

Evaluation of the Electronic Budgeting Process through the Integration of Enterprise Application Systems

1. Reza. Sohrabi^{ORCID}: Department of Industrial Management, CT.C., Islamic Azad University, Tehran, Iran
2. Mohammad Ali. Keramati^{ORCID}*: Department of Industrial Management, CT.C., Islamic Azad University, Tehran, Iran
3. Hassan. Mehrmanesh^{ORCID}: Department of Industrial Management, CT.C., Islamic Azad University, Tehran, Iran

*corresponding author's email:

ABSTRACT

The objective of the present study is to evaluate the efficiency of the electronic budgeting process through the integration of enterprise application systems. In terms of methodology, this research adopts a mixed-methods (qualitative–quantitative) approach, and data collection was conducted using both library-based and field methods. In the qualitative phase, data were analyzed using inductive qualitative content analysis, and the results served as the basis for designing the research instrument for the quantitative phase. The data collection instrument in the quantitative phase was a researcher-developed questionnaire, which was designed based on the findings of the qualitative phase and distributed among 317 experts and managers using a non-probability random sampling method. For the analysis of quantitative data, descriptive and inferential statistics as well as Partial Least Squares Structural Equation Modeling (PLS-SEM) were employed, using SPSS and SMART PLS software. The findings indicate that integrating enterprise application systems with electronic budgeting systems, by providing a flexible, secure, and standardized platform, leads to the alignment of organizational information and processes and ultimately results in improved transparency, cost reduction, enhanced accuracy, and strengthened strategic decision-making. In this regard, electronic budgeting systems, as the core of financial resource management, play a vital role, and their integration with other organizational systems is considered a key step toward digital transformation, the transition to smart government, and the realization of smart organizations.

Keywords: electronic budgeting process, integration, enterprise application systems

Introduction

Public-sector budgeting has undergone profound transformations over the past two decades as governments and public organizations confront increasing fiscal constraints, rising demands for transparency, and growing expectations for performance and accountability. Traditional line-item budgeting systems, which emphasize input control and procedural compliance, have been widely criticized for their limited capacity to support strategic decision-making, performance evaluation, and adaptive resource allocation. In response, many countries have moved toward performance-based budgeting (PBB), digital budgeting platforms, and integrated financial management systems as part of broader public financial management reforms. These shifts are closely aligned with the global agenda of digital transformation, smart government, and results-oriented governance, in which information systems play a central enabling role (1-3).



Article history:
Received 03 February 2026
Revised 10 March 2026
Accepted 20 April 2026
Published online 01 July 2026

How to cite this article:

Sohrabi, R., Keramati, M. A., & Mehrmanesh, H. (2026). Evaluation of the Electronic Budgeting Process through the Integration of Enterprise Application Systems. *Journal of Management and Business Solutions*, 4(4), 1-12.
<https://doi.org/10.61838/jmbs.185>



© 2026 the authors. This is an open access article under the terms of the Creative Commons Attribution-NonCommercial 4.0 International (CC BY-NC 4.0) License.

At the core of these reforms lies the increasing reliance on electronic budgeting (e-budgeting) systems, which leverage digital technologies to automate, standardize, and integrate budgeting processes across organizational units. E-budgeting is not merely a technical innovation; it represents a fundamental reconfiguration of how financial information is generated, shared, and used within organizations. By enabling real-time data access, traceability of budget decisions, and systematic monitoring of expenditures, e-budgeting systems are expected to enhance transparency, reduce administrative costs, and improve the quality of managerial decisions (4, 5). However, empirical evidence suggests that the effectiveness of e-budgeting initiatives varies considerably across contexts, often depending on organizational readiness, institutional arrangements, and the degree of system integration.

One of the most critical yet underexplored determinants of e-budgeting effectiveness is the integration of enterprise application systems. Public organizations typically operate a fragmented landscape of information systems, including accounting, procurement, human resources, planning, and performance management applications. When e-budgeting systems are implemented in isolation, without adequate integration with these complementary systems, they risk becoming standalone tools that replicate existing inefficiencies in digital form. In contrast, enterprise application integration (EAI) enables seamless data exchange and process alignment across organizational subsystems, thereby supporting holistic financial management and strategic coordination (6, 7).

The literature on enterprise resource planning (ERP) systems provides valuable insights into the potential benefits and challenges of system integration in organizational contexts. ERP systems are designed to unify disparate functional modules into a single integrated platform, facilitating standardized processes and shared databases. Research has shown that successful ERP implementation can improve organizational efficiency, information quality, and interdepartmental coordination, while also supporting innovation in business models and managerial practices (7, 8). Nevertheless, ERP projects are complex and resource-intensive, and their outcomes are highly contingent on organizational factors such as leadership support, user acceptance, and change management capabilities (9).

