CHAPTER II

EPISTEMIC TRADITIONS

For any kind of philosophical or metaphysical investigation epistemology is necessary. If philosophical investigation aims at understanding the world as a whole, it must see that the means and methods it employs for understanding it are valid. A philosopher is not satisfied with mere knowing but knowing rightly. Epistemology has to be an integral part of philosophy in order to make any philosophy acceptable. Because of the important role of epistemology for any philosophical enterprise both in the East and the West, there has been a long epistemological tradition. Though the epistemological issues have been more or less the same in both the traditions, their approaches have been sometimes different in dealing with the issues. Broadly the whole epistemological tradition can be divided into Western and Indian.

(A) Western epistemological tradition

The whole Western epistemological tradition can be discussed by dealing with problems of epistemology, analysis
of knowledge, skepticism, and possibility of knowledge and also some major epistemic traditions like empiricism, rationalism, transcendentalism, and irrationalism.

Some epistemic considerations
(i) Problems of epistemology

There are three fundamental problems of epistemology. They are: (i) nature of knowledge, (ii) sources of knowledge, and (iii) limitations of knowledge. Under the first problem we study different conditions which are essential for any knowledge-claim. The objective behind this is to differentiate knowledge from belief. The second problem deals with the valid means of knowledge. There is much controversy among the epistemologists regarding the sources of knowledge, and this gave way to different epistemological schools, namely, empiricism, which accepts sense experience as the source of knowledge, rationalism, according to which reason is the source of knowledge, transcendentalism, which believes that both reason and sense experience are essential for obtaining knowledge, and irrationalism, which takes intuition, revelation, etc., as the sources of knowledge. Issues like the possibility of knowledge, knowledge of the past and of the future, and so on are studied under the third problem.
(ii) Analysis of knowledge

A rigorous exercise has been done by the recent epistemologists in order to provide sufficient conditions for any knowledge-claim. They hold the view that any piece of information in order to obtain the status of knowledge must fulfill certain conditions so that knowledge can be distinguished from mere belief. The central objective behind the "analysis of knowledge" is to evaluate the claims of the metaphysical dogmatists and the epistemological skeptics.

"Analysis of knowledge" in its rudimentary form first appeared in Plato's dialogues, viz., *Meno* and *Theaetetus*. Plato in his *Meno* holds the view that all forms of knowledge are a case of being acquainted with something in this or in some previous existence. Knowledge, Plato holds, is recollection. The state of mind produced by mere collection of previous knowledge is only a form of belief, which must be subject to repeated questioning for reinforcing it; and this in turn enables the person concerned to provide a rationale for his belief; thus belief attains the status of knowledge. In *Theaetetus* Plato argues against the identification of knowledge with true belief. For example, a jury may believe truly that a defendant is guilty, but not have sufficient evidence to claim knowledge. Hence, something more is required than just true belief and
that is, providing a rationale for true belief which will act as an evidence for justification. In recent times Russell, G.E. Moore, Wittgenstein, A.J. Ayer, Brand Blanshard, and Gettier are concerned with this problem. In general we can say that, until the time of Gettier, the epistemologists have accepted three conditions of knowledge. They are: (1) a truth condition; (2) an acceptance condition (which in turn includes belief condition); and (3) a justification condition. Let us analyse these three above mentioned conditions:

1. Truth condition

Any piece of information in order to gain the status of knowledge, in the first instance, must be true. If it is not true, then it turns out to be false and in turn cannot be regarded as knowledge. For example, if I know that my friend has a bank balance of rupees one crore, then it must be true that my friend has the bank balance of rupees one crore. If it is not true that my friend has the bank balance of rupees one crore, then I do not know that my friend has a bank balance of rupees one crore. If I claim to know, my knowledge claim is wrong.

It is essential to understand the meaning of truth. There are four important approaches to the
definition of truth: (i) correspondence, (ii) coherence, (iii) pragmatic, and (iv) redundancy.

(i) Correspondence theory: According to this theory, a proposition is considered to be true if it corresponds to a fact or a state of affairs. For example, if it is a fact that I have a car and if I say that I have a car, my statement is true because it corresponds with the fact or some existing situation. This kind of theory was explicitly expoused by G.E. Moore, Russell, and early Wittgenstein, and also suggested by Plato and Aristotle.

The demerit of this theory lies in the ambiguity of the word "correspondence". We are not clear in what sense the word "correspondence" is used. One cannot think of any kind of correspondence between a non-empirical proposition and actual state of affairs.

(ii) Coherence theory: Unlike correspondence theory, this theory holds that a proposition is considered to be true only when it coheres with a proposition or a set of well established system of propositions. By coherence we understand a relation among propositions and not a relation between proposition and something else which is not a proposition. This sort of view was suggested by Spinoza, Leibnitz, and Hegel and explicitly formulated by F.H.Bradley and Brand Blandshard.
The critics of this theory say that in coherence theory the truth of a proposition either guarantees or is guaranteed by the truth of a member or members of the set. This seems to be circular, for the critics, since coherence theory defines truth in terms of coherence where truth is already presupposed.

