

The Influence of Business Models, Use of Information Technology on the Quality of Accounting Information Systems Digitizing MSMEs Post-COVID-19

Supriyati*

Computerized Accounting, Faculty of Engineering and Computer Science, Universitas Komputer Indonesia
Dipati Ukur Street number 112-116, Bandung, 40132, Indonesia
supriyati@email.unikom.ac.id

Sri Mulyani

Padjadjaran University
Dipati Ukur Street Number 35, Bandung, 40132, Indonesia
Singaperbangsa Karawang University
HS. Ronggo Waluyo Street, Kabupaten Karawang, 41361, Indonesia
sri.mulyani@unpad.ac.id

Harry Suharman

Doctor of Accounting, Faculty of Economics and Business, Padjadjaran University
Dipati Ukur Street Number 35, Bandung, 40132, Indonesia
harry.suharman@unpad.ac.id

Taufiq Supriadi

Sekolah Tinggi Perpajakan Indonesia
Matraman Raya Street Number 27, Jakarta Timur, 13140, Indonesia
Badan Pemeriksa Keuangan RI
Gatot Subroto Street Number 31, Jakarta Pusat, 10210, Indonesia
taufiq.supriadi@bpk.go.id

Abstract

Many organizations realize the importance of building information systems based on the formulation of business models and implementing them into company activities. The survival of an organization is determined by its ability to compete in the market. In modern systems, there are dependencies between enterprise information systems, business models and enterprise business processes. There is an equally strong influence between business models and information systems. The goal achieved between business models and information systems is to maintain a balance between the three dimensions of sustainable development, namely: environmental, social, and economic. The research method used is qualitative with a field approach, an institutional approach, and a library approach. The types of data used in this research are primary data and secondary data. The data collection technique used is observation and literature study both nationally and internationally, while secondary data comes from journals, proceedings, government regulations, and statutory regulations. The output target achieved is obtaining business models, information technology on the quality of MSME accounting information systems after Covid-19.

Keywords: MSMEs, business models, information technology, quality of accounting information systems, Post COVID-19

* Corresponding Author

Introduction

The development of information technology is used by various business actors to develop the business world through information systems in every daily business activity that almost touches all levels of world society. In this fourth-generation industrial era, the size of the company is not a guarantee, but the agility of the company is the key to achieving achievements quickly. The COVID-19 pandemic that has occurred since March 2020 also has a significant impact on the Indonesian economy. In the early days of the pandemic, we could see that almost all business sectors were affected by COVID-19, hampering economic activity, and putting pressure on future world economic growth, including Indonesia's economic growth. Micro, Small and Medium Enterprises (MSMEs) are one of the keys to economic growth in Indonesia. The Central Statistics Agency stated that the number of MSMEs reached 64 million or 99.9 percent of all businesses operating in Indonesia. More than 60% of GDP comes from MSMEs and more than 90% of the workforce is absorbed by MSMEs ([Tim Komunikasi Panitia Penanganan COVID-19 dan Pemulihan Ekonomi Nasional 2021](#)). This makes the movement of MSMEs very influential on the national economy ([Tim Komunikasi Panitia Penanganan COVID-19 dan Pemulihan Ekonomi Nasional 2021](#)). However, as in almost all countries, the MSME sector in Indonesia is experiencing the impact of the COVID-19 pandemic. These impacts are decreased sales, capital difficulties, product distribution barriers, and raw material difficulties ([Sugiri 2020](#)). The current global economic slowdown has had a major impact on Indonesia's economic growth. This can be seen in the sensitivity analysis of the Indonesian economy. Based on the sensitivity analysis, it was found that when China's economy slowed by 1% it would affect and have an impact on Indonesia's economic growth rate of -0.09%. This is also in line with further sensitivity analysis where every 1% economic slowdown in the European Union will have an impact on the rate of economic growth in Indonesia, namely -0.07%, India (-0.02%), Japan (-0.05%) and the United States (-0.06%) ([Nasution et al. 2020](#)). The same picture also occurs in most commodities, namely every 10% decrease in crude palm oil (CPO) prices will have an impact on the Indonesian economy by 0.08%, positive oil by 0.02%, and coal by -0.07% ([Nasution et al. 2020](#)). While companies must prepare themselves to be able to keep up with the development of information technology in the era of the industrial revolution 4.0, they must also be able to survive in pandemic conditions. This makes the challenge even tougher for all companies, but it can also force companies to take the digital leap. Challenges in the industrial revolution 4.0 including 1) Information technology security issues 2) Reliability and stability of production machinery, 3) Lack of adequate skills, 4) Reluctance to change by stakeholders, 5) Loss of many jobs due to changing into automation ([Supriyati 2019](#)).

The COVID-19 pandemic has been almost 2 years since the first case in Indonesia, during which time many companies looked bankrupt. Chairman of the Indonesian MSME Association, Ikhsan Ingratubun said, throughout 2020 there were around 30 million MSMEs that went out of business due to Covid-19 ([Sembiring 2021](#)). However, not all MSME actors have been affected by the Covid-19 pandemic, MSMEs doing business using digital technology have actually grown significantly. Minister of Cooperatives and SMEs Teten Masduki said: "The ones affected by MSMEs are related to office, school, industrial activities, because WFH (work from home) has stopped their business, mostly in the food and beverage sector. There are MSMEs that can still sell but their turnover is down. Beyond that, there is growth, namely MSMEs that are connected to digital platforms" ([mediaindonesia.com 2021](#)). Globalization and economic changes from an industry-based economy to an information-based economy require businesses to operate more effectively, efficiently, and in control by prioritizing competitive advantages at both local and global levels, through improving the quality of human resources/goods, services and increasing the use of information technology ([Susanto 2017](#)). Airlangga Hartarto as the Minister of Industry stated that currently the government has set 10 national priority steps to implement the Making Indonesia 4.0 roadmap (Kementerian Perindustrian Republik Indonesia 2018). This strategy is believed to be able to accelerate the development of the national manufacturing industry to be more globally competitive in the current digital era (Kementerian Perindustrian Republik Indonesia 2018). The survival of an organization is largely determined by its ability to compete in the market ([Green 2007](#)).

