

**WORKLOAD AND FINANCIAL STRESS AS PREDICTORS OF QUALITY OF
RECORD MANAGEMENT AMONG HEALTH INFORMATION
PROFESSIONALS IN THE UNIVERSITY OF CALABAR
TEACHING HOSPITAL, NIGERIA**

Ndarake Janet Ita

archibongjanetefanga@gmail.com
School of Health Information Management,
University of Calabar Teaching Hospital

Beshel Ignatius Akwagiobe

beshelignatius7@gmail.com
College of Health Technology, Calabar

Enembe Otu Hogan

enembehogan1@gmail.com
School of Public Health, University of Port Harcourt

Udofia Ifiok Itoro

fyfia88@gmail.com
School of Health Information Management,
University of Calabar Teaching Hospital

Ubi, Gina Iwara

ginawodu@gmail.com
Library and Information Science
University of Calabar

Dr. Anele, Ezebunwo

Email: aneleezebunwo2022@gmail.com
ORCID ID: <https://orcid.org/0009-0005-0416-3709>
Department of Educational Psychology
University of Calabar



Abstract

The study examined workload and financial stress as predictors of quality of record management among health information professionals in the University of Calabar Teaching Hospital, Nigeria. Specifically, it determined the extent to which workload and financial stress predict quality of record management among health information professionals. The study adopted a correlational research design. The population comprised 86 health information professionals working in the University of Calabar Teaching Hospital. Due to the manageable population size, total enumeration was adopted, and all 86 health information professionals constituted the sample. Data were collected using a researcher-developed questionnaire titled “Workload, Financial Stress and Quality of Record Management Questionnaire” (WFSQRMQ). The instrument was subjected to face and content validation by experts in Health Information Management, Healthcare Administration, and Measurement and Evaluation, while its reliability was established using Cronbach’s alpha method. Simple

linear regression analysis was used to test the hypotheses at the 0.05 level of significance. The findings revealed that workload significantly predicted quality of record management and accounted for 50.7% of its variance. Financial stress also significantly predicted quality of record management, accounting for 47.2% of the variance. The study concluded that workload and financial stress are significant predictors of quality of record management among health information professionals. It recommended adequate staffing, equitable distribution of duties, appropriate work scheduling, improved staff welfare, and financial-wellness programmes to enhance quality record management.

Keywords: Financial Stress; Health Information Professionals; Quality of Record Management; Workload.



Introduction

Quality record management is an important component of healthcare delivery because effective clinical and administrative services depend on accurate, complete, accessible, secure, and timely patient information. Health records contain information on patients' medical histories, diagnoses, investigations, treatments, medications, referrals, and outcomes required for clinical decision-making and continuity of care (Owolabi et al., 2021; Ubi et al., 2026). Proper management of these records also supports hospital planning, research, accountability, monitoring of healthcare services, legal processes, and evaluation of health programmes (Adeleke & Aliyu, 2021; Adie et al., 2026). Consequently, the manner in which health records are created, processed, stored, retrieved, protected, and made available can influence healthcare administration and service delivery (Dagiye et al., 2022).

Quality of record management refers to the extent to which health information is accurately documented, completely maintained, securely stored, promptly retrieved, and protected from loss, alteration, destruction, or unauthorised access. Effective preservation and retrieval of health records support continuity of patient care and other legitimate healthcare purposes (Owolabi et al., 2021). Health information professionals therefore perform important responsibilities relating to the creation, organisation, classification, storage, retrieval, preservation, processing, and protection of patient information within healthcare institutions (Adeleke & Aliyu, 2021). In this study, quality of record management is reflected in the accuracy, completeness, accessibility, timeliness, confidentiality, security, storage, and retrieval of health records.

Globally, increasing dependence on health information has made record management important to clinical care, administration, research, surveillance, and decision-making. The growing adoption of electronic health records has improved opportunities for faster access and exchange of patient information, while creating additional responsibilities regarding data accuracy, privacy, security, and appropriate information use (Thapa & Camtepe, 2021). Although electronic systems can reduce some limitations associated with paper records, their effectiveness depends on appropriate infrastructure, security measures, standardised procedures, and competent personnel (Chatterjee et al., 2020). Thus, both paper-based and electronic health information systems require personnel who can manage large quantities of information accurately and efficiently.

