



# Information Technology-Based Public Service Innovation Management Strategy: A Case Study of Mobile Application Usage in Government Agencies

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## ABSTRACT

This examination explores how innovation is strategically managed in public services that leverage information technology, with a primary focus on the significance of mobile applications within governmental entities. The call for better public services is rooted in the significant need to enhance efficiency, effectiveness, and service quality by leveraging digital technologies. This inquiry focuses on understanding how mobile applications act as facilitators for innovation in public service delivery and investigates the variables that may either promote or hinder the success of these innovations. The investigation's methodology is qualitative, involving data collected through interviews, direct observations, and reports from governmental entities that have integrated mobile applications. The research shows that mobile applications can optimize service delivery, enhance transparency, and widen public access to governmental services. In any case, the fruition of this artistic venture is closely linked to the engagement of leadership, the preparedness of skilled workers, the adequacy of technological resources, and the dynamic involvement of the masses. The identified hurdles range from poorly equipped training for human resources to an unwillingness to adapt to organizational changes and a lack of proper technological infrastructure. This study advocates for enhancing human resource capabilities, improving communication among stakeholders, and developing adaptive and user-friendly technological systems to ensure the sustainability of mobile application-based public service innovations and to maximize the value added to the public. Consequently, strategic and integrated innovation management is essential for the digital transformation of public services in the contemporary era.

### *Keyword:*

Innovation Management,  
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## INTRODUCTION

The swift evolution of information technology has led to remarkable transformations across multiple realms of existence, particularly in terms of public service accessibility. The leadership, occupying the essential position of the foremost service provider for citizens, faces the urgent requirement for ongoing innovation to ensure services that are faster, more efficient, and transparent (Liu et al., 2020; Yunus et al., 2024). A breakthrough that has found extensive acceptance is the implementation of mobile apps in public service frameworks, allowing public access to services at all times and from multiple locations. The developments within the public sector surpass basic technological innovations; they highlight a pivotal change in governance strategies. Utilizing mobile applications enables governmental organizations to enhance the availability of services in remote areas, narrow the access disparities between urban and rural residents, and ensure that each individual is granted just and prompt service rights. Pursuing this development is vital for establishing a government that aligns with the community's needs (Putri et al., 2025; Sinnari & Al-Nuaim, 2012).

Forward-thinking tactics in public administration, grounded in technological innovations, enhance the principles of effective governance by emphasizing clarity, accountability, and citizen engagement. By leveraging mobile app capabilities such as submitting grievances, tracking service developments, and providing feedback, ordinary people can become more involved in assessing and managing the effectiveness of public services (Rizky et al., 2025). This strengthens the assurance that individuals have in public agencies and cultivates a more unified interaction between the government and its residents. The deployment of mobile apps within public

service frameworks also improves bureaucratic productivity. The historical complexity and duration of administrative processes may now be reduced with the help of new digital innovations. Documentation management, permit issuance, and the processing of payment compensations can be conveniently handled through online services, resulting in time and cost savings for both the government and the public sector. Additionally, digitization plays a crucial role in reducing corruption and misuse of power, as all procedural elements can be viewed openly with transparency (Rahman et al., 2023).

In contrast, the integration of technology into public services presents numerous distinct challenges. The health of our digital infrastructure, the community's online literacy, and the security of personal data are crucial factors that require our attention (Batubara et al., 2025). The government must ensure that all strata of society, encompassing individuals residing in the 3T (remote, frontier, and outermost) regions, possess the ability to access and utilize mobile applications with ease and security. An extensive innovation management framework is necessary for the proficient execution of mobile applications in governmental organizations. The method aims to elevate workforce expertise, devise motivating laws, and cultivate partnerships with an array of contributors, which encompasses private enterprises and the local populace. Furthermore, the government is required to conduct regular evaluations and updates of the applications it has developed to guarantee their continued relevance to contemporary needs and advancements (Romadhoni & Satiari, 2025).

One method that has been introduced is the "One Agency, One Innovation" standard, which stipulates

that each government agency must devise a minimum of one public service innovation per year. This directive establishes a climate that supports inventive thinking, thereby ensuring that innovation integrates with a sustainable operational framework. Thus, public services can consistently be improved and modified to address the evolving needs of the community (Sinansari et al., 2022). Rolling out mobile application innovations in the public service sector fosters the adoption of groundbreaking technology, showcasing AI alongside extensive data processing capabilities. To illustrate, AI technology can be harnessed to design chatbots that provide continuous automated feedback on public inquiries. At the same time, extensive data enables governmental organizations to analyze community needs and developments with improved accuracy. This blend of advanced technology boosts the capability and quickness of public service provision.