(iii) **Pragmatic theory**: This theory was developed in the writings of William James and John Dewey. According to this theory, a true proposition is that which works. The truth of a proposition is to be found in its practical consequences. William James extended the application of pragmatic analysis to religious phenomena. He is of the view that the criterion of religious truth is in no way inferior to that of truth in other spheres, and this is to be based on satisfactoriness of a religious belief to the believer. If it is asked, in what sense can the proposition that "God exists" be verified? James' response will be that this proposition may be considered true in so far as it provides the individual with "vital benefits", that is, it may satisfy the individual's religious and spiritual needs.

There are few objections against this theory. They are as follows: (1) The notion of "working" is ambiguous. (2) Untrue ideas also many a times work. (3) It involves relativism since what works for one may not work for another.
(iv) Redundancy theory: The theory was propounded by F.P. Ramsay who is of the view that one can always eliminate predicates like "true" and "false" without loss of meaning since they are semantically redundant. Thus, when it is said that "it is true that p" means the same thing as "p" and when it is said that "it is false that p" means the same thing as "not p".

From the above discussion regarding various theories of truth, it appears to us that it is not very easy to go beyond what Aristotle had stated regarding truth in his *Metaphysics*:¹

To say of what is that it is not, or of what is not that it is, is false, while to say of what is that it is, or of what is not that it is not, is true.

To conclude, we can say that knowledge requires truth, but it is very difficult to say whether it is truth derived from correspondence, or from coherence, or from sheer utility, or from some other means. What John Mackie suggested regarding truth is apt:²

To say that a proposition is true is to say that things are as they are stated to be by that proposition.

2. Acceptance condition

The next necessary condition for knowledge is acceptance. For example, if I claim that my Professor had
been to U.S.A. in 1992, but at the same time I do not accept it, then it amounts to saying that I do not know that my Professor had been to U.S.A. at that time, even if he had been to U.S.A. then. Hence, if I do not accept $p$, then it is tantamount to my not knowing $p$. If $s$ knows that $p$, then $s$ accepts that $p$. This acceptance condition automatically includes belief condition of knowledge. Thus the formula is $s$ accepts that $p$, if and only if $s$ believes that $p$.

Keith Leherer is of the view that it is better to accept acceptance condition than belief condition since it is true that an appropriate kind of acceptance is a kind of belief, but it is not true and appropriate to say that all kinds of beliefs are the requisite sort of acceptance.

3. Justification condition

Sometimes knowledge is not simply true belief since true beliefs are sometimes the outcome of some lucky guess work, and hence they cannot be considered as knowledge. There are cases where a groundless conjecture might be true and believed by a person, but still it does not constitute knowledge. Satisfaction of belief condition has to be appropriately related to the satisfaction of truth condition; and this gives way for the justification condition for knowledge. A true belief can be considered as
justified, if and only if it is based on good justifying reasons.

This way of thinking first appeared in Plato's *Theaetetus*. A jury may believe truly that a defendant is guilty, but he has no sufficient evidence to prove the belief and hence, his claim cannot be a knowledge-claim. In short, it can be said that knowledge is completely justified true belief or acceptance. Hence, the formula can be: "s knows that p", if and only if it is true that p, and s is completely justified in accepting that p.

But the above analysis has been disputed by Edmund Gettier. He gives a counter example to establish his standpoint. Suppose a teacher wonders if any member of her class possesses a car. She gets proper evidence from one of her students namely, 'X', that 'X' possesses a car and she has no evidence from any of her other students possessing a car. So, her statement that one of her students possesses a car is true. But the truth is, 'X' does not really possess a car though he showed all kinds of evidences either to deceive his teacher or raise his social status. On the other hand, it is 'Y' who actually possesses a car though he does not have any evidence to prove. Here, says Gettier, even though 'X' does not possess a car, still the statement of the teacher that one of her students possesses a car holds good since 'Y', her student, possesses a car. But her
statement is based on false justification since it is only her good luck that 'Y' possesses a car. So, actually the teacher has no knowledge of one of her students possessing a car.

In order to avoid the above difficulty, a fourth condition has been added by him: "justification without falsity". It means that our justification should not be based on any false statement. So, our final analysis of knowledge runs like this: s knows that p if and only if,

1. It is true that p,
2. s accepts that p,
3. s is completely justified in accepting that p,
4. s is completely justified in accepting p in some way that does not depend on any false statement.

