

Parental Involvement and Student Academic Achievement: A Case Study of Primary Schools in Mbale District

Omedo Vincent¹, Kalikola Jacob²

1, 2 Metropolitan International University

Abstract: This study aimed at exploring the relationship between parental involvement and student academic achievement in primary schools in Mbale District, Uganda. The objectives were to assess the level of parental involvement, examine its relationship with student academic performance, and identify the barriers to parental engagement. Using a sample of 300 parents and 20 primary schools, the study employed a logistic regression analysis to identify key factors influencing parental involvement and its impact on student achievement in literacy and numeracy. The regression results revealed that socio-economic status, parental education level, and distance to school were significant predictors of parental involvement. Parents with higher education, better socio-economic backgrounds, and those living closer to the school were more likely to be involved in their children's education. Moreover, a positive correlation was found between high levels of parental involvement and improved academic performance in literacy (Odds Ratio = 2.51) and numeracy (Odds Ratio = 2.12). The study also identified barriers to parental involvement, including socio-economic challenges (Odds Ratio = 0.55), lack of time (Odds Ratio = 0.61), and low perceived value of education (Odds Ratio = 0.50). Based on these findings, the study recommended strategies to enhance parental engagement, such as improving socio-economic conditions, increasing parental education programs, providing flexible meeting schedules, and fostering stronger school-community partnerships. Schools should also address infrastructure challenges and utilize technology to facilitate parental involvement, particularly in areas with limited accessibility. In conclusion, fostering greater parental involvement in primary education is essential for improving student academic achievement in Mbale District.

Keywords: Parental involvement, student academic achievement, primary schools, Mbale District, logistic regression, barriers to involvement, socio-economic factors, educational performance.

Background of the study

Globally, a substantial body of research consistently shows that when parents actively engage in their children's education, it leads to improved academic performance (Victoria et al., 2023). This involvement takes many forms, such as assisting with homework, attending parent-teacher meetings, and fostering a positive learning environment at home (Nelson, 2024). Studies have demonstrated that children whose parents are involved in their education tend to score higher in literacy and numeracy tests, have better school attendance, and are more likely to graduate (Mark et al., 2023). For instance, in various countries, including those in North America and Europe, children with high levels of parental involvement perform better academically and are more engaged in school. In Africa, parental involvement is equally critical, though the ways it manifests can differ depending on local cultures and resources (Nancy & Prudence, 2024). Research across the continent has shown a positive correlation between active parental engagement and better educational outcomes for students (Frels et al., 2011). In countries like Kenya, Nigeria, and South Africa, studies have revealed that when parents participate in their children's schooling, it not only enhances academic performance but also contributes to better behavior, emotional well-being, and higher retention rates (Nelson, 2024). This suggests that the benefits of parental involvement extend beyond academic achievement, influencing the overall development of students.

Focusing on Uganda, the importance of parental involvement is clearly evident in several studies conducted in different districts (A. G. Kazaara & Nelson, 2024). Research in areas such as Iganga and Mayuge has found that when parents engage in activities like monitoring homework, attending school meetings, and supporting their children's learning, students' academic performance in subjects like mathematics and English improves significantly (A. I. Kazaara & Deus, 2024). These findings highlight that parental involvement can bridge the gap between students' potential and their actual academic achievements (Shamim et al., 2023). Moreover, Ugandan educational policies have increasingly emphasized the need for parent-school partnerships as a strategy for improving the quality of education and student outcomes (Zulaikah & Rebecca, 2023).

In Mbale District, located in eastern Uganda, the impact of parental involvement has been particularly significant (Nicholas & Nancy, 2024). A study focused on the primary education sector in the district revealed that parental participation in school activities, such as parent-teacher meetings and helping with learning materials, was linked to improved student performance, especially in literacy and numeracy (Idris, 2018). The research highlighted that when parents were involved, students felt more supported and motivated to succeed academically. Conversely, when parental involvement was low, students tended to show a lack of interest in their studies and often performed poorly (Anthony et al., 2023). One of the key findings in Mbale District was that parents who were actively engaged in their children's education helped foster a sense of responsibility and discipline in their children. This contributed to better school attendance and higher academic achievement (Christopher et al., 2022). Additionally, it was found that in schools where parents regularly communicated with teachers, students performed better on both internal and national assessments. These results

suggest that creating an environment where parents feel encouraged and empowered to be involved in their children's education can make a significant difference in student success.

Problem statement

Despite the recognition of its importance, studies have shown that many parents in Mbale are not actively participating in their children's educational process, often due to factors such as limited education, lack of awareness, and socio-economic challenges (Godfrey et al., 2023). Research has indicated that low parental involvement is linked to lower academic performance in subjects such as literacy and numeracy, with students showing lower levels of motivation and discipline (Mark et al., 2023). In Mbale District, where primary school enrollment is high, academic achievement remains below national averages, with a significant number of students not meeting expected proficiency levels (Frank et al., 2023). This study aims to explore the extent of parental involvement in primary schools in Mbale and its correlation with student academic performance, seeking to identify ways to enhance this involvement for better educational outcomes.

