**INTRODUCTION TO LOGIC AND PHILOSOPHY BY DR SOCRATES EBO, FEDERAL UNIVERSITY OTUOKE.**

**CHAPTER ONE**

**ORIGIN AND MEANING OF PHILOSOPHY**

**The Origin of Philosophy**

The origin of philosophy is rooted in the origin of the state. The state is not a mere assemblage of people upon a certain territory. It is an assemblage of people upon a certain territory *with a purpose which is to live the good life.* The good life according to a people is always determined and defined by their ideology implicitly and explicitly. The totality of the laws, the morals and the cultural practices of a people are a function of their ideology. Philosophy and religion are at the service of ideology. Philosophy and religion are same enterprise with different methodologies. Both of them aim at the preservation of the ideology and purpose of the state. Sometimes the attainment of the purpose of the state requires a fundamental change or a modification in their ideology. Philosophy does this easier than religion for philosophy is by methodology amenable to change while religion is by methodology resistant to change.

The diverging point between philosophy and religion is that while philosophy seeks the realization of the good life for the state relying solely on reason or rationality, religion seeks the good life for the state relying solely on faith in a given revelation. The reliance of religion on revelation which is a temporal event of a certain era makes it resistance to change for revelation is not a continuous event. It is not dynamic. Revelation once documented cannot be altered. Hence any event unforeseen by the revelation becomes an automatic source of tension to the religion that results from such a revelation. Philosophy on the other hand is open-ended and dynamic. It does not lay claim to any revelation or any doctrine as the final truth. Philosophy indeed, celebrates change and responds to any new event with a new philosophy.

Much of the history of philosophy is the history of the tension between philosophy and religion. They are like the two opposite ends of a straight line. The crux of the tension is the interpretation of truth. For religion, truth is static; it is a revelation; "as it was in the beginning, it is now, and ever shall be". Philosophy on the other hand, sees truth as dynamic. The cosmos is characterized by change. The truth about the cosmos must necessarily be characterized by change.

To the question, what is philosophy? The answer may be like: philosophy is the enterprise at the service of the society that seeks the truth about the good life and the cosmos using the sole power of reason. By stating that philosophy is an enterprise, it is hereby emnmmphasized that it is a deliberate endeavor. By stating that it is at the service of the society, it is hereby emphasized that philosophy does not happen in vacuum. Philosophy is not an abstract exercise but a community endeavor that is at the service of the society. Philosophy seeks the truth about the good life for the state exists essentially to live the good life. The organization of the state reflects its understanding of the good life. Philosophy seeks to prescribe for individuals as well as the state, the conducts that would guarantee the good life. Philosophy seeks the truth about the cosmos. Philosophy is ambitious of interpreting the cosmos in bits and as a whole. Whenever, the interpretation of a particular aspect of the cosmos becomes too complex and too technical for philosophy to handle while attempting to understand the cosmos as a whole, philosophy leaves it for a branch of science. It rather relies on the information provided by specialists in that field of science and places it in perspective in its interpretation of the cosmos.

To be able to live the good life, man must know his place in the cosmos for he is a part and parcel of the cosmos. It is in the cosmos that he has his being. His fate is tied to the fate of the cosmos. If the cosmos is a divine project intended for a divine purpose, man has to discover this divine purpose, interpret it, understand it and attune his life to it. It is the position of religion that the cosmos is a divine project. History however shows that the priestly class has always claimed the monopoly of the knowledge, interpretation of this divine purpose. They normally claim a revelation of this purpose to one of their own who they variously refer to as founder, demigod, a god or a prophet. In some religions, this revelation is written down and taken as the final authority. Hence, they suppress any ideology which is inimical to their interpretation of the cosmos or their revelation.

Philosophy on the other hand rejects revelation entirely. Even when philosophers hold that the cosmos is a divine project, they do not bequeath the interpretation of the nature and purpose of the project to any revelation or the priestly class. At all times they hold the project discoverable and accountable to reason. Philosophers have not always attributed the cosmos to a god. Sometimes, they attributed the cosmos to nature, and to the tension and chagrin of the priestly class interpreted the cosmos accordingly.

