

## **EFFECTIVITY ASSESSMENT OF METHODS USED BY SECONDARY SCHOOL GEOGRAPHY TEACHERS IN AKWANGA LOCAL GOVERNMENT AREA OF NASARAWA STATE**

By

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### **ABSTRACT**

*This study investigated the effectiveness of methods used by geography teachers in secondary schools suited in Akwanga Local Government Area of Nasarawa state, Nigeria. The study adopted a survey research design targeted at 25 geography teachers in the study area. Questionnaire was used as instrument for data collection. The instrument was validated by experts and reliability established in which a coefficient of 0.84 was obtained which made the instrument reliable for data collection. Simple percentages, Mean scores and chi-square were used for data analysis. The result of the study revealed that; Geography teachers often used appropriate teaching methods, materials, assessment techniques to ensure effectiveness in teaching geography. It was concluded that secondary school geography teachers in the study area are qualified to teach geography and utilize various methods, materials and assessment techniques which provides avenue for students to learn effectively. The study recommended that the government provide updated materials and training for geography teachers on evolving and newly proven strategies and methods to enhance learning.*

**Keywords:** Geography, Secondary School Teachers, Learning, Effectiveness

## **Introduction**

The issue of declining academic performance of students in Nigeria secondary schools has generated much interest among stakeholders in the education sector in Nasarawa state, Nigeria. The quality of education and performance of students depends on the teachers as reflected in the discharge of their duties. Over time students' academic performance in both internal and external examinations had been used to determine the effectiveness of teachers and teaching (Ajao, 2001). This was buttressed by Ogunsaju (2004) that the academic standard of students in all Nigerian educational institutions has fallen considerably below societal expectations. Teachers have been known to have important influence on students' academic achievement and they also play a crucial role in educational attainment because the teacher is ultimately responsible for translating educational policies and principles into actions based on practice during interaction with the students (Aderogba, 2009 & 2011).

Both teaching and learning depend on teachers: no wonder an effective teacher has been conceptualized as one who produces desired results in the course of his duty as a teacher (Uchefuna, 2001).

Teaching is a system of actions intended to induce learning. It can be deduced that teaching is not just a monotype activity, it consists of a series of activities which are clear-cut from each other. However, since the teacher's intention is to make learning effective, the nature of the activity is immaterial. To ensure effective teaching, the teacher must be effective in delivery of facts and content. Teacher effectiveness incorporates all the attributes a teacher needs to effectively utilize in the course of instruction- Mastery of subject matter, qualification, area of specialization, years of professional teaching experience, appropriate use of teaching materials, use of proper evaluation techniques only but a few. Mastery of subject matter can be achieved through training and building up a critical and analytic mind towards the subject. Where the teacher's mastery of subject area is poor, there is tendency of students not achieving academically because content will not be duly explained and understanding as well will not be effective.

The proper implementation of any curriculum depends on the competence of the teachers. The saying that "no education can rise above the quality of its teachers" is very apt here (Federal Government of Nigeria, 2004), since the teacher is the most important of all inputs that go into educational provision. Aaronson, Barrow & Sander (2007) asserted that, education of the highest quality requires teachers of highest quality. This is true in respect of geography education as the quality of its teachers determine the outcome of the teaching in terms of students' achievement. In consideration of the competency performance among geography teachers, the influence of professional qualification, years of teaching experience and area of specialization therefore, become important. Professional qualifications, area of specialization and years of teaching experience have been found to influence many outcomes including academic achievements (Koledoye, 2011).

Knowing fully well the importance of Geography education in Nigeria, it is therefore pertinent to assess the effectiveness of methods used in teaching Geography in Secondary Schools suited in Akwanga Local Government of Nasarawa State.

## **Literature Review**

Traditional method of teaching in most cases serves as a medium for the teaching on a more abstract level, in form of various theories, laws and concepts with an intention of student using their knowledge in their future personal or professional life (Resnik, 2001). Traditional teaching and learning (face to face) methods which were teacher-centred based mainly on

rote-learning (lecture). According to David (2002), one of the common methods that geography teachers prefer today is the lecture method in which teacher transmits knowledge to the students who sits passively in the classroom and listens. Considering the abstract nature of some of the major geography concepts, the teacher spends recounting complex physical concepts with the use of maps, drawings, which remain abstract and are not easily assimilated by students.