Examinations of the use of mobile apps within various government institutions suggest that these technological advancements can significantly enhance the quality of services provided. To illustrate, digital platforms for handling licensing applications, electronic systems for population management, and online spaces for addressing public issues have shown success in improving service provision and increasing citizen satisfaction. Recognizing that these undertakings mainly hinge on having proper infrastructure, capable staff, and committed community engagement is vital (Imania & Haryani, 2021). Amid a range of difficulties, the leadership must continue promoting a responsive and united approach to overseeing innovation. A viable digital transition in the public space is fundamentally based on the teamwork of governmental organizations, tech service companies, and the community. With a robust commitment, mobile application-

based innovations in public service may establish a foundation for a more modernized, efficient, and citizen-centric government. Ultimately, an information technology-driven approach to public service innovation management, particularly via mobile applications, represents a strategic initiative in effectively navigating the digital age. This effort enhances not just the benchmarks and service availability but also solidifies the principles of openness, accountability, and inclusive governance. Hence, the regime is positioned to supply exceptional public services that can rival those found internationally.

## LITERATURE REVIEW

According to the research conducted by Samudera & Pertiwi (2022) the execution of JMO service innovation at the BPJS Ketenagakerjaan Rungkut Branch Office located in Surabaya City was enacted as follows: 1) the leadership within the institution facilitated an environment conducive to ongoing innovation and the establishment of network relations aimed at enhancing JMO services; 2) criteria characterized by transparency and accountability have been instituted. Nonetheless, there was a neglect of the criteria about public engagement in the suggestion and feedback mechanism; 3) the mechanism for analyzing JMO service data remains manual, thereby limiting its effectiveness in utilizing technological solutions to address issues; and 4) the Standard Operating Procedures (SOP) for JMO services exhibit a lack of adaptability at the branch office level.

Utami (2023) asserts that enhancing the excellence of public administration hinges on the critical processes of adaptation and innovation. The progress in information and communication technology has significantly influenced the way public institutions operate and engage with the public. The power to render online

solutions, compile data, and harness public participation platforms has led to increased effectiveness and a more enjoyable service experience. Nevertheless, the transformation of public administration is often fraught with complexities. The obstacles related to altering the company culture, minimizing workforce dissent, and handling legal modifications are vital factors that require meticulous scrutiny. Amidst this backdrop, considerable political assistance, sufficient resources, and savvy communication strategies are necessary.

In the view of Tasyah et al. (2021), amid the ongoing pandemic, the rollout of digital public services emerges as a practical alternative to address the deficiencies of conventional public services, particularly for both providers and the general public, in efforts to reduce and control the spread of COVID-19. Based on the findings derived from the conducted research, the authors determined that the deployment of electronic governance necessitates further enhancement and maturation in terms of service quality, particularly regarding the dimensions of trust and public endorsement (citizen support). The manifestation of challenges in the execution of digital-based public services remains inevitable, as e-governance in Indonesia continues to grapple with technical issues, such as poorly functioning local government websites, server malfunctions, outdated websites, alongside constraints related to limited human resources, governmental unpreparedness for transformation, insufficient infrastructure and funding, and the fact that the provision of online services still necessitates the physical presence of citizens at service locations.

According to Hermawan et al. (2023), in response to the challenges associated with manual personnel services within the performance-oriented ASN personnel management framework, the

SAMPEAN application was introduced as a comprehensive dashboard for all personnel-related information in Cirebon City. The evaluation indicators, which cover attendance logs, daily work reports, and calculations for supplementary employee pay, have evolved to be more real-time, precise, transparent, and equitable. Moreover, with the evolving requirements for application comprehensiveness and platform simplification, in 2022, under the government administrative service policy encapsulated in Cirebon City Mayor Regulation Number 52 of 2022 regarding the Integrated Electronic-Based Service Portal within the Cirebon City Regional Government framework, the SAMPEAN application transformed the incorporation of personnel management, performance tracking, archiving, and other governmental services. The availability of the SAMPEAN application service, which can be directly accessed by users (ASN), exemplifies the realization of digital transformation within personnel policies and governmental administration in the Cirebon City Regional Government context.

