

JOURNAL OF TECHNOLOGY MANAGEMENT AND TECHNOPRENEURSHIP

Human Resource Digital Tools Implementation Strategy to Improve Employee Experience, Employee Engagement, and Job Satisfaction in the Smart Workspace Era

Dedi Rianto Rahadi^{a**}, Liswandi^b, M Iqbal Tawaqal^c

^{a,d} Faculty of Business, President University, Indonesia

^c Faculty of Social and Political Sciences (FISIP), Sriwijaya University, Indonesia

Abstract

This study aims to analyze the implementation of HR Digital Tools in enhancing employee experience, engagement, and job satisfaction in the smart workspace era. Using a descriptive qualitative approach with a literature study method, the research draws on scientific journals, books, and industry reports. The findings indicate that HR Digital Tools play a significant role in increasing engagement and satisfaction by supporting work efficiency, accelerating decision-making, and fostering a collaborative work culture. Nevertheless, implementation challenges persist, including organizational readiness, resistance to change, and the need for continuous training. To address these challenges, organizations must adopt a planned strategy supported by top management commitment and structured education programs. The practical implication of this study highlights that organizations should prioritize assessing digital readiness, strengthening leadership support, and establishing continuous learning initiatives before deploying advanced HR technologies. This strategic approach ensures smooth adoption and maximizes the benefits of HR digital transformation for sustainable workforce development.

Keywords: HR Digital Tools, Employee Experience, Employee Engagement, Job Satisfaction

1. Introduction

In the era of smart workspace, companies need to adapt technology in various operational aspects, including management in HR (Aji & Mala, 2024). The main focus of this field is employee experience, which encompasses all of their interactions and perceptions of the workplace, from recruitment to retention. A positive work experience can increase employee productivity, engagement, and loyalty. Therefore, companies must implement cloud-based systems and digital communication platforms, to create a more dynamic, efficient, and responsive work environment to the needs of the workforce (Susanti & Budiantoro, 2024).

* Corresponding author.

Email address: dedi1968@president.ac.id

Manufacturing industry faces major challenges due to the large number of workers and demands for high efficiency. According to Atmaja, et al. (2024) obstacles that often arise include rigid work systems, ineffective communication between management with operational employees and limited access to information related to company policies. So, to overcome this problem, many manufacturing companies have started to adopt HR Digital Tools. Therefore, this system or technology is expected to speed up the HR administration process, increase employee engagement, and create a better and more efficient work experience.

Digital transformation in HR management brings significant changes in the way companies interact with employees. Administrative processes such as attendance, performance appraisals, and communication are still done manually, now various digital-based systems have been implemented to improve efficiency and data accuracy (Joni & Husein, 2019). The systems used such as the Human Resource Information System, Applicant Tracking System, and cloud-based software are used to manage the workforce more systematically and based on data. So that companies can monitor employee performance and productivity in real-time, and improve the company's ability to make decisions (Rahmi et al., 2024). So that the use of HR Digital Tools not only simplifies the administrative process but also reduces the possibility of human error in data management.

In addition to increasing administrative efficiency, HR digitalization has a role for create environment more supportive for employees. Many companies are starting to use employee wellness apps, digital training platforms, and cloud-based performance management systems to ensure employees feel more valued and have a clear development path career. With this technology, employees can more easily access information related to company policies, apply for leave or overtime digitally, provide feedback to management, and take online training (Fanida & Paulina, 2021). This digital-based system also makes it easier for employees to access welfare benefits, such as health insurance or work-life balance programs. The implementation of HR Digital Tools offers various advantages, but there are still a number of challenges that must be faced, especially in the manufacturing industry. The digital divide among employees, resistance to change, and limited infrastructure are obstacles in this transformation process (Amelliya et al., 2024). Some employees are still not familiar with new technologies or find it difficult to use them. Therefore, companies need to design the right implementation strategy, including training programs for employees and a more gradual approach to implementing digital technology. It is important for companies to ensure that the entire workforce, including those with technological limitations, can easily access and use these HR Digital Tools.