Philosophy is said to have originated in Miletus in the present day Greece. The first philosopher was said to be Thales of Miletus. But these assertions are actually Western biases. Thales himself admits that he travelled to Egypt to be tutored in philosophy. If Thales went to Egypt to learn philosophy, it meant there must have been a school of philosophy in Egypt. There must have been teachers and students of philosophy in that school. Therefore, Thales could not have been the first philosopher in recorded history. It should rather be said that Thales was the first recorded philosopher in the Western world. The 'West' here means Western Europe and North America (U.S.A and Canada).

Rather than Miletus popularly touted by the Western bias, formal philosophy actually originated in Egypt. Until the destruction of Egyptian culture by the Islamic revolution in the seventh century, the coastal town of Alexandria which was then the capital of Egypt flourished in culture and learning. The school of Alexandria was a flourishing hub of learning. It is a tragedy that most of the writings housed in Alexandria did not survive the vicissitudes of history. Philosophy and science had been indeed flourishing in Egypt long before Thales philosophized in Miletus. The eclipse of the sun which Thales predicted was an art he learnt in Egypt. The Egyptians measured the length of pyramids by measuring the shadow it cast at the time the shadow cast on the body is equal to a person's height.

Unlike Europe where the philosophic exercise was individualistic, in Egypt it was rather communal. In the history of Western Philosophy, philosophers strive to personalize the philosophic enterprise. There are frequent cases of individuals modifying communal knowledge in a bid to personalize the credit. For instance, the assertion that all things came from water was a common assumption at the time of Thales, yet he personalized it. In African Philosophy however, knowledge is viewed as a property of the community. There were no such attempts at personalizing the credit for knowledge which is there in the community. Even when such knowledge is modified or improved upon, it is done for the community. It is not presented as a new idea by an individual. But the reverse is the case in the Western of tradition. The communal nature of African philosophy deprived it of the kind of individualism that characterized philosophy in the Western tradition. It was this kind of individualism that gave Thales credit of originality for merely writing down what the community already believed. The second factor that downplayed Egyptian philosophy was the burning of books in the Alexandrian libraries by the conquering Mohammedans who overran Egyptian culture. The destruction of Alexandrian writings and the absence of the art of writing in most African literary traditions led to the collapse of the communal credit mode knowledge transmission and the subsequent success and supremacy of the Western individualistic model which is use today.

Again, the student must be conscious and wary of the bias in Western literature. The experience of slavery and colonialism led to the degrading of everything African. Colonial literature viewed Africans as inferior humans who are incapable of philosophy. Hence the Western bias in ascribing the origin of philosophy to Greece rather than Egypt despite overwhelming literary evidence. Every author writes from a value system, and for an audience. Therefore, the bias of the value system and his audience will invariably filter through the writing. It is not surprising therefore, that most books written by Western philosophers attribute the best of philosophy to the West.+

**Meaning of Philosophy**

The term 'philosophy' was coined by a philosopher-mathematician known as Pythagoras. He form the term from two Greek words: 'philos' which means love, and 'sophia' which means wisdom. So philosophy literally means love of wisdom. It is pertinent to note that formal philosophy has existed for hundreds of years before Pythagoras gave it that name. In other words, he was not the first philosopher. He merely renamed a phenomenon which has been in existence. Philosophers who existed before him must have known philosophy by a certain name, certain names or some description. In Pythagoras' era, superstitious beliefs held sway. Philosophy was the much needed wisdom that would enable one to extricate oneself from the web of superstitions around which the conventional order has been woven.

