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Strategic Human Resource Development And Digital Leadership Toward Employee Performance In Smart Organizations

[1]Muh. Anugrah Prabowo Putra, [2]Fitriani, [3]Achmad Ridha
[1,2]Sekolah Tinggi Ilmu Ekonomi Nusantara Makassar, Indonesia. [3]Universitas Negeri Makassar, Indonesia.
[1]anugrahprabowo@stienus.ac.id, [2]fitriani@stienus.ac.id, [3]achmad.ridha@unm.ac.id

**Correspondence E-mail: anugrahprabowo@stienus.ac.id*

Abstract: *This study investigates the influence of Strategic Human Resource Development (SHRD) and Digital Leadership (DL) on Employee Performance (EP) within the context of smart organizations in Makassar City, Indonesia. The study responds to the accelerating digital transformation that requires organizations to strengthen both human capital strategies and leadership competencies. Using a quantitative explanatory design, data were collected from 150 employees and line managers across financial services, digital marketing, and telecommunication sectors through a structured questionnaire using a seven-point Likert scale. The data were analyzed with Partial Least Squares–Structural Equation Modeling (PLS-SEM) using SmartPLS 4.0. The measurement model showed satisfactory reliability and validity (CR > 0.80; AVE > 0.50), while the structural model revealed that both SHRD (β = 0.61; p < 0.001) and DL (β = 0.21; p < 0.01) significantly influence employee performance, explaining 58.2% of its variance (R^2 = 0.582). These results indicate that strategic HRD serves as a stronger and more direct predictor of performance, while digital leadership functions as a contextual enabler fostering innovation and adaptability. Theoretically, the study extends the Resource-Based View and Dynamic Capability Theory, demonstrating that performance in smart organizations is achieved through the synergy between structured human development and visionary leadership. Practically, it emphasizes that sustainable digital transformation in emerging economies must begin with strategic human transformation. Future research should explore mediating variables such as engagement or digital culture to enrich the conceptual framework of digital HRD.*

Keywords*: Strategic Human Resource Development, Digital Leadership, Employee Performance, Smart Organization.*

INTRODUCTION

The accelerating pace of digital transformation has fundamentally altered the architecture of organizational management, reshaping the way human, technological, and structural resources interact to create value. In this new paradigm, organizations must continuously adapt to technological advancements and redefine employee competencies in order to remain competitive. Within the framework of the so-called smart organizations entities characterized by data-driven systems, automation, and continuous learning the ability to develop human capital strategically has become a crucial determinant of success. This reality underscores the growing importance of

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Strategic Human Resource Development (SHRD) and Digital Leadership (DL) as two complementary pillars in shaping employee performance outcomes. While SHRD emphasizes the alignment of talent development initiatives with long-term organizational strategy, digital leadership focuses on fostering vision, technological adaptability, and innovation among employees (Garavan et al., 2019), (Sacavém et al., 2025). However, despite the proliferation of studies examining both constructs, empirical findings remain inconsistent. Several researchers have reported that digital leadership has an indirect or even insignificant influence on employee performance, suggesting the presence of contextual and mediating factors such as organizational learning capability, engagement, or digital readiness (Wang et al., 2025), (Chen et al., 2022).

Strategic Human Resource Development has long been acknowledged as a key enabler of organizational competitiveness, especially in environments characterized by rapid technological change. Previous studies have demonstrated that SHRD practices ranging from competency-based training, continuous learning, and performance evaluation to knowledge management play a pivotal role in improving innovation and adaptability within firms (Hussain et al., 2023), (Vong et al., 2025). The concept has evolved from a focus on individual learning outcomes toward a systemic understanding of human development as a strategic asset. In digitally oriented organizations, SHRD involves building workforce capabilities that align not only with current operational needs but also with the long-term digital vision of the company. This process entails integrating HR planning with digital transformation strategies, ensuring that learning initiatives support both technological proficiency and strategic agility (Garavan & Carbery, 2021).