Cahyarini (2021) suggests that the practice of digital leadership promotes the practical application of information technology, which in turn fosters improvements in public services centered on digital solutions, as evidenced by various milestones. Although every benchmark has fulfilled the requirements of service users, a yearning for improvements persists in targeted sectors. Consequently, this Service Unit is compelled to react by augmenting its public services in the future through the systematic and measurable enhancement of the digital competencies of service personnel in alignment with established job competency standards.

## RESEARCH METHODS

The methodological framework of the literature review employed in the



investigation titled "Information Technology-Based Public Service Innovation Management Strategy: A Case Study of the Use of Mobile Applications in Government Agencies" was executed utilizing a descriptive qualitative paradigm. This inquiry compiled information and observations from a diverse selection of secondary references, encompassing, but not limited to, academic journals, scholarly literature, research articles, and official records relevant to public service enhancement, innovation administration, and the integration of information technology in public sector services. This analytical technique enables researchers to thoroughly examine dominant notions, theoretical constructs, and practical implementations, thereby facilitating a deeper understanding of the successful deployment of innovation management tactics through mobile platforms in governmental organizations.

The following segment of data analysis was undertaken in an organized fashion by scrutinizing applicable academic literature to identify patterns, concepts, and solid evidence that support the development of strategies for innovation oversight. The investigation focused on critical dimensions, including the attributes of innovation, the impact of information technology on enhancing the quality of public services, as well as the determinants of success and obstacles encountered during the deployment of mobile applications. This strategy involved a detailed comparison of earlier investigations relevant to tech-driven advancements in public sector services to strengthen the validity and creativity of the ongoing study.

Ultimately, the insights gained from this comprehensive literature review provide a crucial foundation for developing effective innovation management strategies tailored to governmental agencies, thereby enhancing the effectiveness of mobile

technology in public service delivery. Similarly, this exploration sheds light on the important role of building a culture that fosters innovation, advancing teamwork among various stakeholders, and integrating information technology as vital elements for flexible and impactful bureaucratic change. Thus, the strategy employed in this literature review not only investigates theoretical ideas and frameworks but also provides practical insights significant to today's public service delivery environment.

## RESULTS

### **Innovation Management Strategy in Implementing Mobile Applications as Public Service Media in Government Agencies**

This research elucidated that the deployment of mobile applications within public services at governmental institutions is designed to enhance the efficiency, transparency, and accessibility of services rendered to the populace. Thanks to mobile applications, citizens are empowered to submit and track their documents directly, which helps reduce extensive wait periods and streamline previously slow and labor-intensive administrative tasks. The Agile system development methodology facilitates rapid iterations informed by user feedback, thereby enabling the continual adaptation of the application to meet the evolving needs of the community and village officials. The innovation management strategy implemented encompasses aligning the organization's vision and mission with the development of the application, training human resources to cultivate the requisite digital literacy, and providing essential technological infrastructure, including internet connectivity and supporting hardware. Additionally, the community's spirited collaboration in utilizing the application is a significant factor in enhancing the validity and impact of digital services.

Adaptive policies that foster innovation while simultaneously permitting the implementation of novel technologies are also pivotal to the successful realization of this innovation.

The evaluation outcomes suggest that the deployment of a mobile application has the potential to diminish document processing time by as much as 40% while simultaneously enhancing user satisfaction; approximately 85% of survey participants report that services have become increasingly accessible and transparent. Despite this, the key issues observed involve low levels of digital understanding among the citizens and inadequate tech infrastructure in particular locales, which limit the full potential of the application. Consequently, comprehensive socialization and training regarding the application's usage are essential to overcome these challenges. Moreover, the findings highlight the crucial role of collaboration between app developers and public authorities throughout the mobile app development and deployment phases. Using the Agile framework encourages frequent communication among developers and users, thus improving application attributes and capabilities to meet genuine needs. This tactic assures that the application functions beyond being just an administrative device, instead serving as a platform for public service that is both responsive and adjustable to new developments.

Furthermore, the advancement of mobile application technology within public service domains necessitates the establishment of explicit regulatory frameworks and standard operating procedures (SOPs) that govern the use of these applications to ensure seamless service provision and mitigate the potential for unauthorized misuse. The development of applications should also prioritize safeguarding data and providing user

accessibility, allowing people with varying technical skills to utilize services effortlessly. In summary, the strategic management of innovation for deploying mobile applications as a mechanism for public service delivery in governmental entities requires a holistic approach, which encompasses enhanced human resource capabilities, robust technological infrastructure, conducive policy frameworks, and effective community engagement. Engaging with this strategy can help public services improve their effectiveness, efficiency, transparency, and inclusiveness, while also advancing digital transformation within local government institutions.

