

Implementation of an HRIS (Human Resource Information System) as a Digitalization Strategy to Improve Human Resource Efficiency: A Case Study at PT. Tenggara Multi Media Gemilang

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Abstract

This research aims to analyze the implementation of the Human Resource Information System (HRIS) as a digitalization strategy in improving the efficiency of human resources at PT. Tenggara Multi Media Gemilang. This case study was conducted with a qualitative approach through observation, interviews, and document analysis to understand the conditions of HR management before and after the implementation of HRIS. The results of the study test whether the implementation of HRIS is able to automate human resource (HR) administrative processes such as employee data management, attendance, payroll, and reporting, thereby reducing manual workload, minimizing data errors, and accelerating the decision-making process at the managerial level. In addition, centralized and real-time integration of human resource data through the Human Resource Information System (HRIS) can increase transparency, information accuracy, and coordination between divisions at PT. Tenggara Multi Media Gemilang. Although there are still challenges in the form of user adaptation and the need to improve human resource (HR) competencies. Thus, the implementation of HRIS at PT. Tenggara Multi Media Gemilang is expected to help its effectiveness as a digitalization strategy that supports increasing efficiency, productivity, and quality of human resource (HR) management.

INTRODUCTION

The development of information technology has penetrated into various industrial fields, including human resource management (HR). Human resources are an important asset in an organization that has a strategic role to achieve corporate goals. However, effective and efficient human resource management (HR) is often a challenge, especially in companies that continue to grow where administrative complexity and data needs increase rapidly (Agustian et al., 2023; Ochieng, 2023; Sharma, 2023). This encourages companies to adopt technology-based information systems to support better human resource (HR) management processes. One form of information technology adoption in HR management is the implementation of the Human Resource Information System (HRIS) (Adebayo et al., 2024; Mandulangi, 2025).

Human Resource Information System (HRIS) is an integrated information system specifically designed to automate personnel related activities such as employee data administration, recruitment processes, attendance, payroll, performance appraisal, to training

and development (Alzoraiki et al., 2024; Lina, 2019; Masum et al., 2018; Midiwo, 2016). Implementation of Human Resource Information System (HRIS). Supporting the transformation of manual administrative activities into digital so as to accelerate information access, improve data accuracy, and reduce administrative workload. Thus, HRIS is not just software, but also a digitalization strategy that contributes to increasing process efficiency and supporting better decision-making by management (Kavanagh, Thite, & Johnson, 2015).

In today's digital era, the demands for effectiveness and efficiency in HR management are getting higher. Fierce business competition requires companies to focus not only on product or service output, but also on the productivity and quality of HR performance (Kaufman, 2015; Prajogo & Oke, 2016). When HR processes are still carried out conventionally, various obstacles often arise such as data duplication, administrative completion times, and high risk of errors. Meanwhile, digital transformation through HRIS offers solutions that can increase productivity, process openness, and information accuracy (Siddique et al., 2025; Tayade, 2025; Yancis, 2025).

PT. Tenggara Multi Media Gemilang as a company engaged in media and digital solutions faces similar challenges in the HR management process. With the increasing number of employees and dynamic operational activities, the Human Resource process becomes very complex if managed traditionally (Burke & Morley, 2023; Pane et al., 2022). The manual system that has been used tends to be time-consuming, requires large resources, and is prone to data input errors. This has an impact on the quality of internal services and the accuracy of the personnel administration process (Pane et al., 2022; Setiawati et al., 2026; Singh, 2016).

The implementation of the Human Resource Information System (HRIS) at PT. Tenggara Multi Media Gemilang is seen as one of the important digitalization strategies to answer these challenges. The Human Resource Information System (HRIS) can unite various Human Resource functions into one integrated platform to facilitate access to real-time data, accelerate response to employee needs, and provide accurate reports for strategic planning. In addition, digitizing Human Resource processes also helps companies in implementing an objective performance evaluation system and supporting sustainable employee competency development programs.

Previous research has shown that the implementation of the Human Resource Information System (HRIS) has a significant effect on operational efficiency and organizational performance. Raziq & Maulabakhsh (2015) stated that HRIS makes a significant contribution in speeding up administrative processes and increasing employee job satisfaction because of the transparent and easily accessible system. Meanwhile, Al Qudah, Zaqalat, & Al Esmael (2015) found that the adoption of the Human Resource Information System (HRIS) is positively related to the effectiveness of Human Resource processes including the reduction of bureaucracy and operational costs.