Parallel to this, the discourse on digital leadership has gained increasing attention. Digital leaders are expected to guide organizations through the complexities of technological disruption, acting not merely as decision-makers but as catalysts for digital innovation and cultural transformation. They inspire digital confidence, encourage risk-taking, and embed a mindset of experimentation and collaboration within their teams (Sacavém et al., 2025), (Wang et al., 2024). Yet, the relationship between digital leadership and employee performance remains debatable. Some studies indicate that digital leadership enhances performance by promoting innovation, collaboration, and engagement (Nguyen & Luu, 2023), whereas others report that its impact tends to be mediated by other constructs such as digital culture or organizational agility (Shahzad et al.,

2025). Such variation implies that while leadership can create a conducive environment for digital transformation, it may not directly translate into measurable improvements in employee output without effective human resource development mechanisms.

Methodologically, the majority of empirical research in this area has employed Partial Least Squares–Structural Equation Modeling (PLS-SEM), an approach that allows simultaneous evaluation of measurement validity and structural relationships between latent constructs. PLS-SEM is particularly suitable for studies involving complex, predictive models and smaller sample sizes, which are common in organizational and behavioral research (Hair et al., 2021), (Hair et al., 2022). Through this technique, researchers can assess indicator reliability, internal consistency (Cronbach's Alpha, Composite Reliability), convergent validity (Average Variance Extracted), and discriminant validity (Heterotrait-Monotrait ratio) while estimating the strength and significance of structural paths. This methodological framework ensures robustness and predictive power in contexts where traditional covariance-based methods may be limited due to non-normality or model complexity.

Despite methodological advances, however, several weaknesses persist across the literature. First, studies often examine SHRD and digital leadership in isolation, thereby neglecting their potential synergistic influence on performance outcomes (Garavan & Carbery, 2021). Second, inconsistencies in results regarding digital leadership's impact on performance suggest that contextual factors such as industry type, organizational size, or digital maturity may alter causal mechanisms (Tagscherer & Froese, 2023). Third, much of the evidence originates from advanced economies, leaving developing urban centers like Makassar underexplored, even though such environments display distinct patterns of digital transformation and resource constraints (Chen et al., 2022). This lack of contextual diversity limits the generalizability of findings and underscores the need for research situated in emerging economies.

The study was conducted among employees of selected private service and technology-based companies in Makassar City, including firms engaged in financial services, digital marketing, and telecommunication sectors. This study addresses these gaps by investigating how SHRD and digital leadership jointly influence employee performance in private-sector smart organizations in Makassar City, Indonesia. The research seeks to determine whether these constructs exert direct,

significant effects or whether their influence operates through indirect mechanisms. Specifically, it explores how strategic human resource practices contribute to performance enhancement and whether digital leadership directly supports this process or functions primarily as an enabling condition. The city of Makassar provides a compelling context because its private sector comprising service-oriented and technology-driven enterprises is experiencing rapid yet uneven digitalization. These organizations increasingly adopt cloud-based systems, digital communication platforms, and analytics tools, yet often struggle to synchronize HRD initiatives with technological change. Consequently, studying this environment offers valuable insights into how leadership and human resource development interact in settings where digital maturity and strategic alignment remain works in progress.

The expected results indicate that strategic HRD will emerge as a significant predictor of employee performance, while digital leadership may show a weaker or statistically insignificant direct effect. Such a finding would align with recent open-access research suggesting that leadership's impact on performance is often mediated through engagement or capability-building mechanisms rather than exerted directly (Wang et al., 2025), (Hussain et al., 2023). Theoretically, this outcome would clarify the boundary conditions under which leadership contributes to performance, reinforcing the view that human resource development remains the more immediate determinant of individual outcomes in smart organizations. Practically, it highlights that effective performance improvement in digitally transforming firms requires integrating HRD initiatives with leadership behaviors ensuring that digital vision, technological investments, and workforce learning progress in unison.

This research contributes to the literature in multiple dimensions. Theoretically, it integrates SHRD and digital leadership into a single analytical framework, enriching understanding of how strategic and behavioral mechanisms jointly drive employee performance in technology-intensive contexts. Methodologically, it strengthens the application of PLS-SEM in emerging-market environments by adopting contemporary reliability and validity standards. Contextually, it expands empirical evidence to include private firms in Makassar an underrepresented yet dynamically evolving region in Indonesia's digital economy. From a managerial standpoint, the study offers

practical implications for aligning HRD strategies with leadership practices to sustain innovation, adaptability, and productivity in smart organizations.

