# Stakeholders' Perception of Factors Influencing Low Academic Performance of Pupils' in Basic Education Certificate Examinations in Ghana

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Abstract: The study aimed at looking at factors influencing stakeholders' perception of factors of low academic performance of pupils in Basic Education Certificate Examination in Pusiga District. The study also sought to find out how teachers', pupils, and parents perceive the factors responsible for pupils' low academic performance in BECE. The sources of data comprised questionnaires. The respondents were 270 comprising teachers', pupils, and parents. The study's findings unearthed that multiple factors influence the low academic performance of pupils. The school and teacher-related factors that influence low academic performance included lack of monitoring and supervision of learning, misuse of instructional time, and teacher incompetence. But, the pupils' related factors included problems with language proficiency, negative attitudes towards learning, and problems of regularity and punctuality. The study also found that the home and parent-related factors that significantly influenced pupils' performance included a lack of conducive home environment, lack of parental involvement, and monitoring of children's education. The study concluded that attention needs to be paid to the language proficiency of the pupils, pupils' attitude towards learning, and regularity and punctuality to school to enhance the academic performance of the pupils. It is recommended that the District Directorate and Head teachers intensify their supervision and monitoring roles, offer guidance and counselling, and periodically organize in-service training for teachers. Also, parents should monitor pupils learning at home. Therefore, it is pertinent that education stakeholders look at considering comprehensive factors that influence the academic performance of pupils in the Pusiga District, instead of concentrating on selective individual factors.

*Keywords:* Academic Performance, Basic Education Certificate Examination (BECE), Effective School, Home and Parentrelated Factors, Low Academic Performance, School and Teacher-related Factors and Pupil-related Factors

# I. BACKGROUND OF THE STUDY

The influence of formal education in development efforts is well recognized worldwide. According to Okumu; Nakaijo and Isoke, (2008), education is regarded as a fundamental human right as well as a catalyst for economic growth and development of nations. Education is valued because it provides the skilled human resource needed for a nations' economic development. It is in this vein that Kapinga, (1992) argues that education helps in developing highly skilled human resource of nations which in turn enhance promote the development of every and nation.Education has long been seen as an instrument for the of peoples' character and socio-economic shaping development of nations across the globeIt appears that quality education is the key to national development. In effect, investing in it will lead to the growth of a country's economy and this explains why Schults, (2002) argues that both developed and newly industrialized countries have developed to their present status as a result of the investment they have put into education. It is therefore not surprising that countries in Africa, South of the Sahara are investing considerable resources into education, probably because of the important role education play in national development. To build a free, democratic and just society, and above all, a united, strong, and a self-reliant nation towards becoming a great and dynamic economy and open opportunities for her citizens, Nigeria, for example, introduced programmes in education among which was the implementation of the Universal Primary Education (UPE) for all Nigerian children of schoolgoing age (Fafunwa, 1974; Balogun, Okon, Musaazi and Thankur, 1984).

The situation in Ghana seems not to be different. Education in Ghana has long been recognized by various nationalist governments as a means of national development. Although various colonial governments' administrations and the various missionary partners laid a solid foundation for the development of formal education in Ghana, postindependence education was given a further boost by the Nkrumah's regime (MOEYS, 2000). Nkrumah saw formal education as a key to national development and this explains why fee-free compulsory basic education, rapid infrastructural expansion, and supply of free textbooks and equipment in basic schools across the country were introduced. Reports say Ghana has developed and introduced policies to boost access to basic education since independence. For example, as per Akyeampong, Djangmah, Oduro, Seidu, and Hunt, (2007), the ADP strategy's fundamental goal was to increase access to basic education by abolishing tuition fees. Ghana has been introducing initiatives such as the capitation grant, school feeding programme, free exercise books, and uniforms over the last decade to improve access to basic education. Reports

indicate that the enrolment rate for pupils in Ghana has gradually improved as a result of these policies

### Statement of the Problem

In Ghana, the general performance of pupils in a public examination such as BECE is a key determinant of whether the goals of school curricular and national philosophy of education are meeting established goals and standards. Given this, the government of Ghana in partnership with some Nongovernmental organizations has over the years implemented various programmes in the educational sector to realize these objectives (MOEYS 2007). Despite the implementation of the various flagship programmes such as free compulsory universal basic education, free school uniforms, school feeding programmes, eradication of schools under trees, and a general increase in the supply of educational logistics, the performance of students at the BECE has been declining in some districts in Ghana (BECE National Survey, 2015; 2016; 2017). Pusiga is one of the districts that have witnessed a persistent decline in BECE in recent times. Despite the myriad of interventions by successive governments and other development partners aimed at improving the quality of basic education in the country, the phenomenon remains unchanged. Notable among these interventions by the government is the FCUBE policy, school feeding programme, and free school uniforms.

Several studies in the past (Mwaura, 2014; Baidoo-Anu, 2017; & Nambuya 2017) explored pupils' poor performance in public examinations but what appears to be concealed in their findings are why some schools continue to perform well in examinations whereas others consistently perform poorly despite the myriad of interventions by government and civil society organizations. The Chief Examiner's report regarding basic education certificate examination has repeatedly attributed pupils' low academic performance to factors such as poor reading, writing, and comprehension skills (Chief Examiner's Report 2002; 2003 &2004). In support of the findings of the report, a study by (Etsey, 2005; Anang, 2011) further corroborated previous studies which concluded that the causal factors of pupils' non-performance were largely due to pupils' lack of comprehension skills. But these studies were conducted in differing contexts; a study is therefore needed to establish the factors accounting for the low academic performance of pupils in the current context.

# Purpose of the Study

The purpose of this study is to ascertain stakeholders' perceptions about factors accounting for the low academic performance of pupils at the Basic Education Certificate Examination within the Pusiga District.

Specifically, the study will:

1. Assess whether teacher qualification and work experience account for differences in pupils' academic performance

2. Determine the influence of family size and parental occupation on pupils' academic performance

#### II. RESEARCH QUESTIONS AND HYPOTHESES

#### Research questions

The following questions guided the study:

- 1. What variables related to schools and teachers predict learners' academic performance?
- 2. What factors associated with pupils predict the academic performance of the learners?

## Hypotheses

1. H<sub>01</sub>: There is no statistically significant difference in the academic performance of pupils' due to the work experience of teachers

H<sub>1</sub>: There is a statistically significant difference in the academic performance of pupils due to the work experience of teachers

2.  $H_{02}$ : Parental occupation does not significantly account for the differences in pupils' academic performance

H<sub>2</sub>: Parental occupation significantly account for the differences in pupils' academic performance

3. H<sub>03</sub>: Family size does not account for the differences in pupils' academic performance

H<sub>3</sub>: Family size accounts for differences in pupils' academic performance

## Significance of the Study

The study will yield useful results to the main educational stakeholders' in the Pusiga District regarding the factors accounting for the persistent decline in learner's academic performance at the basic education level. It appears that factors accounting for low academic performance among learners appear unknown to educational stakeholders; parents, teachers, and students. In effect, the study will provide parents. teachers, pupils, and other agencies with useful insights into how to improve quality education within the study context.

## III. THEORETICAL FRAMEWORK

The theory that framed the study is Lezotte's, (2010) Effective schools Model. The model states that schools can make a difference in academic performance even though their student body is made up of learners' who come from disadvantaged backgrounds. Lezotte further identified seven features of effective schools which he termed as correlates of the effective school. The seven correlates are clear school mission, high expectations of success, strong instructional leadership, learning and student time on tasks, safe and orderly environment, positive home-school relationships, and frequent pupils progress monitoring (Lezotte, 2010). On the correlate of clear school mission, school heads develop a vision and mission for their schools and share this vision and mission with members of the educational community such as teachers, pupils, and parents. While the vision indicates what the school should be, the mission, on the other hand, specifies how the school will be what it wants to be. The correlate of high expectations for success is based on the assumption that each pupil can learn and teachers can influence student learning. In effect, teachers plan and implement their plans to achieve set goals and objectives for the benefit of learners.

On the correlate of instructional leadership, Lezotte argues that schools need effective leadership that will clearly articulate the school mission and vision to all interested parties. Teachers must be aware of the gains to be derived when all teachers perform their tasks as expected. Schools are likely to chalk different forms of success when teachers work harmoniously with head teachers. In effect, head teachers are expected to be visibly present in classrooms most of the time, providing teaching resources, supporting teachers in their classroom management, and regularly organizing in-service training for teachers on regular basis to enhance their content and pedagogical knowledge.On the issue of learning and student time on task, Lezotte posits that equal opportunities should be given to each learner regardless of one's ability. By implication, Lezotte argues that school education should be directed by the educator who determines what to teach and how long it takes to teach different concepts. Great schools give learners' opportunity to spend some time on tasks, learning under the teacher's direction and guidance.

A safe and orderly environment ensures that if education is to be encouraged, schools act as supportive hubs. In essence, there should be mutual respect between members of a school community and this is what defines safe and orderly schools. Moreover, mutual respect becomes a common element that characterizes the daily interventions between the pupils on daily basis (Lessotte,2010). Also, teachers impart knowledge, attitudes, and virtues to pupils both directly and indirectly. Good schools are defined by a positive relationship among homes and schools, according to Lezotte. To achieve this, it is expected that schools will open up to parents and that the latter will reciprocate by supporting schools to achieve their vision and mission. Great schools create opportunities for parents in various school systems to play significant roles. These schools roll up numerous development programmes for parents, all designed to create positive relationships between home and school.

