the present chapter, however, namely, to shew that the business of Classification is merely a process of naming, and is all resolvable into association, the observation, though general, is full and satisfactory. The detail of the purposes to be answered by general terms belongs more properly to the next head of Discourse, and as far as the development of the mental phenomena seems to require it, will there be presented.  
It may still be useful to advert to the three principal cases into which Classification may be resolved; 1, that of objects considered as synchronical; 2, that of objects considered as successive; 3, that of feelings. The first is exemplified in the common classes of sensible objects, as men, horses, trees, and so on; and requires no further explanation. The second is exemplified in the classes of events, denoted by such words, as Birth, Death, Snowing, Thundering, Freezing, Flying, Creeping. By these words there is always denoted one antecedent and one consequent, generally more, sometimes a long train of them. And it is obvious that each of them is, at once, the name of each instance individually, and of all taken generally together. Thus, Freezing, is not the name of an individual instance of freezing only, but of that and of all other instances of Freezing. The same is the case with other words of a still more general, and thence more obscure signification, as Gravitation, Attraction, Motion, Force, &c. which words have this additional source of confusion, that they are {270} ambiguous, being both abstract and concrete. When we say that there is a third case of classification, relating to Feelings, it does not mean that the two former do not relate to feelings: for when we say, that we classify objects, as men, horses, &c.--or events, as the sequences named births, deaths, and so on;--it is obvious that our operation is about our own feelings, and nothing else; as the objects, and their successions, are, to us, the feelings merely which we thus designate. But as there are feelings which we do thus designate; and feelings which we do not; it is convenient, for the purpose of teaching, to treat of them apart. The Feelings, of this latter kind, which we classify, are either single feelings, or trains. Thus, Pain is the name of a single feeling, and the name both of an individual instance, and of indefinite instances, forming a most extensive class. Memory is the name not of a single feeling or idea, but of a train; and it is the name not only of a single instance, but of all instances of such a train, that is, of a class. The same is the case with Belief. It is the name of a train consisting of a certain number of links; and it is the name not only of an individual instance of such trains, but of all instances, forming an extensive class. Imagination is another instance of the same sort of classification. So also is Judgment, and Reasoning, and Doubting, and we might name many more.  
It is easy to see, among the principles of Association, what particular principle it is, which is mainly concerned in Classification, and by which we are rendered capable of that mighty operation; on which, as its basis, the whole of our intellectual structure is reared. That principle is Resemblance. It seems to {271} be similarity or resemblance which, when we have applied a name to one individual, leads us to apply it to another, and another, till the whole forms an aggregate, connected together by the common relation of every part of the aggregate to one and the same name. Similarity, or Resemblance, we must regard as an Idea familiar and sufficiently understood for the illustration at present required. It will itself be strictly analysed, at a subsequent part of this Inquiry.  
So deeply was the sagacious mind of Plato, far more philosophical than that of any who succeeded him, during many ages, struck with the importance of Classification, that he seems to have regarded it as the sum of all philosophy; which he described, as being the faculty of seeing "the ONE in the MANY, and the MANY in the ONE;" a phrase which, when stripped from the subtleties of the sophists whom he exposed, and from the mystical visions of his successors, of which he never dreamed, is really a striking expression of what in classification is the matter of fact. His error lay, in misconceiving the ONE; which he took, not for the aggregate, but something pervading the aggregate.[79] [80]  
[Grote's footnote 79: The two chapters (VII. and VIII.) of Mr. James Mill's Analysis are highly instructive, and exhibit all his customary force and perspicuity. But in respect to Classification and Abstraction, I think that the ancient philosophers of the Sokratic school generally, are entitled to more credit than he allows them; and moreover that in respect to the difference of opinion between Plato and Aristotle, he has assigned an undue superiority to the former at the expense of the latter.](56441.docx#chunk3464)

[The reader would take very inadequate measure of these {272} ancient philosophers, if he judged them from the two citations out of Harris and Cudworth, produced by Mr. James Mill as setting forth the most successful speculations of the ancient world. Both these passages are brought to illustrate "the mystical jargon" (p. 253) with which the ancients are said to have obscured a clear and simple subject. The mysticism in both citations is to a certain extent real; but it depends also in part on the use of a terminology now obsolete, rather than on confusion of ideas. In regard to the citation from Harris, it is a passage in which that author passes into theology, and includes God and Immortality: topics upon which mystical language can seldom be avoided: moreover, if we compare the remarks on Harris (p. 251) with p. 271, we shall find Mr. James Mill ridiculing as mystical, when used by Harris, the same language (about "the One in the Many") which, when employed by Plato, he eulogises as follows--"a phrase which, when stripped from the subtleties of the sophists whom he (Plato) exposed, and from the mystical visions of his successors, of which he never dreamed, is really a striking expression of what in classification is the matter of fact."  
I wish I could concur with Mr. James Mill in exonerating Plato from these mystical visions, and imputing them exclusively to his successors. But I find them too manifestly proclaimed in the Timaeus, Phaedon, Phaedrus, Symposion, Republic, and other dialogues, to admit of such an acquittal: I also find subtleties quite as perplexing as those of any sophist whom he exposed. Along with these elements, the dialogues undoubtedly present others entirely disparate, much sounder and nobler. I have in another work endeavoured to render a faithful account of the multifarious Platonic aggregate, stamped in all its parts,--whether of negative dialectic, poetical fancy, or ethical dogmatism,--with the unrivalled genius of expression belonging to the author. The misfortune is that his Neo-Platonic successors selected by preference his dreams and visions for their amplifying comment and eulogy, leaving comparatively unnoticed the instructive lessons of philosophy {273} accompanying them. To this extent the Neo-Platonists fully deserve the criticism here bestowed on them.  
The long passage, extracted in the Analysis from Cudworth, contains two grave mis-statements, respecting both Plato and Aristotle; which deserve the more attention because they seem to have misled Mr. James Mill himself. Respecting Universals, Cudworth, after saying that they do not exist in the individual sensibles, proceeds as follows (p. 255-256)--  
1. "Neither, in the next place, do they exist somewhere else apart from the individual sensibles, and without the mind: which is that opinion that Aristotle justly condemns, but either unjustly or unskilfully attributes to Plato.  
2. "Wherefore these intelligible ideas or essences of things, those forms by which we understand all things, exist nowhere but in the mind itself: for it was very well determined long ago by Socrates, in Plato's Parmenides, that these things are nothing but \_noemata\_: these species or ideas are all of them nothing but \_noemata\_, or notions that exist nowhere but in the soul itself."  
Now, neither of these assertions of Cudworth will be found accurate: neither the "determination" which he ascribes to the Platonic Sokrates--nor the censure of "unjust or unskilful" which he attaches to Aristotle. It is indeed true that the opinion here mentioned is enunciated by Sokrates in Plato's Parmenides. But far from being given as a "determination," it is enunciated only to be refuted and dropt.[a] In that dialogue, Sokrates is introduced as a youthful and ardent aspirant in philosophy, maintaining the genuine Platonic theory of self-existent and separate Ideas. He finds himself unable to repel several acute objections tendered against the theory by the veteran Parmenides: he is driven from position to position: and one among them, not more tenable than the rest, is the suggestion cited by Cudworth. Yet Parmenides, though his objections remain unanswered and though he alludes to others {274} not specified,--concludes by declaring[b] that nevertheless the Platonic theory of Ideas cannot be abandoned: it must be upheld as a postulate essential to the possibility of general reasoning and philosophy.  
[Footnote a: Plato Parmenid. p. 132, C, D.]  
[Footnote b: Plato Parmenid. p. 135, B, C.  
I have given an account of this acute but perplexing dialogue, in the twenty-fifth chapter of my work on Plato and the other Companions of Sokrates.]  
Even in the Parmenides itself, therefore, where Plato accumulates objections against the theory of separate and self-existent Ideas, we still find him reiterating his adherence to it. And when we turn to his other dialogues, Phaedrus, Phaedon, Symposion, Republic, Kratylus, &c., we see that theory so emphatically proclaimed and so largely illustrated, that I wonder how Cudworth can blame Aristotle for imputing it to him.  
It is by Cudworth, probably, that Mr. James Mill has been misled, when he says--p. 249--"At bottom, Aristotle's [Greek: ei)=dos] is the same as with Plato's [Greek: i)de/a], though Aristotle makes a great affair of some very trifling differences, which he creates and sets up between them."--I have pointed out Cudworth's mistake, and I maintain that the difference between Plato and Aristotle on this subject was grave and material. The latter denied, what the former affirmed, self-existence and substantiality of the Universal Ideas, apart from and independent of particulars.](56441.docx#chunk3465)

[Having cited with some comments the extracts from Cudworth and Harris, Mr. James Mill observes, "Under the influence of such notions as these, men were led away from the real object of Classification, which remained, till a late period of metaphysical enquiry, not at all understood. Yet the truth appears by no means difficult to find, if we only observe the steps by which the mind acquires its knowledge, and the exigencies which give occasion to the contrivances to which it resorts" (p. 259).--He then proceeds, clearly and forcibly, to announce his own theory of classification, intended to dispel the mystery with which others have surrounded {275} it (p. 264). "The word \_man\_ is first applied to an individual: it is first associated with the idea of that individual, and acquires the power of calling up the idea of him: it is next applied to another individual, and acquires the power of calling up the idea of him: so of another and another, till it has acquired the power of calling up an indefinite number of those ideas indifferently. What happens? It does call up an indefinite number of the ideas of individuals, as often as it occurs: and calling them up in close combination, it forms them into a species of complex idea." "It thus appears that the word \_man\_ is not a word having a very simple idea, as was the opinion of the Realists: nor a word having no idea at all, as was that of the Nominalists: but a word calling up an indefinite number of ideas, by the irresistible laws of association, and forming them into one very complex and indistinct, but not therefore unintelligible, idea" (p. 265).--"As it is for the purpose of naming, and of naming with greater facility, that we form classes at all; so it is in furtherance of that same facility that such and such things only are included in one class, such and such things in another. Experience teaches us what sort of grouping answers this purpose best: under the suggestions of that experience, the application of a general word is tacitly and without much of reflection regulated: and by this process and no other, it is, that Classification is performed. It is the aggregation of an indefinite number of individuals, by their association with a particular name" (p. 268).--"It is Similarity or Resemblance, which, when we have applied a name to one individual, leads us to apply it to another and another till the whole forms an aggregate, connected together by the common relation of the aggregate to one and the same name" (p. 271).  
Such is the theory of Mr. James Mill. Its great peculiarity is that it neither includes nor alludes to Abstraction. It admits in Classification nothing more than the one common name associated with an aggregate indefinite and indistinct, of similar concrete individuals. I shall now consider the manner {276} in which the Greek philosophers of the fourth century B.C. dealt with the same subject, and how far they merit the censure of having imported unnecessary mystery into it.  
It is impossible to understand Plato unless we take our departure from his master Sokrates. Now it is precisely in regard to Classification, and the meaning and comprehension of general terms, that the originality and dialectical acuteness of Sokrates were most conspicuously manifested. He was the first philosopher (as Aristotle[c] tells us) who set before himself the Universal as an express object of investigation,--and who applied himself to find out and test the definition of universal terms. He wrote nothing; but he passed most part of his long life in public, and in talking indiscriminately with every one. Oral colloquy, and cross-examining interrogation, were carried by him to a pitch of excellence never equalled. Not only did he disclaim all power of teaching, but he explicitly avowed his own ignorance; professing to be a mere seeker of truth from others who knew better, and to be anxious only for answers such as would stand an accurate scrutiny. To this peculiar scheme--the topics on which he talked were adapted: for he avoided all recondite themes, and discussed only matters relating to man and society: such as What is the Holy? What is the Unholy? What are the Beautiful and the Mean the Just and Unjust? Temperance? Madness? Courage? Cowardice? A City? A man fit for citizenship? Command of Men? A man fit for commanding men? Such is the specimen-list given by Xenophon[d] of the themes chosen by Sokrates. We see that they are all general, and embodied in universal terms. But the terms as well as the themes were familiar to all: every man believed himself thoroughly to understand the meaning of the former--every one had convictions ready-made and decided on the latter. When Sokrates first opened the colloquy, respondents were surprised to be questioned about such subjects, upon which they presumed {277} that every one must know as well as themselves. But this confidence speedily vanished when they came to be tested by inductive[e] interrogatories: citation of appropriate particulars, included or not included in the generalities which they laid down. The result proved that they could not answer the questions without speedily contradicting themselves: that they did not understand the comprehension of their own universal terms: and that upon all these matters, on which they talked so confidently, they had never applied themselves deliberately to learn, nor could they say how their judgments had been acquired or certified.[f]  
[Footnote c: Aristot. Metaphys. A. p. 987, b. 1, M. p. 1078, b. 30.]  
[Footnote d: Xenophon, Memorab. I., 1--16.]  
[Footnote e: So Aristotle calls them--[Greek: lo/gous e(paktikou/s].--Metaph. M. p. 1078, b. 28.]  
[Footnote f: Xenophon, Memorab. IV. 2--13--30--36.]](56441.docx#chunk3466)

[The conviction formed in the mind of Sokrates, after long persistence in such colloquial cross-examination, is consigned in his defence before the Athenian judicature, pronounced a month before his death. He declared that what he found every where was real ignorance, combined with false persuasion of knowledge: that this was the chronic malady of the human mind, which it had been his mission to expose: that no man was willing to learn, because no man believed that he stood in need of learning: that, accordingly, the first step indispensable to all effective teaching, was to make the pupil a willing learner, by disabusing his mind of the false persuasion of knowledge, and by imparting to him the stimulus arising from a painful consciousness of ignorance.  
Such was the remarkable psychological scrutiny instituted by Sokrates on his countrymen, and the verdict which it suggested to him. I have already observed that his great intellectual bent was to ascertain the definition of general terms, and to follow these out to a comprehensive and consistent classification.[g] It must be added that no man was ever less inclined to mysticism than Sokrates: and that he was thus {278} exempt from those misleading influences which (according to Mr. James Mill, p. 260) "have led men away from the real object of Classification, and prevented them from understanding it till a late period in metaphysical enquiry." Sokrates did not come before his countrymen with classifications of his own, originated or improved--nor did he teach them how the process ought to be conducted. His purpose was, to test and appreciate that Classification which he found ready-made and current among them. He pronounced it to be worthless and illusory.  
[Footnote g: Xenophon. Memor. IV. 5, 12; IV. \*6. 1--7--10--15. [Greek: o(=n e(/neka skopo=n su\n toi=s sunou=sin, ti/ e(/kaston ei)/e to=n o)/nton, ou)de/pote e)/lege].]  
Now I wish to point out that what Sokrates thus depreciated, is exactly that which this Chapter of the Analysis lays before us as Classification generally. I agree with the Analysis that Classification, up to a certain point, grows out of the principle of Association and the exigencies of the human mind, by steps instructively set forth in that work. But such natural growth reaches no higher standard than that which Sokrates tested and found so lamentably deficient, even among a public of unusual intelligence. It does not deserve the name of a "mighty operation" (bestowed upon it by Mr. James Mill, p. 270). It is a rudimentary procedure, indispensable as a basis on which to build, and sufficing in the main for social communication, when no science or reasoned truth is required: but failing altogether to realise what has been understood by philosophers, from Sokrates downward, as the true and full purpose of Classification. So long as the Class is conceived to be only what the Analysis describes, an indistinct aggregate of resembling individuals denoted by the same name, without clearly understanding wherein the resemblance consists, or what facts and attributes are \_connoted\_ by the name[h] (I use the word \_connote\_, {279} not in the sense of the Analysis, but in the sense of Mr. John Stuart Mill)--so long will Classification continue to be, as Sokrates entitled it, a large persuasion of knowledge with little reality to sustain it.  
[Footnote h: The necessity of determining the \_connotation\_ of the Class-term is distinctly put forward by Sokrates--Xenophon, Memorab. III. 14, 2. [Greek: lo/go| o)/ntos peri\ o)noma/ton, iph' oi(o=| e)/rgo| e(/kaston ei)/e--E)/choimen a)\n (e)\phe) ei)pei=n, e)pi\ poio=| pote\ e)/rgo| a)/nthropos o)pso/phagos kalei=tai?] &c., also the remarkable passage IV., 6. 13--15, Plato, Sophistes, p. 218 B. [Greek: tou)/noma mo/non e)/chomen koine=| to\ de\ e)/rgon, e)ph' o(=| kalou=men], &c.]  
I pass now from Sokrates to Plato. It is true, as we read in the Analysis, (p. 271) that Plato "was so deeply struck with the importance of Classification, that he seems to have regarded it as the sum of all philosophy." But what Plato thus admired was not the Classification that he found prevalent around him, such as this chapter of the Analysis depicts. Here Plato perfectly agreed with Sokrates. Among his immortal dialogues, several of the very best are devoted to the illustration of the Sokratic point of view: to the cross-examination and exposure of the minds around him, instructed as well as vulgar, in respect to the general terms familiarly used in speech. The Platonic questions and answers are framed to shew how little the respondents understand beneath those current generalities on which every one talks with confidence and fluency--and how little they can avoid contradiction or inconsistency, when their class-terms are confronted with particulars. In fact, Plato goes so far as to intimate that these uncertified classifications,-- generated in each man's mind by merely learning the application of words, and imbibed unconsciously, without special teaching, through the contagion of ordinary society--are rather worse than ignorance: inasmuch as they are accompanied by a false persuasion of knowledge. It would be (in the opinion of Plato) a comparative improvement, if this state of mental confusion, creating a false persuasion of knowledge, were broken up; and if there were substituted in place thereof positive ignorance, together with the naked and painful consciousness of being really ignorant. Only in this way could the mind of the learner be stimulated to active effort in the acquisition of genuine knowledge.[i]  
[Footnote i: Plato, Sophistes, p. 230--231. Symposion, p. 204 A, Menon p. 84, A. D.]](56441.docx#chunk3467)

[Accordingly, when it is said that Plato was "deeply struck {280} with the importance of Classification," we must understand the phrase as applying to Classification, not as he found it prevalent, but as he idealized it. And the scheme that he imagined was not merely different from that which he found, but in direct repugnance to it. He denounced altogether the aggregate of individuals; he declared the class-constituent to reside in a reality apart from them, separate and self-existent--the Idea or Form. He enjoined the student of philosophy to fix his contemplation on these Class-Ideas, the real Realities, in their own luminous region: and for that purpose, to turn his back upon the phenomenal particulars, which were mere transitory, shadowy, incoherent projections of these Ideas[j]--and from the study of which no true knowledge could be obtained. Of the two statements in the Analysis--(p. 271) that "Plato never dreamed of the mystical visions of his successors," and that "his error (respecting Classification) lay in misconceiving the One; which he took, not for the aggregate, but something pervading the aggregate"--neither one nor the other appears to me accurate. In regard to the second of the two, indeed, you may find various passages of Plato which, if construed separately, would countenance it: for Plato does not always talk Realism--nor always consistently with himself. But still his capital and peculiar theory was, Realism. The Platonic One was not something pervading the aggregate of particulars, but an independent and immutable reality, apart from the aggregate: and Plato, when he thus conceived {281} the One, illustrating it by the vast hypotheses embodied in the Republic, Phaedon, Phaedrus, Symposion, Menon, &c., is the true originator of those "mystical visions" against which the Analysis justly protests. Such visions were doubtless suggested to Plato by "his deep sense of the importance of Classification:" but they are his own, though continued and amplified, without his decorative genius, by Neo-Platonic successors. His theory of classification was the first ever propounded; and that theory was Realism. The doctrine here ascribed to him by Mr. James Mill is much more Aristotelian than Platonic. The main issue raised by Aristotle against Plato was, upon the essential separation, and separate objective existence, of the Abstract and Universal: Plato affirmed it, Aristotle denied it.[k] Aristotle recognised no reality apart from the Particular, to which the Universal was attached as a predicate, either essential or accidental to its subject. The Aristotelian Universal may thus be called, in relation to a body of similar particulars, not the aggregate but something pervading the aggregate. But this is not Plato's view: it is the negation of the Platonic Realism.  
[Footnote j: This is what we read in the memorable simile of the Cave, in Plato, Republic, VII., p. 514--519. The language used throughout this simile is [Greek: peria/gein, periakti/on, periagoge/], &c. He supposes that the natural state of man is to have his face and vision towards the particular phenomena, and his back towards the universal realities: the great problem is, how to make the man face about, turn his back towards phenomena, and his eyes towards Universals--[Greek: ta\ o)/nta--ta\ noeta/]. Nothing can be learnt from observation however \*acute, of the phenomena. The same point is enforced with all the charm of Platonic expression in Republ. V. 478, 479, VI., 493, 494. Symposion, p. 210--211, Phaedon, p. 74--75.]  
[Footnote k: According to Plato, it is [Greek: to\ e(\n \_para\ ta\ polla/\_]. According to Aristotle, it is [Greek: e(\n \_kata\ pollo=n\_--e(\n kai\ to\ au)to\ e)pi\ \_pleio/non\_ me\ o(mo/numon e(\n \_e)pi\\_ pollo=n]. Analyt. Poster. I. 11, p. 77, a. 6. Metaphys. I. 9, p. 990, b. 7--13.  
Whoever reads the portions of Plato's dialogues indicated in my last preceding foot note, will see how material this difference is between the two philosophers.  
In the remarkable passage of the Analyt. Post. I. 24, p. 85, a. 30, b. 20, Aristotle notices the Platonic hypothesis that the Universal has real objective, separate, existence apart from its particulars ([Greek: to\ katho/lou e)pi\ ti para\ ta\ kath' e(/kasta]) as an illusion, mischievous and misleading--frequent, but not unavoidable.  
See the antithesis between Plato and Aristotle, on the subject of Universals, more copiously explained in the recent work of Professor Bain, Mental and Moral Science, Appendix, pp. 6--20.]](56441.docx#chunk3468)

[When we read in the Analysis (p. 265) that "the word \_man\_ is not a word having a very simple idea, as was the opinion of the Realists; nor a word having no idea at all, as was that of the Nominalists" this language seems to me not well-chosen. {282} As to the Realists--the Platonic Ideas are conceived as eternal, immutable, grand, dignified, &c., but Aristotle[l] contends that they cannot all be simple: for the Idea of Man (e.g.) can hardly be simple, when there exists distinct Ideas of Animal and of Biped. As to the Nominalists--we cannot surely say that they conceived the universal term as "having no idea at all." A doctrine something like this is ascribed (on no certain testimony) to Stilpon, in the generation succeeding Aristotle: the word Man (Stilpon is said to have affirmed[m]) did not mean John more than William or Thomas or Richard, &c., therefore it did not mean either one of them: therefore it had no meaning at all. So also William of Ockham is said to have declared that Universal Terms were mere "flatus vocis:" but this (as Prantl has shewn[n]) was a phrase fastened upon him by his opponents, not employed by himself. Still less can it be admitted that Hobbes and Berkeley conceived the Universal Term as "having no idea at all." They denied indeed Universal Ideas in the Realistic sense: they also denied what Berkeley calls "determinate abstract Ideas:" but both of them explained (Berkeley especially) that the Universal term meant, any particular idea, considered as representing or standing for all other particular ideas of the same sort.[o] Whether this be the best and most complete explanation or not, it can hardly have been present to Mr. James Mill's mind, when he said that the Universal term had no idea at all in the opinion of the Nominalists.  
[Footnote l: Aristot. Metaphys. Z. 1039, a. 27, 1040, a. 23.]  
[Footnote m: See Grote, Plato and the other Companions of Sokrates, Vol. III., ch. 38, p. 523.]  
[Footnote n: Prantl, Geschichte der Logik, Vol. III., Sect. 19, p. 327.]  
[Footnote o: Berkeley, Principles of Human Knowledge, Introduction, Sect. 12, 15, 16.]  
There is one other remark to be made, respecting the view of Classification presented in the eighth Chapter of the Analysis. We read in the beginning of that Chapter--p. 249--"Forming a class of things is a mode of regarding them. But what is meant by a mode of regarding things? This is mysterious: {283} and is as mysteriously explained, when it is said to be the taking into view the particulars in which individuals agree. For what is there which it is possible for the mind to take into view, in that in which individuals agree? Every colour is an individual colour, every size is an individual size, every shape is an individual shape. But things have no individual colour in common, no individual shape in common, no individual size in common: that is to say, they have neither shape, colour, nor size in common. What then is it which they have in common which the mind can take into view? Those who affirmed that it was something, could by no means tell. They substituted words for things: using vague and mystical phrases, which when examined meant nothing."  
Here we find certain phrases, often used both in common speech and in philosophy, condemned us mystical and obscure. In the next or ninth Chapter (on Abstraction, p. 295 seq.), we shall see the language substituted for them, and the theory by which the mystery is supposed to be removed. I cannot but think that the theory of Mr. James Mill himself is open to quite as many objections as that which he impugns. He finds fault with those who affirm that the word \_cube\_ or \_sphere\_ is applied to a great many different objects by reason of the shape which they have in common; and that they may be regarded so far forth as \_cube\_ or \_sphere\_. But surely this would not have been considered as either incorrect or mysterious by any philosopher, from Aristotle downward. When I am told that it is incorrect, because the shape of each object is an \_individual\_ shape, I dissent from the reason given. In my judgment, the term \_individual\_ is a term applicable, properly and specially, to a concrete object--to that which Aristotle would have called a Hoc Aliquid. The term is not applicable to a quality or attribute. The same quality that belongs to one object, may also belong to an indefinite number of others. It is this common quality that is \_connoted\_ (in the sense of that word employed by Mr. John Stuart Mill) by the class-term: and if there were no common quality, the class-term would have no connotation. In other words, there would be no class: nor {284} would it be correct to apply to any two objects the same concrete appellative name.  
But when we come to the following Chapter of the Analysis (ch. ix. on Abstraction, p. 296), we read as follows--"Let us suppose that we apply the adjective \_black\_ first to the word Man. We say 'black man.' But we speedily see that \_for the same reason\_ for which we say black man, we may say black horse, black cow, black coat, and so on. The word \_black\_ is thus associated with innumerable modifications of the sensation black. By frequent repetition, and the gradual strengthening of the association, these modifications are at last called up in such rapid succession that they appear commingled, and no longer many ideas, but one. \_Black\_ is therefore no longer an individual, but a general name. It marks not the particular black of a particular individual, but the black of every individual and of all individuals."](56441.docx#chunk3469)

[To say that we apply the word \_black\_ to the horse \_for the same reason\_ as we applied it to the man, is surely equivalent to saying that the colour of the horse is the same as that of the man: that blackness is the colour which they have in common. It is quite true that we begin by applying the name to one individual object, then apply it to another, and another, &c. but always for the same reason--to designate (or \_connote\_, in the phraseology of Mr. John Stuart Mill) the same colour in them all, and to denote the objects considered under one and the same point of view. It may be that in fact there are differences in shade of colour: but the class-name leaves these out of sight. When we desire to call attention to them, we employ other words in addition to it. Every attribute is considered and named as One, which is or may be common to many individual objects: the objects only are individual.  
It is to be regretted, I think, that Mr. James Mill disconnected Classification so pointedly from Abstraction, and insisted on explaining the former without taking account of the latter. Such disconnection is a novelty, as he himself states (p. 294): previous expositors thought that "abstraction was included in classification"--and, in my judgment, they were {285} right in thinking so, if (with Mr. James Mill) we are to consider Classification as a "great operation." An aggregate of concretes is not sufficient to constitute a Class, in any scientific sense, or as available in the march of reasoned truth. You must have, besides, the peculiar mode of regarding the aggregate: (a phrase which Mr. James Mill deprecates as mysterious, but which it is difficult to exchange for any other words more intelligible) you must have "that separating one or more of the ingredients of a complex idea from the rest, which has received the name of Abstraction"--to repeat the very just explanation given by him, p. 295--though that too, if we look at p. 249, he seems to consider as tainted with mystery.  
We proceed afterwards to some clear and good additional remarks--p. 298. A class-term, as \_black\_, "is associated with two distinguishable things, but with the one much more than with the other: the clusters, with which it is associated, are variable: the peculiar sensation with which it is associated, is invariable. It is constantly, and therefore much more strongly, associated with the sensation, than with any of the clusters. It is at once a name of the clusters and a name of the sensation: but it is more peculiarly a name of the sensation." Again shortly afterwards, the abstract term is justly described as "marking exclusively one part (of the cluster), upon which such and such effects depend, no alteration being supposed in any other part of it."[p]  
[Footnote p: The abstract term is coined for the express purpose of marking one part of a cluster simultaneously present to the mind, and fixing attention upon it without the other parts--but the concrete term is often made to serve the same purpose, by means of the adverb quatenus, [Greek: ka/thoson, e(=|] &c. These phrases are frequent both in Plato and Aristotle: the stock of abstract terms was in their day comparatively small. It is needless to multiply illustrations of that which pervades the compositions of both: a very good one appears in Plato, Republ. I., p. 340 D, 341 C, 342.]  
This process of marking exclusively, and attending to, one constant portion of a complex state of consciousness, amidst a {286} great variety of variable adjuncts--is doubtless one fundamental characteristic in Abstraction and Classification. A mystery was spread around it by Plato--first through his ascribing to the Constant a separate self-existence, apart from the Variables--still more by his hyperbolical predicates respecting these self-existent transcendental Entia. Plato[q] however in other passages gives many just opinions, respecting Classification, which are no way founded on Realism, and are equally admissible by Nominalists: and portions of Aristotle may be indicated, which describe the process of abstraction as clearly as any thing in Hobbes or Berkeley.[r]  
[Footnote q: The two Platonic dialogues, Sophistes and Politikus, (in which processes of Classification are worked out,) give precepts, for correct and pertinent classification, not necessarily involving the theory of Realism, but rather putting it out of sight; though in one special part of the Sophistes, the debate is made to turn upon it. The main purpose of Plato is to fix upon some fact or phenomenon, clear and appropriate, as the groundwork for distinguishing each class or sub-class--and to define thereby each class-term (\_i.e.\_, to determine its \_connotation\_, in the sense of Mr. John Stuart Mill). Plato deprecates the mere following out of resemblances as a most slippery proceeding ([Greek: o)listhero/taton ge/nos]--Sophist. 231 A). The commonly received classes carry with them in his opinion, no real knowledge, but only the false persuasion of knowledge: he wants to break them up and remodel them.]  
[Footnote r: See especially Aristot. De Memoria et Reminiscentia, c. 1, p. 449, b. 13. De Sensu et Sensili, c. 6, p. 445, b. 17. De Anima III. 8, p. 432, a. 9.]](56441.docx#chunk3470)

[One farther remark may be made upon these two Chapters of the Analysis. Mr. James Mill seems to take little or no thought of Classification and Abstraction, except as performed by Adjectives. But the adjective presupposes a substantive, which is alike an appellative; and which has already performed its duty in the way of abstracting and classifying. This fact seems to be overlooked in the language of some sentences in the present Chapter: for example--"Some successions are found to depend upon the clusters called \_objects\_, all taken together. Thus a tree, a man, a stone, are the {287} antecedents of certain consequents, as such: and not on account of any particular part of the cluster. Other consequents depend not upon the whole cluster, but upon some particular part: thus a tall tree produces certain effects which a tree not tall cannot produce," &c.  
I think that the phraseology of this passage is not quite clear. "The whole cluster all taken together" is not a tree as such--a man as such--a stone as such--but this particular man, tree, or stone, as it stands: John, Thomas, Caius or Titius, clothed with all his predicates, acting or suffering in some given manner. When we speak of a man \_as such\_ or \_quatenus man\_--we do not include the whole cluster, but only those attributes \_connoted\_ (in Mr. John Stuart Mill's sense of the word) by the name \_man\_: we speak of him as a member of the class \_Man\_. What I wish to point out is--That Man is a class-term, just as much as \_tall\_ or \_short\_: only it is the name of a larger class, while tall man is a smaller class under it. The school-logicians did not consider substantives as connotative, but only adjectives: Mr. James Mill has followed them as to this extent of the word, though he has inverted their meaning of it (see p. 299). Mr. John Stuart Mill, while declining to adopt the same inversion, has enlarged the meaning of the word \_connotative\_, so as to include appellative substantives as well as adjectives.--\_G.\_]  
[Editor's footnote 80: Rejecting the notion that classes and classification would not have existed but for the necessity of economizing names, we may say that objects are formed into classes on account of their resemblance. It is natural to think of like objects together; which is, indeed, one of the two fundamental laws of association. But the resembling objects which are spontaneously thought of together, are those which resemble each other obviously, in their superficial aspect. These are the only classes which we should form unpremeditatedly, and without the use of expedients. But there are other resemblances which are not superficially obvious; and many are not brought to light except by long experience, or observation carefully directed to the purpose; being mostly resemblances in the {288} manner in which the objects act on, or are acted on by, other things. These more recondite resemblances are often those which are of greatest importance to our interests. It is important to us that we should think of those things together, which agree in any particular that materially concerns us. For this purpose, besides the classes which form themselves in our minds spontaneously by the general law of association, we form other classes artificially, that is, we take pains to associate mentally together things which we wish to think of together, but which are not sufficiently associated by the spontaneous action of association by resemblance. The grand instrument we employ in forming these artificial associations, is general names. We give a common name to all the objects, we associate each of the objects with the name, and by their common association with the name they are knit together in close association with one another.](56441.docx#chunk3471)

[But in what manner does the name effect this purpose, of uniting into one complex class-idea all the objects which agree with one another in certain definite particulars? We effect this by associating the name in a peculiarly strong and close manner with those particulars. It is, of course, associated with the objects also; and the name seldom or never calls up the ideas of the class-characteristics unaccompanied by any other qualities of the objects. All our ideas are of individuals, or of numbers of individuals, and are clothed with more or fewer of the attributes which are peculiar to the individuals thought of. Still, a class-name stands in a very different relation to the definite resemblances which it is intended to mark, from that in which it stands to the various accessory circumstances which may form part of the image it calls up. There are certain attributes common to the entire class, which the class-name was either deliberately selected as a mark of, or, at all events, which guide us in the application of it. These attributes are the real meaning of the class-name--are what we intend to ascribe to an object when we call it by that name. With these the association of the name is close and strong: and the employment of the same name by different {289} persons, provided they employ it with a precise adherence to the meaning, ensures that they shall all include these attributes in the complex idea which they associate with the name. This is not the case with any of the other qualities of the individual objects, even if they happen to be common to all the objects, still less if they belong only to some of them. The class-name calls up, in every mind that hears or uses it, the idea of one or more individual objects, clothed more or less copiously with other qualities than those marked by the name; but these other qualities may, consistently with the purposes for which the class is formed and the name given, be different with different persons, and with the same person at different times. What images of individual horses the word horse shall call up, depends on such accidents as the person's taste in horses, the particular horses he may happen to possess, the descriptions he last read, or the casual peculiarities of the horses he recently saw. In general, therefore, no very strong or permanent association, and especially no association common to all who use the language, will be formed between the word horse and any of the qualities of horses but those expressly or tacitly recognised as the foundations of the class. The complex ideas thus formed consisting of an inner nucleus of definite elements always the same, imbedded in a generally much greater number of elements indefinitely variable, are our ideas of classes; the ideas connected with general names; what are called General Notions: which are neither real objective entities, as the Realists held, nor mere names, as supposed to be maintained by the Nominalists, nor abstract ideas excluding all properties not common to the class, such as Locke's famous Idea of a triangle that is neither equilateral nor isosceles nor scalene. We cannot represent to ourselves a triangle with no properties but those common to all triangles: but we may represent it to ourselves sometimes in one of those three forms, sometimes in another, being aware all the while that all of them are equally consistent with its being a triangle.  
One important consequence of these considerations is, that {290} the meaning of a class-name is not the same thing with the complex idea associated with it. The complex idea associated with the name man, includes, in the mind of every one, innumerable simple ideas besides those which the name is intended to mark, and in the absence of which it would not be predicated. But this multitude of simple ideas which help to swell the complex idea are infinitely variable, and never exactly the same in any two persons, depending in each upon the amount of his knowledge, and the nature, variety, and recent date of his experience. They are therefore no part of the meaning of the name. They are not the association common to all, which it was intended to form, and which enables the name to be used by all in the same manner, to be understood in a common sense by all, and to serve, therefore, as a vehicle for the communication, between one and another, of the same thoughts. What does this, is the nucleus of more closely associated ideas, which is the constant element in the complex idea of the class, both in the same mind at different times, and in different minds.](56441.docx#chunk3472)

[It is proper to add, that the class-name is not solely a mark of the distinguishing class-attributes, it is a mark also of the objects. The name man does not merely signify the qualities of animal life, rationality, and the human form, it signifies all individual men. It even signifies these in a more direct way than it signifies the attributes, for it is predicated of the men, but not predicated of the attributes; just as the proper name of an individual man is predicated of him. We say, This is a man, just as we say, This is John Thompson: and if John Thompson is the name of one man, Man is, in the same manner, a name of all men. A class name, being thus a name of the various objects composing the class, signifies two distinct things, in two different modes of signification. It signifies the individual objects which are the class, and it signifies the common attributes which constitute the class. It is predicated only of the objects; but when predicated, it conveys the information that these objects possess those attributes. Every concrete class-name is thus a connotative name. It marks {291} both the objects and their common attributes, or rather, that portion of their common attributes in virtue of which they have been made into a class. It \_denotes\_ the objects, and, in a mode of speech lately revived from the old logicians, it \_connotes\_ the attributes. The author of the Analysis employs the word connote in a different manner; we shall presently examine which of the two is best.  
We are now ready to consider whether the author's account of the ideas connected with General Names is a true and sufficient one. It is best expressed in his own words. "The word Man, we shall say, is first applied to an individual; it is first associated with the idea of that individual, and acquires the power of calling up the idea of him; it is next applied to another individual, and acquires the power of calling up the idea of him; so of another, and another, till it has become associated with an indefinite number, and has acquired the power of calling up an indefinite number of those ideas indifferently. What happens? It does call up an indefinite number of the ideas of individuals, as often as it occurs, and calling them up in close connexion, it forms them into a species of complex idea. . . . When the word man calls up the ideas of an indefinite number of individuals, not only of all those to whom I have individually given the name, but of all those to whom I have in imagination given it, or imagine it will ever be given, and forms all those ideas into one,--it is evidently a very complex idea, and therefore indistinct; and this indistinctness has doubtless been the main cause of the mystery which has appeared to belong to it. That this however is the process, is an inevitable result of the laws of association."  
In brief, my idea of a Man is a complex idea compounded of the ideas of all the men I have ever known and of all those I have ever imagined, knit together into a kind of unit by a close association.  
The author's description of the manner in which the class-association begins to be formed, is true and instructive; but does any one's idea of a man actually include all that the author {292} finds in it? By an inevitable result of the laws of association, it is impossible to form an idea of a man in the abstract; the class-attributes are always represented in the mind as part of an image of an individual, either remembered or imagined; this individual may vary from time to time, and several images of individuals may present themselves either alternatively or in succession: but is it necessary that the name should recal images of all the men I ever knew or imagined, or even all of whom I retain a remembrance? In no person who has seen or known many men, can this be the case. Apart from the ideas of the common attributes, the other ideas whether of attributes or of individual men, which enter into the complex idea, are indefinitely variable not only in kind but in quantity. Some people's complex idea of the class is extremely meagre, that of others very ample. Sometimes we know a class only from its definition, i.e. from an enumeration of its class-attributes, as in the case of an object which we have only read of in scientific books: in such a case the idea raised by the class-name will not be limited to the class-attributes, for we are unable to conceive any object otherwise than clothed with miscellaneous attributes: but these, not being derived from experience of the objects, may be such as the objects never had, nor could have; while nevertheless the class, and the class-name, answer their proper purpose; they cause us to group together all the things possessing the class-attributes, and they inform us that we may expect those attributes in anything of which that name is predicated.](56441.docx#chunk3473)

[The defect, as it seems to me, of the view taken of General Names in the text, is that it ignores this distinction between the meaning of a general name, and the remainder of the idea which the general name calls up. That remainder is uncertain, variable, scanty in some cases, copious in others, and connected with the name by a very slight tie of association, continually overcome by counter-associations. The only part of the complex idea that is permanent in the same mind, or common to several minds, consists of the distinctive attributes marked by the class-name. Nothing else is universally present, though {293} something else is always present: but whatever else be present, it is through these only that the class-name does its work, and effects the end of its existence. We need not therefore be surprised that these attributes, being all that is of importance in the complex idea, should for a long time have been supposed to be all that is contained in it. The truest doctrine which can be laid down on the subject seems to be this--that the idea corresponding to a class-name is the idea of a certain constant combination of class attributes, accompanied by a miscellaneous and indefinitely variable collection of ideas of individual objects belonging to the class.--\_Ed.\_]  
  
  
  
{294} CHAPTER IX.  
ABSTRACTION.  
  
"I think, too, that he (Mr. Locke) would have seen the advantage of 'thoroughly weighing,' not only (as he says) 'the imperfections of Language;' but its \_perfections\_ also: For the perfections of Language, not properly understood, have been one of the chief causes of the imperfections of our knowledge."--\_Diversions of Purley\_, \_by John Horne Tooke, A.M.\_, i. 37.  
THE two cases of Consciousness, CLASSIFICATION, and ABSTRACTION, have not, generally, been well distinguished.  
According to the common accounts of Classification, ABSTRACTION was included in it. When it is said, that, in order to classify, we leave out of view all the circumstances in which individuals differ, and retain only those in which they agree; this separating one portion of what is contained in a complex idea, and making it an object of consideration by itself, is the process which is named Abstraction, at least a main part of that process.  
It is necessary now to inquire what are the purposes to which this separating of the parts of a complex idea, and considering and naming the separated parts by themselves, is subservient.  
{295} We have already observed the following remarkable things in the process of naming: 1, Assigning names of those clusters of ideas called objects; as man, fish; 2, Generalizing those names, so as to make them represent a class; 3, Framing adjectives by which minor classes are cut out of larger.  
Those adjectives are all names, of some separate portion of a cluster, and are, therefore, all instruments of abstraction, or of that separating one or more of the ingredients of a complex idea from the rest, which has received the name of Abstraction. One purpose of Abstraction, therefore, is the formation of those \_sub-species\_, the formation of which is required for certain purposes of speech.  
These observations will be rendered familiar by examples. We say, tall man, red flower, race horse. In my complex idea of a man, or the cluster of ideas of sense to which I affix that mark, are included, certain ideas of colour, of figure, size, and so on. By the word tall, I single out a portion of those ideas, namely, the part relating to size, or rather size in one direction, and mark the separation by the sign or name. In my complex idea of a flower, colour is always one of the ingredients. By applying the adjective red, I single out this one from the rest, and point it out for peculiar consideration. The explanation is obvious, and need not be pursued in a greater number of instances.  
Words of this description all denote differences; either such as mark out species from genera, or such as mark out individuals from species. Of this latter sort the number is very small; of which the reason is obvious; individual differences are too numerous to {296} receive names, and are marked by contrivances of abridgment which will be spoken of hereafter.  
To explain this notation of differences; the same examples will suffice. In the phrase "tall man," the adjective "tall" marks the difference between such a man, and "short man," or "middle-sized man." Of the genus man, tall men are one species; and the difference between them and the rest of the genus is marked by the word tall. Of the genus flower, red flowers form a species, and the difference between them and the rest of the genus is marked by the adjective red. Of the genus horse, race horse forms a species, and the difference between this species and the rest of the genus is marked by the word race.  
It is of importance further to observe, that adjectives singling out ideas which are not differences, that is, ideas common to the whole class, are useless: as, tangible wood; coloured man; sentient animal. Such epithets express no more than what is expressed by the name without them.](56441.docx#chunk3474)

[Another thing requiring the attention of the student is the mode in which these differential adjectives are generalized. As the word man, applied first to one individual, then to another, becomes associated with every individual, and every variety of the species, and calls them all up in one very complex idea; so are these adjectives applied to one class after another, and by that means at last call up a very complicated idea. Let us take the word "black" for an example; and let us suppose that we apply this adjective first to the word man. We say "black man." But we speedily see that for the same reason for which we say black man we may say black horse, black cow, {297} black coat, and so on. The word black is thus associated with innumerable modifications of the sensation black. By frequent repetition, and the gradual strengthening of the association, these modifications are at last called up in such rapid succession that they appear commingled, and no longer many ideas, but one. Black is therefore no longer an individual but a general name. It marks not the particular black of a particular individual; but the black of every individual, and of all individuals.[81] The same is the case {298} with all other words of the same class. Thus I apply the word sweet, first to the lump of sugar in my mouth, next to honey, next to grapes, and so on. It thus becomes associated with numerous modifications of the sensation sweet; and when the association is sufficiently strengthened by repetition, calls them up in such close succession, that they are converted into one complex idea. We are also to remember, that the idea and the name have a mutual power over one another. As the word black calls up the complex idea, so every modification of black calls up the name; and in this, as in other cases, the name actually forms a part of the complex idea.  
[Editor's footnote 81: The example which the author has here selected of a general name, sets in a strong light the imperfection of the theory of general names, laid down by him in the preceding chapter. A name like "black," which marks a simple sensation, is an extreme case of the inapplicability of the theory. Can it be maintained that the idea called up in our minds by the word black, is an idea compounded of ideas of black men, black horses, black cows, black coats, and the like? If I can trust my own consciousness, the word need not, and generally does not, call up any idea but that of a single black surface. It is still not an abstract idea, but the idea of an individual object. It is not a mere idea of colour; it is that, combined with ideas of extension and figure, always present but extremely vague, because varying, even from one moment to the next. These vague ideas of an uncertain extension and figure, combined with the perfectly definite idea of a single sensation of colour, are, to my consciousness, the sole components of the complex idea associated with the word black. I am unable to find in that complex idea the ideas of black men, horses, or other definite things, though such ideas may of course be recalled by it.  
In such a case as this, the idea of a black colour fills by itself the place of the inner nucleus of ideas knit together by a closer association, which I have described as forming the permanent part of our ideas of classes of objects, and the meaning of the class-names.--\_Ed.\_]  
The next thing, which I shall observe, deserves in a high degree, the attention of the learner. In the various applications of that species of marks which we are now considering, they are associated with two distinguishable things; but with the one much more than the other. Thus, when we say black man, black horse, black coat, and so of all other black things, the word black is associated with the cluster, man, as often as black man is the expression; with the cluster horse, as often as black horse is the expression, and so on with infinite variety: but at the same time that it is associated with each of those various clusters, it is also associated with the peculiar sensation of colour which it is intended to mark. The CLUSTERS, therefore, with which it is associated, are variable; the PECULIAR SENSATION with which it is associated is invariable. It is much more constantly, and therefore much more strongly associated with the SENSATION than with any of the CLUSTERS. It is at once a name of the clusters, and a name of the {299} sensation; but it is more peculiarly a name of the SENSATION.  
We have, in a preceding note, observed, that such words have been called \_connotative\_; and I shall find much convenience in using the term NOTATION to point out the sensation or sensations which are peculiarly marked by such words, the term CONNOTATION to point out the clusters which they mark along with this their principal meaning.  
Thus the word, black, NOTES that of which black is more peculiarly the name, a particular colour; it CONNOTES the clusters with the names of which it is joined: in the expression, black man, it connotes man; black horse, it connotes horse; and so of all other cases. The ancient Logicians used these terms, in the inverse order; very absurdly, in my opinion.[82]](56441.docx#chunk3475)

[[Editor's footnote 82: The word Connote, with its substantive Connotation, was used by the old logicians in two senses; a wider, and a narrower sense. The wider is that in which, up to this place, the author of the Analysis has almost invariably used it; and is the sense in which he defined it, in a note to section \*5 of his first chapter. "There is a large class of words which denote two things both together; but the one perfectly distinguishable from the other. Of these two things, also, it is observable, that such words express the one primarily as it were; the other in a way which may be called secondary. Thus white, in the phrase white horse, denotes two things, the colour and the horse; but it denotes the colour primarily, the horse secondarily. We shall find it very convenient to say, therefore, that it \_notes\_ the primary, \_connotes\_ the secondary signification."  
This use of terms is attended with the difficulty, that it may often be disputed which of the significations is primary and which secondary. In the example given, most people would agree with the author that the colour is the primary signification; the word being associated with the objects, only through its previous association with the colour. But take the other of the two words, horse. That too is connotative, and in the same manner. It signifies any and every individual horse, and it also signifies those attributes common to horses, which led to their being classed together and receiving that common name. Which, in this case, is the primary, and which the secondary signification? The author would probably say, that in this case, unlike the other, horse is the primary signification, the attributes the secondary. Yet in this equally with the former case, the attributes are the foundation of the meaning: a thing is called a horse to express its resemblance to other horses; and the resemblance consists of the common attributes. The question might be discussed, pro and con, by many arguments, without any conclusive result. The difference between primary and secondary acceptations is too uncertain, and at best too superficial, to be adopted as the logical foundation of the distinction between the two modes of signification.  
The author, however, has, throughout the preceding chapters, regarded words as \_connoting\_ any number of things which though included in their signification, are not, in his judgment, what they primarily signify. He said, for example, that a verb notes an action, and connotes the agent (as either me, thee, or some third person), the number of agents (as one or more), the time (as past, present, or future), and three modes, "that in which there is no reference to anything preceding, that in which there is a reference to something preceding, and that in which reference is made to the will of one of the Persons." I cite this complicated case, to shew by a striking example the great latitude with which the author uses the word Connote.  
But in the present chapter he follows the example of some of the old logicians in adopting a second and more restricted meaning, expressive of the peculiar connotation which belongs to all concrete general names; viz. that twofold manner of signification, by which every name of a class signifies, on the one hand, all and each of the individual things composing the class, and on the other hand the common attributes, in consideration of which the class is formed and the name given, and which we intend to affirm of every object to which we apply the name. It is difficult to overrate the importance of keeping in view this distinction, or the danger of overlooking it when not made prominent by an appropriate phrase. The word Connote, which had been employed for this purpose, had fallen into disuse. But, though agreeing with the old logicians in using the word Connote to express this distinction, the author exactly reverses their employment of it. In their phraseology, the class-name connotes the attributes: in his, it notes the attributes, and connotes the objects. And he declares that in his opinion, their mode of employing the term is very absurd.  
We have now to consider which of these two modes of employing it is really the most appropriate.  
A concrete general name may be correctly said to be a mark, in a certain way, both for the objects and for their common attributes. But which of the two is it conformable to usage to say that it is the name of? Assuredly, the objects. It is they that are called by the name. I am asked, what is this object called? and I answer, a horse. I should not make this answer if I were asked what are these attributes called. Again, I am asked, what is it that is called a horse? and I answer, the object which you see; not the qualities which you see. Let us now suppose that I am asked, what is it that is called black; I answer, all \_things\_ that have this particular colour. Black is a name of all black things. The name of the colour is not black, but blackness. The name of a thing must be the name which is predicated of the thing, as a proper name is predicated of the person or place it belongs to. It is scarcely possible to speak with precision, and adhere consistently to the same mode of speech, if we call a word the name of any thing but that which it is predicated of. Accordingly the old logicians, who had not yet departed widely from the custom of common speech, considered all concrete names as the names of objects, and called nothing the name of an attribute but abstract names.](56441.docx#chunk3476)

[Now there is considerable incongruity in saying that a word connotes, that is, signifies secondarily, the very thing which it is a name of. To connote, is to mark something along with, or in addition to, something else. A name can hardly be said to mark the thing which it is a name of in addition to some other thing. If it marks any other thing it marks it in addition to the thing of which it is itself the name. In the present case, what is marked in addition, is that which is the cause of giving the name; the attributes, the possession of which by a thing entitles it to that name. It therefore seems more conformable to the original acceptation of the word Connote, that we should say of names like man or black that they connote humanity or blackness, and denote, or are names of, men and black objects; rather than, with the author of the Analysis, that they note the attributes, and connote the things which possess the attributes.  
If this mode of using the terms is more consonant to propriety of language, so also is it more scientifically convenient. It is of extreme importance to have a technical expression exclusively consecrated to signify the peculiar mode in which the name of a class marks the attributes in virtue of which it is a class, and is called by the name. The verb "to note," employed by the author of the Analysis as the correlative of "to connote," is far too general to be confined to so specific a use, nor does the author intend so to confine it. "To connote," on the contrary, is a phrase which has been handed down to us in this restricted acceptation, and is perfectly fitted to be used as a technical term. There is no more important use of a term than that of fixing attention upon something which is in danger of not being sufficiently taken notice of. This is emphatically the case with the attribute-signification of the names of objects. That signification has not been seen clearly, and what has been seen of it confusedly has bewildered or misled some of the most distinguished philosophers. From Hobbes to Hamilton, those who have attempted to penetrate the secret of the higher logical operations of the intellect have continually missed the mark for want of the light which a clear conception of the connotation of general names spreads over the subject. There is no fact in psychology which more requires a technical name; and it seems eminently desirable that the words Connote and Connotative should be exclusively employed for this purpose; and it is for this purpose that I have myself invariably employed them.  
In studying the Analysis, it is of course necessary to bear in mind that the author does not use the words in this sense, but sometimes in a sense much more vague and indefinite, and, when definite, in a sense the reverse of this. It may seem an almost desperate undertaking, in the case of an unfamiliar term, to attempt to rectify the usage introduced by the actual reviver of the word: and nothing could have induced me to attempt it, but a deliberate conviction that such a technical expression is indispensable to philosophy, and that the author's mode of employing these words unfits them for the purpose for which they are needed, and for which they are well adapted. I fear, however, that I have rarely succeeded in associating the words with their precise meaning, anywhere but in my own writings. The word Connote, not unfrequently meets us of late in philosophical speculations, but almost always in a sense more lax than the laxest in which it is employed in the Analysis, meaning no more than to imply. To such an extent is this the case, that able thinkers and writers do not always even confine the expression to names, but actually speak of Things as connoting whatever, in their opinion, the existence of the Things implies or presupposes.--\_Ed.\_]  
{300} In using these connotative names, it is often highly convenient to drop the connotation; that is, to leave out the connoted cluster.  
{301} A mark is needed, to show when it is meant that the connotation is dropped. A slight mark put upon the connotative term answers the purpose; and shews {302} when it is not meant that anything should be connoted. In regard to the word black, for example, we merely annex to it the syllable \_ness\_; and it is immediately {303} indicated that all connotation is dropped: so, in sweetness; hardness; dryness; lightness. The new words, so formed, are the words which have been denominated {304} ABSTRACT; as the connotative terms from which they are formed have been denominated CONCRETE; and, as these terms are in frequent use, it is necessary that the meaning of them should be well remembered.  
It is now also manifest what is the real nature of ABSTRACT terms; a subject which has in general presented such an appearance of mystery. They are simply the CONCRETE terms, with the connotation dropped. And this has in it, surely, no mystery at all.[83]  
[Editor's footnote 83: After having said that a concrete general name notes an attribute, that this, one of the sensations in a cluster, and connotes the objects which have the attribute, i.e. the clusters of which that sensation forms a part; the author proceeds to say that an abstract name is the concrete name with the connotation dropped.](56441.docx#chunk3477)

[This seems a very indirect and circuitous mode of making us understand what an abstract name signifies. Instead of aiming directly at the mark, it goes round it. It tells us that one name signifies a part of what another name signifies, leaving us to infer what part. A connotative name with the connotation dropped, is a phrase requiring to be completed by specifying what is the portion of signification left. The concrete name with its connotation signifies an attribute, and also the objects which have the attribute. We are now instructed to drop the latter half of the signification, the objects. What then remains? The attribute. Why not then say at once that the abstract name is the name of the attribute? Why tell us that \_x\_ is \_a\_ plus \_b\_ with \_b\_ dropped, when it was as easy to tell us that \_x\_ is \_a\_?  
The noticeable thing however is that if \_a\_ stands merely for the sensation, \_x\_ really is a little more than \_a\_: the connotation (in the author's sense of the term) of the concrete name is not \_wholly\_ dropped in the abstract name. The term blackness, and every other abstract term, includes in its signification the existence of a black object, though without declaring what it is. That is indeed the distinction between the name of an attribute, and the name of a kind or type of sensation. Names of sensations by themselves are not abstract but concrete names. They mark the type of the sensation, but they do not mark it as emanating from any object. "The sensation of black" is a concrete name, which expresses the sensation apart from all reference to an object. "Blackness" expresses the same sensation with reference to an object, by which the sensation is supposed to be excited. Abstract names thus still retain a limited amount of connotation in both the author's senses of the term--the vaguer and the more specific sense. It is only in the sense to which I am anxious to restrict the term, that any abstract name is without connotation.  
An abstract name, then, may be defined as the name of an attribute; and, in the ultimate analysis, as the name of one or more of the sensations of a cluster; not by themselves, but considered as part of any or all of the various clusters, into which that type of sensations enters as a component part.--\_Ed.\_]  
{305} It hence, also, appears that there can be no ABSTRACT term without an implied CONCRETE, though cases are not wanting, in which there is much occasion for the ABSTRACT term but not much for the CONCRETE; in which, therefore, the concrete is not in use, or is supplied by another form of expression.  
{306} In regular and capricious languages, as our own, the dropping of the connotation of the concrete terms is not marked in a uniform manner; and this requires some illustration. Thus, heavy is a concrete term, and we shew the dropping of the connotation, by the same mark as in the instances above, saying heaviness; but we have another term which is exactly the equivalent of heaviness, and frequently used as the abstract of heavy; that is, weight. Friend is a concrete, connotative term, in the substantive form. Its connotation is dropped by another mark, the syllable ship; thus, friendship; in like manner, generalship; brothership; cousinship. The syllable age is another of the marks we use for the same purpose; pilotage, parsonage, stowage.  
Among concrete connotative words, we have already had full opportunity of observing that verbs constitute a principal class. Those words all NOTE some \_motion\_ or \_action\_ and CONNOTE an \_actor\_. There is the same frequency of occasion to leave out the connotation in the case of this class of connotative words, as in other classes. Accordingly ABSTRACT terms are formed from them, as from the connotative adjectives and substantives. The infinitive mood is such an abstract term; with this peculiarity, that, though it leaves out the connotation of the \_actor\_, it retains the connotation of \_time\_.[84] {307} It is convenient, however, to have abstract terms from the verbs, which leave out also the connotation of time; such are the substantive \_amor\_ from \_amo\_, \_timor\_ from \_timeo\_, and so on.  
[Editor's footnote 84: The infinitive mood does not always express time. At least, it often expresses it aoristically, without distinction of tense. "To love" is as abstract a name as "love," "to fear," as "fear": they are applied equally to past, present, and future. The infinitives of the past and future, as \_amavisse\_, \_amaturus esse\_, do, however, include in their signification a particular time.--\_Ed.\_]  
Verbs have not only an active but a passive form. In the passive form, it is not the \_action\_, but the \_bearing\_ of the action, which is NOTED; and not the \_actor\_, but the \_bearer\_ of the action, that is CONNOTED. In this case, also, there is not less frequent occasion to drop the connotation. By the simple contrivance of a slight alteration in the connotative term, the important circumstance of dropping the connotation is marked. In the case of the passive as the active form of verbs, the infinitive mood drops the connotation of the person, but retains that of the time. Other abstract terms, formed from the passive voice, leave out the connotation both of person and time. Thus from \_legor\_, there is \_lectio\_; from \_optor\_, \_optatio\_; from \_dicor\_, \_dictio\_; and so on.  
It is to be remarked that the Latin mode of forming abstract terms from verbs, by the termination "tio," has been adopted to a great extent in English. A large proportion of our abstract terms are thus distinguished; as action, association, imagination, navigation, mensuration, friction, motion, station, faction, legislation, corruption, and many others.](56441.docx#chunk3478)

[It is also of extreme importance to mark a great defect and imperfection, in this respect, of the Latin language. Such words as \_lectio\_, \_dictio\_, \_actio\_, are derived with equal readiness either from the supine, \_lectum\_, \_dictum\_, \_actum\_; or from the participle, \_lectus\_, \_dictus\_, \_actus\_. The supine is \_active\_, the participle, \_passive\_. From this circumstance probably it is, that {308} these abstract terms in the Latin language possess both the active and passive signification; and by this most unfortunate ambiguity have proved a fertile source of obscurity and confusion. This defect of the Latin language is the more to be lamented by us, that it has infected our own language; for as we have borrowed from the Latin language a great proportion of our abstract terms, we have transplanted the mischievous equivocation along with them. This ambiguity the Greek language happily avoided: thus it had [Greek: pra=xis] and [Greek: pra=gma] the first for the active signification of \_actio\_, the latter the passive.[85]  
[Editor's footnote 85: I apprehend that [Greek: pra=gma] is not an abstract but a concrete term, and does not express the attribute of being done, but the thing done--the effect which results from the completed action.--\_Ed.\_]  
Of the abstract terms, of genuine English growth, derived from the concrete names of action, or verbs, the participle of the past tense supplied a great number, merely dropping the adjective, and assuming the substantive form. Thus, weight, a word which we had occasion to notice before, is the participle weighed, with the connotation dropped: stroke is merely struck; the \_thing\_ struck, the connotation, being left out: thought is the past participle passive of the verb to think, and differs from the participle in nothing, but that the participle, the adjective, has the connotation; the abstract, the substantive, has it not. Whether the concrete, or the abstract, is the term employed, is in such cases always indicated by the context; and, therefore, no particular mark to distinguish them is required.  
{309} In our non-inflected language, a facility is afforded in forming a non-connotative from the connotative, in the active voice of verbs; because the connotative word is always distinguished by the presence of the persons of the verb, or that of some part of the auxiliary verb. The same word, therefore, answers for the abstract, as for the concrete; it being of course the abstract, when none of the marks of the concrete are present. Thus the word love, is both the verb or the connotative, and the substantive or the non-connotative; thus also fear, walk, ride, stand, fight, smell, taste, sleep, dream, drink, work, breath, and many others.  
We have in English, formed from verbs, a great many abstracts or non-connotatives, which terminate in "th," as truth, health, dearth, stealth, death, strength. It may be disputed whether these words are derived from one part of the verb or another; but, in all other respects, the nature of them is not doubtful. The third person singular of the present, indicative active, ends in "th;" and, therefore, they may be said to be that part of the verb with the connotation dropped. The termination, however, of the past participle is "d," and we know that "th" and "d," are the same letter under a slight difference of articulation; and, therefore, they may just as well be derived from the past participle, and as often at least as they have a passive signification, no doubt are. Thus the verb trow, to think, has either troweth, or trowed; from one of which, but more likely from the last, we have truth: the verb to heal, has either healeth, or healed; from one of which, but more likely the last, we have health: the verb to string has stringeth, or stringed; {310} from one of which we have strength; thus from dieth, or died, death; from stealeth, or stealed, stealth; mirth in the same manner, from a verb now out of use; so heighth, length, breadth.[86]  
[Findlater's footnote 86: The abstracts in \_-th\_ belong to a very early stage of the language. We cannot now form words like \_health\_, \_truth\_, as we can abstracts in \_-ness\_. As in the case of adjectives in \_-en\_ (\_wooden\_), and of preterites and participles like \_fell\_, \_fallen\_, that particular part of the vital energy of the language that produced them, is dead--ossified, as it were; and we cannot exemplify their formation by any process now going on. To account for many of them, we must suppose them formed from roots different from any now existing as separate words--roots from which the corresponding verbs and adjectives that we are acquainted with have been themselves derived by augmentation or other change. This being the case, it is impossible to say with certainty whether the immediate root of any particular abstract in \_-th\_ was a verb, a noun, or an adjective; and, indeed, the question need hardly be raised, since a primitive root was of the nature of all three.](56441.docx#chunk3479)

[The structure of these derivatives is better seen in some of the other Teutonic dialects than in the English or the Anglo-Saxon, in which the affix is reduced to a mere consonant. Thus, for Eng. \_depth\_ the Gothic has \_diupi-tha\_; for \_heigh-th\_, \_hauhi-tha\_. In Old High German the affix \_-tha\_ becomes \_-da\_, and we have \_heili-da\_ corresponding to Eng. \_heal-th\_; \_strenki-da\_, to \_streng-th\_; besides a great number of analogous forms, such as \_evi-da\_, "eternity" (from the same root as \_ever\_; compare Lat. \_aetas\_ for \_aevitas\_). In modern German comparatively few of these derivatives survive; and in those that do; the \_-da\_ of the Old German has passed into \_-de\_, as in \_ge-baer-de\_, the way of 'bearing' oneself, behaviour; equivalent to Latin \_habi-tus\_. The modern German equivalents of \_bread-th\_, \_leng-th\_, are \_breit-e\_, \_lang-e\_; but in some of the popular dialects the older forms \_breite de\_, \_lang-de\_ are still retained; and in Dutch \_warm-te\_ corresponds to \_warm-th\_, and \_grot-te\_ is \_great-ness\_. When we recollect that \_th\_ or \_d\_ in the Germanic languages represents in such cases the \_t\_ of the Greek and Latin (compare Gr. [Greek: me/lit (os)], honey with Goth. \_milith\_; Lat. \_alter\_ with Eng. \_other\_), we cannot help seeing how analogous is the formation of the class of words we are now considering to that of Latin past participles (ama-tus, dic-tus, audi-tus). In the case of those abstracts that seem to come more naturally from an adjective root than from a verb, we can conceive the adjective formed on the analogy of the past participle; just as there are in English adjectives having no possible verbal root, yet simulating past participles; as \_able-bodi-ed\_, \_three-corner-ed\_. The abstract noun would appear to have been originally distinguished from the participle, or participial adjective, by some additional affix, as in lec-t-io. In Greek and Latin this additional affix very often consisted in a reduplication of the formative element \_t\_, as if for the purpose of denoting multitude, generality; as in Greek ([Greek: neo/-tet-os]), Latin \_juven-tut-is\_, \_sani-tat-is\_. It is not impossible that Goth. \_diupi-tha\_, O.H.G. \_heili-da\_ are abbreviations of \_diupi-tha-th\_, \_heili-da-d\_, just as Lat. \_sani-tat\_ has dwindled down in modern Ital. to \_sani-ta\_.  
In a great many words essentially belonging to the same class both in meaning and in mode of formation, the \_-th\_ has, for the sake of euphony or from other causes, given place to \_t\_ or \_d\_. Thus \_mood\_ corresponds to Goth. \_mo-th\_, and means a motion (Lat. \_motus\_) or affection (of the mind); \_blood\_, to Goth. \_blo-th\_; \_theft\_, is in Ang. Sax. \_theof-th\_. \_Mur-ther\_, from a root akin to Lat. \_mori\_; \_burthen\_, from the root of to \_bear\_, are of similar formation, with additional affixes.  
All these considerations would seem to put Horne Tooke's proposed derivation of these abstracts from the third person singular of the present indicative of the verb, completely out of court. The famous case of \_truth\_ from \_troweth\_ is especially absurd. For one thing the Ang. Sax. verb \_treowan\_ does not mean "to think," but "to trust," "rely on," "believe." This implies a ground for the trust, and that ground lies in the quality expressed by the adjective, true. \_Truth\_ has the same relation, logically and etymologically, to \_true\_, that \_dearth\_ has to \_dear\_, \_health\_ to \_hale\_. Remarking on the identity in form between the Ang. Sax. \_treow\_, "trust," "a treaty," and \_treow\_, "a tree," Jacob Grimm suggests that they are radically related, and that the idea common to \_tree\_ and \_true\_ is firmness, fixedness. Thus the "true" would be the "firm" the "fixed"--what may be relied on. This view is supported by the analogy of the Lat. \_robur\_, which means both an oak and strength.--\_F.\_]  
{311} It would be interesting to give a systematic account of the non-connotatives, derived from English {312} verbs; and this ought to be done; but for the present inquiry it would be an operation misplaced. The nature of the words, and the mode of their signification, is all which here is necessary to be understood.](56441.docx#chunk3480)

[One grand class of connotative terms is composed of such words as the following: walking, running, flying, reading, striking; and we have seen that, for a very obvious utility, a generical name was invented, the word ACTING, which includes the whole of these specific names; and to which the non-connotative, or abstract term ACTION corresponds. There was equal occasion for a generical name to include all the specific names belonging to the other class of connotative terms; such as coloured, sapid, hard, soft, hot, cold, and so on. But language has by no means been so happy in a general name for this, as for the other class. The word SUCH, is a connotative term, which includes them all, and indeed the other class along with them; for when we apply the word SUCH to any thing, we comprehend under it all the ideas of which the cluster {313} is composed. But this is not all which is included under the word such. It is a relative term, and always connotes so much of the meaning of some other term. When we call a thing \_such\_, it is always understood that it is such \_as\_ some other thing. Thus we say, John is such as James. Corresponding with our "such as," the Latins had \_talis qualis\_. If we could suppose \_qualis\_ to have been used without any connotation of \_talis\_, \_qualis\_ would have been such a word as the occasion which we are now considering would have required. The Latins did not use \_qualis\_, in this sense, as a general concrete, including all the other names of the properties of objects other than actions. But they made from it, as if used in that very sense, a non-connotative or abstract term, the word QUALITY, which answers the same purpose with regard to both classes, as action does to one of them. That is to say; it is a very general non-connotative term, including under it the non-connotatives or abstracts of hot, cold, hard, soft, long, short; and not only of all other words of that description, but of acting, and its subordinates also.  
\_Quantus\_, is another concrete which has a double connotation like \_qualis\_. It connotes not only the substantive with which it agrees, but also, being a relative, the term \_tantus\_, which is its correlate. By dropping both connotations, the abstract QUANTITY is made; a general term, including under it the abstracts of all the names by which the modifications of greater and less are denominated; as large, small, a mile long, an inch thick, a handful, a ton, and so on.  
Much remains, beside what is here stated, of the full explanation of the mode in which \_talis qualis\_, {314} \_tantus quantus\_, are made conducive to the great purposes of marking. But this must be reserved till we come to treat of RELATIVE TERMS, in general.  
We have previously observed, that one of the purposes for which we abstract, or sunder the parts of a complex idea, marked by a general name, is, to form those adjectives, or connotative terms, which, denoting differences, enable us to form, and to name, subordinate classes. We now come to the next of the great purposes to which abstraction is subservient, and it is one to which the whole of our attention is due.  
Of all the things in which we are interested, that is, on which our happiness and misery depend, meaning here by things, both objects and events, the most important by far are the successions of objects; in other words, the effects which they produce. In reality, objects are interesting to us, solely on account of the effects which they produce, either on ourselves, or on other objects.  
But an observation of the greatest importance readily occurs; that of any cluster, composing our idea of an object, the effects or consequents depend, in general, more upon one part of it than another. If a stone is hot, it has certain effects or consequences; if heavy, it has others, and so on. It is of great importance to us, in respect to those successions, to be able to mark discriminately the real antecedent; not the antecedent combined with a number of things with which the consequent has nothing to do. I observe, that other objects, as iron, lead, gold, produce similar effects with stone; as often as the name \_hot\_ can, in like manner, be predicated of them. In the several clusters therefore, hot stone, hot iron, hot gold, {315} hot lead, there is a portion, the same in all, with which, and not with the rest, the effects which I am contemplating are connected. This part is marked by the word \_hot\_; which word, however, in the case of each cluster, connotes also the other parts of the cluster. It appears at once, how much convenience there must be in dropping the connotation, and obtaining a word which, in each of those cases, shall mark exclusively that part of the cluster on which the effect depends. This is accomplished by the abstract or non-connotative terms, heat, and weight.](56441.docx#chunk3481)

[Certain alterations, also, are observed in those parts of clusters on which such and such effects depend; which alterations make corresponding alterations in the effects, though no other alteration is observable, in the cluster, to which such parts belong. Thus, if a stone is more or less hot, the effects or successions are not the same; so of iron, so of lead; but the same alteration in the same part of each of those clusters, is followed by the same effects. It is true, that we know nothing of the alteration in the cause, but by the alteration in the effects; for we only say that a stone is hotter, because it produces such other effects, either in our sensations immediately, or in the sensations we receive from other objects. It is, however, obvious that we have urgent use for the means of marking, not only the alterations in the effects, but the alterations in the antecedents. This we do, by supposing the alterations to be those of increase and diminution, and marking them by the distinction of lower and higher degrees. But, for this purpose, it is obvious that we must have a term which is not connotative; because we suppose no alteration in any {316} part of the cluster but that which is not connoted; thus we can say, with sufficient precision, that a greater or less degree of heat produces such and such effects; but we cannot say, that a greater or less degree of hot stone, of hot iron, of hot any thing else, produces these effects.  
This then, is another use, and evidently a most important use, of abstract, non-connotative terms. They enable us to mark, with more precision, those successions, in which our good and evil is wholly contained.  
This also enables us to understand, what it is which recommends such and such aggregates, and not others, for classification. Those successions of objects, in which we are interested, determine the classifications which we form of them.  
Some successions are found to depend upon the clusters, called objects, all taken together. Thus a tree, a man, a stone, are the antecedents of certain consequents, as such; and not on account of any particular part of the cluster.  
Other consequents depend not upon the whole of the cluster, but upon some particular part: thus a tall tree, produces certain effects, which a tree not tall, cannot produce; a strong man, produces certain effects, which a man not strong cannot produce. When these consequents are so important, as to deserve particular attention, they and their antecedents must be marked. For this purpose, are employed the connotative terms marking differences. These terms enable us to group the clusters containing those antecedents into a sub-class; and NON-CONNOTATIVE or ABSTRACT terms, derived from them, enable {317} us to speak separately of that part of the cluster which we have to mark as the precise antecedent of the consequent which is engaging our attention.  
It is presumed, that these illustrations will suffice, to enable the reader to discern the real marking power of abstract terms, and also to perceive the mode of their formation.  
  
  
  
{318} CHAPTER X.  
MEMORY.  
  
"The science of metaphysics, as it regards the mind, is, in its most important respects, a science of analysis; and we carry on our analysis, only when we suspect that what is regarded by others as an ultimate principle, admits of still finer evolution into principles still more elementary."--\_Inquiry into the Relation of Cause and Effect\_, \_by Thomas Brown, M.D.\_ P. iv. s. i. p. 331.  
IT has been already observed that if we had no other state of consciousness than sensation, we never could have any knowledge, excepting that of the present instant. The moment each of our sensations ceased, it would be gone, for ever; and we should be as if we had never been.  
The same would be the case if we had only ideas in addition to sensations. The sensation would be one state of consciousness, the idea another state of consciousness. But if they were perfectly insulated; the one having no connexion with the other; the idea, after the sensation, would give me no more information, than one sensation after another. We should still have the consciousness of the present instant, and nothing more. We should be wholly incapable of acquiring experience, and accommodating our actions {319} to the laws of nature. Of course we could not continue to exist.  
Even if our ideas were associated in trains, but only as they are in Imagination, we should still be without the capacity of acquiring knowledge. One idea, upon this supposition, would follow another. But that would be all. Each of our successive states of consciousness, the moment it ceased, would be gone for ever. Each of those momentary states would be our whole being.](56441.docx#chunk3482)

[Such, however, is not the nature of man. We have states of consciousness, which are connected with past states. I hear a musical air; I recognise it as the air which was sung to me in my infancy. I have an idea of a ghost; I recognise the terror with which, when I was alone in the dark, that idea, in my childish years, was accompanied. Uniting in this manner the present with the past, and not otherwise, I am susceptible of knowledge; I am capable of ascertaining the qualities of things; that is, their power of affecting me; and of knowing in what circumstances what other circumstances will take place. Suppose that my present state of consciousness is the idea of putting my finger in the flame of the candle. I recognise the act as a former act;[87] and this recognition is followed {320} by another, namely, that of the pain which I felt immediately after. This part of my constitution, which is of so much importance to me, I find it useful to name. And the name I give to it is MEMORY. When the memory of the past is transferred into an anticipation of the future, by a process which will be explained hereafter, it gets the name of experience; and all our power of avoiding evil, and obtaining good, is derived from it. Unless I remembered that my finger had been in the flame of the candle; and unless I anticipated a similar consequent, from a similar antecedent, I should touch the flame of the candle, after being burned by it a hundred times, just as I should have done, if neither burning nor any of its causes had ever formed part of my consciousness.  
[Bain's footnote 87: The recognition of an act as a former act, or of a present sensation as having formerly occurred, is a \*phase of the intellectual power named consciousness of Agreement, or Similarity, which is both an essential of our Knowledge, and a means of mental Reproduction. The defectiveness of the author's view of this function of the intellect has been elsewhere commented on.--\_B.\_]  
Our inquiry is, what this part of our constitution, so highly important to us, is composed of. All inquirers are agreed, that it is complex; but what the elements are into which it may be resolved, has not been very successfully made out.  
It is proper to begin with the elements which are universally acknowledged. Among them, it is certain, that IDEAS are the fundamental part. Nothing is remembered but through its IDEA. The memory, however, of a thing, and the idea of it, are not the same. The idea may be without the memory; but the memory cannot be without the idea. The idea of an elephant may occur to me, without the thought of its having been an object of my senses. But I cannot have the thought of its having been an object of my senses, without having the idea of the animal at the {321} same time. The consciousness, therefore, which I call memory, is an idea, but not an idea alone; it is an idea and something more. So far is our inquiry narrowed. What is that which, combined with an idea, constitutes memory?  
That memory may be, the idea must be. In what manner is the idea produced?  
We have already seen in what manner an idea is called into existence by association. It is easy to prove that the idea which forms part of memory is called up in the same way, and no other. If I think of any case of memory, I shall always find that the idea, or the sensation which preceded the memory, was one of those which are calculated, according to the laws of association, to call up the idea involved in that case of memory; and that it was by the preceding idea, or sensation, that the idea of memory was in reality brought into the mind. I have not seen a person with whom I was formerly intimate for a number of years; nor have I, during all that interval, had occasion to think of him. Some object which had been frequently presented to my senses along with him, or the idea of something with which I have strongly associated the idea of him, occurs to me; instantly the memory of him exists. The friend with whom I had often seen him in company, accidentally meets me; a letter of his which had been long unobserved, falls under my eye; or an observation which he was fond of producing, is repeated in my hearing; these are circumstances all associated with the idea of the individual in question; the idea of him is excited by them, and with the mere idea of the {322} man, all the other circumstances which constitute memory.  
The necessary dependence of memory upon association, may be proved still more rigidly in this way. It has been already observed, that we cannot call up any idea by willing it. When we are said to will, there must be in the mind, the idea of what is willed. "Will, without an idea," are incongruous terms; as if one should say, "I can will, and will nothing." But if the idea of the thing willed, must be in the mind, as a condition of willing, to will to have an idea in the mind, is to will to have that in it, which, by the supposition, is in it already.](56441.docx#chunk3483)

[There is a state of mind familiar to all men, in which we are said to try to remember. In this state, it is certain that we have not in the mind the idea which we are trying to have in it. How then is it, that we proceed in the course of our endeavour to procure its introduction into the mind? If we have not the idea itself, we have certain ideas connected with it. We run over those ideas, one after another, in hopes that some one of them will suggest the idea we are in quest of; and if any of them does, it is always one so connected with it, as to call it up in the way of association. I meet an old acquaintance, whose name I do not remember, and wish to recollect. I run over a number of names, in hopes that some of them may be associated with the idea of the individual. I think of all the circumstances in which I have seen him engaged; the time when I knew him, the place in which I knew him, the persons along with whom I knew him, the things he did, or the things he suffered; and, if I chance upon any idea with which the name is {323} associated, then immediately I have the recollection; if not, my pursuit of it is in vain.[88]  
[Bain's footnote 88: This process seems best expressed by laying down a law of Compound or Composite Association; under which a plurality of feeble links of connexion may be a substitute for one powerful and self-sufficing link.--\_B.\_  
[The laws of compound association are the subject of one of the most original and profound chapters of Mr. Bain's treatise (The Senses and the Intellect. Part ii. Chap. 3.).--\_Ed.\_]]  
There is another set of cases, very familiar, but affording very important evidence on the subject. It frequently happens, that there are matters which we desire not to forget. What is the contrivance to which we have recourse for preserving the memory; that is, for making sure that it will be called into existence, when it is our wish that it should. All men, invariably employ the same expedient. They endeavour to form an association between the idea of the thing to be remembered, and some sensation, or some idea, which they know beforehand will occur at or near the time when they wish the remembrance to be in their minds. If this association is formed, and the sensation or the idea, with which it has been formed, occurs; the sensation, or idea, calls up the remembrance; and the object of him who formed the association is attained. To use a vulgar instance; a man receives a commission from his friend, and, that he may not forget it, ties a knot on his handkerchief. How is this fact to be explained? First of all, the idea of the commission is associated with the making of the knot. Next, the handkerchief is a thing which it is known beforehand will be frequently seen, and of {324} course at no great distance of time from the occasion on which the memory is desired. The handkerchief being seen, the knot is seen, and this sensation recalls the idea of the commission, between which and itself, the association had been purposely formed.  
What is thus effected through association with a sensation, may be effected through association with an idea. If there is any idea, which I know will occur to me at a particular time, I may render myself as sure of recalling any thing which I wish to remember at that time, by associating it with this idea, as if I associated it with a sensation. Suppose I know that the idea of Socrates will be present to my mind at twelve o'clock this day week: if I wish to remember at that time something which I have to do, my purpose will be gained, if I establish between the idea of Socrates, and the circumstance which I wish to remember, such an association that the one will call up the other.  
A very remarkable application of this principle offers itself to our contemplation, in the artificial memory which was invented by the ancient orators and rhetoricians. The orator made choice of a set of objects, sufficient in number to answer his purpose. The ideas of those objects he taught himself, by frequent repetition, to pass through his mind in one constant order. The objects which he chose were commonly such as aided him in fixing them according to a certain order in his memory; the parts, for example, of some public building, or other remarkable assemblage. Having so prepared himself, the mode in which he made use of his machinery was as follows. The topics or sentiments of his speech were {325} to follow in a certain order. The parts of the building he had chosen as his instrument had previously been taught to follow by association, in a certain order. With the first of these, then, he associated the first topic of his discourse; with the second, the second, and so on. The first part of the building suggested the first topic; the second, the second; and each another, to the end of his discourse.[89]](56441.docx#chunk3484)

[[Bain's footnote 89: The conditions of the success of this expedient are interesting to study as illustrations of the working of association. The supposition is that the parts of the building are perfectly coherent in the mind, that they can recall each other easily and rapidly. The advantage gained will depend entirely upon the superior facility of attaching a head of discourse to the visible appearance of a room, as compared with the facility of attaching it to a previous head. If we can form an enduring bond between a topic and the picture of an interior, by a smaller mental effort than is necessary to conjoin two successive topics, there is a gain by the employment of the device; the difference of the two efforts is the measure of the gain. Probably the result would depend upon the relative force of the pictorial and the verbal memory in the individual mind. In minds where the pictorial element prevails, there might be a positive advantage; in cases where the pictorial power is feeble and the verbal power strong, there would almost certainly be a dead loss.--\_B.\_]  
We not only have ideas of memory, individually taken; that is, separately, each by itself; as in the instances which we have just been considering: we have also trains of such ideas. All narratives of events which ourselves have witnessed are composed of such trains. The ideas forming those trains do not follow one another in a fortuitous manner. Each succeeding idea is called up by the one which {326} precedes it; and every one of these successions takes place according to a law of association. After a lapse of many years, I see the house in which my father died. Instantly a long train of the circumstances connected with him rise in my mind: the sight of him on his death-bed; his pale and emaciated countenance; the calm contentment with which he looked forward to his end; his strong solicitude, terminating only with life, for the happiness of his son; my own sympathetic emotions when I saw him expire; the mode and guiding principles of his life; the thread of his history; and so on. In this succession of ideas, each of which is an idea of memory, there is not a single link which is not formed by association; not an idea which is not brought into existence by that which precedes it.  
Whensoever there is a desire to fix any train in the memory, all men have recourse to one and the same expedient. They practise what is calculated to create a strong association. The grand cause of strong associations is repetition. This, accordingly, is the common resource. If any man, for example, wishes to remember a passage of a book, he repeats it a sufficient number of times. To the man practised in applying the principle of association to the phenomena in which it is concerned, the explication of this process presents itself immediately. The repetition of one word after another, and of one idea after another, gives the antecedent the power of calling up the consequent from the beginning to the end of that portion of discourse, which it is the purpose of the learner to remember.  
That the remembrance is produced in no other way, {327} is proved by a decisive experiment. For, after a passage has been committed to memory in the most perfect manner, if the learner attempts to repeat it in any other order than that, according to which the association was formed, he will fail. A man who has been accustomed to repeat the Lord's Prayer, for example, from his infancy, will, if he has never tried it, find the impossibility of repeating it backwards, small as the number is of the words of which it consists. That words alone, without ideas, suggest one another in a train, is proved by our power of repeating a number of words of an unknown language.[90] And, it is worth observing, that the power of arithmetical computation is dependent upon the same process. Thus, for example, when a child learns the multiplication table, and says, 11 times 11 is 121, or 12 times 12 is 144, he annexes no ideas to those words; but, by force of repetition, the expression 12 times 12 instantly calls up the expression 144, or 11 times 11 the expression 121, and so upwards from twice 2, with which he begins. In illustrating the mode in which repetition makes association more and more easy, I used the process of arithmetical addition as a striking example. Persons little accustomed to the process perform it with great difficulty; persons {328} much accustomed to it, with astonishing facility. In men of the first class, the association is imperfectly formed, and the several antecedent expressions slowly suggest the proper consequent ones; in those of the latter class the association is very perfectly formed, and the expressions suggest one another with the greatest expedition and ease.  
[Editor's footnote 90: There is here a lapse, of mere expression. The meaning is not that words suggest one another without ideas; words do not suggest words, but the ideas of words. The author intended to say that words, or the ideas of them, often suggest the ideas of other words (forming a series) without suggesting along with them any ideas of the things which those words signify.--\_Ed.\_]](56441.docx#chunk3485)

[Thus far we have proceeded with facility. In Memory there are ideas, and those ideas both rise up singly, and are connected in trains by association. The same occurs in Imagination. Imagination consists of ideas, both suggested singly, and connected in trains, by association. This is the whole account of Imagination. But Memory is not the same with Imagination. We all know, when we say, we imagine a thing, that we have not the same meaning, as when we say, we remember it. Memory, therefore, has in it all that Imagination has; but it must also have something more. We are now, then, to inquire what that additional something is.  
There are two cases of Memory. One is, when we remember sensations. The other is, when we remember ideas. The first is, when we remember what we have seen, felt, heard, tasted, or smelt. The second is, when we remember what we have thought, without the intervention of the senses. I remember to have seen and heard George III, when making a speech at the opening of his Parliament. This is a case of sensation. I remember my conceptions of the Emperor Napoleon and his audience, when I read the account of his first address to the French Chambers. This is a case of ideas.  
{329} We shall consider the case of sensations first. What is it to remember any thing I have seen?  
First, there is the idea of it; and that idea brought into existence by association.  
But, in Memory, there is not only the idea of the thing remembered; there is also the idea of my having seen it. Now these two, 1, the idea of the thing, 2, the idea of my having seen it, combined, make up, it will not be doubted, the whole of that state of consciousness which we call memory.[91]  
[Editor's footnote 91: The doctrine which the author thinks "will not be doubted" is more than doubted by most people, and in my judgment rightly. To complete the memory of seeing the thing, I must have not only the idea of the thing, and the idea of my having seen it, but the belief of my having seen it; and even this is not always enough; for I may believe on the authority of others that I have seen a thing which I have no remembrance of seeing.--\_Ed.\_]  
But what is it we are to understand by what I have called "the idea of my having seen the object?" This is a very complex idea; and, in expounding, clearly, to the comprehension of persons, not familiar with these solutions, the import and force of a very complex idea, lies all the difficulty of the case.  
It will be necessary for such persons to call to mind the illustrations they have already contemplated of the remarkable case of association, in which a long train of ideas is called up so rapidly as to appear but one idea; and also the other remarkable case, in which one idea is so strongly associated with another, that it is out of our power to separate them. Thus, when we use the word battle, the mind runs over the {330} train of countless acts, from the beginning of that operation to the end; and it does this so rapidly, that the ideas are all clustered into one, which it calls a battle. In like manner, it clusters a series of battles, and all the intermediate operations, into one idea, and calls it a campaign; also several campaigns into one idea, and calls it a war. Of the same nature is the compound idea, which we denote by the word year; and the still more compound idea, which we denote by the word century. The mind runs over a long train of ideas, and combines them so closely together, that they assume the appearance of a single idea; to which, in the one case, we assign the name year, in the other, the name century.  
In my remembrance of George III., addressing the two Houses of Parliament, there is, first of all, the mere idea, or simple apprehension; the conception as it is sometimes called, of the objects. There is combined with this, to make it memory, my idea of my having seen and heard those objects. And this combination is so close, that it is not in my power to separate them. I cannot have the idea of George III.; his person and attitude, the paper he held in his hand, the sound of his voice while reading from it, the throne, the apartment, the audience; without having the other idea along with it, that of my having been a witness of the scene.  
Now, in this last-mentioned part of the compound, it is easy to perceive two important elements; \_the idea of my present self\_, the remembering self; and \_the idea of my past self\_, the remembered or witnessing self. These two ideas stand at the two ends of a portion of my being; that is, of a series of my states {331} of consciousness. That series consists of the successive states of my consciousness, intervening between the moment of perception, or the past moment, and the moment of memory, or the present moment. What happens at the moment of memory? The mind runs back from that moment to the moment of perception. That is to say, it runs over the intervening states of consciousness, called up by association. But "to run over a number of states of consciousness, called up by association," is but another mode of saying, that "we associate them;" and in this case we associate them so rapidly and closely, that they run, as it were, into a single point of consciousness, to which the name MEMORY is assigned.](56441.docx#chunk3486)

[If this explanation of the case in which we remember sensations is understood, the explanation of the case in which we remember ideas cannot occasion much of difficulty. I have a lively recollection of Polyphemus's cave, and the actions of Ulysses and the Cyclops, as described by Homer. In this recollection there is, first of all, the ideas, or simple conceptions of the objects and acts; and along with these ideas, and so closely combined as not to be separable, the idea of my having formerly had those same ideas. And this idea of my having formerly had those ideas, is a very complicated idea; including the idea of myself of the present moment remembering, and that of myself of the past moment conceiving; and the whole series of the states of consciousness, which intervened between myself remembering, and myself conceiving.  
If we contemplate forgetfulness, not memory, we shall see how completely the account of it confirms the account we have just rendered of memory. Every {332} case of forgetfulness, is a case of weakened, or extinct, association. Some years ago, I could repeat a certain discourse with accuracy and ease, from beginning to end; attempting it, the other day, I was unable to repeat more than a few sentences. The reason is obvious. The last of the words and ideas which occurred to me failed to suggest the following; that is to say, the association which formerly existed between them was dissolved.  
A remarkable piece of natural scenery, composed of mountains, woods, rivers, lakes, ocean, flocks, herds, cultivated fields, gay cottages, and splendid palaces, of which I had a lively recollection many years ago, presents itself to me now very much faded: in other words, a great variety of the circumstances, which make up the detail and minute features of the scene, were formerly remembered by me, but are now forgotten. And how forgotten? The manner is obvious. The greater features, which I still remember, had formerly the power of calling up the smaller along with them, and the whole scene was revived; the association gradually declining, the great objects have no longer the power to excite the idea of the small; and they are therefore gone from me for ever.  
There are things of which I have so entirely lost the recollection, that it never can be revived. The meaning is, that the associations which were formed between the ideas of them, and other ideas, are so completely dissolved, that none of my present ideas has the power of exciting them.  
It is observable, that sensations have a stronger power to excite recollections than is possessed by {333} ideas.[92] A man, after an absence of many years, revisits the scenes of his infancy: a variety of circumstances crowd into his memory, which, but for the scene before him, would never have been remembered again. These are the circumstances between which, and the perception of the pristine objects, the association is not yet dissolved. There are other circumstances, without number, which (the association being completely dissolved) not even that perception can revive, and which never can be remembered more.  
[Bain's footnote 92: This is for no other reason than the superior intensity or impressiveness of the actual as compared with the ideal. Although as a rule, the sensation has a greater hold of the mind, than the corresponding idea, there are exceptions. An idea may sometimes be accompanied with an intensity of mental occupation and excitement, surpassing the reality: what we have looked at with indifference when it occurred, may take on an extraordinary importance in the retrospect; in which case its power of resuscitating collateral circumstances will be far greater than the power of the original sensation.--\_B.\_]  
We have seen that there are two cases of memory; that in which sensations are remembered, and that in which ideas.  
It is said, that there are men, who, by often telling a mendacious story as true, come at last to believe it to be true. When this happens, the fact is, that a case of the memory of \_ideas\_, comes to be mistaken for a case of the memory of \_sensations\_.  
How did the man know at first that it was a fictitious story; and how did he afterwards lose that knowledge?  
He knew, at first, by certain associations; he lost his knowledge, by losing those associations, and {334} acquiring others in their stead. When he first told the story, the circumstances related called up to turn the idea of himself fabricating the story. This was the memory of the fabrication. In repeating the story as real, the idea of himself fabricating the story is hurried over rapidly; the idea of himself as actor in the story is dwelt upon with great emphasis. In continued repetitions, the first circumstance being attended to as little as possible, the association of it grows weaker and weaker; the other circumstance engrossing the attention, the association of it grows stronger and stronger; till the weaker is at last wholly overpowered by the stronger, and ceases to have any effect.  
In delirium, madness, and dreams, men believe that what they only imagine, they hear, see, and do. This so far agrees with the case of forgetfulness, just explained, that, in both, there is a mistake of ideas for sensations; but, in the case of memory, it is a mistake of past ideas for past sensations; in delirium, madness, and dreaming, it is a mistake of present ideas for present sensations.](56441.docx#chunk3487)

[How men in sound memory distinguish the ideas remembered, from sensations remembered, and know that the one is not the other, seems to be accounted for by the difference of the things themselves. A sensation is different from an idea, only because it is felt to be different; and being felt to be different, and known to be different, are not two things, but one and the same thing. I have a sensation; I have an idea: if these two are distinguishable in the having, it is likely that the copy of the sensation should be distinguishable from the revival of the idea, when they are both brought up by association; just as when I {335} have two distinguishable sensations, one, for example, of red, and another of black, the copies of them, when brought up by association, are distinguishable. Besides, the accompaniments of a sensation are always generically different from those of an idea; of course, the associations are generically different. The accompaniments of a sensation, are all the simultaneous objects of sensation, together with all those which, to a certain extent, both preceded and followed it. The accompaniments of an idea are not the simultaneous objects of sensation, but other ideas; namely, the neighbouring parts, antecedent and consequent, of the mental train. A sensation, therefore, called up by association, and an idea called up by association, are distinguished both by the difference of the two feelings, and the difference of the associated circumstances.  
It is observable, that the idea of a sensation called up by association, and recognised as the idea of a sensation, is of course a remembrance. The recognition consists in that highly complex idea, consisting of three principal ingredients: 1, the point of consciousness called the remembering self; 2, the point of consciousness called the percipient self; 3, the successive states of consciousness which filled up the interval, between these two points.  
An \_idea\_ called up by association is not necessarily a remembrance; it is only a remembrance when recognised as having been an idea before. And it is recognised as having been an idea before, by the association of that idea, which connects the self of the present moment with the self of the past moment, the remembering self with the conceiving self: in other {336} words, the complex idea is made up of those two selfs and the intermediate states of consciousness.  
Another distinction is here suggested between the memory of a sensation and the memory of an idea. The complex idea, which needs to be associated with a mere simple idea, to make it memory, is not the same in the two cases. There is a specific difference. The self which is at the antecedent end of the associated train, (in the case of sensation,) is the sentient self; that is, seeing or hearing; the self at the antecedent end of the associated train, (in the case of ideas,) is not the sentient self, but the conceptive self, self having an idea. But myself percipient, and my self imagining or conceiving, are two very different states of consciousness: of course the ideas of these states of consciousness, or these states revived by association, are very different ideas.  
The simplest of all cases of memory is that of a sensation immediately past. I have one sensation, and another sensation; call them A and B; and I recognise them as successive. Every man has experience of the fact, and is familiar with it. But not every man can tell what it involves.  
When a sensation ceases, it is as completely gone, as if it had never existed.[93] It is, in a certain sense, {337} revived again in its idea. But that idea must be called into existence by something with which it is associated. In my two sensations, supposed above, the one antecedent, the other consequent, how do I recognise the succession; if the first is gone, before the coming of the second? It is evident that it must be by memory. And how by memory? The preceding developments seem to make the process clear. The consciousness of the present moment calls up the idea of the consciousness of the preceding moment. The consciousness of the present moment is not absolutely simple; for, whether I have a sensation or idea, the idea of what I call Myself is always inseparably combined with it. The consciousness, then, of the second of the two moments in the case supposed, is the sensation combined with the idea of Myself, which compound I call "Myself Sentient." This "Self Sentient," in other words sensation B, combined with the idea of self, calls up the idea of sensation A combined with the idea of self. This we call MEMORY; and, there being no intermediate link, \_immediate\_ MEMORY. Suppose that, instead of two sensations, there had been three, A, B, C. In order {338} to remember A, it is necessary to step over B. The consciousness of the third moment, namely, "sensation C, united with the idea of self," calls up the idea of "sensation A, united with the idea of self," and along with this the intermediate state of consciousness, "B, with the constant concomitant self." If the intermediate state, B, were not included, the sensation A would appear to have immediately preceded sensation C, and the memory would be inaccurate.](56441.docx#chunk3488)

[[Bain's footnote 93: This is a statement that should be qualified. Looking to the change of outward situation, we may say that the difference between the present reality, and the idea of it when past, is total and vast: the wide prospect before the eyes at one moment is gone, annihilated, non-existent. But looking at the mental process, we must use more moderate language. The mind does not adapt itself to the new situation with the same rapidity. If one is very much impressed with a picture, one maintains the rapt attitude for a little time, after the picture is withdrawn, and only by degrees loses the hold in favour of the next thing presented to the view. It is possible for us to resist the solicitation of the actual scene, and to be absorbed to the full measure of actuality by something no longer actual. The immediate past may still divide the empire with the present. The psychological transition follows a different law from the objective transition: a circumstance in no small degree involved in the subtle question of our mental continuity or personal identity.--\_B.\_]  
We have thus carried the analysis of Memory to a certain point. We have found the association to consist of three parts; the remembering self; the remembered self; and the train which intervened. Of these three parts, the last has been fully expounded. The recalling of the successive states of consciousness, which composed the intervening train, is an ordinary case of association. The other parts, \_the two selfs\_, at the two extremities of this train, require further consideration. The self, at the first end, is the remembered self; the \_self which had a sensation, or an idea\_. The idea of this self, therefore, consists of two parts: of self, and a sensation, or an idea. The last-mentioned part of this combination, the sensation or idea, needs no explanation; the first, that which is called self, does. The self at the other extremity of the chain of consciousness, is the \_remembering self\_. Remembering is associating. The idea of this self, then, is the combination of self with the idea of associating. And here, too, associating needs no explanation; it is the other part of the combination that does. The analysis, then, of SELF, or the account of what is included in that state of consciousness commonly {339} called the \_idea of personal identity\_, is still wanting to the complete developement of Memory.  
Philosophers tell us also, that the idea of \_Time\_ is included in every act of MEMORY; and again, that it is from MEMORY we obtain our idea of \_Time\_: thus asserting that the idea of \_Time\_ must precede MEMORY, and that MEMORY must precede the idea of \_Time\_. These contradicting propositions imply that the idea of Time in the minds of those who make them, is a very confused idea. Nevertheless, as there can be no memory without the idea called Time, the exposition of that idea, likewise, is necessary to the full understanding of Memory.  
The idea of personal IDENTITY, and the idea of TIME, two very remarkable states of consciousness, will be very carefully examined hereafter. But for the more ready understanding of what is necessary to be adduced in expounding those complicated cases of association, some other phenomena of the mind will first be explained.  
What is to be understood by that BELIEF which is said to accompany MEMORY, will be seen in the next chapter, where all the different cases of belief will be resolved into their elements.[94]  
[Editor's footnote 94: The only difficulty about Memory, when once the laws of Association are understood, is the difference between it and Imagination; but this is a difference which will probably long continue to perplex philosophers. The author finds in Memory, besides the idea of the fact remembered, two other ideas: "the idea of my present self, the remembering self, and the idea of my past self, the remembered or witnessing self:" and a supposed rapid repetition in thought, of the whole of the impressions which I received between the time remembered and the {340} time of remembering. But (apart from the question whether we really do repeat in thought, however summarily, all this series) explaining memory by Self seems very like explaining a thing by the thing. For what notion of Self can we have, apart from Memory? The fact of remembering, i.e. of having an idea combined with the belief that the corresponding sensation was actually felt by me, seems to be the very elementary fact of Self, the origin and foundation of the idea; presupposed in our having the very complex notion of a Self, which is here introduced to explain it. As, however, the author admits that the phenomenon of Belief, and the notions of Time and of Personal Identity, must be taken into account in order to give a complete explanation of Memory, any further remarks had better be deferred until these subjects have been regularly brought under our consideration.--\_Ed.\_]  
  
  
  
{341} CHAPTER XI.  
BELIEF.  
  
