

Financial Literacy Among University Employees: Evidence from the University of Cape Coast, Ghana

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Abstract: Formal employment in a knowledge-based institution does not necessarily imply uniform financial capability, particularly where employees differ in educational exposure, occupational responsibilities and access to financial information. This study examined financial knowledge, financial behaviour and financial attitude among employees of the University of Cape Coast, Ghana, and compared the three dimensions across junior staff, senior staff and senior members. A descriptive cross-sectional design was used. Through stratified sampling, 360 employees were surveyed with a structured questionnaire comprising seven financial-knowledge items, ten financial-behaviour items and twelve financial-attitude items. Descriptive statistics, factor-analytic diagnostics, Cronbach's alpha, correlation analysis, one-way analysis of variance, Welch's test and Bonferroni post-hoc comparisons were applied. The composite means were 3.821 for financial knowledge, 3.791 for financial behaviour and 3.523 for financial attitude. Reliability was strong across the three constructs ($\alpha = .841-.907$). Financial knowledge, behaviour and attitude were positively related. Staff-category differences were significant for financial knowledge, $F(2,357) = 12.581, p < .001, \eta^2 = .066$, and financial behaviour, $F(2,357) = 9.230, p < .001, \eta^2 = .049$, but not for financial attitude, Welch's $F(2,154.15) = 2.769, p = .066$. Junior staff recorded significantly lower knowledge and behaviour scores than senior staff and senior members. The evidence shows that an institutional average can conceal meaningful staff-category differences and supports differentiated financial education, with particular attention to financial attitudes, expenditure control, insurance and long-term planning.

Keywords: financial literacy; financial knowledge; financial behaviour; financial attitude; university employees; Ghana

Date of Submission: 29-09-2026

Date of Acceptance: 09-10-2026

I. INTRODUCTION

Financial literacy is increasingly relevant as individuals are expected to make recurring decisions about borrowing, saving, insurance, pensions, investment and digital financial services. International frameworks now treat financial literacy as a combination of knowledge, behaviour and attitude rather than knowledge alone [1]. This broader view matters because access to financial products does not by itself ensure that people understand costs, compare alternatives, plan expenditure or make decisions that support longer-term financial well-being [4], [5].

The Ghanaian financial system makes this issue especially pertinent. The expansion of mobile money, digital lending, interoperable payments, pensions and other formal financial services has widened the range of products available to consumers. The 2024 Financial Inclusion Report notes that access alone is insufficient and assesses inclusion through access, usage and quality, while national policy continues to emphasise financial literacy, consumer protection and responsible use of financial services [2], [3]. As financial access deepens, the relevant question is therefore not only whether employees can reach financial services, but whether they possess the knowledge, behaviour and attitudes needed to use them effectively.

What drew me to university employees was a simple but often untested assumption: because they work in a knowledge-based institution, they should be financially literate. That assumption may be partly correct, but it can conceal important differences. A university workforce is not homogeneous. Junior staff, senior staff and senior members differ in educational exposure, occupational responsibilities, income prospects and access to

financial information. Earlier research involving University of Cape Coast employees established relationships among financial literacy, financial decisions and financial well-being [6]. The present study takes a different route. It separates financial literacy into knowledge, behaviour and attitude, examines the strength of each dimension and asks whether staff categories display comparable financial capabilities.

This distinction matters for policy. A general seminar delivered to all employees may have limited effect when the underlying gaps are concentrated in particular staff groups or dimensions. An employee may understand a bank statement and loan contract but still fail to track monthly expenditure. Another may value saving but lack insurance coverage or a consistent investment plan. Financial education is therefore more useful when it is based on the specific weaknesses revealed by evidence rather than on the broad assumption that all staff need the same intervention.

The study pursued two objectives: first, to assess the levels of financial knowledge, financial behaviour and financial attitude among University of Cape Coast employees; and second, to test whether these dimensions differed across junior staff, senior staff and senior members. Three null hypotheses were examined: there is no significant staff-category difference in financial knowledge; there is no significant staff-category difference in financial behaviour; and there is no significant staff-category difference in financial attitude.