In public-sector settings, the integration of ERP and budgeting systems presents additional challenges due to rigid administrative structures, legal constraints, and multiple stakeholder interests. Studies focusing on public universities and government agencies indicate that while integrated systems can enhance budgeting accuracy and accountability, they often encounter resistance from users accustomed to traditional procedures (4, 5). This resistance underscores the importance of examining not only the technical architecture of e-budgeting systems but also the organizational and behavioral dimensions that shape their utilization and impact.

Performance-based budgeting has been widely promoted as a mechanism to link resource allocation with outputs and outcomes, thereby strengthening accountability and performance orientation in public organizations. Empirical research demonstrates that PBB can positively influence organizational performance, especially when supported by strong accountability frameworks and leadership commitment (3, 10). However, several scholars caution that PBB reforms often face implementation gaps, particularly in developing and transitional economies, where institutional capacity and information infrastructure may be limited (1, 2). In such contexts, digital tools and integrated information systems are increasingly viewed as critical enablers for translating PBB principles into operational practice.

Recent studies have begun to explore the interaction between budgeting systems and other organizational processes, such as innovation, participation, and decision-making. For example, Koomson et al. argue that innovative behavior can mediate the relationship between budgetary participation and performance in public-sector

organizations, suggesting that budgeting systems should be designed to encourage learning and experimentation rather than mere compliance (11). Similarly, Seyedi et al. highlight the role of intra-organizational factors in shaping the quality of PBB implementation in project-oriented organizations, emphasizing the need for coherent system design and cross-functional integration (12).

The growing complexity of public-sector operations has also intensified the demand for advanced analytical and computational capabilities within budgeting systems. Developments in workflow scheduling, optimization algorithms, and cloud-based platforms offer new opportunities to enhance the efficiency and responsiveness of budgeting processes, particularly under constraints of time and limited resources (13, 14). While much of this research originates from computer science and operations management, its implications for e-budgeting and enterprise integration are increasingly recognized, especially in large-scale public organizations with complex budgeting cycles.

Another important dimension in contemporary budgeting research concerns governance and sustainability. National budgeting systems are increasingly expected to align financial decisions with sustainable development goals, social accountability, and long-term policy objectives. Studies focusing on Iran's budgeting system reveal persistent challenges related to governance, coordination, and sustainability, which are exacerbated by fragmented information systems and weak integration across agencies (15, 16). These findings suggest that technical integration of budgeting systems must be accompanied by governance reforms and institutional alignment to achieve meaningful and lasting improvements.

From a managerial perspective, the integration of e-budgeting with enterprise applications can also influence marketing, investment, and strategic allocation decisions. Research in private-sector and startup contexts shows that budgeting choices, particularly in areas such as marketing expenditure, have significant implications for financial performance and strategic positioning (17). Although public organizations operate under different incentive structures, similar principles apply in terms of aligning budget allocations with strategic priorities and performance objectives, reinforcing the relevance of integrated budgeting frameworks.

Despite the growing body of literature on e-budgeting, ERP systems, and performance-based budgeting, several gaps remain. First, much of the existing research examines these domains in isolation, without sufficiently addressing their interconnections. Studies on ERP and EAI often focus on operational efficiency and user acceptance, while budgeting research tends to emphasize accountability, participation, and performance outcomes. There is a need for integrative frameworks that explicitly analyze how enterprise application integration influences the efficiency and effectiveness of e-budgeting processes. Second, empirical evidence from developing countries and public-sector contexts remains limited, particularly regarding mixed-method approaches that combine qualitative insights with quantitative modeling. Third, prior studies have often treated system integration as a binary condition, rather than examining its qualitative characteristics, such as flexibility, security, and standardization, which may differentially affect budgeting outcomes (6, 18).

Methodologically, recent research highlights the value of combining qualitative exploration with quantitative validation to capture the multifaceted nature of budgeting reforms. Qualitative studies, such as those using grounded theory or content analysis, can uncover contextual factors and stakeholder perceptions that shape system implementation, while quantitative methods, including structural equation modeling, enable rigorous testing of hypothesized relationships among latent constructs (19, 20). Such mixed-method designs are particularly well suited to studying complex socio-technical systems like e-budgeting platforms integrated with enterprise applications.

In light of these considerations, evaluating the electronic budgeting process through the lens of enterprise application integration is both theoretically and practically significant. From a theoretical standpoint, it contributes to bridging the literature on information systems, public financial management, and organizational performance by articulating the mechanisms through which integration affects budgeting efficiency. From a practical perspective, it provides evidence-based insights for policymakers, managers, and system designers seeking to enhance transparency, reduce costs, and improve strategic decision-making in public organizations. Given ongoing efforts toward smart government, digital governance, and sustainable budgeting, such evaluations are timely and policy-relevant (16, 21).

Accordingly, the aim of this study is to evaluate the efficiency of the electronic budgeting process by examining the role of enterprise application integration in aligning organizational information, processes, and decision-making.

Methods and Materials

The data collection method in the qualitative phase was library-based. In this study, semi-structured interviews were used to collect data aimed at evaluating the electronic budgeting process through the integration of enterprise application systems. The statistical population in the quantitative phase consisted of experts and managers. Considering the target population, a non-probability random sampling method was employed, and a sample size of 317 participants was determined using G*Power software.