(iii) Skepticism and possibility of knowledge

The epistemologists have taken for granted that there is knowledge; and having accepted the existence of knowledge, they have discussed other epistemological problems from various angles. But the skeptics questioned the very possibility of knowledge itself. They describe themselves as those who search for truth, but so far they have not found it. To a great extent all the problems of the theory of knowledge arise from skepticism and are discussed keeping skepticism in the background.
In the history of philosophy we come across two major forms of skepticism, namely, (i) systematic or methodological skepticism and (ii) philosophical or psychological skepticism. The methodological skepticism is positive in its approach. Here, the skeptic uses doubt as a means to arrive at certainty. Her doubt is genuine. Her doubt reaches the climax and comes to a point where absolute certainty is established. She tries to establish certainty because knowledge implies certainty. An uncertain information is no knowledge. So, certainty acts as a secure foundation. The best representative of systematic skepticism is Rene Descartes. After applying the method of doubt extensively, he arrives at an indubitable foundation for philosophy, namely, the "Cogito" or thinking, the starting point of certainty. Thinking implies thinker. Hence, he arrives at the formula, "I think, therefore, I am" ("Cogito ergo sum").

On the other hand, and in contrast to methodological skepticism, there is philosophical skepticism which denies the very possibility of knowledge. This kind of skepticism is based upon the ubiquitous chance for error. According to the votaries of this skepticism, we usually tend to overlook the possibility of error existing in our most trusted conviction which we term as certain knowledge. For them, it is possible that there is some kind of error.
underlying what we call true knowledge. This is the most fundamental and primary skeptical premise.

But the critics of skepticism are against the standpoint of philosophical skepticism. According to them, a wholesale and universal skepticism is untenable. They contend that we can be skeptical about a particular claim of knowledge, or knowledge relating to a particular branch, but we can not question the very possibility of knowledge itself. We know very well that, at least in some fields, we have certain knowledge, e.g., mathematics. Hence, wholesale skepticism is meaningless since there are no grounds for its acceptance. The critics of philosophical skepticism bring forth two important arguments to show the untenability of the skeptical position. They are (i) argument from polar concepts and (ii) argument from paradigm case. According to the first argument, there are certain words that go on in pairs; and in such cases one word obtains meaning in contrast to its opposite, e.g., real/unreal, knowledge/belief, doubt/certainty. In the case of doubt and certainty, the meaning of the word "doubt" is understood only with reference to the meaning of the word "certainty". Likewise, the paradigm-case argument holds that any given concept receives its meaning only when it is applicable to a certain instance. So, when one wants to claim that a particular claim to knowledge is dubious, then one is under
the commitment of saying that there is a particular claim to knowledge. This is how the skeptic loses his stand in accepting wholesale skepticism. Again, if it is understood that the above arguments are sound enough in proving certain and uncertain claims to knowledge, then the conflict between a skeptic and a non-skeptic is balanced. Gilbert Ryle correctly argues that the question of counterfeit does not arise unless there are some real ones. Likewise, the question of uncertainty does not arise unless there is something called certainty.

In recent times we have G.E. Moore and Wittgenstein, who are staunch opponents of philosophical skepticism which calls everything into question. According to them, it is impossible to have universal skepticism. But the sense in which skepticism is impossible for Wittgenstein is quite different from what it is for Moore. Moore rejects skepticism on the basis of common sense, and Wittgenstein, on the basis of notion of forms of life. Moore, in his article, "A Defence of Common Sense", gives a list of truisms conveying the truth of certain propositions. Common sense is not to be identified with a body of common knowledge or propositional knowledge. But it expresses our shared insights in recognizing what is obvious and what is not so. Though Wittgenstein did not fully agree with Moore's notion of common sense, he appreciated the tendency
which is implicit in such a notion. According to Wittgenstein, common sense understanding of the world is capable of solving, in serious philosophical discussions, problems concerning knowledge and certainty since it recognizes that philosophical problems are to be posed and answered within the limits of the world view. For him, common sense recognizes on the one hand the primacy of life and the way we live it and on the other hand it formulates the very ways of living our life as the yardstick, which functions as the standard to resolve all philosophical disputes. When we actually claim to know or imagine something to be or not to be, there is a foundation for such common insight which guarantees certainty. These insights are founded upon the various ways in which we live our life, that is, the forms of life which have their roots in our culture, in our practice, of judging and not in our reasoning or intellection.

