

# Journal of Poverty



ISSN: (Print) (Online) Journal homepage: www.tandfonline.com/journals/wpov20

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**To cite this article:** Mensah Prince Osiesi, Olajumoke Olayemi Salami, Adenike Lucia Aruleba, Olaitan Titilayo Akinola, Abiodun Adesope Fadiya, Atinuke Titilope Babalola, Muyiwa Sunday Ajimuse, Abidemi Olufemi Arogundade & Sunday Nnamdi Okocha (10 Apr 2024): Undergraduates' Educational Life and Academic Engagement in Southwest Universities in Nigeria: The Role of Gender and Perceived Poverty, Journal of Poverty, DOI: 10.1080/10875549.2024.2338175

To link to this article: <a href="https://doi.org/10.1080/10875549.2024.2338175">https://doi.org/10.1080/10875549.2024.2338175</a>

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# Undergraduates' Educational Life and Academic Engagement in Southwest Universities in Nigeria: The Role of Gender and Perceived Poverty

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#### **ABSTRACT**

This study assessed the influence of gender and perceived poverty on undergraduates' educational life and academic engagements in public universities in Ekiti State, Nigeria. 700 undergraduates perceived to be poor were purposively selected. Data was collected using the "Poverty Factors Questionnaire;" with sub-sections measuring perceived poverty ( $\alpha = 0.71$ ), educational life ( $\alpha = 0.86$ ), and academic engagements ( $\alpha = 0.94$ ) hosted on Google forms. Data was analyzed using descriptive statistics, t-test, and correlation analysis. Findings indicate that gender in favor of males significantly contributed to undergraduates' educational life, and engagements; positive and significant relationship among undergraduates' perceived poverty, educational life and engagements. Recommendations are made.

#### **KEYWORDS**

Academic engagements; educational life; gender; perceived poverty; undergraduates

#### Introduction

This study aims to assess the influence of gender and perceived poverty on undergraduates' educational life and academic engagements at public universities in Ekiti State, Nigeria. Poverty remains a crucial and complex issue affecting the global space (Zanky et al., 2023), a more reason it stands out as the first agendum of the Sustainable Development Goals (SDG). As one of the measures to alleviate poverty, access to education is perceived to be a crucial human right and a key social policy for citizens in every society (Ubangida et al., 2018). Individuals who aspire to reach the zenith of educational pursuit and qualification may be critically deterred by poverty. The divide between

students from wealthy and low-income households has largely been characterized by disparities in wealth distributions which remained constant and has affected students in both their academic and social lives (Lancker & Parolin, 2020). The aftermath of the COVID-19 pandemic has widened the disparity gap and the predicament of the poor more apparent (Cookson, 2020).

Undergraduates from predominantly poor communities can rarely afford their living expenses, as they suffer from higher levels of financial stress and food insecurity relative to the general population (Brownfield et al., 2020). The poorest nations with the highest proportion of citizens below the poverty line are in Sub-Sahara Africa, as many of their citizens live on less than \$1.25 a day (World Poverty Clock, 2019). In addition, extreme poverty increasing by almost six persons per minute (World Bank, 2016; Zanky et al., 2023). In Nigeria for instance, the poverty rate is alarming, as more than seventy percent of her citizens (over 95.1 million in 2022) still live far below the poverty line, deterring developmental goals associated with education (Inam, 2015; Okah et al., 2020; Oyebamiji & Khan, 2023).

Extreme poverty facilitated by high unemployment rate has been the bane of an average Nigerian which has expressed itself in terms of infrastructure deterioration, poor living standards, lack of access to health facilities, food, clothing, transportation facilities, shelter, potable water, and education (Inam, 2015; Oyebamiji & Khan, 2023). It is also reported that corruption, high crime rate, laziness, bad governance and income inequality are the causes of poverty in the Nigerian context (Ucha, 2010). Poverty takes a toll on every area of the life of individuals as it impacts their emotional, financial, spiritual, physical, knowledge, support systems, role models and mental health (Lacour & Tissington, 2011; Sirois, 2018). Under such circumstances, poor students are more likely to be academically discriminated against (Knifton & Inglis, 2020). Poor students are likely to experience more social and emotional challenges, stress, depression, suicide ideation and suicide, severe anxiety, and cognitive decline (McKenzie, 2019; Nyagwencha-Nyamweya, 2022). McKenzie (2019) affirms that poverty has become a key predictor of academic achievement in schools.