In the quantitative phase, field data were collected through a researcher-developed questionnaire designed based on the criteria derived from the qualitative phase. In addition, in this study, a questionnaire was used to collect data in order to evaluate the effect of organizational integration on the efficiency of the electronic budgeting process. This questionnaire was developed according to the number of indicators obtained from the influential characteristics and was distributed online to the participants. After establishing validity (construct validity using factor analysis) and reliability (calculation of Cronbach's alpha coefficient), the questionnaire was administered to the respondents, who were asked to answer the questions voluntarily and based on their interest.

Findings and Results

In the quantitative phase, considering maximum variance and a 5% error level, it was determined that in order to increase the questionnaire return rate and facilitate the research process, more than 400 questionnaires were distributed electronically. Of these, 317 completed questionnaires were returned, and this number constituted the basis for data analysis and hypothesis testing. In this study, the selected variables were examined based on a conceptual model. The normality of the data was assessed using skewness and kurtosis indices. The sample consisted of 317 respondents.

The validity and reliability of the constructs were assessed using the measurement model and hypothesis testing, and model fit was evaluated using covariance-based structural equation modeling through the statistical packages SPSS (Version 20) and SmartPLS (Version 2). The use of structural equation modeling in measuring latent variables provided a more accurate representation of conceptual relationships. As stated by Mittal et al., the partial least squares approach assumes that individual variables change one-to-one with others in the model, and the resulting model fit indices are controlled in the measurement stage (Mittal et al., APA style). Moreover, this method computes an auto-regressive standard error and generates approximate t-values for testing the significance of structural paths. Therefore, according to Table 1, it can be observed that all variables are in a desirable condition.

Table 1. Descriptive Statistics for the Dimensions of the Research Variables

Variables	Mean	Median	Mode	Standard Deviation	Range
Increase in organizational efficiency	3.112	3	4	0.456	3
Reduction of time and cost in processes	3.456	3	4	0.887	3
Facilitation of resource management and decision-making	3.465	3	3	0.476	3
Improvement of accuracy in forecasting and planning	3.756	4	4	0.587	3
Enhancement of transparency in decision-making	3.345	4	4	0.557	3
Reduction of human errors in data	3.223	3	4	0.600	3
Facilitation of communication among departments and units	3.143	3	4	0.685	3
Resistance to change	3.437	4	4	0.549	3

To assess the reliability of the questionnaire, Cronbach's alpha and composite reliability were used. The reliability results for each variable indicate that all values exceeded 0.70, which demonstrates acceptable reliability. To assess validity, convergent and discriminant validity were employed. Table 2 presents the findings related to convergent validity. The obtained convergent validity values for the latent variables of the model were greater than 0.50; therefore, it can be concluded that the convergent validity of the measurement models is satisfactory.

Table 2. Results of Construct Validity Assessment

Symbol	Variable	Cronbach's Alpha	AVE	CR
C1	Increase in organizational efficiency	0.856	0.534	0.859
C2	Reduction of time and cost in processes	0.834	0.587	0.820
C3	Facilitation of resource management and decision-making	0.865	0.598	0.814
C4	Improvement of accuracy in forecasting and planning	0.823	0.570	0.843
C5	Enhancement of transparency in decision-making	0.798	0.633	0.850
C6	Reduction of human errors in data	0.811	0.589	0.854
C7	Facilitation of communication among departments and units	0.845	0.580	0.799
C8	Resistance to change	0.806	0.524	0.834

This criterion, which is used to link the measurement component and the structural component of structural equation modeling, indicates the extent to which changes in each dependent variable of the model are explained by the independent variables. A critical point here is that R^2 is calculated only for endogenous (dependent) constructs of the model, while for exogenous constructs, this value is zero. The higher the R^2 value for the endogenous constructs of a model, the better the model fit. Chin (1998) identified three values—0.19, 0.33, and 0.67—as indicators of weak, moderate, and strong model fit, respectively. Similarly, Henseler (2009) and Hair et al. (2011) defined the values of 0.25, 0.50, and 0.75 as benchmarks for weak, moderate, and strong structural model fit based on the coefficient of determination, respectively.

$$R^2 = \frac{0.393 + 0.772 + 0.328 + 0.762 + 0.258 + 0.318 + 0.319}{7} = 0.310$$

Based on the results presented in Figure 4–5, the coefficient of determination (R^2) for the endogenous constructs of the research model is satisfactory. The value of the coefficient of determination for the performance of the dependent components indicates that 45% of the variance in the model variables is explained by the combined effects of the independent and dependent variables, which is considered strongly acceptable.

The second category of findings in this study relates to the assessment of the structural model. After confirming validity and reliability, the structural model of the research was evaluated. Using this model, the research hypotheses were examined. Figure 1 presents the results obtained from the output of the SMARTPLS2 software.

