

Exploring access and usage patterns of e-government services in a SIDS: Focus on Maldives

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Abstract: The expansion of digital governance has transformed public service delivery, offering opportunities to reduce inefficiencies, promote transparency, and enhance inclusivity. In the Maldives, a Small Island Developing State (SIDS) with dispersed geography and centralized governance, notable progress has been made in advancing e-government services over the past decade. Yet, persistent digital divides remain. This study examines access and usage patterns through administrative data and survey responses, employing the Technology Acceptance Model (TAM) to identify barriers such as information scarcity, configuration difficulties, technical glitches, and unreliable internet. No consistent demographic predictors of use emerge, though motivations cluster around accessing documents and applications. While services are often deemed easy to use, low trust and limited frequency of engagement signal gaps in regulation and outreach. The study underscores the need for user-centred design, coherent policies, and improved communication, highlighting tensions between service provision and citizen engagement in high-EGDI but low-EPI contexts.

Keywords: citizen engagement, digital governance, e-government, Maldives, public administration, Small Island Developing States

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Introduction

As digital technologies evolve and integrate deeper into governance systems, e-government services have emerged as essential tools for improving public administration, promoting development goals, and strengthening citizen-state relations. In line with the Sustainable Development Goals (SDGs), particularly Goal 16 (promoting inclusive and accountable institutions) and Goal 9 (industry, innovation, and infrastructure), governments are leveraging Information and Communication Technologies (ICTs) to provide responsive and accessible services.

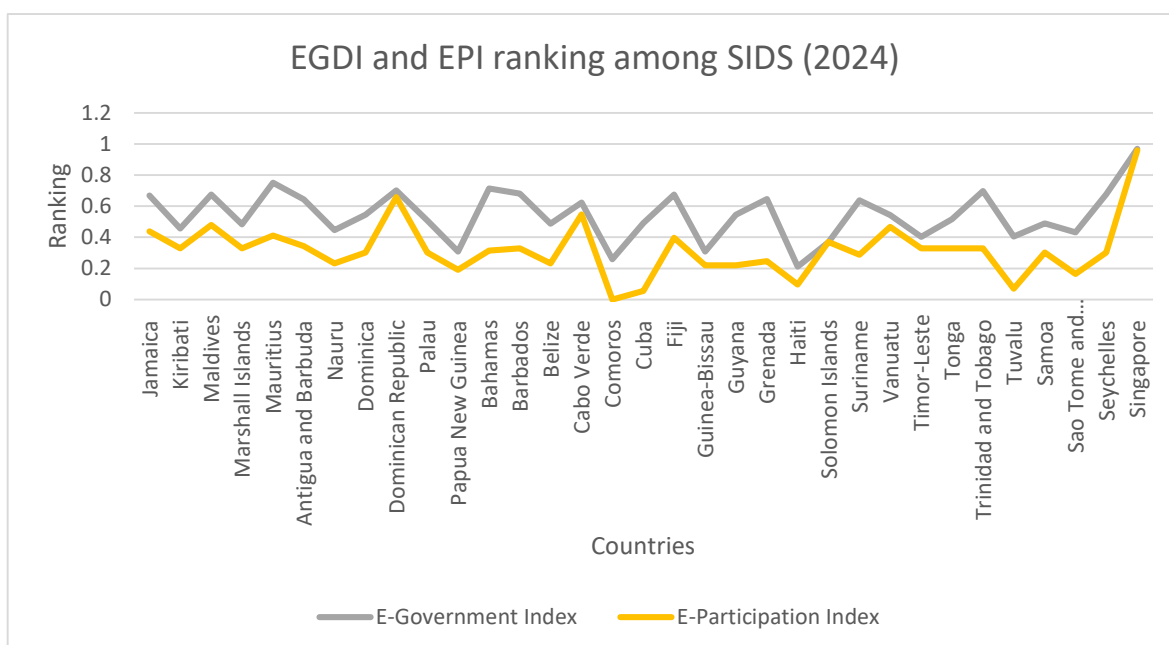
E-government is broadly defined as the use of ICT, particularly the internet, to deliver government services efficiently and effectively to citizens, businesses, and other government entities (OECD, 2003; United Nations, 2024). The World Bank emphasizes the importance of citizen-centred public service design, which involves integrating citizens' needs and concerns at each stage of service development and delivery (World Bank, 2022a). Across global and regional contexts, e-government has been linked with improved transparency, reduced corruption, streamlined bureaucracy, and more equitable access to services.

Despite widespread investment in digital governance infrastructure, implementation and uptake remain uneven. Globally, over 400 digital public service initiatives have been documented (IMF, 2017), but many fail to reach or resonate with intended beneficiaries due to

infrastructural, institutional, and social barriers. Small Island Developing States (SIDS), including the Maldives, face unique challenges in this domain, such as limited economies of scale, geographic fragmentation, and centralized service delivery models that may inadvertently marginalize remote populations.