Philosophy can mean different things in different contexts. For instance, everyone has a *philosophy* of life. In this context, philosophy means a set of principles or values that guides one's life. In the bible, Paul charges his audience to beware of *philosophy*. In this concept, philosophy means atheism and anti-Christian way of life. Sophistry and argumentativeness are sometimes termed as *philosophy*. Philosophy is in certain quarters regarded as stargazing and bandying of meaningless abstractions.

But philosophy is an inquiry. It is methodic and rational inquiry into the ultimate causes of things. Philosophy goes beyond the face value of things and investigates their root causes. Philosophy analyses the relationship between things and the language of the investigation itself. The subject of matter of philosophy is reality. Therefore, philosophy investigates the ultimate causes of reality. Philosophy asks the question of "why" and "how". It is the ambition of philosophy to give interpretation to reality as a whole. While different fields of study concern themselves with specific aspects of reality, philosophy concerns itself with reality as a whole. Biology may explain in the parts of the human body in detail but it can never explain why the human body has its form in the first place. Biology cannot why humans have a will and consciously make choices. It cannot explain what life is neither can it pinpoint the actual location of life in the body. Biology cannot address the question whether man has a soul or not. It cannot answer the question whether life has a purpose or whether it is a meaningless exercise of chance. Philosophy attempts to address these questions in other to give humanity a deeper understanding of existence.

**CHAPTER TWO**

C**ATEGORIZATION OF PHILOSOPHY**

For a better understanding, philosophy has been categorized into five branches. These divisions are not dogmatic as such. The divisions were made to enhance the understanding.

**Branches of Philosophy**

There are five branches of philosophy. They are:

Metaphysics

Epistemology

Logic

Ethics

Aesthetics

**Metaphysics**

The term 'metaphysics' comes from two Greek words, 'meta' which means 'after' and 'physika' which means 'physics'. It was coined by Andronicus of Rhodes who was the editor of Aristotle's works. Andronicus was at a loss on what to call the part of Aristotle's works which come after Aristotle's works on physics, as arranged in the book he was editing. So he called those works *'ta meta ta physikabiblia'*, that is, *the books after the books on physics*. That was how the term 'metaphysics' came to be.

Metaphysics is the branch of philosophy that studies being. Being in this sense can be regarded as existence as an entity. Therefore, metaphysics studies existence holistically. It studies existence as an entity. Metaphysics studies the cosmos and its content. Metaphysics is divided into two: cosmology and ontology.

Cosmology is the branch of metaphysics that studies the origin and the structure of the universe. It asks such questions as: what is the origin of the world? What is the nature of the cosmos? Does the world have a beginning or an end? Can the universe last forever? Has it any cause or is it an independent z

Ontology however, studies categories of being. It studies issues about being and modes of being. Ontology asks such questions as: What is life? What is the nature of man? What is the relationship between the mind and the body? Do we survive death? Is the mind spiritual or physical? Does man have a soul? Does it survive death? Is there anything like a god or God? Etc.

**Epistemology**

The term 'epistemology' comes from two Greek words 'episteme' which means 'knowledge' and 'logos', which means 'study'. It is the branch of philosophy that deals with the theory of knowledge. It studies the nature and extent of human knowledge. Epistemology asks such questions as: What is knowledge? What is truth? What can be known? Is knowledge possible? Epistemology seeks to know the difference between appearance and reality. It seeks to distinguish knowledge and opinion; and truth from belief. Epistemology also seeks to know whether the mind gives us an accurate picture of the world or whether it adds its own nature to knowledge of the world it gives us. Epistemology seeks to know the source of human knowledge.

There are three schools of thought in epistemology. The rational school of thought or rationalism believes that knowledge can be got only through reason. But the empirical school of thought or empiricism believes that knowledge can be got only through the senses. However, the skeptics or skepticisms believe that nothing can be known for certain. For the skeptics, certainty is an illusion.

