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The Impact of Digitalization on Peruvian Public Services

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Abstract

The digital transformation of public institutions ensures that digital services meet citizens' needs and expectations. However, this transformation is not always reflected in public services. In general, digital public services lack continuous improvement processes that enable public organizations to anticipate citizens' needs and provide a better experience to their citizens. Therefore, it is interesting to understand how citizens assess governments' digital technologies and public services to identify those features that may increase citizen satisfaction and their intention to use these services in the future. This study analyzes the impact of digitalization on Peruvian public services and how these services, in turn, may satisfy user experience. The PLS-SEM technique assessed the proposed model with data collected from 119 Peruvian adult citizens. The results demonstrated empirical support for the theorized model, indicating that digitalization has an essential impact on shaping improved services, which increases citizen satisfaction and usage intention. Practical implications and recommendations are further developed.

Keywords: Digitalization, digital transformation, improved services, public services

Introduction

Information technologies (IT) have become a very relevant component for the development of modern states (Zhang, 2023). Governments are evolving from digitizing individual forms to a complete reengineering process of their services within the context of electronic government (hereinafter e-government) and the associated digital transformation trend (Scupola & Mergel, 2022). As in the private sector, citizens also expect that the public sector should be capable of meeting their needs (Palos-Sánchez et al., 2023). Indeed, digitalization of public services aims to enhance life quality by reducing service times, enabling remote access, and fostering transparency by visualizing the status of public procedures (Nookhao & Kiattisin, 2023). Janowski (2015) conceptualizes the evolution of e-government as follows. In its first phase, governments focus on digitalization, including incorporating IT into public institutions. In the second phase, public institutions implement the core principles of e-government, investing in the internal transformation of their processes by using IT to increase efficiency and efficacy. The third phase, referred to as commitment, includes not only the transformation of internal processes but also the inclusion of IT to improve governments' communication with citizens. This transformation of internal processes and external relationships is called digital transformation (Mergel et al., 2019).

Digital transformation in the public sector aims to ensure the alignment between digital services and citizens' needs and expectations. However, in countries with low adoption of the services, this transformation hardly resulted in better public services, and this situation might be associated with the lack of citizen data (as a consequence of the low adoption), which makes it challenging to analyze citizens' needs accurately (OECD, 2023). This problem then requires attention, considering that prior studies found that e-government usage and the associated benefits, such as transparency and auditability of government functions, might positively impact public institutions, restoring citizen trust (Mahmood et al., 2019a).

In the case of Peru, the country has a Digital Government Index of 0.62, which is similar to the average value for OECD countries (OECD, 2023). This index value suggests that Peru has digital technologies that are user-centered, data-driven, and digitally designed. However, the satisfaction rate with education, health, and justice-related services is low, around 50%, 40%, and 20%, respectively (OECD, 2024). In general, Peru has the lowest level of public service satisfaction within the OECD countries (OECD, 2024). This context highlights the need of the Peruvian government to strengthen its digital services provision to improve citizen satisfaction (Kim et al., 2019). Therefore, this study aims to determine the effect of digitalization on citizens' perception of various features associated with digital public services. Furthermore, this study also aims to assess how the perception of these features may impact satisfaction.

Literature Review

From a literature review, digital transformation has been mainly explored in the private sector. For example, Barba-Sánchez et al. (2024) and Valdez-Juárez et al. (2024) mentioned that companies' digital transformation positively affects organizational performance. Likewise, Rawashdeh et al. (2024) and Serdarušić et al. (2024) found that digital transformation positively affects sustainability. Other studies on digital transformation have focused on the user's intention to adopt digital services. For example, Gupta (2024) used the Technological Adoption Model to understand entrepreneurs' adoption of generative artificial intelligence (AI). In addition, Xu et al. (2024) used the Information Systems Success Model (ISSM) to evaluate the factors influencing users to participate in an art exhibition in the Metaverse.