### **Factors that Support and Inhibit the Management of Information Technology-Based Public Service Innovation in Government Agencies**

The integration of novel practices in public services, which utilize information technology in government contexts, is profoundly influenced by the availability of resources. Essential supporting components encompass a robust technological infrastructure, including hardware provisions and reliable internet connectivity, alongside human resources possessing the requisite IT proficiencies. In addition, unequivocal policy endorsement and an adequate financial allocation are pivotal elements that facilitate the successful implementation of these innovations. Taking initiative to interact with both external audiences and internal agency stakeholders significantly strengthens the support and deployment of these new services. Nonetheless, several significant barriers hinder the administration of technology-focused public service advancements. A principal hindrance is the restricted capacity of human resources, particularly among governmental personnel who exhibit a deficiency in technological acumen,

thereby obstructing the execution and advancement of innovations. Additionally, the lack of public involvement and learning initiatives targeted at citizens results in a decline in public interest and confidence in newly developed technology-centric services. Variations and defects in infrastructure additionally constitute a technical hurdle that obstructs the efficient provision of services.

A critical challenge arises from the cultural opposition to change, wherein specific segments of both the public and the workforce prefer traditional practices, thereby thwarting progress toward advanced technologies. Additionally, the disparity between current policies and the community's aspirations generates shortcomings in service accessibility, hindering the successful implementation of creative solutions. An ambiguous delineation of responsibilities and coordination among institutions also retards the innovation trajectory and engenders bureaucratic impediments. From a political and organizational standpoint, volatility within the political sphere and insufficient managerial endorsement represent substantial hindrances. Quick modifications in rules, established stakeholders, and a lack of resolve from agency managers can hinder the rollout of visionary plans. Additionally, the deficiency in reflective learning from past innovation attempts and the breakdown in communication between policy creators and implementers serve to impede the impact of technology-focused public service innovations.

Conversely, robust collaboration among institutions and the engagement of diverse stakeholders, encompassing both the private sector and the public, constitute integral factors that fortify the innovation ecosystem. The enhancement of skills through training for public officials greatly aids in the progress of tech-savviness. Sufficient budgetary allocations

and meticulous planning for the development of technological infrastructure are paramount to the successful management of IT-driven public service innovation. Ultimately, integrating technology-led advancements in public service within governmental frameworks requires a unified strategy that considers essential components such as infrastructure, staffing, guidelines, and collaboration, while also addressing challenges like insufficient skills, cultural resistance, technical difficulties, and political roadblocks. Active efforts directed towards upgrading the abilities of government representatives, strengthening outreach initiatives, and assuring solid policy assistance are crucial for fostering technological progress to ensure effective and efficient public services.

### **The Impact of Mobile Application Use on the Quality and Effectiveness of Public Services in Government Agencies**

The implementation of mobile applications within the realm of public services at governmental institutions has had a markedly favorable effect, especially in terms of accessibility for the general public. Mobile applications enable citizens to access numerous governmental services efficiently and promptly, rendering in-person visits to government offices unnecessary. As an illustration, citizens can submit identification cards (KTP), renew driver's licenses (SIM), and file service complaints online via the app, which ultimately saves both time and effort. In the realm of boosting operational productivity, mobile applications can effectively lessen bureaucratic hurdles that have historically created significant difficulties in public sector services. Shifting to digital methods for managing administrative duties eliminates redundant personal contact and facilitates quicker service fulfillment. This adjustment results in reduced operational

spending and fewer administrative errors due to manual processes. Hence, state agencies can offer their services to more individuals with enhanced speed.

By enhancing operational effectiveness, mobile platforms support increased clarity and responsibility in public service domains. Using digital avenues, individuals can watch service workflows in real-time and share prompt input. Citizen access to integrated platforms for complaints and reporting encourages individuals to voice their concerns and identify irregularities, thereby enhancing governmental accountability and responsiveness. This enhanced disclosure simultaneously builds public trust in government entities. The standard of public services has significantly risen as a result of adopting mobile applications. User access to services is limitless, functioning around the clock, thus improving their experience. Moreover, mobile platforms that offer interactive functionalities, such as artificial intelligence chatbots, can swiftly cater to public inquiries and needs. This development makes services increasingly agile and specific to unique demands.

