

The Impact of Business Transformation in Improving Operational Performance at PT Telkom Witel Sulbagteng

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Abstract: This research was conducted to determine the impact of business transformation on improving operational performance at PT Telkom Witel Sulbagteng. The qualitative approach is based on a literature review of business transformation, Enterprise Resource Planning (ERP) systems, and operational performance. Microsoft Excel was used as the analysis tool. The study population consists of employees at PT Telkom Witel Sulbagteng. The results of this study indicate that service quality based on interviews, the top priority in improving operational performance is focusing on more responsive and high-quality customer services, such as enhancing customer trust through technologies such as cloud computing and big data, operational optimization is the second priority, although it faces challenges in coordination and service distribution, service diversification is critically important to meet changing market demands, making it a high priority, and human resource development does not dominate due to challenges in human resource capacity.

Keywords: Business Transformation, ERP System, Information Technology, Operational Performance

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1. INTRODUCTION

The telecommunications industry is another highly vulnerable industry that continues to face challenges with outdated IT systems, organizational structures, and corporate cultures (Udovita, 2020). The complexity of digital transformation is much greater than previous transformations originating from information technology (Ivanović & Marić, 2021). Digital transformation does not only encompass the technological aspect, but also creates major changes in business models, operations, and experiences that if not adopted, will hamper the competitiveness of companies (Schallmo & Williams, 2017).

The challenges of digital business management include contributing to organizational strategy, adjusting structures to support digitalization, and developing internet-based marketing systems. Other important factors are staff management based on expertise, the use of consultants, manager behavior, and adaptive organizational culture. Organizational culture plays a crucial role in supporting the adoption of new technologies; a culture that supports innovation and collaboration will accelerate the transformation process (Cameron & Quinn, 2011). In addition, key staff capabilities and e-commerce guidelines must be aligned with organizational values and internal and external perceptions (Chaffey, 2015).

PT Telkom Witel Sulbagteng as a manufacturer and distributor of internet services, in it there are various divisions before carrying out the transformation including Customer Interface which includes the BGES (Business, Government, Enterprise Service), Consumer Service, and Customer care divisions, in addition there is a Support section which includes Shared Service & Finance, Logistics & General Support, War Room, then there is a Backroom section which includes the Access Optima & Data Management division, Access & Service Operation, BGES Operations, Network Area & IS Operation, and finally the Hero section which includes Hero Toli-toli, Hero Banggai, Hero Parigi, and Hero Morowali .

Furthermore, when carrying out its business transformation, the organizational structure at PT Telkom Witel Sulbagteng streamlined its structure into Business Service, Large Enterprise Service, Government Service, Sales Engineer, Performance, Risk & QOS, Shared Service and General Support. According to Sulistyawati et al. (2022), companies that have a good organizational culture not only require employees to work to achieve organizational or company goals, but also provide facilities such as training, employee career development, rewards, and so on.

In this context, digital transformation in business models has a significant role because it allows individual elements in the business model to be digitally transformed (Schallmo & Williams, 2017). In his research, Omelyanenko (2022) explained that the problem of the impact of digital transformation on the service sector business model is considered based on business process management. Therefore, this study is used to explore the implementation of business transformation carried out by PT Telkom Witel Sulbagteng in improving its operational performance. Operational performance is the main indicator of the success of a transformation, because it reflects the efficiency of the process and the productivity of the organization as a whole (Kaplan & Norton 1996).

In this exploratory study, the researcher tries to fill the gap by studying business transformation in improving the operational performance of companies. Thus, this study contributes to the literature on understanding business

transformation in improving operational performance in telecommunications companies through various dimensions that are able to explain performance by considering a number of criteria.

PT Telkom Indonesia (Persero) Tbk is a state-owned company that focuses on providing information and communication technology (ICT) services and telecommunications networks in Indonesia. In the process of transforming into a digital telecommunications company, TelkomGroup implements customer-oriented business and operational strategies. This transformation aims to make the TelkomGroup organization more efficient and responsive to rapid changes in the telecommunications industry. In addition, this new structure is expected to increase efficiency and effectiveness in creating a better customer experience. According to Shaharudin et al. (2015), companies need to manage their operations with more focus to ensure sustainable collaboration with partners and customers.

The advancement of digital technology has driven digitalization as a key business strategy, with business information systems (BIS) playing a vital role in operations and decision-making (Bachri et al., 2023; Dwiwijaya et al., 2023; Dharmawati et al., 2024). In the digital era marked by technological advancements and increased remote working, the dynamics of employee participation have grown, while convenience in various aspects of life has become increasingly apparent; without the use of information technology in the past, organizations have found it difficult to achieve competitive advantage and create value for customers (Pasaribu et al., 2021; Rombe et al., 2021; Idris, 2024). Zahara et al. (2023) revealed that the development of digital technology post-pandemic is taking place very rapidly.

Advances in information technology enable organizations to improve data security, cost and time efficiency, while transforming business operations; however, its use in product and service marketing requires a review of the variables that influence customer loyalty (Ponirin et al., 2016; Pasaribu et al., 2021; Dharmawati et al., 2024). From a dynamic perspective, change in an organization is a positive response to a changing environment or urgent situation (Adda et al., 2019).