The Maldives is situated in South Asia with a population of some 500,000 spread across 186 inhabited islands spanning over 90,000 km². The country operates under a unitary presidential system, with executive authority centralized in the Office of the President. The administrative framework includes 20 atolls subdivided into over 180 inhabited islands, each governed by an elected Island Council, under the broader oversight of Atoll Councils. Since the enactment of the Decentralisation Act (2010), local councils have been entrusted with service delivery responsibilities and community development, though fiscal and functional autonomy remains constrained (UNDP, 2021). Despite rather high levels of mobile and broadband penetration – 744,814 mobile subscriptions and 369,000 broadband connections reported in 2023 (CAM, 2024) – the country’s position in global e-government benchmarks remains mixed. This E-Government Development Index (EGDI)– E-Participation Index (EPI) mismatch highlights the Maldives’ structural challenges: strong infrastructure but limited civic uptake. EGDI (E-Government Development Index) incorporates access features, such as infrastructure and educational levels, to reflect how a country is using ICTs to promote civic access and inclusion; while EPI (E-Participation Index) assesses the availability of relevant services and information on government websites that promote citizen engagement in designing policies. In the 2024 UN rankings, the Maldives stands 94th of 193 in EGDI and 92nd in EPI. It is one of only three SIDS in Asia with a high EGDI; but its EPI lags behind. According to the latest UN dataset, the Maldives’ EGDI of 0.6745 is well above the SIDS average of 0.5442, showing strong progress in service delivery and digital infrastructure. However, its EPI is 0.4795, slightly higher than the SIDS average of 0.3205 (UN, 2024) as shown in [Figure 1](#).

Figure 1: EDGI and EPI ranking among SIDS (2024).



Source: UN E-Government Knowledge Base (2024).

This imbalance indicates a distinctive trajectory: while digital services are accessible, mechanisms for citizen engagement in policymaking remain less developed. In contrast, peers such as the Dominican Republic combine high EGDI with high EPI, showing how high service readiness does not automatically translate into deeper e-participation within SIDS contexts.

This gap raises critical questions: Why does high digital infrastructure not translate into active participation? What structural or perceptual barriers hinder the uptake of e-government services in the Maldives? These questions are especially pertinent given the increasing push for digitalization in public service delivery, as noted by World Bank officials who highlight digital technologies as key to promoting decentralization, diversification, and decarbonization in the Maldivian economy (World Bank, 2022b).

Literature review

Theoretical and conceptual foundations

E-government has become a cornerstone of public sector reform globally, with governments seeking to enhance service efficiency, accountability, and citizen satisfaction through digital platforms. The academic literature in this field is diverse. However, a notable gap persists in the literature focusing on SIDS. Unique structural and contextual factors in these states shape digital governance trajectories in ways that diverge from the experiences of larger nations. While some global studies offer generalizable insights, they often fall short in capturing the institutional capacity limitations, geographic dispersion, and distinctive citizen-state relationships prevalent in SIDS.

The Technology Acceptance Model (TAM), introduced by Davis (1989), is a widely cited framework in digital technology studies. It posits that two variables; perceived ease of use and perceived usefulness which influence users' attitudes toward and intentions to adopt technology. Subsequent adaptations of the model have included additional dimensions such as trust, subjective norms, and facilitating conditions (Venkatesh & Davis, 2000; Venkatesh & Bala, 2008). While extensively validated, TAM has faced criticism for its limited sensitivity to cultural, institutional, and political dimensions. Its individualistic orientation often neglects sociopolitical structures and institutional path dependencies, particularly in developing and small-state contexts (Krishnan et al., 2021). In SIDS contexts, this limitation is particularly acute. Institutional weaknesses, fragmented governance, and persistent trust deficits mean that citizens' perceptions of digital systems cannot be divorced from broader state–society relations. As recent SIDS studies show, even technically functional platforms may fail to achieve adoption if citizens doubt government credibility or fear weak data protections. These critiques have spurred the development of expanded models such as the Unified Theory of Acceptance and Use of Technology (UTAUT) and the DeLone and McLean Information Systems Success Model. These models introduce constructs like social influence, facilitating conditions, and system quality to better explain user behaviour in complex and dynamic environments.