II. LITERATURE REVIEW AND THEORETICAL FOUNDATION

Financial literacy as knowledge, behaviour and attitude

Financial literacy has moved from a narrow concern with factual knowledge to a multidimensional view that considers what people know, how they behave and how they approach money. The OECD/INFE framework treats financial knowledge, financial behaviour and financial attitude as related but distinct components [1], [7]. Financial knowledge supports the interpretation of interest rates, borrowing terms, account balances and financial risk. Financial behaviour reflects practical actions such as budgeting, planning, comparing products, saving and checking financial charges. Financial attitude captures a person's orientation toward long-term planning, financial control, insurance, saving and delayed consumption.

This multidimensional approach is useful because knowledge does not automatically become behaviour. A financially informed employee may still postpone saving or spend without a plan. Conversely, a person may practise careful budgeting without being confident about financial products. Studies among working adults have repeatedly shown that knowledge, behaviour and attitude are positively associated but not interchangeable [8], [13]. The distinction is particularly important when an overall financial-literacy score can conceal weakness in a particular dimension or staff group.

Prospect theory and financial decisions under risk

Prospect theory explains decision-making under risk by recognising that people do not always evaluate gains and losses in a fully rational manner [10]. Losses tend to carry greater psychological weight than equivalent gains, and individuals may alter their choices when they perceive a possibility of financial loss. Everyday decisions about borrowing, insurance, saving and investment therefore involve more than factual knowledge; they also involve perceptions of risk, security and future outcomes. Employees with similar educational backgrounds may consequently make different financial choices even when they face broadly similar products and information.

The theory is relevant to this study because several questionnaire items addressed borrowing, overdrafts, saving, insurance and control over one's financial condition. These are decisions in which perceived loss and uncertainty matter. Prospect theory therefore helps explain why employees with similar education may respond differently when making comparable financial choices.

Theory of planned behaviour

The theory of planned behaviour argues that behaviour is shaped by attitudes, subjective norms and perceived behavioural control [9]. Applied to personal finance, it suggests that a positive orientation toward saving and planning can strengthen the intention to act, while perceived control affects whether that intention becomes practice. The model also permits the inclusion of context-specific predictors. Financial knowledge can therefore be treated as a resource that improves perceived control over financial decisions, while financial attitude supports or weakens the intention to budget, save or compare financial products. The framework fits the structure of the present study. Financial knowledge represents an informational resource; financial attitude reflects an evaluative orientation; and financial behaviour captures reported action. Positive associations among the three constructs would be consistent with the theory, although the cross-sectional design does not permit causal claims.

Financial literacy and differences across employee groups

Financial literacy can support planning, debt management, product comparison, saving and longer-term financial well-being [4], [5], [11]-[13]. The OECD/INFE 2023 survey nevertheless reports considerable room for improvement in both overall and digital financial literacy and links stronger literacy with better financial well-being and resilience [1]. Evidence on financial education also suggests that interventions can improve knowledge and behaviour, although their effectiveness depends on design and the behavioural problem being addressed [15], [16]. This reinforces the value of diagnosing specific weaknesses before prescribing financial education.

Financial literacy is also unevenly distributed. Education, occupational status, gender, income and exposure to financial products can produce systematic differences [11], [12]. Within a university, staff categories may reflect differences in qualifications, income trajectories, occupational responsibilities and institutional networks. Recent evidence involving university staff similarly points to occupationally differentiated financial-literacy patterns and the need for tailored interventions [14]. The expectation of this study was therefore not that all employees would perform poorly, but that a favourable institutional average could conceal staff-category gaps. Identifying such gaps provides a stronger basis for staff welfare and financial-education decisions than assuming that employment in a knowledge-based institution produces uniform financial capability.

III. METHODOLOGY

Research design and study setting

The study used a quantitative descriptive cross-sectional design. This design was appropriate because the purpose was to describe the financial-literacy dimensions reported by employees at one point in time and compare mean scores across staff categories rather than estimate causal effects [18], [21]. The study was conducted at the University of Cape Coast, a public university in Ghana.

Population, sample and sampling

The target population was 4,965 employees: 978 senior members, 1,444 senior staff and 2,543 junior staff. The sample size was guided by the Krejcie and Morgan table [17]. A target of 360 employees was selected through stratified sampling to preserve the three staff categories. The final sample comprised 184 junior staff, 105 senior staff and 71 senior members. All 360 distributed questionnaires were returned, giving a reported response rate of 100 per cent.

