



Catalyzing Digital Governance: An Innovative E-Government Model to Accelerate Public Service Transformation in Palembang City, Indonesia

Mardianto, Yoyok Hendarso, Sofyan Efendi, Rahmat Rafinzar, Khairunnas

Universitas Sriwijaya, Kota Palembang, Sumatera Selatan 30128, Indonesia

ARTICLE INFORMATION

Received: December 11, 2024
Revised: April 17, 2025
Available online: April 30, 2025

KEYWORDS

E-government; Innovation; Public Service Transformation; Digital Governance

CORRESPONDENCE

Name: Rahmat Rafinzar
Email: rahmatrafinzar@fisip.unsri.ac.id

ABSTRACT

This research was conducted to examine the implementation of e-government in supporting the acceleration of public service transformation at the Department of Population and Civil Registry of Palembang City. The theory used in the study refers to the Diffusion of Innovations theory. The research methodology employed is qualitative and descriptive. Both primary and secondary data were used as sources, with data collection techniques including interviews, documentation, observation, and literature review. The results of the study indicate that public service innovation at Palembang City has been quite good, although it has not been fully implemented using digital platforms according to the criteria based on the concept of e-government. Several innovative programs have improved public services compared to previous manual processes, considering the needs of the community. The implementation of innovation was also preceded by trials and evaluations. The challenges faced include a lack of socialization and a traditional mindset that still relies on offline document processing. Additionally, improvements in facilities and infrastructure are needed to ensure that e-Gov-based service systems can function optimally. The Acceleration Model for Public Service Innovation Transformation produced in this research consists of the dimensions of Innovation Advantage, Resource Infrastructure, and Innovation Impact.

INTRODUCTION

The digital era has changed the way public services are delivered, providing opportunities to increase efficiency, transparency, and public satisfaction. The integration of digital technology in public administration marks a significant shift in government interactions with citizens as well as the management of public resources. Recent studies emphasize the importance of digital transformation in the public sector to simplify processes, reduce bureaucracy, and expand access to services (Cordella & Tempini, 2015).

However, although digital governance has great potential, the transition to digital public services, particularly in population and civil registration services, faces several empirical gaps and challenges. One of the main problems is the digital divide, which can exacerbate inequality in access to public services. Data from the World Bank (World Bank, 2021) highlights significant gaps in internet access and digital literacy across different demographics and regions, which have the potential to hinder the inclusivity of digital public services. Additionally, concerns regarding data privacy and security pose a major challenge, as the digitalization of the civil service involves the handling of sensitive personal information. A lack of strong data protection mechanisms can prevent people from using digital services, thereby reducing trust in public institutions.

There are major challenges, especially in integrating digital technology into existing bureaucratic structures. Legacy systems and entrenched workflows can hinder digital innovation (Margetts & Dunleavy, 2013). Additionally, the literature on digital governance in public services indicates a gap in research regarding the effectiveness and impact of these digital initiatives (Linders, 2012). The digitalization of public services, especially in the population and civil registration services, has a direct impact on the efficiency and accessibility of important services, such as

the issuance of identity documents. The success of digital transformation in these services can become a blueprint for broader digital governance initiatives. However, empirical research on the long-term impact of digital transformation on public sector performance is still limited (Gil-Garcia et al., 2018).

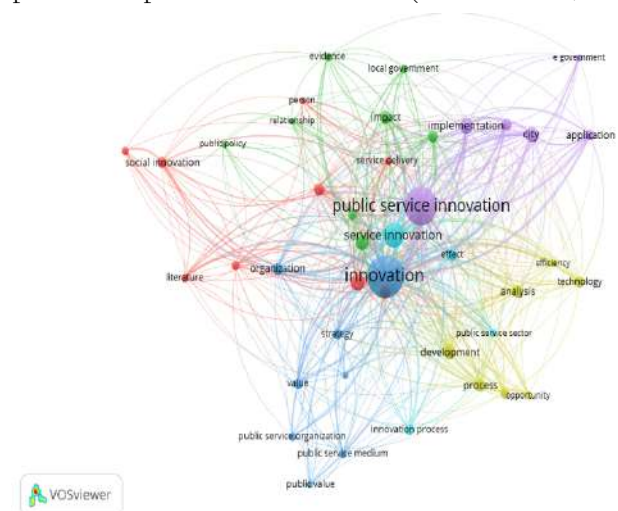


Figure 1. Vosviewer Analysis Data Visualization

From the picture above, research on public service innovation appears to focus more on traditional themes, such as public organization management, development, efficiency and technology. However, there appears to be a research gap that lacks exploration in terms of digital-based innovation, especially in the government sector, which can be seen from the lack of direct connection between digital technology and public services in visualization.

Additionally, although there are some connections that touch on e-government, applications, and service processes, these do not appear to be as numerous as other concepts that are more related to classical organizational and managerial theory. This shows that digital-based public service innovation in the government sector is still an area that is rarely researched or needs more attention in further research. This provides insight that more research is needed to explore how digitalization and technology-based innovation can be integrated more deeply into public service processes, especially in terms of e-government implementation and technology applications in government.

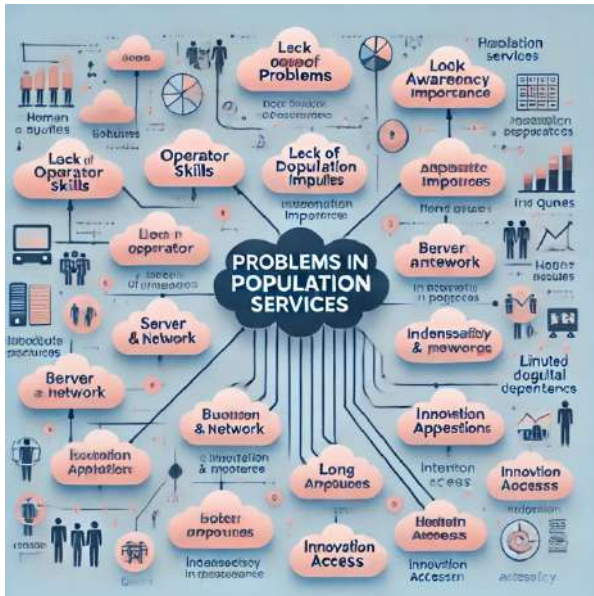


Figure 2. Population Service Problems and Innovations
(Source: processed by researchers (2024))

First, problems from the HR side involve difficulties experienced by employees in providing services and the public in receiving services. Some problems include slow service response, long queues, and the practices of *touts* (Setyaramadani, 2022). Other research also mentions the length of the service process as a significant challenge (Ariska Novi Nur, Selfi Budi Helpiastuti, 2023). Second, some people do not understand the use of digital systems and do not realize the importance of taking care of administration such as making birth certificates. For example, people have difficulty registering on the SITEPAK site due to a lack of understanding and frequent server disruptions (Oriza & Kusumadewi, 2022). Low awareness of the importance of birth and death certificates is also an obstacle because the process of obtaining them is considered difficult (Khatimah & Jubaidi, 2022; Yanuarita & Susanto, 2021). This is exacerbated by the lack of socialization from related agencies, as found in the Population and Civil Registry Service of Bone Regency (Sakir Ahmad Rosandi, Humairah Almahdali, 2024).