Students' poverty can be referred to as the lack of essential resources for educational and non-educational purposes. It is also known as the dearth of material prosperity and low living standards (Nyagwencha-Nyamweya, 2022). Poverty among students can be relative or absolute; as what is termed poverty within a given context, may not be so in another (Ubangida et al., 2018). A student is relatively poor when he or she lives below the general living standard as measured by the economy of his or her immediate environment, while students' absolute poverty is a lack of requisite resources needed for survival (Cook, 2021). Perceived poverty (a term we would prefer in this study) is a common psychological feeling among students with impoverished backgrounds, which affects their

interpersonal interactions, psychological health, and life satisfaction (Liu & Fu, 2022). Poor students are likely to feel a sense of inadequacy, underachievement, and not measuring up to societal standards (Buck & Deutsch, 2014). School fees for these students are unaffordable, which becomes a major obstacle and contributes to ongoing high dropout rates. By so doing escalating an already deplorable state of inequality and student poverty (Buck & Deutsch, 2014). In this study, we defined perceived poverty as students' inability to meet their academic and social needs within the university space, its gloom-ridden influence on educational life, vis-a-vis academic engagements.

We have defined educational life to depict students' educational support, ease of mobility, and academic performance. We think that these are the indicators of students' educational life within the confines of this study. Wanjama et al. (2020) assert that poverty is a major factor affecting students' educational life by determining the school status, learning interest, attitude toward assessment and academic tasks, and students' engagements and interactions in class. Similarly, academic engagement is a multi-dimensional construct that has been studied in various disciplines and has been found to affect students' educational activities and life (Sukor et al., 2021).

Students below the poverty line are sometimes mistakenly viewed as incapable of academic and social success due to their material conditions (Milner et al., 2017). Students' inability to purchase academic materials due to poverty, results in their academic failure and seclusion (S. B. Johnson et al., 2016). Students living in poverty may display social, behavioral, and emotional difficulties early in life, and this may be more pronounced throughout their youthful lives (Knifton & Inglis, 2020). The authors claim that to support students who are below the poverty line, we must carefully reconsider our beliefs and behaviors regarding poverty and how it affects students' quality of life and education. This is made possible by educational support mechanisms (Jones et al., 2018; Milner, 2015). However, in this study, we have conceived students' academic engagements to denote their active engagement in both academic and social activities within the university, irrespective of their gender.

Gender can be referred to as a state of being male or female (Osiesi et al., 2022). According to Sanni et al. (2023) and Wrigley-Asante et al. (2023), several factors, including students' gender, impede university students' academic achievement and engagement. In an academic institution, students - male or female remain the end result of the teaching and learning process. Gender gap, a widely known phenomenon in education is either in favor of females (Kessels et al., 2014; Lietaert et al., 2015) or males (Casuso-Holgado et al., 2013; Crowther & Briant, 2022; Tartari & Salter, 2015; Wrigley-Asante et al., 2023). Students' perceived poverty, in relation to gender, could impact on their academic engagement and educational lives. In terms of gender disparity and involvement within (academic engagement) and without (educational life) the classroom, studies have shown that female students are more academically engaged than males (Havik & Westergård, 2019; Lietaert et al., 2015).

Studies reaffirm that students' poverty leads to increased dropout rates (Arkoudis et al., 2018; Li & Carroll, 2020), financial stress, inability to pay for university fees, and dropout from academic engagements (Norton et al., 2018; Nour, 2020), course and program deferment (Halliday-Wynes & Nguyen, 2014), high psychological distress (Andrews & Chong, 2011), poor academic performance (Lacour & Tissington, 2011). Others have suggested ways by which poverty among students could be addressed (Mouraviev & Kakabadse, 2022; Zanky et al., 2023). However, the impact of gender and perceived poverty on undergraduates' educational life and academic engagements is rarely considered (Brownfield et al., 2020; Liu & Fu, 2022). Especially in Nigeria, little or no attention has been drawn to the subject, necessitating the need for this current study.