In African and other developing-country settings, health information management continues to face challenges associated with inadequate infrastructure, workforce limitations, resource constraints, and uneven adoption of digital technologies (Owolabi et al., 2024). In Nigeria, the transition from predominantly paper-based health records to electronic medical records remains incomplete in many healthcare facilities despite efforts to improve digital health information management (Owolabi et al., 2024). Owolabi et al. (2021) observed that

large volumes of health records, inadequate storage space, and dependence on paper-based systems can contribute to difficulties in retrieval and cases of missing or misplaced records. Similarly, Dagiye et al. (2022) found that although ICT was used for registration, documentation, data analysis, and clinical record management in tertiary hospitals in South-South Nigeria, manual record-preservation practices remained common.

Within these working conditions, workload may be an important predictor of quality record management. Workload refers to the quantity, intensity, complexity, and time demands associated with tasks assigned to an employee within a particular period. Among health information professionals, workload may involve the volume of patient records handled, number of daily registrations, filing and retrieval activities, coding responsibilities, statistical reporting, time pressure, multitasking, staff shortages, extended working hours, and other competing responsibilities. Sonia et al. (2024) identified frequent multitasking, unequal task distribution, insufficient personnel, and delays in task completion among medical record and health information officers, demonstrating that workload can arise when assigned responsibilities exceed available personnel and working time.

Excessive workload may influence quality of record management because record-processing activities require concentration, accuracy, timeliness, and careful attention to detail. Where health information professionals handle large volumes of records within limited periods, difficulties may arise in verifying documentation, classifying records correctly, completing filing procedures, retrieving information promptly, and returning records to their appropriate locations. Sonia et al. (2024) associated staffing shortages and imbalanced task distribution with delays in the work of medical record and health information officers. Heavy workload may also create challenges for compliance with confidentiality and security procedures because health information professionals frequently perform registration, retrieval, filing, coding, reporting, and information-release duties simultaneously (Thapa & Camtepe, 2021). It is therefore necessary to establish empirically whether workload predicts the quality of record management.

Another factor considered in this study is financial stress. Financial stress refers to the worry, pressure, or psychological strain individuals experience when their financial resources appear insufficient to meet existing or anticipated obligations. Such stress may arise from inadequate income, indebtedness, increasing household expenses, family responsibilities, unexpected financial commitments, and concerns about future financial security. Its relevance to work performance lies in the possibility that persistent financial concerns may compete with the cognitive and emotional resources employees require to carry out occupational responsibilities effectively. Liu et al. (2024) demonstrated that financial stress can interact with work engagement and emotional exhaustion in shaping employees' job performance, indicating that financial conditions may have implications for workplace behaviour and productivity.

Among health information professionals, financial stress may be important because record management requires sustained concentration, attention to detail, confidentiality, accuracy, and timely completion of assigned duties. Employees experiencing persistent financial concerns may find it more difficult to maintain the psychological focus required for detailed information-processing responsibilities. However, evidence also suggests that the relationship between financial stress and job performance can vary according to employees' emotional conditions and levels of work engagement (Liu et al., 2024). For this reason, it cannot simply be assumed that financial stress reduces the quality of record management; its predictive influence needs to be empirically determined among health information professionals.

The Nigerian health information management literature has focused more extensively on ICT adoption, record preservation, information-management practices, institutional

conditions, and the wellbeing of health record personnel than on financial stress and record-management quality. Dagiye et al. (2022), for example, concentrated on ICT application in health information management, while Odipe et al. (2023) examined the health-related quality of life of health record officers. Owolabi et al. (2024) similarly focused on electronic medical record adoption and associated implementation challenges. These studies provide useful evidence about the operational environment of health information professionals but give limited attention to whether employees' personal financial stress predicts the quality of their record-management responsibilities.