Technology is constantly evolving new ways to present information, it remains important for AIS research to identify the factors associated with presentation format that affect information use in order

to inform standard setters and designers and users of accounting information systems (Kelton et al. 2010). Most of the research currently conducted in the accounting information systems (AIS) and information systems (IS) areas focuses on understanding phenomena and finding new truths: why things work the way they do. To discuss accounting expert systems from a design science perspective. A key issue addressed in their paper is how much developing expert systems can advance knowledge and, therefore, can be considered as research (Kallunki et al. 2011). There is a growing dependence between enterprise information systems and business models in modern systems (Laudon 2018). An accounting information system is a collection of integrated physical and non-physical components to process financial data into financial information that is needed in decision making by managers and external parties (Supriyati 2020). The process of implementing an adequate accounting information system can assist MSME owners in determining the right business strategy in the Covid-19 pandemic. Therefore, there is a reasonable belief that the accounting information system plays a sufficient role in supporting success in determining strategies in terms of achieving business goals and objectives (Rahmadani 2020). Brenner stated that the problem in developing MSMEs not only rests on increasing their number significantly and providing the widest possible business opportunities for the community, but also on increasing the competitiveness of MSMEs at the local, national and international levels to enjoy the benefits of trade and investment liberalization (Brenner 2020). It was mentioned that being part of the debate in the SME forum about cooperation with the Asia Pacific Economic Council (APEC) on the need for a new business unit to ensure broad participation for members of the APEC community. In addition, views on the need for economic and technical cooperation proposals (ECOTECH) by developing countries to increase the competitiveness of in APEC member industries global competition. In today's global business industry, digitalization of companies is important. Many businesses mutual funds die because they are unable to keep up with technological developments. One of the companies that had suspended animation was Toys R Us, this toy retail company has more than 700 outlets in America and the UK which in 2017 had to close hundreds of outlets because it was badly beaten by e-commerce in America such as Amazon and Walmart and had to laid off about 33 thousand employees without severance pay. Toys R Us was eliminated due to losing to the online shopping trend in e-commerce which directed consumer shopping behavior in a more practical direction and Toys R Us was unable to keep up with technological developments (AsiaQuest Indonesia 2020). Based on the above phenomena, this study intends to conduct basic research with an in-depth study of the use of good business models and optimal use of information technology on the quality of accounting information systems as a support for the digitization of MSMEs echoed by the government, especially in post-Covid-19 conditions. The right development model is expected to create an increase in the income and welfare of MSME business actors.

Research Question

- 1) How does the business model influence the Quality of Digital-Based MSME Accounting Information Systems?
- 2) How is the influence of information technology on the Quality of Digital-Based MSME Accounting Information Systems?

Research purposes

- 1) Knowing the influence of the business model on the Quality of Digital-Based MSME Accounting Information Systems.
- 2) Knowing the influence of information technology on the Quality of Digital-Based MSME Accounting Information Systems.

Literature Review

Business Model

Research in Accounting Information Systems (AIS) has long recognized the importance of information representation. Business process representation plays an important role in this context, as auditors have

a choice between different types of textual and visual representations. Regarding search, recognition and partly for inference tasks, visual business process models seem to be more suitable than textual models (in terms of efficiency and effectiveness, both for experts and beginners). Regarding the memorization task (both for experts and beginners), and partly for the problem-solving task (for experts only), the textual model gave better results than the visual model. This finding supports the concept of theoretical affinity (Ritchi 2019). Whereas different approaches describe business models, most of the current literature agrees on a central aspect: creating and capturing value by delivering a value proposition to customers (Fielt, E. 2013).

According to Demil & Lecocq (2010) a business model is defined as the interaction between three dimensions, namely the value proposition, value network, and resources and competencies. The value proposition describes what the company offers to the market. The value network is related to the company's internal organization and especially to transactions with external partners. Finally, competencies and resources must be utilized to create value for customers (Demil & Lecocq 2010). Indicators of business model success are seen from its ability to overcome competitor threats which include: (1) replication, (2) reading the strength of the company model, (3) not focusing on the market, and (4) substitutes; the ability of competitors' products to seize the market for the company's products. These three things characterize a good business model (Raharjo 2018). Figure 1 illustrates one of the tools that can be used to develop a business model, namely using the Business Model Canvas. The Business Model Canvas is used to explain the various business activities of the company, the company's income & expenses, the value of a company, the segmentation of the company and the way the company is received by its customers.

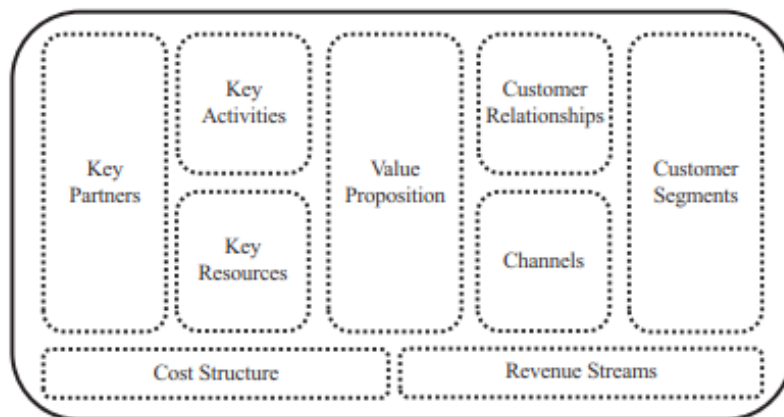


Figure 1. Business Model Innovation (Business Model Canvas)

Use of Information Technology

New ways of presenting information remain important for AIS research to identify factors related to presentation formats that affect the use of information to inform standard setters, designers, and users of accounting information systems (Kelton 2010). Most of the research currently carried out in the fields of accounting information systems (AIS) and information systems (IS) focuses on understanding phenomena in order to discover new truths: why things work the way they do. Talking about accounting expert systems from the perspective of design science, the main issue discussed is how much the development of expert systems can advance knowledge and can be considered as research. The system is expected to have the following three criteria: (1) database orientation, meaning that data needs to be stored at the most primitive level; (2) semantic orientation; and (3) structuring orientation (Geerts 2011). IT enables aid workers, affected communities, volunteers to create, collect, share and use information during an emergency response. IT is used to assess response progress (eg number of people rescued from floods), coordinate activities between aid agencies, government agencies, companies, volunteers, provide direction and appeal to donors (Fernandes 2021).