In addition, the implementation of smart governance is part of the smart city indicator due to the effectiveness of service transactions provided, and it has been proven to increase public satisfaction as service users (Atmojo et al., 2024). For example, the implementation of the Makassar Metaverse innovation has become a strategic step to strengthen the organization's position in the digital ecosystem, enhancing efficiency, transparency, and public participation in the government decision-making process (Malik, 2024).

The government must increase management capacity to support this paradigm shift. Increasing management capacity includes the application of information technology to support public service and management processes. These actions are expected to enhance efficiency, transparency, and accountability in public administration, enabling more flexible responses to contemporary challenges. Moreover, the implementation of an entrepreneurial spirit in government can significantly improve government performance by fostering innovation (Rahmat et al., 2024). flexibility, and responsiveness in managing resources and delivering public services. Problems also arise from SIMs used by government agencies. The applications or websites used still require innovation, especially in terms of speed, security, and implementation policies. Previous research shows that the document upload process is often hampered, and the lack of a chat feature to make it easier for people to report problems is also an obstacle (Ariska Novi Nur, Selfi Budi Helpiastuti, 2023; Najatin et al., 2024; Salsabila et al., 2022). In addition, complaints regarding full queue numbers indicate the need for improvements to the existing digital system.

In improving public services, data integration with national population databases and data security issues are the main challenges. Efficient data integration and strong privacy protection are essential to improve service quality and public trust in electronic services (Nugraha et al., 2023). Other research adds that the quality of electronic services is still not optimal, influenced by internal factors such as inadequate infrastructure, as well as external factors such as policy fluctuations and technological changes. (Annisa Zulfa Rohadatul et al., 2023; Hadiana, 2023). The occurrence of these factors or problems is due to the lack of human resource budget, regulations, and infrastructure which are the main obstacles (Nugroho & Purbokusumo, 2020). As recently confirmed in research (Oktaviani et al., 2023) problems in the SIM group as well as the lack of iOS availability and understanding of the application by some users are other challenges.

The fundamental idea behind e-government is the provision of services using electronic means, such as the Internet, cell phones, computer networks, and multimedia. The implementation of e-government involves the organization and optimization of information management systems and public service operations through the utilization of information and communication technology. To optimize the user experience of public service users, a public service organization should demonstrate innovation by utilizing digital technologies (Trischler & Westman Trischler in Afrizal et al., 2024). Based on the background above, it appears that an in-depth study of digital-based public services is very necessary. This study will provide deeper insight into strategies and approaches in the implementation of electronic public services and enable monitoring of innovation through evaluation frameworks such as DeLone and McLean's Information Systems Success Model (Affandi & Amalia, 2022).

To address these challenges and provide a practical framework for digital service transformation, this study introduces a model for accelerating innovation in public services through e-government. The model is conceptually grounded in Rogers' Diffusion of Innovations theory and empirically derived from case studies at the Department of Population and Civil Registry in Palembang City. This model serves as a tool to better understand how digital innovations can be effectively implemented and scaled within public institutions.

This research aims to understand the implementation of e-Gov in accelerating the transformation of public services in the Palembang City Population and Civil Registry Service. The novelty of this research lies in its comprehensive study of digital transformation in public services, providing empirical insights into the challenges and opportunities of digital technology integration in public administration. The scope of this research is limited to digital governance in the Palembang City Population and Civil Registry Service using a case study approach. Based on Rogers' Diffusion of Innovations theory, innovation characteristics can be analyzed through several key aspects: relative advantage, compatibility, complexity, trialability, observability, interpersonal communication, and availability of resources. Each of these will be described below based on the findings from the case of Palembang City. This research analyzes strategy, technology, and organizational change in the digital transformation process, contributing to broader discussions on digital governance and public sector innovation.

This research focuses on how the digitalization of e-government accelerates the transformation of public services in the field of civil registration and population, as well as its impact on digital governance. Researchers hope to identify best practices and provide recommendations for future digital transformation innovation models, especially in the public service sector.

METHOD

This research uses qualitative methods with a descriptive approach. Research method was carried out to carry out the process of observing the focus and locus of research so that conclusions can then be drawn based on field results, as explained by Arikunto (Arikunto, 2010). The qualitative descriptive research method is the process of observing the behavior or attitudes of people in an environment, interacting with them, and providing an interpretation of their views regarding what is in that environment (Arikunto, 2010).

Data collection was carried out through a process of observation, interviews and documentation. The determination of research informants was carried out using purposive sampling by selecting informants who were deemed to have knowledge and information related to the research. In this research, the data was analyzed through three stages, namely: data reduction, data presentation, and drawing conclusions/verification. This model is known as an interactive model, which means that the analysis is carried out interactively on these three components (Miles dan Huberman in Sugiyono, 2016).

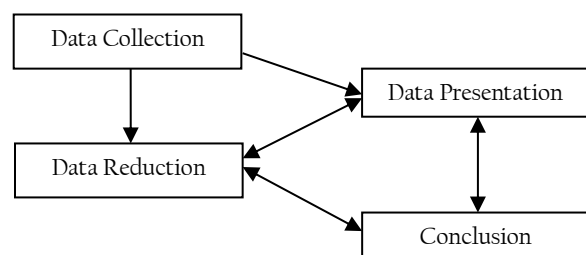


Figure 3. Miles and Huberman Interactive Model Data Analysis Technique

To support producing objective and comprehensive analysis and generating a network of information from the informants of

this research, researchers will use several tools to process data with the help of software NVivo 12 Plus.

RESULTS AND DISCUSSION

Implementation of e-Government in Public Services at the Population and Civil Registration Service of Palembang City

Innovation e-Government implemented in the Department of Population and Civil Registration (Disdukcapil) of Palembang City includes several features such as a registration system and document management online. The Palembang Dukcapil Department has begun implementing an online service portal that makes it easier for the public to access online population administration services such as registration for KTP, birth certificates, death certificates, and others. According to Rogers (in Afifuddin & Casmiwati, 2024) The characteristics of innovation can be seen through several indicators, namely: relative advantage, compatibility, complexity, triability, observability, interpersonal communication, dan resource and support. The following is a description of the research results:

Relative Advantage

Characteristics relative advantage refers to assessing whether an innovation has more significant advantages and benefits than methods or systems that have been implemented previously. Based on information obtained from several informants, it can be seen that the Palembang City Dukcapil Department has demonstrated a commitment to collaborating and creating various innovation programs in population services such as making KTP, birth certificates, and death certificates through the SI JAGO, AMPERA CAKEP, PACAKELA TERUS, and other programs like thumbs up friends for weddings. Apart from that, not only general services, Disdukcapil also ensures that population administration services can reach vulnerable populations such as people with disabilities, ODGJ, and marginalized groups.