Instrument and measurement

Data were collected with a structured, closed-ended questionnaire. The financial-literacy section used a five-point agreement scale from 1 (strongly disagree) to 5 (strongly agree). Financial knowledge was represented by seven self-reported items covering interest and borrowing rates, loan terms, bank statements, loan guarantees, overdrafts and borrowing from formal institutions. Financial behaviour was measured with ten items on saving, documented financial goals, long-term planning, expenditure tracking, planned spending, product comparison, financial advice and checking interest. Financial attitude was measured with twelve items addressing interest in learning, record keeping, frugality, insurance, investment planning, perceived control, future income, expenditure awareness, life insurance, present versus future consumption, regular saving and willingness to use technology.

The knowledge scale is best interpreted as self-assessed financial knowledge because respondents indicated agreement with statements about what they understood rather than completing an objective test with correct and incorrect answers. This distinction is retained throughout the paper.

Data collection, ethics and analysis

The researcher and four trained assistants distributed and collected the questionnaires. Participants were informed about the academic purpose of the study, participation was voluntary, and anonymity and confidentiality were assured. The study records informed consent but does not provide a formal ethics approval number. The relevant institutional approval reference should be inserted before submission if one was issued.

SPSS version 22 was used. Frequencies, percentages, means and standard deviations described the data. Factor-analytic diagnostics included item loadings, the Kaiser-Meyer-Olkin measure and total variance explained. Cronbach's alpha assessed internal consistency. Cochran's Q examined whether item-response patterns differed within each construct, and Pearson and Kendall correlations assessed associations. One-way ANOVA compared financial knowledge and financial behaviour across staff categories because the homogeneity assumption was satisfied. Financial attitude violated homogeneity and was therefore examined with Welch's robust test. Bonferroni comparisons identified the staff-category pairs responsible for significant

omnibus differences. Eta-squared values were computed from the reported sums of squares to indicate effect size.

IV. RESULTS

Respondent profile

Table 1 presents the profile of respondents. Men formed 66.4 per cent of the sample and women 33.6 per cent. Most respondents held a bachelor's degree (39.4 per cent) or postgraduate qualification (36.7 per cent). Junior staff constituted 51.1 per cent of the sample, consistent with their larger share of the university workforce.

Table 1: Respondent profile (N = 360)

Characteristic	Category	Frequency	Percent
Sex	Male	239	66.4
	Female	121	33.6
Highest qualification	Diploma/HND	82	22.8
	Bachelor's degree	142	39.4
	Postgraduate	132	36.7
	Other	4	1.1
Staff category	Junior staff	184	51.1
	Senior staff	105	29.2
	Senior member	71	19.7

Source: Study data. Percentages may not total exactly 100 because of rounding.

Construct quality and descriptive results

The three scales showed satisfactory factor-analytic diagnostics and strong internal consistency. KMO values ranged from .833 to .888, and Cronbach's alpha ranged from .841 to .907. Composite means were above the neutral midpoint of 3.0. Financial knowledge recorded the highest mean (3.821), followed closely by financial behaviour (3.791), while financial attitude was lower (3.523).

A careful interpretation is necessary. The one-sample tests used 4.0, the 'agree' point, as the benchmark. The composite t-statistics were negative and significant, meaning the means were statistically below 4.0. The results therefore support a cautious conclusion: employees reported generally positive or moderately high financial knowledge and behaviour, but the evidence does not show uniform agreement across all items.

Table 2: Descriptive and measurement statistics

Construct	Items	Mean	α	KMO	TVE (%)	Loading range	Cochran Q
Financial knowledge	7	3.821	.841	.833	45.485	.490-.808	160.749***
Financial behaviour	10	3.791	.907	.888	49.951	.631-.802	69.792***
Financial attitude	12	3.523	.872	.845	41.157	.425-.805	461.533***

α = Cronbach's alpha; KMO = Kaiser-Meyer-Olkin measure; TVE = total variance explained. *** $p < .001$.