Quality of Accounting Information System

The system can be interpreted as a collection of subsystems, components or elements that work together with the same goal to produce a predetermined output (Mulyani 2016). Information is data that has been processed that is intended for a person, organization or anyone who needs it (Mulyani 2016). In the decision-making process, a person needs information related to the decision to be taken. Information is often defined simply as processed data, moreover information is data that has been organized and processed to give meaning, improve decision-making processes (Hall 2010) (Romney and Steinbart 2012) (Bodnar 2010) (Gelinas 2008). Regarding the quality of accounting information systems, quality accounting information is needed. Accounting information is one of the types of quantitative information and is the output of AIS and is financially oriented (Gelinas 2008) (Wilkinson, 1999).

In the context of AIS development, the method used in the system cycle is the SDLC (System Development Life Cycle) method. SDLC is a method used to develop a system. The SDLC is also used by systems analysts to develop information systems involving requirements, validation, training, and system owners. SDLC is identical to the waterfall system development technique because the stages decrease from top to bottom (Mulyani 2016). The Accounting Information System records, reports business transactions, the flow of funds within the organization and then produces financial reports (Mulyani et al. 2019).

Based on the opinion above, it can be concluded that accounting information is financial data that has been processed into financial information that is useful for decision making. Regardless of physical form, useful information has the following characteristics: relevance, timeliness, accuracy, completeness, and summary (Hall 2010) (Anthony 2000). Remember that quality information is accurate, reliable, current, complete, and presented in an appropriate format (Stair 2010).

Based on the explanation above, the quality of the information system can be concluded that the quality of accounting information includes relevant, reliable, accurate, timeliness, conciseness clarity, complete, timely, understandable, verifiable, and accessible. Information must also be open and transparent. Transparency is an information that is given accurately, clearly, and overall to the information user so that the information provided can be understood properly and does not cause misunderstanding between the party providing information and the wearer (Ladewi, Y., Et. al 2022).

MSMEs

In modern systems, growing interdependence between enterprise information systems, business models in the form of business models and enterprise business processes. Stating that being part of the debate in the MSME forum on cooperation with the Asia Pacific Economic Council (APEC) on the need for a new business unit to ensure broad participation for members of the APEC community, as well as views on the need for proposals for economic and technical cooperation (ECOTECH) by developing countries to improve the competitiveness of APEC member industries in global competition. Various references mention various concepts that can be used to measure the business model in an organization. According to Mutegi, Njeru, & Ongesa the performance of MSMEs is the result or evaluation of the company's work achieved by a person or group with the division of activities in the form of tasks and roles in a certain period with the standards of the company (Mutegi et al. 2015). According to Ali, MSME performance is analyzed with three approach assumptions, namely it is difficult to measure MSME performance due to limited resources, measuring MSME performance is only complex financial indicators that are identified so that they do not show actual business results, and MSME performance measurement is often used by large-scale companies and structured management. (Ali 2003). MSME performance is a function of various factors such as financial services and government support, these factors can be suppressed or driven by other mediating variables (Esubalew & Raghurama 2020).

To compete in the global arena, MSMEs must be responsive in dealing with environmental changes due to the technology and information revolution (Bardan 2020). Adaptation to a rapidly changing environment requires precision and accuracy for decision making. MSME owners who are also

managers are faced with many alternative choices related to efficiency, such as material selection, product design, market, distribution, and service to customers. Therefore, accurate calculations are needed in every decision-making and action. Many MSMEs use AIS with the aim of gathering more information to help owners make decisions. Ultimately, this leads to increased efficiency, profitability, and performance of MSMEs. In this backdrop, the use of information communication technology (ICT) will certainly provide timely and valuable information, knowledge, knowledge for SMEs, better relationships with suppliers, customers, better collaboration, increased productivity, and efficiency ([Cuevas-Vargas et al. 2016](#)).

Framework of thinking

The Influence of Business Strategy Models on the Quality of Accounting Information Systems

Ishak Ramli and Denny Iskandar in their research explain that: "business strategy has a significant and positive effect on the characteristics of Management Accounting Information Systems" ([Ramli & Iskandar 2014](#)). Research by Lestari and a also explains that:

“Business strategy affects the quality of management accounting information systems. Where the management accounting information system is the heart of the company to achieve competitive advantage. The use of accounting information systems (finance and management) can effectively reduce the costs incurred to carry out back-office functions within the company (accounting and payroll functions, procurement of goods, inventory tracking, and asset management management)” ([Lestari, R., and Hertati 2020](#)).

Another study by Lilis Puspitawati and Azhar Susanto explains:

“Improving the quality of management accounting information, company managers must be able to improve the effectiveness of management accounting information systems. The effectiveness of the management accounting information system can be increased if the implementation of business strategies also increases” ([Puspitawati & Susanto 2018](#)).

Research by Maya Sari explains that: "Business Strategy affects the Quality of Accounting Information Systems by 9.14%" ([Sari 2018](#)). According to Ishak Ramli and Denny Iskandar in their research:

“Business strategy has a significant and positive effect on the characteristics of the Management Accounting Information System. In developing a Management Accounting Information System, business strategy is the most important factor to consider, then informal authority, and the least is the formal structure of authority control” ([Ramli & Iskandar 2014](#)).

Based on the results of the studies above, the authors conclude that the business strategy model affects the quality of the accounting information system, where the better the business strategy in the digital approach, the better the quality of the accounting information system.

The Influence of the Use of Information Technology on the Quality of Accounting Information Systems

Research by Meiryani and Azhar Susanto explains that: "the quality of accounting information systems is influenced by the use of information technology" ([Meiryani & Susanto 2018](#)). Sacer et al. in his research, explains that: "IT significantly contributes to the accuracy and timeliness of accounting information and the quality of Accounting Information Systems" ([Sačer and Oluć 2013](#)).

Dwirandra and Astika in their research explain that: "the behavior of using AIS that is increasingly intensive increases individual performance and the perceived environmental uncertainty encourages the use of AIS to be more intensive and massive, thus encouraging an increase in individual performance" ([Dwirandra and Astika 2020](#)). To measure the use of information technology was through the dimensions of quality Hardware, Application Software, and Telecommunication and Network used by the enterprise ([Supriadi, et al. 2019a](#)). So that the transaction processing system consists of hardware

and software that together have the ability to carry out corporate transactions ([Supriadi, et al. 2019a](#)) ([Supriadi, et al. 2019b](#)).

Based on the results of the studies above, the authors conclude that the use of information technology affects the quality of accounting information systems, where the better the use of information technology, the better the quality of accounting information systems. So, every company should not ignore the use and development of information technology. The development cannot be denied because every application of this technology facilitates service to the consumer ([Tangkilisan, et. al. 2021](#)).