While the strategic importance of HR digital tools has been widely discussed in the literature, there is a notable theoretical gap regarding their impact on employee experience, engagement, and job satisfaction within manufacturing industries. The majority of studies on HR digitalization adopt frameworks such as the Technology Acceptance Model (TAM) (Davis, 1989) and the Unified Theory of Acceptance and Use of Technology (UTAUT) (Venkatesh et al., 2003) to explain employees' acceptance of HR technologies. However, these models primarily focus on individual adoption behaviors rather than organizational-level implications for employee engagement and experience in a digitalized workplace.

Additionally, the Job Demands–Resources (JD-R) theory (Bakker & Demerouti, 2017) has been extensively used to link digital transformation with employee well-being and performance. Yet, prior research often examines digital tools in service-oriented or knowledge-intensive sectors, where job characteristics and technology integration differ significantly from manufacturing environments (Strohmeier, 2020; Bondarouk & Brewster, 2016). Manufacturing organizations operate under distinct constraints, such as highly structured workflows, limited digital literacy among shop-floor workers, and strong dependence on physical processes, making the dynamics of HR digitalization fundamentally different from those in other sectors.

Moreover, most existing studies analyze individual HR practices in isolation, such as e-recruitment (Parry & Wilson, 2009) or digital learning (Stone et al., 2015), rather than evaluating the holistic implementation of integrated HR digital ecosystems that could collectively influence employee experience, engagement, and job satisfaction (Marler & Fisher, 2019). This fragmented approach leaves an unresolved question: How can HR digital tools strategically enhance human-centered outcomes in manufacturing, where technology adoption has traditionally lagged behind other sectors?

Furthermore, the interaction between HR digitalization and Industry 4.0 technologies has been underexplored from a behavioral and psychological perspective (Bresciani et al., 2021). While digital transformation in manufacturing often emphasizes automation, efficiency, and cost optimization, there is limited evidence on how

digital HR tools can improve employee engagement and satisfaction during this transition, which is critical to sustaining organizational performance and adaptability.

This gap justifies the need for a systematic literature review that integrates technology adoption theories (TAM, UTAUT) and employee well-being frameworks (JD-R) to develop a comprehensive understanding of HR digital tools' impact on employee-centered outcomes in manufacturing smart workspaces

Employee experience does not only depend on efficiency in administrative aspects, but how companies build an innovative, inclusive, and technology-based work culture. According to Renhoran et al. (2024) Employees who feel supported by a flexible and digital-based work system tend to be more satisfied and more productive at work. Flexible work systems, such as remote or hybrid, are attractive to employees who want a personal life, work and work balance. Implementation With this technology, companies can create a productive environment. Employees can work more effectively.

In line with the description in the background section, the focus of this research is to identify HR Digital Tools implementation strategies in improving employee experience, employee engagement, and job satisfaction in the manufacturing industry. By using a qualitative approach, to explore various digital strategies implemented by companies to improve employee engagement, experience, and satisfaction. The results of the study can provide insight into the challenges and opportunities in implementing digital technology in HR management in the manufacturing industry. In addition, this study will also provide recommendations that can be used by other companies to utilize HR Digital Tools to improve work experience. The manufacturing industry is the object of research, due to the large number of workers and the frequent use of technology in workLiterature Review

2. Literature Review

HR Digital Tools

Digitalization in HR transforming companies in managing the workforce. HR Digital Tools include various technology-based systems designed to support employee administration and management more effectively and efficiently (Trisnawati, 2024). Systems such as the Human Resource Information System, Applicant Tracking System, Learning Management System, and Performance Management Software have been widely used to improve employee experience, productivity, and managerial effectiveness (Nikmat et al., 2023).