Damar (2004) basically identified some of the teaching learning techniques in geography to include:

**Presentation Technique:** There are various methods found in this technique they include; lecture method, demonstration method, audio visual, field trip and tour.

**Action Techniques:** This technique allows students manipulate ideas, material and tools through experiments, construction, observation and presentation. These kinds of actions include; project method, guided observation, exercises and experiments.

**Interaction Techniques:** This technique is based on human talking and sharing thoughts and ideas. Other techniques found in this method are; Buzz session, interview, committee, discussion, rote-playing, debate and brain storming.

The instinct of curiosity is the master instinct among students. Students, experience proves, are curious to see things for themselves. Their environment is full of things and object about which children want to know everything. They have questions of which they want answers. The geography teacher exploits this instinct to make the teaching of geography interesting and meaningful through the following methods: Meanwhile, the major methods that are relevant and germane to the teaching and learning of geography as described by Onasanya(1992) as cited in Egunjobi, (2006) identified the following as methods suitable for teaching geography at any level of geographic study: discussion, project, inquiry, lecture and activity methods. Moreover, the usefulness and effectiveness of the varieties of discussion methods can be considerably enhanced if adequate instructional materials are effectively utilized with the adoption of the methods. However, the teacher's role in all the discussions is that of a facilitator, guide, assistant, moderator, contributor and aid to the discussion. Project method involves doing something practical, concrete and realistic which is self-motivated, self-generated and self-directed by the learners themselves. The role of the teacher is to inspire and guide the learners in the process of carrying out the project. The teacher should try as much as possible to encourage learners on projects that help to clarify concepts in geography as it provides for the manipulation and experimentation of ideas by the learners. However, if the project method is not meaningfully and properly executed it may lead to time loss, energy wasted and in fact, financial loss. Therefore, this method needs proper planning and scrupulous execution for a worthwhile feedback.

According to Mansaray (1992) in Egunjobi (2006) inquiry method involves probing, inquiring, investigating, analyzing, discovering, evaluating, questioning, thinking, searching, exploring, experimenting, collecting with a view to acquiring updating or validating knowledge and information in geography. It is simply a method of finding out something. The main benefit of this method is that it motivates the learners on how to reason and think for themselves. Therefore, the acquisition of these skills is very crucial and in fact, important for the learners of today and the future who have to face a myriad of unprecedented socio-political and economic problems to which they will have to find solutions to with a credible creativity.

Meanwhile, in geography teaching, the use of inquiry method arises out of the curiosity or inquisitiveness of the user. However, in the post primary school institutions, the

teacher has to put in greater effort in imparting the skill of “how to find out, and think through and the regular use of the inquiry method. Lecture method is the oldest teaching method which is believed historically to be dated back into antiquity. It is also referred to as expository method because it is teacher-dominated and learner’s passive method. It is also known as talk-and-chalk method in a situation when the teacher decides to write the summary of the points s/he has taught on the board. In fact, in this method, the learners’ involvement and participation is at low ebb because communication is often one way for most of the time during the teaching-learning process.

According to (Aremu, 2001) in Adeyemi, (2008) among these methods are lecture methods, inquiry method, inductive and deductive methods. Other methods include the discussion, textbook, problem solving, project, fieldwork, question and answer, dramatization, laboratory method, experimentation and discovery as well as the expository (Alebiosu, 2002, Seweje, 2000, Ajaye, 2004) in Adeyemi (2008). The successful utilization of which teaching methods depends upon the nature of the teaching of geography can improve learning when properly use with appropriate instructional materials such as visuals (charts, maps, graphs, physical models), audio (radio) and audio –visuals (computers, television, animated models), realia, that is real specimen as it’s the best sited during field work. The following are some of the challenges faced by learners and teachers in the course of delivery geographical knowledge: Geographic concepts are abstract in nature and leads to misconception and errors concerning the critical attributes, the traditional methods failed to give substantial explanation of that could enable the learners to assimilate and build mental structure to give a perception of the concept taught, lack of communication of student in constructing locations to get more information, lack of observation and analysis. Difficulties faced by teachers include; Lack of didactic material, limited course content, over populated classes, time constraint, as seen from the above, this manner of teaching without the integration of abstract conceptualization and an everyday life experience, cannot transform geographic teaching into permanent knowledge. Permanent comprehension is achieved only, if we put life experience in the center of the teaching-learning process.

