The Role of Kantor Virtual Applications as an Innovation in Administrative Management in the Management and Library Section of the Organization Bureau of the Regional Secretariat of the Province of Bali.

Ni Putu Sukma Yuniantari Dewi*

Komang Adi Sastra Wijaya

Faculty of Social and Political Sciences

*Correspondence: sukmayuniantaridewi@gmail.com

Abstract

The development of information technology in Indonesia shows a significant upward trend. One of the innovations developed by the Bali Province Communication and Information Office is the Virtual Office Application which is a virtual workspace application for all ASN and non-ASN employees within the Bali Provincial Government. This study aims to comprehensively analyze the role of the Virtual Office Application in improving administrative efficiency in the Management and Library Section of the Bureau of Organization of the Regional Secretariat of Bali Province. This research uses qualitative research methods with a descriptive approach. The results of this study are the use of the Virtual Office application is very visible and felt by employees. The increased speed in handling documents and the lack of complaints from users are clear evidence of its efficiency. This virtual office application has succeeded in changing the way of working to be more modern, effective, and transparent, thus supporting employee performance optimally.

I. Introduction

In the era of globalization and rapid digitalization, the landscape of public administration has undergone a significant transformation. Information and communication technology is no longer just a tool, but the foundation that drives the efficiency and effectiveness of government organizations. Adaptation to technological innovation is imperative for government agencies to improve service quality and responsiveness to community needs.

Increasingly sophisticated digital infrastructure enables faster and more efficient access to information, increases productivity, and facilitates previously unimaginable innovations (Basid et al., 2024). The development of information technology also encourages better system integration, which in turn supports a wide range of industries, from Healthcare to Education, as well as the public and private sectors.

The development of information technology in Indonesia shows a significant upward trend.
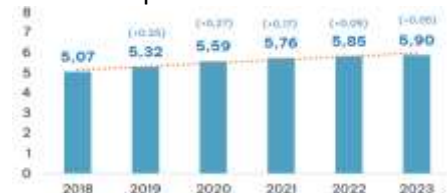
Development of Indonesia's ICT Development Index, 2018-2023
Source: BPS Indonesia

Based on the ICT development index above, BPS explained that Indonesia's ICT development has shown positive development in the last six years, which is indicated by an increase in the ICT Development Index value. In 2018, the ICT Development Index value was recorded at 5.07 and continued to increase until 2023 with a value reaching 5.90. Overall, the index increase that occurred in six years amounted to 0.83 points (BPS, 2024).

In line with the rapid development of information technology in Indonesia, the government sector has also shown a strong commitment to digital transformation through *e-government* initiatives. The implementation of *e-government* aims to improve bureaucratic efficiency, transparency, accountability, and the quality of public services to the community (Bao et al., 2023). Various innovations implemented through digital applications and platforms are starting to be implemented at various levels of government, from central to local, to facilitate internal work processes and interactions with the public. The innovations created by the government must result in major changes in government activities such as the implementation of laws, approaches that allow replication, the role of parties involved in policy making, and accountability of HR users. This encourages the government to continue to innovate in creating a good and efficient government (Wijaya, 2024).

In the Bali Provincial government, it is generally stated in the Bali Governor Regulation Number 44 of 2021 concerning the Bali Provincial Government Electronic-Based Government System (SPBE). This Pergub provides a legal basis for implementing SPBE throughout the Bali Provincial Government, which includes the use of technology in various public services and government operations. One of the innovations developed by the Bali Provincial Communication and Information Office is the Kantor Virtual Application. The Bali Provincial Government Kantor Virtual Application is a virtual workspace application for all ASN and non-ASN employees within the Bali Provincial Government (Diskominfo Provinsi Bali, n.d). Through an integrated digital platform, employees can collaborate in *real-time*, access and share information without geographical barriers, and carry out various routine tasks more efficiently (Saputra, 2023). Key features such as centralized electronic document management systems, shared calendars and scheduling, interactive online communication platforms, and automated digital workflows, offer great potential to optimize an organization's business processes. Bali Kantor Virtual has also been integrated with several systems, namely all employees connected to the attendance system and simpeg can connect to the integrated Kantor Virtual service with one login *(Single Sign On)* SSO Bali Province (Diskominfo Provinsi Bali, n.d).