Resource-Based View (RBV) theory by Barney (1991), competitive advantage of the company was built through the utilization of resources that are valuable, rare, difficult to imitate, and irreplaceable. According to Gusnita (2024) HR Digital Tools as one of the resources that help companies improve the effectiveness of human resource management. In addition, Davis (1989) Technology Acceptance Model (TAM) theory, emphasizes that the acceptance of technology in organizations depends on assessment of convenience and benefits felt by its users. In the manufacturing industry, the implementation of HR Digital Tools helps overcome various challenges in workforce management, such as large-scale employee administration, complex work schedule management, and real-time monitoring of employee performance and engagement. The use of digital systems also has an impact on companies to analyze workforce data, so that HR-based decision making can be done more accurately and strategically (Suwandita et al., 2023).

The integration of HR Digital Tools also provides companies with the flexibility to design policies that are adaptive to the needs of today's workforce, such as hybrid work systems, digital welfare management, and data-based reward systems. With the comprehensive use of technology, HR no longer only plays an administrative role, but becomes a strategic partner in driving the growth of organizations based on superior and highly competitive HR.

HR Digital Tools also play a role in forming a more collaborative, transparent, and adaptive work culture. With features such as open feedback systems, real-time communication, and digital-based training, employees become more involved in organizational processes and respond more quickly to change. Thus creating an environment that supports innovation and accelerates the flow of information at all levels of the organization. This technology-based work culture is an important foundation in creating an agile organization, where HR is not only a policy implementer, but also a strategic partner in setting the direction and growth of the company. This cultural transformation is what makes HR digitalization not just a technical solution, but an integral part of a long-term business strategy.

Employee Experience

Employee experience is an important factor that influences motivation, engagement, and job satisfaction in an organization. The Job Characteristics Model theory explains that positive work experiences can increase employee intrinsic motivation. This model consists of five job dimensions that influence motivation: skill variety, task identity, task significance, autonomy, and feedback. These dimensions help create a satisfying and productive work experience (Dewi et al., 2019). Therefore, creating a positive work experience is very important for companies.

HR Digital Tools Can Creating a better employee experience by providing easy access to information. Employees can access company policies, work schedules, and apply for leave or overtime through a digital platform. This simplifies administrative work and increases efficiency in daily tasks. In addition, a digital-based system also increases convenience for employees in interacting with the company. Therefore, this supports the creation of a more positive work experience.

This HR technology also supports employee development through digital-based systems, such as the Learning Management System (LMS). With LMS, employees can take online training without disrupting their main work (Azizah & Maskhulin, 2025). The use of digital-based feedback and performance evaluation systems strengthens transparency between management and employees. This makes it easier to assess data-based performance so that it is more accurate. Thus, open communication can improve the relationship between employees and the company (Pulakos et al., 2019).

Positive employee experiences are also formed through a sense of appreciation and recognition for the contributions made. Through digital platforms, companies can convey appreciation more quickly and openly, either in the form of achievement announcements, performance awards, or daily motivation reinforcement. This practice strengthens employees' emotional involvement in their work and increases the perception that they are an important part of the organization. Therefore, the work experience obtained will be more meaningful and support workforce retention.

The quality of employee work experience is also determined by the extent to which they feel they have an active role in managing and planning their careers. By utilizing HR Digital Tools, employees are given direct access to review achievements, explore training opportunities, and design career development according to their interests and competencies. The availability of features that support this independence creates a sense of responsibility and ownership of the self-development process. Thus, employee experience becomes more meaningful because employees not only carry out their duties, but also help manage the direction of their professional growth in the company.

Employee Engagement

Employee engagement refers to the level of emotional and cognitive involvement of employees in their work and the organization where they work (Hasibuan, 2019). Engaged employees not only do their work more diligently but also feel more connected to the company's goals. Therefore, employees are highly motivated to make maximum contributions, which will increase productivity and loyalty to the company. In the long term, high engagement encourages innovation and collaboration between teams. Therefore, creating an environment that supports employee engagement is very important for the company.

Social Exchange Theory, employee engagement increases when they feel they receive equitable benefits from the organization. These benefits can be in the form of awards, recognition, and clarity of communication. With increased engagement, employees feel valued and emotionally connected to the company. HR Digital Tools play an important role in providing a platform for providing direct rewards and feedback (Sari et al., 2023). This platform makes it easier for companies to communicate appreciation more efficiently so that it can strengthen the relationship between employees and the company.