"Cette recherche peut infiniment contribuer aux progres de l'art de raisonner; elle le peut seule developper jusques dans ses premiers principes. En effet, nous ne decouvrirons pas une maniere sure de conduire constamment nos pensees; si nous ne savons pas comment elles se sont formees."--\_Condillac\_, \_Traite des Sensations\_, p. 460.  
IT is not easy to treat of MEMORY, BELIEF, and JUDGMENT, separately. For, in the rude and unskilful manner in which naming has been performed, the states of consciousness, marked by those terms, are not separate and distinct.  
Part of that which is named by MEMORY is included under the term BELIEF; and part of that which is named by JUDGMENT, is also included under the name BELIEF. BELIEF, therefore, instead of having a distinct province to itself, encroaches on the provinces both of MEMORY, and JUDGMENT; from which great confusion has arisen.](56441.docx#chunk3489)

[I take MEMORY first, and JUDGMENT last, from no other principle of arrangement, than facility of {342} exposition; and I have in this way found it convenient to treat of JUDGMENT as a case of BELIEF.[95]  
[Editor's footnote 95: How is it possible to treat of Belief without including in it Memory and Judgment? Memory is a case of belief. In what does Memory differ from Imagination, except in the belief that what it represents did really take place? Judgment, in its popular acceptation, is Belief resulting from deliberate examination, in other words, Belief grounded on evidence: while in its philosophical sense it is coextensive, if not synonymous, with Belief itself. I do not know how it is possible to distinguish a judgment from any other process of the mind, except by its being an act of belief.--\_Ed.\_]  
We begin as usual with the simplest cases. These are, the case of a simple sensation, and the case of a simple idea. When we have a sensation, we BELIEVE that we have it; when we have an idea, we BELIEVE that we have it.  
But, to have a sensation, and to believe that we have it, are not distinguishable things. When I say "I have a sensation," and say, "I believe that I have it," I do not express two states of consciousness, but one and the same state. A sensation is a feeling; but a feeling, and the belief of it are the same thing. The observation applies equally to ideas. When I say I have the idea of the sun, I express the same thing exactly, as when I say, that I believe I have it. The feeling is one, the names, only, are two.[96] [97]  
[Bain's footnote 96: In the case of a present reality, belief has no place; it can be introduced only by a fiction or a figure. The believing state comes into operation when something thought of is still remote, and attainable by an intermediate exertion. The fact "I see the sun" is full fruition: the fact that I can see the sun by going out of doors affords scope for belief or disbelief.--\_B.\_]  
[Editor's footnote 97: The difference between Mr. Bain and the author is but in language and classification. It is necessary for the reader of the Analysis to remember, that the author uses the word Belief as the most general term for every species of conviction or assurance; the assurance of what is before our eyes, as well as of that which we only remember or expect; of what we know by direct perception, as well as of what we accept on the evidence of testimony or of reasoning: all this we are convinced or persuaded of; all this, in the author's language, we believe. Mr. Bain, on the other hand, like Sir William Hamilton and many others, restricts the term to those cases of conviction which are short of direct intuition.--\_Ed.\_]  
{343} It may be alleged that, when I say "I have a sensation," I express the simple feeling, as derived from the outward sense; but that when I say "I believe I have a sensation," I express two things, the simple sensation, and the association with it, of that remarkable idea, the idea of myself. The association, however, is the same in both cases. As I never have the sensation of an object, the sight, for example, of a rose, without associating with it, the idea of position, and also that of unity; nor the \_idea\_ of such an object, without the same association; so I never have a sensation, nor the idea of that sensation, without associating with it, the idea of myself. And in both cases, the associations are of that remarkable class, which we have denominated inseparable. It is not in our power to prevent them. Whensoever the perception of the object exists, the idea of its position is sure to exist along with it; whensoever one of my sensations exists, the idea of myself exists along with {344} it; whensoever one of my \_ideas\_ exists, the idea of myself is sure to exist along with it.  
In the case, then, of a present sensation, and that of a present idea; the sensation, and the belief of the sensation; the idea, and the belief of the idea, are not two things; they are, in each case, one and the same thing; a single thing, with a double name.  
The several cases of Belief may be considered under three heads: I., Belief in events, real existences; II., Belief in testimony; and III., Belief in the truth of propositions. We shall consider them in their order; and first, Belief in events, real existences.  
I. This is subdivided into three distinct cases: 1, Belief in present events; 2, Belief in past events; 3, Belief in future events.  
1. Belief in present events, again, is divided into two cases: 1, Belief in immediate existences present to my senses; 2, Belief in immediate existences not present to my senses.  
Belief in existences present to my senses, includes, for one element, belief in my sensations; and belief in my sensations, as we have just observed, is only another name for having the sensations.  
But belief in the external objects, is not simply belief in my present sensations; it is this, and something more. The something more, is now the object of our inquiry. I see, for example, a rose: my sensation is a sensation of sight: that of a certain modification of light; but my belief of the rose is not this; it is this, and much more.](56441.docx#chunk3490)

[Besides the sensation of colour, I have, for one thing, the belief of a certain distance, at which I see {345} the rose; and that of a certain figure, consisting of leaves disposed in a certain form. I believe that I see this distance and form; in other words, perceive it by the eye, as immediately as I perceive the colour. Now this last part of the process has been explained by various philosophers. There is no dispute, or uncertainty, about the matter. All men admit, that this, one of the most remarkable of all cases of belief, is wholly resolvable into association.[98] It is acknowledged, that, by the sense of sight, we receive no sensation but that of a certain modification of light. It is equally proved, that the sensations from which our ideas of distance and figure are derived, are sensations of the muscular actions and touch. How, then, is the Belief generated, that we see extension and figure, as well as colour? After the experience the learner has now had in tracing the rapid combinations of the mind, this presents but little difficulty. He knows, that when we are receiving through the muscles and the touch, the sensations which yield us the idea of extension and figure, we are receiving the sensations of sight at the same time, from the same objects. The sensations of sight, therefore, are {346} associated with the ideas of these tactile and muscular sensations; and associated in the most perfect possible manner; because the conjunction is almost invariable, and of incessant occurrence, during the whole period of life. We are perpetually feeling, and seeing, the same objects, at the same time; so much so, that our lives may be said to consist of those sensations in union; to consist, at least to a far greater degree, of this, than of any one other state of consciousness.  
[Editor's footnote 98: "All men admit." Certainly not all men; though, at the time when the author wrote, it might be said, with some plausibility, all psychologists. Unfortunately this can no longer be said: Mr. Samuel Bailey has demanded a rehearing of the question, and has pronounced a strong and reasoned opinion on the contrary side; and his example has been followed by several other writers: but without, in my opinion, at all weakening the position which since the publication of Berkeley's Essay on Vision, had been almost unanimously maintained by philosophers.--\_Ed.\_]  
This intensity of association, we know, produces two effects. One, is to blend the associated feelings so intimately together, that they no longer appear many, but one feeling. The other is, to render the combination inseparable; so that if one of the feelings exist, the others necessarily exist along with it.  
The case of association which we are now considering, brings to view another circumstance, of some importance in tracing the effects of this great law of our nature. It is this: that in any associated cluster, the idea of sight is almost always the prevalent part. The visible idea is that which takes the lead, as it were; and serves as the suggesting principle to the rest. So it happens in the combination of the sensations of colour, with those of extension and figure: the visible idea stands foremost; and calls up the rest. It calls them up also with such intensity, that both the remarkable cases of association are exemplified. Whenever we have the sensation of colour, we cannot avoid having the ideas of distance, of extension, and figure, along with it; nor can we avoid having them in such intimate union with the ocular sensation, that they appear to be that sensation itself. {347} This is the whole of what is ever supposed to be in the case. Of no phenomenon of the human mind is the developement more complete or more important. Our belief that we see the shape, and size, and distance of the object we look at, is as perfect as belief in any instance can be. But this belief is nothing more than a case of very close association.  
The case of belief by association, any one may illustrate further, for himself, by recollecting some of the commonest cases of optical deception. If we look at a landscape with the naked eye, we believe the several objects before us, the men, the animals, the trees, the houses, the hills, to be at certain distances. If we next look at them through a telescope, they seem as if they were brought near; we have the distinct belief of their proximity, and though a belief immediately corrected by accompanying reflection, it is not only belief, but a belief that we can by no means shake off. We can, after this, invert the telescope, and then we cannot help believing, that the nearest objects are removed to a distance. Now what is it that the telescope performs in these two instances? It modifies in a certain manner the rays of light to the eye. The rays, proceeding from the objects, are so distributed on the eye, as they would be if the distance of the objects was less, or greater. Instantly we have the belief that it is less or greater; because, the sensation of the eye, by means of the glass, is made to resemble that which it receives, when objects are seen at a smaller or greater distance; and each of the sensations calls up that idea of distance which is habitually associated with it.](56441.docx#chunk3491)

[We have thus far proceeded, with some certainty, {348} in detecting the component parts of that which we call our "belief in the existence of external objects." We have taken account of the sensation from which is derived the visible idea, of the sensations from which are derived the ideas of position, extension, and figure; and we have explained the intimate combination of those two sets of ideas by association. But these, though the leading sensations and ideas, are not the only ones. There are, besides, the sensations from which we derive the idea of resistance, in all its modifications, from that of air, to that of adamant. There are also sensations which are not common to all objects, but peculiar to some; as smell, peculiar to odorous bodies; taste, to sapid; and sound, to sonorous ones.  
Now, though the most remarkable case of the associations among those feelings, is that between colour, and extension and figure, they are all blended by association into one idea; which, though in reality a cluster of ideas, affects us in the same manner as if it were a single idea; an idea, the parts of which we detect by an analysis, which it requires some training to be able to make.  
With the colour of the rose, the size and figure of the rose,--which are the predominant ideas,--I associate the idea of that modification of hardness and softness, which belongs to the rose; its degree of resistance, in short; also its smell, and its taste. These associations have been formed, as other associations are, by repetition. I have had so uniformly the sight, along with the handling, these, along with the smell, and the taste--of the rose, that they are always called up together, and in the closest combination.  
{349} Now then let us ask, what we mean, when we affirm, that the rose exists. In this meaning are undoubtedly included the above sensations, in a certain order. I see the rose on the garden wall, and I affirm that it exists: that is, along with my present sensation, the sight of the rose, I have the ideas of a certain order of other sensations. These are, first, the idea of distance, that is, the idea of the feelings involved in the act of going to the rose: after this, the idea of the feelings in handling it; then in smelling, then in tasting it; all springing up by association with the sight of the rose. It is said, we believe we should have these sensations. That is, we have the idea of these sensations inseparably united one with the other, and inseparably united with the idea of ourselves as having them. That this alone constitutes belief, in the remarkable case of the association of extension and figure with the sensations of sight, has already been seen; that this alone constitutes it, in many other remarkable cases, will be seen as we proceed; and in no case can it be shewn, that any thing more is included in it.  
In my belief, then, of the existence of an object, there is included the belief, that, in such and such circumstances, I should have such and such sensations. Is there any thing more? It will be answered immediately, yes: for that, along with belief in my sensations as the \_effect\_, there is belief of something as the \_cause\_; and that to the \_cause\_, not to the \_effect\_, the name object is appropriated.  
This is a case of Belief, which deserves the greatest possible attention. It is acknowledged, on all hands, that we know nothing of objects; but the sensations {350} we have from them. There is a cause, however, of those sensations, and to that we give the name object: or, rather, there is a cluster of causes, corresponding with the cluster of sensations. Thus, when I see, and handle, and smell, and taste the rose, there is a cause of the sensation red, a cause of the sensation soft, a cause of the sensation round, a cause of the smell, and a cause of the taste; and all these causes are united in the rose. But what is the rose, beside the colour, the form, and so on? Not knowing what it is, but supposing it to be something, we invent a name to stand for it. We call it a \_substratum\_. This substratum, when closely examined, is not distinguishable from Cause. It is the cause of the qualities; that is, the cause of the causes of our sensations. The association, then, is this. To each of the sensations we have from a particular object, we annex in our imagination, a cause; and to these several causes we annex a cause, common to all, and mark it with the name substratum.  
This curious case of association we now proceed to develop. The word cause, means the antecedent of a consequent, where the connection is constant. This has been established on such perfect evidence, that it is a received principle of philosophy. More of the evidence of this important principle will appear as we go on. Here we shall take the proposition for granted.](56441.docx#chunk3492)

[Not only are we, during the whole period of our lives, witnesses of an incessant train of events; that is, of antecedents and consequents, between which, for the greater part, the order is constant; but these constant conjunctions are, of all things in the world, what we are {351} the most deeply interested in observing; for, on the knowledge of them, all our power of obtaining good and avoiding evil depends. From this, it necessarily follows, that between none of our ideas is the association more intimate and intense, than between antecedent and consequent, in the order of events. Whenever we perceive an event, the mind instantly flies to its antecedent. I hear words in the street; \_event\_: some one, of course, is making them; \_antecedent\_. My house is broken, and my goods are gone; \_event\_: a thief has taken them; \_antecedent\_. This is that remarkable case of association, in which the combination is \_inseparable\_; a case of so much importance in explaining some of the more mysterious phenomena of thought. Other instances of this remarkable phenomenon, to which we have already had occasion to advert, are, the sight of an object, and the ideas of its distance, its extension, and figure; the idea of colour, and the idea of extension; the idea of an object, and the idea of position and unity; the idea of one of my sensations, and the idea of myself. In no instance is this inseparable association more perfect, or its consequences more important, than in that between an event, and its antecedent. We cannot think of the one without thinking of the other. The two ideas are forced upon us at the same time; and by no effort of ours can they be disjoined. So necessarily, from the first moment of experience, are we employed in observing the constant conjunctions of events; and so deeply are we interested, in looking out for, and knowing the constant antecedent of every event, that the association becomes part of our being. The perception, or the idea, of an event, instantly brings up {352} the idea of its constant antecedent; definite and clear, if the antecedent is known; and indefinite and obscure, if it is unknown. Still, the idea of an event, of a change, without the idea of its cause, is impossible. That a cause means, and can mean nothing to the human mind, but constant antecedent, is no longer a point in dispute.[99]  
[Editor's footnote 99: Here again the author takes too sanguine a view of the amount of agreement hitherto attained among metaphysical philosophers. "That a cause means, and can mean, nothing to the human mind but constant antecedent" is so far from being "no longer a point in dispute" that it is denied with vehemence by a large numerical majority of philosophers; and its denial is perhaps the principal badge of one of the two schools which at this, as at most other times, bisect the philosophical world--the intuitional school and the experiential--\_Ed.\_]  
Of this remarkable case of association, that which we call "Our Belief in External Objects" is one of the most remarkable instances. Of the sensations, of sight, of handling, of smell, of taste, which I have from a rose, each is an event; with each of those events, I associate the idea of a constant antecedent, a cause; that cause unknown, but furnished with a name, by which it may be spoken of, namely, quality; the quality of red, the cause of the sensation red; the qualities of consistence, extension and figure, the causes of the sensations of handling; the qualities of smell and taste, the causes of the sensations of smell and taste. Such is one part of the process of association in this case. Another is that by which the ideas of those sensations are so intimately united, as to appear not several ideas, but one idea, the idea of a rose. We have now two steps of association; that {353} of the several sensations into one idea; that of the several sensations each with a separate cause. But we do not stop here; for, as in a train of events, consisting of several links, A, B, C, D, and so on, though C is the antecedent or cause of D, it is itself the consequent or effect of B; and in all cases, when we have found the cause of any particular event, we have still to find out what was the cause of that cause. In this manner, when our habit of association has carried us from our sensations to the causes of them, the same habit carries us still farther.  
As each of our sensations must have a cause, to which, as unknown, we give the name quality; so each of those qualities must have a cause. And as the ideas of a number of sensations, concomitant in a certain way, are combined into a single idea; as that of rose, that of apple; the unity, which is thus given to the effects, is of course transferred to the supposed causes, called qualities: they are referred to a common cause. To this supposed cause of supposed causes, we give a name; and that name is the word \_Substratum\_.  
It is obvious, that there is no reason for stopping at this \_Substratum\_; for, as the sensation suggested the quality, the quality the substratum, the substratum as properly leads to another antecedent, another substratum, and so on, from substratum to substratum, without end. These inseparable associations, however, rarely go beyond a single step, hardly ever beyond two. The Barbarian, in accounting for the support of the earth, placed it on the back of a great elephant, and the great elephant on the back of a great tortoise; but neither himself, nor those whom he {354} instructed, were carried by their habits of association any farther.[100]](56441.docx#chunk3493)

[[Editor's footnote 100: It is a question worth considering, why that demand for a cause of everything, which has led to the invention of so many fabulous or fictitious causes, so generally stops short at the first step, without going on to imagine a cause of the cause. But this is quite in the ordinary course of human proceedings. It is no more than we should expect, that these frivolous speculations should be subject to the same limitations as reasonable ones. Even in the region of positive facts in the explaining of phenomena by real, not imaginary, causes--the first semblance of an explanation generally suffices to satisfy the curiosity which prompts the inquiry. The things men first care to inquire about are those which meet their senses, and among which they live; of these they feel curious as to the origin, and look out for a cause, even if it be but an abstraction. But the cause once found, or imagined, and the familiar fact no longer perplexing them with the feeling of an unsolved enigma, they do not, unless unusually possessed by the speculative spirit, occupy their minds with the unfamiliar antecedent sufficiently to be troubled respecting it with any of the corresponding perplexity.--\_Ed.\_]  
Such appear to be the elements included in our belief of the existence of objects acting on our senses. We have next to unfold the case of belief in the present existence of objects not acting on our senses.  
Of this Belief, there are two cases: 1, Belief in the existence of objects, which we have not perceived; 2, Belief in the existence of objects, which we have perceived.  
The first of these, is a case of the Belief in testimony; which is to be explained hereafter. What we are to examine at the present moment, then, is, our Belief in the existence of objects, which, though not {355} now present to our senses, have been so at a previous time. Thus, I believe in the present existence of St. Paul's, which I saw this morning.  
In tracing the elements of this Belief, it is obvious in the first place, that in so far as it is founded on my past sensations, memory is concerned in it. But Memory relates to \_past\_ events, Belief in which, is to be considered under a following head. This part of the development, therefore, we postpone.  
But, beside Memory, what other element is concerned in it? There is evidently an anticipation of the future. In believing that St. Paul's exists, I believe, that whenever I am in the same situation, in which I had perception of it before, I shall have perception of it again. But this Belief in future events, is also a case, which remains to be considered under a subsequent head. This, therefore, is another part of the development, which must be postponed.  
I not only believe, that I shall see St. Paul's, when I am again in St. Paul's Churchyard; but I believe, I should see it if I were in St. Paul's Churchyard this instant. This, too, is also a case, of the anticipation of the future from the past, and will come to be considered under the subsequent head already referred to.  
Besides these cases, the only one which remains to be considered, is, my Belief that, if any creature whose senses are analogous to my own, is now in St. Paul's Churchyard, it has the present sensation of that edifice.  
My belief in the sensations of other creatures, is wholly derived from my experience of my own sensations. The question is, How it is derived. That {356} it is an inference from similitude, will not be denied. But what is an inference from similitude?  
I have no direct knowledge of any feelings but my own. How is it, then, that I proceed?  
There are certain things which I consider as marks or signs of sensations in other creatures. The Belief follows the signs, and with a force, not exceeded in my other instance. But the interpretation of signs is wholly a case of association, as the extraordinary phenomena of language abundantly testify.[101] And whenever the association, between the sign and the {357} thing signified, is sufficiently strong to become inseparable, it is belief. Thus, rude and ignorant people, to whom the existence of but one language is known, believe the name by which they have always called an object to belong to it naturally, as much as its shape, its colour, or its smell.[10\*] Thus the perceptions of sight, mere signs of distance, magnitude, and figure, are followed by belief of the sight of them. And it is remarked, with philosophical accuracy, by Condillac, that if our constitution had been such, as to give us, instead of a different modification of sight, a different modification of smell, with each variety of distance, extension, and figure, we should have smelt distance, extension and figure, in the same manner as, by the actual conformation of our organs, we see them. Nor can we doubt the truth of the ingenious observation of Diderot, that if we had seen, and heard, and tasted, and smelt, at the ends of our fingers, in the same manner as we feel, we should have believed our mind to be in the fingers, as we now believe it to be in the head.](56441.docx#chunk3494)

[[Bain's footnote 101: This is true in by far the greater number of instances. Nevertheless, there are some of the signs of feeling that have an intrinsic efficacy, on very manifest grounds. While the meanings of the smile and the frown could have been reversed, if the association had been the other way, there is an obvious suitability in the harsh stunning tones of the voice to signify anger and to inspire dread, and a like suitability in the gentle tones to convey affection and kindly feeling. We might have contracted the opposing associations, had the facts been so arranged, just as in times of peace, we associate joy with deafening salvos of artillery; and as loud, sharp-pealing laughter serves in the expression of agreeable feeling. But there is a gain of effect when the signs employed are such as to chime in, by intrinsic efficacy, with the associated meanings. On this coincidence depend the refinements of elocution, oratory, and stage display.--\_B.\_  
[The fact here brought to notice by Mr. Bain is, that certain of the natural expressions of emotion have a kind of analogy to the emotions they express, which makes an opening for an instinctive interpretation of them, independently of experience. But if this be so (and there can be little doubt that it is so) the suggestion takes place by resemblance, and therefore still by association.--\_Ed.\_]]  
[Mill's footnote 10: "It has been very justly remarked, that if all men had uniformly spoken the same language, in every part of the world, it would be difficult for us not to think [believe] that there is a natural connexion of our ideas, and the words which we use to denote them."--\_Brown\_, \_Lectures\_, ii. p. 80. 2d ed.]  
The process of our Belief in this case, then, is evidently, as follows. Our sensations are inseparably associated with the idea of our bodies. A man cannot think of his body without thinking of it as sensitive. As he cannot think of his own body without thinking of it as sensitive, so he cannot think of another man's {358} body, which is like it, without thinking of it as sensitive. It is evident that the association of sensitiveness is more close with certain parts of the complex idea, our bodies, than with other parts; because the association equally follows the idea of horse, of dog, of fowl, and even of fish, and insect: and it will be found, I think, that there is nothing with which it is so peculiarly united as the idea of spontaneous motion. What is the reason we do not believe there is any sensation in the most curiously-organized vegetable; while we uniformly believe there is in the polypus, and the microscopic insect? Nothing whatsoever can be discovered, but a strong association which exists in the one case, and is wanting in the other. And this is one of the most decisive of all experiments to prove the real nature of Belief.  
As, then, our belief in the sensations of other creatures is derived wholly from the inseparable association between our own sensations and the idea of our own bodies, it is apparent that the case in which I believe other creatures to be immediately percipient of objects, of which I believe that I myself should be percipient if I were so situated as they are, resolves itself ultimately into this particular case of my belief in certain conditional sensations of my own. This, again, as we have seen above, resolves itself into that other important law of Belief, which we are shortly to consider, the anticipation of the future from the past.  
2. It comes next in order, that we notice our Belief in past existences; that is, our present belief, that something had a present existence at a previous time.  
Much of the development of this case is included in the expositions already afforded. Our present {359} belief, means, for one thing, a present idea; our present belief of an existence, the idea of something existing. Of what associations the idea of something existing consists, we have just ascertained. Our present belief of a past existence, then, consists of our present idea of something existing, and the assignment of it to a previous time.  
There are two cases of this assignment; one, in which the thing in question had been the object of our senses; another, in which it had not been the object of our senses.](56441.docx#chunk3495)

[When the thing, the existence of which we assign to a previous time, had been the object of our senses, and when the time to which we assign it is the time when it had so been the object of our senses, the whole is Memory. In this case, Memory, and Belief, are but two names for the same thing. Memory is, in fact, a case of Belief. Belief is a general word. Memory is one of the species included under it. Memory is the belief of a past existence, as Sensation is the belief of a present existence. When I say, that I remember the burning of Drury-Lane Theatre; the \_remembering\_ the event, and \_believing\_ the event, are not distinguishable feelings, they are one and the same feeling, which we have two ways of naming. The associations included in Memory we have already endeavoured to trace. It is a case of that indissoluble connexion of ideas which we have found in the preceding article to constitute belief in present existences. When I remember the burning of Drury-Lane Theatre, what happens? We can mark the following parts of the process. First, the idea of that event is called up by association; in other words, the copies of the {360} sensations I then had, closely combined by association. Next, the idea of the sensations calls up the idea of myself as sentient; and that, so instantly and forcibly, that it is altogether out of my power to separate them. But when the idea of a sensation forces upon me, whether I will or no, the idea of myself as that of which it was the sensation, I remember the sensation. It is in this process that memory consists; and the memory is the Belief. No obscurity rests on any part of this process, except the idea of \_self\_, which is reserved for future analysis. The fact, in the mean time, is indisputable; that, when the idea of a sensation, which I have formerly had, is revived in me by association, if it calls up in close association the idea of myself, there is memory; if it does not call up that idea, there is not memory; if it calls up the idea of myself, it calls up the idea of that train of states of consciousness which constitutes the thread of my existence; if it does not call up the idea of myself, it does not call up the idea of that train, but some other idea. A sensation remembered, then, is a sensation placed, by association, as the consequent of one feeling and the antecedent of another, in that train of feelings which constitute the existence of a conscious being. All this will be more evident, when what is included in the notion of Personal Identity is fully evolved.  
The case of Belief in past existences which have not been the object of our senses, resolves itself into the belief, either of testimony, or of the uniformity of the laws of nature; both of which will, after a few intervening expositions, be fully explained.  
3. The process which we denote by the words, {361} "Belief in future events," deserves, on account of its importance, to be very carefully considered. That it is a complex process, will very speedily appear. Our endeavour shall be to resolve it into its elements; in doing which, we shall see whether it consists wholly of the elements with which we have now become familiar, or whether it is necessary to admit the existence of something else.  
I believe that, to-morrow, the light of day will be spread over England; that the tide will ebb and flow at London-bridge; that men, and houses, and waggons, and carriages, will be seen in the streets of this metropolis; that ships will sail, and coaches arrive; that shops will be opened for their customers, manufactories for their workmen, and that the Exchange will, at a certain hour, be crowded with merchants. Now, in all this, what is involved?  
First of all, in the Belief of any future event, there is, of course, involved the idea of the event. It will be immediately understood, from what has been already adduced, that there can be no Belief in any existence, without an idea of that existence. If I believe in the light of day to-morrow, I must have an idea of it; if I believe in the flux and reflux of the water at London-bridge, I must have ideas of those several objects; and so of all other things.  
In the next place; as it has already been shewn, that we cannot call up any idea by willing it; and that none of our ideas comes into existence but by association; the idea which forms the fundamental part of Belief is produced by association. Ideas and association, then, are necessary parts of belief.](56441.docx#chunk3496)

[{362} But there can be no idea of the future; because, strictly speaking, the future is a nonentity. Of nothing there can be no idea. It is true we can have an idea of that which never existed, and which we do not suppose ever will exist, as of a centaur; but this is a composition of the ideas of things which have existed. We can conceive a sea of milk, because we have seen a sea, and milk; a mountain of gold, because we have seen a mountain, and gold. In the same manner we proceed with what we call the future. The ideas which I have recently enumerated as parts of my belief of to-morrow; the light of day, the throng in the streets, the motion of the tide at London-bridge, are all ideas of the past. The general fact, indeed, is not a matter of dispute. Our idea of the future, and our idea of the past, is the same; with this difference, that it is accompanied with retrospection in the one case, anticipation in the other. What retrospection is, we have already examined. It is Memory. What Anticipation is, we are now to inquire; and to that end it is necessary to recall, distinctly, some important facts which we have already established.  
The fundamental law of association is, that when two things have been frequently found together, we never perceive or think of the one without thinking of the other. If the visible idea of a rose occurs to me, the idea of its smell occurs along with it; if the idea of the sound of a drum occurs to me, the visible idea of that instrument occurs along with it.  
Of these habitual conjunctions, there is none with which we are more incessantly occupied, from the {363} first moment of our existence to the last, and in which we are more deeply interested, than that of antecedent and consequent. Of course there is none between the ideas of which the association is more intimate and intense.  
In fact, our whole lives are but a series of changes; that is, of antecedents and consequents. The conjunction, therefore, is incessant; and, of course, the union of the ideas perfectly inseparable. We can no more have the idea of an event without having the ideas of its antecedent and \*its consequents, than we can have the idea and not have it at the same time. It is utterly impossible for me to have the visible idea of a rose, without the idea of its having grown from the ground, which is its antecedent; it is utterly impossible for me to have the idea of it without the ideas of its consistence, its smell, its gravity, and so on, which are its consequents.  
Of the numerous antecedents and consequents, forming the matter of our experience, some are constant, some are not. Of course the strength of the association follows the frequency. The crow is seen flying as frequently from east to west, as from west to east; from north to south, as from south to north; there is, therefore, no association between the flight of the crow and any particular direction. Not so with the motion of a stone let go in the air: that takes one direction constantly. The order of antecedent and consequent is here invariable. The association of the ideas, therefore, is fixed and inseparable. I can no more have the idea of a stone let go in the air, and not have the idea of its dropping to the {364} ground, than I can have the idea of the stone, and not have it, at the same time.[102]  
[Editor's footnote 102: The theory maintained so powerfully and with such high intellectual resources by the author, that Belief is but an inseparable association, will be examined at length in a note at the end of the chapter. Meanwhile let it be remarked, that the case of supposed inseparable association given in this passage, requires to be qualified in the statement. We cannot, indeed, think of a stone let go in the air, without having the idea of its falling; but this association is not so strictly inseparable as to disable us from having the contrary idea. There are analogies in our experience which enable us without difficulty to form the imagination of a stone suspended in the air. The case appears to be one in which we can conceive both opposites, falling and not falling; the incompatible images not, of course, combining, but alternating in the mind. Which of the two carries belief with it, depends on what is termed Evidence.--\_Ed.\_]  
Where the sequence of two events is merely casual, it passes speedily away from the mind; because it is not associated with the idea of any thing in which we are interested. The things in which we are interested, are the immediate antecedents of our pleasures and pains, and the ideas of them are all inseparably associated with constant conjunctions. The association of the ideas of a constant antecedent and consequent, therefore, has both causes of strength, the interesting nature of the ideas, and the frequency of conjunction, both at their greatest height. It follows, that it should be the most potent and inseparable of all the combinations in the mind of man.](56441.docx#chunk3497)

[As we are thus incessantly, and thus intensely, occupied with cases of constant conjunction, while cases of casual conjunction pass slightly over the mind, and {365} quickly vanish from our consciousness, every event calls up the idea of a constant antecedent. The association is so strong, that the combination is necessary and irresistible. It often enough, indeed, happens, that we do not know the constant antecedent of an event. But never does it fail to call up the idea of such an antecedent; and so inseparably, that we can as little have and not have the idea of an event, as we can have the idea of it, and not have the idea of an inseparable antecedent along with it.--Ignorant, sometimes, of the constant antecedents of such and such events, we find them out by subsequent inquiry. Those cases of successful investigation still further strengthen the association. All that we call good, and all that we call evil, depend so entirely upon those constant conjunctions, that we are necessarily under the strongest stimulus to find them out, and to trace them with greater and greater accuracy. Thus we very often find a constancy of sequence, in which we acquiesce for a while; but after a time discover, that though constant, indeed, it is not immediate; for, that between the event and supposed antecedent, several antecedents intervene. At first we regard the ignition of the gunpowder, as the immediate antecedent of the motion of the ball. Better instructed, we find that a curious process intervenes. The constancy of the sequence is always more certain, the more nearly immediate the antecedent is. And so frequent is our detection of antecedents, more immediate than those which we have just observed, that an association is formed between the idea of every antecedent, and that of another antecedent, as yet unknown, intermediate between it and the consequent which we {366} know. In no sequence do we ever feel satisfied that we have discovered all. We see a spark ignite the gunpowder, we see one billiard-ball impel another. Though we consider these as constant antecedents and consequents, the idea of something intermediate is irresistibly conjoined. To this, though wholly unknown, we annex a name, that we may be able to speak of it. The name we have invented for this purpose is POWER. Thus, we conceive that it is not the spark which ignites the gunpowder, but the \_power\_ of the spark; it is not one billiard-ball that moves the other, but the \_power\_ of the ball. The Power, in this case, is a \_supposed\_ consequent of the moving ball, and antecedent of the moved; and so in all other cases.  
But the idea of an event does not call up the idea of its constant antecedent in closer and more intense association, than it calls up that of its consequent or consequents. I cannot have the idea of water, without the idea of its mobility, its weight, and other obvious properties. I cannot have the idea of rhubarb, without the idea of its nauseous taste, and other familiar properties. I cannot have the idea of the stroke of a sword upon the head of a man, without the idea of a wound inflicted on his head. I cannot have the idea of my falling from a ship into the middle of the sea, without the idea of my being drowned. I cannot have the idea of my falling from the top of a high tower, without having the idea of my being killed by the fall. If I have the first idea, the second forces itself upon me. The union has in it all that I mark by the word necessity; a sequence, constant, immediate, and inevitable.  
This great law of our nature shews to us {367} immediately in what manner our idea of the future is generated. Night has regularly been followed by morning. The idea of night is followed by that of morning; the idea of morning is followed by that of the events of the morning, the gradual increase of light, the occupations of men, the movements of animals and objects, and all their several successions from morning till night. This is the idea of to-morrow; to this succeeds another to-morrow; and an indefinite number of these to-morrows makes up the complex idea of futurity.  
But I am told, that we have not only the idea of to-morrow, but the belief of to-morrow; and I am asked what that belief is. I answer, that you have not only the idea of to-morrow, but have it \_inseparably\_. It will also appear, that wherever the name belief is applied, there is a case of the indissoluble association of ideas. It will further appear, that, in instances without number, the name belief is applied to a mere case of indissoluble association; and no instance can be adduced in which any thing besides an indissoluble association can be shewn in belief.[103] It would seem {368} to follow from this, with abundant evidence, that the whole of my notion of to-morrow, belief included, is nothing but a case of the inevitable sequence of ideas.](56441.docx#chunk3498)

[[Bain's footnote 103: The case that is most thoroughly opposed to the theory of indissoluble association is our belief in the Uniformity of Nature. Our overweening tendency to anticipate the future from the past is shown prior to all association; the first effect of experience is to abridge and modify a strong primitive urgency. There is, no doubt, a certain stage when association co-operates to justify the believing state. After our headlong instinct has, by a series of reverses, been humbled and toned down, and after we have discovered that the uniformity, at first imposed by the mind upon everything, applies to some things and not to others, we are confirmed by our experience in the cases where the uniformity prevails; and the intellectual growth of association counts for a small part of the believing impetus. Still, the efficacy of experience is perhaps negative rather than positive; it saves, in certain cases, the primitive force of anticipation from the attacks made upon it in the other cases where it is contradicted by the facts. It does not make belief, it conserves a pre-existing belief. (See Note at the end of the chapter.)--\_B.\_]  
This, however, is a part of our constitution, of so much importance, that it must be scrutinized with more than ordinary minuteness.  
Our first assertion was, that in every instance of belief, there is indissoluble association of the ideas. We shall confine our examples, for the present, to that case of belief which is more immediately under our examination; belief in the future. I believe, that if I put my finger in the flame of the candle, I shall feel the pain of burning. I believe, that if a stone is dropped in the air, it will fall to the ground. It is evident that in these cases, the belief consists in uniting two events, the antecedent, and the consequent. There are in it, therefore, two ideas, that of the antecedent, and that of the consequent, and the union of those ideas. The previous illustrations have abundantly shewn us, in what manner the two ideas are united by association, and \_indissolubly\_ united. \_These\_ ingredients in the belief are all indisputable. That there is any \_other\_ cannot be shewn.  
{369} Our second assertion was, that cases of indissoluble association, admitted by all men to be this, and nothing more, are acknowledged as Belief. The facts (which any one may call to recollection), in proof of this assertion, deserve the greatest attention; they shew the mode of investigating some of the most latent combinations of the human mind.  
No fact is more instructive, in this respect, than one, which more than once we have had occasion to make use of; the association of the ideas of distance, extension, and figure, with the sensations of sight. I open my eyes; I see the tables, and chairs, the floor, the door, the walls of my room, and the books ranged upon the walls; some of these things at one distance, some at another; some of one shape and size, some of another. My belief is, that I see all those particulars. Yet the fact is, that I see nothing but certain modifications of light;[104] and that all my belief of seeing the distance, the size, and figure of those several objects, is nothing but the close and \_inseparable\_ association of the ideas of other senses. There is no room for even a surmise that there is any thing in this case but the immediate blending of the ideas of one sense with the sensations of another, derived from the constant concomitance of the sensations themselves.  
[Bain's footnote 104: More guardedly--'I am affected by certain modifications of light.' The word 'see' carries with it too much meaning for the case put. There is also the omission, previously remarked on, to take into account the mental elements due to the movements of the eye--visible forms, magnitudes, and movements.--\_B.\_]  
The case of hearing is perfectly analogous, though {370} not so exact. I am in the dark; I hear the voice of one man, and say he is behind me; of another, and say he is before me; of another, he is on my right hand; another, on my left. I hear the sound of a carriage, and say, it is at one distance; the sound of a trumpet, and say, it is at another. In these cases I believe, not only that I hear a sound, but the sound of a man's voice, the sound of a carriage, the sound of a trumpet. Yet no one imagines that my belief is any thing, in these cases, but the close association of the sounds with the ideas of the objects. I believe, not only that I hear the sound of a man's voice, but that I hear it behind me, or before me; on my right hand, or on my left; at this distance, or at that. The indisputable fact, in the mean time, is, that I hear only a modification of sound, and that the position and distance, which I believe I hear, are nothing but ideas of other senses, closely associated with those modifications of sound. That this state of consciousness, the result of an immediate irresistible association, is identical with the state which we name belief, is proved by a very remarkable experiment, the deception produced by ventriloquism. A man acquires the art of forming that peculiar modification of sound, which would come from this or that position, different from the position he is in; in other words, the sound which is associated, not with the idea of the position he is in, but that of another position. The sound is heard; the association takes place; we cannot help believing that the sound proceeds from a certain place, though we know, that is, immediately recognize, that it proceeds from another.](56441.docx#chunk3499)

[We must not be afraid of tediousness, while we {371} adduce instances in superabundance, to prove that in dissoluble association (in one remarkable class of its cases, which, on account of their vast importance, it is found expedient to distinguish by a particular name) is that state of consciousness, to which we have given the name of BELIEF.  
We are all of us familiar with that particular feeling, which is produced, when we have turned ourselves round with velocity several times. We BELIEVE that the world is turning round.  
The sound of bells, opposed by the wind, appears to be farther off. A person speaking through a trumpet appears to be nearer. Our experience is, that sounds decrease by distance. A sound is decreased by opposition of the wind; the idea of distance is associated; and the association being inseparable, it is belief. A sound is increased by issuing from a trumpet, the idea of proximity is associated, and the association being indissoluble, it is belief.  
In passing, on board of ship, another ship at sea, we believe that she has all the motion, we none: though we may be sailing rapidly before the wind, she making hardly any progress against it.  
When we have been making a journey in a stage coach, or a voyage in a ship, we believe, for some time after leaving the vehicle, that still we are feeling its motion; more especially just as we are falling asleep.  
Nobody doubts, that these, and similar cases of belief, which are very numerous, are all to be resolved into pure association. What the associations are, we leave to be traced by the learner; so many repetitions of the same process, though a useful exercise to him, would be very tedious here.  
{372} The Belief which takes place in Dreaming merits great attention in this part of our inquiry. No belief is stronger than that which we experience in dreaming. Our belief of some of the frightful objects, which occur to us, is such, as to extort from us loud cries; and to throw us into such tremors and bodily agitations, as the greatest real dangers would fail in producing. Not less intense is our belief in the pleasurable objects which occur to us in dreams; nor are the agitations which they produce in our bodies much less surprising. Yet there is hardly any difference of opinion about the real nature of the phenomena which occur in dreaming. That our dreams are mere currents of ideas, following one another by association; not controlled, as in our waking hours, by sensations and will; is the substance of every theory of dreaming. The belief, therefore, which occurs in dreaming, is merely a case of association; and hence it follows that nothing more is necessary to account for Belief.  
There is not a more decisive instance of the identity of Belief and Association, than the dread of ghosts, felt in the dark, by persons who possess, in its greatest strength, the habitual disbelief of their existence. That dread implies belief, and an uncontrollable belief, we need not stay to prove. When the persons of whom we speak feel the dread of ghosts in the dark, the meaning is, that the idea of ghost is irresistibly called up by the sensation of darkness. There is here, indisputably, a case of indissoluble association; nor can it be shewn that there is anything else. In the dark, when this strong association is produced, there {373} is the belief; not in the dark, when the association is not produced, there is no belief.[105]  
[Bain's footnote 105: The efficacy of association is not correctly explained in this instance. The influence of Terror on belief is unquestionably great; but the operation is more complicated than the description given of it in the text. Terror, in the first place, is a depressing passion, and as such impairs the tone of mind suited to the anticipation of coming good, or in the obverse, increases the tendency to anticipate coming evil. In the next place, it is the state most liable to a morbid fixed idea of evil, calamity, or danger. Thirdly, we have learned in the course of our lives to expect numerous possible calamities; and are maintained in serenity only by seeing clearly a good way before us, so as to be sure that none of these possible evils are approaching. Darkness extinguishes for the time our assuring fore-sight, and thus, by removing a counteractive, leaves us a prey to all the demons of mischief. Fourthly, the emotion of Terror has its corresponding imaginations, into which are taken up with avidity all the suggestions of danger that have ever been made to us, including ghosts, hobgoblins, and other agents of calamity, when we have not natural vigour or express training to set them at nought.  
The mere fact communicated to us, on a few occasions, that ghosts appear in the dark, and sometimes perform dreadful deeds, would not by force of association alone produce all that un-nerving effect which children and weak or superstitious persons are liable to when, at night, exposed in a lonely place, or passing a churchyard.--\_B.\_]  
Few men, except those who are accustomed to it, could walk on the ridge of a high house without falling down. Yet the same men could walk with perfect security, on similar footing, placed on the ground. What is the interpretation of this contrariety? Fear, we are told, is that which makes the {374} inexperienced person fall. But fear implies belief. There is nothing, however, in the case, but the intense association of the idea of his falling, with his sight of the position in which he is placed. In some persons this idea is so easily excited, that they cannot look down from even a very moderate height, without feeling giddy, as they call it; that is, without having the apprehension; in other words, the belief, of falling.[11\*]](56441.docx#chunk3500)

[[Mill's footnote 11: The same account, in substance, of some of the last of these phenomena, is given by Dr. Brown; and it may aid the conceptions of the learner, to observe the different modes of exposition used by two different writers.  
"There can be no question, that he who travels in the same carriage, with the same external appearances of every kind by which a robber could be tempted or terrified, will be in equal danger of attack, whether he carry with him little of which he can be plundered, or such a booty as would impoverish him if it were lost. But there can be no question also, that though the probabilities of danger be the same, the fear of attack would, in these two cases, be very different; that, in the one case, he would laugh at the ridiculous terror of any one who journeyed with him, and expressed much alarm at the approach of evening; and that, in the other case, his own eye would watch suspiciously every horseman who approached, and would feel a sort of relief when he observed him pass carelessly and quietly along at a considerable distance behind.  
"That the fear, as a mere emotion, should be more intense, according to the greatness of the object, might indeed be expected; and if this were all, there would be nothing wonderful in the state of mind which I have now described. But there is not merely a greater intensity of fear, there is, in spite of reflection, a greater belief of probability of attack. There is fear, in short, and fear to which we readily yield, when otherwise all fear would have seemed absurd. The reason of this it will perhaps not be difficult for you to discover, if you remember the explanations formerly given by me, of some analogous phenomena. The loss of what is valuable in itself, is of course a great affliction. The slightest possibility of such an evil makes the evil itself occur to us, as an object of conception, though not at first, perhaps, as an object of what can be termed fear. Its very greatness, however, makes it, when thus conceived, dwell longer in the mind; and it cannot dwell long, even as a mere conception, without exciting, by the common influence of suggestion, the different states of mind, associated with the conception of any great evil; of which associate or resulting states, in such circumstances, fear is one of the most constant and prominent. The fear is thus readily excited as an associate feeling; and when the fear has once been excited, as a mere associate feeling, it continues to be still more readily suggested again, at every moment, by the objects that suggested it, and with the perception or conception of which it has recently co-existed. There is a remarkable analogy to this process, in the phenomena of giddiness, to which I have before more than once alluded. Whether the height on which we stand, be elevated only a few feet, or have beneath it a precipitous abyss of a thousand fathoms, our footing, if all other circumstances be the same, is in itself equally sure. Yet though we look down, without any fear, on the gentle slope, in the one case, we shrink back in the other case with painful dismay. The lively conception of the evil which we should suffer in a fall down the dreadful descent, which is very naturally suggested by the mere sight of the precipice, suggests and keeps before us the images of horror in such a fall, and thus indirectly the emotions of fear, that are the natural accompaniments of such images, and that but for those images never would have arisen. We know well, on reflection, that it is a footing of the firmest rock, perhaps, on which we stand, but in spite of reflection, we feel, at least, at every other moment, as if this very rock itself were crumbling or sinking beneath us. In this case, as in the case of the traveller, the liveliness of the mere conception of evil that may be suffered, gives a sort of temporary probability to that which would seem to have little likelihood in itself, and which derives thus from mere imagination all the terror that is falsely embodied by the mind in things that exist around.  
"It is not, then, any simple ratio of probabilities which regulates the rise of our hopes and fears, but of these combined with the magnitude or insignificance of the objects."--\_Lectures on the Philosophy of the Human Mind\_. Lecture LXV., vol. iii., p. 345--347. 2d ed.  
Notwithstanding this, the ideas of Dr. Brown were so far from being clear and settled on the subject, that in the same work, Lecture VI., v. i., p. 115, he seems to affirm, that belief cannot be accounted for by association, but must be referred to instinct; though it is necessary to use the word \_seems\_, for it is not absolutely certain that he does not by \_instinct\_ mean association.--(\_Author's Note\_.)]](56441.docx#chunk3501)

[{375} From these illustrations, then, it does not appear that the anticipation of the future from the past, contains in it any thing peculiar. So far from standing by itself, a phenomenon \_sui generis\_ it is included in one of the most general of the laws of the human mind. When Professor Stewart, therefore, and other writers, erect it into an object of wonder, a prodigy, a thing falling within no general rule; and tell us they can refer it to nothing but instinct; which is as much {376} as to say, to nothing at all; the term instinct, in all cases, being a name for nothing but our own ignorance; they only confess their failure in tracing the phenomena of the mind to the grand comprehensive law of association; to the admission of which, in its full extent, they seem to have had a most unaccountable, and a most unphilosophical aversion;--as if that simplicity, according to which one law is found {377} included in a higher, and that in a yet higher, till we arrive at a few which seem to include the whole, were not as much to be expected in the world of mind, as in the world of matter.[12\*]  
[Mill's footnote 12: Locke, at a period subsequent to the publication of his Essay, seems to have become more sensible of the importance of association. These are his words:--"I think I shall make some other additions to be put into your Latin translation, and particularly concerning the connexion of ideas, which has not, that I know, been hitherto considered, and has, I guess, a greater influence upon our minds, than is usually taken notice of."--\_Locke\_, \_Lett. to Molineux\_, \_April\_ 26\_th\_, 1695.--(\_Author's Note\_.)  
[When Locke wrote the letter here quoted, he had not yet written the chapter of his Essay which treats of the Association of Ideas. That chapter did not appear in the original edition, but was first inserted in the fourth, published in 1690. The intention, therefore, which he expressed to Molineux, has received its fulfilment; and the passage quoted further on in the text, is part of the "addition" which he contemplated.--\_Ed.\_]]  
We have now then explored those states of Consciousness which we call Belief in existences;--Belief in present existences; Belief in past existences; and Belief in future existences. We have seen that, in the most simple cases, Belief consists in sensation alone, or ideas alone; in the more complicated cases, in sensation, ideas, and association, combined; and in no case of belief has any other ingredient been found.  
In accounting for belief in present objects not acting on the senses,--it appeared, that a certain anticipation of the future entered, for so much, into this compound phenomenon; the explanation of which part we were obliged to leave, till the {378} anticipation of the future had undergone investigation. We have now seen that this part, as well as the rest, consists of association. The whole, therefore, of this case of belief, is now resolved into association.  
Mr. Locke, whose expositions of any of our mental phenomena are almost always instructive, even when they stop short of being complete, has given the above account of belief precisely, in one remarkable and very extensive class of cases; those in which the belief is unfounded; which he denominates prejudices.  
"There is," he says,[13\*] "scarce any one that does not observe something that seems odd to him, and is in itself really extravagant in the opinions, reasonings, and actions, of other men.  
[Mill's footnote 13: Essay on the Human Understanding, B. II., Ch. 33.]  
"This sort of unreasonableness is usually imputed to education and prejudice; and for the most part truly enough; though that reaches not the bottom of the disease, nor shews distinctly enough whence it rises, or wherein it lies.  
"Education is often rightly assigned for the cause; and prejudice is a good general name for the thing itself; but yet, I think, he ought to look a little farther, who would trace this sort of madness to the root it springs from, and so explain it, as to shew whence this flaw has its original in very sober and rational minds, and wherein it consists."  
Mr. Locke affords the explanation, which he thought necessary to be given, and proceeds as follows.  
"Some of our ideas have a natural correspondence and connexion one with another. It is the office, and {379} excellence, of our reason, to trace these; and hold them together in that union and correspondence, which is founded in their peculiar beings.  
"Besides this, there is another connexion of ideas, wholly owing to chance or custom. Ideas, that in themselves are not at all of kin, come to be so united in some men's minds, that it is very hard to separate them. They always keep in company; and the one no sooner at any time comes into the understanding, but its associate appears with it. And if they are more than two which are thus united, the whole gang, always inseparable, shew themselves together.  
"This wrong connexion, in our minds, of ideas in themselves loose and independent of one another, has such an influence, and is of so great force, to set us awry in our actions, as well moral as natural, passions, reasonings, and notions themselves; that perhaps there is not any one thing that deserves more to be looked after.  
"The ideas of goblins and sprights have really no more to do with darkness than light. Yet let but a foolish maid inculcate these often in the mind of a child, and raise them there together, possibly he shall never be able to separate them again so long as he lives; but darkness shall ever afterwards bring with it those frightful ideas, and they shall be so joined, that he can no more bear the one than the other.](56441.docx#chunk3502)

["A man receives a sensible injury from another; thinks on the man and that action over and over; and by ruminating on them strongly, or much in his mind, so cements those two ideas together, that he makes them almost one."  
"When this combination is settled, and while it {380} lasts, it is not in the power of reason to help us and relieve us from the effects of it. Ideas in our minds, when they are there, will operate according to their nature and circumstances. And, here, we see the cause why Time cures certain affections, which reason, though in the right, has not power over, nor is able, against them, to prevail with those who are apt to hearken to it in other cases."  
After adducing various examples, to illustrate the effect of these associations, in producing both vicious affections, and absurd opinions, he thus concludes:  
"That which thus captivates our reasons, and leads men blindfold from common sense, will, when examined, be found to be what we are speaking of. Some independent ideas of no alliance to one another, are, by education, custom, and the constant din of their party, so coupled in their minds, that they always appear there together; and they can no more separate them in their thoughts, than if there were but one idea; and they operate as if they were so. This gives sense to jargon, demonstration to absurdity, and consistency to nonsense; and is the foundation of the greatest, I had almost said, of all, the errors in the world."  
Such is Mr. Locke's account of wrong belief, or error. But wrong belief is belief, no less than right belief. Wrong belief, according to Locke, arises from a bad association of ideas. Right belief, then, arises from a right association of ideas; and this also was evidently Locke's opinion. It is, thus, association, in both cases; only, in the case of wrong belief, the association is between ideas which ought not to {381} be associated; in the case of right belief, it is between ideas which ought to be associated. In the case of right belief, the association is between ideas which, in the language of Locke, "have a natural correspondence and connexion one with another:" in the case of wrong belief, it is between ideas, which "in themselves are not at all of kin, and are joined only by chance or custom." The ideas of the colour, shape, and smell of the rose; the ideas of the spark falling on the gunpowder, and the explosion,--are the sorts of ideas which are understood, by Mr. Locke, as having "a natural correspondence and connexion." Ideas, such as those of darkness, with those of ghosts; of the miseries suffered at school, with the reading of books,--are the kind which he describes as "not of kin, and united in the mind only by chance or custom." This, put into accurate language, means, that when the ideas are connected in conformity with the connexions of things, the belief is right belief; when the ideas are connected not in conformity with the connexions of things, the belief is wrong belief. The ideas, however, which are connected in conformity with the connexions among things, are connected by custom, as much as those which are connected not in conformity with those connexions. And the custom which unites them in conformity, is by far the most common of the two. It is, in fact, the regular, the ordinary, the standard custom, the other only constitutes the exceptions.  
II. We have divided Belief into, 1, Belief in events, real existences; 2, Belief in testimony; 3, Belief in the truth of propositions.  
Though this division, suggested by the ordinary {382} forms of language, appeared to me didactically convenient, it is not logically correct. The expression, "Belief in testimony," is elliptical. When completed, it becomes "Belief in events upon the evidence of testimony." There are then, in reality, only two kinds of Belief; 1. Belief in events or real existences; and 2. Belief in the truth of Propositions. But Belief in events or real existences has two foundations; 1. our own experience; 2. the testimony of others. The first of these we have examined, the consideration of the second remains.  
When we begin, however, to look at the second of these foundations more closely, it soon appears, that it is not in reality distinct from the first. For what is testimony? It is itself an event. When we believe any thing, therefore, in consequence of testimony, we only believe one event in consequence of another. But this is the general account of our belief in events. It is the union of the ideas, of an antecedent, and a consequent, by a strong association. I believe it is one o'clock. Why? I have just heard the clock strike. \_Striking of the clock\_, antecedent; \_one o'clock\_, consequent; the \_second\_ closely associated with the \_first\_. The striking of the clock is in fact a species of testimony. What does it testify? Not one event, but an infinite number of events, of which the term "one o'clock" is the name. At every instant in the course of the day, a number of events are taking place, some known to us, some unknown. The term one o'clock, is the name of those which take place at a particular point of the diurnal revolution. I believe in them all upon the testimony of the clock. Why? From experience;--every one would directly and {383} truly reply. I have found the events constantly, or at least very regularly, conjoined. From junction of the events, junction of the ideas; in other words, belief.  
If proof, only, were wanted, this would suffice. For the purpose, however, of instruction, tuition, training, a more minute developement of this important case of belief seems too useful to be dispensed with, notwithstanding the tediousness which so many repetitions of the same process are too likely to produce.](56441.docx#chunk3503)

[The watchman calling the hour, is a case of human testimony. That the account of our belief, in this case, is precisely the same as that in the case of the striking of the clock, it is wholly unnecessary to prove. But if our reliance on testimony in one case is pure experience, it may reasonably be inferred that it is so in all.  
The forms of expression, which we apply to this case of belief, are very misleading. We say, "we believe a man," or, "we believe his testimony." "We attach belief to the man," or, "to his testimony." In these expressions, the name belief is applied to the wrong event; to the antecedent, instead of the consequent. What we mean to say is, that we believe the consequent, the thing testified, not the antecedent, the speaking of the words. The words the man uses, are, to us, sensations: belief that he uses the words, is not what is meant by belief in his testimony. The same form of expression is perfectly absurd, when applied to other cases. We never say that we believe the flame of the candle, or we attach belief to the flame of the candle, when we mean to state the belief, that a finger will be burnt if it is put into the flame; {384} we never say we believe the spark, when we mean to express our belief of an explosion when the spark falls upon the gunpowder.  
The only question, then, is, in what manner the words of the testifier, the antecedent, come to be so united with the idea of the thing testified, as to constitute belief. And surely there is no difficulty here, either in conceiving, or admitting the process. Words call up ideas by association, solely. There is no natural connexion between them. The manner in which words are applied to events, I know most intimately by my own experience. I am constantly, and, from the first moment I could use them, have constantly been, employing words in exact conformity with events. Cases occur in which I do not, but they are few in comparison with those in which I do. It has been justly remarked, that the greatest of liars speak truth a thousand times for once that they utter falsehood. The connexion between the use of words, and the idea of conformable existence, is, of course, established into one of the strongest associations of the human mind. In other words, belief, in consequence of testimony, is, strictly, a case of association. That we interpret other men's actions by our own, no one doubts; and that we do so entirely by association has already been proved.  
In accounting for belief in past existences where it is not memory, we have found that it is resolvable into belief in testimony, and in the uniformity of the laws of nature; and the explanation of this we postponed till the cases of belief in testimony, and in the uniformity of the laws of nature, should be expounded. A few words will now suffice to connect the {385} explanations formerly given with those which have now been presented.  
The two cases, as we have seen, resolve themselves into one; as belief in testimony is but a case of the anticipation of the future from the past; and belief in the uniformity of the laws of nature is but another name for the same thing.  
I believe the event called the fire of London, upon testimony. I believe that the stranger who now passes before my window, had a father and mother, was once an infant, then a boy, next a youth, then a man, and that he has been nourished by food from his birth; all this, from my belief in the uniformity of the laws of nature.  
After the preceding developments, it is surely unnecessary to be minute in the analysis of these instances. I have had experience, of a constant series of antecedents and consequents, in the life of man; generation, birth, childhood, and so on; as I have had of pain from putting my finger in the flame. A corresponding association is formed. If the sight of a stranger calls up the idea of his origin and progress to manhood, the ordinary train of antecedents and consequents is called up; nor is it possible for me to prevent it. The association is indissoluble, and is one of the cases classed under the name of Belief.  
The explanation is still more simple of my belief in the fire of London. The testimony in this case is of that sort which I have always experienced to be conformable to the event. Between such testimony, and the idea of the event testified, I have, therefore, an indissoluble association. The testimony uniformly calls up the idea of the reality of the event, so closely, {386} that I cannot disjoin them. But the idea, irresistibly forced upon me, of a real event, is Belief.[106]  
[Bain's footnote 106: The belief in Testimony is derived from the primary credulity of the mind, in certain instances left intact under the wear and tear of adverse experience. Hardly any fact of the human mind is better attested than the primitive disposition to receive all testimony with unflinching credence. It never occurs to the child to question any statement made to it, until some positive force on the side of scepticism has been developed. Gradually we find that certain testimonies are inconsistent with fact; we have, therefore, to go through a long education in discriminating the good testimonies from the bad. To the one class, we adhere with the primitive force of conviction that in the other class has been shaken and worn away by the shocks of repeated contradictions.--\_B.\_]](56441.docx#chunk3504)

[It is in this way that belief in History is to be explained. It is because I cannot resist the evidence; in other words, because the testimony calls up irresistibly the idea, that I believe in the battle of Marathon, in the existence of the Thirty Tyrants of Athens, in that of Socrates, Plato, and so on.  
III. We come now to what we set out with stating as the third case of Belief; but which, as there are in reality but two kinds of belief, is, strictly speaking, the second,--I mean Belief in the Truth of Propositions; in other words, verbal truths.  
The process by which this Belief is generated, or rather the combination wherein it consists, has, by the writers on Logic, at least those in the Latin and modern languages, been called JUDGMENT. This, however, is a restricted sense. In general, the word Judgment is used with more latitude. Sometimes it is nearly co-extensive with Belief, excluding hardly {387} any but the sudden and momentary cases. We should hardly say, A man \_judges\_ there are ghosts, who is afraid of them in the dark, but firmly believes his fear is unfounded; or \_judges\_ the surgeon to be noxious, whom he shudders at the sight of, from recollection of the terrible operation which he underwent at his hands. In all cases, however, either of deliberate or well-founded belief, we seem to apply the word judgment without impropriety. I judge that I see the light, that I hear the drum, that my friend speaks the truth, that water is flowing in the Ganges.  
All Belief of events, except that of our present sensations, and ideas, consists, as we have seen, in the combination of the ideas of an antecedent and a consequent. The antecedent is sometimes simple, sometimes compound, being not one event, but various events taken together. These varieties in the antecedent constitute two distinguishable cases of belief. The last of them, that in which the antecedent is complex, is that in which the term judgment is most commonly applied. Again, there are two cases of complex antecedent, one, in which all the events are concordant; another, in which they are not all concordant. It is to this last case that the term judgment is most peculiarly applied. Thus, it is not usual to say, that we judge we shall feel pain if we put a finger in the flame of the candle. But if we saw two armies ready to engage, one of which had considerable superiority, both in numbers and discipline, we should say we judge that it would gain the victory. This case, however, of belief, where the antecedent is complex, will receive additional illustration farther on. {388} We have now to consider the case of Belief in the truth of propositions.  
PROPOSITION is a name for that form of words which makes a predication. What Predication is, of what parts it consists, what end it serves, and into how many kinds it is divided, we have already explained. It remains to inquire what is meant by the TRUTH of a Predication, and what state of consciousness it is which is called the recognition or BELIEF of that truth.  
Predication consists essentially in the application of two marks to the same thing. Of this there are two remarkable cases; one, That in which two names of equal extent are applied to the same thing; another, That in which two names, one of less, another of greater extent, are applied to the same thing. The questions we have to resolve are, What is meant by truth in these cases; and, What is the process, or complex state of consciousness, which is called assent to the proposition, or belief of it.  
And, first, as to the case of two names of equal extent, as when we say, "Man is a rational animal;" here the two names are, "Man," and "Rational animal," exactly equivalent; so that "man" is the name of whatever "rational animal" is the name of; and "rational animal" is the name of whatever "man" is the name of. This coincidence of the names is all that is meant by the truth of the proposition; and my recognition of that coincidence is another name for my belief in its truth.  
Now, how is it that I recognise two names as equivalent? About this, there will not be any dispute. I recognise the meaning of names solely by {389} association. I recognise that such a name is of such a meaning, by association. I recognise that another name is of the same signification, by the same means. That I recognise the meaning of the last, whatever it is, by association, cannot be doubted, because it is by this that the meaning of every word is established. There is, however, another fact; that I recognise the meaning in the second case, as the same with the meaning in the first case. What is the process of this recognition? The word "Man" is the mark or name of a certain cluster of ideas. A certain cluster of ideas I know to be what it is, by having it. Having it, and knowing it, are two names for the same thing. Having it, and having it again, is knowing it, and knowing it again; and that is the recognition of its sameness. It is a single name for the two states of consciousness. This, then, is all that is meant by our belief in the truth of a proposition, the terms of which are convertible, or of equal extent.](56441.docx#chunk3505)

[When of two names, applied to the same thing, one is of less, another of greater extent, the association is more complex; but in that is all the difference. Thus, when I believe the truth of the proposition, "Man is an animal," the meaning of the name "man" is called up by association, and the meaning of the name "animal" is called up by association. Thus far is certain. But there is something further. I recognise, that "animal" is a name of whatever "man" is a name of, and also of more. In having the meaning of the name "man" called up by association, that is, in having the ideas, I recognise that "man" is a name of James, and John, and Homer, and Socrates, and all the individuals of the class. {390} This is pure association. In having the meaning of the name "animal" called up by association, I recognise that it is a name of James, and John, and all the individuals of the same class, as well as of all the individuals of other classes; and this is all that is meant by my Belief in the truth of the proposition. Man is the name of one cluster of ideas; animal is the name of a cluster, including both this and other clusters. The latter cluster is partly the same with, and partly different from, the former. But having two clusters, and knowing them to be two, is not two things, but one and the same thing; knowing them in the case in which I call them same, and knowing them in the case in which I call them different, is still having them, having them such as they are, and nothing besides. In this second case also, of the belief of a proposition, there is, therefore, nothing but ideas, and association.  
We have already shewn, under the head NAMING, when explaining the purpose to which Predication is subservient, that all Predication may be strictly considered as of one kind, the application to the same thing of another name of greater extent; in other words, that Predication by what Logicians call the Difference, Property, or Accident of a thing, may be reduced to Predication by the Genus or Species; but as there is a seeming difference in these latter cases, a short illustration of them will probably be useful.  
Thus, suppose I say, "Man is rational," and that I choose to expound it, without the aid of the word animal, understood; what is there in the case? The word "man," marks a certain cluster of ideas. "Rational" marks a portion of that cluster. In the {391} cluster marked "man," the cluster marked "rational" is included. To recognise this, is also called believing the proposition. But to have one cluster of ideas, and know what it is; then another, and know what it is, is merely to have the two clusters. To have a second cluster, part of a first, and to know that it is a part of the first, is the same thing.  
The peculiar property of that class of words to which "Rational" belongs, must here be recollected. They are the \_connotative\_ class. Beside marking some thing peculiarly, they mark something else in conjunction; and this last, they are said to \_connote\_. Thus the word "rational," beside the part of the cluster, man, which it peculiarly marks, connotes, or marks in conjunction with it, the part included under the word animal  
It will be easy to apply the same explanation to all other cases. I say, the rose is red. Red is a connotative term, distinctively marking the idea of red. The idea of red is part of the cluster I mark by the word rose.  
Take a more obscure expression; Fire burns. It is very obvious, that in the cluster of ideas I mark by the word fire, the idea of burning is included. To have the idea, "fire," therefore, and the idea "burning," called up by the names standing in predication, is to believe the proposition.  
The Predications, "Virtue is lovely," "Vice is hateful," and the like, all admit of a similar exposition. In the cluster "virtue," the idea of loveliness is included; in the cluster "vice," that of hatefulness is included. Such propositions, therefore, merely say, that what is a part of a thing, is a part of it. The {392} two words call up the two ideas; and to have two ideas, one a part of another, and know that one is part of another, is not two things, but one and the same thing. To have the idea of rose, and the idea of red, and to know that red makes part of rose, is not two things, but one and the same thing.  
Little more is necessary to explain this case of Belief in the truth of Propositions. Propositions are formed, either of general names, or particular names, that is, names of individuals. Propositions consisting of general names are by far the most numerous class, and by far the most important. The preceding exposition embraces them all. They are all merely verbal; and the Belief is nothing more than recognition of the coincidence, entire or partial, of two general names.](56441.docx#chunk3506)

[The case of Propositions formed of particular names, is different, and yet remains to be explained. "Mr. Brougham made a speech in the House of Commons on such a day." The Predicate, "making a speech in the House of Commons," is neither general, so as to include the subject, "Mr. Brougham," as in a species; nor is the cluster of ideas, marked by the predicate, included in the cluster marked by the subject, as a part in its whole. The proposition marks a case either of experience, or of testimony. If I heard the speech, the proposition is an expression of the Memory of an event; Mr. Brougham, antecedent, and making a speech, consequent; and the Belief of the Proposition, is another name for the Memory of the Event. If I did not hear it, Belief of the proposition, is belief in the testimony of those who say they heard it.  
{393} As all propositions relating to individual objects are, after this manner, marks either of other men's testimony, or of our own experience, what belief, in these cases, is, has already been explained.  
Propositions relating to individuals may be expressions either of past, or of future events. Belief in past events, upon our own experience, is memory; upon other men's experience, is Belief in testimony; both of them resolved into association. Belief in future events, is the inseparable association of like consequents with like antecedents.  
It is not deemed necessary to unfold these associations. It has been already done. It seems enough, if they are indicated here.[107] [108]  
[Bain's footnote 107: The author has treated in different places several questions intimately allied. These are:--  
1. The essential nature of the state of mind called Belief, the mental region whence it springs, or the phenomena that it is to be classed with--whether Intellect, Feeling, or Will.  
2. The belief in the Past, and the belief in the Future; in what respect they differ from belief in the present. Inseparably implicated with this, if not prior to it and preparatory to it, is the difference between ideas of Memory and ideas of Imagination.  
3. The nature of our continuous Mental Life, or Identity; or what is meant by the Permanent Existence of Mind.  
The chapters on Memory, and on Belief, and the section on Identity (Chap. XIV.), all treat of these questions, and contain profound original views on them all.  
As regards the nature of Belief, he errs (in common with philosophers generally) in calling it a purely intellectual state. The consequence is to mar the explanations of the other points.  
He displays a remarkably just and penetrating insight into the differences between Memory and Imagination, and between {394} our own self or Personality, and the personality of others; whereby he fully accounts for what is involved in Personal Identity.  
To resolve the difficult phenomenon of Belief in Memory, of which the belief in the Permanent Existence of Mind is merely another expression, we must clear up the foundations of the state of Belief in general.  
The prevailing error on this subject consists in regarding Belief as mainly a fact of the Intellect, with a certain participation of the feelings. The usual assumption is, that if a thing is conceived in a sufficiently vivid manner, or if two things are strongly associated in the mind, the state of belief is thereby induced.  
A better clue to the real character of belief is found in the connexion between faith and works. The practical test applied to a man's belief in a certain matter, is his acting upon it. A capitalist's trust in the soundness of a project, is shown by his investing his money.  
In its essential character, Belief is a phase of our active nature,--otherwise called the Will. Our tendency to action, under special circumstances, assumes the aspect called belief; as in other circumstances, it takes the form of Desire, and in a third situation, appears as Intention; none of all which are essential to voluntary action in its typical form.  
The state of belief or of disbelief is manifested when we are pursuing an Intermediate End. In masticating something sweet, the fruition of the sweetness sustains the energy of the will; there is no case for the believing function properly so called, any more than there is for Desire, Deliberation, or Resolution. In going to a shop to purchase sweets, there is wanting this immediate support of the voluntary energies; the support grows out of an ideal state, the anticipation of the pleasure of sweetness; this state is called Belief. We are said to believe that what we are going to purchase will impart an agreeable sensation. The state is one of degree; we may have a strong belief or a weak belief; the strength having no other measure than the energy of pursuit inspired by it. If we {395} follow the intermediate end with all the avidity shown when we are realizing the full actuality, we have the perfect belief that what we aim at will bring the actuality. If, as often happens, we are less strongly moved than this, our belief is said to be so much weaker. Or, the comparison may be expressed in a different form. If two things are connected together as means and end; and, if on attaining the means, we feel as much elated (the end being something good) as if we had attained the end, then our belief is at the maximum; if less so, our belief is less. The promise made to us by one man gives all the satisfaction of the performance; the promise of another man gives a very inferior satisfaction; the comparison measures our comparative trust in the two men.](56441.docx#chunk3507)

[So far the matter seems plain. The real difficulty lies in assigning the mental origin or seat of the believing attitude. The view to be maintained in this note is, that the state of belief is identical with the activity or active disposition of the system, at the moment, and with reference to the thing believed. Now as there are various sources of activity, so there are various sources of belief. These are:--First, Spontaneous Activity, or the mere overflow of energy growing out of the nourishment of the system. Secondly, Voluntary Action, in the strictest signification, or the pursuit of pleasure and the avoidance of pain, under the stimulus of one or other of those states. Thirdly, the tendency of an Idea to become an Actuality, the degree of which tendency accords with the mental excitement attending the idea. Fourthly, the addition of Habit to all the others. Under every one of these four influences, we are prompted to act, and in the same degree disposed to believe. Not one of the tendencies is any guarantee for the truth of the thing believed; which is a somewhat grave consequence of the theory contended for.  
It will now be asked, in what acceptation, or under what circumstances, does mere activity, no matter how arising, constitute, or amount to, the state of belief. There are certain situations where the two states are on the surface the same; the fact of going along a certain road implicates the belief that {396} a certain destination will be reached. Nay, farther, a great amount of natural energy would sustain a vigorous pace, irrespective of the certainty of the goal; while physical feebleness would make one languid, however strong the evidence of the distant good. All this shows that the mental state called believing is of little use without the active power, and that the active power readily simulates the believing state, and makes it seem greater or less than it really is.  
Let us now look at the question in another light. Having a natural fund of activity, with or without the addition of proper volitional impulses, we commence moving in a certain direction, no matter what. We are not necessarily urged to move by any prospect of what we are to find. We act somehow, because action comes upon us; and we take the consequences. Suppose, however, that we encounter a check, in the form of obstruction or pain: this stops our activity in that direction, but does not prevent it from taking another direction. Now, not only does the actual pain arrest our steps, but also the memory of it (if the circumstances are such as to give it a certain degree of strength) is deterring. We avoid that track in the future. With reference to it there is generated a voluntary activity and determination, containing the whole essence of belief; namely, the avoidance of a certain course, before the point of actual pain. This is, to all intents, belief on the side of prospective harm. Equally important is it to remark, that wherever we have not experienced any positive harm, check, or obstruction, we go on as readily and as energetically as ever. Our natural state of mind, our primitive start is tantamount to full confidence or belief; which is broken in upon, only after hostile experiences; by these, the original condition of implicit confidence is impaired; and in certain directions, a positive anticipation or determining volition and belief of evil is substituted. An animal born on a summer morning, and able to move about from the first, would not anticipate darkness; it would behave exactly as if light were never intermitted. A few days experience makes an {397} in-road on this primitive confidence, and modifies it to suit the facts.  
Let us add another circumstance to the foregoing example. Instead of the individual moving blindly on, by mere exuberance or spontaneity, let the movement be favoured by bringing pleasure at every step. In this situation, the whole force of the spontaneity at the time, and the whole force of the will (proportioned to the stimulating pleasure), sustain the movements at a more energetic pace; and there is nothing to counter-work them. The mental disposition is now equivalent to the highest confidence; there is no hesitation, no distrust, nothing but exuberant unrestrained activity. Neither scepticism as to the unknown future, nor a demand for assurance that the present condition is to last, is entertained by the mind. The individual does not inquire whether a precipice, or the lair of a devouring beast be on the track. The ignorance is at once bliss and belief.  
Here, then, we may discern the original tendency of the mind as regards belief. To have gone a certain way with safety and with fruition, is an ample inducement to continue in that particular path. The situation contains all that is meant by full and unbounded confidence that the future and the distant will be exactly what the present is. The primary impulse of every creature is at the farthest remove from a procedure according to Logic. In the beginning, confidence is at its maximum; the course of education is towards abating, and narrowing it, so as to adapt it to the fact of things. Every check is a lesson, destroying to a certain extent the over-vaulting assurance of the natural mind, and planting a belief in evil, at points where originally flourished only the illimitable belief in good.](56441.docx#chunk3508)

[There is thus wrapped up, in the active impulses of our nature, a power of credulity leading us habitually to overstep the experience of the present. We believe in the uniformity of nature with a vengeance. We have to be schooled by adverse encounters, before we are brought within the limits of the real uniformity. Our natural credulity is equally excessive {398} on the side of evil and on the side of good; where we have once suffered we expect always to suffer. In short, whereas to the logician, there is a great gulf between the present and future, the known and the unknown, to the natural man there is not even a break. The early mind laughs the logician's gulf to scorn. All that science or logic has been able to do is to show that at certain points the assumed uniformity is broken in upon; tractable and docile minds learn to respect these exceptions; but wherever an outlet exists, with no barrier, or express prohibition, not only is that outlet followed, it is followed with all the pristine impetuosity of our active nature. The ordinary logician, over-awed by this force of determination, seldom asserts the principle that the present can by no logical implication contain the future, that a present reality holds in itself no warrant for the unknown past, the distant or the future. The barrier that this principle would interpose to our inferences has been carried by assault; the gordian knot is always cut with the sword.  
From the point of view of the logician, a serious difficulty attaches to our belief in the Memory of the Past; the psychologist can refer it to the incontinence of the mind, in moving freely away from the present in any direction, in accounting the step next to be entered upon in the absence of impediment, as secure as the one actually taken.  
Let us consider the process first by reverting to the anticipation of the Future. That a state of things now begun will continue indefinitely is what the mind not only assumes but proceeds upon with a vehemence proportioned to its active endowments and dispositions, until admonished to the contrary by the experience of being checked. All instruction, or corroborating information, is dispensed with at the outset: the burden is always laid upon the denier. Of this tendency of the mind the examples are innumerable, and need only to be indicated. In the default of evidence, on one side, and against what ought to be considered evidence on the other side, we believe that, as we feel now, so we shall feel always. And our belief is not simply giving the benefit of any doubt there may {399} be to the opinion we incline to; it is a powerful impulse, counteracted only by a severe and protracted discipline. Also, we believe that our own feelings exactly measure and correspond to the feelings of every one else. Very few are ever brought within the limits of the actual truth on this point; the primitive tendency is not met by a sufficient force of the requisite education.  
It is the belief in the future that offers the simplest and clearest example of the mind's tendency to overleap the actual, to see no hard line between the present and the remote. The belief in nature's continuance and uniformity has always been in excess. From the very same tendency springs whatever belief we have of our own continued existence and identity. We make light of the difference between the conceived future and the real present.  
Much more subtlety attends the Belief in Memory: the meaning of which is, that, whereas certain ideas recalled by memory are, \_de facto\_, ideas, or mental elements of a kind that imagination might furnish, they yet carry with them the belief that they represent what was once actuality, like any sensation of the present moment.](56441.docx#chunk3509)

[Let us first apply to the case the overweening instinct now fully set forth. To the logician, the past, however recent, is divided by a deep gulf from the present: the idea and the actuality can never be interchanged. It is not so with the mind following its native disposition. I have a present sensation of thirst; in that present consciousness, I have the highest attainable assurance; my action upon it is unhesitating and complete. Let that sensation, however, pass away for one minute, and there remains only the idea which, as a mere idea, by virtue of its recency, may be at its maximum strength. The point now to be explained is, why I believe not merely that I have the idea, which as a fact of present consciousness I am entitled to believe to the utmost, but that the idea was lately a full actuality as much as is my present state of satisfied sensation. The explanation seems to be, that we really make no radical difference between a present and a proximate past; {400} the march of the mind is to and fro, into the past and the future, with the same tendency to act out both, as to act out the present, assuming always the absence of a positive check or break. Such is the inveterate persistence of the natural activity, that the belief in the thirst when present (shown by action in accordance therewith) has a continuing efficacy second only to the belief in a still present state. At the moment of actual thirst, I, in the absence of corrective influences, (and to some degree in spite of these), would be disposed to believe that I always was, and always would be thirsty. The satisfaction that has followed reduces that belief to a fraction of its former state; and my utmost licence of assumption would be, (in the absence of contradictory beliefs) that all my past has been one thirst. The fact is, that, in these moments, when I give full licence to the sway of the idea, by voluntarily remitting attention to my new experience, that idea may swell out into a pitch of mental occupation hardly distinguishable from the real presence; in which case, my past self and my present self are, as it were, one and indivisible; they are freely interchanged; the actual consciousness compounds and contains them both.  
Going another step backward, let us consider the state prior to the thirst; say a consciousness of heat and muscular fatigue. What proof have I that these penultimate states were present in continuity of time and in immediate precedence to the thirst, and are not vagaries of imagination, nor drawn from a remote past, accidentally revived? There seems no other evidence than that already given regarding the proximate state. In surrendering our mind to the idea still remaining, and so imparting a momentary quasi-reality to the state, we have an experience possessing the characteristic features of present reality.  
Another consideration has to be mentioned. The state of transition from reality to reality is a distinct and unmistakeable experience. The transition from a present sensation of thirst to a present sensation of satisfied thirst is a march of its own kind--unique and explicit. There are in it attendant {401} circumstances, not to be confounded with the transition from a present to a past across a break. The recent and proximate state of thirst has a mode of continuity, a setting in contact with the present, such as did not belong to the thirst of yesterday, and still less belongs to the idea of the narrated thirst of another person. No sensation ever comes to us alone, or without a group of collaterals; and the collaterals of the formerly actual, and of the ideal never an actual, are wholly different. (This point has been well illustrated in the text, Chap. X. on Memory). The peculiar link whereby a present actual passes out of actuality into proximate actuality, when it is barely deprived of existence in the real, is a fact that remains and attaches to everything that has been actual; and the unbroken sequence of these is our past life of actuality, clearly marked out from every aggregate of ideas indiscriminately culled and united in a whole of imagination. This last process has its own distinctive collaterals; it is accompanied by numerous shocks of agreement in difference, under the law of similarity; but we do not confound these or other accompaniments with the gliding movement of the mind over the chronological past. Thus to take the extreme instance. We can assume another person's mental state (to a certain degree); and yet we do not fuse that with our own identity. There is a broad line of demarcation between each one's experience that they term their actual, and the assumption of a second person's experience, say of thirst, of fear, of curiosity. Our own past has continuity and fusion, in itself, and a peculiar set of circumstantial surroundings; in general, too, it is easy to remember. The other person's experience is received through a machinery of objective signs, laboriously interpreted, and not realized with the collaterals of an experience of our own; it is shorn of all the beams of our own personality, whether in the present or in the recollected past.](56441.docx#chunk3510)

[The distinction now drawn, (substantially what is exemplified at length in the chapter referred to,) is confirmed by what happens on occasions when memory and imagination are confounded. When a fact is long past, and all but forgotten, {402} the oblivion overtakes the evidentiary collaterals, the marks of continuity that link together what has been one actual state to what has been another actual state. I remember having had the idea or purpose to say or to do something on a certain occasion; but I do not remember whether I actually did or said the thing. The memory of the occasion is incomplete; the links are snapped that connect that idea with my remembered acting at the time referred to; it is not in its place in that authenticated series; and it is not associated with the collateral circumstances that always attend an actual transaction. On the other hand, as is well remarked in the chapter quoted, imagination may simulate remembered reality, when there is wanting the real memory that would people the occasion with authentic circumstances, and when the imagination has been excited and exercised so as to include in its compass the collaterals that go with an experience in the actual.--\_B.\_]  
[Editor's footnote 108: The analysis of Belief presented in this chapter, brings out the conclusion that all cases of Belief are simply cases of indissoluble association: that there is no generic distinction, but only a difference in the strength of the association, between a case of belief and a case of mere imagination: that to believe a succession or coexistence between two facts is only to have the ideas of the two facts so strongly and closely associated, that we cannot help having the one idea when we have the other.  
If this can be proved, it is the greatest of all the triumphs of the Association Psychology. To first appearance, no two things can be more distinct than thinking of two things together, and believing that they are joined together in the outward world. Nevertheless, that the latter state of mind is only an extreme case of the former, is, as we see, the deliberate doctrine of the author of the Analysis; and it has also in its favour the high psychological authority of Mr. Herbert Spencer. Mr. Bain, in the preceding note, as well as in his systematic work, looks at the phenomenon from another side, and pronounces that what constitutes Belief is the power which an {403} idea has obtained over the Will. It is well known and understood that a mere idea may take such possession of the mind as to exercise an irresistible control over the active faculties, even independently of Volition, and sometimes in opposition to it. This, which Mr. Bain calls the power of a Fixed Idea, is exemplified in the cases of what is called fascination: the impulse which a person looking from a precipice sometimes feels to throw himself down it; and the cases of crimes said to have been committed by persons who abhor them, because that very horror has filled their minds with an intense and irrepressible idea of the act. Since an idea is sometimes able to overpower volition, it is no wonder that an idea should determine volition; as it does whenever we, under the influence of the idea of a pleasure or of a pain, will that which obtains for us the pleasure or averts the pain. In this voluntary action, our conduct is grounded upon a relation between means and an end; (that is, upon a constant conjunction of facts in the way of causation, ultimately resolvable into a case of resemblance and contiguity): in common and unanalytical language, upon certain laws of nature on which we rely. Our reliance is the consequence of an association formed in our minds between the supposed cause and its effect, resulting either from personal experience of their conjunction, from the teachings of other people, or from accidental appearances. Now, according to Mr. Bain, when this association between the means and the end, the end calling up the idea of the means, arrives at the point of giving to the idea thus called up a command over the Will, it constitutes Belief. We believe a thing, when we are ready to act on the faith of it; to face the practical consequences of taking it for granted: and therein lies the distinction between believing two facts to be conjoined, and merely thinking of them together. Thus far Mr. Bain: and with this I fully agree. But something is still wanting to the completeness of the analysis. The theory as stated, distinguishes two antecedents, by a difference not between themselves, but between their consequents. But when the consequents differ, the antecedents cannot be the same. An association {404} of ideas is or is not a Belief, according as it has or has not the power of leading us to voluntary action: this is undeniable: but when there is a difference in the effects there must be a difference in the cause: the association which leads to action must be, in some respect or other, different from that which stops at thought. The question, therefore, raised, and, as they think, resolved, by the author of the Analysis and by Mr. Spencer, still demands an answer. Does the difference between the two cases consist in this, that in the one case the association is dissoluble, in the other it is so much more closely riveted, by repetition, or by the intensity of the associated feelings, as to be no longer dissoluble? This is the question we are compelled to face.  
I.](56441.docx#chunk3511)

[In the first place, then, it may be said--If Belief consisted in an indissoluble association, Belief itself would be indissoluble. An opinion once formed could never afterwards be destroyed or changed. This objection is good against the \_word\_ indissoluble. But those who maintain the theory do not mean by an indissoluble association, one which nothing that can be conceived to happen could possibly dissolve. All our associations of ideas would probably be dissoluble, if experience presented to us the associated facts separate from one another. If we have any associations which are, in practice, indissoluble, it can only be because the conditions of our existence deny to us the experiences which would be capable of dissolving them. What the author of the Analysis means by indissoluble associations, are those which we cannot, by any mental effort, at present overcome. If two ideas are, at the present time, so closely associated in our minds, that neither any effort of our own, nor anything else which can happen, can enable us now to have the one without its instantly raising up the other, the association is, in the author's sense of the term, indissoluble. There would be less risk of misunderstanding if we were to discard the word indissoluble, and confine ourselves to the expression which the author employs as its equivalent, inseparable. This I will henceforth do, and {405} we will now enquire whether Belief is nothing but an inseparable association.  
In favour of this supposition there is the striking fact, that an inseparable association very often suffices to command belief. There are innumerable cases of Belief for which no cause can be assigned, except that something has created so strong an association between two ideas that the person cannot separate them in thought. The author has given a large assortment of such cases, and has made them tell with great force in support of his theory. Locke, as the author mentions, had already seen, that this is one of the commonest and most fertile sources of erroneous thought; deserving to be placed high in any enumeration of Fallacies. When two things have long been habitually thought of together, and never apart, until the association between the ideas has become so strong that we have great difficulty, or cannot succeed at all, in separating them, there is a strong tendency to believe that the facts are conjoined in reality; and when the association is closer still, that their conjunction is what is called Necessary. Most of the schools of philosophy, both past and present, are so much under the influence of this tendency, as not only to justify it in principle, but to elect it into a Law of Things. The majority of metaphysicians have maintained, and even now maintain, that there are things which, by the laws of intelligence, cannot be separated in thought, and that these things are not only always united in fact, but united by necessity: and, again, other things, which cannot be united in thought--which cannot be thought of together, and that these not only never do, but it is impossible they ever should, coexist in fact. These supposed necessities are the very foundation of the Transcendental schools of metaphysics, of the Common Sense school, and many others which have not received distinctive names. These are facts in human nature and human history very favourable to the supposition that Belief is but an inseparable association, or at all events that an inseparable association suffices to create Belief.](56441.docx#chunk3512)

[On the contrary side of the question it may be urged, that {406} the inseparable associations which are so often found to generate Beliefs, do not generate them in everybody. Analytical and philosophical minds often escape from them, and resist the tendency to believe in an objective conjunction between facts merely because they are unable to separate the ideas. The author's typical example of an inseparable association, (and there can be none more suited to the purpose,) is the association between sensations of colour and the tangible magnitudes, figures, and distances, of which they are signs, and which are so completely merged with them into one single impression, that we believe we see distance, extension, and figure, though all we really see is the optical effects which accompany them, all the rest being a rapid interpretation of natural signs. The generality of mankind, no doubt, and all men before they have studied the subject, believe what the author says they do; but a great majority of those who have studied the subject believe otherwise: they believe that a large portion of the facts which we seem to see, we do not really see, but instantaneously infer. Yet the association remains inseparable in these scientific thinkers as in others: the retinal picture suggests to them the real magnitude, in the same irresistible manner as it does to other people. To take another of the author's examples: when we look at a distant terrestrial object through a telescope, it appears nearer; if we reverse the telescope it appears further off. The signs by which we judge of distance from us, here mislead, because those signs are found in conjunction with real distances widely different from those with which they coexist in our ordinary experience. The association, however, persists, and is irresistible, in one person as much as in another; for every one recognises that the object, thus looked at, \_seems\_ nearer, or farther off, than we know it to be. But does this ever make any of us, except perhaps an inexperienced child, \_believe\_ that the object is at the distance at which we seem to see it? The inseparable association, though so persistent and powerful as to create in everybody an optical illusion, creates no \_de\_lusion, but leaves our belief as conformable to the realities of fact as if no such illusive appearance had presented {407} itself. Cases similar to this are so frequent, that cautious and thoughtful minds, enlightened by experience on the misleading character of inseparable associations, learn to distrust them, and do not, even by a first impulse, believe a connexion in fact because there is one in thought, but wait for evidence.  
Following up the same objection, it may be said that if belief is only an inseparable association, belief is a matter of habit and accident, and not of reason. Assuredly an association, however close, between two ideas, is not a sufficient \_ground\_ of belief; is not \_evidence\_ that the corresponding facts are united in external nature. The theory seems to annihilate all distinction between the belief of the wise, which is regulated by evidence, and conforms to the real successions and coexistences of the facts of the universe, and the belief of fools, which is mechanically produced by any accidental association that suggests the idea of a succession or coexistence to the mind: a belief aptly characterized by the popular expression, believing a thing because they have taken it into their heads.  
Indeed, the author of the Analysis is compelled by his theory to affirm that we actually believe in accordance with the misleading associations which generate what are commonly called illusions of sense. He not only says that we believe we see figure and distance--which the great majority of psychologists since Berkeley do not believe; but he says, that in the case of ventriloquy "we cannot help believing" that the sound proceeds from the place, of which the ventriloquist imitates the effect; that the sound of bells opposed by the wind, not only appears farther off, but is believed to come from farther off, although we may know the exact distance from which it comes; that "in passing on board ship, another ship at sea, we \_believe\_ that she has all the motion, we none:" nay even, that when we have turned ourselves round with velocity several times, "we believe that the world is turning round." Surely it is more true to say, as people generally do say, "the world \_seems\_ to us to turn round." To me these cases appear so many experimental proofs, that the tendency of an inseparable association to generate belief, even when that {408} tendency is fully effectual in creating the irresistible appearance of a state of things that does not really exist, may yet be impotent against reason, that is, against preponderant evidence.](56441.docx#chunk3513)

[In defence of these paradoxes, let us now consider what the author of the Analysis might say. One thing he would certainly say: that the belief he affirms to exist in these cases of illusion, is but a momentary one; with which the belief entertained at all other times may be at variance. In the case, for instance, of those who, from an early association formed between darkness and ghosts, feel terror in the dark though they have a confirmed disbelief in ghosts, the author's opinion is that there is a temporary belief, at the moment when the terror is felt. This was also the opinion of Dugald Stewart: and the agreement (by no means a solitary one) between two thinkers of such opposite tendencies, reminds one of the saying "Quand un Francais et un Anglais sont d'accord, il faut bien qu'ils aient raison." Yet the author seems to adopt this notion not from observation of the case, but from an antecedent opinion that "dread implies belief, and an uncontrollable belief," which, he says, "we need not stay to prove." It is to be wished, in this case, that he had stayed to prove it: for it is harder to prove than he thought. The emotion of fear, the physical effect on the nervous system known by that name, may be excited, and I believe often is excited, simply by terrific imaginations. That these imaginations are, even for a moment, mistaken for menacing realities, may be true, but ought not to be assumed without proof. The circumstance most in its favour (one not forgotten by the author) is that in dreams, to which may be added hallucinations, frightful ideas are really mistaken for terrible facts. But dreams are states in which all other sensible ideas are mistaken for outward facts. Yet sensations and ideas are intrinsically different, and it is not the normal state of the human mind to confound the one with the other.  
Besides, this supposition of a momentary belief in ghosts breaking in upon and interrupting an habitual and permanent belief that there are no ghosts, jars considerably with the {409} doctrine it is brought to support, that belief is an inseparable association. According to that doctrine, here are two inseparable associations, which yet are so far from exclusively possessing the mind, that they alternate with one another, each Inseparable implying the separation of the other Inseparable. The association of darkness with the absence of ghosts must be anything but inseparable, if there only needs the presence of darkness to revive the contrary association. Yet an association so very much short of inseparable, is accompanied, at least in the absence of darkness, by a full belief. Darkness is in this case associated with two incompatible ideas, the idea of ghosts and that of their absence, but with neither of them inseparably, and in consequence the two associations alternately prevail, as the surrounding circumstances favour the one or the other; agreeably to the laws of Compound Association laid down with great perspicuity and reach of thought by Mr. Bain in his systematic treatise.](56441.docx#chunk3514)

[To the argument, that the inseparable associations which create optical and other illusions, do not, when opposed by reason, generate the false belief, the author's answer would probably be some such as the following. When the rational thinker succeeds in resisting the belief, he does so by more or less completely overcoming the inseparableness of the association. Associations may be conquered by the formation of counter-associations. Mankind had formerly an inseparable association between sunset and the motion of the sun, and this in separable association compelled them to believe that in the phenomenon of sunset the sun moves and the earth is at rest. But Copernicus, Galileo, and after them, all astronomers, found evidence, that the earth moves and the sun is at rest: in other words, certain experiences, and certain reasonings from those experiences, took place in their minds, the tendency of which was to associate sunset with the ideas of the earth in motion and the sun at rest. This was a counter-association, which could not coexist, at least at the same instant, with the previous association connecting sunset with the sun in motion and the earth at rest. But for a long time the new {410} associating influences could not be powerful enough to get the better of the old association, and change the belief which it implied. A belief which has become habitual, is seldom overcome but by a slow process. However, the experiences and mental processes that tended to form the new association still went on; there was a conflict between the old association and the causes which tended to produce a new one; until, by the long continuance and frequent repetition of those causes, the old association, gradually undermined, ceased to be inseparable, and it became possible to associate the idea of sunset with that of the earth moving and the sun at rest; whereby the previous idea of the sun moving and the earth at rest was excluded for the time, and as the new association grew in strength, was at last thrown out altogether. The argument should go on to say that after a still further prolongation of the new experiences and reasonings, the old association became impossible and the new one inseparable; for, until it became inseparable, there could, according to the theory, be no belief. And this, in truth, does sometimes happen. There are instances in the history of science, even down to the present day, in which something which was once believed to be impossible, and its opposite to be necessary, was first seen to be possible, next to be true, and finally came to be considered as necessarily true, and its opposite (once deemed necessary) as impossible, and even inconceivable; insomuch that it is thought by some that what was reputed an impossibility, might have been known to be a necessity. In such cases, the quality of inseparableness has passed, in those minds at least, from the old association to the new one. But in much the greatest number of cases the change does not proceed so far, and both associations remain equally possible. The case which furnished our last instance is an example. Astronomers, and all educated persons, now associate sunset with motion confined to the earth, and firmly believe this to be what really takes place; but they have not formed this association with such exclusiveness and intensity as to have become unable to associate sunset with motion of the sun. On the contrary, the visible appearance still suggests {411} motion of the sun, and many people, though aware of the truth, find that they cannot by any effort make themselves see sunset any otherwise than as the sinking of the sun below the earth. My own experience is different: I find that I can represent the phenomenon to myself in either light; I can, according to the manner in which I direct my thoughts, see sunset either as the earth tilting above the sun, or as the sun dipping below the earth: in the same manner as when a railway train in motion passes another at rest, we are able, if we prevent our eyes from resting on any third object, to imagine the motion as being either in the one train or in the other. How, then, can it be said that there is an inseparable association of sunset with the one mode of representation, and a consequent inability to associate it with the other? It is associated with both, and the one of the two associations which is nearest to being inseparable is that which belief does not accompany. The difference between different people in the ability to represent to themselves the phenomenon under either aspect, depends rather on the degree of exercise which they have given to their imagination in trying to frame mental pictures conformable to the two hypotheses, than upon those considerations of reason and evidence which yet may determine their belief.  
The question still remains, what is there which exists in the hypothesis believed, and does not exist in the hypothesis rejected, when we have associations which enable our imagination to represent the facts agreeably to either hypothesis? In other words, what is Belief?](56441.docx#chunk3515)

