



# Assessment of Senior Secondary School Student's Attrition in Geography in Gombe Local Government Area, Gombe State

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## ABSTRACT

This study examined senior secondary school students' attrition in geography in Gombe Local Government Area, Gombe State. A survey research design was adopted, involving a population of 756 SSS II Geography students from both public and private schools in the area. A sample of 189 students was selected through a simple random sampling technique. Data were collected using the Student Assessment of Factors Influencing Senior Secondary School Students' Attrition in Geography Questionnaire (SAFAGQ), which was designed to gather information on student attrition. The instrument had a reliability coefficient of 0.786, obtained using Cronbach's alpha statistics. Data were analyzed using mean scores. The study's findings revealed a high attrition rate in geography among students in the study area. Factors contributing to this attrition include the scope of geography and the inadequacy of instructional materials for teaching and learning. Based on these findings, recommendations were made.

#### INTRODUCTION

Geography is a subject which cuts across other field of human study and learning process which expose one to live in a world of amusing beauty, infinite complexity and ignorance challenge that opens door into the dynamic world and prepares people to face the reality of life. The subject is highly relevant and equipped students in their pursuit of tertiary education. Geography provokes and answers questions about natural and human worlds using different scales of enquiry to view them from different perspective. It develops the knowledge of places and environment throughout the world based on map study. It helps in understanding the resolving issues about the environment and sustainable development and to choose reliable career to properly earn a quality life which is highly promoted through quality teaching and learning with availability instructional material and competent teachers handling subject in the schools.

According to National Policy on Education (NPE) (2014) the goal of secondary school Geography, is to raise a generation of people who can think for themselves, respect the views and feelings of others, respect the dignity of labour and appreciate those values ARTICLE INFO

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#### KEYWORDS

Geography, Student's Attrition

specified under our broad national aims and live as good citizens, foster Nigeria unity and with an emphasis on the common ties that unite us in our diversity. The objectives of senior secondary school geography curriculum are in line with the Federal Government reform in education to meet the target of National Economic Empowerment and Development Strategies (NEEDS) and the Millennium Development Goals (MDGs) now Sustainable Development Goals (SDGs) (NPE, 2014).

Geography as an elective subject, like History, Literature and Agricultural Science. By this elective, Geography has suffered attrition/drop of students offering/studying the subjects as a result of complains of the wide scope of Geography curriculum, fear of failure by students at external examination levels and lack of interest/poor attitude develop towards learning Geography by students and peer and parental influence factor has caused students attrition in Geography. By peer group which consist of a small group of similar age and fairly close friends, has influence on the groups. Peer influence is a kind of social pressure on the peer when it comes to study, the peer compel others to adopt a type of behaviours, dress or attitude in order to be acceptable as part of a group. Of these attitudes and behaviour the members of

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peer are either affected positively or negatively. Since, they share the same activities. Negative peer influence affects the child's future while the positive promotes the child's future growth and development. Therefore, peer influences the members of the age groups and usually cause great impact on the group especially when it comes to play in academic pursuit in life.

Attrition is the drop or decline and reduction in number from the initial entry total which is feasible when a set of students cannot control internal or external factors influencing such fears in their academic life and a negative attitude cultivated leading to a number of unsuccessful as non-completers. Attrition is witnessed when subjects in schools are selected to be studied by students out of the many making some subjects elective of which Geography at the senior secondary school (SSS) level suffers due to its: Wide scope, limited time allocation in teaching the subject, students and teachers attitudes, lack of adequate instructional materials, peer and parental influence and teacher's competence in the teaching and learning of Geography.

#### STATEMENT OF THE PROBLEM

Due to large number of subjects as part of the practice in secondary school system students are usually allow and or given the privilege to select for themselves subjects to study. Here, students tend to drop some wide scoped subjects like Geography that seems very difficult for teachers to cover its content regardless of its importance in life study. Students drop subject right from SSI while others in SSII and sometimes into SSSIII before external examination. This continuous dropping in numbers of students from subjects offered has become a thing of great concern to the researcher, most especially on students who drop Geography.

