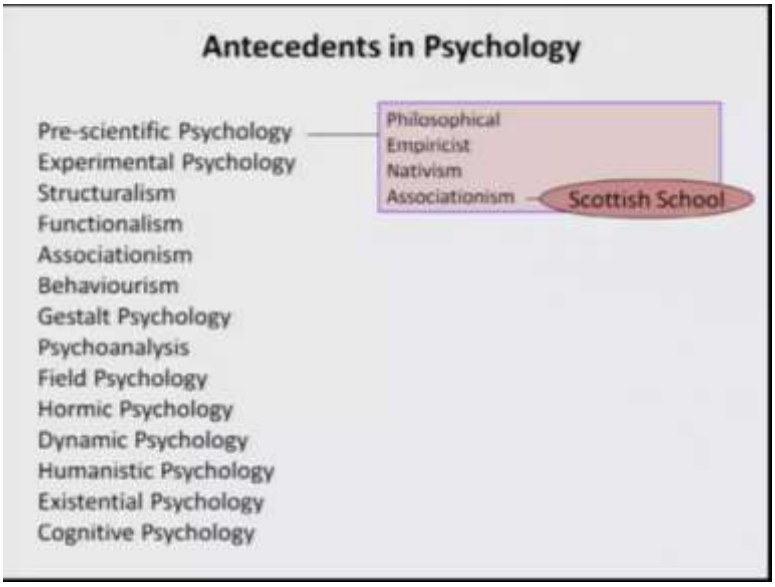
Introduction to Psychology
Prof. Braj Bhushan
Department of Humanities and Social Sciences
Indian Institute of Science, Kanpur

Lecture – 04
Schools of Thoughts in Psychology

Today we are going to talk about various schools of thoughts in psychology. What I will do is initially I will share a list with you and there after we will one by one go through various schools of thoughts. What was the major concepts or major theory is given by that school of thought those we would discuss, but you would realize that few of the schools of thoughts we would know venture through light through very swiftly, very quickly. Few schools you might realize that we are devoting a little more time and in some of cases I will just tell you that fine these are the measure things, but we would be talking about these when we come in the forth coming lectures on various topics.

(Refer Slide Time: 07:07)

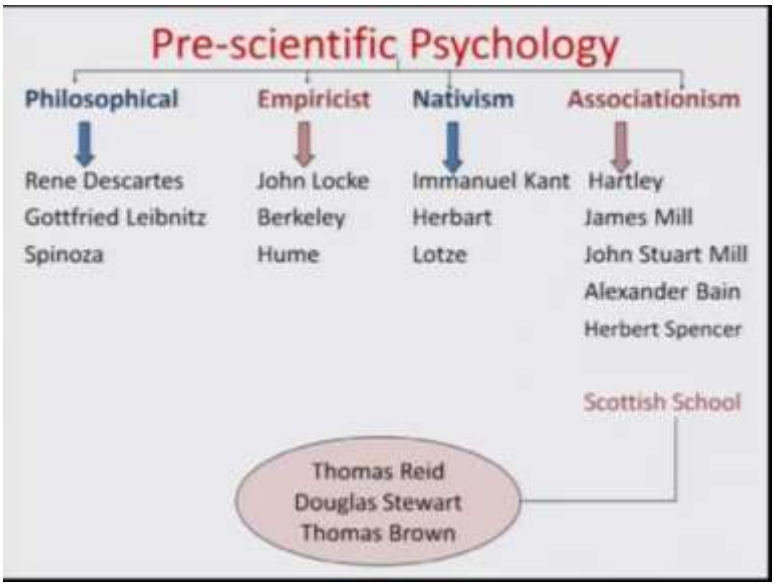


If you look at the antecedents in psychology you can just divide the measury schools of thoughts in following categories - the pre-scientific phase where you have the philosophical empiricist, nativism, associationism, then you have the experimental psychology phase and then started coming the major schools of thoughts like a structuralism, functionalism, associationism, behaviourism, gestalt psychology, psychoanalysis, field psychology, hormic psychology, dynamic psychology, humanistic

and existential psychology, cognitive psychology. So, these are now the measure schools of thoughts that determined the course of fraction in this various subject during certain phase in history.

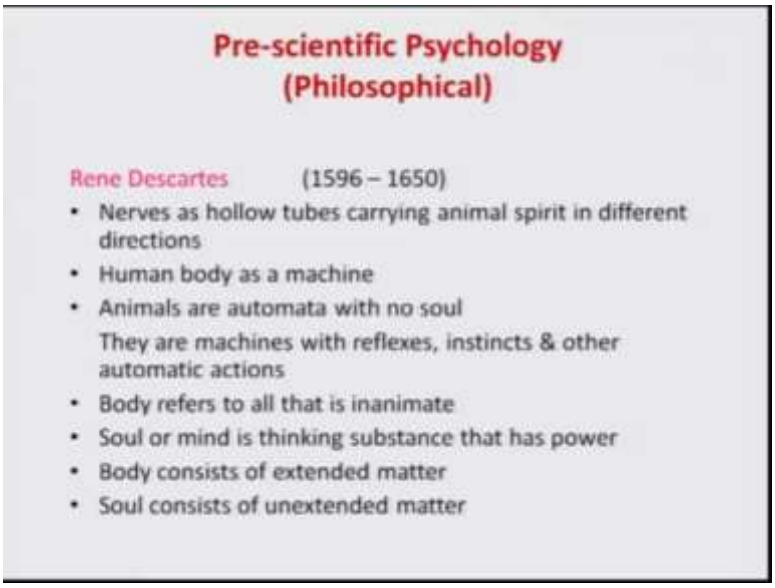
Now, if you look at the pre-scientific phase.

(Refer Slide Time: 02:00)



Primarily you will have the philosophical state, the empiricist state, the nativism and the associationism and various psychologists you will find now they have given various types of concepts, primarily soul, mind, body, these were the issues that you would find being discussed largely in the pre scientific phase.

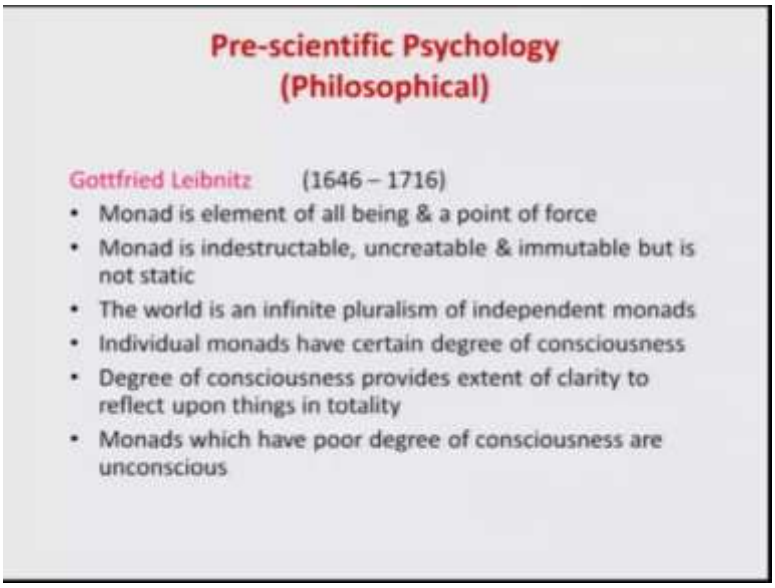
(Refer Slide Time: 02:25)



But couple of things you would find very interesting, like if you go through the work of Descartes you would realize that he did not talk about nerves as hollow tubes which carried animal spirit in different directions. He did conceive human body as a machine and he said that animals basically are an automaton which does not have soul they are machines with reflexes, instincts and other automatic actions.

So, he was the now making a distinction between animals and humans and he said that body when you referred to body it basically refers to all that is inanimate and if you refer to soul or mind that refers to the fact that it is basically a thinking substance that has power. Body that consisted of the extended matter and the soul consisted of the un-extended matter. So, this is the very interesting type of concept being proposed in that point in time, so long back were the focus was although on mind body this very issue, but then there was the reference to the fact that human body has nerves - nerves are hollow tubes in which the animal spirit flows in various directions. And then you would realize that much later clinically it was realized that yes we do have arteries and veins and of course, it is not the animal spirit, but it is basically the blood, oxygenated in the de-oxygenated blood that moves in those nerves and they are of course tubular in structure.

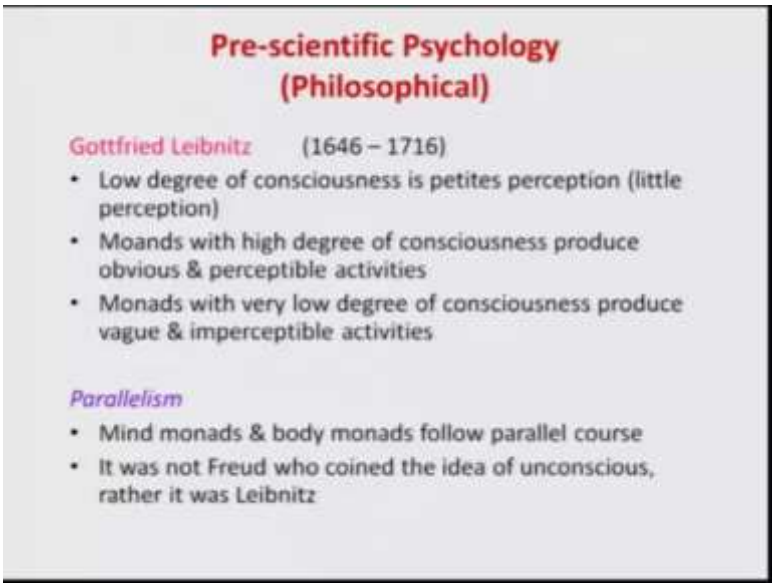
(Refer Slide Time: 04:17)



So, this is very interesting that is the reason we thought we should talk about it here. If you look at the work of Leibnitz once again in the pre-scientific psychology, he talked about monad then he said that monad is basically the element of all being and which is a point of force. It is indestructible, uncreatable, immutable, but it is not static and he said that the world is an infinite pluralism of independent monads. He went on to say that find individual monads have certain degree of consciousness and the degree of consciousness provides extent of clarity to reflect upon things in totality, monads which have poor degree of consciousness are unconscious. So, there is a reference to conscious and unconscious with reference to monads that Leibnitz talked about very long back.

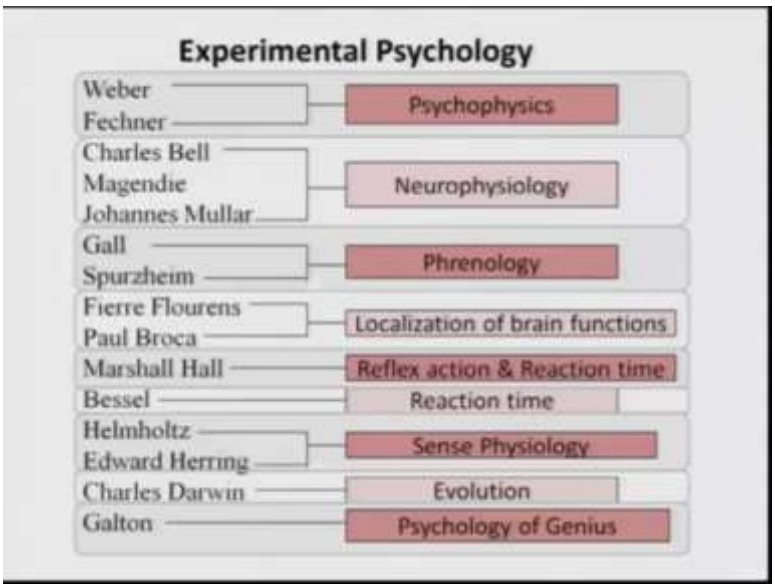
He went on to say that the low degree of consciousness basically leads to what he called as little perception and monads with high degree of consciousness they produce very obvious inperceptible activities. Much later in psychology especially when psycho analytic phase came at that time no there was heavy emphasis on the conscious and the unconscious mind.

(Refer Slide Time: 05:35)



But yes Leibnitz did talk about it long back. Leibnitz in that vary phase also talked about parallelism where he said that mind monads and body monads they follow parallel course and then you realize that it was basically not Freud who coined the idea of unconscious rather it was Leibnitz. So, that is the reason we had referred to Rene Descartes and Leibnitz here.

(Refer Slide Time: 06:09)

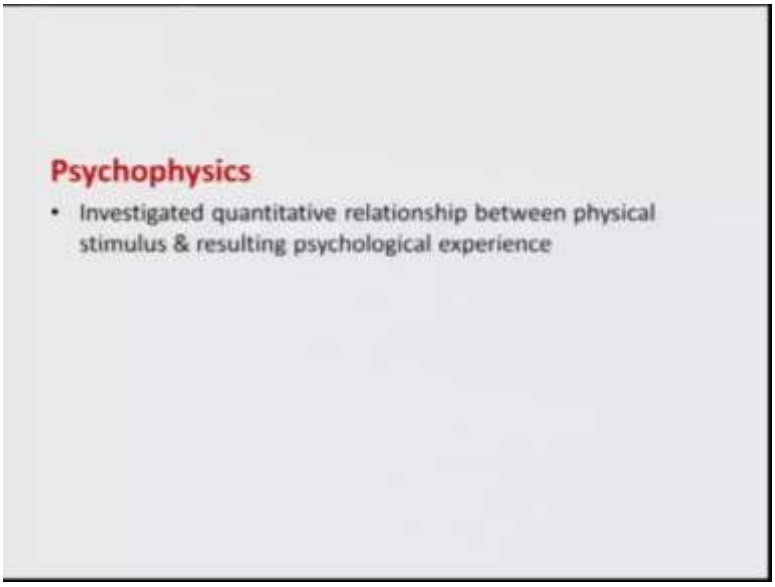


If you look at the whole work done in the stage what we are referring to here as experimental psychology you would find basically the work done in the area of psycho

physics, neurophysiology, phrenology, localization of the brain functions - if you remember localization of the brain function we had talked about when we even came to measure mile stones in psychology. Then of course, reflex action in reaction time, sense physiology, evolution and what is called as psychology of genius. On the left hand side you find couple of names written there, Weber and Fechner who get the credit of establishing and doing empirical work in what is called as psycho physics.Bell, Magendie and Mullar working in area of neurophysiology.