### **Empirical Studies**

Damar, Barnabas and Davwet (2015) conducted A Survey of Geography Teachers’ Classroom Assessment Practices in senior Secondary Schools in Jos North Local Government Area of Plateau State. The study focused on geography teachers’ classroom assessment practices in senior secondary schools in Jos North Local Government Area of plateau state. A survey research design was adopted for the study. The population constituted all the 164 senior secondary schools in Jos North, Plateau state. A sample of 18 senior secondary schools with one geography teacher each was selected across the local government areas. Samples of assignment questions and tests questions drawn from teachers’ lesson plan were used as instruments in addition to a questionnaire drawn to determine teachers’ awareness on the evaluation guide required by the senior secondary geography curriculum and an observation schedule on teachers’ lesson plan to sought information on the relationship between teachers evaluation questions to the evaluation guide in the SS geography curriculum. Four research questions were stated and answered, while one hypothesis was formulated and tested at  $\alpha$  0.05. The results showed that, most geography teachers are fully aware of the evaluation guide in the curriculum but do not make reference to it in drawing questions for evaluation in the classroom.

## Methodology

For this study, a survey research design was employed. The population of this study was all the 25 geography teachers in all 25 public senior secondary schools in Akwanga local government area of Nasarawa state. The data used was collected through the use of Questionnaire on Geography Teachers Effectiveness (QGTE). A four-point scale of Strongly Agreed (SA = 4), Agreed (A = 3), Disagreed (D = 2) and Strongly Disagreed (SD = 1) were used to rate the responses of respondents. Descriptive statistics and Chi square were employed to analyse the results of the study.

## Data Analysis

### Research Question One

What are the methods teachers apply in teaching geography in senior secondary schools in Akwanga Local Government Area of Nasarawa State, Nigeria?

**Table 1: Response Distribution of Teachers on Application of Appropriate Teaching Methods in Teaching Geography in Akwanga Local Government Area of Nasarawa State, Nigeria.**

S/N	Items	Responses				
		X	f	Fx	X	Cx
1	I often used discussion methods for each topic to ensure effectiveness in teaching geography	4	10	40		
		2	2	4	3.24	2.50
		1	1	1		
2	I do understand that demonstration methods exist for practical teaching and learning of geography	4	4	16		
		3	9	27		
		2	8	16	2.52	2.50
		1	4	4		
		10	25	63		
3	To ensure effectiveness I often use problem-solving method to handle topics in geography	4	19	76		
		3	4	12		
		2	1	2	4.24	2.50
		1	1	1		
		10	25	106		
					<b>Cumulative mean = 3.33 &gt; 2.50</b>	

Item 1 on table 1 showed a mean score of 3.24 which was greater than the criterion mean of 2.50 ( $3.24 > 2.50$ ) this showed a positive response that, teachers often used discussion method for each topic to ensure effectiveness in teaching geography. On item 2, 2.52 was obtained as mean score which was greater than the criterion mean of 2.50 ( $2.52 > 2.50$ ). This indicated that, geography teachers do understand that, demonstration methods exist for practical teaching and learning of geography while 4.24 was recorded as mean score for item 3 which was greater than the criterion mean of 2.50 ( $4.24 > 2.50$ ). The cumulative mean scores (= 3.33

> 2.50) signified that, to ensure effectiveness geography teachers often use problem-solving method to handle topics in geography. Therefore, geography teachers in the study area utilize discussion, demonstration and problem solving methods in ensuring effectiveness in teaching of geography.

