



An Assessment of Dualism in Systematic and Regional Geography

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Abstract. Ever since the ancient Egyptian period up till the early Greeks the (pre-socratics) ideologist, scholars like anaximander (610-c. 647 b.c.e) and latter, Heraclitus (C.540-c.480 b.c.e), Empedocles (C.490-C.430 b.c.e), and Anaxagoras (C.500-C 428 b.c.e) all held the doctrine of opposed natural substances, the same was the doctrine of pythagoranism, believed to have been founded by Pythagoras of Samos (C.580-C 500 b.c.e) whose focus was also on opposing dyads such as one/two, male/female, and so forth. Plato's (C.428-348 or 347 b.c.e), view point also supported the earlier ideological doctrine of dualism in his metaphysics when he divided the world into two realms; the unchanging intelligible world of "forms" and the perceptual world of "change" (things). A review of previous studies points to methodological approach and application, this greatly help towards the shifting in geographical thinking and knowledge of inquiry from that of narrow descriptive perception to quantification and critical analysis of geographical spacial relationship in space. The fact remains that dualism in geography showcase value among geographers, This played various roles in the defining and studying of geography. The paper noted that there is a great shift in geographical thinking and knowledge of inquiry, as geography have evolved from descriptive to application of quantitative techniques after the controversies of determinism, possibilism and probabilism. It is worth nothing that the concept of dualism is today acting as property that governs the agenda and conduct of research through the utilization of theory and empirical

application towards any geographical issue on the earth surface; this no doubt serves as a cure to the various natural complexities and environmental challenges facing man and his society. For this reason the study of geography should cover both natural and man-made features, their distribution patterns and interactions of man with the spatial environment as he seeks to increase his returns from the terrestrial space and resources (Ambrose, 1972: 1).

1. Introduction

Since the history of geography, geographers have over the decades thought it wise to fashion out a better methodological approach to geographic issues in other to effectively address and handle spatial related influences of man's environment. One of these methodological debates is the dualism between regional geography and systematic geography (Ye Chao et al, 2012).

Dualism as a methodological approach reflects different viewpoints among different geographers about the nature and methods of geography since the ancient times. The earlier forms of dualism can however be traced in ancient Egyptian religion, with the contest between selt, disorder and sterility, and Osiris, fertility and life, that manifests itself in a cycle of murder and resurrection, even up till the early Greeks, (the pre-socratics) anaximander and, later, Heraclites, Empedocles and Anaxagoras all held the doctrines of opposed natural

substances, hence, the interplay of opposites is part of the developed world. Even the pythagoreanism, believed to have been founded by Pythagoras of Samos focused their ideology on opposing dyads of thinking such as one/two, male/female up/down, and so on. Plato's metaphysics also held same view point and as such divides the world into two realms: the unchanging intelligible world of "forms" and the perceptual world of change; detail of this can be found in Plato's Republic and Timeus; in this book a mythical account of the relationship between things and forms were x-rayed in other to capture the differences that exist in-between things and forms.

These situations put together made the use of methodological approach a focal application; hence, there was a growing need to advance and improve empirical inquiry in geographical phenomenon in other to enhance paradigms shift that was geared towards a positive effect on geographical knowledge and application. Therefore the objective of this paper is to study exploratively the extent to which the introduction of dualism in geographical enquiry have helped in bringing about an improvement in identifying and explaining our experience and knowledge about the complexity of the physical and human environment.

In order to have a good insight of this paper, the paper is divided in five parts. The first part covers the introduction, the second which is the conceptual explication covers areas such as what is geography; its relationship between things in space, its benefits, why geographers should use them and the basic concepts of space relations in geographical approach. The next considers what dualism is in geography. Dualism as the differing belief of geographers takes the fault, the fifth is the application of dualism to systematic and regional geography. The final section covers the conclusion of this paper.

2. Conceptual Explications

In order that we may gain a valued knowledge and understanding about the contributory influence of geographic study and the concept of dualism in this paper, it is considered necessary

that we undertake a clarification of the definition of geography, and the meaning of dualism.

2.1 Concept of Geography

Generally, geography and or geographic thinking began from people's curiosity thinking and the willingness to visualize about the nature of places beyond their homes and lands; this appear to how been the nature of man in order to identify and understand amazing complex and incomprehensible various nature of the earth in which man inhabits his living. The curiosity about places on the earth's surface appears to be ubiquitous human characteristics (Nelson et al, 1995). This position by implication appear to have been the stimulating factor that made people wonder what the landscape and life are live in different locations and may have led to what raised the questions about the conditions and circumstances of variation in life forms and "why" the locational difference on the earth's surface.