According to this model, the factor loadings are significant at the 95% confidence level, and all t-statistic values fall outside the range of -1.96 to $+1.96$.

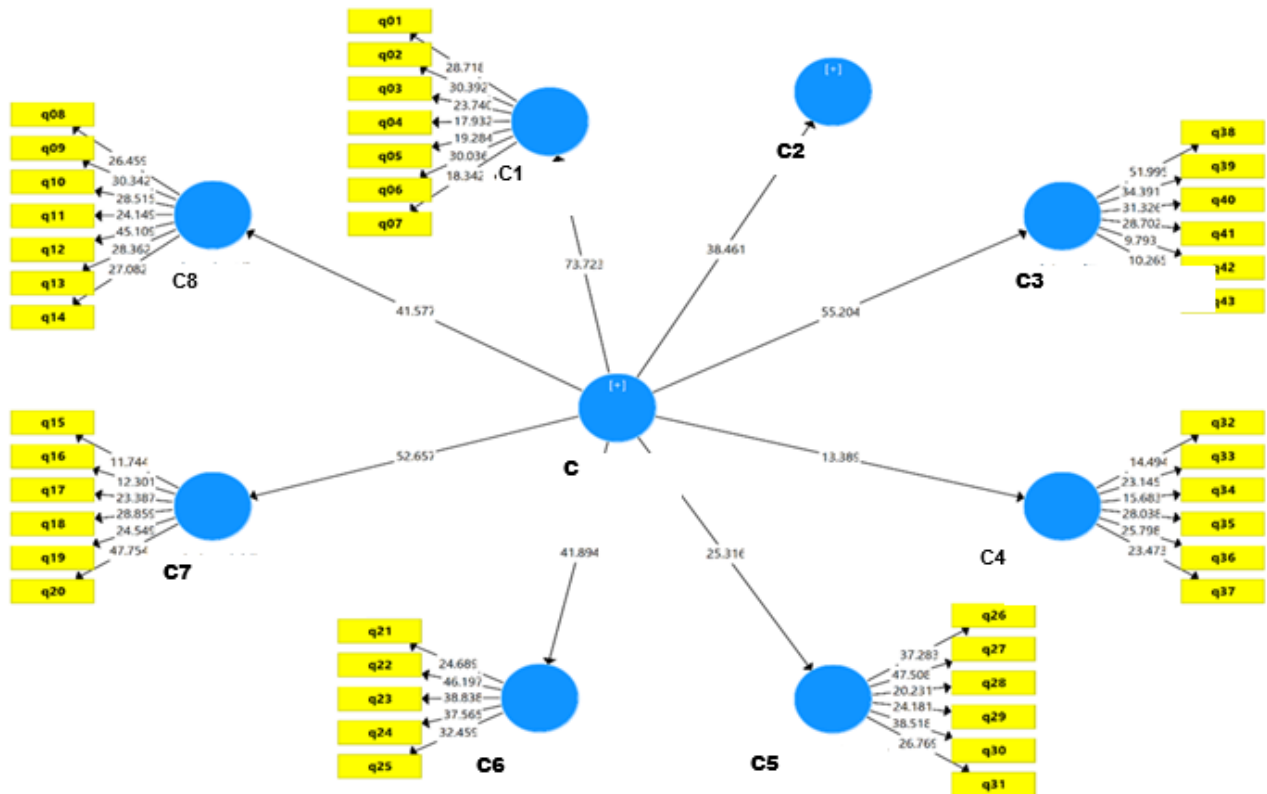


Figure 1. Structural Model of the Research in the Significance State

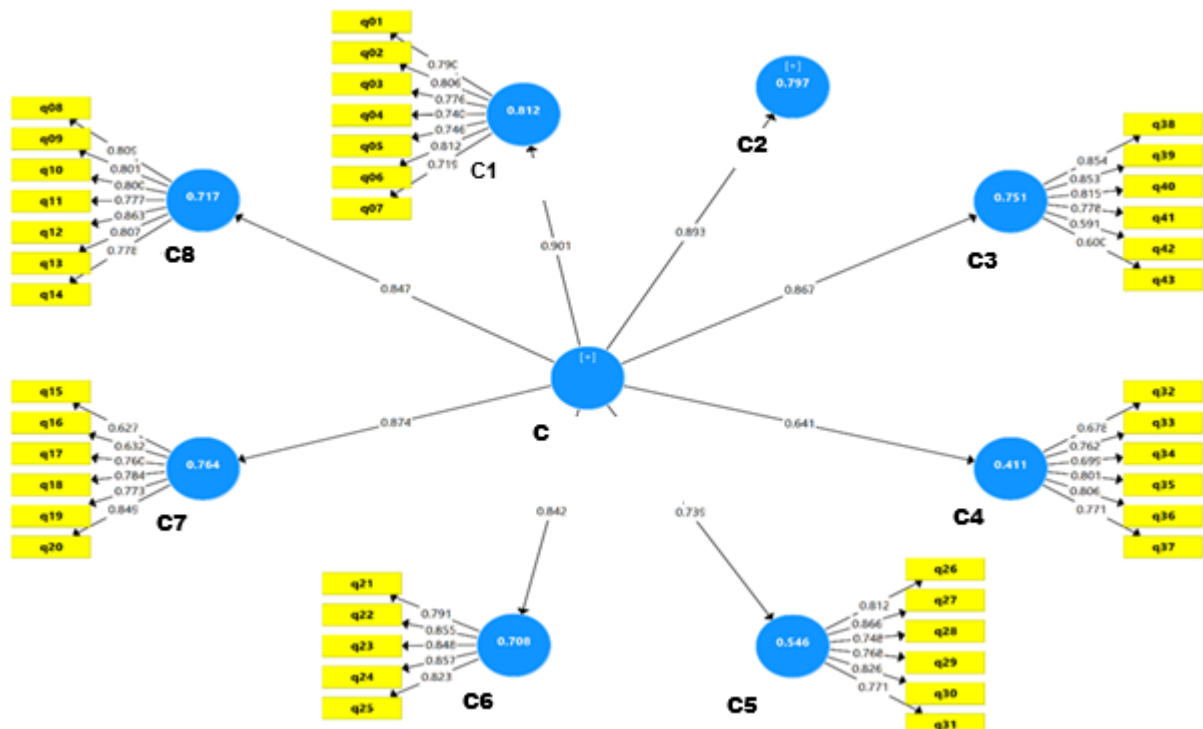


Figure 2. Structural Model of the Research in the Standardized State

In the quantitative phase, the research model was analyzed using SmartPLS software. This analysis included the identified variables, the relationships among them, and comparisons with previous studies. Based on the obtained results, all factor loadings and path coefficients were reported as significant at the 95% confidence level. Specifically, the t-statistic values for all model paths were outside the critical range of -1.96 to $+1.96$, indicating the significance of the relationships among the latent variables of the research at the 5% error level.

Discussion and Conclusion

The purpose of this study was to identify and validate the factors constituting a strategic human resource retention model in Bank Melli of East Azerbaijan Province using a qualitative, expert-based approach. The findings, derived from thematic analysis of expert interviews and subsequently refined through the Delphi technique, reveal that human resource retention in the banking sector is a multidimensional and systemic phenomenon shaped by an interrelated set of structural, relational, leadership, developmental, and well-being-oriented factors. The results demonstrate that retention cannot be reduced to isolated incentives or short-term managerial interventions; rather, it emerges from the alignment of organizational systems, values, and managerial practices with employees' professional and psychological expectations.

One of the most strongly validated dimensions of the model was organizational sustainability and job security. Experts emphasized that perceived stability, predictability of decisions, and assurance regarding employees' career futures are foundational prerequisites for retention in banking organizations. This finding is consistent with prior studies conducted in Iranian and international contexts, which highlight job security as a critical determinant of employee commitment, particularly in public and semi-public organizations operating under economic uncertainty (22, 23). From a strategic HRM perspective, stability serves as a psychological anchor that enables employees to invest their skills, knowledge, and loyalty in the organization over the long term. The confirmation of this dimension also aligns with retention models developed in knowledge-based and public organizations, where long-term employment relationships are viewed as essential for preserving organizational knowledge and social capital (24, 25).

