

Research Article

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In-school factors constraining Bauchi state government and UNICEF girls' education programme strategies

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Abstract: Girls' education is critical to the development of Nigeria; as such, this comparative study is an attempt to investigate the extent to which in-school related factors constrained the girls' education programme strategies of the Bauchi State Government, Nigeria and UNICEF from improving girl-child education in the state. A mixed method research design comprising both qualitative and quantitative approach to data gathering was developed and utilized to obtain a sample size of 180 respondents out of a total population of 283 using Qualtrics quantitative sample size calculator

based on purposive sampling technique. Data obtained were analysed thematically and hypothesis tested using multiple regression with the aid of the SPSS statistical software (version 20) at 0.05 level of significance. The null hypothesis was rejected and the alternate upheld because it was found that school related factors, such as furniture, toilet and water facilities, availability of classrooms, teachers and school fence significantly constrained the girls' education programme strategies of the Bauchi State Government from improving girl-child education compared to that of UNICEF. In conclusion it was recommended that, the state government should utilize traditional and religious institutions to enlighten and create awareness about the benefits of the girls' education programme been implemented.

Keywords – Constraints, Girls' education, In-school factors, Programme strategies, UNICEF

1. INTRODUCTION

The education of girls is critical to knowledge acquisition and their development. It is a tool for the empowerment of girls to make them functional in their communities and the society as a whole. Every individual can realize their potentials through education which is perceived as a process of transmitting the culture, norms, values and ethics of a given society (Eze & Eze, 2018). Education is a fundamental human right and is a tool for improving quality of life and generates prosperity. That is what determines its priority on both national and global development agenda (Irfan, 2008). Available statistics indicates that, out of 134 countries, Nigeria ranks 118 in the Gender Equality Index (GEI) (NBS, 2018). The girl-child in Nigerian drops out of school earlier than their male counterparts. Adeboyeje (2000) and Emetarom (2004), opined that school facilities play a physical and spatial role in enabling teaching and

learning with attendant positive outcomes. It is to this extent that such facilities located in schools constitute vital infrastructures to learning and teaching. School facilities in this regard exist as structures in their permanent and semi-permanent states and may include machineries, laboratory equipment, the blackboard, teachers' tools and other equipment including consumables (Oyesola, 2000).

Ukwuaba (2008) has alluded to the fact that, girl-child education contributes immensely to the growth of a nation. But most schools where children or young learners, especially the girl-child is supposed to obtain quality education to make them valuable do not have classroom space that can be considered adequate. In addition, furniture is non-existent and the schools are often located in remote areas. Also, the combination of inadequate water, health and sanitation facilities and a high teacher to pupils' ratios (1:100) exist in most urban slums (UNICEF, 2007). To this extent, many parents with large families, limited resources and for religious reasons would rather allow their boys to go to school than the girls (UNICEF, 2007). It is thus not unusual to see public school enrolment figures increasing without an increase in school facilities to make up for teaching and learning that is sustainable. As a result, available facilities are over stretched. It is worth noting that Nigeria as a member of the United Nations (UN), must emphasise that in order to experience economic growth and achieve sustainable development, there is the need to train girls and women (Salman et al., 2011). In spite of the relevant role education plays in a developing economy like that of Nigeria, it is unacceptable that gender disparities still persist with regards to access and participation at the basic level of education.

2. THE RESEARCH PROBLEM

That the educational system in Nigeria especially at the primary level is in a state of decay is no longer news. This has become a major source of concern and was well captured in the Situation and Policy Analysis of Basic Education in Nigeria (SAPA) (UNICEF/FGN, 2001). The factors constraining girl-child education have been identified as: Poverty related economic issues, early marriages culminating in teenage pregnancy, school infrastructures that are nonexistent, inadequate or un conducive to learning and teaching, existing biases with respect to culture and religion, inadequate and poorly trained teachers, safety and security issues around schools affecting girls, lack of relevance of schools to the lives of children, etc. (UNICEF, 2006 and 2007). In Bauchi state, the problems associated with girl-child education include the deplorable state of infrastructure at the primary school level, shortage of primary school teachers, religious beliefs and ignorance of the value of education generally and girls' education in particular (BASUBEB, 2009).

To address these deplorable state of basic education, the Bauchi state government through the Bauchi State Universal Basic Education Board (BASUBEB) and UNICEF through the Girls' Education Project (GEP), rehabilitated primary schools in the state, provided learning materials for learners, trained and employed more primary school teachers, provided free education for girls, raised enrolment figures especially for girls and improved the quality of education offered with a view to attaining the set objectives of the Universal Basic Education (UBE). In spite of these interventions by the state government and UNICEF in the area of girl-child education, the girl-child in Bauchi state has not fared any better in basic education (Edeh, 2014). As such, it was found that about 76, 300 eligible school girls were out of school in Bauchi State in the year 2014 (Dabo, 2014). Therefore, how has the girls' education intervention programme strategies of the Bauchi state government performed in comparison to that of the United Nations Children's Fund (UNICEF)? In other words, what has been the impact and constraining factors of the girls' education intervention programme strategies of the Bauchi state government in comparison to that of UNICEF in improving girl child education? This is the question which guides the discussion below.