In developing contexts, e-government adoption is increasingly viewed through the lens of trust, institutional credibility, and perceived risk. Bélanger and Carter (2008) argue that adoption is not solely a function of usability but is significantly influenced by the trustworthiness of governmental institutions and their digital platforms. Similarly, Carter and Weerakkody (2008) emphasize that citizens' prior experiences with public institutions shape adoption behaviour, particularly in contexts with historically low trust in government. Bertot et al. (2010) also assert that transparency, accountability, and institutional trust are not merely outcomes of e-government systems but are prerequisites for their success. As a result, several scholars have advocated for modifications to TAM frameworks that incorporate elements such

as trust, transparency, and contextual variables. Governance quality measures such as Freedom House scores and World Governance Indicators (WGI) reinforce this dynamic. In many SIDS, including the Maldives, relatively modest ratings on accountability and rule of law correlate with citizen hesitancy to adopt e-government systems despite their availability.

Demographic factors such as age, gender, and education often yield inconclusive findings in adoption studies. Instead, systemic and institutional variables, platform reliability, grievance redress mechanisms, and responsiveness are more predictive of engagement. Dunleavy et al. (2006) and Krishnan et al. (2021) argue that technical systems must be embedded within ecosystems of trust, user support, and regulatory oversight. Cultural norms also shape digital behaviours; in societies accustomed to face-to-face problem solving, digital platforms may be viewed as impersonal or less effective.

Institutional models and governance perspectives

Public administration literature has contributed typologies of e-government services, generally categorized into Government to Citizen (G2C), Government to Business (G2B), Government to Government (G2G), and Government to Employee (G2E). G2C models directly affect the public, encompassing services such as identity verification, licenses, financial assistance, and complaint resolution. G2B covers business registrations, tax compliance, and permits. G2G relates to interagency communication and data sharing, while G2E includes recruitment, payroll, and human resource development. The Maldives has made progress across these categories, especially via platforms such as eFaas (G2C), BandeyriPay (G2B), and ministry-level systems (G2G). However, citizen engagement and uptake within these domains remain underexplored in the literature.

The design reality gap framework developed by Heeks (2002, 2008) offers particularly relevant insights for developing countries. It underscores the often significant misalignment between the design of e-government systems and the operational realities faced by institutions and citizens. Many implementation failures, Heeks argues, result not from flawed technology but from inadequate alignment with local capacity, resources, and user needs. This framework has gained traction in analyses of digital platforms in environments characterized by infrastructural constraints and fragmented service delivery.

Regional lessons and implications for SIDS

SIDS-focused research has identified patterns that align with Heeks' design reality gap. Chand and Duncan (2017) found that, in Pacific Island nations, digital services often replicate existing power asymmetries by privileging urban users and marginalizing rural or outer island populations. Karanasios et al. (2015) highlight logistical and institutional issues that constrain equitable service delivery across island geographies. Mobile-first strategies in countries like Fiji and Samoa show potential for broadening digital reach. Yet, such challenges as limited network infrastructure, digital literacy gaps, and trust deficits persist (UNESCAP, 2020).

In the South Asian context, India's e-district programs (Bhatnagar, 2014) and Sri Lanka's Lanka Gate and eCitizen initiatives (Asian Development Bank, 2022) illustrate the disconnect between backend digitization and citizen-facing improvements. Key barriers include fragmented service interfaces, the absence of user feedback mechanisms, and bureaucratic inertia. By contrast, Bhutan's model prioritizes citizen outreach and centralized dashboards, although constrained by limited technical capacity in remote areas. The cases of Fiji and Samoa further illustrate the importance of embedding community-level partnerships into digital rollout strategies. In Samoa, collaborations with village councils and local ICT champions helped mitigate trust barriers and address digital literacy challenges. Nonetheless, these successes are tempered by persistent technical instability and poor back-end system integration.

The COVID-19 pandemic also acted as a significant accelerator of digital service provision in SIDS. In the Maldives, as in other small island states, the pandemic highlighted the urgency of contactless, remote, and digital-first governance solutions. This period witnessed a rapid shift to online platforms for essential public services, including health and education. However, while it revealed the potential of e-government, it also exposed gaps in digital preparedness, platform integration, and user support systems. Within the Maldives, recent research by Ameen and Rahman (2019) and Waheeda and Shareef (2021) has examined digital platform development, institutional reform, and e-government strategies. Yet, these studies primarily focus on implementation and infrastructure, paying limited attention to user behavior or everyday experiences.

While global studies offer valuable insights, limited empirical attention has been paid to SIDS that paradoxically score high on infrastructure indices like the EGDI but lag on participation-oriented metrics like the EPI. Research from Pacific and Caribbean SIDS suggests that while infrastructure is often donor-supported, platform stability and citizen trust lag due to fragmented governance and inadequate user outreach. These dynamics resonate with the Maldivian case, where despite notable infrastructure gains, citizen participation remains low.

