1st International Conference on Management And Business Innovation For Empowering Society 6 Maret 2024

THE ROLE OF DIGITAL CULTURE IN MEDIATING THE INFLUENCE OF DIGITAL LEADERSHIP ON ORGANIZATIONAL PERFORMANCE (CASE STUDY OF BANK NEGARA INDONESIA (BNI) COMMERCIAL BUSINESS CENTER (CMC) MAKASSAR EMPLOYEES)

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ABSTRACT

Changes in the digital era 4.0 have brought significant direction to aspects of human life. Which of course this also has an impact on the scope of the corporate industry in Indonesia. Companies need to make changes to their processes, business models, products and services because driven by the availability of data and digital technology, these advancements spawn continuous innovation in the field of Information and Technology (ICT). This study aims to examine the role of digital culture as mediating the influence of digital leadership on organizational performance. For sampling in this study using total sampling technique, the number of samples for this study were 67 respondents. Data collection using questionnaires. The data analysis tool uses SmartPls 4.0 software. The type of data used is quantitative data. The results of this study indicate that digital leadership has a positive effect on digital culture, digital culture has a positive effect on organizational performance, and digital leadership has a positive effect on organizational performance and digital culture partially mediates the effect of digital leadership on organizational performance.

Keywords: Digital Leadership, Digital Culture, Organizational Performance

1. INTRODUCTION

Revolution is defined as a change The advancement of sophisticated technology can facilitate the process of employee effectiveness and shorten the time so that the work becomes effective and efficient. In the industrial revolution 4.0, the use of digital in life is increasing (Tahar et al., 2022).

Digital transformation has brought about changes in working concepts, professional skills and working relationships to meet market demands. Rethinking the roles of managers and employees has become crucial. Thus, as companies implement the concept of digital transformation in their plans and strategies, new products, processes, services, and business models emerge to reshape existing concepts and meet consumer needs, this requires the acquisition of competencies by organizational leaders. in social and cultural aspects, as well as the general habits of people related to the basis of people's lives caused by the development and progress of science and technology.

The Industrial Revolution 4.0 is a major shift in the social and economic life of society that involves industrial economic activities in all its sectors. This shift can be known as the digitalization trend code and the latest technology and information data exchange. Of course, the changes in the application of industry 4.0 create challenges for the industrial sector in Indonesia. The need to follow these innovations is increasingly becoming a challenge for companies with existing technology. Not only that, some jobs that are usually done by humans are replaced by the sophistication of existing science and technology.

Adiawaty (2019) states that the industrial era 4.0, also known as the era of digitalization, presents new challenges for the world of work. This must be immediately anticipated by companies, especially the human resources division.

Fajriyani et al. (2023) stated that organizations are currently facing new challenges in managing a workforce that has the ability to manage technologies such as the *Internet of Things (IoT), Big Data and Artificial Intelligence (AI)*. To meet the needs of Industry 4.0 which is starting to develop rapidly, leaders must pay attention and develop skills and competencies in the human resources sector.

Skills and expertise, knowledge, job design, personality, work motivation, leadership, leadership style, organizational culture, job satisfaction, work environment are some of the factors that affect organizational performance (Kasmir, 2016).

Adinata (2015) stated that a leader has a deep understanding of the role played by his employees and has the ability to influence the opinions of others without asking for it first. So, a leader can be defined as someone who can think actively and use it to plan, coordinate, experiment and lead work to achieve common goals.

Digital leadership is a combination of transformation leadership style and the use of digital technology. (De Waal et al., 2016). Digital leaders are described as creative, visionary, deep thinking and curious.

In Shin et al.'s research, (2023) shows that digital culture can positively and significantly mediate between digital leadership and organizational performance. Digital culture is essential for digitization and communication between internal and external environments. The object of this research is the employees of Bank Negara Indonesia (BNI) Commercial Business Center (CMC) Makassar, totaling 67 employees.

2. LITERATURE REVIEW AND HYPOTHESES

a. Theoretical Foundation

1) Organizational Performance

Imran *et al.*, (2022) state that organizational performance is the ability of an organization to achieve its goals by using resources effectively and efficiently. Vini *et al.*, (2015) state that organizational performance is the overall effectiveness of the organization to meet the specified needs of each group with regard to systematic efforts and continuously improving the organization's ability to achieve its needs effectively. Factors that affect organizational performance, According to Kasmir (2016), the factors that affect performance both in terms of results and behavior include: skills and expertise, knowledge, job design, personality, work motivation, leadership, leadership style, organizational culture, job satisfaction, work environment.