3. RESEARCH QUESTIONS

- i. What is the difference in impact of the Bauchi state government and UNICEF in-school factors in enhancing girls' education in Bauchi state?

- ii. Are there differences in factors constraining the Bauchi state government and UNICEF's girls education programme strategies from improving girl-child education?

4. RESEARCH OBJECTIVES

- i. To evaluate the difference in impact of the Bauchi state government and UNICEF in-school factors enhancing girls' education in Bauchi state.
- ii. To assess the differences in factors constraining the Bauchi state government and UNICEF's girls education programme strategies from improving girl-child education.

5. HYPOTHESIS

H_0^1 : That there is no significant difference on the impact on the girls' education programme strategies of the Bauchi state government and UNICEF in improving girl-child education.

H_0^2 : That there is no significant difference in the factors constraining the girls' education programme strategies of the Bauchi state government and UNICEF from improving girl-child education.

6. LITERATURE REVIEW

In-school factors

As an institution, a school provides an environment for pupils or students to learn under the guidance of teachers while school-based factors refer to physical, human and financial resources used by schools in the promotion of academic activities which if not provided, limits access and quality of education for the girl-child (Cooter, 2006). In-school factors are contextualized within this paper to mean the physical and human resources which if not provided limits access to and quality of education for the girl-child. These resources include: Water and toilet facilities (including separate toilet for girls), furniture for pupils and teachers, school fence, classrooms and qualified teachers (including female teachers). Girls have special needs especially at puberty, which if not provided, affects their performance negatively. Such facilities as well-constructed toilets with enough privacy and water assist girls in learning (Jacqueline & Sue, 2012). The apparent absence of sanitation that is considered safe and a relatively clean source of water, affects participation and learning for girls adversely. This is because, an improvement in school attendance for girls can be significantly anchored on the provision and availability of water and sanitation facilities that seen as adequate (British Council Nigeria, 2012).

The issue of security for learners, and teachers and for learning to take place is of great concern to the government, parents and learners themselves. This is with regards to the prolonged Boko Haram insurgency and pervasive farmers/herders crises ravaging the north eastern geopolitical zones of Nigeria (Bakari, 2013). Most schools in Nigeria do not have perimeter walls or fence. As such, Dunne *et al.* (2013) concluded that the absence of perimeter walls makes learners to wander about with resultant effect on school attendance. Furthermore, monitoring the movements of learners and teachers in and out of the school environment is challenging for head teachers; making it difficult to regulate the intrusion or control of outsiders which in turn exposes learners to avoidable violence. Recently, this has led to abduction of school children by Boko Haram insurgents for suicide bombing and sex slavery.

Another major problem in Nigerian schools is the shortage of qualified teachers (USAID, 2009) even though having the necessary qualifications is not a guarantee that the teacher possesses the requisite skills or knowledge to teach effectively (Johnson, 2008). In most cases, teachers without the requisite qualifications get appointed instead of those with required qualifications due to the fact that they are cheaper or connected to civil servants in the ministry of education and political gladiators; in addition to the fact that the non-involvement of girls in educational activities was found to be connected with a shortage of female teachers especially in rural areas (Williams, 2009).

7. THEORETICAL FRAMEWORK – ROLE THEORY

The proponents of role theory are of the view that the behaviour of human beings is influenced by the expectations of individuals and other people; and the behaviour of people is as a result of how the social environment created various roles to be fulfilled by both gender. The proponents of social role theory assert that there is a division of labour between men and women which is historical in nature which has assigned domestic responsibilities to women (at home) and external responsibilities to men (outside) (Eagly, 1987). The consequence of this sex differentiated roles or behaviour is that expectations between men and women became divergent (Eagly, 1987) and transferred to future generations which has affected the role or behaviour of each gender in the society or social setting (Eagly, Wood & Diekmann, 2000).

Role theorists have argued therefore that social roles have to be changed before any meaningful change in behaviour can be achieved. In other words, there is a corresponding relationship between roles and behaviours and vice versa. Thus it is pertinent to note that social roles have significant influence on one's belief system and attitude in addition to behaviour. It is this recognition that will influence a person (of either or both sexes) to effect a change in their beliefs and or attitudes to suite their expected roles. Therefore, it is the sex related social roles (stereotype) that determines human behaviour. The connection between role expectancies and behaviour is established first through the socialization processes where each gender acquires different skills or qualities. In other words, people who wield authority over individuals like teachers and parents, influence them to acquire and develop skills and qualities that facilitate their social role. Secondly, in any specific setting, gender roles directly affects the behaviour or a chosen course of action of an individual.