Methodology

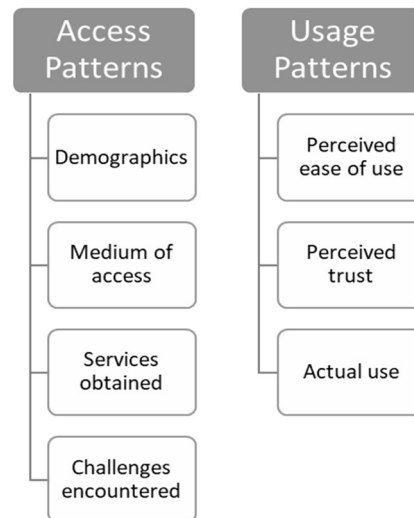
This study adopts a mixed-methods approach to examine the access and usage patterns of e-government services in the Maldives, with particular focus on the national e-government platform, e-Faas. The research integrates secondary data analysis, survey research, and a conceptual framework drawn from the Technology Acceptance Model (TAM), in order to provide a multidimensional understanding of how citizens interact with digital public services.

The primary aim of this study is to explore who uses e-government services, as well as how, why, and under what conditions such use is sustained or disrupted. Specifically, the study seeks to:

- (1) Examine the evolution and structure of e-government service provision in the Maldives.
- (2) Identify the primary channels and devices through which citizens access these services.
- (3) Assess the frequency and motivations of usage across different service categories.
- (4) Analyze the key barriers influencing both access and continued usage.

To achieve these aims, the study employs three key data sources: (1) secondary literature and reports from international organizations and national institutions; (2) administrative data obtained from the National Centre for Information Technology (NCIT), the main government agency responsible for overseeing digital service delivery; and (3) original survey data collected from users and non-users of e-Faas.

In this study, TAM is applied with particular emphasis on three constructs: perceived trust, perceived ease of use, and actual usage (Figure 2). These constructs are used not only to frame the survey design but also to structure the analysis of user responses and institutional data. Access patterns are observed through data capturing demographics, medium of access, services obtained and challenges encountered.

Figure 2: The Research Framework

Survey data were collected using a structured questionnaire developed through a Google Form, distributed digitally via email and social media platforms. The questionnaire consisted of 22 items and covered a wide range of topics. These included demographic details (age, gender, education, employment status, residence), digital access (devices used, self-rated digital skills), and behavioral variables linked to the use of e-government services. Key sections focused on the frequency of use, specific services accessed (such as applying for documents, submitting applications, or making payments), perceived ease of use, confidence, and trust. Respondents were also asked about motivational drivers (e.g., convenience, time-saving, lack of alternatives), challenges encountered during account setup and continued usage, and whether they had sought or provided help. Finally, questions explored satisfaction, preference for traditional methods, and willingness to continue using e-government platforms. While the digital distribution allowed for a wide geographic reach, it may have excluded individuals with limited internet connection or digital literacy, a limitation acknowledged and discussed further below. The survey sample comprised 70 respondents. Although the sample size is modest, it offers indicative insights into user experiences with the e-Faas platform, particularly given the paucity of publicly available data on e-government usage in the Maldives. Responses were analyzed using descriptive statistics, and a multiple regression analysis was conducted to assess whether demographic and digital skill variables significantly influenced e-Faas usage.

In addition to survey analysis, administrative data from NCIT were reviewed to triangulate user statistics and infrastructure trends. This included disaggregated figures on e-Faas usage by age group and geographic distribution, as well as platform enrolment over time. These data complemented the self-reported responses and provided broader context for assessing service uptake trends.

While this study does not claim to offer a nationally representative account of all users of e-government services in the Maldives, it provides a valuable exploratory foundation in an area where empirical data remain scarce. The use of digital survey distribution, while effective for reaching dispersed populations, may have inadvertently excluded individuals with limited connectivity or digital familiarity, which is an issue common in e-government research globally. Finally, while this study centers on user perspectives, future research would benefit from incorporating institutional viewpoints, such as those of system administrators and service designers, to generate a more holistic understanding of e-government implementation in SIDS.

Analysis and results

Evolution of e-government services in the Maldives

The Maldives has long been perceived as a latecomer in adopting modern information and communication technologies (ICTs). The introduction of the telephone began in 1955, and the first public exchange was established in 1968. Initially, government communications were dependent on fax machines. The first government computer, a Data General Eclipse Minicomputer System, was procured in 1983 by the Ministry of Planning and National Development for the national census (Shareef, Ojo, & Janowski, 2010). The telecommunications landscape transformed in 1988 with the launch of Dhiraagu, the first telecom service provider.