Varying scholars defined geography from different value-point in accordance to individual conception and visual perspectives. Immanuel Kant (1724-1804) the Prussian German philosopher termed geography as the science of "place" and "mother of science", this imply that geography is evolving science which have giving rise to several distinctive bodies of knowledge, inclusive of land surveying, meteorology, climatology biogeography, oceanography, cartography, estate management, town planning etc. all these body of geographical science are interrelated and deals with interrelated phenomena on the earth's surface (Alexander Von Humboldt, 1769-1859 and Carl Ritter, 1779-1859).

Similarly, Paul Vidal de la Blache (1845-1918) a French geographer describe geography as "the science of places". Based on this perception Leigh argues that geography has never been a science of man but the science of the "Land" that deals with the earth's surface.

Alfred Hettner (1859-1941) in Jackson Seiyefa Ododo (2002) defined geography as the knowledge of the earth's areas as they defer

from each other, this means that geographical features differ from place to another and that which changes with time, and should be studied base on trends with locational influence.

In attempting a synthesis, Trewartha et al (1957:519) observed that geography should be approached from three key elements in the field of geography. Firstly, the issue of man (population) who utilizes the resources of the physical earth to create the cultural earth; secondly, the physical earth which provides the natural environment which a population operates within and providing the resources it uses and lastly, the cultural earth which is the product of many creation out of the natural environment. This definition seem to shade several meaning and basically implying that geography is an outcome of man's desire to use the application of science and technology to subdue the natural environment to satisfy his basic needs and wants in relation to spatial environmental resources.

Ambrose (1970:1) remarked that geography covers both natural and man-made features, their distribution patterns and interactions of man with the spatial environment as he seeks to increase his returns from the terrestrial space and resources.

The above shows that it is for this reasons that geographers ask such questions as to "why", "how" and where; as such the type of questions in geography arises from the basic concept in geography. These questions in geography are derived from the varying definitions of geography. For this reasons Haggett, Cliff and Frey (1977:3) identified these main themes, which define the scope and purpose of geography. First, geography is concerned with the earth's surface which looks at the earth surface from the viewpoint of social sciences. Secondly, it is also concerned with main's spatial organization and his ecological relationship with the environment. Finally, it is concerned with the analysis of disparities in the distribution of resources, with particular reference to planning and policy formulation (Onokerhoraye, 1994:118).

In geographical science, geography study is not so much concerned with space as an objective condition which exist in self rather as that which have functional relationship between things in space (Kolars and Nystven, 1977). Hence, in nature things show some general geometric and topological forms of the functional relation of things to one another (Mabogunje, 1985).

Harvey (1973:119), and Onoker Horaye (1994:160) identify tow sources of basic concepts of dimensional relations used in geography: (a) indigenous concepts, and (b) derivative concepts

Indigenous basic concepts of space relation involves the use of point, line and area, there derivation concepts on the other hand are volume and surface.

In geographical study, these concepts apart from being valuable in geometry and topology, they serve a great deal and can be used in describing all manner of functional spatial relationships in geography.

In their assertion Kolars and Nystenn (1977:10-16) define point, line, area and volume as:

- Point: as a dimension location
- Line: as a series of point arranged one after the other in a linear form to create a line.
- Area: as a collection of adjacent points arranged in a non-linear form, or a line which closes upon itself to form two-dimensional pattern or figure.
- Volume: as a collection of points arranged in a three dimensional pattern with length, breath and height and in morphological terms which can be called surface and gradient

2.2 What then is dualism in Geography?

Dualism in geography therefore has been seen as that differing belief of geographers over any geographical topic. It is imperative to note that the idea of dualism have generated a great benefit in geography through various improvement and methodological application, which have greatly shifted geographical thinking

and knowledge of inquiry from that of descriptive to that of quantification, been the use of statistic models in explaining dynamic variables and processes such as human behaviour, decision making etc.

There is no doubt that dualism is a doctrine positing two powerful and antagonistic metaphysical principles, which are constitutive of the world and must explain our experience of the world as they are. This is why Kantian Philosophy have argued that knowledge is related to the senses and what could be perceived; to many scholars what could be perceived as reality is the physical (Omeregbe, 1998: 3). Many scholars have over the years conceived our experience of the world as that associated with dichotomies in the experience of things and forms, such as good and evil, light and darkness, attraction and repulsion or love and strife, structure and form. In as much as geography deals with physical things, the discipline generally focuses on the sense perception and knowledge about environmental complexity (physical and human environment) in relation to man's influence and existence.