To measure organizational performance using Shin et al., (2023) citing research by Lee and Choi (2003) which says organizational performance is assessed using global output measures such as the success of organizational growth and market share position compared to major competitors.

2) Digital Leadership

Karollah and Juned (2023) say Digital Leadership can be defined as strategic leadership that leverages the company's digital assets to achieve organizational goals. This leadership drives transformation within the company. Digital leadership is not just about introducing the use of email, websites and social media as part of daily work, but more importantly utilizing data as an important asset. Digital leadership is a leadership style that focuses on implementing digital transformation in an organization (Sağbaş & Erdoğan, 2022).

According to KLEIN (2020) digital leadership means leading the digital transformation process but also leading the organization in a digital environment depending on the level of digital maturity the organization has.

There are five characteristics that digital leaders must possess (Zhu, 2015): Open mind Creative digital leader Visionary, Curiosity, The Deep Leader According to Erhan et al. (2022), the indicators of digital leadership measurement are as follows : increase awareness

of the technology used, digital leaders can play an informative role and behavior in guiding the use of technology

3) Digital Culture

Alfonso (2020) states that digital culture is a set of beliefs, assumptions and symbols that become a way of doing digital business through collaboration, creativity and innovation through digital strategies. Yegen (2019) says this digital culture refers to the cultural influence of the new media environment and the digitization process, where according to some approaches, digital culture has emerged with the new media phenomenon. According to Turkoglu (2019), briefly explaining digital culture is a new form of culture formed by digitalization.

According to Buvat (2017) assumes related indicators or dimensions in digital culture.

- a) Digital First Mindset (Digitalization), the organization will determine solutions together by discussing and asking each other's opinions.
- b) Collaboration, the organization creates cross-functional teams without differentiating the employee's position to optimize the company's expertise oriented towards company achievements.
- c) Innovation, the organization's encouragement to support employees in returning and exploring new ideas.

b. HYPOTHESES

1) Influence Of Digital Leadership On Digital Culture

Shaughnessy (2018) states that for leaders to guide their companies through the transition to a digital culture, a major change for established businesses, they need to be able to understand and explain culture in the context of the values and workflows that make a company digital. Mihardjo (2019) believes that digital leadership is a product of digital culture and skills. Previous research conducted by Shin et al., (2023) showed that the relationship between digital leadership and digital culture is positive. Based on some of the research results that have been put forward by previous researchers, the following hypothesis can be formulated.

H1: Digital Leadership Has A Positive Effect On Digital Culture.

2) Influence Of Digital Culture On Organizational Performance

Duer German et al. (2018) say digital culture drives innovation and new knowledge, thus supporting the creation of new goods and services. In addition, this leads to financial and non-financial organizational performance. Previous research conducted by Shin et al., (2023) showed that the relationship between digital culture and organizational performance is positive. Based on some of the research results that have been put forward by previous researchers, the following hypothesis can be formulated.

H2 : Digital Culture has a positive and significant effect on Organizational Performance

3) Influence Of Digital Leadership On Organizational Performance

Bernarto et al., (2020) the use of information technology by organizations and companies is generally used to facilitate the implementation of business processes and to increase competitiveness. Through information technology, making business processes easier, faster, more efficient and more effective. Previous research conducted by Shin et al., (2023) showed that the relationship between digital leadership and organizational performance is positive. Based on some of the research results that have been stated by previous researchers, the following hypothesis can be formulated.

H3 : Digital Leadership has a positive and significant effect on Organizational Performance

4) The role of Digital Culture in mediating the effect of Digital Leadership on Organizational Performance

Research conducted by Retnowati & Santosa, t.t. (2023) shows that digital culture can affect the sustainability of organizational performance and is also influenced by digital leadership. It is the leader's responsibility to manage and control this digital culture in the organization. Thus, it can be confirmed that digital leadership significantly affects digital culture. Furthermore, digital culture also has an impact on the sustainability of organizational performance. In Shin et al.'s research, (2023) shows that digital culture has a partial mediating effect on the relationship between digital leadership and organizational performance.