The use of digital technology in HR plays a major role in increasing employee engagement through more open internal communication (Yanuary, 2025). Platforms such as Microsoft Teams or Slack will keep employees connected with their teams and management, even if they are in different locations. Hybrid or remote work systems give employees more freedom in determining when and where to work. The implementation of this system further supports employee engagement and increases work satisfaction and effectiveness.

HR Digital Tools provide various employee involvement features in daily decision making. For example, the pulse survey system and engagement analytics provide space for employees to convey aspirations, input, and concerns in real-time. This data can then be processed by HR to design interventions that are relevant and responsive to employee needs. With consistent two-way feedback, companies can create more inclusive and adaptive relationships, where employee voices are not only heard, but will be the basis for improving work systems.

The use of digital training platforms and gamification in skills development also increases employee engagement. The learning process is designed interactively and tailored to individual preferences, employees will feel more appreciated and motivated to develop. A flexible training system gives employees control in shaping their career path, resulting in an increased sense of ownership of their work. Thus, employee engagement does not only grow from social relationships in the workplace, but from meaningful professional experiences and personalization offered through digital technology.

Job Satisfaction

Job Satisfaction, positive or negative feelings felt by employees towards their work. This is influenced by various factors such as compensation, work environment, and company policies. Herzberg's Two-Factor Theory (1959), factors that influence job satisfaction into two categories, namely motivational factors, which include recognition, achievement, and challenging work, and hygiene factors, which include compensation, company policies, and working conditions. Both play an important role in shaping overall job satisfaction.

Implementation of HR Digital Tools can make a significant contribution to increasing employee job satisfaction. Automation of administrative processes, for example, reduces the workload and HR focuses more on strategies that are oriented towards employee welfare (Kuswinarno & Nazarudin, 2024). Thus, HR can be more effective in supporting employees, creating a more conducive environment and supporting the achievement of organizational goals.

With the existence of digital well-being applications, companies can monitor the physical and mental health of employees more effectively (Hakim et al., 2022). The use of digital-based employee feedback and survey platforms also supports the creation of better engagement in decision-making. Employees feel more heard and appreciated, which contributes to increased job satisfaction. Thus, increasing the sense of engagement and job satisfaction that will make employees contribute to performance and reduce employee retention.

The use of digital wellbeing applications allows companies to monitor the physical and mental health of employees in a more structured and sustainable manner (Hakim et al., 2022). Digital platforms such as job satisfaction surveys and feedback systems also encourage more active involvement in the decision-making process. Employees feel more heard and valued because their views and suggestions have space in the managerial process. This increases the sense of belonging to the organization and strengthens loyalty.

HR Digital Tools give employees a greater sense of control and autonomy in managing their work and personal information. When employees can easily access pay slips, attendance data, leave requests, and training digitally, they feel more empowered and involved in managing their own careers. Thus, the integration of technology in HR management improves operational efficiency and creates a work environment that supports overall well-being. All of these aspects contribute holistically to higher job satisfaction and have a positive impact on productivity, work climate, and company retention

3. Methodology

This research uses a literature review, presenting the results of the researcher's findings on several journal articles found. Literature studies were conducted by collecting, reviewing, and analyzing various relevant academic sources, such as scientific journals, books, research reports, and publications that discuss the implementation of HR Digital Tools in improving employee experience, employee engagement, and job satisfaction in the manufacturing industry. Sugiyono (2017) stated that qualitative methods with analytical descriptive design were carried out in depth through detailed document and reporting. This study was conducted with the awareness that science continues to develop over time.

This study used data sourced from secondary data. Data was obtained from various credible sources, such as

scientific journals published in reputable academic databases, including Scopus and Google Scholar.

By using this approach, the study ensures that the findings are grounded in credible academic sources and reflect the most recent developments in HR digitalization. For example, the review examines peer-reviewed articles published between 2018 and 2025 from databases such as Scopus, Web of Science, and Google Scholar. The inclusion criteria might consist of studies that specifically discuss HR digital tools like AI-based recruitment systems, HR self-service platforms, or performance management applications and their influence on employee-related outcomes in smart workplace settings.