So, what is implicit in the notion of common sense becomes focal in the notion of forms of life in the sense that it recognizes that human understanding and judgements are not possible in isolation. It requires an accepted common ground which we must share with other people. It is not reason or knowing, but a form of life that guarantees certainty. It also decides whether a doubt is genuine and reasonable or idle. It is our life in the context of which our certainties and doubts are determined.
If one considers the rationalist and empiricist tradition, one finds that certainty is seen in the first-person terms either as consisting in the immediately given sense experience (the empiricist option), or in the apprehension of clear and distinct ideas in a self-evidential intuition (the rationalist option). This exclusive emphasis upon the "knowing subject" made certainty a matter of first person possession. "Certainty" is something which is uniquely associated with the "knowing subject". My being certain about my having particular experience is a unique episode in my life; and whether I am really certain in having those very experiences is to be determined by me and by none else. Wittgenstein had already exposed this line of argument in *Philosophical Investigations*. Moore also exposes this first person epistemological account of certainty, though in a different way. He says that not only he knows with certainty the truth of a vast number of common sense propositions, but he also knows that other human beings too, likewise, are certain about the truth of those very propositions. Moore says that he is certain about these propositions precisely because others too share in these judgements. It is his participation with others that makes these propositions certain for each other.

The above idea of shared common beliefs on which certainty is based finds its fuller expression in the notion
of Wittgenstein's forms of life. According to Wittgenstein, in every situation where a claim to knowledge is established, there stands fast a corpus of propositions that are taken for granted. Such propositions form a kind of system that are presupposed. These propositions "stand fast" for all the participants in that situation. Seen in this way, certainty becomes an attribute of the common pattern of knowing, doing, and feeling. Certainty, thus, becomes a matter of sharedness.

Moore thought that the ground for the accepted meanings would be the common sense itself, whereas for Wittgenstein more adequate way for explaining the second person epistemological certainty would be that of forms of life. Moore's claim to knowledge of his truisms is still under the shadow of some doubt against which we need to provide a defence. But no such need arises in the case of forms of life because now what we have (presupposed anchored propositions), are neither true nor false and again they themselves are not objects of knowledge or certainty, but provide standards of knowledge and certainty. They provide us with a firm epistemic foundation which is pre-epistemological or pre-theoretical in nature. It is here that the history of epistemology was revolutionised.

For Wittgenstein, "epistemology presupposes pre-epistemology or knowledge presupposes pre-knowledge". The
general crux behind his argument is that whenever we claim to know or doubt, we are already equipped with a background of propositions which are not only beyond doubt, but even logically more fundamental than knowledge itself. They constitute a kind of "logical receptacle" within which all other language games of empirical and theoretical investigation occur.

A question may be asked: "What is that which equips these anchor-propositions which are at the background of all epistemic activity with certainty?" The answer is that it is the praxis. So, it is not a case of cognitive, but practical certainty. What constitutes the basic structure of knowledge and language is a set of practices.

The contemporary critics of skepticism like Hamlyn and Keith Lehrer bring out the untenability of wholesale skepticism in their own way.

Hamlyn strongly opposes skepticism saying that there is no one position that may be called "skepticism". He asks whether a skeptic knows when he says, "we never know anything." If the skeptic is positive in his reply, it leads him to self-contradiction; and if he is negative in his reply, then it robs the initial assertion of his point. But a skeptic may escape by not committing himself to any one position, but only questions the very possibility of
knowledge. But a skeptic who insists on questioning any claim to knowledge cannot escape in this manner from the critics who demand an answer of some kind. General skepticism seems possible in a theoretical sense as long as it remains negative, but it is difficult to maintain in practice. According to Aristotle, it is the mark of a foolish man to demand a proof for everything.

Keith Lehteer solves the problems of wholesale skepticism in a neutral manner. When the skeptics justify their position by bringing in the ubiquitous chance of error in all forms of knowledge, and hence, forms the most fundamental skeptical premise that is: If s accepts that p, then there is some chance that s is incorrect. Keith Lehteer comes forward with the argument that on the analysis of knowledge there is no possibility of having such a premise. He says that, even if s accepts that there is some chance that he is incorrect in accepting that p, nevertheless he may be reasonable in accepting p in addition. He says our fallibility is an insufficient basis for skeptical victory.

To quote Lehteer:3

Of course, what we accept may be wrong - we are fallible but if enough of what we accept is correct, then our justification will be undefeated and we will have knowledge. If we are sufficiently correct in what we say so that we can distinguish between when our acceptance in something is trustworthy and when it is not, then we may know that we think we do despite the risk of error that we confront.

44
(iv) Epistemological traditions

There are four positions with regard to methods of knowledge. They are: (1) empiricism, (2) rationalism, (3) transcendentalism, and (4) irrationalism.

(1) Empiricism:

Empiricism holds that, if there is any kind of knowledge of reality, it is derived from sensory experience and empirical use of reason. Knowledge is basically posteriori. It asserts that any justified assertion must be based on experience directly or indirectly. Even the axioms of mathematics and also first principles of logic are based on experience. For the empiricists, even the so-called a priori principles, like the law of causality, the law of contradiction, the law of identity, etc., are not really prior to, and independent of, experience, but are generalisations from it. For them, knowledge is always acquired and not innate.