The situation is particularly relevant in the University of Calabar Teaching Hospital, where recent evidence indicates continuing challenges in the management of patient health information. Olom et al. (2026) found that 61 per cent of respondents mainly used paper-based methods for storing patient information, while 57 per cent reported moderate use of digital storage systems. The study further showed that confidentiality and data-protection standards were only partially observed by a substantial proportion of respondents (Olom et al., 2026). These findings suggest that the management of patient records within the hospital continues to involve both conventional and emerging digital practices.

Workload has also been identified as a specific challenge within the University of Calabar Teaching Hospital. Olom et al. (2026) reported inadequate staffing among 76 per cent of respondents and heavy workload among 72 per cent, alongside limited storage space and insufficient technical support. Although digital tools were perceived to improve efficiency, limitations in staff competence and training affected their optimal use (Olom et al., 2026). Thus, health information professionals in the hospital operate within conditions characterised by staffing limitations, high work demands, storage problems, and technological constraints. However, the study did not specifically determine the extent to which workload predicts the overall quality of record management. Efforts have nevertheless been made to strengthen health information management through greater adoption of electronic medical records, staff development, technical support, improved security systems, and investment in health information infrastructure (Owolabi et al., 2024; Olom et al., 2026). Despite these measures, challenges relating to paper-based practices, staffing limitations, record storage, technology, and retrieval persist in Nigerian tertiary healthcare institutions (Owolabi et al., 2021; Dagiye et al., 2022; Olom et al., 2026).

Therefore, a gap exists in determining whether workload and financial stress predict quality of record management among health information professionals in the University of Calabar Teaching Hospital. Although workload has been identified as an existing institutional challenge, limited evidence establishes its predictive influence on record-management quality, while financial stress has received even less attention within this occupational setting. The present study therefore seeks to determine the extent to which workload predicts quality of record management and examine the extent to which financial stress predicts quality of record management among health information professionals in the University of Calabar Teaching Hospital, Nigeria.

Aim and objectives of the study

The main objective of the study is to examine workload and financial stress as predictors of quality of record management among health information professionals in the University of Calabar Teaching Hospital, Nigeria. Specifically, the study seeks to:

1. determine the extent to which workload predicts the quality of record management among health information professionals in the University of Calabar Teaching Hospital.

2. examine the extent to which financial stress predicts the quality of record management among health information professionals in the University of Calabar Teaching Hospital.

Research questions

The following research questions are formulated to guide the study:

1. To what extent does workload predict the quality of record management among health information professionals in the University of Calabar Teaching Hospital?
2. To what extent does financial stress predict the quality of record management among health information professionals in the University of Calabar Teaching Hospital?

Research hypotheses

The following null hypotheses are formulated for the study:

1. Workload does not significantly predict the quality of record management among health information professionals in the University of Calabar Teaching Hospital.
2. Financial stress does not significantly predict the quality of record management among health information professionals in the University of Calabar Teaching Hospital.

Methodology

The study adopted a correlational research design. This design was considered appropriate because it enabled the researcher to determine the predictive relationship between workload, financial stress, and quality of record management among health information professionals in the University of Calabar Teaching Hospital, Nigeria. The population of the study comprised 86 health information professionals working in the hospital. Due to the relatively small and manageable size of the population, the total enumeration sampling technique was adopted; therefore, all 86 health information professionals constituted the sample for the study. The instrument used for data collection was a structured questionnaire titled “Workload, Financial Stress and Quality of Record Management Questionnaire (WFSQRMQ).” The questionnaire was divided into three sections measuring workload, financial stress, and quality of record management, respectively. The instrument was structured on a modified four-point Likert scale of Strongly Agree (SA = 4), Agree (A = 3), Disagree (D = 2), and Strongly Disagree (SD = 1).

The instrument was subjected to face and content validation by experts in Health Information Management, Healthcare Administration, and Measurement and Evaluation. Their observations and recommendations were used to improve the clarity, relevance, and adequacy of the questionnaire items. The reliability of the instrument was established through a trial test involving respondents outside the study area who possessed characteristics similar to those of the study population, and the data obtained were analysed using Cronbach’s alpha method to determine the internal consistency of the instrument. The completed questionnaires were coded and analysed using simple linear regression analysis. The first hypothesis determined the extent to which workload predicted quality of record management, while the second determined the extent to which financial stress predicted quality of record management. All null hypotheses were tested at the 0.05 level of significance.