IT and the internet have enabled businesses to expand internationally and connect people through increased interaction (Dwiwijaya et al., 2023). This has enabled the provision of high-quality e-services (Muzakir et al., 2021). Academics note that the high use of information technology and the internet reflects progress, openness of information, and a shift towards an information-based society, where companies rely on these technologies to maximize their chances of success (Pasaribu et al., 2021; Bachri et al., 2023).

Companies and managers need to quickly integrate the right tools to respond effectively to economic, social, legislative, and administrative changes (Hammad et al., 2024). Through innovation, businesses can increase competitiveness by improving technical aspects in manufacturing or product quality (Ibrahim et al., 2024). Companies in marketing their products are always faced with the diversity of consumer behavior who want to consume a good or service offered (Asngadi, 2011).

Current technologies and information systems allow for large-scale data collection and storage (Handoko et al., 2015). ERP serves as the backbone of data integration and business processes in modern organizations. This system enables real-time automation and coordination between departments, which has a direct impact on operational efficiency and effectiveness. One transformative technology

is the Enterprise Resource Planning (ERP) system, which plays a vital role in streamlining business processes and supporting comprehensive data management (Syamsuddin et al., 2023). Modern ERP systems are built to be used over the internet. This is enhanced with e-commerce capabilities and the ability to integrate and collaborate with suppliers, partners, customer portals, and enhanced tracking of incoming line materials and outgoing finished products to expand visibility and control within and outside the company (Geith et al., 2017).

Devi & Aryani (2024) stated that with the implementation of ERP, all aspects of the company, including human resources, manufacturing processes, distribution, supply chain management, sales, and accounting, become interconnected. Considering the complexity of business processes in the telecommunications sector, ERP becomes a strategic tool in realizing a successful digital transformation. The implementation of ERP in a company must be carried out in detail and involve integration between functions (Husada et al., 2020). That is why ERP is one of the key factors that can affect the operational performance of a company in the digital era. User involvement in the development of an ERP system is very important to improve information technology features that are relevant to them (Hammad et al., 2024). Today's dynamic businesses are becoming increasingly complex with functional units requiring more data flow between departments for decision making, timely and efficient procurement of spare parts, inventory management, accounting, human resources and distribution of goods (Madanhire et al., 2016).

Most studies examine the impact of ERP systems on the performance of large organizations. (Almuhayfith & Shaiti, 2020). Today, organizations have shifted from the idea of developing their own IT applications to acquiring innovative ERP solutions from specialist vendors. These software packages have become the heart of information systems, almost essential for managing enterprise flows (Zaitar, 2022). Modern organizations make significant investments in complex information systems such as enterprise resource planning (ERP) systems (Rajan et al., 2015).

2. LITERATURE REVIEW

Business Transformation

According to Wade (2015), transformation is basically about change, and organizational change is the basis of digital business transformation. Boneva (2018) stated that the process of organizational transformation through the use of digital technology and business models to improve economic indicators and respond to changes in consumer behavior is inevitable for contemporary organizations. The importance of digital business transformation has: adoption of e-business technology in companies, use of cloud computing services, electronic sales, information security, and disruptive technologies.

According to Chaffey (2015), digital business transformation is a significant change in organizational processes, structures, and systems implemented to improve organizational performance through increased use of digital media and technology platforms. Wade (2015) states that digital business transformation can be motivated by a number of factors, in some cases, it comes from consumers. Today's consumers are actively seeking improved services, lower prices, and higher levels of quality. Zaitar (2022) argues that digital transformation is largely a buzzword that signals a change in the scope and direction of digital government:

as practitioners try to apply a comprehensive approach to digital government beyond simply digitizing existing offline processes, researchers aim to understand how and why these initiatives succeed or fail.

Wade (2015) stated that business transformation is digital when it is built on a foundation of digital technology. This focus on digital technology is different from other potential transformation drivers such as political, social, cultural, or economic shifts. According to Schwertner (2017), business model transformation is carried out through digital business modification, new digital business and digital globalization. Corver et al., (2014) also explained that the digital business transformation framework is built on four main items: customers, products, organizations, and processes and systems.

According to Chaffey (2015), there are 7s model elements including strategy to set direction, structure to support implementation, and system to run operations. Staff elements highlight HR management, supported by leadership style that shapes culture, and skills as core competencies. All elements are united by the main goal (superordinate goals) that guide the organization. This is in line with the transformation categories explained by Wade (2015), digital business transformation can occur in various forms and intelligent transformation requires priority. The categories are business model (how the company makes money), structure (how the company is organized), people (who work for the company), process (how the company does things), IT capabilities (how information is managed), offerings (what products and services the company offers), and engagement model (how the company engages with its customers and other stakeholders).