## Conceptual Framework

Figure 1 shows a linkage between the different independent variables and pupils' academic performance. This linkage shows that there are multiple factors affecting performance of pupils.



Independent Variables

Figure 1: Conceptual framework showing the link between independent variables and academic performance

## IV. CONCEPTUAL REVIEW

#### The concept of low academic performance

Low academic performance has long been a subject of interest to several scholars. West African Examinations Council, (2019) defines low academic performance at the level of BECE to embrace grade performance in individual subject disciplines that ranges from grade 7 to grade 9. The description of such performance denotes performance that is neither good nor pleasing. Awinimi, (2006) posits that low academic performance is experienced when pupils perform below their grade level. The consequences of persistent below-average performance are that stakeholders in the education enterprise such as parents, teachers, and pupils have consistently accused each other regarding the low academic performance of pupils. Okoye, (1987) argues that low academic performance is the kind that falls short of expected standards. The standards usually provide the basis upon which performance is judged. From this assertion, pupils whose performance falls short of the standards or fail to measure to the clearly defined standards or criteria are described as exhibiting low academic performance.

The implication of low academic performance is grave. Apart from its effects on an individual's educational pursuit and advancement, its combined effects on parents, the immediate and larger society often appears frustrating. Basic education is supposed to be the foundation of formal education. Academic performance at the level of basic education no doubt appears to be a catalyst to future educational prospects and success. But, low commitments by stakeholders to educational provision are functions of persistent low academic performance of pupils. Stakeholders such as parents are dutybound to serve as lead stakeholders of education, which in turn galvanizes teachers, civil society organizations, and pupils to contribute their bit towards a noble cause of educational provision when pupil's academic performance consistently remain low. On the contrary, there is likely to be a surge in the degree of investment and commitment to education when there is a consistent rise in pupil performance. The reason perhaps might be that education has largely been considered as an instrument that can be used to secure rapid socio-economic development of nations and this explains why stakeholders place much significance on quality education delivery at all levels of education.

# School and teacher-related factors influencing academic performance

In a study to identify the factors affecting the success of college students in schools in Gurugram, India; Arora, and Singh, (2017) observed that teachers who have expertise on the subjects, ability to build interest in the topic, and hold good interaction with learners play an important role in the achievement of learners. The study suggested that learners' performance could be improved if the college's teaching faculty provided adequate learning facilities and employs effective teaching and learning approaches for students, as well as improving the college environment. Several factors related to the school and teachers have been identified as influencing academic performance. These include the availability of instructional resources; class size and teacherpupil ratio; teacher qualification and quality of teachers; time management, and motivation of teachers. Others include school monitoring; location of schools and the quality of school infrastructure (Adeyele&Yussif, 2012; Nambuya, 2013; Allan, 2016; Arora & Singh, 2017; Keiti, 2017).

# Availability of learning resources and academic performance

Juma, (2011) posits that the performance of learners in public examinations are a reflection of the learning facilities in schools. Husen, Saha, and Noonan, (1978) argue that schools with sufficient teaching materials are most likely to post grades of better quality than schools with poor learning materials. In effect, learners from disadvantaged backgrounds underperform in tests because they are in areas where schools do not have the requisite resources. A school with insufficient classrooms is likely to accommodate more learners than recommended. The pressure on resources both material and financial can compromise the quality of teaching and learning which in turn impacts negatively on the quality of education (Psacharpolous&Woodhall, 1985; Nafukho, 1999). The result is an effect on pupil learning quality, as well as general low performance in exams.In his research dubbed the impact of human resources on academic performance among learners, Nambuya, (2013) classified human resources to include teachers, support staff, and students in his analysis of academic performance at secondary schools in Teso District. Kenya. The adequacy and quality of the human capital school have far-reaching consequences for how students learn and succeed in their examinations. Adequacy of teachers is also reflected in the student-teacher ratio. For situations where the student-teacher ratio greatly outweighs the ideal, academic achievement is usually affected. In this way, Nambuya states that learners with low academic performance have been partly accused of a lack of sufficient teaching staff. Since the high learner teacher ratio enables teachers to accommodate large classes, there is a tendency to sacrifice the standard of academic results. Difficulty in giving individual learners attention combined with a probability that teachers will use inadequate teaching methodologies makes teachers ineffective in teaching. In reality, Nambuya (2013) attributes this to the inefficiency and ineffectiveness of teachers that lead to the underperformance of both teachers and their students.

# Class size, teacher-pupil ratio, and academic performance

Class size is recognized as a predictor of academic success (Fabunmi, Broi-Abu, and Adeniji, 2007). While small class sizes have some significant impact on school performance for learners', larger class sizes, on the other hand, have very little influence on attainment for learners. A study conducted by Fabunmi, Broi-Abu, and Adeniji shows that schools with small class sizes differ markedly in pupils' academic performance. It has been proposed that good academic performance is often negatively skewed in the direction of schools that favour small class sizes are not favourable to success in school. Kraft, (1994) studies in Ghana, found that class sizes above forty learners are not sufficiently supportive for successful teaching and learning.

# Time management and academic performance

Time is one valuable resource which is critical in achieving operational goals. It does seem, however, that many people have problems with time management. A case study of time management by Amuli, (2008) in a study of time management in schools in Tanzania's Lindi Rural District found that schools pay less attention to time management problems than they do to services, finance, and people. In effect, so much instructional time is lost every day. It would seem that the impact of wasting precious school time has never received attention from educational stakeholders. As Amuli observed, the effect of the wastage of school time is that syllabi remain uncovered and knowledge regarding critical material is possibly not provided for students. Though time cannot be seen in the way other realities could be, its consequences cannot be ignored or concealed. Efficient time management appears to be key to successful academic performance.

# Monitoring teaching and learning and academic performance

Kerlinger, (1995) identified the managerial skills of the school head as key in the monitoring of teaching and learning. Such skills according to Kerlinger set the tone, tempo, and the school learning climate.Lezotte (2001), monitoring is key in attaining efficiency and effectiveness. Whole school monitoring including instructional monitoring allows supervisors to track teachers' and pupils' performance. Monitoring should by nature be comprehensive in scope and should cover all aspects of the teaching and learning process. According to Lezotte, effective schools are characterized by frequent monitoring of both teachers' and learners' performance. In their study of peri-urban and rural-schools in Ghana, Amedahe, Edjah, and Etsey (2004) found that private schools exhibited superior performance than public schools. The reason could be that performance in private schools was of quality than in public schools. Etsey, (2005) identified teachers' absenteeism as a major problem to teacher The study recommended for improved effectiveness. supervision by educational authorities such as circuit supervisors.

# Language proficiency and academic performance

Many educational actors such as teachers and educational authorities have been concerned about the value of language development in children's learning. The development of language skills amongst children seems to have a strong influence on the comprehension of the different concepts taught to pupils. According to Ezeokoli, (2005), the learning of good language skills as a means of communication helps to foster understanding of different concepts in education. It can be deduced from Ezeokoli argument that if children exhibit good language skills, it will also have a positive impact not only on learning English as an official language but on all other subjects taught through the same communication medium. Thus, the skilled use of language seems to have a powerful manifestation in other disciplines. This statement confirms the Chief Examiner's stance that for three successive years low skilled candidates in English language are the explanation for the abysmal low performance at BECE (WAEC, 2002; WAEC, 2003; WAEC, 2004).

# Punctuality and regularity and academic performance

Regularity and punctuality in school attendance are among the variables that most impact on learners' performance. Several studies on the academic performance of learners found a positive relationship between regular attendance in class and performance. Punctuality and regularity improve the time of interaction between teachers and learners. Laeheem, (2007) found a positive relationship between the teacher-learner interactions. In this study conducted in the province of Songkhla, Thailand, it has been established that there is a positive relationship between interactions and learner

achievement. In the same vein, Kamwang, (2003) recorded poor performance as a result of irregular attendance.

Heady, (2003) observed a negative relationship between work and academic performance among learners. Children who are over overworked and given all forms of work when they are supposed to be active in the classroom have serious learning difficulties and typically achieve little academically. Landcaster and Ray, (2003) reported from their research that work time harmed academic performance.

# Attitudes towards learning and academic performance

Pupils' attitude is one of the variables that has received much attention from researchers in recent times. The attitude of pupils seems to affect all forms of pupil behaviour. Positive attitudes have a positive impact on the achievement of pupils while negative attitudes like misbehaviours', truancy, and inattention harm the performance of pupils. In Quansah, (2017), as cited by Mclean, (2007) research which sought to differentiate between high and low achievement achievers, it was found that five attitudinal variables were significantly associated with academic performance. Researchers such as Abu-Hilal, (2000) and Hassan (2002) have identified learner attitudes as affecting their academic achievement. Regardless of how attitudes are expressed, it seems that those learners who display positive attitudes and are highly regarded for learning are those who usually experience higher scores in exams. Attitudes of pupils permeate all aspects of their academic life. This condition defines, to a much greater extent, the type of support learners receive from their teachers and parents at school and home respectively. Fuchs and Woessman, (2004), for example, claimed that learners performed substantially worse in reading, mathematics, and science in schools whose principals indicated that learning was severely hampered by lack of parental support.