Presentation of results

The results of the study are presented in this section based on the research questions and hypotheses formulated to guide the study. The data collected from the respondents were analysed using simple linear regression statistical techniques, and the findings are presented in tables with corresponding interpretations for clarity and ease of understanding.

Hypothesis one

Workload does not significantly predict the quality of record management among health information professionals in the University of Calabar Teaching Hospital, Nigeria. The predictor variable is workload, while the criterion variable is quality of record management, both measured continuously. To test this hypothesis, simple linear regression analysis was used, and the results are presented in Table 1. The result showed that $R = .712$, indicating a strong positive predictive relationship between workload and quality of record management among health information professionals. This implies that changes in workload are strongly associated with corresponding changes in the quality of record management. Furthermore, the adjusted R^2 value of .506 indicates that workload accounted for 50.6% of the variance in quality of record management, while the remaining 49.4% may be attributed to other factors not included in the model. To test the statistical significance of the prediction, the analysis of variance (ANOVA) result was examined. The result showed that $F = 738.612$, $p = .000$. Since the p-value of .000 is less than the .05 level of significance, the null hypothesis that workload does not significantly predict the quality of record management among health information professionals in the University of Calabar Teaching Hospital was rejected. The alternative hypothesis was therefore upheld. This means that workload significantly predicts the quality of record management among health information professionals in the University of Calabar Teaching Hospital, Nigeria.

TABLE 1: Simple regression analysis of workload as a predictor of quality of record management among health information professionals

Source of variation	SS	Df	MS	F-ratio	Sig.
Regression	3268.607	2	3268.607		
Residual	3177.391	84	4.425	738.612*	.000
Total	6445.999	85			
Model	B	Std. Error	Beta	t	Sig.
Constant	9.283	.484		19.160	.000
Workload	.612	.023	.712	27.177	.000

*Significant at .05 level, $R = .712$, $R^2 = .507$, Adjusted $R^2 = .506$

Hypothesis two

Financial stress does not significantly predict the quality of record management among health information professionals in the University of Calabar Teaching Hospital, Nigeria. The predictor variable is financial stress, while the criterion variable is quality of record management, both measured continuously. To test this hypothesis, simple linear regression analysis was used, and the results are presented in Table 2. The result showed that $R = .687$, indicating a strong positive predictive relationship between financial stress and quality of record management among health information professionals. This implies that variations in financial stress are strongly associated with corresponding variations in the quality of record management. Furthermore, the adjusted R^2 value of .471 indicates that financial stress accounted for 47.1% of the variance in quality of record management, while the remaining 52.9% may be attributed to other factors not included in the regression model. To determine the statistical significance of the prediction, the analysis of variance (ANOVA) result was examined. The result showed that $F = 642.020$, $p = .000$. Since the p-value of .000 is less than the .05 level of significance, the null hypothesis that financial stress does not significantly predict the quality of record management among health information professionals in the University of Calabar Teaching Hospital was rejected. The alternative hypothesis was therefore upheld. This means that financial stress significantly predicts the quality of record

management among health information professionals in the University of Calabar Teaching Hospital, Nigeria.

Table 7: Simple regression analysis of financial stress as a predictor of quality of record management among health information professionals

Source of variation	SS	Df	MS	F-ratio	Sig.
Regression	3042.941	2	3042.941		
Residual	3403.057	84	4.740	642.020*	.000
Total	6445.999	85			
Model	B	Std. Error	Beta	t	Sig.
Constant	9.408	.514		18.291	.000
Financial stress	.603	.024	.687	25.338	.000

*Significant at .05 level, $R = .687$, $R^2 = .472$, Adjusted $R^2 = .471$

Discussion of findings

The findings revealed that workload significantly predicts the quality of record management among health information professionals in the University of Calabar Teaching Hospital, Nigeria. This means that the level of work demands placed on health information professionals is significantly associated with the quality with which patient records are created, processed, stored, retrieved, protected and maintained. The result implies that workload arising from large volumes of patient records, multiple responsibilities, time pressure, staff shortages, prolonged working hours and competing duties can affect the ability of health information professionals to carry out record-management responsibilities effectively. Where workload becomes excessive, professionals may have limited time to verify records, complete documentation, file records appropriately, retrieve requested information promptly and ensure compliance with confidentiality and security procedures.