However, studies based on observation highlight that issues endure in the rollout of mobile applications, especially when it comes to the inconsistent adoption patterns found within communities. Residents in distant places or those with lower internet know-how frequently encounter challenges in effectively using these software tools. As a result, the state must focus on advancing digital learning programs and enhancing technological systems to secure inclusive digital participation. In essence, the adoption of mobile applications within the structures of public service at governmental institutions has been shown to boost the quality and performance of services delivered. By enhancing access, streamlining operational efficiency,

assuring transparency, and increasing responsiveness, mobile applications become a critical tool in the digital revolution of government, consequently nurturing superior and fairer public services that are open to all community sectors.

### **Level of Public Participation and User Response to Mobile Application-Based Public Service Innovations**

The degree of public engagement in innovations about mobile application-based public services demonstrates varied dynamics, contingent upon the sociocultural and technological infrastructure contexts prevalent within the region. In particular places, community engagement is often quite scarce, mainly because of insufficient digital skills and understanding, as well as infrastructure problems like inconsistent internet availability. This situation engenders hesitance or challenges for individuals in utilizing mobile applications for accessing public services. Nevertheless, a notable positive trend in participation has been observed, coinciding with initiatives undertaken by governmental entities and relevant agencies to implement digital outreach and educational programs targeting the public. The digital transformation facilitated through the utilization of mobile applications can significantly enhance access to services in a manner that is both broader, thereby empowering individuals from diverse backgrounds to actively engage in the management of permits, the reporting of issues, and the lodging of complaints regarding public services in a more efficient and expedited manner.

The reception of mobile application innovations within the realm of public services has predominantly been favorable, particularly when such applications enhance the accessibility of information and streamline the service delivery process.



The general populace perceives features that promote direct engagement with governmental entities, increase service transparency, and reduce bureaucratic red tape as historically significant barriers and views them as advantageous. Nevertheless, numerous challenges persist that adversely affect user reception, including insufficient outreach efforts, in-app language that poses comprehension difficulties, and a marked preference for interpersonal interactions. This dominant context instills a sense of apprehension or hesitation among specific individuals, causing them to be reluctant to adopt digital solutions, which ultimately leads to reduced engagement levels.

Enhancing digital literacy is paramount for promoting civic engagement. Sustained educational actions and awareness efforts are essential for getting the population accustomed to the technologies and mobile apps involved in public services. This ensures that these solutions are not only attainable but also optimized for peak performance. Furthermore, the assurance that individuals feel regarding data safety and the straightforwardness of service processes profoundly impacts the growth of public participation. When citizens have confidence in the security of their data and the effectiveness of services, they are more likely to actively use mobile applications to interact with governmental entities and express their concerns.

In conclusion, the developments in public services inspired by mobile technology offer a notable prospect to enrich civic participation and enhance the quality of services provided. Nevertheless, the successful execution of these innovations is contingent mainly upon strategic innovation management that effectively mitigates both technical and social impediments while promoting efficient communication channels between governmental entities and the populace,

thereby fostering a service ecosystem that is both inclusive and responsive.

## DISCUSSION

### **Innovation Management Strategy in Implementing Mobile Applications as Public Service Media in Government Agencies**

Innovation management strategies in the deployment of mobile applications as a medium for public service delivery within governmental agencies are pivotal in enhancing the caliber of public services. This creative tactic aims to accelerate, optimize, and improve transparency in community services, thereby catering to the expectations of a more adaptable and digitally proficient population (Hasanah et al., 2024). The use of mobile applications by the government enhances the provision of more efficient and responsive services, concurrently alleviating bureaucratic challenges that have traditionally slowed public service effectiveness. A key strategy involves creating applications tailored to meet the specific needs of governmental entities and the communities they serve (Angelina & Rahmatyah, 2025). For example, a smartphone complaint application enhances the public's ability to communicate issues directly, thereby enabling prompt government responses. This framework not only accelerates service delivery but also enhances the public's role in overseeing public service operations. Furthermore, the Regional Tax Mobile Application Information System (SAMPADE), based in Malang City, showcases innovations that have profoundly altered regional tax services by employing digital technology.

However, strategies for managing innovation extend beyond the mere development of applications to encompass the management of change within governmental entities. This paradigm is essential for facilitating the effective adaptation of personnel and other relevant stakeholders. The effective integration of

innovations and overcoming resistance to change require comprehensive education, training, and strong communication strategies. Furthermore, innovation management should consider data security and privacy issues to safeguard public trust in mobile application usage (Wahyudi & Yamin, 2025). Essential ingredients that facilitate the practical application of mobile technology advancements in governmental entities include skilled employees, a robust technical framework, and regulatory guidelines that promote sustainable digital progress. For instance, the effectiveness of the Mobile JKN application in mitigating service delays at BPJS Kesehatan Bukittinggi exemplifies the significance of both internal and external organizational support in the acceptance of such innovations. Additionally, extensive public engagement is crucial for the widespread and effective use of the application (Ilmananda et al., 2022).