Thus, the implementation of the Human Resource Information System (HRIS) is not without challenges. Factors such as resistance to change from employees, lack of understanding of technology, and limited internal IT resources are often the main obstacles in the adoption process. Therefore, it is important for companies like PT. Tenggara Multi Media Gemilang to not only implement the system, but also develop supporting strategies such as training, internal communication, and a clear digitalization roadmap.

Based on this description, this research is important to evaluate the extent to which the Human Resource Information System (HRIS) is able to improve the efficiency of human resource management at PT. Tenggara Multi Media Gemilang. This research is expected to provide a real picture of the impact of digitizing Human Resource processes on organizational performance and become a reference for other companies in designing Human Resources (HR) digitization strategies. Thus, this study raises the issue of the implementation of the Human Resource Information System (HRIS), evaluation of its effectiveness, and the identification of supporting and inhibiting factors in the context of the company PT. Tenggara Multi Media Gemilang.

RESEARCH METHOD

Approaches and Types of Research

The research method functions as a guideline in conducting research that will be carried out as a basic reference. The research method will be a tool for researchers in analyzing existing data. Thus, it can find a conclusion from the research. In accordance with the title of this research, the researcher uses a qualitative research method. In qualitative language, it means reviewing based on quality. Banister et al describe qualitative research methods, as quoted by Haris Herdiansyah, that: "The essence of qualitative research is as a method to capture and provide an overview of a phenomenon, as a method to explore phenomena, and as a method to provide explanations of a phenomenon being studied".

By using qualitative methods, the data obtained will be more complete, more in-depth, credible, and meaningful. Because of the method, qualitative can explore data that is a work process, the development of an activity, a broad and in-depth description, feelings, norms, mental attitudes, beliefs, work ethic and culture adopted by individuals and groups of people in the work environment. Thus, the purpose of the research can be achieved.

Meanwhile, with the quantitative method, only a few variables can be studied. Because the quantitative method can only explore facts that are empirical and measurable. Facts that are not visible to the senses will be difficult to express, so problems will not be answered with quantitative methods.

The type of research used is qualitative with the Grounded Theory approach. According to Jhon W. Creswell, Grounded Theory qualitative research is as follows: "Grounded Theory qualitative research is a research strategy in which the researcher "produces" a general and abstract theory of a certain process, action, or interaction that comes from the production and production of the participants. This design requires the researcher to undergo a number of stages of data collection and filtering of categories on the information obtained. This design has two main characteristics, namely: constant comparison between data and emerging categories and theoretical sampling of different groups to maximize similarities and differences in information."

Research Population

The population is the research subject as a whole, namely all units of analysis that are the target of the research. In line with Arikunto's definition, that population is the entire object of research or the total group of subjects; both humans, values, symptoms, and phenomena that are the source of the research. The population in this study is all employees of PT. Tenggara Multi Media Gemilang. The total number of the population taken as respondents is 40 people, there are 22 men and 18 women.

Data Collection Methods

Data collection techniques are the most strategic step in research, because the main purpose of research is to obtain data. Without knowing the data collection technique, the researcher will not get data that meets the set production criteria. In this study, the researcher uses several data collection techniques, namely:

1. Interview Method

Burhan Bungin argues that, "An interview is a conversation with a specific intention, which is carried out by two parties, namely the interviewer and the source or informant." Interview is a method used by researchers in data mining, by asking directly to the informant or respondent. Interviews can be conducted by asking spontaneous questions or by using interview guidelines. Then the researcher records or records the results of the interview.

2. Observation Method

Observation is data collection by making observations, and participating directly in the research object, in order to obtain the necessary data. In this case, the researcher uses a moderate participatory observation technique, where the researcher in collecting participatory observation data in several activities will follow it, but not all.

3. Documentation Method

Documentation is a data collection technique obtained through documents and tends to be secondary data. The use of the documentation method is used by researchers to find data about things or variables in the form of notes, transcripts, books, newspapers, scientific magazines, inscriptions, meeting minutes, langger, agendas and so on.