Most empiricists are conceptual empiricists. According to them, all concepts are acquired through sense experience directly or indirectly. While simple concepts like sweet, colour, etc., are derived from direct experience, complex concepts like electricity, beauty, government, etc., are derived from experience indirectly.
Since the empiricists totally rely on experience for obtaining any kind of knowledge, the existence of trans-empirical things have been rejected by them on the ground that they are beyond any external experience.

Empiricism as a theory of knowledge can be traced back to ancient Greek thinkers like Protagoras, Gorgias, and others. In modern times it was revived by Bacon and followed by Gasendi. Empiricism received an articulate form only in the hands of John Locke.

The strongest form of empiricism is logical positivism. Its central tenet is verificational principle, according to which a non-analytic proposition remains meaningful, if and only if it is verifiable or falsifiable on the basis of sensory experience. David Hume and J.S. Mill may be considered as the forerunners of twentieth century logical positivism, the proponents of which include, Carnap and A.J. Ayer.

(2) Rationalism:

In contrast to empiricism, rationalism holds the view that knowledge is basically a priori. It is innate. The self is basically active and rational, and sensations are accidental to it. So, knowledge is actively produced by the self out of its inner ideas and they, in turn, provide us with necessary knowledge. Knowledge of the eternal is
possible by reason which is the essential nature of the self. Sensations and feelings cannot give us the knowledge of the real. The knowledge provided by the sense experience is always contingent and variable. Socrates and Plato were the earliest propounders of rationalism which received an articulate form in the hands of Descartes and Wolff.

(3) Transcendentalism

Kant's transcendental method came into picture as a reaction to Hume's extreme skepticism. Kant says that it is Hume's theory of causation which woke him up from his dogmatic slumber. According to him, all our knowledge of the world is probable. Kant challenges this view of Hume's.

Kant defines genuine knowledge as universal and necessary. But do we have such knowledge? To answer this, Kant goes on to examine the analytic and synthetic judgements. Though knowledge appears in the form of judgement, says Kant, not every judgement yields knowledge. Analytic judgements are those whose truth can be ascertained without reference to any experience or facts. They are a priori in nature. Here, the predicate of the judgement does not give us any new information. On the other hand, it only elucidates what is already contained in the subject. For example, "All bodies are extended," "A triangle has three
sides," etc. If a judgement is to qualify as knowledge, it must be synthetic, which adds to our knowledge. But, says Kant, not all synthetic judgements give us genuine knowledge though they give us some new information. Any ordinary kind of synthetic judgements is called by Kant as synthetic a posteriori judgement. Judgements like, "My house is green," "X is taller than Y," etc. which give us only probable knowledge fall under this category. Any knowledge claim demands apodictic certainty; and only synthetic a priori judgements can yield such knowledge since they possess both necessity and universality. Hume denied the existence or possibility of such judgements, but Kant never entertained any doubt regarding the possibility of such judgements. According to Kant, both in mathematics and physics we have synthetic a priori judgements. In mathematics we have propositions which are true not because of the definition of the terms, e.g. $7+5=12$. An analysis of the terms "7" and "5" would not reveal that they can be combined and their sum would be 12. Something more is involved in the predicate than the mere content of the subject. Even in physics we have propositions like "Every event has a cause" representing synthetic a priori judgement.

Kant made clear that we do have synthetic a priori judgement. But how does this happen? Kant answers this question by applying his unique transcendental method. We
can understand this method of Kant by his theory of sense perception, understanding, and the unity of self-consciousness.

Theory of sense perception:

Kant says that in order to perceive, we must have sensation, but mere sensations cannot form any knowledge. It will be mere modification of consciousness unless it is formed within spatio-temporal framework. Space and time are, thus, regarded by Kant as a priori preconditions for any experience by which every experience has spatial and temporal character. Space and time are recognized by Kant as forms of intuition. Hence, Kant contends that the "form" and "order" of experience are necessary and universal.

Theory of understanding:

According to Kant, the spatio-temporal organization of our experience is necessary, but not sufficient to form any judgement. In order to make judgement about experience, there must be a priori preconditions which can organise the unrelated and disconnected percepts. These a priori preconditions are called by Kant as "the categories of understanding or pure concepts" and "logical functions of judgement". Without these pure concepts we will be mere spectators. Knowledge would be impossible without the cooperation of sensations
and perceptions and understanding on the other. These two preconditions of knowledge are functionally different, but supplement each other. Kant aptly says: "Percepts without concepts are blind and concepts without percepts are empty."

The unity of self consciousness:

Kant's transcendental method culminates in his doctrine of the transcendental unity of apperception. This unity of self-consciousness is presupposed by the categories, the way the categories are presupposed by experience. There could be no knowledge and no connected world of experience without a unifying consciousness which operates with the categories.

The essence of Kant's transcendental method is the argument from experience to its necessary presuppositions. For Kant, knowledge begins with experience, but does not arise from experience.

