ing for the sake of precision and cognitive efficiency, but because such a definition would attach the emotive force of the word to this limited part of its customary meaning and thus might lead some people to approve or disapprove of something which they otherwise would not have done. No doubt this is true. However, the precise definition, if accepted and followed, would tend to eliminate the emotive disposition of the word. Word-magic, the emotive power of words as such without regard to their descriptive meaning, can flourish only in the clouded atmosphere of vagueness and ambiguity. What the constructive analyst attempts to do is not to persuade people in favor of this or that by his definitions, but rather to render language both (1) a more efficient cognitive tool by clarifying and modifying it so that it may better serve the purpose of conveying information and (2) a more intelligent practical instrument by making the affecting of attitudes a function of the information conveyed rather than of a causal disposition of the word as such acquired through its emotional history.

We conclude that the task of logical analysis in the field of ethics is to improve upon common-sense ethics by converting its vague, ambiguous, and emotive terms into a precise technical ethical language freed from word-magic. This does not mean that technical ethical discourse would not have emotive or persuasive power, but rather that emotive responses to ethical discourse would be more intelligent in that they would be a function of the information conveyed instead of merely the words employed. The information conveyed could be intelligently checked for its truth-value, and, in this way, emotive responses could become increasingly mediated and directed by realities.

We have shown by an analysis of meaning that the first premise of Stevenson's argument for the emotive theory is false and hence that the conclusion, the emotive theory, has not been established. Furthermore, our study of the nature of logical analysis has shown that it could not possibly lead to or substantiate the emotive theory of ethical terms.

UNIVERSITY OF NORTH CAROLINA

E. M. ADAMS

CAUSALITY AND PERCEPTION 1

HUME has shown that "causation" is not found among the contents of sense perception. This is incontrovertible when perception is understood, as Kant in his acceptance of Hume's

1 Read at the Forty-sixth Annual Meeting of the Eastern Division of the American Philosophical Association at Clark University, Worcester, Mass., December, 1949,

negative result understood it, as mere receptivity which registers the data of sensation. And if this again is taken—as Hume and Kant implicitly took it—to be the only mode in which externality is originally "given" (so that even of our own bodily activity we know only by our receptivity, whose sequential data have then to be interpreted in terms of action), then indeed causality must be some mental addition to the raw material of prime givenness.

Now, while Hume's argument concerning the non-givenness of causation in perception stands unabated, his account of its origin in the mechanics of ideas does not. Neither does Kant's alternative, since reason by itself no more yields the notion of action and influence than does the sense perception of Hume's description. But perhaps the problem lies in the very fact which Hume and Kant accepted as ultimate: the causal muteness of percepts. this itself is taken as a matter for explanation, as it should be, an interesting inversion of Hume's problem suggests itself: Considering what we know about the causality involved in the genesis of sense perception itself, its de-causalized content presents a particular riddle which sharpens Hume's more general riddle into the paradox that a specific causal nexus-affection of the sensesshould terminate in its own presentational suppression as part of its specific performance. This disowning of its genesis by the perceptive mode, i.e., the terminal obliteration of its own causal character, forms an essential feature of what Whitehead calls "presentational immediacy," and is the condition of its objective function which is thus bought at a price.

The inversion of the problem here suggested presupposes an independent and legitimate source of causal knowledge whose deliverance is not affected by the negative findings of perception; on the contrary it has to be drawn upon for the explanation of perception itself no less than for the supplementation of its findings.

Whitehead's distinction of "causal efficacy" and "presentational immediacy" as belonging to two modes of perception offers an important clue with respect to Hume's problem, but beyond its statement no sufficient explanation of itself (in fact the term "immediacy" is apt to mislead). Following up this clue, this paper proposes to show: (a) how it is that the several senses, in differing degrees, eliminate the imprint of their own causal constitution from the integration of their imagery; (b) why the sacrifice of the causal element extends from the self-presentation of the actual perceiving mode to its general object picture, coinciding with the range of "objectivity" as such, which is thus reality de-natured but would not be possible otherwise; (c) why the objectifying modes so constituted have of necessity come to monop-

olize the concept of knowledge, and their object type that of reality, thereby creating problems peculiar to this self-curtailment (inter alia the problem of "necessary connection").