Data Analysis Techniques

Data analysis in qualitative research is carried out through logical and systematic data management. Qualitative research data analysis is usually carried out after all data has been collected. Both data are explored through interviews, observations, and documentation. There are several techniques in qualitative research data analysis. According to Miles and Huberman quoted by Sugiyono, there are three techniques in qualitative data analysis, namely data reduction, data presentation and conclusion.

4. Data Reduction

From data collection techniques (interviews, observations and documentation) have found a lot of data, complex and mixed, so the researcher reduces the data. In reducing the data, the researcher selects and sorts the data that is considered relevant to the research and to be presented.

5. Data Presentation

The data is presented systematically, aiming to make it easier to follow the chronology of the flow of events, so that the events that actually occurred behind the events are revealed. Systematic data presentation techniques are very helpful for research in drawing conclusions.

6. Conclusion

When the researcher collects data, records and records the informant's answers, the information obtained is examined, either from different sources or by using different techniques or triangulation processes. Then the meaning is sought based on theoretical studies used in a theoretical way used by selecting, sorting and analyzing data.

RESULTS AND DISCUSSION

Respondent Characteristics

Characteristics of respondents are criteria, attributes, or special characteristics (demographic, psychographic, socioeconomic) of the research subjects that are chosen to provide accurate information. Of the 40 respondents, the characteristics obtained are as follows:

a. JSex:

In the company, there are 22 male respondents (55%) and 18 female (45%) female respondents.

b. Age:

In the company, there are 15 respondents aged 20–30 years (37.5%), respondents aged 31–40 years (42.5%) and 8 respondents aged 40 years (20%).

c. Working Period:

In the company, there are 10 respondents with a 2-year working period of < 10 people (25%), 18 people (45%) with a working period of 2-5 years and 12 people (30%) with a working period of 5 years or more.

Based on the results of research conducted through interviews, observations, and documentation of 40 respondents at PT. Tenggara Multi Media Gemilang, it was obtained that the implementation of the Human Resource Information System (HRIS) as a digitalization strategy has had a significant impact on improving the efficiency of human resources. From the results of the interviews, the majority of respondents stated that HRIS has been actively used in various HR management processes, such as attendance, payroll, employee data management, and recruitment processes, which were previously carried out manually. As many as around 85% of respondents admitted that the use of this system was able to speed up the completion of administrative work and reduce repetitive workloads, while 80% of respondents stated that there was a significant increase in work time efficiency, where the data processing process that previously took days can now be completed in a matter of hours. In addition, around 75% of respondents assessed that HRIS is able to improve data accuracy because the integrated system can minimize manual input errors.

The results of observations also show that the implementation of HRIS has changed employee work patterns from a conventional physical document-based system to a computer-based digital system that allows *real-time* data access, thus facilitating coordination between departments and increasing work productivity. Operational efficiency can be seen from the reduction in administrative task completion time by around 50%, as well as the reduction in the use of paper as part of the company's digital transformation. However, in its implementation, several obstacles are still found, including limited technology understanding in some employees, lack of continuous training, and technical glitches in the system that sometimes hinder work activities, as expressed by around 40% of respondents.

Meanwhile, based on the company's documentation, it is known that the level of HRIS usage has increased quite rapidly in the last two years, accompanied by a decrease in HR administration operational costs of up to around 30%, as well as an increase in transparency and ease of monitoring employee performance through an integrated system. Overall, the results of this study show that the implementation of HRIS as a digitalization strategy at PT. Tenggara Multi Media Gemilang has succeeded in improving the efficiency of human resources, both in terms of time, cost, and work accuracy, although optimization efforts are still

needed through improving employee competencies and improving the system so that the benefits obtained can be maximized.

Implementation of HRIS as a Digitalization Strategy

Based on the results of interviews, observations, and documentation, the implementation of the *Human Resource Information System* (HRIS) at PT. Tenggara Multi Media Gemilang shows that the company has carried out a digital transformation in human resource management. HRIS not only functions as an administrative tool, but also as part of a digitalization strategy that supports operational efficiency.