#### Theoretical framework

The theory of vicious circle of poverty and Abraham Maslow's theory of hierarchy of needs, situate this study. Iniodu (1997) posits that poor individuals are consistently in the loop of the poor. The life of students who are living in poverty typify the vicious circle of poverty as they often lack the basic means of livelihood, even while in school, they are unable to break out of its shackles. They barely cater for themselves, usually fall sick and can barely afford medications, hospitalization, payment of school and accommodation levies, amongst others. These result in poor academic outcomes, limited opportunities, peer alienation or exclusion, poor dieting, poor study habits, poor health and so on. The educational life and engagement of most students in Nigeria reflect the basic tenets of this vicious circle in which poverty is likely to breed further poverty. Maslow's theory of needs posits that an individual would first meet his lower needs (psychological) before the high needs (self-actualization). Students' lower needs are mainly food, clothing, accommodation, heath care, academic materials (texts, writing and learning materials, reading lamp, and so on), and means of mobility to and fro their lecture halls, and represent the basic aspects of their educational life. It is only after these basic needs are met, that others needs on the hierarchy could be pursued (Ubangida et al., 2018). With these, students are more engaged academically and socially.



# Rationale for the study and value added

In the extant literature, empirical studies regarding the impact of perceived poverty and students' gender and their relationship with students' educational life and academic engagements, especially in the university space is scanty. Essentially, studies on poverty have not in the actual sense examined the relationship of perceived poverty on educational life as perceived by university students around the dimensions of educational support, mobility, social interactions, academic performance, and engagement. It is against this backdrop that this current study intends to investigate the influence of perceived poverty and gender on the educational life and academic engagements of undergraduates in public universities in Ekiti State, Nigeria.

The accruing findings of this study intend to provide baseline information for governments (especially the Nigerian government) on the nature of the relationship that exists among university students' gender, perceived poverty, educational life, and academic engagements. Policy makers, governments, and organizations would from this study's findings earmark special intervention programs and funds to support indigent students (whether male or female) in tertiary institutions (or other levels of education). Curriculum planners would benefit from this study as it would provide information for them in restructuring or transforming the university curriculum in facilitating the development and application of the fourth revolution skills among students, which they can adopt in raising funds by doing part-time jobs. The extant literature would not be left out, as the findings of the study would boost the knowledge on the subject in context.

#### Statement of the problem

University education is designed as a public institution to develop and prepare individuals for transition into the workplace and a productive life. Every Nigerian, irrespective of gender, tribe, status, or religion should access university education not only on merits but also on the basis that the material conditions set in place ensure that everyone is catered for to the extent that no one is left out based on the financial affordance or socioeconomic statutes. In reality, a large number of Nigerians do not have the privilege nor the resources to access or enroll into university education. Those who are fortunate to be granted access, are unlikely to graduate, or should they struggle to graduate, have very poor outcomes in their academic performance mainly as a consequence of their financial status. This stems from the fact that these students may have come from poor backgrounds and are thereby poor themselves. Thus, there is a need for an



empirical inquiry into the relationship among students' perceived poverty, educational life, and academic engagement, amidst gender differences. Hence, this study assessed the influence of gender and perceived poverty on the educational life and academic engagements of undergraduates in Ekiti State, Nigeria.

# Research questions

- (1) Is there any significant mean difference between undergraduates' gender and educational life?
- (2) Is there any significant mean difference between undergraduates' gender and academic engagements?
- (3) What is the relationship among undergraduates' perceived poverty, educational life, and academic engagements?

#### Literature review

## Concept of poverty

Poverty has always been an item of discussion by nations, governments, institutions, international agencies, and at an individual level. To understand the effects of poverty, one must first know what poverty is (Sarkozy, 2022). Despite the increased attention apportioned to alleviating poverty in several climes, little or no change has been realized and documented; this is due to the fact that poverty rates, and existing inequality gaps between the rich and the poor, continue to widen (Roser & Ortiz-Ospina, 2019; World Bank, 2018a, 2018b). Bracho (2000) asserts that poverty could be referred to as the scarcity of the means of survival. According to McConnell and Brue (2005) and Boh and Onyemaechi (2020), poverty is the state in which an individual or family is unable to meet their basic necessities, which include clothing, food, shelter, and transportation. Boatwright and Midcalf (2019) believe that poverty is not solely a result of financial deprivation in families, but rather a result of a lack of resources, including information, role models, financial, physical, mental, and spiritual. It involves a complex variety of variables that negatively impact people in many different ways, such as the right to an education for all children (Boh & Onyemaechi, 2020).