(a) How do the senses come to deliver a de-causalized content? A complete answer involves an analysis of the senses at once genetic and phenomenological: the latter alone would commit itself from the outset to the face value of perceptional testimony and thus not escape from the magic circle of Hume's argument. Lack of time confines us to a few remarks indicating the line of reasoning.

The smallness (in dimension, time rate, and energy) of the unitactions and reactions involved in affection of the senses, i.e., their minute scale relative to the organism, permits their mass-integration into one continuous and homogeneous effect (impression) in which not only the single impulses are absorbed, but the character of impulse as such is largely cancelled and replaced by that of detached image. Where qualities are perceived, the raw material is action: impacts, hustlings, clashes on a molecular scale. Organisms not far exceeding that scale can therefore have no perception, but the collision experience only. Theirs would be a world not of presences but of incidences, or, not of existences but To the large-scale organism, on the other hand, when having the force-experience in interaction on its own scale, this is always already attended and surrounded by the perceptive transcripts of the small-scale influences which, by reason of their effortless, continuous presence, seem to furnish the neutral substratum of being, to which the force-relation happens to be added on particular occasions. This is an inversion of the original ontological order, and the root of a theoretical problem of causality later on. The degree to which the dynamical relationship is or is not perceptible and represented in the perception itself, and the degree to which sequence of happening is translated into simultaneousness of a statical presence, can serve to classify the senses with respect to their objectifying function. From a comparative analysis, sight emerges as the sense with the most complete neutralizing of dynamic content and the most unambiguous distancing of its object from the perceptive function. In degrees, the selfeffacement of causal efficacy takes place in all sense perception: where violence of the stimulus forces the threshold and causality floods sensation, there sense perception is ousted by the experience of impact or by pain, i.e., it ceases to be perception proper. Especially in touch, the transition from apprehension of quality to experience of pressure and thence to exercise of power is a matter of traceable degrees. Or to exemplify from another sense:

in the case of a detonation nearby, the force acting on our receptor may exceed the acoustic limits and instead of just hearing a sound of particular quality and intensity, we feel assaulted by power, to be sustained and resisted by power. Thus the world, instead of presenting itself, can intrude dynamically into its testimony, its causality overwhelming perception. The latter is therefore constitutionally bound to the former's exclusion from account—at least in relation to itself—and fulfills its specific task by performing just this feat. In the case of vision, the feat is made possible to perfection by the dynamical properties of light and the relative orders of magnitude involved. The seeming inactivity and selfcontainedness of the seen object corresponds to the seeming inactivity and selfcontainedness of the spectator; yet both characters are the purified result of a particular set of connecting activity. Its total elimination from the presentational result, which gains by losing but loses nevertheless, introduces an element of abstraction—the abstraction of image—into the very constitution of sense perception, hence into object knowledge as such.

(b) The suppression of object-subject causality in perception entails that of object-object causality too-or that of causality pure and simple within the "theoretical" (= perceptional) domain to which the intrinsic testimony of subject-object causality as aware of itself in man's active intercourse with things is not admitted as evidence (i.e., not before itself having been subjected to perceptual objectivation, its contents transformed into serial data). By the rejection of this evidence, which has its own story, understanding deprives itself of the one non-perceptive source, the force-experience of my own body in action, which could by analogy still supply the dynamical links in the sequence of observed events: these, having become objects by disconnection from the reality of the observer, stand thereby stripped of that character which would explain also their connectedness among them-The detachment of objectivation left them detached from The character generally suppressed is force each other as well. which, being not a "datum" but an "actum," can not be "seen," i.e., objectified, but only experienced from within when exerted or suffered. The primary neutralization of this character by perception, which changes actualities into data, is bequeathed to the concepts of the understanding which rises from this very basis of objectivation. Understanding by itself, when left to deal with the stripped percepts alone, can not restore that character nor compensate for it by its own means of connection (here again Hume was right-and Kant wrong). But enjoying the advantages of

disconnection in the subject-object relation, namely, the freedom of theory, it has to accept its disadvantages as regards object-object relation.