Qualitatively, most respondents stated that the use of HRIS provides convenience in managing employee data, starting from the recruitment process, attendance recording, to payroll. An integrated system allows data to be stored centrally and can be accessed in real-time, thereby minimizing data duplication and recording errors. In addition, the implementation of HRIS also shows a change in work patterns from manual to digital. This can be seen from the reduced use of physical documents and the increase in speed in the administrative process. Thus, HRIS can be said to be an important instrument in supporting the company's digital transformation. However, in the implementation process, several obstacles were found such as limited understanding of technology by some employees and lack of intensive training. This shows that the success of the digitalization strategy does not only depend on technology, but also on the readiness of human resources.

HR efficiency

The results of the study show that the implementation of HRIS has a significant impact on improving human resource efficiency at PT. Tenggara Multi Media Gemilang. This efficiency can be seen from several main aspects, namely time efficiency, increased data accuracy, and increased employee work productivity. In terms of time, the use of HRIS is able to speed up administrative processes such as employee data processing and payroll. Before the implementation of the system, the process took a long time because it was done manually. However, after using HRIS, the process can be completed more quickly and systematically.

In terms of accuracy, HRIS is able to reduce the rate of errors in data recording. Computerized systems help minimize human error, especially in the process of calculating salaries and recording attendance. This has an impact on increasing employee confidence in the system used. Furthermore, in terms of productivity, employees become more focused on the main job because the administrative burden has been reduced. HRIS allows work that was previously repetitive and time-consuming to be done automatically, so that employees can allocate time for more strategic activities.

The Relationship between HRIS Implementation and HR Efficiency

Based on the results of the qualitative analysis, there is a strong relationship between the implementation of HRIS and the improvement of human resource efficiency. HRIS acts as an enabler in creating a more effective and efficient work system. Good HRIS implementation will result in optimal data integration, making it easier for management to monitor and evaluate employee performance. In addition, the availability of accurate and real-time data also supports faster and more precise decision-making.

These findings show that HRIS not only functions as an administrative tool, but also as a strategic system that is able to improve overall organizational performance. In other words, the more optimal the implementation of HRIS, the higher the level of HR efficiency produced.

However, this relationship is inseparable from supporting factors such as user competence, training, and management support. Without these factors, the implementation of HRIS will not run optimally.

Discussion Based on Theoretical Perspective

If associated with theory, the results of this study are in line with the concept that HRIS is an information system that can improve organizational efficiency through the automation of administrative processes and data integration. HRIS also supports *data-driven decision-making* which is one of the main characteristics in the digitalization era. In addition, the theory of human resource efficiency states that the use of information technology can reduce waste of time and resources, as well as increase work productivity. This is proven in this study, where HRIS is able to optimize employee performance and speed up work processes. However, the theory also emphasizes the importance of organizational readiness in adopting technology. In this study, the obstacles found such as lack of training and technology adaptation show that human factors remain the main key to the successful implementation of the system.

Overall, the results of this study show that the implementation of HRIS as a digitalization strategy has a significant contribution in improving the efficiency of human resources in PT. Tenggara Multi Media Gemilang. HRIS is able to integrate work processes, improve data accuracy, and accelerate decision-making.

However, to achieve optimal results, companies need to pay attention to aspects of employee competency development and provide continuous training. Thus, the implementation of HRIS is not only a technological change, but also a transformation of work culture towards a more modern and efficient organization.

CONCLUSION

Based on the results of research that has been conducted on the implementation of *the Human Resource Information System* (HRIS) as a digitalization strategy at PT. Tenggara Multi Media Gemilang, it can be concluded that the implementation of HRIS has gone quite well and has provided significant changes in human resource management. This system is able to replace manual processes with a more integrated digital system, making it easier to manage employee data, attendance, and payroll more systematically and efficiently. In addition, the implementation of HRIS has been proven to be able to improve human resource efficiency as shown through increasing the speed of work processes, data accuracy, and employee productivity. With a computerized system, errors in recording can be minimized and administrative work becomes more effective. This allows employees to focus more on strategic tasks, thereby supporting the improvement of overall organizational performance. However, in its implementation, there are still several obstacles such as a lack of understanding of technology by some employees and the lack of optimal training provided. Therefore, the success of HRIS implementation is not only determined by the sophistication of the system, but also by the readiness of human resources in adopting the technology. With the support of continuous training and management commitment, the implementation of HRIS is expected to run more optimally in the future.

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