This theory is related to the present study in that its explanation of how the social environment shapes the role expected of individuals to perform can be used to explain the attitude of the society in Bauchi state towards the education of the girl-child. Thus, while the level of educational attainment of girls in an enlightened society can be expectedly high, the reverse will likely be the case in a society which is still very traditional. The societal context, therefore, plays a key role in what people think of girl-child education. The justification for using the role theory is premised on the fact that roles shape behaviour and behaviour in turn shapes beliefs and attitude towards issues. Thus, the perception of an individual on girl-child education is likely to be determined by what role(s) the individual performs in that particular society.

8. METHODOLOGY

8.1. Research design

In order to explore the issues related to government and UNICEF intervention in girl-child education in the selected LGAs of Bauchi State, a mixed method research design was developed and utilized for the study while the Girls Education Project (GEP) served as a case study. A mixed method strategy to scientific enquiry adopts and utilizes qualitative and quantitative methods in addition to a case study to collect and analyse data in order to understand a problem.

8.2. Population, sample size and technique

The target population are the UNICEF personnel/consultants involved in girl-child education, the staff of Bauchi State Universal Basic Education Board (BASUBEB) directly involved in the implementation of UNICEF GEP, the Education Secretaries (ES) of the selected LGAs that implemented GEP intervention, the School-Based Management Committees (SBMC) members and teachers of the 20 pilot schools/communities who were beneficiaries of UNICEF GEP intervention in each of the 3 selected LGAs for the study. The researchers decided to work within this population because they were involved with the GEP and the information obtained from these categories of respondents has the potential to make the findings of the study more acceptable. To conduct the study, it was necessary to select a total sample size of 180 respondents out of a total population of 283 respondents.

To ensure representativeness, one LGA was selected randomly from each senatorial zone of Bauchi state where UNICEF intervened in the area of girl-child education. They are: Giade LGA in Bauchi north senatorial district; Dambam LGA in Bauchi central senatorial district and Dass LGA in Bauchi south senatorial district. Five (5) pilot primary schools/communities were chosen in each of the three LGAs for in-depth study. The pilot primary schools were selected such that 1 was urban in nature, 2 semi-urban and 2 rural in nature. Two (2) non-GEP primary schools (1 semi-urban and 1 rural) were also chosen from each of the selected 3 LGAs for comparison.

The pilot GEP schools/communities who are beneficiaries of the GEP were represented by 10 teachers each comprising the Head Teacher (HT), Assistant Head Teacher (AHT), Subject Teachers (ST) in English and Mathematics, and Class Teachers (with focus on female teachers and Sciences and Civics teachers). Thus 10 questionnaires were administered to teachers in each of the 5 UNICEF (GEP) pilot schools in each of the selected LGAs of study giving a total of 150 teachers. Also, questionnaires were administered to 30 teachers (HT, AHT, English and Mathematics) from 2 non-GEP schools in the same selected pilot LGAs of study. This gives 180 questionnaires distributed in all (both UNICEF and government schools).

The sample size for questionnaire administration was arrived at using the Qualtrics quantitative sample size calculator. This was obtained by imputing the confidence level at 95 %, the margin of error at 5 % and the target population size of 283 to give a sample size of 163 respondents. However, this was increased to 180 respondents because deliberate efforts were made to ensure that more female teachers or at least 2 female teachers were administered a questionnaire irrespective of whether they were subject teachers captured by the study sample population. Three focus group discussions (FGDs) were conducted with 7 SBMC members of the respective UNICEF pilot schools in each of the 3 selected LGAs of study. Also, to get a view of government activities in improving access and quality education for the girl-child, 2 FGDs were conducted with 5 parents-teachers association (PTA) members of government primary schools in 2 selected LGAs. This gives a total of 5 FGDs conducted in all.

The purposive sampling technique was adopted because the choice of informants and cases were based on the characteristics and experiences that has a direct relationship with the research questions or phenomenon under investigation. It is a non-random sampling technique that does not need underlying theories or a set number of participants.

8.3. Sources of data

Both primary and secondary sources of data were utilized in the study. Primary data consists of first-hand information the researchers obtained from the field. Sources of primary data for this study include the semi structured interview of UNICEF, BASUBEB and Bauchi State Ministry of Education (BASMoe) officials involved in the GEP. Others are the Focus Group Discussions (FGD) with School Based Management Committee (SBMC) and Parents Teachers Association (PTA), observation of project facilities or infrastructures created as a result of the intervention in the study primary schools and the questionnaire which was used to compliment the interview, FGD and observation. In addition to primary sources of data, the study also made use of secondary sources of data which were already collected and documented in project reports, annual reports, newsletters, evaluation reports, enrolment statistics and policy documents in soft and hard copies. Secondary data were extracted from UNICEF records and publications, consultant reports, Bauchi state ministry of education documents, Plans and Reports, Bauchi State Universal Basic Education Board (BASUBEB) documents, GEP progress reports and School Based Management Committee (SBMC) files.