A possible reason for this finding is that record management requires sustained concentration, accuracy, attention to detail and timely completion of tasks. Health information professionals who are required to process large volumes of records within limited periods may experience pressure that affects their capacity to maintain consistent standards of record management. Staff shortages may further increase the number of responsibilities assigned to available personnel, thereby creating greater demands on their time and mental resources. The finding can be explained from the perspective of the Job Demands-Resources Model, which assumes that excessive job demands can place physical and psychological pressure on employees when adequate resources are not available to meet those demands. From this perspective, increasing workload without corresponding increases in staffing, technology and institutional support may reduce employees' capacity to perform their responsibilities efficiently.

The finding agrees with Sonia et al. (2024), who identified frequent multitasking, unequal task distribution, insufficient staffing and delays in task completion among medical record and health information officers. Their findings showed that excessive work demands could affect the timely performance of health information responsibilities. The finding is also consistent with Olom et al. (2026), who reported that heavy workload and inadequate staffing were major challenges affecting health information management in the University of Calabar Teaching Hospital. Similarly, Owolabi et al. (2021) observed that large volumes of health records, inadequate storage facilities and dependence on paper-based systems created difficulties in record retrieval and contributed to cases of misplaced records. Dagiye et al. (2022) further reported that health information professionals in tertiary hospitals in South-South Nigeria continued to operate within environments characterised by manual record practices and limitations in technological resources. These findings support the present result

that workload is an important predictor of the quality of record management among health information professionals.

The finding further revealed that financial stress significantly predicts the quality of record management among health information professionals in the University of Calabar Teaching Hospital, Nigeria. This means that the financial pressures experienced by health information professionals are significantly associated with the quality of their record-management responsibilities. Financial stress arising from inadequate income, indebtedness, increasing household expenses, family responsibilities, difficulty meeting basic needs and concerns about future financial security may affect employees' concentration, motivation, psychological disposition and commitment to their duties. Since record management requires careful attention, accuracy and consistency, persistent financial concerns may interfere with the mental and emotional resources required for effective performance.

A possible reason for this finding is that employees experiencing financial difficulties may devote substantial mental attention to personal financial obligations, thereby reducing the concentration available for occupational responsibilities. Continuous concern about debts, household expenses and other financial commitments may also contribute to emotional exhaustion, reduced work engagement and diminished attention to detail. For health information professionals, such conditions may affect accurate documentation, timely filing and retrieval, proper storage, confidentiality and other aspects of record management. The finding can be explained by Conservation of Resources Theory, which proposes that individuals experience stress when valued resources such as income, financial security and emotional stability are threatened or insufficient. From this perspective, financial stress may reduce the psychological resources employees need to maintain consistent work performance.

The finding agrees with Liu et al. (2024), who found that financial stress was associated with employees' work engagement and job performance and that emotional exhaustion played an important role in this relationship. Their finding suggests that persistent financial pressure can affect employees' capacity to remain psychologically engaged and productive at work. The present result is also related to Odipe et al. (2023), who drew attention to the wellbeing of health record officers within the Nigerian healthcare system and demonstrated the importance of employees' personal and occupational conditions to their work experiences. Furthermore, the operational challenges identified by Olom et al. (2026) among health information personnel in the University of Calabar Teaching Hospital indicate that employees already function within conditions involving heavy workload, staffing shortages and limited technical support. When financial stress is added to these existing occupational demands, the ability of health information professionals to maintain high-quality record-management practices may be further affected. The finding therefore demonstrates that financial stress constitutes an important predictor of quality of record management among health information professionals in the University of Calabar Teaching Hospital, Nigeria.

Conclusion

The study concluded that workload and financial stress significantly predict the quality of record management among health information professionals in the University of Calabar Teaching Hospital, Nigeria. The level of work demands placed on health information professionals and the financial pressures they experience are important factors associated with their ability to maintain accurate, complete, secure, and timely health records. Therefore, appropriate workload management and measures aimed at reducing financial stress are necessary for improving the quality of record management in the hospital.