In the public sector context, digital transformation is described as organizational change based on big data, analytics, cloud, mobile technologies, and social networks to provide better services (Nwankpa et al., 2016). The studies by AlNuaimi et al. (2022), Xanthopoulou et al. (2023), and Ly (2024) focused on digital transformation from the perspective of public officials. AlNuaimi et al. (2022) found a positive relationship between leadership and digital transformation. On the other hand, Xanthopoulou et al. (2023) focused on the relationships of internal factors, such as public services quality, on digital transformation. In the case of Ly (2024), the author argues that digital transformation significantly mediates the relationship between organizational commitments and individual performance. Finally, another thematic axis related to e-government is citizens' adoption of technologies, with TAM and the Unified Theory of Acceptance and Use of Technology (UTAUT) being two of the frameworks most used to study this phenomenon (Patrick & Marques, 2024; Chuah et al., 2024; Assegaff et al., 2023).

Another research stream has focused on understanding the dimensions of digital transformation and the features of digital services. For example, Mergel et al. (2019) stated that digital transformation in the public sector includes the dimensions of digitalization, relationships, competencies, and mindset. The authors also argued that digital transformation generates improved services, which may positively impact satisfaction. On the other hand, Chan et al. (2021) focused on analyzing the characteristics of digital services from the users' perspective. The authors found that the core features are self-service, facilitative service perception (accessibility and security), and support services perception (personalization and transparency). However, the authors did not consider digital transformation for service development. Chohan & Hu (2020), for their part, posited that e-government can be evaluated based on the system quality (including information and service quality). However, the authors did not include the effects of digitalization as part of the equation.

Finally, another research stream has focused on studying the effect of service quality on user satisfaction with digital public services (Mahmood et al., 2019a; Sharma et al., 2018; Ahmed et al., 2023). In this same group of studies, Hu et al. (2022) and Chohan & Hu (2020) incorporated usage intention as a consequence of satisfaction, extending the knowledge about this phenomenon. Based on the above discussion, this

section has identified two gaps in the literature: 1) citizens' perspective of the impact of digitalization on digital service quality has not been covered, and 2) a lack of studies on the effect of digitalization and improved services on citizen satisfaction, especially in the developing countries.

Theoretical Framework

Digitalization modernizes organizations' internal processes and changes how people access essential services, communicate with institutions, and participate in economic and social life (Bikse et al., 2021). Nookhao et al. (2023) established that public services digitalization was assessed from the citizen perspective using the ISSM developed by DeLone and McLean (2003). This model proposes to evaluate digital services using the system quality concept. For example, Veeramootoo et al. (2018) found that system quality plays a critical role in the success of digital government services, and it can be used as a proxy measure of customers' assessment of the digitalization level of institutions. System quality refers to technical attributes such as usability, availability, response time, and platform reliability (DeLone & McLean, 2003). These system features can determine how well a citizen can complete digital interactions and capture users' overall perception of the service experience. Empirical findings confirm the existence of this relationship in e-government contexts (Veeramootoo et al., 2018). Hence, system quality will be used to measure digitalization in this study.

Improved Services

The concept of public value originates in public administration, particularly from Moore's theory, which describes it as the shared expectations that citizens hold regarding government and public services (Moore, 1995). Twizeyimana et al. (2019) and Piranejad (2011) discussed the concept of improved services, defining them as the requirements of public services to enhance organizational experience with their connections and interrelations with citizens. According to Morgeson & Petrescu (2011), a relationship exists between the delivery of digital public services and citizen satisfaction. Similarly, Kim et al. (2019) found that using better digital public services positively affects citizen satisfaction. Therefore, digital services' features must be carefully designed and planned to impact citizens positively (Kim et al., 2019).

Chan et al. (2021) defined five core characteristics of a digital service. First is **self-service capacity**, which refers to how a person perceives that a service allows them to access it without human agents (Meuter et al., 2000). Second, **accessibility** refers to citizens' perception of the effort required to acquire the computer resources to access the service (Wixom & Todd, 2005; Layne et al., 2001; Zhang et al., 2011; Piranejad, 2011). Third, **security protection** captures citizens' perception that the service is protected against intrusions and attacks (Li & Shang, 2020; Gafni & Geri, 2013). Fourth, **the ability to personalize** refers to citizens' perception that a service can be customized to fit user-specific needs or preferences (Hinnant & O'Looney, 2003; Zachary & Pieterson, 2011). Finally, **transparency** refers to citizens' perception that a user can clearly understand how the service works (Welch et al., 2005; Bannister & Connolly, 2014; Castelnovo, 2013; Karkin & Janssen, 2014).