Enterprise Resource Planning

According to Hammad et al., (2024), ERP is a set of important systems that allow organizations to interpret and distribute information both inside and outside the company. Handoko et al., (2015) stated that ERP is the center of business information processing. In many companies, the ERP system serves as the foundation of the information system landscape. Enterprise Resource Planning is a software package that is able to integrate various functions within a company and functions as an operating system used by the organization (Sebayang et al., 2021).

Devi & Aryani (2024) stated that with the implementation of ERP, all company functions, including human resources, manufacturing processes, distribution, supply chain management, sales, and accounting, become interconnected. The ERP system also helps companies share information and accelerate the completion of business processes (Almuhayfith & Shaiti, 2020).

In their research, Geith et al., (2017) explained that ERP is a software system that aims to integrate all functional units of a company cooperatively. Enterprise Resource Planning (ERP) is a strategic tool that synchronizes, integrates, and streamlines an organization's data and processes into a single system to gain competitive advantage in an uncertain business environment (Madanhire et al., 2016). Over time, ERP systems have faced many evolutionary and upgrading processes to improve their functionality and enhance integration capabilities. ERP vendors such as Oracle, SAP, PeopleSoft, JD Edward, etc. have developed different modules to cover and support all functional units of a company (Abd et al., 2017).

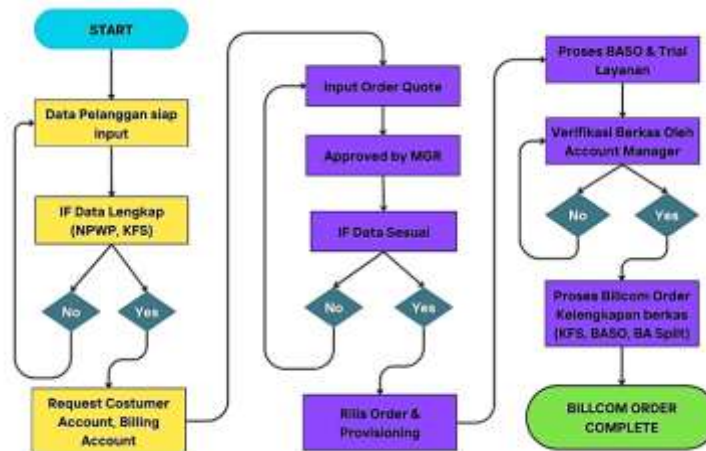


Figure 1.
Flowchart of PT Telkom Witel Sulbagteng ERP System

Flowchart illustrates the business process flow for managing customer requests, starting from:

1. Customer data readiness that includes complete documents, such as NPWP and KFS forms. If the data is complete, proceed to the customer account and billing account request stage.
2. The customer request is processed to generate an order quote which will be validated by the manager. If the data is incomplete, the process is delayed until it is completed.
3. Once the data is complete, the order is released and enters the provisioning stage and service testing through the BASO (Operation Ready Minutes) process and service trial.
4. After the service test results, then verify the files from the authorized Account Manager.
5. Next, the documents are verified by the Account Manager to ensure the completeness of files such as KFS, BASO, and BA Split.
6. The process ends with the completion of the order via Billcom Order (complete), ensuring that all requirements have been met and the service can be officially handed over to the customer.

Operational Performance

Operational performance is related to competitive priorities that are aligned with strategic capabilities (Sierra et al., 2024). Today's volatile and rapidly evolving business environment requires organizations to continuously improve performance (Nwankpa & Datta, 2017). In the organizational literature, it is recognized that aspects such as delivery, flexibility, product quality, and production costs are key competitive areas. Each of these dimensions reflects important elements in achieving optimal operational performance (Narasimhan & Das, 2001). The following is an explanation of each of these dimensions:

- **Flexibility**
Flexibility refers to the ability to easily add or replace products in a series. This aims to reduce costs arising from product changes while adapting to various conditions.
- **Product Quality**

Quality is the ability of a product to meet customer expectations and needs. This aspect plays a vital role in building competitive advantage, as improving quality directly impacts performance.

- **Delivery**

Delivery refers to the company's ability to fulfill promises to customers according to the agreed dates. This dimension includes the process of distributing orders received by customers at the time of purchase, with an emphasis on customer service, such as reliability in meeting delivery schedules or speed in the delivery process.

- **Production cost**

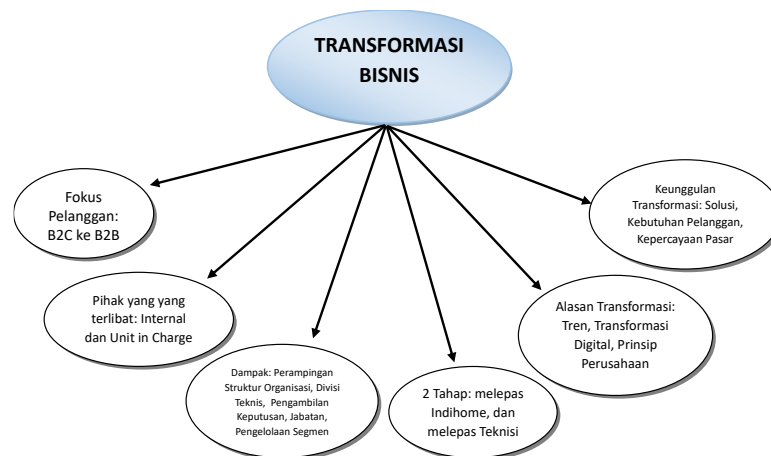
Production costs refer to the expenses incurred by a company in the process of producing goods or services. This factor is crucial because it has a direct impact on the price of the product, which ultimately affects the level of profitability, either increasing or decreasing it.