Based on previous research, the authors describe the framework used as follows:

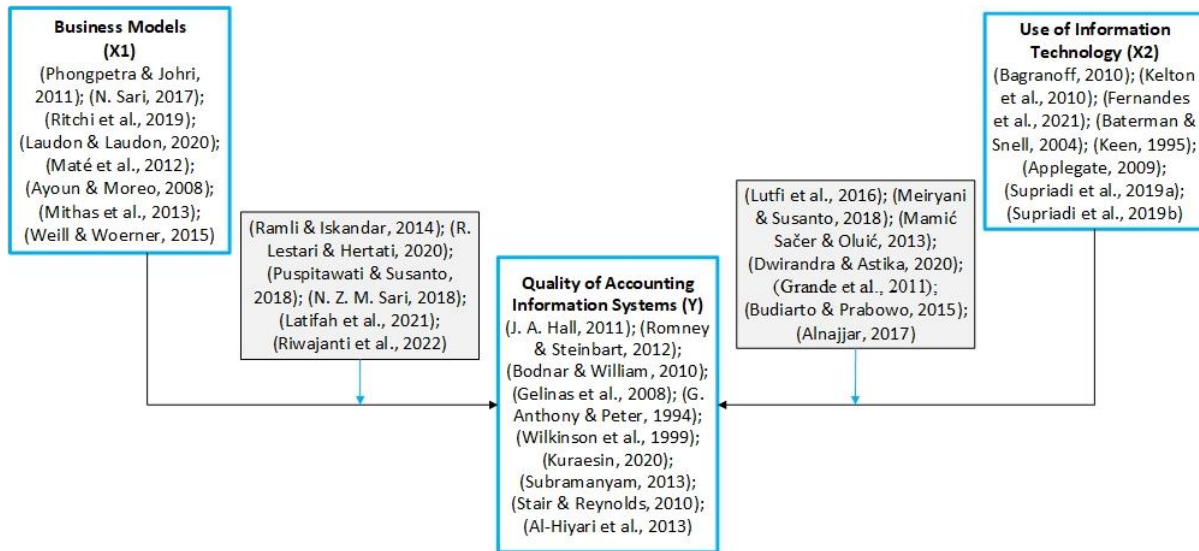


Figure 2. Framework of thinking

Based on the literature review and the framework of thinking above, the hypotheses in this study are:

H1: The business strategy model has an effect on the Quality of Accounting Information Systems.

H2: Use of Information Technology affects the Quality of Accounting Information Systems.

Research Method

The research method used in this study is a quantitative research method. Data collection techniques used were interviews with the Office of Cooperatives and Small Businesses of West Java Province and literature studies. The types of data used are primary and secondary data. The population used in this study was 6,257,390 MSME units spread across all regencies/cities in West Java. While the sample used was 135 MSME units in West Java with various business categories, namely accessories, batik, borders, crafts, fashion, convection, culinary, food, drinks, services, and others. When validating the data in the field, the researcher compares it with supporting documents. The data analysis technique used in this study uses an interactive data analysis model by Miles and Huberman ([Bodnar 2010](#)), including data reduction, data presentation, and drawing conclusions/verification. The object of research used in this study is the digitization of SMEs in West Java. While secondary data comes from open journal systems, proceedings, government regulations, and laws and regulations.