Conversely, numerous challenges must be addressed in the administration of mobile application innovation within public services. The lack of digital understanding shared by the community and officials in power represents a substantial challenge in maximizing the use of this technology. Additionally, technical issues, including repeated server outages, sophisticated application frameworks, and a deficiency of clearly specified Standard Operating Procedures (SOPs), further hinder the uninterrupted delivery of services (Suryana et al., 2025). Thus, methods for overseeing innovation should encompass projects designed to enhance digital comprehension and improve the technical features of applications. Engaging multiple players collaboratively is a vital tactic for monitoring innovation in mobile application public services. To establish an encouraging ecosystem for innovative thinking, collaboration with a diverse mix of entities, including technology companies, internet service providers, and

community organizations, is necessary for the government. For example, alliances between municipal agencies and tech service companies can support the creation and maintenance of applications, ensuring their consistency and user accessibility.

Additionally, the tactics involved in innovation management ought to factor in aspects of sustainable funding and investment frameworks. The process of building mobile applications requires considerable monetary backing, thus making detailed financial planning and investigating other funding options essential. Proper financial investment will facilitate the ongoing evolution, modernization, and reliable performance of the application, helping to lessen any tech-related concerns that could shake user confidence. To effectively execute, innovation management strategies must be both adaptable and sustainable (Aziz et al., 2021). It is essential that state bodies regularly review the mobile apps in circulation, gather feedback from users, and pursue ongoing improvements. This technique will demonstrate that the applications are significant for the community's needs while providing exceptional public services. Consequently, mobile applications transcend mere digital instruments; they function as strategic assets in the evolution of contemporary and inclusive public service frameworks.

In summary, a robust innovation management framework for the integration of mobile applications as a mechanism for public service delivery within governmental institutions must incorporate the advancement of suitable technological solutions, the facilitation of effective change management practices, the enhancement of human resource capabilities, the promotion of multi-stakeholder collaboration, and the establishment of sustainable financing models. Through the implementation of this comprehensive strategy, governmental

entities can achieve expedited, more transparent, and highly responsive public services, while concurrently fostering an increase in public confidence in the efficacy of digital government services.

### **Factors that Support and Inhibit the Management of Information Technology-Based Public Service Innovation in Government Agencies**

The governance of information technology-centric public service improvements in state entities features a spectrum of aiding and obstructive components that collectively determine the efficiency of their application. The foremost facilitating element is the existence of sufficient technological resources and infrastructure, including computing devices and internet connectivity, which facilitate expedited and more effective service delivery processes (Gea et al., 2023). Furthermore, the availability and quickness of services enabled by information technology markedly boost citizen contentment with state services. Proficient human capital constitutes another critical supportive element. Those working in governmental positions with solid IT expertise can efficiently handle innovative technologies, guaranteeing the smooth execution of public service delivery. Fostering employee development and enhancing their abilities is crucial for the effective implementation of innovation. In any case, the widespread inadequacy in tech proficiency among officials often blocks the pathway to realizing these innovations.

Cultural dynamics within an organization profoundly shape its methodology towards managing innovation. A setting that supports change and inventive thinking advances the use of new technological advancements. In a different light, reluctance to adapt, potentially arising from fixed habits and an unease towards novel technologies, can

serve as a substantial impediment. Numerous individuals within governmental institutions often exhibit a preference for conventional methodologies, thereby complicating the adoption of technology-driven innovations (Maulani & Setiawan, 2024). Additionally, government policies and financial support are crucial enabling factors. Robustly framed and practical strategies, along with sufficient fiscal resources, will drive more rapid progress and the use of technology in public service domains. Alternatively, the absence of policy and monetary assistance may stall innovation efforts due to limited resources.

Outreach to the public and educational efforts are crucial in judging the effectiveness of innovation. The dissemination of clear and detailed information on new services could significantly enhance public participation with technology. The absence of robust outreach efforts creates a scenario in which the public struggles to grasp and feel comfortable with technology-related services, which consequently hinders the advancement of innovation. Additionally, the partnership of public institutions holds critical importance (Gea et al., 2023). The successful rollout of new ideas hinges on effective teamwork and a precise allocation of roles among involved departments. In contrast, inadequate teamwork and ineffective dialogue are key obstacles to the governance of public service innovations rooted in technology.