**Table 2: Response Distribution of Teachers Application of Appropriate Teaching Materials in Teaching Geography in Akwanga Local Government Area of Nasarawa State, Nigeria.**

S/N	Items	Responses				
		X	F	Fx	X	cx
1	I understand there are materials used for teaching geography that aid to facilitate learning	4	22	88	3.88	2.5
		2	0	0		
		10	25	97		
2	I often use visual materials that appeal only to sense of sight for teaching topics in geography	4	15	60	3.40	2.5
		3	6	18		
		2	3	6		
		1	1	1		
10	25	85				
3	I don't use any teaching material to facilitate learning because I think it is not necessary	4	6	24	2.72	2.5
		3	6	18		
		2	13	26		
		1	0	0		
10	25	68				
4	My school doesnot provide teaching materials so I don't waste my time improvising any	4	12	48	3.28	2.5
		3	9	27		
		2	3	6		
		1	1	1		
10	25	82				
5	I often improvise teaching materials to ensure effective teaching and learning of geography	4	8	32	3.00	2.5
		3	11	33		
		2	4	8		
		1	2	2		
10	25	75				

**Cumulative mean scores = 3.26 > 2.5**

The result on table 2 showed the following; item 1 (3.88 > 2.50) this showed that, geography teachers agreed there are materials used for teaching geography that aid to facilitate learning, item 2 (3.40 > 2.50) this indicated that, geography teachers often use visual materials that appeal only to sense of sight for teaching topics in geography. On item 3 (2.72 > 2.50) was recorded, and revealed a positive response that, geography teachers do not use any teaching material to facilitate learning because teachers don't think it is necessary, also, (3.28 > 2.50) was recorded on item 4. This revealed that, schools do not provide teaching materials so geography teachers don't waste time improvising any. Item 5 revealed a mean score greater than the criterion mean of (3.00 > 2.50). This further explained that, geography teachers in the study area often improvise teaching materials to ensure effective teaching and learning of geography. Therefore, the cumulative mean scores (= 3.26 > 2.50) showed that, to a greater extent geography teacher apply teaching materials also known as instructional materials such as visual materials.



## Discussion of Findings

The result in table 1 showed that geography teachers often used discussion method for each topic to ensure effectiveness in teaching geography. And are aware of activity teaching method is, so they are familiar with the right one to use to teach topics in geography. Also, geography teachers in the study area understood the existence of field work and demonstration methods for outdoor and practical teaching and learning of geography and geography teachers do understand that demonstration methods exist for practical teaching and learning of geography and to ensure effectiveness, geography teachers often use problem-solving method to handle topics in geography. This supported the findings of Maanongun (2019) that demonstration method, field trip method and discussion method were used by the teachers while lecture method, audio-visual methods and project methods were not used in the study. Demonstration strategy has been shown to be effective with both large and small groups. The greater the degree of participation and sensory involvement by the learner, the more effective learning will be (Uhumuavbi and Mamudu, 2009). According to Thigpen (2001), demonstration creates confidence and develops a more friendly condition between the teachers and students and with one another. Okoro (1997) also asserted that discussion method is a way of considering various facet of a problem and also it lays the ground work for the many discussion situations in which young people and adults are constantly taking part.

The result in table 2 showed geography teachers understood there are materials used for teaching geography that aid to facilitate learning; this indicated that geography teachers often use visual materials that appeal only to sense of sight for teaching topics in geography and often improvise teaching materials to ensure effective teaching and learning of geography. Therefore, the researcher concluded that a greater degree of geography teachers apply teaching materials also known as instructional materials in teaching and learning of geography in the study area. Reasons linked to the submission of Adebisi (2004) that instructional materials are very important for students to imagine accurately and interpret correctly the features of this great world. Thus, instructional materials provide more realistic experience than the verbal abstractions. They motivate students to learn and encourage active participations. In order to ensure an effective teaching learning process in geography, it was important for the teacher to be thoroughly acquainted with the teaching resources and services available to him (Olawale 2013).

## Conclusion and Recommendation

Secondary school geography teachers in the study area utilize known methods, materials and assessment techniques which provide avenue for students to learn effectively, however, there is lack of government support for provision of materials and training on evolving techniques to enhance learning experience. Hence, the study recommends the following:

- i. Teachers should be motivated to go extra miles to assess the output of their teaching methods and approaches.
- ii. Provision of adequate support for training and retraining of teachers to update knowledge on teaching methods and materials.
- iii. Teachers should embrace personal research as a tool to develop a robust teaching technique that will produce better results.

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