## Time on task, homework and academic performance

Concerning the relationship between time-on-task and academic success, Engin- Demir (2009) noted that irrespective of intellect, students who spend more time on assignments and homework experienced increased in grades. Butle,r (1987) found that the number of times students spend on homework and other tasks were also highly motivated. Time on work for pupils helps to improve practice. In the school situation, it is seen as the implementation of learning as learners spend time on task. In a variety of situations, this may manifest. Homework, assignments, and activities are just a few examples. Time on tasks seems to strongly correlate with academic performance. Etsey, (2005), homework is important for learners to understand successful learning outcomes.

Despite their intellect, pupils who devote more time to tasks such as homework and assignments will significantly improve their grades. Etsey found that homework has a positive relationship with learning outcomes when it is related to learning goals, is consistently distributed in reasonable amounts, is well defined, encouraged, and collected and refreshed during class time, and used as an opportunity for learner input. Homework is a sort of distributed practice which is a kind of school activity extension. Homework participation means learning from experience, a way of reinforcing what is taught in school. If homework is of value and also measures pupils' ability level, it becomes a strong motivation for learning. Butler, (1987) noted that the amount of time that learners spend on homework and other related activities was also found to be highly motivational.

# Empirical Review

Farooq, Chaudhry, Berhany, Shafiq, (2011) examined factors influencing the standard of academic performance of learners' in Pakistani schools. The study's main concern was to investigate various factors affecting the academic performance students in a metropolitan city of Pakistan. The sampling used for this survey was descriptive. Six hundred respondents participated. It included 300 male and 300 female students. Convenience sampling was used to pick the schools while the respondents were randomly picked. Data on variables such as education of parents, occupation of parents, socio-economic status, and rural/urban belongingness were collected using a questionnaire. Using descriptive and inferential statistics, the data obtained were analyzed. A t-test was used to compare male and female students' achievement. By applying ANOVA using SPSS 16, the significant impact of the different factors on student achievement was explored via multiple comparisons.

The study found that socioeconomic status; father education and mother education had a large effect on the overall academic achievement of the students. Certain findings are that there are other factors related to the consistency of learners' academic success within and outside school. Studies by Farooq, Chaudhry, Berhanu, and Shafiq concentrated only on some of the factors outside of school that affect students' performance. The relevance of the Pakistani research to the current study is that both sought to examine factors influencing the academic performance quality of students. The current study also tried to use quantitative methods of questionnaire data collection as the analysis tools, as was the case with the Pakistani study. Nevertheless, studies by Farooq, Chaudhry, Berhanu, and Shafiq centered on some of the variables outside of school that influence the quality of academic performance thereby neglecting factors within the school and students' characteristics. Also, the Pakistani study focused on students who were studying in the context of Pakistan. Thus, the study is unlikely to provide insights into the factors that predict academic performance in other sociocultural contexts. In this vein, there is the need for a study to be conducted in other contexts to include variables such as school conditions, teacher characteristics, and learner characteristics to enable meaningful comparisons as well and a more nuanced understanding of the phenomenon.

# Research Design

Kothari, (2004) describes research design as the conceptual structure within which researchers conduct research. Kothari further argues that a research design is a blueprint for the collection, measurement, and analysis of data. The study employed the use of a descriptive survey design. A descriptive survey is a method of gathering information by interviewing a sample of individuals or administering a questionnaire to a sample of individuals (Orodho, 2003). The choice of the survey is based on its advantages over other designs among which is its flexibility in the use of questionnaires and interviews as techniques of obtaining information that are closely linked to the research questions (Johnson and Christensen, 2004). Survey also describes the phenomenon without necessarily manipulating variables and factors. Nikolava, (2011) reiterated that the survey enhances standardization of responses as the respondents respond to the same questions posed under the same measuring scale. In effect, through a survey, the questionnaire could be used to obtain accurate information regarding the phenomenon under investigation. Glassow, (2005) maintains that the survey has the potential of helping the researcher obtain the requisite information from the respondents in a quicker and reliable form. Thus, the choice of a survey to elicit responses from parents, teachers and pupils was informed by this argument.

Despite the positive side of surveys, there is a possibility of obtaining varied response rates when using surveys (Rose, 2015). Moreover, the likelihood of non-response bias may arise especially when the non-participants vary from respondents in certain systematic ways. Besides, attempting to streamline the questions before they are administered to the subjects may make some of the questions inappropriate for some of the stakeholders and this may influence the answers (Zein, 2012).

# Population

Polit and Hungler, (1996) defined population as the entire aggregate of cases that meet a designated set of criteria. Gay (1992) asserts that the population refers to the group about whom the researcher is interested in obtaining information and drawing conclusions. The study was conducted within the Pusiga District of Ghana. The total number of public junior high schools within the district at the end of the 2018/2019 academic year stood at thirty-four (PDEO, 2019). The target population for the study comprised all JHS 3 pupils, their teachers, and parents all numbering about 3000. Kothari, (2004) posits that the target population should be clearly defined to ensure their inclusiveness in the study. In social research, the target population refers to the group whom a researcher intends to generalize a study's findings (Amedahe2002). Accessible population according to Amedahe refers to the group of persons whom data will be collected from. Thus, for the present study, the accessible population consists of a list of all final-year junior high school teachers, final-year junior high school pupils, and their parents

drawn proportionally from ten junior high schools selected across the entire Pusiga District.

### Sampling Procedure

A sampling procedure is a method used by researchers to select a sample for a study. Since sometimes it appears difficult to obtain complete coverage of the population of the study, the researcher adopted a procedure called sampling. Amedahe, (2002) posits that sampling is about how researchers select their sample in such a way that it truly reflects the population. The decision to sample respondents was informed by various factors such as the need to acquire more detailed information regarding the phenomenon. This corroborates with Sarantakos, (2005) assertion on reasons for sampling which include: necessity, the economy of time, economy of labour, and the quest to obtain more detailed information on the issue under investigation. For the present study, a sample size of 278 respondents was chosen comprising final-year teachers of junior high schools, finalyear pupils' and their parents. In essence, two schools were selected from each of the five circuits through convenience sampling. Teachers and final year pupils were randomly sampled whereas the parents were purposively selected. In all, a sample size of 278 respondents comprising 38 teachers, 120 pupils, and 120 parents were selected proportionally from all ten schools with 75 teachers, 470 pupils, and 470 parents.

# Data Collection Instruments

According to Amedahe, (2002), questionnaires are described as a list of organized and ordered questions or statements presented to respondents in such a uniform manner to which they respond. Despite some disadvantages associated with questionnaire administration, especially its low return rate, the researcher opted for the use of a questionnaire as a tool for obtaining relevant information. Apart from it being less expensive, questionnaires are better to use because they seem to provide uniform items to and provide a high degree of confidentiality to respondents. Before the development of the instruments, literature that relates to the problems of low academic performance was reviewed thoroughly to obtain first-hand information on the various issues at stake; most especially on what has been done and reported in the area of low academic performance.

Based on first-hand information that was gathered from the field, questions were structured for the various stakeholders to respond. Pupils, parents, and teachers who were sampled were asked to respond to the various questions posed. Questions were put into four sections and categorized into three variables namely school and teacher-related factors, home, and parent-related factors, and pupil-related factors. These were meant to elicit responses from the target stakeholders. Each of the three category of stakeholders answered different versions of the questionnaires. These included information on the biographical data of respondents. Section 'A' sought for respondent's biographical information

whilst Sections 'B', 'C', and 'D' allowed respondents to tick the most appropriate response. Amedahe, (2002) suggests that each item that appears on the list of questionnaires should be developed to measure a specific aspect of the objective or answer a particular research question. At the end of the administration of the questionnaire, a total of two hundred and seventy (270) completed questionnaires were retrieved representing a return rate of 97%.

# Validity and reliability

To achieve validity, especially construct and content validity, the research instruments were carefully constructed after due consideration about the construction of questionnaire items had been considered. Most importantly, efforts were made to ensure that each of the items was developed to measure a specific aspect of the research questions. A critical and trusted colleague was tasked to assist in editing the draft questionnaire items. Besides, the entire questionnaire was subjected to expert review by my project supervisor. He checked for appropriateness, clarity, relevance, practicality, and fairness of the items. According to Anane and Gyimah, (2016), clarity, fairness, validity, and practicality constitute important criteria for evaluating questionnaires and test items. As part of measures at attaining content validity, all the instruments were thoroughly vetted to ensure their appropriateness.

The questionnaire's reliability measure suggests that the respondents replied consistently to most of the questionnaires for the final draft. Moreover, the correlation coefficient on both administrations was calculated. Initial test (M= 3.56, SD= 1.22), retest= (M=3.74, SD=1.36). A strong link between the first set and second set responses, that is, the responses for the initial and retest administrations was an indication of the greater reliability of the responses and for that matter the instruments. Hence, the adoption of the instruments.

# Data Collection Procedures

Pre-testing of the questionnaire preceded the main data collection stage of the study. Fifty respondents comprising 10 teachers, 20 JHS 3 pupils, and 20 parents of the selected pupils were drawn for the pre-testing of the research instruments. The parents were purposively selected whereas the teachers and pupils were selected through a simple random sampling procedure. The pre-testing of the instruments was carried out in the Binduri District of the Upper East Region. Binduri was chosen because it has similar geographic, economic, and social conditions as the Pusiga District, the study's area. In both situations, permission to visit and collect data was obtained from the head teachers. Ethical clearance was obtained from the Institutional Review Board (IRB) of the University of Cape Coast. Next, was a visit to the various sites to engage with the various stakeholders dubbed teachers, pupils' and parents. The maiden visit permitted for selfintroduction and declaration of the purpose of the visit.