**Logic**

The term 'logic' comes from the Greek word 'logos' which can be translated into reason, word, study or rationale. But in the philosophic sense, the term 'logic' denotes rationale, justification or reason. The term 'logic' was introduced in philosophical discourse by a man called Zeno. Logic is the science of thought. It is the study of the laws of correct reasoning. It is the art that guides reason on the path of truth. The term 'logic' connotes reason, rationale, justification and study because reasoning is all about providing justifications or rationales. Reasoning is done with words and communicated in words.

There is an inherent order in nature. That order is the logic of nature. There is an inherent order in reasoning. That order is logic. There cannot be any thinking without reasoning. There cannot be any reasoning without logic. Logic is that order upon which reasoning operates. If thinking is orderly, we say it is logical and rational. If thinking is disorderly, we say it is illogical and irrational. The thinking mind is guided by the order called logic. When the logic of the mind is faulty, the individual goes astray in errors.

Logic is a systematic process of reasoning that establishes the cause of a conclusion or the justification for truth. Logic is the science that studies reason. Every field of science is the study of the logic that particular field. That is, the product of logic as applied to that field. That is why almost every field of science has the suffix '-logy' affixed to it. Suffix '-logy' stands for logic. It is the application of logic to that field that makes it scientific.

Logic is divided into two: material logic and formal logic. Material logic deals with the logic that obtains when the conclusion obtained from the process of reason is correct and also true as things are in the world. Material logic demands that the conclusion be correct and also factually true.

For instance,

All mammals reproduce.

Man is a mammal.

Therefore, man reproduces.

Formal logic deals only with the correctness or coherence of the conclusion arrived from the process of reasoning. Unfortunately, an argument can be correct without being true. For instance,

All US presidents live in the Whitehouse.

Michelle Obama lives in the Whitehouse.

Therefore, Michelle Obama is a US president.

The argument above is coherent but untrue. Formal logic is solely concerned with the conformity to the rules of logic. But material logic is concerned both with the rules of logic and the truthfulness of the products of logic.

**Aesthetics**

Aesthetics and ethics are sometimes grouped together as a branch of philosophy called axiology. Aesthetic is the branch of philosophy that studies beauty. It deals with what appeals to the eyes and the ears. It asks such questions as: What is beauty? What makes a thing beautiful? What are the properties or nature of beauty? Aesthetics studies the works of art. The term is derived from the Greek word, 'aesthet-ikos' which means perception. Axiology is derived from two Greek words 'axia' which means value or worth, and 'logos' which means study.

**Ethics**

The term 'ethics' comes from the Greek word 'ethos' which means custom or habit. Ethics is the branch of philosophy that studies the principles of human action. Ethics deals with the morality of human actions. It deals with values of good and evil. Ethics is preoccupied with prescribing the values that will enable man live the good life. Ethics investigates the principles behind the norms and conventions of the society.

**Methods of Philosophy**

Just as there are five branches of philosophy, there are also five methods of philosophy or approaches through which a philosopher can embark on philosophical inquiry in any branch of philosophy. These methods are not branches of philosophy but styles through which a philosopher can philosophize in any branch of philosophy. They are: speculative, analytic, prescriptive, hermeneutic and phenomenological method methods.

**Speculative Philosophy**

This involves system building. It is the method of philosophy through which a philosopher establishes a grand principle and builds a system of philosophy on it. The philosopher makes hypothesis of possible sequence of events based on the established principle. Plato's dualistic system of knowledge was built on the principle of forms.

**Analytic Philosophy**

The analytic method of philosophy is employed by philosophers who approach philosophical issues by breaking down complex systems into simple propositions. It involves analyzing the language of the issues in contention into simpler forms.

**Prescriptive Philosophy**

This is the method of philosophy usually employed in discussing ethical issues. It involves philosophers prescribing what ought to be done and what ought not to be done.

**Hermeneutic Philosophy**

This is the method of philosophy employed by philosophers dealing with complex issues of language, especially when the meaning of a word depends on the meaning of another word and the meaning of that other word depends on the meaning of the earlier word. It is the method favoured by philosophers who embark on the interpretations of thorny philosophical issues. An element in a text can depend on the understanding of the entire text while the understanding of the entire text presupposes the understanding of that very element. For instance, one cannot understand clearly, a particular event in a crisis without understanding the whole situation. But one cannot actually understand the whole situation without understanding the particular events that constitute the situation. Hermeneutics deals with paradoxes like this.