During the 1990s and early 2000s, there was a significant expansion of ICTs in the public sector. The establishment of the Maldives Centre for Management and Administration in 1991 marked the initiation of computer training for public sector employees. Dhiraagu launched internet services in the mid-1990s, and in 1998, the first Ministry of Communication, Science, and Technology was established. By 1997, telecom services had reached the outer islands, and universal telephone access was achieved by 1999 (ADB, 2010). In 1999, the Ministry prepared a government network project document, outlining the requirements for a common data network, which laid the groundwork for e-government service development.

From 2000 to 2010, a more structured approach to e-government development emerged. The Science & Technology Master Plan (2001) proposed the establishment of the National Centre for Information Technology (NCIT) and a national ICT framework. The ADB-supported Information Technology Development Project (ITDP) was initiated in 2001 and later transferred to NCIT in 2003. Work commenced on establishing the Government Network of Maldives (GNM) in 2005, connecting 110 organizations across 88 buildings in Malé by the following year. In 2007, efforts began to implement an integrated financial information system, followed by the piloting of the Government Intranet in 2009. The Government E-Letter Management System (GEMS) was introduced in 2010, leading to MVR 8.7 million (USD 564,000) in savings by 2011.

After 2010, ministries began publishing information online, and G2C communications were facilitated via email and web forms. Several service-specific portals were developed, such as the Tourism Info Management System, the Expat Worker Management System, and the eCouncil System. In 2012, the eFaas national authentication platform was launched to streamline digital interactions. That same year, a national computer network connected all atoll capitals, followed by full inhabited island connectivity in 2013.

In 2017, biometric passports and Hafthaa Res (a youth talent showcase platform) were introduced. The Magey Hiyaavahi portal, launched in 2019, supported social housing. During the COVID-19 pandemic (2020–2022), digitalisation was accelerated to maintain service continuity. New portals such as My Edu (scholarships), Gedhoruveriya (housing), ebusiness (business registration), Gemen (local councils), Bandeyri Pay (government payments), and SIMS (transport) were launched to facilitate services during lockdowns and periods of restricted mobility.

Post-pandemic, digital resilience efforts included reduced internet costs in 2021 and the introduction of a new submarine cable in 2023. The Digital ID mobile app and GEMS Workspace also improved integration. By July 2023, over 130,000 users were registered on eFaas, which enabled access to 440 government services. NCIT reported 195,708 active users by end-2023. GEMS 2.0 expanded G2G communication to 162 agencies in Malé and 325 agencies across 183 islands and introduced G2B and G2C capabilities, including case tracking and digital signatures (MoCST, 2024).

Despite these advances, adoption remains uneven. This history shows a focus on technical rollout and system establishment. However, gaps in local-level outreach, digital confidence, and participatory feedback mechanisms indicate that services have not yet become fully embedded in citizens' day-to-day administrative routines. As such, the subsequent sections explore access and usage patterns in greater detail.

Access patterns

This section examines access through five key user engagement dimensions: demographic factors, device usage, services accessed, digital skills, and barriers during setup. Survey responses are triangulated with administrative data to present a multi-layered view of how users experience e-government in the Maldives.

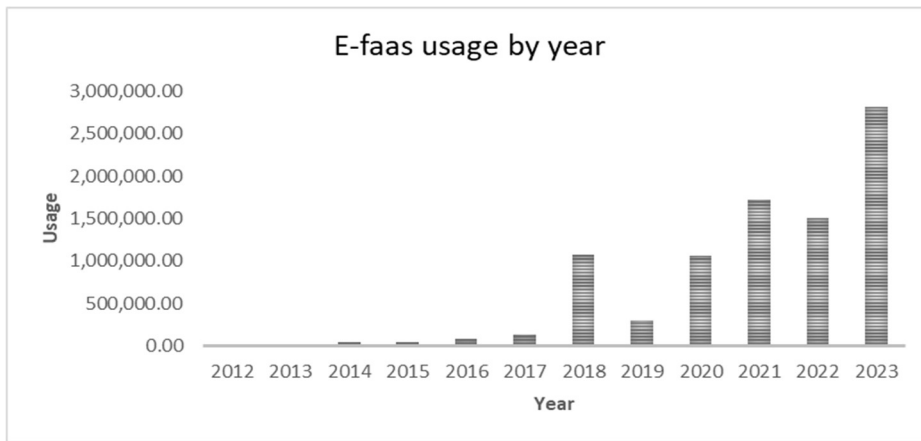
Of the total respondents, 91.4% reported using e-Faas, while 8.6% had not. In terms of gender, the sample was nearly evenly split, with 51.4% female and 48.6% male. Age-wise, the largest segment (48.6%) was in the 34–41 age group, followed by 22.9% aged 26–33, and 14.3% aged 42–49. Respondents aged 50 and above constituted 8.6%, and 18–25-year-olds made up 5.7%. Geographically, 74.3% resided in K. Atoll, with 5.7% of Maldivians residing abroad and 20% from outer islands, reflecting a mostly urban-centric distribution pattern with pockets of outer island inclusion.