The item-level pattern helps explain the lower attitude score. Respondents were most confident that a loan guarantor becomes responsible when a borrower defaults ($M = 4.10$) and that they understood bank-statement balances ($M = 4.06$). Knowledge was weakest for awareness of interest or borrowing rates ($M = 3.50$) and the relative cost of formal institutions and private moneylenders ($M = 3.57$). In financial behaviour, consistent saving and assessing loan conditions both recorded means of 3.90, while monthly tracking of income and expenditure and spending based on prior planning each recorded 3.62. For attitude, regular saving as a basis for future security was strongest ($M = 4.01$). The weakest areas were preference for present spending over medium- to long-term saving ($M = 2.89$), uncertainty about where money was spent ($M = 3.10$) and adequate insurance coverage ($M = 3.29$).

Relationships among financial-literacy dimensions

The dimensions were positively related. The strongest Pearson association was between financial behaviour and financial attitude ($r = .690$, $p < .001$), followed by financial knowledge and behaviour ($r = .657$, p

< .001). The relationship between knowledge and attitude was positive but weaker ($r = .487$, $p < .001$). The same pattern appeared in Kendall's tau coefficients. These relationships are consistent with the view that knowledge, behaviour and attitude reinforce one another while remaining empirically distinct.

Table 3: Correlations among financial-literacy dimensions

Construct pair	Pearson r	Kendall τ
Knowledge – Behaviour	.657***	.478***
Knowledge – Attitude	.487***	.308***
Behaviour – Attitude	.690***	.479***

*** $p < .001$.

Differences across staff categories

Table 4 shows clear staff-category differences in financial knowledge and financial behaviour. Senior staff recorded the highest financial-knowledge mean (4.0), while senior members recorded the highest financial-behaviour mean (4.0). Junior staff recorded the lowest means for both constructs. The ANOVA results were significant for knowledge and behaviour. The effect was moderate for knowledge ($\eta^2 = .066$) and small-to-moderate for behaviour ($\eta^2 = .049$). Financial attitude did not differ significantly across the three groups.

Table 4: Financial literacy by staff category

Construct	Junior staff M (SD)	Senior staff M (SD)	Senior member M (SD)	Omnibus test	p	Effect
Financial knowledge	3.5 (.7)	4.0 (.7)	3.9 (.8)	$F = 12.581$	<.001	$\eta^2 = .066$
Financial behaviour	3.6 (.7)	3.9 (.8)	4.0 (.7)	$F = 9.230$	<.001	$\eta^2 = .049$
Financial attitude	3.6 (.7)	3.5 (.7)	3.7 (.6)	Welch $F = 2.769$	.066	n.s.

Eta-squared values were calculated from the reported sums of squares. n.s. = not significant.

Bonferroni comparisons confirmed that junior staff scored significantly below senior staff and senior members in both financial knowledge and financial behaviour. The senior staff–senior member differences were not significant. The null hypotheses of no staff-category difference were therefore rejected for financial knowledge and financial behaviour but retained for financial attitude.

Table 5: Bonferroni pairwise comparisons

Outcome	Comparison	Mean difference	p
Financial knowledge	Junior – Senior staff	-.435	<.001
	Junior – Senior member	-.342	.017
	Senior staff – Senior member	.093	1.000
Financial behaviour	Junior – Senior staff	-.298	.002
	Junior – Senior member	-.480	<.001
	Senior staff – Senior member	-.181	.345

Mean difference is I – J. Negative values indicate a lower mean for the first-listed group.

V. DISCUSSION

The first finding is not that university employees were financially illiterate. Their knowledge and behaviour scores were above the scale midpoint, the scales were reliable, and many respondents reported that they understood basic financial arrangements and practised saving, planning and product comparison. This supports the broader literature that education and exposure to formal employment can strengthen financial capability [11], [12]. It also aligns with earlier research at the University of Cape Coast showing that financial literacy influences workers' financial decisions [6].

The more revealing finding is that positive averages did not amount to uniform financial strength. Composite scores fell below the “agree” benchmark used in the study, and several practical items were weaker than the headline averages suggest. Respondents were less confident about borrowing rates than about the meaning of a bank balance or loan guarantee. They valued saving, yet monthly tracking of income and

expenditure and prior spending plans were comparatively weaker. Their financial attitude was especially restrained by low scores on insurance, expenditure visibility and the tension between current consumption and long-term preservation of money.