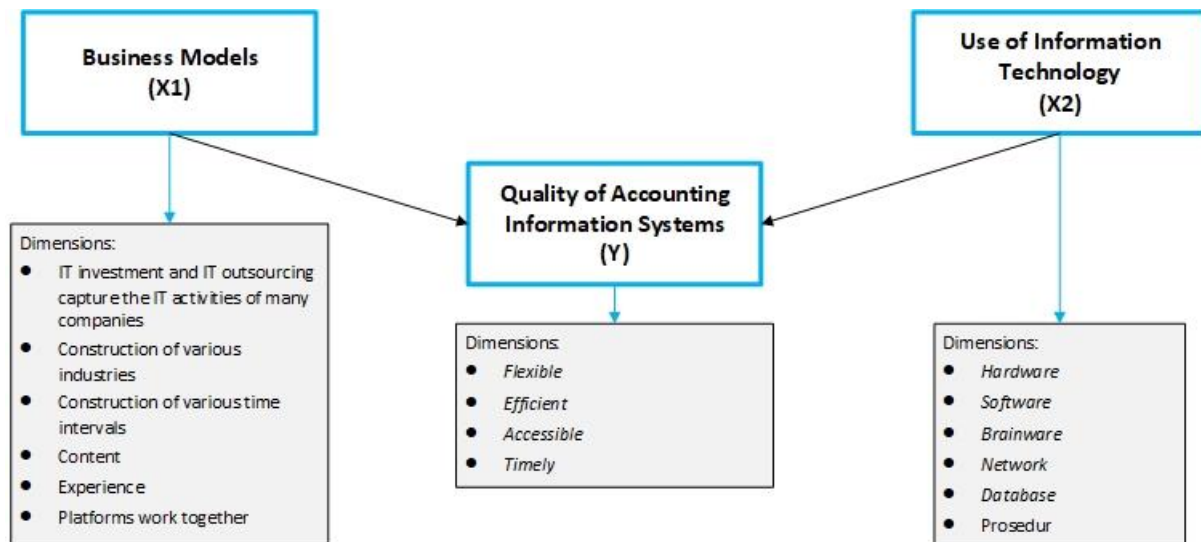


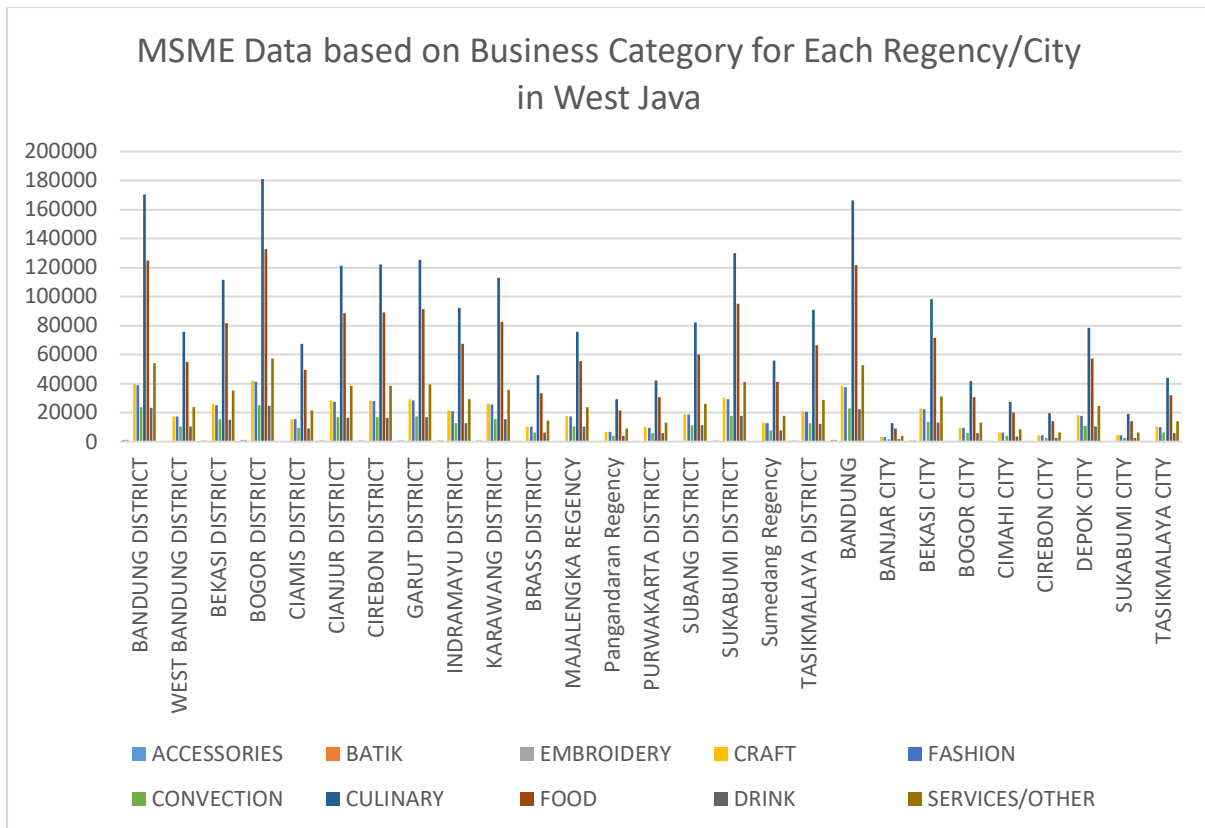
Figure 3. Operationalization of Research Variables

From [Figure 3](#) it is explained the operationalization of the variables, namely:

1. Digital business strategy emerges as a result of the interaction between the company's digital strategic posture and the industrial environment ([Mithas et al. 2013](#)).
2. Technology continues to develop new ways of presenting information, it remains important for AIS research to identify the factors that influence the use of information to inform standard setters, designers and users of accounting information systems ([Kelton et al. 2010](#)).
3. The quality of the accounting information system is a technical subsystem with indicators of hardware, software, databases, procedures and social subsystems with brainware indicators and management must pay attention to the application of AIS ([Rapina 2014](#)).

Results and Discussion

Based on data obtained from the Office of Cooperatives and Small and Medium Enterprises of West Java Province, currently there are 6,257,390 MSME units spread across all regencies/cities in West Java which have high potential but are still managed manually and simply ([Dinas Koperasi dan Usaha Kecil Provinsi Jawa Barat 2021](#)). [Figure 4](#) depicts a graph of the distribution of MSMEs by business category throughout West Java. The potential of MSMEs is predicted to increase rapidly if MSME business actors modernize their business processes by optimally utilizing information technology so that the products/services produced can compete with the products/services produced by other companies.



Source: West Java KUKM Service Data Management ([Dinas Koperasi dan Usaha Kecil Provinsi Jawa Barat 2021](#))

Figure 4. MSME data by business category for each Regency/City in West Java

Business organizations in Indonesia do not yet have a good business model, marked by the absence of adequate product innovation, as well as the presence of monotonous and less varied products, especially in terms of business model dimensions and indicators consisting of replication, MSME potential, weak market share and substitution inadequate, causing MSMEs to be unable to survive in the industrial revolution 4.0. Research by Sari explains that business strategy affects the Quality of Accounting Information Systems by 9.14%” ([Sari 2018](#)). Business strategy affects the quality of management accounting information systems, where management accounting information systems are the heart of the company to achieve competitive advantage. The use of accounting information systems (finance and management) can effectively reduce the costs incurred to carry out back-office functions within the company (accounting and payroll functions, procurement of goods, inventory tracking, and asset management management) ([Lestari, R., and Hertati 2020](#)). Another study by Lilis Puspitawati and Azhar Susanto explained that: Improving the quality of management accounting information, company managers must be able to increase the effectiveness of management accounting information systems. The effectiveness of the management accounting information system can be increased if the implementation of business strategies also increases ([Puspitawati & Susanto 2018](#)).

Based on the facts found in the real world, the implementation of the business model in Indonesia is still far from the expected condition. Research by Marketing Research Indonesia (MRI) in 2005 showed a weakening trend in the domestic aviation business market because several airlines were not good at determining market segments and positioning. Another thing that is no less interesting was stated by the President Director of PT. Astra International Tbk, Prijono Sugiarto, in 2015 that Overall, the weakening of product demand during the first quarter was caused by PT. Astra does not diversify its products, which is indicated by the lack of new products being launched.

Another problem is that Indonesia is still far behind in innovation and needs to urgently accelerate strategic innovation ([Habibie 2015](#)). Based on these various problems, it can be said that business organizations in Indonesia have not been able to have a good business model, which is characterized by the absence of adequate product innovation, weak market share, and the existence of products that seem monotonous and less varied.

Information systems experts claim that user competence affects an effective accounting information system ([Bollen 2006](#)). The user-oriented design philosophy demonstrates the importance of attitudes and approaches to systems development that consciously consider the entire organizational context. Users need to be involved in application design ([Bollen 2006](#)). More on this source text is required for additional translation information. Send Side Panel feedback. System users (accountants) will work effectively depending on how they have adequate knowledge of Accounting Information Systems and the technology used to implement accounting information systems ([Bodnar 2014](#)). According to Gelinis, the knowledge that system users must possess is knowledge in the fields of computer literacy, information literacy, business fundamentals, systems theory, systems development, and system modeling, while the skills/expertise that must be possessed are communication skills, analytical skills, creativity, and leadership. ([Gelinis 2008](#)). Furthermore, according to ([Fauzi 2021](#)), the knowledge that must be possessed by competent users in designing accounting information systems is knowledge in terms of accounting principles, auditing, information system technology, and system development methods. Various other facts found in the field include the condition of incompetent human resources within the local government ([Hall 2011](#)).