These trends are consistent with national digital infrastructure rollouts that prioritize capital regions, though they highlight critical access equity issues in peripheral zones. Evidence from other SIDS such as Mauritius and Samoa shows similar urban–rural divides in e-government engagement (UN DESA, 2022). This suggests that the Maldivian case is not an exception, but a structural characteristic of geographically fragmented states.

According to the National Centre for Information Technology (NCIT), the number of e-Faas users reached 195,708 by the end of 2023. Annual usage trends ([Figure 3](#)) show consistent growth, reflecting platform expansion and gradual public uptake. NCIT demographic breakdowns also align with survey findings, indicating the highest usage among those aged 30–39 ([Figure 4](#)) and a concentration of users in K. Atoll ([Figure 5](#)).

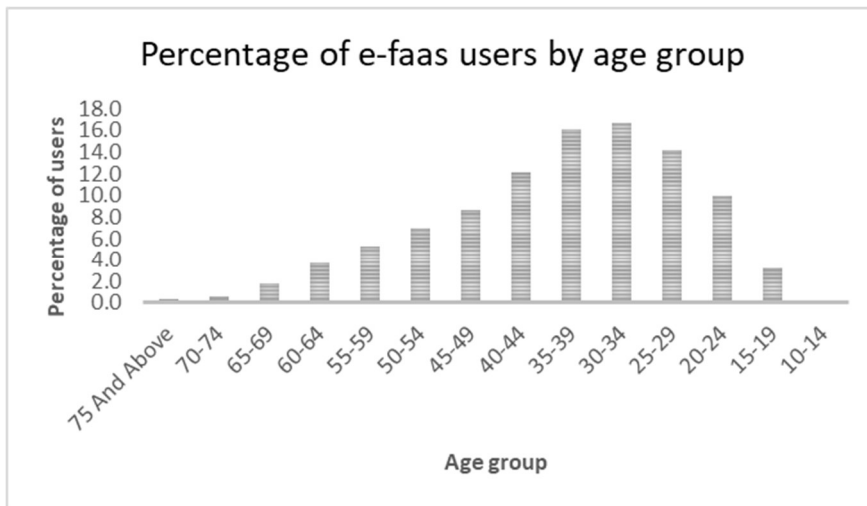
54.3% of respondents held tertiary qualifications, 20% post-secondary, 22.9% secondary, and 2.9% primary education. Occupation-wise, 42.9% worked in the public sector, 28.6% in the private sector, 20% were unemployed, 5.7% worked from home, and 2.9% were employed by state-owned companies. 54.3% rated themselves as excellent in digital skills, 20% very good, 20% good, and 5.7% fair; none rated themselves poorly. The high rate of self-reported digital proficiency suggests a population segment comfortable with technology, but possibly limited by platform-specific or contextual usability challenges.

Figure 3: E-faas users by year.



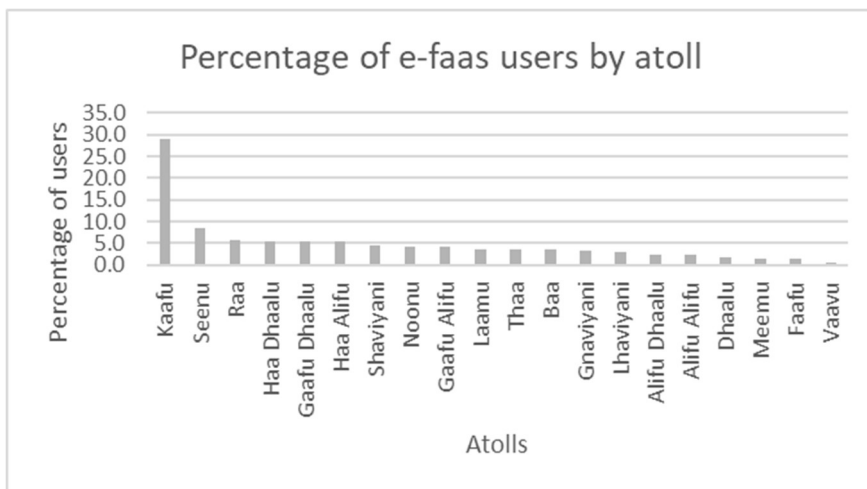
Source: NCIT (2023).

Figure 4: Percentage of E-faas users by age group



Source: NCIT (2023).

Figure 5: Percentage of E-faas users by atoll.



Source: NCIT (2023).

Table 1: Multiple Regression Analysis of demographics by access to e-faas.