During these visits, there were arrangements for an agreedupon date for actual data collection. Questionnaire items constituted the main instruments for this purpose. However, for those parents who were unable to supply information through this means, there was an opportunity for them to respond through direct assistance from the researcher and his assistants.

Assurance was given for the confidentiality of the information provided. The duration of the questionnaire administration did not exceed an hour and thirty minutes per respondent. The researcher was supported by trained assistants for the administration of the questionnaire. Thus, the pre-testing of the draft questionnaire was carried out in five junior high schools that were conveniently selected within the Binduri District. The essence of this was to obtain first-hand information on the relevance and appropriateness of the individual items as well as estimate the reliability and validity of the instruments. Another reason was to establish whether there was a need for revision of the questionnaire items.

# Data Processing and Analysis

The researcher employed the Statistical Product for Service Solutions (SPSS) software to process the information. The study's primary goal was to investigate stakeholders' opinions on different independent variables and how each of them predicts the academic performance of learners' at the BECE level. The study was guided by three research questions and four research hypotheses. For the research questions, descriptive and inferential statistics were used to analyze the data. The descriptive and inferential statistics used included mean, standard deviation, frequency, and percentages, and the findings were organized into tables. Multiple regression and one-way between-groups ANOVA included inferential statistics used. In testing the research hypotheses, the one-way between-groups ANOVA was carried out. All the results in the form of output were presented in tables and discussions did accordingly

## V. ANALYSIS OF BACKGROUND DATA

# Response rate

A total of two hundred and seventy-eight (278) questionnaires were administered to the respondents, but two hundred and seventy (270) questionnaires were retrieved and involved in the analysis. Therefore, the response rate attained in the study was 97%. This response rate was attained because three (3) questionnaires had a lot of missing data which were excluded from the analysis due to their potential to distort the findings if they were included. Besides, five (5) questionnaires were not filled; hence they were excluded from the analysis. The response rate obtained in the study was deemed appropriate based on the recommendation of Babbie (2010) that a response rate of 50% is enough in a survey.

# Demographic Information of Respondents

The demographic characteristics of the respondents were investigated and analysed. The analysis of the demographic data was done based on the category of respondents in the study, which comprised teachers, pupils, and parents.

# Demographic characteristics of teachers

The demographic characteristics of the teachers were examined. These included sex, academic qualification, marital status, programme of specialization, and work experience. The results of the analysis are presented in Table 1.

Variables	Categories	Frequency	Percent
S	Male	15	41.7
Sex	Female	21	58.3
	Diploma	9	25.0
Academic Oualification	Degree	23	63.9
	Masters	4	11.1
	Married	21	58.3
Marital Status	Single	7	19.4
Marital Status	Divorced	6	16.7
	Separated	2	5.6
Programme of	General	10	27.8
Specialization	Specialist	26	72.2
	1-3	21	58.3
Work Experience	4-6	9	25.0
	7-9	6	16.7

Table 1: Demographic Characteristics of Teachers

Source: Fieldwork Data, 2022

The findings in Table 1 revealed that more female teachers (n=21, 58.3%) than male teachers (n=15, 41.7%) participated in the study. The composition of the respondents by the academic level was examined. The academic qualification of the teachers included Diploma, Bachelor Degree, and Master's Degree. The results showed that the majority of the teachers possessed Bachelor's Degree (n=23, 63.9%) as compared to those who have a Diploma (n=9, 25.0%) and Master's Degree (n=4, 11.1%) respectively. On marital status, the findings indicated that more than half of the teachers were married (n=21, 58.3%), followed by those who were single (n=7, 19.4%), divorced (n=6, 16.7%), and separated (n=2, 16.7%). 5.6%) respectively. The study delved into the programme of specialization of the teachers, and the findings pointed out that more than two-thirds of the teachers were specialist teachers (n=26, 72.2%) while the remaining 10 teachers, representing 27.8% had general training background. The work experience of the teachers was categorized into three, where more than half of the teachers had 1-3 years' work experience (n=21, 58.3%) as compared to those who had 4-6 years' work

experience (n=9, 25.0%), and 7-9 years' work experience (n=6, 16.7%).

# Demographic characteristics of pupils

The demographic compositions of the pupils were investigated. These included sex, age, and provider of pupils' educational needs. The results of the analysis were presented in Table 2.

Variables	Categories	Frequency	Percent
Sov	Male	56	47.5
Sex	Female	62	52.5
4.00	Below 14 years	34	28.8
Age	Above 14 years	84	71.2
	Father	33	28.0
Provider of	Mother	41	34.7
educational needs	Both Parents	25	21.2
	Others	19	16.1

Table 2: Demographic Characteristics of Pupils

Source: Fieldwork Data, 2022

The results in Table 2 indicated that more female pupils (n=62, 52.5%) than male pupils (n=56, 47.5%) participated in the study. Concerning age, more than two-thirds of the pupils were above 14 years (n=84, 71.2%) as compared to those who were below 14 years (n=34, 28.8%). The information further showed that mothers only provided the educational needs of the pupils most (n=33, 28.0%), followed by fathers only (n=33, 28.0%), both parents (n=25, 21.2%), and other relatives (n=19, 16.1%) respectively.

## Demographic characteristics of parents

The study investigated the demographic characteristics of the parents, and the findings are shown in Table 3.

Table 3: Demographic Characteristics of Parents

Variable	Categories	Frequency	Percent
C	Male	60	51.7
Sex	Female	56	48.3
	Trading	43	37.1
	Farming	33	28.4
Occupation	Public/Civil Servant	33	28.4
	Others	7	6.0
	Married	78	67.2
Marital Status?	Divorced	22	19.0
	Separated	16	13.8
	Basic Education	67	57.8
Educational	Secondary Education	23	19.8
Background	Tertiary Education	17	14.7
	No Education	9	7.8

	1-3	45	38.8
	4-6	53	45.7
Number of Children	7-9	11	9.5
	10 or more	7	6.0
	Total	116	100.0

Source: Fieldwork Data, 2022

The results in Table 3 disclosed that more male parents (n=60, 51.7%) than female parents (n=56, 48.3%) participated in the study. The information also revealed that most of the parents were engaged in trading (n=43, 37.1%), followed by those involved in farming (n=33, 28.4%) and public/civil service (n=33, 28.4%) while the least number of the parents were employed in the other occupations (n=7, 6.0%). In relation to marital status, majority of the parents were married (n=78, 67.2%) as compared to those who were divorced (n=22, 19.0%), and separated (n=16, 13.8%) respectively.

The composition of the respondents based on educational background showed that the majority of the respondents had Basic Education (n=67, 57.8%), followed by those who had Secondary Education (n=23, 19.8%), Tertiary Education (n=17, 14.7%), and those with no education (n=9, 7.8%). The distribution of the parents by the number of children revealed that those who had 4-6 children were most (n=53, 45.7%) as compared to those who had 1-3 children (n=45, 38.8%), 7-9 children (n=11, 9.5%), and 10 or more children (n=7, 6.0%).

#### VI. ANALYSIS AND DISCUSSION OF RESEARCH QUESTIONS

#### Research question one

# What variables related to school and teachers predict learners' academic performance?

This research question investigated the school and teacherrelated variables that predict academic performance among the pupils. These variables included teacher competence, class size, availability of learning resources, instructional time, and monitoring and supervision of learning. The mean and standard deviation were used to describe the independent and dependent variables in the study and the results are shown in Table 4.

Table 4: Descriptive Statistics for School and Teacher Factors and Academic Performance

Variables	Mean	Std. Deviation	Ν
Academic Performance	48.32	0.962	270
Teacher Competence	1.63	0.910	270
Class size	1.70	0.989	270
Availability of Learning Resources	3.08	1.051	270
Instructional Time	2.96	1.021	270
Monitoring and Supervision of Learning	3.38	0.761	270

Source: Fieldwork Data, 2022

The findings in Table 8 showed that the respondents rated monitoring and supervision of learning highest among the school and teacher-related variables (M=3.38, SD=0.761), followed by availability of learning resources (M=3.08, SD=1.051), instructional time (M=2.96, SD=1.021), class size (M=1.70, SD=0.989) while teacher competence was rated

least among the variables (M=1.63, SD=0.910). The academic performance of the pupils was 48.32 (SD=0.962).

The study employed the multiple regressions to investigate the extent to which the school and teacher-related variables predict academic performance among the learners, and the findings are presented in Table 5.

N 11	$\mathbf{P}$ $\mathbf{P}^2$		Std. Error of	Change Statistics						
Model	R	R <sup>2</sup>	Adjusted R <sup>2</sup>	the Estimate	R <sup>2</sup> Change	F Change	df1	df2	Sig. F Change	
1	$0.450^{a}$	0.203	0.188	0.868	0.203	13.419	5	264	0.000	
a. Predic	a. Predictors: (Constant), Monitoring and Supervision of Learning, Teacher Competence, Availability of Learning Resources,									
			Ins	structional Time,	Class size					

Table 5: Model Summary Results for School and Teacher Factors and Academic Performance

Source: Fieldwork Data, 2022

The multiple regression result in Table 5 revealed that school and teacher-related variables such as teacher competence, class size, availability of learning resources, instructional time, and monitoring and supervision of learning collectively predicted 20.3% in pupils' academic performance. These results implied that other variables not included in this regression analysis are responsible for the remaining 79.7% variance in pupils' academic performance in the Pusiga District.