Companies will not succeed in designing new systems or understanding existing systems without understanding the organization's ongoing business activities, because information systems and organizations influence each other with a very complex relationship, influenced by many mediating factors such as organizational structure, business processes, politics, organizational culture, environment and management policies ([Laudon 2018](#)). Understanding the flow patterns of responsibility, authority and accountability is important in assessing the information needed by users ([Hall 2011](#)). Every manager at various levels and parts of the organization has a different role from one another. Therefore, managing an organization at various levels and sections will require different information. The accounting information system is built to flow information in accordance with the information needed by users at each hierarchical level in their organizational structure to help them make decisions in carrying out their duties ([Susanto 2017](#)). Leadership behavior affects the quality of accounting information systems. The low quality of accounting information systems at accredited universities in Java, Indonesia is characterized by an inflexible system, an unreliable system and an unintegrated system caused by leaders who have not fully done what they should have done ([Fitrios 2018](#)).

The Indonesian government is still focused on the development of digital technology. This can be seen from the efforts of the President of the Republic of Indonesia, Joko Widodo, who launched a vision to make Indonesia "The Digital Energy of Asia in Silicon Valley" in mid-February 2017. In line with the Ministry of Communication and Informatics, the Informatics Program together with KIBAR, initiated the National 1000 Startup Digital Movement to create quality and positive impact by solving big problems in Indonesia. This movement is targeted to create 1,000 new companies with a total business valuation of USD 10 billion by 2020. According to the Ministry of Communication and Information, the potential of the digital industry in Indonesia cannot be underestimated. There are around 93.4 million internet users and 71 million smartphone users in Indonesia today. This condition is a big capital for Indonesia to develop e-commerce business and implement digital technology. The volume of e-commerce business in Indonesia is estimated at USD 130 billion, with an annual growth rate of around 50 percent. This is in line with what Telekomunikasi Indonesia or Telkom has done again to launch the Digital UKM Village program in Bandung Regency this year. In addition to seeking inspiration in producing goods and marketing products, Wahyuddin said that cellphones can also be used to make sales, withdraw money, and make payments electronically. The Regent of Bandung, Dadang M. Naser accompanied by the Head of the Department of Cooperatives, MSMEs, Industry and Trade, Bandung Regency Popi Hopipah welcomed the SME Digital Village program held by PT Telkom. "This is a

breakthrough for MSMEs in producing or marketing their products. So that MSMEs in Bandung Regency can compete with other entrepreneurs in ASEAN and abroad," he said.

According to Romney and Steinbart, AIS collects, records, stores, processes accounting and other data to produce information for decision makers. The right decision can only be made based on the quality of the information generated by the accounting information system. But in reality, the existing accounting information is not in accordance with the needs of users, so that the resulting information is not of high quality (Romney and Steinbart 2012). System Quality, Information Quality, and Service Quality have increased so that User Satisfaction also increases so that it has an impact on increasing SIPKD Net Benefits at the Sumedang Regency Satker, meaning that the better the system is determined by the quality of the system, the quality of the information produced, and the quality of services provided by the provider application, the greater the satisfaction of system users, with user satisfaction resulting in the benefits obtained from system users (Kuraesin 2021). A good Accounting Information System has a sustainable standard of assurance (Mulyani 2019).

In the study by Sari, it is stated that the low quality of accounting information is indicated by the inaccuracy of the information conveyed to users, and it is also supported by research by Komala (2012) which shows that the quality of accounting information systems affects the quality of accounting information (Sari 2015).

Conclusion

The limitation of this research, the sample used is Small Business which is included in the development of MSME Champion from the West Java DISKUK program and which has implemented digitization in its business processes from various business categories. From these samples were analyzed and the results obtained that the business model has a positive effect on the quality of accounting information systems. MSMEs are digital-based, and their performance will be seen in the context of each MSME. Information technology has a positive effect on the quality of digital MSME accounting information systems. Business models and information technology will affect the quality of accounting information systems and performance in the context of each MSME. If viewed simultaneously business model and company performance is a process of interaction between environmental factors and organizational factors. Environmental factors are used as industrial uncertainty for each MSME, while organizational factors are measured from the process of formulating their business model. Company performance, such as market share growth, gross profit margin, and return on investment. The observed business model is a financial and non-financial based strategy from MSMEs. This research can still be developed by optimizing the capacity of MSMEs in accordance with the needs and investment capabilities of MSMEs in the IT sector, as well as establishing research collaborations with the government for the implementation of facilities for MSMEs.

References

- Ali, I. 2003. "A Performance Measurement Framework for a Small and Medium Enterprise," University of Alberta.
- Anthony, R. N., and Govindarajan, V. 2000. "Management Control System: Sistem Pengendalian Manajemen," Buku Dua. Jakarta: Salemba Empat.
- AquaQuest Indonesia. 2020. "6 Perusahaan yang Bangkrut karena Digitalisasi," AquaQuest Indonesia, url: <https://aqi.co.id/blog/6-perusahaan-yang-bangkrut-karena-digitalisasi>.
- Bardan, A. B. 2020. "UMKM didorong Manfaatkan Teknologi untuk Topang Pertumbuhan Ekonomi," Kontan.Co.Id. <https://nasional.kontan.co.id/news/umkm-didorong-manfaatkan-teknologi-untuk-topang-pertumbuhan-ekonomi>
- Bodnar, G. H., and William, S. H. 2010. Accounting Information Systems, Tenth Edit. New York: Pearson Education, Inc., Publishing as Prentice Hall.
- Bodnar, G. H., and Hoopwood, W. S. 2014. Accounting Information Systems. USA: Pearson Education Limited.