The present study contends that improved services is a superordinate construct, underlying the following sub-dimensions: "transparency," "personalization," "accessibility," "security," and "self-service." This second-order variable is reflective and can be viewed as a general concept composed of the five abovementioned dimensions, which should be understood in detail in order to propose adequate strategies to improve citizen experience.

Satisfaction and Usage Intention

Satisfaction is an important component of the New Public Management and is a key indicator for performance evaluations in public institutions (Mizrahi et al., 2010). The New Public Management approach places citizens at the center of public services, viewing them as clients (Caiden & Caiden, 2002). Public administration thus promotes using satisfaction measures as part of performance assessments in public agencies (Poister & Henry, 1994). This study conceptualizes satisfaction as the citizen's evaluation of past and present experiences with public service delivery (Mizrahi et al., 2010).

On the other hand, usage intention has emerged as a key behavioral outcome in the e-Government field, often influenced by prior user experience and perceived service quality. According to DeLone & McLean (2003), usage intention reflects users' willingness to continue interacting with an information system after initial adoption. In the context of digital public services (e.g., e-government), continuance intention is shaped by satisfaction (Mergel et al., 2019; Rivas-Delgado & Libaque-Saenz, 2022).

Stimulus-Organism-Response (SOR) Model

To determine the relationship between variables, this study is grounded in the SOR framework, proposed by Mehrabian & Russell (1974). The SOR framework has been widely applied in the field of human–machine interaction as a robust theoretical model for explaining how specific technological attributes influence individual psychological states and subsequent behavioral outcomes (Shi et al., 2022; Tuncer, 2021; Trinh & Tran, 2024). This theory offers valuable lenses for understanding how external factors (i.e., stimuli) can shape users' cognitive evaluations (i.e., organism), which in turn lead them to act in a certain way (i.e., response). This framework applies to the proposed e-government context as follows: digitalization and improved services act as external stimuli, and thus they can define users' overall evaluation of the service (i.e., satisfaction level), which in turn may impact users' decision to continue using a public digital service (i.e., intention).

Research Model

From the discussion provided in the previous section, it is important to notice that while digitalization embraces the system's quality, improved services are aligned with service quality. Accordingly, prior research has emphasized digitalization's significant role in shaping perceptions of service quality in information systems. For example, Shagari et al. (2017) empirically confirmed that system attributes significantly affect user perceptions of service quality. Similarly, Veeramootoo et al. (2018) applied the ISSM in e-government services, confirming the influence of digitalization, measured by system quality, on improved services. Based on this discussion, this study proposes:

H1*: Digitalization positively influences Improved Services*

On the other hand, Drwish et al. (2023) concluded that improved services positively impact user satisfaction by facilitating a more efficient interaction with digital services. Similarly, Nookhao & Kiattisin (2023), in their analysis of e-government adoption, found that perceived service quality significantly affects citizen satisfaction. Likewise, Xiong et al. (2022) confirmed that in mobile government services, service quality and overall perceived quality strongly influence user satisfaction. Based on this consistent empirical evidence across different technological contexts, the following hypothesis is proposed:

H2*: Improved Services positively influence Satisfaction*

Impact of Organism on Response

Li & Shang (2020) demonstrated that in the e-government context, citizen satisfaction is a determinant of usage intention. In other words, the satisfaction associated with the interaction with digital services strengthens citizens' intention to continue using these services. Complementarily, Sobodić et al. (2024) provided evidence that satisfaction significantly mediates the relationship between usability factors and continued usage intention of information systems. Likewise, Trinh & Tran (2024) confirmed that satisfaction is a key cognitive state mediating the impact of perceived usefulness on user intention. Based on these prior findings, user satisfaction is a robust predictor of intention to use information systems.