Finally, this research acknowledges its contextual limitation. The data were collected exclusively from private-sector organizations located in Makassar City, where digital transformation is in progress but not yet uniformly institutionalized. The findings should therefore be interpreted within this boundary, recognizing that public-sector institutions or firms in other regions may exhibit different leadership dynamics, resource configurations, and organizational cultures. While the study offers valuable insights for similar emerging economies, caution should be exercised in generalizing results beyond the Makassar private sector. Future research is encouraged to extend the model across regions and industries to validate the observed relationships under varying conditions (Nguyen & Luu, 2023), (Shahzad et al., 2025).

In summary, this paper aims to bridge the theoretical and practical divide between human resource development and leadership in the digital age. It positions SHRD as a direct enabler of employee performance and digital leadership as a contextual catalyst that amplifies this effect within smart organizations. The following sections review the relevant literature, detail the research methodology, present empirical results, and discuss implications for theory and practice, ultimately advancing understanding of how strategic HRD and digital leadership jointly sustain employee performance in digitally transforming environments.

METHOD

Research Design

This study adopts a quantitative explanatory research design, which aims to examine the causal relationships among Strategic Human Resource Development (SHRD), Digital Leadership (DL), and Employee Performance (EP) within smart organizations. The explanatory approach allows for hypothesis testing based on established theoretical models, thereby ensuring that observed relationships are both statistically and theoretically grounded.

Given the study's focus on behavioral constructs and predictive relationships, Partial Least Squares Structural Equation Modeling (PLS-SEM) was employed as the primary analytical technique. PLS-SEM is particularly appropriate for complex, non-normal data structures and

smaller sample sizes typical of organizational and management studies (Hair et al., 2021), (Hair et al., 2022).

Population and Sample

The population of this study comprises employees working in private-sector smart organizations in Makassar City, Indonesia, particularly those operating in service-oriented and technology-driven industries such as financial services, digital marketing, and telecommunications. These organizations were selected because they represent sectors most actively undergoing digital transformation in the regional economy.

The sampling technique used is purposive sampling, with inclusion criteria as follows:

1. Employees who have worked in the organization for at least one year;
2. Employees who are directly involved in digital or technology-supported work processes (e.g., digital communication platforms, cloud-based operations, or data analytics systems);
3. Supervisory or managerial-level employees who can assess both leadership and development practices.

A total of 150 valid responses were obtained through a structured online questionnaire distributed via organizational HR departments and professional networks. This sample size meets the minimum requirement for PLS-SEM, following the "10-times rule," where the number of samples exceeds ten times the largest number of indicators measuring a single construct (Hair et al., 2021).

Data Collection Procedure

Data were collected using a structured questionnaire consisting of four main sections: (1) Demographic information (gender, age, education level, tenure, and department); (2) Strategic Human Resource Development (SHRD) items; (3) Digital Leadership (DL) items; (4) Employee Performance (EP) items.

The questionnaire employed a seven-point Likert scale (1 = strongly disagree to 7 = strongly agree) to capture respondent perceptions. Prior to distribution, a pilot test involving 20 respondents was conducted to assess clarity, reliability, and content validity of the instrument. Minor adjustments were made to wording for better contextual alignment with local organizational terminology.

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Measurement of Constructs

The measurement instruments were adapted from validated sources as follows:

Construct	Dimension / Focus	Source
Strategic Human Resource Development (SHRD)	Strategic integration, training & learning culture, management participation	Garavan et al. (2019); Hussain et al. (2023)
Digital Leadership (DL)	Vision, technological adaptability, digital mindset, collaboration	Sacavém et al. (2025); Wang et al. (2024)
Employee Performance (EP)	Task performance, adaptability, innovation behavior	Nguyen & Luu (2023); Shahzad et al. (2025)

Table 1. *Measurement of Constructs*

Each construct consisted of 4–6 reflective indicators, which were assessed for reliability (Cronbach's Alpha > 0.7), internal consistency (Composite Reliability > 0.7), and convergent validity (Average Variance Extracted > 0.5). Discriminant validity was examined using the Heterotrait-Monotrait (HTMT) ratio, ensuring that each construct was conceptually distinct.