[I think it must be admitted, that when we can represent to ourselves in imagination either of two conflicting suppositions, one of which we believe, and disbelieve the other, neither of the associations can be inseparable; and there must therefore be in the fact of Belief, which exists in only one of the two cases, something for which inseparable association does not account. We seem to have again come up, on a different side, to the difficulty which we felt in the discussion of Memory, in accounting for the distinction between a fact remembered, and the same fact imagined. There is a close parallelism between {412} the two problems. In both, we have the difference between a fact and a representation in imagination; between a sensation, or combination of sensations, and an idea, or combination of ideas. This difference we all accept as an ultimate fact. But the difficulty is this. Let me first state it as it presents itself in the case of Memory. Having in our mind a certain combination of ideas, in a group or a train, accompanying or succeeding one another; what is it which, in one case, makes us recognize this group or train as representing a group or train of the corresponding sensations, remembered as having been actually felt by us, while in another case we are aware that the sensations have never occurred to us in a group or train corresponding to that in which we are now having the ideas? This is the problem of Memory. Let me now state the problem of Belief, when the belief is not a case of memory. Here also we have ideas connected in a certain order in our own mind, which makes us think of a corresponding order among the sensations, and we believe that this similar combination of the sensations is a real fact: \_i.e.\_, whether we ever felt it or not, we confidently expect that we should feel it under certain given conditions. In Memory, we believe that the realities in Nature, the sensations and combinations of sensations presented to us from without, \_have\_ occurred to us in an order which agrees with that in which we are representing them to ourselves in thought: in those cases of Belief which are not cases of Memory, we believe, not that they have occurred, but that they would have occurred, or would occur, in that order.  
What is it that takes place in us, when we recognize that there is this agreement between the order of our ideas and the order in which we either had or might have had the sensations which correspond to them--that the order of the ideas represents a similar order either in our actual sensations, or in those which, under some given circumstances, we should have reason to expect? What, in short, is the difference \_to our minds\_ between thinking of a reality, and representing to ourselves an imaginary picture? I confess that I can perceive no escape from the opinion that the distinction is ultimate and primordial. {413} There is no more difficulty in holding it to be so, than in holding the difference between a sensation and an idea to be primordial. It seems almost another aspect of the same difference. The author himself says, in the chapter on Memory, that, a sensation and an idea being different, it is to be expected that the remembrance of having had a sensation should be different from the remembrance of having had an idea, and that this is a sufficient explanation of our distinguishing them. If this, then, is an original distinction, why should not the distinction be original between the remembrance of having had a sensation, and the actually having an idea (which is the difference between Memory and Imagination); and between the expectation of having a sensation, and the actually having an idea (which is the difference between Belief and Imagination)? Grant these differences, and there is nothing further to explain in the phenomenon of Belief. For every belief is either the memory of having had a sensation (or other feeling), or the expectation that we should have the sensation or feeling in some given state of circumstances, if that state of circumstances could come to be realized.  
II.  
That all belief is either Memory or Expectation, will be clearly seen if we run over all the different objects of Belief. The author has already done so, in order to establish his theory; and it is now necessary that we should do the same.  
The objects of Belief are enumerated by the author in the following terms:--1. Events, real existences. 2. Testimony. 3. The truth of propositions. He intended this merely as a rough grouping, sufficient for the purpose if it includes everything: for it is evident that the divisions overlap one another, and it will be seen presently that the last two are but cases of the first.  
Belief in events he further divides into belief in present events, in past events, and in future events. Belief in present events he subdivides into belief in immediate existences present to my senses, and belief in immediate existences not present {414} to my senses. We see by this that he recognises no difference, in a metaphysical sense, between existences and events, because he regards, with reason, objects as merely the supposed antecedents of events. The distinction, however, requires to be kept up, being no other than the fundamental difference between simultaneousness, and succession or change.  
Belief in immediate existences present to my senses, is either belief in my sensations, or belief in external objects. Believing that I feel what I am at this moment feeling, is, as the author says, only another name for having the feeling; with the idea, however, of Myself, associated with it; of which hereafter.](56441.docx#chunk3516)

[The author goes on to analyse Belief in external objects present to our senses; and he resolves it into a present sensation, united by an irresistible association with the numerous other sensations which we are accustomed to receive in conjunction with it. The Object is thus to be understood as a complex idea, compounded of the ideas of various sensations which we have, and of a far greater number of sensations which we should expect to have if certain contingencies were realized. In other words, our idea of an object is an idea of a group of possibilities of sensation, some of which we believe we can realize at pleasure, while the remainder would be realized if certain conditions took place, on which, by the laws of nature, they are dependent. As thus explained, belief in the existence of a physical object, is belief in the occurrence of certain sensations, contingently on certain previous conditions. This is a state of mind closely allied to Expectation of sensations. For--though we use the name Expectation only with reference to the future, and even to the probable future--our state of mind in respect to what \_may\_ be future, and even to what \_might have been\_ future, is of the same general nature, and depends on the same principles, as Expectation. I believe that a certain event will positively happen, because the known conditions which always accompany it in experience have already taken place. I believe that another event will certainly happen \_if\_ the known conditions which always accompany it take place, and those conditions I can produce when I please. I believe {415} that a third event will happen if its conditions take place, but I must wait for those conditions; I cannot realize them at pleasure, and may never realize them at all. The first of these three cases is positive expectation, the other two are conditional expectation. A fourth case is my belief that the event would have happened at any former time if the conditions had taken place at that time. It is not consonant to usage to call this Expectation, but, considered as a case of belief, there is no essential difference between it and the third case. My belief that I should have heard Cicero had I been present in the Forum, and my belief that I shall hear Mr. Gladstone if I am present in the House of Commons, can nowise be regarded as essentially different phenomena. The one we call Expectation, the other not, but the mental principle operative in both these cases of belief is the same.  
The author goes on to say, that the belief that we should have the sensations if certain conditions were realized, that is, if we had certain other sensations, is merely an inseparable association of the two sets of sensations with one another, and their inseparable union with the idea of ourselves as having them. But I confess it seems to me that all this may exist in a case of simple imagination. The author would himself admit that the complex idea of the object, in all its fulness, may be in the mind without belief. What remains is its association with the idea of ourselves as percipients. But this also, I cannot but think, we may have in the case of an imaginary scene, when we by no means believe that any corresponding reality exists. Does the idea of our own personality never enter into the pictures in our imagination? Are we not ourselves present in the scenes which we conjure up in our minds? I apprehend we are as constantly present in them, and as conscious of our presence, as we are in contemplating a real prospect. In either case the vivacity of the other impressions eclipses, for the most part, the thought of ourselves as spectators, but not more so in the imaginary, than in the real, spectacle.  
It appears to me, then, that to account for belief in external {416} objects, we must postulate Expectation; and since all our expectations, whether positive or contingent, are a consequence of our Memory of the past (as distinguished from a representation in fancy), we must also postulate Memory. The distinction between a mere combination of ideas in thought, and one which recals to us a combination of sensations as actually experienced, always returns on our hands as an ultimate postulate.  
The author proceeds to shew how this idea of a mere group of sensations, actual or contingent, becomes knit up with an idea of a permanent Something, lying, as it were, under these sensations, and causing them; this further enlargement of the complex idea taking place through the intimate, or, as he calls it, inseparable association, generated by experience, which makes us unable to imagine any phenomenon as beginning to exist without something anterior to it which causes it. This explanation, seems to me quite correct as far as it goes; but, while it accounts for the difficulty we have in not ascribing our sensations to some cause or other, it does not explain why we accept, as in fact we do, the group itself as the cause. I have endeavoured to clear up this difficulty elsewhere (Examination of Sir William Hamilton's Philosophy), and in preference to going over the ground a second time, I subjoin, at the end of the volume, the chapter containing the explanation. That chapter supplies all that appears to me to be further necessary on the subject of belief in outward objects; which is thus shewn to be a case of Conditional Expectation.](56441.docx#chunk3517)

[It is unnecessary to follow the author into the minute consideration of Belief in the existence of objects not present since the explanation already given equally applies to them. My belief in the present existence of St. Paul's is correctly set forth by the author as consisting of the following elements: I believe that I have seen St. Paul's: I believe that I shall see St. Paul's, when I am again in St. Paul's Churchyard: I believe that I should see St. Paul's, if I were in St. Paul's Churchyard at this instant. All this, as he justly remarks, is Memory or Expectation. And this, or some part of this, is {417} the whole of what is in any case meant by belief in the real existence of an external object. The author adds, I also believe that if any creature whose senses are analogous to my own, is now in St. Paul's Churchyard, it has the present sensation of that edifice. But this belief is not necessary to my belief in the continued existence of St. Paul's. For that, it suffices that I believe I should myself see it. My belief that other creatures would do so, is part of my belief in the real existence of other creatures like myself; which is no more mysterious, than our belief in the real existence of any other objects some of whose properties rest not on direct sensation, but on inference.  
Belief in past existences, when those existences have been perceived by ourselves, is Memory. When the past existences are inferred from evidence, the belief of them is not Memory, but a fact of the same nature as Expectation; being a belief that we \_should have had\_ the sensations if we had been cotemporary with the objects, and had been in the local position necessary for receiving sensible impressions from them.  
We now come to the case of Belief in testimony. But testimony is not itself an object of belief. The object of belief is what the testimony asserts. And so in the last of the author's three cases, that of assent to a proposition. The object of belief, in both these cases, is an assertion. But an assertion is something asserted, and what is asserted must be a fact, similar to some of those of which we have already treated. According to the author, belief in an assertion is belief that two names are both of them names of the same thing: but this we have felt ourselves obliged to discard, as an inadequate explanation of the import of any assertions, except those which are classed as merely verbal. Every assertion concerning Things, whether in concrete or in abstract language, is an assertion that some fact, or group of facts, has been, is, or may be expected to be, found, wherever a certain other fact, or group of facts, is found. Belief in this, is therefore either remembrance that we did have, or expectation that we shall have, or a belief of the same nature with expectation that in {418} some given circumstances we should have, or should have had, direct perception of a particular fact. Belief, therefore, is always a case either of Memory or of Expectation; including under the latter name conditional as well as positive expectation, and the state of mind similar to expectation which affects us in regard to what \_would\_ have been a subject of expectation, if the conditions of its realization had still been possible.  
It may be objected, that we may believe in the real existence of things which are not objects of sense at all. We may. But we cannot believe in the real existence of anything which we do not conceive as capable of acting in some way upon our own or some other being's consciousness; though the state of consciousness it produces may not be called a sensation. The existence of a thing means, to us, merely its capacity of producing an impression of some sort upon some mind, that is, of producing some state of consciousness. The belief, therefore, in its existence, is still a conditional expectation of something which we should, under some supposed circumstances, be capable of feeling.  
To resume: Belief, as I conceive, is more than an inseparable association, for inseparable associations do not always generate belief, nor does belief always require, as one of its conditions, an inseparable association: we can believe that to be true which we are capable of conceiving or representing to ourselves as false, and false what we are capable of representing to ourselves as true. The difference between belief and mere imagination, is the difference between recognising something as a reality in nature, and regarding it as a mere thought of our own. This is the difference which presents itself when Memory has to be distinguished from Imagination; and again when Expectation, whether positive or contingent (i.e. whether it be expectation that we shall, or only persuasion that in certain definable circumstances we should, have a certain experience) has to be distinguished from the mere mental conception of that experience.  
III.  
Let us examine, once more, whether the speculations in the text afford us any means of further analysing this difference.](56441.docx#chunk3518)

[{419} The difference presents itself in its most elementary form in the distinction between a sensation and an idea. The author admits this distinction to be ultimate and primordial. "A sensation is different from an idea, only because it is felt to be different." But, after having admitted that these two states or consciousness are distinguishable from each other in and by themselves, he adds, that they are also distinguishable by their accompaniments. "The accompaniments of a sensation are always generically different from those of an idea. . . . . The accompaniments of a sensation, are all the simultaneous \_objects of sensation\_, together with all those which, to a certain extent, both preceded and followed it. The accompaniments of an idea are not the simultaneous objects of sensation, but \_other ideas\_; namely, the neighbouring facts, antecedent and consequent, of the mental train." There can be no doubt that in those individual cases in which ideas and sensations might be confounded, namely, when an idea reaches or approaches the vivacity of a sensation, the indication here pointed out helps to assure us that what we are conscious of is, nevertheless, only an idea. When, for instance, we awake from a dream, and open our eyes to the outward world, what makes us so promptly recognise that this and not the other is the real world, is that we find its phenomena connected in the accustomed order of our objects of sensation. But though this circumstance enables us, in particular instances, to refer our impression more instantaneously to one or the other class, it cannot be by this that we distinguish ideas at first from sensations; for the criterion supposes the distinction to be already made. If we judge a sensation to be a sensation because its accompaniments are other sensations, and an idea to be an idea because its accompaniments are other ideas, we must already be able to distinguish those other sensations from those other ideas.  
A similar remark is applicable to a criterion between sensations and ideas, incidentally laid down by Mr. Bain in the First Part of his systematic treatise. "A mere picture or \_idea\_ remains the same whatever be our bodily position or {420} bodily exertions; the sensation that we call the actual is entirely at the mercy of our movements, shifting in every possible way according to the varieties of action that we go through." (\_The Senses and the Intellect\_, 2nd ed. p. 381.) This test, like the author's, may serve in cases of momentary doubt; but sensations in general must have been already distinguished from ideas, before we could have hit upon this criterion between them. If we had not already known the difference between a sensation and an idea, we never could have discovered that one of them is "at the mercy of our movements," and that the other is not.  
It being granted that a sensation and an idea are \_ipso facto\_ distinguishable, the author thinks it no more than natural that "the copy of the sensation should be distinguishable from the revival of the idea, when they are both brought up by association." But he adds, that there is another distinction between the memory of a sensation, and the memory of an idea, and it is this. In all Memory the idea of self forms part of the complex idea; but in the memory of sensation, the self which enters into the remembrance is "the sentient self, that is, seeing and hearing:" in the memory of an idea, it is "not the sentient self, but the conceptive self, self having an idea. But" (he adds) "myself percipient, and myself imagining, or conceiving, are two very different states of consciousness: of course the ideas of these states of consciousness, or these states revived by association, are very different ideas."](56441.docx#chunk3519)

[Concerning the fact there is no dispute. Myself percipient, and myself imagining or conceiving, are different states, because perceiving is a different thing from imagining; and being different states, the remembrance of them is, as might be expected, different. But the question is, in what does the difference between the remembrances consist? The author calls one of them the \_idea\_ of myself perceiving, and the other the \_idea\_ of myself imagining, and thinks there is no other difference. But how do the idea of myself having a sensation, and the idea of myself having an idea of that sensation, differ from one another? since in either case an idea of the sensation is all {421} that I am having now. The thought of myself perceiving a thing at a former time, and the thought of myself imagining the thing at that former time, are both at the present moment facts of imagination--are now merely ideas. In each case I have an ideal representation of myself, as conscious in a manner very similar in the two cases; though not exactly the same, since in the one case I remember to have been conscious of a sensation, in the other, to have been conscious only of an idea of that sensation: but, in either case, that past consciousness enters only as an idea, into the consciousness I now have by recollection. In what, then, as far as mere ideas are concerned, do my present mental representations of the two cases differ? Will it be said, that the idea of the sensation is one thing, the idea of the idea of the sensation another thing? Or are they both the same idea, namely, the idea of the sensation; and is the element that is present in the one case, but absent in the other, not an idea but something else? A difference there is admitted to be between the remembrance of having had a sensation, and the remembrance of having merely thought of the sensation, i.e. had the idea of it: is this difference a difference in the ideas I have in the two cases, or is the idea the same, but accompanied in the one case by something not an idea, which does not exist in the other? for if so, this something is a Belief.  
I have touched upon this question in a former note, and expressed my inability to recognise, in the idea of an idea, anything but the idea itself; in the thought of a thought, anything but a repetition of the thought. My thought of Falstaff, as far as I can perceive, is not a copy but a repetition of the thought I had of him when I first read Shakespeare: not indeed an exact repetition, because all complex ideas undergo modification by time, some elements fading away, and new ones being added by reverting to the original sources or by subsequent associations; but my first mental image of Falstaff, and my present one, do not differ as the thought of a rose differs from the sight of one; as an idea of sensation differs from the sensation. On this point the author was perhaps of {422} the same opinion, since we find him contrasting the "copy" of the sensation with the "revival" of the idea, as if the latter was a case of simple repetition, the former not. It would have been well if he had made this point a subject of express discussion; for if his opinion upon it was what, from this passage, we may suppose it to have been, it involves a serious difficulty. If (he says) a sensation and an idea "are distinguishable in the having, it is likely that the copy of the sensation should be distinguishable from the revival of the idea." But the copy of the sensation is the idea; so that, on this shewing, the idea is distinguishable from its own revival, that is, from the same idea when it occurs again. The author's theory would thus require him to maintain that an idea revived is a specifically different idea, and not the same idea repeated: since otherwise the two states of mind, so far as regards the ideas contained in them, are undistinguishable, and it is necessary to admit the presence in Memory of some other element.  
Let us put another case. Instead of Falstaff, suppose a real person whom I have seen: for example General Lafayette. My idea of Lafayette is almost wholly, what my idea of Falstaff is entirely, a creation of thought: only a very small portion of it is derived from my brief experience of seeing and conversing with him. But I have a remembrance of having seen Lafayette, and no remembrance of having seen Falstaff, but only of having thought of him. Is it a sufficient explanation of this difference to say, that I have an idea of myself seeing and hearing Lafayette, and only an idea of myself thinking of Falstaff? But I can form a vivid idea of myself seeing and hearing Falstaff. I can without difficulty imagine myself in the field of Shrewsbury, listening to his characteristic soliloquy over the body of Hotspur; or in the tavern in the midst of his associates, hearing his story of his encounter with the men in buckram. When I recal the scene, I can as little detach it from the idea of myself as present, as I can in the case of most things of which I was really an eye-witness. The spontaneous presence of the idea of Myself in the {423} conception, is always that of myself as percipient. The idea of myself as in a state of mere imagination, only substitutes itself for the other when something reminds me that the scene is merely imaginary.](56441.docx#chunk3520)

[I cannot help thinking, therefore, that there is in the remembrance of a real fact, as distinguished from that of a thought, an element which does not consist, as the author supposes, in a difference between the mere ideas which are present to the mind in the two cases. This element, howsoever we define it, constitutes Belief, and is the difference between Memory and Imagination. From whatever direction we approach, this difference seems to close our path. When we arrive at it, we seem to have reached, as it were, the central point of our intellectual nature, presupposed and built upon in every attempt we make to explain the more recondite phenomena of our mental being.--\_Ed.\_]  
  
  
  
{424} CHAPTER XII.  
RATIOCINATION.  
  
"It would afford great light and clearness to the art of Logic, to determine the precise nature and composition of the ideas affixed to those words which have complex ideas; \_i.e.\_, which excite any combinations of simple ideas, united intimately by association."--\_Hartley\_. \_Prop.\_ 12, \_Corol.\_ 3.  
RATIOCINATION is one of the most complicated of all the mental phenomena. And it is worthy of notice, that more was accomplished towards the analysis of it, at an early period in the history of intellectual improvement, than of any other of the complex cases of human consciousness.  
It was fully explained by Aristotle, that the simplest case of Ratiocination consists of three propositions, which he called a syllogism. A piece of ratiocination may consist of one, or more syllogisms, to any extent; but every single step is a syllogism.  
A ratiocination, then, or syllogism, is first resolved into three propositions. The following may be taken as one of the simplest of all examples. "All men are animals: kings are men: therefore kings are animals."  
Next, the Proposition is resolved into its proximate elements. These are three; two Terms, one called the Subject, the other the Predicate, and the \_Copula\_. {425} What is the particular nature of each of these elements we have already seen, and here, therefore, need not stay to inquire.  
The ancient writers on Logic proceeded in their analysis, no farther than Terms. After this, they only endeavoured to enumerate and classify terms; to enumerate and classify propositions; to enumerate and classify syllogisms; and to give the rules for making correct syllogisms, and detecting incorrect ones. And this, as taught by them, constituted the whole science and art of Logic.  
What, under this head, we propose to explain, is--the process of association involved in the syllogism, and in the belief which is part of it.  
That part of the process which is involved in the two antecedent propositions, called the premises, has been already explained. It is only, therefore, the third proposition, called the conclusion, which further requires exposition.  
We have seen, that in the proposition, "All men are animals," Belief is merely the recognition that the meaning of the term, "all men," is included in that of the term "animals," and that the recognition is a case of association. In the proposition also, "kings are men," the belief is merely the recognition, that the individuals named "kings," are part of the many, of whom "men," is the common name. This has already been more than once explained. And now, therefore, remains only to be shewn what further is involved in the third proposition, or conclusion, "kings are animals."  
In each of the two preceding propositions, two terms or names are compared. In the last {426} proposition, a third name is compared with both the other two; immediately with the one, and, through that, with the other; the whole, obviously, a complicated case of association.  
In the first proposition, "all men are animals," the term, "all men," is compared with the term animals; in other words, a certain association, already expounded, takes place. In the second proposition, "kings are men," the term "kings," is compared with the term "all men;" comparison here, again, being only a name for a particular case of association. In the third proposition, "kings are animals," the name "kings," is compared with the name "animals," but mediately through the name, "all men." Thus, "kings," is associated with "all men," "all men," with "animals;" "kings," therefore, with "animals," by a complicated, and, at the same time, a rapid, and almost imperceptible process. It would be easy to mark the steps of the association. But this would be tedious, and after so much practice, the reader will be at no loss to set them down for himself.[109]  
[Editor's footnote 109: This chapter, which is of a very summary character, is a prolongation of the portion of the chapter on Belief, which examines the case of belief in the truth of a proposition; and must stand or fall with it. The question considered is, how, from belief in the truth of the two premises of a syllogism, we pass into belief in the conclusion. The exposition proceeds on the untenable theory of the import of propositions, on which I have so often had occasion to comment. That theory, however, was not necessary to the author for shewing how two ideas may become inseparably associated through the inseparable association of each of them with a third idea: and inasmuch as an inseparable association between the subject and {427} predicate, in the author's opinion, constitutes belief, an explanation of ratiocination conformable to that given of belief follows as a matter of course.](56441.docx#chunk3521)

[Although I am unable to admit that there is nothing in belief but an inseparable association, and although I maintain that there may be belief without an inseparable association, I can still accept this explanation of the formation of an association between the subject and predicate of the conclusion, which, when close and intense, has, as we have seen, a strong tendency to generate belief. But to shew what it is that gives the belief its validity, we must fall back on logical laws, the laws of evidence. And independently of the question of validity, we shall find in the reliance on those laws, so far as they are understood, the source and origin of all beliefs, whether well or ill-founded, which are not the almost mechanical or automatic products of a strong association--of the lively suggestion of an idea. We may therefore pass at once to the nature of Evidence, which is the subject of the next chapter.  
I venture to refer, in passing, to those chapters in my System of Logic, in which I have maintained, contrary to what is laid down in this chapter, that Ratiocination does not \_consist\_ of Syllogisms; that the Syllogism is not the analysis of what the mind does in reasoning, but merely a useful formula into which it can translate its reasonings, gaining thereby a great increase in the security for their correctness.--\_Ed.\_]  
  
  
  
{428} CHAPTER XIII.  
EVIDENCE.  
  
"In consequence of some very wonderful laws, which regulate the successions of our mental phenomena, the science of mind is, in all its most important respects, a science of analysis." \_Brown's Lect.\_, i., 108.  
BEFORE leaving the subject of Belief, it will be proper to shew, in a few words, what is included, under the name Evidence. Evidence, is either the same thing with Belief, or it is the antecedent, of which Belief is the consequent.  
Belief we have seen to be of two sorts: Belief of events; Belief of propositions.  
Of events, believed on our own experience, the evidence of the present is sense; of the past, memory; and in these cases, the evidence and the belief are not two things, but one and the same thing. The lamp, which at this moment lights me, I say that I see burning, and that I believe it burning. These are two names of one and the same state of consciousness.--"I remember it was burning at the same hour last night," and "I believe it was burning at the same hour last night," are also two expressions for the same thing.--In the simple anticipation of the future, from the past, also, the evidence, and the belief, are {429} not two things, but one and the same thing. There is a close and inseparable association of the idea of a like antecedent, with the idea of a like consequent. This has not a single name, like memory; but, like memory, it is both evidence and belief.  
The case of testimony is different. The Testimony is one thing, the Belief is another. The name Evidence is given to the testimony. The association of the testimony, with the event testified, is the belief.  
Beside the belief of events which are the immediate objects of sense, of memory, and of anticipation (the consequence of sense and memory), and of those which are the immediate objects of testimony; there is a belief of events which are not the immediate objects of any of those operations. The sailor, who is shipwrecked on an unknown coast, sees the prints of a man's foot on the sand. The print of the foot is here called the evidence; the association of the print, as consequent, with a man, as antecedent, is called the belief. In this case, the sensation of one event, the print of a foot on the sand, induces the belief of another event, the existence of a man. The sailor who has seen the mark, reports it to his companions who have not quitted the wreck. Instantly they have the same belief; but it is a remove farther off, and there is an additional link of evidence. The first event to them, is the affirmation of their companion; the second, the existence of the print; the third, that of the man. There is here evidence of evidence; the testimony, evidence of the print; the print, evidence of the man.  
The companions of the sailor, having themselves gone on shore, perceive, indeed, no man, but see a {430} large monkey, which leaves prints on the sand very much resembling those which had first been perceived by their companion. What is now the state of their minds? Doubt. But doubt is a name; what do we call by that name? A phenomenon of some complexity, but of which the elements are not very difficult to trace. There is, here, a double association with the print of the foot. There is the association of a man, and there is the association of a monkey. First, the print raises the idea of a man, but the instant it does so, it raises also the idea of a monkey. The idea of the monkey, displacing that of the man, hinders the first association from the fixity which makes it belief; and the idea of man, displacing that of monkey, hinders the second association from that fixity which constitutes belief.  
When evidence is complex; that is, consists of more than one event; the events may be all on the same side, or not all on the same side; that is, they may all tend to prove the same event; or some of them may tend to prove it, some may have an opposite tendency.](56441.docx#chunk3522)

[Thus, if after discovering the print on the sand, the sailors had seen near it a stick, which had any appearance of having been fashioned into a club, or a spear, this would have been another event, tending, as well as the print on the sand, to the belief of the presence of men. The evidence would have been complex, but all on one side. The process is easy to trace. There is now a double association with the existence of men. The print of the foot excites that idea, the existence of the club excites that idea. This double excitement gives greater permanence to the {431} idea. By repetition, the two exciting causes coalesce, and, by their united strength, call up the associated idea with greater force.  
In the case of the appearance of the monkey, in which one of the events tended to one belief, the other to another, we have just seen that the effect is precisely contrary; to lessen the strength of the association with the existence of a man, and to hinder its becoming belief.  
These expositions may be applied with ease to the other cases of complex evidence, which can only consist of a greater or less number of events, either all tending to the belief of the same event, or some tending that way, some another; but all operating in the manner which has just been pointed out. Thus we may complicate the present case still further, by the supposition of additional events. After the appearance of the monkey, the sailors may discover, in the neighbourhood, the vestiges of a recent fire, and of the victuals which had been cooked by it. The association of human beings with these appearances is so strong, that, combined with the association between the print and the same idea, it quite obscures the association between the print and the monkey; and the belief that the place has inhabitants becomes complete. But suppose, further; that after a little observation, they discover an English knife, and fork, and a piece of English earthenware near the same place. The idea of an English ship having touched at the place, is immediately excited, and all the evidence of local inhabitants, derived from the marks of fire and cookery, is immediately destroyed. In other words, a new association, that with an English ship, {432} is created, which completely supersedes the idea, formerly associated, that of inhabitants existing on the spot.  
The whole of the events, which go in this manner to form a case of belief, or of doubt, or of disbelief, are called Evidence. And the association, which binds them together into a sort of whole, as antecedent, and connects with them the event to which they apply as consequent, and which constitutes the belief, doubt, or disbelief, very often goes by the names of "judgment," "judging of the evidence," "weighing the evidence," and so on.  
In these cases of the belief of Events upon complicated evidence, there is an antecedent and a consequent; the antecedent consisting of all the events which are called evidence, the consequent of the event, or events evidenced; and lastly, there is that close association of the antecedent and the consequent, which we have seen already, in so many instances, constitutes belief.  
We have now to consider, what we call evidence in the case of the Belief of Propositions.  
There are two cases of the Belief of propositions. There is belief in the case of the single proposition; and there is belief of the conclusion of a syllogism, which is the result of a combination of Propositions.  
We have seen what the process of belief in Propositions is. The subject and predicate, two names for the same thing, of which the predicate is either of the same extent with the subject, or of a greater extent, suggests, each of them, its meaning; that is, call up, by association, each of them, its peculiar cluster of ideas. Two clusters of ideas are called up in {433} connexion, and that a peculiar connexion, marked by the copula. To have two clusters of ideas, to know that they are two, and to believe that they are two, this is nothing more than three expressions for the same thing. To know that two clusters are two clusters, and to know that they are either the same, or different, is the same with having them. In this case, then, as in that of the belief of events, in sense and memory, the belief and the evidence are the same thing.  
Belief of the conclusion of a syllogism, is preceded by two other beliefs. There is belief of the major proposition; belief of the minor proposition; by the process immediately above explained, in which the evidence and the belief are the same thing. These are the antecedent. There is, thirdly, belief of the conclusion, this is the consequent. The process of this belief has been so recently explained, that I do not think we need to repeat it. In this case, it is sometimes said, that the two premises are the evidence; sometimes it is said, that the ratiocination is the evidence; in the former of these applications of the word evidence, the belief of the concluding proposition of the syllogism is not included; in the last, it is. The ratiocination is the belief of all the three propositions; and, in this acceptation of the word, the evidence and the belief are not considered as two things, but one and the same thing. This, however, is only a difference of naming. About the particulars named, there is no room for dispute.[110]  
[Editor's footnote 110: This chapter on Evidence is supplementary to the chapter on Belief, and is intended to analyse the process of weighing and balancing opposing grounds for believing.](56441.docx#chunk3523)

[{434} Evidence is either of individual facts (not actually perceived by oneself), or of general truths. The former is the only case to which much attention is paid in the present chapter; which very happily illustrates it, by the case of navigators having to decide on the existence or non-existence of inhabitants in a newly discovered island. The process of balancing the evidence for and against, is depicted in a very lively manner. Let us see whether the mental facts set down in the exposition, are precisely those which take place.  
When the sailors have seen prints of a foot, resembling those of a man, the idea is raised of a man making the print. When they afterwards see a monkey, whose feet leave traces almost similar, the idea is also raised of a monkey making the print, and the state of their minds, the author says, is doubt. Of this state he gives the following analysis: "There is here a double association with the print of the foot. There is the association of a man, and there is the association of a monkey. First, the print raises the idea of a man, but the instant it does so, it raises also the idea of a monkey. The idea of the monkey, displacing that of the man, hinders the first association from the fixity which makes it belief; and the idea of man, displacing that of monkey, hinders the second association from that fixity which constitutes belief."  
This passage deserves to be studied; for without having carefully weighed it, we cannot be certain that we are in complete possession of the author's theory of Belief.  
There are two conflicting associations with the print of the foot. The picture of a man making it, cannot co-exist with that of a monkey making it. But the two may alternate with one another. Had the association with a man been the only association, it would, or might (for on this point the author is not explicit) have amounted to belief. But the idea of the monkey and that of the man alternately displacing one another, hinder either association from having the fixity which would make it belief.  
This alternation, however, between the two ideas, of a monkey making the footprint and of a man making it, may {435} very well take place without hindering one of the two from being accompanied by belief. Suppose the sailors to obtain conclusive evidence, testimonial or circumstantial, that the prints were made by a monkey. It may happen, nevertheless, that the remarkable resemblance of the foot prints to those of a man, does not cease to force itself upon their notice: in other words, they continue to associate the idea of a man with the footsteps; they are reminded of a man, and of a man making the footsteps, every time they see or think of them. The double association, therefore, may subsist, and the one which does not correspond with the fact may even be the most obtrusive of the two, while yet the other conception may be the one with which the men believe the real facts to have corresponded.  
All the rest of the exposition is open to the same criticism. The author accounts very accurately for the presence of all the ideas which the successive appearance of the various articles of evidence arouses in the mind. But he does not shew that the belief, which is ultimately arrived at, is constituted by the expulsion from the mind of one set of these ideas, and the exclusive possession of it by the other set. It is quite possible that neither of the associations may acquire the "fixity" which, according to the apparent meaning of the author, would defeat the other association altogether, and drive away the conception which it suggests; and yet, one of the suppositions may be believed and the other disbelieved, according to the balance of evidence, as estimated by the investigator. Belief, then, which has been already shewn not to require an inseparable association, appears not to require even "fixity"--such fixity as to exclude the idea of the conflicting supposition, as it does exclude the belief.](56441.docx#chunk3524)

[The problem of Evidence divides itself into two distinguishable enquiries: what effect evidence ought to produce, and what determines the effect that it does produce: how our belief ought to be regulated, and how, in point of fact, it is regulated. The first enquiry--that into the nature and probative force of evidence: the discussion of what proves what, and {436} of the precautions needed in admitting one thing as proof of another--are the province of Logic, understood in its widest sense: and for its treatment we must refer to treatises on Logic, either inductive or ratiocinative. All that would be in place here, reduces itself to a single principle: In all cases, except the case of what we are directly conscious of (in which case, as the author justly observes, the evidence and the belief are one and the same thing)--in all cases, therefore, in which belief is really grounded on evidence, it is grounded, in the ultimate result, on the constancy of the course of nature. Whether the belief be of facts or of laws, and whether of past facts or of those which are present or future, this is the basis on which it rests. Whatever it is that we believe, the justification of the belief must be, that unless it were true, the uniformity of the course of nature would not be maintained. A cause would have occurred, not followed by its invariable effect; an effect would have occurred, not preceded by any of its invariable causes; witnesses would have lied, who have always been known to speak the truth; signs would have proved deceptive, which in human experience have always given true indication. This is obvious, whatever case of belief on evidence we examine. Belief in testimony is grounded on previous experience that testimony is usually conformable to fact: testimony in general (for even this may with truth be affirmed); or the testimony of the particular witness, or the testimony of persons similar to him. Belief that the sun will rise and set to-morrow, or that a stone thrown up into the air will fall back, rests on experience that this has been invariably the case, and reliance that what has hitherto occurred will continue to occur hereafter. Belief in a fact vouched for by circumstantial evidence, rests on experience that such circumstances as are ascertained to exist in the case, never exist unaccompanied by the given fact. What we call evidence, whether complete or incomplete, always consists of facts or events tending to convince us that some ascertained general truths or laws of nature must have proved false, if the conclusion which the evidence points to is not true.](56441.docx#chunk3525)

[{437} Belief on evidence is therefore always a case of the generalizing process; of the assumption that what we have not directly experienced resembles, or will resemble, our experience. And, properly understood, this assumption is true; for the whole course of nature consists of a concurrence of causes, producing their effects in a uniform manner; but the uniformity which exists is often not that which our first impressions lead us to expect. Mr. Bain has well pointed out, that the generalizing propensity, in a mind not disciplined by thought, nor as yet warned by its own failures, far outruns the evidence, or rather, precedes any conscious consideration of evidence; and that what the consideration of evidence has to do when it comes, is not so much to make us generalize, as to limit our spontaneous impulse of generalization, and restrain within just bounds our readiness to believe that the unknown will resemble the known. When Mr. Bain occasionally speaks of this propensity as if it were instinctive, I understand him to mean, that by an original law of our nature, the mere suggestion of an idea, so long as the idea keeps possession of the mind, suffices to give it a command over our active energies. It is to this primitive mental state that the author's theory of Belief most nearly applies. In a mind which is as yet untutored, either by the teachings of others or by its own mistakes, an idea so strongly excited as for the time to keep out all ideas by which it would itself be excluded, possesses that power over the voluntary activities which is Mr. Bain's criterion of Belief; and any association that compels the person to have the idea of a certain consequence as following his act, generates, or becomes, a real expectation of that consequence. But these expectations often turning out to have been ill grounded, the unduly prompt suggestion comes to be associated, by repetition, with the shock of disappointed expectation; and the idea of the desired consequent is now raised together with the idea not of its realization, but of its frustration: thus neutralizing the effect of the first association on the belief and on the active impulses. It is in this stage that the mind learns the habit of looking out for, and weighing, evidence. It presently discovers {438} that the expectations which are least often disappointed are those which correspond to the greatest and most varied amount of antecedent experience. It gradually comes to associate the feeling of disappointed expectation with all those promptings to expect, which, being the result of accidental associations, have no, or but little, previous experience conformable to them: and by degrees the expectation only arises when memory represents a considerable amount of such previous experience; and is strong in proportion to the quantity of the experience. At a still later period, as disappointment nevertheless not unfrequently happens notwithstanding a considerable amount of past experience on the side of the expectation, the mind is put upon making distinctions in the kind of past experiences, and finding out what qualities, besides mere frequency, experience must have, in order not to be followed by disappointment. In other words, it considers the conditions of right inference from experience; and by degrees arrives at principles or rules, more or less accurate, for inductive reasoning. This is substantially the doctrine of the author of the Analysis. It must be conceded to him, that an association, sufficiently strong to exclude all ideas that would exclude itself, produces a kind of mechanical belief; and that the processes by which this belief is corrected, or reduced to rational bounds, all consist in the growth of a counter-association, tending to raise the idea of a disappointment of the first expectation: and as the one or the other prevails in the particular case, the belief, or expectation, exists or does not exist, exactly as if the belief were the same thing with the association. It must also be admitted that the process by which the belief is overcome, takes effect by weakening the association; which can only be effected by raising up another association that conflicts with it. There are two ways in which this counter-association may be generated. One is, by counter-evidence; by contrary experience in the specific case, which, by associating the circumstances of the case with a contrary belief, destroys their association with the original belief. But there is also another mode of weakening, or altogether {439} destroying, the belief, without adducing contrary experience: namely, by merely recognising the insufficiency of the existing experience; by reflecting on other instances in which the same amount and kind of experience have existed, but were not followed by the expected result. In the one mode as in the other, the process of dissolving a belief is identical with that of dissolving an association; and to this extent--and it is a very large extent--the author's theory of Belief must be received as true.  
I cannot, however, go beyond this, and maintain with the author that Belief is identical with a strong association; on account of the reason already stated, viz. that in many cases--indeed in almost all cases in which the evidence has been such as required to be investigated and weighed--a final belief is arrived at without any such clinging together of ideas as the author supposes to constitute it; and we remain able to represent to ourselves in imagination, often with perfect facility, both the conflicting suppositions, of which we nevertheless believe one and reject the other.--\_Ed.\_]  
  
  
  
{440} APPENDIX.  
(\_From "An Examination of Sir William Hamilton's Philosophy."\_)  
THE PSYCHOLOGICAL THEORY OF THE BELIEF IN AN EXTERNAL WORLD.](56441.docx#chunk3526)

[WE have seen Sir. W. Hamilton at work on the question of the reality of Matter, by the introspective method, and, as it seems, with little result. Let us now approach the same subject by the psychological. I proceed, therefore, to state the case of those who hold that the belief in an external world is not intuitive, but an acquired product.  
This theory postulates the following psychological truths, all of which are proved by experience, and are not contested, though their force is seldom adequately felt, by Sir W. Hamilton and the other thinkers of the introspective school.  
It postulates, first, that the human mind is capable of Expectation. In other words, that after having had actual sensations, we are capable of forming the conception of Possible sensations; sensations which we are not feeling at the present moment, but which we might feel, and should feel if certain conditions were present, the nature of which conditions we have, in many cases, learnt by experience.  
It postulates, secondly, the laws of the Association of Ideas. So far as we are here concerned, these laws are the following: 1st. Similar phaenomena tend to be thought of together. 2nd. Phaenomena which have either been experienced or conceived {441} in close contiguity to one another, tend to be thought of together. The contiguity is of two kinds; simultaneity, and immediate succession. Facts which have been experienced or thought of simultaneously, recall the thought of one another. Of facts which have been experienced or thought of in immediate succession, the antecedent, or the thought of it, recalls the thought of the consequent, but not conversely. 3rd. Associations produced by contiguity become more certain and rapid by repetition. When two phaenomena have been very often experienced in conjunction, and have not, in any single instance, occurred separately either in experience or in thought, there is produced between them what has been called Inseparable, or less correctly, Indissoluble Association: by which is not meant that the association must inevitably last to the end of life--that no subsequent experience or process of thought can possibly avail to dissolve it; but only that as long as no such experience or process of thought has taken place, the association is irresistible; it is impossible for us to think the one thing disjoined from the other. 4th. When an association has acquired this character of inseparability--when the bond between the two ideas has been thus firmly riveted, not only does the idea called up by association become, in our consciousness, inseparable from the idea which suggested it, but the facts or phaenomena answering to those ideas come at last to seem inseparable in existence: things which we are unable to conceive apart, appear incapable of existing apart; and the belief we have in their coexistence, though really a product of experience, seems intuitive. Innumerable examples might be given of this law. One of the most familiar, as well as the most striking, is that of our acquired perceptions of sight. Even those who, with Mr. Bailey, consider the perception of distance by the eye as not acquired, but intuitive, admit that there are many perceptions of sight which, though instantaneous and unhesitating, are not intuitive. What we see is a very minute fragment of what we think we see. We see artificially that one thing is hard, another soft. We see artificially that one thing is hot, another cold. We see artificially that {442} what we see is a book, or a stone, each of these being not merely an inference, but a heap of inferences, from the signs which we see, to things not visible. We see, and cannot help seeing, what we have learnt to infer, even when we know that the inference is erroneous, and that the apparent perception is deceptive. We cannot help seeing the moon larger when near the horizon, though we know that she is of precisely her usual size. We cannot help seeing a mountain as nearer to us and of less height, when we see it through a more than ordinarily transparent atmosphere.  
Setting out from these premises, the Psychological Theory maintains, that there are associations naturally and even necessarily generated by the order of our sensations and of our reminiscences of sensation, which, supposing no intuition of an external world to have existed in consciousness, would inevitably generate the belief, and would cause it to be regarded as an intuition.](56441.docx#chunk3527)

[What is it we mean, or what is it which leads us to say, that the objects we perceive are external to us, and not a part of our own thoughts? We mean, that there is concerned in our perceptions something which exists when we are not thinking of it; which existed before we had ever thought of it, and would exist if we were annihilated; and further, that there exist things which we never saw, touched, or otherwise perceived, and things which never have been perceived by man. This idea of something which is distinguished from our fleeting impressions by what, in Kantian language, is called Perdurability; something which is fixed and the same, while our impressions vary; something which exists whether we are aware of it or not, and which is always square (or of some other given figure) whether it appears to us square or round--constitutes altogether our idea of external substance. Whoever can assign an origin to this complex conception, has accounted for what we mean by the belief in matter. Now all this, according to the Psychological Theory, is but the form impressed by the known laws of association, upon the conception or notion, obtained by experience, of Contingent Sensations; {443} by which are meant, sensations that are not in our present consciousness, and individually never were in our consciousness at all, but which in virtue of the laws to which we have learnt by experience that our sensations are subject, we know that we should have felt under given supposable circumstances, and under these same circumstances, might still feel.  
I see a piece of white paper on a table. I go into another room. If the phaenomenon always followed me, or if, when it did not follow me, I believed it to disappear \_e rerum natura\_, I should not believe it to be an external object. I should consider it as a phantom--a mere affection of my senses: I should not believe that there had been any Body there. But, though I have ceased to see it, I am persuaded that the paper is still there. I no longer have the sensations which it gave me; but I believe that when I again place myself in the circumstances in which I had those sensations, that is, when I go again into the room, I shall again have them; and further, that there has been no intervening moment at which this would not have been the case. Owing to this property of my mind, my conception of the world at any given instant consists, in only a small proportion, of present sensations. Of these I may at the time have none at all, and they are in any case a most insignificant portion of the whole which I apprehend. The conception I form of the world existing at any moment, comprises, along with the sensations I am feeling, a countless variety of possibilities of sensation: namely, the whole of those which past observation tells me that I could, under any supposable circumstances, experience at this moment, together with an indefinite and illimitable multitude of others which though I do not know that I could, yet it is possible that I might, experience in circumstances not known to me. These various possibilities are the important thing to me in the world. My present sensations are generally of little importance, and are moreover fugitive: the possibilities, on the contrary, are permanent, which is the character that mainly distinguishes our idea of Substance or Matter from our notion of sensation. These possibilities, which are conditional {444} certainties, need a special name to distinguish them from mere vague possibilities, which experience gives no warrant for reckoning upon. Now, as soon as a distinguishing name is given, though it be only to the same thing regarded in a different aspect, one of the most familiar experiences of our mental nature teaches us, that the different name comes to be considered as the name of a different thing.  
There is another important peculiarity of these certified or guaranteed possibilities of sensation; namely, that they have reference, not to single sensations, but to sensations joined together in groups. When we think of anything as a material substance, or body, we either have had, or we think that on some given supposition we should have, not some one sensation, but a great and even an indefinite number and variety of sensations, generally belonging to different senses, but so linked together, that the presence of one announces the possible presence at the very same instant of any or all of the rest. In our mind, therefore, not only is this particular Possibility of sensation invested with the quality of permanence when we are not actually feeling any of the sensations at all; but when we are feeling some of them, the remaining sensations of the group are conceived by us in the form of Present Possibilities, which might be realized at the very moment. And as this happens in turn to all of them, the group as a whole presents itself to the mind as permanent, in contrast not solely with the temporariness of my bodily presence, but also with the temporary character of each of the sensations composing the group; in other words, as a kind of permanent substratum, under a set of passing experiences or manifestations: which is another leading character of our idea of substance or matter, as distinguished from sensation.](56441.docx#chunk3528)

[Let us now take into consideration another of the general characters of our experience, namely, that in addition to fixed groups, we also recognise a fixed Order in our sensations; an Order of succession, which, when ascertained by observation, gives rise to the ideas of Cause and Effect, according to what I hold to be the true theory of that relation, and is on any {445} theory the source of all our knowledge what causes produce what effects. Now, of what nature is this fixed order among our sensations? It is a constancy of antecedence and sequence. But the constant antecedence and sequence do not generally exist between one actual sensation and another. Very few such sequences are presented to us by experience. In almost all the constant sequences which occur in Nature, the antecedence and consequence do not obtain between sensations, but between the groups we have been speaking about, of which a very small portion is actual sensation, the greater part being permanent possibilities of sensation, evidenced to us by a small and variable number of sensations actually present. Hence, our ideas of causation, power, activity, do not become connected in thought with our sensations as actual at all, save in the few physiological cases where these figure by themselves as the antecedents in some uniform sequence. Those ideas become connected, not with sensations, but with groups of possibilities of sensation. The sensations conceived do not, to our habitual thoughts, present themselves as sensations actually experienced, inasmuch as not only any one or any number of them may be supposed absent, but none of them need be present. We find that the modifications which are taking place more or less regularly in our possibilities of sensation, are mostly quite independent of our consciousness, and of our presence or absence. Whether we are asleep or awake the fire goes out, and puts an end to one particular possibility of warmth and light. Whether we are present or absent the corn ripens, and brings a new possibility of food. Hence we speedily learn to think of Nature as made up solely of these groups of possibilities, and the active force in Nature as manifested in the modification of some of these by others. The sensations, though the original foundation of the whole, come to be looked upon as a sort of accident depending on us, and the possibilities as much more real than the actual sensations, nay, as the very realities of which these are only the representations, appearances, or effects. When this state of mind has been arrived at, then, and from that time forward, we are never {446} conscious of a present sensation without instantaneously referring it to some one of the groups of possibilities into which a sensation of that particular description enters; and if we do not yet know to what group to refer it, we at least feel an irresistible conviction that it must belong to some group or other; \_i.e.\_ that its presence proves the existence, here and now, of a great number and variety of possibilities of sensation, without which it would not have been. The whole set of sensations as possible, form a permanent background to any one or more of them that are, at a given moment, actual; and the possibilities are conceived as standing to the actual sensations in the relation of a cause to its effects, or of canvas to the figures painted on it, or of a root to the trunk, leaves, and flowers, or of a substratum to that which is spread over it, or, in transcendental language, of Matter to Form.  
When this point has been reached, the Permanent Possibilities in question have assumed such unlikeness of aspect, and such difference of apparent relation to us, from any sensations, that it would be contrary to all we know of the constitution of human nature that they should not be conceived as, and believed to be, at least as different from sensations as sensations are from one another. Their groundwork in sensation is forgotten, and they are supposed to be something intrinsically distinct from it. We can withdraw ourselves from any of our (external) sensations, or we can be withdrawn from them by some other agency. But though the sensations cease, the possibilities remain in existence; they are independent of our will, our presence, and everything which belongs to us. We find, too, that they belong as much to other human or sentient beings as to ourselves. We find other people grounding their expectations and conduct upon the same permanent possibilities on which we ground ours. But we do not find them experiencing the same actual sensations. Other people do not have our sensations exactly when and as we have them: but they have our possibilities of sensation; whatever indicates a present possibility of sensations to ourselves, indicates a present possibility of similar sensations to them, except so far as {447} their organs of sensation may vary from the type of ours. This puts the final seal to our conception of the groups of possibilities as the fundamental reality in Nature. The permanent possibilities are common to us and to our fellow-creatures; the actual sensations are not. That which other people become aware of when, and on the same grounds, as I do, seems more real to me than that which they do not know of unless I tell them. The world of Possible Sensations succeeding one another according to laws, is as much in other beings as it is in me; it has therefore an existence outside me; it is an External World.](56441.docx#chunk3529)

[If this explanation of the origin and growth of the idea of Matter, or External Nature, contains nothing at variance with natural laws, it is at least an admissible supposition, that the element of Non-ego which Sir W. Hamilton regards as an original datum of consciousness, and which we certainly do find in our present consciousness, may not be one of its primitive elements--may not have existed at all in its first manifestations. But if this supposition be admissible, it ought, on Sir W. Hamilton's principles, to be received as true. The first of the laws laid down by him for the interpretation of Consciousness, the law (as he terms it) of Parcimony, forbids to suppose an original principle of our nature in order to account for phaenomena which admit of possible explanation from known causes. If the supposed ingredient of consciousness be one which might grow up (though we cannot prove that it did grow up) through later experience; and if, when it had so grown up, it would, by known laws of our nature, appear as completely intuitive as our sensations themselves; we are bound, according to Sir W. Hamilton's and all sound philosophy, to assign to it that origin. Where there is a known cause adequate to account for a phaenomenon, there is no justification for ascribing it to an unknown one. And what evidence does Consciousness furnish of the intuitiveness of an impression, except instantaneousness, apparent simplicity, and \*unconsciousness on our part of how the impression came into our minds? These features can only prove the impression to be {448} intuitive, on the hypothesis that there are no means of accounting for them otherwise. If they not only might, but naturally would, exist, even on the supposition that it is not intuitive, we must accept the conclusion to which we are led by the Psychological Method, and which the Introspective Method furnishes absolutely nothing to contradict.  
Matter, then, may be defined, a Permanent Possibility of Sensation. If I am asked, whether I believe in matter, I ask whether the questioner accepts this definition of it. If he does, I believe in matter: and so do all Berkeleians. In any other sense than this, I do not. But I affirm with confidence, that this conception of Matter includes the whole meaning attached to it by the common world, apart from philosophical, and sometimes from theological, theories. The reliance of mankind on the real existence of visible and tangible objects, means reliance on the reality and permanence of Possibilities of visual and tactual sensations, when no such sensations are actually experienced. We are warranted in believing that this is the meaning of Matter in the minds of many of its most esteemed metaphysical champions, though they themselves would not admit as much: for example, of Reid, Stewart, and Brown. For these three philosophers alleged that all mankind, including Berkeley and Hume, really believed in Matter, inasmuch as unless they did, they would not have turned aside to save themselves from running against a post. Now all which this manoeuvre really proved is, that they believed in Permanent Possibilities of Sensation. We have therefore the unintentional sanction of these three eminent defenders of the existence of matter, for affirming, that to believe in Permanent Possibilities of Sensation is believing in Matter. It is hardly necessary, after such authorities, to mention Dr. Johnson, or any one else who resorts to the \_argumentum baculinum\_ of knocking a stick against the ground. Sir W. Hamilton, a far subtler thinker than any of these, never reasons in this manner. He never supposes that a disbeliever in what he means by Matter, ought in consistency to act in any different mode from those who believe in it. He knew {449} that the belief on which all the practical consequences depend, is the belief in Permanent Possibilities of Sensation, and that if nobody believed in a material universe in any other sense, life would go on exactly as it now does. He, however, did believe in more than this, but, I think, only because it had never occurred to him that mere Possibilities of Sensation could, to our artificialized consciousness, present the character of objectivity which, as we have now shown, they not only can, but unless the known laws of the human mind were suspended, must necessarily, present.  
Perhaps it may be objected, that the very possibility of framing such a notion of Matter as Sir W. Hamilton's--the capacity in the human mind of imagining an external world which is anything more than what the Psychological Theory makes it--amounts to a disproof of the theory. If (it may be said) we had no revelation in consciousness, of a world which is not in some way or other identified with sensation, we should be unable to have the notion of such a world. If the only ideas we had of external objects were ideas of our sensations, supplemented by an acquired notion of permanent possibilities of sensation, we must (it is thought) be incapable of conceiving, and therefore still more incapable of fancying that we perceive, things which are not sensations at all. It being evident however that some philosophers believe this, and it being maintainable that the mass of mankind do so, the existence of a perdurable basis of sensations, distinct from sensations themselves, is proved, it might be said, by the possibility of believing it.](56441.docx#chunk3530)

[Let me first restate what I apprehend the belief to be. We believe that we perceive a something closely related to all our sensations, but different from those which we are feeling at any particular minute; and distinguished from sensations altogether, by being permanent and always the same, while these are fugitive, variable, and alternately displace one another. But these attributes of the object of perception are properties belonging to all the possibilities of sensation which experience guarantees. The belief in such permanent possibilities seems {450} to me to include all that is essential or characteristic in the belief in substance. I believe that Calcutta exists, though I do not perceive it, and that it would still exist if every percipient inhabitant were suddenly to leave the place, or be struck dead. But when I analyse the belief, all I find in it is, that were these events to take place, the Permanent Possibility of Sensation which I call Calcutta would still remain; that if I were suddenly transported to the banks of the Hoogly, I should still have the sensations which, if now present, would lead me to affirm that Calcutta exists here and now. We may infer, therefore, that both philosophers and the world at large, when they think of matter, conceive it really as a Permanent Possibility of Sensation. But the majority of philosophers fancy that it is something more; and the world at large, though they have really, as I conceive, nothing in their minds but a Permanent Possibility of Sensation, would, if asked the question, undoubtedly agree with the philosophers: and though this is sufficiently explained by the tendency of the human mind to infer difference of things from difference of names, I acknowledge the obligation of showing how it can be possible to believe in an existence transcending all possibilities of sensation, unless on the hypothesis that such an existence actually is, and that we actually perceive it.  
The explanation, however, is not difficult. It is an admitted fact, that we are capable of all conceptions which can be formed by generalizing from the observed laws of our sensations. Whatever relation we find to exist between any one of our sensations and something different from \_it\_, that same relation we have no difficulty in conceiving to exist between the sum of all our sensations and something different from \_them\_. The differences which our consciousness recognises between one sensation and another, give us the general notion of difference, and inseparably associate with every sensation we have, the feeling of its being different from other things: and when once this association has been formed, we can no longer conceive anything, without being able, and even being compelled, to form also the conception of something different from it. {451} This familiarity with the idea of something different from each thing we know, makes it natural and easy to form the notion of something different from all things that we know, collectively as well as individually. It is true we can form no conception of what such a thing can be; our notion of it is merely negative; but the idea of a substance, apart from its relation to the impressions which we conceive it as making on our senses, is a merely negative one. There is thus no psychological obstacle to our forming the notion of a something which is neither a sensation nor a possibility of sensation, even if our consciousness does not testify to it; and nothing is more likely than that the Permanent Possibilities of sensation, to which our consciousness does testify, should be confounded in our minds with this imaginary conception. All experience attests the strength of the tendency to mistake mental abstractions, even negative ones, for substantive realities; and the Permanent Possibilities of sensation which experience guarantees, are so extremely unlike in many of their properties to actual sensations, that since we are capable of imagining something which transcends sensations, there is a great natural probability that we should suppose these to be it.](56441.docx#chunk3531)

[But this natural probability is converted into certainty, when we take into consideration that universal law of our experience which is termed the law of Causation, and which makes us mentally connect with the beginning of everything, some antecedent condition, or Cause. The case of Causation is one of the most marked of all the cases in which we extend to the sum total of our consciousness, a notion derived from its parts. It is a striking example of our power to conceive, and our tendency to believe, that a relation which subsists between every individual item of our experience and some other item, subsists also between our experience as a whole, and something not within the sphere of experience. By this extension to the sum of all our experiences, of the internal relations obtaining between its several parts, we are led to consider sensation itself the aggregate whole of our sensations as deriving its origin from antecedent existences {452} transcending sensation. That we should do this, is a consequence of the particular character of the uniform sequences, which experience discloses to us among our sensations. As already remarked, the constant antecedent of a sensation is seldom another sensation, or set of sensations, actually felt. It is much oftener the existence of a group of possibilities, not necessarily including any actual sensations, except such as are required to show that the possibilities are really present. Nor are actual sensations indispensable even for this purpose; for the presence of the object (which is nothing more than the immediate presence of the possibilities) may be made known to us by the very sensation which we refer to as its effect. Thus, the real antecedent of an effect--the only antecedent which, being invariable and unconditional, we consider to be the cause--may be, not any sensation really felt, but solely the presence, at that or the immediately preceding moment, of a group of possibilities of sensation. Hence it is not with sensations as actually experienced, but with their Permanent Possibilities, that the idea of Cause comes to be identified: and we, by one and the same process, acquire the habit of regarding Sensation in general, like all our individual sensations, as an Effect, and also that of conceiving as the causes of most of our individual sensations, not other sensations, but general possibilities of sensation. If all these considerations put together do not completely explain and account for our conceiving these Possibilities as a class of independent and substantive entities, I know not what psychological analysis can be conclusive.  
It may perhaps be said, that the preceding theory gives, indeed, some account of the idea of Permanent Existence which forms part of our conception of matter, but gives no explanation of our believing these permanent objects to be external, or out of ourselves. I apprehend, on the contrary, that the very idea of anything out of ourselves is derived solely from the knowledge experience gives us of the Permanent Possibilities. Our sensations we carry with us wherever we go, and they never exist where we are not; but when we change {453} our place we do not carry away with us the Permanent Possibilities of Sensation: they remain until we return, or arise and cease under conditions with which our presence has in general nothing to do. And more than all--they are, and will be after we have ceased to feel, Permanent Possibilities of sensation to other beings than ourselves. Thus our actual sensations, and the Permanent Possibilities of sensation, stand out in obtrusive contrast to one another: and when the idea of Cause has been acquired, and extended by generalization from the parts of our experience to its aggregate whole, nothing can be more natural than that the Permanent Possibilities should be classed by us as existences generically distinct from our sensations, but of which our sensations are the effect.  
The same theory which accounts for our ascribing to an aggregate of possibilities of sensation, a permanent existence which our sensations themselves do not possess, and consequently a greater reality than belongs to our sensations, also explains our attributing greater objectivity to the Primary Qualities of bodies than to the Secondary. For the sensations which correspond to what are called the Primary Qualities (as soon at least as we come to apprehend them by two senses, the eye as well as the touch) are always present when any part of the group is so. But colours, tastes, smells, and the like, being, in comparison, fugacious, are not, in the same degree, conceived as being always there, even when nobody is present to perceive them. The sensations answering to the Secondary Qualities are only occasional, those to the Primary, constant. The Secondary, moreover, vary with different persons, and with the temporary sensibility of our organs; the Primary, when perceived at all, are, as far as we know, the same to all persons and at all times.  
  
  
  
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ANALYSIS  
  
OF THE PHENOMENA OF THE  
  
HUMAN MIND.  
  
  
ANALYSIS  
OF THE PHENOMENA OF THE  
HUMAN MIND  
BY JAMES MILL  
WITH NOTES ILLUSTRATIVE AND CRITICAL BY  
ALEXANDER BAIN  
ANDREW FINDLATER  
AND  
GEORGE GROTE  
EDITED WITH ADDITIONAL NOTES BY  
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CHAPTER XIV.  
SOME NAMES WHICH REQUIRE A PARTICULAR EXPLANATION.  
  
"Quam difficile sit inveteratas, eloquentissimorumque scriptorum authoritate confirmatas, opiniones, mentibus hominum excutere, non ignoro. Praesertim cum philosophia vera (id est accurata) orationis non modo fucum, sed etiam omnia fere ornamenta ex professo rejiciat: cumque scientiae omnis fundamenta prima non modo speciosa non sint, sed etiam humilia, arida, et pene deformia videantur."--\_Hobbes Comput. sive Logica\_, cap. i. s. I.  
WE have now seen that, in what we call the mental world, Consciousness, there are three grand classes of phenomena, the most familiar of all the facts with which we are acquainted,--SENSATIONS, IDEAS, and the TRAIN OF IDEAS. We have examined a number of the more complicated cases of Consciousness; and have found that they all resolve themselves into the three simple elements, thus enumerated. We also found it necessary to shew, for what ends, and in what manner, marks were contrived of sensations and ideas, and by what combinations they were made to represent, {2} expeditiously, trains of those states of consciousness. Some marks or names, however, could not be explained, till some of the more complicated states of consciousness were unfolded; these also are names so important, and so peculiar in their mode of signification, that a very complete understanding of them is required. It is to the consideration of these remarkable cases of Naming that we now proceed.[1]  
[Editor's footnote 1: Under the modest title of an explanation of the meaning of several names, this chapter presents us with a series of discussions of some of the deepest and most intricate questions in all metaphysics. Like Plato, the author introduces his analysis of the most obscure among the complex general conceptions of the human mind, in the form of an enquiry into the meaning of their names. The title of the chapter gives a very inadequate notion of the difficulty and importance of the speculations contained in it, and which make it, perhaps, the profoundest chapter of the book. It is almost as if a treatise on chemistry were described as an explanation of the names air, water, potass, sulphuric acid, &c.--\_Ed.\_]  
  
SECTION I.  
NAMES OF NAMES.  
  
It is of great importance to distinguish this class of terms; to understand well the function which they perform, and to mark the subdivisions into which they are formed. There is not, however, such difficulty in the subject as to require great minuteness in the exposition.  
As we have occasion to speak of \_things\_; animals, vegetables, minerals; so we have occasion to speak of the \_marks\_, which we are under the necessity of using, in order to record or to communicate our thoughts respecting them. We cannot record or communicate our thoughts respecting names, as man, tree, horse, to walk, to fly, to eat, to converse, without marks for them. We proceed in the case of names, as we do in other cases. We form them into classes, some more, some less, comprehensive, and give a name to each.  
We have one name, so general as to include them all; Word. That is not a name of any \_thing\_. It is a name of the marks which we employ for discourse; and a name of them all. \_John\_ is a word, \_mountain\_ is a word, \_to run\_ is a word, \_above\_ is a word, and so on.  
They are divided into classes, differently for different purposes. The grammarian, who regards chiefly the concatenation of words in sentences, divides them into \_noun\_, \_adjective\_, \_pronoun\_, \_verb\_, \_adverb\_, \_preposition\_, {4} \_conjunction\_; these words are none of them names of things. \_Noun\_ is not a name of a "thing;" it is a name of a "class of words," as John, James, man, ox, tree, water, love, hatred; the same is the case with adjective, verb, and so of the rest.  
The philosopher makes another division of them, adapted to his purposes, which has a more particular reference to their mode of signification. Thus, he divides them into universal, and particular; concrete, and abstract; positive, and negative; equivocal, and univocal; relative, and absolute; and so on.  
It is very easy to see that the word "universal," for example, is not a name of a \_thing\_. Things are all individual, not general. The \_name\_, "man," is a "universal," because it applies to every individual of a class; for the same reason the \_name\_ "ox," the \_name\_ "horse," the \_name\_ "dog," and so on, are universals. The words, "genus" and "species" are synonymous with "universal;" of course they also are names of names. Such is the word "number." "One," "two," "one hundred," "one thousand," are "numbers;" in other words, "number" is a general name for each and all of those other names.](56441.docx#chunk3533)

[Beside our names for names singly, we have occasion to name combinations of names. Thus we have the name "predication." This is a name for the combination of three words, "subject," "predicate," and "copula." We have the name "sentence," which never can be less, implicitly or explicitly, than a predication, but is often more. The same is the account of the word "definition." We have the names "speech," "oration," "sermon," "conversation," all of them names for a series of sentences. We have {5} also names of written discourse, such as a "volume," a "book," a "chapter," a "section," a "paragraph."[2]  
[Editor's footnote 2: A right understanding of the words which are names of names, is of great importance in philosophy. The tendency was always strong to believe that whatever receives a name must be an entity or being, having an independent existence of its own; and if no real entity answering to the name could be found, men did not for that reason suppose that none existed, but imagined that it was something peculiarly abstruse and mysterious, too high to be an object of sense. The meaning of all general, and especially of all abstract terms, became in this way enveloped in a mystical haze; and none of these have been more generally misunderstood, or have been a more copious source of futile and bewildering speculation, than some of the words which are names of names. Genus, Species, Universal, were long supposed to be designations of sublime hyperphysical realities; number, instead of a general name of all numerals, was supposed to be the name, if not of a concrete thing, at least of a single property or attribute.  
This class of names was well understood and correctly characterized by Hobbes, of whose philosophy the distinction between names of names and of things was a cardinal point.--\_Ed.\_]  
  
{6} SECTION II.  
RELATIVE TERMS.  
  
The explanation of Relative Terms will run to a considerable length. The mode in which they are employed as marks is peculiar; and has suggested the belief of something very mysterious in that which is marked by them. It is therefore necessary to be minute in exhibiting the combinations of ideas of which they are the names.  
One peculiarity of Relative Terms, which it is necessary for us to begin with noticing, is, that they always exist in pairs. There is no relative without its correlate, either actual or implied. Thus, we have \_Father\_ and \_Son\_; \_Husband\_ and \_Wife\_; \_Master\_ and\_ Servant\_; \_Subject\_ and \_King\_; also \_High\_ and \_Low\_; \_Right\_ and \_Left\_; \_Antecedent\_ and \_Consequent\_.  
In these cases of relative pairs, the two names are two different words; in other cases, one word serves for both names. Of this sort are the words \_Brother\_, \_Sister\_, \_Cousin\_, \_Friend\_, \_Like\_, \_Equal\_, and so on. When we say that John is brother, we always mean of some one else, as James, whom we also call brother. We call Jane the sister of Ann, as we call Ann the sister of Jane. When we say that A is equal to B, we signify, by the same expression, that B is equal to A; and so on.  
It is always to be remembered, that, in speaking, we are only indicating our own trains; and that of {7} course every word in a mark of some part of a train. The parts of our trains to which we give relative names, are either simple, or complex. The simple, are either the simple sensations, or the ideas of those sensations. The complex, are either those clusters of simple ideas which we call the ideas of objects, because they correspond with clustered sensations; or they are the clusters which the mind puts together arbitrarily for its own purposes.  
If it is asked, why we give names in pairs? The general answer immediately suggests itself; it is because the things named present themselves in pairs; that is, are joined by association. But as many things are joined in pairs by association, which do not receive relative names, the cause may still be inquired of the classification. What is the reason that some pairs do, while many more do not, receive relative names? The cause is the same by which we are guided in imposing other names. As the various combinations of ideas are far too numerous for naming, and we are obliged to make a selection, we name those which we find it of most importance to have named, omitting the rest. It is a question of convenience, solved by experience. It will be seen more distinctly hereafter that relative names are one of the contrivances for epitomising; and that they enable us to express ourselves with fewer words than we should be able to do without them.[3]  
[Editor's footnote 3: No part of the Analysis is more valuable than the simple explanation here given of a subject which has seemed so mysterious to some of the most enlightened and penetrating philosophers, down even to the present time. The only difference between relative names and any others consist in their being given in pairs; and the reason of their being given in pairs is not the existence between two things, of a mystical bond called a Relation, and supposed to have a kind of shadowy and abstract reality, but a very simple peculiarity in the concrete fact which the two names are intended to mark.](56441.docx#chunk3534)

[In order to make quite clear the nature of this peculiarity, it will be desirable to advert once more to the double mode of signification of concrete general names, viz. that while they denote (or are names of) objects, they connote some fact relating to those objects. The fact connoted by any name, relative or not, is always of the same nature; it is some bodily or mental feeling, or some set of bodily or mental feelings, accompanying or produced by the object. But in the case of the ordinary names of objects, this fact concerns one object only, or rather only that one object and the sentient mind. The peculiarity in the case of relative names is, that the fact connoted concerns two objects, and cannot be understood without thinking of them both. It is a phenomenon in which two objects play a part. There is no greater mystery in a phenomenon which concerns two objects, than in a phenomenon which concerns only one. For example; the fact connoted by the word cause, is a fact in which the thing which is the cause, is implicated along with another thing which is the effect. The facts connoted by the word parent, and also by the word son or daughter, are a long series of phenomena of which both the parent and the child are parts; and the series of phenomena would not be that which the name parent expresses, unless the child formed a part of it, nor would it be that which the name son or daughter expresses, unless the parent formed a part of it. Now, when in a series of phenomena of any interest to us two objects are implicated, we naturally give names expressive of it to both the objects, and these are relative names. The two correlative names denote two different objects, the cause and the effect, or the parent and son; but though what they denote is different, what they connote is in a certain sense the same: both names connote the same set of facts, considered as giving one name to the one object, another name to the other. This set of facts, which is connoted by both the correlative names, was called by the old logicians the ground of the relation, \_fundamentum relationis\_. The \_fundamentum\_ of any relation is the facts, fully set out, which are the reason of giving to two objects two correlative names. In some cases both objects seem to receive the same name; in the relation of likeness, both objects are said to be like; in the relation of equality, both are said to be equal. But even here the duality holds, on a stricter examination: for the first object (A) is not said to be like, absolutely, but to be like the second object (B); the second is not said to be like absolutely, but to be like the first. Now though "like" is only one name, "like A" is not the same name as "like B," so that there is really, in this case also, a pair of names.  
From these considerations we see that objects are said to be related, when there is any fact, simple or complex, either apprehended by the senses or otherwise, in which they both figure. Any objects, whether physical or mental, are related, or are in a relation, to one another, in virtue of any complex state of consciousness into which they both enter; even if it be a no more complex state of consciousness than that of merely thinking of them together. And they are related to each other in as many different ways, or in other words, they stand in as many distinct relations to one another, as there are specifically distinct states of consciousness of which they both form parts. As these may be innumerable, the possible relations not only of any one thing with others, but of any one thing with the same other, are infinitely numerous and various. But they may all be reduced to a certain number of general heads of classification, constituting the different kinds of Relation: each of which requires examination apart, to ascertain what, in each case, the state of consciousness, the cluster or train of sensations or thoughts, really is, in which the two objects figure, and which is connoted by the correlative names. This examination the author accordingly undertakes: and thus, under the guise of explaining names, he analyses all the principal cases which the world and the human mind present, of what are called Relations between things.--\_Ed.\_]  
{8} I. The only, or at least the principal, occasions, for naming simple sensations, or simple ideas, in pairs, seem to be these:  
1 When we take them into simultaneous view, as such and such;  
2. When we take them into simultaneous view, as antecedent and consequent.  
II. The principal occasions on which we name the complex ideas, called objects, in pairs, are these four:  
{9} 1. When we speak of them as having an order in space;  
2. When we speak of them as having an order in time;  
3. When we speak of them as agreeing or disagreeing in quantity;  
4. As agreeing or disagreeing in quality.  
III. The occasions on which we name the complex ideas of our own formation in pairs, are,  
{10} 1. When we speak of them as composed of the same or different simple ideas;  
2. When we speak of them as antecedent and consequent.  
Whatever it may be necessary to remark, respecting relative terms, will occur in the consideration of these several cases.  
I. 1. We speak of two sensations, as \_Same\_ or \_Different\_, \_Like\_ or \_Unlike\_.  
These words are Relatives of the double signification; each individual of the pair has the same name. When we say that sensation A is the "same" with {11} sensation B, we mean that B also is the "same" with A; "different," "like," and "unlike," have the same double application.](56441.docx#chunk3535)

[Another ambiguity needs to be noted in the word "same." When there are \_two\_ things, they are not the \_same\_ thing; for "same," in the strict sense of the word, means one thing, and that only. Here it means a great degree of likeness, a sense in which, with respect to sensations and ideas, it is very frequently used.  
Of two sensations, or two ideas, we, in truth, can only say, that they are like or unlike; or, that the one comes first, the other after it.  
It is now necessary to attend very carefully to what happens, when we say that two sensations are like, or that they are unlike.  
First of all, we have the two sensations. But what is it to have two sensations? It is merely to be conscious of a change. But to be conscious of a change in sensation, is sensation. It is an essential part of the process. Without it we should not be sentient beings. To have sensation, and not to be conscious of any change, is to have but one sensation continued. We have already seen that this is a state which seems incapable of being distinguished from that of having no sensation. At any rate, what we mean by a sentient being, is not a being with one unvaried sensation, but a being with sensations continually varied; the varying being a necessary part of the having more sensations than one; and the varying, and the being conscious of the variation, being not two things, but one and the same thing. Having \_two\_ sensations, therefore, is not only having sensation, but the only {12} thing which can, in strictness, be called having sensation; and the having two, and knowing they are two, which are not two things, but one and the same thing, is not only sensation, and nothing else than sensation, but the only thing which can, in strictness, be called sensation. The having a new sensation, and knowing that it is new, are not two things, but one and the same thing.[4]  
[Bain's footnote 4: The author is here endeavouring to express the most fundamental fact of the consciousness--the necessity of change, or transition from one state to another in order to our being conscious. He approaches very near to, without exactly touching, the inference that all consciousness, all sensation, all knowledge must be of doubles; the state passed from and the state passed to, are equally recognised by us. Opening the eyes to the light, for the first time, we know a contrast,--a present light, a past privation--but for the one we should not have known the other. Any single thing is unknowable by us; its relative opposite is a part of its very existence.  
In a former page it is stated that relative names are one of the conveniences of epitomising. This is a narrow view to take of them. They are an essential part of language; they are demanded by the intrinsic relativity of all nameable things. If we have a thing called "light," we have also another thing but for which light could not be known by us, "dark." It is expedient to have names for both elements of the mutually dependent couple. And so everywhere. Language would be insufficient for its purposes if it did not provide the means of expressing the correlative (called also the negative) of every thing named.--\_B.\_]  
The case between sensation and sensation, resembles that between sensation and idea. How do I know that an idea is not a sensation? Who ever thought of asking the question? Is not the having an idea, {13} and the knowing it as an idea, the same thing? The having without the knowing is repugnant. The misfortune is, that the word, know, has associations linked with it, which have nothing to do with this case, but which intrude themselves along with the word, and make a complexity, where otherwise there would be none.  
This is a matter which deserves the greatest attention. One of the most unfortunate cases of the illusions, which the close association of ideas with words has produced, is created by ideas clinging to words when they ought to be disjoined from them, and mixing themselves by that means with the ideas under consideration, when they ought to be considered wholly distinct from them. Nothing was of more importance, than that the phenomenon, to which we are just now directing our attention, the very first ingredient in the great mental composition, should be accurately understood, and nothing mixed up with it which did not truly belong to it.  
There is no doubt that in one of its senses, knowledge is synonymous with sensation. If I am asked what is my knowledge of pain? I answer, the feeling of it, the having it. The blind man has not the knowledge of colours; the meaning is, he has not the sensations: if deaf also, he is without the knowledge, that is, the sensations, of sounds: suppose him void of all other sensations, you suppose him void of knowledge. In many cases, however, we arrive at knowledge, by certain steps; by something of a process. The word, know, is most frequently applied to those cases. When we know, by mere sensation, we say we see, we hear, and so on; when we know by mere ideas, {14} or rather ideation, if we could use such a word, we say we conceive, we think. The word know, therefore, being almost constantly joined with the idea of a process, it is exceedingly difficult, when we apply it to sensation, not to have the idea of a process at the same time; and thus exceedingly difficult to conceive that sensation, and knowing, in this case, are purely synonymous.](56441.docx#chunk3536)

[As the knowing I have an idea, is merely having the idea; as the having a sensation, and knowing I have a sensation; the knowing, for example, that I have the pain of the toothache, and the having that pain; are not two things, but one and the same thing; so the having a change of sensation, and knowing I have it, are not two things but one and the same thing.  
Having a change, I have occasion to mark that change. The change has taken place in a train of feelings. I call the first part by one name, the last by another, and the marking of the change is effected. Suppose that, without any organ of sense but the eye, my first sensation is red, my next green. The whole process is sensation. Yet the green is not the red. What we call making the distinction, therefore, has taken place, and it is involved in the sensation.  
My names, green, and red, thus applied, are absolute names. The one has no reference to the other. Suppose that after green, I have the sensations, blue, yellow, violet, white, black; and that I mark them respectively by these names. These are still absolute names. Each marks a particular sensation, and does nothing more. But, now, suppose that, after my sensations red, green, blue, &c., I have the sensation {15} red again; that I recognise it as like the sensation I had first, and that I have a desire to mark that recognition; it remains to explain what are the steps of this process.  
Having the sensation a second time needs no explanation; it is the same thing as having it the first. But what happens in recognising that it is similar to a former sensation?  
Beside the \_Sensation\_, in this case, there is an \_Idea\_. The idea of the former sensation is called up by, that is, associated with, the new sensation. As having a sensation, and a sensation, and knowing them, that is, distinguishing them, are the same thing; and having an idea, and an idea, is knowing them; so, having an idea and a sensation, and distinguishing the one from the other, are the same thing. But, to know that I have the idea and the sensation, in this case, is not all; I observe, that the sensation is like the idea. What is this observation of likeness? Is it any thing but that distinguishing of one feeling from another, which we have recognised to be the same thing as having two feelings? As change of sensation is sensation; as change, from a sensation to an idea, differs from change to a sensation, in nothing but this, that the second feeling in the latter change is an idea, not a sensation; and as the passing from one feeling to another is distinguishing; the whole difficulty seems to be resolved; for undoubtedly the distinguishing differences and similarities, is the same thing; a similarity being nothing but a slight difference.[5] As {16} change from red to green, and knowing the change, or from a sensation of sight, to one of any other of the senses, the most different, is all sensation; so change from one shade of red to another, is assuredly sensation. Its being a different shade consists in my feeling of it, that is, in my sensation.  
[Bain's footnote 5: More properly Similarity is "agreement in difference." Difference or discrimination is one thing, one element of knowledge or cognition; Similarity or agreement in difference is another thing, the second or completing element of knowledge. The two work together in closest intimacy, but they should neither be looked upon as the same fact, nor as merely a various shading of the same fact. Without difference there would be no similarity; but similarity is difference and something more. At their roots or first origins, the two processes lie in almost undistinguishable closeness; but in their developments they run wide apart. No fact or attribute is known, or mentally possessed, without the union of many shocks of difference with many shocks of identity, or agreement in difference.--\_B.\_]  
Passing from red to red, red, red, through a succession of distinguishable shades, is one train of pure sensation: passing from red to green, blue, tasting, smelling, hearing, touching, is another train of pure sensation; that these are not the same trains, but different trains, consists in their being felt to be so; they would not be different, but for the feeling: and that a feeling is different, and known to be so, are not two things, but one and the same thing. Having two such trains, I want marks to distinguish them. For this purpose, I invent the words "same," "similar," and their contraries; by means of which, my object is attained. I call the parts of a train, such as the first, "same," or "similar;" those of a train like the last, "different," "dissimilar."  
By these relative terms, we name the sensations in pairs. When we say, same, we mean that sensations {17} A, and B, are the same; different, that A, and B, are different; like and unlike, the same. By these words we have four pairs of relative terms.  
A. B. same same different different like like unlike unlike.  
The feeling is perfectly analogous in the case of the \_ideas\_ of those sensations; and the naming is the same. Thus the idea of red, green, and so on, and the ideas of the different shades of red are distinguished from one another by the ideas themselves. To have ideas different and ideas distinguished, are synonymous expressions; different and distinguished, meaning exactly the same thing.](56441.docx#chunk3537)

[The sensations above mentioned, and their ideas, have the same absolute names: thus, red is at once the name of the sensation, and the name of the idea; green, at once the name of the sensation and the idea; sweet, at once the name of the sensation and the idea. The relative terms, it is obvious, have the same extent of application. Same, different, like, and unlike, are names of pairs of ideas, as well as pairs of sensations.  
It seems, therefore, to be made clear, that, in applying to the simple sensations and ideas their absolute names, which are names of classes, as red, green, sweet, bitter; and also applying to them names which denote them in pairs, as such and such; there is nothing whatsoever but having the sensations, having the ideas, and making marks for them.[6]  
[Editor's footnote 6: The author commences his survey of Relations with the most universal of them all. Likeness and Unlikeness; and he examines these as subsisting between simple sensations or ideas; for whatever be the true theory of likeness or unlikeness as between the simple elements, the same, in essentials, will serve for the likenesses or unlikenesses of the wholes compounded of them.  
Examining, then, what constitutes likeness between two sensations (meaning two exactly similar sensations experienced at different times); he says, that to feel the two sensations to be alike, is one and the same thing with having the two sensations. Their being alike is nothing but their being felt to be alike; their being unlike is nothing but their being felt to be unlike. The feeling of unlikeness is merely that feeling of change, in passing from the one to the other, which makes them two, and without which we should not be conscious of them at all. The feeling of likeness, is the being reminded of the former sensation by the present, that is, having the idea of the former sensation called up by the present, and distinguishing them as sensation and idea.  
It does not seem to me that this mode of describing the matter explains anything, or leaves the likenesses and unlikenesses of our simple feelings less an ultimate fact than they were before. All it amounts to is, that likeness and unlikeness are themselves only a matter of feeling: and that when we have two feelings, the feeling of their likeness or unlikeness is inextricably interwoven with the fact of having the feelings. One of the conditions, under which we have feelings, is that they are like and unlike: and in the case of simple feelings, we cannot separate the likeness or unlikeness from the feelings themselves. It is by no means certain, however, that when we have two feelings in immediate succession, the feeling of their likeness is not a third feeling which follows instead of being involved in the two. This question is expressly left open by Mr. Herbert Spencer, in his "Principles of Psychology;" and I am not aware that any philosopher has conclusively resolved it. We do not get rid of any difficulty by calling the feeling of likeness the same thing with the two feelings that are alike: we have equally to postulate likeness and unlikeness as primitive facts--as an inherent distinction among our sensations; and whichever form of phraseology we employ makes no difference in the ulterior developments of psychology. It is of no practical consequence whether we say that a phenomenon is resolved into sensations and ideas, or into sensations, ideas, and their resemblances, since under the one expression as under the other the resemblance must be recognised as an indispensable element in the compound.  
When we pass from resemblance between simple sensations and ideas, to resemblance between complex wholes, the process, though not essentially different, is more complicated, for it involves a comparison of part with part, element with element, and therefore a previous discrimination of the elements. When we judge that an external object, compounded of a number of attributes, is like another external object; since they are not, usually, alike in all their attributes, we have to take the two objects into simultaneous consideration in respect to each of their various attributes one after another: their colour, to observe whether that is similar; their size, whether that is similar; their figure, their weight, and so on. It comes at last to a perception of likeness or unlikeness between simple sensations: but we reduce it to this by \_attending\_ separately to one of the simple sensations forming the one cluster, and to one of those forming the other cluster, and if possible adjusting our organs of sense so as to have these two sensations in immediate juxtaposition: as when we put two objects, of which we wish to compare the colour, side by side, so that our sense of sight may pass directly from one of the two sensations of colour to the other. This act of attention directed successively to single attributes, blunts our feeling of the other attributes of the objects, and enables us to feel the likeness of the single sensations almost as vividly as if we had nothing but these in our mind. Having felt this likeness, we say that the sensations are like, and that the two objects are like in respect of those sensations: and continuing the process we pronounce them to be either like or unlike in each of the other sensations which we receive from them.--\_Ed.\_]  
{18} 2. The only other relative terms applicable to simple sensations and ideas, are those which denote them as \_Antecedent\_ and \_Consequent\_.  
{19} I have sensation red, sensation green. Why I mark them red, and green, or as "different," has already been seen. What happens in marking them {20} as "antecedent" and "consequent" comes next to be considered.](56441.docx#chunk3538)

[A sensation, the moment it ceases, is gone for ever. When I have two sensations, therefore, A, and B, one first, the other following, sensation A is gone, before sensation B exists. But though \_sensation\_ A is gone, its idea is not gone. Its idea, called up by association, exists along with sensation B, or the idea of sensation B. My knowing that the idea of sensation A is the idea of sensation A, is my having the idea. Having it, and knowing it, are not two things, but one and the same thing. \_Having\_ the idea of sensation A, that is, having the idea of the immediate antecedent of sensation B, seems, also, to be the same thing with knowing it as the idea of that antecedent. Having sensation A, and after it sensation B, is mere sensation; and having the idea of sensation A, the immediate antecedent, called up by sensation B, the immediate consequent, is knowing it for that antecedent. The links of the train are three; 1, sensation A; 2, sensation B; 3, the idea of sensation A, in a certain order with B, called up by sensation B; and after this, NAMING.  
The case appears mysterious, solely, from the want of words to express it clearly; and our confirmed habit of inattention to the process. Suppose, that {21} instead of two sensations, A and B, we have three, A, B, and C, in immediate succession. I recognise A, as the antecedent of B; B, as the antecedent of C. What is the process? The idea of sensation A, is associated with sensation B; and the idea of sensation B, is associated with sensation C. But sensation C, is not associated with the idea of sensation B solely, it is associated also with the idea of sensation A. It is associated, however, differently with the one and the other. It is associated with B immediately; it is associated with A, only through the medium of B; it calls up the idea of B, by its own associating power, and the idea of B, calls up the idea of A. This second state of consciousness is different from the first. The first is that in consequence of which B receives the name "Antecedent," and C the name "Consequent." When two sensations in a train are such, that, if one exists, it has the idea of the other along with it, by its immediate exciting power, and not through any intermediate idea; the sensation, the idea of which is thus excited, is called the antecedent, the sensation which thus excites that idea, is called the consequent.  
It is evident that the terms, "antecedent," and "consequent," are not applied in consequence of sensation merely, but in consequence of sensation joined with ideas. The antecedent sensation, which is past, must be revived by the consequent sensation, which is present. It is the peculiarity of this revival which procures it the name. If revived by any other sensation, it would not have that name.  
The Clock strikes three. My feelings are, three sensations of hearing, in succession. How do I know {22} them to be three successive sensations? The process in this instance does not seem to be very difficult to trace. The clock strikes one; this is pure sensation. It strikes two; this is a sensation, joined with the idea of the preceding sensation, and the idea of the feeling (also sensation), called change of sensation, or passage from one sensation to another. After two, the clock strikes three; there is, here, sensation, and a double association; the third stroke is sensation; that is associated immediately with the idea of the second, and through the idea of the second, with the idea of the first. It is observable, that these successive associations soon cease to afford distinct ideas; they hardly do so beyond the second stage. When the clock strikes, we may have distinct ideas of the strokes, as far as three, hardly farther; we must then have recourse to NAMING, and call the strokes, four, five, six, and so on: otherwise we should be wholly unable to tell how often the clock had struck.  
In the preceding pairs of relative terms, we have found only one name for each pair. Thus, when we say of A and B, that A is similar to B, we say also, that B is similar to A. We have now an instance of a pair of relative terms, consisting not of the same, but of different names. If we call A antecedent, we call B consequent. The first class were called by the ancient logicians, synonymous, the second heteronymous; we may call them more intelligibly, single-worded, and double-worded, relatives.[7]](56441.docx#chunk3539)

[[Editor's footnote 7: The next relation which the author examines is that of succession, or Antecedent and Consequent. And here again we have one of the universal conditions to which all our feelings or states of consciousness are subject. Whenever we have more feelings than one, we must have them either simultaneously or in succession; and when we are conscious of having them in succession, we cannot in any way separate or isolate the succession from the feelings themselves. The author attempts to carry the analysis somewhat farther. He says that when we have two sensations in the order of antecedent and consequent, the consequent calls up the idea of the antecedent; and that this fact, that a sensation calls up the idea of another sensation directly, and not through an intermediate idea, \_constitutes\_ that other sensation the antecedent of the sensation which reminds us of it--is not a \_consequence\_ of the one sensation's having preceded the other, but is literally all we mean by the one sensation's having preceded the other. There seem to be grave objections to this doctrine. In the first place, there is no law of association by which a consequent calls up the idea of its antecedent. The law of successive association is that the antecedent calls up the idea of the consequent, but not conversely; as is seen in the difficulty of repeating backwards even a form of words with which we are very familiar. We get round from the consequent to the antecedent by an indirect process, through the medium of other ideas; or by going back, at each step, to the beginning of the train, and repeating it downwards until we reach that particular link. When a consequent directly recalls its antecedent, it is by synchronous association, when the antecedent happens to have been so prolonged as to coexist with, instead of merely preceding, the consequent.  
The next difficulty is, that although the direct recalling of the idea of a past sensation by a present, without any intermediate link, does not take place from consequent to antecedent, it does take place from like to like: a sensation recalls the idea of a past sensation resembling itself, without the intervention of any other idea. The author, however, says, that "when two sensations in a train are such that if one exists, it has the idea of the other along with it by its immediate exciting power, and not through any intermediate idea; the sensation, the idea of which is thus excited, is called the antecedent, the sensation which thus excites that idea is called the consequent." If this therefore were correct, we should give the names of antecedent and consequent not to the sensations which really are so, but to those which recall one another by resemblance.  
Thirdly and lastly, to explain antecedence, \_i.e.\_ the succession between two feelings, by saying that one of the two calls up the idea of the other, that is to say, is followed by it, is to explain succession by succession, and antecedence by antecedence. Every explanation of anything by states of our consciousness, includes as part of the explanation a succession between those states; and it is useless attempting to analyse that which comes out as an element in every analysis we are able to make. Antecedence and consequence, as well as likeness and unlikeness, must be postulated as universal conditions of Nature, inherent in all our feelings whether of external or of internal consciousness.--\_Ed.\_]  
{23} II. Having shewn what takes place in naming simple SENSATIONS, and simple IDEAS, in pairs, both as {24} such and such, and as antecedent and consequent, we come to the second case of relative terms, that of naming the clusters, called EXTERNAL OBJECTS, in pairs. The principal occasions of doing so we have said are four.  
1. When we speak of them, as they exist in the synchronous order, that is, the order in space, we use such relative terms as the following: high, low; east, west; right, left; hind, fore; and so on.  
It is necessary to carry along with us a correct idea of what is meant by synchronous order, that is, the order of simultaneous, in contradistinction to that of successive, existence. The synchronous order is much more complex than the successive. The successive {25} order is all, as it were, in one direction. The synchronous is in every possible direction. The following seems to be the best mode of conceiving it.  
Take a single particle of matter as a centre. Other particles may be aggregated to it, in the line of every possible radius; and as the radii diverge, and other lines, tending to the centre, may be continually interposed, to any number, particles may be aggregated in those numberless directions. They may also be aggregated in those directions to a less or a greater extent. And they may be aggregated to an equal extent in every direction; or to a greater extent in some of the directions, a less extent in others. In the first case of aggregation they compose a globe; in the last, any other shape.  
Every one of the particles in this aggregate, has a certain order; first with respect to the centre particle; next with respect to every other particle. This order is also called, the Position of the particle. In such an aggregate, therefore, the positions are innumerable. It is thence observable, that position is an exceedingly complex idea; for the position of each of those particles is its order with respect to every one of the other innumerable particles; it includes, therefore, innumerable ingredients. Hence it is not wonderful that, while viewed in the lump, it should seem obscure and mysterious.  
Of positions, thus numberless, it is a small portion, only that have names. Bulk is a name for an aggregate of particles, greater, or less. Figure is only a modification, or case, of bulk; it is more or fewer particles in such and such directions.](56441.docx#chunk3540)

[These things being explained, it now remains to {26} shew, of what copies of sensations, peculiarly combined, the complex ideas in question are composed.  
The simplest case of position, or synchronous order, is that of two or more particles in one direction. Let us take the particle, conceived as the centre particle, in a preceding supposition, and let us aggregate to it a number of particles, all in the direction of a single radius, one by one. We have first the centre particle, and one other, in juxta-position. This is the simplest case of synchronous order, and this is the simplest of all positions. Let us next aggregate a second particle; we have now the centre particle, and two more. The position of the first of the aggregated particles with respect to the centre particle is contact, or juxta-position; that of the second is not juxta-position, but position at the distance of a particle; the next which is aggregated, is at the distance of two; the next of three particles, and so on, to any extent.  
Particles thus aggregated, all in the direction of a single radius from the first, constitute a line of less or greater length, according to the number of aggregated particles.  
Line is a word of great importance; because it is by that, chiefly, we express ourselves concerning synchronous order; or frame names for positions. Now it happens, that Line has a duplicity of meaning, most unfortunate, because it has confounded two meanings, which it is of the highest importance to preserve distinct.  
We have already remarked the distinction between concrete, and abstract, terms; and explained wherein the difference of their signification consists. We have {27} also observed, that though in very many cases, the concrete term, and the abstract term, are different words, as good and goodness, true and truth, there are many others in which the concrete and abstract terms are the same; and this is the case, unhappily, with the word Truth itself, which is used in the concrete sense, as well as the abstract. Thus we call a proposition, a Truth; in which phrase, the word Truth, means "True Proposition;" and in this sense we talk of eternal truths, meaning, Propositions, always true. "Property," is another word, which is sometimes concrete, sometimes abstract. Thus, a man calls his horse, his field, his house, his property. In such phrases the word is concrete. He also says, he has a property in such and such things. In these phrases, it is abstract.  
Of this ambiguity, the word Line is an instance. It is applied as well to what we call a physical line, as to what we call a mathematical line. In the first case, it is a concrete, or connotative term; in the second case, it is an abstract or non-connotative term. Let us then conceive clearly the two meanings. The purest idea of a physical line, is that which we have already formed; the aggregate of particle after particle, in the direction of a radius. When this aggregate of particles in this order is called a line, the word, line, is connotative; it marks or notes the \_direction\_, but it also marks or connotes the \_particles\_; it means the particles and the direction both; it is, in short, the \_concrete\_ term. When it is used as the \_abstract\_ term, the connotation is left out. It marks the direction without marking the particles.  
It is here necessary to call to mind, that abstract {28} terms derive their meaning wholly from their concretes; and that by themselves they have absolutely no meaning at all. I know a green tree, a sweet apple, a hard stone, but greenness without something green, hardness without something hard, are just nothing at all.  
The same, in its abstract sense, is the case with line, though we have not words by which we can convey the conception with equal clearness. If we had an abstract term, separate from the concrete, the troublesome association in question would have been less indissoluble, and less deceptive. If we had such a word as Lineness, or Linth, for example, we should have much more easily seen, that our idea is the idea of the physical line; and that linth without a line, as breadth without something broad, length without something long, are just nothing at all.[8]](56441.docx#chunk3541)

