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DIGITAL TRANSFORMATION IN BUSINESS OPERATIONS MANAGEMENT

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Abstract

The development of technology and digital transformation are important factors in improving business performance in Indonesia, with the government and companies needing to face challenges and implement efficient operational management to stay competitive in the digital era. The purpose of this study is to determine the application of digital transformation in business operational management. The method used in this research is a literature study method with a qualitative approach. The data analysis uses Miles and Huberman analysis, namely Data Reduction, Data Display, Conclusion Drawing / Verification. Research results in the advancement of information and communication technology have triggered digital transformation in business operational management, changing the way companies plan, organize, manage, and supervise the production of goods and services. This transformation enables companies to adopt digital technologies such as the Internet of Things, artificial intelligence, cognitive computing, advanced robotics, cloud technologies, blockchain, and big data to improve their efficiency, productivity, and competitiveness. Successful operations managers are those who understand and utilize these technologies, so as to better achieve company goals, respond quickly to market changes, and avoid gaps between customer expectations and traditional business models. Digital transformation has become key in managing efficient and sustainable business operations in an ever-changing era.

Keywords: digital transformation, management, business operations management **This article is licensed under a Creative Commons Attribution-ShareAlike 4.0**



INTRODUCTION

The development of science and technology is increasingly rapid, including in Indonesia. In manufacturing, and production are increasingly utilizing technology to improve company performance (Bahas & Yamit, 2022). The development of technology that is present demands, both individuals and organizations to carry out digital transformation. Digital transformation is a process by adopting digital technology to change existing processes so as to create new things or ways (Nst et al., 2023). Digital transformation is no longer just words or ideas, but a reality that businesses must adopt to remain relevant and effective. In addition, companies must also consider aspects of data security and privacy in the use of digital technology. Digital transformation in

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Indonesia is one of the government's policies to encourage people and businesses to make optimal use of digital technology (Ridwan et al., 2023).

The demands of digital transformation and the readiness of the community to welcome digital services from various parties in various sectors. The government sector experiences several obstacles that can arise in the implementation of digital transformation, such as data problems and the adoption of new technologies (Pangandaheng et al., 2022). The impact of digitalization has been and still is tremendous, forcing companies around the world to act and react to changes in business rules. Digital transformation is a necessity for all business sectors in increasing value, performance capabilities and increasing their competitiveness (Susanto et al., 2023). Digital transformation of an enterprise is defined as the use of new digital technologies, such as social media, mobile, analytics, or embedded devices that enable significant business improvements, such as customer experience, maximization of operations, and creating new business models (Oktaviani & Ramayanti, 2023). Digital transformation will carry out a lot of innovations that change companies to be more effective and efficient in running a business (Halasa et al., 2020).

Large-scale companies need a series of structured activities in operating every day. The series of activities must be adjusted to how the company began until it was said to end. A series of activities is usually said to be operational. It is important for large companies to pay attention to their management that regulates operational activities, because this is related to the utilization of human resources such as the production process. Operational management is referred to as an activity that is able to maximize an internal process in creating a product by organizing, processing, designing, and planning human resources in the company carefully so as to produce a good form of activity (Cheren et al., 2022). According to Rusdiana in Mariani (2022), with operations management, companies can know how to manage operations with a modern approach, making it easier to analyze and improve systems in companies or organizations. Operational management runs well, it will have an impact on the quality of goods that are being produced.

Previous research conducted by Rahmawati et al (2023) stated that the digital transformation journey in companies is an important step to achieve companies to compete competitively in the era of convenience, and companies can be left behind if they still have not implemented digitalization. Based on questions about the challenges faced by companies in facing challenges in the digital transformation journey, the need for team organizational strength, cooperation, especially in the operating division to continue to be optimal in running the smart manufacturing industry 4.0 to industry 5.0, industry 6.0 until later it is time to start being applied thoroughly with digital.

The novelty of this study is to describe some of the challenges of digital transformation in business operational management. This increasingly rapid technological development requires the community to be proactive and participate in these developments, especially in the business sector. Transformation contributes to business operational management activities. Thus, this study aims to analyze digital transformation in business operational management.

RESEARCH METHODS

This research uses a literature study method with a qualitative approach. Literature study is a method by collecting data by understanding and studying theories from various literature related to the research Adlini et al., (2022). Qualitative research aims to gain a

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masterful understanding of human and social problems, not describe the surface part of a reality as quantitative research does with positivism (Fadli, 2021).

The data analysis using Miles and Huberman's analysis in Kajongian et al (2022) suggests that activities in qualitative data analysis are carried out interactively and take place continuously until they are complete, so that the data is saturated. The measure of data saturation is characterized by no more obtaining new data or information, namely Data Reduction, Data Display, Conclusion Drawing / Verification.