Data Analysis Technique

The data were analyzed using SmartPLS 4.0 software in two main stages: (1) Measurement Model (Outer Model) Evaluation to test indicator reliability, convergent validity, and discriminant validity; (2) Structural Model (Inner Model) Evaluation to assess the significance and strength of the hypothesized relationships among constructs. The bootstrapping procedure with 5,000 resamples was applied to estimate path coefficients and test hypotheses.

Research Model

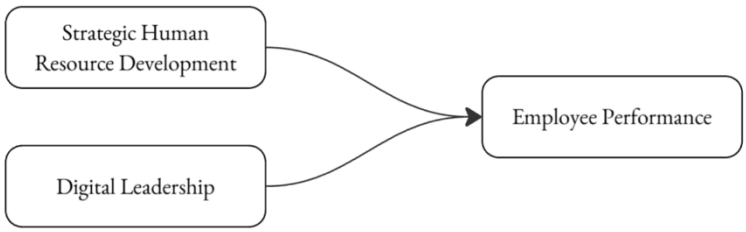

Figure 1. *Conseptual Framework*

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RESULT AND DISCUSSION

Respondent Profile

A total of 150 valid responses were analyzed. The majority of respondents were male (58%) and aged between 26–40 years (62%). Most held a bachelor's degree (71%) and had between 3–10 years of professional experience (65%). Regarding sectoral distribution, respondents represented firms in financial services (40%), digital marketing (33%), and telecommunication (27%) industries in Makassar City. These characteristics reflect a digitally active workforce within emerging smart organizations.

Measurement Model (Outer Model) Evaluation

Realibility and Validity Testing

The first step in PLS-SEM involves evaluating the measurement model for indicator reliability, internal consistency, and construct validity.
All indicators demonstrated satisfactory outer loadings above 0.70, confirming adequate item reliability. Internal consistency was verified with Cronbach's Alpha (α) and Composite Reliability (CR) values exceeding the recommended threshold of 0.70.

Construct	α	CR	AVE	Status
Strategic HRD (SHRD)	0.88	0.91	0.64	Reliable & Valid
Digital Leadership (DL)	0.90	0.93	0.67	Reliable & Valid
Employee Performance (EP)	0.91	0.94	0.70	Reliable & Valid

***Table 2**. Realibility and Validity Testing*

All Average Variance Extracted (AVE) values exceeded 0.50, indicating strong convergent validity.

Discriminant Validity

The Heterotrait-Monotrait (HTMT) ratios among constructs were below 0.85, confirming discriminant validity and ensuring that SHRD, DL, and EP measure distinct conceptual domains. These results confirm that the measurement model fulfills all reliability and validity requirements, allowing further analysis of the structural relationships.

Structural Model (Inner Model) Evaluation

After confirming the reliability and validity of all measurement indicators, the next analytical step was to evaluate the structural model, which examines the causal relationships among the latent

constructs: Strategic Human Resource Development (SHRD), Digital Leadership (DL), and Employee Performance (EP).

The evaluation of the inner model in Partial Least Squares–Structural Equation Modeling (PLS-SEM) aims to determine the predictive power, explanatory strength, and statistical significance of hypothesized paths. This process involves assessing several key criteria, namely multicollinearity, coefficient of determination (R^2), effect size (f^2), predictive relevance (Q^2), and the significance of path coefficients obtained through bootstrapping.

To begin, multicollinearity diagnostics were conducted using the Variance Inflation Factor (VIF). The results showed that all VIF values ranged between 1.55 and 2.30, well below the recommended threshold of 5.0. This indicates that no serious collinearity exists among the predictor variables, and each construct contributes unique explanatory information to the model.
The coefficient of determination (R^2) for Employee Performance (EP) was found to be 0.582, meaning that SHRD and DL together explain approximately 58.2% of the variance in employee performance. According to the interpretive guidelines proposed by Hair et al. (2021), this value represents a moderate to substantial level of explanatory power, suggesting that the model captures more than half of the determinants of employee performance in smart organizations. This result also implies that other unobserved variables, such as organizational learning or digital readiness, may account for the remaining unexplained variance an avenue for future research.