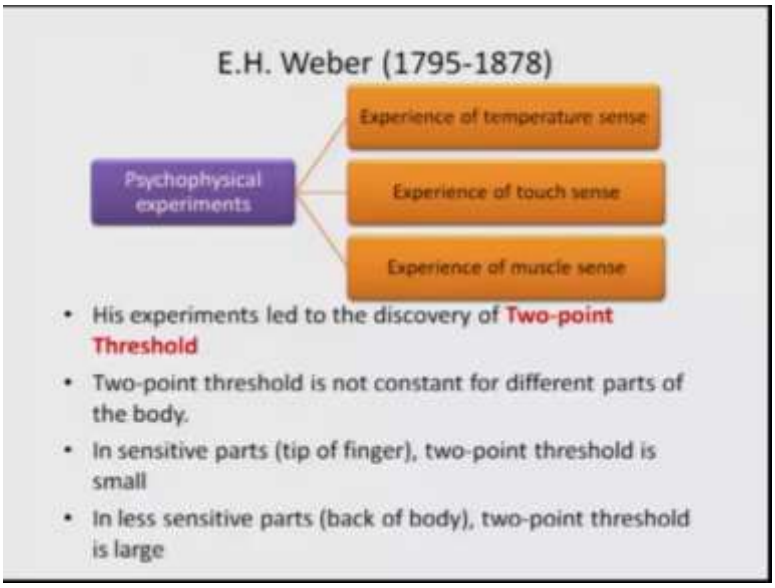
So, one by one we would know go through all of them and very succinctly we will see what were the major thoughts, what were the major concepts, what were the major hypothesis or theory is it was proposed in that very phase.

(Refer Slide Time: 07:15)



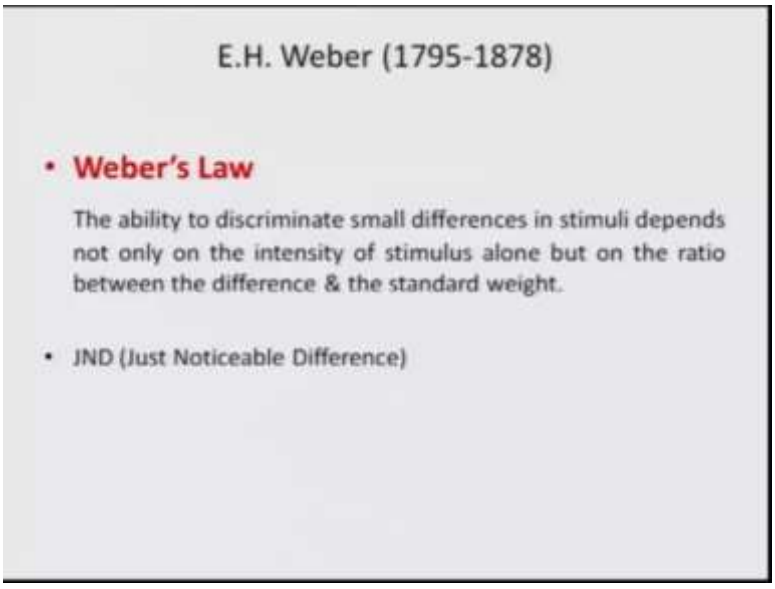
So, of course, as I said at Weber and Fechner their work is considered at psychophysics and psychophysics basically now investigated the quantitative relationship between the physical stimulus and the resulting psychological experience. In fact, when we will come in the next week on the topic of perception there also we will be talking about Weber's law. What Weber basically said is that the psychophysical experiments, you can have three types of experiences that it can lead to – one, the experience of temperature sense, the touch sense and the muscle sense and his work basically led to the discovery of what is called as two point threshold.

(Refer Slide Time: 07:34)



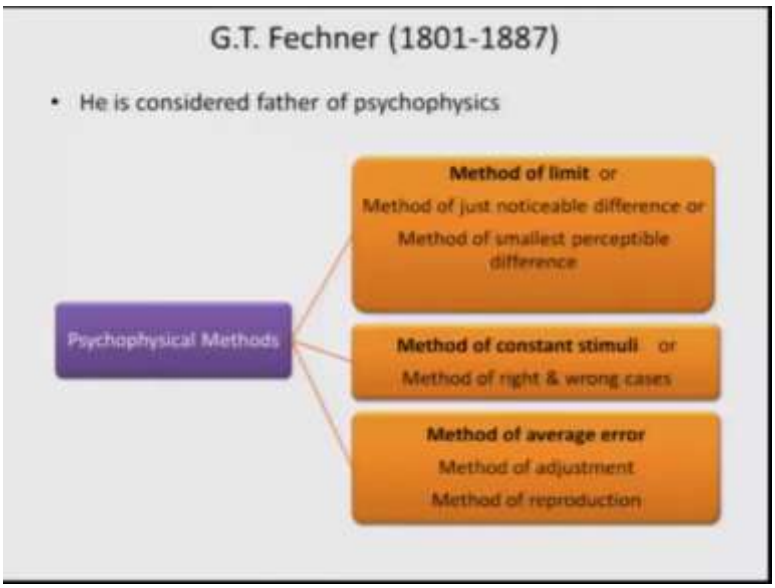
And two point threshold he found it is not constant for different part of the body. So, certain sensitive parts of the body like the tip of the finger, here the two point threshold is very small whereas, certain other part of the body, say for example - the back of the body the two point threshold is very large. So, two point threshold basically would be that say if you take a force, if you take two sharp edged object and if you prick it here, see two points which are very close if you just put it here you feel that even though physically the distance between the two points is minimal you can still sense it at the tip of the fingers, simply because this is one of just most sensitive parts of the body.

(Refer Slide Time: 08:56)



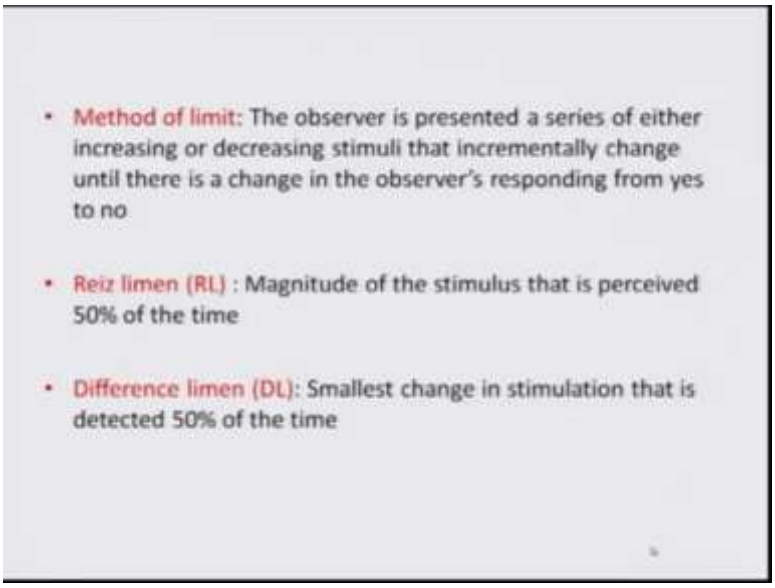
Whereas the same thing when you touch at the back you realizes that fine it is only one point which is now touching your body. So, this was the concept of two point threshold and Weber gets the credit for coming forward with this. And of course, he talked about what is called as Weber's law where he said that the ability to discriminate small differences in stimuli basically depends not on the intensity of the stimuli alone, but on the ratio between the difference in the standard weight and we will be talking about Weber's law with interesting example when we come to the next week when we will be talking about perception and at that time you would also be talking about JND what is called as just noticeable difference. I am not going in to the details right now because next week we would have been talking about all these things.

(Refer Slide Time: 09:35)



Then the other important person in the area of psychophysics, our Fechner and basically it is Fechner who is considered as the father of psychophysics he came forward with three methods what are called as psychophysical methods. First method the method of limit, second the method of constant stimuli and third the method of average error.

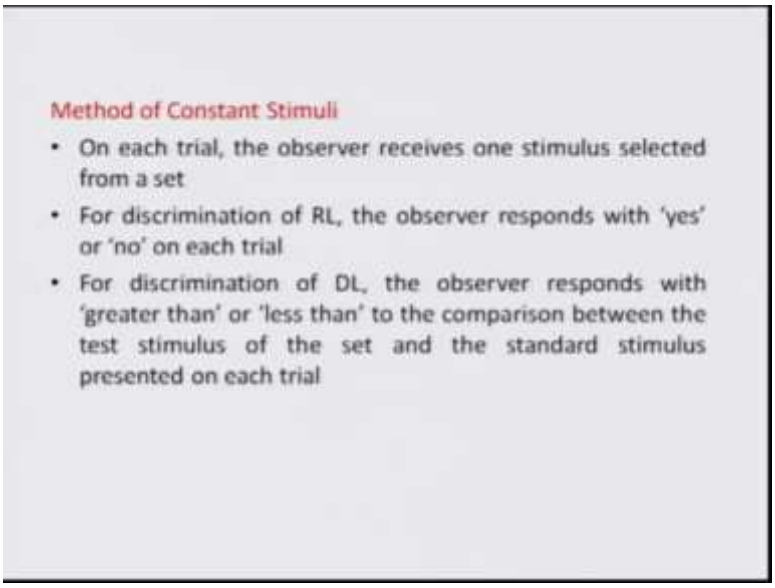
(Refer Slide Time: 09:50)



So, basically what is said that in the method of limit, the observer can be presented a series of either increasing or decreasing stimuli where the intensity of the stimuli either incrementally changes both in either direction - either it could increase or decrease. Until there is a change that the observers and they respond by saying yes or no this was considered as the method of the limit that you proposed and he did come forward with the concept of RL and DL the Reiz Limen and the Difference Limen; Reiz Limen and Difference Limen again we would be talking about it when we come in the next week to perception.

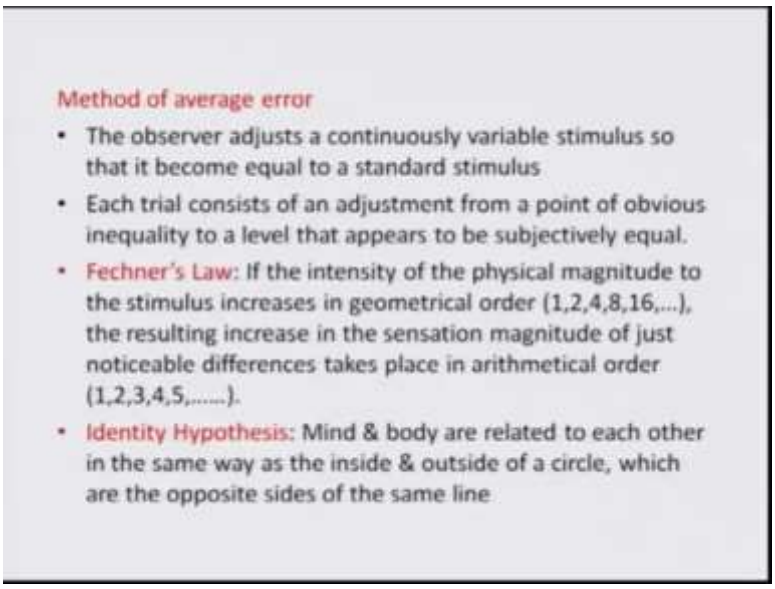
So, magnitude of the stimulus if you are able to perceive it at least 50 percent of the time it is considered as Reiz Limen and the smallest change in the stimulation that you can take 50 percent of the time that is called as Difference Limen. The details of it we will come in the next week.

(Refer Slide Time: 10:50)



The second method that you proposed was the method of constant to stimuli and he said at on each trail the observer receives one stimulus selected from a set. So, for discrimination of the Reiz Limen the observer responds with yes or no on each trail whereas, for the discrimination of the DL the observer responds with greater than or less than has compared between the test stimuli and the standard one.

(Refer Slide Time: 11:16)

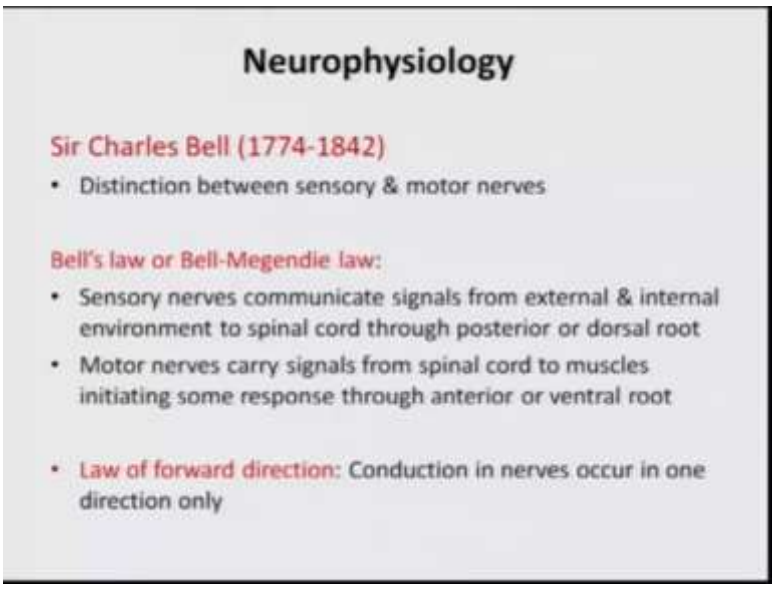


The third method that was the method of average error here the observer adjusts a continuously variable is stimulus, so that it becomes equal to the standard stimulus.