Another central finding of the study concerns organizational justice and transparency, which emerged as one of the most robustly supported dimensions in the Delphi process. Distributive and procedural justice received particularly high approval rates, indicating that fair allocation of resources and consistent, transparent procedures are perceived as indispensable for retention. This result corroborates extensive evidence in the strategic HRM literature suggesting that perceptions of justice significantly influence trust, organizational commitment, and turnover intentions (26, 27). In the banking context, where formal rules and hierarchical decision-making are prevalent, transparency in processes and decisions appears to play a compensatory role by reducing uncertainty and mitigating perceptions of arbitrariness. The partial reservation expressed by experts regarding principle-based decision-making suggests that while ethical consistency is valued, its practical implementation may require clearer operational definitions within bureaucratic systems.

The findings also underscore the importance of a culture of respect and human interaction as a core retention mechanism. Mutual respect, managerial integrity, teamwork, and acceptance of individual differences were unanimously retained in the model. This aligns with contemporary strategic HRM approaches that emphasize relational and cultural dimensions of retention alongside formal HR practices. Prior research indicates that respectful and inclusive organizational climates enhance employees' sense of dignity and belonging, thereby reducing

withdrawal behaviors (28, 29). In service-oriented sectors such as banking, where work is highly relational and customer-facing, positive interpersonal dynamics not only support retention but also contribute to service quality and organizational reputation.

Human-centered and participatory leadership emerged as another critical dimension, though with nuanced outcomes. Trust in employees, coaching-oriented leadership, human leadership skills, and supportive leadership styles were validated, whereas formal participation in decision-making was rejected due to insufficient expert consensus. This pattern suggests that experts distinguish between relational support and structural participation. While supportive and trust-based leadership is seen as essential for retention, participatory decision-making mechanisms may be constrained by regulatory frameworks, centralized governance, or risk-averse cultures typical of banking organizations. This interpretation is consistent with international findings indicating that leadership style often has a stronger influence on retention than formal participation structures, particularly in highly regulated environments (30, 31).