- [Bollen, K. A., and Curran, P. J. 2006. Latent curve models: A structural equation perspective, 467. John Wiley & Sons.](#)
- [Brenner, R., "Escalating Plunder," New Left Review, 2020. \[Online\]. Available: <https://newleftreview.org/issues/ii123/articles/robert-brenner-escalating-plunder>. \[Accessed: 28-May-2021\].](#)
- [Cuevas-Vargas, H., Estrada, S., and Larios-Gómez, E. 2016. "The Effects of ICTs As Innovation Facilitators for a Greater Business Performance. Evidence from Mexico," *Procedia Computer Science* \(91\), pp. 47–56.](#)
- [Demil, B., and Lecocq, X. 2010. "Business Model Evolution: In Search of Dynamic Consistency," *Long Range Planning* \(43:2-3\), pp. 227–246.](#)
- Dinas Koperasi dan Usaha Kecil Provinsi Jawa Barat. 2021. "Jumlah Usaha Mikro, Kecil dan Menengah (UMKM) Binaan Berdasarkan Bentuk, Jenis, Kategori, dan Wilayah," *Pengelolaan Data Layanan KUKM Jawa Barat*.
- [Dwirandra, A. A. N. B., and Astika, I. B. P. 2020. "Impact of Environmental Uncertainty, Trust and Information Technology on User Behavior of Accounting Information Systems," *Journal of Asian Finance, Economics and Business* \(7:12\), pp. 1215–1224.](#)
- [Esubalew, A. A., and Raghurama, A. 2020. "The mediating effect of entrepreneurs' competency on the relationship between Bank finance and performance of micro, small, and medium enterprises \(MSMEs\)," *European Research on Management and Business Economics* \(E](#)
- [Fauzi, G., Sistem Pelaporan Keuangan Daerah Kurang Efisien Pola laporan keuangan daerah dinilai hanya memboroskan keuangan negara." \[Online\]. Available: <http://www.hukumonline.com/berita/baca/lt4ebb3796f2ea5/sistem-pelaporan-keuangan-daerah-kurang-efisie>](#)
- [Fernandes, A., Tarafdar, M., and Spring, M. 2021. "The nature of IT use in temporary organizations," *The Journal of Strategic Information Systems* \(30:1\), pp. 101655.](#)
- [Fielt, E. 2013. "Conceptualising Business Models: Definitions, Frameworks and Classifications," *Journal of Business Models* \(1:1\), pp. 85-105.](#)
- [Fitrios, R., Susanto, A., Soemantri, R., and Suharman, H. 2018. "The Influence of Environmental Uncertainty on The Accounting Information System Quality and Its Impact on The Accounting Information Quality," *Journal of Theoretical and Applied Information*](#)
- [Geerts, G. L. 2011. "A design science research methodology and its application to accounting information systems research," *International Journal of Accounting Information Systems* \(12:2\), pp. 142–151](#)
- Gelinas, J. R., Ulric, J., and Dull, R. B. 2008. "Accounting Information Systems," Canada: Thomson South-Western a part of The Thomson Cooperation.
- [Green, K. W., Chakrabarty, S., and Whitten, D. 2007. "Organisational culture of customer care: market orientation and service quality". *International Journal of Services and Standards* \(3:2\), pp. 137-153.](#)
- Habibie, I. 2015. "Ilham Habibie: Tingkatkan Daya Saing Global, Indonesia Perlu Inovasi," beritasatu.com. Url: <https://www.beritasatu.com/archive/249970/ilham-habibie-tingkatkan-daya-saing-global-indonesia-perlu-inovasi>.
- Hall, J. A. 2010. *Accounting Information Systems*, Seventh Ed. Boston: Cengage Learning.
- Hall, J. A. 2011. "Accounting Information Systems," Seventh Ed. Canada: Thomson South-Western a part of The Thomson Cooperation.
- [Kallunki, J. P., Laitinen, E. K. and Silvola, H. 2011. "Impact of enterprise resource planning systems on management control systems and firm performance," *International Journal of Accounting Information Systems* \(12:1\), pp. 20-39. <https://EconPapers.repec.org/RePEc:eee:ijoa:is:v:12:y:2011:i:1:p:20-39>.](#)
- [Kelton, A. S., Pennington, R. R., and Tuttle, B. M. 2010. "The Effects of Information Presentation Format on Judgment and Decision Making: A Review of the Information Systems Research," *Journal of Information Systems* \(24:2\), pp. 79–105.](#)

- [Kementerian Perindustrian Republik Indonesia, “Pemerintah Keluarkan 10 Jurus Jitu Hadapi Revolusi Industri 4.0.”](https://kemenperin.go.id/artikel/19169/Pemerintah-Keluarkan-10-Jurus-Jitu-Hadapi-Revolusi-Industri-4.0) [Online]. Available: <https://kemenperin.go.id/artikel/19169/Pemerintah-Keluarkan-10-Jurus-Jitu-Hadapi-Revolusi-Industri-4.0>. [Accessed: 23-Jan]
- [Kuraesin, A. D., and Suharman, H. 2020. “The Influence of Information Technology on the Quality of Accounting Information Systems Survey in Bandung City University,”](#) *Psychol. Educ. J.*, vol. 58, pp. 2642–2648.
- [Ladewi, Y., Supriadi, T., Sjam, J. M. E., Welly, Agista, and Subowo, H. 2020. “The Effect of Accountability and Transparency of Village Fund Management,”](#) *The International Journal of Accounting and Business Society* (28:2), pp. 45–64.
- Laudon, K. C., and Laudon, J. P. 2018. *Sistem Informasi Manajemen Mengelola Perusahaan Digital*, 13th ed. Jakarta: Salemba Empat.
- [Lestari, R., and Hertati, L. 2020. “Bagaimana Pengaruh Strategi Bisnis, Kekuatan Produk Terhadap Kualitas Sistem Informasi Akuntansi Manajemen: Studi Kasus Pada Usaha Kecil Dan Menengah Di Indonesia,”](#) *Kajian Akuntansi* (21:1), pp. 01–16.
- [Mediaindonesia.com. 2021. UKM dengan Platform Digital Tetap Bertahan di Masa Pandemi Covid-19,](https://mediaindonesia.com/ekonomi/425374/ukm-dengan-platform-digital-tetap-bertahan-di-masa-pandemi-covid-19) <https://mediaindonesia.com/ekonomi/425374/ukm-dengan-platform-digital-tetap-bertahan-di-masa-pandemi-covid-19>.
- [Meiryani, & Susanto, A. 2018. “The Influence of Information Technology on the Quality of Accounting Information System,”](#) *ACM International Conference Proceeding Series*, pp. 109–115.
- [Mithas, S., Tafti, A., and Mitchell, W. 2013. “How a Firm’s Competitive Environment and Digital Strategic Posture Influence Digital Business Strategy,”](#) *MIS Quarterly* (37:2), pp. 511–536.
- Mulyani, S. 2016. *Analisis dan Perancangan Sistem Informasi Manajemen Keuangan Daerah: Notasi Pemodelan Unified Modeling Language (UML) (Cetakan 1)*. ABDI SISTEMATIKA.
- [Mulyani, S., Kasim, E., Yadiati, W., and Umar, H. 2019. “Influence of Accounting Information Systems And Internal Audit On Fraudulent Financial Reporting,”](#) *Opcion* (35:21), pp. 323–338.
- [Mutegi, H. K., Njeru, P. W., and Ongesa, N. T. 2015. “Financial Literacy and Its Impact on Loan Repayment by Small and Medium Enterpreneurs: An Analysis of the Effect of Book Keeping Skills from Equity Group Foundation’s Financial Literacy Training Program on Entrepreneurs’ Loan Repayment Performance,”](#) *International Journal of Economics* (3:3), pp. 1–28.
- [Nasution, D. A. D., Erlina, E., and Muda, I. 2020. “Dampak Pandemi COVID-19 terhadap Perekonomian Indonesia”.](#) *Jurnal Benefita* (5:2), pp. 212-224.
- [Puspitawati, L., and Susanto, A. 2018. “The Influence of the Quality Accounting Information System To the Quality of Accounting Information - Evidence in Indonesia,”](#) *International Conference on Business, Economic, Social Sciences and Humanities (ICOBEST 2018)*, (225).
- Raharjo, S. 2018. “Bagaimana Mendesain Business Model untuk Perusahaan Outsourcing Sumber daya Manusia,” Working Paper.
- [Rahmadani, P. D. 2020. “Implementasi Sistem Informasi Akuntansi untuk Menunjang Strategi Bisnis UMKM pada Masa Pandemi Covid-19,”](https://www.kompasiana.com/putripdr/5f1147c7d541df055546bd45/implementasi-sistem-informasi-akuntansi-untuk-menukung-strategi-bisnis-umkm-pada-masa-pandemic-covid-19?page=all) *Kompasiana*. <https://www.kompasiana.com/putripdr/5f1147c7d541df055546bd45/implementasi-sistem-informasi-akuntansi-untuk-menukung-strategi-bisnis-umkm-pada-masa-pandemic-covid-19?page=all>
- [Ramli, I., & Iskandar, D. 2014. “Control Authority, Business Strategy, and the Characteristics of Management Accounting Information Systems,”](#) *Procedia - Social and Behavioral Sciences* (164), pp. 384–390.
- [Rapina. 2014. “Factors Influencing the Quality of Accounting Information System and Its Implications on the Quality of Accounting Information,”](#) *Research Journal of Finance and Accounting* (5:2), pp. 148–152.
- [Ritchi, H., Jans, M., Mendling, J., and Reijers, H. 2019. “The Influence of Business Process Representation on Performance of Different Task Types,”](#) *Journal of Information Systems* (34).
- Romney, M. B., and Steinbart, P. J. 2012. *Accounting Information Systems*, Twelfth Ed. London: Pearson Education, Inc., Publishing as Prentice Hall.