[[Editor's footnote 8: This conception of a geometrical line, as the abstract, of which a physical line is the corresponding concrete, is scarcely satisfactory. An abstract name is the name of an attribute, or property, of the things of which the concrete name is predicated. It is, no doubt, the name of some part, some one or more, of the sensations composing the concrete group, but not of those sensations simply and in themselves; it is the name of those sensations regarded as belonging to some group. Whiteness, the abstract name, is the name of the colour white, considered as the colour of some physical object. Now I do not see that a geometrical line is conceived as an attribute of a physical object. The attribute of objects which comes nearest to the signification of a geometrical line, is their length: but length does not need any name but its own; and the author does not seem to mean that a geometrical line is the same thing as length. He seems to have fallen into the mistake of confounding an abstract with an ideal. The line which is meant in all the theorems of geometry I take to be as truly concrete as a physical line; it denotes an object, but one purely imaginary; a supposititious object, agreeing in all else with a physical line, but differing from it in having no breadth. The properties of this imaginary line of course agree with those of a physical line, except so far as these depend on, or are affected by, breadth. The lines, surfaces, and figures contemplated by geometry are abstract, only in the improper sense of the term, in which it is applied to whatever results from the mental process called Abstraction. They ought to be called ideal. They are physical lines, surfaces, and figures, idealized, that is, supposed hypothetically to be perfectly what they are only imperfectly, and not to be at all what they are in a very slight, and for most purposes wholly unimportant, degree.--\_Ed.\_]  
{29} What are, then, the sensations, the ideas of which, in close association, we mark by the word line?  
Though it appears to all men that they see position, length, breadth, distance, figure; it is nevertheless true, that what appear, in this manner, to be sensations of the eye, are Ideas, called up by association. This is an important phenomenon, which throws much light upon the darker involutions of human thought.  
The sensations, whence are generated our ideas of synchronous order, are from two sources; they are partly the sensations of touch, and partly those of which we have spoken under the name of muscular sensations, the feelings involved in muscular action.[9]  
[Bain's footnote 9: In attaining the ideas of synchronous order, which is another name for Space, or the Extended World, sight is a leading instrumentality. It is by sight more than by any other sense that we get somewhat beyond the strict limits of the law of the successiveness of all our perceptions. Although we can \_distinctly\_ see only a limited spot at one instant, we can couple with this a vague perception of an adjoining superficies. This is an important sign of co-existence, as contrasted with succession, and enters with various other signs into the very complex notion of the author's synchronous order, otherwise called the Simultaneous or Co-existing in Space.--\_B.\_]  
{30} A line, we have said, is an order of particles, contiguous one to another, in the direction of a radius from one particle. Let us begin from this one particle, and trace our sensations. One particle may be an object of touch; it may be felt, as we call it, and nothing more; it may, at the same time, give the sensation of resistance, which we have already described as a feeling seated in the muscles, just as sound is a feeling in the ear. Resistance, is force applied to force. What we feel, is the act of the muscle. Without that, no resistance. This state of consciousness is, in reality, what we mark by the name. It is, at the same time, a state of consciousness not a little obscure; because we habitually overlook many of the sensations of which it is composed; because it is, in itself, very complex; and because it is entangled with a number of extraneous associations.  
We have already remarked the habit we acquire of not attending to the sensations which are seated in the muscles, of attending only to the occasions of them, and the effects of them; that is, their antecedents, and consequents; overlooking the intermediate sensations. In marking, therefore, or assigning our names, it seems to be rather the occasions and effects, the antecedents and consequents, than the sensations themselves, which are named. The word resistance is thus the name of a very complex {31} idea.[10] It is the name; first, of the feelings which we have when we say we feel resistance; secondly, of the occasions, or antecedents, of those feelings; and, thirdly, of their consequents. The feelings intermediate between the antecedents and consequents, are themselves complex. There are two kinds of sensations included in them; the sensation of touch, and the muscular sensations; and there is something more. When we move a muscle, we Will to move it. This state of consciousness, the Will to move it, is part of the feeling of the motion. What that state of consciousness, called the Will, is, we have not yet explained. At present we speak of it merely as an element in the compound. Of what elements it is itself compounded we shall see hereafter. In the idea of resistance, then, there is the will to move the muscles, the sensations in the muscles, the occasion or antecedent of those feelings, and the effects or consequents of them. And there is the common complexity attending all generical terms, that of their including all possible varieties.](56441.docx#chunk3542)

[[Bain's footnote 10: Still, when we apply an analysis to the complex facts indicated by the name, we come to a simple as well as ultimate experience, which is correctly signified by the name Resistance. The feeling of muscular energy expended is in all likelihood an absolutely elementary feeling of the mind; and the form of this feeling that is least complicated or mixed up with other sensibilities is what the word Resistance most usually expresses, namely, the dead strain, that is energy without leading to movement, or causing movement in such a slight degree as not to depart from the essential peculiarity of expended force.--\_B.\_]  
These things being explained, the learner will now be able to trace, without error, the formation of one of the most important of all our ideas, that of {32} resistance, or pressure. We touch one thing, butter, for instance; it yields to the finger, after a slight pressure; that is, a certain feeling of ours. The will to move the muscles, and the sensations in the muscles, are both included in that feeling; but, for shortness, we shall speak of them, through the present exposition, under one name, as the feelings or sensations in the muscles. As we call the butter yellow, on account of a feeling of sight; odorous, on account of a feeling of smell; sapid, on account of a feeling of taste; so we call it soft, on account of a feeling in our muscles. We touch a stone, as we touched the butter, and it yields not, after the strongest pressure we can apply. As we called the butter soft, on account of one muscular feeling, we call the stone hard, on account of another. The varieties of these feelings are innumerable. Only a small portion of them have received names. The feeling upon pressure of butter, is one thing; of honey, another; of water, another; of air, another; of flesh, one thing; of bone, another. We mark them as we can, by the terms soft, more soft, less soft; hard, more hard, less hard, and so on. We have great occasion, however, for a word which shall include all these different words. As we have "coloured" to include all the names of sensations of sight; "touch" all the names of sensations of touch, and so on; we invent the word "resisting," which includes all the words, soft, hard, and so on, by which any of the sensations of pressure are denoted.  
Such, then, are the feelings which we are capable of receiving from the particle with which we may suppose a line of particles to commence. These feelings, in passing along the line, we should receive in {33} succession from each, if the tactual sense were sufficiently fine to distinguish particles in contact from one another. It has not, however, this perfection. Even sight cannot distinguish minute intervals. If a red-hot coal is whirled rapidly round, though the coal is present at only one part of the circle at each instant, the whole is one continuous red. If the seven prismatic colours are made to pass rapidly in order before the eye, they appear not distinct colours, but one uniform white. In like manner, in passing from one to another, in a line of particles, there is no feeling of interval; there is the feeling we call continuity; that is, absence of interval.  
The sensations, then, the ideas of which combined compose the idea which we mark by the word line, may thus be traced. The tactual feeling, and the feeling of resistance, derivable from every particle, attend the finger in every part of its progress along the line. What is there besides? To produce the progress of the finger, there is muscular action; that is to say, there are the feelings combined in muscular action. That we may exclude extraneous ideas as much as possible, let us suppose, that, when a person first makes himself acquainted with a line, he has the sense of touch, and the muscular sensations, without any other sense. He has one state of feeling, when the finger, which touches the line, is still; another, when it moves. He has also one state of feeling from one degree of motion, another from another. If he has one state of feeling from the finger carried along, as far as it can extend, he has another feeling when it is only carried half as far, and so on.  
It is extremely difficult to speak of these feelings {34} precisely, or to draw by language those who are not accustomed to the minute analysis of their thoughts, to conceive them distinctly; because they are among the feelings, as we have before remarked, which we have acquired the habit of not attending to, or rather, have lost the power of attending to.  
It is certain, however, that by sensation alone we become acquainted with lines; that in every different contraction of the muscles there is a difference of sensation; and that of the tactual feeling, and the feelings of the contracted muscles, all the feelings which constitute our knowledge of a line are composed.  
As, after certain repetitions of a particular sensation of sight, a particular sensation of smell, a particular sensation of sight, and so on, received in a certain order, I give to the combined ideas of them, the name rose, the name apple, the name fire, and the like; in the same manner, after certain repetitions of particular tactual sensations, and particular muscular sensations, received in a certain order, I give to the combined ideas of them, the name Line. But when I have got my idea of a line, I have also got my idea of extension. For what is extension, but lines in every direction? physical lines, if real, tactual extension; mathematical lines, if mathematical, that is, abstract, extension.](56441.docx#chunk3543)

[It would be tedious to pursue the analysis of extension farther. And I trust it is not necessary; because the application of the same method to the remaining cases, appears completely obvious. Take plane surface for example. It is composed of all the lines which can be drawn in a particular plane; the idea of it, therefore, is derived from the tactual feeling, and the feeling of resistance, combined with the {35} muscular feelings involved in the motion of the finger in every direction which it can receive on a plane.  
Let us now take some of the words which, along with the synchronous order, connote objects in pairs. The names of this sort are not very numerous. High, and low, right, and left, hind, and fore, are examples. These, it is obvious, are names of the principal directions from the human body as a centre. The order of objects, the most frequently interesting to human beings, is, of course, their order with respect to their own bodies. What is over the head, gets the name of high; what is below the feet, gets the name of low; and so on. Of the pairs which are connoted by those words, the human body is always one. The words, right, left, hind, fore, when they denote the object so called, always connote the body in respect to which they are right, left, hind, fore. We have already noticed the cases in which the objects, thus named in pairs, have each a separate name, as father, son; also those in which both have the same name, as sister, brother. We have here another case, which deserves also to be particularly marked, that in which only one of them has a name. The human body, which is always one of the objects named, when we call things right, left, hind, fore, and so on, has no corresponding relative name. The reason is sufficiently obvious; this, being always one of the pair, cannot, the other being named, be misunderstood.  
For the complete understanding of these words, it does not appear that any thing remains to be explained. If one line, proceeding from a central particle, be understood, every line, which can proceed from it, is also understood. If that central point be a part {36} of the human body, it is plain that as the hand, passing along a line in a certain direction from that centre, has certain muscular actions, passing along in another direction, it has muscular actions somewhat different. When we say muscular actions somewhat different, we say muscular feelings somewhat different. Difference of feeling, when important, needs difference of naming.  
A particular case of association is here to be remarked; and it is one which it is important for the learner to fix steadfastly in his memory.  
We never perceive, what we call an object, except in the synchronous order. Whatever other sensations we receive, the sensations of the synchronous order, are always received along with them. When we perceive a chair, a tree, a man, a house, they are always situated so and so, with respect to other objects. As the sensations of positions are thus always received with the other sensations of an object, the idea of Position is so closely associated with the idea of the object, that it is wholly impossible for us to have the one idea without the other. It is one of the most remarkable cases of indissoluble association; and is that feeling which men describe, when they say that the idea of space forces itself upon their understandings, and is necessary.[11]  
[Editor's footnote 11: Under the head, as before, of Relative Terms, we find here an analysis of the important and intricate complex ideas of Extension and Position. It will be convenient to defer any remarks on this analysis, until it can be considered in conjunction with the author's exposition of the closely allied subjects of Motion and Space.--\_Ed.\_]  
{37} 2. We come now to the case of naming OBJECTS in pairs, on account of the Successive Order.  
We have had occasion to observe that there is nothing in which human beings are so deeply interested, as the Successive Order of objects. It is the successive order upon which all their happiness and misery depends; and the synchronous order is interesting to them, chiefly on account of its connection with the successive.  
When we speak of objects, it is necessary to remember, that it is sensations, not ideas, to which we are then directing our attention. All our sensations, we say, are derived from objects; in other words, object is the name we give to the antecedents of our sensations. And, reciprocally, all our knowledge of objects is the sensations themselves. We have the sensations, and that is all. A knowledge, therefore, of the successive order of objects, is a knowledge of the successive order of our sensations; of all the pleasures, and all the pains, and all the feelings intermediate between pleasure and pain, of which the body is susceptible.  
Of successions, that is, the order of objects as antecedent and consequent, some are constant, some not constant. Thus, a stone dropped in the air always falls to the ground. This is a case of constancy of sequence. Heavy clouds drop rain, but not always. This is a case of casual sequence.[12] Human life is {38} deeply interested in ascertaining the constant sequences of all the objects from which human sensations are derived. The great business of philosophy is to find them out; and to record them, in the form most convenient for acquiring the knowledge of them, and for applying it.](56441.docx#chunk3544)

[[Editor's footnote 12: This is surely an improper use of the word Casual. Sequences cannot be exhaustively divided into invariable and casual, or (as by the author a few pages further on) into constant and fortuitous. Heavy clouds, though they do not always drop rain, are not connected with it by mere accident, as the passing of a waggon might be. They are connected with it through causation: they are one of the conditions on which, when united, rain is invariably consequent, though it is not invariably consequent on that single condition. This distinction is essential to any system of Inductive Logic, in which it recurs at every step.--\_Ed.\_]  
In the successions of objects, it very often happens, that what appear to us to be the immediate antecedent and consequent, are not immediately successive, but are separated by several intermediate successions. Thus, the falling of a spark on gunpowder, and the explosion of the gunpowder, appear antecedent and consequent; but several successions in reality intervene; various decompositions, and compositions, in which, indeed, all the sequences cannot as yet be traced. Most of the successions, which we are called upon to notice and to name, are in the same situation. We fix upon two conspicuous points in a chain of successions, and the intermediate ones are either overlooked, or unknown.  
Thus, we name Doctor and Patient, the two extremities of a pretty long succession of objects. The Doctor is not the immediate antecedent of any change in the patient. He is the immediate antecedent of a certain conception, of which the consequent is, writing a prescription; the consequent of this, is the sending {39} it to the apothecary; the consequent of that, is the apothecary's reading it, and so on; the whole composing a multitudinous train. Doctor and Patient, therefore, are not only two paired names of two paired objects, but names of all the successions between the one and the other. Doctor and Patient, therefore, properly speaking, are to be considered one name, though made up of two parts. Taken together, they are the name of the complex idea of a considerable train of sequences, of which a particular man is one extremity, a particular man another; just as navigation is the single-worded name of the complex idea of a very long train, of which the extremities are not particularly marked. If you say, navigation from the Thames to the Ganges, you have a many-worded name, by which the extremities of this long train are particularly marked.  
The relative terms, Father and Son, are obviously included in this explanation. They are the two extremities of a train of great length and intricacy, very imperfectly understood. They also, both together, compose, as may easily be seen, but one name. Father is a word which connotes Son, and whether Son is expressed or not, the meaning of it is implied. In like manner Son connotes Father; and, stripped of that connotation, is without a meaning. Taken together, therefore, they are one name, the name of the complex idea of that train of which father is the one extremity, son the other.[13]  
[Editor's footnote 13: It seems hardly a proper expression to say that Physician and Patient, or that Father and Son, are one name made up of two parts. When one of the parts is a name of one person and the other part is the name of another, it is difficult to see how the two together can be but one name. Father and Son are two names, denoting different persons: but what the author had it in his mind to say, was that they connote the same series of facts, which series, as the two persons are both indispensable parts of it, gives names to them both, and is made the foundation or \_fundamentum\_ of an attribute ascribed to each.  
With the exception of this questionable use of language, which the author had recourse to because he had not left himself the precise word Connote, to express what there is of real identity in the signification of the two names; the analysis which follows of the various complicated cases of relation seems philosophically unexceptionable. The complexity of a relation consists in the complex composition of the series of facts or phenomena which the names connote, and which is the \_fundamentum relationis\_. The names signify that the person or thing, of which they are predicated, forms part of a group or succession of phenomena along with the other person or thing which is its correlate: and the special nature of that group or series, which may be of extreme complexity, constitutes the speciality of the relation predicated.--\_Ed.\_]  
{40} Brother and Brother are a pair of relative terms marking a still more complex idea. Two brothers are two sons of the same Father; taken together, they are, therefore, marks of all that Son, taken twice, is capable of marking. Son, as we have just seen, always implies Father; and, taken together, they are the name of a train. The relatives, therefore, brother and brother, are the compound name; two brothers, are the name of the train marked by the term, Father and Son, taken twice, the prior extremity of the train being the same in both cases, the latter different.](56441.docx#chunk3545)

[The above terms. Father and Son, Brother and {41} Brother, are imposed on account of sequences which are passed. I do not at this moment recollect any relative terms imposed on account of sequences purely future. The terms, Buyer and Seller, are sometimes, indeed, used in a sense wholly future; when they mean persons having something to buy and something to sell: but they are also used in a sense wholly passed, when they signify persons who have effected purchase and sale. We have, however, many relative terms on account of trains which are partly passed and partly future. Thus, Lender and Borrower, are imposed partly on account of the passed train included in the contract of lending and borrowing; partly on account of the future train implied in the repayment of the money. The words Debtor and Creditor are names of the same train, partly passed and partly future.  
The relative terms, Husband and Wife, are of the same class; the name of a train partly passed, to wit, that implied in entering into the nuptial contract; and partly future, to wit, all the events expected to flow out of that contract. Master and Servant are imposed, on account of a train partly passed and partly future; the train of entering into the compact of master and servant, and the train of acts which flow out of it. King and Subject are the name of a train similarly divided; first, the train which led to the will of obeying on the part of the people, the will of commanding on the part of the king; secondly, the trains which grow out of these wills.  
Owner and Property are relative terms, or terms which connote one another. They also are imposed on account of a train partly passed and partly future. The part which is passed is the train implied in the {42} circumstances of the acquisition, whether inheritance, gift, labour, or purchase. The part which is future is the train implied in the use which the owner may make of the property.  
Of the terms which denote objects in successive pairs, several are very general. Thus we have antecedent and consequent, which are applicable to any parts of any train. Prior and Posterior, are nearly of the same import. First and Last, are applicable to the two extremities of any train. Second, third, fourth, and so on, are applicable to the contiguous parts of any train.  
We have remarked, above, that successions of objects are to be distinguished into two remarkable kinds; that of the successions which are fortuitous, and that of the successions which are constant. Names to mark the antecedent and consequent in all constant successions, which are things of such importance to us, were found of course indispensable. Cause and Effect, are the names we employ. In all constant successions. Cause is the name of the antecedent. Effect the name of the consequent. And, beside this, it has been proved by philosophers,[1\*] that these names denote absolutely nothing.  
[Mill's footnote 1: Chiefly by Dr. Brown, of Edinburgh, in a work entitled "Inquiry into the Relation of Cause and Effect;" one of the most valuable contributions to science for which we are indebted to the last generation.--(\_Author's Note\_.)]  
It is highly necessary to be apprized, that each of the two names. Cause and Effect, has a double meaning. They are used, sometimes in the concrete sense, sometimes in the abstract. By this ambiguity, {43} ideas are confounded, which it is of the greatest importance to preserve distinct. When we say, the sun is the Cause of light, cause is concrete; the meaning is, that the sun always causes light. When we say that ice is the Effect of cold air, effect is concrete; the meaning is, that ice is effected by cold air. "Cause," in these cases, is merely a short name for "causing object," "Effect," a short name for "caused object." In abstract discourse, on the other hand, Cause and Effect are often used in the abstract sense, in which cases Cause means the same thing as would be meant by causingness; Effect, the same as would be meant by causedness. They are merely the connotative or concrete terms, with the connotation dropped.  
As the abstract terms have no meaning, except as they refer to the concrete, it is in the concrete sense I shall always use the words Cause and Effect, unless when I give notice to the contrary.  
Other terms, pairing the parts of a train, take parts more or less distant; first and last, take the most distant; father and son, take parts at a considerable distance; cause and effect, on the other hand, mean always the proximate parts. It does not, indeed, happen, that we always apply them to the proximate parts; because the intermediate sequences are often unknown, at other times overlooked. They are always, however, applied to the parts regarded as proximate. For we do not, strictly speaking, say, that any thing is the cause of a thing, when it is only the cause of another thing, which is the cause of that thing; still less, when there is a series of causes and effects, before you arrive at that which you have marked as \_the\_ effect, because the ultimate one. In {44} all the inquiries of philosophers into causes, it is the antecedent and consequent, really proximate, which is the object of their pursuit.  
We have observed, in the case of the relative terms, applied to objects as successive, that the words, properly speaking, form but one name,--that of the complex idea of a train of less or greater length: thus, Doctor and Patient is a name; Father and Son is a name; each denoting a train of which two individuals are the principal parts. In like manner, the relative terms Cause and Effect, taken together, are but one name, the name of a short train, that of one antecedent and one consequent, regarded as proximate, and constant.](56441.docx#chunk3546)

[3. We have now shewn, in what manner the principal Relative Terms are applied, when we have to speak of objects as having order in Space, and when we have to speak of them as having order in Time. We proceed to shew in what manner they are applied, when we have to speak of objects as differing in Quantity, or differing in Quality; and first, as differing in Quantity.  
We apply the word Quantity, in a very general manner; to things, which have the greatest diversity. Thus, we use the word quantity, when we speak of extension; we use the word quantity, when we speak of weight; we use it, when we speak of motion; we use it, when we speak of heat; we use it, in short, on almost every occasion, on which we can use the word degree. Of course, it represents not one idea, but many ideas, some of which have the greatest diversity.  
The relative terms, which we co-apply with {45} quantity, are equal, unequal, or some particular case included under these more general terms; as, more heavy, less heavy\*; more strong, less strong; whole, part; and so on.  
When quantity is applied to extent, it may be extent either in one, or more, or every direction; it may mean either quantity in line, quantity in surface, or quantity in bulk. Accordingly, we can say, equal, or unequal, lines; equal, or unequal, surfaces; equal, or unequal, bulks.  
Line is the simplest case; the explanation of it will, therefore, facilitate the rest. We have already traced the sensations, which constitute our knowledge of a line. We have seen that they are certain sensations of touch, combined with the muscular sensations involved in extending the arm.  
As the sensations, involved in extending the arm so far, are not the same with those which are involved in extending it farther; and as the having different sensations, and distinguishing them, are not two things, but one and the same thing;--as often as I have those two cases of sensation, I distinguish them from one another; and, distinguishing them from one another, I require names to mark them. The first I mark, by the word, short; the other, by the word, long. As I call a line long, from extending my arm so far; that is, from the sensations involved in extending it; I call it longer from extending it farther. After experience of a number of lines, there are some which I call long, long, long, one after another, to any amount; others which I call longer, longer, longer; others which I call short, short, short; and so on.  
When we have perceived the sensations, on account {46} of which we call lines long, longer, short, shorter, we can be at no loss for the knowledge of those, on account of which we call them equal, and unequal. It is to be observed, that in applying the words long, longer, short, shorter, minute differences are not named. They cannot be named. The names would be too numerous. A general mark, however, may be invented, to shew when there is even a minute difference, and when there is not. When there is not, we call the two lines equal; when there is, we call them unequal.  
We shall presently see, when we come to trace the ideas, which the class of words, called numbers, are employed to mark, what distinction of sensation it is which is marked by the words, one, and two. In the mean time, it is easy to see, that the case of sensation, when we trace one line, with the hand, and then another, is different from the case of sensation when we trace one line only, or even the same line twice; and this diversity needs marks to distinguish it. It is true, that in tracing one line, and then another, and marking the distinction, there is something more than sensation, there is also memory. But to this ingredient in the compound, after the explanation which has already been given of memory, it is not, at present, necessary particularly to advert.  
When it is seen, what are the sensations which are marked by the terms longer and shorter, applied to a line, it will not be difficult to see what are the sensations, which are marked by the terms, part, and whole.  
The terms, a part, and whole, imply division. Of course, the thing precedes the name. Men divided, before they named the act, or the consequences of the {47} act. In the act of division, or in the results of it, no mystery has ever been understood to reside. It is of importance to remark, that the word division, in its ordinary acceptation, includes, and thence confounds, things which very much need to be distinguished. It includes the will, which is the antecedent of the act; the act itself; and the results of the act. At present we may leave the will aside; it will be explained hereafter; and, as it is not the act, but the antecedent of the act, the consideration of it is not required, for the present purpose.  
The act of dividing, like all the other acts of our body, consists in the contraction and relaxation of certain muscles. These are known to us, like every thing else, by the feelings. The act, as act, is the feelings; and only when confounded with its results, is it conceived to be any thing else. If it be said, that the contraction of the muscles of my arm, is something more in me than feelings, because I see the motion of my arm; it is to be observed, that this seeing, this sensation of sight, is not the act, but one of its results; the feelings of the act are the antecedent; this sensation of sight one of the consequents.](56441.docx#chunk3547)

[In the act of dividing a line, as in the act, already analysed, of tracing a line, there is a feeling of touch, and there is also a muscular feeling. There may be more or less of cohesion in the parts of the line; and thence, more or less of what we call muscular force, required to disunite them. Of course, what we call more or less of force, are only names for different states of feeling. The states of feeling which we mark by the term, force, being antecedent, all the rest {48} are consequents of this antecedent. The disunion of the parts of one line is attended with a certain muscular feeling; I call the feeling a small force. That of another line is attended with a muscular feeling somewhat different; I call it a greater force; and so on. This muscular feeling, however, has various accompaniments; which are closely associated with the idea of the act, and with its name. Thus there is the sight of the line, there is the sight of the hands in the act of disruption, and there is the sight of the line after it is divided. The term division, as we have mentioned before, includes all; the muscular feeling, the sight of the line before division, and the sight of it after. I need a pair of names for the line before division, and the line after. I call the one whole, the other parts. Like other relative terms, the one of these connotes the other; whole has no meaning, but when associated with parts; parts have no meaning, but when associated with whole. Taken together; that is, whole and parts, used as one name; they mark a complex idea, consisting of three principal parts; an undivided line, the act of division, and the consequent of that antecedent, the line after division.  
In the preceding exposition, it is actual division, the actual making of parts, which has been spoken of. It is observable, however, that the same language, by which we name actual division, and actual parts, is applied to conceived division, and conceived parts. Thus we talk of the parts of a line, when it is not divided, nor meant to be divided. The exposition of this, however, is easy; and there is obscurity only when the double use of the terms confounds the two {49} cases, the division which is actual, with that which is conceived.  
The division of the line may consist of one act, or of more acts than one. By the first act, it is divided into two parts; by the second into three; by the third into four, and so on. The parts of a line are so many lines. These may be equal, or unequal. But the sensations, on account of which we denominate lines equal, or unequal, have been already shewn; the equality, and inequality, therefore, of the parts of a line, need no further explanation.  
When the learner conceives distinctly the sensations on account of which we apply the terms whole and parts to a line, he will not find it difficult to understand, on what account we apply them to all the modifications of extension; seeing that all these modifications are lines combined.  
Thus, a plane surface is a number of straight lines, in contact, in the direction called a plane. It is of greater or less extent, according as these lines are longer or shorter from a central point; it is of one shape or another shape, according as the lines are of the same length, or of different lengths. When they are all of one length, the surface is called a circle. As they may be of different lengths in endless variety, the surface may have an endless variety of shapes, of which only a few have received names. The square is one of these names, the triangle another, the parallelogram another, and so on.  
Bulk, which is the other great modification of extension, is lines from a central point in every direction. This bulk is greater or less, according as these lines are longer or shorter. The figure or shape of this {50} bulk is different, according as the lines are of the same or different lengths. If they are of the same length, the bulk is called round, or, in one word, a sphere; sphere meaning exactly round bulk. As the lines, when they differ in length, may differ in endless ways; figures, or the shapes of bulk, are also endless, as our senses abundantly testify. Of these but a small number have received names. In this number are the cube, the cylinder, the cone. We name some shapes by referring to known objects; thus we speak of the shape of an egg, the shape of a pear, and so on.  
It seems that nothing, therefore, is now wanting, to shew in what manner the relative terms, expressive of Quantity, are applied to all the modifications of extension.  
After what has been said, it will not be difficult to ascertain the sensations on account of which we apply the same relative terms to cases of Weight.](56441.docx#chunk3548)

[Weight is the name of a particular species of pressure; pressure towards the centre of the earth. Pressure, as we have already fully seen, is the name we apply, when we have certain sensations in the muscles, just as green is the name we apply when we have a certain sensation in the eye. As green is the name of the sensation in the eye, pressure is the name of the sensation in the muscles. Pressure upwards, is one thing; pressure downwards, is another; pressure of a body, when that body is urged by another body, is one thing; pressure of a body, when it is not urged by another body, is a different thing: pressure of a body in altering the position of its parts is one thing; pressure, when there is no alteration of the position of its parts, is another thing. Of this last sort is weight, {51} the pressure downwards, or towards the centre of the earth, of a body not urged by another body, and not altering the position of its parts.  
In supporting in my hand a stone, I resist a certain pressure; in other words, have certain muscular feelings, on account of which I call the stone heavy. I support other stones, and in doing so have muscular feelings, in one case similar, in another dissimilar. In the case of similarity, I call two stones equal, meaning in weight; in the case of dissimilarity, unequal; and so I apply all the other relative terms by which quantity is expressed.  
It seems unnecessary to carry this analysis into further detail. The words equal, unequal: greater, less; applied to Motion, to Heat, and other modifications of sensation, have a meaning, which in following the course so fully exemplified it cannot be difficult to ascertain.  
It seems still necessary that I should say something of the word \_Quantus\_, from which the word Quantity is derived. \_Quantus\_ is the correlate of \_Tantus\_. \_Tantus\_, \_Quantus\_, are relative terms, applicable to all the objects to which we apply the terms, Great, or Little; they are applicable, therefore, to all the modifications of extension, of weight, of heat; in short, to all modifications which we can mark as degrees.  
Of two lines, we call the one \_tantus\_, the other \_quantus\_. The occasions on which we do so are, when the one is as long as the other. \_Tantus\_, and \_Quantus\_, then, in this case, mean the same thing as equal, equal. They will be found to have the same import as equal, equal, when applied also to surface, and bulk; and so in all other compatible cases.  
{52} What then, it may be asked, is the use of them? If it should appear that they were of no use, it would not be very surprising; considering by whom languages have been made; and that redundancy is frequent in them as well as defect. In the present case, however, a use is not wanting.  
It is necessary to observe the artifice, to which we are obliged to have recourse, to name, and even to distinguish, the different modifications, not of kind but of degree, included under the word quantity. We are obliged to take some one object, with which we are familiar, and to distinguish other objects, as differing or agreeing with that object. Thus, we take some well-known line, the length of the foot, or the length of the arm, and distinguish and name all other lengths by that length; which can be divided or multiplied so as to correspond with them. In like manner, we take some well-known object as a standard weight, which we call, for example, a pound, and distinguish and name all other weights, as parts or multiples of that known weight.  
Now it will be recognised, that, in applying the relative terms equal, equal, or in calling two objects equal, no one of them is marked as the standard. Both are taken on the same footing. The one is equal to the other; and the other is equal to that. But when we say that one thing is \_tantus\_, \_quantus\_ another; or one so great, as the other is great; the first is referred to the last, the \_tantus\_ to the \_quantus\_; the first is distinguished and named by the last. The \_quantus\_ is the standard.  
It is this which gives its peculiar meaning to the word Quantity, and has recommended it for that very {53} comprehensive and generical acceptation, in which it is now received.  
Our word Quantity, is the Latin word \_Quantitas\_; and \_Quantitas\_ is the abstract of the concrete \_Quantus\_. We have no English words, corresponding to \_Tantus\_, \_Quantus\_. We form an equivalent, by aid of the relative conjunctions; we say, So Great, As Great. But these concrete terms do not furnish abstracts; we do not say, As-greatness; in the first place, because it is an awkward expression; and in the next place, because the relative, "as," is not steady in its application, since we use "as great" not for \_quantus\_ only, but frequently also for \_tantus\_. As greatness, therefore, does not readily suggest the idea of the abstract of \_Quantus\_.](56441.docx#chunk3549)

[On what account, then, is it we give to any thing the name \_Quantus\_? As a standard by which to name another thing \_Tantus\_. The thing called \_Quantus\_, is the previously known thing, the ascertained amount, by which we can mark and define the other amount. Leaving out the connotation of \_Quantus\_, which is some one individual body, \_Quantitas\_ merely denotes such and such an amount of body. \_Quantitas\_, if it was kept to its original meaning, would still connote \_Tantitas\_; just as paternity connotes filiality. But in the case of Quantity, even this connotation is dropped; it is used not as a relative abstract term, but an absolute abstract term; and is employed as a generical name for any portion of extension, any portion of weight, of heat, or any thing else, which can be measured by a part of itself.[14]  
[Editor's footnote 14: After analysing Position and Extension under the head of Relative Terms, the author now, under the same head, gives the analysis of Quantity and Quality. To what he says on the subject of Quantity it does not appear necessary to add anything. He seems to have correctly analysed the phenomenon down to a primitive element, beyond which we have no power to investigate. As Likeness and Unlikeness appeared to be properties of our simple feelings, which must be postulated as ultimate, and which are inseparable from the feelings themselves, so may this also be said of More and Less. As some of our feelings are like, some unlike, so there is a mode of likeness or unlikeness which we call Degree: some feelings otherwise like are unlike in degree, that is one is unlike another in intensity, or one is unlike another in duration; in either case one is distinguished as more, or greater, the other as less. And the fact of being more or less only means that we feel them as more or less. The author says in this case, as he had said in the other elementary cases of relation, that the more and the less being different sensations, to trace them and to distinguish their difference are not two things but one and the same thing. It matters not, since there the difference still is, unsusceptible of further analysis. The author's apparent simplification amounts only to this, that differences of quantity, like all other differences of which we take cognizance, are differences merely in our feelings; they exist only as they are felt. But (as we have already said of resemblance, and of antecedence and consequence) they must be postulated as elements. The distinction of more and less is one of the ultimate conditions under which we have all our states of consciousness.--\_Ed.\_]  
{54} 4. After tracing the sensations and ideas, which are marked when we apply relative terms to objects, as agreeing or disagreeing in \_quantity\_; we have now to trace the sensations and ideas, which are marked, when we apply relative terms to objects, on account of their agreeing or disagreeing in \_quality\_.  
First of all, the learner must take note of what he {55} means by Quality. We ascribe qualities to an object on account of our sensations. We call an object green, on account of the sensation green; hard, on account of the sensation hard; sounding, on account of the sensation sounding. The names of all qualities of objects, then, are names of sensations. Are they any thing else? Yes; they are the names of our sensations, with connotation of a supposed unknown cause of those sensations. As far, however, as our knowledge goes, they are names of sensations, and nothing else. The supposed cause is never known; the effects alone are known to us.  
We ascribe qualities to objects, in two cases, which require to be distinguished: on account of the sensations which we have from them primarily; on account of those which we have from them secondarily. The first we call their sensible qualities; as green, hot, hard, sweet, scented, and so on: the second we more frequently call their powers; as the power of the loadstone to draw iron, the power of water to melt sugar. In this latter case, the sensations marked are not those which are derived from the loadstone, or from water; but those which are derived from the changes in the iron, and the sugar; of which changes, we call the loadstone, and the water, the cause. In the latter case, the train of antecedents and consequents is longer than it is in the former. When I see an object green; there is the object, the antecedent; and myself sentient of green, the consequent. When I see a loadstone draw iron, there is the following train; the loadstone, antecedent; iron drawn, first consequent; myself seeing it drawn, second consequent. When I see water melt sugar, there is the {56} antecedent water; sugar melting, first consequent; myself seeing it, second consequent. What I call the powers of an object, then, are its order in respect to certain of my sensations, the order of antecedence, not proximate, but more or less remote.  
When I say that grass is green, I trace my sensation green, no farther than to the grass. When I say, the sugar is melting, I trace my sensations (for they are several) called sugar melting, first to the sugar, and then to the water. My word green, therefore, is the notation of a sensation, and connotation of an unknown cause; my name melting, is the notation of a compound of sensations, and connotation of two causes, an antecedent and a consequent: the first, an unknown cause in the sugar; the second, the cause of that unknown cause, namely, the water.  
In speaking of the qualities of an object, it is necessary to take notice of an inaccuracy of language; which, not only, as Dr. Brown has well observed, lies at the bottom of many philosophical errors, but induces men to mistake the very business of the philosopher.](56441.docx#chunk3550)

[The term, "quality" or "qualities of an object," seems to imply, that the qualities are one thing, the object another. And this, in some indistinct way, is, no doubt, the opinion of the great majority of mankind. Yet, the absurdity of it strikes the understanding, the moment it is mentioned. The qualities of an object are the whole of the object. What is there beside the qualities? In fact, they are convertible terms: the qualities are the object; and the object is the qualities. But, then, what are the qualities? Why, sensations, with the association of {57} the object as the cause. And what is the association of the object as the cause? Why, the association of other sensations as antecedent. What, for example, are the smell, and colour, and other qualities of the rose? Is not each of the names of these qualities, that of the smell, for example, a connotative name, not only noting the sensation, of which it is properly the name, but connoting all the sensations of colour, of consistence, of figure, of position; to which, all combined by association, so as to form one complex idea, we give the specific name, rose, the more general name, vegetable, and the still more general name, object? When the smell of a rose is perceived by me, or the idea suggested to me, immediately all the other ideas included under the term rose, are suggested along with it, and their indissoluble union presupposed. But this belief of the previous indissoluble union of each of those sensations with all the other sensations, is all which I really mean when I refer each sensation to the rose as its cause.  
If the learner has fully apprehended the ideas here premised, it will be easy for him to trace to the bottom the relative terms, which we apply to objects on account of their agreeing or disagreeing in \_Quality\_.  
We say, that objects agree or disagree, on account of one quality, or more than one quality, that is, on account of single sensations, or combined sensations.  
Let us first observe the case of one quality. We say, that a blade of grass is like the leaf of an oak, meaning, that in the quality of colour both are green; we say that the leaf of the rose tree, is unlike the petal of the flower, meaning in colour. By these {58} words, we name the objects in pairs; first, the pair of leaves, to each of which, we give the name, like; secondly, the leaf and the petal, to each of which, we give the name, unlike. We name the first two objects, "like," on account of the two sensations, green, and green, one of each object; we name the next two objects unlike, on account of the two sensations, green of the one, red of the other. What is done, or rather what is felt, when we give the same, or a different name, to each of two sensations, has been already so fully explained, that a bare suggestion of what has been premised, is here all that will be required.  
We have two sensations. A, B. Having two sensations, and knowing them to be two sensations, that is, not one sensation, is having the sensations, and nothing more.  
Why do I call one sequence of sensations, green, green; another sequence, green, red? Clearly on account of the sensations. No other explanation can be given of it, nor can be required. For the same reason for which I called the sensations of the first sequence individually, green, green, I call them both, like; and for the same reason for which I called those of the second sequence, not green, green, but green, red, I call them, unlike.  
Let us next put the case of several sensations. We say, that one rose is like another. We have only to take the sensations combined under the name rose, one by one, to see that this, and the former, case, are in reality the same. The two roses are like in colour, like in smell, like in consistence, like in form, like in position. The likeness of the two roses, is a likeness {59} not in one sensation, but in several. But the likeness of two sensations of smell, is of the same nature as the likeness of the two sensations of sight. When I call the smell, therefore, of the two roses like, it is for the same reason as I call the colour of them like, that is, the sensations. When I call the shape and consistence, and position, like, it is for the same reason still; the tactual and muscular sensations, whence the ideas are derived to which these names are annexed. In this case, however, the reason is by no means so clearly seen, first, because the sensations are complex, and secondly, because they are of that class of sensations which we habitually overlook.  
The Latin words, \_Talis\_, \_Qualis\_, are applied to objects in the same way, on one account, as \_Tantus\_, \_Quantus\_, on another; and the explanation we gave of \_Tantus\_, \_Quantus\_, may be applied \_mutatis mutandis\_, to the pair of relatives we have now named. \_Tantus\_, \_Quantus\_, are names applied to objects on account of dimension. \_Talis\_, \_Qualis\_, are names applied to objects on account of all other sensations. We apply \_Tantus\_, \_Quantus\_, to a pair of objects when they are equal; we apply \_Talis\_, \_Qualis\_, to a pair of objects, when they are like.  
\_Talis\_, \_Qualis\_, however, express the likeness of two objects in a manner somewhat different from the other pair of nearly equivalent relatives, "Like," and "Like." When we call two objects Like, the one is placed on the same footing as the other. No one of them is taken as the standard. When we apply, \_Talis\_, \_Qualis\_, the case is different. One of the objects is then the standard. The object \_Qualis\_, is that to which the reference is made.](56441.docx#chunk3551)

[{60} This being understood, the extensive meaning which came to be given to the word Quality, may be easily explained. Quality is the Latin \_Qualitas\_, and \_Qualitas\_ is the abstract of \_Qualis\_. The meaning of the abstract is the same with that of the concrete, the connotation being dropped. When the word \_Qualis\_, is applied to an object, it notes something about it in particular, but connotes the whole object. The \_Qualitas\_ of that object, is the something noted in particular, the connotation being dropped. As \_Qualis\_ is applied to objects, sometimes on account of one thing belonging to them, sometimes on account of another, \_Qualitas\_ comes in turn to be applied to every thing in them, requiring at any time a separate notation. \_Qualitas\_, when first formed from \_Qualis\_, has the force of a relative, and connotes the abstract of \_Talis\_; but in its frequent use, in marking every thing in objects, which requires separate notation, this connotation, also, comes to be dropped; and Quality is finally used as an absolute term, the generical name of every thing in objects, for which a separate notation is required.[15]  
[Editor's footnote 15: As in the case of Quantity, so in that of Quality, it is needless to add anything to the author's very sufficient elucidation. I merely make the usual reserves with respect to the use of the word Connotation. The concrete names which predicate qualities (for of abstract relative names the author is not yet speaking) are said by him to be the names of our sensations; green, for instance, and red. But it is the abstract names alone which are this: the names greenness, and redness. And even the abstract names signify something more than only the sensations: they are names of the sensations considered as derived from an object which produces them. The concrete name is a name not of the sensation, but of the object, of which alone it is predicable: we talk of green objects, but not of green sensations. It however connotes the quality greenness, that is, it connotes that particular sensation as produced by, or proceeding from, the object; as forming one of the group of sensations which constitutes the object. This, however, is but a difference, though a very important one, in terminology. It is strictly true, that the real meaning of the word is the sensations; as, in all cases, the meaning of a connotative word resides in the connotation (the attributes signified by it), though it is the name of, or is predicable of, only the objects which it denotes.--\_Ed.\_]  
{61} III. It was remarked at the beginning of this investigation of relative terms or names applied in pairs, that we name in pairs-- 1, single sensations or ideas; 2, the clusters we call objects; 3, the complex ideas we form arbitrarily for our own purposes. Having finished the consideration of the two former cases, we shall not find occasion to speak much at length upon the last.  
The clusters, formed by arbitrary association, receive names in pairs, on two occasions; either,  
1. When they consist of the same or different simple ideas; or,  
2. When they succeed one another in a train.  
1. The ideas which we put together arbitrarily are sometimes less, sometimes more, complex, for the most part, they are exceedingly complex.  
Of the less complicated kinds, are such ideas as that of the unicorn, which is a horse with one straight horn growing from the middle of its forehead; the Cyclops, a gigantic man, with a single eye in the middle of his forehead; a mermaid, of which the upper part is a woman, the lower a fish; the Brobdignagian {62} and Lilliputian of Swift, which are men of greatly reduced, or greatly enlarged dimensions.  
Of the more complicated kinds, are such ideas as those which are marked by the word Science, by the word Trade, by the word Law, by the word Religion, by the word Faith, by the words God and Devil, by the word Value, by the words Virtue, Honour, Vice, Beauty, Deformity, Space, Time, and so on.  
Language has not many relative terms, applicable to ideas of this class. We speak of pairs of them as like or unlike, same or different, greater or less; and except when their order in time is to be noted, we hardly apply to them any other marks in pairs.  
We say the Cyclops in Homer, and the Brobdignagian of Swift, are unlike. We do so precisely in the same way, as we say, the rose and the lily are unlike; and the explanation which we have given of that which is distinctively marked by those terms, when applied to objects, is precisely applicable here. In the case of objects, that which is named, is, clusters of ideas;[16] in the present case, that which is named, is clusters of ideas. That one cluster has been formed in one way, another in another, makes no difference in annexing marks to the clusters when they are formed.  
[Editor's footnote 16: Say rather, in the case of objects, what is named is clusters of sensations, supplemented by possibilities of sensation. If an object is but a cluster of ideas, what is there to distinguish it from a mere thought?--\_Ed.\_]](56441.docx#chunk3552)

[There is as little difficulty in tracing what is marked by the relatives, different, and same, when applied to ideas of this class. We say, the unicorn is different {63} from the horse; because, to the idea of the horse it adds that of a horn growing in the middle of the forehead. In the case of very complex ideas, it is much more difficult to say, with precision, what are the added and subtracted ideas, on account of which, we apply the term, different; as when we say, the courage of Ajax was different from that of Achilles; but it is not the less certain, that it is wholly on account of ideas added and subtracted, that we so denominate the courage of the two men.  
Rather more explanation is needed, to shew what is peculiarly marked by the relatives equal, unequal, greater, less, when applied to the class of arbitrarily formed complex ideas.  
We have already seen, that those terms are primarily applied to what we call objects, on account of their extension; objects are equal or unequal, greater or less, in extension.  
We have also seen, that in marking the extension of different objects, we are under the necessity of taking some known object as a standard, and by that object naming others. Thus, we take the foot, and say that other objects are two feet, three feet, or the half or quarter of a foot, and so on.  
Having become familiar with what we call degrees of extension, we are led to employ the same mode of notation, when we come to mark analogous differences in other cases of sensation. Thus, when we perceive the weight of different heavy bodies; as the terms equal, unequal, greater, less, are applied with convenience to certain cases of extension, it appears they may be applied with equal convenience, and even precision, to cases of weight. All other sensations, {64} having distinguishable differences, may be marked in the same way: thus sounds are more or less loud, and we speak of equal, or unequal, less or greater loudness of sound; less or greater sweetness in objects of the palate; less or greater resistance; less or greater pain; less or greater pleasure.  
When the terms equal, unequal, less, greater, had been applied to simple sensations of the pleasurable kind, and their ideas; the transference of them to complex ideas, of the pleasurable or painful kind, was easy. If the less or greater sweetness of the rose and the woodbine, was a convenient notation, so was the less or greater beauty of those two flowers, the less or greater beauty of two women, the less or greater wisdom or folly, vice or virtue, of two men.  
It thus appears, that, as we apply the term unlike to our complex ideas, on account of the addition and subtraction of ideas of \_different\_ kinds, so we apply to them the term unequal, on account of the addition and subtraction of ideas of the \_same\_ kind. Like and equal we apply, when we neither add, nor subtract.[17]  
[Editor's footnote 17: In this passage the author has got as near as it is perhaps possible to get, to an analysis of the ideas of More and Less. We say there is more of something, when, to what there already was, there has been superadded other matter of the same kind. And when there is no actual superadding, but merely two independent masses of the same substance, we call that one the greater which produces the same impression on our senses which the other would produce if an addition were made to it. So with differences of intensity. One sweet taste is called sweeter than another because it resembles the taste which would be produced by adding more sugar: and so forth. In all these cases there is presupposed an original difference in the sensations produced in us by the greater mass and by the smaller: but according to the explanation now offered, the idea which guides the application of the terms is that of physical juxtaposition.--\_Ed.\_]  
{65} 2. We apply the same relative terms to successive ideas of this class, which we apply to simple ideas, or the clusters called objects, when successive. We call them antecedent and consequent, or names equivalent; as prior, posterior; first, second; or even successive, which is a name including both antecedent and consequent.](56441.docx#chunk3553)

[In speaking of the relative terms applied to objects as successive, we had occasion to explain the two important terms, Cause and Effect. We found that Cause and Effect, were only other names for antecedent and consequent, in a certain set of cases. We do not use the terms, Cause and Effect, as synonymous with antecedent and consequent, in those cases in which, though the objects may be antecedent and consequent to our perception, we know not whether they are parts of the same series, or parts of two different series. Within the sphere of our observation, innumerable series of events are going on; and we are observing, first a part of one series, and then a part of another, continually. It is thus constantly happening, that those things, which are immediately antecedent and consequent to our observation, are not parts of the same series, but parts of different series; and, of course, in those antecedents and consequents, there is no constancy; they are accidental, as the course of each man's attention. This may be illustrated by many familiar instances. There may be {66} immediately before me, a man playing on the violin, one series; another man filing a saw, a second series. My attention may pass immediately from the sight of the man playing on the violin, to the sound produced by the filing of the saw. Playing on the violin, and the disagreeable sound of the file on the saw, are thus antecedent and consequent to my attention. But, as we recognise such antecedents and consequents, as parts of different series of events, we do not call them cause and effect.  
There are two cases of antecedents and consequents, even when they are parts of the same series. They may be proximate; or they may be remote; that is, parts of the series, more or fewer, may come between them. It is only to the case of the proximate parts of the same series, that the relatives, cause and effect, are properly and strictly applied. When the series, however, is the same, the intermediate links between any two remote parts are constant. Suppose a series, A, B, C, D; as B is the immediate consequent of A, C the immediate consequent of B, and D the immediate consequent of C; when I know A and D as antecedent and consequent, without knowing the intermediate parts B, and C, there is little inaccuracy in naming A and D cause and effect; because B and C are surely intermediate, and the succession of A and D, though not immediate, is constant. We accordingly do name cause and effect parts of a series thus removed from one another, in all those cases in which the intermediate parts are either unknown to us, or habitually overlooked.  
The terms Cause and Effect, thus applied to Objects as antecedent and consequent, are applied also to {67} Thoughts as antecedent and consequent. Thus we say, that Evidence is the cause of Belief; Villany is the cause of Indignation, and so on.  
Of objects, antecedent and consequent, we have observed, that innumerable series are existing at the same time; a separate series, of vegetation, for example, in every plant, of animalization in every animal, of composition and decomposition in objects without number. In the mind, however, there is but one train, not various trains at the same time; and therefore, according to the sense above applied to the terms Cause and Effect, each thought in a train is the cause of that which follows it, and each succeeding thought is the effect of that which precedes it.  
But if thoughts are reciprocally Cause and Effect; that is to say, if, in trains of thought, the same antecedent is regularly followed by the same consequent, how happens it that all trains of thought are not the same? For if the ideas A, B, C, D, &c., constantly follow one another, every mind into which A may enter, goes on with B, C, D, &c., and hence all such minds should consist of the same trains, that is, should be the same.  
Supposing the succession of two thoughts to have that constancy to which we apply the terms cause and effect, trains would still have that variety which we experience. Our trains consist of two distinguishable ingredients; sensations and ideas. Sensations depend upon the innumerable series of objects. They are, therefore, liable to all that variety which attends the perception of those objects. A perpetual variety in sensations produces a perpetual variety in the thoughts which are consequent upon them. The {68} variety of sensation, is even much greater than is commonly supposed. The most active of all our sensations is the sight. But in most objects of sight there are numerous parts. Some of these are more seen, some are less seen; some not seen at all. Of these, the parts that are more seen by one man, are less seen by another; whence it is probable, that from an object of any complexity no two men ever receive precisely the same sensations. There is a striking exemplification of this, in the fact, so constantly observed, of the different manner in which different men are affected by the comparison of two countenances. To one man there appears a strong likeness, where another man cannot discover any. Of the minute particulars, on which the likeness depends, none, or an insufficient number, is embraced by the vision of the one, while the contrary is the case with that of the other.](56441.docx#chunk3554)

[The variety in the sensations, which mix in the trains of men, is one grand cause of the variety in the ideas, which make up or complete those trains. The variety in the order of those sensations is another cause. We have seen that ideas follow one another, in the order in which the sensations have followed. Thus, a man may be a kind father to his child. The sight of him to the child is habitually accompanied with agreeable sensations. The same man may be a severe master to his slaves. The sight of him to the slaves is habitually accompanied with painful sensations. A corresponding difference exists in the case of the ideas. When his image presents itself to the mind of the child, it is followed by a train of pleasurable ideas, corresponding to the {69} pleasurable sensations which the child has habitually enjoyed in his presence. When his image rises to the mind of the slave, it is followed, from the contrary cause, by ideas of the contrary description.[18]  
[Editor's footnote 18: The author may seem to be anticipating a difficulty which few will feel, when he asks how it happens that all trains of thought are not the same. But what he is enquiring into is not why this happens, but how its happening is consistent with the doctrine he has just laid down. He is guarding against a possible objection to his proposition, that "the succession of two thoughts" has "that constancy to which we apply the terms Cause and Effect." If (he says) it is by direct causation that an idea raises up another idea with which it is associated; and if it be the nature and the very meaning of a cause, to be invariably followed by its effect; how is it, he asks, that any two minds, which have once had the same idea, do not coincide in their whole subsequent history? And how is it that the same mind, when it gets back to an idea it has had before, does not go on revolving in an eternal round?  
Of this difficulty he gives a solution, good as far as it goes--that it is because the train of ideas is interrupted by sensations, which are not the same in different minds, nor in the same mind at every repetition, and which even when they are the same, are connected in different minds with different associations. This is true, but is not the whole truth, and a still more complete explanation of the difficulty might have been given. The author has overlooked a part of the laws of association, of which he was perfectly aware, but to which he does not seem to have been always sufficiently alive. The first point overlooked is, that one idea seldom, perhaps never, entirely fills and engrosses the mind. We have almost always a considerable number of ideas in the mind at once; and it must be a very rare occurrence for any two persons, or for the same person twice over, to have exactly the same collection of ideas present, each in the same relative intensity. For this reason, were there no other, the ideas which the mental state excites by association are almost always more or less different.  
A second point overlooked is, that every sensation or idea is far from recalling, whenever it occurs, all the ideas with which it is associated. It never recalls more than a portion of them, and a portion different at different times. The author has not, in any part of the Analysis, laid down any law that determines which among the many ideas associated with an idea or sensation, shall be actually called up by it in a given case. The selection which it makes among them depends on the truth already stated, that we seldom or never have only one idea at a time. When we have several together, they all exercise their suggesting power, and each of them aids, impedes, or modifies the suggesting power of the others. This important case of Association has been treated in a masterly manner by Mr. Bain, both in his larger treatise and in his Compendium, under the name of Compound Association, and he lays down the following as its most general law. "Past actions, sensations, thoughts, or emotions, are recalled more easily when associated either through contiguity or similarity, with more than one present object or impression." (Compendium of Psychology and Ethics, p. 151.) It follows that when we have several ideas in our mind, none of which is able to call up all the ideas associated with it, those ideas will usually have the preference which are associated with more than one of the ideas already present. An idea A, coexisting in the mind with an idea B, will not select the same idea from among those associated with it, that it would it it occurred alone or with a different accompaniment. If there be any one of the ideas associated with A which is also associated with B, this will probably be one of those called up by their joint action. If there be any idea associated with A which not only is not associated with B, but whose negation is associated with B, this idea will probably be prevented from arising. If there are any sensations which have usually been presented in conjunction, not with A alone or with B alone, but with the combination A B, still more likely is it that the ideas of these will be recalled when A and B are thought of together, even though A or B by themselves might in preference have recalled some other.](56441.docx#chunk3555)

[These considerations will be found of primary importance in explaining and accounting for the course of human thought. They enable us, for example, to understand what it is that keeps a train of thought coherent, \_i.e.\_ that maintains it of a given quality, or directs it to a given purpose. The ideas which succeed one another in the mind of a person who is writing a treatise on some subject, or striving to persuade or conciliate a tribunal or a deliberative assembly, are suggested one by another according to the general laws of association. Yet the ideas recalled are not those which would be called up on any common occasion by the same antecedents, but are those only which connect themselves in the writer's or speaker's mind with the end which he is aiming at. The reason is, that the various ideas of the train are not solitary in his mind, but there coexists with all of them (in a greater or less degree of constancy according to the quality of the mind) the highly interesting idea of the end in view: and the presence of this idea causes each of the ideas which pass through his mind while so engaged, to suggest such of the ideas associated with them as are also associated with the idea of the end, and not to suggest those which have no association with it. The ideas all follow one another in an associated train, each calling up by association the one which immediately follows it; but the perpetual presence or continual recurrence of the idea of the end, determines, within certain limits, which of the ideas associated with each link of the chain shall be aroused and form the next link. When we come to the author's analysis of the power of the Will over our ideas, we shall find him taking exactly this view of it.  
Concerning the simultaneous existence of many ideas in the mind, and the manner in which they modify each other's exercise of the suggesting power, there is an able and instructive passage in Cardaillac's Etudes Elementaires de Philosophie, which has been translated and quoted by Sir William Hamilton in his Lectures, and which, being highly illustrative of the preceding remarks, I think it useful to subjoin.  
"Among psychologists, those who have written on Memory and Reproduction with the greatest detail and precision, have still failed in giving more than a meagre outline of these operations. They have taken account only of the notions which suggest each other with a distinct and palpable notoriety. They have viewed the associations only in the order in which language is competent to express them; and as language, which renders them still more palpable and distinct, can only express them in a consecutive order, can only express them one after another, they have been led to suppose that thoughts only awaken in succession. Thus, a series of ideas mutually associated, resembles, on the doctrine of philosophers, a chain in which every link draws up that which follows; and it is by means of these links that intelligence labours through, in the act of reminiscence, to the end which it proposes to attain.  
"There are some, indeed, among them, who are ready to acknowledge, that every actual circumstance is associated to several fundamental notions, and consequently to several chains, between which the mind may choose; they admit even that every link is attached to several others, so that the whole forms a kind of trellis,--a kind of network, which the mind may traverse in every direction, but still always in a single direction at once,--always in a succession similar to that of speech. This manner of explaining reminiscence is founded solely on this,--that, content to have observed all that is distinctly manifest in the phenomenon, they have paid no attention to the under-play of the latescent activities,--paid no attention to all that custom conceals, and conceals the more effectually in proportion as it is more completely blended with the natural agencies of mind.  
"Thus their theory, true in itself, and setting out from a well-established principle, the Association of Ideas, explains in a satisfactory manner a portion of the phenomena of Reminiscence; but it is incomplete, for it is unable to account for the prompt, easy, and varied operations of this faculty, or for all the marvels it performs. On the doctrine of the philosophers, we can explain how a scholar repeats, without hesitation, a lesson he has learned, for all the words are associated in his mind according to the order in which he has studied them; how he demonstrates a geometrical theorem, the parts of which are connected together in the same manner: these and similar reminiscences of simple successions present no difficulties which the common doctrine cannot resolve. But it is impossible, on this doctrine, to explain the rapid and certain movement of thought, which, with a marvellous facility, passes from one order of subjects to another, only to return again to the first; which advances, retrogrades, deviates, and reverts, sometimes marking all the points on its route, again clearing, as if in play, immense intervals; which runs over, now in a manifest order, now in a seeming irregularity, all the notions relative to an object, often relative to several, between which no connection could be suspected; and this without hesitation, without uncertainty, without error, as the hand of a skilful musician expatiates over the keys of the most complex organ. All this is inexplicable on the meagre and contracted theory on which the phenomena of reproduction have been thought explained. . . . . . .](56441.docx#chunk3556)

["To form a correct notion of the phenomena of Reminiscence, it is requisite that we consider under what conditions it is determined to exertion. In the first place it is to be noted that, at every crisis of our existence, momentary circumstances are the causes which awaken our activity, and set our recollection at work to supply the necessaries of thought. In the second place, it is as constituting a want, (and by want I mean the result either of an act of desire or of volition) that the determining circumstance tends principally to awaken the thoughts with which it is associated. This being the case, we should expect, that each circumstance which constitutes a want, should suggest, likewise, the notion of the object, or objects, proper to satisfy it; and this is what actually happens. It is, however, further to be observed, that it is not enough that the want suggests the idea of the object; for if that idea were alone, it would remain without effect, since it could not guide me in the procedure I should follow. It is necessary, at the same time, that to the idea of this object there should be associated the notion of the relation of this object to the want, of the place where I may find it, of the means by which I may procure it, and turn it to account, &c. For instance, I wish to make a quotation:--This want awakens in me the idea of the author in whom the passage is to be found which I am desirous of citing; but this idea would be fruitless, unless there were conjoined, at the same time, the representation of the volume, of the place where I may obtain it, of the means I must employ, &c.  
"Hence I infer, in the first place, that a want does not awaken an idea of its object alone, but that it awakens it accompanied with a number, more or less considerable, of accessory notions, which form, as it were, its train or attendance. This train may vary according to the nature of the want which suggests the notion of an object; but the train can never fall wholly off, and it becomes more indissolubly attached to the object, in proportion as it has been more frequently called up in attendance.  
"I infer, in the second place, that this accompaniment of accessory notions, simultaneously suggested with the principal idea, is far from being as vividly and distinctly represented in consciousness as that idea itself; and when these accessories have once been completely blended with the habits of the mind, and its reproductive agency, they at length finally disappear, becoming fused, as it were, in the consciousness of the idea to which they are attached. Experience proves this double effect of the habits of reminiscence. If we observe our operations relative to the gratification of a want, we shall perceive that we are far from having a clear consciousness of the accessory notions; the consciousness of them is, as it were, obscured, and yet we cannot doubt that they are present to the mind, for it is they that direct our procedure in all its details.  
"We must, therefore, I think, admit that the thought of an object immediately suggested by a desire, is always accompanied by an escort more or less numerous of accessory thoughts, equally present to the mind, though, in general, unknown in themselves to consciousness; that these accessories are not without their influence in guiding the operations elicited by the principal notion; and it may even be added that they are so much the more calculated to exert an effect in the conduct of our procedure, in proportion as, having become more part and parcel of our habits of reproduction, the influences they exert are further withdrawn, in ordinary, from the ken of consciousness. . . . The same thing may be illustrated by what happens to us in the case of reading. Originally each word, each letter, was a separate object of consciousness. At length, the knowledge of letters and words and lines being, as it were, fused into our habits, we no longer have any distinct consciousness of them, as severally concurring to the result, of which alone we are conscious. But that each word and letter has its effect,--an effect which can at any moment become an object of consciousness,--is shewn by the following experiment. If we look over a book for the occurrence of a particular name or word, we glance our eye over a page from top to bottom, and ascertain, almost in a moment, that it is or is not to be found therein. Here the mind is hardly conscious of a single word, but that of which it is in quest; but yet it is evident, that each other word and letter must have produced an obscure effect, which effect the mind was ready to discriminate and strengthen, so as to call it into clear consciousness, whenever the effect was found to be that which the letters of the word sought for could determine. But if the mind be not unaffected by the multitude of letters and words which it surveys, if it be able to ascertain whether the combination of letters constituting the word it seeks, be or be not actually among them, and all this without any distinct consciousness of all it tries and finds defective; why may we not suppose,--why are we not bound to suppose, that the mind may, in like manner, overlook its book of memory, and search among its magazines of latescent cognitions for the notions of which it is in want, awakening these into consciousness, and allowing the others to remain in their obscurity?](56441.docx#chunk3557)

["A more attentive consideration of the subject will show, that we have not yet divined the faculty of Reminiscence in its whole extent. Let us make a single reflection. Continually struck by relations of every kind, continually assailed by a crowd of perceptions and sensations of every variety, and, at the same time, occupied by a complement of thoughts; we experience at once, and we are more or less distinctly conscious of, a considerable number of wants,--wants, sometimes real, sometimes factitious or imaginary,--phenomena, however, all stamped with the same characters, and all stimulating us to act with more or less energy. And as we choose among the different wants which we would satisfy, as well as among the different means of satisfying that want which we determine to prefer; and as the motives of this preference are taken either from among the principal ideas relative to each of these several wants, or from among the accessory ideas which habit has established into their necessary escorts;--in all these cases it is requisite, that all the circumstances should at once, and from the moment they have taken the character of wants, produce an effect, correspondent to that which, we have seen, is caused by each in particular. Hence we are compelled to conclude, that the complement of the circumstances by which we are thus affected, has the effect of rendering always present to us, and consequently of placing at our disposal, an immense number of thoughts; some of which certainly are distinctly recognised, being accompanied by a vivid consciousness, but the greater number of which, although remaining latent, are not the less effective in continually exercising their peculiar influence on our modes of judging and acting.  
"We might say, that each of these momentary circumstances is a kind of electric shock which is communicated to a certain portion, to a certain limited sphere, of intelligence; and the sum of all these circumstances is equal to so many shocks which, given at once at so many different points, produce a general agitation. We may form some rude conception of this phenomenon by an analogy. We may compare it, in the former case, to those concentric circles which are presented to our observation on a smooth sheet of water, when its surface is agitated by throwing in a pebble; and, in the latter case, to the same surface when agitated by a number of pebbles thrown simultaneously at different points.  
"To obtain a clearer notion of this phenomenon, I may add some observations on the relation of our thoughts among themselves, and with the determining circumstances of the moment.  
"1deg. Among the thoughts, notions, or ideas which belong to the different groups attached to the principal representations simultaneously awakened, there are some reciprocally connected by relations proper to themselves; so that, in this whole complement of coexistent activities, these tend to excite each other to higher vigour, and consequently to obtain for themselves a kind of pre-eminence in the group or particular circle of activity to which they belong.  
"2deg. There are thoughts associated, whether as principals or accessories, to a greater number of determining circumstances, or to circumstances which recur more frequently. Hence they present themselves oftener than the others, they enter more completely into our habits, and take, in a more absolute manner, the character of customary or habitual notions. It hence results, that they are less obtrusive, though more energetic, in their influence, enacting, as they do, a principal part in almost all our deliberations; and exercising a stronger influence on our determinations.  
"3deg. Among this great crowd of thoughts, simultaneously excited, those which are connected with circumstances which more vividly affect us, assume not only the ascendant over others of the same description with themselves, but likewise predominate over all those which are dependent on circumstances of a feebler determining influence.  
"From these three considerations we ought, therefore, to infer, that the thoughts connected with circumstances on which our attention is more specially concentrated, are those which prevail over the others; for the effect of attention is to render dominant and exclusive the object on which it is directed, and during the moment of attention it is the circumstance to which we attend that necessarily obtains the ascendant.  
"Thus, if we appreciate correctly the phenomena of Reproduction or Reminiscence, we shall recognise, as an incontestable fact, that our thoughts suggest each other not one by one successively, as the order to which language is astricted might lead us to infer; but that the complement of circumstances under which we at every moment exist, awakens simultaneously a great number of thoughts; these it calls into the presence of the mind, either to place them at our disposal, if we find it requisite to employ them, or to make them co-operate in our deliberations by giving them, according to their nature and our habits, an influence, more or less active, on our judgments and consequent acts.  
"It is also to be observed, that in this great crowd of thoughts always present to the mind, there is only a small number of which we are distinctly conscious: and that in this small number we ought to distinguish those which, being clothed in language, oral or mental, become the objects of a more fixed attention; those which hold a closer relation to circumstances more impressive than others; or which receive a predominant character by the more vigorous attention we bestow on them. As to the others, although not the objects of clear consciousness, they are nevertheless present to the mind, there to perform a very important part as motive principles of determination; and the influence which they exert in this capacity is even the more powerful in proportion as it is less apparent, being more disguised by habit." (Sir William Hamilton's Lectures on Metaphysics, vol. ii. Lecture xxxii.)--\_Ed.\_]](56441.docx#chunk3558)

[{70} This, then, is all which seems necessary to be said respecting the occasions on which we apply Relative {71} Terms, and to show what it is which they distinctively mark, in the trains of our sensations and ideas.  
{72} ABSTRACT RELATIVE TERMS.  
From the \_Concrete relative\_ terms, \_Abstract\_ terms are formed, in the same manner as Abstract terms are {73} \*formed from other Concrete terms. Thus from equal, we have equally; from unequal, unequally; from {74} like, likeness; from unlike, unlikeness; from friend, friendship; and so on.  
{75} After what has been said about abstract terms in general, it will not be very difficult to mark what is {76} peculiar in the nature of this species of them. We have seen that concrete, are connotative, terms; and {77} that their corresponding abstracts have the same meaning with the concretes, that which is connoted {78} being left out. White, for example, has a notation, and a connotation. It notes a quality, and it connotes {79} something else, that which is white. The abstract whiteness marks what is \_noted\_ by the concrete, but not what is \_connoted\_.  
We are now to see, in what manner this applies to relative terms. I call two things like: two sensations, for example; let us say, sensations of red. I call sensation A, like sensation B; and, of course, sensation B, like sensation A. It is here more easy to observe distinctly what is connoted, than what is noted. What is connoted are the two sensations. They are clear and simple. What is noted is what we call their likeness. What is that? We have remarked, that, in having two sensations, the \_distinguishing\_ them one {80} from another is included; it is part of the compound process: And that in having two sensations--red, red, and two sensations red, green, the distinguishing the succession red, red, from the succession red, green, is included; it being part of the process, which, though in this case compound, and on that account obscure, is not the less wholly sensation. In the process of sensation, then, that part which consists in distinguishing one as one, another as another, and in distinguishing one succession from another; red, red, for example, from red, green,--is the part which is noted by the words like and unlike. The thing noted is not a distinct sensation, it is part of a process of sensation, and a part which, being never experienced separate by itself, it is very difficult to make a distinct subject of attention. Even that part of the process which consists in distinguishing, is to be distinguished into two parts. There is that part which consists in distinguishing the sensations from one another, as one, and one; and there is that part which consists in distinguishing the two, red, and red, from the two, red, and green. It is this \_latter part\_ which is \_noted\_ by the terms like and unlike. What is \_connoted\_ is all \_the rest of the process\_. When, therefore, we make abstracts, from the terms like and unlike; that is, cut off the connotative part of their meaning, retaining the notative only; it is the part of the process which consists in distinguishing, not one and one, but two and two, which the terms distinctively mark.  
We have also seen, and remarked, that having two sensations, one after another, and knowing them to be first one and then another, is a process of sensation and association. The pair of relatives, prior and {81} posterior, or antecedent and consequent, taken together, names the whole of the process; each pair is in reality a compound name of a complex idea, that of a certain process, the process of having two ideas in succession, in which process the being sensible of the successiveness is part. By all concrete relatives, something is noted, something connoted. In the process which is marked by the relatives prior and posterior, part is noted, part connoted; and the part which is noted, is the part which it is difficult to make a separate object of attention,--the part which consists in being sensible of the successiveness, for which we have not a name. By its notation and connotation, taken together, each of the terms, prior, and posterior, is a name of something, and that something is very distinct; prior is a name of the first sensation and something else; posterior is a name of the second sensation, and something else. It is by connotation, however, that each is the name of its respective sensation. Their notative power relates to the something else, and not to the whole of that; because prior and posterior, beside connoting, each its own sensation, connote one another. The notation and connotation, therefore, are divided between them, in a manner which renders it difficult to shew what belongs to each. We have not names adapted to the purpose.  
The word prior notes something, and connotes something. When we make from it the abstract term priority; what was connoted by the concrete, prior, is dropped; what was noted by it is retained. In the succession of ideas A, and B, priority is not the name of A, it is the name of that part of the compound process, which consists in knowing A, as the {82} first of the two; posteriority is not the name of B, but of that part of the compound process, which consists in knowing B, as the last of the two.  
There is a peculiarity, however, in the abstract terms formed from the relative concrete terms. These abstract terms are not, as whiteness, hardness, wholly void of connotation. They have a connotation of their own. The abstract of one relative of a pair, always connotes the abstract of the other; thus, priority always connotes posteriority, and posteriority priority.](56441.docx#chunk3559)

[This constitutes a distinction, worth observing, between the force of the abstracts formed from the pairs of relatives which consist of different names, as prior, posterior; cause, effect; father, son; husband, wife;--and those which consist of the same name, as equal, equal; like, like; brother, brother; friend, friend; and so on. Priority and Posteriority make together a compound name of something, of which, taken separately, each is not a name; Causingness and Causedness, the abstracts of cause and effect, make up between them the name of something, of which each by itself is not a name, and so of the rest. The case is different with such abstracts as likeness, equality, friendship, formed from pairs which consist of the same name. When we call A like, and B like; the abstract, likeness, formed from the one, connotes merely the abstract, likeness, formed from the other. Thus, as priority and posteriority make a compound name, so, likeness and likeness, make a compound name. But as likeness and likeness are merely a reduplication of the same word, likeness taken once very often signifies the same as likeness taken twice. Priority never signifies as much as priority and {83} posteriority taken together; but likeness taken alone very often signifies as much as likeness, likeness, taken both together. Likeness has thus a sort of a double meaning. Sometimes it signifies only what is marked by the abstract of one of the pair, "like, like;" sometimes it signifies what is marked by the abstracts of both taken together. The same observation applies to the abstracts equality, inequality; sameness, difference; brotherhood, sisterhood; friendship, hostility; and so on.[19]  
[Editor's footnote 19: The exposition here given of the meaning of abstract relative names is in substance unexceptionable; but in language it remains open to the criticism I have, several times, made. Instead of saying, with the author, that the abstract name drops the connotation of the corresponding concrete, it would, in the language I prefer, be said to drop the denotation, and to be a name directly denoting what the concrete name connotes, namely, the common property or properties that it predicates: the likeness, the unlikeness, the fact of preceding, the fact of following, &c.  
When the author says that abstract relative names differ from other abstract names in not being wholly void of connotation, inasmuch as they connote their correlatives, priority connoting posteriority, and posteriority priority, he deserts the specific meaning which he has sought to attach to the word connote, and falls back upon the loose and general sense in which everything implied by a term is said to be connoted by it. But in this large sense of the word (as I have more than once remarked) it is not true that non-relative abstract names have no connotation. Every abstract name--every name of the character which is given by the terminations \_ness\_, \_tion\_, and the like--carries with it a uniform implication that what it is predicated of is an attribute of something else; not a sensation or a thought in and by itself, but a sensation or thought regarded as one of, or as accompanying or following, some permanent cluster of sensations or thoughts.--\_Ed.\_]  
{84} Among the abstract terms corresponding to relative concretes, those corresponding to cause and effect, are the only ones which, on account of their importance, require to be somewhat more particularly expounded.  
Cause and Effect have not abstract terms formed immediately from themselves. One of the grand causes of their obscurity is, that they are not constant in their meaning, but are sometimes used as concretes, sometimes as their own abstracts.  
Cause means "something \_causing\_;" effect, "something \_caused\_." Causingness, therefore, is the proper abstract of cause; and causedness, the proper abstract of effect. Of two objects, A, and B, we call the one causing, the other caused, when they are not only prior and posterior, but parts of the same series; and, if we speak strictly, proximate parts. Of proximate parts of the same series, we call the antecedent, causing; the consequent, caused. Causingness, and causedness, therefore, mean antecedence and consequence, and something more. The ideas are more complex. Causingness and causedness, mean, not only antecedence and consequence, but also sameness of series, and proximity of parts.  
As we have seen, that priority and posteriority, taken together, form a compound name of a certain complex idea, so causingness and causedness, taken together, form the compound name of a still more complex idea. Having frequent occasion to express that idea, a separate name for it was found necessary. Accordingly, we have the term Power, which means precisely what is meant by causingness and causedness taken together. Causation has the same {85} meaning with Power, except that it connotes present time; Power connotes indefinite time.[20]  
[Editor's footnote 20: The term Causation, as the author observes, signifies causingness and causedness taken together, but I do not see on what ground he asserts that it connotes present time. To my thinking, it is as completely aoristic as Power. Power, again, seems to me to express, not causingness and causedness taken together, but causingness only. Some of the older philosophers certainly talked of passive power, but neither in the precise language of modern philosophy nor in common speech is an effect said to have the power of being produced, but only the capacity or capability. The power is always conceived as belonging to the cause only. When any co-operating power is supposed to reside in the thing said to be acted upon, it is because some active property in that thing is counted as a con-cause--as a part of the total cause.--\_Ed.\_]  
The connotation of \_Time\_, by abstract terms, is a circumstance almost always overlooked, but of which the observation is of the utmost importance to accuracy of thought.](56441.docx#chunk3560)

[When we have invented a number of marks to be taken in pairs, as like, like; equal, equal; antecedent, consequent; master, servant; husband, wife; father, son; owner, property; author, book; cause, effect; and so on; we have occasion for a name by which to speak of that class of names. We have invented such a name. We call those terms "Relative Terms."  
The word "Relative," thus belongs to that class of names, which have been called "Names of Names." As man, tree, stone, are names of things, of those clusters which we call objects; as red, green, hard, soft, are names of sensations; as courage, wisdom, {86} anger, love, are names of complex ideas arbitrarily composed; so adjective is the name of one class of names, verb the name of another class of names; syllable, is the name of one part of a word, letter of another; and so, also, relative is the name of the class of words which have this peculiarity, that they are taken in pairs. Thus, father and son, are relative terms; prior and posterior, are relative terms; like and like, are relative terms; so equal, equal; unequal, unequal; brother, brother; friend, friend; and so on.  
Relative itself corresponds with the names which it marks, in its being one of a pair; of that species of pairs, which are formed by a double use of the same word, as like, like. When we say of father and son, that they are relative terms, we mean that father is relative to son, and son relative to father.  
As \_relative\_ is the name of all concrete names, taken in pairs, such as like, like; friend, friend; causing, caused; so the abstract relation, formed from relative, is the name given to all the abstract terms formed from the concrete relatives: thus, equality, inequality, friendship, power, are abstract terms, which we call by a general name, relation. As Noun is the name of a certain class of words, so "Relation," is the name of a certain class of words.  
It is not, however, meant to be affirmed, that relative and relation, are not names which are also applied to things. In a certain vague, and indistinct way, they are very frequently so applied. This, however, is strictly speaking, an abuse of the terms, and an abuse which has been a great cause of confusion of ideas. In this way, it is said, of two brothers, that {87} they are relative; of father and son, that they are relative; of two objects, that they are relative in position, relative in time; we speak of the relation between two men, when they are father and son, master and servant; between two objects, when they are greater, less, like, unlike, near, distant, and so on.  
What, however, we really mean, when we call two objects relative (and that is a thing which it is of great importance to mark) is, that these objects have, or may have, relative names. On what accounts we give them relative names, has just been explained, and the explanation need not be repeated. When we say that Socrates and the Emperor Napoleon are unlike, the men are, each, a man, distinct, separate, absolute. We only give them a pair of related names, for the convenience of discourse. In like manner, Charles I. and George IV. are separate, distinct, absolute individuals. We only give them the relative names Predecessor, Successor, for the convenience of discourse, to mark the place which they occupied in a certain series of events. From this appears also what is meant, when we say of two objects, that they have a relation to one another. The meaning is, that the objects may have relative names, and that these names may have abstracts which we call relation. Thus we say that two brothers have a relation to one another. That relation is brotherhood. But brotherhood is merely the abstract of the relative names. We say that father and son have a relation. That relation is fathership and sonship. These are merely the abstracts of the two relative names. We say of two events, a stab with a sword, and death of the person stabbed, that they have a relation to one another. That relation is {88} causingness and causedness, the abstract of cause and effect, or, in one word, power.[21]  
[Editor's footnote 21: The application of the word Relative to Things is not only an offence against philosophy, but against propriety of language. The correct designation for Things which are called by relative names, is not Relative, but Related. A Thing may, with perfect propriety both of thought and of language, be said to be related to another thing, or to have a relation with it--indeed to be related to all things, and to have a prodigious variety of relations with all; because every fact that takes place, either in nature or in human thought, which includes or involves a plurality of Things, is the \_fundamentum\_ of a special relation of those Things with one another: not to mention the relations of likeness or unlikeness, of priority or posteriority, which exist between each Thing and all other Things whatever. It is in this sense that it is said, with truth, that Relations exhaust all phenomena, and that all we know, or can know, of anything, is some of its relations to other things or to us.--\_Ed.\_]  
  
{89} SECTION III.  
NUMBERS.](56441.docx#chunk3561)

[We have already observed, that objects exist, with respect to us, in two orders; in the synchronous order, and the successive order; and that we have great occasion for marks to represent them to us as they exist in both orders. We have also to observe, that the synchronous order, the order in which things exist together; that is, as we otherwise name it, the order of position, or the order in place; is interesting to us chiefly on account of the successive order. The order in which objects \*succeed one another, that is, the order of the changes which take place, the order of events, depends almost entirely upon the synchronous order. In other words, the synchronous order is part of every successive order; it is the antecedent of every consequent; or as we otherwise express it, the cause of every effect. Thus the synchronous order, or the order in place, of the spark and the gunpowder, is the antecedent of the explosion; the synchronous order of my finger and the candle, is the antecedent or the cause of the pain which I feel.  
In regard to the explosion, also, it is less or greater, according as the quantity of the gunpowder is less or greater. Of the synchronous order, therefore, one part which I am particularly interested in knowing correctly is, the amount of the things. A certain amount of gunpowder produces one set of effects, another {90} another: a certain amount of men produce one set of effects, another another; and so of all other things.  
It is of the last importance to me not only to be able to ascertain, and know, these amounts, with accuracy, but to be able to mark them.  
For ascertaining and knowing amounts, some contrivance is requisite. It is necessary to conceive some small amount, by the addition or subtraction of which, another becomes larger or smaller. This forms the instrument of ascertainment. Where one thing, taken separately, is of sufficient importance to form this instrument, it is taken. Thus, for ascertaining and knowing different amounts of men, one individual is of sufficient importance. Amounts of men are considered as increased or diminished by the addition or subtraction of individuals. A grain of gunpowder might also be taken; but it is not of sufficient importance; the quantity, taken as the instrument of measurement, must have an ascertainable influence upon the effect, for the sake of which, the ascertaining of the amount is of importance. In their simple state, men use principally the hand for their elementary ascertainments. A pinch, or as much as could be held between the finger and the thumb, was a small amount distinctly conceived, and formed the principle of measurement where small additions were important; a handful was not less distinctively conceived, and was the instrument, where only larger additions were of importance.  
When one addition was made, or needed to be made, after another, and another after that, and so on, the next point of importance was to conceive exactly how often the addition was made. A few {91} additions are distinct to sense. Place one billiard-ball by another, the sight of the two is distinct. Place three or four, it is still distinct. Soon, however, it ceases to be so. Place a dozen, and you will not probably be able to distinguish them from eleven. You must count them, or divide them. If you divide them by the eye, into two parcels, you may see that one is six and another six; but to benefit by this, you must know the art of putting six and six together.  
The next step, therefore, necessary in the process of ascertaining amounts, was, to mark these additions, one after another, in such a manner, as to make known to what extent they had gone. When men were familiar with the operation of assigning names as marks of their ideas, the course which would suggest itself to them is obvious; they would employ a name as the mark of each addition. They would say, one, for the first, two, for the second, three, for the third, and so on. These marks it was very useful to make connotative, that the other important ingredient of the process, the thing added, might be made known at the same time. Thus we say, one man, two men; one horse, two horses; and so of all other things, the enumeration of which we are performing.  
Numbers, therefore, are not names of objects. They are names of a certain process; the process of addition; of putting one billiard-ball to another; not more mysterious than any other process, as walking, writing, reading, to which names are assigned. One, is the name of this once performed, or of the aggregation begun; two, the name of it once more performed; three, of it once more performed; and so on. The words, however, in these concrete forms, beside {92} their power in noting this process, connote something else, namely, the things, whatever they are, the enumeration of which is required.](56441.docx#chunk3562)

[In the case of these connotative, as of other connotative marks, it was of great use to have the means of dropping the connotation; and in this case, it would have been conducive to clearness of ideas, if the non-connotative terms had received a mark to distinguish them from the connotative. This advantage, however, the framers of numbers were not sufficiently philosophical to provide. The same names are used both as connotative, and non-connotative; that is, both as abstract, and concrete; and it is far from being obvious, on all occasions, in which of the two senses they are used. They are used in the connotative sense, when joined as adjectives with a substantive; as when we say two men, three women; but it is not so obvious that they are used in the abstract sense, when we say three and two make five; or when we say fifty is a great number, five is a small number. Yet it must, upon consideration, appear, that in these cases they are abstract terms merely; in place of which, the words oneness, twoness, threeness, might be substituted. Thus we might say, twoness and threeness are fiveness.[22] [23]  
[Editor's footnote 22: The vague manner in which the author uses the phrase "to be a name of" (a vagueness common to almost all thinkers who have not precise terms expressing the two modes of signification which I call denotation and connotation, and employed for nothing else) has led him, in the present case, into a serious misuse of terms. Numbers \_are\_, in the strictest propriety, names of objects. \_Two\_ is surely a name of the things which are two, the two balls, the two fingers, &c. The process of adding one to one which forms two is connoted, not denoted, by the name two. Numerals, in short, are concrete, not abstract names: they denote the actual collections of things, and connote the mental process of counting them. It is not twoness and threeness that are fiveness: the twoness of my two hands and the threeness of the feet of the table cannot be added together to form another abstraction. It is two balls added to three balls that make, in the concrete, five balls. Numerals are a class of concrete general names predicable of all things whatever, but connoting, in each case, the quantitative relation of the thing to some fixed standard, as previously explained by the author.--\_Ed.\_]  
[Grote's footnote 23: Here the process of numeration generally, together with the function of numbers carrying their separate names, are clearly set forth; after which we find the remark, that no distinction is made in the name of the number, when used as an abstract and when used as a concrete. Mr. James Mill thinks that it would have been conducive to clearness if such distinction had been marked by an inflexion of the name. "The names of numbers are used in the connotative (concrete) sense, when joined as adjectives with a substantive, as when we say, two men, three men: but it is not so obvious that they are used in the abstract sense, when we say three and two make five: or when we say fifty is a great number, five is a small number. Yet it must upon consideration appear, that in these cases they are abstract terms merely: in place of which, the words oneness, twoness, threeness, might be substituted. Thus we might say, twoness and threeness are fiveness."  
The last part of what is here affirmed cannot, in my judgment, be sustained. Connecting itself with one among the many arguments between Aristotle and Plato, it lays down a position from which both of them would have dissented. In the last book but one (Book M) of Aristotle's "Metaphysica," this argument will be found set forth at length; though with much obscurity, which is cleared up by the lucid commentary of Bonitz. Plato distinguished two classes of numbers--the mathematical, and the ideal. The first class were the Quanta of equal and homogeneous units (One, Two, Three, &c.), any or all of which might be added so as to coalesce into one total sum. The second class were, the ideal or abstract numbers, Two \_quatenus\_ Two, &c., represented by Dyad, Triad, Tetrad, Pentad, Dekad, &c., the characteristic property of which was, that they could not be added together nor coalesce into one sum. These were uncombinable numbers, "[Greek a)rithmoi\ a)su/mbletoi]--numeri inconsociabiles."-- See Aristot. Metaph. M. 6. 1080. b. 12. Bonitz Comment. p. 540, 541, seq.](56441.docx#chunk3563)

[Plato regarded these uncombinable numbers as the highest representative specimens or coryphaei of the Platonic Ideas. In this character Aristotle reasoned against them, contending that they did nothing to remove the many objections against Plato's ideal theory. With the question thus opened, I have no present concern: all that I wish to point out is the view which Plato originated and upon which Aristotle reasoned, viz.: That these ideal or abstract numbers could not be added together, or fused into one sum total. The abstract term Twoness means Two \_so far forth as two\_: so also Threeness and Fiveness. You cannot truly predicate anything of Twoness which would be inconsistent with this fundamental characteristic: you cannot add it to Threeness so as to make Fiveness, nor can you subdivide Fiveness into Twoness and Threeness, without suppressing the fundamental characteristic of each. Neither of them admit of increase or diminution. In like manner, a Triangle, or every particular Triangle, may have one of its sides taken away, or two more sides added to it: on each of which suppositions it ceases to be a triangle. But if we speak of a Triangle \_so far forth as Triangle\_, neither of these suppositions is admissible. We may say that its three angles are equal to two right angles, but we cannot subtract from it one of its sides, nor add to it one or two other sides. The subject of predication is so limited and specialised, that no predicate can be allowed which would efface its characteristic feature--Triangularity.  
Bonitz remarks truly that the class of numbers set forth by Plato--the ideal or uncombinable numbers which could not be either added or subtracted--were divested of all the useful aptitudes and functions of numbers, and passed out of the category of Quantity into that of Quality. The Triad was one quality; the Pentad was another: there was no common measure into which both could be resolved (Bonitz, Comment. p. 540--553). \_Two\_, \_three\_, \_five\_, are quantifying names, designating each so many numerable units: and the units counted in each list may be added to, or subtracted from, the units counted in the others. But when we say, Twoness or the Dyad--Threeness or the Triad--Fiveness or the Pentad--we then recognise a peculiar quality, founded upon each separate variety of aggregation or quantification: so that these separate varieties are no longer resolvable into any common measure of constituent units. Each quality stands apart from the others, and has its own predicates. In the view of Plato and the Pythagoreans, the Dekad especially was invested with magnificent predicates.  
I cannot therefore agree with Mr. James Mill in his opinion that, "when we say three and two make five, we use these numbers in the abstract sense." We clearly do not mean that three, \_so far forth as three\_, and two, \_so far forth as two\_, make five. But this would be what we should mean, if we used these names of numbers in the abstract sense. What we do mean is, that the units constituting three may be added to those constituting two, so as to make five: and that this is equally true, whether the units are men, horses, stones, or any other objects. Two, three, five, &c., are general or universal terms, capable of being joined with units of indefinite variety: but they do not become abstract terms, until we limit them by \_quatenus\_, [Greek: katho/son, e(=|], \_so far forth as\_, &c., or by a suffix such as \_ness\_. Such abstracts would have been of little use as to the ordinary functions of numbers; and accordingly they have never got footing in familiar speech, though they are occasionally employed in metaphysical discussions.--\_G.\_]  
{93} It is necessary to observe, that the process, marked by the names called numbers, though used for the {94} purpose of ascertaining synchronous order, is in the mind successive; one addition follows another. {95} Numbers, therefore, in reality, name successions; and are easily applied to mark certain particulars of the {96} successive order, when the marking of those particulars is of importance.  
It is of importance, when successions take place all of one kind; and when consequences of importance depend upon the less or greater length of the train. It is then of importance, to mark the degrees of that length, which is correctly done by the enumeration of the links.  
To take a simple and familiar instance, that of the human steps. They are successions all of one kind. Consequences of importance may, and often do result from a knowledge of the length of any particular series of steps. The ascertainment of an aggregate, in this order, is made in the same way, as that which we have traced in the synchronous order. An element of aggregation is taken; by its successive aggregations, the amount of the aggregate is correctly conceived; and, by a proper mark for each successive aggregation, it is also correctly denoted. The continued successions of day and night are all of one kind; and it is of the greatest importance for us to know accurately the length of a series of those successions; of the series between such and such events; between the sowing of the seed in the ground, for example, and the maturity of the crop. This is done, accurately, by putting a several mark upon each {97} several succession, one for the first, two for the one after that, three for the one after that, and so on.  
If there be no mystery in one sensation after another, or one idea after another; and, if having them in that order and associating the idea of the antecedent with the sensation of the consequent be to know that they are in that order; then there is no mystery in Numbers, for they are only marks to shew that one is after another.  
That there is no mystery in the ideas of priority and posteriority, which are relative terms, has been shewn under the preceding head of discourse.](56441.docx#chunk3564)

[The word Number itself, which is only a name of the names, one, two, &c., nothing being a number but some one of those names, has also been explained, when the class of words which are distinguished as Names of Names was under consideration.  
In using the terms, one, two, three, four, and so on, the object is to ascertain with precision, the amount of the aggregate in question. In some cases, however, it is of importance to ascertain the order of aggregation, as well as the amount; and that, whether a synchronous, or a successive, aggregate be the object in view. This purpose is answered by a set of names, called the ordinal numbers, which, applied to the units of aggregation in the order in which they are taken, mark precisely the order of each. Thus, when we say, first, second, third, fourth, and so on; each of these concrete, or connotative names, notes a certain position, if in the synchronous order; a certain link, if {98} in the successive; and connotes the precise object which holds that position, or forms that link.  
As there is no difficulty whatsoever in tracing the ideas, which, on each occasion, receive those marks, there is no need of multiplying words in their illustration.  
  
{99} SECTION IV.  
PRIVATIVE TERMS.  
  