The dimension of organizational belonging revealed a selective configuration of retention drivers. Intangible and symbolic practices such as recognition, non-financial benefits, incentive leave, and welfare facilities were retained, whereas performance-based financial rewards, supplementary insurance, and supportive loans were rejected. This finding challenges traditional assumptions that financial incentives are the primary drivers of retention and supports more recent evidence suggesting that symbolic recognition and perceived appreciation may be more influential in sustaining long-term commitment (26, 27). In the context of Bank Melli, where pay structures are often standardized and externally regulated, non-financial mechanisms may provide greater flexibility and psychological impact in reinforcing employees' sense of belonging.

Professional development conditions were also strongly emphasized in the model. Targeted training, mentoring, transparent career paths, talent management, and knowledge sharing were retained, highlighting the strategic importance of growth opportunities in retention. This finding aligns with both Iranian and international studies demonstrating that employees are more likely to remain in organizations that invest in their professional development and provide clear advancement trajectories (25, 32). The rejection of broadly defined competency development suggests that experts prioritize role-relevant and strategically aligned development initiatives over generalized skill accumulation, particularly in specialized banking roles.

The learning and creativity culture dimension further reinforces the developmental orientation of the retention model. Support for creativity, innovation, continuous learning, and training workshops were validated, while the formal establishment of an organizational learning culture was rejected. This apparent contradiction may reflect a pragmatic orientation among experts, who view learning as an operational practice rather than an abstract cultural label. Similar observations have been reported in studies of strategic HRM in transitional and developing economies, where learning is often implemented through concrete programs rather than formal cultural frameworks (33, 34).

Organizational cohesion and structural alignment emerged as a fully supported dimension, encompassing goal alignment, transparency of senior management decisions, participatory organizational decision-making, and trust in professional expertise. This finding highlights the systemic nature of retention, suggesting that employees are more likely to remain when they perceive coherence between organizational strategies and daily practices. Prior research indicates that strategic alignment enhances internal legitimacy and reduces role ambiguity, thereby strengthening commitment and retention (35, 36). In banking organizations, where misalignment between

headquarters policies and branch-level realities can be pronounced, structural coherence appears particularly salient.

Psychological well-being and work–life balance were also unanimously retained, underscoring the growing importance of mental health and quality of work life in retention strategies. Workload management, managerial psychological support, and attention to occupational well-being were identified as key components. These results resonate with recent strategic HRM literature emphasizing employee well-being as a strategic asset rather than a peripheral concern (28, 37). In high-pressure banking environments, sustained neglect of well-being may accelerate burnout and turnover, whereas supportive practices can enhance resilience and long-term engagement.

Finally, the supportive system and effective feedback dimension demonstrated strong consensus, highlighting responsiveness to employee needs, performance improvement, suggestion systems, and transparent performance appraisal. This finding supports the view that retention is reinforced through continuous dialogue and feedback rather than episodic evaluations. Strategic HRM studies consistently show that feedback-rich environments foster learning, trust, and perceived organizational support, all of which contribute to retention (24, 38).

Taken together, the findings of this study converge with contemporary strategic human resource management theories that conceptualize retention as an emergent outcome of aligned systems, ethical leadership, developmental opportunities, and employee well-being. At the same time, the results extend existing literature by offering a context-specific, expert-validated model tailored to the banking sector in a provincial Iranian setting. By integrating structural, relational, and psychological dimensions, the proposed model provides a comprehensive framework for understanding and managing human resource retention in Bank Melli.

Despite its contributions, this study has several limitations that should be acknowledged. First, the research adopted a qualitative, expert-based design with a relatively small sample size, which, although appropriate for exploratory and theory-building purposes, may limit the generalizability of the findings. Second, the study focused on a single banking organization within one province, and contextual factors specific to Bank Melli or East Azerbaijan Province may have influenced expert perceptions. Third, the reliance on expert judgments may have introduced subjective bias, as participants' views are shaped by their professional experiences and organizational positions.

Future studies could extend this research by quantitatively testing the proposed strategic human resource retention model using survey data from a larger sample of bank employees across multiple regions. Comparative studies across different banks, provinces, or sectors could help identify contextual similarities and differences in retention dynamics. Longitudinal research designs may also be employed to examine how changes in strategic HR practices influence retention over time. Additionally, future research could explore the interaction between digital HR technologies and human-centered retention strategies in greater depth.

From a practical perspective, managers and policymakers in banking organizations should view retention as a strategic, system-wide responsibility rather than an isolated HR function. Emphasis should be placed on enhancing transparency, justice, supportive leadership, and employee well-being alongside professional development opportunities. Non-financial recognition mechanisms and feedback systems should be strengthened to reinforce organizational belonging. Finally, retention strategies should be regularly reviewed and adapted to align with organizational strategy, regulatory constraints, and evolving employee expectations.