H4 : Digital Culture mediates the effect of Digital Leadership on Organizational Performance

Figure 1 shows the relationship between dependent, mediating and independent variables. digital leadership, digital culture and organizational performance. Based on this, the research framework is shown in Figure 1 below.

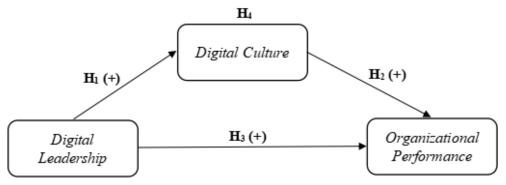


Figure 1. Proposed Conceptual Framework

3. RESEARCH METHODS

a. Population and Sample

Population is the whole element that will be used as a generalization area. The population element is the entire subject to be measured, which is the unit under study (Sugiyono, 2019). In this study, researchers took the population, namely all employees of Bank Negara Indonesia (BNI) CMC Makassar, totaling 67 employees. The sample is part of the number and characteristics possessed by the population. For this reason, the sample taken from the population must be truly representative (representative). Research conducted on populations under 100 should be sampled (Sugiyono, 2019). The data collection method used in this study is to use a questionnaire, which is distributed by giving a set of questions or statements that are directly filled in by respondents to get answers from respondents regarding organizational performance, digital leadership and digital culture.

b. Data Analys Techniques and Hypothesis Testing

1) Validity And Reliability Test

The validity measurement is seen from the loading factor value of each indicator examined as an analytical tool to assess the level of data validity in this study. An individual reflexive measure is said to be high if it correlates more than 0.70 with the construct to be measured. Ghozali & Latan (2015), state that to prove the construct reliability test which is measured by two criteria, namely composite reliability and Cronbach's alpha from the indicator block that measures the construct. The variable can be said to be good if the composite reliability value is > 0.7 and the Cronbach's alpha value is recommended > 0.6.

2) Coefficient Of Determination Test

The coefficient of determination test is used to measure the model's ability to explain the effect of the independent variables simultaneously on the dependent variable which can be indicated by the R-Square value. The R-Square value is the coefficient of determination on endogenous constructs. In general, the R-square value is 0.75 (strong), 0.50 (moderate) and 0.25 (weak).

3) Hypothesis Testing

Hypothesis test t (T test), used to test the first, second, third and fourth hypotheses. The technique used is a bootstrapping technique that does not require assumptions about normal distribution when applying the t statistic or t test because it compares with the t table if it is greater than 1.96 (Ghozali & Latan 2015).

4. RESULT AND DISCUSSION

1) Validity And Reliability Test

Variabel	AVE	Indikator	Loading Factor	Keterangan
	0,645	DL1	0,739	Valid
		DL2	0,861	Valid
Disital Landaushin (DL)		DL3	0,848	Valid
Digital Leadership (DL)		DL4	0,854	Valid
		DL5	0,820	Valid
		DL6	0,681	Not Valid
Digital Culture (DC)	0,431	DC1	0,587	Not Valid
		DC2	0,762	Valid
		DC3	0,725	Valid
		DC4	0,327	Not Valid
		DC5	0,774	Valid
Organizational Performance (OP)	0,718	OP1	0,868	Valid
		OP2	0,873	Valid
		OP3	0,813	Valid
		OP4	0,887	Valid
		OP5	0,791	Valid

The results showed that the statement indicator on the digital culture variable had an AVE value <0.50 by indicating two statement items that had a loading factor value below 0.7. Therefore, the researcher deleted one statement item from the digital leadership variable, namely (DL6) and two statement items from the digital culture variable, namely (DC1 & DC4).

Variabel	AVE	Indikator	Loading	Keterangan
			Factor	
Digital Leadership (DL)	0,700	DL1	0,751	Valid
		DL2	0,904	Valid
		DL3	0,860	Valid
		DL4	0,829	Valid
		DL5	0,832	Valid
Digital Culture (DC)	0,615	DC2	0,780	Valid
		DC3	0,808	Valid
		DC5	0,764	Valid
Organizational Performance (OP)	0,718	OP1	0,872	Valid
		OP2	0,876	Valid
		OP3	0,806	Valid
		OP4	0,887	Valid
		OP5	0,791	Valid

After conducting the second test, it shows that the statement indicators on each variable have a value> 0.50. This indicates that the individual indicators on each variable can be used in this study because they meet the convergent validity requirements with a correlation value that is above 0.50.