The whole transcendental method of Kant is confined only to phenomena (things as they appear to us), but not noumena or things-in-themselves. According to Kant, we cannot transcend our experience. Knowledge involves perception, but things-in-themselves cannot be perceived by the senses. They cannot be intuited by the intellectual intuition since we do not possess intellectual intuition.
If we apply categories to things-in-themselves, we cannot justify their claim to validity since perception can afford no evidence of the application of the category. So, essentially things-in-themselves are unknowable because of the limitation of our faculties of knowledge. But it does not imply, argues Kant, that things-in-themselves are non-existent. Unknowability of a thing does not necessarily imply its non-existence.

Kant applies the same argument in the case of metaphysical concepts like God, soul, and so on. The reason why we are not able to discover any metaphysical knowledge is that we have no means of ascertaining it since the forms of intuition (space and time), the logical functions of judgement and categories cannot be applied only to the phenomenal world or the realm of possible experience. When we attempt to proceed from the necessary knowledge of the phenomena to the necessary knowledge of the noumena, says Kant, either we end up in logical fallacies or self-contradictory conclusions.

(4) Irrationalism:

Irrationalism as a method of knowledge can be well understood in contrast to rationalism. (Here, rationalism is not to be taken as a priorism, but as anti-irrationalism). While rationalism declares the cult of
rational knowledge, that is, knowledge gained in a natural way by the help of intellect, irrationalism believes that knowledge is gained by super-natural sources like intuition, insight, revelation, faith, etc. In short, irrationalism lays its belief in the cult of emotion.

Mathematics and natural sciences act as paradigms for valid cognition in the case of rationalism. It is against the kind of cognitions derived from revelation, divinations, prophecies, etc. But, on what basis is a scientific cognition distinguishable from unscientific cognition? Perhaps, a scientific cognition has two characteristic features. They are: (i) It can be communicated to others in words normally understood; (ii) its correctness or incorrectness can be decided in principle by anybody provided the appropriate external conditions are conducive to him. It short, a scientific cognition is that which is intersubjectively communicable and controllable. The main objective in recognizing such a kind of cognition is to protect the society from being victim to meaning-less cliche and untestifiable principles. In other words, it attempts to protect the society from non-sense and falsehood.

But a deeper scrutiny reveals to us the fact that scientific cognition suffers from inadequacies in giving
extra importance to intersubjectivity. Is it ever possible to achieve total intersubjectivity? We fail to communicate totally about certain personal experience, e.g., pain. Even with reference to the experience of a colour or taste one cannot communicate in full measure to the other person. One has to have direct experience to have a total picture of anything.

The opponents of rationalism, i.e., irrationalists, oppose rationalism on the ground that "rational cognition is schematic, abstract and lacks intimate contact with the object." According to irrationalism, completeness in cognition is possible only when there is direct or immediate contact with the object. For them, total cognition remains inexpressible intersubjective words. The upholders of irrationalism hold the view that knowledge of many things (specially of things trans-empirical) is possible by intuition revelation, faith, etc., but of course, they recognize the significance of rational cognition for practice and action.

The representatives of irrationalism appear very early in the history of thought. Mystics, prophets, and saints of all lands and many religions, belong to this trend. They have some unique and peculiar kinds of experiences relating to God's existence in their mystical states. They claim their experiences to be most authentic.
since it is their own direct intuitive experience of the reality. They are so much convinced of their subjective certainty that they are not shaken by their opponents. The mystic experience, according to them, has explored new horizons and new vision of the world. And this made their lives meaningful and valuable.

In recent times, the main representative of irrationalism is the French philosopher, Henri Bergson. He opposed rationalism vehemently. According to him, the rational cognition, which is based on analysis, cannot give us the total picture of the reality, but intuition, which is inexpressible in words, enables us to know the reality itself. In fact, for him, intuition is the only source of knowledge which can grasp the dynamic aspect of the reality. Reason which, by its very nature, is a dividing and discursive principle, can provide us with knowledge of the static aspect of the reality. He defines intuition as "the kind of intellectual sympathy by which one places oneself within an object in order to coincide with what is unique in it and consequently inexpressible." For Bergson, reality is really dynamic in nature. It is the elan vital, a continuous flux and flow. So, only intuition, or what he calls intellectual sympathy, alone can grasp such a reality which can penetrate into the heart of the reality, but not reason which can only staticise what is really dynamic.
Intuition as a source of knowledge is understood as direct apprehension of knowledge, which is not a product of conscious reasoning or immediate sense perception. Sometimes intuition is also expressed as "immediate feeling of certainty", "imagination touched with convictions", "a total response to some total situation" and a "direct insight into truth". By intuition, George Santayana means our awareness of all immediate data of consciousness. The upholders of intuitionism hold the view that there is an element of intuition present in all knowledge. Even in rationalism and empiricism we do come across discussions regarding intuitive knowledge though the approach is a little different. Bradley, who belongs to the trend of rationalism, contends that, if the absolute reality is subject to mere intellectual analysis, it can represent only a partial aspect of truth. Reality, in its totality, can be grasped only by "experience" which is suprarational or alogical.