H3*: Satisfaction positively influences Intention of Use*

Research Methodology

Following prior studies, all first-order variables were measured as reflective. Each variable was measured based on citizens' perspectives and with multiple items, as shown in the Appendix. All items were contextualized to fit this study and were rated on a 5-point Likert scale from Strongly Disagree (1) to Strongly Agree (5). This study targeted Peruvian citizens who used digital public services. Data were collected through a survey implemented in Google Forms, and filter questions were added at the beginning to verify that participants were Peruvian citizens, 18 years or older, and had used at least one digital public service recently. The survey was provided in Spanish, and the participants were recruited through social media using a snowball sampling technique.

All constructs were latent variables, and thus they cannot be measured directly, as they represent abstract concepts without tangible or direct indicators (Moustaki, 1996). Therefore, a structural equation modeling (SEM) technique was used since it can assess relationships between latent variables (Pavlou, 2003). Among SEM options, this study relied on the partial least squares (PLS) variance-based technique because of the exploratory nature of the present study (Hair et al., 2010). As noted by Chin (2010, p. 660), PLS-SEM enables researchers "to constrain the new constructs and measures to its immediate nomological neighborhood of constructs and avoid possible CB-SEM estimation bias that can be affected by minor modeling or item selection errors." Furthermore, the proposed model includes a second-order construct (SERV), which is more suitable for PLS-SEM (Lowry & Gaskin, 2014). SmartPLS 4.0 tool was used as an analysis tool (Ringle et al., 2015). Data collection was conducted in March and April 2025. A total of 119 valid responses were used for further analysis, as shown in Table 1. The proportion of male respondents (69.75%) was larger than that of female respondents (30.25%). Regarding age, the most significant percentage of participants was between 18 and 29 (43.70%). Concerning education level, 52.94% reported having an undergraduate degree and 43.70% held a graduate-level degree.

Table 1. Demographics

Variable	Option	Frequency	Percentage
Sex	Male	83	69.75%
	Female	36	30.25%
Age	18 to 29 years old	52	43.70%
	30 to 39 years old	24	20.17%
	40 to 49 years old	30	25.21%
	50 to 59 years old	10	8.40%
	60 years old or more	3	2.52%

Variable	Option	Frequency	Percentage
Education level	High school level	3	2.52%
	Technical level	1	0.84%
	Undergraduate level	63	52.94%
	Graduate level	52	43.70%

For PLS, considering a maximum of one independent variable per dependent variable in the research model, prior literature recommends that it would be necessary to have a minimum of 33 observations to detect an R^2 value of at least 0.25 to achieve a statistical power of 0.8 at a significance level of 0.05 (Hair et al., 2010). Therefore, our sample size of 119 met the requirement. However, 119 is still not sufficient for the application of CB-SEM, which further supports the decision of using PLS in this study. The limitations associated with the sample size will be discussed in the Limitations and Future research subsection.

Results

First, to evaluate multicollinearity among the constructs, this study employed the variance inflation factor (VIF). All VIF values were found to be below the commonly accepted threshold of 5, indicating the absence of multicollinearity issues (Hair et al., 2011). Second, to assess the presence of common method bias (CMB), Harman's single-factor test was applied. An exploratory factor analysis was conducted using SPSS, incorporating all measurement items. The analysis revealed that the first unrotated factor accounted for 46.31% of the total variance, which is below the 50% threshold suggested by Podsakoff and Organ (1986).

Validation of First-Order Variables

This process included assessments of construct reliability and convergent validity. Considering that all first-order variables are reflective, reliability was evaluated through internal consistency measures. Specifically, Cronbach's Alpha and Composite Reliability were calculated for each variable. As shown in Table 2, both indicators exceeded the recommended minimum threshold of 0.70 (Nunnally, 1978), confirming adequate reliability. Convergent validity was assessed through two criteria. First, as displayed in the Appendix, all item loadings on their respective latent constructs exceeded the threshold of 0.70, recommended by Barclay et al. (1995). Second, Table 2 shows that the average variance extracted (AVE) for each variable exceeded the minimum acceptable value of 0.50, as suggested by Hu et al. (2004).