Omobowale (2014) asserts that poverty is a condition in which individuals lack access to positive aspects of life, the means to attain a desired level of wellbeing, and a standard of living that is acceptable in society. The resources required for success in and out of the classroom are not available to lowincome schools (Sarkozy, 2022). Poverty is a long-standing issue in developing nations that has drawn the interest of wealthy nations worldwide. Ten percent of the world's population, or more than 700 million people, still live in severe



poverty and struggle to meet even the most basic requirements, such as access to clean water, sanitation, health care, and education (United nations, 2019).

Abdu-Raheem (2015) posits that most Nigerians are unable to meet their children's needs, particularly their educational needs, which indicates that they are living below the poverty line. Buck and Deutsch (2014) assert that poverty results in what they termed "inferior education," necessitated by students' numerous challenges, which cannot be solved by either the teacher or the school. They further restated that due to poverty, schools now have dilapidated infrastructure, which impedes education quality (including students' educational life and engagements), school management and support systems.

# **Empirical review**

Amzat (2010) conducted a qualitative study to examine the effect of poverty on education in Nigeria and the ways by which it could be addressed. The findings showed that poverty restricts access to education, affects the quality of education, students' feeding and shelter. According to Casewell (2018), poverty raises risks of socio-economic difficulties and poor academic performance of students. The studies of Kendra (2019), K. Johnson (2019), and Justice et al. (2019) have reaffirmed the negative impacts of poverty on students' social interaction and engagements, as well as self-confidence or selfesteem. Haanpää et al. (2019) examined how poverty and social relationships affect the perceived life satisfaction of Finnish students. The findings showed that children who are not from poor backgrounds have higher levels of life satisfaction compared to those who are from poor backgrounds. Mood and Jonsson (2016) in their study on the social consequences of poverty in Sweden, adopted panel data methods on longitudinal data and concluded that poverty in general has adverse effects on social life. Şengönül (2021) carried out a study on the adverse role of poverty on students' social life, cognitive development, and academic performance. The findings established that poverty decreases support for students, their social life, and academic outcomes. Studies by Smith-Carrier, Smith-Carrier et al. (2019); Simon (2018), and Sarkozy (2022) reaffirm the negative impact of poverty on students' social and academic performance.

It has been documented and revealed through several empirical studies that poverty negatively impacts on students' educational development and achievement (Blair & Raver, 2016; Ihejirika & Green, 2020; Smarr, 2020). In the Thandanani neighborhood in the Insiza area, Wisdom (2013) investigated the causes and effects of poverty on academic achievement. The study's conclusion demonstrated how poverty has a detrimental effect on pupils' academic performance. In the Shongom Local Government Area of Gombe State, Nigeria, Boh and Onyemaechi (2020) also studied the impact of poverty on the academic achievement of female senior secondary school pupils. Their research indicates that students' academic performance is significantly impacted negatively by poverty.

The study by Ihejirika and Green (2020) on the effect of poverty on the academic performance of secondary school students in Bonny Local Government Area of Rivers State, Nigeria, also indicates a negative impact of poverty on students' academic performance. The study by Wanjama et al. (2020) examined the effect of poverty on Kenya students' academic performance. The findings indicate that poverty has a significant negative effect on students' academic performance and academic engagements. Brownfield et al. (2020) systematic review also indicates a negative relationship among students' poverty, well-being, university engagement and academic outcomes. Andrea (2017) conducted a qualitative study in the United States to ascertain the reason behind students dropping out of college. The findings show that poverty was a major cause amongst others.