Here each trail consists of an adjustment from a point of obvious inequality to a level that appears to be subjectively equal and Fechner of course came forward with law which is popularly now considered as Fechner's law wherein if the intensity of the physical magnitude to the stimulus increased in the geometric order 1 2 4 8 16. So 1 and 2 double of it 2 2 za 4, 4 plus 4 8, 8 plus 8 16. So, it is increasing in geometrical order, the resulting increase in the sensation magnitude of just noticeable differences, takes place in arithmetic order means 1 2 3 4 5, this is called Fechner's law. Fechner's law also gets a credit of talking about identity hypothesis again referring to mind body problem, he said that mind and body are related to each other in the same way as the inside and outside of a circle, which are opposite side of the same line.

Then the second phase that you find in experimental psychology was neurophysiology, Magendies we referred to his work instead (Refer Time: 12:41) we are talking about measure miles stones.

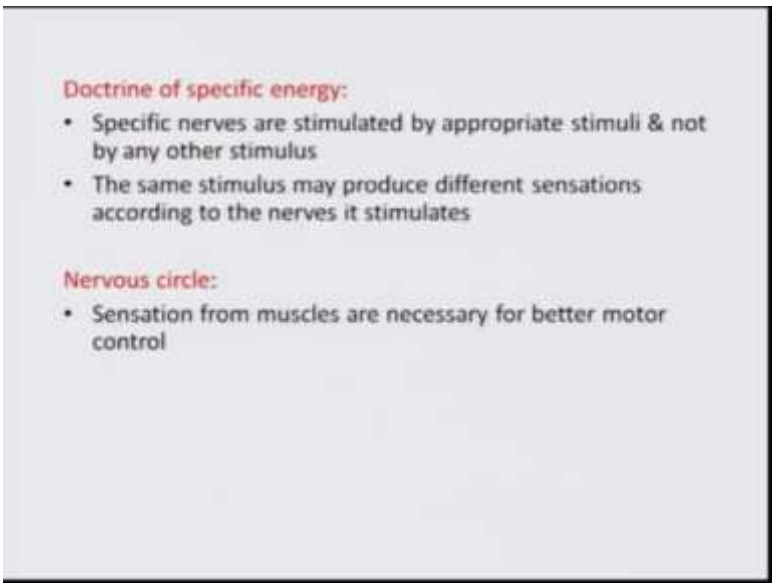
(Refer Slide Time: 12:47)



Take different things you would find a Charles Bell he talked about now the distinction between the sensory nerve and the motor nerves. Bell and Megendie's they came forward with law what is call as Bell-Megendie's law, this law says that the sensory nerve communication signals from external and internal environment to spinal cord is through the dorsal root whereas, the motor nerve that carry signals from spinal cord to the muscle to initiate some action response that is through the ventral root and they also talked about

an interesting phenomena talking about the direction of flow, so they said that the conduction in the nerve fibre always occurs in only one direction what was called as law of forward direction.

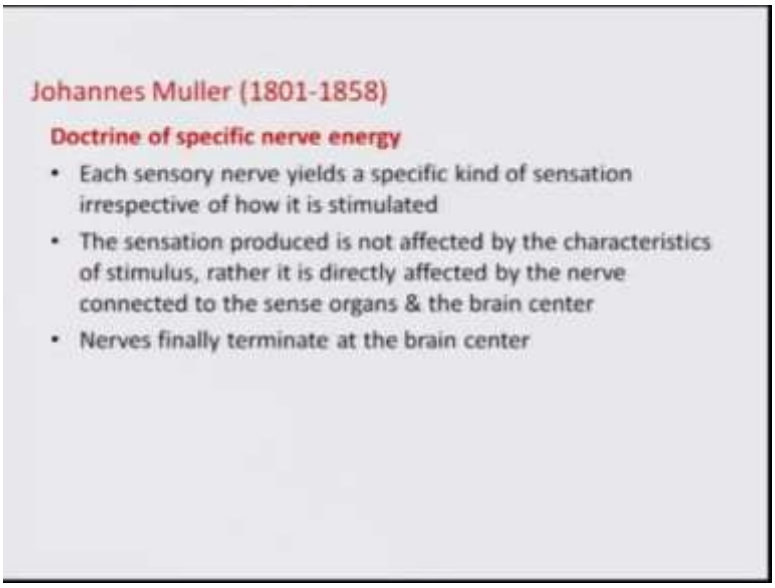
(Refer Slide Time: 13:36)



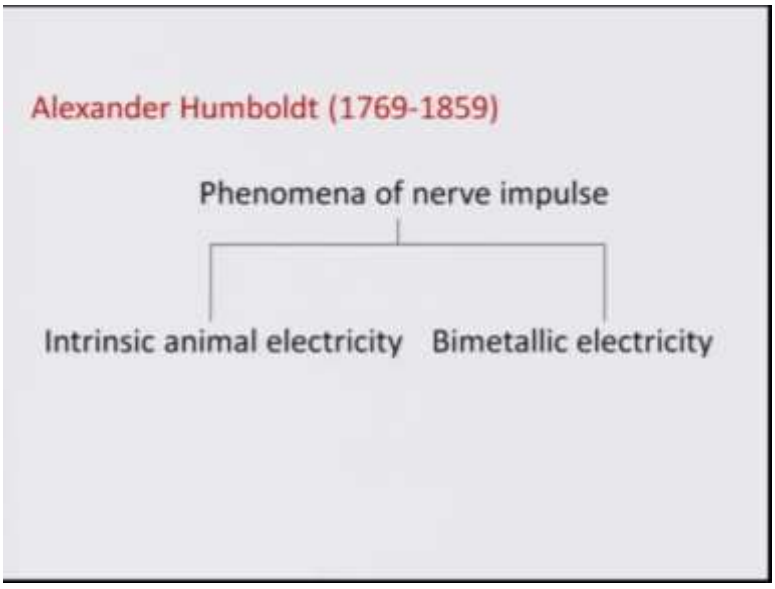
This was the phase when the doctrine of specific energy was talked about, which said that specific nerves are stimulated by appropriate stimuli and not by any other stimulus.

The same stimulus may produce different sensation according to the nerves it stimulates and the concept of nervous cycle was also talked about saying that sensation from muscles are necessary for better motor control.

(Refer Slide Time: 14:04)



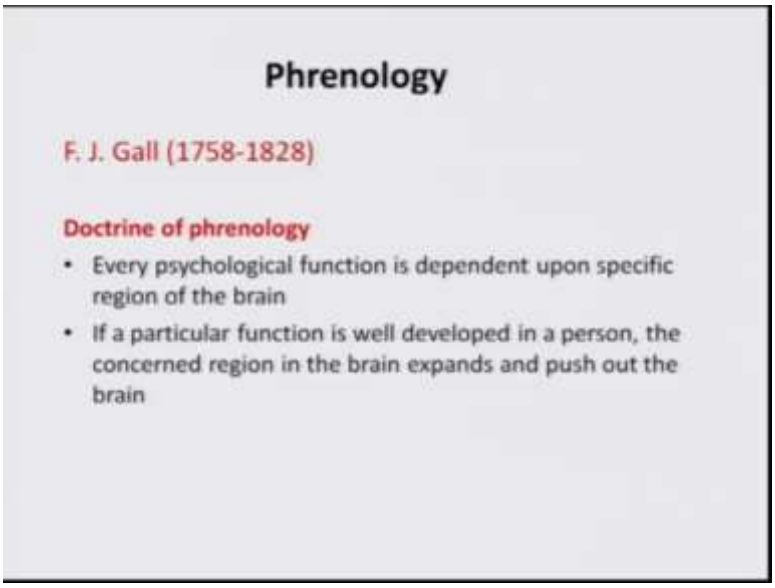
(Refer Slide Time: 14:10)



Muller gave the doctrine of specific nerve energy, and it was Alexander Humboldt who also went ahead talking about the phenomena of nerve impulse where he talked about the intrinsic and the bimetallic electricity.

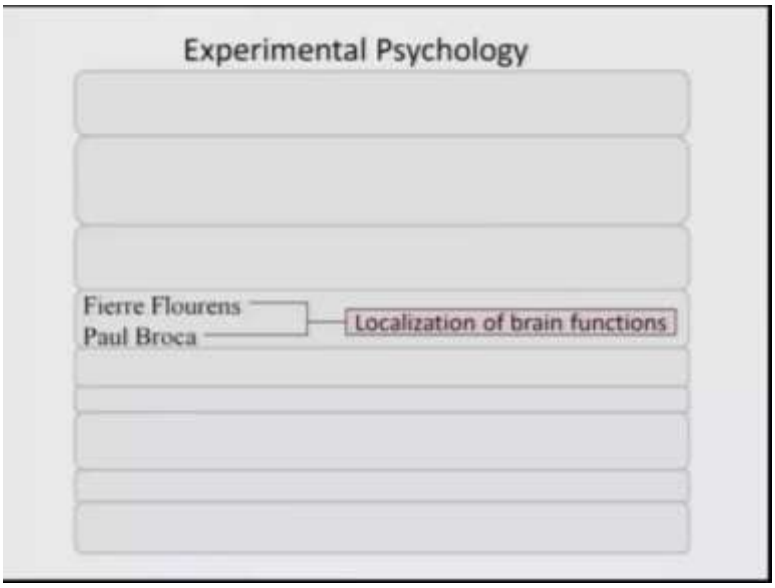
Then came an interesting phased a talked about phrenology this are interesting know phase where very new concept was proposed.

(Refer Slide Time: 14:30)



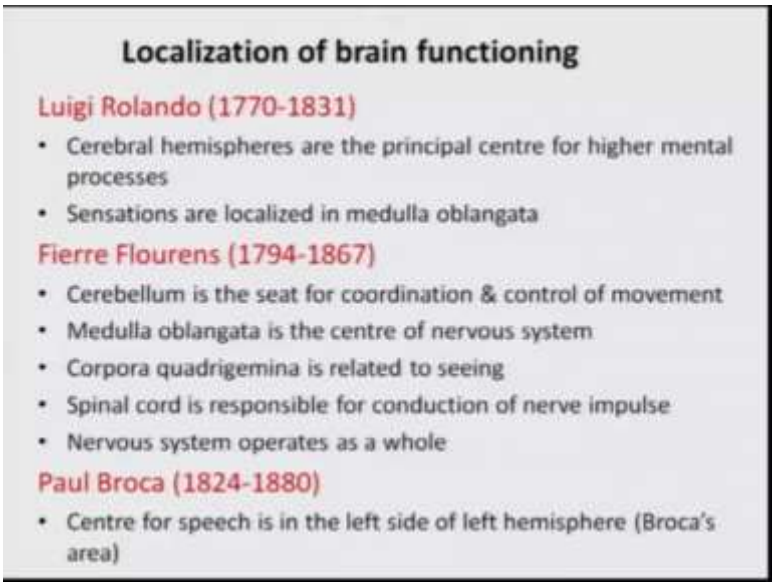
Gall now gave this doctrine of phrenology and he basically said that different psychological functions that basically depend on the specific regions of the brain, so if you utilize certain area of the brain then that concerned area would expand and therefore, it would push the brain out. So, basically if even if you touch your head you will find you know bumps hear in there on the head. So, some crusts and some troughs know. So, places where you find there is a bump according to Gall basically that very area of the brain is under control of certain functions wherein you have developed extreme expertise and therefore, that area has expanded and this expansion has led to push the brain forward.

(Refer Slide Time: 15:34)



But very interestingly initially now it got so much of attention, but then give slowly and slowly peoples said that fine this is not true.

(Refer Slide Time: 15:49)

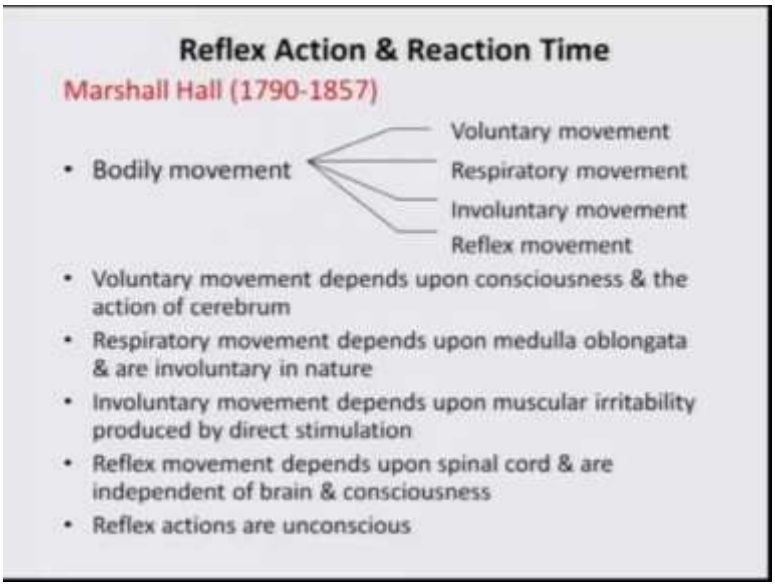


The fourth interesting worked that came forward in this phase was the localization of the brain functions and of course, Paul Broca we referred to in when we were talking about major mile stones. Rolando came forward with concept of cerebral hemispheres and he said its cerebral hemispheres are the principal centers for all higher mental functions and it did go ahead suggesting that sensations are basically localized in medulla oblongata.

Then Flourens suggested that cerebellum is the seat for coordination of and control of the movement and medulla is the center for nervous system. He also talked about spinal cord which was responsible for conduction of the nerve impulse and finally, it was Paul Broca who succeeded you know suggesting the centers on the left side of the hemisphere which basically controls this speech and on his name, this area is named as Broca's area.

Then came, another stage when reflex action and reaction time was the focus and Marshall Hall was the person who did this work.