In geography, one of the most excited methodological debates is the dualism between regional geography and systematic geography. It reflected different viewpoints among different geographers about the nature and methods of geography since the ancient times. The view and principles of systematic geography focus point is on methodological application for instance, it held that geographers and indeed geography are scientists and science pursuing discipline that should be guided by the general rules of science, on the other hand, regional geographers and regional geography regard region as the centre of geographical research without much reference to external influence to the region and its peripheral area (Block et al 1997).

This ideological thinking of the ancient Greece came under serious attack by many scholars, two of these scholars Hartshorne and Schaefer strongly oppose the idea of region as the center of regional geographical research, hence their idealism oppose the kind of dualism that only underlines one, but ignores the other; this infact,

account for the differences in values, interest and the different attitudes to the history of geographical ideal to a great extend leading to the real dualism.

Dualism in geography as a conscious design should be seen as a necessary concept that should always be employed in geographical topical in other to seek for a more realistic and holistic ideology in geographical issues and problems.

A cursory look at the history of dualism to a very reasonable view and consideration shows that dualism is a show of value and as such value in geography becomes one of the most important factor in the course of defining and studying geographical features and their relationships with both man and the environment. This is why after the end of second world-war, more and more scholars begin to hold a kind of standpoint admitting the great influence and assistance different values have in the rationality and logic on different geographical topic which have potentially advance geographic course and reduce the inadvertent complexity associated with the dynamics of geography and man because geography is about man and his environment; infact, geography is to describe and comprehend the earth's with the development of postmodern geography, geographers seem to have consensus on popular trends and general rule, that should guide the various ways of geographic enquiry; in other to avoid and curtail possible omission and consideration of significant geographic influence to every geographic topic.

2.3 Dualism as the differing belief of Geographers

To show that dualism in geography is the differing belief of geographers over any geographical topic; this fact have been argued base on two ideological schools of thought; these schools are:

- The environmental determinism school and
- The social determinism school thought

Environmental Determinism: The ideological tenet of this school of thought is such that hold and believe that geographers should hold nature and all the happening on earth to nature and nature only. They attribute the incidence of natural complexity to the physical environment which has a massive and often controlling and perhaps never changing and generationally stable surface which certainly requires that we lay the natural sciences under condition but in some respects the greatest differentiating agent is man himself. It is he who makes the difference between town and country, between steppe and the sown; (Wooldridge and East, 1965:95) effect on human beings, in essence dictating man's abilities in all realms of life and society hence the physical environment exert overwhelming power over and above man on the planet-earth; some of these challenge of nature could be seen in form of climate change and its associated implications on natural processes. This school of thought believe that these natural associated hazards; such as rain fall, flooding, heat intensity, harsh-weather, increase in pressure winds, windstorm, melting in-ice bags, ocean rise and desert-in preachment, etc, would keep on increasing and in a constant progression on till earth dies.

The above position of environmental determinists sees and place man in a world of natural complex reality of the physical environment without due consideration to man's ingenuity and the possibility of piercing and subduing complexities and it's processes occurring in naturality.

Social Determinism: This school of thought holds a contrary view point, and blames all the happenings on planet earth to man, hence, the school of thought called man an initiator of anthropogenic factor to the natural environment; and as such introducing not only threat but stress and danger to the physical natural environment; and inturn influence the generation of these anthropogenic factors resulting in changing the characteristic pattern and behaviour of the climate whose co-efficient and resultant influence helps to trigger climate change which is said to be accountable to several death in human race; while environmental resource

exploitation, forest lutting (deforestation), industrial application of chemicals and particulates, including cloro-floro carbon (CFCs) HFCs hydro floro carbon, and other delirious substances and machines continue to degrade environmental quality. They all constitute potent stress that triggers the discontinuity of a concentrated earth, its eddies and potential survival of man and other organic existence on the surface of the earth (Amadi, 2018).

Comparatively, these two schools of thought have created dichotomy in their various ways base on their differing beliefs and perception which is today known as geographical dichotomy. This dichotomy arise from the methodological problem confronting geographers since the history of geography. However, it is important to note that in as much as dualism in geography is the differing belief of geographers over any geographical topic; it is on the other hand the existence of parallel streams of thoughts over an issue particularly with geographical problems.