8.4. Research instruments

Research instruments used to collect data were interview schedule for UNICEF, BASUBEB and LGEA personnel involved in GEP; FGD interview schedule, checklist for observation, questionnaires for SBMC members and documentary analysis. They were developed and used to generate required data for this study. The semi-

structured interview method that was conducted was face-to-face and on one-on-one basis which gave opportunity for free interaction with respondents.

The focus group discussions are a combination of elements of both interviewing and participant observation. The distinguishing feature of FGD is that group interaction were utilized explicitly to generate relevant data and insights from respondents which may likely not be obtained without the interaction that a group provides. There was FGD to elicit information from SBMC members in the 3 selected GEP pilot schools/communities/LGAs for the study. Three FGD sessions were conducted with a minimum of 7 SBMC members. FGD was also conducted with a minimum of 5 PTA members in 2 locations of non-GEP schools/communities/LGAs. This enabled the study get information about government approach to girl-child education. The FGD was meant to enrich data obtained through secondary sources and semi-structured interviews.

The observation of project facilities created to improve education for the girl-child in the selected GEP and non-GEP schools/communities were also useful tools for acquiring relevant information. Project sites or locations within the benefitting schools/communities were visited to ascertain the actual projects executed by the Bauchi State Government (BASG) and UNICEF to improve education for girls. In other words, the concrete project infrastructures created through government and GEP interventions were inspected and their current status confirmed to ascertain if the facilities so created were still serving the purpose they were created to serve.

Observation was done directly and was non-participant in nature. Observation was done purposively as it would be practically impossible to observe all the selected schools. Observations were conducted in 3 GEP schools and 2 non-GEP schools in the selected pilot LGAs. The following were observed: Classrooms constructed or renovated, furniture supplied, water facilities, separate toilet facilities for girls, teaching and learning resources (textbooks, maps, charts, etc.), the schools in their settings, school fence, teachers–pupils interaction in a teaching session, neatness of school surroundings and pupils especially girl-children, etc. with the aim to determine whether the schools were well equipped and conducive to improve education for the girl-child. The questionnaire on the other hand was used as a device or instrument to obtain answers and have the advantage of collecting information from various people simultaneously and contained both open and close-ended questions to allow for collection of qualitative and quantitative data.

8.5. Validity of research instruments

The instruments (Interview/FGD schedules, questionnaire and observation checklist) were validated by experts in the field of project management and girls' education. Their suggestions/corrections led to the present form of instruments making them valid for use in the study.

8.6. Reliability of instrument

The reliability of an instrument or scale indicates the freedom of an instrument from random error so as to ensure consistency internally. The Cronbach's Alpha is one of the most commonly used and effective indicator of internal consistency and the coefficient of a scale should be above 0.7 (DeVellis, 2003). Thus values above 0.7 are considered acceptable; however, values above 0.8 are preferable. To analyze the Cronbach's Alpha for the questionnaires designed and used for the study, the Statistical Package for Social Sciences (SPSS) software (version 20) was used. The reliability of questionnaires designed and administered in UNICEF/GEP pilot schools has a Cronbach alpha of 0.91 while those administered in government/non GEP schools was 0.99. This result suggests very good internal consistency and reliability of the questionnaire as an instrument.

8.7. Methods of data presentation and analysis

Data obtained through the semi-structured interviews, FGD, observation and secondary data were presented in a thematic manner in such a way as to meet the objective and justify or debunk the hypotheses postulated for the study. Secondary data were presented first, followed by interview, FGD and questionnaire responses. In between,

where applicable, reports of observations made were also presented. Each source of data was used to corroborate or reinforce the other or even to counter a position. Data obtained through the questionnaire was presented in tabular form followed by detailed explanation (description). A descriptive analysis of the quantitative data in the form of simple frequencies and percentages was employed. Also, the parametric statistics in the form of multiple regressions was used to test the hypothesis postulated at the 0.05 significance level using the SPSS version 20 software. The study adopted multiple regressions because each of the study hypotheses comprises a dependent variable and an independent variable with multiple indices explaining them. Hence the study is interested in explaining the relationship between the independent and dependent variables and the predictive power of the indices in the independent variable on the dependent variable.