Variable	β	SE	t	P-value
Gender				
Female	-0.007	0.245	-0.028	0.978
Male	0.007	0.229	0.030	0.976
Age Group				
18-25	-0.156	0.341	-0.456	0.657
26-33	-0.033	0.223	-0.147	0.885
34-41	0.010	0.183	0.056	0.956
42-49	0.013	0.217	0.062	0.951
50 and above	0.011	0.272	0.042	0.967
Current Residence				
Residence 1	0.002	0.395	0.005	0.996
Abroad	0.009	0.288	0.032	0.975
Residence 2	0.014	0.561	0.025	0.980
Residence 3 (K)	0.004	0.175	0.023	0.982
Residence 4	-0.003	0.383	-0.007	0.995
Highest Education				
Post-secondary	0.004	0.218	0.020	0.984
Primary	0.007	0.848	0.008	0.994
Secondary	0.009	0.183	0.047	0.963
Tertiary	0.183	0.273	0.672	0.514
Primary engagement				
Government employer	0.050	0.214	0.234	0.818
Government shared company	0.005	0.657	0.008	0.994
Private sector employee	0.013	0.483	0.028	0.978
Home-based worker	0.010	0.225	0.043	0.967
Unemployed	0.034	0.214	0.159	0.876
Digital skills				
Excellent	0.217	0.228	0.952	0.358
Fair	-0.228	0.523	-0.435	0.671
Good	0.158	0.424	0.372	0.715
Very good	0.042	0.377	0.112	0.912

Source: Survey results

Multiple regression analysis found no statistically significant correlation between demographic variables and e-Faas usage. This suggests that access disparities are not driven by individual characteristics, but rather by broader systemic or infrastructural barriers. Even digitally confident users experienced onboarding challenges: 42.9% cited a lack of information, 22.9% faced setup difficulties, and 20% reported unreliable internet. Device unavailability was an issue for 86%, while only 5.7% reported no difficulty. This finding reinforces the need for improved user guidance and system reliability rather than digital literacy interventions alone.

Device use mirrored mobile-first trends: 56.3% accessed e-Faas via smartphone, while 43.8% used computers. No tablet users were reported. It highlighted the need for mobile-optimized, low-bandwidth responsive design. The lack of tablet use may reflect market availability and redundancy given smartphone penetration. Urban users, particularly in Male', tend to own multiple devices, while outer-island users often rely solely on mobile phones, reflecting a rural–urban divide common across SIDS.

Usage frequency data further highlights platform marginality in daily life. Only 15.6% used e-Faas daily, 18.8% weekly, and 28.1% rarely. This irregular engagement is linked to the transactional nature of the services offered: 65.6% used it for submitting applications, 28.1% for document requests, and 6.3% for payments. Notably, feedback channels, progress tracking, or personalized dashboards were absent from usage narratives, reducing incentives for routine engagement. By contrast, e-government platforms in countries like Estonia or Singapore embed status updates, timelines, and integrated service pathways, fostering habitual engagement.

Despite high self-reported digital competence, 43% reported setup-related issues, pointing to design limitations rather than user deficiencies. This gap reinforces the earlier-noted "design-reality" disconnect. The fact that users with excellent digital skills still faced onboarding difficulties signals potential flaws in interface logic, inadequate FAQs or guidance, and inconsistent backend processes.

Moreover, qualitative feedback indicated that users from outer atolls found the initial registration process confusing due to unclear Dhivehi-language instructions and the absence of local digital support officers. These structural constraints challenge the notion that digital access alone is sufficient to ensure uptake. Without active mediation, either through trained intermediaries or simplified design, access remains notional rather than practical.

Usage patterns

Usage was assessed across four dimensions: frequency of use, perceived ease of use, trust in the platform, and ongoing challenges. Among users, 37.50% accessed the platform monthly, 28.1% rarely, 18.8% weekly, and 15.6% daily. The low frequency of use indicates that e-Faas functions more as a periodic transaction point than a regular engagement tool. These patterns suggest that even among users, engagement remains situational, often triggered by specific service needs rather than proactive digital habits.

In terms of perceived ease, 43.8% found the platform easy to use, 37.5% very easy, and 18.8% were neutral. No respondents found it very difficult. However, trust levels were mixed: 25.7% fully trusted e-Faas, 40% remained neutral, 20% had low trust, 8.6% trusted it to a large extent, and 5.7% had no trust at all. These figures point to a trust deficit, possibly due to uncertainty over data protection, limited redress mechanisms, or inconsistent service quality. Participants also linked their trust levels to the lack of transparency in application processing timelines and perceived inefficiencies in customer support. Trust in continued use is further complicated by legal ambiguities. Although the Maldives has proposed cybersecurity and data protection bills, they remain unenacted, creating uncertainty over how personal data is stored

or shared. This lack of legal protection reinforces perceptions of risk and reduces users' willingness to rely on e-Faas for sensitive or high-stakes transactions.