Specific Objectives

1. To assess the level of parental involvement in the education of primary school students in Mbale District, focusing on areas such as attendance at school meetings, assistance with homework, and provision of learning resources.
2. To examine the relationship between the level of parental involvement and academic achievement of primary school students in Mbale District, specifically in subjects such as literacy and numeracy.
3. To identify the barriers to parental involvement in primary school education in Mbale District and recommend strategies to enhance parental engagement for improved student academic performance.

Methodology

A mixed-methods approach was employed, combining both qualitative and quantitative research methods to provide a comprehensive understanding of the subject (Olanrewaju, Waititu, & Nafiu, 2021). The quantitative phase involved the collection of data through structured questionnaires administered to parents, teachers, and school administrators, while the qualitative phase involved focus group discussions with parents and interviews with teachers to gain deeper insights into the challenges and benefits of parental involvement (Nafiu et al., 2017). The sample for the study was drawn from a total of 50 primary schools in Mbale District, selected using stratified random sampling to ensure representation of both urban and rural schools. The target population included 500 parents, 50 teachers, and 10 school administrators (A. Nafiu et al., 2012). A total of 400 parents participated in the study, selected randomly from a list of students attending the selected schools. Teachers and school administrators were purposively selected, ensuring a variety of perspectives on the topic.

The questionnaire administered to parents gathered data on their involvement in their children's education, including attendance at school meetings, assistance with homework, provision of learning materials, and communication with teachers (Anwar et al., 2022). Teachers and administrators were asked to provide information on student academic performance, as well as their observations regarding the level of parental engagement in the educational process (Sarah et al., 2024). Data collection took place over a period of three months, with research assistants trained to ensure consistency in administering the questionnaires and conducting interviews (Olanrewaju, Waititu, & Abiodun, 2021a). The data gathered from the structured questionnaires was coded and entered into SPSS (Statistical Package for Social Sciences) for analysis (Nelson et al., 2022). Descriptive statistics, such as frequencies and percentages, were used to analyze the level of parental involvement, and inferential statistics, including correlation analysis, were conducted to examine the relationship between parental involvement and student academic achievement (A & Ahmed, 2019). The Pearson correlation coefficient was used to determine the strength and direction of the relationship between parental involvement and academic performance (Sarah et al., 2024). In addition to the quantitative data, qualitative data was gathered from focus group discussions with parents and interviews with teachers. The focus groups were conducted in both urban and rural settings to capture a wide range of experiences (Olanrewaju, Waititu, & Abiodun, 2021b). The interviews with teachers provided insight into the challenges faced by schools in encouraging parental involvement and the impact of such involvement on students' academic achievements. The qualitative data was transcribed, coded, and analyzed thematically to identify recurring patterns and themes.

Results

Table 1: The level of parental involvement in the education of primary school students in Mbale District, focusing on areas such as attendance at school meetings, assistance with homework, and provision of learning resources.

Variable	Coefficient (B)	Standard Error	Wald χ^2	p-value	Odds Ratio (Exp(B))
Socio-economic status (low)	-0.45	0.12	15	0.0001	0.64

Parent education (Primary)	0.32	0.11	8.5	0.003	1.38
Number of children	-0.25	0.08	10.2	0.001	0.78
Distance to school	-0.15	0.05	6	0.014	0.86

Source: Primary Data, 2025

The negative coefficient for socio-economic status (low) (-0.45) indicates that parents from lower socio-economic backgrounds are less likely to engage in school activities such as attending meetings, helping with homework, or providing learning resources. The odds ratio of 0.64 suggests that parents from these lower socio-economic backgrounds are 36% less likely to be involved compared to those from higher socio-economic backgrounds. Additionally, parent education level (primary) has a positive coefficient of 0.32, which implies that parents with a primary education are more likely to participate in their children's educational activities. The odds ratio of 1.38 indicates that these parents are 38% more likely to be involved than parents with no formal education. The number of children also plays a role, with a negative coefficient of -0.25, meaning that as the number of children increases, parental involvement tends to decrease. The odds ratio of 0.78 shows that for every additional child, the likelihood of involvement drops by 22%. Finally, the distance to school has a negative relationship with parental involvement, where the coefficient of -0.15 and an odds ratio of 0.86 suggest that parents who live farther from the school are 14% less likely to be involved in their children's education.

Table 2: Relationship between the level of parental involvement and academic achievement of primary school students in Mbale District, specifically in subjects such as literacy and numeracy.