In the organizational structure of the Regional Secretariat of Bali Province, the Organization Bureau plays a strategic role in organizing and improving the performance of all work units. Under the auspices of the Organization Bureau, there are three sections, one of which is the Governance and Library Section. The Governance and Library Section is specifically responsible for structuring and developing an effective governance system and managing information resources through the library. Its existence ensures that administrative processes are orderly, efficient, and supported by adequate access to information for all Regional Secretariat employees. Structurally, the Administration and Library Section is led by a Section Head who oversees two main sub-sections, namely the Administration Sub-Section (TU) and the Library Sub-Section. The Administration Subdivision focuses on managing general administrative affairs, including correspondence, archives, asset management and office equipment, as well as other administrative support services. Meanwhile, the Library Sub-Division is responsible for managing book collections and other information materials, providing library services, and developing literacy and a culture of reading within the Regional Secretariat.

Efficiency in the management of this function has direct implications for the overall productivity and effectiveness of the Organization Bureau, which in turn affects the performance of the Bali Province

Regional Secretariat. Slow administrative processes, less structured document management, and limited access to information can hinder smooth operations and timely decision-making. In this context, the Kantor Virtual Application offers a potential solution to address the various administrative challenges faced by the Governance and Library Section. The implementation of an electronic document management system can streamline correspondence and filing processes, reduce paper usage, and facilitate information disbursement and access. Online collaboration features can improve coordination between employees and speed up task completion.

Nonetheless, the adoption of Kantor Virtual Applications is not a simple process. Its successful implementation relies heavily on an in-depth understanding of the organization's specific needs, technological infrastructure readiness, human resource competencies, as well as an effective change strategy. Therefore, this in-depth research is needed to identify how the Kantor Virtual application can be optimally integrated into the workflow of the Management and Library Section of the Organizational Bureau of the Bali Provincial Secretariat.

This research aims to comprehensively analyze the role of Kantor Virtual Application in improving administrative efficiency in the Management and Library Section of the Organization Bureau of the Regional Secretariat of Bali Province. Through careful analysis of the potential benefits, implementation challenges, and success factors, this research is expected to make a significant contribution in formulating strategic recommendations for the utilization of information technology in realizing more efficient, transparent, and accountable governance within the Bali Provincial Government.

II. Research Methods

This research uses qualitative research methods with a descriptive approach. According to Creswell in Amruddin (2022), qualitative is a method used as an understanding of meaning and exploring various social problems. This method was chosen to explore deeply and comprehensively the experiences, perceptions, and meanings constructed by users and managers regarding the implementation of Kantor Virtual Applications in improving administrative efficiency, without intending to test hypotheses or make statistical generalizations (Ananditya et al., 2020). The main focus is on an in-depth understanding of the processes, interactions, and impacts felt by the parties involved.

III. Results and Discussion

As globalization develops in Indonesia, technology and information are progressing quite rapidly. Technological developments are one of the demands of modernization for the government in terms of public service delivery. This encourages the government to continue to innovate in order to encourage success in efforts to improve service quality performance and efforts to solve problems that often occur during the administrative process in government (Al Karimi & Meirinawati, 2022).

One of the innovations created by the Bali Provincial Government is the Kantor Virtual application, which is an innovation to facilitate government employees in handling government administrative affairs. Where the implementation of this innovation is expected to be able to modernize and optimize public services by utilizing digital technology, thus allowing the government and the public to interact and complete various administrative matters efficiently without being bound by physical location. This aims to improve accessibility, transparency, and speed of service, while saving operational costs and increasing productivity

by providing work flexibility, while ensuring service continuity even in emergency conditions, in line with the vision of adaptive and technology-oriented regional development.

To determine the effectiveness of the role of the Kantor Virtual application as an innovation in administrative management in the Management and Library Section of the Organization Bureau of the Regional Secretariat of Bali Province, this study uses the Innovation theory. According to Nurdin in K.K Azizah & Maharani (2024), innovation is something new, which is launched and implemented in practice or process (both goods and services) or something new but the result of adoption from other parties. In the theory of innovation, there are several indicators put forward by Everret M. Roggers in Riksfardini et al (2023), which include.

1. Relative Advantage is the extent to which an innovation is considered better than pre-existing ideas or products, for example, more efficient or more cost-effective.

2. Compability is the degree to which the innovation conforms to the existing values, past experiences, and needs of potential adopters.

3. Complexity is how difficult the innovation is to understand and use by individuals or organizations that want to adopt it.

4. Triability is the ability of an innovation to be tried on a limited scale before full commitment, which reduces uncertainty for potential adopters.

5. Observability is the extent to which the results of the innovation are visible and can be communicated to others, facilitating adoption because the benefits are clear.

Based on interviews that have been conducted with Anak Agung Sagung Ratih Candra Dewi as the Virtual Office admin of the Governance and Library section, it is explained that the Kantor Virtual application is very effective in administrative management in the Governance and Library Section.