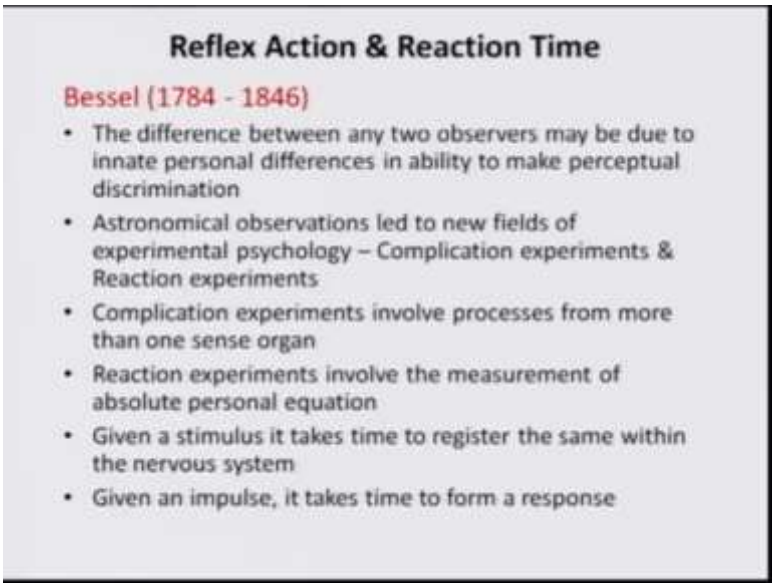
(Refer Slide Time: 16:59)



Marshall Hall talked about bodily movements and is said that there are four types of movements that you find voluntary, respiratory, involuntary and reflex movements.

He is said that voluntary movement basically depends on conscious and the action of the cerebrum. So, it is a conscious process completely under the control of the cerebrum. On the other hand respiratory movements basically depend on medulla oblongata and they are involuntary. He suggested that involuntary movement basically depend upon muscular irritability produced by direct stimulation. Further he said that reflex movements depend on a spinal cord and are independent of brain and consciousness.

(Refer Slide Time: 17:44)

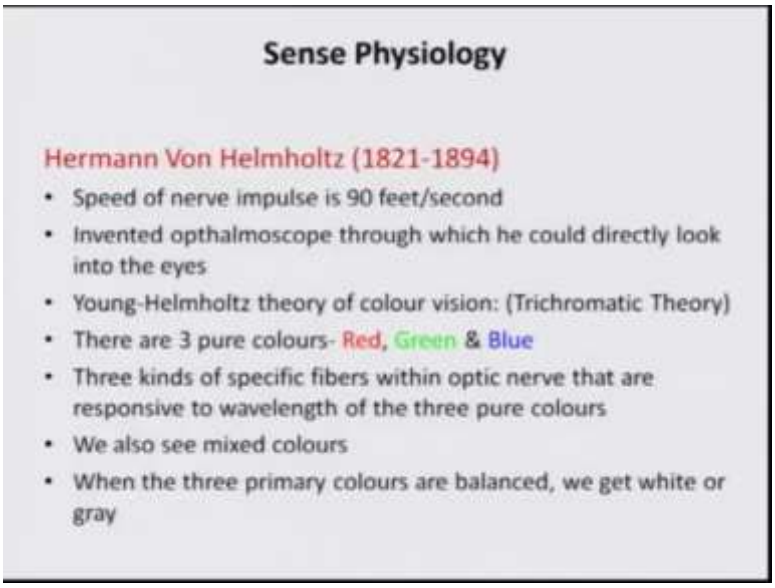


Bessel proposed that the difference between any two observers may be due to the innate personal difference in ability to make perceptual discrimination and Bessel of course, he was very much interested in astronomy. So, based on astronomical observations he led to the new field of experimental psychology where he talked about complication experiments and reaction experiments.

Complication experiments basically they involved processes from more than one sense organ, whereas in the case of reaction experiments the absolute personal equation was measured. So, this was an interesting thing that he came forward with and he also suggested that given an impulse everybody would take time to form a response.

Then came sense physiology, basically this was the area when the conduction, speed and colour vision was studied at length.

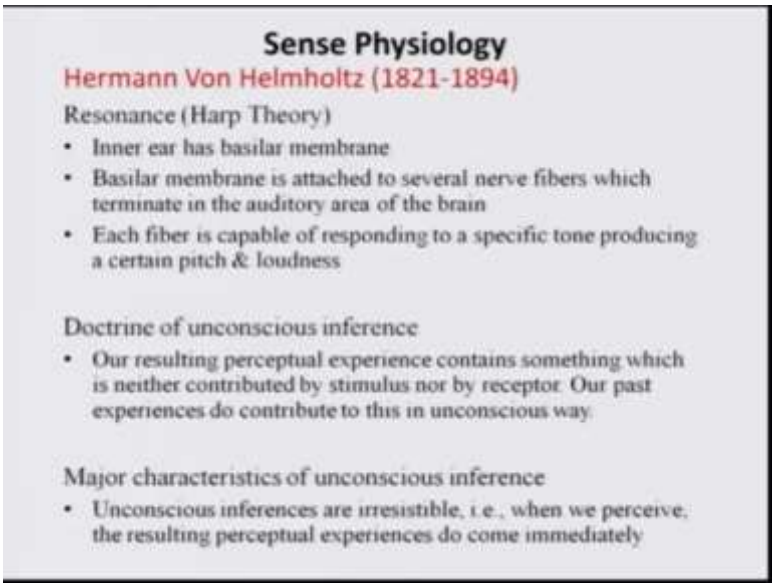
(Refer Slide Time: 18:45)



Hermann's, he came forward with speed of nerve conduction and he said this speed of nerve impulse is approximately 90 feet per second. He invented opthalmoscope through which he could directly look in to the eyes of the participants and Young-Helmholtz theory of colour vision came which is also called as trichromatic theory where he talked about three pure colours Red, Green and Blue.

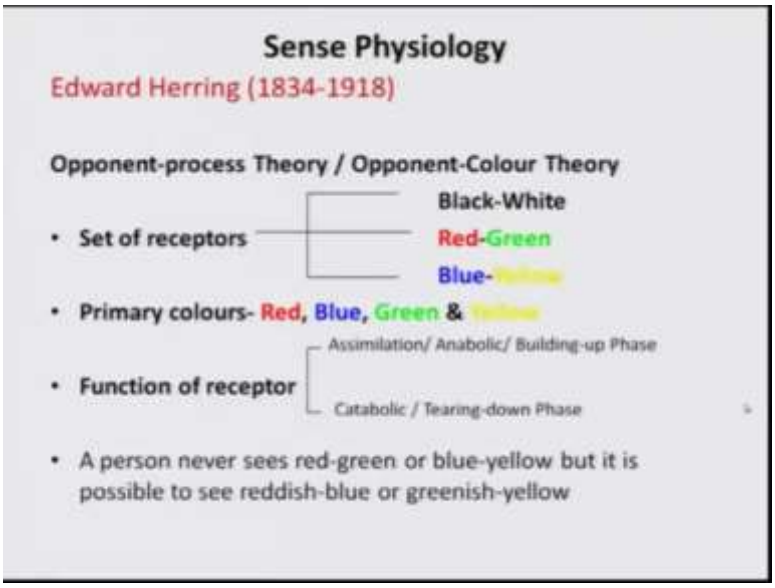
He said that three kinds of specific fibers within the optic nerve are there which are responsive to different wavelengths and he suggested that we also see mixed colours, so when the three primary colours are balanced we see white or we see grey.

(Refer Slide Time: 19:40)



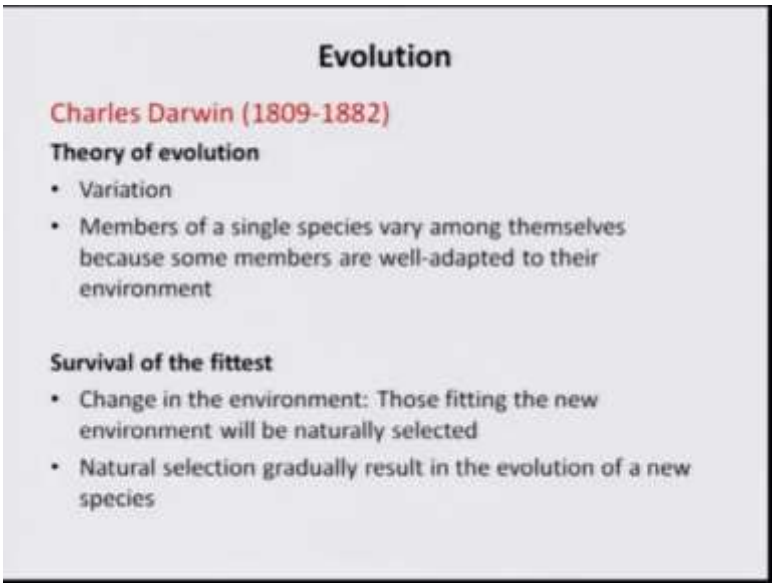
He talked about Resonance what is called as Harp Theory where we talked about the inner ear and the basilar membrane there and how basilar membranes are attached to nerve fibers and these nerve fibers finally go to the auditory area in the brain and he did talk about the fact that the fibers they are capable of responding to a specific tones which is a loudness. He also talked about the unconscious inference and his doctrine of unconscious inference suggested that are resulting perceptual experience contains something which is neither contributed by stimulus nor by receptors. Rather our past experience contributes to this in unconscious way and the major characteristics of unconscious inference he said that it is basically irresistible. So, when we perceive the resulting perceptual experience do come immediately.

(Refer Slide Time: 20:38)



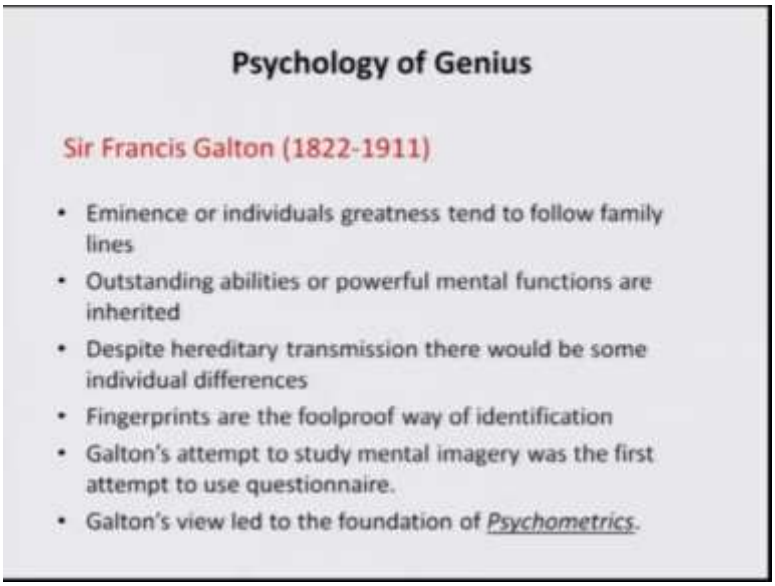
Edward Herring know gave this opponent process theory or what you also called as opponent colour theory where he talked about the set of receptors – black -white the first set, green and red the second set, and blue and yellow the third set and he said that red, blue, green and yellow they are the four primary colours. He also talked about the function of the receptor where he said that assimilation or catabolic phase, these are the two phases where in one case the building process takes place that is the simulation or the anabolic phase, the second is the tearing down the catabolic phase and he said that the person never sees red green or blue yellow, but it is possible to see reddish blue or greenish yellow.

(Refer Slide Time: 12:29)



Charles Darwin's work all of us know, famous work on evolution he give the theory of evolution talked about variations, talked about species survival of the fittest.

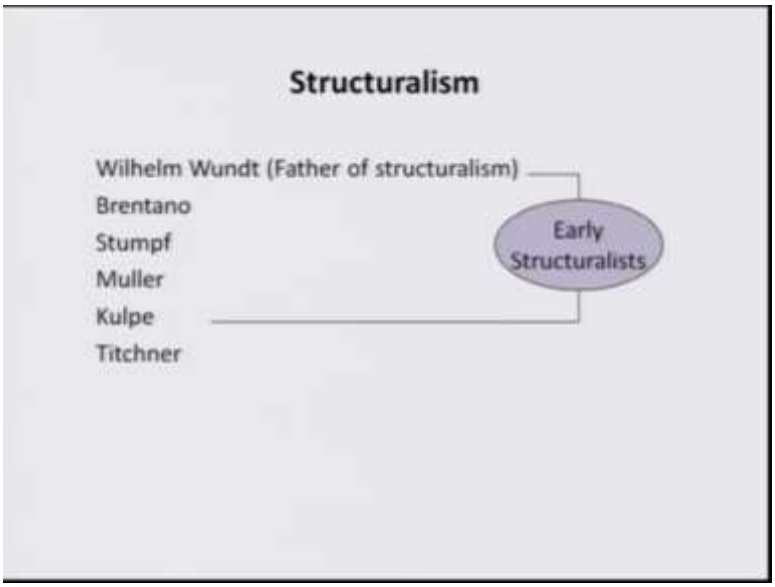
(Refer Slide Time: 21:42)



And finally, it was Galton who came forward with what is called as psychology of genius basically he said that individual greatness, they usually follow the family line although he is work was not accepted later on, but he proposed this vary concept that outstanding abilities or powerful mental functions are basically inherited. And of course, he talked about the fact that the fingerprints are the foolproof way of identification, although his

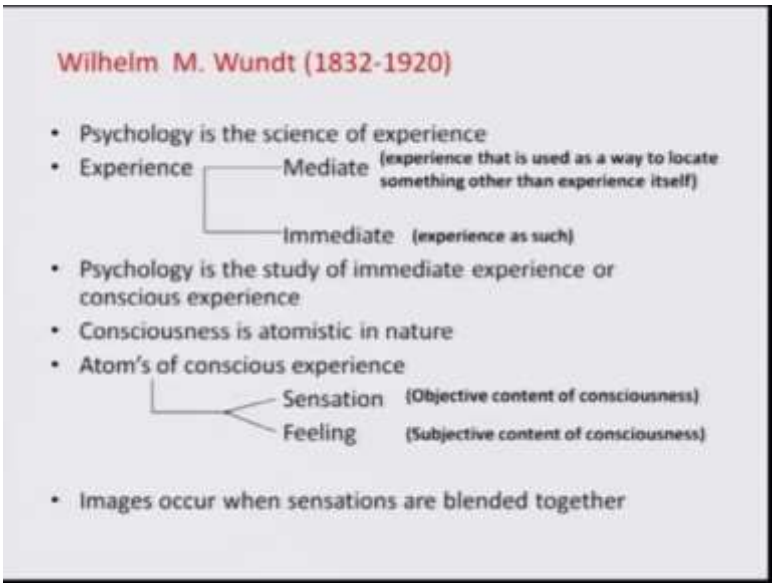
theory of eminence and outstanding ability which has a genetic origin this was discarded, but fingerprint has foolproof way of identification is still you find that is being used and if you recollect when we are talking about major mile stones we had talked about the seminal work of Sir Francis Galton - the techniques that he led to a especially the questionnaire and all those things. And basically it is Galton's viewed that led to the foundation of psychometric that we use so generously nowadays.