Privative terms are distinguished from other terms, by this; that other terms are marks for objects, as present or existent; privative terms are marks for objects, as not present or not existent.[24]  
[Editor's footnote 24: The author gives the name of Privative terms to all those which are more commonly known by the designation of Negative; to all which signify non-existence or absence. It is usual to reserve the term Privative for names which signify not simple absence, but the absence of something usually present, or of which the presence might have been expected. Thus blind is classed as a privative term, when applied to human beings. When applied to stocks and stones, which are not expected to see, it is an admitted metaphor.  
This, however, being understood, there is no difficulty in following the author's exposition by means of his own language.--\_Ed.\_]  
Thus the word Light, is the mark of a certain well-known object, as existent or present.  
The word Darkness, on the contrary, is the mark of the same object, as not existent or not present. Ask any man, what he means by darkness; he says the absence of light. But the absence of light, is only another name for light absent; and light absent, is only another name for light not present. Darkness, therefore, is another name for light not present.  
It thus appears, that the idea called up by the {100} word light, is that of a certain object associated with its presence; the idea called up by the word darkness, is that of the same object associated with its absence.  
After the explanations which have been so often given, what I mean, when I speak of the idea of an object, as one thing; the idea of its presence, as another thing; ought not to be obscure. Its presence, is its existence; its absence, is its non-existence; at least, at a particular time and place. What ideas and sensations I mark by the word existent, has already been explained. The word non-existent is the mere negation of the same sensations and ideas.  
We have repeatedly seen, that what we call existence, is an inference from our sensations. We have clusters of sensations; these call up the ideas of antecedents, which we call qualities; these the idea of an antecedent common to all the qualities, which we call \_Substratum\_; and the \_Substratum\_, with its qualities, we call the Object.  
When we speak, then, of this \_Substratum\_ and its qualities, as present, at a particular time and place: which is what we mean by its existence; what we affirm is this; that if there be sentient organs at such a time and place, there will be such and such sensations. When we speak of it as absent, we affirm, that though there be sentient organs at such a time and place, there will not be those sensations. These ideas, then, forming in combination a very complex idea, are what, in the respective cases, we call the presence, and the absence of an object. Any further analysis would be superfluous in this place.  
{101} A law of some importance, which has been already explained, is, that in complex ideas there is very often some one part, so prominent, as to throw the rest into the shade, and confine the attention almost wholly to itself. There is a curious exemplification of this law, in the pair of cases before us. Thus, in the complex idea of "the object and its presence," marked by the word Light, the object is the prominent part, and the presence is so habitually neglected, that it is with some trouble it is recognised. The case is reversed in the complex idea of "the object and its absence," marked by the word Darkness. In this, the absence is the prominent part, and it so completely engrosses the attention, that it requires reflection, to discover, that the idea of the object is necessarily combined.](56441.docx#chunk3565)

[There is something more in these two cases, which it is of great importance to remember. We have two sets of indissoluble associations, both exceedingly numerous, the one with the idea of the object as present, the other with the idea of it as absent; that is, the one set with light, the other set with darkness. Whenever we have the perception of light, we habitually have, along with it, the perception of objects; that is, of all sorts of colours, all sorts of shapes, all sorts of magnitudes, all sorts of distances, and so on. With the idea of light, then, are indissolubly associated the ideas of all sorts of objects; of extension in all its modifications, colour in all its modifications, motion in all its modifications; the word light, therefore, serves as a name, not merely of the fluid which acts upon the eye, but of that along with its innumerable associations. Such are the perceptions and {102} ideas, which, when we have the perception of light, we have along with it. What are the perceptions and ideas, which, when we have not the perception of light, we have along with that state of privation? There is, first, the want of all the perceptions, which we have along with that of light. There is, next, the disagreeable sensations we experience from not knowing what objects are approaching us, either by our motions, or by theirs; hence the idea of dangerous objects approaching; hence, also, the inability to perform many of the acts which are conducive either to our being, or well-being. With the idea of darkness, then, are indissolubly associated a multitude of ideas, of pain, of privation, of weakness; all disagreeable; with little or no mixture of any of an opposite kind. And the word darkness, therefore, stands as a name not merely of light absent, but of that along with all the accompanying sensations and ideas.  
The reader will observe, and it is necessary he should well observe, that all terms might have corresponding privative terms. We have already stated, that the ordinary names of objects are names both of the object, and of its presence or existence, combined in one complex idea. Thus, rose, horse, are names of the objects as present or existent. We might have had names of them as absent or not existent. It is only, however, in a few cases, that the absence of an object is a matter of first-rate importance. It is only in those cases that it has been found requisite to have for it a particular name. The absence of light is obviously a case of the greatest importance. Consequences of the very first order, and infinite in number, {103} depend upon it. An appropriate name, therefore, was of the highest utility.  
This explanation will enable us to see, without a minute analysis, the composition of the clusters marked by other Privative Terms.  
Let us take Silence, as the next example. Silence is the absence of sound, either all sound, which is sometimes its meaning; or of some particular sound, which at other times is its meaning. Sound is the name of a well-known something, as present. Silence is the name of the same well-known something, as absent. The first word, is the name of the thing, and its presence. The second, is the name of the thing, and its absence. In the case of the combination marked by the first, namely, the thing and its presence, the thing is the prominent part, and the presence generally escapes attention. In the case of the second, the thing and its absence, the absence is the important part, and the thing is feebly, if at all, attended to.  
Ignorance is easily explained, in the same manner. Knowledge is the name of a certain well-known something, as present or existent. Ignorance is the name of the same well-known something, as absent or nonexistent.  
Having a sensation, or an idea, is one state of consciousness; not having it is another state of consciousness.[2\*] The state of consciousness called "not having" {104} it is no doubt very various; for it is any sensation or idea different from the one in question. The "Having" one sensation and another sensation, or one idea and another idea; and the "Knowing" that the one is not the other; we have often observed to be the same thing. The great majority of names are invented, to mark sensations and ideas as "had;" there are, however, cases, in which it is necessary to mark them as "not had." In what manner, in the more remarkable cases, this marking is performed by privative names, has now been shewn. But, beside the marks for particular cases, it was necessary to have a comprehensive or \_general\_ mark; which should include all cases, as well those provided with particular names, as those not so provided. "Absent" was such a word. "Absent," standing by itself, and unrestricted by connection with any other word, is a name of any thing, joined with the idea of its not being \_then\_ and \_there\_. What is included in that Idea has already been shewn in explaining Belief in Existence. The mark "Absent," joined with any particular name, becomes a particular Privative Term. We have observed, that the word rose, is a mark not merely of the thing, but the thing with the idea of its presence; we have also observed, that such Presence-affirming Terms, except {105} in remarkable cases, have not corresponding Privative, or Absence-affirming Terms. But if we say "absent" rose, we have a Privative Term, double worded, indeed, instead of single worded, exactly corresponding to the Presence-affirming Term, rose. And, by the use of the same word, we can form Privative Terms of this description, in all cases in which they can be wanted; thus we can say, absent man, absent horse, absence of food, &c.](56441.docx#chunk3566)

[[Mill's footnote 2: Mr. Locke recognised the fact, but gave an erroneous account of it: "I should offer this as a reason why a privative cause might produce a positive idea; \_viz.\_, that, all sensation being produced in us, only by different degrees and modes of motion in our animal spirits, variously agitated by external objects, the abatement of any former motion, must as necessarily produce a new sensation, [for "abatement of any former motion," read, ceasing of a particular sensation; and for "new sensation," read, new feeling, or, new state of consciousness,] as the variation or increase of it: and so introduce a new idea. B. II. ch. viii. s. 4.--(\_Author's Note\_.)]  
The word Nothing, \_Nihil\_, is another \_generical\_ Privative Term. That this word has a very important marking power, every man is sensible in the use which he makes of it. But if it marks, it names; that is, names something. Yet it seems to remove every thing; that is, not to leave anything to be named.  
The preceding explanations, however, have already cleared up this mystery. The word Nothing is the Privative Term which corresponds to Every Thing. Every Thing is a name of all possible objects, including their existence. Nothing is a name of all possible objects, including their non-existence.[25]  
[Editor's footnote 25: The analysis of the facts, in all these cases, is admirable, but I still demur to the language. I object to saying, for instance, that silence is "the name of sound and its absence." It is not the name of sound, since we cannot say Sound is silence. It is the name of our state of sensation when there is no sound. The author is quite right in saying that this state of sensation recalls the idea of sound; to be conscious of silence as silence, implies that we are thinking of sound, and have the idea of it without the belief in its presence. In another of its uses, Silence is the abstract of Silent; which is a name of all things that make no sound, and of everything so long as it makes no sound; and which connotes the attribute of not sounding. So of all the other terms mentioned. "Nothing" is not a name of all possible objects, including their non-existence. If Nothing were a name of objects, we should be able to predicate of those objects that they are Nothing. Nothing is a name of the state of our consciousness when we are not aware of any object, or of any sensation.--\_Ed.\_]  
{106} "Absent," in its unrestricted sense, above explained, comes near to this marking power of the word Nothing, but differs from it in one respect. Absent is the Privative name of all possible objects, taken one by one. Nothing is the privative name of them, taken altogether. This distinction, I presume, is sufficiently obvious, and intelligible, thus expressed; and stands in no need of a more wordy explanation.[3\*]  
[Mill's footnote 3: The account of Privative Terms which is given by Locke, is the same with that which is presented in the text. The difference is, that Locke, who has stated the case correctly, has not attempted its analysis. He says (B. II. ch. viii.), "We have negative names, such as insipid, silence, \_nihil\_, &c., which words denote positive ideas; \_v.g.\_, taste, sound, being; with a signification of their absence."--(\_Author's Note\_.)]  
We shall now take notice of the Privative Term EMPTY, which is a word of great importance.  
Empty is a name applicable to all the things to which the name, full, is applicable; in other words, to all the things which are calculated to contain other things in position, or in the synchronous order, that is, in the order of particle adjoining particle. It is necessary to mark this limitation of the word contain; because, in another sense, a complex idea is said to contain the simple ideas of which it consists; and a chemical compound is said to contain the simple {107} substances into which it can be decomposed. Empty, and Full, are names of those things only which contain, or are adapted to contain, things in position, or in the order of particle adjoining particle.  
Things adapted to contain other things in position, are, themselves, a peculiar combination of positions, to which we must very attentively advert. To understand this combination, it will be necessary to remember exactly the analysis of position; of lines, surfaces, and bulks; as it has been already given in our explanation of Relative Terms.  
The word "containing," applied to anything, as when we speak of a box containing books, a cask containing liquor, a room containing furniture, generally includes the idea of limitation. That which contains, has certain boundaries within which the things contained are placed, or have their position. This idea of things having their position within another thing, is a very complex idea, the composition of which we must be at some pains to understand.  
It consists, first, of the thing containing; secondly, of the things contained.  
The thing containing, again, consists of two parts; first, its boundaries; and, secondly, its containing capacity within its boundaries.](56441.docx#chunk3567)

[Its boundaries are surfaces. How we become acquainted with surfaces; in other words, what are the sensations, the copies of which form our complex idea of surface, has been already explained. They are certain sensations of touch, and certain sensations of muscular action. This complex idea is easily distinguished into two parts; first, a certain idea of resistance; secondly, the idea of extension. The sides {108} of a box I call resisting, and I call them extended; and I call them by both names on account of certain sensations. Let us conceive the box without a lid; each of the sides is extended and resisting. What is the top without a lid? Extended, and non-resisting. The idea of the top is that of extension without resistance; extension, in a particular direction, that of a plane surface. What is the idea of the inside of the box without its contents? That of extension in all directions without resistance. This is emptiness.  
So far is plain, and not doubtful. There are still, however, some things which require explanation. What are we distinctly to understand by extension without resistance? Whenever we use the concrete extended, we mean something extended; and by that something we always mean something that resists. What do we mean when we use the abstract extension? It will be easily recollected that all this is a case of association, which has been already fully explained.  
Concrete Terms are Connotative Terms; Abstract Terms are Non-connotative Terms. Concrete terms, along with a certain quality or qualities, which is their principal meaning, or notation, connote the object to which the quality belongs. Thus the concrete red, always means, that is, connotes, something red, as a rose. We have already, by sufficient examples, seen, that the Abstract, formed from the Concrete, notes precisely that which is noted by the Concrete, leaving out the connotation. Thus, take away the connotation from red, and you have redness; from hot, take away the connotation, and you have heat.  
{109} The very same is the distinction between the concrete extended, and the abstract extension. What extended is with its connotation, extension is without that connotation. We have then to explain, wherein the connotation consists.  
When we say extended, meaning something extended, we mean one or other of three things, a line, a surface, or bulk. We have already explained sufficiently in what manner we come by the ideas of line, surface, and bulk. We have certain sensations of touch, and of muscular action, conjoined, and the ideas of those sensations, in conjunction, form our ideas of line, surface, and bulk. The sensation, or sensations, which we mark by the word resisting, seem to be those alone which are connoted by the word extending; for it is most important to observe, that what we call extending in the parts of our own body, by the operation of its own muscles, is that which we call extended in all other things; and thus the essential connotation of the concrete, extended, is, resisting, and nothing else. In other concrete terms the connotation is greater. Thus red, connotes a surface, that is, something extended; and extended connotes resisting. And thus red connotes both extended and resisting, while extended connotes resisting alone. It is true, that persons enjoying the faculty of seeing cannot conceive any thing extended, without conceiving it coloured; because in them the idea of something extended includes, by association, the visual, as well as the tactual, and muscular, ideas; and the visual being accustomed to predominate, the tactual, and muscular, are faintly observed. This, however, cannot be the case in persons born blind, {110} who have the tactual, and muscular, feelings, and not the visual at all.  
Now, then, we can easily understand what extension is in all its cases. Linear extension is the idea of a line, the connotation dropped, that is, the idea of resisting, dropped; superficial extension is the idea of a surface, the same connotation dropped; and solid extension, or bulk, is merely the idea of bulk, the connotation, or resisting, dropped. But bulk, the connotation (\_i.e.\_ resistance) dropped, is what? The place for bulk: Position. But place is, what? A portion of SPACE; or, more correctly speaking. SPACE itself, with limitation.  
We thus seem to have arrived, without any difficulty, at an exact knowledge of what is noted or marked by the word SPACE; a phenomenon of the human mind hitherto regarded as singularly mysterious. The difficulty which has been found in explaining the term, even, by those philosophers who have approached the nearest to its meaning, seems to have arisen, from their not perceiving the mode of signification of Abstract Terms; and from the obscurity of that class of sensations, a portion of which we employ the word "extended" to mark. The word "space" is an abstract, differing from its concrete, like other abstracts, by dropping the connotation. Much of the mystery, in which the idea has seemed to be involved, is owing to this single circumstance, that the abstract term, space, has not had an appropriate concrete. We have observed, that, in all cases, abstract terms can be explained only through their concretes; because they note or name a part of what the concrete names, leaving out the rest. If we were {111} to make a concrete term, corresponding to the abstract term space, it must be a word equivalent to the terms "infinitely extended." From the ideas included under the name "infinitely extended," leave out resisting, and you have all that is marked by the abstract Space.[26]](56441.docx#chunk3568)

[[Editor's footnote 26: There is great originality as well as perspicacity in the explanation here given of Space, as a privative term, expressing when analysed, the absence of the feeling of resistance in the circumstances in which resistance is frequently felt, namely, after the sensations of muscular action and motion. The only part of the exposition to which I demur is the classing of Space among abstract terms. I have already objected to calling the word line, when used in the geometrical sense, an abstract term. I hold it to be the concrete name of an ideal object possessing length but not breadth. In like manner a Space may be said to be the concrete name of an ideal object, extended but not resisting. The sensations connoted by this concrete name, are those which accompany the motion of our limbs or of our body in all directions: and along with these sensations is connoted the absence of certain others, viz. of the muscular sensations which accompany the arrest of that motion by a resisting substance. This being the meaning of a Space, Space in general must be a name equally concrete. It denotes the aggregate of all Space.--\_Ed.\_]  
In the idea of SPACE, the idea of Infinity is included. What the idea of Infinity is, needs therefore to be explained. When the word Infinite is not used metaphorically, as it is when we speak of the infinite perfections of God, in which case it is not a name for ideas, but for the want of them, it is applied only to Number, Extension, and Duration.  
We increase numbers by adding one to one, one to two, and so on, without limit, giving a name to {112} each aggregate. The association of ideas which constitutes the process has been already explained. With each number, one, two, three, four, as we go on, the idea of one more is so strongly associated, that we cannot help its existing in immediate conjunction. However high, therefore, we go in numbering, the idea of one more always forces itself upon us; and hence we say that number is infinite. That this, literally, is not true; that, indeed, it is a verbal contradiction, is obvious. Number, is something numbered; but if numbered, limited; that is, not infinite. Number is the negation of infinite; as black is the negation of white. The name infinite, in this case, is, in reality, nothing but a mark for that state of consciousness, in which the idea of one more is closely associated with every succeeding number. And Infinity, the abstract term, is the peculiar idea, without the connotation.  
When we apply "infinite" to extension, we do so equally to all its three modifications, to lines, surfaces, and bulk. How we do so is obvious. We know no infinite line, but we know a longer, and a longer. A line is lengthened, as number is increased, by continual additions; a line of any length, say of an inch, is increased by the continual addition of other lengths, say of an inch. In the process, then, by which we conceive the increase of a line, the idea of one portion more, is continually associated with the preceding length; and to what extent soever it is carried, the association of one portion more, is equally close and irresistible. This is what we call the idea of infinite extension; and what some people call the \_necessary\_ idea; which only means, that the idea of a {113} portion more, rises necessarily, that is, by indissoluble association, so that we cannot help its rising. Infinite is the concrete term, here connoting Line; drop the connotation, you have Infinity, the abstract.  
If such be the whole of what is involved in the idea of Infinity, in the case of a line; call it necessary idea, if you will; the idea of it, in the case of surface, and of bulk, is also explained; for surface, and bulk, are only lines, in such and such, or in all directions. The idea of a portion more, adhering, by indissoluble association, to the idea of every increase, in any or in all directions, is the idea of "infinitely extended," and the idea of "infinitely extended," the connotation dropped, is the idea of Infinite Space. It has been called a simple idea (so little has the real nature of it been understood); while it is thus distinctly seen, to be one of the most complex ideas, which the whole train of our conscious being presents. Extreme complexity, with great closeness of association, has this effect--that every particular part in the composition is overpowered by the multitude of all the other parts, and no one in particular stands marked from the rest; but all, together, assume the appearance of ONE. Something perfectly analogous occurs, even in sensation. If two or three ingredients are mixed, as wine and honey, we can distinguish the taste of each, and say it is compound. But if a great many are mixed, we can distinguish no one in particular, and the taste of the whole appears a simple peculiar taste.[27]  
[Editor's footnote 27: This explanation of the feeling of Infinity which attaches itself to Space, is one of the most important thoughts in the whole treatise; and, obvious as its truth is to a mind prepared by the previous exposition, it has great difficulty in finding entrance into other minds.](56441.docx#chunk3569)

[Every object is associated with some position: not always with the same position, but we have never perceived any object, and therefore never think of one, but in some position or other, relative to some other objects. As, from every position. Space extends in every direction (i.e. the unimpeded arm or body can move in any direction), and since we never were in any place which did not admit of motion in every direction from it, when such motion was not arrested by a resistance; every idea of position is irresistibly associated with extension, beyond the position: and we can conceive no end to extension, because the place which we try to conceive as its end, raises irresistibly the idea of other places beyond it. This is one of the many so-called Necessities of Thought which are necessities only in consequence of the inseparableness of an association: but which, from unwillingness to admit this explanation, men mistake for original laws of the human mind, and even regard them as the effect and proof of a corresponding necessary connexion between facts existing in Nature.--\_Ed.\_]  
{114} This, indeed, is one great cause of the mistakes, which have been committed, in the examination of abstract ideas. We have shewn that they are all complex, and in the highest degree. Yet the greater number of them have always been treated as simple. Mr. Locke shewed that some of them, which he calls mixed modes, were undoubtedly compounded, as obligation, crime, &c. But they are no otherwise complex, than as power, quality, chance, fate, position, and space, are complex.  
It is truly remarkable, how many of the cases of indissoluble association are all united in the idea of SPACE. First of all, with the idea of every object, the idea of \_position\_ or \_place\_, is indissolubly united. {115} Secondly, with the idea of position or place, the idea of \_extension\_ is indissolubly united. Thirdly, with the idea of extension the idea of \_infinity\_ is indissolubly united. Fourthly, by the unfortunate ambiguity of the \_Copula\_, the idea of \_existence\_ is indissolubly united with SPACE, as with other abstract terms. What these several ingredients, the ideas of Position, Extension, Infinity, Existence, are composed of, we have already seen. All these, forced into combination, by irresistible association, constitute the idea of SPACE.  
  
{116} SECTION V.  
TIME.  
  
As SPACE is a comprehensive word, including all Positions, or the whole of synchronous order; so TIME is a comprehensive word, including all Successions, or the whole of successive order.  
The difficulty of the exposition, in this case, consists not in the ideas; for they are clear and certain enough; but in finding expressions which will have even a chance of conveying to readers, who are not familiar with the analysis of mental phenomena, the ideas which it is my object to impart.  
As all objects, considered as existing together, are said to exist in SPACE, so all objects considered as existing one after another, are said to exist in TIME.  
Objects, however, are said to exist in Time, in two distinguishable cases; either when they are in constant flow; or, when they have, what we call, stability or duration. The constant passage of men, horses, vehicles, &c., in a busy and crowded street, is in Time; the permanence of St. Paul's, in its well-known position, is also in Time. If Time mean the succession of the objects in the one case, it must mean something else in the other. It cannot mean the succession of St. Paul's. But it may mean the idea of St. Paul's, associated with the idea of other successions.  
Of TIME itself we conceive, that it is never still. It is a perpetual flow of instants, of which only one can ever be present. The very idea of Time, therefore, is {117} an idea of successions. It consists of this, and of nothing else.  
But there are no real successions, save successions of objects, that is of feelings in our minds.[28] What, then, are the successions of TIME, which are the successions of nothing? To those who have thoroughly familiarized themselves with the account which we have given of abstract terms, and who can promptly and steadily conceive the mode of their signification, we can render an answer, which will be understood at once, and will be felt to be complete and satisfactory.  
[Editor's footnote 28: There is an unusual employment of language here, which if attention is not formally drawn to it, may embarrass the reader. By objects are commonly meant, those groups or clusters of sensations and possibilities of sensation, that compose what we call the external world. A single sensation, even external, and still less if internal, is not called an object. In a somewhat larger sense, whatever we think of, as distinguished from the thought itself and from ourselves as thinking it, is called an object; this is the common antithesis of Object and Subject. But in this place, the author designates as objects, all things which have real existence, as distinguished from the instants of mere Time, which, as he is pointing out, have not; and a puzzling effect is produced by his applying the name Object, in even an especial manner, to sensations: to the tickings of a watch, or the beatings of a patient's pulse.--\_Ed.\_]](56441.docx#chunk3570)

[We have shewn, how we form the abstracts, redness, from red; sweetness, from sweet; hardness, from hard; by simply dropping the connotation of the concrete term. Thus red, always means something red; redness, is the red without the something; so of sweetness, hardness, and so forth. When the ideas are more {118} complicated, the case is still the same. When we use the concrete, living, it always connotes something living; a living man, a living quadruped, a living bird, fish, insect, and so forth. When we use the abstract, life, we convey all that we convey by the term living, except the connotation. We say that John is healthy, James is healthy, on account of circumstances the idea of which forms a very complex idea. The concrete healthy always connotes an individual. Use the abstract, health, you have the idea without the connotation.  
In applying this doctrine to the case of successions, we are ill supplied with appropriate names; and hence the difficulty of the case, both to the teacher, and the learner.  
We have said that there are no real successions, but successions of objects. The tickings of my watch are successive sounds, that is, sensations. The beatings which are felt by the physician, in the artery of his patient, are successive feelings or sensations of touch.  
When the different particulars of a scene in which a man has been engaged, of a battle, for example, in which he has commanded, pass through his mind, there is a succession of ideas. In all these cases of the successions of sensations, or ideas, there is always one present, others past, and others to come, that is, future. Drop the connotation of "something past," "something present," "something future." You have pastness, presentness, and futureness. But pastness, presentness, and futureness, are TIME. TIME can neither be shewn, nor conceived, to be any thing else. It is a single-worded abstract, involving the meaning {119} of these three several abstracts. The true meaning of these abstracts is clearly made out from their concretes. The precise idea, therefore, marked by the word TIME; if the meaning of these abstracts is sufficiently apprehended; is at last apparent. Nor is there any mysteriousness in it whatsoever, but that which has arisen from misapprehension of that grand department of Naming, which belongs to abstract terms; and from inattention to that class of words, which are invented to supply the place, each of them singly, of several other words.  
To our conclusion, that TIME is the equivalent of Pastness, Presentness, and Futureness, combined, it may be objected, that the word Time is applicable to all the three cases; as we can say, past time, present time, and future time, all with equal propriety. This, however, is so far from being any presumption against the conclusion, that it is a clear confirmation of it; since Time, standing by itself, marks no particular case, and, in order to do so, must have another mark applied to it to limit its signification. It is only because Time marks all the cases of pastness, presentness, and futureness, that it needs the marks past, present, or future, to confine its meaning; present time being merely another name for presentness, future time, for futureness, and past time, for pastness. The same thing is seen in the case of all other abstracts. Redness is the name of a certain colour, in all its modifications, and to whatever object belonging. But by the addition of an appropriate mark, we confine its meaning to any particular case; as when we say, the redness of a rose, the redness of scarlet, and so on.  
{120} The accounts, which have been rendered of Time by different philosophers, so far as they have in them any acknowledged accuracy, are, all of them, parts, and but parts, of the analysis which we have thus been presenting. Dr. Reid says, Memory gives us the conception and belief of finite intervals of duration; and these we enlarge by our mental processes to infinity.[4\*] We have already seen what Memory is. It is not a faculty, as Dr. Reid supposes, which "gives" any thing; it is an idea, formed by association of the particulars of a certain train; a train of antecedents and consequents, of which the present feeling is one extremity. Pastness is included under the term Memory. Memory is the name of a certain whole, and Pastness is the name of a part of that whole. Memory is a connotative term; what it notes, is the antecedence and consequence of the several parts of that which forms the chain of the remembrance; what it connotes, are the feelings themselves, the objects remembered. When what it connotes is left out, and what it notes is retained, we have the idea which is expressed by pastness.  
[Mill's footnote 4: Intellect. Powers. Essay III. ch. v. p. 583.]  
In the chain of memory, consisting of antecedent, antecedent, antecedent, traced back to any length from the present feeling, we call that which immediately precedes the present, the nearest; the next, we call more distant; the next, more distant still; and that, between which and the present feeling the greatest number of successions intervenes, we call the most distant, also the farthest back; but the farthest back of a series of successions, is the oldest, that between {121} which and the present time the greatest length of time has intervened. Greatest length of time, therefore, in this case, is only another name for greatest number of successions.](56441.docx#chunk3571)

[It has been already seen, that there is nothing in which we are so deeply interested, as an accurate knowledge of the antecedents and consequents, in the midst of which we exist. Of the different innumerable trains of antecedents and consequents which it is important for us carefully to mark, it is observed, that some succeed more quickly, some less. While the long pendulum of an eight-day clock is performing one oscillation, the short pendulum of a table-clock performs two or three.  
What that is, to which we give the name of quickness, or slowness, in those successions; in other words, what is the state of consciousness which we have thus occasion to mark; has already been seen. Every succession, observed by us, is a case of sensation and memory; sensation of the consequent, memory of the antecedent. If we have observed simultaneously the oscillations of the two pendulums, mentioned above, we remember two or three antecedent oscillations of the short pendulum, before we get back to one of the long. It is a mere case, therefore, of the greater or less number of antecedents in a chain of memory, expounded in a preceding chapter.  
In the knowledge, so important to us, of antecedents and consequents, it is not enough that we know what antecedents are followed by what consequents; much depends upon the quickness or slowness of the successions. It is, therefore, of the highest importance that we should have the means of marking them.  
{122} What we do is, to take some well-known case of successions, and to make that a standard, by which to ascertain the rest. We take, for example, the oscillations of a pendulum. So many of these we call a minute. So many minutes we call an hour. These minutes and hours, then, are so many oscillations, that is successions. We call them measures of time. But things are measurable only by parts of themselves; extension by extension, weight by weight, and so on. What is \*measured by succession, therefore, is itself nothing but succession.  
Having assumed a certain case of successions as a standard, and marked it into quantities, by distinctive names, we mark or name all other successions, by the names applied to the standard case. Thus, that grand succession, on which so much of what we are interested in depends, a revolution of the earth upon its own axis, we distinguish, by the term, twenty-four hours; which we also call by the name, day; and afterwards make use of, as a standard, to mark still slower successions, such as a revolution of the moon about the earth, a revolution of the earth about the sun. In all these measurements, and expressions, of time, it is still seen, that there is nothing in reality conceived but successions.  
Beside the standards, more distinctly conceived and expressed, there is always, in these estimates of time, a tacit reference to another standard, which is regarded as the unit, or minimum of time. The case here is precisely analogous to that of the unit, or minimum, of extension, which we have already observed. Our tactual, and muscular, senses are not sufficiently fine to discern objects of less than a certain magnitude. {123} The least which they can discern is tacitly assumed as the unit of extension. Nor are any of our senses fine enough to discern successions which have more than a certain degree of rapidity. Thus, if the seven primitive colours are made to pass with a certain velocity before the eye, they do not appear separate, but blended into one continuous white. In like manner, if sounds are made to succeed one another, at first, slowly, afterwards, with greater and greater rapidity, they cannot, at last, be distinguished as different sounds, but appear as one continuous sound. In fact, this is probably the account of all sounds, which are merely effects of the vibrations in the air, and therefore pulses; but often so quick, in succession, that no interval is distinguishable, and the perception is that of a continuous sound.  
The close resemblance, in this respect, between sensations and ideas, is remarkable. When sensations are brought into close conjunction they become blended, and appear, not several, but one. We have seen, in a most important case of association, that when ideas are called up together in close conjunction, they, too, cease to be distinguishable, and, being blended together, assume, even where there is the greatest complexity, the appearance, not of many ideas, but of one. Of this we have very remarkable examples, in the two cases of SPACE, and TIME.  
There is a certain succession, then, of sensations and ideas, in which the antecedent and consequent can be distinguished: another, in which the antecedent and consequent, on account of quickness, cannot be distinguished. The quickest that can be distinguished, is that to which, as the unit or minimum, a tacit {124} reference is made, in our several estimates of time.  
Having thus shewn how far the account of TIME, presented by one of the most recent Philosophers of high name, goes in expounding the phenomenon, and how far it leaves it unexpounded; it will be instructive next to observe, how far the genius of the ancient Greek Philosophers carried them, in this important inquiry. It is satisfactory, that we can refer the unlearned reader to a very clear and accurate exposition of their doctrines, in a well known work in our own language, the "Hermes" of Mr. Harris; from which, for the sake of this convenience, the present account of those ancient doctrines shall be drawn.  
"Time and Space," says that author,[5\*] "have this in common, that they are both of them by nature \_continuous\_. But in this they differ, that all the parts of Space exist \_at once\_ and \_together\_, while those of Time only exist in \_Transition\_ or Succession." This is only transcribing the common language. What remained was, to shew what are the real facts couched under this language.[6\*]](56441.docx#chunk3572)

[[Mill's footnote 5: Hermes, B. I. ch. vii.]  
[Mill's footnote 6: The expression of Ammonius, here quoted by Harris, comes nearer the fact than his own--[Greek: o( chro/nos u(phi/sta/tai kata/ mo/non to\ NUN, e)n ga/r to=| gi/nesthai kai/ phthei/resthai to/ ei=nai e)/chei]. Time subsists only in a single NOW or INSTANT, for it hath its being in beginning and ceasing to be. In other words, Time never is; all you can say of it is only this, it has been, or it is about to be.--(\_Author's Note\_.)]  
"In every given time we may assume anywhere a \_Now\_ or \_Instant\_, and therefore, in every given \_Time\_, there may be assumed infinite \_Nows\_ or \_Instants\_.  
{125} "A NOW or INSTANT is the \_Bound\_ of every finite \_Time\_. But although a \_Bound\_, it is not a \_Part of Time\_. If this appear strange, we may remember, that if a \_Now\_ or \_Instant\_ were a \_Part of Time\_ it being essential to the character of Parts, that they should measure the \_Whole\_, it would contain within itself infinite other nows; and this, it is evident, would be absurd and impossible."  
"\_The same Now\_ or \_Instant\_, may be the end of one \_Time\_, and the \_Beginning\_ of another; the first, necessarily Past Time, as being previous to \_the Now\_ or \_Instant\_, which both Times include; the other necessarily FUTURE, as being \_subsequent\_. As, therefore, every NOW or INSTANT always exists in Time, and without being Time, is \_Time's Bound\_; the Bound of \_Completion\_ to the \_Past\_, and the Bound of \_Commencement\_ to the Future: from hence we may conceive its nature or end, which is \_to be the Medium of Continuity between the Past and the Future, so as to render Time, through all its parts, one Intire and Perfect Whole\_."  
It must be obvious to every one, who has correctly followed me through the preceding deductions, that this mysterious language, if applied to actual successions, has a distinct meaning; if not so applied, it is jargon merely, without one idea annexed. This NOW, which is not \_Time\_, and, not being \_Time\_, is of course nothing else; this NOTHING, then, which, though nothing is the medium of continuity between Somethings, namely, time past, and time future, seems to be only a mysterious name for that link which is supposed to be between every antecedent and its consequent; which supposition of a link, or medium of continuity, we have already shewn to be a mere case {126} of association, involving a prejudice; the antecedent and consequent, and nothing else, being really included in a case of succession. Thus understood, however, it is a medium of continuity, forming the "\_Bound of Completion\_" to the previous train of successions, the "\_Bound of Commencement\_" to the following.  
Mr. Harris proceeds to shew some of the conclusions, resulting from the account which he had thus rendered of Time. "\_In the first place\_," he says, "\_there cannot\_ (strictly speaking) \_be any such thing as time present\_." We will draw from this a conclusion, which Mr. Harris appears not to have seen, or does not choose to acknowledge; That, if there be no such thing as Time present, neither can there be any such thing as Time past. For what is the past, but that which has been present? But if there be no such thing as time present, or time past, there can be no such thing as time future. Time, therefore, is an impossibility.  
Mr. Harris himself, indeed, goes a certain way toward this conclusion. "If \_no Portion\_ of time," he says, "be the object of \_any Sensation\_; further, if the Present \_never\_ exist; if the past be \_no more\_; if the Future be not as yet; and if these are all the parts, out of which \_Time\_ is compounded: how strange and shadowy a Being do we find it? How nearly approaching to a perfect non-entity?"[7\*]  
[Mill's footnote 7: It is but justice to Aristotle, to say, that he expressed the right conclusion much more distinctly than Harris thought proper to do. His mode of inferring, as translated by Harris, is as follows: That, therefore, \_Time\_ exists not at all, or at least, has but a faint and obscure existence, one may suspect from hence. A part of it has been, and is no more; a part of it is coming, and is not as yet; and out of these is made that Time, which is without end, and ever to be assumed farther and farther. Now, that which is made up of nothing but non-entities, it should seem was incapable ever to participate of Entity.--(\_Author's Note\_.)]  
{127} Mr. Harris then says, "Let us try, however, since the senses fail us, if we have not faculties of higher power, to seize this fleeting Being." What then is it he does in the search of those "faculties of higher power?" It will be seen, from the following quotation, that he merely describes a few cases of actual succession; and says, that from them, by the help of memory, and imagination, we come by the idea of Time. But the Memory and Imagination of successions present to us nothing but the successions themselves. If then the Memory and Imagination of successions, give us the idea of Time, the idea of Time can only be some part or the whole of the idea of the successions.](56441.docx#chunk3573)

["The World has been likened to a variety of Things, but it appears to resemble no one more than some moving spectacle (such as a procession or a triumph) that abounds in every part with splendid objects, some of which are still departing, as fast as others make their appearance. The Senses look on, while the sight passes, perceiving as much as is immediately present, which they report with tolerable accuracy to the Soul's superior powers. Having done this, they have done their duty, being concerned with nothing, save what is present and instantaneous. But to the \_Memory\_, to the \_Imagination\_, and above all, to {128} the \_Intellect\_, the several \_Nows\_ or \_Instants\_, are not lost, as to the \_Senses\_, but are presented and made objects of \_steady\_ comprehension, however, in their own nature, they may be \_transitory\_ and \_passing\_.  
"Now it is from contemplating two or more of these Instants under one view, together with that Interval of Continuity, which subsists between them, that we acquire insensibly the Idea of TIME. For example: \_The Sun rises\_: this I remember: \_it rises again\_: this too, I remember. These Events are not together; there is an \_Extension\_ between them--not however of \_Space\_, for we may suppose the place of rising the same, or at least, to exhibit no sensible difference. Yet still we recognise some Extension between them. Now what is this Extension, \_but a natural day\_? And what is that, but pure \_Time\_? It is after the same manner, by recognising two new Moons, and the Extension between these; two several Equinoxes, and the extension between these; that we gain Ideas of other Times, such as \_Months\_ and \_Years\_, which are all so many Intervals, described as above; that is to say, \_passing Intervals of Continuity between two Instants viewed together\_.  
"And thus it is THE MIND acquires the Idea of TIME. But this Time it must be remembered is PAST TIME ONLY, which is always the \_first Species\_, that occurs to the human Intellect. How then do we acquire the Idea of TIME FUTURE? The answer is, we acquire it by \_Anticipation\_. Should it be demanded still further, \_And what is Anticipation\_? We answer, that, in this case, it is a kind of reasoning by analogy from similar to similar; from successions of events, that are past already, to similar successions, {129} that are presumed hereafter. For example: I observe, as far back as my memory can carry me, how every day has been succeeded by a night; that night, by another day; that day, by another night; and so downwards in order to the Day that is now. Hence, then, I \_anticipate a similar succession\_ from the present Day, and thus gain the Idea of days and nights in \_futurity\_. After the same manner, by attending to the periodical returns of New and Full Moons; of Springs, Summers, Autumns, and Winters, all of which, in Time past, I find never to have failed, I anticipate a like orderly and diversified succession, which makes Months, and Seasons, and Years, \_in Time future\_."  
It is to be observed, that, in the above passage, Harris, beside Memory and Imagination, introduces the name of \_Intellect\_, as concerned in generating the idea of Time. But it will be seen that he makes no use of it, whatsoever, in giving his explanation, nor mentions any other operations than those of, memory for the past, and anticipation for the future. Indeed, it appears from a passage of his work, immediately following, that when Mr. Harris, in this inquiry, uses the word Intellect, he means nothing but Anticipation and Memory. "There is nothing," he says, "appears so clearly an object of the MIND or INTELLECT only, as \_the Future\_ does, since we can find no place for its existence any where else. Not but the same, if we consider, is equally true of \_the Past\_.\*"[8\*] Here we see, that {130} both \_the Future\_, and \_the Past\_, are said to be objects of the INTELLECT only. But the future is the object of anticipation, the past of memory; and both memory, and anticipation, as we have seen, are cases of association.  
[Mill's footnote 8: \_Ibid\_. He goes on to say, that, from this same doctrine, that Time exists only in the mind, some philosophers inferred, that if mind did not exist, neither could Time. [Greek: Po/teron de\ me\ ou)/ses psuche=s ei)/e| a)\n o( chro/nos, a)pore/seien a)/n tis]. (\_Aristot. Nat. Auscult.\_ 1. iv. c. 20.) Themistius, who comments the above passage, expresses himself more positively. [Greek: Ei) toi/nun dicho=s le/getai, to/ te a)rithmeto\n, kai\ to\ a)rithmou/menon, to\ me\n, to\ a)rithmeto\n delade\, duna/mei, to\ de\ e)nergei/a|, tau=ta de\ ou)k a)\n u(postai/e|, me\ o)/ntos tou= a)rithme/sontos, me/te duna/mei me/t' e)nergei/a|,--phanero\n o(s ou)k a)\n o( chro/nos ei)/e|, me\ ou)/ses psuche=s]. (\_Them.\_ p. 48. Edit. Aldi.)--(\_Author's Note\_.)]](56441.docx#chunk3574)

[In the cases of succession which he adduces, as examples, to shew, in what manner we acquire, he says, "insensibly," the idea of time, he tells us, there is sensation of the consequent, memory of the antecedent, and beside these, "contemplation of two or more instants under one view, together with that Interval of continuity, which subsists between them." But the contemplation of two instants, one prior, another posterior, in one view, with the interval between them, is a circumlocution for memory. It denotes obscurely, and imperfectly, that union, in one idea, of all the parts of a train, to which the name memory is affixed. From this contemplation, he says it is, "that we acquire the idea of Time." The real meaning is thus shewn to be, that we acquire it from memory. Mr. Harris, therefore, at the bottom, agrees with Dr. Reid; and the same observations by which we shewed {131} the imperfection of Dr. Reid's account, are equally applicable to that, of Mr. Harris. The case, in truth, is, that neither of them does any thing more than merely state the fact, without an attempt to explain it. That we cannot have the idea of time, without the observation of successions; and that memory is joined with sense in the observation of successions,--is the matter of fact. What TIME is, distinct from the memory and the sensations, they ought to have told us, but have not. They would not have found it difficult, had they been familiar with the distinction (of such infinite importance, in all accurate inquiries into the human mind) between the mode of signification of concrete words, and the mode of signification of abstract ones; the latter, in its more complicated cases, of not very easy comprehension. Unfortunately, we have no concrete term, corresponding with Time. Hence a great part of the difficulty of conceiving distinctly the meaning of the abstract. Time, also, is not the abstract name of any one train, but of all trains; as redness is not the name of one red, but of all reds. And there is this further complication, that the word "time" is never applied to any train, in particular; as time of a race, time of a battle, and so on; without the predominating association of that particular train, whatever it be, minutes, hours, or days, which we are accustomed to employ, as the measure of other successions. Without much and accurate practice, therefore, in conceiving the meaning of abstract terms, especially in the more complex and intricate cases; it is extremely difficult steadily to contemplate either TIME, as the {132} abstract name of all successive, or SPACE, as the abstract name of all simultaneous order.[9\*]  
[Mill's footnote 9: "Multos autem in errorem ducit, quod voces generales et abstractas in disserendo utiles esse videant, nec tamen earum vim satis capiant. Partim vero a consuetudine vulgari inventae sunt illae ad sermonem abbreviandum, partim a philosophis ad docendum excogitatae, non quod ad naturas rerum accommodatae sint, quae quidem singulares et concretae existunt, sed quod idoneae ad tradendas disciplinas, propterea quod faciant notiones, vel saltem propositiones, universales."--\_Berkeley de Motu\_, s. 7. No predecessor of Berkeley was so fully aware, as he was, of the deceptions practised on the human mind by abstract terms.--(\_Author's Note\_.)]  
It will be instructive, to recapitulate the indissoluble associations which are contained in the idea of Time. With every present event, is indissolubly associated the idea of an antecedent; with that antecedent, the idea of another antecedent; and so on without end. These are the ideas of Succession, and of Infinity; forced upon us by indissoluble association. The events of the present moment, are innumerable. With every one of these we associate the ideas of antecedents without end. This is the Past; an Infinity of simultaneous successions, each having antecedents, running back without end. These are successions in the concrete; successions of objects. Drop the connotation, to form the abstract, as is done in other cases; you have then successions without the objects; which is precisely the meaning of the word TIME.  
As with every present event, and those infinite in number, is indissolubly associated the idea of a series of antecedents, without end, which, in the abstract, is {133} TIME PAST, so with every such event, is indissolubly associated the idea of a consequent, with that the idea of another consequent, and so on, without end; which, in the abstract, is TIME FUTURE.  
The synchronous Line, or Line of \_Extension\_, and the successive Line, or Line of \_Time\_, bear a pretty close analogy. As, in the Line of \_Extension\_, we have the concrete line, and the abstract line; the concrete line being the positions with the objects; the abstract or mathematical line, the positions without the objects; so, in the line of \_Time\_, we have the concrete line, and the abstract line; the concrete line being the successions with the objects; the abstract line, the successions without the objects; to which abstract line, we give the name TIME.  
We have before remarked, as an important case of indissoluble association, that the idea of Position, that is, of a modification of Space, is indissolubly associated with the idea of every sensible object. It is now to be remarked, as a not less important case, that the idea of succession or of antecedent and consequent, that is, a modification of Time, is indissolubly associated with the idea of every object. The idea of a modification of Space, and the idea of a modification of Time, form parts of our complex idea of every object. It is no wonder that they appear to be necessary, seeing that they force themselves upon us, by irresistible association, with the idea of every object.[29] [30]](56441.docx#chunk3575)

[[Editor's footnote 29: As is shewn in the text. Time is a name for the aggregate of the successions of our feelings, apart from the feelings themselves. I object, however, in the case of time, as I did in the {134} case of Space, to considering it as an abstract term. Time does not seem to me to be a name (as the author says) for the pastness, the presentness, and the futureness of our successive feelings. It is rather, I think, a collective name for our feeling of their succession--for what the author called, in a previous section, the part of the process "which consists in being sensible of their successiveness," for which part, he then said, "we have not a name." This taking notice of the successiveness of our feelings, whether we prefer to call it a part of the feelings themselves, or another feeling superadded to them, is yet something which, in the entire mass of feeling which the successive impressions give us, we are able to discriminate, and to name apart from the rest. A perception of succession between two feelings is a state of consciousness \_per se\_, which though we cannot think of it separately from the feelings, we can yet think of as a completed thing in itself, and not as an attribute of either or both of the two feelings. Its name, if it had one, would be a concrete name. But the entire series of these perceptions of succession has a name, Time; which I therefore hold to be a concrete name.  
However inextricably these feelings of succession are mixed up with the feelings perceived as successive, we are so perfectly able to attend to them, and make them a distinct object of thought, that we can compare them with one another, without comparing the successive feelings in any other respect. We can judge two or more successions to be of equal, or of unequal, rapidity. And if we find any series of feelings of which the successive links follow each other with uniform rapidity, such as the tickings of a clock, we can make this a standard of comparison for all other successions, and measure them as equal to one, two, three, or some other number of links of this series: whereby the aggregate Time is said to be divided into equal portions, and every event is located in some one of those portions. The succession of our sensations, therefore, however closely implicated with the sensations themselves, may be abstracted from them in thought, as completely {135} as any quality of a thing can be abstracted from the thing.  
The apparent infinity of Time the author, very rightly, explains in the same manner as that of Space.--\_Ed.\_]  
[Grote's footnote 30: In this section Mr. James Mill explains Time. He tells us that "it is a comprehensive word including all successions, or the whole of successive order" (p. 116)--"a perpetual flow of instants, of which only one can ever be present. The very idea of Time is an idea of successions. It consists of this and of nothing else" (pp. 116--117)--"it is the single worded abstract, involving the meaning of the three several abstracts, pastness, presentness, futureness" (p. 118). In the line of "Time, we have the concrete line, and the abstract line: the concrete line being the successions with the objects: the abstract line, the successions without the objects: to which abstract line, we give the name Time" (p. 133).  
In p. 120 he gives us in a few words Dr. Reid's explanation of Time:--and in pp. 124--130 he cites at greater length Aristotle's explanation, as reproduced by Harris in the Hermes.  
Both Aristotle and Reid include in their meaning of Time, not merely succession, but duration or continuity. Mr. James Mill includes only succession--antecedents and consequents. He thinks that continuity is nothing else than an illusion or prejudice, arising from extreme rapidity of succession (pp. 123--125).  
"Time and Space (says Harris, cited p. 124) have this in common, that they are both of them by nature continuous. But in this they differ--that all the parts of space exist at once and together; while those of Time only exist in Transition or Succession." Mr. James Mill proceeds to say--"This is only transcribing the common language. What remained was, to show what are the real facts couched under this language."  
Undoubtedly these facts ought to be shewn, and shewn fully. But I cannot think that they are shewn fully in the {136} present Chapter of the Analysis. On the contrary, a most important part of the case is omitted--Duration or Continuity--which Aristotle has put in the front of his exposition, and after him \*Reid as well as Harris.  
If it were true that the word Time is the abstract, having for its concrete succeeding objects and nothing more, we should not need the term at all. The abstract term "Succession" already answers this purpose, much more perspicuously and obviously. But Time includes something more than succession. It comprehends not merely potentiality for succeeding objects or events, but also potentiality for continuous motions or sensations: it embraces duration as well as succession.  
The exposition of Aristotle is adapted to readers and debates so different from those of the present day, that it often appears strange, and even mystical, when ever so well translated. In the present case, however, we derive satisfaction from knowing, that his doctrine is, with a very small reserve, adopted by Hobbes, the most anti-mystical of all philosophers. (Hobbes' First Grounds of Philosophy--Part II., Sect. 7. 3). Aristotle has given a theory of Time at great length, perfectly clear as to its main features, though in several of its details, obscure and difficult to follow. I will add that throughout nearly the whole exposition, he keeps the abstract in close implication with the concrete: the neglect of which precaution, by many philosophers, is so justly censured by the Author of the Analysis.](56441.docx#chunk3576)

[Aristotle, according to a practice frequent with him, begins by enumerating various puzzles and difficulties which stand in the way of any theory ([Greek: diapore=sai] Physic. IV. 10. p. 217. 6. 30). In doing this, here as elsewhere, he states the difficulties in a manner somewhat paradoxical. The citation of page 126, (together with note, page 127,) are all taken from this preliminary excursion, the beginning and end of which Aristotle distinctly marks (Physica IV. c. 10. p. 217 b. 30. p. 218 a. 30). He then proceeds to exposition; and after remarking that Time is one and alike every where, amidst the greatest {137} diversity of events succeeding each other--he says that it is not indeed identical with Motion, (as some theorists considered it), but that it is nevertheless inseparable from Motion being one of the aspects or appurtenances of Motion. Magnitude or Body moved--Motion--Time--all go together in Aristotle's conception. Magnitude is continuous: Motion is continuous: Time is continuous (Physica IV. 11. p. 219. a. 12. 223. a. 10): Line is continuous. On the other hand, the Point is separate and indivisible; no two Points have any common term: a Line is not made up of Points, but of smaller Lines; and every Line has Points for its bounds or limits. What the Point is to a Line, the Now or Instant is to Time: the Instant is not a portion of Time, but the boundary of each portion, and the conjoining boundary between Time past and Time future. (Physica IV. 11. p. 220. a. 5-25--VI. 3. 234. a. 1-24).  
Aristotle defines Time as the Number of Motion according to Former and Later: \_i.e.\_, Continuous Motion, considered as numerable and successive. To take the words of Harris, from Aristotle (cited p. 128 of the Analysis)--"It is from contemplating two or more Instants under one view, together with that Interval of Continuity which subsists between them, that we acquire insensibly the Idea of Time."--"Months and Years are all so many Intervals described as above; that is to say, passing Intervals of Continuity between two Instants viewed together."  
Mr. James Mill hardly does justice to this exposition, when he observes (p. 131)--"Neither Harris \*nor Reid does anything more than merely state the fact, without an attempt to explain it. That we cannot have the idea of time, without the observation of succession; and that memory is joined with sense in the observation of successions,--is the matter of fact. What Time is, distinct from the memory and the sensations, they ought to have told us, but have not."--In this passage, the word "sensations" is evidently used by Mr. James Mill as equivalent to "successions" or successive {138} sensations: and the observation appears to me not well founded. I think that Aristotle has told us, and Harris after him, what Time is, distinct from the successive sensations. It includes Motion and the Continuity of Motion. These are elements of which Mr. James Mill takes no notice: and they supply the deficiency of which he complains.  
It is one of the many merits of Mr. James Mill's Analysis that he has paid more attention to movements and muscular sensibility, as elements of our consciousness, than philosophers had done before him. But in this chapter unfortunately, he has left them out, and has confined himself to successions. The explanation of Time, given in the main by Aristotle, is completed and elucidated by Professor Bain in his work on the Senses and the Intellect (chapter on the Muscular Feelings, sect. 20--23, pp. 95, 96; compare also p. 183, in ed. 3rd). The feeling of continuance in our muscular exertions, of longer or shorter duration in the sweep of our limbs, is one of the primordial varieties of sensibility. A longer expenditure of our energy affects the consciousness differently from a shorter. In a full sweep of the arm, we are conscious of the instant of commencement as antecedent,--the interval of continued effort,--and the instant of termination as following. This is the clearest illustration of that which Aristotle and Harris describe as Time: two instants former and later, with continuous interval between them. Motion is the most striking and obvious example of Continuity, and is therefore employed by Aristotle as the basis for his exposition of Time. The eternal and uniform motions of the celestial bodies were to him the most impressive of all phenomena; the great standard by which all other motions were to be measured. Hobbes also takes the Line as the proper exponent of time. But though motion affords the best and amplest illustrations of Continuity, it is not motion only that is felt as continuous. The sense of continuance is felt in regard to other impressions also. Professor Bain observes--"All impressions made on the mind, whether those of muscular energy, or those of the ordinary senses, are felt differently according as they endure {139} for a longer or a shorter time. This is true of the higher emotions also. The continuance of a mental state must be discriminated by us from the very dawn of consciousness; and hence our estimate of time is one of our earliest mental aptitudes. It attaches to every feeling that we possess"--(p. 93).](56441.docx#chunk3577)

[We thus perceive that the sense of continuance is just as much an original presentation to our consciousness, as the sense of succession. This is an important fact, which has not been sufficiently adverted to in the exposition of complex ideas such as Time and Space. The \_fundamentum\_ of Continual Quantity is an immediate manifestation of our sensitive discriminations not less than that of Discrete Quantity. The complex Idea of Time embodies both.[a] Mr. James Mill insists everywhere, with laudable emphasis, upon the necessity of seeking the meaning of every abstract term in the concrete particulars out of which it grows. But in explaining Time, he has not set before himself all the concrete particulars in their full variety and amplitude. Confining himself to Succession, and scarcely touching Continuance, he has not been led to follow out the facts of motion in all their diversified aspects, nor the many abstractions and generalisations which {140} spring from comparison of motions with each other, under some one of these aspects.  
[Footnote a: Aristotle's definition of Time was much discussed by his contemporaries and successors. Both his pupils, Theophrastus and Eudemus, accepted it: but there were many objectors, and the earliest of them notified to us is, Straton of Lampsakus, pupil and successor of Theophrastus. Straton objected on the ground that the definition combined Number and Motion--Discrete Quantity and Continual Quantity--which combination he held to be inadmissible. But this seems no valid objection. Aristotle very properly recognises the two as distinct varieties of Quanta--(see Categor. p. 4, b. 20): but that is no reason why both of them may not be combined in the same complex idea--especially when we see that each of them has its distinct root in different original presentations of our discriminative consciousness.  
See Simplikius ad Aristot. Physic. IV. Scholia, p. 394, b. 27--47. Brandis.]  
In a note to this chapter of the Analysis (p. 129) attention is called by Mr. James Mill to another important doctrine cited by Harris out of Aristotle--to the relative nature of Time. Can there be any time, apart from the percipient mind? asks Aristotle--since time is the numerable element in motion, and there can be no numeration without a rational mind to number.[b] He does not affirm positively, but he speaks as conceiving number and the numbering mind to be Relatum and Correlatum, so that the former cannot exist without the latter.[c] Both Alexander of Aphrodisias and Themistius thought so likewise after him: though Boethius and other commentators dissented from the opinion.[d] Upon this general question of relativity, Aristotle is not always consistent with himself. Though he declares explicitly, that Relata reciprocate in predication, and are implicated each with the other--and though he says that "the Soul is in a certain sense all things" (\_i.e.\_ is the implied correlate of all our beliefs and disbeliefs, affirmations and negations)--yet in other places, he limits this {141} universal principal by exceptions, which some of his commentators deprecate as inadmissible.[e]--\_G.\_  
[Footnote b: Aristot. Physica. IV. 14, p. 223, a. 26.]  
[Footnote c: So also Hobbes' First Philosophy, Part II. 7, 3, 5:--"Seeing all men confess a year to be time, and yet do not think a year to be the accident or affection of any body, they must needs confess it to be, not in the things without us, but only in the thought of the mind." (Here Hobbes goes too far, divesting time of all objective character; instead of considering it as relative to the mind, which implies a subjective and an objective aspect combined. The next passage exhibits this.) "Time is the phantasm of before and after in motion: which agrees with the definition of Aristotle. Time is the number of motion according to former and latter--for that numbering is an act of the mind. To divide Space or Time, is nothing else but to consider one and another within the same--division is not made by the operation of the hands, but of the mind."]  
[Footnote d: Themistius ad Aristot. Physic. IV. p. 337, in Spengel's edition of Themistius--partly extracted by Brandis in Scholia to Aristotle, p. 393, b. 27.]  
[Footnote e: Aristot. Categor., c. 7, p. 6, a. 37, b. 28; p. 7, b. 23. Scholia ad Categor., p. 65, b. 10--20. Brandis.  
Aristot. de Anima, III., 8, 431, b. 21, [Greek: e( psuche\ ta\ o)/nta po/s e)sti pa/nta; e)\ ga\r ai)stheta\ ta\ o)/nta e)\ noeta\, e)/sti d' e( e)piste/me me\n ta\ e)pisteta/ pos, e( d' ai)/sthesis ta\ ai)stheta/].]]  
  
{142} SECTION VI.  
MOTION.  
  
It is necessary to take notice of this term, because the idea which is named by it is apt to present the appearance of something mysterious, though, after the expositions with which we are now familiar, the materials of which it is compounded, will not be difficult to find.  
The word Motion, is the abstract of Moving. What we have to investigate, therefore, are the sensations, on account of which, we call a body "moving;" motion being merely moving, the connotation dropped.  
All motion is in a Line, either a straight line, or some other line. The idea of "moving," therefore, contains, for one ingredient, the idea of a line.  
A body "moving," is a body which is successively at every point of a line. Every point of a line, as we have seen, is a particular position. A body "moving," therefore, is a body first in one position, then in another, then in another, through a certain series.  
In the idea of a Body moving, then, we can enumerate the following particulars: the idea of a body, the idea of a position, the idea of a line, the idea of succession. These are all complex ideas; some of them highly complex; united into one idea, motion, they compose one of the most complex of all our {143} ideas. The ingredients, however, being already explained, there can be no great difficulty in understanding the compound.](56441.docx#chunk3578)

[It is commonly said, that motion includes the idea both of Space, and of Time. As it includes the idea of Succession, it includes the idea of Time, successions in the abstract (otherwise called instants), without end, receiving the name of Time. As it includes the idea of a Line, it includes the idea of extension in one direction. As it includes the idea of Position, which is that of lines, in every direction, it includes the idea of extension in every direction; but extension in every direction, taken abstractly, is Space.  
It is important to observe, that, though we receive, and that the most frequently, information of motions by the eye, it is not from the sensations of sight, that the idea of motion is derived. It is by association of ideas alone, that we fancy we see motion, as it is thence we fancy that we see figure, and distance. The classes of sensations, from which we derive the idea of motion, and the idea of extension, are the same; they are the muscular and tactual sensations. The man born blind, is not without the idea of motion, as he is without that of colour; on the contrary, he has the idea probably much more precise, than we who have entangled it inextricably with the perceptions of sight.  
To recur to the exposition which we have already given; we may remember, that the sensations (taking the simplest case), on account of which we apply the name Line, are partly sensations of Touch, partly sensations of Muscular Action. If we touch a line at one point with any part of our bodies, say the finger; so long as the finger is still, we have merely the {144} sensations, on account of which we call the line tangible. As soon as we move the finger along the line, we have the sensations and ideas, on account of which we call it extended. But these new feelings, on account of which we call the line extended, are also the feelings, on account of which we call the finger moved. The sensations, therefore, whence we derive our ideas of extension, and of motion, exist simultaneously. We have a certain compound of feelings, partly sensations, and partly ideas; for we have already seen, that the perception of succession consists in a present sensation, associated with the idea of a past one; and we assign to this compound, not one name, as on other occasions, but two names, after a very peculiar and remarkable manner. These two names are, Line Extended, Finger Moved. The complication of the feelings here, and of course the obscurity of them, is very remarkable; though the naming, as in certain other cases of obscure ideas, is very distinct. We are never misled in the application of the terms, Line Extended, Finger moved; though we may be very much puzzled to shew, of the compound of feelings which are thus named, and which, in the compound, are easily, and infallibly traced, how much is included under the one term, and how much under the other. A certain portion of the sensations in the compound is peculiar to what is called the Line, another portion is peculiar to what is called the Finger. The rest is common to both. The common part, united to what is peculiar to line, is called line extended; the same common part, united with what is peculiar to finger, is called Finger moved.  
Our ideas of extension and motion, are, no doubt, {145} originally derived from the action of our own bodies. I touch something, and have the sensation of resistance. The idea of resistance is the fundamental part in every combination to which I give the name of object. In this case, there is the object touched, and there is the finger touching. A certain action is given to my finger, still touching the object. That action involves certain feelings; these I combine both with the object, and with the finger, and to these two combinations I give the two names, Object Extended, Finger Moved.  
If any one shut his eyes, excluding as much as possible, the ideas of sight, and conceiving, without admixture, the feelings in the finger and the arm, while the finger passes along a line, he will get some notion of the series of antecedents and consequents, whence the idea of Motion is derived. They are feelings, which language does not enable us to communicate by words; but it does not seem very difficult for any man to raise the ideas of them in himself.  
Let any one suppose, that the line commences opposite to the centre of his body. He begins by touching it at that point with the finger of his right hand; and in this there is one state of feeling. He gives the finger the smallest perceptible motion towards the right: this is another state of feeling. He gives it a further motion, the smallest perceptible, in the same direction: this is another state of feeling; and so on, as far as the arm can reach. The antecedent states are in each instance united with the present by memory, and by the amount of the states, thus united, the amount of the motion is computed.](56441.docx#chunk3579)

[Conceiving the case of a man born blind, the more {146} easily to exclude the illusions of association; it is obvious, that such a man can obtain the idea of another body in motion, only by accompanying it with his hand; or by associating the ideas, on account of which he calls the hand, moved, with the body in question. By frequent operations of the hand, such as that described above, he becomes familiar with the idea of the hand moved. The ideas of the sensations, on account of which, he calls it moved, are easily raised, easily form themselves into combination, and easily associate themselves with the object, Hand. The idea of Hand, and the idea of Hand moved, having become very familiar, it is an easy case of association to transfer the term \_moved\_ to other things, as the foot moved, the body moved, the stone moved. When he has become familiar with the application of Moved, as a connotative term, to various objects, it is easy, in this, as in other cases, to drop the connotation; and then he has the abstract, MOTION.[31] [32]  
[Bain's footnote 31: The author correctly, in my opinion, refers to our muscular sensibility (aided by Touch), the fundamental notions of Resistance, Motion, Extension, Space. He also remarks properly, that the idea of motion and the idea of extension are the same; they are merely different modes of viewing one experience. In a mutually involved series of properties such as these, the Analysis may proceed in several different arrangements, no one being apparently very decisive. The following mode is suggested as on the whole, the most consecutive.  
The feeling of Resistance expresses what is probably the most fundamental state of all, the consciousness of muscular energy or expended force. Taking the case of a dead strain, or a pressure without movement, we have mere muscular energy and nothing else. We have an indivisible, unanalysable, mode {147} of consciousness, distinct from all modes of passive sensation, and from all forms of emotion. It is a kind of consciousness remarkably constant in its character; it varies in degree, but with this peculiarity that because a man is physically weaker than usual, he does not on that account exaggerate or misrepresent the degree of his muscular expenditure; the feeling of lifting two pounds is not made the same as the feeling of lifting four pounds, although in some of the incidents of exertion, as in the organic state of exhaustion, the smaller expenditure in one state is held to be equal to the greater expenditure in another state. The consciousness of putting forth power is the most uniform, the least variable, of all our sensibilities; the same amount of actual force expended is estimated as nearly the same under all circumstances.  
In being conscious of expended energy, we discriminate its degrees, within certain limits; we know when we increase or diminish the amount; and our sensibility is measured by the smallness of the difference that makes a change in our consciousness. This discrimination is the basis of our estimate of the property termed Force, Resistance, Momentum, in moving bodies. Our idea of force is a muscular idea, an idea of muscular force of a certain amount. Force may be viewed in other ways, or from other aspects, but its direct and simple estimate is muscular energy in the dead strain.  
2. We are farther conscious of muscular energy as more or less enduring or continuing. Our consciousness varies according as a strain is protracted; a weight supported half a minute gives a feeling different from a weight supported a quarter of a minute.  
Farther, it is important to remark that increase of continuance is not confounded with increase of force in the same time. Mechanically speaking, it is the same to us, whether we support two pounds one minute, or one pound two minutes; the energy gone out of us, the oxidation, or consumption of material, must be the same for both. But the consciousness is not the same for both; each has a character of its own, and we recognise the distinction in clear consciousness. If we {148} confounded all modes of expended energy that are dynamically equal, we should be disqualified from attaining the ideas of motion and extension.  
When energy is accompanied by \_movement\_, there is a new and characteristic mode of consciousness, of vital importance. Energy in the dead strain and energy with motion may be equal as regard expended force, but they are not the same to our feelings. Continuance in the one is a different fact from continuance in the other. The feeling of continuance in moving energy is the fact that we call motion; and also the fundamental property, the starting point, with reference to Extension; although much more is wanted to complete that cognition. Mere dead strain would not amount to extension; and the discriminating of dead strain from moving strain is thus of essential moment. From the sense of this distinction, and the estimate of degree of continuance in movement, we begin at once the experience of motion and the ground-work of extension.  
The consciousness of continuance whether of dead strain or of movement is also a consciousness of duration, but not the only mode of becoming versed in this property. All our mental states,--whether muscular feelings, sensations, emotions, thoughts, volitions,--are different as they are more or less continued, and this consciousness of difference is a consciousness of Duration or Time. Hence the usual saying that Time is a property common to the Object and to the subject. The object experiences of motion and extension are the most convenient modes of measuring time, they are the most accurate and discriminative, but they are not the only nor the chief concrete embodiments of it. We often measure time by the duration and succession of our feelings and thoughts.](56441.docx#chunk3580)

[3. Another mode of discrimination inhering in our muscular consciousness is the degree of movement, as slow or quick. We are differently affected according to the rapidity of our movements; an accelerated pace in the arm, or in the whole body, sensibly alters our feelings. Farther, we do not compound this alteration with its dynamical equivalents in the {149} other modes--with increase in the amount of the dead strain, in the continuance of the dead strain, or in the continuance of movement. A characteristic mode of feeling attends this special form of augmenting or reducing our expenditure of force. The consequence is, a feeling of velocity or speed of movement. But this feeling of speed is not all. We gain another equivalent of degrees of extension; more speed in the same time being equal to more time with the same speed. It is proper to remark, however, that we are premature in speaking of extension, or in regarding it as arrived at, at once by our primary experiences of movement; much has to be gone through before this is fully formed or developed. Motion is the fundamental fact, but motion is a fact of succession, and can do nothing to suggest a group of contemporaneous phenomena, an outspread universe of the co-existing in time. Our primary sensibility is a mere thread of succession, duration, or continuance; we have to acquire by a process of aggregation and association, the highly artificial experience of things permanently situated in a relationship of co-existence in space or extension.  
It is at this point that Sensation comes to our aid. Passive sensation by itself is incompetent to give us the foundations of extension; through it, we have neither resistance nor movement, nor any fact partaking in what is essential to the extended or object universe. Mere warmth, odour, relish, touch, sound, colour, contain no elements of extension. The co-operation with moving energy is what introduces us to the object world.  
How then does Sensation aid muscularity in evolving Extension? In various ways, but chiefly thus. Our movements are not performed in vacuo, but in conjunction with sensation. The movements of the hand and arm, are usually conjoined with sensations of touch. We draw the hand across a table; there is an arm sensibility, purely motor or energetic, which is distinct from every mode of passive sensation. There accompanies it, however, a series of tactile sensations, making a united experience, active and passive. If this conjunction {150} were to happen but once, nothing would be thought of it farther than as a mere experience of succession. Again, in another situation the sweep of the movement ends in a contact or sensation of touch, or begins in the loss of such a contact. So far, these are mere casual conjunctions, unions of moving energy and passive sensibility. But in the course of many trials, there arise uniform conjunctions of movement with passive sensibility: the same movement being associated with the same tactile series, or with the same beginning or ending of tactile sensation. Take the case of the movement of the hand over the surface of our own body. A certain definite start, and definite amount of exertion brings with it a uniform tactile sensation, as in drawing the hand over the face. This uniformity generates an expectation that the same sensation will follow on the same definite energy. Many such conjunctions are formed in this manner. There is an interesting variety of the experience of such concurrences; namely, when we reverse a movement, and find a series of sensations identified as the same in an inverted order. The hand passed along the side of a knife, experiences movement coupled with sensations, as often as the movement is made; the inverted movement inverts the sensations.  
The supposition, hitherto, has been confined to Touch. When we take in sight, the scope for the operation is greatly enlarged. Almost all our movements are conjoined with optical changes--sensations of colour and of visible form in a certain sequence. We speedily detect a number of uniform occurrences of movement and visible sensation. The same movement gives the same series of appearances at all times; and an inverted movement corresponds with an inverted order. Here too we attain to a number of uniformities of coincidence, with the expectation of future occurrence. A certain movement of the eyes is accompanied with an optical series, as scanning the starry heavens; as often as the movement is repeated from the same stand-point, the optical series is repeated; the inverted movement gives the inverted series. We {151} contract an expectation, that such a coincidence will occur in the future, and this expectation is our idea of the starry space.  
Our idea of extended things is thus completed by sensation. It is a series of conjunctions, or associations, of movements and sensations, in a fixed order. We do not in our idea of space, command an entire view at one glance; the successive perception of points or limited portions is what we begin with, and is the character of the mind's working even after we are educated to the utmost. The co-existing in space, is the mind's potentiality of finding definite sensations by means of definite movements; and it seems impossible to assign any other meaning or import to the phenomena. The genesis of the idea of space determines our mode of settling the great question of the Perception of a material world.--\_B.\_]  
[Editor's footnote 32: It will be both useful and interesting to the inquiring reader, if I add to the analysis of these very complex ideas by the author of the present treatise, and to that by Mr. Bain, the analysis given of them by the other great living master of the Association psychology, Mr. Herbert Spencer. The following passages are from his "Principles of Psychology." First, of Resistance:](56441.docx#chunk3581)

["On raising the arm to a horizontal position and keeping it so, and still more on dealing similarly with the leg, a sensation is felt, which, tolerably strong as it is at the outset, presently becomes unbearable. If the limb be uncovered, and be not brought against anything, this sensation is associated with no other, either of touch or pressure." This is the sensation of Muscular Tension.  
"Allied to the sensation accompanying tension of the muscles, is that accompanying the act of contracting them--the sensation of muscular motion. . . . While, from the muscles of a limb at rest, no sensation rises; while, from the muscles of a limb in a state of continuous strain, there arises a continuous sensation which remains uniform for a considerable time; from the muscle of a limb in motion, there arises a sensation which is {152} ever undergoing increase or decrease, or change of composition.  
"When we express our immediate experiences of a body by saying that it is \_hard\_, what are the experiences implied? First, a sensation of pressure, of considerable intensity, is implied; and if, as in most cases, this sensation of pressure is given to a finger voluntarily thrust against the object, then there is simultaneously felt a correspondingly strong sensation of muscular tension. But this is not all: for feelings of pressure and muscular tension may be given by bodies which we call soft, provided the compressing finger follows the surface as fast as it gives way. In what then consists the difference between the perceptions? In this; that whereas when a soft body is pressed with increasing force, the synchronous sensations of increasing pressure and increasing muscular tension are accompanied by sensations of muscular movement; when a hard body is pressed with increasing force these sensations of increasing pressure and tension are not accompanied by sensations of muscular movement. Considered by itself, then, the perception of softness may be defined as the establishment in consciousness of a relation of simultaneity between three series of sensations--a series of increasing sensations of pressure; a series of increasing sensations of tension; and a series of sensations of motion. And the perception of hardness is the same, with omission of the last series." (pp. 212, 218.)  
Of Extension; and first, of Form or Figure:  
"It is an anciently established doctrine that Form or Figure, which we may call the most complex mode of extension, is resolvable into relative magnitude of parts. An equilateral triangle is one of which the three sides are alike in magnitude. An ellipse is a symmetrical closed curve, of which the transverse and conjugate diameters are one greater than the other. A cube is a solid, having all its surfaces of the same magnitude, and all its angles of the same magnitude. A cone is a solid, successive sections of which, made at right angles to the axis, are circles regularly decreasing in {153} magnitude as we progress from base to apex. Any object described as narrow is one whoso breadth is of small magnitude when compared with its length. A symmetrical figure is a figure in which the homologous parts on opposite sides are equal in magnitude. Figures which we class as similar to each other, are such that the relation of magnitude between any two parts of the one, is equal to the relation of magnitude between the corresponding parts of the other. Add to which, that an alteration in the form of anything, is an alteration in the comparative sizes of some of its parts--a change in the relations of magnitude subsisting between them and the other parts, and that by continuously altering the relative magnitudes of its parts, any figure may be changed indefinitely. Hence, figure being wholly resolvable into relations of magnitude we may go on to analyze that out of which these relations are formed--magnitude itself." (pp. 224, 225.)  
Next therefore, of Magnitude:  
"What is a magnitude, considered analytically? The reply is, It consists of one or more relations of position. When we conceive anything as having a certain bulk, we conceive its opposite limiting surfaces as more or less removed from each other; that is, as related in position. When we imagine a line of definite length, we imagine its termini as occupying points in space having some positive distance from each other; that is, as related in position. As a solid is decomposable into planes; a plane into lines; lines into points; and as adjacent points can neither be known nor conceived as distinct from each other, except as occupying different places in space--that is, as occupying not the same position, but relative positions--it follows that every cognition of magnitude, is a cognition of one or more relations of position, which are presented to consciousness as like or unlike one or more other relations of position." (p. 226.)  
And finally, of Position:](56441.docx#chunk3582)

["This analysis of itself brings us to the remaining space-attribute of body--Position. Like magnitude, Position cannot be known absolutely; but can be known only relatively. {154} The notion of position is, in itself, the notion of relative position. The position of a thing is inconceivable, save by thinking of that thing as at some distance from one or more other things. The essential element of the idea will be best seen, on observing under what conditions only, it can come into existence. Imagine a solitary point A, in infinite space; and suppose it possible for that point to be known by a being having no locality, what now can be predicated respecting its place? Absolutely nothing. Imagine another point B to be added. What can now be predicated respecting the two? Still nothing. The points having no attributes save position, are not comparable in themselves; and nothing can be said of their relative position, from lack of anything with which to compare it. The distance between them may be either infinite or infinitesimal, according to the measure used; and as, by the hypothesis, there exists no measure--as space contains nothing save these two points; the distance between them is unthinkable. But now imagine that a third point C is added. Immediately it becomes possible to frame a proposition respecting their positions. The two distances, A to B, and A to C, serve as measures to each other. The space between A and B may be compared with the space between A and C; and the relation of position in which A stands to B becomes thinkable, as like or unlike the relation in which A stands to C. Thus, then, it is manifest that position is not an attribute of body in itself, but only in its connection with the other contents of the universe.  
"It remains to add, that relations of position are of two kinds: those which subsist between subject and object; and those which subsist between either different objects, or different parts of the same object. Of these the last are resolvable into the first. It needs but to remember, on the one hand, that in the dark a man can discover the relative positions of two objects only by touching first one and then the other, and so inferring their relative positions from his own position towards each; and on the other hand, that by vision no knowledge of their relative positions can be {155} reached save through a perception of the distance of each from the eye; to see that ultimately all relative positions may be decomposed into relative positions of subject and object.  
"These conclusions--that Figure is resolvable into relative magnitudes; that magnitude is resolvable into relative positions; and that all relative positions may finally be reduced to positions of subject and object--will be fully confirmed on considering the process by which the space-attributes of body become known to a blind man. He puts out his hand and touching something, thereby becomes cognizant of its position with respect to himself. He puts out his other hand, and meeting no resistance above or on one side of the position already found, gains some negative knowledge of the thing's magnitude--a knowledge which three or four touches on different sides of it serve to render positive. And then, by continuing to move his hands over its surface, he acquires a notion of its figure. What, then, are the elements out of which, by synthesis, his perceptions of magnitude and figure are framed? He has received nothing but simultaneous and successive touches. Each touch established a relation of position between his centre of consciousness and the point touched. And all he can know respecting magnitude and figure--that is, respecting the relative position of these points to each other--is necessarily known through the relative positions in which they severally stand to himself.  
"Our perceptions of all the space-attributes of body being thus decomposable into perceptions of position like that gained by a single act of touch; we have next to inquire what is contained in a perception of this kind. A little thought will make it clear that to perceive the position of anything touched, is really to perceive the position of that part of the body in which the sensation of touch is located. Whence it follows that our knowledge of the positions of objects, is built upon our knowledge of the positions of our members towards each other--knowledge both of their fixed relations, and of those temporary relations they are placed in by every change of muscular adjustment. That {156} this knowledge is gained by a mutual exploration of the parts--by a bringing of each in contact with the others--by a moving over each other in all possible ways; and that the motions involved in these explorations, are known by their reactions upon consciousness; are propositions that scarcely need stating. But it is manifestly impossible to carry the analysis further without analysing our perception of motion. Relative position and motion are two ideas of the same experience. We can neither conceive motion without conceiving relative position, nor discover relative position without motion. In the present, therefore, we must be content with the conclusion that, whether visual or tactual, the perception of every statical attribute of body is resolvable into perceptions of relative position which are gained through motion." (pp. 226--229.)  
In further prosecution of the analysis:  
"How do we become cognizant of the relative positions of two points on the surface of the body? Such two points, considered as coexistent, involve the germinal idea of Space. Such two points disclosed to consciousness by two successive tactual sensations proceeding from them, involve the germinal idea of Time. And the series of muscular sensations by which, when self-produced, these two tactual sensations are separated, involve the germinal idea of Motion. The questions to be considered then are--In what order do these germinal ideas arise? and--How are they developed?](56441.docx#chunk3583)

["... Taking for our subject a newly-born infant, let us call the two points on its body between which a relation is to be established, A and Z. Let us assume these points to be anywhere within reach of the hands--say upon the cheek. By the hypothesis, nothing is at present known of these points; either as coexisting in Space, as giving successive sensations in Time, or as being brought into relation by Motion. If, now, the infant moves its arm in such a way as to touch nothing, there is a certain vague reaction upon its consciousness--a sensation of muscular tension. This {157} sensation has the peculiarity of being indefinite in all its commencement; indefinite in its termination; and indefinite in all its intermediate changes. Its strength is proportionate to the degree of muscular contraction. Whence it follows that as the limb starts from a state of rest, in which there is no contraction; and as it can reach a position requiring extreme contraction only by passing through positions requiring intermediate degrees of contraction; and as the degrees of contraction must therefore form a series ascending by infinitesimal increments from zero; the sensations of tension must also form such a series. And the like must be the case with all subsequent movements and their accompanying sensations; seeing that, be it at rest or in action, a muscle cannot pass from any one state to any other without going through all the intermediate states. Thus, then, the infant, on moving its arm backwards and forwards without touching anything, is brought to what we may distinguish as a nascent consciousness--a consciousness not definitely divisible into states; but a consciousness the variations of which pass insensibly into each other, like undulations of greater or less magnitude. And while the states of consciousness are thus incipient--thus indistinctly separated, there can be no clear comparison of them; no thought, properly so called; and consequently no ideas of Motion, Time, or Space, as we understand them. Suppose, now, that the hand touches something. A sudden change in consciousness is produced--a change that is incisive in its commencement, and, when the hand is removed, equally incisive in its termination. In the midst of the continuous feeling of muscular tension, vaguely rising and falling in intensity, there all at once occurs a distinct feeling of another kind. This feeling, beginning and ending abruptly, constitutes a definite state of consciousness; becomes, as it were, a mark in consciousness. By similar experiences other such marks are produced; and in proportion as they are multiplied, there arises a possibility of comparing them, both in respect to their degrees and their relative positions; while at the same {158} time, the feelings of muscular tension being, as it were, divided out into lengths by these superposed marks, become similarly comparable; and so there are acquired materials for a simple order of thought. Observe, also, that while these tactual sensations may, when several things are touched in succession, produce successive marks in consciousness, separated by intervening muscular sensations, they may also become continually coexistent with these muscular sensations; as when the finger is drawn along a surface. And observe further, that when the surface over which the finger is drawn is not a foreign body, but some part of the subject's body, these muscular sensations, and the continuous tactual sensation joined with them, are accompanied by a series of tactual sensations proceeding from that part of the skin over which the finger is drawn. Thus, then, when the infant moves its finger along the surface of its body from A to Z, there are simultaneously impressed upon consciousness three sets of sensations--the varying series of sensations proceeding from the muscles in action; the series of tactual sensations proceeding from the points of the skin successively touched between A and Z; and the continuous sensation of touch from the finger-end.... As subsequent motions of the finger over the surface from A to Z always result in the like simultaneous sets of sensations, these, in course of time, become indissolubly associated. Though the series of tactual sensations, A to Z, being producible by a foreign body moving over the same surface, can be dissociated from the others; and though, if the cheek be withdrawn by a movement of the head, the same motion of the hand, with its accompanying muscular sensations, may occur without any sensation of touch; yet, when these two series are linked by the tactual sensation proceeding from the finger-end, they necessarily proceed together; and become inseparably connected in thought. Whence it obviously results that the series of tactual sensations A to Z, and the series of muscular sensations which invariably accompanies it when self-produced, serve as mutual equivalents; and being {159} two sides of the same experience, suggest each other in consciousness.](56441.docx#chunk3584)

["Due attention having been paid to this fact, let us go on to consider what must happen when something touches, at the same moment, the entire surface between A and Z. This surface is supplied by a series of independent nerve-fibres, each of which at its peripheral termination becomes fused into, or continuous with, the surrounding tissue; each of which is affected by impressions falling within a specific area of the skin; and each of which produces a separate state of consciousness. When the finger is drawn along this surface these nerve-fibres A, B, C, D . . . Z, are excited in succession; that is--produce successive states of consciousness. And when something covers, at the same moment, the whole surface between A and Z, they are excited simultaneously; and produce what tends to become a single state of consciousness. Already I have endeavoured to shew in a parallel case, how, when impressions first known as having sequent positions in consciousness are afterwards simultaneously presented to consciousness, the sequent positions are transformed into coexistent positions, which, when consolidated by frequent presentations, are used in thought as equivalent to the sequent positions.[f] ... As the series of tactual {160} impressions A to Z, known as having sequent positions in consciousness, are, on the one hand, found to be equivalent to the accompanying series of muscular impressions; and on the other hand, to the simultaneous tactual impressions A to Z, which, as presented together, are necessarily presented in coexistent positions; it follows that these two last are found to be the equivalents of each other. A series of muscular sensations becomes known as equivalent to a series of coexistent positions; and being habitually joined with it, becomes at last unthinkable without it. Thus, the relation of coexistent positions between the points A and Z (and by implication all intermediate points) is necessarily disclosed by a comparison of experiences: the ideas of Space, Time, and Motion, are evolved together. When the successive states of consciousness A to Z, are thought of as having relative positions, the notion of Time becomes nascent. When these states of consciousness, instead of occurring serially, occur simultaneously, their relative positions, which were before sequent, necessarily become coexistent; and there arises a nascent consciousness of space. And when these two relations of coexistent and sequent positions are both presented to consciousness along with a series of sensations of muscular tension, a nascent idea of Motion results.  
[Footnote f: "Objects laid upon the surface will come to be distinguished from each other by the relative lengths of the series they cover; or, when broad as well as long, by the groups of series which they cover. . . . By habit these simultaneous excitations, from being at first known indirectly by translation into the serial ones, will come to be known directly, and the serial ones will be forgotten: just as in childhood the words of a new language, at first understood by means of their equivalents in the mother tongue, are presently understood by themselves; and if used to the exclusion of the mother tongue, lead to the ultimate loss of it." We see that "a set of [nervous] elements may be excited simultaneously as well as serially; that so, a \_quasi\_ single state of consciousness becomes the equivalent of a series of states; that a relation between what we call coexistent positions thus represents a relation of successive positions, and that this symbolic relation being far briefer, is habitually thought of in place of that it symbolizes; and that, by the continued use of such symbols, and the union of them with more complex ones, are generated our ideas of . . . extension--ideas which, like those of the algebraist working out an equation, are wholly unlike the ideas symbolized, and which yet, like his, occupy the mind to the entire exclusion of the ideas symbolized."--(pp. 222--224.)]  
"The development of these nascent ideas, arising as it does from a still further accumulation and comparison of experiences, will be readily understood. What has been above described as taking place with respect to one relation of coexistent positions upon the surface of the skin--or rather, one {161} linear series of such coexisting positions, is, during the same period, taking place, with respect to endless other such linear series, in all directions over the body. The like equivalence between a series of coexistent impressions of touch, a series of successive impressions of touch, and series of successive muscular impressions, is being established between every pair of points that can readily be brought into relation by movement of the hands. Let us glance at the chief consequences that must ultimately arise from this organization of experiences.  
"Not only must there gradually be established a connection in thought between each particular muscular series, and the particular tactual series, both successive and simultaneous, with which it is associated; and not only must there, by implication, arise a knowledge of the special muscular adjustments required to touch each special part, but, by the same experiences, there must be established an indissoluble connection between muscular series in general and series of sequent and coexistent positions in general, seeing that this connection is repeated in every one of the particular experiences. And when we consider the infinite repetition of these experiences, we shall have no difficulty in understanding how their components become so consolidated, that even when the hand is moved through empty space, it is impossible to become conscious of the muscular sensations, without becoming conscious of the sequent and coexistent positions--the Time and Space, in which it has moved.](56441.docx#chunk3585)

["Observe again, that as, by this continuous exploration of the surface of the body, each point is put in relation not only with points in some directions around it, but with points in all directions--becomes, as it were, a centre from which radiate lines of points known first in their serial positions before consciousness, and afterwards in their coexistent positions--it follows, that when an object of some size, as the hand, is placed upon the skin, the impressions from all parts of the area covered being simultaneously presented to consciousness, are placed in coexistent positions before {162} consciousness: whence results an idea of the superficial extension of that part of the body. The idea of this extension is really nothing more than a simultaneous presentation of all the impressions proceeding from the various points it includes, which have previously had their several relative positions measured by means of the series of impressions separating them. Any one who hesitates respecting this conclusion, will, I think, adopt it, on critically considering the perception he has when placing his open hand against his cheek--on observing that the perception is by no means single, but is made up of many elements which he cannot think of altogether--on observing that there is always one particular part of the whole surface touched, of which he is more distinctly conscious than of any other--and on observing that to become distinctly conscious of any other part, he has to traverse in thought the intervening parts; that is, he has to think of the relative positions of these parts by vaguely recalling the series of states of consciousness which a motion over the skin from one to the other would involve." (pp. 257--263).  
These three different expositions of the origin of our ideas of Motion and Extension, by three eminent thinkers, agreeing in essentials, and differing chiefly in the comparative degrees of development which they give to different portions of the detail, will enable any competent reader of such a work as the present to fill up any gaps by his own thoughts. Many pages of additional commentary might easily be written; but they would not add any important thought to those of which the reader is now in possession; and belonging rather to the polemics of the subject than to its strictly scientific exposition, they would jar somewhat with the purely expository character of the present treatise.  
I will only further recommend to particular attention, the opinion of Mr. Spencer, also adopted by Mr. Bain, that our ascribing simultaneous existence to things which excite successive sensations, is greatly owing to our being able to vary or reverse the order of the succession. When we pass our hands {163} over an object, we can have the tactual and muscular sensations in many different orders, and after having them in one order, can have them in another exactly the reverse. They do not, therefore, become associated with each other in a fixed order of succession, but are called up in any order with such extreme rapidity, that the impression they leave is that of simultaneousness, and we therefore hold the parts of tangible objects to be simultaneous.--\_Ed.\_]  
  
{164} SECTION VII.  
IDENTITY.  
  
There is one other term, which still requires explanation; and that is, IDENTITY, about which there would not have appeared any difficulty, had it not been for Personal Identity; which is, indeed, a complicated case, and, of course, involves the obscurity which great complexity implies.  
We have already seen, on what account we use the marks, same, and different, when we apply them to two simple sensations, or when we apply them to two ideas, simple, or complex. In these cases, the terms are relative terms, and name the objects in pairs.  
There is another case, that which now it is our business to explain, in which the name is not applied to two objects, but to the same object, at two different times. Thus it is, that I say, The bridge at Westminster, by which I crossed the Thames thirty years ago, is the same by which I crossed it yesterday. The crown which was placed on the head of George IV. at his coronation, is the same by which the kings of England have been crowned for many centuries. The words which we read in the Gospel of Matthew, are the same which were written by that evangelist. The words which we read in the poem called the AEneid are the same which were written by the poet Virgil. The church which is now at Loretto, is the same with that which belonged to the Virgin Mary at Nazareth, which in the month of May, in the year 1291, was {165} carried through the air by Angels, from Galilee to Tersato, in Dalmatia; and again on the 10th of December, 1294, about midnight, by what conveyance is not known, was set down in a wood in Italy, in the district of Ricanati, about a thousand paces from the sea.  
It is evident, from the contemplation of these instances, which might be multiplied to any extent, that the word SAME, in this mode of applying it, is merely the name of a certain case of Belief: a belief which, in some of the instances, is, memory; in some, is grounded upon testimony; in some, upon circumstantial evidence; and, in some, upon both testimony and circumstances. Thus, the case of belief respecting Westminster-bridge, which I mark by the word, same, is Memory. The cases of belief respecting the crown of England, respecting the words of the gospel, respecting the church of Loretto, marked respectively by the word same, are founded on testimony, joined with circumstances.  
As we have already shewn wherein Belief, in all its cases, consists, we have implicitly afforded the exposition of Identity. From same, the concrete, comes, in the usual way, sameness, the abstract, dropping only the connotation of the concrete. And Identity and Sameness are equivalent terms.](56441.docx#chunk3586)

[From the importance, however, which has been attached to these words, it seems necessary to shew to the learner, somewhat more particularly, the mode of tracing the simple ideas composing the clusters which they are employed to mark.  
The Lily, when it produces its brilliant flower in summer, I call the same, with the plant which began {166} to shew itself above the surface of the ground, in spring, from a bulb, which I had planted in a particular spot of my garden. I also called it the same, from one day to another, though changing every day in its size, and other appearances, from its germination to the present time. For what reason have I done so? On account of certain circumstances, which every body can enumerate; its rising from a certain root; the uninterrupted continuity, by means of the stalk, between the root and the other parts of the plant; its being always found in the same place, that is, in the same synchronous order with certain other things; its corresponding with other plants, the growth of which I have observed, and so on. If it had grown in a flower pot, and been transferred from one to another, the enumeration of the circumstances would have been different; the evidence of its having grown from the same root would have been drawn from other circumstances. When I say, then, that the Lily I see, with its flowers in July, is the same with the Lily just emerging from the ground in April, I only express my belief of its having sprung from a certain root, and of its having vegetated, in connexion with that root, in the way of the plants grouped in the class called Lily.  
I have a male Calf, of singular beauty, produced from my cow. I observe him from day to day. From day to day I call him the Same; and I do so when he has grown a bull of the greatest size. When I do so, I merely express my belief in a certain train of antecedents and consequents, with which experience has rendered me familiar. There is a certain train of antecedents and consequents, known to me by {167} observation, which I call the birth, growth, maturity; and, in one word, the Life, of the animal. The birth, growth, and maturity of one animal, is one series of successions; the birth, growth, and maturity of another animal, is another series of successions. When I apply the name Same, then, to any animal, I merely express my belief, that my present sight of the animal is part of a particular series, of which that perception is the last link.  
The case, it will not be doubted, is perfectly analogous, when I transfer the term from one of the lower animals to one of my fellow men. The birth, infancy, childhood, youth, manhood, of a human being, are names for different parts of a certain series of antecedents and consequents. This series is known to me by experience; that is, by sensation, by memory, and other cases of association. The life of one man is one series. The life of another man is another series. When I say, then, that a man is the same, I merely express my belief in one of those series; belief that the particular man, of the present instant, is the last link of such and such a chain, and not of any other.  
It is, however, to be observed, that the chain, thus believed, and the evidence upon which it is believed, are different things; and that this evidence is different in different cases. In the case of a person whom I have lived with from his birth, and seen every day, the evidence, to a great degree, is sense and memory. Sometimes the sameness of an individual is proved in a court of justice, by evidence, such as is applicable to any other matters of fact; by written documents, marks on the body, articles of property found {168} with the child, and the testimony of those whose knowledge has been uninterrupted from one time to another.  
It is not to be doubted, that when I transfer the word Same, from another man to myself, all that I do is to express my belief in one of those series; and the only difference in the case is, that it is a series of which I have evidence of a very particular kind, and of which many parts are known to me, which can be known to nobody else.  
As far as memory reaches, the evidence, in regard to myself, is memory and sensation. In the case of Evidence by memory and sensation, we have observed a peculiarity, necessary to be remembered, that the Evidence, and the Belief, are not different things, but the same thing. The memory which I have of my own existence, that is, the memory of a certain train of antecedents and consequents, is the Belief of them; on account of which belief, I apply to myself the term same, in the same way as I apply it to any other of my fellow men.](56441.docx#chunk3587)

[But I apply the term same to myself beyond the point to which memory reaches; as far back, in short, as to other men. This is true: I believe, that a train of antecedents and consequents, corresponding to that which forms the existence of other men, has also formed my existence. Part of this train I believe, by consciousness, memory. Part, namely, that which precedes memory, I believe on other evidence. What that evidence is, it is not difficult to see. We have, in the first place, the evidence of testimony; namely, that of all the persons who knew us from our birth, to the time to which memory extends. We have next {169} the evidence of what happens in the existence of all other men; or that case of association which unites inseparably the idea of like antecedents with like consequents.  
It may be said, however, that my belief in the Identity of other men, is a very different thing from belief in my own Identity; and that the foregoing exposition does not sufficiently account for the difference which every one remarks between them.  
The foregoing exposition, when duly attended to, will be found to account completely for the difference. We have remarked, that the evidence which I have for a great part of the series, in the case of other men, and of myself, is remarkably different. In the case of other men, it consists of observation and memory; in the case of myself, it consists of consciousness and memory. In these several and respective circumstances, Observation, and Consciousness, the distinction wholly consists. The memory of a chain of facts observed, is the evidence in the one case. The memory of a chain of states of Consciousness, is the evidence in the other.  
I doubt not that this, without further analysis, will be seen by many of my readers to be a complete solution of the question. It may, however, be still objected, that we resolve observation itself into states of consciousness; and, if so, that the memory of a chain of states of Consciousness, is the evidence in both cases.  
This brings us to the very bottom of the matter. Every body recognises, at once, that the memory of a state of consciousness, and the memory of something {170} observed, are two distinct things; that the memory, for example, of one of my own sensations, and the memory of an outward fact, as of the death of my father, are specifically different: or, to take two cases still easier perhaps to distinguish; no one will say, that the memory of one's own pain is any thing like the same state of consciousness with the memory of seeing another man in pain. In the one case, the state of consciousness remembered is the pain itself; in the other it is the sensations of sight or hearing, which indicated to me the pain of the other man, or called up the idea of his pain by association. In the one case, the memory is memory of my own sensations purely; in the other case, it is the memory of my sensations, as the evidence only of outward things.  
Each of the terms, therefore, I, Thou, He, marks a particular chain of antecedents and consequents, terminating with the I, the Thou, the He, of the present moment. The I, the Thou, the He, of the present moment, is marked, by these terms, \_primarily\_; the preceding links are marked, \_secondarily\_, that is, connoted. When I say, "I, Thou, or He, did any thing," it is the I, the Thou, the He, of the moment spoken of, that is specially noted. The rest of the chain is not particularly adverted to, except when there is particular occasion for it.  
Since the I, the Thou, the He, stand for the names of three men, and equally denote the antecedents and consequents, forming what is familiarly called the thread of life, of each of those individuals; how does it happen, that the idea, which is called up by the term I, appears to be so different, from that which is {171} called up by the term Thou, or any term denoting the vital chain of any other man?  
In what has been already stated, is found the answer. In that chain of antecedents and consequents which I mark by the term "same man," two species of things are included; 1. The antecedents and consequents which form the successive states of his body; 2. The successive states of his consciousness.](56441.docx#chunk3588)

[In knowing the antecedents and consequents, which form the successive states of my own body and of that of another man, the mode, though in some respects different, is, in so many respects, the same, that it does not here require explanation. But the mode of knowing the successive states of my own consciousness, and of those of other men, is totally different; and in this consists the peculiarity which appears to belong to the idea which I annex to the term I, or myself. The knowledge of my own states of consciousness is consciousness itself, for the present moment, and memory of that consciousness for all the past. Of the states of consciousness of other men, I have no direct knowledge. I draw my belief of them only from signs. These signs, too, are significant only by reference to my own states of consciousness. Certain things cognizable by my senses, are accompanied in myself by certain states of consciousness, single, or in trains. These objects of sense (sights, sounds, &c.) are closely associated with the ideas of those states of consciousness. When presented to me, therefore, as objects of sense to other men, they excite the ideas of those states of consciousness; and hence what I call my knowledge and belief of the mental trains of other men. It is not necessary to go further in the {172} analysis. It is very obvious, that two complex ideas must be different, which are formed in these different ways; nor is any thing more necessary to account for the difference between the idea annexed to the pronoun I, and that annexed to the pronoun Thou.[33]  
[Editor's footnote 33: The author has avoided an error in the mode and order of the enquiry, which has greatly contributed to make the explanations given by psychologists of Personal Identity, so eminently unsatisfactory as they are. Psychologists have almost always begun with the most intricate part of the question. They have set out by enquiring, what makes me the same person to myself? when they should first have enquired what makes me the same person to other people? or, what makes another person the same person to me? The author of the Analysis has done this, and he easily perceived, that what makes me the same person to others, is precisely what makes a house, or a mountain, the same house or mountain to them to-day which they saw yesterday. It is the belief of an uninterrupted continuity in the series of sensations derivable from the house, or mountain, or man. There is not this continuity in the actual sensations of a single observer: he has not been watching the mountain unintermittedly since yesterday, or from a still more distant time. But he believes, on such evidence as the case affords, that if he had been watching, he should have seen the mountain continuously and unchanged during the whole intervening time (provided the other requisites of vision were present--light to see it by, and no cloud or mist intervening): and he further believes that any being, with organs like his own, who had looked in that direction at any moment of the interval during which he himself was not looking, would have seen it in the same manner as he sees it. All this applies equally to a human object. I call the man I see to-day the same man whom I saw yesterday, for the very reason which makes me call the house or the mountain the same, viz., my conviction that if my organs had been in the {173} same position towards him all the time as they are now, and the other conditions necessary for seeing had been present, my perception of the man would have continued all the time without interruption.  
If we now change the point of view, and ask, what makes me always the same person to myself, we introduce, in addition to what there was in the other case, the entire series of my own past states of consciousness. As the author truly says, the evidence on which I accept my own identity is that of memory. But memory reaches only a certain way back, and for all before that period, as well as for all subsequent to it of which I have lost the remembrance, the belief rests on other evidence. As an example of the errors and difficulties in which psychologists have involved themselves by beginning with the more complex question without having considered the simpler one, it is worth remembering that Locke makes personal identity consist in Consciousness, which in this case means Memory; and has been justly criticised by later thinkers for this doctrine, as leading to the corollary, that whatever of my past actions I have forgotten, I never performed--that my forgotten feelings were not my feelings, but were (it must therefore be supposed) the feelings of somebody else. Locke, however, had seen one part of the true state of the case; which is, that to \_myself\_ I am only, properly speaking, the same person, in respect of those facts of my past life which I remember; but that I nevertheless consider myself as having been, at the times of which I retain no remembrance, the same person I now am, because I have satisfactory evidence that I was the same to other people; that an uninterrupted continuity in the sensations of sight and touch caused or which could have been caused to other people, existed between my present self and the infant who I am told I was, and between my present self and the person who is proved to me to have done the acts I have myself forgotten.](56441.docx#chunk3589)

[These considerations remove the outer veil, or husk, as it were, which wraps up the idea of the Ego. But after this is removed, there remains an inner covering, which, as far as I can perceive, is impenetrable. My personal identity consists {174} in my being the same Ego who did, or who felt, some specific fact recalled to me by memory. So be it: but what is Memory? It is not merely having the idea of that fact recalled: that is but thought, or conception, or imagination. It is, having the idea recalled along with the Belief that the fact which it is the idea of, really happened, and moreover happened to myself. Memory, therefore, by the very fact of its being different from Imagination, implies an Ego who formerly experienced the facts remembered, and who was the same Ego then as now. The phenomenon of Self and that of Memory are merely two sides of the same fact, or two different modes of viewing the same fact We may, as psychologists, set out from either of them, and refer the other to it. We may, in treating of Memory, say (as the author says) that it is the idea of a past sensation associated with the idea of myself as having it. Or we may say, in treating of Identity, (as the author also says), that the meaning of Self is the memory of certain past sensations. But it is hardly allowable to do both. At least it must be said, that by doing so we explain neither. We only show that the two things are essentially the same; that my memory of having ascended Skiddaw on a given day, and my consciousness of being the same person who ascended Skiddaw on that day, are two modes of stating the same fact: a fact which psychology has as yet failed to resolve into anything more elementary.  
In analysing the complex phenomena of consciousness, we must come to something ultimate; and we seem to have reached two elements which have a good prima facie claim to that title. There is, first, the common element in all cases of Belief, namely, the difference between a fact, and the thought of that fact: a distinction which we are able to cognize in the past, and which then constitutes Memory, and in the future, when it constitutes Expectation; but in neither case can we give any account of it except that it exists; an inability which is admitted in the most elementary case of the distinction, viz. the difference between a present sensation and an idea. Secondly, in addition to this, and setting out from the belief {175} in the reality of a past event, or in other words, the belief that the idea I now have was derived from a previous sensation, or combination of sensations, corresponding to it, there is the further conviction that this sensation or combination of sensations was my own; that it happened to myself. In other words, I am aware of a long and uninterrupted succession of past feelings going as far back as memory reaches, and terminating with the sensations I have at the present moment, all of which are connected by an inexplicable tie, that distinguishes them not only from any succession or combination in mere thought, but also from the parallel successions of feelings which I believe, on satisfactory evidence, to have happened to each of the other beings, shaped like myself, whom I perceive around me. This succession of feelings, which I call my memory of the past, is that by which I distinguish my Self. Myself is the person who had that series of feelings, and I know nothing of myself, by direct knowledge, except that I had them. But there is a bond of some sort among all the parts of the series, which makes me say that they were feelings of a person who was the same person throughout, and a different person from those who had any of the parallel successions of feelings; and this bond, to me, constitutes my Ego. Here, I think, the question must rest, until some psychologist succeeds better than any one has yet done in shewing a mode in which the analysis can be carried further.--\_Ed.\_]  
  
  
  
{176} CHAPTER XV.  
REFLECTION.  
  