8.8. Multiple regressions model

The variables for government and UNICEF In-school factors are:

$X = GSF_1, GSF_2, GSF_3, GSF_4, GSF_5$

$X = USF_1, USF_2, USF_3, USF_4, USF_5$

Where:

$GSF_1, USF_1 =$ Lack of water and sanitation facilities

$GSF_2, USF_2 =$ Lack of furniture for teachers/learners

$GSF_3, USF_3 =$ Inadequate classrooms

$GSF_4, USF_4 =$ Lack of school fence

$GSF_5, USF_5 =$ Inadequate teachers/female teachers

These are the indicators of government and UNICEF In-school factors (GSF & USF) and represent the Independent Variable (IV), while the Dependent Variable (DV) (Y_i) is girl education programme strategies. The multiple regression model is specified as: $Y = d_0 + d_1x_1 + d_2x_2 + d_3x_3 + d_4x_4 + d_5x_5 + U_t$ -----

Where d_0, d_1, \dots, d_5 are the coefficient to be estimated and U_t is the disturbance or residual or error term used to capture other factors that improve girl-child education but not included in the model.

NB: GSF – Government Schools (in-school) Factors, USF – UNICEF schools (in-school) Factors

8.9. Data presentation and analysis

Data presentation and analysis was based on the empirical data obtained from the field. Data were presented based on the key in-school related variables and hypothesis, after which the hypothesis was tested.

a. Water and toilet facilities

The availability of water and toilet facilities in schools is a major factor in improving access and quality girl-child education. This fact was reported by interview (A. Koriyo, personal communication, November 17, 2017) and FGD respondents from both GEP and non-GEP schools/communities. All the GEP schools visited have functional water and toilet facilities, including separate toilet for girls. This is as a result of GEP interventions by UNICEF. The SBMCs and the benefitting school management are responsible for the maintenance of water and toilet facilities. Four of the non-GEP schools visited do not have functional water facilities, only two have available and functional water facilities.

It is evident that the problem with water and toilet facilities in non-GEP schools is non maintenance of installed facilities. Although all of non GEP schools have toilet facilities, they are in bad shape as the environment around the toilet facilities are not properly taken care of. The state of water and toilet facilities in schools has positive or negative effect on access and quality of girl-child education. Non-availability and functionality of these facilities have adverse effect on programme strategies. In Bauchi state, between 2008 and 2009 a total of 161 latrines were constructed in GEP primary schools. As a result over 60, 000 pupils had access to and practised good toilet habits. Also a total of 98 boreholes were also completed (UNICEF, 2012).

Clearly, the non-availability of water and toilet facilities in non-GEP (government) schools constrained the girls' education programme strategies of the Bauchi state government more than those of GEP (UNICEF) schools from improving access and quality girl child education.

b. Furniture for teachers and learners

Head teachers and classroom teachers from non GEP schools asserted that classroom furniture such as chairs/desks for teachers/learners have become inadequate making the learning environment un-conducive for learning (Y. Y. Bello and A. Koriyo, personal communication, November 17, 2017). They observed that available chairs/desks now accommodate more learners than originally intended for as damaged furniture are not replaced or repaired on time. In GEP pilot schools visited, there were adequate furniture for teachers and learners which is a major motivation for enrolment and attendance for learners including girl-children. As observed by a respondent (S. Abdullahi, Focus Group Discussion, November 21, 2017) that before GEP intervention, most schools in the focus communities/LGAs lack comfortable chairs and desks for pupils and teachers. Where they are available, they were in dilapidated state. Therefore, it is not uncommon to find pupils sitting on the floor in classes. Also, in a chat it was observed that inadequate financial allocation to the education sector on the part of Bauchi state government made it nearly impossible for the purchase of adequate chairs and desks and other learning materials before GEP intervention.

Part of the GEP intervention includes the provision of chairs and desks for teachers and learners to improve access and quality education. All GEP pilot schools were furnished so as to reduce the constraints of inadequate furniture on the success of programme strategies. However, inadequate provision of furniture for teachers and learners in non-GEP schools constrained the state government strategies from improving access and quality girl-child education.

c. School fence

The availability of school fence is an indicator of safety for learners. Parents/guardian of learners put the safety of their children especially girl-children into consideration before enrolling them in schools. All the GEP pilot schools visited were fenced while only two out of six non-GEP schools were fenced. Those schools were located in urban and semi-urban areas while those in rural areas were not fenced. The education secretaries interviewed decried the quality of contractors used to erect school structures. They said some erected school fences have collapsed as a result of heavy rains because of shoddy job execution by contractors.

A respondent (K. Katagum, personal communication, November 18, 2017) posited that *when schools are not fenced, it is opened to all and sundry making schools unsafe and un-conducive to learning as pupils will be distracted to happenings around them*. School fence can help monitor pupils from leaving the school premises whenever they like to look for food, water or writing materials or simply because they don't like school which may affect the pupil's academic performance and eventual dropping out of school. When lack of safety discourages parents/guardians from allowing their girl-children to access primary school education, it becomes a constraint on programme strategy. Thus non-availability of school fence for learners' safety constrained government programme strategies more than that of UNICEF.

d. Classrooms

Classrooms should be adequately provided to make primary education meaningful to girls. It is a common feature to see most public primary schools in Bauchi state with inadequate and dilapidated classrooms. While FGD respondents from both GEP and non-GEP schools/communities acknowledged the efforts of the state government through BASUBEB in renovating and maintaining classrooms, most respondents within the school/community reiterated the need for more government assistance to improve access and quality of education for girls. This was

particularly the case with the schools/communities in rural locations that are characterized by inadequate, dilapidated and unusable classrooms (Researcher's observation, November 21, 2017).