To reduce selection bias, two independent reviewers screened the articles at both the title/abstract and full-text levels, with any disagreements resolved through discussion or a third-party reviewer. Inter-rater reliability was measured using Cohen's Kappa to ensure consistency in article selection. To avoid interpretation bias, data extraction followed a predefined coding framework that focused on key themes such as digital recruitment systems, AI-driven HR analytics, and digital performance management tools. Additionally, the review included only peer-reviewed journal articles published between 2018 and 2025 to ensure academic rigor and up-to-date insights.

4. Results And Discussion

This study highlights that HR departments must evolve into digital transformation champions. By aligning HR digital tools with employee needs and organizational goals, businesses can create a resilient, satisfied, and engaged workforce—essential for thriving in the smart workspace era.

Implementation of HR Digital Tools in Improving Employee Experience

The implementation of Human Resource (HR) digital tools has become a strategic imperative for organizations seeking to enhance employee experience (EX). Digital HR tools ranging from self-service portals, chatbots, people analytics, employee experience platforms, to digital learning systems are designed to create a more seamless, personalized, and efficient work environment. Recent studies have emphasized that digital transformation in HR is no longer limited to automation of administrative tasks but extends to shaping how employees perceive and interact with their organization (Ruiz et al., 2024; Venugopal & Thulasiraman, 2024).

The Role of HR Digital Tools in Employee Experience

Employee experience refers to the holistic perception employees have regarding their interactions with an organization throughout their employment journey. HR digital tools play a crucial role in delivering an employee-centric environment through accessibility, transparency, and real-time support. According to Ruiz et al. (2024), digital HR strategy is a multidimensional construct that integrates technology, processes, and data to generate value for employees and organizations. As workplace dynamics evolve and remote or hybrid work models become prevalent, the demand for digital HR solutions that improve engagement and satisfaction has intensified (Gallup, 2025).

Mechanisms Enhancing Employee Experience through Digital HR

Several mechanisms explain how digital HR tools contribute to improved employee experience:

✓ Self-Service HR Portals and Mobile Platforms

Self-service portals allow employees to manage leave requests, payroll details, and benefits without depending on HR intermediaries. This autonomy enhances convenience and reduces administrative friction, fostering a sense of empowerment and satisfaction. Studies indicate that well-designed employee self-service (ESS) systems significantly improve process efficiency and employee contentment (Bindra, 2025).

✓ AI-Powered Chatbots and Virtual Assistants

Chatbots and AI-driven virtual assistants provide instant responses to HR queries, improving service responsiveness. Research demonstrates that AI adoption in HR positively influences employee experience and job performance, with trust serving as a critical mediator (Humanities & Social Sciences Communications, 2024). Transparent communication and reliability of AI systems are essential to strengthening this trust

(Soulami et al., 2024).

✓ People Analytics and Pulse Surveys

Data-driven insights derived from analytics and frequent pulse surveys allow organizations to identify pain points in the employee journey and develop targeted interventions. Analytics tools enable predictive assessments of engagement trends, helping HR teams proactively address dissatisfaction and improve workplace well-being (Soulami et al., 2024).

The Influence of HR Digital Tools on Employee Engagement

The rapid digital transformation in human resource management (HRM) has introduced a wide range of digital tools aimed at enhancing operational efficiency and employee experience. These tools—such as self-service portals, artificial intelligence (AI)-driven chatbots, learning management systems, and people analytics platforms are not only reshaping traditional HR processes but also influencing employee engagement levels (Ruiz et al., 2024). Engagement, defined as the degree of enthusiasm and commitment an employee feels toward their work and organization, is a critical determinant of organizational success (Gallup, 2025). The implementation of HR digital tools is increasingly recognized as a strategic enabler of engagement through personalization, transparency, and improved communication.