The analysis further delved into whether the 20.3% variance in pupils' academic performance was statistically significant, and the results are shown in Table 6.

Table 6: ANOVA Results for School and Teacher Factors and Academic

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regressio n	50.498	5	10.100	13.41 9	$0.000^{b}$
1	Residual	198.702	264	0.753		

	Total	249.200	269									
	a. Dependent Variable: Academic Performance											
b. C	Predictors: (Competence, A	Constant), Monitor vailability of Lear	ring and 3 ming Res size	Supervision ources, Ins	n of Learn tructional	ing, Teacher Time, Class						

Source: Fieldwork Data, 2022

The results in Table 10 discovered that the 20.3% prediction of the school and teacher-related variables to pupils' academic performance was statistically significant [F (5, 264) =13.419, p<0.05]. In essence, the researcher established that the school and teacher-related variables involved in the study put together, were good predictors of academic performance among the pupils in the Pusiga District. Having established that the school and teacher-related variables jointly contributed significantly to pupils' academic performance, the study further examined the contribution of each of the predictors to the academic performance, and the findings are shown in Table 7.

Table 7: Standardized and Unstandardized Coefficients for School and Teacher Factors and Academic Performance

Model		Unstandardized Coefficients		Standardized Coefficients	Т	Sig.	Collinearity Statistics	
		В	Std. Error	Beta	_	~ 6	Tolerance	VIF
	(Constant)	1.094	0.265		4.126	0.000		
	Teacher Competence	0.147	0.077	0.139	1.903	0.048	0.568	1.762
	Class size	0.021	0.072	0.021	0.285	0.776	0.548	1.824
1	Availability of Learning Resources	0.046	0.026	0.098	1.778	0.077	0.986	1.015
	Instructional Time 0.179		0.061	0.190	2.914	0.004	0.712	1.405
	Monitoring and Supervision of Learning	0.323	0.082	0.255	3.959	0.000	0.726	1.378

Source: Fieldwork Data, 2022

The information in Table 7 indicated that the Tolerance values of all the predictor variables were greater than 0.10, and the VIF values were less than 10, which confirmed that the assumption of multicollinearity was not violated. In essence, the results showed that out of the five school and teacherrelated variables as predictors of academic performance, monitoring and supervision of learning ( $\beta$ =0.255, t=3.959, p<0.05), instructional time ( $\beta$ =0.190, t=2.914, p<0.05), and teacher competence ( $\beta$ =0.139, t=1.903,p<0.05) individually contributed significantly to pupils' academic performance while the individual contributions of class size ( $\beta$ =0.021, t=0.285, p>0.05) and availability of learning resources ( $\beta$ =0.098, t=1.778, p>0.05) to academic performance were not statistically significant. In effect, the study concluded that monitoring and supervision of learning, instructional time, and teacher competence were critical schools and teacher-related variables that are crucial in determining the academic performance of the pupils in the Pusiga District.

#### Research question three

# What factors associated with pupils predict the academic performance of the learners?

The third research question sought to investigate the degree to which pupil-related variables such as language proficiency, attitude towards learning, self-concept, and time on task, regularity, and punctuality to school contributed to their academic performance. The researcher used the mean and standard deviation to describe the variables, and the findings are shown in Table 8.

Table 12: Descriptive Statistics for Pupil-related Factors and Academic Performance

Variables	Mean	Std. Deviation	Ν
Academic Performance	48.32	0.962	270
Language Proficiency	3.39	0.795	270
Attitude towards Learning	2.87	0.943	270
Self-concept	2.18	1.027	270
Time on Task	2.37	1.211	270
Regularity and Punctuality to School	2.30	1.071	270

Source: Fieldwork Data, 2022

In Table 8, the results showed that the respondents rated language proficiency highest among the pupil-related variables (M=3.39, SD=0.795), followed by the attitude towards learning (M=2.87, SD=0.943), time on task (M=2.37, SD=1.211), regularity, and punctuality to school (M=2.30, SD=1.071) while self-concept recorded the least among the pupil-related variables (M=2.33, SD=1.070).The researcher used multiple regressions to investigate the predictive abilities of the pupil-related variables to academic performance, and the findings are presented in Table 9.

Table 9: Model Summary Results for Pupil-related Factors and Academic Performance

	_	$\mathbf{P}$ $\mathbf{P}^2$	$A = 1 D^2$	Std. Error of	Change Statistics						
Model	R	R²	Adjusted R <sup>2</sup>		R <sup>2</sup> Change	F Change	df1	df2	Sig. F Change		
1	0.533ª	0.284	0.271	0.822	0.284	20.977	5	264	0.000		
a. Predic	a. Predictors: (Constant), Regularity and Punctuality to School, Attitude towards Learning, Language Proficiency, Self-concept, Time on Task										

Source: Fieldwork Data, 2022

The multiple regression results in Table 9 revealed that pupilrelated variables such as language proficiency, attitude towards learning, self-concept, and time on task, regularity, and punctuality to school jointly contributed 28.4% to the learners' academic performance. This implied that other variables that were not included in the study would be responsible for 71.6% variance in academic performance among the pupils in the Pusiga District. The researcher investigated whether the 28.4% variance in academic performance as determined by all the pupil-related variables was statistically significant and the findings are shown in Table 10.

Table 10: ANOVA Results for Pupil-related Variables and Academic Performance

Model		Sum of Squares	Df	Mean Square	F	Sig.		
	Regression	70.855	5	14.171	20.977	0.000 <sup>b</sup>		
1	Residual	178.345	264	0.676				
	Total	249.200	269					
		a. Dependent Variab	le: Acade	mic Performance				
b. Predictors: (Constant), Regularity and Punctuality to School, Attitude towards Learning, Language Proficiency, Self- concept, Time on Task								

Source: Fieldwork Data, 2022

In Table 10, the researcher found that the 28.4% variance in academic performance as accounted by the pupil-related variables was statistically significant [F (5, 264) =20.977, p<0.05]. Consistent with this finding, the study concluded that

all together, the pupil-related variables involved in the study were good predictors of pupils' academic performance. Further analysis was done to assess the contribution of each of the pupil-related variables to academic performance, and the findings are shown in Table 11.

Model		Unstandardized Coefficients		Standardized Coefficients		Sig	Collinearity Statistics		
		В	Std. Error	Beta	ι	51g.	Tolerance	VIF	
1	(Constant)	0.725	0.254		2.851	0.005			
	Language Proficiency	0.336	0.068	0.277	4.909	0.000	0.849	1.178	
	Attitude towards Learning	0.211	0.055	0.207	3.853	0.000	0.940	1.064	
	Self-concept	0.047	0.052	0.050	0.901	0.368	0.878	1.139	
	Time on Task	0.053	0.053	0.067	1.008	0.314	0.620	1.612	
	Regularity and Punctuality to School	0.191	0.058	0.212	3.269	0.001	0.645	1.551	
a. Dependent Variable: Academic Performance									

Table 11: Standardized and Unstandardized Coefficients for Pupil-related Factors and Academic Performance

Source: Fieldwork Data, 2022

From Table 11, an observation of the Tolerance values established that all the values for each predictor were greater than 0.10, and the VIF values were less than 10 (Pallant, 2009), which suggested that the multicollinearity assumption was not violated. The results showed that language proficiency ( $\beta$ =0.277, t=4.909, p<0.05), attitude towards learning ( $\beta$ =0.207, t=3.853, p<0.05), and regularity and punctuality to school ( $\beta$ =0.212, t=3.269, p<0.05) independently contributed significantly to the pupils' academic performance while the contributions of self-concept  $(\beta=0.050, t=0.901, p>0.05)$ , and time on task  $(\beta=0.067, t=0.067)$ t=1.008, p>0.05) did not contribute significantly to pupils' academic performance. In essence, it concluded that language proficiency, attitude towards learning, and regularity and punctuality to school were the major pupil-related determinants of academic performance in the Pusiga District.

Test of Research Hypotheses

## Hypothesis 1

 $H_{02}$ : There is no statistically significant difference in the academic performance of pupils due to the work experience of teachers.

 $H_2$ : There is a statistically significant difference in the academic performance of pupils due to the work experience of teachers.

The one-way between-groups analysis of variance (ANOVA) was used to test this hypothesis. The work experience of the teachers was grouped as 1-3 years, 4-6 years, 7-9 years, and the results were presented in Table 13.

Table 13: ANOVA Results for Work Experience and Academic Performance

Work Experience	N	Mean	Std. Deviation	F	Sig.
1-3 years	21	42.33	1.826	0.710	0.499
4-6 years	9	43.83	1.617		
7-9 years	6	46.50	1.473		
Total	36	43.40	1.592		

Source: Fieldwork Data, 2022

The ANOVA results in Table 13 revealed that the differences in the mean academic scores of the pupils regarding teachers who had work experience ranged 1-3 years (M=42.33, SD=1.826), 4-6 years (M=43.83, SD=1.617), and 7-9 years (M=46.40, SD=1.473) were not statistically significant [F (2, 33) =0.710, p>0.05]. In effect, the work experience of the teachers did not matter in determining the differences in the academic performance of the pupils. In essence, the null hypothesis that 'There is no statistically significant difference in the academic performance of pupils' due to work experience of teachers' was supported while the alternative hypothesis 'There is a statistically significant difference in the academic performance of pupils' due to work experience of teachers' was rejected. This implies that the work experience of teachers is not closely linked to pupil's academic performance.