This commitment is in line with the principles of public service which emphasize accessibility and fairness as regulated in Law Number 25 of 2009 concerning Public Services. The public's accessibility to public services in the context of the population administration service innovation program at Disdukcapil is very important because according to Palenewen (2019), Public services provided by the government will not provide maximum benefits for society if they cannot be accessed by everyone. This is following the principle of justice which aims to provide equal opportunities to all levels of society in accessing public services.

Apart from referring to the principles of public service, the various innovations that have been created have several advantages to help achieve organizational goals effectively and efficiently (Ekawati et al., 2017). The innovative advantage of the SI JAGO (SIKOK JADI TIGO) program, for example, shows the efficiency of the service, namely through one application you get three documents such as a family card, KTP, and birth certificate. Another innovation that has advantages is Ampera Cakep, which aims to ensure that community groups that are often neglected receive special attention by providing easier and fairer access to population administration services.

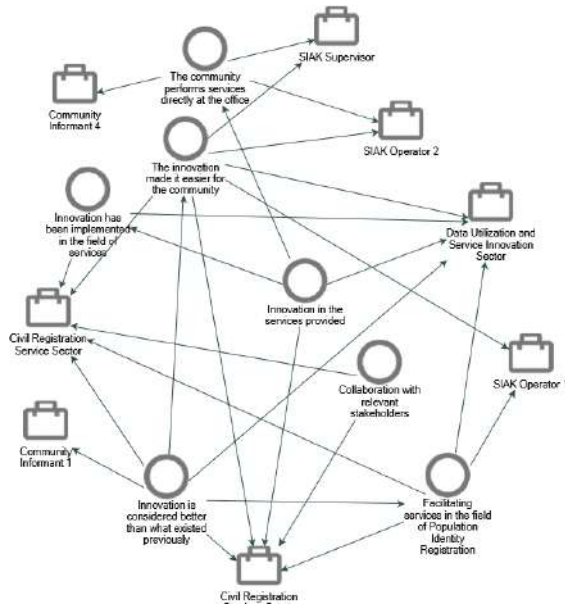


Figure 4. Data Processing Interview on Innovation Excellence (Source: Processed by the author using Nvivo 15 Software)

Based on the data visualization above, information was obtained that informants from the Civil Registration and Services sector, as well as informants from the civil registration services sector, explained that the innovations carried out were better than what existed before. All informants had the same opinion, namely that the innovations made it easier or simplified the mechanisms for field services and recording population identity. Apart from that, based on explanations from SIJAK Operators and Supervisors, the innovations carried out do not prevent the public from continuing to come to take care of their population administration needs directly at the service center at the Palembang City Dukcapil Office. Support for the implementation of this innovation program is carried out through collaboration with relevant stakeholders. For example, recording birth certificates and renewing family cards in collaboration with several hospitals.

Table 1. List of Hospitals and Independent Practices of Midwives Who Collaborate with the Population and Civil Registration Service of Palembang City

No.	Year	Hospital	Midwife Practice	Amount
1	2023	13	6	19
2	2024	6	9	15

Source: Processed by researchers from the City Population and Civil Registration Service Archives Palembang

Based on the table above, it is known that in 2023 there will be 13 hospitals and 6 independent midwife practices collaborating with Disdukcapil. Then in 2024, there will be 6 hospitals and 9 independent midwife practices collaborating. To date, the total collaboration with Disdukcapil in PACAKELA program innovation has reached 34 hospitals and midwife practices. This shows progress and that innovation is getting a positive response. Apart from that, several other programs are part of the innovation program at the Palembang City Dukcapil Department including the AMPERA CAKEP Program, JEMPOL KAWAN Innovation Program, and SIJAGO Innovation Program for civil registration.

In general, it can be seen that the innovation program carried out by the Palembang City Dukcapil Office not only meets standard services but has the advantage of increasing efficiency, accessibility, and also service quality. Apart from that, this program is considered capable of solving community problems because it makes the process of obtaining service products easier and simpler compared to methods or systems that were previously carried out manually. However, Disdukcapil does not prevent the community from taking care of their population's needs offline. Some people have used this innovation program, but some other people still have not responded to the use of digital services and prefer to do it online offline. So efforts to increase public understanding are a challenge that must be resolved by Disdukcapil in implementing innovation programs.



Figure 5. Community Queue at Disdukcapil (Source: Documentation by researchers)

Compatibility

Compatibility or compatibility, meaning the extent to which the innovation program is considered consistent with values, and community experience, and meets user needs. So the background of the innovation program is crucial to knowing and ensuring that the innovation created can be widely accepted and adopted. Without understanding the background of the innovation program, values, and characteristics of society, innovation may not be fully compatible and may face resistance and even failure in adoption (Rizzo et al., 2024).

Based on the results of interviews with Palembang City Disdukcapil employees, it is known before planning and implementing an innovation program, Disdukcapil conducted a survey directly with the community. The survey was carried out at the direction of the Social Service and the Ministry to find out who did not have population documents. In this context, the

survey carried out helps to obtain accurate data about field conditions, user needs, and potential obstacles that may arise.

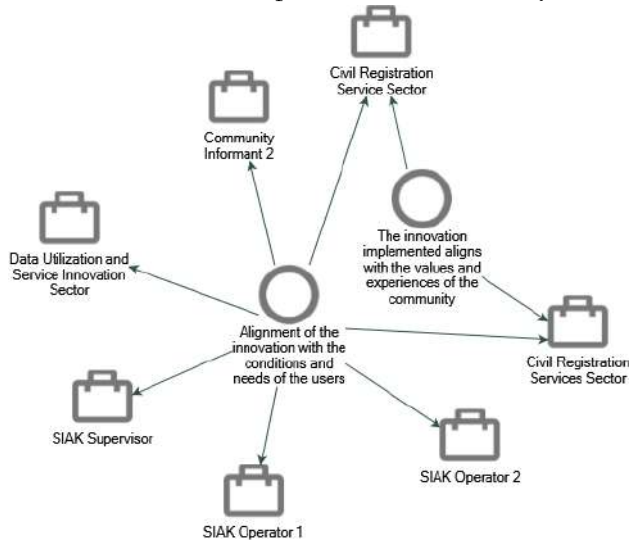


Figure 6. Data Processing Interview on Innovation Suitability (Source: Processed by the author using NVivo 15 Software)

Based on the general description related to the informant's explanation regarding the suitability of the innovation above, it can be concluded that most of the informants agree that the innovation carried out follows the conditions, needs, and experiences of the community. The opening of service centers spread across every sub-district and Public Service Mall is carried out to accommodate easy access in realizing effective public services because the standards used are the same whether viewed in the context of ease and speed of service. This is relevant to several problems experienced by the community so far regarding public services that are difficult to access, and service times that are relatively long and complicated.