This knowledge–attitude gap is important. Financial knowledge can help a person understand a product, but financial attitude influences whether that understanding is converted into a consistent plan. The strong association between behaviour and attitude in this study is consistent with the theory of planned behaviour: employees who report a stronger long-term orientation and sense of financial control also tend to report more prudent actions [9], [13]. The finding therefore cautions against equating factual understanding with financial capability; effective decision-making also depends on behavioural discipline and attitudes toward future financial security.

The staff-category results provide the clearest policy message. Junior staff scored below both senior staff and senior members in financial knowledge and financial behaviour, while senior staff and senior members did not differ significantly. The pattern may reflect differences in education, earnings, occupational exposure or access to financial information, but the data do not permit those mechanisms to be separated. It would therefore be inappropriate to treat staff category as a direct cause. What the evidence does establish is that a single institutional average hides a consistent disadvantage for junior staff.

The absence of a significant staff-category difference in financial attitude is also instructive. Attitudes toward money may be shaped by experiences and norms that cross occupational boundaries. Seniority did not automatically produce a stronger attitude score. Indeed, senior staff had a slightly lower mean attitude than junior staff, although the difference was not statistically significant. Programmes aimed at insurance, long-term saving, expenditure control and financial confidence should therefore be offered across the institution, even while technical knowledge and behaviour interventions are more strongly targeted toward junior staff.

The findings are consistent with studies showing that financial knowledge, behaviour and attitude are related but distinct [8], [13] and with recent evidence that financial-literacy patterns may differ across categories of university staff [14]. They also support the OECD emphasis on combining financial knowledge with behaviour, attitudes, inclusion and resilience rather than treating literacy as factual recall alone [1], [24]. Taken together, the evidence strengthens the case for institution-specific diagnosis before financial-education programmes are designed.

VI. PRACTICAL IMPLICATIONS

The University of Cape Coast and its staff welfare bodies can act on these findings in four practical ways. First, financial education should be segmented. Junior staff require accessible sessions on interest rates, loan conditions, debt comparison, budgeting and financial product selection. Senior staff and senior members should not be excluded, but the content can be differentiated according to the evidence.

Second, financial-attitude interventions should be institution-wide. Workshops should move beyond lectures on financial definitions and include expenditure diaries, realistic savings goals, insurance literacy, retirement planning and practical exercises that help employees connect present decisions with future security.

Third, employee welfare schemes can incorporate financial-resilience mechanisms such as emergency savings plans, structured financial counselling and referral arrangements with credible financial institutions. The purpose should not be to encourage borrowing, but to improve informed choice, strengthen preparedness for unexpected expenses and reduce reliance on expensive or poorly understood credit.

Fourth, interventions should be evaluated. Short pre- and post-programme measures, followed by later behavioural checks, would show whether knowledge is being translated into expenditure tracking, saving, insurance and debt management.

VII. LIMITATIONS AND SUGGESTION FOR FUTURE RESEARCH

The study is limited to one university and cannot represent all university employees in Ghana. Its cross-sectional design captures reported conditions at one point in time and does not establish how financial literacy changes over time. The measures are self-reported and may be affected by social-desirability bias. In particular, financial knowledge was measured through perceived understanding rather than an objective knowledge test. The study also did not test the effects of income, age, marital status or actual financial-product holdings, although some of these characteristics appeared in the questionnaire.

Future research should combine objective and subjective financial-literacy measures, compare universities, and follow employees over time. Qualitative interviews would help explain why junior staff recorded lower knowledge and behaviour scores and why attitudes toward insurance and expenditure control were relatively weak. Multi-institutional and longitudinal studies could also establish whether staff-category differences persist across universities and how they change as employees gain experience and engage with new financial products.

VIII. CONCLUSION

The financial literacy of University of Cape Coast employees was positive but uneven. Knowledge and behaviour were stronger than attitude, and all three dimensions were related. The most important divide was occupational: junior staff recorded lower financial knowledge and behaviour than senior staff and senior members. At the same time, the comparatively moderate attitude scores cut across staff categories.

The practical lesson is straightforward. Universities should not assume that employment in an educational institution guarantees financial preparedness. Nor should they respond with one generic seminar. Evidence-based financial education should combine targeted technical support for groups with lower knowledge and behaviour with institution-wide work on saving, insurance, expenditure control and long-term financial orientation. As Ghana's financial system becomes more accessible and digitally enabled, such differentiated support can help employees convert access and information into more informed and sustainable financial decisions.

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