(Refer Slide Time: 22:49)



Then came the third important school of thought what is called as structuralism.Wilhelm Wundt is given the credit of being the father of a structuralism and the important people where Brentano, Stumpf, Muller, Kulpe they are cal called the Early Structuralists where has Titchner is considered as modern structuralists.

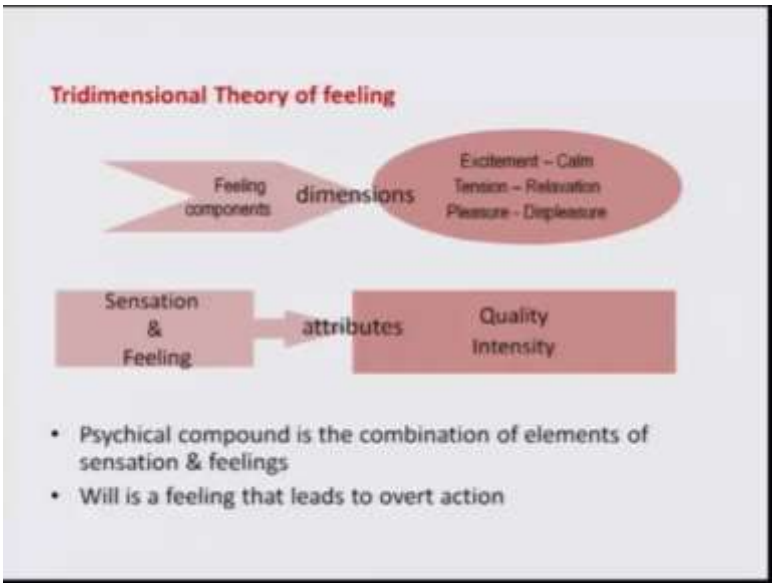
(Refer Slide Time: 23:08)



Wundt basically talked about the science of experience according to him there are two types of experiences mediate experience and immediate experience. So, experience that is used as a way to locate something other than the experience itself is mediate whereas, if you are experiencing as such then it is immediate in nature and he said that psychology is basically the study of immediate experience or the conscious experiences.

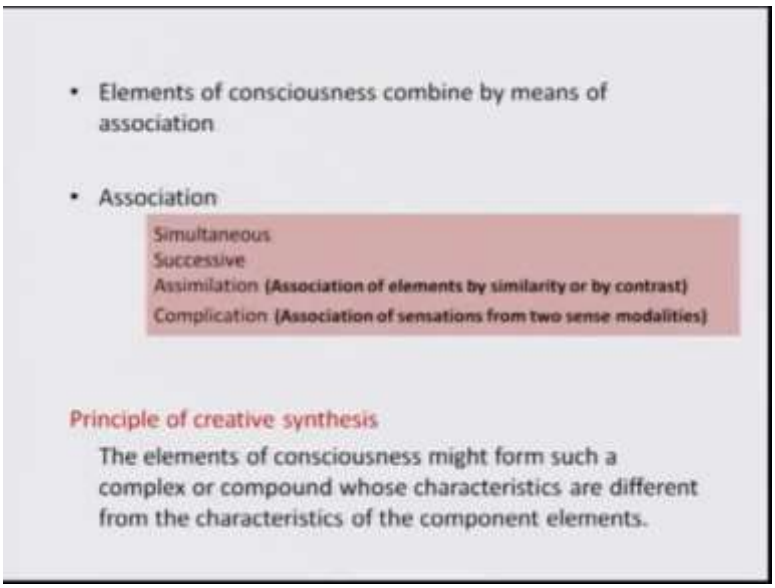
And he suggested that consciousnesses atomistic in nature, by atomistic nature he basically meant that it have two components - sensation and feeling. Sensation which is the objective component of the consciousness and feeling is the subjective component of consciousness and he said that images occur when sensations they blend together. He also gave these feeling components the dimensions of it and he said that there are three tridimensional.

(Refer Slide Time: 24:05)



Excitement-calm these are by polar, tension-relaxation and pleasure-displeasure and similarly he said that there are two attributes of sensation in feeling - one is the quality and the other is the intensity. All psychical compounds are the combination of elements of sensation and feeling, and then he talked about will wherein he said that will is a feeling that lead to overt action.

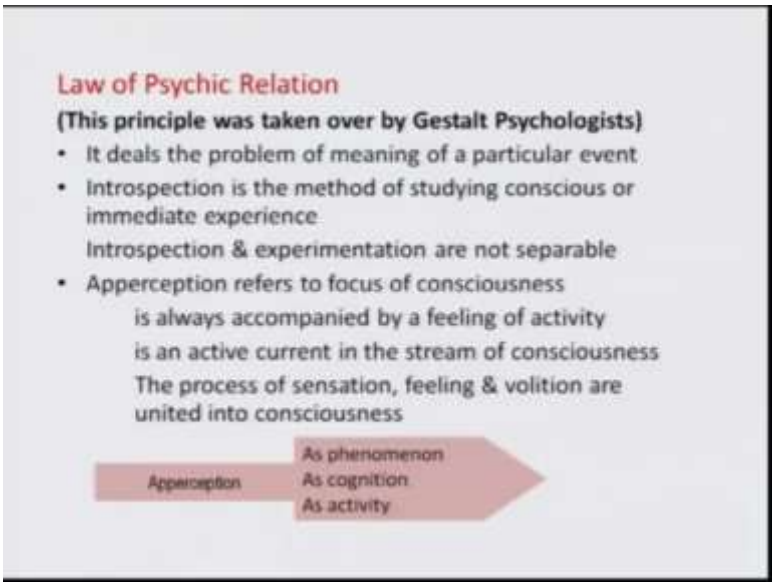
(Refer Slide Time: 24:36)



He also talked about the elements of consciousness which combines by means of association and four types of associations he talked about simultaneous association,

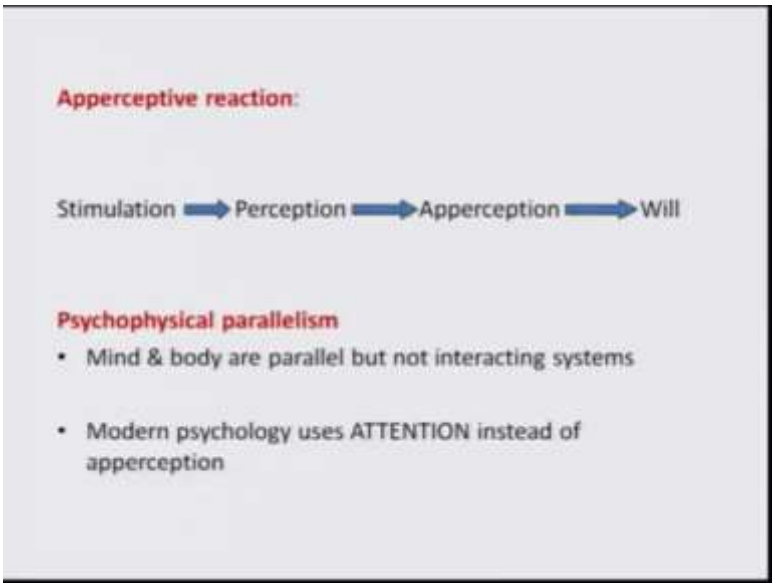
successive associations, assimilation and complications. Then he also talked the principle of creative synthesis wherein he said that the element of consciousness might form such a complex or compound whose characteristics are different from the characteristics of the compound elements.

(Refer Slide Time: 25:09)



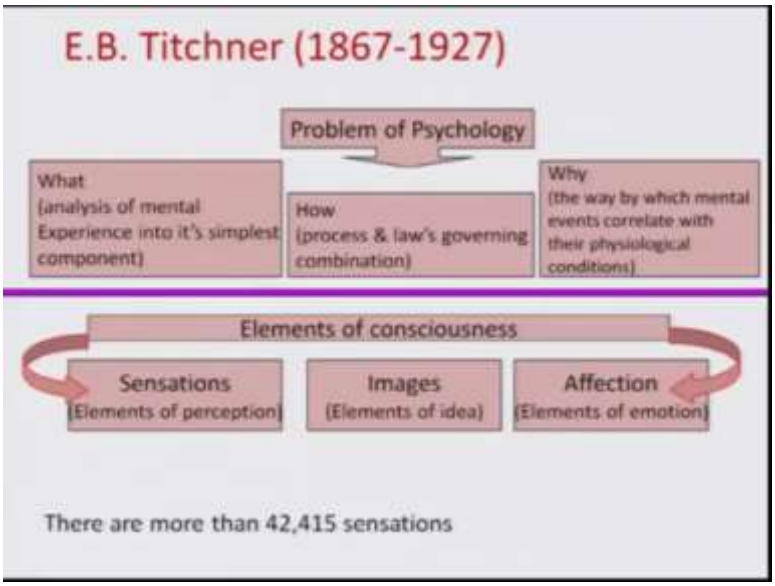
He also gave this law of psychic relationships and interestingly he would realized that it was this very principle of psychic relationship which was later on take an up by Gestalt Psychologists, we will come to Gestalt Psychology little later. He talked about apperception and apperception as a phenomenon, as cognition, as activity. So, according to him stimulation leads to perception, perception leads to apperception, and apperception leads to will and of course, he talked about psychophysical parallelism where he talked about the interaction between the mind and the body.

(Refer Slide Time: 25:33)



Remember that the apperception the term perception that was used by him modern psychology uses attention word for that.

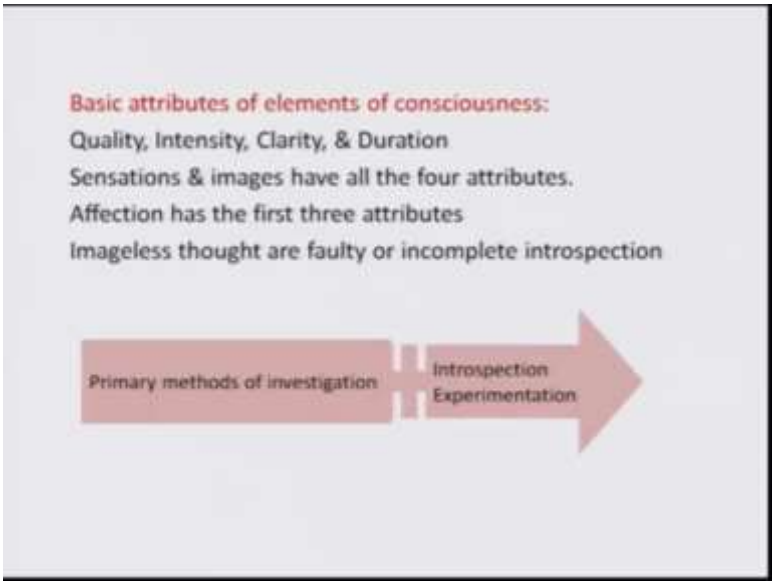
(Refer Slide Time: 25:59)



Another important person in this school of thought was Titchner, he said that basically the problem of psychology is what,how and why of the phenomena. So, if you are analyzing the mental experiences and trying to break it down into simplest components then it is what of the problem, if you are interested in process and laws that govern these mental components then it is how of the phenomena, and if you are interested

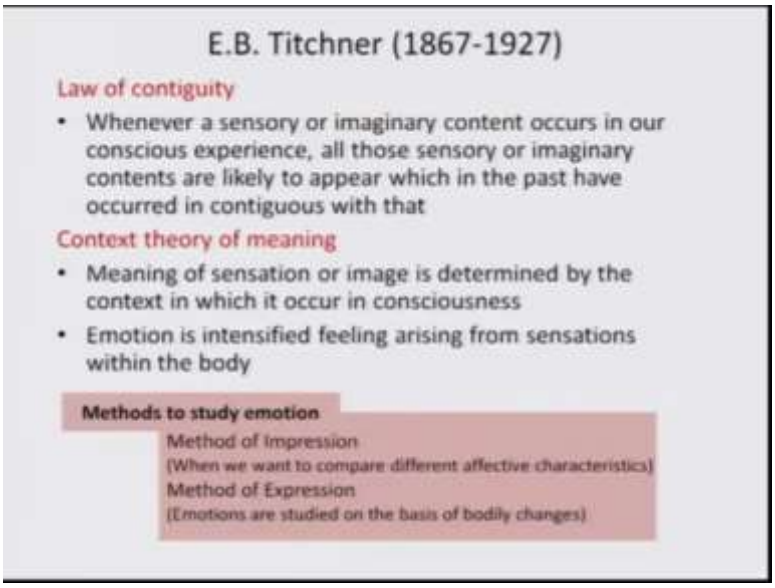
understanding the way by which mental events correlate with their physiological conditions then it is why of the phenomena. So, basically what,how and why is the subject matter of psychology, this is Titchner's view and he said that there are three elements of consciousness – sensations, images and affection. Sensations basically have the elements of perception, images have the elements of idea and affection has the elements of emotion and recording to Titchner, we human beings have 42415 different types of sensations.