While dichotomy in geography is an attempt to create various sub-division and or branching of the subjects into distinct streams of specialization for the realization of a maximum discovery and utilization for the benefit of man and his environment, many authors have spend considerable time energy and resources in debating and defending this particular idea of environmental determinism and social determinism. The work of Pradeep Yadav (2017), Sanjay Kisan Joshi (2016), including the view point of Pawanveer, an assistant professor of geography, government of Haryana were of the same viewpoint. Yet more scholars have postulated several theories of man and the environment in a more idealized manner with the intention to provide a more helpful development and advancement of geography as a discipline solving subject of man and his surrounding for the purpose of enhancing sustainable development for the future generation.

3. Application of Dualism to Systematic and Regional Geography

Systematic or better still general geography study certain organized phenomenon in space in relation to their general significance to both man and the environment. In this manner, geographers can study the industrial location patterns of the world, or agricultural system and method adopted by other countries of the world and their various changing patterns, such that the various patterns and system of a successive country can be adopted for development and advancement of man-kind in that country. Nigeria for instance has oil as a main stay of her economy. This phenomenon (oil) can be studied using its significant contribution to both external and internal enhancement. The internal influence can be studied using its spreading pattern to study migration, and population increase, spatial pattern of development and standard of living of the inhabitants with other non crude oil deposit region. Alexander von Humboldt owns much to this approach.

Regional geography on the other hand owns much to Carl Ritter as one of the major contributor to its development. Regional geography according to its founding father is bases on specific area units. Each unit is studied in-depth based on physical features, such as; climate, vegetation, settlement pattern, human nature, land scape, transportation, economic activity as well as their relationship with the area unit in question which has a lot to do with its physical uniqueness and identification. In this case, it is the physical features of the human and physical environment that defines an area, they act as a yardstick use to classify and quantify a given area unit.

Most scholars of the world, particularly the French regional school scholars recognize regional geography as the best geographic method, since the regional geography believes in the complex relation of natural and human elements as the basis for the evolution of cultural landscape which then create room for the understanding of the whole interaction in the global system which pose greater threat to man and should be considered much more important than any other parts of the globe.

This position has seriously been criticized based on the ground that it has a container concept which does not allow interrelationship with other regions which they say is an important factor that creates complexities in the region. This idea has been faulted and plays less desirable in the present day interdependent of resources, information and globalization of interconnectivity of human, activities. On the other hand regional geography have help to provide a detailed knowledge of an area by identifying various feature that can be used to classify an area or region for easy analysis.

4. Types of Regions

The word region and area are sometimes interchangeably used to explain a giving unit in geographical analysis with regard to differential surfaces of the earth. However to classify an area as a region it is usually based upon certain criteria, these criteria are what separate one area from the other, an area region changes with time due to man influence and activities.

Basically there are two types of regions **formal** and **functional regions**.

4.1 Formal Region

This form of region are area units that contains certain continuous distributed landscape features of physiographic preserve which may include climatic boundary, land mass, and ethnic demarcations as well as political boundaries, this depend on if the people are well defined in such region as members of a certain political party.

Obviously, in a formal region other criteria which may be single or multiple features can be used to classify a formal region. For instance, a single feature region can be classified using only one criteria such as river or relief. On the other hand multiple regions can be classified using varying associated feature including other man made features which help to observe geographical and man made regions of the world.

4.2 Functional Regions

Functional regions differs interns of the contents of human occupancy and other natural features including man made features and other complex realities; for instance, city regions and industrial regions are typical examples of functional regions. The functional regions takes into consideration the interplay between the surrounding area and the core interns of their interdependent, interconnectedness of functions and roles.

However, from the point of view of economic development, it is more appropriate for regional planners to classify regions as:

- Developed
- Underdeveloped or backward and
- Depressed regions

This observation is in line with the view of (Hartshorne 1963).

5. Conclusion

Regional and systematic geographers are not different approaches but are just the two extremes of a continuum use in expanding scientific knowledge about geographical inquiry, therefore the same can be said that dualism in geography have achieve tremendous progression in geographical discovery. For this reason determinism, possibilism and probabilism spring to the line light of geographical knowledge (Ofomata, 2001).

More significantly, geographers make use of varying concept, each of these concepts plays different roles in geographic issues particularly when it comes to point, line, area volume and their derivatives including other geographic phenomena during any geographic inquiry and resolution using scientific precision to resolve qualitatively and quantitatively associated sizes and heights as situation demands; this is because in geography almost all phenomena geographer deals with vary in size, height, intensity in quality and quantity such that they employ them to differentiate their varying status for easy identification and classification of geographic phenomenon in order to ease classification and analysis of geographical phenomenon.

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