Complexity

Which is defined as if an innovation is considered complex or difficult to understand, there will likely be obstacles or barriers to the adoption of the innovation. On the other hand, if the innovation is easy to understand and implement, the adoption process tends to be faster. Based on the results of interviews conducted with several informants regarding the obstacles faced regarding the implementation of innovation in public services at the Palembang City Dukcapil Office, it is visualized as follows:

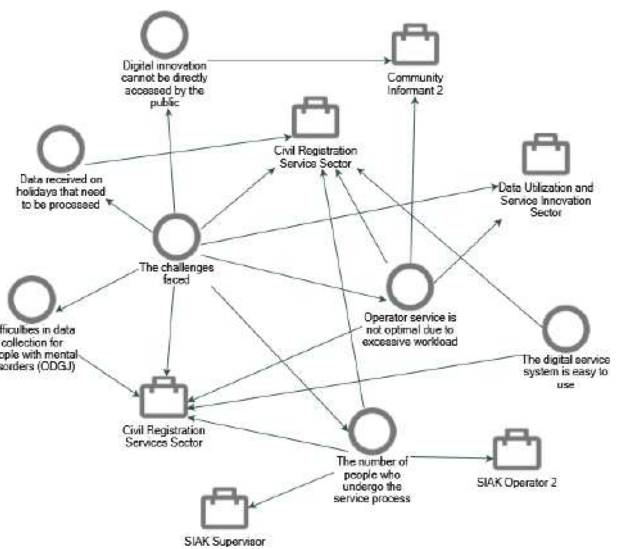
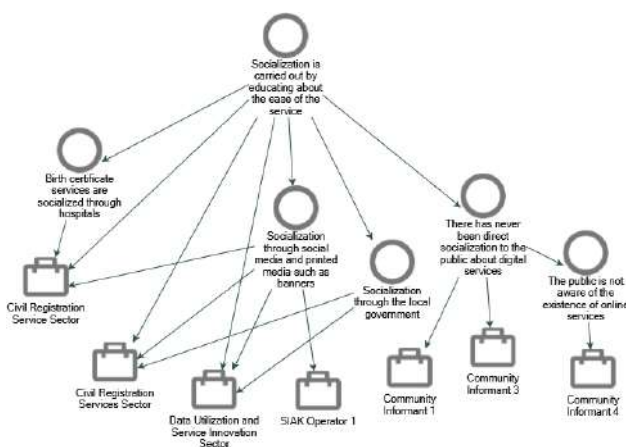


Figure 7. Data Processing Interview about Barriers to Innovation (Source: Processed by the author using NVivo Software)

Based on this data visualization, two different perspectives can be analyzed between Disdukcapil as the service provider and the community who are the service users. According to the civil registration service sector and civil registration service sector, the digital service system provided is very easy to use. This is reinforced by information obtained from stakeholders The Palembang City Dukcapil Department explained that outreach related to easy access to services had been carried out through social media and print media, through the local government at the sub-district level, as well as through hospitals regarding easy administration services for making birth certificates.

However, based on interview data, it is important to note that the implementation of e-government services still faces significant limitations in terms of inclusivity and effectiveness. Several community members stated that they had never received any socialization or information regarding the existence and use of digital services provided by Dukcapil. Some also mentioned that these services are only accessible in a limited number of sub-districts, which excludes certain population groups, especially those in rural or marginalized areas.

This indicates that the digital transformation efforts undertaken by Dukcapil have not been fully optimized from the perspective of service users. While institutional stakeholders emphasized improvements in efficiency and innovation, the lack of user engagement and digital literacy among the community remains a key barrier to adoption. Therefore, a deeper analysis is needed to balance stakeholder perspectives with the lived experiences of the citizens—particularly those who still face challenges in accessing and utilizing digital services. This user-centered approach is crucial to ensure that e-government implementation is inclusive, equitable, and sustainable in the long term.



Figure 8. Socialization of the Innovation Program E-Government Via Instagram Media (Source: Instagram Disdukcapil Palembang City)

Based on the picture above, information can be obtained that the Palembang City Dukcapil Office has carried out good outreach to inform the public about the new services or procedures being offered. However, despite this, there are still people who do not know and understand the essence of the convenience offered through this program. The obstacles or constraints that occur at Disdukcapil must be addressed immediately, because according to Alzahrani et al., (dalam D. S. K. Dewi et al., 2024) failure in implementation e-government This can be caused by technical systems that are not running optimally, inadequate technology, lack of knowledge of the main targets, and limited capacity.

According to stakeholder Palembang City Dukcapil Office, the implementation of digital service innovation is also hampered by several things, including the intensity of the community using digital services quite a lot, incoming data is also found on holidays so it must still be processed, the digital innovation carried out is still simple so it still requires the role of service officers, while the service operators are not yet optimal because there is an imbalance between the number of operators and the number of people, which reaches 400 people every day.

The public's tendency to process population documents directly at the Dukcapil Office is also encouraged by mindset. The traditional view is that document processing must be done face to face, especially for the elderly. This statement is supported by facts from research results by Ganis Ashari (2018) that the elderly tend to be technologically illiterate compared to other groups amidst the development of communication technology. The findings suggest obtained, several service users, namely people who were used as informants, explained that they had never received socialization regarding digital population and civil registration services, as well as service centers available in several sub-districts, so users still chose to access services directly to the Palembang City Dukcapil Office.

Triability

Triability refers to the extent to which an innovation can be tried out before adoption. Ideas or practices that can be tried will generally be adopted more quickly than those that are not tested. At the DISDUKCAPIL installation, employees are asked to carry out trials of service innovations that are launched. Based on information obtained from informants, the trial was not only carried out at DISDUKCAPIL in Palembang City, but the existing UPT also took part in carrying out the trial of this digital service.

Before conducting the trial, the agency also held a series of training workshops, and socialization was a strategy used to provide opportunities for each agency employee to introduce digital-based service innovations.

In addition to conducting trials on the UPT, socialization via the Instagram platform @dukcapilppalembang, the official website of the Palembang City Disdukcapil, banners at the registration waiting area, as well as conducting direct outreach to the UPT, hospitals, and schools. The following is documentation of socialization activities carried out by the Palembang City Dukcapil Office:



Figure 9 Socialization of Disdukcapil Services (Source: Disdukcapil.com website news archive)

DISDUKCAPIL as the implementing party has carried out trials of the innovations they have created and carried out trials (trial) at the UPT (Technical Implementation Unit), if the UPT has carried out trials and is considered good, then the innovation will be introduced to the community. However, judging from the interviews we conducted, the service innovation trial period did not involve the community as users. According to (Keenan et al., 2022) testing on users is an important thing to do, the community (user) is asked to interact with the system that will be used by the user himself. If the public is not involved in testing, there is a chance of losing users due to problems with the system design (Dwivedi et al., 2019).