The Influence of HR Digital Tools on Job Satisfaction

The digital transformation of human resource management (HRM) has profoundly changed the way organizations interact with employees, manage processes, and shape workplace experiences. Digital HR tools such as employee self-service (ESS) platforms, HR information systems (HRIS), AI-powered chatbots, and people analytics have become integral in enhancing organizational efficiency and improving employee-related outcomes, including job satisfaction (Ruiz et al., 2024). Job satisfaction, defined as the positive emotional response toward one's job and workplace conditions, is essential for employee retention, performance, and overall organizational success (Bindra, 2025). As organizations increasingly adopt digital HR technologies, understanding their impact on job satisfaction is critical.

5. Conclusion

This study indicates that the implementation of HR Digital Tools plays an important role in improving employee experience, employee engagement, and job satisfaction in the smart workspace era. The adoption of HR digital tools has emerged as a critical factor in shaping employee job satisfaction in the modern workplace. These tools, including self-service portals, AI-driven chatbots, and people analytics, offer significant benefits by enhancing transparency, responsiveness, and accessibility in HR processes. By granting employees greater autonomy and providing personalized experiences, digital HR systems foster a sense of empowerment and organizational support, which are essential for job satisfaction (Bindra, 2025; Ruiz et al., 2024). Empirical evidence supports the positive influence of these technologies, demonstrating improvements in employee satisfaction and overall workplace experience when digital solutions are effectively implemented (Venugopal & Thulasiraman, 2024).

However, while digital HR solutions provide numerous advantages, their successful integration depends on addressing critical challenges, such as ensuring data privacy, reducing algorithmic bias, and maintaining ethical governance. Trust in digital systems plays a central role in determining whether employees perceive these tools as beneficial or intrusive (Soulami et al., 2024). Therefore, organizations must strike a balance between leveraging technology for efficiency and preserving a human-centered approach to HR management.

In conclusion, HR digital tools represent a transformative force in promoting job satisfaction, but their effectiveness is contingent upon thoughtful implementation, user readiness, and ethical considerations. Future research should continue to explore the evolving relationship between HR technology and employee well-being, particularly within diverse cultural, industrial, and technological contexts. This will enable organizations to

maximize the potential of digital HR innovations while ensuring sustainable employee satisfaction and engagement.

The findings of this study form the basis for formulating several recommendations to increase the effectiveness of HR Digital Tools implementation in the manufacturing industry:

Improving Digital HR Infrastructure

Manufacturing companies need to adopt cloud-based *HRIS*, such as *SAP SuccessFactors* or *Workday*, to increase efficiency and employee access to personnel data independently. In addition, the use of internal communication platforms such as *Microsoft Teams* or *Slack* can speed up coordination between divisions, especially for employees with a shift system. This digitization increases transparency, reduces scheduling errors, and supports a more efficient work experience.

Improving Employee Digital Literacy

Companies need to provide digital training so that employees can optimally utilize HR Digital Tools. Learning platforms such as *LinkedIn Learning* or *Coursera* provide flexibility for employees to learn. In addition, internal workshops can be provided to train the use of HR applications, such as digital attendance and performance management. Thus, employees are better prepared to adapt to the digital system in the company..

Developing a Digital-Based Feedback System

HR Digital Tools play a vital role in improving employee experience and engagement. Companies need to develop a digital feedback system so that employees can express their opinions more openly. Implementing AI-based engagement surveys such as *Officevibe* will make it easier for HR to collect real-time data on employee satisfaction. With a digital system, HR can respond to employee input faster and based on data, which has an impact on increasing employee satisfaction and loyalty.

Suggestions for Future Research

Although numerous studies have examined the impact of HR digital tools on job satisfaction, there are several areas that remain underexplored and present opportunities for future research. First, most existing research has relied on cross-sectional designs, which provide only a snapshot of the relationship between HR digital tools and job satisfaction. To gain a deeper understanding of how these tools affect employees over time, future studies should adopt longitudinal approaches. Such studies would help determine whether the positive effects of digital HR adoption on job satisfaction are sustainable in the long term (Ruiz et al., 2024).