But there are some thinkers who are opposed to intuitionism, which can include any kind of supranatural experience. Kazimierz Ajdukiewicz, anticipating dangers in irrationalism, thus comments: 4

However, the voice of the rationalist is a sound social reaction, it is an act of self-defence by society against the dangers of being dominated by uncontrollable forces among which may be both a saint proclaiming a revelation as well as a mad
man affirming the products of his sick imagination and finally a fraud who wants to convert others to his views for the sake of his egoistic and unworthy purposes. It is better to rely on the safe but modest nourishment of reason than, in fear of missing the voice of "Truth", to let oneself be fed with all sorts of uncontrollable nourishment which may more often be poisonous than healthy and beneficial.

I feel this view of Ajdukiewicz should be subjected to careful scrutiny. Chapter Five "Epistemology of Mysticism", which in general deals with the arguments in defence of mysticism will answer the critics like Ajdukiewicz.

(B) Indian epistemological tradition

Parallel to epistemology in Western philosophical tradition, we have pramāṇa-sāstra in Indian philosophy. But what do we mean by pramāṇa? According to Matilal, "A pramāṇa is the means leading to a knowledge-episode (pramā) as its end." Evidence of our knowledge-claim is automatically related to the question of sources of knowledge. There are six recognized sources of knowledge in Indian philosophy. They are: (i) pratvākṣa (perception), (ii) anumāna (inference), (iii) upamāṇa (comparison), (iv) sabda (verbal testimony), (v) arthāpatti (presumption), and (vi) anupalabdhi (non-existence). But all the pramāṇas are not recognized by all the schools of Indian philosophy except perception. Perception has been recognized as the jyeṣṭha pramāṇa (first pramāṇa) by all the schools of Indian
An element of empiricistic tendency either in its strong or weak form is found in all the schools of Indian philosophy. The strong form of empiricism holds that all our theoretical and objective knowledge has an observational basis, and the weak form of it claims that all our knowledge must begin with sensory experience. B.K. Matilal wishes to call the pramāṇa theorists as empiricists as they were engaged in rejecting the skepticism of the Indian dialecticians like Nāgūrjuna and Jayarāśi who denied the possibility of knowledge. All the pramāṇa theorists unanimously agree that no knowledge is possible independently of some perceptual basis. Even scriptural knowledge is regarded by some pramāṇa theorists as ultimately based upon the direct experience of the āptas (trustworthy persons).

Anumāna (inferential reasoning, both deductive and inductive) has been recognized as one of the valid sources of knowledge by all the schools of Indian philosophy except Cārvaka. Many a time even upamāna (comparison) and arthāpatti (presumption) are subsumed under inference. It will not be wrong to say that there are only three major important pramāṇas in Indian philosophy, namely, perception, reasoning, and verbal testimony.

The Nyāya-Vaiśeṣika, being a thorough-going realistic system, believes in the objective order of reals
(objects) external to, and independent of, the "knowing subject." All forms of knowledge have an unerring objective reference. There can be no knowledge without having real objects prior to the possibility of any knowledge. The Nyāya account of knowledge episode involves three factors: (1) the object (vīgaya), (2) the subject (vīsayi), and (3) the self-linking relation (svarūpasambandha). The Naiyāyikas define knowledge as the manifestation of an object to a subject. Self is the inherent cause of knowledge. Knowledge essentially inheres in the soul-substance, but it is not the essence of the self.

The Nyāya school accepts four pramāṇas, namely, perception (pratyakṣa), inference (anumāna), comparison (upamāna), and verbal testimony (śabda). It gives a broad classification of perception, i.e., ordinary (laukika) and extra-ordinary (alaukika). Under ordinary perception it recognizes two forms of perception, viz., internal and external. All our experiences of pleasure and pain come under internal perception; and all our perceptions through five sense organs come under external perception. Different forms of intuitive perception come under extra-ordinary perception.

Inferential reasoning is one of the pramāṇas accepted by the Nyāya school. It has not only applied this
pramāṇa in obtaining the knowledge of the world but also it has extended rational arguments in proving the existence of God. The rational theistic arguments formulated by the Naiyāyikas are questioned by the Advaita school to show the limitation of rational arguments. It holds that no conclusive truth can be arrived at by mere reasoning.

Śruti has been accepted by the Naiyāyikas just by courtesy. The whole philosophical system of Nyāya is mostly based upon logic.