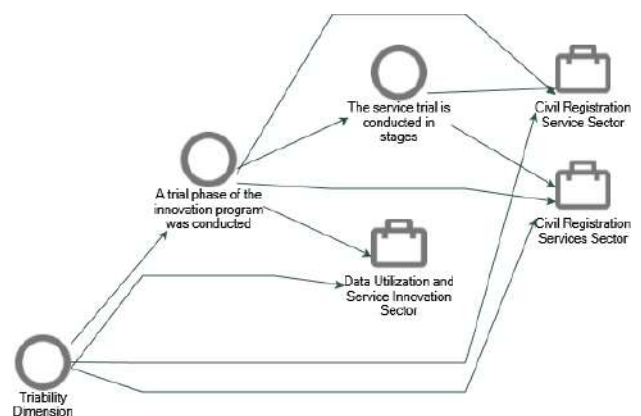


Figure 11. Data Processing Interview about Innovation Trials (Source: Processed by the author using NVivo Software)

Based on an analysis of information from informants in general regarding the program trial process, information was obtained that all innovation programs carried out had gone through a gradual trial process in line with the socialization process carried out to the community.

Observability

The character of innovation is also related to observability, which is the extent to which the visible results of an innovation are observed or communicated by other individuals. The easier an innovation is for members of a social system to see its results or to describe to others, the quicker they will adopt it.

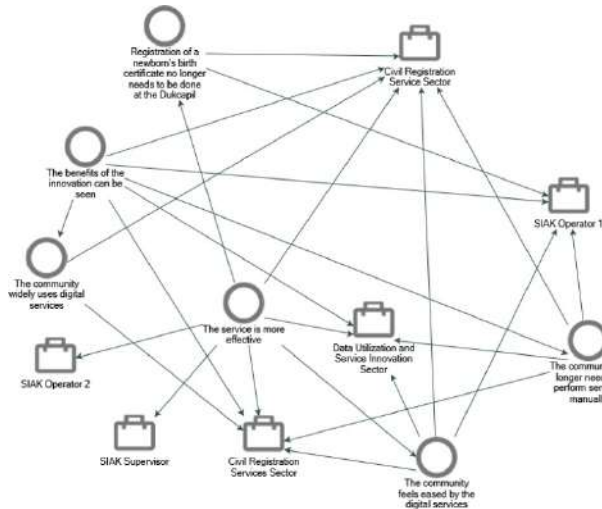


Figure 12. Data Processing Interview Regarding Observation of Innovation (Source: Processed by the author using Nvivo Software)

Based on the results of the information processing above, it is generally clear that the informants explained that the innovations carried out were very useful and this can be seen from the large number of people who use digital services and people no longer need to access services manually. This is reinforced by explanations from Supervisors and other SIAK Operators, that the innovations carried out encourage more effective service delivery, for example, the public feels that access to digital services makes the service process easier, for example, that registration of a newborn child's birth certificate no longer requires going to Dukcapil. Because it can be done through digital services.

Interpersonal Communication

Communication is said to be effective if the message is received and understood as intended by the sender of the message, the message is followed up with voluntary action by the recipient of the message, can strengthen the quality of interpersonal relationships, and there are no obstacles to this (Suranto, 2011). Interpersonal communication refers to the transmission of information between at least two individuals (Abed et al., 2023). Interpersonal communication styles (ICS) are important for forming and maintaining relationships, both in work environments and personal spaces (Szostek, 2019).

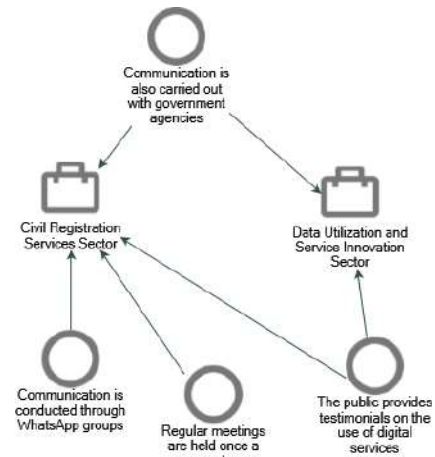
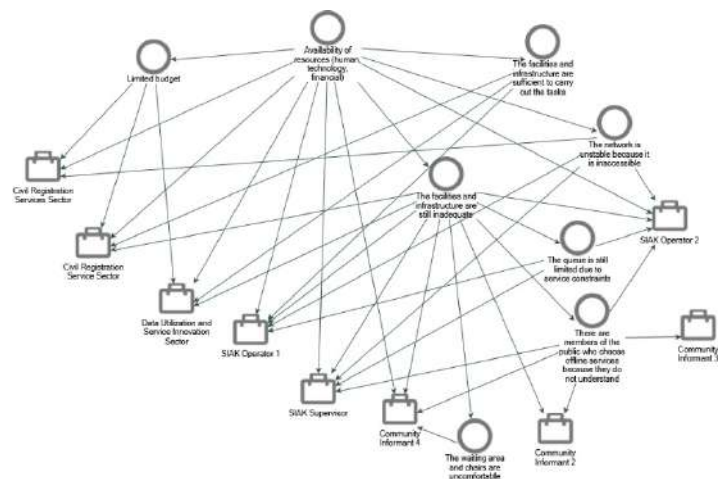


Figure 13. Data Processing Interview about Interpersonal Communication (Source: Processed by the author using Nvivo Software)

Based on the data visualization above, information is obtained that the Civil Registration Services Sector and the Data Utilization and Service Innovation Sector, explain that the implementation of program innovation in population and civil registration services is carried out through effective communication with various relevant government agencies, as well as evaluating and monitoring the quality of service innovation through testimonials from the public as users of these services. Meanwhile, further explanation from the Service and Civil Registration Sector is that to maintain service quality, regular meetings are held once a week, and intense communication between stakeholders through internal communication groups, namely WhatsApp.