Next, the effect size (f^2) was examined to determine the relative contribution of each independent variable to the dependent construct. The analysis revealed that SHRD exerts a large effect ($f^2 = 0.43$) on employee performance, whereas DL demonstrates a small to medium effect ($f^2 = 0.09$). These findings reinforce the argument that strategic HRD practices particularly when aligned with organizational digital strategies play a more substantial and direct role in enhancing performance outcomes than leadership alone.

The model's predictive relevance (Q^2) was also tested using the blindfolding procedure. The resulting Q^2 value of 0.42 indicates strong predictive validity, confirming that the model has meaningful out-of-sample predictive power. In other words, the constructs of SHRD and DL not only explain performance statistically but also possess predictive relevance when applied to similar organizational contexts.

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To evaluate the significance and strength of the hypothesized relationships, a bootstrapping procedure with 5,000 subsamples was conducted. The results show that SHRD has a significant positive path coefficient ($\beta = 0.61$, $t = 8.75$, $p < 0.001$) toward employee performance, confirming that organizations that strategically develop human resources tend to achieve higher levels of employee adaptability, innovation, and productivity. Meanwhile, DL also demonstrated a positive but weaker effect ($\beta = 0.21$, $t = 2.94$, $p < 0.01$), suggesting that while digital leadership contributes to performance improvement, its influence is less direct and may operate through mediating mechanisms such as engagement or digital culture.

The optional moderating effect of DL on the SHRD–EP relationship was tested but found to be statistically insignificant ($\beta = 0.07$, $t = 1.54$, $p > 0.05$). This implies that digital leadership in this context acts more as a parallel predictor rather than a moderator, functioning as a contextual enabler that supports the effectiveness of strategic HRD rather than altering its magnitude.

`Collectively, these results confirm the robustness and relevance of the proposed structural model. The combination of a high R^2 value, strong path significance, and substantial predictive relevance demonstrates that the model is both statistically sound and theoretically meaningful. The empirical evidence supports the theoretical proposition that Strategic Human Resource Development serves as the primary driver of employee performance, while Digital Leadership provides the contextual environment that amplifies and sustains this effect within smart organizations.

This structural model thus validates the notion that in digitally transforming environments such as private organizations in Makassar performance improvement depends not solely on leadership charisma or vision, but on the strategic alignment of human development initiatives with digital transformation goals.

Hypotesis Testing

Hypothesis	Path	β	t-value	p-value	Result
H1	SHRD → EP	0.61	8.75	0.000	Supported
H2	DL → EP	0.21	2.94	0.004	Supported

Table 3*. Structural Model Results and Hypothesis Testing Using PLS-SEM*

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Interpretation

H1 supported: SHRD significantly and positively affects employee performance, confirming that organizations with strong learning culture and strategic HRD alignment achieve higher adaptability and productivity. H2 supported: DL has a positive but weaker direct effect on performance, implying that leadership enhances motivation and innovation but its influence depends on supporting HRD mechanisms.

Disussion

The findings of this study provide robust empirical evidence that Strategic Human Resource Development (SHRD) plays a dominant role in enhancing Employee Performance (EP) within the context of smart organizations, while Digital Leadership (DL), though positive and significant, demonstrates a comparatively smaller influence. This pattern of results suggests that in environments undergoing digital transformation, such as private-sector organizations in Makassar City, performance improvement depends more directly on how systematically and strategically human capital is developed rather than on leadership behaviors alone. The statistical evidence from the structural model confirms that SHRD exerts the strongest effect on employee outcomes, highlighting the centrality of learning culture, strategic alignment, and managerial involvement as core mechanisms for organizational adaptability and productivity. Conversely, the effect of DL, while still significant, operates more as a contextual enabler that creates the digital climate in which strategic HRD initiatives can flourish.

His finding reinforces the theoretical arguments proposed by the Resource-Based View (RBV) and Human Capital Theory, both of which emphasize that sustainable performance derives from the organization’s ability to build and mobilize valuable, rare, inimitable, and non-substitutable resources. Human resources, when developed strategically and integrated with digital competencies, become a source of sustained competitive advantage. SHRD operationalizes this principle by aligning talent development, digital upskilling, and learning culture with long-term organizational strategy. In this sense, SHRD functions as a strategic mechanism that transforms human capital into organizational capability, allowing employees to not only adapt to digital technologies but to leverage them for innovation and value creation. This theoretical perspective also aligns with the Dynamic Capability Theory, which posits that organizations must continuously

reconfigure and renew their resources in response to environmental turbulence. Through systematic training, continuous learning, and knowledge management, SHRD provides the infrastructure for such dynamic capabilities, enabling employees to acquire, integrate, and apply digital knowledge in real time.