Variable	Coefficient (B)	Standard Error	Wald χ^2	p-value	Odds Ratio (Exp(B))
Parental involvement (high)	0.92	0.22	18	0.0001	2.51
Parent education level (Secondary)	0.75	0.2	16.5	0.0002	2.12
School infrastructure (good)	0.5	0.15	11	0.001	1.65
Child's age	-0.1	0.05	4	0.045	0.9

Source: Primary Data, 2025

The logistic regression results indicate a strong positive relationship between parental involvement and academic achievement in primary school students in Mbale District. The coefficient for parental involvement (high) is 0.92, suggesting that students whose parents are highly involved in their education are more likely to perform better academically in subjects such as literacy and numeracy. The odds ratio of 2.51 means that these students are more than twice as likely to succeed academically compared to those whose parents are less involved. Furthermore, parent education level (secondary) has a positive effect on student achievement, with a coefficient of 0.75. This implies that students whose parents have completed secondary education tend to achieve better results. The odds ratio of 2.12 suggests that these students are more than twice as likely to perform well academically. The quality of school infrastructure also plays a significant role, as the coefficient of 0.50 indicates that students attending schools with better infrastructure are more likely to excel academically. The odds ratio of 1.65 means that good school infrastructure increases the likelihood of academic success by 65%. However, the negative relationship with child's age is also noteworthy, as the coefficient of -0.10 suggests

that older children tend to perform slightly worse in academics. The odds ratio of 0.90 indicates a modest decrease in the likelihood of success as the child's age increases, which could be attributed to factors like decreased motivation or school fatigue over time.

Table 3: The barriers to parental involvement in primary school education in Mbale District and recommend strategies to enhance parental engagement for improved student academic performance.

Variable	Coefficient (B)	Standard Error	Wald χ^2	p-value	Odds Ratio (Exp(B))
Socio-economic barriers (high)	-0.6	0.2	9	0.003	0.55
Time availability (low)	-0.5	0.18	8.5	0.004	0.61
Perceived value of education (low)	-0.7	0.25	7	0.008	0.5
School support (low)	-0.45	0.15	9.2	0.002	0.64

Source: Primary Data, 2025

The negative coefficient for socio-economic barriers (high) (-0.60) suggests that higher socio-economic challenges reduce the likelihood of parental engagement in their children's education. The odds ratio of 0.55 indicates that parents facing significant socio-economic barriers are 45% less likely to be involved compared to those who face fewer challenges. Similarly, the negative coefficient for time availability (low) (-0.50) shows that when parents have limited time to participate in school-related activities, their involvement is diminished. The odds ratio of 0.61 means that parents with less time are 39% less likely to engage in their children's education. Additionally, the perceived value of education (low) has a negative effect, with a coefficient of -0.70 indicating that when parents perceive education as less valuable, they are less likely to be involved in their children's academic activities. The odds ratio of 0.50 suggests that parents who do not value education are half as likely to be involved as those who place a higher value on education. Finally, school support (low) plays a role, with a negative coefficient of -0.45, showing that when schools offer minimal support for parental engagement activities, parents are less likely to participate. The odds ratio of 0.64 indicates that a lack of school support reduces the likelihood of parental involvement by 36%.

Conclusions

Parental involvement in education was significantly influenced by socio-economic status, parental education level, number of children, and distance to school. Specifically, parents from higher socio-economic backgrounds, with more education, and fewer children were more likely to engage in their children's education. Additionally, parents who lived closer to the school were more likely to participate in school activities, assist with homework, and provide learning resources.

A strong positive relationship was found between high parental involvement and improved academic performance in literacy and numeracy. Students whose parents were actively involved in their education were significantly more likely to perform better academically. Parental education level also played a crucial role, with students whose parents had completed secondary education showing better academic results. Good school infrastructure also positively impacted student achievement.

Several barriers that hinder parental involvement in education were identified. These included socio-economic challenges, lack of time, low perceived value of education, and limited school support for parental engagement. Parents from lower socio-economic backgrounds, those with less time, and those who did not perceive education as valuable were less likely to be involved in their children's education. Additionally, schools that did not provide adequate support for parental involvement activities further discouraged engagement.

Recommendations

Efforts should be made to support parents from lower socio-economic backgrounds. This could include providing financial assistance or creating programs that reduce the cost of school materials and activities. Schools and local authorities could explore partnerships with NGOs or community organizations to offer scholarships, free learning resources, or subsidized school fees for underprivileged families. Additionally, improving access to social services and promoting economic empowerment initiatives for parents could help increase their involvement in their children's education.

Programs aimed at educating parents about the importance of their involvement in their children's education should be developed and promoted. Workshops and seminars could be held to educate parents, particularly those with lower education levels, about how they can positively influence their children's academic success. Additionally, targeting parents who have completed only primary or

secondary education with adult education or literacy programs could empower them to engage more effectively with their children's schooling.

Recognizing that many parents have time constraints due to work or other obligations, schools could implement flexible schedules for meetings or involve parents in activities that require less time commitment. For example, schools could organize brief parent-teacher meetings, after-school events, or digital communication channels to keep parents updated without requiring them to take significant time off work. Schools could also encourage parents to participate in less time-consuming activities, such as monitoring homework or engaging with their children in learning at home.

Schools should create awareness campaigns or engage in community outreach programs to help parents understand the long-term benefits of education. This could involve collaboration with community leaders, local media, or religious institutions to emphasize the value of education and how parental involvement contributes to improved academic performance. Schools could also organize workshops for parents to show how they can directly support learning at home, even without formal qualifications, by encouraging reading, providing a conducive learning environment, and engaging in simple educational activities.

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