Resource and support

In this context, resources can include financial, knowledge, human resources, and physical resources needed in the organizational environment. (Leonita, 2020). This includes the Palembang City Dukcapil Office which requires these various resources to support the successful implementation of innovation programs by the e-government. In general, information obtained from related informants' resources and support can be seen through the following visualization:



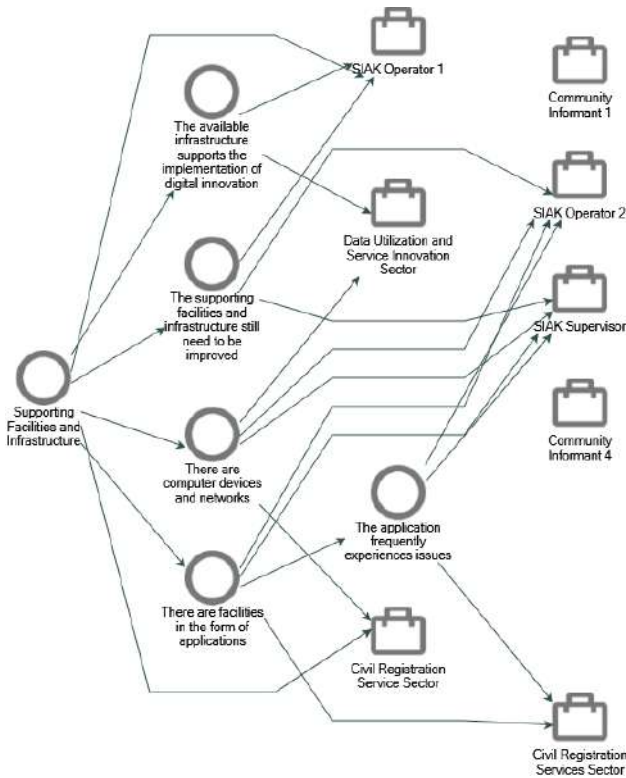


Figure 14. Processing Interview Data about Resorce and Support (Source: Processed by the author using NVivo Software)

Based on this figure, two things that can be analyzed from this dimension are the availability of resources (human, technological, and financial) as well as other supporting facilities and infrastructure. Regarding the availability of resources (human, technological, and financial), several information was obtained. According to the Civil Registration Services Sector, the Civil Registration Services Sector, and the Data and Information Utilization Service Innovation Sector, several problems related to resource availability include unstable network conditions, limited budgets, and infrastructure that is only at a "sufficient" level for carrying out work, so it is necessary to improve infrastructure. This is supported by information obtained from SIAK operators and supervisors that inadequate facilities and infrastructure can be seen from the limited service queues due to several limitations related to resources. Meanwhile, based on information obtained from one of the service users, namely the community, the limited facilities and infrastructure were felt from the uncomfortable condition of the waiting room.

Regarding supporting facilities and infrastructure, informants from the Disdukcapil agency as the service provider explained that the current availability of facilities and infrastructure consists of service applications, computer equipment, and internet networks. Based on the explanation from the Data Utilization and Service Innovation Sector, the currently available infrastructure is sufficient to support the implementation of digital innovation. However, according to the SIAK Supervisor, supporting facilities and infrastructure still need to be improved, because several obstacles are still found, for example, applications that often experience problems. Trouble and problematic internet signal. Angin & Adawiyah (2023) stated that the service technology system does not always guarantee that public services have been implemented, the

technology system depends on the strength of the internet signal. Based on the results of research and observations carried out, the implementation of public service transformation in terms of resources and infrastructure at the DISDUKCAPIL agency that has been implemented at this time is only at a sufficient level.

A common criterion for evaluating government readiness is technological infrastructure (Seng et al., 2010)(Purnomo et al., 2020). To evaluate the readiness of e-government in e-government implementation, integrated tools are needed that highlight access to information and also unite various organizational segments, ICT, human resources, and external readiness (Sabri, 2012). The requirements for implementing information technology in public services following Presidential Regulation of the Republic of Indonesia Number 95 of 2018 concerning Electronic-Based Government Systems (SPBE) are to provide convenience to service users. People don't have to come to government agencies as service providers, they just need to access pages that are managed by the government website or social media, the public can find out basic information about the services provided, as well as fill in the application form that has been provided (Wijayanti Ita, 2020). Meanwhile, the digital service provided by Disdukcapil is by filling in a Google form or registering online, but people still have to come to Disdukcapil. Some innovation services have platforms but management is still done manually.

Model for Accelerating Public Service Innovation Transformation in Electronic Government-based Government Services

Based on the results of research using Diffusion of Innovations Theory According to Everett Rogers, empirically it was found that the seven dimensions used can be simplified into three dimensions that are suitable in the context of public services. These three dimensions include Innovation Excellence, Infrastructure and Resources, and Innovation Impact. The model is described as follows:

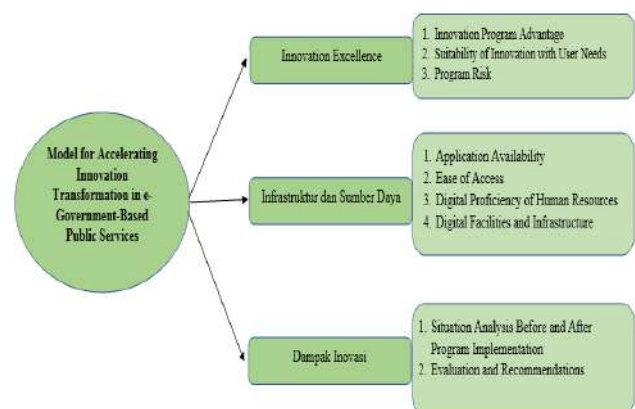


Figure 15. Accelerated Transformation Model for Innovation-based Public Services e-Government (Source: processed by researchers)

Based on this image, the model for accelerating the transformation of public services is based on e-government and includes the dimensions of Innovation Excellence, infrastructure and resources, and Innovation Impact. Innovation Excellence can be measured using several indicators, namely Innovation Program Excellence which analyzes what differentiates an innovation program that has been formulated from programs that have existed before. Innovation Excellence also includes indicators of

suitability of innovation to user needs, so that it can be analyzed whether the innovation program created is following the needs of the public as users. Meanwhile, the third indicator includes program risk analysis as a form of mitigation against negative potentials caused by program implementation.

Apart from that, the second dimension includes infrastructure and resources that support the implementation of innovation. This dimension can be analyzed from indicators of the availability of applications that support the running of an innovation program, ease of access to these applications, digital mastery of innovation organizers, and digital literacy of the community, as well as digital facilities and infrastructure available in the user environment that support and are related to their digital activities. Furthermore, the third dimension includes the Impact of Innovation whose indicators include Situation Analysis before and after the program is implemented, as well as evaluations and recommendations based on analysis of the impact after the innovation is implemented.

CONCLUSION

The public service innovations carried out at the Palembang City Dukcapil Disdukcapil are quite good, but they have not been fully implemented using the platform digital according to concept-based criteria e-Government. Several innovation programs demonstrate better public service mechanisms than previously existing service mechanisms. The innovations carried out have also taken into account the needs of the community as users. Implementation of innovation begins with a thorough trial process, observed so that we can evaluate its advantages and disadvantages. Not much socialization is yet massive and the mindset traditionally related to document management offline is an obstacle that must be overcome.