Second, there is a need to explore the role of cultural and industry-specific factors in shaping the impact of HR digital tools. Much of the current evidence is derived from research in the service sector and in specific geographical regions. Future investigations could benefit from examining whether cultural differences, organizational size, or industry context influence the strength or direction of this relationship (Venugopal & Thulasiraman, 2024).

Third, employee digital literacy and technology readiness remain critical factors that have not been extensively studied. The successful implementation of digital HR systems often depends on employees' ability to use and adapt to these technologies. Therefore, future research should investigate whether digital competence moderates the effect of HR digital tools on job satisfaction and how organizations can design effective digital training programs to enhance adoption (Soulami et al., 2024).

References

- Aji, GS, & Mala, IK (2024). Improving HR Quality to Achieve Company Competitive Advantage in the Digital Era: Trends, Innovations, and Challenges. *Journal of Management and Creative Economy*, 2(3), 1-17.
- Amelliya, R.P., Kusairi, R.A., & Ismail, I. (2024). Innovative Strategies in Job Analysis Training: Overcoming Challenges, Maximizing Resources, and Adapting to Global Trends in the Digital Age. *Journal of Management Research*, 2(4), 260–269.
- Atmaja, HE, Permana, J., Batubara, ZK, Ardiani, W., & Parlindungan, A. (2024). Digital Transformation in Human Resource Management: Challenges and Opportunities (Case Study on Manufacturing Companies in Indonesia). *Eduonomika Scientific Journal*, 8(2), ISSN: 2231-7996 e-ISSN: 2289-8158 Vol 13 No 1 2025

1-15.