RESULT AND DISCUSSION

The current progress of Information and Communication Technology has shown tremendous progress. The development of science and technology has encouraged progress in all areas of life, including advances in the field of information technology (Wirasaputra et al., 2022). With technology, it is basically to make it easier for humans to run things. This information technology has been widely used to process, process data, analyze data to produce relevant, fast, clear, and accurate data or information. Information technology has been widely used in government institutions or private companies and other institutions. And the development of information technology has also opened a new chapter in society, including in the business world, currently entrepreneurs use this information technology for the development of their business itself (Siregar & Nasution, 2020).

The development of technology and information has given birth to digital transformation that occurs due to the modernization of information technology towards digital optimization and the discovery of new business models digitally. The existence of digital transformation is possible to influence people's behavior (Adawiyah et al., 2023). Digital transformation refers to change and transformation that is driven and built on the foundation of digital technology. In an enterprise, digital transformation is defined as an organization's shift to big data, analytics, cloud, mobile, and social media platforms. While organizations are constantly changing and evolving in response to the changing business landscape, digital transformation is change built on the foundation of digital technology, ushering in unique changes in business operations, business processes and value creation (Sukarni et al., 2021). The occurrence of digital transformation is driven by changes and technological developments in organizations and the environment. Digital transformation is a change process that is actively designed and carried out that is influenced by digital technology (Istiatin et al., 2021).

Digital transformation as the transformation of business relationships and interactions between organizations, consumers, suppliers, and employees is expected to avoid the gap between customer expectations and what traditional business models can offer; it is also related to customer behavior, technological and social change (Rochmawati et al., 2023). Business digitalization is understood as the use of "digital opportunities" through the incorporation of various internet-based technologies – as drivers of business digital transformation:

- 1. Internet of Things / IoT (connecting a set of devices into a complex system).
- 2. Artificial Intelligence (using systems that mimic human intelligence) and computing

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- 3. Cognitive (combination of Artificial Intelligence and signal processing).
- 4. Advanced robotics (using semi-autonomous robots).
- 5. Cloud technology (renovation of applications and platforms as a service).
- 6. Blockchain (changing data sharing between users).
- 7. Big Data (changing decision-making information).

In this regard, digital transformation is utilized by various institutions and companies to improve their management systems. Management in an organization is the main activity that distinguishes an organization from other organizations in providing services to humans. The success of the organization in achieving its goals and social responsibility is largely determined by the role of the managers owned by the organization. If managers are able to carry out their duties well, then the organization where the managers shelter is also expected to succeed in meeting the needs and goals of the organization (Heridiansyah & Prawani SR, 2012).

Management in an organization is basically intended as a process (activity) of determining and achieving organizational goals through the implementation of four basic functions: planning, organizing, actuating, and controlling (Fahmi & Qulub, 2017). Meanwhile, operational management is a comprehensive and optimal management method that pays attention to labor, goods such as machinery, raw materials, equipment, or products that can be used as a product of goods or services that can be bought and sold. Operations management needs to be studied because the management function is one of the three management functions in an organization or company, namely production, finance, and marketing. In addition, operations management is also a part of the company that consumes large enough funds in a company. The concept of operational management is a company's activity in creating goods and services offered by the company to consumers. With the concept of operations management, all company income will be integrated to produce outputs that have added value, be it in the form of final goods, semi-finished goods or services (Kumar et al., 2021).

The basic concepts of management are grouped into 3 types, namely the first scope of management that touches all fields in society such as government, trade, industry. Both elements and management functions such as management elements and functions (Purnomo & Astuningsih, 2021). Managers who are successful in designing and providing goods and services around the world are managers who understand operational management. Operational management is one of the most important factors for the survival of a company. Because with operational management, the division of performance and the company's performance process can run well. So as to support the achievement of the vision, mission, and goals of the company. Operational management as a division with the largest amount of funds requires attention because from here it can be known how the product is produced (Rohaetin & Norrahmi, 2020).

According to Griffin & Ebert in Widyanti (2019), there are 3 operational management functions, namely operational planning, operational scheduling, and operational supervision. Business planning and forecasting are developed by management into operational planning. Operational planning consists of capacity, location, layout,

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quality and methods. Next, the company draws up a schedule for implementing the plan. The Company identifies specific times to perform operational activities. Rational operation scheduling consists of master operation schedule, detailed schedule, staff schedule, and project schedule. The company also monitors operational performance by comparing results with detailed plans and schedules. Managers take corrective action for inappropriate performance outcomes. Operational supervision consists of materials management and quality control. Operations management deals with the production of goods and services. Every day we encounter an abundance of goods or services, all of which are produced under the supervision of operations managers. Operations managers not only work in the manufacturing industry but there are also those who work in the service industry (Mahmudah et al., 2016).

CONCLUSION

Digital transformation has entered various aspects of business that bring advances in information and communication technology. Currently, the use of information technology is the main thing in increasing the efficiency, productivity, and competitiveness of the company. Digital transformation includes various adoption technologies such as IoI, AI, robotics, cloud, blockchain, and big data that support organizational management. In business operations management, digital transformation is important in optimizing and modernizing business processes. Operational management is part of achieving organizational goals and providing the best service to customers. In its management, managers need to plan, organize, manage and supervise all aspects of production. In the implementation of digital transformation, companies can integrate technology in operational management.

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