1. Relative Advantage

This Kantor Virtual application brings very significant advantages compared to the previous administration system in the Management and Library section, especially in terms of correspondence. The correspondence process is now much faster with a clear tracking feature. Employees can easily find out where a letter is, so there is no more guesswork or uncertainty. If there is a pending or unsigned letter process, then employees can see the complete history in *real-time*. This history feature allows employees to track when a letter was uploaded, when it was signed, when it came in, and when it went out. This effectively eliminates the potential for "miss" or misinformation. With the date, time, and identity of the uploader clearly recorded, there is no more room for misunderstanding.

This Kantor Virtual application has provided great added value in terms of time efficiency and operational costs, as well as indirectly improving the quality of work in the Management and Library Section. Compared to before, the process is much more effective and faster. Now, people can also write to the bureau without coming directly to the office. They simply submit their requests through the system, which significantly speeds up the entire process. In addition, operational costs are almost nil, as all that is needed is an internet connection. This is a major advancement in favor of efficiency and accessibility.

2. Compability

   This Kantor Virtual application is very much in line with the values, needs, and work experience of the employees in the Management and Library section. This is because the government designed the system based on existing regulations and workflows, such as the Governor Regulation (Pergub). For example, the flow of letter submission starts from the staff, goes up to the sub-department head, then to the head of the bureau, and finally to the head of the bureau (karo), everything is structured and organized. This application is designed to follow these rules, ensuring that every step in the administrative process is accommodated and in accordance with applicable procedures.

   The main challenge in integrating the Kantor Virtual application lies in the adaptation of the employees. Previously, they were used to a manual correspondence system that used hard copies or paper. The transition process from the manual way of working to the digital system takes time. Most employees come from the senior generation, so the process of learning and adapting to new technology is a bit of a challenge. However, this does not mean it is impossible. They can still be taught and adapted, although it requires extra effort in guidance and training.

3. Complexity

   This Kantor Virtual application is actually not difficult to learn and use by employees in the Management and Library section. The difficulty that may arise is more due to unfamiliarity with the new system. In fact, the way to operate this application is similar to the use of smartphones that are already familiar to most employees. The main key is the willingness to learn. If employees have that willingness, adaptation will not be a big problem. It's like if they can operate a smartphone, they can definitely operate this app.

   The features offered by this application are easy to understand and implement in daily administrative activities. The main features are centered on correspondence, including:

   a. Incoming Mail: Receive letters from outside agencies, the public, or other Regional Technical Implementation Units (UPTD).

   b. Outgoing Mail: Sending letters from internal regional apparatus, both to other UPTD and external agencies.

   In addition, there is also a very helpful mail history feature. This feature allows users to see the real-time status and when the mail was created, which greatly supports transparency and efficiency. However, please note that there is no "trash" feature for deleted mails. If a mail has been deleted, the data will be permanently lost. However, only administrators have the authority to delete documents, so the risk of accidental data loss is minimized.

4. Triability

   The process of introducing and testing the Kantor Virtual application in our work environment was gradual and continuous. Initially, admins such as the interviewees participated in special training. After that, admins who have received training are tasked with transferring this knowledge to other colleagues. Admins conduct demo sessions to explain how the application works and introduce what a Virtual Office is. The admin also ensures that any employee who has difficulty or has not fully understood can ask the admin directly. The implementation of this application continues along with the learning process.

To date, the Kantor Virtual app continues to undergo updates and development of new features. For example, there is now the ability to combine a draft letter with its attachments into a single document. After that, users can choose whether they want to send the letter and attachments separately or combined. So, the app continues to be refined with the addition of features that are always being updated.

5. Observability

The impact or results of using the Kantor Virtual application are very easily seen and felt by employees in the Management and Library section. One of the main conveniences is accessibility. This application is available in the form of a mobile application on smartphones, which allows employees to access it anytime and anywhere, as long as there is an internet connection. This ease of access means that there are no more excuses for late letters, because every process must run on time. This positive impact is directly visible in the increased responsiveness and efficiency of daily work.

Currently, there is no formal survey to quantitatively measure the benefits of this app. However, the effectiveness of the app's role can be seen directly in the field. For example, if there is a meeting today and the invitation letter or meeting materials are sent through the app on the same day, employees can immediately know about it. This shows real speed and efficiency. Although there is no specific measurement, this speed and efficiency is very visible in the field. We have also not received any complaints regarding the use of this application. Overall, this Kantor Virtual is rated very good and almost perfect. The ease of *login* using SSO (Single Sign-On) which allows access to many applications/webs with one account is also a plus. In addition, maintenance of the application is rarely required, indicating good system stability.