Variabel	Composit realibility	Cronbach's Alpha	Keterangan
Digital Leadership	0,921	0,892	Realibel
Digital Culture	0,827	0,691	Realibel
Organizational Perfomance	0,927	0,901	Realibel

The table above reflects that the digital leadership variable shows a number of 0.921 in the composite reliability value, the digital culture variable has a value of 0.827 and the organizational performance variable has a value of 0.927. Because this value is above 0.7, it is stated that the three variables analyzed have good composite reliability.

2) Coefficient Of Determination Test

Variabel	R-square		
Digital Culture	0,441		
Organizational Performance	0,413		

The table shows that the R-Square value for digital culture influenced by digital leadership is 44.1% and the organizational performance variable is influenced by digital leadership by 41.3%. The R-Square value is classified as a weak model.

3) Hypothesis Testing

Hipotesis	Sampel Asli (O)	Rata- rata sampel (M)	Standar Deviasi (STDEV)	T-Statistik (O/STDEV)	P Values	Keterangan
Digital Leadership \rightarrow Digital Culture	0,664	0,673	0,064	10,295	0,000	Accepted
Digital Culture → Oganizational Performance	0,357	0,366	0,136	2,621	0,009	Accepted
Digital Leadership → Organizational Performance	0,348	0,344	0,124	2,815	0,000	Accepted
Digital Leadership →Digital Culture → Organizational Performance	0,237	0,246	0,095	2,485	0,013	Accepted

The analysis of the table above concludes that there is an influence between variables if the t statistical value is more than the t table (1.96) or the p value is less than 0.05 so that the effect of each independent variable on the dependent variable is less than 0.05.

4) **DISCUSSION**

a) Positive effect Of Digital Leadership on Digital Culture

The results of testing the first hypothesis, namely the effect of digital leadership variables on digital culture, show a p-value of 0.000 < 0.05 and a t-statistic value of 10.295 more than the t-table of 1.96, indicating significant. And for the positive path coefficient of 0.664 reflects that the effect of digital leadership on digital culture is unidirectional. Thus, digital leadership has a positive effect on digital culture.

b) Positive effect of Digital Culture on Organizational Performance

The results of testing the second hypothesis, namely the effect of digital culture on organizational performance, show a positive path coefficient value of 0.357. This positive path coefficient reflects that the effect of digital culture variables on organizational performance is unidirectional. Indicated by the p-value showing 0.009 <0.05 and the t-statistic value of 2.621 more than the t-table of 1.96 reflects a positive and significant effect on the digital culture variable on organizational performance.

c) The Effect of Digital Leadership on Organizational Performance

The results of testing the third hypothesis, namely the effect of digital leadership on organizational performance, show a positive path coefficient value of 0.348. This positive path coefficient reflects that the effect of digital leadership variables on organizational performance is unidirectional. Indicated by the p-value showing 0.000 <0.05 and the t-statistic value of 2.815 more than the t-table of 1.96 reflects a positive and significant effect on the digital leadership variable on organizational performance.

d) Digital Culture mediates the relationship between Digital Leadership and Organizational Performance.

The results of testing the fourth hypothesis, namely the mediating effect of digital culture between the relationship between digital leadership and organizational performance, the p-value shows 0.013 < 0.05 and the t-statistic value of 2.485 is more than 1.96, concluding that digital culture is able to partially mediate the effect of digital leadership on organizational performance.

5. CONCLUSION

Based on the results of the research that has been carried out, the researcher can draw the following conclusions.

- a) Digital Leadership has a positive and significant effect on Digital Culture of Bank Negara Indonesia (BNI) CMC Makassar employees.
- b) Digital Culture has a positive and significant effect on Organizational Performance of Bank Negara Indonesia (BNI) CMC Makassar employees.
- c) Digital Leadership has a positive and significant effect on Organizational Performance of Bank Negara Indonesia (BNI) CMC Makassar employees.
- d) Digital Culture partially mediates the effect of Digital Leadership on Organizational Performance.

6. REFERENCES

Adiawaty, Susi. 2019. Kompetensi Praktisi Sdm Menghadapi Era Indusri 4.0. Vol. 22.