3. RESEARCH METHODS

This study uses a qualitative approach based on a literature review related to business transformation, Enterprise Resource Planning (ERP) systems, and operational performance. Wade (2015) emphasized that business transformation is a process of organizational change that includes various aspects such as strategy, structure, process, and technology to improve operational effectiveness. Meanwhile, Chaffey (2015) shows the importance of integrating IT capabilities, digital business models, and human resource development in driving digital transformation.

This research approach involves analyzing previous literature, such as Chaffey's (2015) research on the role of ERP systems in creating operational efficiency. In addition, literature on the challenges of digitalization by Boneva (2018) also used to identify the barriers faced by organizations during the digital business transformation process. This study also refers to the field observation and interview approaches, as suggested in the study of Omelianenko (2022), to understand the direct impact of digitalization on the business models of telecommunications organizations.

4. RESULTS AND DISCUSSION

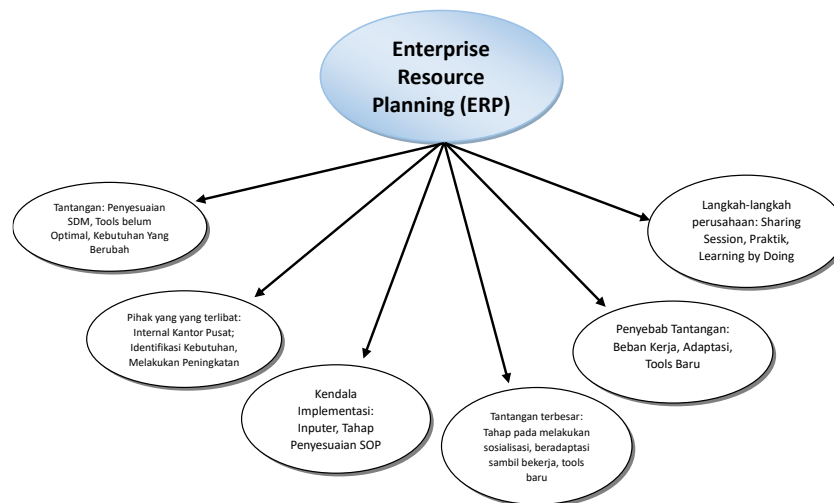


Source: Informant Statement (AW)

Figure 2.
Business Transformation Data Reduction Results

From Figure 2, it is explained that the business transformation carried out by Telkom Witel Sulbagteng aims to respond to the digitalization trend and strengthen market trust by changing customer focus from B2C to B2B. This is in accordance with the informant's statement (AW) " the focus of customer segments during business transformation is business customers who previously focused on housing". This step involves streamlining the organizational structure, changes to the technical division, decision making, and segment management.

According to the informant (AW) " the impact of this business transformation is that the organizational structure has changed". The transformation was carried out in two stages, namely the release of IndiHome services and the transfer of technicians to support new strategies. The advantage of this transformation lies in its ability to provide solutions according to customer needs, despite facing challenges such as internal adjustments and major changes in related units.

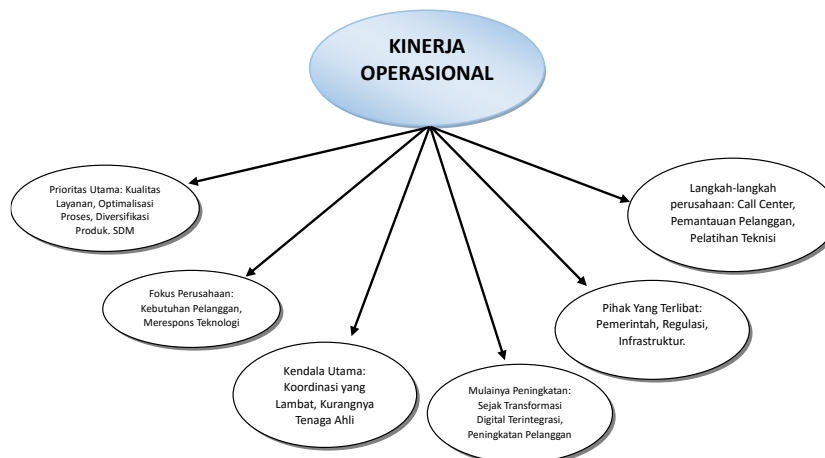


Source: Informant Statement (AF)

Figure 3.
Enterprise Resource Planning Data Reduction Results

From Figure 3, it is explained that the implementation of ERP at Telkom Witel Sulbagteng aims to improve operational efficiency and support Telkom's business transformation. However, major challenges emerged in the early stages of implementation, such as HR adaptation to new tools, evolving needs, and adjustments to changed SOPs. In addition, the main obstacle in implementation is the high workload on employees, who must adapt to the new system while still carrying out daily work.