Table 2. Construct reliability and validity

Latent Variable	Cronbach's Alpha	Composite Reliability	AVE
Accessibility (AC)	0.939	0.961	0.892
Self-Service (SS)	0.954	0.970	0.915
Digitalization (DI)	0.937	0.948	0.694
Intention of use (INT)	0.936	0.969	0.940
Personalization (PERS)	0.949	0.967	0.907
Satisfaction (SAT)	0.945	0.964	0.901
Security (SE)	0.950	0.968	0.910
Transparency (TR)	0.914	0.939	0.795

Regarding discriminant validity, heterotrait-monotrait ratio (HTMT) values were used. According to Hultén (2007), HTMT values below 0.85 indicate adequate discriminant validity for conceptually distinct

constructs, while a more lenient threshold of 0.90 is acceptable for theoretically related constructs. As shown in Table 3, all HTMT values fall below 0.85, confirming an adequate discriminant validity.

Table 3. Heterotrait-monotrait ratio (HTMT) Matrix

Variables	AC	SS	DI	INT	PERS	SAT	SE	TR
AC								
SS	0.647							
DI	0.731	0.627						
INT	0.626	0.586	0.620					
PERS	0.274	0.146	0.341	0.360				
SAT	0.623	0.625	0.668	0.831	0.569			
SE	0.598	0.531	0.643	0.575	0.485	0.666		
TR	0.405	0.315	0.363	0.422	0.667	0.613	0.457	

Validation of the Second-Order Variable

The second-order construct "improved services" (SERV) has been conceptualized as a superordinate (reflective) variable and was modeled using the repeated-indicator approach. This configuration corresponds to a reflective–reflective hierarchical component model (HCM), in which all associated indicators are also reflective in line with Mode A, as recommended by Becker et al. (2012). Based on this conceptualization, the reliability and convergent validity of "improved services" were assessed.

The validation of this variable followed the guidelines established in Bravo & Libaque-Saenz (2022). First, the path coefficients linking the second-order construct to its first-order dimensions act as loadings. They must be statistically significant with a magnitude of at least 0.70, as Barclay et al. (1995) recommended. Second, based on these loadings, the value for composite reliability was computed to evaluate internal consistency. Nunnally (1978) states composite reliability should exceed the 0.70 threshold. Third, the AVE for the second-order variable was calculated using the same loadings, with a minimum acceptable value of 0.50, as Hu et al. (2004) suggested. As shown in Table 4, "improved services" met all these criteria, confirming its reliability and convergent validity.

Table 4. Second-order construct reliability and validity

Relationship	Path (Loadings)	CR / AVE
SERV -> AC	0.802	CR = 0.853 AVE = 0.540
SERV -> SS	0.733	
SERV -> PERS	0.618	
SERV -> SE	0.819	
SERV -> TR	0.683	

Structural Model

The proposed conceptual model was empirically validated, revealing statistically significant relationships between the constructs (see Figure 1). Digitalization (DI) had a positive and significant effect on Improved Services (SERV) (H1: $\beta = 0.730$, $p < 0.05$), which in turn significantly influenced User Satisfaction (SAT) (H2: $\beta = 0.804$, $p < 0.05$). Additionally, Satisfaction had a positive and significant impact on user Intention to Use (INT) digital services (H3: $\beta = 0.783$, $p < 0.05$). The R^2 values for the endogenous constructs were satisfactory: 53.2% for SERV, 64.7% for SAT, and 61.3% for INT, indicating a good explanatory power.