(Refer Slide Time: 27:11)



He talked about the basic attributes of elements of consciousness wherein he talked about quality, intensity, clarity and duration, and he said that the primary method of investigation is either introspection or experimentation.

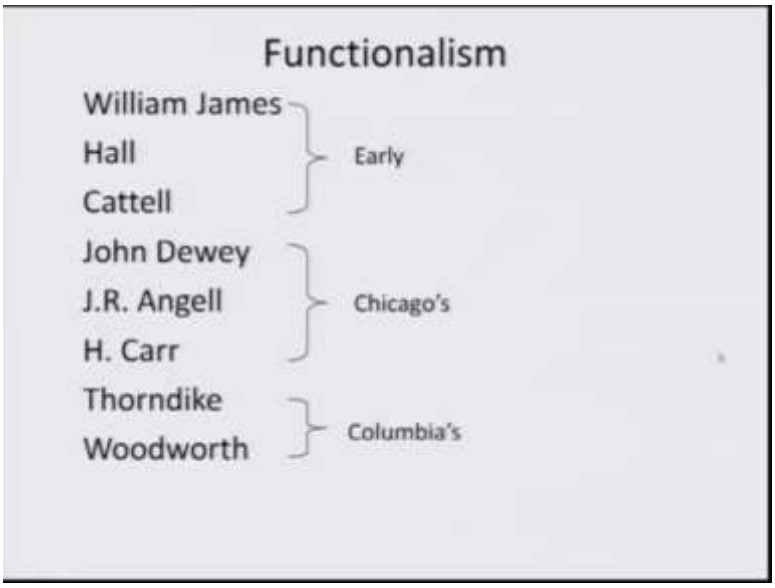
(Refer Slide Time: 27:28)



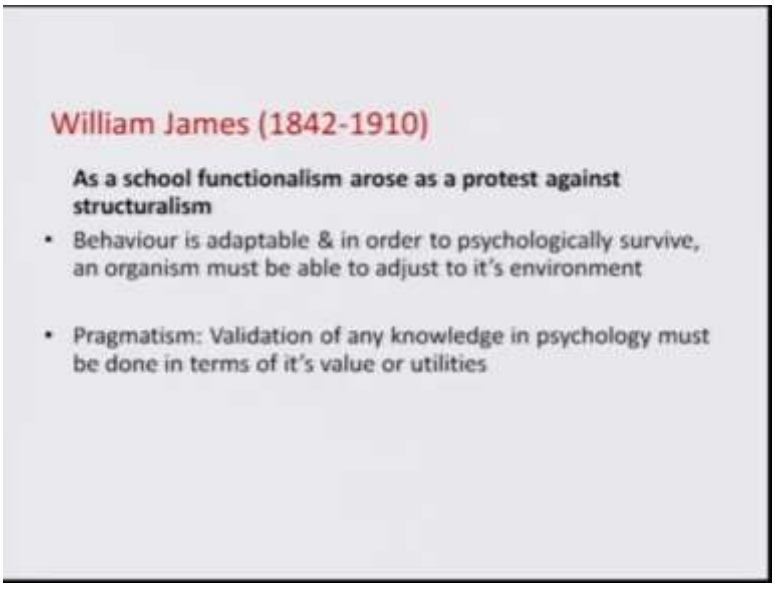
Titchner talked about law of contiguity, law of contiguity means the concurrence of two type of type of things together if one comes after the other in very close duration. So, he said that whenever a sensory or an imaginary content occurs in our conscious experiences all those sensory or imaginary contents they are likely to appear which happened in the past and it was contiguous. And it is basically the meaning of sensation or image which is determined by the context in which it occurs, in consciousness. So, this was what is called as the context theory of meaning. And according to him the methods that can be used to study emotion are basically the method of impression and the method of expression.By impression he meant that when we want to compare different of affective characteristics then it is the method of impression. And if you are studying emotions on the basis of bodily changes then you are basically trying to study emotions with respect to expressions.

The fourth major school of thought in psychology was functionalism. And if you look at the list of the functionalist, it start with William James and it goes up two good worth and you have all legendaries here.

(Refer Slide Time: 28:42)

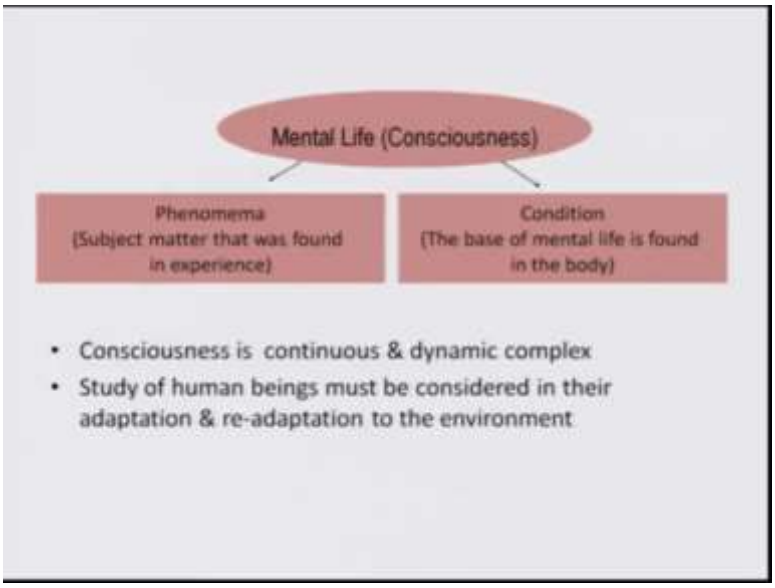


(Refer Slide Time: 28:51)



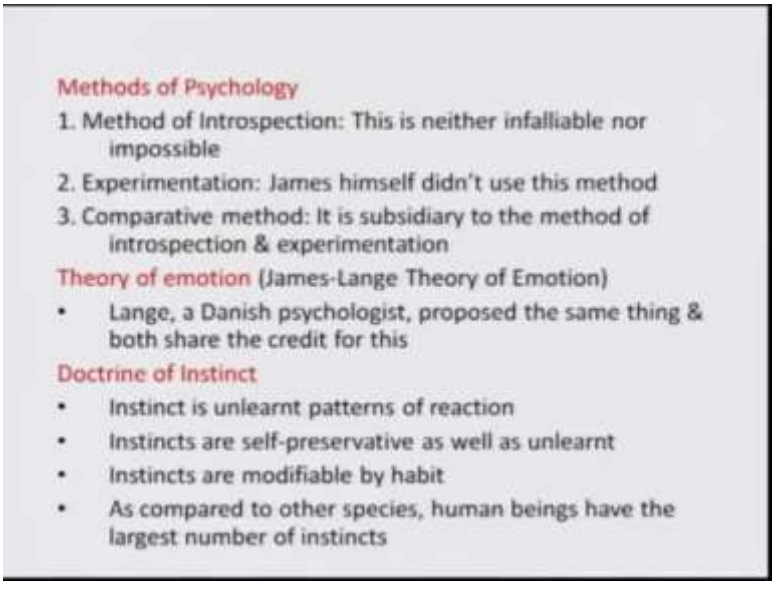
Frankly speaking functionalism was a school that came out as a protest against structuralism. So, functionalist basically this said that behavior is adaptable and in order to psychologically survive any organism must be able to adjust to its environment and their focus was more and more pragmatic. So, they said that the validation of any knowledge in psychology must be done in terms of its value and utility.

(Refer Slide Time: 29:23)



They talked about mental life or what was referred as consciousness both as phenomena and as condition. So, the subject matter that was found in experience is the phenomena and the base of the mental life know is found in the body and of course, they said that consciousness is continuous and dynamic process which is very, very complex. According to functionalism the study of human beings must be considered in their adaptive and re-adaptive processes that they take forward with respect to their environment.

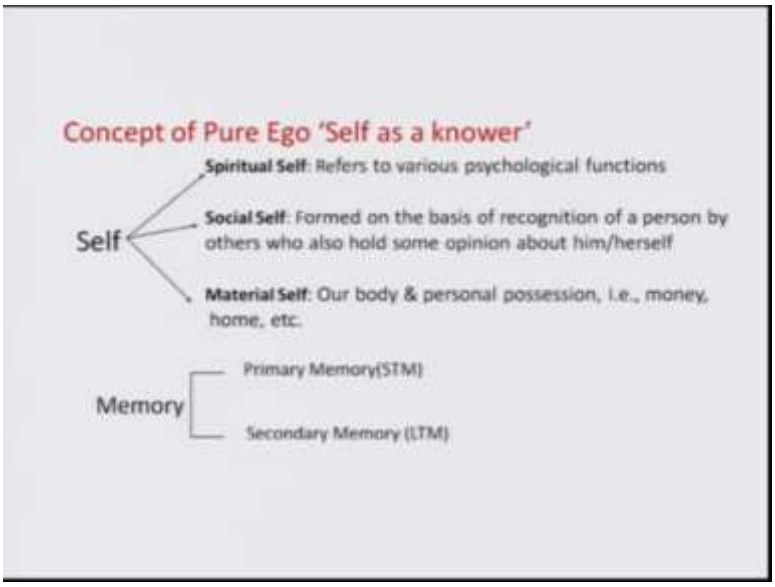
(Refer Slide Time: 30:00)



The major method that they focused on was introspection, experimentation and the comparative method. Of course, you should remember that William James himself did not use the method of experimentation and the famous theory the James Lange theory for emotion we would also talk about it no when we come to the topic emotion in the coming weeks.

James proposed this and Lange who was a Danish psychologist also proposed the similar type concept and therefore the credit for this theory was share between the two. So, this was major concept given by this school of thought and then now functionalism also talked about the doctrine of instinct. James said that instinct is a unlearnt pattern of reaction, they are self preservative as well as, unlearnt they are modifiable by our habits and as compared to other species human beings have a large number of instincts. James talked about three types of self's the spiritual self, the social self and the material self.

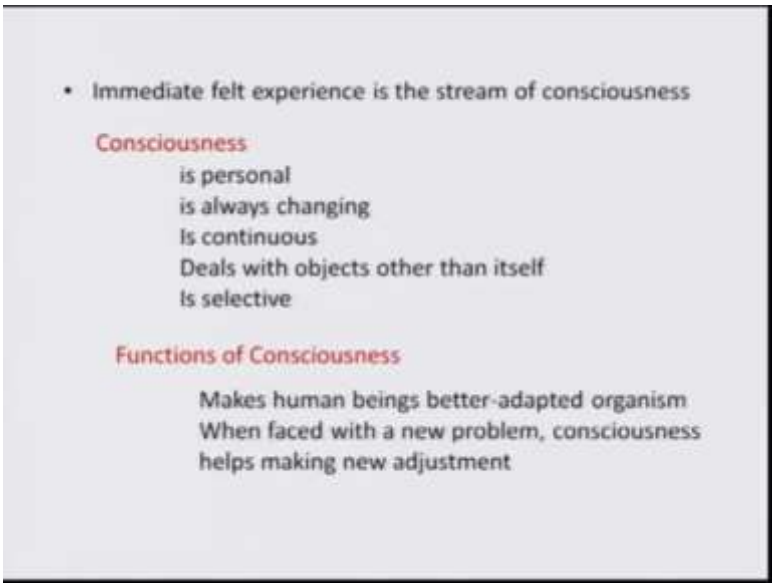
(Refer Slide Time: 31:03)



Spiritual self basically refers to various psychological functions, the social self basically is formed on the basis of the recognition of a person by others based on the opinion they hold about that vary person and the material self basically is our body and our personal possessions.

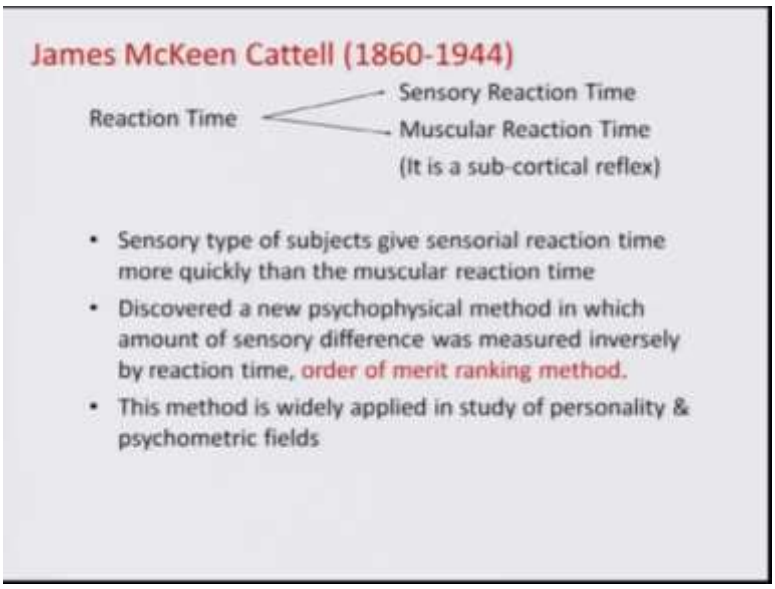
James also talked about the primary and the secondary memory, primary memory you can relate it to short term memory and secondary memory you can relate it to long term memory.

(Refer Slide Time: 31:41)



He talked about consciousness and suggested that fine it is personal always changing a continuous and selective process which deals with objects rather than itself. He also talked about the function that consciousness serves and he said that basically consciousness makes human being better adopted organisms and when faced with new problem it is basically consciousness that makes us adjust according to the new demand.