## Hypothesis 2

 $H_{03}$ : Parental occupation does not significantly account for the differences in pupils' academic performance.

 $H_3$ : Parental occupation significantly accounts for the differences in pupils' academic performance.

For this research hypothesis, the one-way between-groups ANOVA test was carried out and the results are presented in Table 14.

Table 14: ANOVA Results for Parental Occupation and Academic Performance

Occupation	Ν	Mean	Std. Deviation	F	Sig.
Trading	42	45.41	1.662	1.164	0.327
Farming	33	44.29	1.787		
Public/Civil Servant	33	42.44	1.627		
Others	6	47.38	1.902		
Total	114	44.33	1.004		

Source: Fieldwork Data, 2022

The findings in Table 14 revealed that there were no statistical differences in the mean academic scores for pupils whose parents were engaged in trading (M=45.41, SD=1.662), farming (M=44.29, SD=1.787), public/civil service (M=42.44, SD=1.627), and other businesses (M=47.38, SD=1.902); [F (3, 110) =1.164, p>0.05]. The study suggests that the occupation of parents is not a critical factor that differentiates among pupils in terms of their academic performance in the Pusiga District. This is significant because the hypothesis that 'parental occupation does not significantly account for the differences in pupils' academic performance' was supported whereas the alternative hypothesis which asserts that 'Parental occupation significantly accounts for the differences in pupils' academic performance' in pupils' academic performance in pupils' academic performance' may supported whereas the alternative hypothesis which asserts that 'Parental occupation significantly accounts for the differences in pupils' academic performance' may support academic performance' was rejected.

# Hypothesis 3

 $H_{04}$ : Family size does not account for the differences in pupils' academic performance.

# $H_4$ : Family size accounts for differences in pupils' academic performance.

In testing this hypothesis, the one-way between-groups ANOVA was carried out and the results are shown in Table 15.

Family Size	Ν	Mean	Std. Deviation	F	Sig.
1-3	44	45.67	1.009	0.800	0.497
4-6	52	43.54	1.292		
7-9	11	44.27	1.164		
10 or more	7	41.86	1.408		
Total	114	44.33	1.004		

Table 15: ANOVA Results for Family Size and Academic Performance

Source: Fieldwork Data, 2022

Table 15 showed that there were no statistical differences in the mean academic scores for pupils whose family size was 1-3 (M=45.67, SD=1.009), 4-6 (M=43.54, SD=1.292), 7-9

(M=44.27, SD=1.164), and 10 or more (M=41.86, SD=1.408); [F (3, 110) =0.800, p>0.05]. These findings revealed that family size did not lead to differences in the academic performance of the pupils. In effect, the null hypothesis that 'Family size does not account for the differences in pupils' academic Performance' was supported whereas the alternative hypothesis that 'Family size accounts for differences in pupils' academic performance' was rejected.

#### VII. DISCUSSION OF THE FINDINGS

For research question one, the study discovered that school and teacher-related variables such as teacher competence, class size, availability of learning resources, instructional time, and monitoring and supervision of learning together predicted a significant 20.3% in pupils' academic performance. However, further investigation revealed that monitoring and supervision of learning, instructional time, and teacher competence were major schools and teacher-related variables that individually and collectively predicted academic performance among the pupils in the Pusiga District. With these findings, the relevance of Lezotte' theory of effective schools becomes relevant. In this theory, the role of the school in determining the academic performance of the school has been recounted. The school has been vested with the responsibility of educating children, and that the academic performance of the learners is influenced by the experiences of the children in school. Arora and Singh, (2017) and Nambuya, (2017) also gave credence to the vital role of the school and its related factors such as teachers and learning factors as critical determinants of academic performance. The findings of this study agree with earlier studies which established that school and teacher-related variables such as monitoring and supervision of learning, instructional time, and teacher competence play a major role in enhancing the academic performance of pupils (Lockheed & Verspoor, 1991; Lezotte, 2001; Ansah, 2017). The findings also corroborate that of Allan (2016) as captured in the empirical review. The current study found that teacher/pupil absenteeism, lack of instructional monitoring, and lack of parental involvement in children's education were important predictors of low academic performance among pupils. Based on these findings, the study concluded that the District Directorate of Education and head teachers should up their supervisory roles and core functions and also educate parents to do the same. This study together with others implies that school and teacher-related factors are vital in promoting pupils' academic performance irrespective of the context. The issues of monitoring and supervision, teacher competence, and the management of instructional time fall within the scope of school leadership which requires that head teachers adopt effective management and leadership practices to safeguard the waste of instructional time, enhance monitoring and supervision, and promote professional competence of teachers. Head teachers need to adopt contemporary trends in instructional leadership to lead the schools towards improvement.

Again, the findings of this study disagree with studies like Kraft (1994) and Adeyela, (2000) where they observed that class size affects pupils' academic performance. Also, this study departs from Juma's (2011) results which stated that pupils' academic performance was linked to the availability of learning resources in schools. It is inferred from these findings that class size per se does not inhibit or enhance academic performance. For instance, class size could be small, but without effective monitoring and supervision, judicious use of instructional time, and competent teachers, no gains would be made in pupils' learning outcomes. Besides, learning materials could be available, but teachers need to use them in their teaching and learning encounters, else the desirable performance may not be attained.

The two research questions aimed to determine the extent to which pupil-related factors predicted the academic performance of the pupils, and the findings show that all the pupil-related variables outlined in this study such as language proficiency, attitude towards learning, self-concept, time on task, regularity, and punctuality to school together predicted a significant 28.4% of pupils' academic performance. However, language proficiency, attitude towards learning, and regularity and punctuality to school were the major pupil-related variables that individually and significantly predicted academic performance among the pupils in the Pusiga District. The findings of this study support Lezotte's theory which guided the study. The point made by the theoretical framework and the findings of the current study suggests that there is an interplay of various factors that predict the academic performance of learners and that the learners themselves are important in determining their academic performance.

Based on these findings, the study concluded that attention needs to be paid to the language proficiency of the pupils, pupils' attitude towards learning, and regularity and punctuality to school to enhance the academic performance of the pupils. Studies like Ezeokoli (2005), Kamwang (2003), and Quansah (2017) also cited language proficiency of pupils, punctuality and regularity, and attitudes of pupils towards learning respectively as critical pupil-related factors that contribute to pupils' academic performance. This is a call from pupils to take charge of their learning and apply themselves diligently to their learning endeavours. Interestingly, the study discovered that self-concept and time on task did not significantly influence pupil academic performance, and this finding contradicts previous studies (Lezotte, 2010; Quansah, 2017). The study appears to suggest that self-concept and time on the task alone are insufficient in determining academic performance among pupils.

In terms of the research hypothesis, the findings showed that variables such as, teacher work experience, parental occupation, and family size did not lead to differences in the academic performance of the pupils in the Pusiga District. These findings depart from the findings of Farooq et al. (2011) that parental occupation affected the academic performance of the students. The findings also conflicted Arora and Singh' (2017) findings which cited specific teacher factors such as work experience, and qualification as predictors of academic performance. In essence, the point is made that even though the home and teacher-related factors predict academic performance, this study did not support the influence of selective factors as determinants of academic performance among learners. Therefore, it is pertinent that education stakeholders look at considering comprehensive factors that influence the academic performance of pupils in the Pusiga District, instead of concentrating on selective individual factors.

# VIII. CONCLUSION

The study has established that the academic performance of pupils is contingent on several factors. Extant literature demonstrates that school and teacher-related factors impact the academic performance of pupils. In essence, the school and teachers play crucial roles in the academic achievement of pupils. Therefore, school leaders are required to lead their schools towards improvement and support both teachers and pupils in their instructional practices. Again, the findings of the study highlight the vital role of the teacher in promoting the academic performance of pupils. Therefore, the teachers need to be well equipped to carry out their instructional activities effectively and promote pupil learning. In other words, the teachers need to be competent with relevant content and pedagogical knowledge, skills, and desirable attitudes to induce learning in the pupils.

Likewise, the study has shown that apart from the home and parent-related, and school and teacher-related factors, pupilrelated variables impact academic performance among pupils. It is inferred from the findings of the study that pupils are one of the prime stakeholders who are required to ensure that academic performance is enhanced in the school. The researcher argues that nobody learns for others. Therefore, pupils need to be diligent and adopt positive attitudes towards learning. The point is made that unless pupils apply themselves diligently to their learning tasks, school and homerelated factors alone would not significantly influence the academic performance of pupils.

Literature catalogued the findings of previous researches on the impact of demographic factors such as teacher academic qualification, teacher work experience, family size, and parental occupation on pupil's academic performance. Indeed, the findings of these studies provided contradictory results and calls for further investigations in different contexts. In this study, the findings showed that demographic factors such as teacher qualification, teacher work experience, parental occupation, and family size did not influence the academic performance of the pupils. It is therefore established that demographic factors affect the academic performance of all pupils proportionately. Hence, efforts to enhance the academic performance of the pupils need to be directed at all pupils irrespective of their social and demographic disparities.