To overcome these challenges, the company adopted a "learning by doing" approach, which included knowledge sharing sessions, hands-on practice, and gradual socialization. This is in accordance with the statement of the informant (AF) who said "the company itself took steps to carry out the sharing session and learning by doing agenda". This step was designed to ensure that HR could understand and utilize ERP optimally.



Source: Informant Statement (A)

Figure 4.
Results of Operational Performance Data Reduction

The operational performance of Telkom Witel Sulbagteng focuses on improving service quality, optimizing processes, diversifying products, and developing human resources. This is in accordance with the statement of informant (A) " the main priorities in improving the company's operational performance are customer service quality, optimizing operational processes, diversifying services, digital products, and developing human resources". Integrated digital transformation has had a significant impact on increasing the number of customers. According to informant (A) " the company can respond to changing customer needs, customers need faster services". However, challenges such as slow coordination and lack of experts in various fields remain major obstacles.

To overcome these obstacles, Telkom conducts regular technician training, customer monitoring through call centers, and ensures regulations and infrastructure that are in accordance with needs. The government is also an important stakeholder in supporting operational performance through regulations and permits.

PT Telkom Witel Sulabagteng faces challenges, such as HR adjustments in the use of ERP, high workload, lack of understanding of experts related to ERP and operations, and slow coordination. Stakeholders involved include Telkom's head office, units at the center, regions, and witel, and the government related to infrastructure regulations and permits. The solutions implemented include sharing sessions and direct learning (learning by doing) for the use of ERP, technician training, periodic evaluations, and customer monitoring to improve operational performance. The business focus has also shifted from the housing sector to business, with a priority on improving service quality to meet customer needs. The results of this transformation are measured by the increase in the number of IndiHome customers after the digital transformation was carried out. The main reason for this transformation is to face business challenges, follow digitalization trends, and apply the principle of "follow the money".

Discussion

Business Transformation

Business transformation at PT Telkom Witel Sulbagteng is focused on the business customer segment, replacing the previous focus on residential customers. According to informant (A), "Business transformation allows companies to focus more on solutions that are relevant to customer needs, increase market trust, and accelerate service innovation". This transformation involves all internal parties, including the responsible units from the head office that direct policies and their implementation at the regional and witel levels.

The main impacts of this transformation include changes in organizational structure, reduction in the number of witel, and transfer of several positions to subsidiaries. This is in line with research by Wade (2015) which states that transformation is basically about change, and organizational change is the basis of digital business transformation. The transformation process began in July 2023, with two main stages: the release of Indihome products to Telkomsel in July 2023 and the technical release to Telkom Akses in August 2024. The main reasons for this transformation are business challenges and digitalization trends, with the main results producing a service focus that is more in line with customer needs.

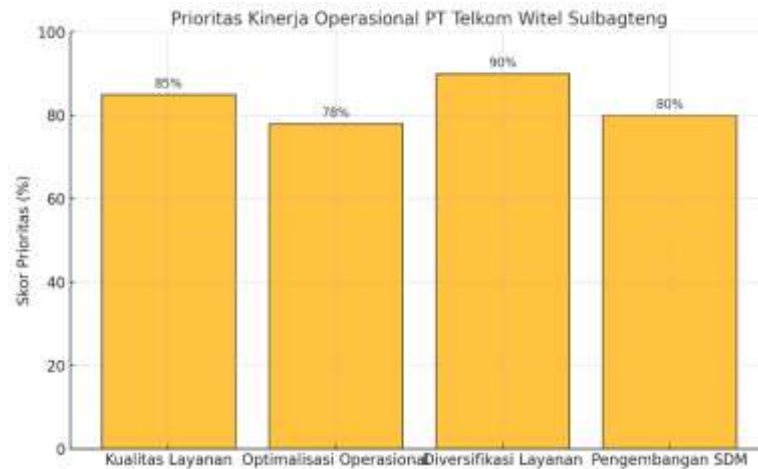
ERP Implementation

ERP implementation faces several challenges, especially related to human resources (HR) who need to adapt to new tools. The process involves internal parties from the head office who provide guidance and listen to suggestions from related areas. The main obstacle arises during the socialization stage, where employees must adjust to the increased workload while learning to use the new tool. To overcome this problem, the company held sharing sessions and implemented direct learning methods.

Sarker (2024) in his research stated that cultural and organizational resistance is one of the challenges in implementing an ERP system. Both employees and management are often reluctant to switch to an ERP system because of concerns about losing their jobs, disrupting existing workflows, or discomfort in adopting new technology.