Wuchira (2014) carried out study which sought to explore factors influencing the choice of Geography as an optional subject, revealed that, teacher's attributes adequacy of Geography resources and school past performance in Geography were major institutional factors influencing students during selection of Geography as a subject and the lack of adequate Geography resources and school past performance in the subject cause attrition of students. The result of the study, also

revealed that, Geography syllables is too wide to be covered and was very clear from the study that, there existed attrition of students- male and female in the selection of Geography as a school subject. In view of the study carried out by Wuchira (2014), the current research study also observed that Geography is bedeviled by high attrition since 2017 from the researcher's Field Survey (2023). This development has posed serious challenges to the study of Geography in the study area. If this continues, the purpose of Geography Education, of environmental protection and control, resource management will be greatly affected in the area and perhaps Nigeria at large will be in question. Therefore, this study will be conducted to examine the factors influencing senior secondary school student's attrition in Geography in Gombe Local Government Area of Gombe state.

#### **Objectives of the Study**

- 1. The level of students' attrition in Geography in the study area.
- 2. The effect of scope of Geography curriculum on students' attrition.
- The role of availability of instructional material on Geography students' attrition.

#### **Research Questions**

- 1. What is the level of students' attrition in Geography in the study area?
- What is the effect of scope of Geography curriculum on students' attrition?
- What is the role of availability of instructional material on Geography students' attrition?

#### LITERATURE REVIEW

This study is anchored on Bean and Metzner Model of students' attrition 1985. The model emphasized on satisfaction. Satisfaction was stressed at to mean that attrition depends on students' background variables which cover the socio-economic status combine with organizational determinants including the relevance of one's course and integration; satisfaction and institutional commitment in order to attain a result. Beans' and Metzner's main factor was, factor external to the postsecondary context such as: Financial,

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opportunity to transfer and influence of friends termed environmental factors and that, failure to continue with a course of study depends on the level of dissatisfaction with the course or subject taught in the school as an institution as well as academic integration and performance with a wrong choice of course and overall lack of preparedness of the students lead to attrition of certain subject of which, in this case, geography suffers this threat of academic factors. Bean and Metzner also pointed out that, the indicator to dropping a subject is college grades; performance, institution fits and commitment of the students as an outcome variable resulting from: environmental factors, socio-psychological processes and academic factors.

Rilwani, Akahomen and Gbakeji (2014) defined Geography as a science of spatial distribution of phenomenon on land space and a multidisciplinary area of learning. As a science of spatial distribution, Geography explains the scientific processes which is systematic, sequential and logical in approach to life problems in a precise and clear terms by: proper formulating appropriate hypothesis, collecting data necessary for testing the so far made hypothesis, analyzing the data to test the hypothesis formed and then drawing necessary inferences and or conclusion on the data gathered. As a multidisciplinary area of learning, Geography has a central question of "What is it like this here?" that is locational, descriptive and explanatory aspect of the earth's phenomenon with contents to cover: physical, practical, regional Geography as well as introductory Geographic Information System (GIS)- The new branch of Geography.

Damar, Davwet and Dukut (2016) defined Geography as a science that studies physical and human processes and spatial pattern on the earth in an integrated way over space and time; it examines the spatial distribution of people and their activities; physical and human made features, ecosystem and interaction between humans and the environment in a dynamic context. This implies that geography deals with the study of how spatial patterns and processes affects the way people live and interact with the environment, how physical and human processes shape the environment, and how humans interrelate with the living and non-living component of the ecosystem. This is another all-encompassing definition, covering aspects of physical, regional and human geography. Peter (2016) also defined Geography as the study of earth's distribution of its living and non-living creatures. The focus of Geography according to Peter is the physical and human or cultural phenomena on earth that needs to be properly studied.