Mobility problems are linked to poverty (Martiskainen et al., 2021). Poverty could limit one's ability to transit from one place to another (Allen & Farber, 2019), and people who are poor face the challenges of mobility for reasons that are either social, religious, or economic (Alkire & Santos, 2014). Due to their incapacity to relocate or carry themselves to such locations, those who live in distant or isolated areas may have restricted access to employment opportunities, high-quality education, healthcare services, other critical resources, and functional and quality education, as they are unable to pay the transport fares. Also, people's ability to better their financial status may be hampered by a lack of mobility alternatives (IFAD, 2020; Zimmermann, 2013). Individuals and groups can improve their chances of escaping poverty and attaining better socioeconomic results by ensuring ease of mobility, thereby breaking the cycle of poverty (Chetty et al., 2016).

Gülşen and Şahin (2023) looked at gender disparities to investigate the relationship between academic self-efficacy and engagement, with a major focus on the role of personal growth. The study's conclusions demonstrate that gender has no discernible influence on students' academic engagement and self-efficacy. Kessels et al. (2014) investigated how gender affected students' performance in mathematics and science as well as their involvement in the classroom. The results show that women were generally more engaged in their academic lives than men were. Wrigley-Asante et al. (2023) mixedmethods research was on gender differences in academic performance of STEM students in Ghana. Their findings showed that the academic performance and engagements of males were better than those of the females.

Crowther and Briant (2022) investigated gender-based differences in academic achievement in STEM fields. The findings of the study revealed that females had higher academic achievement than males. Casuso-Holgado et al. (2013) cross-sectional study on health science students in a Spanish university was aimed at examining their academic performance and engagement. The study found higher levels of academic engagements among male students than their female counterparts. Tartari and Salter (2015) examined the engagement gaps in relation to gender differences among academics in a university cum industry collaboration activities. Their findings indicate that male academics had higher engagements than females. Still, Appiah-Kubi et al. (2022) study regarding academic engagements of high school students in Ghana, reveals that both male and female students have equal academic engagement levels.

# Methodology

## Research design

The study adopted the survey research design, as the study's variables were not manipulated.

#### Study context, population and sample

This research was designed to be university student-centered and to elicit information as regards the study from students we know in the sampled universities' faculties as poor. However, this was done without reinforcing any form of stigma on the participants, by reassuring them prior to their participation, that the essence of the research is only for academic concerns, and that their response would provide better enlightenment on the subject. We purposively selected public universities (government-owned), in Southwest Nigeria; as it is expected that the majority of poor students enroll in government-owned schools based on their affordability (McCaslin-Timmons & Grady, 2022). In Nigeria and other Sub-Sahara African universities, private universities are in the real sense, more likely off the reach of the poor and the middle class since their fees are somewhat very exorbitant.

The population of the study comprised all undergraduates in public universities (Federal University of Oye-Ekiti: FUOYE), Ekiti State University: EKSU, and Bamidele Olumilua University of Education, Science and Technology: BOUESTI) in Ekiti State, Nigeria. Purposive sampling was also used in selecting a faculty of education in the selected public universities as we expect to find more poor students in the faculty. This is because the faculty of education in the study contexts, pays the least tuition/school fees, amongst others. The convenient sampling technique was used in selecting students who we know are poor given our years of teaching, guiding and counseling services rendered to them. Many of them had in the past, reached out to us (including Departmental and faculty welfare committees), for one financial/material help or the other. Thus, 700 undergraduates from the faculty of education constituted the study's sample.



#### **Instruments**

Researchers and policymakers have contrasting views of what students' poverty measurement should be. Some suggest that it should capture students' socioeconomic status (Greenberg et al., 2019); median household income of the student (NYC IBO, 2015); parental education levels (Owens et al., 2016), a share of poor or single-parent households and community socio-economic statistics (Geverdt & Nixon, 2018), students' mobility or instability (Sandstrom & Huerta, 2013), and free or reduced-price meals (Koedel & Parsons, 2019). Nonetheless, there is no universally accepted measure for students' poverty (Greenberg et al., 2019), a reason we measured students' poverty contextually, bearing in mind the aforementioned measures. As such, the instrument we used in collecting data for this study were developed with the knowledge from this literature and the researchers.