Acknowledgments

We would like to express our appreciation and gratitude to all those who helped us carrying out this study.

Authors' Contributions

All authors equally contributed to this study.

Declaration of Interest

The authors of this article declared no conflict of interest.

Ethical Considerations

All ethical principles were adhered in conducting and writing this article.

Transparency of Data

In accordance with the principles of transparency and open research, we declare that all data and materials used in this study are available upon request.

Funding

This research was carried out independently with personal funding and without the financial support of any governmental or private institution or organization.

References

1. Mauro SG, Cinquini L, Sinervo LM. Actors' dynamics toward performance-based budgeting: A mix of change and stability? *Journal of Public Budgeting, Accounting & Financial Management*. 2019;31(2):158-77. doi: 10.1108/JPBAFM-07-2018-0068.
2. Salegi M, Golmorsa F, Shamsi Goshki S. Designing a performance-based budgeting model with a systemic and mixed approach. *Scientific Research Quarterly*. 2022;27(2):193-228. doi: 10.52547/jpbud.27.2.193.
3. Haqqarast A, Barahooei Pirnia B, Ilaghi M, Dazeh N, Arab L. The role of accountability in performance-based budgeting. *Outlook on Accounting and Management*. 2023;6(80):195-206.
4. Nugraha AY, Wibowo UB, editors. Analysis of benefits and obstacles from e-budgeting implementation in educational organizations. *International Conference on Educational Research and Innovation (ICERI 2019)*; 2019: Atlantis Press.
5. Tewe R, Ismaila B, Beneke J, Siewe L. Perceptions on "free" tertiary education and operational budgeting within a public university in South Africa. *Social Sciences & Humanities Open*. 2024;9:100793. doi: 10.1016/j.ssaho.2023.100793.
6. Pratama RY, Samopa F, editors. Design of enterprise application integration (EAI) in e-planning and e-budgeting systems. *Proceedings Series*; 2019.
7. Molina-Castillo FJ, Rodríguez R, López-Nicolas C, Bouwman H. The role of ERP in business model innovation: Impetus or impediment? *Digital Business*. 2022;2:100024. doi: 10.1016/j.digbus.2022.100024.
8. Abejo MC. Enterprise Resource Planning (ERP) system implementation framework for selected state universities. *International Journal of Computing Sciences Research*. 2023;7:2450-77.
9. Malekinia M, Khadem SH, Mobarhan R. The role of organizational factors in implementing enterprise resource planning systems using the technology acceptance model. *Scientific Quarterly of Interdisciplinary Strategic Knowledge Studies*. 2024;14(54):243-66.