SO much use has been made of the word REFLECTION, and results of so much importance have been referred to it, that it is necessary to shew what state of Consciousness it denotes, in all the possible acceptations of it.  
Mr. Locke defines it, "That notice which the mind takes of its own operations."  
When we have a sensation, we have already seen, on various occasions, that the having the state of consciousness, and taking notice of it, are not two things, but one and the same thing. When we say that one sensation is more attended to than another, this, as we shall see hereafter, is really tantamount to saying, that the one is more a sensation than the other.  
In like manner, when we have an idea; the having the idea, the being conscious of the idea, knowing the idea, observing the idea, are only different names for the same thing. They mean the being conscious in a particular way. But the being conscious is to take notice of the consciousness. To be conscious, and not to take notice, is the same thing as to be {177} conscious, and not conscious. The notice is the consciousness, and the consciousness is the notice.](56441.docx#chunk3590)

[Thus far, therefore, it appears, with abundant evidence that Reflection is nothing but Consciousness; and Consciousness is the having the sensations and ideas. But what will be objected is, that we not only have Ideas; but we are capable of forming the idea of that particular state of mind which exists when we have an idea. It requires a close examination, to discover what is really meant by the language in which this objection is conveyed. The thing, however, to which it imperfectly points, can be made out; though, from the imperfection of the language which we must employ, it is not easy to explain it, with a certainty of being understood.  
When it is said, that we can not only have a particular idea, but can form an idea of that state of mind, generally, which is called having an idea; this can mean nothing but the distinction between the particular and the general idea. It is affirmed, that we can not only have this idea, and that idea, but we can have the general idea of all ideas. This is true. But we know, by previous elucidations, what all this means. We can have the idea not only of this man, or that man, but we can have the idea of men in general. That is to say, we can group all individuals of a certain description into one class, to which class we give a name, equally applicable to every individual; which name, accordingly, being associated equally with individuals indefinite in number, calls up the ideas of individuals, indefinite in number, on every application of it.  
This points out a double meaning of the word Idea; from which all the confusion of the language {178} about REFLECTION seems to have been derived. The same word, Idea, is both the \_particular\_, and the \_general\_ name. It cannot be disputed, that so far as regards individual Ideas, the having an idea, and knowing it, the being in the state of consciousness, and knowing the state of consciousness, are one and the same thing. And, if the being in a state of consciousness, and knowing it, does not express all that is meant by reflecting upon it (where reflecting is not used in another sense, as equivalent with remembering), it will remain for those who believe there is anything more, to shew what it is.  
That the general is derived from the particular, there will be no hesitation in allowing. The fact, therefore, so imperfectly stated, is, that, from individual states of consciousness, we rise, by generalization, as in other cases, to the general idea which embraces a class. General Ideas, on account of their complexity, are all apt to appear, to persons little accustomed to examine them closely, more or less mysterious. But general ideas, not of the steady objects of sense, but the fleeting states of consciousness, which we have so little under command, and for the naming of which we are so ill provided with terms, cannot fail to appear mysterious in a much greater degree. What we are now, therefore, contemplating is a case of generalization, which, how certainly soever, from the common laws of the human mind, we know that it is made, it is far from easy distinctly to conceive. And those of my readers, who have followed me easily in this deduction, may be satisfied they have made no slight progress in metaphysical science.  
{179} It is evident, when all this is clearly understood, that what has been mysteriously set forth, under the name of an Idea of REFLECTION, is simply the generalization of particular states of consciousness; which particular states of consciousness are our sensations and ideas.  
There are various cases of this generalization, some more, some less, extensive.  
In the same manner as we generalize the having of a single idea; and conceive, not the having of this idea, or that idea, but the having of any idea, and all ideas; we also generalize the having two associated ideas, and, from particulars, mount up to the general idea of the association, or train, of ideas.  
It is needless to be particular in referring to the specific cases. We have seen what combination of ideas constitutes the case of memory. Individual instances of memory are generalized; these peculiar combinations are viewed as a class; hence the general idea, and general name of the class.  
The explanation is obviously the same, in other cases, as Judgment, Reasoning, Belief, Willing. We know what is the particular case of association on which each of these names is bestowed. We know what is the state of consciousness, on each individual occasion of Judging, Reasoning, and so forth. Generalization is performed. The particular instances are viewed as composing a class. The Idea of the class is the Idea of Reflection.[34]  
[Editor's footnote 34: To reflect on any of our feelings or mental acts is more properly identified with \_attending\_ to the feeling, than, (as stated in the text) with merely having it. The author scarcely {180} recognises this as a difference. He sometimes indeed seems to consider attention as mental repetition; but in his chapter on the Will, we shall find that he there identifies attending to a feeling with merely having the feeling. I conceive, on the contrary, (with the great majority of psychologists) that there is an important distinction between the two things; the ignoring of which has led the author into errors. What the distinction is, I have endeavoured to shew in my note to the chapter on Consciousness; and the subject will return upon us hereafter.--\_Ed.\_]  
  
  
  
{181} CHAPTER XVI.  
THE DISTINCTION BETWEEN THE INTELLECTUAL AND ACTIVE POWERS OF THE HUMAN MIND.](56441.docx#chunk3591)

["It is the greatest triumph of philosophy to refer many, and seemingly very various, phenomena, to one, or a very few, simple principles: and the more simple and evident such a principle is, provided it be truly applicable to all the cases in question, the greater is its value and scientific beauty."--\_Elements of Logic\_, \_by Dr. Whately\_, p. 32.  
THE Phenomena of Thought have long appeared to be divisible into two great classes; which were distinguished by the names, the one of the Intellectual, the other of the Active, Powers of the Human Mind. In the phenomena which compose the first of those classes, and which we have now pretty completely surveyed, the sensations and ideas are considered merely as existing. In the phenomena which compose the second of the two classes, the sensations and ideas are to be considered as not merely existing, but also as exciting to action.[35]  
[Bain's footnote 35: Instead of "The phenomena of \_Thought\_," substitute the phenomena of Mind, the Subject, or the Subject Consciousness. The use of the word "Thought" seems to justify an opinion held by Hamilton and by the German philosophers, that thought, or the cognitive function is the basis of mind, instead of being co-ordinate with the other leading functions (Feeling and Will.) There is no evidence elsewhere that the author shares this opinion.  
The defectiveness of the two-fold classification of the mind, which seems to have descended from Aristotle, and is only in the present generation supplanted by an explicitly worked-out triple division, is especially apparent in the handling of all the succeeding chapters of the present work. The Will, or the activity of the system, is spoken of as set on indiscriminately by "sensations and ideas;" which, as will be seen, is to mix together a number of entirely distinct processes.  
There is no adequate separation of the emotional part of a Sensation, from its intellectual or knowledge-giving part. The same confusion extends to the word "idea," which, without premonition, is employed for the memory of pleasures and pains, and for the memory of sensations of the intellectual or knowledge-giving kind. There is, as might be expected, an insufficient treatment of the special forms of Emotion; there being no basis laid for their exhaustive or natural classification.--\_B.\_]  
{182} With respect to the sensations and ideas which compose the phenomena of the first class, we have observed, that they are apt to be formed into clusters of more or less complexity; and that they follow one another, in trains, according to certain laws.  
The sensations and ideas, which compose the phenomena of the second class, are equally formed into clusters, with those composing the phenomena of the former class; and follow one another, in trains, according to the same laws.  
So far, the two classes of phenomena agree; and so far, the analysis, which we have endeavoured to effect of the former class, is to be taken as the analysis also of the latter. Our object, now, is, to trace to their {183} source the differences which constitute this a separate class; to mark the subdivisions into which it can be most conveniently distributed; and to demonstrate the simple laws, into which the whole phenomena of human life, so numerous, and apparently so diversified, may all be easily resolved.  
  
  
  
{184} CHAPTER XVII.  
PLEASURABLE AND PAINFUL SENSATIONS.  
  
THERE is a remarkable difference of sensations, which has been mentioned before, but which must now be more particularly attended to.  
Some sensations, probably the greater number, are what we call indifferent. They are not considered as either painful, or pleasurable. There are sensations, however, and of frequent recurrence, some of which are painful, some pleasurable. The difference is, that which is felt. A man knows it, by feeling it; and this is the whole account of the phenomenon. I have one sensation, and then another, and then another. The first is of such a kind, that I care not whether it is long or short; the second is of such a kind that I would put an end to it instantly if I could; the third is of such a kind, that I like it prolonged. To distinguish those feelings, I give them names. I call the first Indifferent; the second, Painful; the third. Pleasurable; very often, for shortness, I call the second, Pain, the third, Pleasure.  
We formerly shewed, that having a sensation and {185} knowing it, are not two things, but one and the same thing; that having two sensations and knowing them, are not two things, but one and the same thing. It is obvious, therefore, that having three sensations, an Indifferent, a Pleasurable, and a Painful, and knowing them for what they are, are not different things, but one and the same thing.  
The pleasurable and painful sensations are common to all the senses. We have pleasures and pains of the eye, of the ear, of the touch, the taste, the smell, and also of many internal parts of the body, for which, though, as we shall presently see, they hold a great share in composing the springs of human action, we have not names, nor any means of accurate estimation.[36]](56441.docx#chunk3592)

[[Editor's footnote 36: In the case of many pleasurable or painful sensations, it is open to question whether the pleasure or pain, especially the pleasure, is not something added to the sensation, and capable of being detached from it, rather than merely a particular aspect or quality of the sensation. It is often observable that a sensation is much less pleasurable at one time than at another, though to our consciousness it appears exactly the same sensation in all except the pleasure. This is emphatically the fact in cases of satiety, or of loss of taste for a sensation by loss of novelty. It is probable that in such cases the pleasure may depend on different nerves, or on a different action of the same nerves, from the remaining part of the sensation. However this may be, the pleasure or pain attending a sensation is (like the feelings of Likeness, Succession, &c.) capable of being mentally abstracted from the sensation, or, in other words, capable of being attended to by itself. And in any case Mr. Bain's distinction holds good, between the emotional part or property of a sensation (in which he includes the {186} pleasure or pain belonging to it) and its intellectual or knowledge-giving part. It must be remembered, however, that these are not exclusive of one another; the knowledge-giving part is not necessarily emotional, but the emotional part is and must be knowledge-giving. The pleasure or pain of the feeling are subjects of intellectual apprehension; they give the knowledge of themselves and of their varieties.--\_Ed.\_]  
  
  
  
{187} CHAPTER XVIII.  
CAUSES OF THE PLEASURABLE AND PAINFUL SENSATIONS.  
  
NEXT in order to the Pleasurable and Painful Sensations, it is necessary to take notice of the causes of them. We can generally trace them to certain constant antecedents; and it is evidently of the greatest importance to us to be able to do so; as it is by those means only, we can lessen the number of the painful sensations, increase the number of the pleasurable.  
Of the causes of our Pleasurable and Painful Sensations, it is necessary to distinguish two classes; first, the immediate causes; secondly, the remote causes; a remote, being not, strictly speaking, the cause of the sensation, but the cause of that cause. Thus, the lash of the executioner is the immediate cause of the pain of the criminal. The sentence of the Judge, is the cause of that cause. The sound of the violin is the immediate cause of the pleasure of my ear; the performance of the musician, the cause of that sound; the money with which I have hired the musician, the cause of that performance. The money is, in this case, the cause of the cause of the cause of the sensation; or the cause, at two removes.  
{188} It is necessary to be remarked, respecting the causes of our pleasurable and painful sensations, that, they are apt to become greater objects of concern to us, to rank higher in importance, than the sensations themselves. It is a vulgar observation, with respect to money, for example, that, though useful only for obtaining pleasure, or saving from pain, it is often employed for neither purpose, but hugged as a good in itself.  
The importance attached to the cause of the sensation, is a case of association easy to be traced. The pleasurable and painful sensations themselves are, specifically, not numerous. The causes of them, on the other hand, are exceedingly numerous, and diversified. Again; the mind is not much interested in attending to the sensation. The sensation provides for itself. The mind, however, is deeply interested in attending to the cause; that we may prevent, or remove it, if the sensation is painful; provide, or detain it, if the sensation is pleasurable. This creates a habit of passing rapidly from the sensation, to fix our attention upon its cause.  
  
  
  
{189} CHAPTER XIX.  
IDEAS OF THE PLEASURABLE AND PAINFUL SENSATIONS, AND OF THE CAUSES OF THEM.  
  
WE have already seen, that all sensations are capable of being revived, without that action on the organs of sense which originally produced them; and that, when so revived, we call them ideas or copies of the sensations.  
The sensations which are pleasurable and painful, are revived in the same manner as those which are indifferent; but, as the sensations which are pleasurable and painful form a class of sensations remarkably distinguished from sensations of the indifferent class, the ideas of the pleasurable and painful sensations form a class of ideas, no less remarkably distinguished from the ideas of the indifferent sensations.  
It is necessary to endeavour by a particular effort to distinguish accurately from all other feelings that peculiar state of consciousness, which we call the idea of a pleasurable or painful sensation; in other words, that sensation revived, after the operation upon the senses has ceased.  
This state of consciousness, like other states, is known only by having it. What it is felt to be, it is. {190} We can afford, therefore, no aid to the reader in distinguishing it, otherwise than by using such expressions as seem calculated to fix his attention upon it. It is his own inward, invisible state, which only he can mark for himself.  
The idea of a pain or pleasure, is not a pain or pleasure. We do not say that the idea of the hand scalded is a pain, or the idea of a sweet smell is a pleasure. But this is not very satisfactory language; for it, in reality, means little more, than that the idea of a pleasurable or painful sensation, is not a sensation. That there are some trains of ideas, however, which it is agreeable to have, others which it is disagreeable, is one among the most familiar facts of our nature. There is, therefore, a distinction among ideas, analogous to that of pleasurable and painful among sensations.](56441.docx#chunk3593)

[It is difficult to think of any one sensation by itself; because each is so combined with others, that the idea of one can never present itself, but in company with more. This is peculiarly the case with sensations of the pleasurable and painful kinds: and hence the cause of the indistinctness, which seems to accompany the idea of any of those sensations, when we endeavour to take it apart, and consider what it is in itself.  
An idea is the revival of a former state of feeling. The first thing which I have to consider is, what is my precise state of consciousness, when I receive a pleasurable or painful sensation.  
When the sensation was present, suppose a painful one, it was a state of consciousness, so interesting to me, that it was important to find a mark for it. I {191} called it Pain. It is a state of consciousness known to every man by his having had it, and it can be known by no other means. We call it by various names; an odious state, a disagreeable state, and so on; but these are only several modes of marking what is felt, and tell to no man anything more than his feeling has told. Except for his own knowledge of his own feeling, the words would be utterly without a meaning.  
Such is the state of consciousness under the sensation. I revive the sensation.  
My state of consciousness under the sensation I called a pain. My state of consciousness under the idea of the pain, I call, not a pain, but an aversion. An aversion is the idea of a pain. Whatever is included under the term idea of pain, is included precisely under the term aversion. They are not two things, but two names for the same thing.  
The same explanation applies to the case of a pleasurable sensation. The state of consciousness under the sensation, that is, the sensation itself, differed from other sensations, in that it was agreeable. A name was wanted to denote this peculiarity; to mark, as a class, the sensations which possess it. The term, Pleasure, was adopted. I revive the sensation; in other words, have the idea; and as I had occasion for a name to class the sensations, I have occasion for a name to class the ideas. My state of consciousness under the sensation, I call a Pleasure: my state of consciousness under the idea, that is, the idea itself, I call a Desire. The term "Idea of a pleasure," expresses precisely the same thing as the term, Desire. It does so by the very import of the words. The {192} idea of a pleasure, is the idea of something as good to have. But what is a desire, other than the idea of something as good to have; good to have, being really nothing but desirable to have? The terms, therefore, "idea of pleasure," and "desire," are but two names; the thing named, the state of consciousness, is one and the same.  
There is an ambiguity, however, in the terms Aversion, and Desire, which contributes not a little to cast darkness upon this part of our inquiry.  
They are applied to the ideas of the Causes of our Pleasurable and Painful Sensations, as well as to the ideas of those Sensations; and, of course, in a different sense. We say we have an aversion to certain kinds of food, or certain drugs; we have a desire for water to drink, for fire to warm us, and so on.  
When we examine these phrases narrowly, we find that it is not literally, but by a sort of figure of speech, that the terms "Aversion," and "Desire," are applied to the Causes of Pains and Pleasures. Properly speaking, it is not to the food, or the drug, that we have the aversion, but to the disagreeable taste. The food is a substance of a certain colour, and consistence; so is the drug. There is nothing in these qualities which is offensive to us; only the taste. In like manner, it is not the water we desire, but the pleasure of drinking; not the fire we desire, but the pleasure of warmth.  
The illusion is merely that of a very close association. There is no case, indeed, of association, in which the union is more intimate, than that between the idea of a pungent sensation, and its customary cause; and hence, there is no wonder that the name {193} which properly belongs to the one, should be bestowed upon the other, or rather, that the name which belongs properly to one, should be given to the two, formed into a complex idea, in conjunction.](56441.docx#chunk3594)

[There is another source of perplexity, which arises from the connotative power of the terms Desire, and Aversion. They are Nouns, in the future tense; that is, they connote futurity; just as Verbs, in the future tense, connote futurity. Though the feeling, called the idea of a pleasurable sensation, is precisely the feeling called desirableness; desirableness, and the idea of something pleasurable, being convertible terms, the word Desire, whenever it is applied to a particular case, carries with it a tacit reference to future time. When the idea of a sensation is present, the sensation itself is not present. The sensation has been, or is to be. It is difficult, therefore, to have the idea of a pleasurable sensation, without the association of the past, or the future. The idea of a pleasurable sensation with the association of the Past, is never called Desire. The word Desire, is commonly used to mark the idea of a pleasurable sensation, when the Future is associated with it. The idea of a pleasurable sensation, to come, is what is commonly meant by Desire. We have, however, no other name to mark the idea, when it is considered by itself, and without reference to the past, or the future. In these cases, Desire, and the idea of a pleasurable sensation; Aversion, and the idea of a painful sensation, are convertible terms.  
From this exposition, it follows, that the number of our desires is the same with that of our pleasurable sensations; the number of our aversions, the same {194} with that of our painful sensations; just as the number of our simple ideas of sight, is the same with that of our sensations of sight; the number of our simple ideas of sound, taste, or smell, the same with that of our sensations of sound, taste, or smell.[37]  
[Editor's footnote 37: The principal doctrine of this chapter is, that Desire, and Aversion, are nothing but the idea of a pleasurable sensation, and the Idea of a painful sensation: which doctrine is then qualified by saying, that a desire is the idea of a pleasure associated with the future, an aversion the idea of a pain associated with the future.  
But according to the whole spirit of the author's speculations, and to his express affirmation in the beginning of the next chapter, the idea of any sensation associated with the future, constitutes the Expectation of it: and if so, it rested with him to prove that the expectation of a pleasure, or of a pain, is the same thing with the desire, or aversion. This is certainly not conformable to common observation. For, on the one hand, it is commonly understood that there may be desire or aversion without expectation; and on the other, expectation of a pleasure without any actual feeling of desire: one may expect, and even look forward with satisfaction to, the pleasure of a meal, although one is not, but only expects to be, hungry. So perfectly is it assumed that expectation, and desire or aversion, are not necessarily combined, that the case in which they are combined is signified by a special pair of names. Desire combined with expectation, is called by the name of Hope; Aversion combined with expectation, is known by the name of Fear.  
I believe the fact to be that desire is not Expectation, but is more than the idea of the pleasure desired, being, in truth, the initiatory stage of Will. In what we call Desire there is, I think, always included a positive stimulation to action; either to the definite course of action which would lead to our {195} obtaining the pleasure, or to a general restlessness and vague seeking after it. The stimulation may fall short of actually producing action: even when it prompts to a definite act, it may be repressed by a stronger motive, or by knowledge that the pleasure is not within present reach, nor can be brought nearer to us by any present action of our own. Still, there is, I think, always, the sense of a tendency to action, in the direction of pursuit of the pleasure, though the tendency may be overpowered by an external or an internal restraint. So also, in aversion, there is always a tendency to action of the kind which repels or avoids the painful sensation. But of these things more fully under the head of Will.--\_Ed.\_]  
  
  
  
{196} CHAPTER XX.  
THE PLEASURABLE AND PAINFUL SENSATIONS, CONTEMPLATED AS PASSED OR AS FUTURE.  
  
WE have considered, what the pleasurable and painful sensations are when present; what the ideas of them, considered as present, are; and what the ideas of their causes.  
Those sensations, however, together with their causes, we may contemplate, either as passed, or as future: and so contemplated, they give rise to some of the most interesting states of the human mind.  
To contemplate any feeling as Passed, is to remember it; and the explanation of Memory we need not repeat. To contemplate any feeling as Future, is merely a case of that Anticipation of the future from the passed, of which, also, we have already given the explanation.  
When my finger was in the flame of the candle and burned, the painful sensation was present. The state of consciousness, however, was complex, and consisted of several ingredients; the sight of the burning candle, the sight of my finger, the sense of a certain position or locality, namely, that of my {197} finger and the candle, the painful sensation, and the belief that it was my sensation; in other words, the association of that thread of consciousness in which, to me, my being consists, with the present sensation. The painful feeling was thus a feeling deeply imbedded among others.](56441.docx#chunk3595)

[When I remember this state of consciousness, the idea of it, which makes part of the memory, is by no means a simple idea. It is composed of the ideas of all the above-mentioned sensations, together with that of the train of consciousness, which I call myself. This last is necessary to constitute it \_my\_ idea. This idea, thus existing as my idea, and my present idea, is associated with that part of my train or thread of consciousness which has intervened, between the present state and the remembered state; and by this last association the idea becomes memory.  
The anticipation of the Future is the same series of association; with this difference, that, in memory, the association of the train of consciousness, which converts the idea into memory, is from consequent to antecedent, that is, backwards; the association in the case of anticipation is from antecedent to consequent, forwards.  
In anticipation, as in memory, there is, first, the complex idea, as above; next, the passage of the mind forwards from the present state of consciousness, the antecedent, to one consequent after another, till it comes to the anticipated sensation. Suppose, that, as a punishment, a man is condemned to put his finger after two days in the flame of a candle; wherein consists his anticipation? The complex idea, as described above, of the painful sensation, with all its {198} concomitant sensations and ideas, is the first part of the process. The remainder is the association with this idea of the events, one after another, which are to fill up the intermediate time, and terminate with his finger placed in the flame of the candle. The whole of this association, taken together, comprises the idea of the pain as his pain, after a train of antecedents.  
The process of anticipation is so precisely the same, when the sensation is of the pleasurable kind, that I deem it unnecessary to repeat it.[38]  
[Editor's footnote 38: This is the first place in which the author gives his analysis of Expectation; and his theory of it is, as all theories of it must be, the exact counterpart of the same person's theory of Memory. He resolves it into the mere Idea of the expected event, accompanied by the "idea of the events, one after another," which are to begin with the present moment, and end with the expected event. But in this case, as in that of Memory, the objection recurs, that all this may exist in the case of mere Imagination. A man may conceive himself being hanged, or elevated to a throne, and may construct in his mind a series of possible or conceivable events, through which he can fancy each of these results to be brought about. If he is a man of lively imagination, this idea of the events "which are to fill up the intermediate time" may be at least as copious, as the idea of the series of coming events for a year from the present time, which according to the author's theory I have in my mind when I look forward to commencing a journey twelve months hence. Yet he neither expects to be hanged, nor to be made a king, still less both, which, to bear out the theory, it would seem that he ought.  
The difference between Expectation and mere Imagination, as well as between Memory and Imagination, consists in the presence or absence of Belief; and though this is no explanation of either phenomenon, it brings us back to one and the same real problem, which I have so often referred to, and which neither the author nor any other thinker has yet solved--the difference between knowing something as a Reality, and as a mere Thought; a distinction similar and parallel to that between a Sensation and an Idea.--\_Ed.\_]  
{199} In contemplating a painful or pleasurable sensation as past, that is, remembering it, the mind is in general tranquil. The state is not, perhaps, a state of indifference; but it is not so far removed from it, as to call attention to itself, or require a name to mark it.  
The case is different, when the sensation is contemplated as future, or anticipated. The state of consciousness is then far removed from a state of indifference. It admits of two cases. One is, when the sensation is contemplated as certainly future; the other is, when it is contemplated as not certainly future.  
When a pleasurable sensation is contemplated as future, but not certainly, the state of consciousness is called Hope. When a painful sensation is contemplated as future, but not certainly, the state of consciousness is called Fear.[39]  
[Editor's footnote 39: The author's definitions of Hope and Fear differ from those offered in my note (p. 194). He considers these words to signify that the pleasure or the pain is contemplated as future, but without certainty. It must be admitted that the words are often applied to very faint degrees of anticipation, far short of those which in popular language would be spoken of as Expectation: but I think the terms are not inconsistent with the fullest assurance. A man is about to undergo a painful surgical operation. He has no doubt whatever about the event; he fully intends it; there are no other means, perhaps, of saving his life. Yet the feeling with which he looks forward to it, and with which he contemplates the preparations for it, are such as would, I think, by the custom of language, be designated as fear. Death, again, is the most certain of all future events, yet we speak of the fear of death. It is perhaps more doubtful whether the fully assured anticipation of a desired enjoyment would receive, in ordinary parlance, the name of Hope; yet some common phrases seem to imply that it would. We read even on tombstones "the sure hope of a joyful immortality."](56441.docx#chunk3596)

[A still more restricted application of the word Fear, also justified by usage, is to the case in which the feeling amounts to a disturbing passion; and to this meaning Mr Bain, as will be seen in a future note, thinks it desirable to confine it.--\_Ed.\_]  
{200} Again: When a pleasurable sensation is anticipated with certainty, we call the state of consciousness Joy. When a painful sensation is thus anticipated, we call it Sorrow. Neither of the two terms is good; because not confined to this signification. Both are applied to name other things, also, which we shall presently have occasion to notice. They are, therefore, a source of confusion.  
  
  
  
{201} CHAPTER XXI.  
THE CAUSES OF PLEASURABLE AND PAINFUL SENSATIONS, CONTEMPLATED AS PASSED, OR AS FUTURE.  
  
SECTION I.  
THE IMMEDIATE CAUSES OF PLEASURABLE AND PAINFUL SENSATIONS, CONTEMPLATED AS PASSED, OR AS FUTURE.  
  
BESIDE the Sensations, the Causes of them are capable of being contemplated, both as passed, and as future.  
It may be regarded as remarkable, that though the idea or thought of a disagreeable sensation, as passed, is nearly indifferent, the thought of the cause of a painful passed sensation is often a very interesting state of consciousness. This state of consciousness we sometimes call Antipathy, sometimes Hatred; though hatred, as we shall afterwards see, is more frequently the name of the Motive to which it gives birth. We have, however, but one concrete term for both of these abstracts, the verb "to hate," which, of course, performs its business ill. From this, however, it no doubt comes, that the word Hatred is often used as synonymous with Antipathy.  
{202} This is a case of association, which deserves a little attention. The idea of the cause of a painful sensation is so closely associated with that of the sensation, that the one never exists without the other. But this is not all. The anticipation of the future from the passed, is so strong an association, that, in interesting cases, it is indissoluble. The thought of the Cause of a passed painful sensation, is the idea of an antecedent and a consequent. The idea of the passed antecedent and consequent is instantly followed by that of a future antecedent and consequent; and thus the feeling partakes of the nature of the anticipation of a future painful sensation. The association may be but momentary, as it may instantly be checked by other associations. But, being momentary, it existed, and its existence is sufficient to account for the difference, which is often observable, between the state of consciousness when the sensation is remembered, and the state of consciousness when the cause of the sensation is remembered. When the sensation is remembered singly, there is not that association of a passed antecedent and consequent, which is instantly followed by that of a future antecedent and consequent of the same kind. That association takes place in the case of the remembered cause; and hence the difference, with which every man is acquainted.[40]  
[Editor's footnote 40: The difference here brought to notice between the very slight emotion excited in most cases by the idea of a past pain, and the strong feeling excited by the idea of the cause of a past pain, will be confirmed by every one's experience; and is rightly explained by the author, as arising from the fact that what has caused a past pain has an interest affecting the future, since it may cause future pains. It is noticeable that the author nowhere explains why the thought of a pain as future is so much more painful, than the thought of a past pain when detached from all apprehension for the future; why the expectation of an evil is generally so much worse than the remembrance of one. This fact might have made him doubt the sufficiency of his theory of Memory and Expectation; since, according to his analysis, neither of them is anything but the idea of the pain itself, associated in each case with a series of events which may be intrinsically indifferent; and if there were no elements in the case but those which he has pointed out, no sufficient reason is apparent why there should be any inequality of painfulness between the remembrance and the expectation.--\_Ed.\_]  
{203} The thought of the cause of a passed agreeable sensation or sensations, is also very often an interesting state of consciousness. It is called by the names both of Sympathy, and Love. Neither of the terms is confined to this signification; they are both, therefore, bad names, and a great cause of confusion of ideas; as we shall see in other instances hereafter.  
The pleasurable sensations not being so pungent as the painful, it but rarely happens that the immediate cause of a single passed pleasurable sensation is an object of interest: the cause of the cessation, however, of a painful sensation is so, not unfrequently. The traveller, who was ready to perish with thirst in the desert, can never afterwards think of the well which relieved him, without emotion.  
The states of consciousness which exist when we contemplate the causes of our painful and pleasurable sensations as \_Future\_, are easily analysed, after what has been shewn. It is a case of the anticipation of the future from the passed; with this peculiarity, that {204} the final antecedent and consequent are interesting, the one as a pleasurable or painful Feeling, the other as the cause of it.](56441.docx#chunk3597)

[If the anticipated sensation is painful, and contemplated as certain, the associated ideas of the cause and effect constitute a state of consciousness, which we mark by various forms of expression, but for which we have no appropriate name. We call it Hatred, we call it Aversion, we call it Horror. We call the object hateful, or disgusting, or loathsome, according to the nature of the anticipated sensation. When the sensation is contemplated as not certainly future, the state of mind is what we call Dread, in some one or other of its numerous modifications.  
When the cause of a pleasure is contemplated as certainly future, such object is associated with the feeling called Joy; when it is contemplated as not certainly future, it is associated with the feeling called Hope. What the feelings, Joy, and Hope, are, we have so recently seen, that it cannot be forgotten. In the association of the cause of a pleasure with both, the state of consciousness has no more appropriate name than that of Love. An object contemplated as a future cause of future pleasure, is an object \_loved\_, whether the anticipation is certain or uncertain.[41]  
[Bain's footnote 41: A distinction should be drawn between Aversion and Fear. We may be very much averse to a thing, and yet not fear it. A courageous person is not necessarily wanting in aversions or dislikes, or in labours for warding off what is disagreeable. Anything that gives us pain, when approaching or imminent, is viewed with aversion, and stimulates efforts of counteraction, or escape; and yet it may not inspire the state properly named Fear. The distinguishing characteristic of fear is an unhinging {205} excitement, a disturbance of the serenity and balance of the mind, inducing exaggerated, disproportioned or misplaced exertions. One of the causes of fear is approaching evil, but the effect does not always happen. The evil may work its proper effect upon the will, namely to prevent or evade it, without any of the perturbing accessories called being terrified or afraid.--\_B.\_]  
  
{206} SECTION II.  
THE REMOTE CAUSES OF PLEASURABLE AND PAINFUL SENSATIONS, CONTEMPLATED AS PAST, OR FUTURE.  
  
Before entering into the detail of this part of the subject, one important observation is to be made; that the remote causes of our Pains and Pleasures are apt to be objects, far more deeply interesting, than those which are immediate. This at first sight appears paradoxical. It is the necessary result, however, of the general Law of our nature.  
The immediate causes of our pleasurable and painful sensations have never any very extensive operation. The idea of any one is rarely associated with more than a limited number of pains or pleasures. Food, for example, the cause of the pleasures of eating; pleasures, perhaps, from the frequency with which they are repeated, and the portion of life over which they are spread, more valuable, as a class, than any other which we enjoy; has never appeared an object of sufficient interest, to make the affection with which it is regarded be thought worthy of a name. The idea of Food, though associated with pleasures which constitute so important a class, is associated with the pleasures but of one class: some of the remote causes are associated with the pleasures of almost every class. Money, for example, instrumental in procuring the causes of almost all our pleasures, and removing the {207} causes of a large proportion of our pains, is associated with the ideas of most of the pleasurable states of our nature. The idea of an object associated with a hundred times as many pleasures as another, is of course a hundred times more interesting.  
\* \* \* \* \*  
SUB-SECTION I.  
\_Wealth\_, \_Power\_, \_and Dignity\_, \_and their Contraries\_, \_Contemplated as Causes of our Pleasures and Pains\_.  
  
As among the remote causes of our pleasures and pains may be reckoned everything which in any way contributes to them, it follows that the number of such causes is exceedingly great. Of course it is only the principal cases which have been attended to, and classed under Titles. They are mostly comprehended under the following:--Wealth, Power, Dignity, as regards the pleasurable sensations;--Poverty, Impotence, Contemptibility, as regards the painful sensations. What our states of consciousness are, when we are said to contemplate these causes of pains and pleasures, with reference to ourselves, or as causes of our own pleasures and pains, we now proceed to inquire.  
One remarkable thing is first of all to be noticed: the three, above named, grand causes of our pleasures agree in this, that they all are the means of procuring for us the Services of our fellow-creatures, and themselves contribute to our pleasures in hardly any other way. It is obvious from this remark, that the grand {208} cause of all our pleasures are the services of our fellow-creatures; since Wealth, Power, and Dignity, which appear to most people to sum up the means of human happiness, are nothing more than means of procuring those services. This is a fact of the highest possible importance, both in Morals, and in Philosophy.  
That Wealth, Power, and Dignity do procure for us pleasurable sensations only by procuring for us the services of our fellow-creatures, a short illustration will suffice to shew.  
Wealth enables us either to purchase directly the services of other men, as of those whom we desire to have in attendance about us; or to purchase commodities; or, it adds to our Power and Dignity. As far as it purchases the services of others directly, the truth of what we have advanced is obvious. It is hardly less obvious, that when we purchase commodities, which are the fruit of other men's labour, we, in reality, do nothing but purchase the services of those men, who, in fact, were working for us, when working at the goods which we ultimately consume. In as far as Wealth adds to Power, and Dignity, it is included under those several heads.](56441.docx#chunk3598)

[A man's Power means the readiness of other men to obey him. Now one man obeys another, from the prospect, either of good if he obeys, or of evil if he does not obey. Wealth is the great means of procuring obedience, through the medium of good. All hire of services, is through that medium. The power of inflicting evil, in case of disobedience, and of procuring services by fear, is what in the more peculiar sense, is meant by the term Power. It is to be {209} observed, that the range of obedience, obtained by fear, is capable of much greater enlargement, than that which is obtained by hope. The means any man has of paying for the services of others, extends at most to some thousands; the means which some men have had of imposing their commands on other men, through fear, has extended to many millions.  
Dignity is a word of much more vague signification, than Wealth, or Power. It is, therefore, much more difficult, to describe clearly its mode of operation.  
Dignity, is commonly said to be that which procures us the respect of other men. But what is this respect? It is not a mere barren feeling in the mind of another man, regarded as wholly unconnected with his actions. It is regarded as a sentiment in his breast, from which actions favourable to us may proceed. It derives its whole value to us from the actions which it is likely to produce.  
For the present purpose, therefore, we consider the word Dignity, as expressing all that, in, and about, a man, which is calculated to procure him the services of others, without the immediate application either of reward, or of fear.  
Wealth, and Power, are the grand constituents of Dignity; and procure a man services beyond the immediate sphere, either of the good, or the evil, he can dispense. This is a remarkable case of association; and a source of very important consequences in human life.  
Our proneness to sympathize with the Rich and Great, has often been taken notice of, as a remarkable phenomenon in human nature. This has been described {210} as a readiness to go along with them in their affections; to desire the accomplishment of their ends; and to lend ourselves for the attainment of them.  
I believe it will be sufficient, if I barely indicate the mode of analysing the complicated sentiment, which is thus described. With command over the means of all sorts of pleasures, we associate strongly the idea of happiness; the idea of happiness, is an agreeable idea; and the idea of whatever disturbs it, painful. The first idea is a desire; the second, an aversion.  
Beside this; with the Power of dispensing a great deal of good, or evil, we associate strongly the idea of the actual dispensation; that is, the idea of a great number of individuals benefited, or hurt. But no association of good or evil to individuals is so constant and inseparable with the causes of them, as that of good or evil to ourselves. This association takes place in the case which we are now considering. It may have been but momentary. It may have been instantly overpowered by other associations, by association of the circumstances which exclude the Belief. Still it had a momentary existence; and, in its consequences, presents a remarkable instance of those two very important facts, first pointed out distinctly to the attention of philosophers by Professor Stewart; First, that feelings, so momentary as not to be recognised the moment after they have passed, may not only have existed, but have given its whole character to some important phenomenon of the human mind; and, Secondly, that there is no conception, that is, idea, without the momentary belief of the existence {211} of its object.[42] The momentary conception and belief of good and evil to ourselves, in the association constituting the idea of a man of wealth and power, has a great share in the character which that association bears.  
[Editor's footnote 42: This is the place where the author most clearly enunciates the doctrine which is the indispensable basis of his theory of Belief, viz. that there is no idea "without the momentary belief of the existence of its object." This opinion, as the author observes, is maintained also by Dugald Stewart; but I have never seen any positive evidence in its favour. All which has been established is, that the belief \_may\_ have momentarily existed, although immediately afterwards forgotten, and replaced by disbelief. But no proof of this momentary existence has been given, except that it is supposed that what is not believed to be real cannot cause strong emotion (terror, for instance), nor prompt to outward action. Yet nothing can be more certain than that a mere idea can exercise direct power over our nerves of motion, and through them, over the muscles; as the author shows by examples further on. It is true that, as Mr. Bain has pointed out, this power of an idea over the active energies is the only germ of belief which exists originally, and the foundation of the power of Belief in after life; but it is not the less true that the power of Belief as it exists in after life, stands broadly distinguished from the power of the Fixed Idea, and that this last may operate not only without, but in defiance of, a positive Belief. That a contrary belief has momentarily intervened is a mere conjecture, which can neither be refuted nor proved.--\_Ed.\_]  
The Power of doing good or evil, though the foundation of our idea of Dignity, is not the only ingredient in it; the Disposition to make use of it enters for a great share. The disposition to make use of it only for evil, if carried, to a certain pitch, would {212} sink the idea of dignity, and leave dread and abhorrence in its place.](56441.docx#chunk3599)

[Beside the disposition to make a good use of wealth and power, which is virtue; Knowledge, and Wisdom enter as an important ingredient in Dignity. In the possessor of wealth and power, they are necessary to give effect to his good disposition; in all men they are an instrument of power; and they are intimately associated, in well-educated minds, with the idea of the great benefits to mankind, which have been, and will be, derived from them. In such minds, they, therefore, inspire a very lively sympathy.  
I do not think it necessary to lengthen this exposition, by offering any analysis of the corresponding causes of pain,--Poverty, Weakness, and Contemptibility. The reader, after what he has learned, will, without difficulty, perform it for himself  
What we have now to consider, is the affection or state of mind, which is formed, when we contemplate each of those causes, first, as the past cause of past sensations, and secondly, as the future cause of future sensations.  
We are singularly ill-provided with names, to mark those several states of our consciousness. It is very obvious, that we ought to have two names for each cause; for example, one, to mark the state of mind, when Wealth is contemplated as the \_past\_ cause, of \_past\_ sensations, and one to mark the state of mind, when it is contemplated as the \_future\_ cause of \_future\_ sensations. We have but one name for both. We call by the single name, "Love of Wealth," both the pleasurable state when we associate with the idea of our past wealth the past pleasures we have derived from it, and {213} when we anticipate the future, and associate with the idea of future wealth, the idea of the pleasures to be derived from it. There is no wonder that the two states should be confounded; and that the love of wealth should be a vague, indefinite term.  
The imperfection of our language is the same in regard to the two other causes of our pleasures. The Love of Power, and the Love of Dignity, are names for both states of mind, both the contemplation of the past, and the contemplation of the future. The indistinctness of our language here, too, prevents the distinctness of our ideas.  
The word Hatred, renders the same service in regard to the causes of evil. Hatred of poverty, is the name for both states of mind, both that in which the future, and that in which the past, is the object of contemplation. Hatred of imbecility, hatred of contemptibility, are not common expressions, but we have for the states in question no other names.  
It is to be observed, that Wealth, Power, and Dignity, derive a great portion of their efficacy, from their comparative amount; that is, from their being possessed in greater quantity than most other people possess them. In contemplating them with the satisfaction with which powerful causes of pleasure are contemplated, we seldom fail to include the comparison. And the state of consciousness, formed by the contemplation and comparison taken together, is called Pride.  
We are said to be proud of our Wealth, proud of our Power, proud of our Dignity; and also, of any of the ingredients of which our powder or dignity is {214} composed; of our knowledge, of our eloquence, of our family, of our personal beauty.  
Of course the name has a very different meaning in each of these applications; a difference, however, which in ordinary minds, the use of the same term, almost completely confounds.  
It is obvious, that, in the contemplation of our own Wealth, Power, and Dignity, as greater, we include the contemplation of another man's Wealth, Power, and Dignity, as less. As the state of consciousness, thus formed, is called Pride when the reference is to ourselves, it is called Contempt when the reference is to others.  
When the case is reversed, and a man contemplates his Wealth, Power, and Dignity as less than those of other men, the state of consciousness is called Humility. As towards the other member of the comparison, the men who possess the greater amount of those advantages, it has the name of Respect, or Admiration.  
\* \* \* \* \*  
SUB-SECTION II.  
\_Our Fellow-Creatures contemplated as Causes of our Pleasures and Pains\_.  
  
Wealth, Power, and Dignity, being the origin of such powerful affections as we find them to be, though the causes of Pleasure to us only by being the causes of the actions of our Fellow-creatures; it would be wonderful, if our Fellow-creatures themselves, the {215} more immediate causes of those actions, should not be the origin of affections.  
This is not the case. Our Fellow-creatures are the origin of affections of the greatest influence in human life; to the examination of which it is now our business to proceed. It is, in the first place, however, to be observed, that Wealth, Power, and Dignity, afford perhaps the most remarkable of all examples of that extraordinary case of association, where the means to an end, means valuable to us solely on account of their end, not only engross more of our attention than the end itself, but actually supplant it in our affections. What the associating process is by which this effect is produced, we need not stay to inquire. That it is produced, to a remarkable degree, in the case of Wealth, Power, and Dignity, is familiar to every man's observation. How few men seem to be at all concerned about their fellow-creatures! How completely are the lives of most men absorbed, in the pursuits of wealth, and ambition! With how many men does the love of Family, of Friend, of Country, of Mankind, appear completely impotent, when opposed to their love of Wealth, or of Power! This is an effect of misguided association, which requires the greatest attention in Education, and Morals.](56441.docx#chunk3600)

[We contemplate our Fellow-creatures as causes of our Pleasures, either Individually, or in Groups. We shall consider the several cases, which have attracted sufficient attention to be distinguished by names: 1st, That of Friendship; 2dly, That of Kindness; 3dly, That of Family; 4thly, That of Country; 5thly, That of Party; and 6thly, That of Mankind.  
{216} 1.--\_Friendship\_.  
In what manner the associations are formed constituting that feeling towards another man which we call friendship, it seems not very difficult to trace. The states of circumstances in which the Feeling originates are very numerous. But they are all, without exception, of one kind. They are all states of circumstances, in which a greater proportion than usual of our own pleasures, come to be associated with the idea of the Individual. It often originates in companionship, between men who for some time have indulged their Tastes, and prosecuted their pleasures in company. It is perfectly obvious how the idea of such men will occur to one another, not simply as the idea of a man, but so enveloped by the trains of pleasurable ideas associated with the man, that the idea of him is upon the whole a highly pleasurable idea. When to this is added, the expectation of future pleasures, not merely the continuation of the companionship, but services of importance; when the wisdom of the man promises light and guidance from his counsels; when his fidelity makes it safe to trust him; when his benevolence towards us makes us count upon his services, whenever they are required, and his reputation and influence in the world are such as to give weight to his endeavours, there is a sufficient accumulation of pleasurable ideas with that of the individual to account for the affection denominated Friendship.  
2.--\_Kindness\_.  
There is nothing which more instantly associates with itself the ideas of our own Pleasures, and Pains, {217} than the idea of the Pleasures and Pains of another of our Fellow-creatures. The expositions already afforded sufficiently indicate the source of this association, which exerts a powerful and salutary influence in human life.  
The idea of a man enjoying a train of pleasures, or happiness, is felt by every body to be a pleasurable idea. The idea of a man under a train of sufferings or pains, is equally felt to be a painful idea. This can arise from nothing but the association of our own pleasures with the first idea, and of our own pains with the second. We never feel any pains and pleasures but our own. The fact, indeed, is, that our very idea of the pains or pleasures of another man is only the idea of our own pains, or our own pleasures, associated with the idea of another man. This is one not of the least important, and curious, of all cases of association, and instantly shews how powerfully associated trains of ideas of our pains and pleasures must be with a feeling so compounded.[43]  
[Editor's footnote 43: That the pleasures or pains of another person can only be pleasurable or painful to us through the association of our own pleasures or pains with them, is true in one sense, which is probably that intended by the author, but not true in another, against which he has not sufficiently guarded his mode of expression. It is evident, that the only pleasures or pains of which we have direct experience being those felt by ourselves, it is from them that our very notions of pleasure and pain are derived. It is also obvious that the pleasure or pain with which we contemplate the pleasure or pain felt by somebody else, is itself a pleasure or pain of our own. But if it be meant that in such cases the pleasure or pain is consciously referred to self, I take this to be a mistake. By the acts or other signs exhibited by another person, the idea of a pleasure (which is a pleasurable idea) or the idea of a pain (which is a painful idea) are recalled, sometimes with considerable intensity, but in association with the other person as feeling them, not with one's self as feeling them. The idea of one's Self is, no doubt, closely associated with all our experiences, pleasurable, painful, or indifferent; but this association does not necessarily act in all cases because it exists in all cases. If the mind, when pleasurably or painfully affected by the evidences of pleasure or pain in another person, goes off on a different thread of association, as for instance, to the idea of the means of giving the pleasure or relieving the pain, or even if it dismisses the subject and relapses into the ordinary course of its thoughts, the association with its own self may be, at the time, defeated, or reduced to something so evanescent that we cannot tell whether it was momentarily present or not.--\_Ed.\_]  
{218} The Pleasurable association composed of the ideas of a man and his pleasures, and the painful association composed of the ideas of a man and his pains, are both Affections, which have so much of the same tendency that they are included under one name, Kindness; though the latter affection has a name appropriate to itself, Compassion.  
3.--\_Family\_.  
The Group, which consists of a Father, Mother, and Children, is called a Family. The associations which each member of this group has of his pains and pleasures, with the pains and pleasures of the other members, constitute some of the most interesting states of human consciousness.](56441.docx#chunk3601)

[The affection of the husband and wife is, in its origin, that of two persons of different sex, and need {219} not be further analysed. To this source of pleasurable association is added, when the union is happy, all those other associations, just enumerated, which constitute the affection of Friendship. To this another addition is made by the union of interests; or that necessity, under which both are placed, of receiving pain and pleasure from the same causes. As, in too many instances, these pleasurable associations are extinguished, by the generation of others of an opposite description; in other cases, they are carried to such a height, as to afford an exemplification of that remarkable state of mind, in which a greater value is set upon the means, than upon the end. Persons have been found, the one of whom could not endure to live without the other.  
The Parental affection requires to be somewhat more minutely analysed.  
First of all, there can be no doubt, that all that power of exciting trains of ideas of our own pains and pleasures, which belongs to the pains and pleasures of any of our fellow-creatures, is possessed by the pains and pleasures of a man's child.  
In the next place, it is well known that the pains and pleasures of another person affect us; that is, associate with themselves the ideas of our own pains and pleasures, with more or less intensity, according to the attention which we bestow upon his pains or pleasures. A parent is commonly either led or impelled to bestow an unusual degree of attention upon the pains and pleasures of his child; and hence a habit is contracted of sympathizing with him, as it is commonly, and not insignificantly named; in other words, a facility of associating the ideas of {220} his own pains and pleasures, with those of the child.  
Again, a man looks upon his child as a cause to him of future pains or pleasures, much more certain, than any other person. The father regards the son somewhat in the light of another self, a great proportion of the effects of whose acts, whether good or evil, will redound to himself. An object regarded as a great future cause to us of future pains or pleasures, we call an object of intense interest; in other words, a train of interesting ideas, that is, of ideas of pains or pleasures, is associated with it.  
The vivacity and simplicity of the expressions of the pains and pleasures of children, in their looks, and tones, and attitudes, as well as words, give them a peculiar power of exciting sympathy, that is, of associating with them trains of the analogous feelings of ourselves. The frequency with which a parent is called upon to attend to those expressions in his child, gives him a habit of forming the associations to which they lead.  
The perfect dependence of the child upon the parent is a source of deep interest. The whole of its pleasures being the fruit of his acts, he more easily associates with them the trains of his own pleasures, than with those of any person not so connected with him. His acts, too, being required to save it from the worst of pains, and from destruction, the idea of its pains, arising from any relaxation of his care, calls up, in strong association, both the analogous pains of himself, and also the opposite pleasurable feelings arising from the continuance of the acts by which the pleasures of the child are produced. And to all these {221} sources of association is added, that which is always agreeable, the train making up the idea of our own power; no case of power being so perfect as that of the parent over his helpless offspring.  
Another important source of agreeable association is yet to be mentioned. Man becomes fond (it is a matter of daily observation) of that on which he has frequently conferred benefits. This is a fact of considerable importance in human nature; for, under the little care which hitherto has been bestowed in generating, by education, the associations on which Beneficence depends, a considerable part of the beneficence existing in the world has been produced by this cause. It is also a case of association, which strongly illustrates the fact, that pleasures, produced by our own acts, have a peculiar power in associating with them trains of the ideas of our own pleasures. Not only a Fellow-creature, but even one of the lower animals, by having been the object of repeated acts of kindness, becomes an object of affection. Trains of our own pleasures are so often united with the idea of such an object of our kindness, that the idea of the object becomes at last an idea made up of the original idea of the individual and of trains of our own pleasures: a compound idea, made up, in great part, of pleasurable ideas; that is, an Affection.  
That the whole of the parental affection is derived from these and similar associations, is proved by some decisive facts.  
Whenever it happens that a man is placed in circumstances which produce those associations, he feels the parental affection, without parentage. Facts of this description are so frequent, and so notorious, that {222} it is hardly necessary to produce an instance of them. How else does it happen, that a man who does not suspect the infidelity of his wife, rears as his own, and without any difference of affection, the offspring of the man who has injured him? Cases, for the credit of our nature, are not wanting, and when education is better, they will be less rare, in which a family of orphans is taken under the protection of a man of virtue. By acting towards them the part of a parent, he never fails to acquire for them the affection of a parent.](56441.docx#chunk3602)

[There are equally notorious and decisive facts to prove, that whenever the parent is placed in circumstances which either wholly, or to a great degree, prevent the formation of the associations with the child to which we ascribe the parental affection, there is a corresponding want of the affection. The case of illegitimate children is pregnant with evidence to this point. In the great majority of cases of this description, no affection exists. The parent may feel the obligation of maintaining the child, because public opinion, or perhaps the law, requires it: but this is the extent of the bond.  
The circumstances of Families, in the two opposite states, of great poverty, and great opulence, are unfavourable to the formation of those associations of which the parental affection consists.  
In cases of extreme poverty, which alone are the cases here understood; because, in the more moderate cases of poverty, the parental affection exists in considerable strength; the circumstances which lead to the formation of agreeable associations with the child, are either wanting, or counteracted by circumstances {223} of an opposite tendency. The parent has little the means of bestowing pleasures on his child; he has not the means of saving it from an almost constant series of pains. The means which he employs in saving the child from pains, are taken from the means of saving himself from pains. Constantly occupied in the labours which yield him a scanty means of subsistence, he spends but little time in the company of his child, and has therefore little opportunity of attending to the engaging expressions of its pains and pleasures. It is needless to carry the enumeration of particulars farther. The circumstances which tend to generate agreeable associations with the child are few. The circumstances which tend to generate painful associations with it are many.  
In Families of great opulence, the attention of the parent, averted either by the calls of pleasure, or the avocations which his position in society creates, is but little bestowed upon his children. Where the pains and pleasures of others are not attended to, no association with those pains and pleasures exists; where there is not a habit of forming the associations, the Affection does not exist.  
The mode in which the child of the man of opulence is maintained and educated, proceeds so remotely from the acts of the parent, that the agreeable associations, which we have with our own acts of beneficence, are, in the case of such a parent, very imperfectly formed.  
The man of opulence naturally regards his children as part of his state; as the inheritors of his fortune; or as belonging to the same line of ancestors with himself; and with both those constituents of his {224} dignity he has many agreeable associations. But these are an imperfect substitute for the habits of agreeable association which are generated in more favourable circumstances.  
Hitherto, we have considered only the parental affection of the Father. The parental affection of the Mother differs from that of the Father in the associations which she forms with her child in her own peculiar situations of gestation and nursing. That these are such as to create intense associations every one will admit. Every movement of the child during the period of gestation is to her a sensation. Every thought of it is connected with that flood of hopes and fears attached to the awful hour, never absent from her thoughts, which, through a series of cruel pains, will either stretch her a lifeless corpse, or render her a rejoicing mother. As a nurse, the child is to her a source, both of agreeable sensations, and agreeable ideas. On the sensations we need not dilate. They are known only to those who have experienced them. But it is not possible to conceive a case more calculated to associate strongly the ideas of our own pleasures, with the ideas of the pleasures we bestow, than that of the mother, when she presses her infant to her bosom, and communicates to him the means of life, and the only pleasures he is capable of enjoying, not only by her own acts, but from her own substance; and when she perceives how soon in the mind of the child, the idea of herself is associated with the existence of all his pleasures, and the removal of all his pains; in other words, how quickly she becomes not only the object of his affections, but the one and only object.  
{225} Having explained at so much length the grand case of the Domestic Affections, we may pass over the rest with a very cursory notice.  
Even the Filial affection has in it nothing peculiar. In the child, the idea of his parent, as a being with power almost unlimited over him, creates the associations which constitute reverence, and respect; and the perpetual use of that power on the part of the parent to give him pleasures, or the command of pleasures, to remove from him pains, or give him the means of removing them, naturally creates the associations which constitute affection.  
The affection which exists among Brothers and Sisters, has in it most of the ingredients which go to the formation of Friendship. There is first of all Companionship; the habit of enjoying pleasures, in common, and also of suffering pains: hence a great readiness in sympathizing with one another; that is, in associating trains of their own pains and pleasures, with the pains and pleasures of one another. There is next, when the Education is good, a constant reciprocation, to the extent of their power, of beneficent acts. And lastly there is their common relation to the grand source of all their pleasures, the Parent.](56441.docx#chunk3603)

[When the affections of the domestic class exist in perfection (in such a state of Education and Morals as ours this rarely can happen), they afford so constant a succession of agreeable trains, that they form, perhaps, the most valuable portion of human happiness. Acts of beneficence to larger masses of mankind, afford still more interesting trains to those who perform them. But they are the small number. The happiness of the Domestic affections is open to all.  
{226} 4.--\_Country\_.  
The word country is the name of an idea of great complexity. In that idea are included all the multitudes of persons, and all the multitudes of things, and all the multitudes of positions, in a certain portion of the Globe of the Earth. Nor are these present existences alone included in that idea: the HISTORY of the country is included, that is, the whole series of prior existences; and not the PAST HISTORY only, but the FUTURE HISTORY also, or series of future existences, as far as our power of anticipation reaches. This is a remarkable example of the power of association, to unite ideas without number in such closeness, that their individuality is unperceived, and the cluster, however large, resembles a single uncompounded idea.  
This cluster is not wholly made up of indifferent ideas. There is included in it the sources of all our pleasures, and almost all the objects with which we have been accustomed to associate trains of agreeable ideas. The plains, the mountains, the valleys, the rivers, with which we have formed agreeable associations, are all there; the individual objects with which we have formed similar associations, the trees, the houses; the house, for example, in which we were born, the tree under which we have sat to enjoy the affections of our parents, or indulge our sympathies with other objects of our love, the paths in which we have strayed, the fields through which we have roamed, the riches wherewith we have seen them periodically clothed, the labours of those fields, the labourers, their manners, appearance, and character, {227} the flocks and herds, the cities and towns, with all their inhabitants, and all their operations, the wonderful proceedings of the manufacturers, the arrival and departure of ships, loaded with the precious commodities of the different regions of the Earth.  
To these sources of Interest is to be added, all that portion of our fellow-creatures with whom we have been accustomed to associate our Pains and Pleasures. Here are our Parents, our Brothers and Sisters, our Sons and Daughters. Here are the men, and here the women, who have engaged our affections. Here are our Benefactors, here are our Instructors, here are the manners which alone from habit are agreeable to us. And here are the Institutions from which we have derived Protection, and to which, in their usual state of imperfection, we are apt to lend a reverence, such is the strength of the association, far beyond the measure of their worth.  
Sufficient sources have now been pointed out, to shew whence it is that the Idea of country, as it involves a great number of agreeable associations, becomes, or more properly speaking is, an Affection,  
5.--\_Party; Class\_.  
That which constitutes a Party, or class, is always some community of Interest: in other words, some thing or things, to be obtained, secured, or augmented, by the common endeavours of the class, and operating as a cause of pleasure to all of them.  
The People, that is, the Mass of the community, are sometimes called a class; but that is only to distinguish them, like the term Lower Orders, from the {228} Aristocratical class. In the proper meaning of the term class, it is not applicable to the People. No interest is in common to them, which is not in common to the rest of the community. There is nothing which can operate as a cause of benefit to them exclusively. Whatever operates as a cause of benefit to them in common, operates equally as a cause of benefit to every part of the community, saving and excepting those who are in possession of some mischievous power over a portion, greater or less, of the community. It may no doubt very easily happen, that what is a benefit to the rest of the community, is an evil to the possessors of such power; as what is an evil, and the greatest of all Evils, to the Community, is a Benefit to them.  
There is no Love of Class, therefore, but in a Privileged Order. The Patricians, in ancient Rome, were a Class of this sort. And in modern Europe there are two such classes: the Nobility, in each Country: and the Incorporated Clergy; calling themselves the Church, in Catholic countries, the Established Church, in Non-catholic countries.  
The associations which the members of a governing class have with one another, individually, as fathers, sons, companions, friends, are not here to be taken into account. The associations connected with the privileges which constitute any body of men a class, are alone concerned in forming the states of mind which we now are explaining.  
Such privileges consist of Wealth, Power, Dignity, one, or all, conferred by Legislative act: that is, not the result of natural acquisition, but of a sort of force, or compulsion, put upon other people.  
{229} We need not again enter into an explanation of the agreeable associations which every man has with his own Wealth, Power, and dignity, and with the causes, either of their existence, or of their increase, or of their security. When these causes to one man, are causes also to a circle of other men, the whole Body has both individually and collectively the associations with those causes, which constitute Affection.  
6.--\_Mankind\_.  
The word Mankind is the name of another of those remarkable associations, by which countless ideas are so combined, that their individuality is sunk, and the aggregate is, to appearance, one idea.](56441.docx#chunk3604)

[The Idea Mankind, like the Idea Country, is not made up wholly of indifferent ideas. It has in it all the trains of pleasurable ideas which we associate, either with individuals, or with subdivisions, of the whole mass.  
We have interesting associations with the idea of a man, as a man. The idea of his pains, and his pleasures, call up, unavoidably, trains of the ideas of our own pains and pleasures. The Idea of a man, therefore, naturally includes, the love of his pleasures, hatred of his pains.  
From our earliest Infancy, we have had experience of nothing more constantly than this; that a great proportion of our pleasures proceeded from a certain disposition towards us, on the part of those of our fellow-creatures who were near us; and a great proportion of our Pains from a certain other disposition on their part. Those Dispositions, taken in the most {230} general sense, are Kindness, which we have already explained; and its opposite, Unkindness. We have, therefore, very intense associations of Pleasure, with the idea of the Disposition towards us, called Kindness, in other men; and very intense associations of Pain with that of the Disposition in them called Unkindness towards us.  
In our Idea of each individual man, therefore, is included not only the Love of his Pleasures and Aversion to his Pains; but, in addition to this, the Love of his Disposition of Kindness towards us, and Aversion to his Disposition of Unkindness towards us.  
Now, as our complex Idea of Mankind, is made up of the aggregate of the ideas of Individuals, including the interesting trains called Love of their Pleasures, Hatred of their Pains; Love of their Kindness, Aversion to their Unkindness; the generation of the affection, called Love of Mankind, is, for our present purpose, sufficiently shewn.[44] [45]  
[Bain's footnote 44: As carrying out the principle of association, in the domain of the Feelings, the foregoing chapters, from XIX. onwards, are unexceptionable and cogent. As furnishing the complete account of the Benevolent and Malevolent Affections, and of the Sympathies or disinterested impulses, they are defective. Indeed, the whole subject of the Emotions is placed by the author upon a too narrow basis. Any theory that looks solely to the circumstance of pleasure and pain, (important as that is) fails to grapple with all the facts. For example, there is no account rendered of the very familiar emotion of Wonder.  
That the Emotions are all compounded of elements of Sense (in the widest comprehension, that is, with Muscularity included) may be maintained on good grounds. Nevertheless, in order to a satisfactory analysis of even the commoner emotions, such as Tenderness, there is wanted a more exhaustive detail of the pleasures and pains of sense than is furnished in the present work.  
A few remarks on the generic example of the Tender Feeling, on which the author has expended the greatest part of his illustration, will show the method to be pursued. It is a case where certain primary sensibilities, correctly ranked under Sensation, together with the associating principle, seem to account for the whole of the phenomenon. In such a case as Wonder, the explanation involves an additional element.  
The pleasures of Tender Feeling, or Love and the Affections, are no doubt, as remarked in the text, in a considerable part associations with other pleasures, such as nourishment. An animal and a child would contract a pleasurable association with the person that brings them their food, or ministers to their bodily wants. Still, there is something different from this in Tenderness or Love. The fact essential to the state is the gratification from the acts of caressing, fondling, and embracing; a pleasure that has its independent sources in the human and animal sensibilities, and does not need the association with being fed and cared for, although enhanced and stimulated by that association. Even apart from the powerful element of sexuality, there is a great mass of pleasurable animal feeling awakened in the loving embrace of two individuals of the warm-blooded species. We may instance, among these, the pleasures of Touch in the soft warm contact; the muscular pleasures co-operating; the organic feelings connected with secretions stimulated in the act, of which the lachrymal is the prominent but not the solitary case; the peculiar sensibility of the pharynx, which is probably the sign of a less acute but more extended influence in the alimentary canal generally; to all which, is to be added, in women, the genial secretion of the breasts, going on incessantly, although more profuse in nursing mothers. The coalition of these tactile, muscular, and organic sensibilities, is the pleasure of love by itself, or as it might be felt between two living sentient creatures, in no other way the givers or receivers of benefits. Nor does this exhaust the circle. The eye, and the ear, and even the smell, may be also included. The visible aspects of living beings are often highly agreeable from the first, and become so to a farther extent by association with the tactile and organic pleasures. Similarly, the ear may be charmed with the sounds emitted by another human being or animal, and may also form associations with the still more potent pleasures above named. Once more, the odour of one animal may be intrinsically sweet to another animal; while here too, associations may be added.](56441.docx#chunk3605)

[The pleasure of Tender feeling must therefore be pronounced to have an independent standing in the sentient framework, although susceptible of being analysed into the primary pleasures of the senses, together with the influence of association. All the affections derive the chief part of their strength from this complex source. For, although the acts of fondling and caressing are not universally practised between every two persons that have a mutual affection, or are so only in the very limited form of the shake of the hand, yet there is an echo of these, and a stimulus to the organic accompaniments, in the sight of each other, in the sounds of the voice, and in the more intellectual forms of indicating attachment. It can be proved that the two higher senses enter deeply into the tender emotion, (as they do into the Beautiful). The well-known Dr. Kitto, who was stone-deaf, in describing his experience, states that, as regarded his pleasures, the loss that affected him most was his inability to hear the voices of his children. It is evident that the same remark, as to the mutilation of an organ of tender feeling, is applicable to the blind. The pathos of the lines in Paradise Lost contains this implication.--\_B.\_]  
[Editor's footnote 45: The two preceding subsections are almost perfect as expositions and exemplifications of the mode in which, by the natural course of life, we acquire attachments to persons, things, and positions, which are the causes or habitual concomitants of pleasurable sensations to us, or of relief from pains: in other words, those persons, things, and positions become in themselves pleasant to us by association; and, through the multitude and variety of the pleasurable ideas associated with them, become pleasures of greater constancy and even intensity, and altogether more valuable to us, than any of the primitive pleasures of our constitution. This portion of the laws of human nature is the more important to psychology, as they show how it is possible that the moral sentiments, the feelings of duty, and of moral approbation and disapprobation, may be no original elements of our nature, and may yet be capable of being not only more intense and powerful than any of the elements out of which they may have been formed, but may also, in their maturity, be perfectly disinterested: nothing more being necessary for this, than that the acquired pleasure and pain should have become as independent of the native elements from which they are formed, as the love of wealth and of power not only often but generally become, of the bodily pleasures, and relief from bodily pains, for the sake of which, and of which alone, power and wealth must have been originally valued. No one thinks it necessary to suppose an original and inherent love of money or of power; yet these are the objects of two of the strongest, most general, and most persistent passions of human nature; passions which often have quite as little reference to pleasure or pain, beyond the mere consciousness of possession, and are in that sense of the word quite as disinterested, as the moral feelings of the most virtuous human being.](56441.docx#chunk3606)

[The author, then, has furnished a most satisfactory and most valuable explanation of certain of the laws of our affections and passions, and has traced the origin and generation of a great number of them. But it must be remarked of the whole exposition, that it accounts truly, but only partially, for this part of human nature. It affords a sufficient theory of what we may call the mental, or intellectual element of the feelings in question. But it does not furnish, nor does the author anywhere furnish, any theory of what may be called the animal element in them. Yet this is no unimportant ingredient in the emotional and active part of human nature: and it is one greatly demanding analysis. Let us take the case of any of the passions: and as one of the simplest as well as one of the most powerful of them, let us take the emotion of Fear. The author gives no account of Fear but that it is the idea of a painful sensation, associated with the idea of its being (more or less uncertainly) future. Undoubtedly these elements are present in it; but do they account for the peculiar emotional character of the passion, and for its physiological effect, such as pallor, trembling, faltering of the voice, coldness of the skin, loss of control over the secretions, and general depression of the vital powers? The case would be simpler if these great disturbances of the animal functions by the expectation of a pain were the same in kind as the smaller modifications produced by the mere idea. This, however, is by no means the case; Ideas do produce effects on the animal economy, but not those particular effects. The idea of a pain, if it acts on the bodily functions at all, has an action the same in kind (though much less in degree) as the pain itself would have. But the passion of fear has a totally different action. Suppose the fear to be that of a flogging. The flogging itself, if it produced any physical demonstrations, would produce cries, shrinkings, possibly muscular struggles, and might by its remoter effects disturb the action of the brain or of the circulation; and if the fear of a flogging produced these same effects, in a mitigated degree, the power of fear might be merely the power of the idea of the pain. But none of these are at all like the characteristic symptoms of fear: while those characteristic symptoms are much the same whatever be the particular pain apprehended, and whether it be a bodily or a purely mental pain, provided it be sufficiently intense and sufficiently proximate. No one has ever accounted for this remarkable difference, and the author of the Analysis does not even mention it. The explanation of it is one of those problems, partly psychological and partly physiological, which our knowledge of the laws of animal sensibility does not yet enable us to resolve. In whatever manner the phenomena are produced, they are a case of the quasi-chemistry of the nervous functions, whereby the junction of certain elements generates a compound whose properties are very different from the sum of the properties of the elements themselves.  
This is the point which the author's explanations of the emotional part of human nature do not reach, and, it may even be said, do not attempt to reach. Until, however, it is reached, there is no guarantee for the completeness of his analysis of even the mental element in the passions: for when the effect exhibits so much which has not, in the known properties of the assigned cause, anything to account for it, there is always room for a doubt whether some part of the cause has not been left out of the reckoning. This doubt, however, does not seriously affect the most important of the author's analyses, viz. those which, without resolving the emotions themselves into anything more elementary, expound their transfer by association from their natural objects to others; with the great increase of intensity and persistency which so often accompanies the transfer, and which is in general quite sufficiently accounted for by the causes to which the author refers it.--\_Ed.\_]  
\* \* \* \* \*  
SUB-SECTION III.  
\_The Objects called Sublime and Beautiful, and their Contraries, contemplated as Causes of our Pleasures and Pains\_.  
  
These objects have received much of the attention of Philosophers; and great progress has been made in {231} analysing the associations which form the complicated feelings, ranged under the name of Emotions of the Sublime and Beautiful.  
{232} It does not belong to the present purpose to go into the details of this subject, which, for obvious reasons, have been pursued to great length. It is necessary, {233} however, for that purpose, to shew, into what general laws the phenomena are capable of being resolved.  
The feelings which are marked under the name of {234} Emotions of the Sublime and Beautiful, are so much alike, that the distinction of them into two species is somewhat arbitrary. Though the Romans did apply {235} the word \_sublimis\_, and its abstract, \_sublimitas\_, in a certain rhetorical way, to objects of Taste, their word \_Pulchrum\_, properly denoted all that is expressed by {236} our Sublime and Beautiful, taken together. The Greek word, [Greek: kalo/n], also clearly included every thing which we rank under the name of Sublime. Longinus, indeed, who lived at a very late and degenerate period of Grecian literature, wrote a treatise to which he gave the affected Title, [Greek: Pe/ri U(psou=s], or "About Height;" and as that has been a very popular treatise in modern times, it is not improbable, that the use of the word Sublime, which has become so prevalent in the discourse of the moderns, derives its origin from no higher source.](56441.docx#chunk3607)

[Mr. Alison, who wrote a very pleasing, and, to a certain degree, a Philosophical Book, on the Emotions of Taste, has shewn by an abundance of well-chosen illustrations, that it is not the immediate sensations, received by us from the objects of Taste, which constitute them a cause of our pleasures. The immediate sensations are commonly indifferent, or approaching the indifferent. It is only when they introduce, by association, a train of pleasurable ideas, that the feelings called the pleasures of Taste, are ever enjoyed.  
I believe that I may assume this as an established {237} fact in our nature; and I shall only adduce as much of the evidence as may teach those of my readers, to whom these inquiries may be new, the mode in which the truth of the proposition becomes apparent. I also think it useful to avail myself, not only of the illustrations, but as much as possible of the words, of Mr. Alison, as exhibiting the clear conviction of the wonderful effects of association, in one instance, on the part of a writer, who seems to have had no idea of its affording an equally satisfactory solution of the other complex phenomena of mind.  
What are called the external objects of Taste, are mostly objects of Hearing, objects of Sight, or objects of that Muscular Sense, from which we derive the idea of extension.  
That the feelings we have by these senses are generically distinct from the emotions of Sublimity and Beauty, might, I imagine, be trusted to an appeal to each man's consciousness. There are innumerable cases, however, which may be regarded as decisive experiments upon the subject.  
Of the sounds which can be adduced as Sublime or Beautiful, there is, perhaps, not one, which is not often heard in circumstances, wherein no tendency to Emotion is felt. The circumstances in which the Emotion is felt, and those in which it is not felt, are those in which a train of pleasurable ideas is, or is not, introduced by association.  
"All sounds," says Mr. Alison, "are in general SUBLIME, which are associated with Ideas of great Power or Might: the Noise of a Torrent,--the Fall of a Cataract,--the Uproar of a Tempest,--the Explosion of Gunpowder,--the Dashing of the Waves, &c.  
{238} "All sounds, in the same manner, are sublime, which are associated with Ideas of Majesty, or Solemnity, or deep Melancholy, or any other strong Emotion: the Sound of the Trumpet, and all other warlike instruments,--the Note of the Organ,--the Sound of the Curfew,--the Tolling of the Passing bell, &c.  
"There is a great variety of sounds also, that occur in the scenes of Nature, which are productive of the Emotion of BEAUTY: the Sound of a Waterfall,--the Murmuring of a Rivulet,--the Whispering of the Wind,--the Sheepfold-bell,--the sound of the Curfew, &c.  
"That the Notes or Cries of some Animals, are Sublime, every one knows: the Roar of the Lion, the Growling of Bears, the Howling of Wolves, the Scream of the Eagle, &c. In all those cases, those are the notes of animals remarkable for their strength, and formidable for their ferocity. It would seem very natural, therefore, that the sublimity of such sounds should arise from the qualities of which they are expressive.  
"The Bleating of a Lamb, is beautiful in a fine day in spring: the Lowing of a Cow at a distance, amid the scenery of a pastoral landscape in summer. The Call of a Goat among rocks is strikingly beautiful, as expressing wildness and independence. The Hum of the Beetle is beautiful in a fine summer evening, as appearing to suit the stillness and repose of that pleasing season. The Twitter of the Swallow is beautiful in the morning, and seems to be expressive of the cheerfulness of that time."  
This enumeration of cases, which is only a selection from those of Mr. Alison, is far more than {239} sufficient for the purpose, as indeed it is one defect of his book that his propositions are overlaid with evidence.  
That these sounds, as sensations, do not constitute the pleasures enjoyed, he demonstrates, by shewing that on many occasions, on which the sensations exist as perfectly as on any other occasion, no pleasure is felt. He also shews, that when the pleasures are felt, a train of pleasurable ideas is introduced by association.  
"The sound of Thunder, he says, is perhaps of all others in Nature, the most Sublime." Yet the rolling of stones from a cart, produces a sound so exactly the same, that it is often mistaken for thunder. While the mistake lasts, the feeling of sublimity lasts. When the mistake is corrected, it instantly vanishes; that is, the association is dissolved.  
"There is scarcely in nature," says Mr. Alison, "a more trifling sound than the buzz of Flies; yet, I believe, there is no man of common Taste, who, in the deep silence of a summer's noon, has not found something strikingly sublime, in this inconsiderable sound. The falling of a drop of water, produces in general a very insignificant and unexpressive sound; yet sometimes in Vaults, and in large Cathedrals, a single drop is heard to fall, at distant intervals, from the roof; than which, I know not if there is a single sound more strikingly sublime."](56441.docx#chunk3608)

[Mr. Alison further remarks, that to those who have no trains of pleasurable ideas associated with sounds, "or who consider them simply as sounds, they have no beauty. It is long before children shew any sensibility to the beauty of sounds. To the greater {240} number of the sounds which we denominate beautiful, the common people, in the same manner, are altogether indifferent. To the peasant, the Curfew is only the mark of the hour of the evening,--the Sheep-bell, the sign of the neighbourhood of the flock,--the sound of a Cascade, the sign of the falling of water, &c. Give him the associations which men of cultivated imagination have with such sounds, and he will infallibly feel their beauty."  
Mr. Alison shews, that when the notes or cries of animals are stripped of certain associations, they are unproductive of Emotions of sublimity or beauty. "There is not one of these sounds," he says, "which may not be imitated in some manner or other; and which, while we are ignorant of the deception, does not produce the same Emotion with the real sound: when we are undeceived, however, we are conscious of no other Emotion, but that, perhaps, of simple pain from its loudness. The howl of the Wolf is little distinguished from the howl of the Dog, either in its tone or in its strength, but there is no comparison between their sublimity. Few, if any, of the sounds felt as sublime are so loud as the most common of all sounds, the lowing of a Cow; yet this is the very reverse of sublimity. Imagine this sound, on the contrary, expressive of Fierceness and Strength, and there can be no doubt, that it would become sublime. The scream of the Eagle is simply disagreeable, when the bird is either tamed or confined; it is Sublime, only when it is heard amid Rocks and Deserts, and when it is expressive to us, of Liberty and Independence, and savage Majesty. The noise of the Rattlesnake (that most dangerous animal of all his tribe) {241} is very little different from the noise of a child's play-thing; yet who will deny its sublimity? The growl of the Tiger, resembles the purring of a Cat; the one is sublime, the other insignificant."  
Mr. Alison, with great propriety, adds, "Upon the principle of the absolute and independent Sublimity or Beauty of Sounds, it is very difficult to account for the different sounds which have been mentioned as productive of these Emotions. There is certainly no resemblance, as sounds, between the noise of Thunder, and the hissing of a Serpent,--between the growling of a Tiger, and the explosion of Gunpowder,--between the scream of an Eagle, and the shouting of a multitude; yet all of these are sublime. In the same manner, there is as little resemblance, between the tinkling of the Sheepfold-bell, and the murmuring of the Breeze; between the hum of the Beetle and the song of the Lark; between the twitter of the Swallow, and the sound of the Curfew; yet all of these are beautiful. Upon the principle of association, they are all perfectly accountable."  
I shall not follow Mr. Alison in his illustrations of the beauty and sublimity felt in the tones of the human voice, or in the composition of sounds, called Music; because I have no doubt but it will be allowed that they derive the whole of what is called their expression,--in other words, their power of pleasing,--from the associations connected with them.[46] I {242} shall also produce a very few specimens of the illustrations which he adduces to show that what is called the Beauty and Sublimity of objects of sight, is derived wholly from association.  
[Editor's footnote 46: What the author thinks himself dispensed from either proving or illustrating because he has no doubt that it will be allowed, is, on the contrary, one of the most disputable parts of his theory. That very much of the pleasure afforded by Music is the effect of its expression, i.e. of the associations connected with sound, most people will admit: but it can scarcely be doubted that there is also an element of direct physical and sensual pleasure. In the first place, the quality of some single sounds is physically agreeable, as that of others is disagreeable. Next, the concord or harmony of pleasant sounds adds a further element of purely physical enjoyment. And thirdly, certain successions of sounds, constituting melody or tune, are delightful, as it seems to me, to the mere sense. With these pleasures those of the associated ideas and feelings are intimately blended, but may, to a certain extent, be discriminated by a critical ear. It is possible to say, of different composers, that one (as Beethoven) excels most in that part of the effect of music which depends on expression, and another (as Mozart) in the physical part.  
That the full physical pleasure of tune is often not experienced at the first hearing, is a consequence of the fact, that the pleasure depends on succession, and therefore on the coexistence of each note with the remembrance of a sufficient number of the previous notes to constitute melody: a remembrance which, of course, is not possessed in perfection, until after a number of repetitions proportioned to the complexity and to the unfamiliar character of the combination.--\_Ed.\_]  
The following observations are general, and very instructive.  
"The greatest part of colours are connected with a kind of established Imagery in our minds, and are considered as expressive of many very pleasing and affecting Qualities.  
"These Associations may perhaps be included in the following Enumeration: 1st, Such as arise from {243} the nature of the objects thus permanently coloured: 2ndly, Such as arise from some analogy between certain Colours, and certain Dispositions of mind: and, 3rdly, Such as arise from accidental connexions, whether national or particular.](56441.docx#chunk3609)

["1. When we have been accustomed to see any object capable of exciting Emotion, distinguished by some fixed or permanent colour, we are apt to extend to the Colour the Qualities of the object thus coloured, and to feel from it, when separated, some degree of the same emotion which is properly excited by the object itself. Instances of this kind are within every person's observation. White, as it is the colour of Day, is expressive to us of the cheerfulness or gaiety which the return of day brings. Black, as the colour of Darkness, is expressive of gloom and melancholy. The colour of the heavens, in serene weather, is Blue: Blue, is therefore expressive to us of somewhat of the same pleasing and temperate character. Green, is the colour of the Earth, in Spring: it is, consequently, expressive to us of some of those delightful Images which we associate with that season. The expressions of those colours, which are the signs of particular passions in the Human countenance, and which, from this connexion, derive their effect, every one is acquainted with.  
"2. There are many colours which derive expression from some analogy we discover between them and certain affections of the Human Mind. Soft or Strong, Mild or Bold, Gay or Gloomy, Cheerful or Solemn, &c., are terms, in all languages, applied to colours; terms obviously metaphorical, and the use of which indicates their connexion with particular {244} qualities of Mind. In the same manner, different degrees or shades of the same colour have similar characters, as Strong, or Temperate, or Gentle, &c. In consequence of this Association,--which is, in truth, so strong, that it is to be found in all mankind,--such colours derive a character from this resemblance, and produce in our mind some faint degree of the same Emotion, which the qualities they express are fitted to produce.  
"3. Many colours acquire character from accidental Association. Purple, for instance, has acquired a character of Dignity, from its accidental connexion with the Dress of Kings. The colours of Ermine have a similar character, from the same cause. The colours, in every country, which distinguish the Dress of Magistrates, &c., acquire dignity in the same manner. Every person will, in the same manner, probably, recollect the particular colours which are pleasing to him, from their having been worn by people whom he loved, or from some other accidental association."  
That it is not from the sensation, but from those trains of associated Ideas, that the feeling of Beauty in colours, whenever we have it, is derived, he demonstrates, by adducing some well-chosen instances to shew that the sensation may exist as well without the association as with it; and that, as often as it is unaccompanied with the association, it is unaccompanied with any feeling of Beauty. When it has the association. Beauty is felt: when it has not the association, Beauty is not felt. The association, therefore, is the cause of the Beauty.  
{245} "Black," says Mr. Alison, "is to us an unpleasant colour, because it is the colour appropriated to mourning. In Venice and Spain, it is agreeable, because it is the colour which distinguishes the dress of the Great. White is beautiful to us, in a supreme degree, as emblematical both of Innocence and Cheerfulness. In China, on the other hand, it is the colour appropriated to Mourning, and, consequently, very far from being generally beautiful.  
"The common colours of the indifferent things which surround us,--of the Earth, of Stone, of Wood, &c.,--have no kind of Beauty. The things themselves are so indifferent to us, that they excite no kind of emotion; and, of consequence, their colours produce no greater emotion as the signs of such qualities, than the qualities themselves. The colours, in the same manner, which distinguish the ordinary Dress of the Common People, are never considered as beautiful. It is the colours only of the Dress of the Great, of the Opulent, or of Distinguished Professions, which are ever considered in this light.  
"No new colour is ever beautiful, until we have acquired some pleasing associations with it. This is peculiarly observable in the article of Dress; and indeed it is the best instance of it, because no other circumstance intervenes by which the experiment can be influenced. Every man must have observed, that, in the great variety of new colours, which the caprice of Fashion is perpetually introducing, no new colour appears at first sight as beautiful. A few weeks, even a few days alter our opinion; as soon as it is generally adopted by those who lead {246} the public Taste, and has become in consequence the mark of Rank and Elegance, it immediately becomes beautiful.  
"When the particular associations we have with such colours, are destroyed, their beauty is destroyed at the same time.  
"The different machines, instruments, &c., which minister to the convenience of Life, have, in general, from the materials of which they are composed, or from the uses to which they are applied, a fixed and determinate colour. This colour becomes accordingly in some degree beautiful, from its being the sign of such qualities; change the accustomed colour of such objects, and every man feels a kind of disappointment. This is so strong, that, even if a colour more generally beautiful is substituted, yet still our dissatisfaction is the same; and the new colour, instead of being beautiful, becomes the reverse. Rose-colour, for instance, is a more beautiful colour than that of Mahogany: yet, if any man were to paint his doors and windows with Rose-colour, he would certainly not add to their beauty. The colour of a polished steel grate is agreeable, but is not in itself very beautiful. Suppose it painted green, or violet, or crimson, all of them colours much more beautiful, and the beauty of it is altogether destroyed. Instances of this kind are innumerable."[47]](56441.docx#chunk3610)

[[Editor's footnote 47: The elements contributed by association are certainly more predominant in the pleasure of colours than in that of musical sounds; yet I am convinced that there is a direct element of physical pleasure in colours, anterior to association. My own memory recals to me the intense and mysterious delight which in early childhood I had in the colours of certain flowers; a delight far exceeding any I am now capable of receiving from colour of any description, with all its acquired associations. And this was the case at far too early an age, and with habits of observation far too little developed, to make any of the subtler combinations of form and proportion a source of much pleasure to me. This last pleasure was acquired very gradually, and did not, until after the commencement of manhood, attain any considerable height. The examples quoted from Alison do not prove that there is no original beauty in colours, but only that the feeling of it is capable, as no one doubts that it is capable, of being overpowered by extraneous associations.  
Whether there is any similar organic basis of the pleasure derived from form, so far at least as this depends on proportion, I would not undertake to decide.  
The susceptibility to the physical pleasures produced by colours and musical sounds, (and by forms if any part of the pleasure they afford is physical), is probably extremely different in different organisations. In natures in which any one of these susceptibilities is originally faint, more will depend on association. The extreme sensibility of this part of our constitution to small and unobvious influences, makes it certain that the sources of the feelings of beauty and deformity must be, to a material extent, different in different individuals.--\_Ed.\_]  
{247} Mr. Alison produces a very long line of illustrations to show that the Beauty of FORMS is not the mere sensation of Form, but consists, as in the case of sounds and colours, in the train of pleasurable ideas associated with the sensation. Mr. Alison is less happy, and more tedious, in the illustration of this than the preceding parts of his subject. We shall make little use of his proofs; because we can arrive, by a short process, at a very satisfactory conclusion.  
Mr. Alison seems not to have been aware of the {248} origin of our ideas of Form; and thence in expounding them has found many difficulties which do not in reality belong to the subject. He supposes that Form is altogether a sensation of sight. In a former part of this Inquiry, we ascertained the sensations: we saw that Form, in all its cases, is merely a modification of extension; that it is made known to us, by those feelings, which accompany the motion of certain of our members, as that of a finger, or a hand. Those feelings are in no danger of being confounded with the emotion of Beauty. They are feelings so completely indifferent, that in most of the associations into which the ideas of them enter as essential ingredients they are overlooked, and the very existence of them is commonly unknown.  
If the sensation is no cause of the Pleasure derived from Forms, it will not be questioned that association is the cause.  
Forms are either Animate or Inanimate. The associations with the Animate only differ from those with the Inanimate, in holding some additional ingredients. Some Forms affect us, by their magnitude, naturally associated with the idea of Power; some, by the uses to which they are applied, as the more powerful instruments of war; some, by the extent of their duration, with which we have obvious associations; some, by the splendour or magnificence, with the ideas of which they are associated,--the Throne, the Diadem, the Triumphal Car.  
The natural movements of the arm, from its turning in its socket as round a centre, are all waving; circles, or portions of circles, running into one another. All other movements are forced upon it, {249} and the effect of constraint. Hence the beauty of waving lines, because associated with the agreeable ideas of Ease, and absence of Restraint.  
As nothing is more agreeable to us than to trace the operation of design, of successful contrivance, some Forms affect us strongly by the idea of their Fitness, of their adaptation to an End.  
Others affect us not only by the idea of their adaptation to an end, but by the value which we attach to the end. In this case it is by their utility that they are said to please us.  
We associate with the idea of certain states of the Human Body, or at least of the Bodies of Animals in general, certain inward Dispositions; with great strength we associate great Wilfulness, and little regard of others; with frailness, we associate Delicacy, the ideas of gentleness, compliance, and regard for others. The forms of inanimate objects sometimes bear such an analogy to the Delicate and Frail in human Forms, that the ideas associated with the animate, are called up by the inanimate, and produce the emotion of Beauty.  
This emotion, however, is altogether prevented, when the more potent idea of Fitness intervenes. Any thing analogous to the slender form, which is so exquisitely beautiful in the more elegant grasses, would be a real deformity in the oak.  
More than one of those sources of agreeable association are often united in the same subject, and increase the emotion produced by it.  
Mr. Alison goes on to the exposition of the associations which constitute the Beauty of Motion, and the Beauty of the Human Form and Countenance. {250} But after what has been said, these associations are not difficult to trace; and I have already carried the illustration of this subject farther than I should have done, if I had not regarded this case of Association as affording most important aid toward the developement of all the more mysterious phenomena of the Human Mind.](56441.docx#chunk3611)

[We have here a class of Pleasures; the Feeling of Beauty, the Feeling of Sublimity; exercising a great influence over all cultivated minds. These Feelings, when taken as objects of general contemplation, appear perfectly simple. To such a degree have they assumed the appearance of simple and original feelings of our nature, even to Philosophers of eminence, that a particular sense has been supposed necessary to account for their existence. Yet all this apparent simplicity is only an exemplification of that association, by which a multitude of ideas are so intimately, and instantaneously blended together, that they appear to be not many ideas, but one idea.  
Of this highly important fact, we have had occasion to take notice of various leading cases, before. In the present case, however, there is a peculiarity; which it has in common with the various cases called Affection, which we have recently been engaged in considering. In the cases which occurred for examination, in the earlier part of this Inquiry, where we found long trains of Ideas so blended together, by association, as to appear not many ideas, but one; that of Motion, that of Space, that of Time, that of Personal Identity; the ideas associated were those of \_indifferent\_ sensations. The ideas, on the other hand, which are associated under the terms {251} Beauty and Sublimity, are ideas of \_pleasurable\_ sensations. The difference is that which is testified by every man's consciousness.  
That there should be a remarkable difference between a train composed of ideas of the indifferent class, and a train composed of ideas of the pleasurable class, can be easily supposed. It is necessary further to observe, that between two trains, both of the pleasurable class, there are such important differences, as to have suggested the use of marking them by different names. Thus, even in the class which we have been now considering, one train is composed of pleasurable ideas, of such a kind, that we call it sublime; another, of pleasurable ideas of such a kind, that we call it Beautiful. From the train of ideas associated with the form of the statue called the Venus de Medicis, we call it beautiful. We have a train of ideas, also pleasurable, associated with the bust of Socrates. But this is a train not reckoned to belong to the class either of the beautiful or the sublime; it is a train including all the grand associations connected with the ideas of intellectual, and moral, worth.  
A particular description of the sort of ideas which constitute each of the more remarkable cases of our pleasurable trains (that they are of one kind in one train, of another kind in another train,--of one kind, for example, in the trains called Sublimity, another in the trains called Beauty, another in the trains for which we have no better name than moral approbation, no one can doubt) would be highly necessary in a detailed account of Human Nature. It is not necessary for the Analysis which is the object of this {252} Work; and would engage us in too tedious an exposition.[48]  
[Editor's footnote 48: The objection commonly made to the psychological analyses which resolve Beauty into association, is that they confound the Beautiful with the merely agreeable. This objection is urged, for example, by Coleridge, in his Biographia Literaria. He admits, with every one else, that things not in themselves agreeable, are often made agreeable by association; that is, the pleasantness which belongs to the ideas with which they are associated, adheres to themselves: but this cannot, it is asserted, be the cause of their producing the particular emotion to which we attach the name of Beauty; because, as no feeling of beauty belongs to the ideas that are supposed to generate the emotion, no such feeling can be transferred from them to what they are associated with.  
Any one who has studied the Analysis up to this point, is aware of the inconclusiveness of this last argument. That a complex feeling generated out of a number of single ones, should be as unlike to any of those from which it is generated, as the sensation of white is unlike the sensations of the seven prismatic colours, is no unexampled or rare fact in our sensitive nature.](56441.docx#chunk3612)

[But it will also, I think, be found, in the case of our feelings of Beauty, and still more, of Sublimity, that the theory which refers their origin mainly to association, is not only not contradictory to facts, but is not even paradoxical. For if our perceptions of beauty and sublimity are of a more imposing character than the feelings ordinarily excited in us by the contemplation of objects, it will be found that the associations which form those impressions are themselves of a peculiarly imposing nature. This is apparent even from Alison; and if the Author of the Analysis had written later, he might have referred to a deeper thinker than Alison, and a more valuable because an unconscious witness to the truth of the Association theory. Mr. Ruskin, with profounder and more thoughtful views respecting the beauties both of Nature and of Art than any {253} psychologist I could name, undertakes, in the second volume of "Modern Painters," to investigate the conditions of Beauty. The result he brings out is, that every thing which gives us the emotion of the Beautiful, is expressive and emblematic of one or other of certain lofty or lovely ideas, which are, in his apprehension, embodied in the universe, and correspond to the various perfections of its Creator. He holds these ideas to be, Infinity, Unity, Repose, Symmetry, Purity, Moderation, and Adaptation to Ends. And he is, in my judgment, to a very considerable degree successful in making out his case. Mr. Ruskin, it is true, never thinks of inferring that our feelings of Beauty are the actual consequence of our having those elevating or cheering ideas recalled to us through manifold channels of association. He deems the emotion to be arbitrarily attached to these ideas by a pre-established harmony. But the evidence which he adduces goes far to prove the other point. If he succeeds, as I think he does, in showing that the things which excite the emotions of beauty or sublimity are always things which have a natural association with certain highly impressive and affecting ideas (whether the catalogue which he has made of those ideas is correct and complete or not), we need no other mode of accounting for the peculiar character of the emotions, than by the actual, though vague and confused, recal of the ideas. It cannot be deemed surprising that a state of consciousness made up of reminiscences of such ideas as Mr. Ruskin specifies, and of the grand and interesting objects and thoughts connected with ideas like those, must be of a more elevated character, and must stir our nature to a greater depth, than those associations of commonplace and every-day pleasures, which often combine with them as parts of the mass of pleasurable feeling set up in us by the objects of Nature and Art. In a windy country, a screen of trees so placed as to be a barrier against the prevailing winds, excites ideas of warmth, comfort, and shelter, which belong to the "agreeable," as distinguished by Coleridge from the Beautiful; and these enter largely into the pleasurable feeling with which we contemplate the trees, without contributing to give {254} them the peculiar character distinctive of aesthetic feelings. But besides these there are other elements constituting the beauty, properly speaking, of the trees, which appeal to other, and what we are accustomed, not without meaning, to call higher, parts of our nature; which give a stronger stimulus and a deeper delight to the imagination, because the ideas they call up are such as in themselves act on the imagination with greater force.  
As is observed by the author of the Analysis, the exposition in detail of the associations which enter into our various feelings of the sublime and beautiful, would require the examination of the subject on a scale not suited to the character nor proportioned to the dimensions of this Treatise. Of all our feelings, our acquired pleasures and pains, especially our pleasures, are the most complex; resulting from the whole of our nature and of our past lives, and involving, consequently, a greater multitude and variety of associations than almost any other phenomena of the mind. And among our various pleasures, the aesthetic are without doubt the most complex. It may also be remarked, and is a considerable confirmation of the association theory, that the feelings of beauty or sublimity with which different people are affected by the contemplation of the same object, are evidently as different, as the pleasurable associations of different persons with the same object are likely to be. But there are some ingredients which are universally, or almost universally, present, when the emotions have their characteristic peculiarity; and to which they seem to be mainly indebted for the extraordinary power with which they act on the minds which have the greatest susceptibility to them. These ingredients are probably more numerous and various than is commonly suspected; but some of the most important and powerful of them are undoubtedly pointed to, and illustrated with great force, in the discussion which I have mentioned, by Mr. Ruskin; to whose work I willingly refer the psychological student, as a copious source of at least far-reaching suggestions, and often of much more.](56441.docx#chunk3613)

[Supposing that all Beauty had been successfully analysed {255} into a lively suggestion of one or more of the ideas to which it is referred by Mr. Ruskin, the question would still remain for psychologists, why the suggestion of those ideas is so impressive and so delightful. But this question may, in general, be answered with little difficulty. It is no mystery, for example, why anything which suggests vividly the idea of infinity, that is, of magnitude or power without limit, acquires an otherwise strange impressiveness to the feelings and imagination. The remaining ideas in Mr. Ruskin's list (at least if we except those which, like Moderation, are chiefly ancillary to the others, by excluding what would jar with their effect) all represent to us some valuable or delightful attribute, in a completeness and perfection of which our experience presents us with no example, and which therefore stimulates the active power of the imagination to rise above known reality, into a more attractive or a more majestic world. This does not happen with what we call our lower pleasures. To them there is a fixed limit at which they stop: or if, in any particular case, they do acquire, by association, a power of stirring up ideas greater than themselves, and stimulate the imagination to enlarge its conceptions to the dimensions of those ideas, we then feel that the lower pleasure has, exceptionally, risen into the region of the aesthetic, and has superadded to itself an element of pleasure of a character and quality not belonging to its own nature.--\_Ed.\_]  
  
  
  
{256} CHAPTER XXII.  
  
MOTIVES.  
SECTION I.  
PLEASURABLE OR PAINFUL STATES, CONTEMPLATED AS CONSEQUENTS OF OUR OWN ACTS.  
  