The instrument was tagged the Poverty Factors Questionnaires (PFQ), which consists of four sections A to D. Sections A captures students' demographics such as gender, age, academic level, faculty, means of school fees payment, and times school fees are paid. Section B consists of 16 items that measured students' perceived poverty, with items placed on a 5-point Likert scale of "Very True" to "Very Untrue." This scale was self-developed by the researchers, using the insights from Liu and Fu's (2022) perceived poverty scale, where higher scores indicated higher perceived poverty. Section C was self-developed by the researchers and had three sub-sections: academic performance, educational support, and mobility; there were 23 items in all, that measured students' educational life, and these were placed on a 5-point Likert scale of "Very True" to "Very Untrue." Section D was also self-developed by the researchers, with 28 items measuring students' academic engagements, and were placed on a 5-point Likert scale of "Very often" to "Never." We validated these scales by peer-to-peer reviews, and subsequently pilot tested them on a smaller sample (n = 46), that were not part of the study sample. The ordinal alpha reliabilities of the scales (B, C, D) were 0.71, 0.86, and 0.94 respectively; depicting that they are internally consistent and reliable for the study's concerns.

# Method of data collection

Ethical clearance for this study was obtained from the office of the Dean of the Faculties of Education of the sampled universities, and approval was granted. The instruments were designed and hosted on an online application (Google forms). Informed consent of the sampled undergraduates and purpose of the study was requested through the various undergraduates' communication group platforms (Telegram, WhatsApp, and Google Classrooms). Also, an option for voluntary participation was created on the Google link form to



either accept to participate and proceed on the online survey or not. Respondents were encouraged at the conclusion of lectures to fill out the questionnaires to increase the response rate. The contact details of the researchers were made available on the form for respondents who needed more clarification to questions while filling out the questionnaires (Simões de Almeida et al., 2023). Data collection lasted for four months (July to October 2023).

# **Data analysis**

Data for this study was analyzed using descriptive statistics, t-test, and correlation analysis via the Hayes macro process in SPSS version 26.0.

#### Results

Table 1 presents the demographic characteristics of the respondents. It reveals that 422 (60.3%) of the respondents were from FUOYE, 168 (241%) were from EKSU, and 110 (15.7%) were from BOUESTI. There were 229 (32.7%) males and 471 (67.3%) females. 141 (20.1%) were less than 20 years of age, 557

**Table 1.** Distribution of demographics.

Variable	Frequency	Percentage (%)
University		
FUOYE	422	60.3
EKSU	168	24.0
BOUESTI	110	15.7
Total	700	100
Gender		
Male	229	32.7
Female	471	67.3
Total	700	100
Age		
Less than 20	141	20.1
21–30	557	79.6
Above 30	2	0.3
Total	700	100
Level		
100	92	13.1
200	243	34.7
300	364	52.0
400	1	0.1
Total	700	100
Means of Paying School Fee		
Parent	550	78.6
Self	120	17.1
Family Relation	17	2.4
Scholarship	3	0.4
Sponsor	10	1.4
Total	700	100
Number of Times Paid School Fee		
Twice	645	92.1
More than twice	55	7.9
Total	700	100

(79.6%) were between 21-30 years, and 2 (0.3%) were above 30 years of age. 92 (13.1%) of the respondents were in 100 level, 243 (34.7%) were 200 level, 364 (52%) were 300 level and 1 (0.1%) were in 400 level. 550 (78.6%) of the respondents stated that their parent pays their school fees for them, 120 (17.1%) pays by themselves, 17 (2.4%) had their fees paid by family relatives, 3 (0.4%) had scholarships, and 10 (1.4%) pays through a sponsor. Furthermore, on the number of times the respondents paid their schools, it was found that 645 (92.1%) paid twice while 55 (7.9%) pays more than twice, depicting their poverty status. Moreover, the result of the normality assumption based on skewness and kurtosis values of -2 to +2 and -7 to +7 respectively (Byrne, 2010) show that the data is normally distributed as the values from the data falls within the acceptable range.