- Sačer, I. M., and Oluić, A. 2013. "Information technology and accounting information systems' quality in Croatian middle and large companies," *Journal of Information and Organizational Sciences* (37:2), pp. 117–126.
- Sari, N. Z. M. 2018. "The Business Strategy and Development Life Cycle with Quality Accounting Information Systems," *International Journal of Scientific and Technology Research* (7:12), pp. 295–300.
- Sari, S. K., and Asniar, A. 2015. "Analisis Dan Pemodelan Proses Bisnis Prosedur Pelaksanaan Proyek Akhir Sebagai Alat Bantu Identifikasi Kebutuhan Sistem," *Jurnal Infotel*, (7:2), pp. 143-152.
- Sembiring, L. J. 2021. "Sad! 30 Juta UMKM Gulung Tikar Karena Corona". CNBC Indonesia. <https://www.cnbcindonesia.com/news/20210326144212-4-233127/sad-30-juta-umkm-gulung-tikar-karena-corona>
- Stair, R. M., and Reynolds, G. W. 2010. "Principles of Information Systems A Managerial Approach," Ninth Edit. Boston: Cengage Learning.
- Sugiri, D. 2020. "Menyelamatkan Usaha Mikro, Kecil dan Menengah dari Dampak Pandemi Covid-19," *Fokus Bisnis : Media Pengkajian Manajemen dan Akuntansi* (19:1), pp. 76–86.
- Supriadi, T., Mulyani, S., Soepardi, E. M., and Farida, I. 2019a. "Influence of Auditor Competency in Using Information Technology on the Success of E-audit System Implementation," *EURASIA J Math Sci Tech* (15:10), pp. 1-13.
- Supriadi, T., Mulyani, S., Soepardi, E. M., and Farida, I. 2019b. "The use of information technology of e-audit system on audit quality," *Opcion* (35:89), pp. 475–493.
- Supriyati, and Bahri, R. S. 2020. "Model Perancangan Sistem Informasi Akuntansi Laporan Keuangan Pondok Pesantren Berbasis SAK ETAP," *@is The Best : Accounting Information Systems and Information Technology Business Enterprise* (4:2), pp. 151-165.
- Supriyati, Bahri, R. S., and Komarudin, E. 2019. "Computerized of International Financial Report Standard for Good Governance in Small Medium Enterprises". *IOP Conference Series: Materials Science and Engineering*, (662:5).
- Susanto, A. 2017. "Sistem Informasi Manajemen (Pendekatan Terstruktur – Risiko Pengembangan)," Bandung: Lingga Jaya.
- Tangkilisan, W., Saragih, B. R., Soelistiyo, H., and Supriadi, T. 2021. "Inconsistency of Misusing Electronic Identity Card (E-KTP) Data in General Elections in Indonesia," *Utopía Y Praxis Latinoamericana*, (26), pp. 182-194.
- Tim Komunikasi Komite Penanganan COVID-19 dan Pemulihan Ekonomi Nasional. (2021). *Pandemi Dorong Pelaku UMKM Adaptasi Menuju Digitalisasi. Komite Penanganan COVID-19 Dan Pemulihan Ekonomi Nasional*. <https://covid19.go.id/p/berita/pandemi-dorong-pelaku-umkm>
- Wilkinson, J. W., Cerullo, M. J., Raval, V., and Wing, B. W. O. 1999. "Accounting Information Systems: Essential Concepts and Applications", 4th Edition. New Jersey: Wiley.

How to cite:

Supriyati, Mulyani, S., Suharman, H., Supriadi, T. 2022. "The Influence of Business Models, Use of Information Technology on the Quality of Accounting Information Systems Digitizing MSMEs Post-COVID-19," *Jurnal Sistem Informasi (Journal of Information System)* (18:2), pp. 36-49.