### IX. RECOMMENDATIONS

Based on the major findings and the conclusions drawn from the study, the following recommendations are made:

- i. Consistent with the finding that monitoring pupils' learning significantly predicted pupils' academic performance, it is recommended that the Guidance and Counselling Unit of the Pusiga District Education Directorate should educate parents to continuously monitor their children's learning to boost academic performance among the pupils.
- ii. Based on the finding that school and teacher-related variables significantly predicted pupils' academic performance, it is recommended that the management of the schools should ensure that school and teacher variables are favourable and tailored towards the academic performance of the pupils.
- iii. The study pointed out that monitoring and supervision of learning at school helped to heighten the academic performance of the pupils; therefore, it is recommended that the Monitoring and Supervision Unit of the Pusiga District Education Directorate and the head teachers of the schools should intensify supervision and monitoring in the schools to promote the academic performance of the pupils.
- iv. Having discovered that instructional time was critical in determining the academic performance of pupils, it is recommended that the head teachers should be supported to ensure efficient use of instructional time in their schools. This could be achieved where teachers prudently use instructional time and eschew wasting instructional time in the sch
- v. In line with the finding that the language proficiency of the pupils impacted their academic performance, it is recommended that the Pusiga District Education Directorate should organise in-service training for teachers in language instruction so that they can improve the language skills of the pupils for good academic performance.
- vi. The study showed that the attitude of pupils towards learning significantly contributed to their academic performance, it is recommended that the Pusiga District Education Directorate, head teachers, SMC, and PTA of the schools create awareness among the pupils and support them to develop a positive attitude towards learning to enhance their academic performance.
- vii. The study discovered that pupils' regularity and punctuality to school significantly predicted academic performance among the pupils; hence it is recommended that SMC and PTA encourage parents to encourage the pupils to attend school regularly and

punctually so as to boost the academic performance among the latter.

# Suggestion for further Research

This study was carried out among JHS 3 pupils and their parents, and teachers in the Pusiga District. It is therefore suggested that further studies are conducted among the JHS 1, JHS 2, and primary pupils to evolve a comprehensive district-wide strategy for enhancing academic performance in the district.

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#### REFERENCES

- Abayi, O., &Odipo, G. (1997). Efficiency of primary education in Kenya: Situational analysis and implementation of educational reform. Nairobi: Institute of Policy Analysis and Research.
- [2] Abudu, A. M., &Fuseini, M. N., (2013). Influence of single parenting on pupils' academic performance in basic schools in the Wa Municipality. *International Journal of Educational Learning and Development*, 1 (2) 85-94.
- [3] Abu-Hilal, M. M. (2000). A structural model of attitudes towards school subjects, academic aspirations, and achievement. *Educational Psychology*, 20, 75-84.
- [4] Abuseji, F.A. (2007). Student and teacher-related variables as determinants of Secondary school students' academic achievement in chemistry. *Journal Pendidikan*, 32, 3-18. Retrieved June 2, 2011, from http://pkukmweb.ukm.my.
- [5] Adeyela, J. (2000). Problems of teaching science in large classes at the junior Secondary school level. Implications for learning outcome. Unpublished M. Ed. Thesis: University of Ibadan, Ibadan
- [6] Allan, C., (2016). Factors affecting poor academic performance of pupils in junior secondary leaving examinations in selected Day Secondary Schools in Mwense District, Luapula Province. M. Ed. Dissertation, University of Zambia. of education. Vol. 5, No. 1, pp. 1-5.
- [7] Amedahe, F. K. (2002). Fundamentals of educational research methods. Mimeograph, UCC, Cape Coast.
- [8] Amedahe, F. K., Edjah, K., & Etsey, Y.K. A. (2004). Do private primary Schools perform better than public schools in Ghana? *Unpublished paper:* Department of Educational Foundations, University of Cape Coast: Cape Coast.
- [9] Amuli, A. (2008). *Time management in Tanzania secondary* schools. Lindi Rural District. Unpublished thesis submitted to Uzembe University
- [10] Anane, E. & Gyimah A. (2016). Research methods in education. University of Cape Coast: Unpublished
- [11] Anang, M. (2011). Perceived factors that affect students' academic performance in basic education certificate examination in the central region of Ghana: A case study of the Cape Coast Metropolis: Unpublished Master's Thesis: University of Cape Coast.
- [12] Ansah, O. P. (2017). Effects of single parenting on academic performance of basic school Pupils' in Yamoransa Circuit,

*Mfantseman Municipality, Central Region.* Unpublished M.Phil. Thesis, University of Cape Coast: Cape Coast.

- [13] Arora, N. & Singh, N. (2017). Factors affecting the academic performance of college students. Retrieved from https://www.researchgate.net/ publication/319670964.
- [14] Asonaba, K. A., Numale, M. K., & Ohene, J. (2010). Psychological basis for Teaching and learning. Winneba: IEDE, UEW.
- [15] Awinimi, T. A. (2006). Using ability grouping to improve the reading competence of the basic three pupils of St. Charles Primary School, Bolgatanga. Unpublished Project Work, Winneba
- [16] Babbie, E. R. (2010). *The practice of social research*. Belmont, Calif: Wadsworth Cengage, Chicago.
- [17] Babbie, E. R. (2010). The practice of social research. Belmont, Calif: Wadsworth Cengage, Chicago
- [18] Baidoo Anu, D. (2015). Perceived factors responsible for poor academic performance of junior high school pupils in Asikuma circuit of Asikuma-Odoben-Brakwa District. Unpublished Thesis
- [19] Butler, R. (1987). What young people want to know when: Effects of Calif: mastery and ability goals on interest in different kinds of social comparisons: *Journal of personality and social psychology*, 69, 934-945.
- [20] Darling-Hammond, L. (2000). Teacher quality and student achievement: A review of state policy evidence. *Educational Policy Analysis Archives*, 8(1), 34-67.
- [21] Dessel, G.V. (2013). How to determine population and survey sample size. Blog.Check Market [accessed 11 March 2019] Available at:https://www.checkmarket.com/blog/howto-estimateyour-population-and-survey-sample-size
- [22] Diaz, A. L. (2003). Personal, family and academic factors affecting low academic in secondary schools. *Electronic Journal of Research in EducationalPsychology and Psycho Pedagogy*, *1*(1).
- [23] Engine-Demir, C. (2009). Factors affecting the academic achievement of Turkish Urban Poor. *International Journal of Educational Development*, 29(1), 17-29.
- [24] Epstein, (2001). *School, family, and community partnership.* Bolder C. O: Westview Press
- [25] Etsey,K. (2005). Causes of low academic performance of primary school pupils in the Shama Sub-Metro of ShamaAhanta East Metropolitan Assembly (SAEMA) in Ghana. Paper presented at the Regional Conference on Education in West Africa, Dakar, and Senegal.1st- 2<sup>nd</sup> November.
- [26] Ezeokoli, F. O., (2005). Home language as a determinant of reading interests of senior Secondary students in Oyo State, Nigeria in Dauda, A. Abimbola, A., and Kolawole, O. O. (eds). Issues in language communication and education. Ibadan: Constellation books pp. 15-31.
- [27] Fafunwa, A. B., (1974). History of education in Nigeria. London: George Allan & Urwin Ltd
- [28] Farooq, M. S., Chaudhry, A. H., Shafiq, M., & Berhanu, G. (2011). FactorsAffecting students' quality of academic performance. A case of secondary school level. *Journal ofQuality* and Technology Management, 7(2), 1-14..
- [29] Fuchs, T., &Woessman, L. (2004). What accounts for international differences instudent performance? Areexamination using PISA data. Working paper, 1.23-54.
- [30] Gay, L. (1992). Educational research: competencies for analysis and application. Upper Saddle River, NJ: Prentice Hall, Inc.
- [31] Glasow, A. (2005). Fundamentals of survey research methodology: Virginia, Mitr Washington DC3 Centre.
- [32] Halloway, S. D., Hess, R. D. & Price, G. G. (1984). Material variables aspredictors of children's school readiness and later achievement in vocabulary and mathematics in 6<sup>th</sup> grade. *Child development*, 35, 1901-1912.
- [33] Hanushek, E. A. &Wobmann, L. (2009). Do better schools lead to more growth? Cognitive skills, economic outcomes, and causation. Cambridge, MA: National Bureau of Economic Research.