Operational Performance

Operational performance improvement at PT Telkom Witel Sulbagteng was achieved by prioritizing customer service quality, optimizing operational processes, diversifying digital services, and developing human resources. Narasimhan & Das (2001) in their research stated that in organizational literature, it is recognized that aspects such as delivery, flexibility, product quality, and production costs are key competitive areas. Each of these dimensions reflects important elements in achieving optimal operational performance. The focus on cloud technology and big data has enabled the company to quickly respond to changing customer needs, thereby increasing competitiveness. However, there are still obstacles in service distribution, such as slow coordination and lack of experts. To maintain service quality, the company takes steps such as technician training and periodic evaluations.



Source: Primary Data Processing Results (2024)

Figure 5.
Operational Performance Priority Bar Chart

Figure 5 shows the priorities in improving the operational performance of PT Telkom Witel Sulbagteng. The main focus is seen on service quality, followed by service diversification, HR development, and operational optimization. The percentages in the bar graph above are based on the priority focus mentioned in the interview regarding the operational performance of PT Telkom Witel Sulbagteng. The percentage scores reflect the relative priority level of each dimension based on the interview narrative. The following is the basis for the percentages.

Service Quality (85%): Based on interviews, the main priority in improving operational performance is to focus on more responsive and quality customer service, such as increasing customer trust through technology, such as cloud and big data. **Operational Optimization (78%):** optimizing operational processes is the second priority, despite facing obstacles in coordination and distribution of services. In its implementation, there are a number of challenges, especially in terms of coordination between work units and equal distribution of services to all stakeholders.

Service Diversification (90%): Diversification of digital products is very important to meet changing market needs, making it a high priority. The service diversification carried out by PT Telkom Witel Sulbagteng is by bundling service products by providing more competitive prices and attractive added value for customers. This bundling strategy combines several superior products or services, such as high-speed internet, TV services, and landlines, at a more economical price than if purchased separately. This step aims to increase competitiveness, expand market share, and meet customer needs in the Central Sulawesi region which continues to grow. This diversification helps the company to respond effectively to changes in market demand and customer preferences. By expanding the reach of its digital services, PT Telkom Witel Sulbagteng can better position itself in the competitive landscape.

Human Resources Development (80%): Human Resources Development including technician training and learning new tools, scored high but did not completely dominate due to human resource constraints at PT Telkom Witel Sulbagteng. The percentage results show that implementing strategies such as

technician training and regular evaluations can help reduce these challenges, which ultimately lead to improved service quality and operational performance. This percentage is a qualitative representation based on insights from interviews, not direct quantitative calculations.

This study provides a comprehensive overview of how PT Telkom Witel Sulbagteng can leverage business transformation to improve its operational performance. By focusing on service quality, operational optimization, service diversification, and human resource development, the company can navigate the challenges it faces and strengthen its competitive position in the telecommunications industry.

5. CONCLUSION

This study successfully identified the impact of business transformation on improving operational performance at PT Telkom Witel Sulbagteng. Using a qualitative approach based on interviews and literature reviews, the research findings include:

1. The company has successfully shifted its focus from residential customers to business customers, simplified the organizational structure, and increased efficiency through two major steps of releasing the Indihome product to Telkomsel in 2023 and transferring technical aspects to Telkom Akses in 2024. These changes make the service more in line with customer needs.
2. ERP systems are a key factor in optimizing operational processes, despite challenges such as human resource adaptation and high workloads. Strategies such as experience sharing sessions and hands-on learning have proven effective in enhancing internal capabilities.
3. Cloud technology, big data, product diversification, and human resource development, the company is able to increase customer trust and strengthen its competitiveness. However, challenges such as slow coordination and shortage of experts remain obstacles that must be overcome.

Study has limitations, including the approach used in the study is qualitative and only conducted in one company, namely PT Telkom Witel Sulbagteng, so the results cannot be generalized for all Telkom Group entities or other telecommunications companies. In addition, data were obtained through interviews with internal informants without involving external perspectives, in this case customers who can also provide an overview of the impact of business transformation on service quality.

Further researchers are advised to use a quantitative or mixed methods approach to measure the relationship between business transformation variables, ERP, and operational performance more objectively and measurably. In addition, the scope of the study can be expanded to several other Telkom regions or units to obtain comparative data. Further research can also involve the perspective of customers who are directly affected by business transformation.