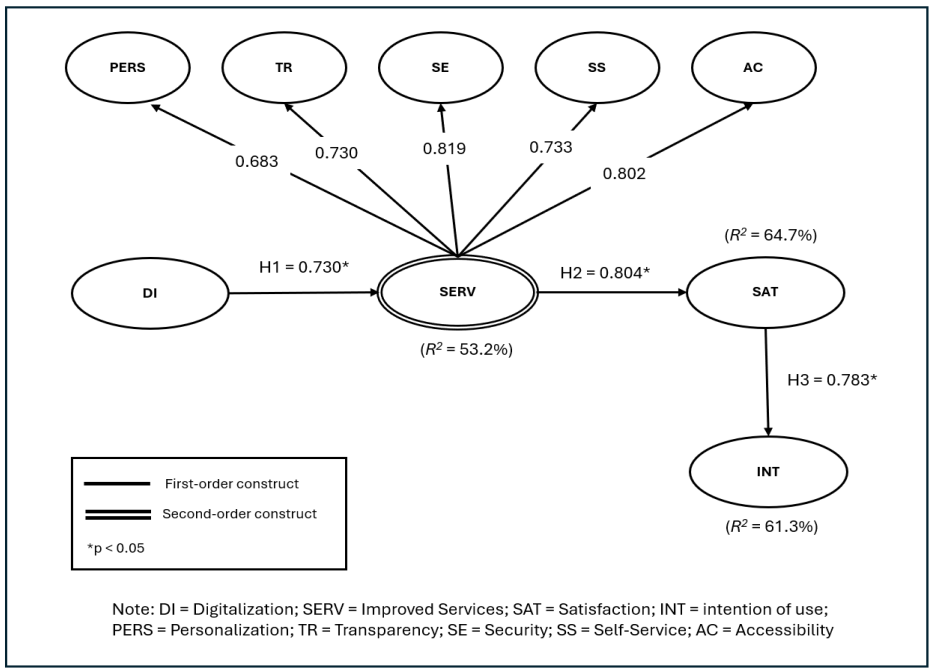

Figure 1: Structural Equation Model Assessment

Discussion

This study developed a preliminary model that includes the use of technology in Peruvian public services. The results found preliminary empirical evidence of the impact of digitalization on digital public services in the Peruvian context. Regarding the hypotheses proposed in this study, the results confirmed that digitalization has a significant and positive effect on the perception of improved services, positively influencing user satisfaction and intention to continue to use digital public services. The study also validated the hypothesis that the construct named improved services can be conceptualized as a second-order variable with the following dimensions: transparency, personalization, security, accessibility, and self-service.

These results highlight that citizens value the functionality and usability of digital government platforms, and a combination of technical features and user experience shapes their overall satisfaction. In addition, when users perceive that digital services are accessible and reliable, their intention to use these platforms increases, confirming the relevance of digital transformation initiatives in public administration. These findings also suggest that improved services play a central mediating role, translating technical advancements into positive user experiences and behavioral outcomes.

Theoretical Implications

The literature review section identified two gaps: 1) citizens' perspective of the impact of digitalization on digital service quality has not been covered, and 2) a lack of studies on the effect of digitalization and improved services on citizen satisfaction, especially in developing countries. Hence, this study confirms the positive impact of citizens' perception of the digital system attributes on their assessment of the public services, impacting their satisfaction and intention to continue using digital public services. In addition, this study contributes to the literature on information systems and e-government by offering a multidimensional conceptualization of improved services as a second-order reflective construct, composed of five key dimensions: personalization, transparency, security, self-service, and accessibility. This approach contrasts

with traditional models that often treat service quality in digital environments as a unidimensional variable (Nookhao & Kiattisin, 2023; Drwish et al., 2023).

Accordingly, discussing how the subdimensions collectively define improved services provides theoretical clarity regarding the internal structure of service quality. As MacKenzie et al. (2011) emphasized, a clear conceptualization of higher-order constructs requires a well-grounded definition of the dimensions and a specification of how those dimensions form the overall construct. Similarly, this study contributes by empirically validating improved services through a reflective-reflective hierarchical model, using the repeated-indicator approach recommended by Becker et al. (2012). Finally, this study provides knowledge about this phenomenon in developing countries, where institutional digital maturity and citizens' access to digital public services differ from those in developed nations. By empirically analyzing how digitalization and improved service delivery influence citizen satisfaction and continuance intention, the study extends the applicability of the SOR model in countries like Peru.

Practical Implications

To develop effective digitalization strategies, decision-makers require a validated set of service quality dimensions and a clear understanding of how these dimensions relate to each other and influence broader outcomes such as user satisfaction and continued use intention. Improved services are a reflective construct comprising security, accessibility, personalization, transparency, and self-service. Since these dimensions are reflective manifestations of improved services, their causal effects are shaped by the broader perception of service improvement. Hence, governments can implement initiatives that improve any of these five dimensions, leading to cumulative enhancements in perceived service quality. For example, efforts to increase platform reliability and data protection (security), intuitive interfaces to carry out transactions (self-service), or designing web-responsive interfaces (accessibility) may contribute to a more favorable perception of service improvements.