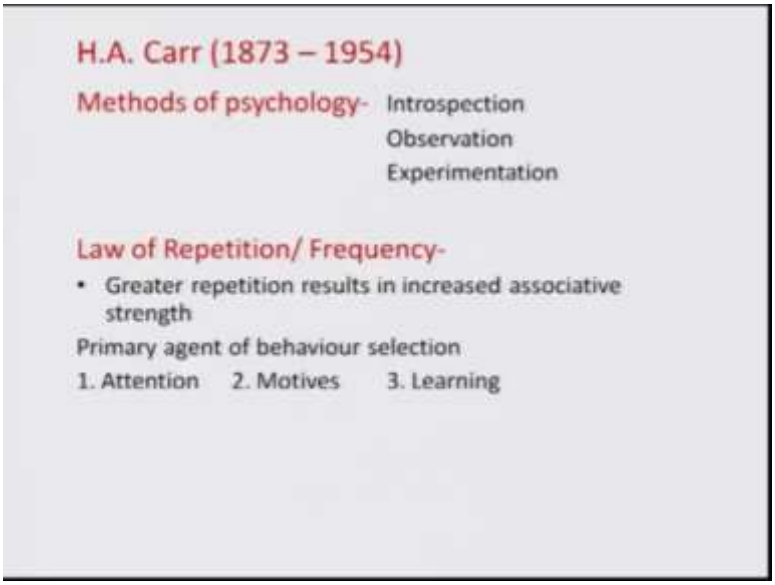
(Refer Slide Time: 32:10)



Cattell was another important source of new concepts in this school of thought who basically talked about two types of reaction time - sensory and the muscular reaction time.

And he said that sensory type of subjects gives sensorial reaction time more quickly than the muscular reaction time. So, he was basically now making a distinction between type of people based on they are reaction time, but most importantly Cattell discovered the new psycho physical method what is called as the order of merit ranking method and this method is widely applied now in personality and psychometric.

(Refer Slide Time: 32:54)

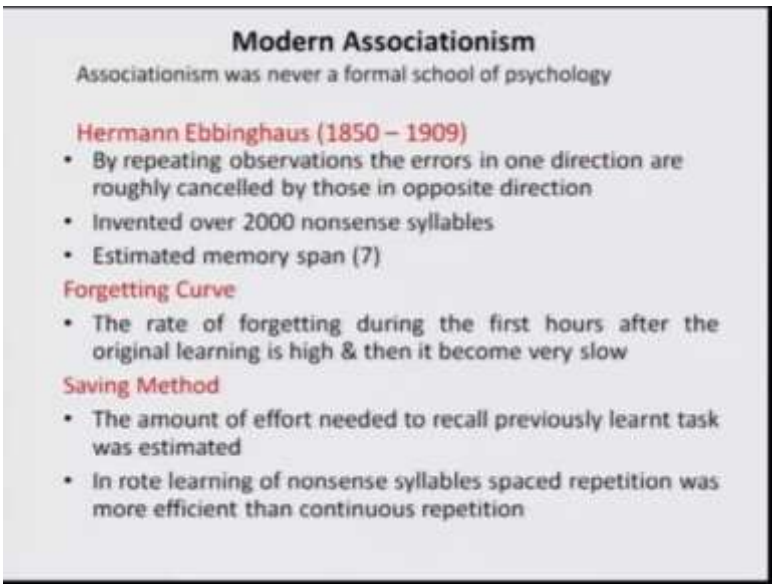


Carr was another important contributor to this is school of thought, who gave three methods of study introspection, observation and experimentation and he did talk about law of repetition or law of frequency and he said that greater reputation results into increased associative strength and they also said that the primary agents of behavior selection are attention, motives and learning.

(Refer Slide Time: 33:36)

The new school of thought basically many people said this was not basically a school thought, but we are considering it as right now as a school of thought was associationism. You can again divide the older and the modern school and if you look at the list in the modern school you again have the Stoll words who gave major theory is in psychology Ebbinghaus, Pavlov, Thorndik, Guthrie.

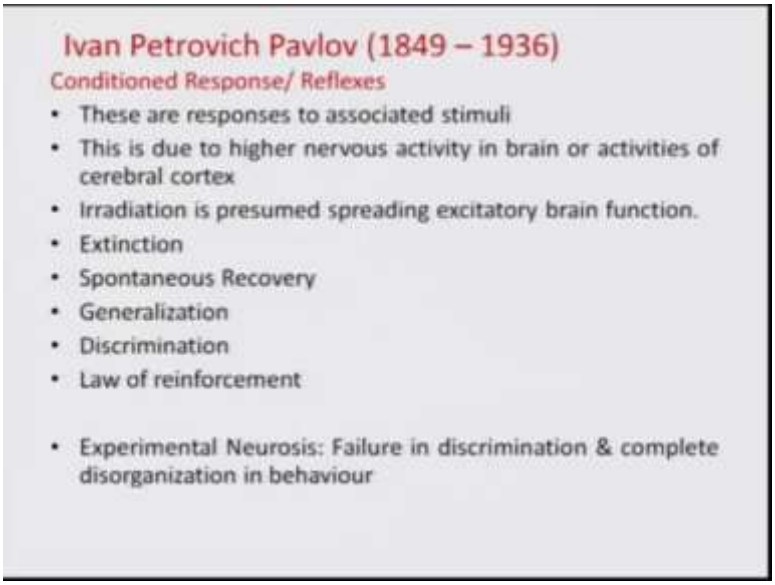
(Refer Slide Time: 33:49)



Ebbinghaus theory we all know, and we would be talking about it when we come to memory in the forth coming weeks. He said that by repeating observations the error in

one direction are roughly cancelled by those in the opposite direction and he was the one who came forward with nonsense syllables which is still date used in the study of memory. He came forward with around 2000 nonsense syllables and he is also given the credit of coming forward with this estimate span of memory, you know 7 plus minus 2. He also came forward with this concept of forgetting curve, forgetting curve we will again talk about when we come to memory. And of course, method of saving that is the amount of effort that is needed to recall something that was already previously learned, this is against method which we would be talking about when we come to memory.

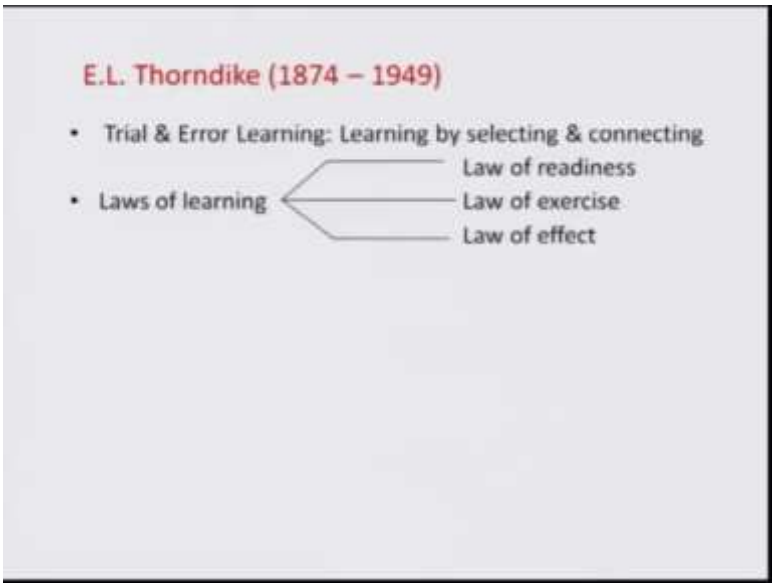
(Refer Slide Time: 34:47)



Pavlov's work again we will talk about when we come to learning, he was the one who talked about condition responses or reflexes and he talked about all types of things. The very fact that the responses are associated to stimuli, the fact the higher nervous activity in the brain now they get connected. He talked about extinction spontaneous recovery, generalization, discrimination, the law of reinforcement, all these things we will be talking about when we come to learning in the coming weeks.

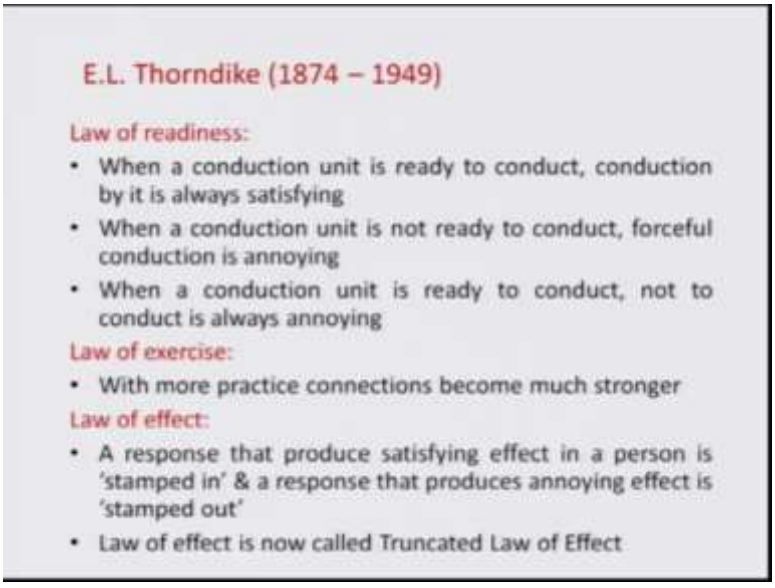
He mentioned one thing what he called as experimental neurosis that was basically the failure to discriminate and complete disorganization in behavior. So, this is very interesting concept that I have talked about.

(Refer Slide Time: 35:34)



Thorndike again we would refer to him when we come to learning he gave this favors trial and error method of learning where he talked about learning by selection and connection and the laws of learning he talked about three laws - law of readiness, the law of exercise and the law of effect.

(Refer Slide Time: 35:53)

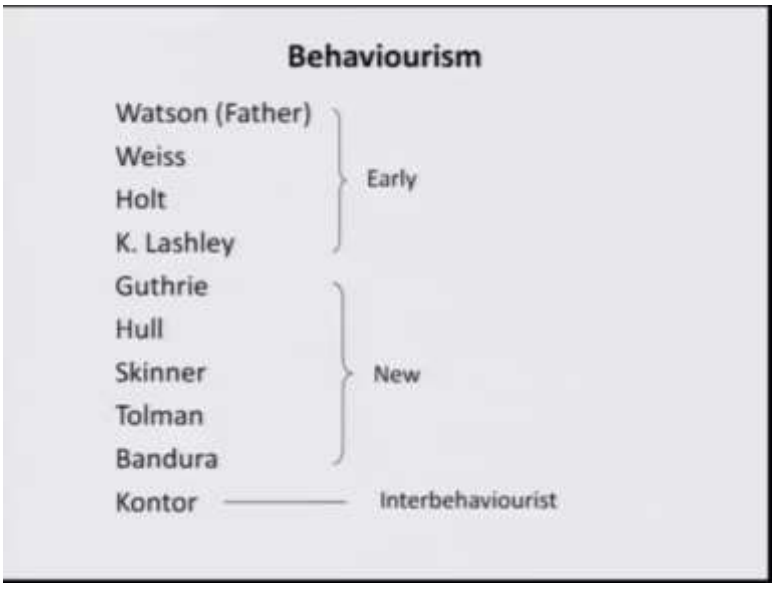


So, law of readiness said that when conduction unit is ready to conduct, conduction by it is always satisfying compared to this when the conduction unit is not ready to conduct then forceful conduction is annoying and third condition when the conduction unit is

ready to conduct not to conduct is again annoying. So, this is what he called as law of readiness.

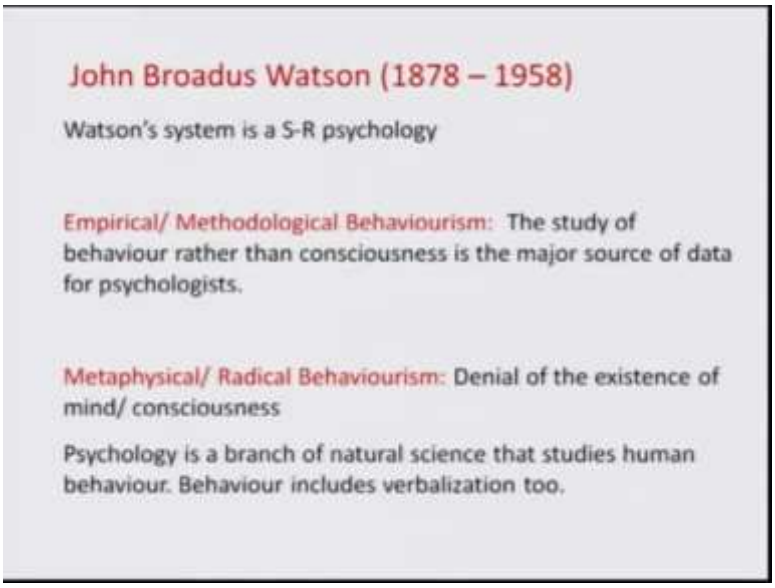
Law of exercise is said at with more practice connections become much more stronger and then of course he talked about the law of effect that are response that produce satisfying effect in a person is stamped in and the response that produces annoying effect is stamped out and law of effect is now called Truncated law of effect.

(Refer Slide Time: 36:47)



The next school is the behaviorist and again you know most of these names Watson is given the credit of being the father of behaviourism and again whole lot of people the major once being Bandura, Tolman and Skinner in this row.

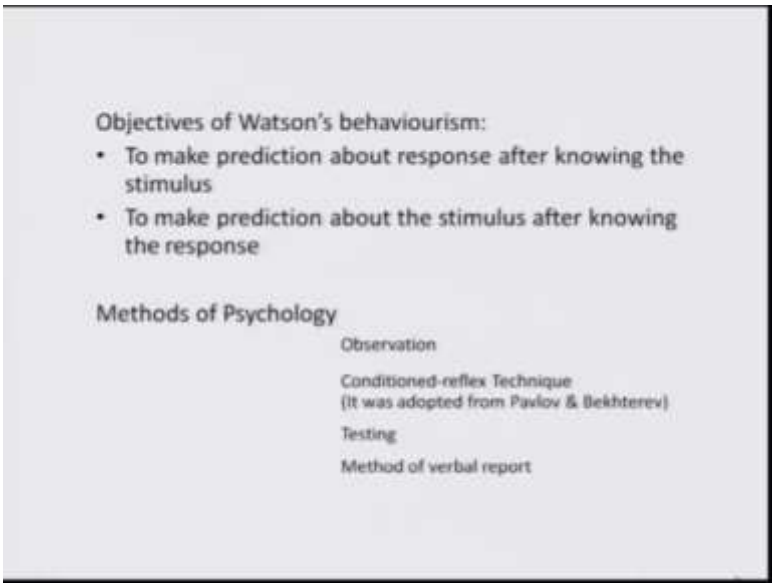
(Refer Slide Time: 37:01)



Now, Watson of course, talked about the S-R component know the stimulus response component of psychology which is always talked about. He talked about the empirical or the methodological behaviourism which is the study of behavior rather than consciousness and he said that this method is the major source of data for psychologists.