REFERENCES

- Abd, M.A., Nasr, E.S., & Geith, M.H. (2017). Benefits and Challenges of Cloud ERP Systems – A Systematic Literature Review . *Future Computing and Informatics Journal* , 1 (1–2), 1–9. <https://doi.org/10.1016/j.fcij.2017.03.003>
- Adda, HW, Natsir, S., & Niluh Putu Evvy Rossanty. (2019). Employee Perceptions Towards Organizational Change and Leadership in the Banking Industry . *Banks and Bank Systems* , 14 (3), 113–120. [https://doi.org/10.21511/bbs.14\(3\).2019.10](https://doi.org/10.21511/bbs.14(3).2019.10)
- Almuhayfith, S., & Shaiti, H. (2020). The Impact of Enterprise Resource Planning on Business Performance: With the Discussion on Its Relationship with Open Innovation . *Journal of Open Innovation: Technology, Markets, and Complexity* , 6 (3), 87. <https://doi.org/10.3390/joitmc6030087>
- Asngadi. (2011). Exploratory Study on Consumer Factors Visiting Mall Tatura Palu Central Sulawesi. *Journal of Management Applications* , 9 .
- Bachri, S., Putra, S. M., Sastrawan, E., Farid, & Darman. (2023). The Digital Marketing to Influence Customer Satisfaction Mediated by Purchase Decision . *Journal of Management Applications* , 21 , 578–592. <https://doi.org/10.21776/ub.jam.2022.021.03.03>
- Boneva, M. (2018). Challenges Related to the Digital Transformation of Business Companies (p. 106).
- Campo-Sierra, S., Escorcía-Caballero, J.P., & Chams-Anturi, O. (2024). Assessing Operational Performance Outcomes in Rural Entrepreneurship . *Procedia Computer Science* , 231 (2023), 458–463. <https://doi.org/10.1016/j.procs.2023.12.234>
- Chaffey, D. (2015). E-Commerce Management Strategy, Implementation, and Practice .
- Corver, Q., & Elkhuizen, G. (2014). A Framework for Digital Business Transformation . *Cognizant* , 1 – 10 . Retrieved from <https://www.cognizant.com/InsightsWhitepapers/a-frameworkfor-digital-business-transformation-codex-1048.pdf>
- Dwiwijaya, KA, Harto, B., Afriyadi, H., Rusgowanto, FH, Masrizal, Pambudi, A., & Suhardi, AR (2023). Business Information System. Addition of Sodium Benzoate and Potassium Sorbate (Anti-inversion) and Stirring Speed as an Effort to Inhibit Inversion Reactions in Sugarcane Juice.
- Husada, TZJ, Hotlan, S., & Sebayar, P. (2020). The Impact of Implementing Enterprise Resources Planning (ERP) Project on Firm Performance and Organizational Citizenship Behavior as a Moderate . *Journal of Project Management* , 5 , 227–236. <https://doi.org/10.5267/j.jpm.2020.8.001>

- Ibrahim, Al, Setiawan, M., Noermijati, & Rahayu, M. (2024). HR Innovation in Mediating Entrepreneurial Motivation in Improving the Competitive Ability of Palu Fried Onions MSMEs . *Business, Management and Economics Engineering* , 22 (1), 77–95. <https://doi.org/10.3846/bmee.2024.19933>
- Idris. (2024). The Influence of Transformational Leadership, Emotional Intelligence, and Organizational Culture. *Community Practioner* , 21 (07), 742–752. <https://doi.org/10.5281/zenodo.12705302>
- Ivanović, T., & Marić, M. (2021). Application of Modern Enterprise Resource Planning (ERP) Systems in the Era of Digital Transformation . *Strategic Management* . <https://doi.org/10.5937/straman2104028i>
- Leo, B., Aryanto, R., & Gautama, I. (2015). The Impact of Enterprise Resources System and Supply Chain Practices on Competitive Advantage and Firm Performance: Case of Indonesian Companies . *Procedia - Procedia Computer Science* , 72 , 122–128. <https://doi.org/10.1016/j.procs.2015.12.112>
- Madanhire, I., & Mbohwa, C. (2016). Enterprise Resource Planning (ERP) in Improving Operational Efficiency: Case Study. *Procedia CIRP* , 40 (2001), 225–229. <https://doi.org/10.1016/j.procir.2016.01.108>
- Muzakir, Bachri, S., Adam, RP, & Wahyuningsih. (2021). The Analysis of Forming Dimensions of E-Service Quality for Online Travel Services . *International Journal of Data and Network Science* , 5 (3), 239–244. <https://doi.org/10.5267/j.ijdns.2021.6.010>
- Narasimhan, R., & Das, A. (2001). The Impact of Purchasing Integration and Practices on Manufacturing Performance . *Journal of Operations Management* , 19 (5), 593–609. [https://doi.org/10.1016/S0272-6963\(01\)00055-9](https://doi.org/10.1016/S0272-6963(01)00055-9)
- Nwankpa, J. K., & Datta, P. (2017). Balancing Exploration and Exploitation of IT Resources: The Influence of Digital Business Intensity on Perceived Organizational Performance . *European Journal of Information Systems* , 26 (5), 469–488. <https://doi.org/10.1057/s41303-017-0049-y>
- Omelyanenko, V., & Omelianenko, O. (2022). Issues of Digital Transformation of Business Models in the Service Sector. *Economics & Education* , 7 (1), 14–19. <https://doi.org/10.30525/2500-946x/2022-1-4>
- Pasaribu, F., Bulan, TRN, Muzakir, & Pratama, K. (2021). Impact of Strategic Leadership and Organizational Innovation on the Strategic Management: Mediatlional Role of IT Capability . *Polish Journal of Management Studies* , 24 (2), 354–369. <https://doi.org/10.17512/pjms.2021.24.2.22>