- [34] Harbison, R.W., &Hanushek, E.A. (1992). Educational performance of the poor. Lessons from Rural Northeast Brazil. New York: Oxford University Press for the World Bank.
- [35] Harbison, T., &Hanushek, E. A. (2001). The right to environment, in T. Filippini and V.Vecchi (eds). *The Hundred Languages of Children: The Exhibit*. Reggio Emilia: Reggio Children.
- [36] Hassan, M.M. (2002). Academic satisfaction and approaches to learning among United Arab university pupils. Social behavior and personality. *An International Journal*, 30, 443-451.
- [37] Heady, T. (2003). *The well-being of nations: The role of human and socialcapital*. OECD Secretariat.
- [38] Helmke, A., & Van-Aken, M. A. G. (2005). The causal ordering of academicAchievement and self-concept of ability during elementary school: A longitudinal study. *Journal of Educational Psychology*, 87, 624637.
- [39] Helms, D. B. & Turner, J. S. (1986). *Exploring child behavior*. Belmont: BrucelCole Publishing Company.
- [40] Husen, T. Saha. L., & Noonan, R. (1978). Teacher training and studentperformance in less developed countries. World Bank Staff working paper No. 310, Washinton D. C: The World Bank.
- [41] Johnson, R. B., & Christensen, L.B. (2004). *Educational research: quantitative, qualitative, and missed approaches*. Boston, MA: Allyn and Bacon.
- [42] Juma, F. (2011). The relationship between mode of teacher motivation and students' academic performance in public secondary schools in Bungoma North District. Unpublished M.Ed. Project Report. Moi University, Kenya.
- [43] Kadenyi, M. M. &Kamunyu, M. E. (2006). Challenges facing women in tertiaryinstitutions: A Case of Eldoret Municipality. *The Educator*, 1(1):121-12181(1): 121-1218.
- [44] Kamwang, A. (2003). The learning behavior and leisure of low learningachievement students, Srithana Commercial Technology College Chiangmai. Unpublished master's thesis, Chiangmai University
- [45] Kapinga, D. S. (1992). Educational development in Tanzania since colonial era. Unpublished book, Morogoro: Sokoire University.
- [46] Karande, S., Kulkarni, M., (2005). Poor school performance. *Indian journal of pediatrics*.72(11): 961-967.
- [47] Kasanda, S. M. (2003). (Ed). Learning achievement at the Middle basic level: Zambia's Assessment Survey Report – 2003. Lusaka: M. O. E.
- [48] Kazmi, S. F., Mohammed, S., & Tahir, P. (2011). Parental style and academicAchievement among the students. *International Journal of Academic Research*, 3(2), 45-55.
- [49] Kerlinger, F.N. (1995). Foundations of behavior research. New York, NY: Holt, Rinehart & Winston.
- [50] Kieti, J. M. (2017). An investigation into Factors influencing students' academic performance in public secondary schools in Matungulu Sub-County, Machakos County. M.Ed. project: South Eastern Kenya University.
- [51] Kothari, C. R. (2004). Research methodology: methods and techniques. New Delhi: New Age International Limited, Publishers.
- [52] Kraft, R. J. (2004). *Teaching and learning in Ghana*. Boulder, CO: MitchellGroup.
- [53] Krashen, S. (2005). The hard work hypothesis: Is doing your homework enoughto overcome the effects of poverty?.*Multicultural Education*, 12(4), 16-19.
- [54] Kuh, G. D., Cruce, T. M., Shoup, R., Kinzie, J. & Gonyea, R. M. (2008). Unmasking the effects of student engagement on first-year college grades and persistence. *The Journal of Higher Education*, 79(5), 540-563.
- [55] Laeheem, K. (2007). Predict elementary in the academic achievement of students atIslamic private school in Three Changwat, Southern Thailand. *Prince of Songkla Journal*, 13(3), 441-443.
- [56] Lezotte, L. (2001). Correlates of Effective schools: The first and secondgeneration, Okemos (Michigan): Effective Schools Products, Ltd

- [57] Lezotte, L.W. (2010). What effective schools do: Re-envisioning the correlates. Indianapolis, IN Solution Tree.
- [58] Lockheed, M. E. & Verspoor, A.M. (1991). Improving education. *EducationReview*, 16(3), 303-311.
- [59] Ministry of Education, Youth, and Sports (2007). Trends in education and schoolmanagement in Ghana. Accra: MOEYS
- [60] Musili, A. M. (2015). Influence of teacher-related factors on students'performance in Kenya Certificate of Secondary Education. Unpublished M. ed Thesis. Kibwezi: Kenyatta University
- [61] Mwaura, P. G. (2014). Home-based factors influencing students' performancein KCSE in Public Day Secondary Schools in Lari District, Kiambu County. M.Ed. Project, University of Nairobi: Kenya
- [62] Nafukho, M. (1991). Determining optimal class size and existence of economicsof scale in Kakamega District Secondary Schools. Unpublished M. Ed. Thesis, Kenyatta University, Kenya.
- [63] Nambuya, O. B., (2013). School-based factors influencing students' academicperformance at Kenya Certificate of secondary education in Teso South District. Unpublished M.ed. Project. The University of Nairobi.
- [64] National Teaching Council (2018). Four-year bachelor of education degree:Supported teaching in school (school placement handbook). Accra: Ministry of Education
- [65] Ndiritu, W. A. (1999). A study of factors which influence performance in KCSE in selected public schools in Nairobi and Central Provinces. Nairobi: Unpublished M.Ed. Project: University of Nairobi.
- [66] Nghambi, G. H. (2014). Factors contributing to poor academic performance in certificate of Secondary Education Examination for community secondary schools in Urambo District, Tabora, Tanzania. M.Ed Dissertation, University of Tanzania: Tanzania
- [67] Nikolava, M. S. (2011). *Survey collection methods*. Department Business, Retrieved from Mnikolavafaubg.bg
- [68] Nyandwi, M. D. (2014). Determinants of poor academic performance of secondary school students in Sub-bawanga district, Tanzania.
- [69] Okoruwa, T.O. (1999). The effect of some teachers' characteristics on pupils'performance in primary science. Unpublished M. Ed. Project. University of Ibadan. Retrieved June 2, 2011, from <u>http://pkukmweb.ukm.my</u>.
- [70] Okumber, J. A. (1988). Education administration theory and practice. Nairobi University Press.
- [71] Okumu, I. M., Nakajjo, A. &Isoke, D. (2008). Socio-economic determinants of Primary school dropouts: The Logistic Model Analysis. *Retrieved May 9, 2013, from http: mpra.ub.unimuenchen.de*/7851.
- [72] Orodho, A. J. (2010). Techniques of writing proposals and reports in educationand social sciences. Maseno/Nairobi: Kanezja: HP
- [73] Pallant, J. (2009). SPSS survival manual: A step by step guide to data analysis using SPSS 9 (3<sup>rd</sup> ed.). New South Wales: Crows West.
- [74] Pearson, H. (1988). *The teaching of language skills: Listening, reading, writing.* Nairobi: Oxford University Press.
- [75] Polit, D. F., &Hungler, B. P. (1996). Research principles and methods.New Jersey: Prentice-Hall

- [76] Psacharpolous, G., &Woodhall, M. (1985). Education for Development: Ananalysis of investment choices. New York: Oxford University Press.
- [77] Pusiga District Education Office (2015). *District BECE Survey*: Pusiga
- [78] Pusiga District Education Office (2016). *District BECE Survey*: Pusiga
- [79] Pusiga District Education Office (2017). *District BECE Survey*: Pusiga
- [80] Pusiga District Education Office (2019). Statistics of basic schools and enrolment figures for the 2019/2020 academic year. Pusiga: Pusiga Education Directorate.
- [81] Quansah, E. A., (2017). Factors contributing to the academic achievement of junior high school students in Aboom Circuit, Cape Coast. Unpublished M. Phil. Thesis, University of Cape Coast.
- [82] Rampur, S. (2011). Significance of time management at workplace: visited on 2<sup>nd</sup>.
- [83] Rose, S. (2015). Management of research: Applying the principles. Nielspinks& Ana Isabel Canhato. Retrieved from documents, Routledge interactive, 53.Amason.aws.com.on April 24, 2015
- [84] Sander, W. (2001). Chicago public schools and student achievement. *UrbanEducation*, *36*(1), 27-38.
- [85] Sanders, M. G. (1996). School-family community partnerships and the academicAchievement of African, American Urban adolescents
- [86] Sarantakos, S. (2005). Social research. (3<sup>rd</sup>ed). New York: Palgrave Macmillan.
- [87] Schultz, T. P. (2002). "Why governments should invest more to educate girls". *Journal of labour economics*, Vol. 25: pp. 95-135
- [88] Shamaki, T. A. (2015). Influence of learning environment on students' academic achievement in mathematics: a case study of some selected secondary schools in Yobe-State-Nigeria. *Journal* of Education and Practice, 6(34), 40-44.
- [89] Šteingber, L. (1989). Adolescence. 2<sup>nd</sup>ed.) New York: Alfred A. Knopf.
- [90] Topor, F. D. (2010). The impact of parental involvement on a child's academic performance. *PMC Advanced Journal*, 38(3). 183-197.
- [91] West African Examination Council (2002). Basic Education Certificate Examination: Chief Examiners' Report. Accra: WAEC
- [92] West African Examination Council (2003). Basic Education Certificate Examination: Chief Examiners' Report. Accra: WAEC
- [93] West African Examination Council (2004). Basic Education Certificate Examination: Chief Examiners' Report. Accra: WAEC
- [94] West African Examination Council (2015). National BECE Survey. Accra: WAEC
- [95] West African Examination Council (2016). National BECE Survey. Accra: WAEC
- [96] West African Examination Council (2017). National BECE Survey Accra: WAEC
- [97] West African Examination Council (2019). BECE Grading System: acomprehensive guide 2020: visited on 24<sup>th</sup>December, 2019 <u>http://yen.com.gh>107663-bece</u>
- [98] Zein, M.S. (2012). Language teacher education for primary school Englishteachers in Indonesia. Retrieved from <u>https://www</u> researchgate.net/profile/subhanZein/Publication/300909051 on July 10, 2014.