**RQ1.** Is there any significant mean difference between undergraduates' gender and educational life?

Table 2 presents the significant difference between gender and undergraduates' educational life in the sampled universities. The Levene's test for equality of variances in the group means was significant (F = 8.334; p < .05). Since the group means had no equal variance, equal variance not assumed was used. The mean score (M = 50.74) of males were higher than the mean score (M = 47.94) of females, and this was statistically significant ( $t_{(698)} = 2.019$ ; p = .036). This implies that gender in favor of males significantly contributed to undergraduates' educational life in the universities.

RQ 2: Is there any significant mean difference between undergraduates' gender and academic engagement?

Table 3 presents the significant difference between gender and undergraduates' academic engagement in the universities. The Levene's test for equality of variances in the group means was not significant (F = 2.632; p > .05), denoting that the group means had equal variance. Hence, the equal variance assumed was used. The mean score (M = 89.75) of males were also higher than the mean score (M = 78.93) of females, and this was statistically significant  $(t_{(698)} = 5.885; p = .000)$ . Therefore, gender in favor of males significantly contributed to undergraduates' academic engagement in the sampled universities.

Table 2. T-test of significant difference between undergraduates' gender and educational life.

		Levene' for Equa Variar	lity of		t-test for Equality of Means				
Gender	Mean	F	Sig.	T	Df	Sig. (2-tailed)	Mean Diff.	Std. Error Diff.	Significant
Male (229)	50.74	8.334	.004	2.099	698	.036	2.802	1.335	_
Female (471)	47.94	_		2.019	409.516	.044	2.802	1.388	

N = 700; SD for Male = 18.82, SD for Female = 15.93.

Table 3. T-test of significant difference between undergraduates' gender and academic engagement.

	Levene's test for equality of variances					t-test for equality of means				
Gender	Mean	F	Sig.	T	df	Sig. (2-tailed)	Mean diff.	Std. error diff.	Significant	
Male (229)	89.75	2.632	.105	5.885	698	.000	10.817	1.838		
Female (471)	78.93	_		5.946	464.002	.000	10.817	1.819		

N = 700; SD for Male = 22.36, SD for Female = 23.03.

**RQ3.** What is the relationship among undergraduates' perceived poverty level, educational life, and academic engagement?

Table 4 presents the result of the Pearson Product Moment Correlation coefficients and the significance of the relationship among undergraduates' perceived poverty, education life (academic performance, educational support, mobility) and academic engagement (academic activities and social activities) of undergraduates in the sampled universities. There exists no multi-collinearity (r > 0.90) among the variables of the study. Also, the intercorrelation matrix reveals a positive and significant relationship among perceived poverty, educational life (academic performance: r = 0.50,  $p < .05_{(0.00)}$ ; mobility: r = 0.42,  $p < .05_{(0.00)}$ ), and academic engagement (academic activities: r = 0.12,  $p < .05_{(0,0)}$ ; social activities: r = 0.38,  $p < .05_{(0.00)}$ ) respectively. However, a positive but insignificant relationship existed between perceived poverty and educational support  $(r = 0.04, p > .05_{(0.24)})$ .

#### Discussion

This study aimed to investigate gender differences in undergraduates' educational life and academic engagements, as well as the relationship

Table 4. Intercorrelation matrix of parent perceived poverty level, educational life and academic engagement of undergraduates.

	LP_Pr	EL_AP	EL_ES	EL_M	AE_AA	AE_SA
LP_Pr	1	.504**	.044	.416**	.138**	.380**
EL_AP		1	209**	.816**	084*	.345**
EL_ES			1	169**	.081*	210**
EL_M				1	076*	.270**
AE_AA					1	.732**
AE_SA						1

<sup>\*.</sup> Correlation is significant at the 0.05 level (2-tailed).

<sup>†.</sup>Correlation is significant at the 0.01 level (2-tailed).