The foregoing definitions revealed that Geography is concerned with the earth as an environment of man which influences his way of life and organization; man's ecological relationship and resource distribution and processes of harnessing these resources by man in terms of planning. It laid emphasis on people, places and phenomena as they occur in particular patterns and as they evolve in a process in any environment.

Due to the importance, Geography as a subject has a pride place on the National Curriculum of secondary school (education) with this particular reason in mind, Garner (2011), ranked geography as being essential in understanding and solving complex and dynamically changing world's problems that are related to man's environment for adequate living. Secondary education is the form of education received after primary education and before the tertiary level. The secondary school level has many objectives thus: providing an increasing number of students with the opportunity for education of a higher quality, irrespective of sex or social, religious and ethnic background. The goals of secondary schools is to raise a generation of people who can think for themselves, respect the views and feelings of others, respect the dignity of labour and appreciate those values specified under our broad national aim and live as good citizens, foster Nigeria's unity with emphasis on the common ties that unite us in our diversity.

Students' attrition in any academic discipline is a thing of concern in education planning and management. Students' attrition in a given academic discipline is no doubt increasingly becoming a matter of economic backwardness in contemporary societies. The dwindling level of students in a given subject or course of study is often termed attrition. High level of attrition has become evident in some subjects at the secondary school level of which Geography, one of the subjects have been experiencing such attrition. It can be noted

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therefore that, on admission into Senior Secondary School (SSS1), many students tend to embrace and offer the subjects on the school lesson time table for the class but after a term or an academic year/session, You may discover that there is a drastic drop in the attendance in certain lesson of the school time table as a result of subject selection by students. This selection of subjects by students sometimes is not guided while sometimes is guided by school but influence by peer and parents to stop offering certain subjects on the school lesson time table but encouraged them to offer these subjects proposed to them. Sometimes, the students' attitudes toward selection of the study subject resulted in dropping a particular subject of which Geography most times tagged "Geography Mungun Ciwo" suffered this dropped or decline and reduction in population of students causing attrition in the study of the Subject-Geography.

This declining stage and reduction in the population of students compared with the initial population admitted give rise to what we call attrition rate. Supporting Garner's definition, Maher and Macallister (2013), further explained that, attrition of students from subjects in school can come in different ways, it could come from the subject teacher as a result of the teacher's inability to effectively teach and or from the wrong placement of students during subject placement and or wrong advise to the student to leave or stop offering a particular subject. It could occur as a result of those students who do not return to progress from other year to another or that those who take a break from studying the particular subject with the intention of returning but never returned due to ill-health and those who moves from one school to another to continue their study. Maher and Macallister, further pointed out that students' attrition usually occur mostly between first and second year of the study period which is highly attributed to students' emotion in respect to subject offered in geography inclusive. To buttress the definition of attrition given by Garner's, Gutl Rizzardin; Chang and Mordles (2014), also define attrition in their study on Massive Open Online Course (MOOC) as a decline in the number of students who initially enrolled to undertake a course of study to the end of the course. By implication, the definition given by Gutl Rizzardin, Chang and Mordles explains

attrition rate as, voluntary and involuntary termination of a course of study expressed as the ratio of the number of students who endure to study Geography up to external examination level: WAEC/NECO to that which was initially on list of admission for that trend of admission year. Akintade (2011) pointed out that the attrition of students in Geography as a school subject at WAEC level in Nigeria is evident as a result of lack of interest by students and inadequate number of geography teachers in our schools among others. The analysis of students' enrollment for WAEC within 2020-2023 in Nigeria clearly showed that there is attrition rate in Geography. Attrition therefore is the ratio of current population to that of the original number enrolled at the start. This ratio explains the fraction of the whole. The whole is the initial populations while the population that no longer study the geography, stands the numerator which is usually low and the initial population represents the denominator of the fraction which is larger.