The role of digital leadership observed in this study complements rather than overshadows the influence of SHRD. Digital leaders are essential in setting the strategic vision, motivating employees to embrace technological change, and fostering a culture of innovation and collaboration. However, the present findings indicate that leadership influence alone is insufficient to produce direct and sustainable performance gains if not supported by well-structured HRD systems. The relatively smaller path coefficient for DL implies that leadership functions primarily as a contextual and cultural driver, establishing the conditions necessary for SHRD to be effective. In practical terms, digital leaders act as catalysts they inspire digital confidence, encourage experimentation, and reduce resistance to technological change but the measurable impact on performance becomes significant only when these behaviors are supported by strategic HRD initiatives that translate vision into capability. This interplay underscores the symbiotic relationship between structure and behavior: HRD provides the strategic foundation, while leadership infuses it with purpose, direction, and adaptability.

The results of this study are broadly consistent with prior research while extending existing knowledge in meaningful ways. Studies such as (Hussain et al., 2023)(Vong et al., 2025) demonstrated that SHRD, when aligned with organizational strategy, improves employee innovation, engagement, and performance. The present study confirms these findings within an emerging-market context, showing that the same mechanisms operate effectively even in regions like Makassar, where digital transformation is still developing. Similarly, (Garavan & Carbery, 2021) argued that HRD becomes strategic only when integrated into the broader process of digital transformation an argument that this study empirically validates.

On the other hand, the findings related to digital leadership partly corroborate the work of (Nguyen & Luu, 2023), (Shahzad et al., 2025), who found that DL influences performance mainly through mediating factors such as employee engagement, digital culture, or organizational agility. The weaker direct path observed in this study supports the notion that leadership impacts

performance indirectly through the mechanisms of motivation, empowerment, and culture-building rather than immediate behavioral outcomes. However, the result diverges from findings in studies conducted in advanced economies (Wang et al., 2025), where digital leadership was found to have a strong direct effect on employee performance. This divergence can be attributed to contextual differences: in developed economies, digital maturity and technological readiness are higher, allowing leadership behaviors to translate more directly into performance. In contrast, in emerging economies such as Indonesia, especially at the city level, HRD systems remain the more dominant factor driving performance because they provide the structured learning and digital adaptation mechanisms that leadership alone cannot substitute.

This contextual nuance represents one of the key novelties of the present research. Most prior studies have examined SHRD and DL independently, often within the context of developed economies or large multinational corporations. This study uniquely integrates both constructs into a single conceptual model and tests their combined effect in a developing digital ecosystem specifically, in private-sector organizations in Makassar City, Indonesia. The findings show that even in environments with limited digital maturity, organizations can still achieve significant performance outcomes by focusing on strategic HRD alignment, supported by leadership behaviors that promote collaboration and learning. This adds to the growing body of evidence that digital transformation is not merely a technological process but fundamentally a human resource process that requires alignment between leadership and learning systems.

The theoretical contribution of this study thus lies in demonstrating that SHRD and DL function as complementary yet asymmetrical constructs in shaping performance. SHRD provides the structural and capability-based dimension, translating strategic objectives into human competence, while DL provides the motivational and behavioral dimension, enabling cultural readiness and digital openness. Together, they form a dual framework through which smart organizations can sustain performance in rapidly changing technological environments. This model extends the literature by showing that the effectiveness of digital leadership depends on the maturity of the HRD system suggesting that leadership, when decoupled from strategic HRD, risks becoming symbolic rather than transformative.

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From a practical standpoint, the study emphasizes that organizations in developing economies must invest not only in technology but also in people. Building a strategic HRD architecture that supports digital literacy, continuous learning, and innovation should be a managerial priority. Equally, developing digital-minded leaders at all levels not merely at the top can help bridge the gap between digital initiatives and human capability. In this regard, HRD and leadership should not be viewed as separate domains but as mutually reinforcing levers of organizational transformation. When integrated, they create a coherent system that enables employees to adapt, innovate, and perform at higher levels of productivity.