There was dissatisfaction with the state of classrooms in the community primary school in Dambam. The broken classroom floors makes children come back home with dirty uniforms and school bags. Also, *the state of school furniture and chalkboards is nothing to write home about* (S. Abdullahi and G. Garba, Focus Group Discussion, November 21, 2017). Classrooms should be adequate and conducive for learning. There should be adequate furniture, proper seating arrangement, work space, lighting and ventilation and a writing board that is visible to all learners.

All GEP pilot schools for the study have adequate classrooms that are conducive to learning with charts, maps, pictures, painted walls, etc. The non-GEP schools selected for the study also have adequate classrooms but most of them do not have charts, maps, pictures, lighting, neat and painted walls, etc. Virtually all schools visited have enough classrooms, as there were no pupils learning under the tree in any location (Researcher's observation, November 21, 2017). When classrooms are not conducive enough to attract learners to participate in primary education it becomes a constraint to programme strategy. By making GEP pilot schools' classrooms conducive for learning, classrooms do not constrain UNICEF programme strategies as like that of the state government.

e. Availability of teachers

As part of efforts to improve quality education, the GEP intervention through the Female Teachers Training Scholarship Scheme (FTTSS) built the capacity of female teachers. Aside the NCE programme at the College of Education, Azare, workshops were organised for teachers generally where they were trained on how to prepare lesson notes, maintain good teacher-community relations and lesson delivery methodology. In the course of discussion with LGEA education secretaries, they acknowledged that the training has led to a significant improvement in the preparation of lesson notes. As a result of this improvement, pupils' interest in academics and learning has being positively stimulated.

With respect to teacher's supply in terms of quantity and quality, the report showed there was a marked improvement in the pupil-teacher ratio between the time baselines surveys were conducted before project implementation to the point of project dissemination. There has been improvement in primary school teacher's qualification since 2008 when the FTTSS commenced. This has ensured that the teacher-pupil ratio (TPR) was established and maintained at an average of 1:55, while a few female teachers were employed and assigned to teach in schools located in rural areas. Although qualification alone does not guarantee performance of pupils but it is critical to have and engage high quality teachers at the primary school level which is considered to be the foundational level of any educational pursuit. In fact, it is well elaborated in the document that "engaging qualified teachers and the extent to which they are able to apply their teaching skills" in practical terms has a significant impact on girls' education.

A respondent (A. Koriyo, personal communication, November 17, 2017) highlighted that *unqualified teachers, inadequate and outdated teaching materials and methods* as major limitations to access and quality girl-child education. As a result, *the quality of teaching in government schools is low*. In addition, teachers, especially qualified teachers are essential to the performance of any intervention programme strategy. Inadequate and unqualified teachers inhibit access and quality education. FGD respondents in non-GEP schools assert that some teachers lack the minimum teaching qualification and lack adequate knowledge of the subjects they teach which makes teaching and learning difficult for girls. Lack of qualified teachers is sometimes attributed to scarce resources by the government to employ more qualified teachers. Based on interviews and FGDs, respondents indicate that despite government efforts, *some of the teachers are not qualified to teach*. As such, most teachers in non-GEP primary schools do not have the required qualification to teach. As at the time of field work, education secretaries and head teachers were unable to provide specific data on the number and qualification of primary school teachers in each school visited for the study.

Lack of qualified and experienced teachers in most public primary schools in Bauchi state could be as a result of the fact that teaching is not an attractive and well remunerated profession despite the inducement allowances paid to teachers. Increase in enrolment, if not matched with increase in the provision of classroom and recruitment of more teachers may result in a situation where the number of pupils is higher than that of teachers per class. Qualified teachers are not willing to work and teach in rural schools and communities of the state. This has serious implication for access and quality of education for girls in rural areas. Well over 70% of the teachers in GEP schools state-wide have been trained both in literacy and numeracy skills, child-friendly curriculum and pedagogical skills, etc. (UNICEF, 2012).

Female teachers are difficult to come by in most rural schools and most married female teachers prefer to be posted to areas where their families reside and to urban or semi-urban locations. Observation shows that GEP pilot schools have more teachers as a whole with a high proportion of female teachers compared to non-GEP schools. As such, the FTTSS has improved access and quality girl-child education in the GEP pilot primary schools in Bauchi state.