On the other hand, the findings indicate that improved services act as a key mediator between digitalization efforts and user satisfaction. Therefore, institutions should align their investments toward those aspects of digital transformation that may improve how citizens experience services. By doing so, they can indirectly but effectively boost satisfaction levels and increase the intention to reuse these services, which is critical for digital government sustainability. Additionally, public institutions can leverage the validated dimensions of improved services to segment users according to the dimensions they value most. For instance, security-conscious users may respond better to visible authentication mechanisms and privacy disclosures, while others may prioritize fast access and intuitive navigation. These insights can guide user-centered design policies and tailored communication strategies to improve adoption rates.

Finally, this framework enables policymakers and digital service managers to continuously adopt data-driven strategies to enhance digital public services. Public institutions can identify specific pain points by collecting and analyzing user feedback across the various dimensions of improved services such as personalization, accessibility, transparency, security, and self-service capabilities. Over time, this feedback makes it possible to detect usage patterns and evolving user expectations. These insights can inform the iterative design of services, ensuring that improvements are reactive, proactive, and aligned with citizens' needs.

Limitations and Future Research

The present study has limitations. First, the sample size was only 119 valid responses. Although this size is acceptable for PLS-SEM analysis, it would be desirable for future research to use larger samples to enhance

the statistical power and robustness of the findings. Second, there were demographic disparities within the sample, particularly a gender imbalance favoring male respondents, and an overrepresentation of participants with university-level education. Third, this research offers empirical insights into how digitalization and improved service influence citizen satisfaction and usage intention of digital public services within Peru. Future studies could extend the current model by incorporating additional dimensions of digital transformation, as well as second-order variables related to improved services such as convenience and privacy, and include variables such as trust in e-government.

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Appendix: Measurement Items

Digitalization	
DI1 (λ = 0.848)	The website of the public institution offers useful instructions.
DI2 (λ = 0.876)	The website of the public institution is easy to use.
DI3 (λ = 0.838)	Navigation on the website of the public institution is simple.
DI4 (λ = 0.803)	The website of the public institution allows you to access information quickly.
DI5 (λ = 0.791)	I can use the public institution's website anytime within the established period.
DI6 (λ = 0.845)	The steps to complete a task on the public institution's website follow a logical sequence.
DI7 (λ = 0.839)	Performing an operation on the public institution's website leads to a predictable outcome.
DI8 (λ = 0.824)	I consider the operation of the public institution's website reliable.
Self-service	
SS1 (λ = 0.948)	This digital service allows me to conduct my procedure without interacting with people.
SS2 (λ = 0.963)	I do not need to interact with public employees to complete my procedure.
SS3 (λ = 0.958)	I can conduct my procedure completely on my own when using this digital service.
Accessibility	
AC1 (λ = 0.962)	This digital service is very accessible to me.
AC2 (λ = 0.943)	This service is easy to access.
AC3 (λ = 0.928)	I have immediate access to this service.
Security	
SE1 (λ = 0.945)	Using this digital service to conduct online procedures is safe.
SE2 (λ = 0.968)	I consider it safe to conduct my procedures online using this digital service.
SE3 (λ = 0.948)	This digital service is a reliable option for carrying out my procedures online.
Personalization	
PERS1 (λ = 0.935)	I can fully customize the notifications when I use this digital service.
PERS2 (λ = 0.965)	I can completely customize the presentation of the information when I use this digital service.
PERS3 (λ = 0.957)	This digital service allows me to completely customize the information I will see.
Transparency	
TR1 (λ = 0.855)	The operational processes of this digital service are transparent.
TR2 (λ = 0.914)	The government provides me with detailed access to how this digital service works.
TR3 (λ = 0.930)	The government provides me with detailed knowledge about this digital service’s operations.
TR4 (λ = 0.865)	I have opportunities to provide feedback on this digital service.
Satisfaction	
SAT1 (λ = 0.949)	Overall, I am satisfied with using the public institution's website.
SAT2 (λ = 0.946)	I think using the public institution's website was a good decision.
SAT3 (λ = 0.952)	My experience with the public institution's website was satisfactory.
Intention of Use	
INT1 (λ = 0.969)	I intend to continue using this public institution's website.
INT2 (λ = 0.970)	My intention is to continue using this public institution's website.