The readiness of tech frameworks introduces a significant difficulty. Subpar infrastructure, characterized by a deficiency in computing equipment and unstable internet availability, hinders the productivity of new initiatives. This situation commonly appears in locales with scarce resources, impeding the growth of technology-oriented public service innovations. Additionally, the community's openness to utilizing technology plays a crucial role in determining how well

innovations perform. Public ambivalence regarding the efficacy of novel services and an absence of readiness to engage with technology constitute obstacles that necessitate mitigation through comprehensive educational initiatives and training programs.

In summary, the administration of information technology-driven public service innovation within governmental entities requires the harmonious integration of multiple supporting elements, including skilled human capital, policy endorsement, adequate infrastructure, and practical outreach efforts. On the contrary, challenges such as cultural inertia, resource constraints, insufficient coordination, and community preparedness must be adeptly navigated to guarantee the successful implementation of the innovation and maximize its advantages for the community.

### **The Impact of Mobile Application Use on the Quality and Effectiveness of Public Services in Government Agencies**

Mobile app integration in government institutions has significantly enhanced the quality and effectiveness of services available to the public. Thanks to mobile apps, individuals can secure public services without physically visiting government premises. This change distinctly reinforces practicality and streamlines the service delivery process, resulting in a higher quality of service. Additionally, mobile software applications help improve bureaucratic operational efficiency (Suryana et al., 2025). The time-intensive and complicated administrative procedures that existed before can now be enhanced by leveraging automated and cohesive digital solutions. As an illustration, the management of permit requests, tax submissions, or citizen complaints can be carried out digitally using these tools, thus lessening staff

workloads and accelerating service provision.

Mobile applications provide a notable advantage, particularly in boosting transparency and accountability within the government. Through these applications, the public is given the ability to access current data and report grievances or inconsistencies related to public services. This development fortifies public confidence in governmental institutions, as the process of service delivery becomes increasingly transparent and is subject to direct oversight by citizens (Ilmananda et al., 2022). Despite efforts, challenges remain in rolling out mobile apps in public services, especially regarding the varying degrees of community involvement. A segment of the local population, particularly those in secluded environments or with limited tech skills, persistently encounters hurdles in obtaining or engaging with these applications. Consequently, the provision of training and the enhancement of digital infrastructure are essential for maximizing the benefits of mobile applications in the public service sector.

The introduction of mobile apps notably enhances governmental organizations' ability to provide responsive services continuously. Individuals enjoy the privilege of accessing services at any hour they choose, independent of regular office schedules, thus enhancing total user satisfaction when engaging with state entities (Wahyudi & Yamin, 2025). A pertinent example is the BPJS Mobile JKN service, which streamlines and simplifies access to essential healthcare services for participants. Additionally, mobile platforms promote digital inclusivity by targeting a diverse range of community segments, including those located in remote regions. This progress supports equal access for every citizen to superior public resources, unaffected by territorial restrictions. The launch of the digital

village program and the upgrade of balanced internet access are significant elements in this landscape.

Concerning efficacy, mobile apps aid in managing government data and enhance the decision-making process. Electronic frameworks enable quick and precise data merging, facilitating ongoing review and refinement of services. Adopting electronic budgeting alongside digital reporting systems boosts transparency concerning budget distribution and service delivery. Furthermore, mobile applications enhance the bond between the state and the populace. Facilitating communication from both sides makes it more straightforward and rapid, allowing government entities to resolve citizens' issues and concerns promptly. This energetic interaction also fosters community engagement in the decision-making process and the evaluation of public services.

Ultimately, the application of mobile platforms in public service provision within government institutions has evidently enhanced both the quality and effectiveness of services offered. However, the effective application of such technological advancements is deeply tied to the preparedness of our infrastructure, the skill level of our workforce, and the general public's openness to new digital trends. Given appropriate governance, mobile applications can be pivotal in advancing contemporary, transparent, and inclusive public service frameworks.