IN contemplating pains and pleasures as future; in other words, anticipating them, or believing in their future existence; we observe, that, in certain cases, they are independent of our actions; in other cases, that they are consequent upon something which may be done, or left undone by us.  
Thus, in certain cases, we foresee that a painful sensation or sensations will be given us, but that something may be done by us which will prevent it: Again, that a pleasurable sensation, or sensations will be given us, but not unless something be done by us, of which the sensations are the consequence.  
It is necessary that those two cases, a pain to be prevented, and a pleasure to be obtained, by our own actions, should be distinguished from one another; but as they both rank under the title of a good, and, as it will shorten our phraseology to name them {257} together, we shall speak of the removal of pain, in the present section, at least, under the denominations of a pleasure.  
We have seen what is the state of consciousness, produced by the contemplation of a pleasurable sensation as future; that it is called Joy, if the pleasure is contemplated as certainly future, in other words, believed; that it is called Hope, if the sensation is contemplated as not certainly future, that is, if the anticipation does not amount to belief.  
We have also seen what is our state of consciousness, when we contemplate the cause of a future pleasure, and the pleasure, together. It is a mixture of Love, and Joy; Love as regards the cause; Joy as regards the sensation.  
The association which constitutes those States of Mind (AFFECTIONS, as they are commonly called) it is hardly necessary to repeat. The anticipation of a future sensation, is merely the association, the result of prior sensations, of a certain number of antecedents and consequents. I anticipate, for example, the pleasing sensation of light, at a certain hour to-morrow morning. The meaning is, that with my sensations of the present moment, are associated those of the next; with those of the next those of the following; and so on, till sleep; after sleep, waking, and then the anticipated sensation.  
When the cause is contemplated along with the sensation, the association which constitutes the process of anticipation is the same, till we arrive at the link which immediately precedes the sensation. Thus, if instead of the pleasurable sensation of light, the pleasure of breakfast, is my anticipation of to-morrow {258} morning; in that case, the idea of the pleasure of eating is associated with the idea of the food, not as with an ordinary antecedent, but that peculiar antecedent which is called a cause.  
When the idea of the Pleasure is associated with an action of our own as its cause; that is, contemplated as the consequent of a certain action of ours, and incapable of otherwise existing; or when the cause of a Pleasure is contemplated as the consequent of an action of ours, and not capable of otherwise existing; a peculiar state of mind is generated which, as it is a tendency to action, is properly denominated MOTIVE.  
The word MOTIVE is by no means steadily applied to its proper object. The pleasure, for example, which is the consequent of the act, is apt to be regarded as alone the impelling principle, and properly entitled to the name of \_Motive\_. It is obvious, however, that the idea of the pleasure does not constitute the motive to action without the idea of the action as the cause; that it is the association, therefore, to which alone the name belongs.](56441.docx#chunk3614)

[As every pleasure is worth having; for otherwise it would not be a pleasure; the idea of every pleasure associated with that of an action of ours as the cause, is a motive; that is, leads to the action. But every motive does not produce the action. The reason is, the existence of other motives which prevent it. A man is tempted to commit adultery with the wife of his friend; the composition of the motive obvious. He does not obey the motive. Why? He obeys other motives which are stronger. Though pleasures are associated with the immoral act, pains are {259} associated with it also; the pains of the injured husband; the pains of the injured wife; the moral indignation of mankind; the future reproaches of his own mind. Some men obey the first, rather than the second motive. The reason is obvious. In them, the association of the act with the pleasure, is, from habit, unduly strong; the association of the act with the pains, is, from want of habit, unduly weak. This is a case of bad Education; and one highly unfortunate, for the value of the pleasures in question is infinitely outweighed by the value of the pains. The business of a good education is to make the associations and the values correspond.  
In the preceding paragraph, I have spoken of the abstaining from an act, as an act. Though this language is not rigidly correct, yet as it will lead to no confusion, and will often permit the use of abridged expressions, I shall not scruple, as often as I find occasion, to adopt it.  
In the cases adduced above, of one man who obeys the motive to commit a crime, of another who obeys the motive to abstain from it, we have an example of an important fact; that, among the different classes of motives, there are men who are more easily and strongly operated upon by some, others by others. We have also seen, that this is entirely owing to habits of association. This facility of being acted upon, by motives of a particular description, is that which we call DISPOSITION. And it is necessary to take notice of the name and its meaning here; because we shall find that many of the names of \_Motives\_ are names also of the corresponding \_Dispositions\_; and we should not, therefore, be able to exhibit distinctly the {260} marking power of such names, without an accurate conception of what it is which, in this mode of using them, they are employed to mark.  
Each of the senses affords sensations, which, associated with the act which is its proper antecedent, may be considered as forming a class of motives.  
In most of its cases, this association, taking place uniformly and habitually, is, like the motion of the eyelids, unnoticed, and not provided with a name.  
Two cases, however; one, the pleasures of the palate; the other, those of sex; act so important a part in human life, that the motives they constitute by association with their antecedents, have not been left without names; though very defective ones have been applied to them.  
Thus, for the motive of Eating, we have the name Gluttony: but gluttony is applied to it only when it is unduly strong. In like manner, we have the name Lust for the motive of sex; but that, too, only when the motive is unduly strong, or in some other respect faulty.  
We have here an instance of that confusion of names which was noticed above; the same word employed as the mark of two different things; first, the Motive; secondly, the readiness to be acted upon, and strongly acted upon, by it. The name Gluttony is not only the name of a certain \_Motive\_; it is also the name of the corresponding \_Disposition\_; a readiness to obey that motive. The name Lust is not only the name of the \_Motive\_; but also of the \_Disposition\_, or a readiness to obey the motive.  
Drunkenness is a name used in the same way exactly as the preceding two. It is the name of a motive, {261} only in the case of excess. And it is a name with a double meaning, being applied both to the Motive, and the Disposition.  
For these several motives, in the cases which are not considered as in excess, we have none but circumlocutory names; as, love of eating; love of drinking; love of sex. It is to be observed, also, that the circumlocutory names have the same double meaning, as the preceding single name; they are the names both of the \_Motive\_, and the \_Disposition\_.  
The motives, arising from the pleasures of the palate, and from the pleasures of sex, are sometimes spoken of as two species of one genus. To this the name \_Sensuality\_ is applied. The fact, however, rather is, that the cases of excess, named Gluttony, Drunkenness, Lust, are considered as the species of a certain genus. Sensuality is rather a generical name of the cases of excess, than of those of moderation.  
\_Sensuality\_ has the same duplicity of meaning, with all the other names, just enumerated; it is the name, both of the \_Motive\_ and of the \_Disposition\_.  
\_Temperance\_, and \_Intemperance\_, are names of Dispositions, which have a reference to pleasures generally.  
We have seen, from a previous illustration, that when the motive resulting from the association of a pleasure is not obeyed, it is owing to the association of a pain. When the association of the pain resulting from any act so balances that of the pleasure, that when the value of the pain exceeds that of the pleasure, the pleasure never prevails,--the {262} Disposition called \_Temperance\_ exists; that is, an equal facility of associating with any act both its pleasures and its pains.](56441.docx#chunk3615)

[When the association in the two cases is not in this manner equally balanced; that is, when the association of the pleasures is an overmatch for the pains, the Disposition called \_Intemperance\_ exists.[49]  
[Editor's footnote 49: A Motive is that which influences the will; and the Will is a subject we have not yet arrived at the consideration of. Meanwhile, it is here shewn that a motive to an act consists in the association of pleasure with the act; that a motive to abstain from an act, is the association of pain with it; and we are prepared to admit the truth deduced therefrom, that the one or the other motive will prevail, according as the pleasurable or the painful association is the more powerful. What makes the one or the other more powerful, is (conformably to the general laws of association) partly the intensity of the pleasurable or painful ideas in themselves, and partly the frequency of repetition of their past conjunction with the act, either in experience or in thought. In the latter of these two consists the efficacy of education in giving a good or a bad direction to the active powers.  
In further elucidation of Motives, I cite the following passages from the First Appendix to the author's "Fragment on Mackintosh" (pp. 389, 390):--  
"A motive is something which moves--moves to what? To action. But all action, as Aristotle says, (and all mankind agree with him) is for an end. Actions are essentially means. The question, then, is, what is the end of action? Actions, taken in detail, have ends in detail. But actions, taken in classes, have ends which may be taken in classes. Thus the ends of the actions which are subservient to the pleasures of sense, are combined in a class, to which, in abstract, we give the name sensuality. The class of actions which tend to the {263} increase of power, have a class of ends to which we give the name ambition, and so on. When we put all these classes together, and make a \_genus\_; that is, actions in general; can we in like manner make a genus of the ends; and name ends in general?  
"If we could find what the several classes of ends; sensuality for example; ambition; avarice; glory; sociality, &c. have in common, we could.  
"Now, they have certainly this in common, that they are all agreeable to the agents. A man acts for the sake of something agreeable to him, either proximately or remotely. But agreeable to, and pleasant to; agreeableness, and pleasantness, are only different names for the same thing; the pleasantness of a thing is the pleasure it gives. So that pleasure, in a general way, or speaking generically; that is, in a way to include all the species of pleasures, and also the abatement of pains; is the end of action.  
"A motive is that which moves to action. But that which moves to action is the end of the action, that which is sought by it; that for the sake of which it is performed. Now that, generically speaking, is the pleasure of the agent. Motive, then, taken generically is pleasure. The pleasure may be in company or connection with things infinite in variety. But these are the accessaries; the essence, is the pleasure. Thus, in one case, the pleasure may be connected with the form, and other qualities of a particular woman; in another, with a certain arrangement of colours in a picture; in another, with the circumstances of some fellow-creature. But in all these cases, what is generical, that is the essence, is the pleasure, or relief from pain.  
"A motive, then, is the idea of a pleasure; a particular motive, is the idea of a particular pleasure; and these are infinite in variety.  
"Another question is, in what circumstances does the idea of a pleasure become a motive? For it is evident, that it does not so in all. It is only necessary here to illustrate, not to resolve the question. First, the pleasure must be {264} regarded as attainable. No man wills an act, which he knows he cannot perform, or which he knows cannot effect the end. In the next place, the idea of the particular pleasure must be more present to the mind, than any other of equal potency. That which makes the idea of one pleasure more potent than another; or that which makes one idea more present to the mind than another, is the proximate cause of the motive, and a remote cause of the volition. The cause of that superior potency, or of that presence to the mind, is a cause of the volition, still more remote, and so on.--\_Ed.\_]  
  
{265} SECTION II.  
CAUSES OF OUR PLEASURABLE AND PAINFUL STATES, CONTEMPLATED AS THE CONSEQUENTS OF OUR OWN ACTS.  
  
The motives which are formed by the association of our actions, not with our pleasures immediately, but the causes of them, are much more numerous than those which are formed by the association of them with the pleasures themselves; and give birth to a much greater number of actions.  
The cause of this we have already explained, and need not explain it again.  
The causes of our Pleasures, including as well the remote as the proximate, are so numerous, that it is necessary to speak of them in classes.  
We have surveyed them under the following Heads; Wealth, Power, Dignity, our Fellow-creatures, the objects called Sublime and Beautiful; and having fully explained the associations by which they become AFFECTIONS, we have now only to shew, by what additament these Affections are converted into MOTIVES.](56441.docx#chunk3616)

[It is not difficult to trace the course of association. The idea of the pleasure carries us to the idea of the cause; the idea of that cause, to the idea of its cause; and so on till we arrive at that action of ours which is the commencing cause, and gives birth to all the {266} rest. This association forms a complex state of consciousness, which receives the name of MOTIVE.  
It is also to be observed, that when a grand cause of pleasures has been associated with a great many pleasures, and a great many times, the association acquires a peculiar character and strength. The idea of the cause, as cause, is so lost among the innumerable ideas of the pleasures combined with it, that it seems to become the idea of pleasure itself. An instance commonly adduced to illustrate the important class of associations to which this belongs, is that of \_Money\_; and a remarkable instance it is. Many are the instances in which the association of pleasures with money constitutes so vehement an affection that it is an overmatch for all others.  
In those cases the association which constitutes the motive seems to consist of a single link. The money is the passion; the idea of the action which is to add to it, or prevent its diminution, associated with the passion, constitutes the Motive.  
The Motive which leads to the acquisition of wealth, great as is the part which it plays in human life, has no appropriate name. Avarice, Rapacity, like the words Gluttony, and Lust, are only names for cases of excess. It is observable, however, that they have the above-noticed duplicity of meaning; that they are names both of the Motive, and of the Disposition.  
We have noticed three states of consciousness into which the idea of a cause of our pleasures enters as a main ingredient: 1. The mere contemplation of it as a cause, past or future; which is called the AFFECTION: 2. The association of an act of ours, as the {267} cause of the cause; which is called the MOTIVE: 3. A readiness to obey this motive, which is called the DISPOSITION.  
We have seen, that in regard to Wealth, we had no other name for the first of those states of Consciousness, or the AFFECTION, than the term "Love of Wealth." It is here of importance to observe, that for the Motive also, or the second of those states, unless in its cases of excess, we have no other name than the name of the affection. We call the \_Motive\_ also, "love of wealth." Nor have we any other name for the \_Disposition\_. This, therefore, is a case of great confusion. We have but one name for the \_Affection\_, for the \_Motive\_, and for the \_Disposition\_. They are states of consciousness, therefore, perpetually confounded.  
Power, as a cause of pleasure, is rather a less distinct and definite idea, than Wealth. The associations formed with it partake of this indistinctness. The \_Motive\_ which is formed by association of the idea of Power, with that of an act of ours, which is to add to it, is a more vague idea than that formed of the idea of Wealth associated with the ideas of the acts which are to add to it. Our present purpose, however, does not require a minute analysis. The acts by which, in the different degrees in which it is possessed, men are commonly enabled to add to their power, are vulgarly known. Power, like wealth, becomes itself a sort of primary affection. The association with it of acts of ours as causes of its increase, constitutes the state of mind called the Motive.  
This Motive receives the name of Ambition; and that name is so applied pretty generally; though its {268} original and more appropriate application seems to be, to great acquisitions of power, or additions made to great acquisitions.  
The same duplicity of meaning, which we have so often remarked, meets us here. In whatever sense Ambition is the name of the \_Motive\_, it is also a name of the \_Disposition\_.  
The term "Love of Power," which we have found to be the name of the \_Affection\_, is also applied to the two other states of mind, the \_Motive\_, and the \_Disposition\_. The three, therefore, \_Affection\_, \_Motive\_, \_Disposition\_, are commonly confounded.  
Dignity is a more vague term than even Power; including a still greater number of undefined particulars. But to understand sufficiently the three states of mind which it contributes to form, no further enumeration of those particulars is necessary. The idea of Dignity, as cause, associated with the idea of pleasures as effect, constitutes the state of mind called \_Affection\_. The state of mind called affection associated with the idea of an act of ours as cause of the cause, is the state of mind called the \_Motive\_. And a facility of being acted upon by the motive, is the \_Disposition\_.  
We have only one name, "Love of Dignity," for all the three.  
We have seen that the value of Wealth, Power, and Dignity, is greatly enhanced, by their comparative amount; that is, the degree in which they are possessed by us, compared with the degree in which they are possessed by others.  
We have seen in what manner this comparison generates certain affections, which have received the {269} names of Pride, on the one hand, Contempt, on the other; Humility, on the one hand, Respect, Admiration, on the other. We have now to shew in what manner this comparison generates both \_Motives\_, and \_Dispositions\_.  
As it is not only of value to me to have more Wealth, Power, and Dignity; but of additional value to have more than other men; the surpassing of other men becomes, thus, a cause of Pleasure; and hence the idea of this surpassing, associated with the ideas of my own acts, as the cause, becomes a \_Motive\_.](56441.docx#chunk3617)

[We may endeavour to surpass other men, by either of two ways; by adding to our own Wealth, Power, Dignity; or, by abstracting from theirs.  
When only the acts which add to our advantages enter into the Motive, it is called Emulation. When those which abstract from the advantages of another enter into it, it is called Envy.  
Emulation is sometimes the name of the \_Disposition\_, as well as of the \_Motive\_. Ambition, however, is very often used as the name of the Disposition corresponding to the \_Motive\_, Emulation.  
Envy, is the name both of the \_Disposition\_ and the \_Motive\_. It has the appearance also of being the name of the corresponding \_Affection\_; or of the state of consciousness arising from the comparison of another man's greater, with our own less advantages. This, however, is only Humility. It is never Envy, but when the Motive to reduce them is felt. It may be a Motive without effect, being counteracted by other motives. And it is this state in which it assumes the appearance of an \_Affection\_.  
In these instances, the same end is attainable by {270} two sets of means; the one virtuous; the other vicious. The man who takes the virtuous course, that is, obeys the virtuous motive, is the man who has formed the habit of associating his idea of the good to be derived from surpassing others, with the acts which lead to the increase of his own advantages. The man who takes the vicious course, is the man who has formed the habit of associating with his idea of the benefit of surpassing others, the acts, by which their advantages are diminished.  
This a case of the greatest importance, in Education, and Ethics.  
We now come to the explanation of that important class of Motives which arise from the contemplation of our FELLOW-CREATURES, as the cause of our Pleasures, and Pains.  
With respect to our Fellow-creatures, a distinction must be carefully observed. They are sources to us of Pleasure or Pain, in two ways; either by their STATES; or, by their Actions. Their ACTIONS give birth to a set of Associations of the greatest importance, which remain to be considered under a Head by themselves. What the \_Affections\_ are, which are generated by the association of our pains and pleasures, with the STATES of our Fellow-creatures, taken individually, or in groups, we have recently examined. We have now only to shew, and for this a few words will suffice, what are the \_Motives\_, generated by the association of acts of ours with those STATES; acts contemplated as causes of such alterations in the States as render them to a greater or less degree causes of our pleasures or pains.  
1. What the state of my \_Friend\_ is, as respects both {271} his outward circumstances and his inward disposition, which renders him, more or less, a source, to me, of pleasure on the one hand, or pain on the other, it is not necessary, after what has been said, any further to illustrate. When alterations can be effected in that state by my actions, of a kind to render my Friend more a cause of Pleasure to me, or less a cause of Pain, the association takes place of my pleasures as effect with such alterations as cause of those pleasures, and with my own acts, as cause of those alterations.  
The MOTIVE, therefore, exists. And when a facility of forming this association, in other words, a readiness of obeying the MOTIVE, is contracted, the Disposition exists.  
It is important to observe, that the word, \_Friendship\_, has all that equivocation, or variety of meaning, which we have detected in other words expressing our states of mind towards the causes of our pleasures or pains. It is, at once, the name of the AFFECTION, the name of the MOTIVE, and the name of the DISPOSITION.  
2. We have seen what the State of any one of our fellow-creatures is, which so associates with it the ideas of our own pains and pleasures, as to make him an object of \_Kindness\_. It is easy to see in what manner the ideas of our own acts are so joined to those associations, as to constitute \_Motives\_. When the idea of additions to the pleasures of a man, calls up the idea of additions to our pleasures; the idea of a diminution of his pains, the idea of a diminution of our pains; and when to this is added the idea of our own acts as cause of those additions and diminutions, the association exists which we call MOTIVE.  
{272} The motive, which we are now considering, though in most men, owing to a bad education, in which so important an association has been neglected, it is too feeble, not to give way to any of the stronger propensities of our nature, is, nevertheless, from the constancy of its action, a powerful agent in human life, and the cause of no small portion of all the happiness which exists in the world.  
A readiness to be acted upon by this MOTIVE; a main object of good Education; constitutes the DISPOSITION.  
The AFFECTION, the MOTIVE, the DISPOSITION, have all but one name. Each is denominated \_Kindness\_. When the more immediate effect is the removal of pain, we use the term \_Compassion\_; which is, in like manner, a name of the affection, the motive, and the disposition.  
3. The State of the group, denominated a Family, is a copious source of pain, or pleasure, to the members of it. We have explained, above, the associations which constitute the Family \_Affections\_. The formation of the \_Motives\_ it is now easy to trace.](56441.docx#chunk3618)

[To take the principal case, that of the Parent; The pleasurable associations which he has with the pleasures, and removal of the pains, of his child, joined with the idea of his own acts, as cause of those pleasures and removals, constitute a MOTIVE, the importance of which we daily observe. Notwithstanding the defects of the parental associations, under such a state of Education and Morals as ours, no other source of generosity in Human Nature produces uniformly so large a portion of its proper effects.  
It is not necessary to explain in what manner the affections, either of the child towards the parent, or of {273} brothers and sisters towards each other, become motives. That such motives often exist, and in great strength; and that no small portion of human happiness is derived from them, is matter of experience.  
We have no appropriate name for either the AFFECTION, or the MOTIVE, or the DISPOSITION, in the case, either of the parent toward the child, or of the child toward the Parent, or of the children among themselves. We are under the necessity of forming circumlocutory names, by aid of the general term Love. We say the Love of Family; the Love of a Parent toward his offspring; the Love to one another of brothers and sisters. And these are names, at once, of the AFFECTION, the MOTIVE, and the DISPOSITION. So imperfectly have some of the most interesting and important of our states of consciousness been distinguished.  
4. The idea of our \_Country\_ is associated, as in some sort their cause, with a great portion of all the pleasures which we enjoy. And the difference of the states, in which it may be placed, makes a prodigious difference in the amount of pleasures, which we derive from it. When actions of ours, therefore, can influence the state of our country, we associate the idea of those acts as causes, with the pleasurable results as effects, and hence the MOTIVE exists.  
To individuals of the great body of the people, wholly in most countries deprived of power, their country can seldom present itself in the light of a motive, because with few acts of theirs as cause, can they associate a benefit to their country as the Effect. Their exertions in repelling from it the invasion of a destructive enemy, or freeing it from the power of a {274} mischievous government, are the principal exceptions to this general rule.  
The way in which the idea of Country becomes a \_Motive\_ to a man whose actions are more widely operative, may thus be conceived. In the prosperity of his country, is included a portion of his own prosperity, and of that of all the individuals who are objects of his affection. Such actions of his, therefore, as are calculated to add to the prosperity of his country, are associated with all the agreeable trains, which additions to the prosperity of himself, and of all those with whom he has any sympathies, imply.  
There are cases, though rare, in which this motive has existed in extraordinary force; in which men have been found capable of sacrificing every thing for their country. This happens most readily in times of great excitement; that is, when public opinion holds out a great reward; and when the object rather is, to ward off some great calamity, than to obtain an accession of good.[50]  
[Editor's footnote 50: It is too limited a view of the effect of "times of great excitement" in intensifying the patriotic feelings, to identify it with the influence of a more than usual reward held out by public opinion. That fact often contributes its share, but there are other causes fully as effectual. In times of excitement, the idea of Country, the ideas of all the interests involved in it, and of the manner in which those interests will be affected by our action or by our forbearance to act, exist in the mind in greater intensity, and are recalled with far greater frequency, than in ordinary times. Moreover, the fact that a feeling is shared by all or many of those with whom we are in frequent intercourse, strengthens, by an obvious consequence, all the associations, both of resemblance and of contiguity, which give that feeling its force. This is the well-known influence of sympathy, so strikingly evinced by the vehement feelings of a crowd. To these might be added another influence, belonging rather to physiology than to psychology. When the nervous system has been highly strung up by the influence of any strong feeling, it seems to become more acutely sensible to feeling of any sort, those feelings excepted which jar with, and are counteracted by, the prevailing tone of the system.--\_Ed.\_]  
{275} It is important to observe, that this motive tends different ways, according to the different positions of the individual. Where the inhabitants of a country are divided into classes, a Ruling Class, and a Subject Class, the members of the Ruling Class have hardly any sympathies, except with one another; in other words, have agreeable associations with the pleasures, and removal of the pains, of hardly any persons, but those who belong to the same class. In this class are contained, their Parents, their Brothers and Sisters, their Sons and Daughters, their Companions, whether Male or Female, and their Friends: the manners of this class, are to them the only agreeable manners; the morals of this class the only virtue. It hence appears, that the principal part of the associations, which make the idea of country an AFFECTION, are, in their case, connected exclusively with the good of their own class. When their own acts, as causes, are associated with accessions to this good, as effects, the \_Motive\_ created is that of benefit to the class. Patriotism, in their case, means, literally, 1st, Affection for their own class; 2ndly, The Motive to benefit that class; and 3rdly, A readiness to obey that Motive.](56441.docx#chunk3619)

[It is to be observed, that Patriotism is the only {276} name provided for all the three states of the agreeable trains connected with the idea of country, the AFFECTION, the MOTIVE, and the DISPOSITION,--and that it is commonly used in a laudatory sense; to mark an unusual degree of the Affection, the Motive, or the Disposition.  
It follows, from what has been said, that there can be no real Patriotism, no pointing of the \_Affection\_, the \_Motive\_, and \_Disposition\_, steadily to the good of the whole, without preference of any particular part; except, either in men of elevated minds and affections, in whom the larger associations, generated by a good Education, control the narrow associations, growing out of a particular position; or, in men whose position is such as to give them pleasurable associations chiefly with individuals of the general mass, whose good has this happy quality, that it is always identified with that of the community at large.  
5. The group, called a \_Party\_, or \_Class\_, generates associations, which have produced great, we may say terrible, effects, in human life; and which thence deserve a great degree of attention. The associations, of which the AFFECTION consists, and by which the interest of the class comes to be identified, as it were, with the interest of the individual, have been already pointed out. From this the generation of the MOTIVE is easily traced.  
When the interests of the class are contemplated as capable, either of receiving increase, or of being preserved from diminution, by the acts of the class, collectively, or individually; that is, when the increase, or the preservation from diminution, is associated, as {277} effect, with acts of the class, collectively, or individually, as cause, the MOTIVE exists.  
When a readiness to obey this MOTIVE; that is, a facility of forming the associations which constitute the MOTIVE exists, the corresponding DISPOSITION exists.  
There are no appropriate names for these states of consciousness. We make, by the usual forced service of the word Love, a name for necessary occasions. A nobleman says, he has a Love for his Order; and that term, Love of his Order, is the name for all the three states, the AFFECTION, the MOTIVE, and the DISPOSITION.  
The Clergy have invented a name for their own case. It is Love of the Church. This means, the love of the interests of the class; of the Wealth, Power, and Dignity, of the Clergy. The term Love of the Church has the usual variety of meaning. It is the name not only of the AFFECTION, but also of the MOTIVE, and the DISPOSITION.  
It is moreover a name well contrived for the purposes of the class; because it is calculated to keep the real character of the associations out of sight.  
6. The aggregate, included under the comprehensive term \_Mankind\_, is in so many ways associated with our pains and pleasures, that the interest of each individual appears, in some degree, bound up in the interest of the race. Any act of ours, then, by which the interest of the race can be promoted, is associated in our minds with our own interest; and becomes a motive. A readiness to act upon this MOTIVE, is the DISPOSITION and the AFFECTION, the {278} MOTIVE, and the DISPOSITION, have but one name, Love of Mankind.  
This motive operates feebly, and is easily overruled by other motives, in the great majority of men. A very general idea, such as that of \_Mankind\_, is an indistinct idea; and no strong association is formed with it, except by the means of Education. In the common run of men, the narrow sympathies, alone, act with any considerable force. Such men can sympathize with this individual, and the other individual, with their own Family, or their own class. But to sympathize with mankind at large, or even with the body of the people in their own country, exceeds the bounds of their contracted affections.  
Large Classes, which cannot be the object of our Senses, become steady subjects of contemplation, only through the medium of General Terms. Applied, in comprehensive, and important Propositions, General Terms call forth associations of the most interesting nature; and to men, who are in the habit of so applying them, become the source of an affection, powerful enough to control every other propensity of their nature. It is only by a Philosophical Education, that men are early trained to the use of General Terms, and comprehensive Propositions; and have the means of forming those associations, on which the most ennobling of all the states of Human Consciousness depends.[51]  
[Editor's footnote 51: This Section is devoted to an exposition of the manner in which facts which are not pleasures or pains, but causes of pleasures or of pains, become so closely associated in thought {279} with the pains and pleasures of which they are causes, as not only to become themselves pleasurable or painful, but to become also, by their association with acts of our own by which they may be brought about, motives of the greatest strength. The value of a due understanding of this fact, both for the purposes of psychological science and for those of practical education, is evidently very great: and the author, to whose mind the bearings of speculative philosophy on the practical interests of the human race were ever present, has not failed to make some ethical and political applications of the psychological truth which he has here so excellently illustrated.--\_Ed.\_]  
  
  
  
{280} CHAPTER XXIII.  
THE ACTS OF OUR FELLOW-CREATURES, WHICH ARE CAUSES OF OUR PAINS AND PLEASURES, CONTEMPLATED AS CONSEQUENTS OF OUR OWN ACTS.  
  
WE are now in a condition to explain the Phenomena, which have been classed under the titles of Moral Sense, Moral Faculty, Sense of Right and Wrong, Moral Affection, Love of Virtue, and so on, which are all names of similar import.](56441.docx#chunk3620)

[We have already remarked, that, of all the Causes of our Pleasures and Pains, none are to be compared in point of magnitude, with the actions of ourselves, and our Fellow-creatures. From this class of causes, a far greater amount of Pleasures and Pains proceed, than from all other causes taken together. It follows, that these causes are objects of intense affection to us; either favourable, if they are the cause of Pleasure; or unfavourable, if they are the cause of Pain.  
The actions from which men derive advantage have all been classed under four Titles; Prudence, Fortitude, Justice, Beneficence.  
We apply the names Prudent, Brave, Just, {281} Beneficent, both to our own acts, and to the acts of other men.  
When those names are applied to our own acts, the first two, Prudent and Brave, express acts which are useful to \_ourselves\_, in the first instance; the latter two, Just, and Beneficent, express acts, which are useful to \_others\_, in the first instance.  
When we apply the same names, not to our own acts, but to the acts of other men, the first two, Prudent and Brave, express acts which are useful to them in the first instance; the latter two, Just and Beneficent, express acts which are useful to others, in the first instance.  
It is further to be remarked, that those acts of ours, which are primarily useful to ourselves, are secondarily useful to others; and those which are primarily useful to others, are secondarily useful to ourselves. Thus, it is by our own Prudence and Fortitude, that we are best enabled to do acts of Justice and Beneficence to others. And it is by acts of Justice and Beneficence to others, that we best dispose them to do similar acts to us.  
Again, in the case of other men, the acts which are primarily useful to themselves, their Prudence, their Fortitude, are secondarily useful to others, as by them they are the better enabled to be always just and beneficent; and the acts by which they are primarily useful to others, their Justice, their Beneficence, are secondarily useful to themselves, as disposing others the more to be just and beneficent toward them.  
We have two sets of associations, therefore, with the acts which are thus named; one set of associations {282} with them, when they are considered as our own acts; another set of associations with them, when they are considered as the acts of other men.  
1. When they are considered as our own acts; in other words, when we consider our own Prudence, Bravery, Justice, and Beneficence, we have associations with them of the following kind. With our own acts of Prudence and Bravery, we associate good to ourselves; that is, either Pleasure, or the cause of Pleasure, as the immediate consequent. Acts of PRUDENCE, for example, are divided into two sorts; the sort productive of good, and the sort preventive of evil. All acts which add to our Wealth, Power, and Dignity, or any one of them, so far as they produce this effect without counterbalancing evil, may be called acts of Prudence. Thus, incessant Labour, by all those to whom it is necessary for subsistence, or for reputation, is a course of Prudence. Prudence, however, in its common acceptation, is more employed to denote the acts by which we avoid evils, than those by which we obtain good; those by which we reject present pleasures when followed by pains which overbalance them, and by which we endure present pains when they prevent the following of greater pains, or secure the following of pleasures which overbalance them.  
It thus appears, that, for the most perfect performance of acts of prudence, the greatest measure of knowledge is required. It is the choice made, among all the innumerable acts within our power, of those, the consequences of which, when the pleasurable and painful are balanced against one another, constitute the greatest amount of good. To this is requisite a {283} knowledge of all the train of consequences, which each act can produce; that is, a knowledge of the qualities of almost every thing, animate and inanimate, with which we are surrounded; and a judgment, constantly upon the alert, to draw correct conclusions from what we know.  
When we perform acts of COURAGE or FORTITUDE, the chance of Evil, that is, danger, is incurred for the sake of a preponderant good. If the good were not something more than a balance for the chance of Evil, the consequences of the act would not be a balance of good, but of evil. It would, therefore, be an immoral, not a moral, act; and would have no title to the name of Courage.[52]  
[Bain's footnote 52: The virtue of Prudence might apparently have included Courage or Fortitude; we cannot be said to be prudent, if we are unable to face a certain amount of evil or danger, for the sake of a greater good. Doubtless, however, the author felt that Prudence does not suggest the full scope of so eminent a quality as Courage. The reasons of this are interesting to explore.  
Of various considerations that might be adduced, by far the most pertinent is the following. Courage, as a virtue esteemed and extolled in all ages, involves a certain amount of self-sacrifice. If it were limited to the control of the state of fear, so as to enable one never to fail in the pursuit of one's own interest, by giving way to unreasonable alarms, it would be respected as a manifestation of strength, but it would not receive the warm admiration that we usually bestow upon courageous men. The nobility of courage is its devotedness. The courageous soldier is not he that maintains a post of apparent danger unmoved, knowing there is no real danger; which would be the prudent man's courage. Something very different is exacted in return for the epithet "a brave man."--\_B.\_]](56441.docx#chunk3621)

[Knowledge is, therefore, as necessary to the exercise of this virtue as to that of Prudence. Courage, in fact, is but a species of the acts of Prudence: a class selected for distinction by a particular name; that class, in which evils, of great magnitude, or rather of a particular description, are to be hazarded, for the sake of a preponderant good. But how is the {284} amount of the good, or of the evil, to be ascertained, but by that power of tracing the consequences of acts, for which the greatest knowledge, and the most accurate judgment, are required?  
When, with the ideas of our acts of Prudence, and acts of Courage, past, and future, have been associated, sufficiently often, the classes of benefits which are the consequences of them, the Ideas of those acts are no longer SIMPLE IDEAS, INDIFFERENT IDEAS; they are PLEASURABLE IDEAS; that is, AFFECTIONS.  
The MOTIVE, in this case, presents a peculiarity, which requires attention. In the case of the Love of Wealth, Power, or Dignity, the Love of Individuals, the Love of Family, and all other causes of our Pleasures, we have uniformly found the \_Affection\_ to be one thing, the \_Motive\_ another. The \_Affection\_ consisted of the association of the idea of the object as Cause, with that of our Pleasures as Effect. The \_Motive\_ consisted of the association of the idea of the object, as cause, with that of our pleasures, as effect, and the idea of an act of ours, as cause of that cause. When it is an act of our own, however, which is the cause of our Pleasure, there is no act of ours to be associated as cause of that cause. The {285} ideas of the act, and its consequences, are the Motive. The MOTIVE, therefore, and the AFFECTION, are in this case the same.  
The next two classes of acts are those to which the names, Justice, and Beneficence, have been applied. Taken together, they are the names of all those acts of a man, by which he does good to others. Out of these, the name Justice selects a particular class, and all the rest are Beneficence.  
Men, in society, have found it essential, for mutual benefit, that the powers of Individuals, over the general causes of good, should be fixed by certain rules; that is, Laws. Acts done in conformity with those rules are called Just Acts; and, when duly considered, they are seen to include the main portion of acts of beneficence in general; of those acts of ours, the immediate object of which is the good of others. To the performance of a certain portion of the acts of Justice, our Fellow-creatures compel us, by annexing penalties to the non-performance of them. A large portion, however, remain to be performed without compulsion.  
Our Beneficent acts are either causes of pleasure to others immediately, or causes of the causes of their pleasures. The act of him who gives a cup of water to the thirsty traveller in the Desert, may be said to be cause of the pleasure of the Traveller. The act of him who instructs the Traveller, before he proceeds on his journey, where in the Desert water is to be found, is the cause of the cause of his Pleasure. To speak generally, all acts of ours, by which increase is imparted to the Wealth, Power, and Dignity of another person, and to the favourable disposition of {286} other persons towards him; or by which diminution of those advantages is prevented, are acts of Beneficence towards him.  
It is easy to trace in what manner the ideas of those acts become \_Affections\_. In the first place, we have associations of pleasure with all the pleasurable feelings of a Fellow-creature. We have associations of pleasure, therefore, with those acts of ours which yield him pleasure. In the second place, those are the acts which procure to us one of the most highly valued of all the sources of our pleasures, the favourable Disposition of our Fellow-men. With our acts of Justice and Beneficence, therefore, we have associations of all the pleasures which the favourable disposition of other men towards us is calculated to produce. By those associations, the Idea of our own beneficent acts is no longer an INDIFFERENT IDEA; it becomes a PLEASURABLE IDEA, that is, an AFFECTION.[53]  
[Bain's footnote 53: The affirmations in this paragraph require to be tested in the detail, in order to find out their limitations.  
That "we have associations of pleasure with all the pleasurable feelings of a Fellow-creature" is true in a great many instances. By the law of association, the signs of happiness tend to suggest the happy feelings themselves, and even to induce these to some extent upon the beholder. The sight of happy beings is a positive contribution to our own happiness; the obverse fact being equally well marked. We are delighted with the playful gambols of animals, and of children, and with the pleased expression of our fellow-creatures generally. On this ground, we have an interest in conferring happiness upon all our associates, and upon every one whose signs of pleasure and of displeasure come under our notice. Hence, in the absence of other motives, we are disposed to be the authors of pleasure, rather than of pain, wherever we go. Our first impulse towards a stranger would always be, from this consideration, to confer some benefit or perform some agreeable act. From this origin, there flows a considerable fraction of the generosity and the courtesy of human beings.  
But the tendency is thwarted, and often extinguished, by other powerful impulses of the mind. There are two principal counteractives,--Rivalry in interests generally, and the Love of Power.](56441.docx#chunk3622)

[If the expression of pleasure manifested by any sentient being, is procured at our expense, we fail to realise the happy feelings; we are, on the contrary, pained and embittered by the display. Now this is a fact of very frequent occurrence in all conditions of human beings; and, to the extent of its occurrence, it mars the strength and purity of the association.  
The Love of Power works in the same direction. It not only reconciles the mind to displays of pain, but it may render these a delight and luxury. Being an emotion little checked in ordinary human beings, it provides a considerable share of gratification, through the infliction of pain. This, therefore, is a second interference with the law that would connect the signs of happiness with a thrill of pleasure in the beholder. One can easily suppose, and one frequently finds, the emotion of power in such a pitch of development as to make the pleasure of seeing happy beings the exception, and not the rule.  
So much for the first of the two motives in the text. The second,--the procuring of reciprocal benefits by benefits conferred,--is everything that a motive can be. We are all our lives engaged in working out good for ourselves, and if, by doing good to others, we obtain a corresponding measure of our own advantage, we employ that instrumentality. But then the prospect must be clear; the instrument must be a promising one. Now there are some situations wherein we have a reasonable security of a return. When there is a legal guarantee, as in bargains, and in covenanted services, we are (as a rule) ready to fulfil our own share. Also, in very little things, such as the courtesies of civilised society, we contribute our part willingly; we are nearly sure of a full return for the trifling nature of the service. But there are multitudes of cases where (as we suppose) there would be no adequate return, or no return at all; all of which interfere with the growth of the association between benefits conferred and pleasure to ourselves.  
It is not necessary, in order to the pleasure of benevolence, that the return should be either in kind, or in flattery. If we can only obtain love for our benefits, we think them well bestowed. A great many benefits are conferred with no other view; and the appreciation of the extent of this motive is necessary to do justice to the author's theory of the derivation of Benevolence from Prudence.  
It does not admit of question, that if all the services that each person is disposed to bestow, were fairly requited in kind, in praise, or in love, the motive to seek the good of others would have an overpowering strength of association, such as the author assigns to it. The finishing stroke, in all cases of strong and unremitted association,--the transfer to the means of the feeling originally due to the end, and even the sinking of the end out of view,--would be a sure result of the operation. But so partial, as human beings are now constituted, is the operation of the principle; so seldom are people satisfied, that they have the full equivalent of benefits imparted;--that, unless in select instances, there is as much of mistrust as of confidence and hope, in the reciprocation of services of any great magnitude. Of course, people will differ greatly in their estimate of this fact; but on no reasonable and candid calculation, is the association strong enough to account for the intensity and diffusion of disinterested impulses as actually found among mankind.--\_B.\_]  
{287} Pleasurable ideas, as effects, associated with acts of our own as the cause, constitute the MOTIVE, as well as the AFFECTION. The reason of this, we have just stated, and need not repeat.  
We have now seen by what associations both AFFECTION, and MOTIVE are created, in the case of our own acts of Prudence, Fortitude, Justice, and Beneficence. The DISPOSITION, as in all other cases, consists in a facility, from habit, of performing the associations; in other words, a readiness of obeying the Motive.  
In each of the cases, the Affection, the Motive, and the Disposition, have the same name. Thus, Prudence is the name of the Affection, and Motive, and also of the Disposition, to acts of Prudence; so is Fortitude, Justice, and Beneficence, each in regard to its own class of acts.  
Beside the four specific names, Prudence, Fortitude, {288} Justice, and Beneficence, we have a Generical Name, which includes them all. VIRTUE is the name of Prudence, Fortitude, Justice, and Beneficence, all taken together. It is also, like the name of each of the species included under it, at once the name of the Affection, the Motive, and the Disposition. The man who has the Disposition toward all the four, Prudence, Fortitude, Justice, Beneficence, in full strength; that is, who has acquired, from habit, the facility of {289} associating with those acts the pleasures which result from them, in other words, a habit of obeying the motives, is perfectly virtuous.  
It requires the most perfect education to create those associations adequately, in other words, to give the motives such power within us, that, when counteracted by other motives, they may always prevail. Under the present imperfect state of education, it is rather by their constant action, than their force, that they produce the very considerable effects, of which we see that they are the causes. In few men, are they a {290} match for any of the more potent motives; and, in most men, they give way, habitually, whenever they are opposed by any other motive even of moderate strength. There are so many occasions, however, in every part of our lives, for acts of virtue, when other motives do not intervene, that we may still ascribe to the motives of virtue, feeble as they generally are, a large portion of the happiness which we observe in the world.](56441.docx#chunk3623)

[2. Having considered the associations which each of us has with the ideas of his own acts of Prudence, Fortitude, Justice, and Beneficence, it remains that we consider the associations which each of us has with other men's acts of Prudence, Fortitude, Justice, and Beneficence.  
We have already observed, that the Prudence of other men is primarily useful to themselves, secondarily useful to others. A man who is to a certain degree imprudent, deprives himself of the power of being useful either to himself or to others. As we have agreeable associations with acts which produce pleasure to others, so we have agreeable associations with the cause of such acts, the power of producing them; and, of course, disagreeable associations with the acts which deprive a man of the means of doing good to others, and warding off evil from himself. It is not necessary to enter into a more minute analysis to show in what manner our Idea of another man's Prudence becomes a Pleasurable Idea, in other words, an AFFECTION.  
We next proceed to the case of Fortitude, Courage. We have seen that Fortitude is the name of that class of acts, in which a good is aimed at by the risk of a {291} great evil. There is a grand class of cases in which the good aimed at is not the peculiar good of the Individual or Individuals by whom the act, or series of acts, is performed, but a good common to others, to a whole People; as, for example, when another hostile People is encountered and overcome. Of course, in such a case, we have a strong association of our own pleasures, or exemption from pains, with other men's courage, whether we are sharing with them in the danger, or exempted from it by their acts. This association is such as to constitute, and we know by experience does constitute, a very strong AFFECTION. Even when the good sought by the act of courage is only the good of the individual, we have a sufficient association with it of pleasurable ideas to constitute it an AFFECTION. We have, first of all, an agreeable association with the balance of good which the act is calculated to produce to the actor. And next we have a very powerful association of pleasure with the state of mind in which the Idea of a great evil is controlled by the Idea of a greater good. When the motive exists to do us good in a man who has such a mind, he will not be deterred by the prospect of an inadequate evil. When we encounter danger in company with such a man, we shall not be exposed to greater danger by his deserting us.  
As other men's acts of Justice and Beneficence are directly beneficial to them who are the objects of them, it is impossible that every man should not have pleasurable associations, first with the acts of Justice and Beneficence of the men, whose sphere of action extends to himself, and then with the acts of Justice and Beneficence of all men. And as the benefits which {292} spring from such actions are very great, the AFFECTION, generated by association of the Ideas of those Benefits, is proportionally strong.  
Of all the MOTIVES, competent to our nature, those belonging to this class are by far the most important. As there is nothing in which I am so deeply interested, as that the acts of men, which regard myself immediately, should be acts of Justice and Beneficence, and those which regard themselves immediately, should be acts of Prudence and Fortitude, it follows, that I have an interest, proportionally deep, in all those acts of my own, which operate as causes of those acts in other people.  
Of acts of other men, which are useful to us, a great number can be bought by wealth, or commanded by power, or elicited by dignity. The mode of the operation of those causes has already been explained, and the motives into the composition of which they enter, form a different class. The acts of beneficence, of justice, of fortitude, and of prudence, performed by other men in our behalf, are, to a vast extent, such as can neither be bought, nor commanded. What means have we of increasing to the utmost, the number of those acts; diminishing to the utmost, the number of those of an opposite tendency?  
Those means are of two sorts: 1st, Similar actions on our part; 2dly, The manifestation on our part, of the disposition to perform similar actions.  
1. It is interesting here to observe, by what a potent call we are summoned to Virtue. Of all that we enjoy, more is derived from those acts of other men, on which we bestow the name VIRTUE, than from any other cause. Our own virtue is the principal {293} cause why other men reciprocate the acts of virtue towards us. With the idea of our own acts of virtue, there are naturally associated the ideas of all the immense advantages we derive from the virtuous acts of our Fellow-creatures. When this association is formed in due strength, which it is the main business of a good education to effect, the motive of virtue becomes paramount in the human breast.  
2. We strongly act upon other men, when we manifest on our parts, a disposition to perform acts in their favour, in consequence of the acts performed by them in favour of others. This disposition we manifest, when we praise those acts; or, as we otherwise phrase it, when we declare our approbation, or admiration, of them.](56441.docx#chunk3624)

[It is to be observed, that all our names for those acts;--Prudence, Fortitude, Justice, Beneficence, Virtue; are names of Praise. They are names, not merely of the acts, but of the acts associated with the ideas of the benefits resulting from them; and further associated with the idea of those acts of ours, which are the causes of such acts; acts of similar utility on our part to the Authors of the acts which are useful to us.  
Praise, also, is extensive in its operation. The acts of any individual can afford a retribution for the virtuous acts of a very small number of men. His \_Praise\_ can extend to all men; and its effects are most important. Not only does it indicate the affection of him who is the author of it, toward him who is the object; but it points out him who is the object of it, to all other men, as the proper object of a similar affection in them. This indication has some tendency {294} to propagate the favourable affection or disposition towards the object of the applause; but it has a much greater tendency to propagate the praise; and when praise is sounded from many lips, that is, when a disposition is expressed by many persons favourable to the man who has been the author of the applauded acts, a number of acts in his favour are the natural consequence.  
That we have pleasurable associations of great potency, with this manifestation of the favourable disposition of others towards us, is matter of common and constant experience. It is called, in its more remarkable states, the LOVE OF FAME, and is known to operate as one of the most powerful motives in our nature. One of its cases is a remarkable exemplification of that high degree of association, which has been already explained, and to which we have frequently had occasion to advert, in explaining other phenomena; the degree which constitutes belief, and which gives to that belief, even when momentary, and instantly overruled by other associations, a powerful effect on our actions.  
Not only that Praise of us, which is diffused in our lives, and from which agreeable consequences may arise to us, is delightful, by the associated ideas of the pleasures resulting from it; but that Praise, which we are never to hear, which will be diffused only when we are dead, and from which no actual effects can ever accrue to us, is often an object of intense affection, and acts as one of the most powerful motives in our nature.  
The habit which we form, in the case of immediate praise, of associating the idea of the praise with the {295} idea of pleasurable consequences to ourselves, is so strong, that the idea of pleasurable consequences to ourselves becomes altogether inseparable from the idea of our Praise. It is one of those cases in which the one Idea never can exist without the other. The belief, thus engendered, is of course encountered immediately by other belief, that we shall be incapable of profiting by any consequences, which posthumous fame can produce: as the fear, that is, the belief of ghosts, in a man passing through a churchyard at midnight, may be immediately encountered by his settled, habitual belief that ghosts have no existence; and yet his terror, not only remains for a time, but is constantly renewed, as often as he is placed in circumstances with which he has been accustomed to associate the existence of ghosts.[54]  
[Editor's footnote 54: The case here put, that of the desire of posthumous fame, affords no real support to the author's doctrines, that a high degree of association constitutes belief, and that belief is always present when we are determined to action. The case is merely one of many others, in which something not originally pleasurable (the praise and admiration of our fellow-creatures) has become so closely associated with pleasure as to be at last pleasurable in itself. When it has become a pleasure in itself, it is desired for itself, and not for its consequences; and the most confirmed knowledge that it can produce no ulterior pleasurable consequences to ourselves will not interfere with the pleasure given by the mere consciousness of possessing it, nor hinder that pleasure from becoming, by its association with the acts which produce it, a powerful motive. It is a frequent mode of talking, to speak of the desire of posthumous fame in a kind of pitying way, as grounded on a delusion; as a desire which implies a certain infirmity of the understanding. Those who thus speak must be prepared to apply the same disparaging phrases to the interest taken in the welfare of others after our own death; for in that case also, no beneficial consequences to ourselves personally can ever follow from the realization of the object of our desire. But there is nothing at variance with reason in the associations which make us value for themselves, things which we at first cared for only as means to other ends; associations to which we are indebted for nearly the whole both of our virtues, and of our enjoyments. That he who acts with a view to posthumous fame has a belief, however momentary, that this fame will produce to him some extraneous good, or that he shall be conscious of it after he is dead, I shall not admit without better evidence than I have ever seen or heard of.--\_Ed.\_]](56441.docx#chunk3625)

[{296} The operation of Dispraise is similar, to prevent the performance of acts contrary to Justice, Beneficence, Fortitude, and Prudence. Dispraise is the manifestation of a Disposition, unfavourable to the object of it, a disposition to abstain from acts useful to him, not to abstain from acts hurtful to him. It is not necessary to point out the associations formed in this case. It is a matter of common and constant experience, that we have associations of painful consequences, with the idea of the unfavourable disposition of our fellow-creatures, associations which constitute some of the most painful feelings of our nature. This it is, which is commonly expressed by the terms loss of reputation, loss of character, disgrace, infamy. In some instances, the Association rises to that remarkable case, which we have had frequent occasions of observing; when the means become a more important object than the end, the cause, than the effect. It not unfrequently happens, that the idea of the unfavourable sentiments of mankind, becomes more intolerable than all the consequences which could result from {297} them; and men make their escape from life, in order to escape from the tormenting idea of certain consequences, which, at most, would only diminish the advantages of living.[55] Nor is the Idea of posthumous Disgrace, less operative than that of posthumous Fame, and from the same species of association. In men, in whom the associations which constitute the pain of disgrace are strong; though not sufficiently strong to restrain them from deeds which incur the execration of mankind, the thought of what they have done is agonizing. Along with it, constantly rises up, before them, the idea of the condemnatory countenance, the condemnatory sentiment, the retributive acts, of every human being the idea of whom is presented to them. They are never at rest. The Idea of the horrid Deed or Deeds becomes associated with almost every point of their consciousness. At every moment, it rises up in their minds, and along with it the {298} overwhelming train of ideas, with which it is connected. In its more awful cases, this state of mind is called Remorse; and is generally regarded as the most perfect state of suffering to which a human Being is exposed.  
[Editor's footnote 55: They do not seek death to escape from the idea of any consequences of the unfavourable sentiments of mankind. The mere fact of having incurred those unfavourable sentiments has become, by the adhesive force of association, so painful in itself, that death is sometimes preferred to it. There is often no thought of the consequences that may arise from the unfavourable sentiments; and when consequences are thought of, they are usually rather those which are mere demonstrations of feeling, and owe their painfulness to the sentiment of which they are demonstrations, than those which directly grate upon our senses or are injurious to our interests. It is true that a vague conception of the many unpleasant consequences liable to arise from the evil opinion of others, was the crude matter out of which the horror of the thing itself was primitively formed: but, once formed, it loses its connexion with its original source.--\_Ed.\_]  
The same considerations account for that remarkable phenomenon of our nature, eloquently described, but not explained, by Adam Smith, that, in minds happily trained, the love of Praiseworthiness, the dread of Blameworthiness, is a stronger feeling, than the love of actual Praise, the Dread of actual Blame. It is one of those cases, in which, by the power of the association, the secondary feeling becomes more powerful than the primary. In all men, the idea of praise, as consequent, is associated with the idea of certain acts of theirs, as antecedent; the idea of blame, as consequent, with the idea of certain acts of theirs, as antecedent. This association constitutes what we call the feeling, or notion, or sentiment, or idea (for it goes by all those names), of Praiseworthiness, and Blameworthiness.[56] The anticipation, in the one case, is delightful; in the other painful. The association {299} exists in different men, in all possible degrees of strength. In some men it exists in so great a degree of strength, that not only, the pleasure of immediate praise, the pain of immediate blame, but every other feeling of their nature, is subdued by it.  
[Editor's footnote 56: This paragraph, unexplained, might give the idea that the author regarded praiseworthiness and blameworthiness as having the meaning not of deserving praise or blame, but merely of being likely to obtain it. But what he meant is, that the idea of deserving praise is but a more complex form of the association between our own or another person's acts or character, and the idea of praise. To deserve praise, is, in the great majority of the cases which occur in life, the principal mode of obtaining it; though the praise is seldom accurately proportioned to the desert. And the same may be said of blame. A powerful association is thus, if circumstances are favourable, generated between deserving praise and obtaining it; and hence between deserving praise, and all the pleasurable influences on our lives, of other people's good opinion. And this association may become sufficiently strong to overcome the direct motive of obtaining praise, where it is to be obtained by other means than desert; the rather, as the desire of undeserved praise is greatly counteracted by the thought that people would not bestow the praise if they knew all. That what has now been stated was really the author's meaning, is proved by his going on to say, that praiseworthiness and blameworthiness, as motives to action, have reference "not to what is, or to what shall be, but to what ought to be, the sentiments of mankind."--\_Ed.\_]](56441.docx#chunk3626)

[The case is perfectly analogous to that of the love of posthumous praise, the dread of posthumous blame, and is a still more important principle of action, as it has reference, not to what is, or to what shall be, but to what ought to be, the sentiments of mankind.  
Such, then, are the AFFECTIONS which we bear toward the just, the beneficent, the courageous, the prudent acts of other men, and the contrary; that is, such are the associations we have with them of pleasurable or painful consequences. Such also are the MOTIVES; that is, the feelings generated by the association of certain acts of ours, as cause, with the virtuous acts of other men, as their effects.  
Of those MOTIVES, that which involves the acts of praising and blaming, is in constant and strong {300} operation. It is from the great use made of those acts in the Education of children, and even in the rude management of them in the nursery, that praise and blame acquire the influence in most cases, the ascendancy in some, which they are seen to exercise over us. It is this sensibility to praise and blame, in other words, the associations we have with them, which gives its effect to what is called POPULAR OPINION, or the POPULAR SANCTION, and, when the acts of Justice, Beneficence, Fortitude, and Prudence of other men are the objects of it, the MORAL SANCTION; \_Popular Opinion\_, being a phrase which expresses the Praise or Blame which the people bestow; and the \_Sanction\_ being the good or evil consequences which men are accustomed to associate with that praise or blame.  
In the present state of Education, the Praise and Blame of most men are very erroneously bestowed, with great precipitation, commonly in excess upon small occasions, with little regard to its justice; blame being very often inflicted where applause is due, and applause lavished where blame ought to be bestowed. When Education is good, no point of morality will be reckoned of more importance than the distribution of Praise and Blame; no act will be considered more immoral than the misapplication of them. They are the great instruments we possess for ensuring moral acts on the part of our Fellow-creatures; and when we squander away, or prostitute those great causes of virtue, and thereby deprive them of a great part of their useful tendency, we do what in us lies to lessen the quantity of Virtue, and thence of Felicity, in the world.  
The MOTIVES, which are generated by the {301} association of our own acts of Justice and Beneficence as cause with other men's acts of Justice and Beneficence as effects, are subject, unhappily, to strong counteraction; because it rarely happens that we can perform acts of Justice and Beneficence without more or less sacrifice to ourselves. The association, at the same time, is strong, in all men. All men have the daily experience, that their own acts of Justice, and Beneficence, dispose other men to be Beneficent to them; their own acts of injustice and malevolence, dispose other men to bring evil (which in this case they call punishment) upon them; and to abstain from doing them good. This experience is of course followed by the usual association between cause and effect. The man who does acts of Justice and Beneficence, anticipates the favourable disposition of mankind, as their natural effect; and this association is his belief, or conviction, or sense (he calls it by all those names), of deserving the favourable sentiments of mankind. The man, on the other hand, who performs acts which are unjust and hurtful to others, anticipates the unfavourable and hostile sentiments of mankind, as the natural consequents of his acts; in other words, has the belief, or conviction, or sense (for the association in this case also has these various names), of deserving, not well, but ill, at the hands of other men.  
There are no men, however vicious, in whom those associations do not produce constant and numerous effects. When they have not been happily cultivated, and when the counteracting associations, of which we just now made mention, have been allowed to acquire a mischievous strength; acts in opposition to them {302} are, occasionally, but, even in the worst men, no more than occasionally, produced.  
This anticipation of the hostile, or benevolent sentiments of mankind, as the natural effects of actions of a certain description on our part, is the foundation of that remarkable association of which we had very recently occasion to make mention, the association which Dr. Smith has called the love of Praiseworthiness, and which is sometimes found to be much more powerful than the love of actual Praise.  
The DISPOSITION which corresponds to those MOTIVES, or the facility of forming the associations which constitute them, is the result of habit in this as in all other cases.  
The AFFECTION, in this case, has the name of \_Moral approbation\_ and \_Disapprobation\_. The same is the only name we have for the MOTIVE. It is also the only name we have for the DISPOSITION. The terms Moral Sense; Sense of Right and Wrong; Love of Virtue, and Hatred of Vice, are sometimes used as synonymous terms; but they are not equally appropriate. Virtue, as we have seen, is a name which is given to each of the three, the Affection, the Motive, the Disposition; Morality is a name which is applied with similar latitude.[57] [58]  
[Bain's footnote 57: The foregoing analysis of the Moral Sentiment proceeds upon a number of unquestionable psychological data. That we have a strong personal interest in the virtues of Prudence, Fortitude, Justice and Beneficence, in the manner stated, is most certain; and that this personal interest will incline us to practise those virtues ourselves, and to encourage them in {303} others, is also certain. The only doubt is, as to whether the motives to rectitude of action are exhausted in this analysis.](56441.docx#chunk3627)

[The sufficiency of an analysis is less easily tested in mental phenomena, than in physical phenomena. The chief reason is that, in the mind, we cannot make exact numerical estimates; and, therefore, cannot show, by castings up a sum, that the assigned constituents of a compound exactly amount to the total. The several constituents put down may be actually present, without our being sure whether they are the whole. Hence the Deductive verification, so valuable in physical science, does not carry with it the same precision, in mental science.  
To evade this source of uncertainty we are thrown back upon the Experimental Canons, or the Four Methods. We know by these, that if an analysis is good, there must be present in each instance of the phenomenon the causes assigned, one or more; and should one exist in a low degree, or be entirely wanting, the others must have a compensating intensity. If, on the other hand, the whole of the causes have not been assigned, there will, almost inevitably, occur instances, either without the causes stated, or with these in an obviously insufficient amount.  
The following facts and considerations render doubtful the completeness of the author's explanation of the Moral Sentiment.  
The affirmation in the text is that not merely the self-regarding virtue--Prudence, but also the two great social virtues--Justice and Beneficence, are developed from associations with our own personal interest. In other words, they grow up exactly by the same course as the virtue of Prudence; they are strong as that happens to be strong, and weak as that happens to be weak; the most prudent man being the most just and beneficent man. This inference can be avoided only by drawing some distinction between the interested associations entering into prudence, and the interested associations entering into justice and beneficence; but no such distinction {304} is drawn in the foregoing chapter, at least in such a way as to meet the difficulty thus suggested.  
Now, on an appeal to the facts, we find that the virtue of prudence is not uniformly concomitant with the virtues of justice and beneficence; that, on the contrary, except in the more highly cultivated moral natures, they are frequently manifested in the inverse proportion. A human being, by cherishing interested associations, does not as a matter of course attain to either justice or beneficence. Even the most far-sighted prudence, as regards self, would not develop the whole virtue of justice, nor the whole virtue of beneficence. On the other hand, beneficence is often abundant and pronounced in cases where interested associations with self have been very slightly cultivated.  
The illustration of this generic discrepancy, between the author's theory and the more obvious facts, might be extended. There is, however, another mode of proceeding, perhaps more decisive; that is, to show that the mind contains sources of the moral sentiment besides the associations with self-interest.  
It does not appear easy, at first sight, to establish the existence of purely disinterested impulses in our mental constitution; the admixture of self being so seldom unequivocally absent from human conduct. Still, if these impulses do exist, there will probably be found instances where they are manifested in convincing isolation.  
Perhaps the desired isolation is most readily afforded in some of the familiar forms of Pity. There are instances, no doubt, where pity may have a selfish motive, as when we compassionate the sufferings of parents, friends, and benefactors. But, in other instances, it arises not only without any selfish bearing, but in opposition to powerful associations of interest. The pity that we often extend to enemies and to criminals is a case in point. Even when the punishment of wrong-doers is bound up with our strongest interests, the spectacle of their sufferings often moves us to remit the punishment necessary for our own protection. Now, with beings made up of purely {305} interested considerations, the \_argumentum ad misericordiam\_, under those circumstances, would be void of effect.  
Another example is furnished by those acts of lavish generosity and charity that perhaps ruin the giver, and do harm to the recipient. If one's moral education were exclusively conducted through the building up of associations with self, by what class of associating links is this impulse generated?  
It is no less difficult to account for the actions of men wholly devoted to philanthropy, like Howard. So very small is the result to self from the labours and sacrifices of such men, that we are unable to account for their motives without assuming an independent source of disinterested affections. The difficulty is greatly increased in the case of minds little cultivated, as in the heroic devotion of the common soldier.  
Observation of children reveals a specific power in the spectacle of misery or suffering to awaken pity and generous sympathies. The effective impulse to sympathy has little to do with a prudential education, or with the following out of self-interest in its associations with the welfare of others. The patriotic orator never trusts wholly to interested motives; he does not omit these; but he expects much from the lively description of suffering and misery to people generally; and if the picture comes home to the experience of his hearers, they will be moved by it, on account of each other, as well as on account of their separate selves.  
From such facts as these, it is admissible to lay down, as a general law, that the sight of misery in others prompts us, irrespective of our own interest, to enter into, and to relieve, that misery. This is the essential fact of Sympathy.](56441.docx#chunk3628)

[The principle thus announced is not an ultimate law of the mind. It may be brought under a still higher law, of which some notice will be taken afterwards (see note on the Will, chap. XXIV.), namely, the tendency of every idea to act itself out, to become an actuality, not with a view to bring pleasure or to ward off pain--which is the proper description of the will--but from an independent prompting of the mind that often makes us throw away pleasure and embrace pain. The full {306} exposition of this principle would add greatly to the evidence for pure disinterested impulses, by showing that the fact described operates in a much wider sphere than the moral sentiment.  
On a survey of the different theories of the mental origin of Benevolent impulses, we may reduce them under the following heads.  
1. They have been ascribed to direct and immediate self-interest, either from the return of benefits in kind, or from the pleasure of praise and flattery. This is substantially the position of Mandeville.  
2. It is said we are so constituted that the sight of misery is a pain to us; and that we work to rid ourselves of that pain, as we should work to assuage thirst, to banish toothache, or to escape reproach. This view was held by Hobbes. It is forcibly brought in in the following anecdote recorded of him by Aubrey (Lives II. p. 623).  
"One time, I remember, goeing in the Strand, a poor and infirme old man begged his almes; he beholding him with eies of pitty and compassion, putt his hand in his pocket, and gave him 6d.; Sayd a divine [Dr. Jaspar Mayne] that stood by, 'Would you have done this, if it had not been Christ's Command?' 'Yea,' sayd he: 'Why?' quoth the other; 'Because,' sayd he, 'I was in paine to consider the miserable condition of the old man; and now my almes, giving him some relief, doth also ease me.'"  
There is a certain amount of truth in this statement; and taking the fact by itself, we might find some difficulty in drawing the line between a volition moved by our own pain, and the acting out of the idea of pain in favour of the sufferer. The best reply, perhaps, is to compare the amount of pain incurred and of pleasure remitted or sacrificed by the sympathiser, with the utmost value fairly ascribable to his own mental pain. The pain of misery witnessed is frequent and habitual, and although it has a certain depressing effect upon the mind, yet we should generally bear it much more easily than the pains of self-sacrifice it often incites us to.  
{307} 3. We may be endowed with a positive susceptibility to pleasure from acts of kindness to others; so that in doing good, we are still moved in exact proportion to our own gratification. This expresses very nearly Bentham's view of Disinterestedness; which, however, equally with the foregoing, comes short of the facts. Supposing some such pleasure to exist, no one could show that in degree it fully corresponds to the effects prompted by benevolent impulse.  
4. \_Habits\_ of acting in favour of others may be formed to such an extent, that our virtuous actions, begun under our own pleasures and pains, may at last cease to have any reference to those pleasures and pains. Here, also, the appeal is to an undeniable fact of our mental constitution. Actions that begin as proper voluntary actions--on the spur of pleasure and pain--often pass into a mechanical routine, and are persisted in even when they thwart our pleasures. Any one placed for a number of years in a position of danger, and habituated to troublesome precautions, is almost sure to keep up the same routine, after the occasion has ceased; mothers are liable to this unreasonable continuance of solicitude about their children. The application of the fact to moral education is of great moment. If the young are initiated betimes into a regard to the feelings and interests of others, they will grow up with a sort of mechanical unquestioning tendency towards the same line of conduct.  
These are the four different modes of stating the origin of disinterested conduct, apart from the assumption of a source of purely disinterested impulses in the constitution of the mind. Such a source has been indicated above, in what may be called the power of the "fixed idea," having its seat in the region of the intellect, and operating to thwart the proper voluntary impulses, which are instigated by our pleasures and pains.--\_B.\_]  
I.](56441.docx#chunk3629)

[[Editor's footnote 58: It had been pointed out, in a preceding chapter, that Wealth, Power, Dignity, and many other things which are not {308} in their own nature pleasures, but only causes of pleasures and of exemption from pains, become so closely associated with the pleasures of which they are causes, and their absence or loss becomes so closely associated with the pains to which it exposes us, that the things become objects of love and desire, and their absence an object of hatred and aversion, for their own sake, without reference to their consequences. By virtue of the same law of association, it is pointed out in the present chapter that human actions, both our own and those of other people, standing so high as they do among the causes both of pleasure and of pain to us (sometimes by their direct operation, and sometimes through the sentiments they give birth to in other persons towards ourselves) tend naturally to become inclosed in a web of associated ideas of pleasures or of pains at a very early period of life, in such sort that the ideas of acts beneficial to ourselves and to others become pleasurable in themselves, and the ideas of acts hurtful to ourselves and to others become painful in themselves: and both kinds of acts become objects of a feeling, the former of love, the latter of aversion, which having, in our minds, become independent of any pleasures or pains actually expected to result to ourselves from the acts, may be truly said to be disinterested. It is no less obvious that acts which are not really beneficial, or not really hurtful, but which, through some false opinion prevailing among mankind, or some extraneous agency operating on their sentiments, incur their praise or blame, may and often do come to be objects of a quite similar disinterested love or hatred, exactly as if they deserved it. This disinterested love and hatred of actions, generated by the association of praise or blame with them, constitute, in the author's opinion, the feelings of moral approbation and disapprobation, which the majority of psychologists have thought it necessary to refer to an original and ultimate principle of our nature. Mr. Bain, in the preceding note, makes in this theory a correction, to which the author himself would probably not have objected, namely, that the mere idea of a pain or pleasure, by whomsoever felt, is intrinsically painful or pleasurable, and when raised in {309} the mind with intensity is capable of becoming a stimulus to action, independent, not merely of expected consequences to ourselves, but of any reference whatever to Self; so that care for others is, in an admissible sense, as much an ultimate fact of our nature, as care for ourselves; though one which greatly needs strengthening by the concurrent force of the manifold associations insisted on in the author's text. Though this of Mr. Bain is rather an account of disinterested Sympathy, than of the moral feeling, it is undoubtedly true that the \_foundation\_ of the moral feeling is the adoption of the pleasures and pains of others as our own: whether this takes place by the natural force of sympathy, or by the association which has grown up in our mind between our own good or evil and theirs. The moral feeling rests upon this identification of the feelings of others with our own, but is not the same thing with it. To constitute the moral feeling, not only must the good of others have become in itself a pleasure to us, and their suffering a pain, but this pleasure or pain must be associated with our own acts as producing it, and must in this manner have become a motive, prompting us to the one sort of acts, and restraining us from the other sort. And this is, in brief, the author's theory of the Moral Sentiments.  
The exhaustive treatment of this subject would require a length and abundance of discussion disproportioned to the compass and purposes of a treatise like the present, which was intended to expound what the author believed to be the real mode of formation of our complex states of consciousness, but not to say all that may and ought to be said in refutation of other views of the subject. There are, however, some important parts of the author's own theory, which are not stated in this work, but in a subsequent one, of a highly polemical character, the "Fragment on Mackintosh:" and it may be both instructive and interesting to the reader to find the statement here. I therefore subjoin the passages containing it.  
"Nature makes no classes. Nature makes individuals. Classes are made by men; and rarely with such marks as determine certainly what is to be included in them.  
{310} "Men make classifications, as they do everything else, for some end. Now, for what end was it that men, out of their innumerable acts, selected a class, to which they gave the name of moral, and another class, to which they gave the name of immoral? What was the motive of this act? What its final cause?  
"Assuredly the answer to this question is the first step, though Sir James saw it not, towards the solution of his two questions, comprehending the whole of ethical science; first, what makes an act to be moral? and secondly, what are the sentiments with which we regard it?  
"We may also be assured, that it was some very obvious interest which recommended this classification; for it was performed, in a certain rough way, in the very rudest states of society.  
"Farther, we may easily see how, even in very rude states, men were led to it, by little less than necessity. Every day of their lives they had experience of acts, some of which were agreeable, or the cause of what was agreeable, to them; others disagreeable, or the cause of what was disagreeable to them, in all possible degrees.](56441.docx#chunk3630)

["They had no stronger interest than to obtain the repetition of the one sort, and to prevent the repetition of the other.  
"The acts in which they were thus interested were of two sorts; first, those to which the actor was led by a natural interest of his own; secondly, those to which the actor was not led by any interest of his own. About the first sort there was not occasion for any particular concern. They were pretty sure to take place, without any stimulus from without. The second sort, on the contrary, were not likely to take place, unless an interest was artificially created, sufficiently strong to induce the actor to perform them.  
"And here we clearly perceive the origin of that important case of classification . . . . the classification of acts as moral and immoral. The acts, which it was important to other men that each individual should perform, but in which the individual had not a sufficient interest to secure the {311} performance of them, were constituted one class. The acts, which it was important to other men that each individual should abstain from, but in regard to which he had not a personal interest sufficiently strong to secure his abstaining from them, were constituted another class. The first class were distinguished by the name moral acts; the second by the name immoral.  
"The interest which men had in securing the performance of the one set of acts, the non-performance of the other, led them by a sort of necessity to think of the means. They had to create an interest, which the actor would not otherwise have, in the performance of the one sort, the non-performance of the other. And in proceeding to this end, they could not easily miss their way. They had two powers applicable to the purpose. They had a certain quantity of good at their disposal; and they had a certain quantity of evil. If they could apply the good in such a manner as to afford a motive both for the performance and non-performance which they desired, or the evil, in such a manner as to afford a motive against the performance and non-performance which they wished to prevent, their end was attained.  
"And this is the scheme which they adopted; and which, in every situation, they have invariably pursued. The whole business of the moral sentiments, moral approbation, and disapprobation, has this for its object, the distribution of the good and evil we have at command, for the production of acts of the useful sort, the prevention of acts of the contrary sort. Can there be a nobler object?  
"But though men have been thus always right in their general aim, their proceedings have been cruelly defective in the detail; witness the consequence,--the paucity of good acts, the frequency of bad acts, which there is in the world.  
"A portion of acts having been thus classed into good and bad; and the utility having been perceived of creating motives to incite to the one, and restrain from the other, a sub-classification was introduced. One portion of these acts was such, that the good and evil available for their production {312} and prevention, could be applied by the community in its conjunct capacity. Another portion was such, that the good and evil available could be applied only by individuals in their individual capacity. The first portion was placed under the control of what is called law; the other remained under the control of the moral sentiments; that is, the distribution of good and evil, made by individuals in their individual capacity.  
"No sooner was the class made, than the rule followed. Moral acts are to be performed; immoral acts are to be abstained from.  
"Beside this the general rule, there was needed, for more precise direction, particular rules.  
"We must remember the fundamental condition, that all rules of action must be preceded by a corresponding classification of actions. All moral rules, \*comprehended in the great moral rule, must relate to a class of actions comprehended within the grand class, constituted and marked by the term moral. This is the case with grand classes in general. They are subdivided into minor classes, each of the minor classes being a portion of the larger. Thus, the grand class of acts called moral has been divided into certain convenient portions, or sub-classes, and marked by particular names. Just, Beneficent, Brave, Prudent, Temperate; to each of which classes belongs its appropriate rule that men should be just, that they should be beneficent, and so on . . . . .  
"In the performance of our duties two sets of cases may be distinguished. There is one set in which a direct estimate of the good of the particular act is inevitable; and the man acts immorally who acts without making it. There are other cases in which it is not necessary.  
"The first are those, which have in them so much of singularity, as to prevent their coming within the limits of any established class. In such cases a man has but one guide; he must consider the consequences, or act not as a moral, or rational agent at all.](56441.docx#chunk3631)

[{313} "The second are cases of such ordinary and frequent occurrence as to be distinguished into classes. And everybody knows . . . that when a class of acts are performed regularly and frequently, they are at last performed by habit; in other words, the idea of the act and the performance of it follow so easily and speedily that they seem to cohere, and to be but one operation. It is only necessary to recall some of the more familiar instances, to see the mode of this formation. In playing on a musical instrument, every note, at first, is found by an effort. Afterwards, the proper choice is made so rapidly as to appear as if made by a mechanical process in which the mind has no concern. The same is the case with moral acts. When they have been performed with frequency and uniformity, for a sufficient length of time, a habit is generated . . . . .  
"When a man acts from habit, he does not act without reflection. He only acts with a very rapid reflection. In no class of acts does a man begin to act by habit. He begins without habit; and acquires the habit by frequency of acting. The consideration, on which the act is founded, and the act itself, form a sequence. And it is obvious from the familiar cases of music and of speaking, that it is a sequence at first not very easily performed. By every repetition, however, it becomes easier. The consideration occurs with less effort; the action follows with less effort; they take place with greater and greater rapidity, till they seem blended. To say, that this is acting without reflection, is only ignorance, for it is thus seen to be a case of acting by reflection so easily and rapidly, that the reflection and the act cannot be distinguished from one another . . . . . .  
"Since moral acts are not performed at first by habit, but each upon the consideration which recommends it; upon what considerations, we may be asked, do moral acts begin to be performed?  
"The question has two meanings, and it is necessary to reply to both. It may be asked, upon what consideration the men of our own age and country, for example, at first {314} and before a habit is formed, perform moral acts? Or, it may be asked, upon what consideration did men originally perform moral acts?  
"To the first of these questions every one can reply from his own memory and observation. We perform moral acts at first, from authority. Our parents tell us that we ought to do this, ought not to do that. They are anxious that we should obey their precepts. They have two sets of influences, with which to work upon us; praise and blame; reward and punishment. All the acts which they say we ought to do, are praised in the highest degree, all those which they say we ought not to do, are blamed in the highest degree. In this manner, the ideas of praise and blame become associated with certain classes of acts, at a very early age, so closely, that they cannot easily be disjoined, No sooner does the idea of the act occur than the idea of praise springs up along with it, and clings to it. And generally these associations exert a predominant influence during the whole of life.  
"Our parents not only praise certain kinds of acts, blame other kinds; but they praise us when we perform those of the one sort, blame us when we perform those of the other. In this manner other associations are formed. The idea of ourselves performing certain acts is associated with the idea of our being praised, performing certain other acts with the idea of our being blamed, so closely that the ideas become at last indissoluble. In this association consist the very important complex ideas of praise-worthiness, and blame-worthiness. An act which is praiseworthy, is an act with the idea of which the idea of praise is indissolubly joined; an agent who is praiseworthy is an agent with the idea of whom the idea of praise is indissolubly joined. And in the converse case, that of blame-worthiness, the formation of the idea is similar.  
"Many powerful circumstances come in aid of these important associations, at an early age. We find, that not only our parents act in this manner, but all other parents. {315} We find that grown people act in this manner, not only towards children, but towards one another. The associations, therefore, are unbroken, general, and all-comprehending.  
"Our parents administer not only praise and blame, to induce us to perform acts of one sort, abstain from acts of another sort, but also rewards and punishments. They do so directly; and, further, they forward all our inclinations in the one case, baulk them in the other. So does everybody else. We find our comforts excessively abridged by other people, when we act in one way, enlarged when we act in another way. Hence another most important class of associations; that of an increase of well-being from the good will of our fellow-creatures, if we perform acts of one sort, of an increase of misery from their ill-will, if we perform those of another sort.](56441.docx#chunk3632)

["In this manner it is that men, born in the social state, acquire the habits of moral acting, and certain affections connected with it, before they are capable of reflecting upon the grounds which recommend the acts either to praise or blame. Nearly at this point the greater part of them remain, continuing to perform moral acts and to abstain from the contrary, chiefly from the habits they have acquired, and the authority upon which they originally acted; though it is not possible that any man should come to the years and blessing of reason, without perceiving, at least in an indistinct and general way, the advantage which mankind derive from their acting towards one another in one way, rather than another.  
"We come now to the second question, viz. what are the considerations upon which men originally performed moral acts? The answer to this question is substantially contained in the explanation already given of the classification of acts as moral and immoral.  
"When men began to mark the distinction between acts, and were prompted to praise one class, blame another, they did so, either because the one sort benefited, the other hurt them; or for some other reason. If for the first reason, the case is perfectly intelligible. The men had a motive {316} which they understood, and which was adequate to the end. If it was not on account of utility that men classed some acts as moral, others as immoral, on what other account was it?  
"To this question, an answer, consisting of anything but words, has never been returned.  
"It has been said, that there is a beauty, and a deformity, in moral and immoral acts, which recommended them to the distinctions they have met with.  
"It is obvious to reply to this hypothesis, that the mind of a savage, that is, a mind in the state in which the minds of all men were, when they began to classify their acts, was not likely to be much affected by the ideal something called the beauty of acts. To receive pain or pleasure from an act, to obtain, or be deprived of, the means of enjoyment by an act; to like the acts and the actors, whence the good proceeded, dislike those whence the evil proceeded; all these were things which they understood.  
"But we must endeavour to get a little nearer to the bottom of this affair.  
"In truth, the term beauty, as applied to acts, is just as unintelligible to the philosopher, as to the savage. Is the beauty of an act one thing; the morality of it another? Or are they two names for the same thing? If they are two things, what is the beauty, distinct from the morality? If they are the same thing, what is the use of the name morality? It only tends to confusion.  
"But this is not all. The beautiful is that which excites in us the emotion of beauty, a state of mind with which we are acquainted by experience. This state of mind has been successfully analysed, and shewn to consist of a train of pleasurable ideas, awakened in us by the beautiful object.  
"But is it in this way only that we are concerned in moral acts? Do we value them for nothing, but as we value a picture, or a piece of music, for the pleasure of looking at them, or hearing them? Everybody knows the contrary. Acts are objects of importance to us, on account of their {317} consequences, and nothing else. This constitutes a radical distinction between them and the things called beautiful. Acts are hurtful or beneficial, moral or immoral, virtuous or vicious. But it is only an abuse of language, to call them beautiful or ugly.  
"That it is jargon, the slightest reflection is sufficient to evince; for what is the beauty of an act, detached from its consequences? We shall be told, perhaps, that the beauty of an act was never supposed to be detached from its consequences. The beauty consists in the consequences. I am contented with the answer. But observe to what it binds you. The consequences of acts are the good or evil they do. According to you, therefore, the beauty of acts is either the utility of them, or it is nothing at all;--a beautiful ground on which to dispute with us, that acts are classed as moral, not on account of their utility, but on account of their beauty.  
"It will be easily seen, from what has been said, that they who ascribe the classification of acts, as moral, and immoral, to a certain taste, an agreeable or disagreeable sentiment which they excite (among whom are included the Scottish professors Hutcheson, and Brown, and David Hume himself, though on his part with wonderful inconsistency)--hold the same theory with those who say, that beauty is the source of the classification of moral acts. Things are classed as beautiful, or deformed, on account of a certain taste, or inward sentiment. If acts are classed in the same way, on account of a certain taste or inward sentiment, they deserve to be classed under the names beautiful, and deformed; otherwise not.  
"I hope it is not necessary for me to go minutely into the exposure of the other varieties of jargon, by which it has been endeavoured to account for the classification of acts, as moral and immoral. 'Fitness' is one of them. Acts are approved on account of their fitness. When fitness is hunted down, it is brought to bay exactly at the place where beauty was. Fitness is either the goodness of the consequences, or it is nothing at all.  
{318} "The same is the case with 'Right Reason,' or 'Moral Reason.' An act according to moral reason, is an act, the consequences of which are good. Moral reason, therefore, is another name, and not a bad name, for the principle of utility."[a]  
[Editor's footnote a: Fragment on Mackintosh, pp. 247--265.]](56441.docx#chunk3633)

[The following passage from another part of the same work, is also very much to the purpose.  
"The terms moral and immoral were applied by men, primarily, not to their own acts, but the acts of other men. Those acts, the effects of which they observed to be beneficial, they desired should be performed. To make them be performed, they, among other things they did, affixed to them marks of their applause; they called them, good, moral, well-deserving; and behaved accordingly.  
"Such is the source of the moral approbation we bestow on the acts of other men. The source of that which we bestow on our own is twofold. First, every man's beneficial acts, like those of every other man, form part of that system of beneficial acting, in which he, in common with all other men, finds his account. Secondly, he strongly associates with his own beneficial acts, both that approbation of other men, which is of so much importance to him, and that approbation which he bestows on other men's beneficial acts.  
"It is also easy to shew what takes place in the mind of a man, before he performs an act, which he morally approves or condemns.  
"What is called the approbation of an act not yet performed, is only the idea of future approbation: and it is not excited by the act itself; it is excited by the idea of the act. The idea of approbation or disapprobation is excited by the idea of an act, because the approbation would be excited by the act itself. But what excites moral approbation or disapprobation of an act, is neither the act itself, nor the motive of the act; but the consequences of the act, good or evil, and their being within the intention of the agent.  
{319} "Let us put a case. A man with a starving wife and family is detected wiring a hare on my premises. What happens? I call up the idea of sending him to prison. I call up the ideas of the consequences of that act, the misery of the helpless creatures whom his labour supported; their agonizing feelings, their corporal wants, their hunger, cold, their destitution of hope, their despair: I call up the ideas of the man himself in jail, the sinking of heart which attends incarceration; the dreadful thought of his family deprived of his support; his association with vicious characters; the natural consequences,--his future profligacy, the consequent profligacy of his ill-fated children, and hence the permanent wretchedness and ruin of them all. I next have the idea of my own intending all these consequences. And only then am I in a condition to perform, as Sir James says, the 'operation of conscience.' I perform it. But in this case, it is, to use another of his expressions, 'defeated.' Notwithstanding the moral disapprobation, which the idea of such intended consequences excites in me, I perform the act.  
"Here, at all events, any one may see, that conscience, and the motive of the act, are not the same, but opposed to one another. The motive of the act, is the pleasure of having hares; not in itself a thing anywise bad. The only thing bad is the producing so much misery to others, for securing that pleasure to myself.  
"The state of the case, then, is manifest. The act of which I have the idea, has two sets of consequences; one set pleasurable, another hurtful. I feel an aversion to produce the hurtful consequences. I feel a desire to produce the pleasurable. The one prevails over the other. . . . .  
". . . Nothing in an act is voluntary but the consequences that are intended. The idea of good consequences intended, is the pleasurable feeling of moral approbation; the idea of bad consequences intended is the painful feeling of moral disapprobation. The very term voluntary, therefore, applied to an act which produces good or evil consequences, {320} expresses the antecedence of moral approbation or disapprobation."[b]  
[Editor's footnote b: Fragment on Mackintosh, pp. 375--378.]  
I will quote one short passage more, in correction of the very vulgar error, that to analyse our disinterested affections and resolve them into associations with the ideas of our own elementary pleasures and pains, is to deny their reality.  
"Sir James must mean, if he means anything, that to trace up the motive affections of human nature to pain and pleasure, is to make personal advantage the only motive. This is to affirm, that he who analyses any of the complicated phenomena of human nature, and points out the circumstances of their formation, puts an end to them.  
"Sir James was totally ignorant of this part of human nature. Gratitude remains gratitude, resentment remains resentment, generosity generosity in the mind of him who feels them, after analysis, the same as before. The man who can trace them to their elements does not cease to feel them, as much as the man who never thought about the matter. And whatever effects they produce, as motives, in the mind of the man who never thought about the matter, they produce equally, in the minds of those who have analysed them the most minutely.](56441.docx#chunk3634)

["They are constituent parts of human nature. How we are actuated, when we feel them, is matter of experience, which every one knows within himself. Their action is what it is, whether they are simple or compound. Does a complex motive cease to be a motive whenever it is discovered to be complex? The analysis of the active principles leaves the nature of them untouched. To be able to assert, that a philosopher, who finds some of the active principles of human nature to be compound and traces them to their origin, does on that account exclude them from human nature, and deny their efficiency as constituent parts of that nature, discovers a total incapacity of thinking upon these subjects. When Newton discovered that a white ray of {321} light is not simple but compound, did he for that reason exclude it from the denomination of light, and deny that it produced its effects, with respect to our perception, as if it were of the same nature with the elementary rays of which it is composed?"[c]  
[Editor's footnote c: Fragment on Mackintosh, pp. 51, 52.]  
II.  
The reluctance of many persons to receive as correct this analysis of the sentiments of moral approbation and disapprobation, though a reluctance founded more on feeling than on reasoning, is accustomed to justify itself intellectually, by alleging the total unlikeness of those states of mind to the elementary one, from which, according to the theory, they are compounded. But this is no more than what is observed in every similar case. When a complex feeling is generated out of elements very numerous and various, and in a corresponding degree indeterminate and vague, but so blended together by a close association, the effect of a long series of experiences, as to have become inseparable, the resulting feeling always seems not only very unlike any one of the elements composing it, but very unlike the sum of those elements. The pleasure of acquiring, or of consciously possessing, a sum of money (supposed not to be desired for application to some specific purpose,) is a feeling, to our consciousness, very different from the pleasure of protection against hunger and cold, the pleasure of ease and rest from labour, the pleasure of receiving consideration from our fellow-creatures, and the other miscellaneous pleasures, the association with which is admitted to be the real and only source of the pleasure of possessing money. In the case, then, of the moral sentiments, we have, on the one hand, a \_vera causa\_ or set of causes, having a positive tendency to generate a sentiment, of love for certain actions, and of aversion for certain others; and on the other hand, those sentiments of love and aversion, actually produced. This coincidence between the sentiments and a {322} power adequate to produce them, goes far towards proving causation. That the sentiments are not obviously like the causes, is no reason for postulating the existence of another cause, in the shape of an original principle of our nature.  
In a case, however, of so great interest and importance, a rigid adherence to the canons of inductive proof must be insisted on. Those who dispute the theory are entitled to demand that it shall conform strictly to the general law of cause and effect, which is, that the effect shall occur with the cause, shall not occur without the cause, and shall bear some proportion to the cause. Unless it can be shewn that when the effect is not produced, the cause is either absent, or counteracted by some more powerful agency; and unless, when there is any marked difference in the effect, a difference can be shewn in the cause, sufficient to account for it; the theory must give way, or at least, cannot be considered as proved.  
The principal case in which the effect is absent, notwithstanding the apparent presence of the cause assigned for it, is anticipated by the author, and provided for after his manner, in the first of the passages quoted from the Fragment on Mackintosh. There are actions (he observes) as beneficial as any others, which yet do not excite the moral sentiment of approbation; but it is because the spontaneous motives to those beneficial acts are in general sufficient: as to eat when we are hungry, or to do a service for which we are to be amply paid. There are, again, actions of a very hurtful character, but such that the spontaneous motives for abstaining from them may be relied on, without any artificial addition: such, in general, are acts destructive of one's own life or property. But even in these cases the hurtful acts may become objects of moral reprobation, when, in any particular case, the natural deterrents prove insufficient for preventing them.](56441.docx#chunk3635)

[The author seems to think that the difference here pointed out, is explained by the fact that the moral sentiment is in the one case needed, in the other not needed, for producing the useful or averting the hurtful act; that, in short, we are {323} made to have the feeling, by a foresight that our having it will operate usefully on the conduct of our fellow-creatures. I cannot accept this explanation. It seems to me to explain everything about the usual feelings, except the feelings themselves. It explains praise and blame, because these may be administered with the express design of influencing conduct. It explains reward and punishment, and every other distinction which we make in our behaviour between what we desire to encourage, and what we are anxious to check. But these things we might do from a deliberate policy, without having any moral feeling in our minds at all. When there is a moral feeling in our minds, our praise or blame is usually the simple expression of that feeling, rather than an instrument purposely employed for an end. We may give expression to the feeling without really having it, in the belief that our praise or blame will have a salutary effect; but no anticipation of salutary effects from our feeling will ever avail to give us the feeling itself: except indeed, what may be said of every other mental feeling--that we may talk ourselves into it; that the habitual use of the modes of speech that are associated with it, has some tendency to call up the feeling in the speaker himself, and a great tendency to engender it in other people.  
I apprehend, however, that there is another, and more adequate reason why the feeling of moral approbation is usually absent in the case of actions (or forbearances) for which there are sufficient motives without it. These actions are done, and are seen to be done, by everybody alike. The pleasant associations derived from their usefulness merge, therefore, in our feelings towards human life and towards our fellow-creatures generally, and do not give rise to any special association of pleasure with given individuals. But when we find that a certain person does beneficial acts which the general experience of life did not warrant us in counting upon--acts which would not have been done by everybody, or even by most people, in his place; we associate the pleasure which the benefit gives us, with the character and disposition of that individual, and with the act, conceived as proceeding {324} from that specially beneficent disposition. And obversely, if a person acts in a manner from which we suffer, but which is such as we should expect from most other people in a parallel case, the associations which his acts create in our minds are associations with human life, or with mankind in general; but if the acts, besides being of a hurtful kind, betoken a disposition in the agent, more hurtful than we are accustomed to look for in average men, we associate the injury with that very man, and with that very disposition, and have the feeling of moral disapprobation and repugnance.  
There is, as already intimated, another condition which those who hold the Association theory of the moral sentiments are bound to fulfil. The class of feelings called moral embraces several varieties, materially different in their character. Wherever this difference manifests itself, the theory must be required to shew that there is a corresponding difference in the antecedents. If pleasurable or painful associations are the generating cause, those associations must differ in some proportion to the difference which exists in what they generate.  
The principal case in point is the case of what is called Duty, or Obligation. It will probably be admitted that beneficial acts, when done because they are beneficial, excite in us favourable sentiments towards the agent, for which the utility or beneficial tendency of the actions is sufficient to account. But it is only some, not all, of these beneficial acts, that we regard as duties; as acts which the agent, or we ourselves if we are the persons concerned, are bound to do. This feeling of duty or obligation, it is contended, is a very different state of mind from mere liking for the action and good will to the agent. The association theory may account for the two last, but not for the former.  
I have examined this question in the concluding chapter of a short treatise entitled "Utilitarianism." The subject of the chapter is "the connexion between Justice and Utility." I have there endeavoured to shew what the association is, which exists in the case of what we regard as a duty, but does not {325} exist in the case of what we merely regard as useful, and which gives to the feeling in the former case the strength, the gravity, and pungency, which in the other case it has not.  
I believe that the element in the association, which gives this distinguishing character to the feeling, and which constitutes the difference of the antecedents in the two cases, is the idea of Punishment. I mean the association with punishment, not the expectation of it.](56441.docx#chunk3636)

[No case can be pointed out in which we consider anything as a duty, and any act or omission as immoral or wrong, without regarding the person who commits the wrong and violates the duty as a fit object of punishment. We think that the general good requires that he should be punished, if not by the law, by the displeasure and ill offices of his fellow-creatures: we at any rate feel indignant with him, that is, it would give us pleasure that he should suffer for his misconduct, even if there are preponderant reasons of another kind against inflicting the suffering. This feeling of indignation, or resentment, is, I conceive, a case of the animal impulse (I call it animal because it is common to us with the other animals) to defend our own life or possessions, or the persons whom we care for, against actual or threatened attack. All conduct which we class as wrong or criminal is, or we suppose it to be, an attack upon some vital interest of ourselves or of those we care for, (a category which may include the public, or the whole human race): conduct which, if allowed to be repeated, would destroy or impair the security and comfort of our lives. We are prompted to defend these paramount interests by repelling the attack, and guarding against its renewal; and our earliest experience gives us a feeling, which acts with the rapidity of an instinct, that the most direct and efficacious protection is retaliation. We are therefore prompted to retaliate by inflicting pain on the person who has inflicted or tried to inflict it upon ourselves. We endeavour, as far as possible, that our social institutions shall render us this service. We are gratified when, by that or other means, the pain is inflicted, and dissatisfied if from any cause it is not. This {326} strong association of the idea of punishment, and the desire for its infliction, with the idea of the act which has hurt us, is not in itself a moral sentiment; but it appears to me to be the element which is present when we have the feelings of obligation and of injury, and which mainly distinguishes them from simple distaste or dislike for any thing in the conduct of another that is disagreeable to us; that distinguishes, for instance, our feeling towards the person who steals our goods, from our feeling towards him who offends our senses by smoking tobacco. This impulse to self-defence by the retaliatory infliction of pain, only becomes a moral sentiment, when it is united with a conviction that the infliction of punishment in such a case is conformable to the general good, and when the impulse is not allowed to carry us beyond the point at which that conviction ends. For further illustration I must refer to the little Treatise already mentioned.--\_Ed.\_]  
  
  
  
{327} CHAPTER XXIV.  
THE WILL.  
  