Table 1: Type/Extent to which In-School Factors Constrained Programme Strategies

In-school factors	UNICEF Schools			Government Schools		
	High	Ave	Low	High	Ave	Low`1`
Inadequate water/ sanitation facilities	28 (19%)	19 (13%)	100 (68%)	12 (40%)	11 (37%)	7 (23%)
Lack of furniture	13 (9%)	46 (31%)	88 (60%)	9 (30%)	8 (27%)	13 (43%)
Insufficient classrooms	16 (11%)	27 (18%)	104 (71%)	16 (53%)	8 (27%)	6 (20%)
Lack of school fence	7 (5%)	24 (16%)	116 (79%)	9 (30%)	9 (30)	12 (40%)
Inadequate female teachers	70 (48%)	29 (20%)	48 (32%)	20 (67%)	4 (13%)	6 (20%)

Source: Field Work (2017)

From the data obtained from questionnaire administration available in table 3, on the types and extent in-school factors affect girl-child education, 19% of respondents from GEP schools rated inadequate water and sanitation facilities high, 13% rated it average while 68% rated it low in affecting access and quality girl-child education in their schools/communities. On the other hand, 40% of respondents from non-GEP schools rated inadequate water and sanitation facilities high, 37% rated it average while 23% rated it low in limiting access to and quality of girl-child education.

In addition, 9% of respondents from GEP schools rated lack of furniture high, 31% rated it average while 60% rated it low in affecting access and quality. From non-GEP schools, 30% of respondents rated furniture high, 27 % rated it average while 43% rated it low in influencing access and quality. Also, 11% of respondents from GEP schools rated insufficient classrooms high, 18% rated it average while 71% rated it low in affecting access and quality girls' education. In the same vein, 53% of respondents from non-GEP schools rated insufficient classrooms high, 27% rated it average while 20 % rated it low in influencing access and quality education for girls. With respect to school fence, 5 % of respondents from GEP schools rated it high, 16% rated it average while 79% rated it low in limiting access and quality girls education.

Subsequently, 30% of respondents from non-GEP schools rated school fence high, another 30% rated it average and 40% of respondents rated it low in influencing access and quality education. Finally, 48% of GEP schools respondents ranked inadequate female teachers high, 20% ranked it average while 32% ranked it low in affecting access and quality girls' education. On the other hand, 67% of respondents from non-GEP schools ranked inadequate female teachers high, 13% ranked it average while 20% ranked it low in affecting access and quality girls' education. Clearly then, in-school factors constrained both the Bauchi state government and UNICEF girls' education intervention programme strategies but with more constraint on government programme strategies or non-GEP schools/communities. This means that UNICEF has to some extent been able to address issues related to in-school factors affecting access and quality girl-child education through the GEP.

Test of Hypothesis

The primary data obtained through questionnaire administration was coded in the SPSS software (version 20) and multiple regression technique for data analysis was used to test hypotheses at the 0.05 level of significance.

H₀: In-school factors do not significantly constrain the girls’ education intervention programme strategies of the Bauchi state government and UNICEF from improving access and quality of girl-child education.

Table 2: ANOVA^a Result for Hypothesis

Respondents	Model	Sum of Squares	Df	Mean Square	F	Sig.
Government	Regression	1340.783	5	268.157	221.285	.000 ^b
	Residual	29.084	24	1.212		
	Total	1369.867	29			
UNICEF	Regression	740.932	5	148.186	20.226	.000 ^b
	Residual	1033.041	141	7.327		
	Total	1773.973	146			

Source: Researchers’ Computation (SPSS version 20)

a. Dependent Variable: GAQ / UAQ

b. Predictors: GSF / USF (In-school Factors)

Table 4 indicates that the F_{cal} value of 221.285 for government in-school factors and the associated significant level of 0.000 is less than the 0.05 level of significance. Also, the UNICEF F_{cal} value of 20.226 at the associated significant level of 0.000 is less than the predetermined significance level of 0.05. This shows that the model is significant and that the combination of the independent variable (GSF 01-05) significantly predicts the dependent variable (GAQ) and (USF 01-05) significantly predict the dependent variable (UAQ).

Table 3: CO-EFFICIENT^b Output for Hypothesis

Model	Standardized Coefficient		Sig.	Remarks
	Beta	T		
(Government School Factors)		1.015	.320	
Inadequate Water / Sanitation	.189	2.501	.020	S
Lack of Furniture	.159	.966	.344	NS
Insufficient Classrooms	.197	1.941	.064	NS
Lack of School Fence	.385	2.445	.022	S
Inadequate Teachers (Female)	.124	1.464	.156	NS
(UNICEF School Factors)		28.293	.000	
Inadequate Water / Sanitation	-.248	-1.602	.111	NS
Lack of Furniture	.103	.525	.600	NS
Insufficient Classrooms	.087	.644	.521	NS
Lack of School Fence	.798	8.141	.000	S
Inadequate Teachers (Female)	-.143	-.767	.444	NS

Source: Researchers’ Computation (SPSS version 20)

(S – Significant < 0.05 NS – Not Significant > 0.05)

Based on available statistics in table 5, two out of five indices of government school factors significantly predicted the relationship between the independent and dependent variables. These are inadequate water and sanitation (r =

0.020) and Lack of school fence ($r = 0.022$). Lack of furniture ($r = 0.344$), Insufficient classrooms ($r = 0.064$) and inadequate teachers ($r = 0.156$) did not significantly predict the relationship for Bauchi state government variables. On the other hand, only lack of school fence under UNICEF school factors ($r = 0.000$) significantly predicted the relationship between the independent and dependent variables under UNICEF. Therefore, the null hypothesis is rejected and the alternate which states that in-school factors significantly constrained girls' education intervention programme strategies of both the Bauchi state government and UNICEF from improving girl-child education is upheld.