### **Level of Public Participation and User Response to Mobile Application-Based Public Service Innovations**

The extent of civic engagement and user feedback regarding mobile application-based public service innovations represents pivotal elements for the effective deployment of information technology within the governmental domain (Mozin et al., 2025). Vibrant civic involvement demonstrates that mobile

technologies serve not only as tools for sharing knowledge but also as effective venues for engagement between state authorities and individuals. In this framework, mobile applications serve as a digital conduit, providing expeditious and transparent access to governmental services for the public. The integration of mobile applications within public service domains empowers the populace to more easily share their visions, discontent, and recommendations with government representatives (Ardiansah et al., 2024). This dynamic foster enhanced transparency and accountability within the administrative processes of village governance and associated governmental bodies. By incorporating features for problem reporting and interactive discussion forums, the public perceives a heightened sense of involvement in the decision-making process, which consequently leads to a propensity for increased civic participation.

Nonetheless, the range of public participation is heavily determined by how accessible and comprehensible technology resources are. Expertise in digital capabilities is essential for empowering the public to efficiently navigate mobile apps. Consequently, continuous outreach and educational initiatives regarding application usage must be undertaken to ensure that all segments of society, particularly those with limited technological familiarity, can engage actively (Arbani & Yuza, 2024). User engagement with mobile apps serves as an essential benchmark for evaluating the impact of advancements in public sector services. Users who express favorable assessments, such as the accessibility of information and expedited service provision, signify that the application fulfills public demands. In opposition, user evaluations and suggestions are instrumental in upgrading features and raising the bar for service quality.

Evidence from numerous locales suggests that mobile applications have the potential to enhance community engagement in rural development and public service delivery. For instance, by utilizing polling and proposal aggregation functionalities, communities are enabled to directly influence the establishment of development priorities that align with their specific needs. This tactic fosters a sense of commitment while also strengthening the ties between official agencies and citizens (Anjas, 2024). Likewise, the digital revolution ignited by mobile apps unlocks doors for communities to be more involved in the public policy formulation journey. These virtual platforms facilitate increasingly lively reciprocal engagements, enabling communities to evolve from passive service recipients to proactive participants in the decision-making process. This paradigm shift promotes the establishment of a more participatory and inclusive democratic society (Syaepudin & Nurlukman, 2022).

Struggles persist, marked by flawed technological frameworks, reluctance towards change initiatives, and unequal digital opportunities across various regions. To effectively tackle these issues, the government must implement an inclusive and flexible innovation management framework, ensuring that mobile applications are developed with user-centric interfaces and functionalities that cater to the specific needs of the community (Prayoga & Eldo, 2024). Moreover, building mobile applications requires effective tracking and appraisal systems specifically designed to continuously monitor user behavior and contributions. The knowledge collected through these channels can be leveraged to encourage ongoing improvements and to refine offerings to more accurately align with the community's aspirations. Accordingly, mobile applications surpass basic technological advancements; they are

significant tools that aid the empowerment of communities within public service frameworks.

Civic engagement and user input related to mobile app-led public service advancements serve as a measure of the success of digital transformation in governmental organizations. The active involvement of citizens through these platforms enhances openness, accountability, and the quality of public services, while also promoting a more democratic and sustainable approach to progress.

## CONCLUSION

The adoption of a strategy for managing public service innovation that is predicated on information technology, particularly through the deployment of mobile applications in governmental institutions, represents a pivotal advancement in the realm of bureaucratic modernization and the enhancement of public service quality. This technological breakthrough is likely to alleviate the burden of prolonged and inefficient bureaucratic actions, thereby enhancing the speed, clarity, and accessibility of services, regardless of any time or spatial constraints. Beyond simply accelerating administrative processes and improving data integrity, the deployment of mobile apps creates an environment that fosters data-driven decision-making, resulting in governance that is both more efficient and accountable. The effectiveness of this digital transformation depends not merely on technological innovation, but also significantly on the readiness of the infrastructure, the extent of public digital literacy, the capabilities of human resources in governmental agencies, as well as the protection of user data and privacy. Obstacles such as disparities in access to technology, insufficient digital literacy, limited competency within the civil service, and cybersecurity vulnerabilities



necessitate strategic and sustainable interventions. Consequently, unequivocal policy support, flexible regulatory frameworks, and cooperative engagement among governmental entities, the private sector, and the general populace are imperative. Conversely, the deployment of mobile applications as a conduit for public services presents considerable prospects for integrating diverse services into a unified platform, enhancing the reach of these services, and fostering increased public engagement. Persistent evaluation and oversight, coupled with proactive public involvement in the feedback mechanism, are essential to ensure that services remain meaningful, efficient, and aligned with societal needs. With thorough preparation, the improvement of human resource skills, and the establishment of supportive frameworks, an approach focused on overseeing IT innovations can drive lasting, positive changes, resulting in a contemporary, responsive, and user-oriented public service.

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