Finally, this study contributes to filling the empirical gap in the literature by providing evidence from a developing-region context, an area that remains underrepresented in the global HRD and leadership discourse. The findings demonstrate that strategic HRD remains the most immediate driver of employee performance, while digital leadership serves as a contextual catalyst that sustains its effects. This distinction enriches both theory and practice by clarifying the boundary conditions under which leadership translates into performance and by highlighting that in smart organizations, human resource development not technology alone is the true foundation of competitiveness. The novelty of this research lies not only in its integrative framework but also in its contextual relevance: it illuminates how emerging digital organizations in regions like Makassar can strategically manage human resources to achieve world-class performance outcomes even amid technological and structural constraints.

CONCLUSION

This study set out to examine the extent to which Strategic Human Resource Development (SHRD) and Digital Leadership (DL) influence Employee Performance (EP) within the framework of smart organizations operating in Makassar City, Indonesia. The empirical results obtained through the application of Partial Least Squares–Structural Equation Modeling (PLS-SEM) provide compelling evidence that SHRD exerts the strongest and most direct effect on employee performance, while DL contributes positively but plays a comparatively secondary role. These findings collectively underscore that in digitally transforming organizations, the development of human capital through strategic and learning-oriented HRD systems remains the primary

determinant of performance outcomes, whereas digital leadership serves as a contextual enabler that reinforces and sustains these effects.

Theoretically, this research contributes to the growing body of knowledge on human resource management and digital transformation by integrating two previously separate streams of inquiry strategic HRD and digital leadership into a single analytical framework. The findings validate the principles of the Resource-Based View (RBV) and Human Capital Theory, confirming that strategically developed human resources function as valuable and inimitable assets that drive sustainable competitive advantage. Moreover, the results extend the logic of Dynamic Capability Theory by showing that SHRD represents a dynamic process through which organizations build the capacity to continuously adapt, learn, and innovate amid technological disruption. The evidence also clarifies that leadership effectiveness in digital contexts is contingent upon the existence of structured HRD mechanisms that translate visionary direction into concrete competencies and behavioral outcomes.

From a practical standpoint, the study provides actionable insights for managers and organizational leaders in emerging digital economies. Organizations seeking to improve performance must invest in strategic HRD architectures that integrate digital skill development, knowledge management, and continuous learning with corporate strategy. HRD should not merely be operational but function as a strategic partner that aligns workforce capability with digital transformation objectives. At the same time, leaders must cultivate digital leadership behaviors such as technological openness, data-driven decision-making, and empowerment of innovation that create the psychological and cultural conditions for transformation. When leadership vision and HRD systems are synchronized, organizations are better positioned to achieve sustainable performance gains and navigate the challenges of the smart era.

The contextual contribution of this research is equally significant. By focusing on private-sector organizations in Makassar a city emblematic of developing digital ecosystems in Southeast Asia this study expands empirical evidence beyond the traditionally studied advanced economies. It demonstrates that even in regions where digital maturity is still evolving, strategic human resource initiatives can yield meaningful performance improvements if guided by coherent

leadership and supported by learning-oriented cultures. This insight adds regional depth and contextual realism to the global discourse on digital transformation and HRD.

Despite these valuable contributions, the study acknowledges certain limitations. The data were derived from a cross-sectional design, limiting the ability to capture dynamic changes over time. Furthermore, the sample was restricted to private-sector organizations within a single city, which may constrain the generalizability of findings across industries or national contexts. Future research is encouraged to employ longitudinal approaches, incorporate mediating and moderating variables such as employee engagement, organizational learning capability, or digital readiness, and expand to comparative cross-regional studies to validate the robustness of the proposed model. In summary, this study concludes that the path to superior employee performance in smart organizations lies not solely in technological investment or charismatic leadership, but in the strategic integration of human development and digital leadership. SHRD provides the structural capability foundation, while DL supplies the motivational and visionary impetus together forming a synergistic framework that enables organizations to thrive in the digital age. For emerging economies like Indonesia, the implications are clear: sustainable digital transformation begins with strategic human transformation.

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