There has been conflicting opinions regarding the role of reason and revelation in Advaita thought. Sometimes it is felt that Advaita constitutes the culmination of the development of philosophic reason in India; and again some appreciate this system on the ground that it affords the highest satisfaction of mystical impulse. A deeper study is required in order to understand the place of reason and revelation in Advaita.

First of all, one has to raise the question whether Advaita as a philosophical system is based purely on reason or revelation. It is a well-known fact that Advaita has inherited its basic epistemological stand from the Upaniṣads. Having recognized the necessity of methods of approach to the reality, the Upaniṣads view that Brahman or Ātman, the ultimate principle, must be apprehended by
śravāṇa, manana, and nididhyāsana. Advaita, following the Upaniṣads, has recognized these three steps. Śravāṇa represents an element of authoritarianism in Vedānta since it stands for assimilation of traditional knowledge by the process of hearing which is embodied in the sacred texts. Manana stands for reason or reflection. Nididyāsana stands for meditation or contemplation on the truths received through śravāṇa and established through manana. It must culminate in aporakṣānubhūti or immediate experience of the reality; and this represents the mystical element, the higher transcendental empiricism, in Advaita. Roughly, it can be said that Advaita has recognized authoritarianism, rationalism and mysticism as methods of knowledge. Of course, it has recognized sense experience as a source of knowledge to things empirical.

Saṅkara, in his Brahma-sūtra-bhāṣya, raises the question regarding the means of understanding the real, and for making the assertion that Brahman is the ultimate cause of origination, sustenance, and annihilation of the world. He is of the view that causality of Brahman cannot be established by reason as done by Naiyāyikas by the sruti.

Again, Saṅkara in his commentary on the Bhagavad-gītā says that there are two things which can be known only by revelation, namely, dharma and Brahman. Brahman which is
a super-sensuous entity cannot be known by perception; it cannot be known by inference also since it is completely transcendent. In one way it can be said that Brahman is known because it is all-pervasive and is everything, but at the same time it is not known because of its unobtrusiveness. Hence, it is different from both known and unknown. Because of its unique nature it is not known by any other prāmāṇas except śrutī. The authority of scripture is accepted only in things relating to the super-natural. In knowing things of the empirical realm, other sources of knowledge should be taken into consideration. If scriptural utterances do not contradict our experience and what is conveyed by them is capable of being known by empirical observation, then scriptures constitute the authority. Again, our acceptance of the authority of scriptures depends upon our application of thought and logical rules of interpretation in order to arrive at its final import. Hence, Advaita does not accept śrutī blindly. Even scriptures themselves recognize the value of reason. It also declares, "One sees by the sharp intellect". This is the reason why manana has been given much importance by the Upaniṣads. Reason has twofold function: (1) to remove the improbability about the statements and (2) to remove the contradictions. Truly speaking, there is no contradiction between reason and revelation. They are not contradictory, but in fact complementary provided we understand them
reasonably. According to Advaita, while intuition of the real is given to us by śrutī, reason helps us to understand the śrutī properly.

Śaṅkara further says that scripture alone is not the source of knowledge regarding Brahman. Anubhava as well as scripture, is the source of knowledge regarding Brahman. Since Brahman is an existing thing, knowledge of Brahman must culminate in experience. According to him, anubhava of Brahman means the realization of oneself as Brahman. He also says that whether a man has knowledge of Brahman or not is to be judged by one's own heart's conviction alone.

The various pramāṇa theories of classical Indian philosophy came into existence as a reaction to the skeptical challenge that knowledge is impossible. The skepticism which appeared before the rise of philosophical systems in India is originally directed against the knowledge-claims regarding moral, religious, and eschatological matters. Skepticism about metaphysical truth-claims and moral principles gradually paved way to skepticism about the possibility of any knowledge. Nāgārjuna, the great exponent of Mādhyamika Buddhism initiated a systematic skeptical challenge to a theory of knowledge which tries to form a notion of "knowledge" and "knowables" by referring to various means of knowledge.
(pramāṇa). The skeptical dialecticians of India tried to show the hollowness of the very concept of knowledge and knowable so that alternative ways of arriving at certainty either through reason or experience are inadequate. The main objective behind their skepticism is to demonstrate the futility of reason when it is pursued rigorously and led beyond the limits of possible experience as it ends up in contradictions.

The pramāṇa theorists believe that senses initially provide us with knowledge and hence knowledge is grounded on the most direct sort of evidence. But the skeptics challenged this. According to them, there is an inherent conflict between data of experience and reason; and this leads to skepticism. According to Nāgārjuna, the standards which we need to measure others are themselves to be measured.

The pramāṇa theorists create a common front against this onslaught of radical skepticism. They emphatically hold the view that, whatever exists, is knowledge or knowable. They speak of empirical and non-empirical knowledge. While empirical knowledge is obtained by ordinary means of knowledge, non-empirical knowledge is obtained by intuition (pratibhā) and scriptures.