- Ponirir, Scott, D., & Von Der Heidt, T. (2016). E-Loyalty: Its Antecedents, Implications and Differences between Developed and Developing Countries . *Developments in Marketing Science: Proceedings of the Academy of Marketing Science* , 77–82. https://doi.org/10.1007/978-3-319-18696-2_29
- Purnama, S., & Aryani, YA (2024). ERP Implementation and Earnings Management: The Moderating Effect of an Independent Board of Commissioners . *Journal of Economics and Business* , 27 (1), 163–182. Retrieved from <https://ejournal.uksw.edu/jeb/article/view/8759>
- Rajan, C. A., & Baral, R. (2015). Adoption of ERP System: An Empirical Study of Factors Influencing the Usage of ERP and Its Impact on End Users . *IIMB Management Review* , 27 (2), 105–117. <https://doi.org/10.1016/j.iimb.2015.04.008>
- Rombe, E., Zahara, Z., Santi, IN, & Rahadhini, MD (2021). Exploring E-Mobile Banking Implementation Barriers on Indonesian Millennial Generation Consumers . *International Journal of Data and Network Science* , 5 (4), 579–586. <https://doi.org/10.5267/j.ijdns.2021.8.010>
- Sarker, J. (2024). Enterprise Resource Planning (ERP): Opportunities, Benefits and Implementation Challenges in Bangladesh . *International Journal of Science and Business* , 42 (1), 71-83. <https://doi.org/10.58970/IJSB.2485>
- Schallmo, D., Williams, C. A., & Boardman, L. (2017). Digital Transformation of Business Models—Best Practices, Enablers, and Roadmap . *International Journal of Innovation Management* , 21 (08), 1740014.
- Schwertner, K. (2017). Digital Transformation of Business . *Thracian Journal of Science* , 15 (Suppl. 1), 388–393. <https://doi.org/10.15547/tjs.2017.s.01.065>
- Sebayar, P., Tarigan, ZJH & Panjaitan, TWS (2021). ERP Compatibility on Business Performance Through the Inventory System and Internal Integration ERP Compatibility on Business Performance Through the Inventory System and Internal Integration . *IOP Conference Science, Materials* . <https://doi.org/10.1088/1757-899X/1010/1/012008>
- Shaharudin, M.R., Govindan, K., Zailani, S., & Tan, KC (2015). Managing Product Returns to Achieve Supply Chain Sustainability: An Exploratory Study and Research Propositions . *Journal of Cleaner Production* . <https://doi.org/10.1016/j.jclepro.2015.03.074>
- Sulistyawati, N., Setyadi, IK, & Nawir, J. (2022). The Influence of Work Environment, Organizational Culture, and Transformational Leadership on Job Satisfaction of Millennial Employees (The Influence of Work Environment, Organizational Culture, and Transformational Leadership on Job Satisfaction of Millennial Employee). *Study of Management and Organization Science (SIMO)* , 3 (1), 183–197.

- Syamsuddin, S., Ilham, BU, Dwiwijaya, KA, Navianti, DR, & Hadikusumo, RA (2023). Implementation of an Enterprise Resource Planning (ERP) System and its Impact on Manufacturing Company Operational Efficiency . *Global International Journal of Innovative Research* , 1 (2), 194–199. <https://doi.org/10.59613/global.v1i2.29>
- Syamsuddin, S., Marsudi, S., Hasanuddin, B., Umar, A., & Suprayitno, D. (2024). Adapting to Digital Transformation: Challenges and Strategies for Traditional Businesses . *Global International Journal of Innovative Research* , 2 (3), 704–711. <https://doi.org/10.59613/global.v2i3.121>
- Syamsuddin, Saharuddin, Yusrizal, Dharmawati, T., Pujisari, Y., & Fatmawati, E. (2024). Utilizing Blockchain Technology in Global Supply Chain Management: An Exploration of Scalable Information Systems. *EAI Endorsed Transactions on Scalable Information Systems* , 11 (1), 1–12. <https://doi.org/10.4108/eetsis.4374>
- Udovita, PVMVD (2020). Conceptual Review on Dimensions of Digital Transformation in Modern Era . *International Journal of Scientific and Research Publications*, 10 (2), 520–529. <https://doi.org/10.29322/IJSRP.10.02.2020.p9873>
- Wade, M. (2015). Digital Business Transformation - A Conceptual Framework . *Global Center For Digital Business Transformation* , (June).
- Zahara, Z., Ikhsan, Santi, IN, & Farid. (2023). Entrepreneurial Marketing and Marketing Performance Through Digital Marketing Capabilities of SMEs in Post-Pandemic Recovery . *Cogent Business and Management* , 10 (2). <https://doi.org/10.1080/23311975.2023.2204592>
- Zaid, M., Hammad, M. Bin, Yahaya, J.B., & Mohamed, I. Bin. (2024). A Model for Enterprise Resource Planning Implementation in the Saudi Public Sector Organizations . *Heliyon* , 10 (2), e24531. <https://doi.org/10.1016/j.heliyon.2024.e24531>
- Zaitar, Y. (2022). Analyzing the Contribution of ERP Systems to Improving the Performance of Organizations . *Ingenierie Des Systemes d'Information* , 27 (4), 549–556. <https://doi.org/10.18280/isi.270404>