Over the years, the teaching of geography in secondary schools in Nigeria has been criticized for not meeting the needs of the learner and the interest of the nation and was occupied by some guacks and ungualified teachers who cannot deliver both in terms of content and methodology (Ezema, 2014). Teaching of geography according to Ezema, had remained theoretical and enrollment rate of students in both internal and external examination had been observed to be low or poor that is high attrition rate so far recorded. Ezema (2014) and Khalil et al (2015) pointed out teaching methods, inadequate poor instructional materials, teacher's quality and quantity, nature of geography, inadequate time, lack of geography rooms (built laboratories); teachers and students attitudes are all responsible to geography students attrition in senior secondary schools. Lamenting on the state of instructional materials for the teaching of geography in Nigeria, Aderogba (2012), Nuratu (2014) and Khalil et al (2015) stated that non-availability of instructional materials for the teaching of geography in Nigeria is a thing of great concern that is quite frustrating to geography teachers.

Instructional materials or instructional aides are all tools which can easily be used by a teacher to correct wrong impressions and to

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illustrate things that learners cannot forget easily. It is a principle and method, which bring together men and materials in a systematic cooperation to effectively solve educational problems and remove abstractness of teaching and learning presentation from the learners' mind and print a more lasting mindset and permanency of learned material (Benjamin, 2014). Instructional materials are also seen as anything which is of help to the teachers and students and which minimizes learning in the various areas of technology. This definition implies that all resources that the teacher uses to enhance the teaching and learning of geography as put forward by NERDC (2007) are: Compass, aerial photographs, globe, tracing paper, (mathematical set, pair of compasses, pair of divider, ruler and others), printer, scanner, digitizer and sketch maps, others are measuring tapes, computers, Global Positioning System (GPS), radio, apparatus used for measurement of weather and climate elements, rock samples, correct soil samples, survey equipment, atlases, topographical maps, projector, charts, photographs and three dimensional such as models.

Ugoma, Usifo and Augusta (2017) carried out a research on the topic "Attrition of students in school enrolment in health science and biology is increasing due to many educational factors like instructional materials and school environment. Hussain and Sulaimon (2018) carried out research on Analysis of the Decline in the number of students who register and wrote Geography in Nigerian secondary schools. The study concluded that the relationship between the number of students that registered and sat for Geography in WAEC within the year under review is significant. Due to improvement in provision of instructional materials, and effective

teaching methods. Nwafor and Ugbor (2018) examined the factors militating against the effective teaching and learning of Geography in public schools in Onitsha North LGA of Anambra State. Findings of the study revealed that, appropriate usage of instructional materials helps in the retain of students to select particular subject for study. Teacher's attitudes towards teaching Geography, was not included in the reviewed study, as well as gender factormale and female Geography student.

### METHODOLOGY

Survey research design was adopted for the study. Survey research design is a research procedure in which information is gathered from a sample for the purpose of making inferences about the population of interest. The Population of this study consisted of 756 SSS II Geography students from both public and private schools in the study area. 189 students' serves as the sample of the study obtained through simple sampling random technique. Student assessment of factors influencing Senior Secondary school students' attrition in Geography Questionnaire (SAFAGQ) was used to collect data for the study. The instrument is designed to collect information on student's attrition. The reliability coefficient of the instrument was 78.6 obtained using Cronbach alpha statistics. This instrument was scored on a five point likert scale. The scoring was thus: strongly agree (SA)= 5 points; Agree (A)= 4 points, undecided (U)= 3 points, disagree (D)= 2 points and strongly disagree (SD)= 1 point while the scoring was in reversed order if the statement on the scale is negative.

#### **RESULTS AND DISCUSSION**

Research Question 1: What is the attrition level of Geography students in the study area?

I able 1: Attrition levels of students in Geography in the study area.				
Level of attrition	NO.	Percentage (%)	Degree	
Very high	240	68.6%	247°	
High	60	17.1%	62°	
Moderate	28	8.0%	29°	
Low	9	3.0%	9°	
Very low	13	4.0%	13°	

Table 4. Attribute laurals of students in O ......