Apart from that, facilities and infrastructure are crucial elements whose quantity and quality must also be improved, so that the public service system based on e-Gov can be realized optimally. Based on empirical analysis of service innovation carried out at the Palembang City Dukcapil Department and theoretical analysis of the regulations governing SPBE, a Model for Accelerating Public Service Innovation Transformation can be formulated with a dimensional framework consisting of Innovation Excellence, Resource Infrastructure, and Innovation Impact. This model can be used practically as an intervention in SPBE policies, especially mapping the constituent elements of electronic-based services in the SPBE Services section.

The limitation of this research is to explore the policies and innovations carried out at the research location and also their implementation in various agencies and other public organizations. This can be input and suggestions for other researchers to conduct more in-depth exploration of the implementation of SPBE policies and conduct research on public service innovations in various other government agencies. These steps can help government apparatus practitioners, researchers and readers to find out the effectiveness of innovations in public services that have been implemented.

ACKNOWLEDGEMENT

The research/publication of this article was funded by DIPA of Public Service Agency of Sriwijaya University 2024. Number SP DIPA-023.17.2.677515/2024, on November 24 2023, In accordance with the Rector's Decree Number 0013/UN9/LP2M.PT/SK/2024. On May 20, 2024.

REFERENCES

- Abed, L. G., Abed, M. G., & Shackelford, T. K. (2023). Interpersonal Communication Style and Personal and Professional Growth among Saudi Arabian Employees. *International Journal of Environmental Research and Public Health*, 20(2). <https://doi.org/10.3390/ijerph20020910>
- Affandi, N. A., & Amalia, R. (2022). Analisis Kesuksesan Sistem Informasi Website Dukcapil (Dinas Kependudukan Dan Pencatatan Sipil) Ogan Ilir, Menggunakan Model DeLone and McLean. *Jurnal Mantik*, 6(3), 3422–3434.
- Afifuddin, A. A., & Casmawati, D. (2024). Optimalisasi Program Status Kawin Tercatat melalui Inovasi Pelayanan Kependudukan menggunakan Aplikasi Kalimasada di Kelurahan Babat Jerawat, Kota Surabaya. *Indonesian Journal of Public Administration*, 1(4), 1–12. <https://doi.org/10.47134/par.v1i4.3075>
- Afrizal, D., Luthfi, A., Bin Wallang, M., Hildawati, H., & Ekareesakul, K. (2024). Citizens' Intention to Use E-Government Services in Local Government by Integrating UTAUT, TPB, and TAM Model. *Journal of Local Government Issues*, 7(2), 129–143. <https://doi.org/10.22219/logos.v7i2.32437>
- Angin, R., & Adawiyah, P. R. (2023). Population and Civil Registration Public Services Digital Transformation During the Covid-19 Pandemic. *Journal of Government and Civil Society*, 7(1), 140–158. <https://doi.org/10.31000/jgcs.v7i1.7180>
- Annisa Zulfa Rohadatul, Nurlukman, A. D., Arif Ginanjar Suryatman, & Toddy Aditya. (2023). Inovasi Sistem Pelayanan Publik Aplikasi Sobat Dukcapil di Dinas Kependudukan dan Pencatatan Sipil Kota Tangerang. *Jurnal Ilmu Administrasi Negara ASIAN (Asosiasi Ilmuwan Administrasi Negara)*, 11(1), 56–68. <https://doi.org/10.47828/jianaasian.v11i1.141>
- Arikunto, S. (2010). *Prosedur Penelitian Suatu Pendekatan Praktek*. Rineka Cipta.
- Ariska Novi Nur, Selfi Budi Helpiastuti, A. S. (2023). Inovasi Proses Pelayanan Dokumen Kependudukan Terintegrasi di Dinas Kependudukan dan Pencatatan Sipil Kabupaten Sumenep. *Electronical Journal of Social and Political Sciences (e-Sospol)*, 10(2), 31–41.
- Atmojo, M. E., Darumurti, A., & Hanif, N. A. (2024). Agile Governance in Optimizing Digital Literacy for Micro, Small and Medium Enterprises (MSMe) in Kulon Progo Regency. *Journal of Local Government Issues*, 7(1), 68–82. <https://doi.org/10.22219/logos.v7i1.29981>
- Cordella, A., & Tempini, N. (2015). E-government and organizational change: Reappraising the role of ICT and bureaucracy in public service delivery. *Government Information Quarterly*, 32(3). <https://doi.org/10.1016/j.giq.2015.03.005>
- Dewi, D. S. K., Yulianti, D. B., & Djuwitaningsih, E. W. (2024). How Is E-Government Readiness and Its Impact on Muhammadiyah Citizens? (An Analysis of Ponorogo Internet Program Enters RT). *Journal of Government Civil Society*, 8(1), 43–57.
- Dwivedi, Y. K., Rana, N. P., Jeyaraj, A., Clement, M., & Williams, M. D. (2019). Re-examining the Unified Theory of Acceptance and Use of Technology (UTAUT): Towards a Revised Theoretical Model. *Information Systems*