Based on the results of the interviews conducted, the Kantor Virtual application has proven to be very helpful for performance in the Management and Library section. One of the biggest benefits is that the correspondence process has become much faster and more efficient due to the clear tracking feature, so that the position of the mail is always known. This directly saves time and operational costs, because employees and the public can now correspond from anywhere without the need to come directly to the office, just by using an internet connection.

Although at the beginning of the implementation there were adaptation challenges for some employees, especially those who were accustomed to the manual system, the application was relatively easy to learn because the way it works is similar to using a smartphone. The main features offered, such as inbound and outbound mail management, as well as real-time mail history, are easy to understand and implement in daily activities.

Overall, the positive impact of using this application is very visible and felt. The increased speed in handling documents and the lack of complaints from users are clear evidence of its efficiency. This Kantor Virtual application has successfully changed the way of working to be more modern, effective, and transparent, thus supporting the unit's performance optimally.

IV. Conclusion

The Kantor Virtual application has proven to be effective in improving administrative management in the Management and Library Section of the Organization Bureau of the Bali Provincial Secretariat. The application provides significant advantages in terms of correspondence, speeds up the process with clear

tracking features, allows employees to know the status of letters in real-time, and eliminates misunderstandings. Its use also saves time and operational costs as people can submit letters online without having to come to the office.

Although at the beginning of the implementation there were adaptation challenges, especially for employees who were accustomed to the manual system, the application was relatively easy to learn because the operation was similar to using a smartphone. Its main features, such as incoming and outgoing mail management and real-time mail history, are easy to understand and implement in daily activities.

The positive impact of using this application is very visible and felt, with an increase in the speed of handling documents and minimal complaints from users as evidence of its efficiency. This application has succeeded in changing the way of working to be more modern, effective and transparent, thus supporting optimal employee performance.

Literature

Al Karimi, D. S., & Meirinawati, M. (2022). Innovation of the Ready and Taper Village Program (Fast, Empathetic, and Pro-Active Services) in Lowayu Village, Dukun District, Gresik Regency. *Publika*, 1101-1110.

Amruddin, S. P. (2022). Quantitative paradigm, theory and literature study. *Quantitative and Qualitative Research Methodology*, *1*.

Ananditya, A., Sriyono, S., & Yanti, S. (2020). Design of Desktop-Based Online Game Voucher Sales Information System at Aren. Net in Depok. *Journal of Research and Application of Informatics Students (JRAMI)*, *1*(01), 87-94.

Central Bureau of Statistics. (2024). *Information and Communication Technology Development Index 2023*. Accessed on April 7, 2025 via https://www.bps.go.id/id/publication/2024/09/30/b50f00b8615fc8716c8e02d4/indeks-pembangunan-teknologi-informasi-dan-komunikasi-2023.html.

Bao, B., Ayomi, H. V., Bakri, H., & Ndibau, P. (2023). Implementation of E-Government in Public Services in Jayapura City. *Journal on Education*, *5*(2), 4147-4157.

Basid, I. A. M., Islamiyah, N., Zuleika, R. A., Inka, A., Andarini, S., & Kusumasari, I. R. (2024). The Role of Information Technology in Business Planning and Development in the Digital Age: Challenges and Opportunities. *Economics And Business Management Journal (EBMJ)*, *3*(01), 71-76.

KK, A. S. R., & Maharani, H. N. (2024). Innovation and Development of Islamic Financial Products: Challenges and Prospects in the Era of the Industrial Revolution 4.0. *Edunomika Scientific Journal*, *8*(1).

Bali Provincial Government. (2021). Bali Governor Regulation Number 44 of 2021 concerning the Electronic-Based Government System (SPBE) of the Bali Provincial Government. Denpasar: Regional Secretariat of Bali Province

Riksfardini, M., Sagara, B., Firmanto, F. S., & Handayani, N. (2023). E-Government Based Tax Service Innovation Through the Use of E-Filing in Improving Service Quality. *PENTAHELIX*, *1*(1), 35-44.

Saputra, A. M. A., Kharisma, L. P. I., Rizal, A. A., Burhan, M. I., & Purnawati, N. W. (2023). *INFORMATION TECHNOLOGY: The role of IT in various fields*. Sonpedia Publishing Indonesia.

SPBE-Diskominfos Team. (n.d). Bali Provincial Government Virtual Office Application Guide.

Wijaya, K. A. S. (2024). Innovative governance in public services management through the Jakarta Kini application in DKI Jakarta Province. *Journal of Bina Praja*, *16*(1), 157-169.