9. DISCUSSION OF FINDINGS

The study found that in-school factors significantly constrained the girls' education programme strategies of the Bauchi state government and that of UNICEF from improving girl-child education. Findings on in-school factors that constrained programme strategies include lack of water and toilet facilities (including separate toilet for girls) which is supported by findings from GEP evaluations that school attendance can be improved with the provision of adequate water and sanitation facilities (British Council, 2012). With respect to findings on the impact of school furniture on access and quality education, there seem to be an agreement with the postulation of UBEC (2012a) that, the condition of infrastructure in a given school has a major impact on the educational quality and sustenance of learners' access to education in perceived and actual terms in Nigeria.

School fence also affects access and quality of girls' education and agrees with Dunne *et. al.*, (2013) who asserted that the non-availability of school fence or perimeter walls has effect on learners because it encourages pupils to wander away from the learning environment thereby affecting school attendance. It is also difficult or even impossible for head teachers to monitor the movement of learners, teachers and other staff; as such the incursion of outsiders exposes learners to dangers and violence. Finally, findings on availability of classrooms/learning materials is related to the works of Bullock (2007) who provided evidence that a positive relationship can be established between the physical environment in which learning takes place and the learning outcomes of pupils or students.

However, the constraining effect of in-school factors may be higher on government strategies compared to that of UNICEF. This is because, through the School Based Management Committees (SBMCs) which are functional in GEP pilot schools, renovation and maintenance of school infrastructural facilities are carried out regularly. Also, UNICEF provides small grants to pilot schools based on the concept of the Whole School Development Plan (WSDP). In addition, SBMCs raise funds from other sources to support schools located in their communities.

10. CONCLUSION AND LESSON LEARNT

The study found that in-school factors significantly constrained the girls' education programme strategies of the Bauchi state government from improving girl-child education more than UNICEF programme strategies. Some remedies to the challenges affecting girl-child education may be gender-neutral. The state government uses the top-down approach to implement a gender neutral policy predominantly to encourage basic education for every Nigerian child; IDPs such as UNICEF utilize a bottom-up approach to implement gender specific policies to encourage basic education delivery. It must be realized that some gender neutral strategies implemented by both the government and IDPs such as provision of uniforms, text / note books, classroom furniture, school security, improvement in teacher -pupil ratio, etc. may have greater benefits for girls than boys. Therefore, the gender neutral policies of government implemented through the UBE and the gender specific policies implemented by IDPs are complimentary and relevant to enhancing girl child education in Bauchi state.

The provision of school infrastructure such as water and sanitation facilities, renovation of classrooms, provision of furniture, school fence, etc. and learning materials such as text/note books, charts, maps, etc. and other incentives like uniforms and schoolbags has made GEP pilot primary schools more girl children friendly and conducive for learning while also reducing the cost of education on parents. This is in addition to some form of

psychological impact on children especially girl children because it elicits a positive attitude towards education by motivating them to learn. It also encourages them to attend school regularly and embracing punctuality as an attitude.

The Female Teachers Training Scholarship Scheme (FTTSS) has proved to be a good strategy in recruiting and retaining female teachers in primary schools to serve as role models to encourage more girls to go to school. The method of recruiting and training teachers through the FTTSS is a good way of recruiting female teachers than recruitment after training. There is a likelihood of high retention of teachers under the FTTSS than when already trained teachers are recruited. This is because such teachers may have chosen the teaching profession out of frustration rather than a desire or passion for the profession.

There should be provision of or maintenance of school related facilities to meet up with the enrolment of pupils, especially girl learners. The maintenance of school facilities requires as much as feasible keeping such facilities near their original state of procurement or creation and is critical to encourage the enrolment of girls in basic education.

The FTTSS should be strengthened, monitored and evaluated for effectiveness. Also, more female teachers should be recruited and deployed to schools in rural communities to serve as role models to girls and further increase access and quality education of girls in primary school.

Water and toilet facilities should be provided in government schools as obtained in UNICEF GEP pilot schools to encourage girls to attend.

The security of young learners (especially the girl child) should be enhanced through the establishment of schools in safer locations and the erection of perimeter walls where they do not exist.

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