- Bernarto, Innocentius, Diana Bachtiar, Niko Sudibjo, Ian Nurpatria Suryawan, Agus Purwanto, And Masduki Asbari. 2020. "Effect Of Transformational Leadership, Perceived Organizational Support, Job Satisfaction Toward Life Satisfaction: Evidences From Indonesian Teachers." International Journal Of Advanced Science And Technology 29(03):5495–5503.
- Buvat, J., Crummenerl, C., Kar, K., Sengupta, A., Solis, B., Aboud, C., Dan Aoufi, H.
 E. 2017. The Digital Culture Challenge: Closing The Employee-Leadership Gap By The Digital Transformation Institute.
- De Waal, Benny, Frank Van Outvorst, And Pascal Ravesteyn. N.D. Digital Leadership: The Objective-Subjective Dichotomy Of Technology Revisited.
- Dwi, Indah, Rahayu Mochammad, Al Musadieq, And Arik Prasetya. 2017. Pengaruh Gaya Kepemimpinan Dan Program Keselamatan Dan Kesehatan Kerja Terhadap Motivasi Kerja (Studi Pada Karyawan Tetap Maintenance Department Pt Badak Lng Bontang). Vol. 43.
- Farunik. 2019. "Admin,+Journal+Manager,+11.+Jurnal+-+Suhartini+Dan+Lusianah (3)." *Primanomics : Jurnal Ekonomi Dan Bisnis - Vol. 17. No. 1 (2019).*
- Ghozali, Imam dan Hengky Latan (2015). Partial Least Squares Konsep Teknik dan Aplikasi dengan Program Smart PLS 3.0. Semarang: Universitas Diponegoro Semarang
- Klein, Müge. 2020. "Leadership Characteristics In The Era Of Digital Transformation." Business & Management Studies: An International Journal 8(1):883–902. Doi: 10.15295/Bmij.V8i1.1441.
- Lee, Heeseok, And Byounggu Choi. 2003. "Knowledge Management Enablers, Processes, And Organizational Performance: An Integrative View And Empirical Examination." *Journal Of Management Information Systems* 20(1):179–228.

- Shaughnessy, Haydn. 2018. "Creating Digital Transformation: Strategies And Steps." *Strategy And Leadership* 46(2):19–25. Doi: 10.1108/SI-12-2017-0126.
- Shin, Jinkyo, Md Alamgir Mollah, And Jaehyeok Choi. 2023. "Sustainability And Organizational Performance In South Korea: The Effect Of Digital Leadership On Digital Culture And Employees' Digital Capabilities." Sustainability (Switzerland) 15(3). Doi: 10.3390/Su15032027.
- Sugiyono. (2019). Metode Penelitian Kuantitatif, Kualitatif Dan R&D. (Cetakan Ke-1). Bandung: CV Alfabeta
- Suhag, Abdul Karim, Shafique Rahman Solangi, Raja Sohail Ahmed Larik, Muhammad Kamil Lakho, And Altaf Hussain Tagar. 2017. "The Relationship Of Innovation With Organizational Performance." *International Journal Of Research -Granthaalayah* 5(2):292–306. Doi: 10.29121/Granthaalayah.V5.I2.2017.1741.
- Tahar, Achmad, Pompong B. Setiadi, Sri Rahayu, Magister Manajemen Stie, And Mahardhika Surabaya. 2022. Strategi Pengembangan Sumber Daya Manusia Dalam Menghadapi Era Revolusi Industri 4.0 Menuju Era Society 5.0. Surabaya.
- Vini, Oleh ..., Destriyani Pembimbing, Taufeni Taufik, And Eka Haryani. 2015. Pengaruh Good Governance, Kualitas Sumber Daya Manusia, Pemanfaatan Teknologi Informasi Dan Pengendalian Intern Terhadap Kinerja Organisasi (Studi Pada Satuan Kerja Perangkat Daerah Kabupaten Kepulauan Meranti). Vol. 2.
- Wawan Sam Adinata Stie Pasundan Bandung, Ujang. N.D. Pengaruh Kepemimpinan Transformasional, Motivasi, Dan Budaya Organisasi Terhadap Kinerja Karyawan Kjks Bmt Tamzis Bandung
- Zhu, P. (2015). Digital Master : Debunk the Myths of Enterprise Digital Maturity. Lulu Press, Inc