WE have now considered the class of sensations, called Pleasurable, and Painful. We have also considered the Ideas of those sensations, or that revival of them which is capable of taking place, when the outward action upon the senses is removed. The Idea of the pleasurable sensation, and the Desire of it; the Idea of the painful sensation, and the Aversion to it; are respectively names for one and the same state of consciousness.  
We have also considered the Ideas of the Causes of our Pleasurable and Painful sensations. We have found that those Ideas are never Ideas of the Causes separately; but Ideas both of the causes and of their effects, inseparably joined by association. They are not, therefore, indifferent Ideas; they are always either pleasurable or painful; being complex Ideas, to a great degree composed of the Ideas of pleasurable and painful sensations.  
As the simple Idea of a pleasurable or painful sensation, is a DESIRE or an AVERSION; so the complex Idea, composed of the Ideas of a Cause of pleasurable or painful sensations, and its effects, is called an {328} AFFECTION; which receives different names, according as it is modified by different circumstances; of time, for example, past or future; and if future, certainly or uncertainly, future.  
We next observed, that our own acts were very often the cause of the causes of our pleasures, and of the prevention of our pains. The Idea of an action of our own, as cause, strongly associated with the Idea of a pleasure as its effect, we found to be a state of mind peculiarly important; because it excites to action. In what manner this state of mind gives birth to action, is the question which we now have to resolve.  
The object of the Inquiry is, to find out, what that peculiar state of mind or consciousness is, by which action is preceded. From all men it receives the same name. It is called the Will, by every body; and by every body this Will is understood to be a state of mind or consciousness; but how formed, or wherein consisting, is variously and vehemently disputed.](56441.docx#chunk3637)

[Much of the confusion of Ideas which has darkened this controversy arose from the misconception, so long universal, respecting the Idea of a Cause. The will was invariably, and justly, assumed as the cause of the action; but unhappily there was always assumed as a part of the Idea of this cause, an item, which is found to be altogether imaginary. In the sequence of events called Cause and Effect, men were not contented with the Cause and the Effect; they imagined a third thing, called Force or Power, which was not the cause, but something emanating from the cause, and the true and immediate cause of the {329} Effect. This illusion has been minutely examined, as we have already remarked, by a late Philosopher; by whom it has been proved, beyond the reach of contradiction, that the power of any cause is nothing different from the cause. A cause, and the power of a cause, are not two things, but two names for the same thing. With the Idea of Cause is always united the Idea of Effect. It is one of the cases of inseparable conjunction. The Idea of the Cause as existing, is irresistibly followed by the Idea of the Effect as existing. Not only does the one Idea always follow the other; but it is not in our power to prevent their following. Now the Idea of any thing as existing, when that idea forces itself upon us, and cannot be resisted, is that which we call Belief. In all this, however, there is nothing but the idea of an Antecedent and a Consequent, and a fixed order of Association. Our object, therefore, in this Inquiry will be completely attained if we discover which is the real state of mind which immediately precedes an action.  
The actions of a human being may be divided into two sorts: I. Those which are called the actions of his Body; II. Those which are called the actions of his mind. We shall endeavour to ascertain what are the antecedents of both, and shall begin with the Body.  
I. The actions of the Body are all of one sort. They consist essentially of that action of certain fibres, which is called contraction. The object of this part of our Inquiry, therefore, is to ascertain what are the states of mind which immediately precede a fibrous contraction.  
{330} We can show that muscular or fibrous contractions follow, 1st, Sensations; 2dly, Ideas: and we can also shew, that in a vast proportion of those cases, the sequence is invariable; in other words, that the Sensation, or Idea, is the cause of the contraction.  
1. It is no part of our present business to adduce what has been discovered by physiologists in tracing the physical antecedents of a contracting muscle. The mental antecedent is the object of our inquiry; and whether a physical link, or more than one physical link, intervenes between it and the contraction, alters not the question as to the state of the mental cause; nor the fact as to the ultimate effect. Facts are abundant, to prove, that the nerves are the immediate instrument of contraction; and also that the effect produced by the mental state is first upon the nerves, and only through the nerves upon the muscle. A paralytic limb, is a limb, the movement of which is not consequent upon that mental state which is usually followed by such a movement. But a paralytic limb is only a limb, the nerves of which are deprived of their usual power by a disorder in that part of the brain in which they originate.  
Innumerable facts are capable of being adduced, to prove that sensation is a cause of muscular action. There is, however, little necessity to be tedious with the proof; because there will be little difficulty in assenting to the proposition.  
The distinction, which we formerly drew, between those sensations which we have by what is called the external senses, in other words, on the surface of our body, and those (numerous, not individually only, but also in their species or kinds), which we have in {331} the internal parts of our bodies, it is here peculiarly necessary to remember, and strongly to remark. The muscles themselves are internal parts of the body. The feelings in the muscles are one species of those internal sensations. And, in general, as it is easy to conceive, the internal sensations are a leading cause of such actions as take place in the internal organs of the Body.[59]  
[Editor's footnote 59: The actions which take place in the interior of the body are not always, nor perhaps even generally, produced by sensations. A large portion of them are not preceded by any sensation of which we are aware, and have been ascertained to depend on nerves not terminating in the brain, which is the seat of sensation, but stopping at the spinal cord. These actions are inferred to be the results of a mere \*physical stimulus, operating either upon the local nerves, or upon the spinal ganglions with which those nerves communicate, and not attended with any consciousness.  
Many of the instances which the author goes on to enumerate, of muscular action excited by sensation, are, in all probability, cases of this description. The muscular action is directly excited by the physical irritation of the nerves, and any sensation which accompanies it is not its cause, but a simultaneous effect.--\_Ed.\_]](56441.docx#chunk3638)

[Some of the external cases are remarkably familiar and precise. A pungent odour enters the nostrils; first, a certain sensation follows, and immediately after, the violent action of a great number of muscles, called Sneezing. In drinking, a drop of water sometimes enters the larynx; it produces a certain sensation, immediately followed by the action of certain muscles, from which we have the very painful feeling of suffocation. There is a very remarkable exemplification of the same law, in the case of the sensation {332} of light. The Pupil of the Eye contracts or dilates, according as a greater or less degree of light falls upon the retina. The eyelids are in perpetual motion in consequence of sensations to which we do not attend. The painful sensation pervading the body, when we plunge into cold water, produces so much action in the muscles, that we sob and respire in a convulsive manner. The lachrymal glands are moved to action, by certain effluvia, as those of onions, by smoke, and various gases, and even by certain states of the air, so as to shed tears abundantly. The action of food is similar upon the salivary glands; and of heat and cold upon the skin, the one opening, the other contracting its pores.  
In respect to a great number of the contractions of muscles, which take place in consequence of impressions on the surface of our bodies, the evidence is not so precise; because, though contractions are originally performed by sensation, they are afterwards and more habitually performed by Ideas. We shall be able, therefore, to speak of them more instructively, when more familiar with the sequence consisting of Ideas antecedent, and the contraction of muscles consequent.  
The action of the internal organs in consequence of internal sensations, is proved by many familiar, as well as by many interesting phenomena. The action of coughing, than which none more familiar, is the highest evidence. The sensation here, is not one of those which are neglected and obscure. A violent action of the muscles is its immediate consequence. Hiccup is also produced by a sensation in the stomach; and affords evidence definite and decisive. Vomiting is another very instructive case. We {333} know that it is the ultimate effect of something which produces disagreeable sensations in the stomach. The sensation, indeed, in this case, is not so well distinguished from others, nor so precisely known, as in the case of coughing. We know, however, its general character, and we know well the violent contraction of muscles, which is the consequence of it. In connexion with this, we may notice the peculiar sensations in the \_Uterus\_, which produce the muscular actions of Parturition; some of the most violent belonging to the human frame. The sensations, which are the cause of cramps, are commonly obscure. It is the Effect which engages all our attention. There is no doubt, however, that it is by an internal sensation, that this very painful effect is produced. A greater proportion of those painful muscular actions called spasms, are the effect of sensations; though Ideas, also, appear to be concerned in the production of those which become frequent. One very remarkable case, which is named the Locked Jaw, is often the result of a pain produced by an external wound.  
Not any of our bodily functions is more important than Respiration. It is a very extensive action of muscles habitually performed by sensation merely. The sensations, however, escape our attention to such a degree, that we lose the power of attending to them. And it is only by the effort we are capable of to stop Respiration, when a painful sensation after a time renders the action of the muscles irresistible, that we get a sort of conjectural knowledge of what the ordinary sensation is.  
There are some most important cases of the action of our internal organs, in consequence of sensation, in {334} which, from the habitual neglect of that which never calls for our attention, both cause and effect, to our ordinary perception, are alike unknown. That the heart is a part of the body endowed with sensation, is abundantly known, as often as, by a departure from its habitual state, it becomes the seat of sensations other than the habitual sensations, to which, from habit of inattention to them, we have lost the power of attending. The blood cannot flow into the heart, without a sensation of the heart. The contraction of the heart is the consequence of that sensation; thence the circulation of the blood; thence respiration, and all the trains, both of sensations, and of actions, which constitute the general working of the human machine. In truth, the actions of the alimentary canal, necessary to keep up the supply of the blood and the actions of the circulating system, which impart their action to most of the assimilating and secreting organs of the human body, all taking place in sensitive parts, all, of course, attended by sensation, and all produced by sensation, constitute a system of internal sensations, numerous beyond what it is easy to conceive,--some pleasurable, some painful,--and of all possible modifications of pain and pleasure; but to which, singly, the habit of inattention is so complete, that it amounts to inability of attending to them.](56441.docx#chunk3639)

[When they are very extensively of a pleasurable, or very extensively of a painful kind, they produce a general state, which often calls our attention; but for which, as it is a vague, indeterminate feeling, we have only vague, indeterminate names: we call it a {335} state of comfort or discomfort; of cheerfulness, or gloom; high spirits, or low spirits; and so on. The incessant motion of the blood, in so many sensitive tubes, in every part of the body, constitutes a system of sensations pervading the whole frame; as the contact of the air produces a system of sensations, pervading every part of the surface of our bodies, but to which our habit of inattention is so complete, that we are equally incapable of attending to them as we are of attending to the sensations produced in our arteries and veins, by the motion of the blood, and in the secreting and absorbing vessels when excited to action.[10\*]  
[Mill's footnote 10: "Is there not reason to suspect, that our unconsciousness, in health, of the Impressions made on our organs by the fluids which they contain, depends on our being accustomed to the sensations which they incessantly excite; so that there remains but a confused perception which in time disappears."--\_Elements of Physiology\_, by A. Richerand, translated by James Copeland, M.D., 4th ed., p. 21.--(\_Author's Note\_.)]  
We are rather more attentive, perhaps, to the general states produced by the extensive diffusion of pleasurable or painful sensations in the alimentary canal, than in the channels of the blood, and perhaps we sometimes confound them. To some of the feelings in the upper part of the canal we attend sufficiently to distinguish them; the feeling called nausea, for example, in its numerous modifications. To those in the other parts, unless they amount to acute pain, we never attend, till they are so extensively diffused, as to constitute a state, to which we assign the terms, Comfort, Discomfort, or some other {336} of the vague names, by which a state made up of an indefinite number of painful or pleasurable sensations is usually denominated. Yet we know that actions of great importance are the result of those unnoticed sensations; the secretion of the gastric juice; the secretion of the bile; the separation of the nutritive from the innutritive part of the food; the operation of the lacteal and lymphatic vessels, and that extraordinary motion called the peristaltic, which aids in carrying on the contents of the bowels to the place of their discharge. It is probable, that the pleasurable states of the alimentary canal are commonly joined, or synchronous, with pleasurable states of the channels of the blood; and the painful states, the same. That the healthy, or unhealthy state of the one, accompanies that of the other, we know. And that certain diseased states of the circulating system, are accompanied with that general state of feeling, called discomfort, or wretchedness, which implies the wide diffusion of painful sensations throughout the system, is but too well known to all who have experienced any modification of the febrile state; nor can it be doubted, that the joyous state of perfect health, in which we feel delight in our being, and our whole frame seems to be a source of pleasure to us, is in a great degree produced by the innumerable unnoticed and unnoticeable sensations, produced by the motion and contact of the blood, in every part of our frame.  
We seem authorized, therefore, by the fullest Evidence, to assume that Sensation, is the mental cause, whatever the physical links, of a great proportion of the muscular contractions of our frame; and that {337} among those so produced are found some of the most constant, the most remarkable, and the most important, of that grand class of corporeal phenomena.  
2. To prove that Ideas, as well as Sensations, are the cause of muscular actions, it is necessary to make choice of cases, in which the Idea is in no danger of being confounded with that state of mind called the Will. And hardly any case will answer this condition, except some of those which are held to be involuntary, for the Idea itself never can be very clearly distinguished from the Will.  
The Winking of the Eyelids, when a person moves his hand rapidly close to the eyes of another person, is a familiar case of an action of the muscles, which we cannot prevent. The idea is that of pain, from the contact of the hand with the eye. A sudden sensation of pain in the eye makes the eyelid close. This is the case, already examined, of contraction by sensation. When this has been performed, a number of times, the idea of pain in the eye, and the idea of the contraction of the muscles, that is, of the sensations contained in the contraction of the muscles, become associated together, so strongly, that the one can never exist without the other. The next step of the process is, that the contraction follows upon the Idea, in the same manner as it followed upon the sensation. This is not a matter of conjecture, it is matter of fact. It is an experienced event. We do not undertake to say, what physical links are between the Idea and the contraction, any more than between the sensation and the contraction. The Idea is the last part of the mental operation. And as the Idea and the sensation are feelings so nearly alike, there is {338} no difficulty in believing that like effects proceed from like causes.[60]](56441.docx#chunk3640)

[[Bain's footnote 60: The act of winking or wincing under the threat of a blow on the eyes is a good example of strong, and even indissoluble association. Any one making the experiment with an infant will find that there is no original tendency to perform the act. It is an association generated under the impressiveness of an acute pain, mingled with terror; a state of things under which an indelible mental connexion will be established in a very small number of repetitions. As a dog that has once suffered from a burnt cinder will dread for ever any commotion or stirring of the fire, so one smart in the eye will be associated with the cause in an indissoluble bond; and the mere sight of anything in motion towards the face will induce the preventive volition.--\_B.\_]  
The origin of the sensation, and the origin of the Idea seem to be different. The sensation originates in the extremity of the nerves at some particular part of the body. Something, we know not what, happens at the extremity of those nerves; something, we know not what, is conveyed along the nerves to the brain; and then sensation exists. From the brain, in its state of sensation, something, we know not what, is conveyed along the nerves to the contracting muscle, and the contraction takes place. Also, from the Brain, in its state of Ideation, if I may here, for the sake of the analogy with sensation, use a word of my own coining, something is conveyed along the nerves to the contracting muscle, and the contraction takes place. The sensation does not originate in the Brain; the Idea does. But if the state of the Brain when it has a sensation, and when it has the idea of that sensation, be, as we may {339} naturally suppose, very nearly the same; and if the state of the Brain is a necessary link in the chain of antecedents and consequents which terminates in the contracted muscle, the effect is so far accounted for.  
Yawning is a familiar case of contraction, produced by sensation. We yawn without intending it; we know that we yawn in consequence of an antecedent state of feeling, of which, from never attending to it particularly, we have no distinct Idea; but which we recognise sufficiently as the antecedent of the act. This act, however, we also know is frequently the effect of Ideas. If we see another person yawn, it rarely happens that we do not yawn along with him. The act of yawning is so strongly associated with the idea of the feelings which precede it, that the sight of the act by another person calls up in us strongly the idea of the precedent feelings. The Idea exists, and as the contraction was the effect of the sensation, so is it also of the Idea.  
The same is the account to be rendered of the infectious power of convulsions. In assemblies of men and women, especially under such a state of excitement (religious enthusiasm, for instance) as implies the strong association of certain trains of Ideas, if one person is attacked with convulsions, it commonly happens that others are attacked, and frequently great numbers. That this is a case of Ideas is certain; because nothing is conveyed to the spectators from a person convulsed, but the sight of the person; and the sight can do nothing but excite associated Ideas. The associated Ideas exist: the convulsions follow.  
Laughter is a curious phenomenon of human nature. The analysis of it is not here required. It {340} will be easily recognised as a remarkable instance of the production of muscular action by Ideas. We laugh, either when certain ideas are suggested to us by others, or when they proceed from our own associations. In either case, the Ideas exist; the Laughter follows.  
Sobbing and weeping, in grief, afford a similar instance. What we call grief, is the existence of certain trains of Ideas. The Ideas exist: the weeping follows.  
The swallowing of the saliva affords a good experiment. If a friend assures you that you cannot refrain, for the space of a minute, from this act, and you are tempted to try, you are almost sure to fail. By the attention fixed on the act, the ideas of the feelings, which precede the act, are so strongly called up by association, that the act follows of course.[61]  
[Bain's footnote 61: This is a pure example of the "fixed idea," or of the tendency to work out into full actuality whatever is strongly presented in idea. The case also shows this power in conflict with the Will; we are supposed to be trying hard to prevent the act (which is volition), and yet there is, in the intense possession of an idea, a power greater than the will. The fact of being strongly excited to avoid swallowing the saliva, increases the force of the idea of swallowing it, and makes that idea almost omnipotent to work itself out. The same baffling of the will, the making it recoil upon itself, is shown in our attempt to forget or banish a painful idea. The more intensely we will to forget the idea, the more do we stamp it on the mind, through the excitement engendered by the volition.--\_B.\_]  
There are many acts of familiar occurrence to shew, that those actions of our organs which are the most {341} habitually produced by sensations, are capable of being strongly modified by Ideas. The effect of Fear, for example, on the action of the heart, is known to be very remarkable. So it is on the action of the bowels, of the kidneys, and of the skin. One of its effects is perspiration; another, paleness: another, cold.[11\*]](56441.docx#chunk3641)

[[Mill's footnote 11: The operation of Ideas on the internal parts of the body is so familiar, that we meet everywhere with pleasant stories of it. Zachary Gray, in one of his notes on Butler's Hudibras, alluding to the story of the countryman, who, receiving a prescription from the doctor, and being told by him to take that, swallowed the paper, asks, "And why might not this operate upon a strong imagination, as well as the ugly parson, the very sight of whom in a morning (Oldham's Remains) would work beyond Jalap or Rhubarb; and a Doctor prescribed him to one of his patients as a remedy against costiveness: Or what is mentioned by Dr. Daniel Turner (De Morbis Cutaneis), that the bare imagination of a purging potion has wrought such an alteration in sundry persons, as to bring on several stools like those they call physical; and he mentions a young gentleman, his patient, who having occasion to take many vomits, had such an antipathy to them, that ever after he would vomit as strongly by the force of imagination, by the bare sight of the emetic bolus, as most could do by medicine. The application of a clyster-pipe, without the clyster, has had the same effect upon others."--(\_Author's Note\_.)]  
The cases which we have just adduced, of yawning, and contagious convulsions, may be regarded as belonging to an extensive class; which obtains the general name of Imitation. There is more or less of a propensity to Imitation in all men, that is, to perform the act which we see another man performing. In most children the propensity is very strong; and {342} to it they owe much of the celerity with which they make certain acquirements; to that of imitating sounds, for example, the celerity with which they learn to speak. The propensity to imitate musical sounds so adheres to persons of a musical ear, even in mature age, that they can scarcely forbear humming every tune which they hear. Children learn to stutter and to squint, from imitation of their companions. We know how universally it happens that young persons acquire the manner and the air of those with whom they habitually live. These are cases not only of action, but of habits of action, produced by the agency of Ideas. It requires only cases of strong association to produce analogous effects, at all periods of life. "When we see a stroke," says Mr. Smith, "aimed and just ready to fall upon the leg or arm of another person, we naturally shrink and draw back our own leg, or our own arm. The mob, when they are gazing at a dancer on the slack rope, naturally writhe and twist, and balance their own bodies as they see him do. Persons of delicate fibres and a weak constitution of body, complain, that in looking on the sores and ulcers which are exposed by beggars in the streets, they are apt to feel an itching or uneasy sensation in the correspondent part of their own bodies. Men of the most robust make, observe, that in looking upon sore eyes, they often feel a very sensible soreness in their own." There are few persons who do not put on a cheerful countenance, upon the sight of the cheerful countenances of their friends; still fewer whose countenance is not made sorrowful by sight of the sorrowful countenances of their friends. It is well known, that Tears are contagious; and upon {343} this some well-known rules for the countenance both of the orator and the actor are prescribed. It is not necessary further to accumulate instances of this description; nor further to enter into the analysis of them, than to remark, that the action, the idea of which is conveyed to us by what we thus hear or see, calls up, by association, the idea of the feelings which precede the action. The Idea of the feelings exists, and the action follows.  
There is a case of the action of the muscles which requires particular attention; that in which we \_learn\_ to make use of them; in which we acquire what we call command over them only by degrees. There is more or less, probably, of this process in all the sorts of muscular action which are not performed originally by sensation; and the process seems to be longer or shorter according as the number of muscles, which must act together in order to the production of the effect, is greater or less. We know how slowly the child acquires the power of so balancing his body as to hold it erect. To this Effect the action of a great number of muscles is required. Yet, before the age at which reflection begins, the power is so completely acquired, that the mental process escapes our attention. To be erect, seems the posture into which our body puts itself of its own accord. There are circumstances, however, in which we become distinctly conscious of the powerful effort, which is required for that purpose, though, from its being habitual, we are in ordinary circumstances wholly insensible of it. If we allow sleep to come upon us, while we are in an erect posture, so far, that the ideas which maintain the muscular action begin to give way, we have {344} immediately the sensation of falling, and a strong perception of the effort required to keep the body erect.  
We observe how slowly the child learns to perform, with the requisite precision, the contractions on which the operation of walking depends. And every man can remember the difficulty with which he has learned to perform any new combination of contractions. Whoever has learned to dance, knows how imperfectly, till after a multitude of repetitions, he performed the simplest steps. Whoever has been drilled, as they call it; that is, trained to perform with the firelock the acts required of the soldier, knows with what difficulty, each of them, however simple, was originally performed.](56441.docx#chunk3642)

[There is another very familiar instance, that of learning to write. Most men can remember, when they began this process, how imperfectly the hand obeyed them; and how awkwardly they made even the simple strokes. Every man can make the experiment with his left hand. After the habit of performing with the right hand is completely attained, he is almost unable to form a letter with the left. The cases of this incapacity of the left hand to perform the acts which we perform habitually with the right are innumerable; and afford decisive illustration of the great fact which is now the subject of our attention. To perform the contractions of a number of muscles, the contractions of all of which must be combined in the action, the idea whereon each of the contractions depends must previously exist, and in the requisite order. That is to say, a certain association of Ideas must be performed. But we know, that no new {345} association of Ideas is easily or steadily performed. This is the effect of Repetition. As soon as the association of the ideas is completely established by repetition, the process, both bodily and mental, goes on with ease; and where the habit is great, with so much ease, as even to escape attention. The process of learning to play on a musical instrument is slow and difficult. By habit the associations become so close, that an expert performer can execute the most difficult pieces, and carry on another and even an intricate process of thought at the same time.  
How slowly, and with how much difficulty do children acquire command over the organs of speech? And how totally without effort on our part in after life does the sound appear immediately to cling to the Idea of the word? Yet, in learning the new sounds of a foreign language we become abundantly sensible of the difficulty, sometimes altogether insurmountable, of performing the precise combination of contractions which a particular sound requires.  
It seems to be established, therefore, by an ample induction, that muscular actions follow ideas, as invariable antecedent and consequent, in other words, as cause and effect; that whenever we have obtained a command over the ideas, we have also obtained a command over the motions; and that we cannot perform associate contractions of several muscles, till we have established by repetition, the ready association of the Ideas.  
I believe that nothing more need be said for the establishing of these truths. I shall adduce a few more instances, chiefly with the view to familiarize my readers with the mode of applying to this {346} interesting class of facts, the principles with which they are now fully acquainted.  
There is no part of the body with the use of which we are so perfectly familiar as the hand. There are no actions, of the sort at least to which we are attentive, the repetition of which is so incessant. Of course, the associations of the ideas corresponding to the associate contractions of the muscles which produce the various movements or actions of the hand, are formed in the most perfect manner; and we never have the Ideas, as antecedent, without the movement as consequent. This inseparable connexion between the Ideas, and the contractions, which we call the Power of the Will, is gradually formed. At first the hand of the infant is moved by sensations. If the inside of the hand is touched, so at least as to make the sensation considerable, the fingers bend; and perform more or less of the act of grasping. Here is a train of events. First, the sensation of touch, from the application of the external object; next, an influence from the seat of the sensation in the brain, transmitted along the nerves of certain muscles; then the contraction of the muscles, with the various sensations which the action upon those organs, and the action excited in them, imply. When the sensation has been often repeated, in conjunction with its effect, the Idea of the sensation becomes familiar and distinct; and capable of producing many of the effects which the sensation itself produces. It is also closely associated with the idea of the motion, and all its accompanying sensations as the effect; and the chain of antecedents and consequents proceeds in uninterrupted order.  
{347} As similar instances of motions, at first produced by sensations, afterwards by ides, we may adduce the remarkable cases of the sphincters of the bladder and \_anus\_. At first, children perform their evacuations, as they sneeze and cough, when the sensations excite them. Afterwards, they learn, but by slow degrees, to bring them under the command of ideas. There is no case, however, which affords more decisive evidence of the power of ideas over the actions of particular parts, than those which are called Amatory; because the effects, which are produced by the Ideas, cannot be produced by the will.  
There is another set of cases, which deserve attention; those in which the ideas which are followed by the action of certain muscles, acquire associations with other sensations or Ideas which call them up, and thence give action to the muscles, upon very inconvenient occasions. A woman who has accustomed herself to scream out, upon every sudden idea of the slightest danger, cannot abstain from screaming. The awkward motions, for which some, even eminent, men have been remarkable, Dr. Johnson, for instance, are completely explained by this principle. The ideas, whence the motions proceed, have become associated, in ways which can seldom be traced, with sensations, or ideas of frequent recurrence. And hence are the motions frequently produced.](56441.docx#chunk3643)

[There are equally remarkable cases, in which the associations, necessary to produce the idea on which the muscular actions depend, are prevented by other associations more powerful. Men admitted to the presence of a great personage have found themselves wholly unable to articulate a word. The Ideas of {348} Power and Dignity, with all their associates of terror and of hope, were called up in such irresistible association by the presence of him who was clothed with them; that the ideas necessary to the articulation of words were excluded, and the power of speaking was lost.  
We have now established, by an ample Induction, that the action of muscles follows, as an effect its cause; first, upon sensations; secondly, upon Ideas. The language which Professor Stewart has applied to a similar case, is perfectly applicable here. "It may, indeed, be said, that these observations only prove the possibility, that our muscular contractions may be all performed by sensations and Ideas. But, if this be admitted, nothing more can well be required; for, surely, if these phenomena are clearly explicable, from the known and acknowledged laws of the human mind, it would be unphilosophical to devise a new principle, on purpose to account for them."[12\*]  
[Mill's footnote 12: Elements of the Philosophy of the Human Mind. Chap. ii.]  
I believe, indeed, that this conclusion is not at variance with the common belief upon the subject. It appears to me to be not inconsistent with the language of the advocates for what is called the Freedom of the Will, to admit, that the action of the muscle takes place in consequence of the Idea; and that our power of willing consists in the power of calling into existence the appropriate Idea; that the power of the will is not immediate over the muscle, but over the Idea.  
The following observations of Dr. Reid, though not remarkable for their precision, seem fully to justify this Inference.  
{349} "\_First\_, every act of will must have an object. He that wills, must will something; and that which he wills is called the object of his volition. As a man cannot think without thinking of something, nor remember without remembering something, so neither can he will without willing something. Every act of will, therefore, must have an object; and the person who wills must have some conception, more or less distinct of what he wills.  
"A \_second\_ observation is, that the immediate object of will must be some action of our own."  
There are two assertions here which demand our attention; 1, that what is willed is an action of our own; 2, that to such will a conception, that is, an Idea, more or less distinct, of this action of ours, is indispensable.  
He adduces some particulars, in illustration, which impart something more of precision to his meaning.  
"A healthy child, some hours after its birth, feels the sensation of hunger, and, if applied to the breast, sucks and swallows its food very perfectly. We have no reason to think, that before it ever sucked, it has any conception of that complex operation, or how it is performed. It cannot, therefore, with propriety, be said that it wills to suck." It appears, from this example, that the muscular actions, which are performed by Sensation, Dr. Reid distinguishes from those, which he calls voluntary; that he denominates voluntary, those only which are performed by Ideas. It also appears fully, from the example, that the Idea of the action willed, which he considers the foundation of volition, must, in all cases, be subsequent to the performance of the act by Sensation; in other {350} words, that the idea cannot exist but in consequence of the sensation.  
What has yet been advanced, however, is not a full explanation of the subject. For, after it is admitted that the motion of the muscles is, in all cases, the immediate effect of the appropriate Idea, there is still one class which all men agree to call involuntary; another which many contend are voluntary. It now remains that we inquire wherein the difference consists.  
There is one point which is established by the mere statement, and which goes a certain way towards the solution of the question. Since the action of the muscles follows upon the existence of the Idea, whatever calls up the Idea produces the action. The Question, then, may be resolved into these two: In what manner is the Idea called up in cases called involuntary? In what manner is it called up in those called voluntary?  
In the cases called not voluntary, I doubt not, it will be easily admitted, that the Idea is raised in the way of ordinary association, by a preceding Sensation, or Idea. In the yawning which proceeds from the sight of another person yawning, the idea is called up by a Sensation. In the laughter which is excited either by ideas suggested to us from without, or ideas which spring up in our associated trains, the idea which is proximate to the muscular action is, of course, called up by an Idea.  
There appears no circumstance by which the cases called voluntary are distinguished from the involuntary, except that in the voluntary there exists a Desire. Shedding tears at the hearing of a tragic story, we do not desire to weep: laughing at the recital {351} of a comic story, we do not desire to laugh.[62] But when we elevate the arm to ward off a blow, we desire to lift the arm; when we turn the head to look at some attractive object, we desire to move the head. I believe that no case of voluntary action can be mentioned, in which it would not be an appropriate expression, to call the action desired.  
[Bain's footnote 62: These are emotional and not volitional manifestations. They are the natural signs, expression, or embodiment of a feeling, as feeling, and apart from the power to move the will, which is a separate fact.--\_B.\_]](56441.docx#chunk3644)

[We have already examined the meaning of the word Desire. We have seen that it is applied to pleasurable sensations; to exemption from painful sensations; and to the causes of them. We have also seen, and to the present purpose this is a point of great importance, that when the word desire is applied, to the cause of a sensation, or of an exemption from a sensation, it is employed in a figurative, or metaphorical, not in a direct sense. Few of our actions can be called pleasurable sensations; or exemption from painful; in propriety of language perhaps none. Our actions are causes of those two classes of events; and on that account are called, but only in a metaphorical sense, objects of desire.  
In a voluntary action, then, we recognise two Ideas; first, the idea of the sensation or exemption, which two, for shortness, we shall call by one name, Pleasure; secondly, the idea of an action of our own as the cause of the pleasure. It is also easy to see how the Idea of a pleasure should excite the Idea of the action which is the cause of it; and how, when the Idea exists, the action should follow.  
{352} We have seen, that the idea of a pleasure, as effect, associated with the Idea of an act of our own, as its cause, is one of the cases of motive. In the preceding paragraph it seems also to be one of the cases of will. It may then be asked, if the will is, or is not, anything different from the motive?  
The course pursued by the mind in devising and executing a train of means for the accomplishment of an end, has been often described. The End; that is, the advantage or pleasure desired; is the first thing in the contemplation of the mind; the step nearest to the end in the process of attainment, is the second; the step immediately preceding that is the third; and so on, to the step at which the process of execution must begin. Thus, suppose the pleasure of living in a handsome house is the end; the apartments, and furniture, and accommodations of such a mansion is the nearest step; the one immediately preceding that is the building and furnishing it; the one preceding that, the employing an architect and upholsterer; the one preceding that, the finding the money. Such is the order in which the mind proceeds from the primary conception of the End through the requisite series of means. The order of execution is directly the reverse. It begins where the other ends, and ends where the other begins. If the person we have supposed proceeds to the execution of his plan, his first step is, to find the money, his next to provide the architect, and so on from step to step, till he places himself in the pleasurable situation he originally contemplated.  
There is this double operation in what we may call the formation and execution of motives. The first association starts from the pleasure. The idea of the {353} pleasure is associated with its immediate cause, that cause with its cause, and so on, till it reaches that act of ours which is the opposite end of the train. The process may stop here, and in that case the motive does not excite to action. If it excites to action, the process is exactly reversed. In the first process of association, the pleasure was the first link in the chain, the action the last; in the second process, the action is the first, the pleasure the last. When the first process only is performed, the association is called MOTIVE. When the second is performed it is called WILL.  
A difficulty, however, presents itself. The first process terminates in an Idea of the action. The second process commences with an idea of the action. The Idea of the action is thus excited twice. But the first time it is not followed by the action; the second time it is. How is this to be reconciled with the supposed constancy of connexion between the muscular action and the Idea which produces it? The difficulty is solved by observing, that the phrase, "Idea of the action," has two meanings. There are two Ideas, very different from one another, to both of which we give the name, "Idea of the action." Of these Ideas, one is the outward appearance of the action, and is always a very obvious Idea. The other is the copy of those internal sensations which originally called the muscles into action, to which, from habit of not attending to them, we have lost the power of attending. This last is by no means an obvious Idea. And the mind passes from it so quickly, intent upon the action which is its result, that it is almost always swallowed up in the mass of association. It constitutes, in fact, one of the most remarkable {354} instances of that class of links in a chain, which, how important soever to the existence of the chain, are passed over so rapidly, that the existence of them is hardly ever recognised.  
This last Idea alone, is that upon which the contraction of the muscle is consequent. In the process of association which we call the motive, as described above, the first of the two above-mentioned ideas of the action, that of its outward appearance, is the idea excited. If the association stops there, the motive is inoperative; if the association does not stop there, but the idea of the outward appearance of the action, calls up that other, the idea of the internal feelings of the action, the motive is then operative, and we are said TO WILL.](56441.docx#chunk3645)

[If we are asked, how an Idea, as that of the outward appearance of an act, should at one time excite an idea, as that of the internal feelings of the act, at another time not excite it, we can only refer to the laws of association, as far as they have been ascertained. We know there are certain cases of association, so strong, that the one Idea never exists without calling up the other. We know there are other cases in which an Idea sometimes does, and sometimes does not, call up such or such an Idea. Sometimes it is easy to trace the cause of this variety; sometimes difficult.[63]  
[Editor's footnote 63: This analysis of the power of the Will over muscular action is substantially that of Hartley, though more clearly and forcibly stated, and more amply illustrated. In the field of mental philosophy this is the point at which Hartley approached nearest to the most advanced thoughts of his successors, and left least for them to do beyond the task of commentators and defenders.  
The doctrine of Hartley on the Will may be summed up in the following propositions. 1. All our voluntary movements were originally automatic: meaning by automatic, involuntary, and excited directly by sensations. 2. When a sensation has the power of exciting a given muscular action, the idea of that sensation, if sufficiently vivid, will excite it likewise. 3. The idea of the sensation which excites an automatic action of the muscles, persists during the action, and becomes associated with it by contiguity, in such a manner as to be itself, in its turn, excited by any vividly recalled idea of the muscular act. 4. The following is what takes place in voluntary motion. The idea of the end we desire, excites by association the idea of the muscular act which would procure it for us. The idea of this muscular act excites, by association, the idea of the sensation which originally excited the same muscular action automatically. And lastly, the idea of this sensation excites the action, as the sensation itself would have done. 5. These associations being formed gradually, and progressively strengthened by repetition, this gives us the explanation of the gradual and slow process whereby we gain what is called command of our muscles; i.e. the process by which the actions, originally produced automatically by sensations, come to be produced, and at last, to be easily and rapidly produced, by the ideas of the different pleasurable ends to which those muscular actions are the means. 6. In this chain of association, as is so often the case in chains of association, the links which are no otherwise interesting to us than by introducing other links, gradually drop out of consciousness, being, after many repetitions, either forgotten as soon as felt, or altogether thrown out; the latter being the supposition which Hartley apparently favours. The link that consists in the idea of the internal sensations which excited the muscular action when it was still automatic, being the least interesting part of the whole series, is probably the first which we cease to be aware of. When the succession of the ideas has become, by frequent repetition, extremely prompt, rapid, and certain, another link tends to disappear, namely, the ideas of the muscular feelings that accompany the act. A practised player, for example, on a keyed instrument, becomes less and less conscious of the motions of his fingers, until there at last remains nothing in his consciousness to shew that the muscular acts do not arise without any intermediate links, from the purpose, i.e. the idea in his mind, which made him begin playing. At this stage the muscular motion, which, from automatic, had become voluntary, has become, from voluntary, what, in Hartley's phraseology, is called secondarily automatic; and it seems to be his opinion that the ideas which have disappeared from consciousness, or at all events from memory, have not been (as maintained by Stewart) called up, and immediately afterwards forgotten, but have ceased to be called up; being, as it were, leapt over by the rapidity with which the succeeding links rush into consciousness.  
This theory, as we have seen, is adopted, and more fully worked out, by the author of the Analysis. He proves, by many examples, that sensations excite muscular actions; that ideas excite muscular actions; and that, when a sensation has power to excite a particular muscular action, the idea of the sensation tends to do the same. It is true that many, if not most, of what he presents as instances of muscular action excited by sensations, are cases in which both the sensation and the muscular action are probably joint effects of a physical cause, a stimulus acting on the nerves. This misapprehension by the author reaches its extreme point when he declares traumatic tetanus to be produced not by the wound but by the pain of the wound; and cramps to be produced by sensations, instead of merely producing them. But the error is quite immaterial to the theory of the Will; the two suppositions being equivalent, as a foundation for the power which the idea of the muscular sensation acquires over the muscular action. Whether the sensation is the cause of the automatic action, or its effect, or a joint effect of the cause which produces it--on all these hypotheses the sensation and the action are conjoined in such a manner, as to form so close an association by contiguity that the idea of the sensation becomes capable of exciting the action. This being conceded, it follows, by the ordinary laws of association, that whatever recals the idea of the sensation, tends, through the idea, to produce the action.](56441.docx#chunk3646)

[Now, there is nothing so closely associated with the idea of the muscular sensation, as the idea of the muscular act itself, such as it appears to outward observation. Whatever, therefore, calls up strongly the idea of the act, is likely to call up the idea of the accompanying muscular sensation, and so produce the act. But the idea of the act is called up strongly by anything which makes us desire to perform it; that is, by an association between it as a means, and any coveted pleasure as an end. The act is thus produced by our desire of the end; that is (according to the author's theory of desire) by our idea of the end, when pleasurable; which, if an end, it must be. The pleasurable association may be carried over from the ultimate end to the idea of the muscular act, through any number of intermediate links, consisting of the successive operations, probably in themselves indifferent, by which the end has to be compassed; but this transfer is strictly conformable to the laws of association. When the pleasurable association has reached the muscular act itself, and has caused it to be desired, the series of effects terminates in the production of the act. What has now been described is, in the opinion of the author, the whole of what takes place in any voluntary action of the muscles. At the close of the chapter we shall consider whether there is any part of the facts, for which this theory does not sufficiently account.--\_Ed.\_]  
{355} II. But even when it is admitted that all muscular contraction is the effect of association, in the way we have described, there are other {356} phenomena to be accounted for. We may still be reasonably called upon to explain the power which the mind appears to possess over its associations. There is a {357} distinction in the trains of the mind which is observed by every body. Some trains, as those in dreams, in delirium, in frenzy, are supposed to proceed according {358} to the established laws of association without any direction from the mind. Other trains; a piece of reasoning, for example; any process of thought, directed to an end; are considered as wholly under the guidance of the mind. The guidance of the mind is but another name for the will. And thus it is inferred that the will is not association, but something which controuls association.  
We now proceed to the solution of this difficulty. It can be supposed that the will controuls association, in only one of two ways; either, by calling up an Idea, independently of association; or, by making an Idea call up, not the Idea which would follow it spontaneously, but some other Idea.  
The first supposition, that an Idea can be called up by the will, is relinquished by the common consent of philosophers.  
We cannot will without willing something; and in willing we must have an Idea of the thing willed. If we will an Idea, therefore, we must have the Idea. The Idea does not remain to be called up. It is called up already. To say that we will to have an Idea, when we already have it, is a mere absurdity.[64]  
[Bain's footnote 64: What we have in mind when we will to remember anything, is of course not the thing to be remembered, but some collateral, or something to determine our search for it. We will to remember an opinion found in a certain book. We have not in our mind the actual opinion sought; what we have in mind is the book, and portion of the book, and the subject that the opinion refers to; and we desiderate the filling up of the blank in our present ideas. We will to remember the Greek name of the god, called by the Romans, Bacchus. We have in mind the name Bacchus, and the knowledge that the Greeks had a different name for the god; we have not in our mind that name; and we put forth an effort of recollection to arrive at it.--\_B.\_]  
{359} The second supposition is, that will can prevent an Idea from calling up one idea, make it call up another; prevent its calling up the Idea which would have followed it spontaneously, make it call up the Idea which the mind is in quest of.  
The first question is, how the will, or the mind willing, can prevent an Idea from calling up another. We know that this is wholly impossible in all those cases in which the association is strong. We cannot think of colour without thinking of extension; we cannot think of the word bread without thinking of its meaning. It can be supposed that we have such power in those cases only in which an Idea has not an inseparable association with the idea in question, but only such an association with it as it has with many others. But how is it that we can hinder an idea which has those associations, from calling up any of the ideas with which it is associated? How can we foresee which of those ideas it will call up? And, if we do foresee that it will call up the idea which we desire to avoid, it follows that the Idea is already in our mind. There seems, therefore, the same incongruity in the supposition that the will can directly prevent, as that it can directly produce, an idea.  
If the mind, then, possesses any power over its trains, it seems to be confined to its power of making {360} an idea call up other ideas than those which it would spontaneously excite. And if it possesses this power, it possesses that also of excluding ideas which would otherwise exist; since a new train of associations must take its origin from the state of consciousness thus produced. It is, therefore, in this, if in any thing, that the power of willing consists.](56441.docx#chunk3647)

[We are, however, immediately encountered by the question. If the mind cannot will an Idea, what power does it possess of introducing any idea into a train, but such as comes of its own accord? If it has the idea, it is in the train already. If it has it not, what can it do in order to obtain it? There is the existing train; but how can that be made any thing but what it is; or have any associations but those which are already established?  
In cases where language is too imperfect to ensure the conveyance of definite ideas, there is an advantage in particular instances. There are two familiar processes, which are commonly adduced as examples of the power which the mind exercises over its trains. The one is, the endeavour to recollect something we do not remember. The other is, the process of attention.  
When anything is remembered, the idea of the thing is always in the mind along with certain associations. In recollection, therefore, the object is attained by the excitement of this idea. Sometimes the effort which we make is successful; sometimes it is not. We are said to will to recollect; but this is obviously an improper expression. To recollect is to call up an Idea. But this, as we have seen already, is not within the province of will. When it is said {361} that we will to recollect, the meaning only is, that we desire to recollect.  
But it is also to be inquired, what here is the meaning of the word Desire. We have seen that it is a term applied to Pleasure, or the Cause of Pleasure. The idea, in this instance, which the mind is in quest of, is desired. But why desired? As Pleasure; or the Cause of Pleasure? As Cause, we may reply, in all instances. The idea is wanted for some purpose or end. In that End the pleasure is involved.  
The End is thus a pleasurable, that is, an interesting, Idea. But it is in the character of interesting ideas, to dwell in the mind. The meaning is, that they are easily called up by other ideas; and, thus, that there is a perpetual recurrence of them. A young man in love, is said to be engrossed with the idea of his mistress. No sooner has her idea suggested another idea, that is, given place to it, than her idea is again suggested by another, and so on, continually. The man, who is to be executed to-morrow, can think of nothing but the terrible event which is approaching. It can be banished, hardly for an instant. Every thing serves to recall it: and along with it a rush of ideas of the most painful description. There is no law of association more remarkable than that of the rapidity with which pleasurable and painful ideas call up trains of great complexity, and the facility with which they themselves are excited by almost every idea which enters the mind.  
When we endeavour, therefore, to recollect any thing, the pleasurable idea, the purpose or end, predominates in the mind, and gives birth to those {362} associations, which are called the effort of recollection. The idea sought after, is sought as a means to this end. Till that idea is recalled, the Idea of the end, that is, an unsatisfied desire, exists, and calls up one circumstance after another, more or less connected with the Idea which is sought after. If these circumstances do not recall the idea; the feeling of unsatisfied desire still continues. The feeling of unsatisfied desire, accompanying successive cases of association, constitutes the feeling to which we give the name of effort of recollection. And the Idea of the End, perpetually calling up the idea of the absence of what is wanted, as the means to that end, and hence calling up in close association every circumstance connected with that unknown something, constitutes the feeling which we call casting about, for the unknown Idea. I believe that this is a full, though summary account of the mental process, or succession of ideas, which takes place when we endeavour to recall a forgotten idea.  
The other process, through which the mind is supposed to influence its trains, is Attention. We seem to have the power of attending, or not attending to any object; by which is meant, that we can Will to attend to it, or not to attend. By attending to an object, we give it the opportunity of exciting all the ideas with which it is associated. By not attending to it we deprive it of more or less of that opportunity. And if the will has this power over every idea in a train, it has thence a power, which may be called unlimited, over the train.  
What remains, therefore, to complete this inquiry, is, to point out the real process, on which the name {363} ATTENTION is in this manner bestowed. The exposition has been substantially given by preceding writers. But it is desirable, if it be in our power, to set forth the several steps of the process a little more distinctly than has hitherto been done.  
At first sight, the objects of attention seem to be infinite. When traced to their sources, however, it is found, that they are of two species only. We attend to Sensations; we attend to Ideas; and there is no other object of our attention.  
For the present purpose, it is peculiarly necessary to bear in mind the important distinction we have already noticed, between the class of indifferent sensations, and the class of pleasurable or painful, which we may call, by one name, interesting, sensations. Uninteresting sensations are never, for their own sakes, an object of attention. If ever they become objects of attention, it is when they are considered as causes, or signs, of interesting sensations.](56441.docx#chunk3648)

[A painful or a pleasurable sensation is a peculiar state of mind. A man knows it, only by having it; and it is impossible that by words he can convey his feeling to others. The effort, however, to convey the idea of it, has given occasion to various forms of expression, all of which are greatly imperfect. The state of mind under a pleasurable or painful sensation is such, that we say, the sensation engrosses the mind; but this really means no more than that it is a painful or pleasurable sensation; and that such a sensation is a state of mind very different from an indifferent sensation. The phrase, engrossing the mind, is sometimes exchanged for the word Attention. A pleasurable or painful sensation is said to fix the {364} Attention of the Mind. But if any man tries to satisfy himself what it is to have a painful sensation, and what it is to attend to it, he will find little means of distinguishing them. Having a pleasurable or painful sensation, and attending to it, seem not to be two things, but one and the same thing. The feeling a pain is attending to it; and attending to it is feeling it. The feeling is not one thing, the attention another; the feeling and the attention are the same thing.  
An objector may appeal to certain cases, in which one sensation of the pleasurable or painful kind seems to be swallowed up, as it were, by another. Thus, in the agony of the gout, or toothache, the uneasiness of some local cutaneous inflammation is hardly perceived. The case here is that of two uneasy sensations, one slight; the other intense. According to the supposition, that attention is but a name given to the having of an interesting sensation, what ought to happen in this case is that precisely which does happen. The stronger sensation is, the stronger attention. And that the feebler sensation merges itself in the stronger, and is lost in it, is matter of common and obvious experience. Thus we are every instant, as long as we are awake, shutting and opening our eyelids. We are, therefore, alternately in light and darkness. But as the light is the stronger sensation of the two, we have the sensation of light without interruption. Thus, too, if a stick ignited at one end is rapidly turned round in a circle, though it is obvious that the ignited object is at only one part of the circle at a time, and all the other parts are in darkness, the circle, nevertheless, assumes the {365} appearance of being wholly ignited. There is not a more striking exemplification of this law than what is exhibited by the comparison of our sleeping and waking thoughts. In dreams, when our trains are composed of Ideas, unmixed with sensations, the Ideas have so much vividness as to be taken for sensations.[65] In our waking trains, sensations and ideas are mixed together; but as each sensation introduces many ideas, however numerous the sensations may be, the ideas are many times more numerous. Yet such is the effect of the more vivid to obscure the less vivid feeling, that our day does not appear a day of ideas, but a day of sensations.  
[Bain's footnote 65: The author makes frequent reference to dreams, but it may be doubted whether he has seized the explanation of that obscure phenomenon. It is an approximately correct statement of one circumstance of dreams, that the Ideas are unmixed with sensations; in a sound slumber, we are inaccessible to the sensations of the five senses. We are not equally fortified against the organic sensations, as those of digestion and other functions. The sensations absent are a very important class, as regards objective or outward reality; and it is probably their absence, as competitors on this ground, that allows the ideas to swell out into an unnatural and illusory prominence, as if they alone were the full reality. This is a more probable account of the illusion, than the circumstance given in the text, "the greater vividness" of the monopolising Ideas, although that too is a fact, and may tend in the same direction.--\_B.\_]  
There are cases in which the effect which is thus produced by a stronger sensation with respect to a weaker, or by sensations with respect to ideas, is also produced by one idea with respect to another. Innumerable cases can be adduced to prove, and, {366} indeed, it forms one of the great features of what we call the intellectual nature of man, that Ideas, by their accumulation, are capable of acquiring a power, superior to that of sensations, both as pleasure and as pain. The pleasures of Taste, the pleasures of Intellectual exertion, the pleasures of Virtue, acquire when duly cultivated, a power of controlling the solicitations of appetite, and are esteemed a more valuable constituent of happiness than all that sense can immediately bestow.  
On the power of ideas, as the stronger feelings, to swallow up sensations, in the same manner as stronger sensations swallow up the weaker, some decisive experiments have been made. The wretches who, nearly a century ago, were made tools of in France, under the title of \_convulsionnaires\_, to carry on the purposes of Fanaticism, were so placed under the dominion of certain ideas, being persons of weak intellects and strong imagination, and operated upon by men skilled in the ways of perverting feeble understandings, that the ideas became feelings far more potent than the sensations; and when the bodies of the frenzied creatures were subjected to operations calculated to produce the most intense sufferings, they denied that they felt any thing, and by the whole of their demeanour confirmed, as far as it could confirm, the truth of their asseverations. That men in the ardour of battle receive wounds of a serious nature, without being aware of them, till after a considerable lapse of time, is testified upon unsuspicious evidence.](56441.docx#chunk3649)

[These instances, therefore, it is manifest, form no objection to our conclusion, that the attending to an {367} interesting sensation, and the having the sensation, are but two names for the same thing.  
We have now to consider, what it is, to attend to an indifferent sensation. The force of the word indifferent implies, that an indifferent sensation is not an object of attention on its own account. If it were an object of attention on its own account, it would not be indifferent. If it is regarded, however, as the cause, or the sign, of an interesting sensation, we are already acquainted with the process which takes place. The idea of the interesting sensation is immediately associated with it; the state of consciousness then is not an indifferent sensation merely; it is a sensation and an idea, in union. The idea besides is an interesting idea, that of a pain or pleasure.  
The union of an interesting idea, with an indifferent sensation, makes a compound state of consciousness which, as a whole, is interesting. As the having an interesting sensation, and the attending to it, are but two names for the same thing; the having a sensation rendered interesting by association, and the attending to it, cannot be regarded as two different things. In the first case, attention is merely a sensation of a particular kind; in the second, it is merely an association of a particular kind.  
We have now to shew what takes place, when the attention, to use the common language, is not directed to Sensations but Ideas.  
Ideas are, like sensations, of two kinds. They are either interesting, or not interesting. We need not repeat what has been so often said respecting the origin and composition of those two classes of Ideas, and the cause of their difference.  
{368} An indifferent idea, like an indifferent sensation, is, in itself, not an object of attention. If it were an object of attention, it would not be indifferent; in other words, it would be interesting. In fact, it is in the very import of the word attention, that the object of it is interesting. And if an object is interesting it must be so, either in itself, or by association.  
As we found that the having an interesting sensation, and the attending to that sensation, were not two distinguishable states of consciousness, but one and the same state of consciousness, let us now observe, as carefully as we can, whether the having an interesting idea is a state of consciousness, which can be distinguished from attending to it, or whether they are not merely two names for the same thing. When the young man, in love, has the idea of the woman, who is the object of his affections, is not attention merely another word for the peculiar nature of the Idea? In like manner in the mind of the man, who is to be executed to-morrow, the idea of the terrible event before him, is an idea in the very essence of which attention is involved. Attention is but another name for the interesting character of the idea.  
If there are any cases to which an objector's appeal can be made, they will be found, upon examination, to resemble those which we considered in the case of sensation, and which we found to be nothing more than instances of the prevalence of a stronger feeling over a weaker; stronger, either by its nature, or the peculiar circumstances of the moment. We shall not, therefore, stay to propound and explain them.  
{369} It only remains to expound the case in which an indifferent Idea becomes interesting by association. It cannot do so in any other way, than those in which it appeared that an indifferent sensation becomes interesting. It may be considered as the cause, or the sign, of some interesting state of consciousness. When that which is interesting becomes associated with that which is uninteresting, so as to form one compound state of consciousness, the whole is interesting. An idea, in itself indifferent, associated with interesting ideas, becomes part of a new compound which, as a whole, is interesting: and an interesting idea existing, and an interesting idea attended to, are only two names for the same thing.  
In the case of Ideas, then, as in the case of sensations, attention to an interesting Idea, is merely having it; attention to an indifferent idea, is merely associating with it some idea that is interesting.  
As far then, as ATTENTION gives us power over the trains of our ideas, it is not Will which gives it to us, but the occurrence of interesting sensations, or ideas.  
There is not any of the phenomena, which are usually appealed to as the great manifestations of the power of the mind over its trains, which this mode of exposition does not satisfactorily account for. We may take as a sufficient exemplification of them all, the composition of a Discourse upon any important topic. The operation of the mind upon such an occasion seems to consist in a perpetual selection; that is, in the exercise of an uninterrupted power over {370} the trains of association. There is no doubt that it consists of that peculiar class of associations, to which we give the names, of selection, and power.  
In composing a Discourse, a man has some end in view. It is for the attainment of this end, that the Discourse is undertaken. If every thing in the discourse tends to the accomplishment of the end, the Discourse is said to be coherent, appropriate, consistent. If there are many things in it which have no tendency, or but little tendency, to the accomplishment of the end, the discourse is said to be rambling, and incoherent.](56441.docx#chunk3650)

[This is a case, the exposition of which corresponds very much with that which we have already explained; the endeavour to recollect a forgotten Idea. In that case, the existence of an interesting idea calls up a variety of circumstances, that is, a variety of ideas; and it very often happens, that the idea which is sought for, is called up among them.  
In this case, what the seeker has occasion for, is a single Idea; a single idea accomplishes the end he has in view. In the case of the composer of a discourse a great many ideas are wanted. His end cannot be attained by one or a few. But his proceeding is precisely of the same kind in regard to his many Ideas, as that of the man who desires to recollect in regard to his single Idea. He knows there are a number of ideas, connected with the end he has in view, which he can employ for his purpose, provided he can call them up. How they are called up, after the practice we have had in those solutions, requires but little explanation. The end in view is an interesting Idea. It is, at the time, the prevalent Idea. {371} It is that by which the man is stimulated to action. This idea calls up by association many ideas and trains of ideas. Of these a large proportion pass, and are not made use of. Others are detained and employed. This detaining and employing is all that needs to be explained. It is the same sort of result as the recognition of the forgotten Idea, in the case of recollection.  
The forgotten Idea is an Idea associated, as cause, with the end to be obtained by it, as its effect. The same is the case with the ideas which the composer of a discourse selects out of the multitudes, which the continual suggestions of the interesting Idea by which he is actuated, that of his end, bring before him. The greater number are not associated with the idea of his end as cause and effect. Some among them are. These immediately suggest the use to be made of them; and thence, by the regular chains of association, the operations take place.  
It is from these explanations, also, easy to see what constitutes the difference between the man who composes a coherent, and the man who composes a rambling discourse. In the man who composes the coherent discourse, the main Idea, that of the end in view, predominates, and controls the association, in every part of the process. It is not only the grand suggesting principle, which sets trains of the ideas connected with itself in motion; but it is the grand selecting principle. As ideas rise in the train, this interesting and predominating idea stands ready to be associated as effect with every idea in the train which can operate as cause; it so associates itself with no other; and therefore no wrong selection is made. {372} If, however, it does not thus predominate in the mind of the composer of the discourse, as his exclusive end; if it gives way at every turn to some other end; as the idea of applause from some lively jest, from some gaudy description, from some florid thought, the selection is made so far upon other principles, and the object of the discourse is forgotten.[66]](56441.docx#chunk3651)

[[Editor's footnote 66: The account here given of Attention, though full of instructive matter, I cannot consider to be at all adequate. When it is said that a sensation, by reason of its highly pleasurable or painful character, engrosses the mind, more is meant than merely that it is a highly pleasurable or painful sensation. The expression means, first, that when a sensation is highly pleasurable or painful, it tends, more or less strongly, to exclude from consciousness all other sensations less pleasurable or painful than itself, and to prevent the rising up of any ideas but those which itself recals by its associations. This portion of the facts of the case is noticed by the author, though not sufficiently prominent in his theory. But there is another portion, altogether untouched by him. Through this power which the sensation has, of excluding other sensations and ideas, it tends to prolong its own existence; to make us continue conscious of it, from the absence of other feelings which if they were present would either prevent us from feeling it, or would make us feel it less intensely; which is called diverting our attention from it. This is what we mean when we say that a pleasurable or painful idea tends to fix the attention. We mean, that it is not easy to have, simultaneously with it, any other sensation or idea; except the ideas called up by itself, and which in turn recal it by association, and so keep it present to the mind. Becoming thus a nearly exclusive object of consciousness, it is both felt with greater intensity, and acquires greater power of calling up, by association, other ideas. There is an increase both in the multitude, the intensity, and the distinctness of the ideas it suggests; as is always the case when the suggesting sensation or idea is increased in intensity. In this manner a sensation which gets possession of our consciousness because it is already intense, becomes, by the fact of having taken possession, still more intense, and obtains still greater control over the subsequent train of our thoughts. And these also are precisely the effects which take place when, the sensation not being so pleasurable or painful as to produce them of itself, or in other words to fix the attention, we fix it voluntarily. All this is as true of Ideas as of Sensations. If a thought is highly painful, or pleasurable, it tends to exclude all thoughts which have no connexion with it, and which if aroused would tend to expel it--to make us (as we say) forget the pain or the pleasure. By thus obtaining exclusive possession of the mind, the pleasurable or painful thought is made more intense, more painful or pleasurable; and, as is the nature of pains and pleasures, acquires, in consequence, a greater power of calling up whatever ideas are associated with it. All this is expressed by saying that it fixes the attention. And ideas which are not of themselves so painful or pleasurable as to fix the attention, may have it fixed on them by a voluntary act. In other words, the will has power over the attention.  
But how is this act of will excited, and in what does it consist? On this point the author's analysis is conclusive, and admirable. The act, like other voluntary acts, is excited by a motive; by the desire of some end, that is, of something pleasurable; (including in the word pleasurable, as the author does, exemption from pain). What happens is, that, the idea on which we are said to fix our attention not being of itself sufficiently pleasurable to fix it spontaneously, we form an association between it and another pleasurable idea, and the result then is that the attention is fixed. This is the true account of all that we do when we fix our attention voluntarily; there is no other possible means of fixing it. It thus appears, that the fixing of attention by an act of will depends on the same law, as the fixing it by the natural pleasantness or painfulness of the idea. Of itself the idea is not pleasant or painful, or not sufficiently so to fix the attention; but if it were considerably more pleasant or painful than it is, it would do so. It becomes considerably more pleasurable by being associated with the motive--that is, by a fresh association of pleasure with it--and the attention is fixed. This explanation seems complete.  
It may be said, however, by an objector, that this accounts only for the case in which the voluntary attention flows easy and unimpeded, almost as if it were spontaneous; when the mere perception that the idea is connected with our purpose--with the pleasurable end which suggested the train of thought, at once and without difficulty produces that exclusive occupation of the mind with it, which is called fixing the attention. But it often happens that the mere perception of its connexion with our purpose is not sufficient: the mind still wanders from the thought: and there is then required a supplementary force of will, in aid of association; an effort, which expends energy, and is often both painful and exhausting.](56441.docx#chunk3652)

[Let us examine, then, what takes place in this case. The association of the thought with the pleasurable end in view, is sufficient to influence the attention, but not sufficient to command it. The will, therefore, has to be called in, to heighten the effect. But in this case, as in every case, the will is called into action by a motive. The motive, like all other motives, is a desire. The desire must be either the same desire which was already felt, but made more effectual than before, or another desire superadded to the first. The former case presupposes the latter: for the desire which was not sufficient to fix the attention firmly on that which is the means to its fulfilment, cannot be sufficient to call forth the voluntary effort necessary for fixing it: some other desire must come to its assistance. What, then, is this other desire? The question is not difficult. The present is one of the complex cases, in which we desire a different state of our own desires. By supposition, we do not care enough for the immediate end, that is the idea of it is not sufficiently pleasurable, or the idea of its frustration sufficiently painful, to exert the force of association required. But we are dissatisfied with this infirmity of our desires: we wish that we cared more for the end; we think that it would be better for us if either this particular end, or our ends generally, had greater command over our thoughts and actions than they have. There is thus called up, by our sense of the insufficiency of our attention in the particular case, the idea of another desirable end--greater vigour and certainty in our mental operations. That idea superadds itself to the idea of the immediate end, and this reinforcement of the associating power at last suffices to fix the attention. Or (which is the same thing in effect) the painful idea is called up, of being unable to fix our attention, and being in consequence thwarted generally in our designs; and this pain operates, in the same manner as a pleasure, in fixing our attention upon the thought which, if duly attended to, will relieve us from the oppressive consciousness.  
It will be asked, whence come the sense of laborious effort, and the subsequent feeling of fatigue, which are experienced when the attention does not fix itself spontaneously, but is fixed with more or less difficulty by a voluntary act? I conceive them to be consequences of the prolongation of the state designated by the author, in the text, as a state of unsatisfied desire. That state, whatever view the psychologist takes of it, is a condition of the brain and nerves, having physiological consequences of great importance, and drawing largely on that stock of what we call nervous energy, any unusual expenditure or deficiency of which produces the feeling of exhaustion. The waste of energy, and the subsequent exhaustion, are greatest when the desire seems continually on the point of obtaining its gratification, but the gratification constantly eludes it. And this is what actually happens in the case supposed. The attention continually fastens on the idea which we desire to attend to, but, from the insufficient strength of the pleasurable or painful association, again deserts it; and the incessant alternation of hope and disappointment produces, as in other cases, the nervous disturbance which we call the sense of effort, and which is physiologically followed by the sensations of nervous exhaustion. It is probable that whatever is not muscular in the feeling which we call a sense of effort, is the physical effect produced by a more than usual expenditure of nervous force: which, reduced to its elements, means a more than usually rapid disintegration and waste of nervous substance.  
Let me here remark, that the recognition, by the author of the Analysis, of a peculiar state of consciousness called a state of unsatisfied desire, conflicts with his doctrine that desire is nothing but the idea of the desired pleasure as future. In what sense is it possible to speak of an unsatisfied idea? If even we insert the omitted element of Belief, and resolve desire not into the mere idea, but into the expectation of a pleasure; though we might rationally speak of an unsatisfied expectation, it would only mean an expectation not fulfilled, in other words, an expectation of pleasure not followed by the pleasure; an expectation followed by a mere negation. How a pleasant idea, followed, not by a pain, but by nothing at all, is converted into a pain, the pain of unsatisfied desire, remains to be explained: and the author has not pointed out any associations which account for it. If it be said that the expectation is perpetually renewed and perpetually disappointed, this is true, but does not account for more than a continual alternation between a pleasant idea and no idea at all. That an element of pain should enter into unsatisfied desire, is a fact not explained by the author's theory; and it stands as evidence that there is in a desire something inherently distinct from either an idea or an expectation.--\_Ed.\_]](56441.docx#chunk3653)

[{373} I cannot deem it necessary, after the training which we now have had, to give these expositions in more {374} minute detail. But it seems to be proper to notice, in a few words, the explanation which they afford of {375} the phenomena which are usually named the power or want of power over the train of the ideas--in a still {376} more important instance than the composition of a discourse, that of the conduct of life. Some men are distinguished for a steady direction of their actions, through the course of their lives, to some general end, or ends. One man attaches himself to the cultivation of his mind; another, to the accumulation of wealth; another, to the acquisition of fame. There are other men whose lives appear to be a perpetual fluctuation. They either shift from one great end to another perpetually; or, in their trains, the great ends appear to have no ascendancy over the little. There are men who seem to have a different end of their actions, every day they rise from their beds. The men, in whose minds the great purposes of life seem to have no greater ascendancy than the minor objects, are called frivolous men. It sometimes happens, that a {377} man who chooses a frivolous end is steady in the pursuit of it. The common case, however, is that no one frivolous end acquires a steady ascendancy; and the man is in a state of perpetual fluctuation.  
The solution of these phenomena is obvious. When the idea of any of the great purposes of life exists habitually in controlling strength, it performs the same function in regard to the selection of actions, which the Idea of the end or purpose of the Discourse performs in regard to ideas, in the case of the man who is composing it. Out of the whole number of ideas, which present themselves to him, the idea of his End associates itself with those which can operate as causes of its attainment; and this association is followed by all the other associations which produce the employment of the Ideas. In like manner, when {378} the great purposes of life are established into predominating ideas, they associate themselves strongly with the ideas of those actions which contribute to their attainment; and those associations are followed by all the other associations, which produce their adoption.  
The interpretation which belongs to the phrases, when we hear of men who have, and men who have not, their ideas and actions under command, is, that the one set of men have certain leading ideas, called purposes, so established, as to maintain a control over both their Ideas and their actions; the other set have not ideas so formed as to exercise this ascendancy. That man may be justly said to have the greatest command over his ideas, whose associations with the grand sources of felicity are the most numerous and strong. When the grand sources of felicity are formed into the leading and governing ideas, each in its due and relative strength. Education has then performed its most perfect work; and thus the individual becomes, to the greatest degree, the source of utility to others, and of happiness to himself.  
In regard, then, to that state of mind which precedes action, we seem to have ascertained the following indisputable facts: That actions are, in some instances, preceded by mere sensations; that, in other instances, they are preceded by ideas; that, in all cases in which the action is said to be Willed, it is desired, as a means to an end; or, in more accurate language, is associated, as cause, with pleasure as effect: that the idea of the outward appearance of the action, thus excited by association, excites, in the same way, the idea of the internal feelings, which are {379} the immediate antecedent of the action, and then the action takes place; that whatever power we may possess over the actions of our muscles, must be derived from our power over our associations; and that this power over our associations, when fully analysed, means nothing more than the power of certain interesting Ideas, originating in interesting sensations, and formed into strength by association.[67] [68]](56441.docx#chunk3654)

[[Editor's footnote 67: The analysis contained in this chapter affords, as it appears to me, a sufficient theory of the manner in which all that we denominate voluntary, whether it be a bodily action or a modification of our mental state, comes to be produced by a motive, i.e. by the association of an idea of pleasure or of exemption from pain with the act or the mental modification. But there is still an unexplained residuum which has not yet been brought to account. There are some bodily movements the consequence of which is not pleasure, but pain. Painful states of consciousness, no less than pleasurable ones, tend to form strong associations with their causes or concomitants. The idea, therefore, of a pain, will, no less than that of a pleasure, become associated with the muscular action that would produce it, and with the muscular sensations that accompany the action; and, as a matter of fact, we know that it does so. Why, then, is the result not merely different, but contrary? Why is it that the muscular action excited by association with a pleasure, is action towards the pleasure, while that excited by association with a pain is away from the pain? As far as depends on the law of association, it might seem that the action, in both cases, would be towards the fact with which the action is associated. There are some remarkable phenomena in which this really happens. There are cases in which a vivid imagination of a painful fact, seems really to produce the action which realizes the fact. Persons looking over a precipice are said to be sometimes seized with a strong impulse to throw {380} themselves down. Persons who have extreme horror of a crime, if circumstances make the idea of committing it vividly present to their mind, have been known, from the mere intensity of their horror, to commit the crime without any assignable motive; and have been unable to give any account of why they committed it, except that the thought struck them, that the devil tempted them, and the like. This is the case of what is sometimes called a fixed idea; which has a sort of fascinating influence, and makes people seek what they fear or detest, instead of shunning it. Why is not this extremely exceptional case the common one? Why does the association of pain with an act, usually excite not to that act, but to the acts which tend to prevent the realization of the dreaded evil?  
It seems, that as the author has had to admit as an ultimate fact, the distinction between those of our sensations which we call pleasures and those which we call pains, considered as states of our passive sensibility, so also he would be compelled to admit, as a fact unreached by his explanations, a difference between the two in their relation to our active faculty; an attraction in the one case, and a repulsion in the other. That is, he must admit that the association of a pleasurable or painful idea (at all events when accompanied by a feeling of expectation) with a muscular act, has a specific tendency to excite the act when the idea is that of a pleasure, but, when it is the idea of a pain, has a specific tendency to prevent that act, and to excite the acts that are associated with the negation of the pain. This is precisely what we mean when we say that pleasure is desired, that pain is an object of aversion, and the absence of pain an object of desire. These facts are of course admitted by the author: and he admits them even as ultimate: but, with his characteristic dislike to multiply the number of ultimate facts, he merges them in the admitted ultimate fact of the difference between pleasure and pain. It is chiefly in cases of this sort--in leading him to identify two ultimate facts with one another, that his love of simplification, in itself a feeling highly worthy of a philosopher, seems to {381} mislead him. Even if we consent to admit that the desire of a pleasure is one and the same thing with the idea of a pleasure, and aversion to a pain is the same thing with the idea of a pain--it remains true that the difference which we passively feel, between the consciousness of a pleasure; and that of a pain, is one fact, and our being stirred to seek the one and avoid the other is another fact; and it is just this second fact that distinguishes a mere idea of something as future, from a desire or aversion. It is this conscious or unconscious reference to action, which distinguishes the desire of a pleasure from the idea of it. Desire, in short, is the initiatory stage of volition. The author might indeed say, that this seeking of the sensation is involved in the very fact of conceiving it as pleasant; but this, when looked into, only means that the two things are inseparable; not that they are, or that they can ever be thought of, as identical; as one and the same thing.  
It appears, then, that there is a law of voluntary action, the most important one of all, which the author's explanations do not attempt to reach. Yet there is no necessity for accepting that law as ultimate. A theory resolving it into laws still more fundamental, has been propounded by Mr. Bain in his writings, and a masterly statement of it will be found in the succeeding note. If, as I expect, this theory makes good its footing, Mr. Bain will be the first psychologist who has succeeded in effecting a complete and correct analysis of the Will.](56441.docx#chunk3655)

[In the same note will be found an analysis of the case of an \_idee fixe\_--the most striking case of which, is that of a terrific idea, exceptionally drawing the active power into the direction which leads towards the dreaded catastrophe, instead of, as usual, into the opposite direction. This peculiar case obliges us to acknowledge the coexistence of two different modes in which action may be excited. There is the normal agency of the ideas of a pleasure and a pain, the one determining an action towards the pleasure, the other an action away from the pain; and there is the general power of an extremely strong association of any kind, to make the action follow the idea. {382} The reason why the determination of action towards a pain by the idea of the pain is only exceptional, is, that in order to produce it, the general power of a strong association to excite action towards the fact which it recals, has to overcome the specific tendency of a painful association to repel action from that fact. But the intensity of the painful idea may be so great, and the association of the act with it so strong, as to overpower this repulsive force by a greater attractive force: and it is then that we find the painful idea operating on action in a mode contrary to the specific property which is characteristic of it, and which it usually obeys.  
It has been suggested, that the intensity with which the mind sometimes fixes upon a frightful idea, may operate by paralysing for the time being the usual voluntary efforts to avoid pain, and so allowing the natural impulse to act on a predominant idea to come into play.--\_Ed.\_]  
[Bain's footnote 68: This chapter is a remarkably searching discussion of the Will, not as a metaphysical puzzle, but as a leading function of the mind. It is greatly superior to any previous handling of the subject.  
Of the facts brought forward in illustration of voluntary movement, some are more properly referable to other parts of the mental system.  
First. Such actions as sneezing, coughing, contraction of the pupil of the eye, hiccup, parturition, lock-jaw, respiration, the movements of the heart, the peristaltic movements of the intestines,--all which are stated to be movements prompted by sensation,--are nearly, if not altogether, involuntary. They are more usually termed Reflex Actions. In a certain number, sensation is present, but is not essential; as in coughing, sneezing, parturition. In others, for example, the movements of the heart and the intestines, there is no sensation; the assumption made in the text, that the blood cannot flow into the heart without being accompanied with sensation, is incorrect.  
These actions are interesting to study in connexion with the will, but rather in the way of contrast than of similarity. {383} There is probably a deep community in the foundations of the two classes of movements; but, in their more obvious aspect, and for all psychological purposes, they are opposed. It is common to apply to the Reflex class the name "involuntary."  
Secondly. The movements in yawning, laughter, sobbing; the altered action of the heart, the bowels, the kidneys, the skin, in Fear,--are allied with sensations or feelings; but they are not correctly classed with the Will; in fact, some of them are performed through involuntary muscles. A different view must be taken of these effects. They are the inseparable physical accompaniments of feeling; the physical side or counterpart of the mental fact; in their absence the feeling itself would not exist. Fear would not be fear, if the emotional state were not attended with a series of physical effects, partly of movement, partly of altered secretions. These physical accompaniments supply the appearances known to all men as the expression of feeling; which although to a great degree made up of movements, is totally distinct from the voluntary promptings of the feelings. The smile that accompanies a pleasure tasted is one thing: the activity inspired to prolong the enjoyment is another thing. The two kinds of movement are frequently mingled; thus, in acute pains, the cries and contortions of feature are the embodiment of the feeling; the gestures and movements of the body, may be partly expression, but are also attempts to obtain relief. Expression in its purity is well seen in a shock of surprise; a state which being often entirely neutral as regards pleasure or pain, has no voluntary prompting whatsoever. Every feeling has a certain definite physical embodiment with much or with little outward display; this belongs to the feeling as such; it is a phenomenon of feeling or emotion, and not of volition.  
Thirdly. The operation of Ideas, in such instances as involuntary imitation, contagious convulsions, the influence of the imagination,--is a genuine source of actions, but is yet to be distinguished from the Will. When the idea of a certain medicine produces the very same effect as the medicine actually applied, when a person yawning makes the beholder yawn, {384} or when, standing on the brink of a precipice, one is tempted to jump down,--there is no intervention of the will properly so called; on the contrary, there may be a conflict between the influence of the idea and the true volitional promptings. The characteristic feature of the voluntary activity is to follow pleasure and to retreat from pain; some of the tendencies growing out of an idea are in the direction of pain.](56441.docx#chunk3656)

[This, in many respects remarkable, phenomenon is better assigned to the Intellectual part of our nature, although it has consequences on our actions. When a sensation passes into an idea, it still retains, in a diminished form, many of its characteristic properties. The sensation of a savoury morsel in the mouth is accompanied with a gush of saliva; the corresponding idea in any way aroused, as when just commencing to eat, induces the very same flow, expressed by the phrase "the mouth watering." The mode of interpreting the phenomenon is the announcement of a pregnant law of the mind (two-sided like the mind itself), that the idea is embodied in the same tracks as the sensation, although commonly in a weaker form. There is a standing mental determination, whereby all ideas tend to work themselves out into full actuality; a power that the will and other influences are constantly employed in checking. The sight of a person yawning gives the idea of the act; and the idea, unless counteracted, brings forth the reality. The sight of a precipice gives very forcibly the idea of something falling headlong down, and that idea possesses the mind of the spectator so strongly that but for a restraining volition, he would act it out in his own person.  
By far the most interesting application of the law is to explain the workings of Sympathy, in the form of purely beneficent disinterested impulses. Allusion has already been made to the law, in this peculiar aspect, in a former note (Chap. XXIII. p. 302).  
These three great classes of phenomena being withdrawn from the region of the Will, the remaining facts mentioned in the text can be viewed in a clearer light.  
1. It is justly stated that the Will is an extensive and {385} laborious \_acquisition\_, pursued, especially at the commencement, in the midst of considerable difficulties.  
2. In the mature will, the immediate antecedent of a voluntary act is an \_idea\_ of the thing to be done. This is true, but not the precise, nor the whole truth.  
3. The author's mode of viewing the influence of Attention points to the really fundamental and typical fact of the Will. He says, Attention is merely another name for the engrossing effect of a pleasurable or a painful sensation. "Having a pleasurable or painful sensation, and attending to it, seem not to be two things, but one and the same thing." That is to say, there is a power in pleasure as such, and in pain as such, to stimulate action or movement with reference to the pleasure or the pain. This is the nearest approach that is made in the text to a statement of the law of voluntary action.  
The law has been differently expressed. Locke said, the will moves to the greatest uneasiness, which is no doubt the fact. Still, by a wider induction, we obtain a more comprehensive, as well as more accurate, generalization.  
If we observe one of the most familiar instances of voluntary action--the process of eating, for example, we find that what happens is as follows:--The contact of the food with the tongue and palate stimulates, by an immediate impulse, all the movements of mastication and swallowing (in its first stage), and the further movements for placing more food in the mouth. We find that the intensity of the stimulation is in proportion to the degree of the pleasurable excitement, being highest at the commencement, and sinking gradually in the approach to satiety. There is no fact that can be produced more exactly typifying the primary action of the will. A tasted pleasure, everywhere, at all times, from the beginning to the close of life, is an immediate inducement to activity. Coming out of a chilling atmosphere into a place of genial warmth, our energy is at once aroused to follow the cue. The striking up of a band attracts and detains all listeners susceptible to the charm. There is, in such instances, no intermediate process of reflection, deliberation, or resolution; a {386} simple, an indivisible, link unites a burst of pleasure and a burst of activity following up the pleasure.  
Reverting to the first example, the act of eating, we may detect another phase of the voluntary sequences. Suppose a morsel, admitted in good faith, to disclose a very bad taste, say the taste of soot; what is the immediate, unreflecting, response? The \_first\_ effect is a collapse and suspension of all the masticating movements. From the earliest infancy, this consequence would be shown. There commonly succeeds, and often with great rapidity, a \_second\_ effect, which we shall consider under another head--the energetic discharge of the morsel from the mouth; but long before children are capable of the second act, they fall into the first--the suspension of the activity at the time.  
On extending our survey to the analogous cases, we are enabled to announce this also, as a typical situation of the Will, namely:--That, as pleasure furthers activity in its own direction, pain arrests activity in its own direction. Turning a street corner, we encounter suddenly a bitter wintry blast; we feel at once an arrest upon our movements. An ill odour, a painful contact, a grating noise, a disagreeable spectacle, have all the same immediate efficacy. The proper, the direct consequent of an incursion of pain, is suspended activity. Not only is this second law conformable to observation, it is the implication, the obverse, of the previous law connecting pleasure with increased activity.](56441.docx#chunk3657)

[The apparent exceptions to the second law need to be adverted to. The most obvious is the exciting effect of a smarting sensation, as the stroke of a whip. A light, smarting, pungent, stimulus, amounting to pain, quickens the general activity of the system for the time; while a more severe blow operates according to the general principle, and suspends activity. To quicken an animal's pace, the light smart is often the best application; to arrest an access of action, there must be greater severity. The excitement of an acute smart is due not to the pain of it, but to the mere shock imparted to the nerves; if a similar intensity of nervous shock were also a {387} cause of pleasure, the stimulating effect would be far greater, and more prolonged; for the element of pain, in the case of the painful smart, destroys the activity in the second stage, when the nervous excitement has subsided. Any one walking at a certain pace, and suddenly jolted, is momentarily awakened to a higher pitch of nervous excitement; but goes on, after the shock, at a slackened pace. An acute smart has thus a twofold efficacy; it is both a temporary stimulant of activity, and a cause of reduced energy on the whole, according to the second law of the Will.  
Another apparent exception is the vehemence manifested in escaping from pain; a mode of activity almost indistinguishably mixed up with the writhings and contortions of a creature under suffering, in other words, with the physical embodiments of the state of pain. The sudden excitement just adverted to also enters into the complex effect; being brought out at the first moment of the infliction, and at every new twinge in fitful modes of suffering. This energetic activity for escape is a distinct aspect of voluntary power. It is Locke's typical form of the Will, but is here regarded as secondary or circuitous, and not as the primitive situation.  
Thirdly. We must now then consider expressly the influence of pain in stimulating action for alleviation or escape, as when we draw back from anything that pains or offends us. To call the pain the direct stimulant in this situation, would be to connect pain and pleasure equally with the exaltation of our energies; which would be a contradiction, or else would tend to show that there is no casual connexion between pleasure or pain and our active exertions. The real motive force of pain, however, is not the state of suffering, but the \_relief\_; and relief from pain is another form of pleasure. That pleasure stimulates, that pain depresses, that alleviation of pain stimulates, are all one and the same phenomenon--statements of the same law.  
There are two stages in the operation of pain. The first is, when under a present pain, something happens to give us relief; in which case, we experience on the instant, a burst of {388} physical elation, exactly as from a sudden access of pleasure. In exposure to a cold wind, we have the depression accompanying a massive pain; in coming gradually under shelter, we feel buoyed and elated, our movements are quickened, and we follow the lead with growing energy. Every one has experienced the stimulus of success, and the damping effect of failure; although, practically viewed, the success should dispense with the newborn energy, and the failure should bring about an increase of exertion. It takes a mind of unusual strength, to resist these natural tendencies.  
In the second stage, pain is found acting as a stimulant, without present alleviation, and therefore without the benefit of the law of pleasure. How is this? The answer is, that the idea of the relief is the operative circumstance. The pedestrian exposed to a freezing wind is urged to an accelerated pace, by the secondary or derived impulse, growing out of the idea or anticipation of relief through a certain amount of exertion. That this idea is the real source of the new strength, is attested by the known facts and circumstances of the situation. A sufferer, having no idea, prospect, or hope of alleviation, flags and succumbs, in accordance with the proper tendency of pain; the stimulation of the active powers does not follow the degree of the misery, but the openings of a better lot. What was noted above as the strength of mind that induces a successful man to refrain from pushing on still farther, and an unsuccessful man to struggle the more, means the firm possession of an \_idea\_, to oppose the power of the present,--under success, an idea of moderation, and, under misery, an idea of relief to supply the active spur that the situation restrains. We call a man strong-minded, if he resists the pressure of the actual in favour of an ideal. This is the highest manifestation of energy of will. It owes its merit, and even its meaning, to the fact that a present pleasure inflames and a present pain quenches the activities; and that, to counterwork these tendencies, there must be a strong conception of ideal pain in the one case, and of ideal pleasure in the other; which is the same law of the mind in another form. We {389} cannot remain quiescent under a vivid and growing pleasure, unless by the prospect of pain in the distance; nor do we rouse up under pain without some idea of relief, that is, pleasure in the distance.  
No general law of the mind is more thoroughly confirmed by the experience of human actions than the principle now stated in its three several aspects. There is, as has been seen, something to be accounted for, in the lively stimulus under acute smarts; there is, also, an obverse of this fact, in certain forms of pleasure (as gentle warmth) which are lulling and soporific; but these are the consequence of another law of the mind, in some degree complicating the phenomena, without disproving the main law of the Will.](56441.docx#chunk3658)

[Possibly, this principle, wide as it is, may be subsumed under a still wider:--namely, a principle connecting pleasure with nutrition, or the supply of vital power and stimulus, and, by implication, pain with the abatement or loss of vital energy; from which the law of the will would be a consequence. The attempt to resolve it so is highly interesting; but, in the psychological explanation of the will, we may be satisfied, for the present, to start from the less imposing, but well-grounded generality now given. At the same time, it will be found that, having once caught a glimpse of the higher law, we cannot avoid occasionally falling into the language suggested by it; so suitable does it often appear to the expression of the facts.  
With regard to one great aspect of voluntary action,--our being moved \_to\_ pleasure and \_from\_ pain, the law is the full and precise summary. The element of the will remaining unexplained, is the \_selection\_ of the proper movements in each case; as when we start up and walk in the direction of a pleasing sound. The rendering an account of this selective adaptation is the theory of the growth or development of the will.  
In the delicate and difficult enquiry as to the manner of first attaining the voluntary command of the movements, the law of the will, just expounded, must still be referred to. But taken by itself, that law does not explain the beginnings of the will. It accounts for the keeping up of a movement {390} bringing pleasure, and the dropping of a movement bringing pain, but it does not account for the ability to single out, and set a-going, movements calculated to enhance pleasure and subdue pain, actual or distant. There is not, within its compass, any specifying or selective faculty.  
The complete explanation of the Will demands a reference to two other laws of the mind. The first is the Spontaneous beginning of Movements; the second, the Retentive or Associative process constituting the basis of all our acquisitions.  
By the Spontaneity of Movement is meant the tendency of human beings, and of animals generally, to begin acting without the express stimulus of sensation from without, and by virtue of the fund of power residing in the active organs themselves. By means of nourishment, the animal is disposed to pass into movement, from the mere abundance of the motor energy in the nerve centres and in the muscles. A large proportion of the activity of the more active creatures,--as the human species (especially the young), quadrupeds, birds, fishes, and insects,--is due to the presence of an active machinery provided with superabundance of motive power. Apart from the stimulus of sensation, from the wants and the pleasures of the animal, there is a necessity for the active organs to put forth their activity. The energy is greatly heightened,--often doubled or tripled, by the stimulation of the senses, and, after a certain education, by the influence of ideas; but it is far from remaining in abeyance till operated upon by stimulants from without or from within.  
Besides summing up a large amount of the activity familiar to us in the life of human beings, and of animals, this Spontaneity has a special importance as a starting-point for the will. We have seen that the difficulty unprovided for by the law of pleasure and pain, is the singling out, or commencing, of the suitable movements. The utmost that the law can ensure is to retain or continue them, when once commenced. Now, the tendency to spontaneous action applies to all the voluntary members--locomotive organs, trunk, head, jaw, {391} tongue, mouth, eyes, voice, &c. There is, at the outset, no rule or order for the spontaneous outburst, except the physical condition of each organ, including the nervous connexions. The animal, in its exuberant phase, after nourishment and rest, may become active at any point; it may run, gesticulate, chew, gaze, cry out; or having expended itself in any one direction, it may fall into other regions of activity where the force is still abundant.  
One or two instances must here suffice to indicate the process of attaining the selective faculty of the will, through Spontaneity, joined with the law of pleasure and pain. In the maturity of the will, we have the power of following with the eyes a moving object, partly by revolving the eye-balls, and partly by turning the head. An infant has no such power. The manner of arriving at it is open to observation, and is typical of the less obvious cases. Suppose the child to have its gaze fixed upon a light, or some other appearance of a stimulating kind. The physical effect of the stimulus, always conjoined with the mental effect, is an increase of energy (by the primary law of the will), which would manifest itself in quickening and retaining the child's gaze; there is displayed a more energetic strain of the attention than had existed when the eyes found nothing to impart a special charm. Suppose next that the light is withdrawn, by being moved to one side. The loss of the stimulus instantly works as a depression; the heightened strain of attention collapses. Still, the child is not reduced to absolute quiescence; it has an internal fund of energy, independent of casual stimulations; the flowing out of this energy consists in a series of movements for the most part at random. It may happen, that one of these chance movements is a rotation of the eyes, or of the head, in the exact direction of the pleasing object, and therefore tending to recover the illumination. Instantly, there is a burst of heightened energy, according to the law of pleasure; and the movement accidentally commenced is persistently stimulated so long as the pleasure of the spectacle grows or continues. The concurrence is fortuitous; the prolongation of it is not fortuitous, {392} but follows the law of the will--the abiding by whatever movement is giving pleasure.](56441.docx#chunk3659)

[The completing step is due to the Retentive or plastic power of the mind. An association is begun between the optical effect of a light retreating from the full gaze to the right or to the left, and the muscular movements that enable the eye to follow it. After a certain number of similar chance coincidences, this bond of association is rendered firm enough to ensure the movement at once when the sensation is present; and one of the many thousand links constituting the mature will is thereby forged. The very same course of proceeding is followed in a host of other instances.  
The beginnings of Imitation are also highly illustrative of the process. There is no trace of imitative power during the first months of infancy. The rise and progress of the power may be visibly discerned by any observer; and perhaps the best example for the purpose is Speech. In the beginnings of this extensive acquirement, the basis is most obviously the infant's spontaneous articulations; these must be waited for by the instructor, who can only foster and maintain them when they come. The law of the will provides for the fostering part of the process. The child is, in all probability, gratified by the sound of its voice, when it gives forth any new sound, and so is stimulated to keep up the vocal exertion. Next in efficacy is the catching up and repeating of the sound by others, which is an addition to the pleasing stimulus. Under the two-fold agency, there is opportunity for an association to grow up between the vocal impulse and the sensation of the sound heard; which association is ultimately the medium of bringing on the articulation whenever it is desired.  
The other cases of Imitation describe the same routine. The movements are initiated by random spontaneity; and when they arise, they are accompanied by a sensible impression on the eye, or on the ear; the concurrences, being regular and uniform, are at length contiguously associated; the muscular exertion of lifting the hand is connected with the visible picture of a lifted hand. At a certain stage, the association {393} may be brought to operate in the inverted order,--the sensations first, the movement next,--which is the whole fact of Imitation.  
A numerous class of voluntary links consists in obeying the word of command, or in following verbal directions. This, as will be admitted, can be nothing but association. It is an association that would not be attainable without the spontaneous commencement. A child, or an animal, must perform a certain action, \_proprio motu\_, in the first instance; the name is then uttered in company with it; this being done repeatedly, a connexion is made whereby the word can induce or single out the movement.  
In the training of animals, a hastening process is resorted to, which well exemplifies the difficulties in the early education of the will. In breaking a horse, the whip and the curb form the earliest instrumentality. The animal must still commence moving of its own accord. The business is to guide the spontaneity into definite channels, in consistency with the law of the will, and to connect all the various desired movements with language and signs, by whose means they can always be brought into play. When the colt under discipline is moving in the desired pace, it is allowed to go on without molestation or hindrance; when it deviates in any way, it is made to feel the pain of the whip or other check; this, by the law of pain, abates the existing movements; and if the abatement is the thing sought, the end is gained. The application may, however, be such as to quicken the movements by the smarting stimulus; an effect both exceptional and uncertain, and of use as causing a diversion of pace, out of which may come the movement desired. The surest agency of control, however, in the early and crude stage of the will, is the abatement of an excessive or a wrong movement by a decidedly painful check, such as the operation of the curb, which by pressing severely on a sensitive surface, is a certain means of depression; whereas, the light, irritating smart of the whip operates by a spasmodic uncertain stimulation. It is by the tendency of pain to put an arrest upon the wrong movement. {394} and of the relief from pain to indicate the right movement, that the trainer secures the obedience of the animal; he, at the same time, familiarizing its ear with the sounds that are to signify the various paces and movements. The spontaneous commencement is essential under all circumstances; according as this spontaneity is, from the first, ready, vigorous, and various, is the facility in attaining and cementing the initial links of voluntary command.](56441.docx#chunk3660)

[It will now be apparent that the immediate antecedent of a voluntary act is not solely the idea of the action to be performed. The successive upbuilding of the voluntary associations developes a series of phases, under which the direct antecedent is transformed into various shapes. The sensation of hunger may be the sole antecedent in prompting an animal to the search for food; the painful sensation is coupled at a very early stage with the sight and the idea of food. When a child first attains the power of lifting a sweet morsel to its mouth, the antecedent of the voluntary act is the sight of the morsel coupled with the remembrance of the sweetness. A farther advance takes place by associating the ultimate object with intermediate actions, as when the child learns to entreat what it wants from other persons. The stage that first brings in an idea of the moving members themselves is Imitation; in imitating by sight, the antecedent is the view of the parts moved. Through this medium, we pass to what is popularly considered the type of voluntary control, the moving from a wish to move. I will to raise the arm, and the act follows; the antecedent is the idea of the raised arm (together with some feeling to be gratified by the act). In the highest developments of voluntary acquisition, there is another case, also of frequent occurrence; namely, where the intellectual antecedent is the idea of the work to be done; as, for example, in the act of washing the hands, where we do not think of the movements to be gone through, but of a certain appearance to be produced.  
In Chapter X., on Memory, it is remarked:--'When we {395} are said to will, there must be in the mind what is willed.' But the idea of what is immediately willed, with reference to the same ultimate end, may assume all the variations above described. To gain a pleasure or free ourselves from a pain, we may employ different instrumentalities; and the explanation of the will should comprehend them all.--\_B.\_]  
  
  
  
{396} CHAPTER XXV.  
INTENTION.  
  
THE word "intend," the concrete, seems to be employed on two occasions. 1. We are said to intend, or not to intend, certain actions of our own. 2. And we are said to intend, or not to intend, certain consequences of our own actions.  
We have to examine what is the state of mind which the word designates on each of those occasions.  
1. We are said to intend only a \_future\_ action. When the action is immediate, we are not said to INTEND, but to WILL it; an action intended, is an action of ours contemplated as \_future\_, or certainly to be.  
We have minutely analysed, on a former occasion, the state of mind which exists, when events, other than actions of our own, are contemplated as future. An association, from prior habit, exists, between antecedent and consequent, in a series of events; an association, such, that we cannot think of one of the events as existing, without thinking of the others as existing; that is, without anticipating their existence.  
{397} That this process is involved in anticipating that peculiar event, called an action of our own, cannot be doubted. The only question is, what are the circumstances from which it derives its peculiar character.  
Something peculiar is imparted to it, from the very circumstance of its being an action of our own. In anticipating an action of our own, we necessarily anticipate the mental processes, which are its antecedents. Among these we necessarily anticipate what is called the act of willing. In such anticipations, the association is of that intimate character, which constitutes belief. In anticipating an action of our own, therefore, we contemplate the act as certainly future: that is, we believe that we shall will it. But to look forward through a certain train of antecedents and consequents, the concluding part of which is a certain act, which we shall then will, and then do, is a process which apparently involves in it all that is meant by what, in this class of cases, we call Intention.  
It may still, however, be objected, that the explanation thus presented, recognises, in the state of mind in question, only the ideas involved in the process called willing, with the idea of the action, and the belief that the action will take place; but that there seems to be something more than the present existence of ideas and belief, in that state of mind which we call intending, which seems to partake of the nature of willing at the moment of its existence.  
There is something here of the customary illusions of language. The word "intend" is an active verb. And, wherever we use an active verb, we have {398} the association of activity and of willing, involved in it.  
That there can be nothing of willing in the case, is abundantly certain; since the will relates only to immediate acts.  
It may, however, be objected, that though there is nothing of willing in the case, there is nevertheless a determination or purpose to will. A man may say, I not only believe that I shall act so and so, but I am determined that I shall act so and so.  
In this objection, the words "determine," and "determination," are still but substitutes for "intend," and "intention." At most, they only mark a degree of strength in the intention. There is another expression, however, which deserves notice. A man may not only resolve to do a thing, but he may promise to do it. And the promises of men form a very important class of their actions.](56441.docx#chunk3661)

[After all, a Promise is in its very essence merely the \_Declaration\_ of an \_Intention\_. If it be asserted that it is not only the declaration of an intention, but the declaration that nothing shall occur to hinder that intention of its effect; what is this but the declaration of another intention; the intention not to frustrate an existing intention? But this second intention is included in the first. The very existence of an intention implies the absence of any counter intention.  
Why is it that a man intends? For the same reason, of course, that he wills. In willing, a certain act is contemplated as a cause of pleasure; an immediate act, and an immediate pleasure. In intending, a certain future act is contemplated as cause of a future {399} pleasure. The idea of the pleasure and its cause, united by association, constitute the motive. In this act of anticipation, the sequence, consisting of motive as cause, action as effect, is indissoluble. In our supposed state of intention, the motive is presented to the mind as about to exist at the time in contemplation; the idea of the act as existing irresistibly follows. An act of our own anticipated by irresistible association, when the motive is immediate, is willed; when the motive is future, is intended. Intention is the strong anticipation of a future will. But every thing which strengthens the motive, that is, associates the idea of the act with that of a greater amount of good arising from it, increases the certainty of the act. A promise to perform the act strengthens the motive; in some cases exceedingly. As it is of great consequence to men in general, that promises should be performed, they take care to reward the performing of promises, to punish the non-performing of them, with their favour in the one case, their disfavour in the other. When the favour and disfavour of mankind are general, and strong, to a certain degree, they amount to the highest of all punishments, and all rewards. A promise, then, which is the \_declaration\_ of an intention, greatly strengthens the certainty of the act, by greatly adding to the force of the motive.  
2. The next case of the meaning of Intention is of easy explanation. When we will, or when we intend, an action, we either foresee, or do not foresee, certain of its consequences. In what associations the act of foreseeing or anticipating consists, we need not again explain. The question, whether a man did {400} or did not foresee certain consequents of his acts, is of great importance in certain cases of judicature, because upon this circumstance depends the propriety of a less or greater degree of punishment, perhaps the propriety or impropriety of punishing at all.  
A person administers to another person a medicine. It turns out to be poison. The person whose act the administration was, believing the drug to be salubrious, not hurtful, anticipated good consequences; in other words, intended the benefit of the patient; intending, and anticipating, here, being only two names for the same thing. He did not foresee the evil consequences; and this we commonly express by saying he did not intend them. If the person who administered the drug, instead of believing it to be a proper medicine, and anticipating from it salutary effects, knew it to be poison, anticipating from it destructive effects, he would be said to intend those effects.  
It thus appears, that when a man, having certain consequences of an act in view, proceeds to the performance of the act, the having in view, or anticipating, receives, in these circumstances, the name of intention. It is a case of anticipation, anticipation in peculiar circumstances, and is marked by a peculiar name.  
The consequence of an act may be such, that the person had no reason to anticipate them, or could not possibly anticipate them; or they may be such, that, though actually not foreseen, they might, with more or less of care, have been foreseen. These are questions respecting the nature of one solitary act. {401} They are what in law are called questions of fact. The exact determination of them is essential to the right decision of the judge in the particular case; but any further consideration of them is not within the province of this inquiry.[69]  
[Editor's footnote 69: This chapter is devoted to clearing up the confusion and disentangling the ambiguity connected with the word Intention. And it fully attains the purpose, save where the refusal to admit any difference between expectation and a strong association, throws a certain haze over an operation into which they both enter.  
Intention, when the word is used in reference to our future conduct, is well characterized by the author as "the strong anticipation of a future will." It is an unfaltering present belief that we shall hereafter will a particular act, or a particular course of action. There may be, over and above this belief, an intention "that nothing shall occur to hinder that intention of its effect;" "the intention not to frustrate an existing intention." The author thinks that "this second intention is included in the first:" but it is not necessarily so. It is the first intention, fortified by some additional motive which creates a special desire that this particular desire and intention should continue. It is another case of what the author never recognizes, the desire of a desire.](56441.docx#chunk3662)

[Intention, when we are said to intend the consequences of our actions, means the foresight, or expectation of those consequences; which is a totally different thing from desiring them. The particular consequences in question, though foreseen may be disagreeable to us: the act may be done for the sake of other consequences. Intention, and motive, are two very different things. But it is the intention, that is, the foresight of consequences, which constitutes the moral rightness or wrongness of the act. Which among the many consequences of a crime, are those, foresight of which constitutes guilt, and non-foresight entitles to acquittal, depends on the particular nature of the case. We may say generally, that it is the hurtful consequences. When the question arises judicially, we must say it is the consequences which the law intended to prevent. Reverting to the author's illustration; a person who gives a drug to a patient, who dies in consequence, is not guilty (at least of intentional crime) if he expected good consequences, or no consequences at all, from its administration. He is guilty, if he expected that the consequence would be death; because that was the consequence which the legislator intended to prevent. He is guilty, even if he thought that the death of the patient would be a good to the world: because, though the law did not intend to prevent good to the world, it did intend to prevent persons from killing one another. Judged by a moral instead of a legal standard, the man may be innocent; or guilty of a different offence, that of not using his thinking faculty with sufficient calmness and impartiality, to perceive that in such a case as that of taking life, the general presumption of pernicious consequences ought to outweigh a particular person's opinion that preponderant good consequences would be produced in the particular instance.--\_Ed.\_]  
{402} Thus, then, the Exposition of the Human Mind, as far as the imperfection of the execution may allow the accomplishment to be predicated of the attempt, may be regarded as brought to its close. The phenomena which characterize man as a thinking Being, have been brought forward, have been carefully resolved into their component elements, and traced to certain general and undisputed laws. I should call this the THEORY of the Human Mind, if I could hope that the word would be understood in its original and literal meaning, that is, VIEWING or OBSERVING, AND CORRECTLY RECORDING THE MATTERS OBSERVED. This is the task, the execution of which {403} has been endeavoured throughout the preceding pages. But, unhappily, the word Theory has been perverted to denote an operation very different from this, an operation by which VIEWING--OBSERVING--is superseded; an operation which essentially consists in SUPPOSING, AND SETTING DOWN MATTERS SUPPOSED AS MATTERS OBSERVED. Theory, in fact, has been confounded with Hypothesis; and it is probably vain to think of restoring it to its proper signification.  
If, however, the \_Theoretical\_, or Expository part of the Doctrine of the Human Mind were perfected; another great branch, the \_Practical\_ (which, to be rationally founded, must be founded on the Theoretical) would still remain. This subject, it appears, might be conveniently treated in three Books:  
I. The Book of Logic; containing the Practical Rules for conducting the mind in its search after Truth:  
II. The Book of Ethics; or the Book of Rules for regulating the actions of human beings, so as to deduce from them the greatest amount of good, both to the actor himself, and to his fellow-creatures at large:  
III. The Book of Education; or the Book of Rules, for training the Individual to the greatest excellence of his nature; that is, to the highest possible state of efficiency (ability and will included), as cause of good to himself, and to his species.  
  
  
  
THE END.  
  
  
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Transcriber's Note  
All editions of this text were published in two volumes. This file has combined them. The only consequential change to the original material is that the Contents pages for Volume 2 are repeated immediately after the Contents of Volume 1.  
Footnotes James Mill's text had a few footnotes, indicated by single asterisks. His later commentators' work was printed as footnotes, numbered consecutively through each volume (though there is no note 36 in volume 1), and attributed by an initial (or "Editor's note") at the end. In this text each note is attributed to its author (James Mill being called Mill; John Stuart Mill, Editor). John Stuart Mill made one note in James' style, 7\* in volume 1 (where the attribution has been marked by an asterisk). There are footnotes in Grote's main footnote, and in a couple of other footnotes, marked as in the original. All footnotes are now placed after the paragraph in which they occur.  
Corrections Corrected text is indicated by a preceding \*. The following corrections have been made (usually confirmed by reference to the earlier editions):  
Location Original Correction Volume 1 p. 11 denonominate denominate p. 95 and of footnote 47 infinities infinitives footnote 54 existtence existence p. 195 their there footnote 59 gutteral guttural p. 204 {blank} 2 p. 217 predicacations predications p. 256 rationes \_rationes\_ footnote g b 6 footnote j accute acute footnote 82 6 5 footnote 87 phrase phase p. 363 it its p. 447 unconciousness unconsciousness Volume 2 Contents 369 396 p. 45 : ; p. 72 former formed p. 89 succeeds succeed p. 122 measure measured p. 129 end quote mark missing at footnote 8\* p. 136 Read Reid footnote 30 not nor p. 312 comprehend comprehended footnote 59 physicial physical  
Two uncorrections might be noticed: in volume 1, pp. 61-62 the Mills read 'Brobdignagian,' following, it seems, an edition with that spelling instead of the usual 'Brobdingnag'; in volume 2, page 387 'casual' is given in both editions but 'causal' seems better sense.  
Other matters Page numbers are preserved in-text within {}.](56441.docx#chunk3663)

[Italic or gesperrt text is enclosed by \_ \_.  
Greek text is transliterated thus: breathings marked ( for hard, ) for soft, accents / for acute, \ for grave, = for circumflex, all after their vowel; iota subscript is marked |. In footnote 53 of Volume 1, [)i] is used to stand for i with a breve above it, in a rendering of Wotiak.](56441.docx#chunk3664)