LP\_Pr = Parent Poverty Level; EL\_AP = Education Life in terms of Academic Performance; EL\_ES = Education Life in terms of Educational Support; EL\_M = Education Life in terms Mobility; AE\_AA = Academic Engagement in terms of Academic Activities; AE SA = Academic Engagement in terms of Social Activities.

among undergraduates' perceived poverty, educational life, and academic engagements. Results demonstrate that gender in favor of males significantly contributed to undergraduates' educational life and academic engagements. As expected, we think that given the nature of the male gender, as they are more physically strong, resilient, and adaptive, they are likely to adjust easily to daunting educational life. With regards to academic performance, mobility, and educational support, males have better outcomes than females, as they are more agile and mobile than females. They are also more likely to delegate academic tasks to peers or female counterparts (a form of educational support), which invariable can lead to their enhanced academic performance. This finding is consistent with the findings of Casuso-Holgado et al. (2013), Tartari and Salter (2015), Wrigley-Asante et al. (2023) which revealed higher levels of academic engagements among male students than their female counterparts. Yet the finding is not in tandem with the findings of Crowther and Briant (2022) which revealed that females had higher academic achievement than males; Appiah-Kubi et al. (2022) which revealed that both male and female students have equal academic engagement levels; Kessels et al. (2014) which revealed that women were generally more engaged in their academic lives than men were, and Gülşen and Şahin (2023) which indicate that gender has no discernible influence on students' academic engagement and performance.

The findings of the study have revealed a positive and significant relationship among undergraduates' perceived poverty, educational life (academic performance, mobility, educational support), and academic engagements (academic and social engagements). This implies that perceived poverty among undergraduates affects their academic performance, mobility, educational life, academic and social engagements (Sirois, 2018). Undergraduates who are poor (or perceived to be) will likely not be able to purchase academic materials (Johnson et al., 2016), enjoy little or no academic support, leading to a decline in academic engagements and performance (Sanni et al., 2023, Wrigley-Asante et al., 2023). They are also not able to easily afford the cost of mobility (and this affects their class attendance, or meeting up with other academic schedules) (Martiskainen et al., 2021; Allen & Farber, 2019).

Poor students could have sense of belonging challenges, and this impedes their self-confidence, self-esteem and eventual social life and interactions (Knifton & Inglis, 2020). This finding supports those of previous studies (Amzat, 2010; Blair & Raver, 2016; Boh & Onyemaechi, 2020; Brownfield et al., 2020; Casewell, 2018; Haanpää et al., 2019; Ihejirika & Green, 2020; K. Johnson, 2019; Justice et al., 2019; Kendra, 2019; Mood & Jonsson, 2016; Sarkozy, 2022; Şengönül, 2021; Smarr, 2020; Simon, 2018; Smith-Carrier, Smith-Carrier et al. 2019; Wanjama et al., 2020; Wisdom, 2013).



#### **Conclusion and recommendations**

This study has brought to the fore insights into gender differences as pertain to undergraduates' educational life and engagement, and this was found to be in favor of males. The study also provides insights into the negative impact of undergraduates' poverty on their educational support, mobility, academic performance, academic and social engagements. While male undergraduates have better educational life and higher academic engagements according to this study's results; undergraduates' poverty, irrespective of gender, has a negative impact on students' educational life and academic engagements. Stemming from the findings of this study, we recommend that avenues and schooling-learning opportunities that promote undergraduates' enhanced educational life and engagements be made available and accessible to all students, with special attention to the females. Support programs and opportunities for poor students to exit poverty should be made available by governments and education stakeholders, including university managers and administrators (Buck & Deutsch, 2014; Smarr, 2020).

#### Limitation and future research directions

When evaluating the findings of this study, it is important to consider its limitations. While a cross-sectional study can uncover connections that may aid in guiding or directing future research, it is not the ideal method for establishing causation between variables. On this, we suggest future research to explore similar study using the qualitative or mixed research lenses. Second, the use of online survey for data collection may have influenced the response rate. Third, contextualizing poverty is contentious, as such, this may impede the generalization of this study's findings. Sampling students who are perceived to be poor or actually poor, is stigmatizing, and this is likely to have impacted on the study's results. Future research should do better. Lastly, the "perceived poverty" measure, as used in this study may have been biased, we suggest that future studies could develop and standardize a "poverty" measure.

#### **Disclosure statement**

No potential conflict of interest was reported by the author(s).

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#### **Author contributions**

Contributions from all authors were significant in terms of conception and design, data acquisition, analysis, and interpretation; participation in the article's drafting or critical revision for significant intellectual content; agreement to submit to the current journal; final approval of the version to be published, and acceptance of responsibility for all aspects of the work.

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