**Phenomenology**

The phenomenological method of philosophy involves suspending all previously held biases and ideas and describing the contents of consciousness are they appear to the consciousness. This is the method of philosophy used in investigating subjective experiences.

**Dimensions of Philosophy**

Just as philosophy has branches and methods, it also has dimensions. The dimensions of philosophy as like the trajectories of philosophy. They are the applications of philosophy to other disciplines. Popular among them are: the philosophy of law, the philosophy of science, the philosophy of mathematics.

**Philosophy of Law**

The philosophy of law studies the philosophical foundations of law, the justice or otherwise of law, the purpose of law and the limitations of law. While lawyers interpret laws and judges make judgments on interpretations, the philosopher of law asks questions on the propriety of the law itself. Philosophy of law asks such questions as: Who has the power to make laws? What makes a pronouncement a law, it because it has been pronounced thus by someone in authority of because it is just? What is the relationship between law and justice? Is the law made for man or man made for law?

**Philosophy of Science**

The philosophy of science studies the philosophical foundations of science. It critiques the scientific method and sets values for science. The products of science affect man. Philosophy of science delves into the argument whether science should flourish unchecked or whether it should be controlled lest it destroys man. Don't forget that the atom bomb is a product of science.

**Philosophy of Mathematics**

Philosophy of mathematics critiques the theorems of mathematics.

**CHAPTER THREE**

**HISTORY OF PHILOSOPHY**

The history of philosophy is shrouded in controversy. The reason is that what is normally taught to students as the history of philosophy is actually *the history of Western Philosophy.* But the history of philosophy is much more than the history of Western Philosophy. Western Philosophy is a genre among the many genres of philosophy. There is African Philosophy. There is Oriental Philosophy which encompasses Chinese Philosophy, Indian Philosophy and Japanese Philosophy. All these philosophies have their unique histories which ought to be incorporated in the history of philosophy as taught in the colleges.

The history of Western philosophy is divided into three:

Ancient Philosophy

Medieval Philosophy

Modern Philosophy

Contemporary Philosophy

**Ancient Philosophy**

The history of ancient philosophy is subdivided into two: the Pre-Socratic and the Socratic periods. The Pre-Socratic era is the period in the history of ancient philosophy before the emergence of Socrates. The Socratic era is the period in the history of ancient philosophy that spans from the emergence of Socrates to the emergence of the medieval period.

**Pre-Socratic Philosophers**

Pre-Socratic philosophers were called ustuff philosophers. They were generally looking for the substance that could explain the cosmos. Their focus was cosmopocentric.

**Thales**

Thales of Miletus held that the cosmos has its source in water. He is said to be the first recorded philosopher in Western history. But bear in mind that Thales himself said that he was educated in Egypt. That means, philosophy emerged in Miletus, it already flourished in Egypt. For, Thales, everything is moist. Therefore, water must have been the cause of the universe. Thales heralded the theory of evolution by saying that human beings originated in water. He held that humans must have existed in water in a form different from their present day form as they couldn't have survived in water. Thales held that the world was round but flat like a disk.

**Anaximander**

Anaximander reasoned that whatever that could be cause of the multitude of things in the cosmos must be unique. It must be indeterminate. Therefore, Anaximander postulated that the boundless which is also called the apeiron is the cause of all things.

**Anaximenes**

Anaximenes theorized that everything was made from air. For him, air was the primary substance from which all things were made. Anaximander said that the multitude of things were made from air through the upward and downward movements of air. The upward movement of air, he called rarefaction. Explaining rarefaction, Anaximenes said that when earth is heated, it becomes water. When water is heated, it becomes moisture. When it is further heated, it becomes air. Anaximenes called the downward movement of air condensation. When air is cooled, it becomes moist. When it is further cooled, it becomes water. When could further, it becomes earth.