(c) Abscondence of causal efficacy is the price by which presentation of being by itself, and consequently objectivity, are gained. On the credit side, effacement of causality means disengagement from it. Perception as such, and vision particularly, secure that standing back from causal involvement which frees for observation and opens a horizon for elective attention. The object, staying in its bounds, faces the subject across the gap which the evanescence of the force context has created. From the onrush and impact of reality, out of its insistent proximity in influence, the distance of appearance (phenomenon) is won: image, in the place of effect, can be looked at and compared, in memory retained and recalled, in imagination varied and freely composed. separation of contained appearance from intrusive reality, the original feat of perception, gives rise to the separableness of essentia from existentia underlying the higher freedoms of theory. It is but the basic freedom of vision, and the element of abstraction inherent in image, which are carried farther in conceptual thought; and from perception, concept and idea inherit that ontological pattern of objectivity it has primarily created. The stillness of object, withdrawn from the turmoil of forces, recurs enhanced in the stableness and permanent availability of idea: it is in the last analysis at the bottom of "theory" as such. It follows that the dominance in epistemology of the cognitive modes derived from perception—a dominance pushed historically to the exclusion of other modes of acquaintance with reality—is intimately bound up with the possibility of knowledge as such: so is the corresponding dominance in ontology of their object pattern. exclusiveness, however, has its penalty.

On the debit side, the same gap between subject and object which provides the dimension of freedom for theory, and which is found duplicated in the gap between object and object, provides in both respects also the breeding ground for a class of problems which beset the history of knowledge—unavoidable because rooted in its very conditions, and by the same token insoluble within those conditions. As regards object-object relation, an epistemological case in point is Hume's problem of necessary connection, as a substitute for real causality (and in this devitalized form taken over by Kant). In its ontological version, the problem of relation revolves around the classical concept of selfcontained, inactive substance—"that which requires nothing but itself in order to exist" (Descartes)—which is by no means an histori-

cal freak, but the conceptual framing of perceptive truth. The homelessness of "force" in the system raises the issue of "anthropomorphism," whose banishment from exterior knowledge is far too much taken for granted as the proper thing in scientific epistemology. As regards subject-object relation, the gulf opened by perceptive objectivation in sole command is partly responsible for those puzzles of the consciousness-external world dualism which parallelism, occasionalism, idealism have in vain attempted to solve. I can here but enumerate the problems originating in the perceptive situation and made over to the reflection of theory. In the case of all of them, an original freedom of animal life, perception—itself an offshoot of the more basic freedom of organic being as such—presents its bill in the yet higher freedom of thought.

Conclusions. Reverting to Hume's issue we find: that his result, the non-givenness of causation among percepts, is only what is to be expected from the nature and meaning of perception itself; that the result, in being confirmed, is at the same time limited to its proper field and thereby divested of its sceptical implications; that what calls for explanation in the first place is not how, from the causal vacuum of perception, we still come to the idea of causation, but how it is that perception does not exhibit it, i.e., contrives to conceal it, its absence there and not its presence among our ideas being the puzzling fact; that the primary aspect of causality is not regular connection, not even necessary connection, but force and influence; that these are themselves original contents of experience and not interpolations between contents of experience (= percepts) by a synthetic function, be it association or reason: that the source of this experience is, indeed, not sense perception, but our body exerting itself in action—the source which Hume summarily dismisses under the head of "animal nisus": that, lastly, the right of extrapolation from this source beyond its immediate range of deliverance is a question to be studied, without fear of the blame of anthropomorphism, by an organic philosophy.

HANS JONAS

CARLETON COLLEGE, OTTAWA, ONTARIO

COMMENTS AND CRITICISM

NORMATIVE NATURALISTIC ETHICS

I think that the valid and ultimate norm of moral obligation should be stated as follows:—An individual's duty is to do that which is most deeply satisfactory to him in the long run. This is