10. Pratolo S, Mukti AH, Sofyani H. Intervening role of performance-based budgeting in the relationship between transformational leadership, organizational commitment and university performance. *Jurnal Dinamika Akuntansi dan Bisnis*. 2021;8(1):77-90. doi: 10.24815/jdab.v8i1.19116.
11. Koomson S, Azadda WN, Opoku Mensah A, Gbadago FY. Does innovative behaviour intervene between budgetary participation and performance in the public sector? *International Journal of Innovation Science*. 2025;17(2):438-62. doi: 10.1108/IJIS-04-2023-0084.
12. Seyedi P, Borhani SA, Maleki MH, Adeli O. Investigating the impact of intra-organizational factors on the quality of performance-based budgeting implementation in project-oriented organizations in Iran's housing sector. *Studies in Ethics and Behavior in Accounting and Auditing*. 2025;4(1):115-34.
13. Kushwaha S, Singh RS. Deadline and budget-constrained archimedes optimization algorithm for workflow scheduling in cloud. *Cluster Computing*. 2025;28(2):117. doi: 10.1007/s10586-024-04702-1.
14. Roy I, Kaluvakuri S, Maddali K, Liu Z, Gupta B, Debnath N. Novel design of load balanced and fault-tolerant multicasting protocols for PIM-SM. *International Journal of Computers and Their Applications*. 2020;27(4):158-67.
15. Rezvani-Far S, et al. Designing a Sustainable Development Governance Model in National Budgeting. *Journal of Public Management*. 2024.
16. Rezvani-Far MM, Salimi Z. Challenges of Governance Based on Sustainable Development in Iran's Budgeting System. 2024.
17. Rathore APS. Impact of Marketing Budget Allocation on Financial Performance of Startups. *Shodhkosh Journal of Visual and Performing Arts*. 2024;5(6). doi: 10.29121/shodhkosh.v5.i6.2024.5761.
18. Amini M, Azar A, Bayat K, Khadivar A. Presenting a developed performance based budgeting maturity model: With focusing on capabilities and results in a mature system. *Management Research in Iran*. 2021;22(4):225-47.
19. Alizadeh H, Khorramabadi M, Saberian H, Keramati M. Qualitative study to propose digital marketing based on customer experience: Considering grounded theory (GT). *Business, Marketing, and Finance Open*. 2024;1(6):86-98. doi: 10.61838/bmfopen.1.6.8.
20. Riswanto DI, Sensuse DI, editors. Knowledge management systems development and implementation: A systematic literature review. *IOP Conference Series: Earth and Environmental Science*; 2021.
21. Tefang Saz A, Sotoudeh R, Gard A, Haqqarast A. Proposing a performance-based budgeting model and evaluating its impact on performance accountability. *Government Accounting*. 2024;11(1):131-46.
22. Daghati A. Investigating the Drivers of Human Resource Retention in Birjand University of Medical Sciences. *Public Management Research*. 2018;11(42):271-94.
23. Ranjbar M. Investigating human resource retention system and its impact on productivity improvement in Parsian Gas Refining Company. *Journal of Human Capital Empowerment*. 2022;5(2):111-21.
24. Nodeh Farahani M, Seyed Naghavi MA, Mehrabi J. Designing a Human Resource Retention Model Based on Structural Equations in Smart PLS Software (Case Study: Knowledge-Based Organizations in Tehran Province). *Commercial Reviews*. 2024;22(125):92-110. doi: 10.22034/bs.2024.2014567.2886.
25. Farahani Majid N, Seyed Naghavi MA, Mehrabi J. Designing the human resource Retention Model in knowledge-based organizations: A Review of Experts' views. *Journal of public Administration Mission*. 2023;14(1):1-18.
26. Safari Z, Alvani SM, Zarei Matin H, Safari M. The Antecedents of Human Resource Retention With an Emphasis on the Role of Job Embeddedness: A Mixed Meta-Study. *Organizational Culture Management*. 2023;21(67):1-20.
27. Bigdeli M, Vaddadi A, Ghorbanizadeh V. Conceptual Analysis of Human Resource Retention Policy Evaluation Using Rogers' Evolutionary Approach. *Defense Human Capital Management*. 2024;4(1):23-70.
28. Hamzavi H, Mohebi A, Khademi A, Rezaeimanesh B. The Impact of Sustainable Human Resource Management on Human Resource Retention and the Mediating Role of Social Capital. *Transformative Human Resources Quarterly*. 2023;2(7):20-38.

29. Mohammadi R, Bastami H. Modeling the causal relationship between organizational virtue and professional ethics of employees of the General Department of Sports and Youth of Kermanshah province with the mediating role of strategic human resource management. *Journal of Organizational Behavior Management in Sports*. 2024;11(4):57-70.
30. Jamai M, Taheri Lari M, Bahramzadeh HA. Exploring the Components of Strategic Human Resource Management in Organizations. *Studies in Management and Leadership in Educational Organizations*. 2024;4(1).
31. Suryawan IM, Sakapurnama E. The Urgency of Strategic Human Resources Planning for the Transformation of the Indonesian National Army Command and Staff College. *Dinasti International Journal of Education Management And Social Science*. 2024;5(3):92-9. doi: 10.31933/dijemss.v5i3.2281.
32. Mwambela A. Analysis of the Impact of Recruitment and Selection as a Strategic Human Resource Management Tool on Organisational Performance in Zambia. *Journal of Management Studies and Development*. 2024;3(03):193-210. doi: 10.56741/jmsd.v3i03.620.
33. Hormozi Moghaddam F, Saffarian Hamedani S, Yousefi Saeedabadi R. The Impact of Educational Excellence Model Components on the Development of Human Resources in Zahedan's Education Organization. *Iranian Journal of Educational Sociology*. 2024;7(1):133-40. doi: 10.61838/kman.ijes.7.1.13.
34. Wijaya F, Senen SH. Strategic Human Resource Management in Social Enterprises: A Systematic Review of Practices and Challenges. *Journal of Social Entrepreneurship Theory and Practice*. 2024;3(2). doi: 10.31098/jsetp.v3i2.2821.
35. Permana D, Rustiawan I, Sya'rani R. Strategic Human Resources Management And Organisational Resillience In Indonesian Start-Ups. *Commercium: Journal of Business and Management*. 2024;2(2):47-66. doi: 10.61978/commercium.v2i2.214.
36. Magomedbekov GU, Isakova BL, Умарова CX. Resource Positioning in Strategic Human Resource Management. 2024(12(161)):1230-3. doi: 10.34925/eip.2023.161.12.240.
37. Rahmawati A, Rahmat MRA. Strategic Human Resource Management in the AI Era: A Scoping Review on 2024 Adaptation Strategies. *Economics and Business Journal (ECBIS)*. 2024;2(6):503-12. doi: 10.47353/ecbis.v2i6.200.
38. Reddy KJ, V MP. Analysis of Review of Literature on- Strategic Human Resource Management for Internal Brand Building: A Study of Select Higher Education Institutions in Bengaluru. *Interantional Journal of Scientific Research in Engineering and Management*. 2024;08(008):1-6. doi: 10.55041/ijrem37123.