- Azizah, N., & Maskhulin, PIA (2025). Improving Employee Competence: Optimizing Learning Management System at PT. Japfa Comfeed Indonesia Tbk. *Journal of Revolutionary Economics*, 8(1), 14–17.
- Bakker, A. B., & Demerouti, E. (2017). Job demands–resources theory: Taking stock and looking forward. *Journal of Occupational Health Psychology*, 22(3), 273–285.
- Bindra, S. (2025). Traditional to digital: Human resource management transformation in an Indian public sector bank. *Journal of Work-Applied Management*. <https://doi.org/10.1108/JWAM-02-2025-0019>
- Bondarouk, T., & Brewster, C. (2016). Conceptualizing the future of HRM and technology research. *The International Journal of Human Resource Management*, 27(21), 2652–2671.
- Bresciani, S., Ferraris, A., & Del Giudice, M. (2021). The management of organizational ambidexterity through alliances in a new context of analysis: Internet of Things (IoT) smart city projects. *Technological Forecasting and Social Change*, 166, 120607.
- Davis, F. D. (1989). Perceived usefulness, perceived ease of use, and user acceptance of information technology. *MIS Quarterly*, 13(3), 319–340.
- Dewi, NK, Hermawan, A., & Affandi, MJ (2019). The Influence of Job Characteristics and Leader Member Exchange on Work Engagement at PT. Elang Perdana Tyre Industry. *Journal of Management and Business Applications*, 5(3), 430–442.
- Fanida, HP, & Paulina. (2021). The Influence of Information Quality, System Quality, and Usefulness on Human Resource Performance through the Human Resource Information System (HRIS) Study at PT. Bank Ganesha Tbk. *Journal of Economics, Management and Banking*, 7(3), 1-11.
- Gallup. (2025). *State of the Global Workplace 2025*. Gallup Workplace Report.
- Gusnita, E. (2024). Innovative Strategies in Human Resource Management: Optimizing Employee Performance and Welfare in the Digital Era. *Journal of Economics and Business Development*, 8(2), 240-251.
- Hakim, M., Hidayat, H., & Fanani, MR (2022). The Role of HRIS Implementation and Job Satisfaction on Employee Performance at PT. Pisma Putra Textile. *Journal of Management*, 13(1), 32–43.
- Hasibuan. (2019). *Human Resource Management*. Bumi Aksara.
- Jonni, M., & Husein, SM (2019). Design of website-based Human Resource Information System (HRIS) application at PT. Super Tata Raya Steel. *Jurnal Teknik*, 5(2), 1-17.
- Kuswinarno, M., & Nazarudin, MA (2024). Digital Transformation in HR Management: Challenges and Opportunities in the Industrial Era 5.0. *Jurnal Media Akademik*, 2(11), 1-14.
- Marler, J. H., & Fisher, S. L. (2019). An evidence-based review of e-HRM and strategic human resource management. *Human Resource Management Review*, 29(1), 1–18.
- Nikmah, W., Mukarromah, A., Widyansyah, D., & Anshori, MI (2023). Use of Technology in Human Resource Development. *Journal of Research and Scientific Work*, 1(5), 366–386.
- Parry, E., & Wilson, H. (2009). Factors influencing the adoption of online recruitment. *Personnel Review*, 38(6), 655–673.
- Rahmi, R., Wahyuni, R., Bakar, A., & Firdaus. (2024). Implementation of Cloud-Based Manufacturing Information System to Improve Industrial Performance and Responsiveness. *Journal of Engineering and Technology*, 3(1), 20–26.
- Renhoran, MI, Roswah, HF, Sundari, S., & Pakpahan, M. (2024). Strategy to Increase Employee Engagement through Performance Management in Modern Organizations. *Jurnal Cakrawala Akademika*, 1(3), 1-17.
- Ruiz, M., Rios, A., Quesada, M., & Ariza-Montes, A. (2024). Digital HR strategy: Conceptualization and empirical analysis. *Information & Management*
- Sari, SM, Pratama, AS, Hj, MF, Badwi, M., & Anshori, MI (2023). The Influence of Artificial Intelligence, Big Data, and Automation on HR Performance in the Digital Era. *Journal of Management Science Publication*, 2(4), 108–123.
- Soulami, M., et al. (2024). Exploring how AI adoption in the workplace affects employees' well-being: A bibliometric review and contextual analysis. *Frontiers in Artificial Intelligence*. <https://doi.org/10.3389/frai.2024.1473872>
- Stone, D. L., Deadrick, D. L., Lukaszewski, K. M., & Johnson, R. (2015). The influence of technology on the future of human resource management. *Human Resource Management Review*, 25(2), 216–231.
- Strohmeier, S. (2020). Digital human resource management: A conceptual clarification. *German Journal of Human Resource Management*, 34(3), 345–365.
- Sugiyono. (2017). *Research Methods: Quantitative, Qualitative and R&D*. Bandung: Alfabeta
- Susanti, D., & Budiantoro, A. (2024). Analysis of the Influence of Employee Perception, Satisfaction, and Engagement on the Effectiveness of the Implementation of the Human Resources Information System at PT. Kawasan Berikat Nusantara. *Scientific Journal of Management and Accounting*, 1(3), 1–19.
- Suwandita, AD, Pijasari, V., Prasetyowati, AED, & Anshori, MI (2023). Human Resources Data Analysis for Decision Making: The Use of Data Analytics and Artificial Intelligence (AI) in Forecasting Human Resources Trends, Talent Management, and Employee Retention. *Journal of Creative Management*, 1(4), 97–111.
- Trisnawati, AP (2024). The Influence of Human Resource Information System on Employee Performance with Employee Engagement as a Moderating Variable. *Scientific Journal of Management*, 12(1), 169-183.
- Venkatesh, V., Morris, M. G., Davis, G. B., & Davis, F. D. (2003). User acceptance of information technology: Toward a unified view. *MIS Quarterly*, 27(3), 425–478.
- Venugopal, C., & Thulasiraman, P. (2024). Investigating the effect of AI adoption on employee experience and performance: Evidence from Indian service sector. *Cogent Business & Management*. <https://doi.org/10.1080/23311975.2024.2432550>
- Yanuarty, R. (2025). The Role of Strategic HR Analytics in Improving the Effectiveness of Human Resource Management. *Journal of Economics and Business*, 5(1), 41–49.