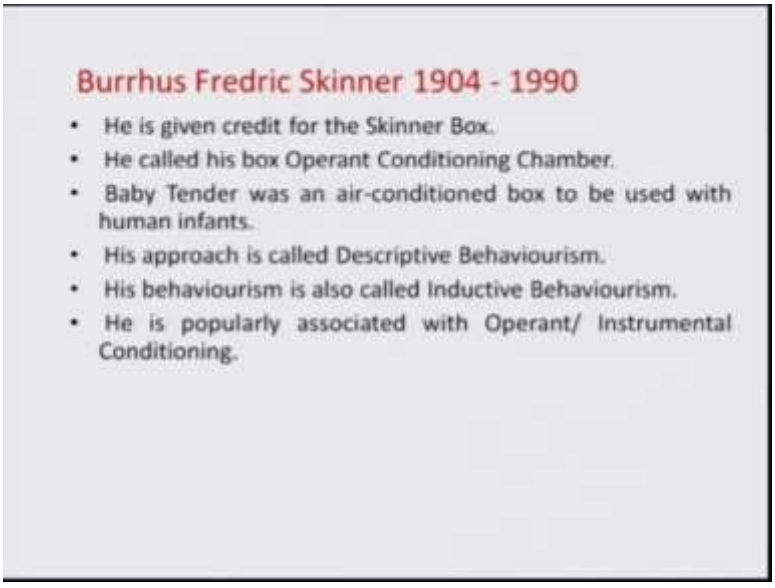
He also talked about radical behaviourism or metaphysical behaviourism saying that denial of the existence of mind is something that is desirable and the focus should be basically on the behavior rather than the mind and consciousness. He said that psychology is a branch of natural science that studies human behavior and behavior for him included even something like verbalization as well.

(Refer Slide Time: 37:55)



So, the objective of Watson's behaviourism was basically to make prediction about response after knowing the stimulus and to make prediction about the stimulus if you know the response. The methods that he suggested was observation, conditioned reflex technique and it was adopted basically from Pavlov and Bekhterev.

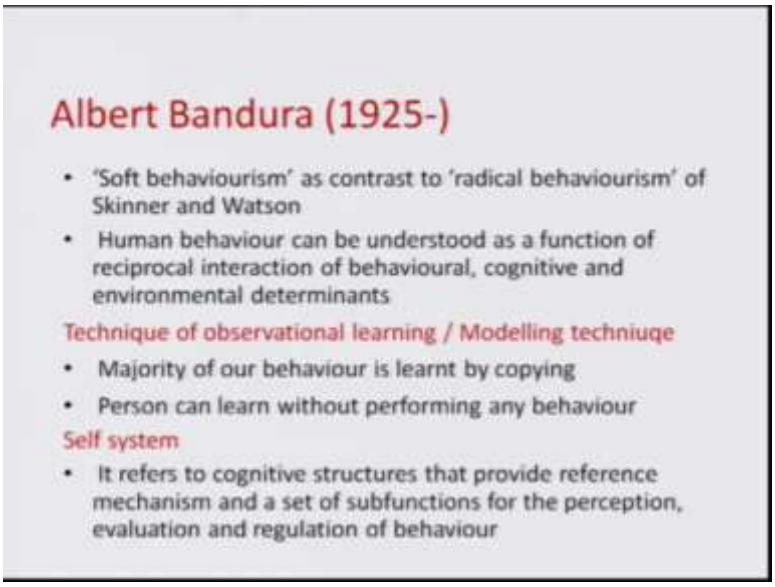
(Refer Slide Time: 38:23)



The third method he talked about was testing and the fourth method was verbal report. So, these are the four method step was talked about by him. The Skinner, we all know the famous skinner box and the operant conditioning experiments, we would talk about

his work (Refer Time: 38:34) when we come in the coming next to the topic of learning. His approach is basically also called as descriptive behaviourism or inductive behaviourism and he is primarily very very popular for his instrumental conditioning experiments.

(Refer Slide Time: 38:50)



Albert Bandura gets another credit knows for introducing what is called as soft behaviourism, Skinner and Watson we have called as radical behaviourists, whereas Bandura is given the credit of being the soft behaviourists.

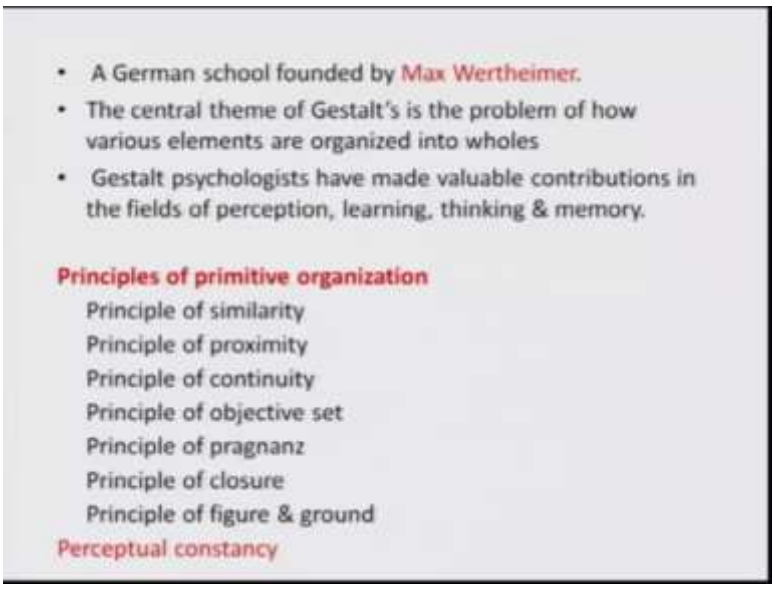
And he said that human behavior can be understood as a function of reciprocal interaction of behavioral, cognition and the environmental determinants. He considered that observational learning or modeling is one of the best ways of learning which basically means that majority of our behavior is basically learned through copying, that means, that a person can learn without performing a behavior. So, you just observe you just copy and you model. This very technique we would be again talking about when we come to learning and he also referred to self system, basically it refers to cognitive structures that provides reference, mechanism and a set of sub functions of the perception, evaluation and regulation of behavior.

Then came Gestalt psychologists of course, Wertheimer, Kohler, Koffka and many others get the credit.

(Refer Slide Time: 40:04)

This very school talked about many concepts, but basically they are famous for the principles of primitive organization, various principles they talked about what they are popularly called as the Gestalts Theory.

(Refer Slide Time: 40:07)



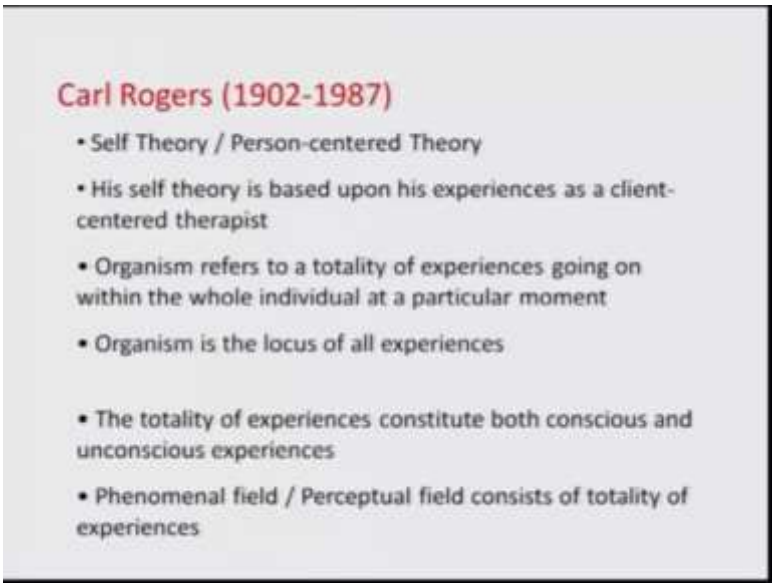
Principles of similarity, proximity, continuity, closure, objective set, figure and ground they also talked about perceptual constancy, all of this we will be talking about when we come to the topic of perception in the coming week.

Then came up major school of thought psychoanalysis, Sigmund Freud was considered as the pioneer, he is given the credit of being the father of modern psychology as well and Adler, Jung, Horneye, Erikson they are the one who are called as Neo Freudians. Right now I am not going into the details of what they talked about because when we come to the topic personality in that very week we would be talking about various theories given by all these psychoanalysis.

(Refer Slide Time: 40:43)

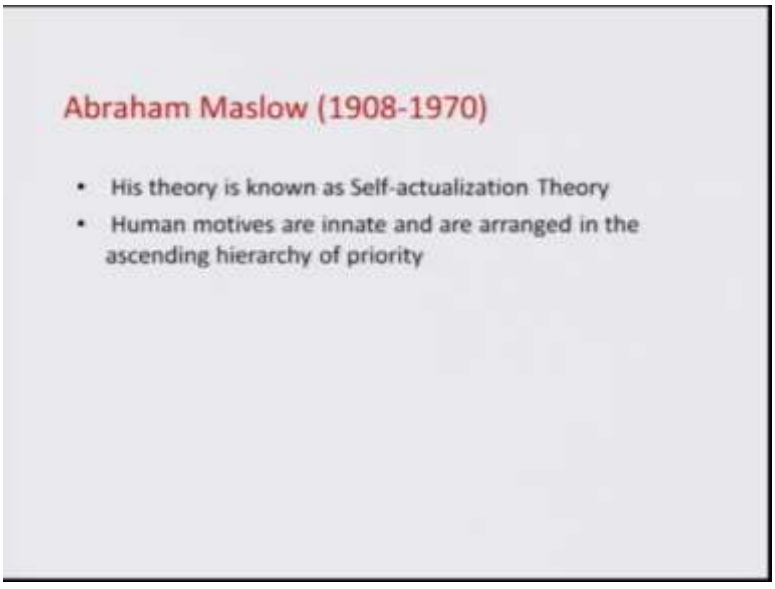
But you would realize that the focus completely shifted if you graphically plot what the focus of attention of various schools of thoughts and if you start from a structuralism. So, structuralism to behaviourism to socialism to all these schools coming up to psychoanalysis will find a big change. The major school of thought which came little later was the humanistic and the existential psychologists. Two people who are popular know are Abraham Maslow and Carl Rogers.

(Refer Slide Time: 41:47)



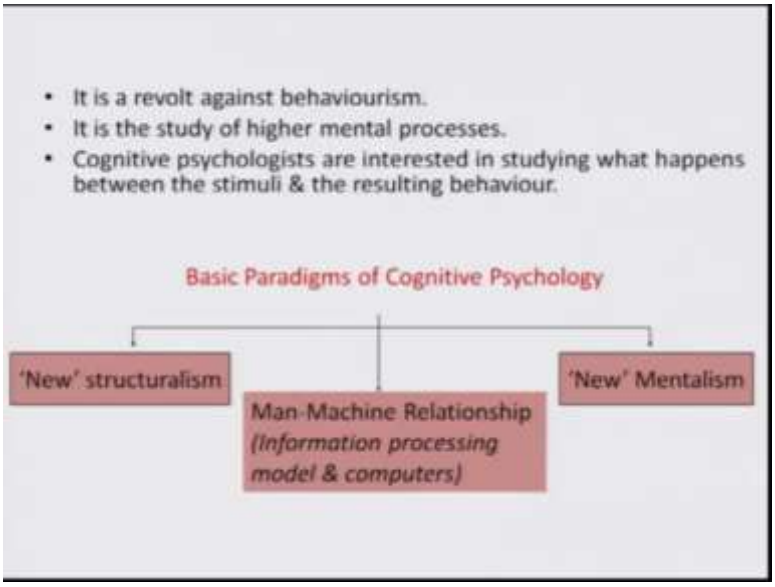
Carl Rogers we all know for the persons centered therapist, his self theory which is basically based on his own experience as a client centered therapist and he talked about the organism referring to the totality of experience going on within the whole individual at a particular moment and he talked about the locus of all the experiences within that very organism. Carl Rogers we would be talking about again when we come to personality.

(Refer Slide Time: 42:18)



Again Abraham Maslow very famous for his self actualization theory, he gave this famous need hierarchy concept. He talked about human motives which are innate and that are arranged in ascending hierarchy of priority. Gradually now psychology moves towards new school of thought, which looked at the mental faculties and what is called as cognitive psychology.

(Refer Slide Time: 42:44)



This was basically a revolt against behaviourism and the entire focus was on higher mental processes. So, the cognitive psychologists, they were interested in studying what happens between the stimulus and the resulting behavior. Three basic paradigms you will find the 'New' structuralism, Man-Machine Relationship and the 'New' Mentalism. These where the focus of the cognitive psychologists and now you will find that there is whole lot of now mix and matches that has taken place.

If you remember last time when where talking about various divisions of psychology and the prominent areas, the emerging areas, you could have found that psychology has expanded right from the general principles that was being observed to what not at the modern type. So, this is the whole course of develop and that has taken place in psychology. This was the summary of the major schools of thoughts. Next week onwards we would be talking exclusively on various topics each week would be dedicated to one major concept and this is how we will precept.