The data in table one and figure two clearly show the level of students' attrition as thus: 68% represent 247° was very high, high attrition level was 17.1% represent 62° and 4%

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represent 13° is very low. These data means, the attrition level of students who studied Geography in the study area is very high.

**Research question 2:** What is the role of availability of instructional materials in Geography on Geography students' attrition?

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Table 2: The role of availability of instructional materials in Geography on Geography students' attrition	1
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SN	Items	n	mean	std. deviation	answer
1	The school has sufficient printed materials like reference books for Geography.	350	1.50	1.10	Negative
2	The school has sufficient graphic materials like maps and globes for the study of Geography.	350	1.33	0.88	Negative
3	The school has sufficient visuals materials like overhead projector for teaching Geography.	350	1.28	0.80	Negative
4	The school has sufficient audio- visuals materials like computer and videos for teaching Geography.	350	1.23	0.74	Negative
5	The school has weather station.	350	1.26	0.76	Negative

The data on table 4 revealed that students negatively responded to all items (1, 2, 3, 4 and 5) of the instrument which stated that the school has sufficient printed materials like reference books, graphic materials like maps and globes, visual materials like overhead projectors, audio-visual materials like computer and videos in teaching Geography and that the school has weather stations having mean score

of: 1.50, 1.33, 1.28, 1.23 and 1.26 respectively. This means that the absence of availability of instructional materials played a vital role in students' attrition in schools.

**Research question 3:** What is the effect of scope of Geography curriculum on students' attrition?

Table 3: The effect of sco	pe of Geography	curriculum on	students' attrition

SN	Items	n	mean	std. deviation	Answer
6	Geographic Information System (GIS) is difficult to understand.	350	4.32	1.22	Positive
7	Physical aspect of Geography is wide and difficult to cover.	350	4.29	1.25	Positive
8	Human aspect of Geography is wide and difficult to cover.	350	5.00	0.00	Positive
9	Regional aspect of Geography is wide and difficult to cover.	350	4.41	1.13	Positive
10	Map work is wide and difficult to study.	350	4.41	1.13	Positive

From table five, the data revealed that students positively responded to all items: (6, 7, 8, 9 & 10) of the instrument which stated that: it is difficult to understand Geographic Information System (GIS), as well Physical, Human, Regional and Map Work are wide and difficult to cover, having the mean of 4.32, 4.29, 5.00, 4.41 and 4.41 respectively. This implied that, scope of Geography curriculum has great effect on students' attrition. Findings of the study revealed that the attrition level of students who studied Geography in the study area is very high. This may be attributed to factors as contained in the objectives of the studies. This is not opposing the findings of Wachira, (2014), Zachary, and Oyinlade, (2015), Ugoma, Usifo, and Augusta, (2017), that students' attrition rate among secondary school stduents is very high due to lack of instructional materials and wide scope of

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geography note. Its only contradicts the studies conducted by Toryila, Tseah, and Adai, (2019) that geography attrition is caused by lack of adequate teachers that are teaching geography as majority of the teachers are either on parttime basis or volunteering to help the students, and negative attitude of teachers as well as parental influence. This is in collaboration with the shortage of teachers

Furthermore, the study discovered that there is unavailability of instructional materials in teaching geography. This makes the teaching and learning of geography uninteresting because of lack of student's interaction and hands on deck. At this stage, (Naval, & Setosta, 2013). Learning becomes boring for students. This is not different from the discouragements poised by the scope of Geography curriculum to students as a result of linking consequences of teacher competencies and unavailability of instructional materials (Rilwani, Akahomen, & Gbakeji, 2014).

### RECOMMENDATIONS

- 1. Male and female Geography student's attrition rate in public and private schools should be examine.
- 2. Geography students' attrition rate in public schools with that of the private in Rural and Urban schools should be explore.

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