**Pythagoras**

Pythagoras said that everything was made of numbers. By numbers, he meant both numerals and geometric shapes like squares, triangles, rectangles, circles, cones, etc. Pythagoras imagined these things to be real things instead of abstractions.

**Heraclitus**

Heraclitus of Ephesus believed that everything was in a state of flux. He reasoned that the cosmos was constantly becoming. For Heraclitus, "You cannot step on the same river twice for fresh waters are ever flowing in upon you." For, Heraclitus, the constant process of change that characterizes the cosmos is not chaotic. Rather there is a hidden harmony because the upward and downward paths go on simultaneously and instantaneously, and result in a hidden harmony. "The death of fire is the birth of air, and the death of air is the birth of water". Heraclitus was notorious for his melancholic way of life and was therefore called the weeping philosopher.

**Parmenides**

Parmenides of Elea reacted to Heraclitus' theory of change as the essence of the universe. He argues that change is an illusion but being is one. Parmenides propounds that nothing can come out of nothing. Nothing can really become because everything is always something. Being is one and changeless. Parmenides founded a university called the Eleatic School.

**Empedocles**

Empedocles propounded four elements which he called the root of all things. The four elements are air, water, fire and earth. These elements are unalterable and indestructible. However, there are forces of love and strife which mix together and separate the elements. While love brings together the elements and mixes them to form things, strife separates them. The bringing together, and the separation of the elements by the forces of love and strife account for what we call change.

**Anaxagoras**

Anaxagoras was born in the Greek city of Klazomenai around 510 BC. He was the first philosopher to introduce Western Philosophy to Athens. Like Socrates much later after him, the priestly elements in Athens made use were upset by his by his naturalistic philosophy which rendered the gods redundant in the interpretation and authorship of the universe. This was a clear threat to their authority as the mouthpiece of the gods who were said to have authored the universe. The popularization of the philosophy of Anaxagoras would mean the banishment of the gods from physics and politics in the psyche of Athenians. It would spell redundancy for priestly class. Accordingly, Anaxagoras was accused of impiety, a crime which carried the death sentence. Anaxagoras fled to Lampsacus to escape being killed.

Anaxagoras attempted a scientific explanation of universe. He postulated that the world was originally made up of a mixture of particles which were indestructible. Change and individuation were caused by the preponderance of certain ingredients in a particular mixture. He is famous for the saying, "there is everything in everything". Anaxagoras did not see change as a result of the individual properties of the particles but as a result of higher concentration of a particle in a particular mixture. He differed with Parmenides who held that change was impossible.

To account for the intelligence and order in the world, Anaxagoras introduces an extraneous phenomenon called nous which literally meant mind. He said that nous (mind) ordered the mixture into the arrangement and order we see in the cosmos. The nous was the principle of intelligence in the world. It is revolutionary that Anaxagoras did not call the nous god. He held nous to be a purely natural phenomenon. By so doing, Anaxagoras dethroned the gods from the creation and ordering of the world. The principle of intelligence which was culturally attributed to the gods was now attributed to nature. Such re-interpretation of the world by Anaxagoras did not go down well with the priestly class. It belied the accepted theory of the world as an act of the gods. To make matters worse, Anaxagoras sought to give a scientific account to some phenomena which were previously thought to be manifestations of the gods. Anaxagoras said that the sun is a stone-like mass of metal on fire. The stars were essentially like the sun but we do not feel the heat from them because of their distance from the earth. The sacerdotal view of the world considered the sun a god, and stars spirits. Anaxagoras brought these phenomena from the world of spirits into the world of nature and gave them a physical interpretation that is devoid of any religious coloration. Anaxagoras equally attempted a scientific account of meteors and rainbow.

**Democritus**

Democritus was born around the year 460 AD.