- Frontiers, 21(3), 719–734. <https://doi.org/10.1007/s10796-017-9774-y>
- Ekawati, R., Karnita Soleha, L., Pengajar STIE STEMBI Bandung ratnaekawati, S., & Pengajar STIE Pasundan Bandung, S. (2017). MENINGKATKAN KEMAMPUAN INOVASI ORGANISASI MELALUI HUMAN CAPITAL. Print) Jurnal INTEKNA, 17(2), 79–147. <http://ejurnal.poliban.ac.id/index.php/intekna/issue/archive>
- Ganis Ashari, R. (2018). Memahami Hambatan dan Cara Lansia Mempelajari Media Sosial. Jurnal Ilmu Komunikasi, 15(2), 155–170.
- Gil-Garcia, J. R., Dawes, S. S., & Pardo, T. A. (2018). Digital government and public management research: finding the crossroads. In Public Management Review (Vol. 20, Issue 5). <https://doi.org/10.1080/14719037.2017.1327181>
- Hadiana, I. (2023). Pelayanan Publik Pada Dinas Kependudukan dan Pencatatan Sipil Kota Dumai (Studi Kasus Penggunaan Aplikasi Sistem Layanan Administrasi Kependudukan Warga Secara Online (SILAWO)). INNOVATIVE: Journal Of Social Science Research, 3, 7680–7690.
- Malik, I. (2024). Government Organization Development: Innovative Strategies with Makassar Metaverse. Journal of Local Government Issues, 7(2), 194–209. <https://doi.org/10.22219/logos.v3i1.10699>
- Keenan, H. L., Duke, S. L., Wharrad, H. J., Doody, G. A., & Patel, R. S. (2022). Usability: An introduction to and literature review of usability testing for educational resources in radiation oncology. Technical Innovations and Patient Support in Radiation Oncology, 24(September), 67–72. <https://doi.org/10.1016/j.tipsro.2022.09.001>
- Khatimah, N. K., & Jubaidi, A. (2022). Tinjauan Tentang Inovasi Pelayanan Dalam Pembuatan Akta Kelahiran di Dinas Kependudukan dan Catatan Sipil Kota Samarinda. Jurnal Administrasi & Kebijakan, 21, 149–159.
- Leonita, N. (2020). DETERMINASI PENGEMBANGAN KARIER DAN KINERJA PEGAWAI KOMPETENSI DAN BEBAN KERJA (LITERATURE REVIEW MANAJEMEN SUMBER DAYA MANUSIA). Jurnal Ilmu Manajemen Terapan, 2(2), 155–167. <https://doi.org/10.31933/jimt.v2i2>
- Linders, D. (2012). From e-government to we-government: Defining a typology for citizen coproduction in the age of social media. Government Information Quarterly, 29(4). <https://doi.org/10.1016/j.giq.2012.06.003>
- Margetts, H., & Dunleavy, P. (2013). The second wave of digital-era governance: A quasi-paradigm for government on the Web. Philosophical Transactions of the Royal Society A: Mathematical, Physical and Engineering Sciences, 371(1987). <https://doi.org/10.1098/rsta.2012.0382>
- Najatin, A., Eka, F., Anwar, M., & Santa, R. (2024). 2024 Madani : Jurnal Ilmiah Multidisiplin Inovasi Teknologi Pelayanan Publik Dalam Implementasi E-Government Studi Kasus Aplikasi Sakedap di Kabupaten Bandung 2024 Madani : Jurnal Ilmiah Multidisiplin. Jurnal Ilmiah Multidisiplin, 2(1), 473–479.
- Nugraha, K. R. A., Wijaya, K. A. S., & Wismayanti, K. W. D. (2023). Penerapan Digital Government Melalui Website Taring Dukcapil di Dinas Kependudukan dan Pencatatan Sipil Kota Denpasar. Ethics and Law Journal: Business and Notary, 1(3), 74–81. <https://doi.org/10.61292/eljbn.v1i3.56>
- Nugroho, R. A., & Purbokusumo, Y. (2020). E-Government Readiness: Penilaian Kesiapan Aktor Utama Penerapan E-Government di Indonesia. Iptek-Kom, 22(1), 1–17.
- Oktaviani, F. N., Sari, K. Y., Rafi, M., & Balebat, S. (2023). Penerapan E-Government Dalam Aplikasi Selesai Dalam Genggaman (Salaman) Dinas Kependudukan dan Pencatatan Sipil Kota Bandung 2023 Madani : Jurnal Ilmiah Multidisiplin. Madani : Jurnal Ilmiah Multidisiplin, 1(60), 737–744.
- Oriza, N., & Kusumadewi, R. (2022). Penerapan E-Government Melalui Aplikasi Layanan Sitepak Pada Dinas Kependudukan Dan Pencatatan Sipil Kabupaten Bekasi. Jurnal Ilmu Sosial, 20(3), 1412–9736.
- Palenewen, J. D. O. (2019). Manajemen Pelayanan Publik: Tinjauan tentang Keadilan Akses Pelayanan Publik Bagi Kaum Difabel. JSPG: Journal of Social Politics and Governance, 1(1), 29–38.
- Purnomo, S., Rahayu, E. S., Riani, A. L., Suminah, S., & Udin, U. (2020). Empowerment model for sustainable tourism village in an emerging country. Journal of Asian Finance, Economics and Business, 7(2), 261–270. <https://doi.org/10.13106/jafeb.2020.vol7.no2.261>
- Rahmat, B., Hartanto, B., & Hilman, A. (2024). Bureaucratic Reform in Indonesia: From “Public Administration” to “Public Management.” Journal of Local Government Issues, 7(2), 144–158. <https://doi.org/10.22219/logos.v7i2.33848>
- Rizzo, G., Migliore, G., Schifani, G., & Vecchio, R. (2024). Key factors influencing farmers’ adoption of sustainable innovations: a systematic literature review and research agenda. Organic Agriculture, 14(1), 57–84. <https://doi.org/10.1007/s13165-023-00440-7>
- Sabri, A. (2012). A Cultural E-Government Readiness Model. Intelligent Information Management, 04(05), 212–216. <https://doi.org/10.4236/iim.2012.46031>
- Sakir Ahmad Rosandi, Humairah Almahdali, Y. A. (2024). IMPLEMENTASI E-GOVERNMENT DALAM PELAYANAN PUBLIK: STUDI KASUS PADA DINAS KEPENDUDUKAN DAN CATATAN SIPIL KABUPATEN BONE. Jurnal Administrasi Publik, 2(1), 181–193.
- Salsabila, S., Zetra, A., & Putera, R. E. (2022). Penerapan E-Government Dalam Pelayanan KTP Pada Dinas Kependudukan dan Pencatatan Sipil Kota Padang. Jurnal Ilmu Administrasi Negara ASIAN (Asosiasi Ilmuwan Administrasi Negara), 9(2), 314–324. <https://doi.org/10.47828/jianaasian.v9i2.65>
- Seng, W. M., Jackson, S., & Philip, G. (2010). Cultural issues in developing E-Government in Malaysia. Behaviour & Information Technology, 29(4), 423–432. <https://doi.org/10.1080/01449290903300931>
- Setyaramadani, D. (2022). Bali Nyate: Inovasi Pelayanan Publik Di Dinas Kependudukan Dan Pencatatan Sipil (Disdukcapil) Kabupaten Purworejo. Kajian Ilmu Administrasi, 19(1), 78–89.
- Sugiyono. (2016). Metode Penelitian Administrasi. Alfabeta.
- Suranto, A. W. (2011). Interpersonal Communication. In Graha Ilmu.
- Szostek, D. (2019). The impact of the quality of interpersonal relationships between employees on counterproductive

work behavior: A study of employees in Poland. Sustainability (Switzerland), 11(21). <https://doi.org/10.3390/su11215916>

Wijayanti Ita. (2020). Pemerintahan Berbasis Elektronik dalam Pelayanan Publik. Ombudsman Republik Indonesia.

World Bank. (2021). Ensuring a More Inclusive Future for Indonesia through Digital Technologies. <https://www.worldbank.org/en/news/press-release/2021/07/28/ensuring-a-more-inclusive-future-for-indonesia-through-digital-technologies>

Yanuarita, H. A., & Susanto, D. (2021). Analisis Kebijakan Dinas Kependudukan dan Pencatatan Sipil dalam Layanan Administrasi Pendataan Penerima Bansos COVID-19 di Kota Malang. JISIP (Jurnal Ilmu Sosial Dan Pendidikan), 5(2), 685–694. <https://doi.org/10.58258/jisip.v5i2.2045>