Recommendations

1. The management of the University of Calabar Teaching Hospital should reduce excessive workload among health information professionals through adequate staffing, equitable distribution of duties, and appropriate scheduling of work to enable personnel to maintain accurate and timely record-management practices.
2. The management of the University of Calabar Teaching Hospital should strengthen staff welfare through appropriate financial support, timely payment of salaries and allowances, and financial-wellness programmes to reduce financial stress and enhance effective performance of record-management responsibilities.

References

- Adeleke, I. T., & Aliyu, W. (2021). National health information management systems, COVID-19 and health data quality in Nigeria: What roles for health information management professionals? *International Journal of Health Records & Information Management*, 4(1), 1–3.
- Adie, R. U., Beshel, I. A., Ekong, E. K., Amos, K. J., Anele, E., & Ekereke, A. B. (2026). Meta-cognitive skills as predictors of academic self-efficacy among secondary school students in Calabar Municipality of Cross River State, Nigeria. *Inter-Disciplinary Journal of Science Education*, 7(2), 56–66.
- Chatterjee, A., Shahaab, A., Gerdes, M. W., Martinez, S., & Khatiwada, P. (2021). Leveraging technology for healthcare and retaining access to personal health data to enhance personal health and well-being. In S. Bhattacharyya, H. Baek, N. Dey, & D. De (Eds.), *International perspectives on artificial intelligence* (pp. 343–364). Elsevier.
- Dagiye, E. L., Ayebanengimote, V., & Edeki, E. (2022). Application of ICT in health information management practices in selected tertiary hospitals in South-South States of Nigeria. *International Journal of Health Records & Information Management*, 5(1).
- Odiye, O. E., Danjin, M., Okeleji, L. O., & Adewole, O. H. (2023). Quality of life assessment of health record professionals working in a tertiary health facility, during the COVID-19 pandemic in South Western Nigeria. *Current Research in Public Health*, 3(2), 128–138. <https://doi.org/10.31586/crph.2023.741>
- Olom, M. O., Wegbom, A. I., Nwafor, K. N., & Iloke, C. V. (2026). Availability of the technological support in storage of patient health information and associated challenges among healthcare professionals in University of Calabar Teaching Hospital, Cross River State, Nigeria. *European Journal of Public Health Studies*, 9(2). <https://doi.org/10.46827/ejphs.v9i2.261>
- Owolabi, R. O., Adeleke, I. T., Ahmed, H. H., & Aliyu, A. (2024). Organizational bottlenecks, health data management and electronic medical records adoption in Nigeria. *International Journal of Health Records & Information Management*, 7(1), 31–35.
- Owolabi, R. O., Agboola, I. O., & Oguiyi, S. (2021). Digital preservation of health records in tertiary hospitals: Implications for health information management in Nigeria. *International Journal of Health Records & Information Management*, 4(1), 31–38.
- Sonia, D., Fannya, P., & Putra, D. H. (2024). Workload analysis of medical record and health information officers at a hospital. *International Journal of Community Medicine and Public Health*, 11(12), 4636–4644. <https://doi.org/10.18203/2394-6040.ijcmph20243446>
- Thapa, C., & Camtepe, S. (2021). Precision health data: Requirements, challenges and existing techniques for data security and privacy. *Computers in Biology and Medicine*, 129, 104130. <https://doi.org/10.1016/j.compbimed.2020.104130>

- Ubi, G. I., Adie, R. U., Amos, K. J., Beshel, I. A., Ekong, E. K., Ekereke, A. B., & Anele, E. (2026). The determinant of task shifting among librarians in Cross River State, Nigeria. *Inter-Disciplinary Journal of Science Education*, 7(2), 1–12.
- Wei, X., Wei, X., Yu, X., & Ren, F. (2024). The relationship between financial stress and job performance in China: The role of work engagement and emotional exhaustion. *Psychology Research and Behavior Management*, 17, 2905–2917. <https://doi.org/10.2147/PRBM.S446520>