Technical problems remain a major barrier to sustained use. Over one-third (37.5%) reported glitches, 28.1% cited poor internet, 18.8% lacked familiarity with digital governance, and 15.6% needed more technical support. Many users expressed frustration with unclear error messages or session expirations, which often led them to abandon tasks.

Institutional gaps compound these problems. Although NCIT plays a central role in e-Faas deployment, its support capacity is stretched. Services are fragmented across agencies, and users lack clear feedback or complaint pathways. Centralized governance limits atoll-level innovation and responsiveness, leaving remote users without reliable recourse in case of issues. For example, users in outer islands reported delays in verification or account activation due to a lack of local contact points or communication breakdowns between agencies. Another persistent gap is the absence of feedback loops. Users are currently unable to track the status of requests or submit complaints within the same interface. This design flaw weakens the participatory potential of e-Faas and contributes to perceptions of institutional opacity. By comparison, best-practice platforms often include status dashboards, chatbots, and embedded feedback forms that promote two-way communication. These usage findings affirm the partial relevance of models like the Technology Acceptance Model (TAM). While perceived ease encourages initial engagement, sustained usage hinges more on trust, reliability, and institutional responsiveness. The absence of demographic predictors in both access and use patterns suggests that structural and systemic enablers, rather than individual traits, are central to successful e-government adoption in SIDS.

Conclusion and Recommendations

This study examined the access and usage patterns of e-government services in the Maldives, using the e-Faas platform to analyze broader trends in digital public service delivery. Drawing on both survey responses and administrative data from the NCIT, and analyzed through the TAM framework, the findings provide important insights into the strengths and limitations of the country's e-government landscape.

Over the past two decades, the Maldives has made consistent investments in its digital infrastructure. Platforms such as GEMS for inter-agency communication and e-Faas for public-facing services reflect a deliberate national strategy to improve access, efficiency, and transparency in governance. These developments position the Maldives among the few SIDS with a relatively high EGDI score and a low EPI score, highlighting a significant gap between infrastructure provision and active, meaningful citizen engagement.

The findings show that access to e-Faas is concentrated in K Atoll, reflecting ongoing centralization. Most users interact with the platform infrequently, primarily for transactional purposes such as submitting applications or obtaining official documents. Smartphones are the dominant access device, highlighting the importance of mobile-first design. Perceived ease of use was relatively high, suggesting the interface is accessible to digitally literate users. However, trust in the platform was more variable, with many users expressing neutral or low levels of confidence in its reliability, responsiveness, and data protection.

Importantly, the study found no significant correlation between e-Faas usage and demographic factors such as age, gender, education, or employment status. This indicates that barriers to adoption are less about individual capacity and more about systemic issues. These include limited information about available services, challenges during initial setup, unreliable internet connectivity, technical problems, and a lack of ongoing user support.

To address these gaps, a shift in strategy is needed. The focus should move from digital infrastructure alone toward inclusive and user-centred digital governance. First, awareness and outreach efforts must be expanded. Many respondents cited a lack of information as a major obstacle. Targeted communication campaigns should be developed, particularly for outer atolls, using local councils, schools, media, and community spaces to promote understanding of available services. Second, mobile optimization must be prioritized. With smartphones as the primary device for access, all digital services should be designed with mobile compatibility in mind. In areas with connectivity challenges, lightweight interfaces and offline features could provide practical alternatives. Third, technical support must be strengthened. The creation of a centralized helpdesk, coupled with resources such as FAQs, video walkthroughs, and multilingual guidance, would help resolve frequent user difficulties and enhance confidence in the platform. Fourth, trust in e-government platforms must be reinforced. This includes improving system reliability and introducing or strengthening legislation on data privacy. Public communication about how data is protected will be key to improving user confidence and increasing regular engagement. Fifth, the scope of e-Faas services should be broadened. Currently, usage is largely limited to one-way transactions. Integrating features such as service status tracking, citizen feedback channels, and direct messaging with service providers can promote two-way engagement and encourage routine use. Finally, user-centred design processes should be embedded into future upgrades. Regular consultation with diverse user groups, especially those from outer islands, will ensure services meet actual needs. In addition, evaluation frameworks should extend beyond TAM to include factors such as institutional trust, social inclusion, and service quality, which are especially relevant in geographically dispersed contexts like the Maldives.

In conclusion, the Maldives has made substantial progress in establishing digital infrastructure. The next stage of e-government development must focus on accessibility, trust, and inclusivity. For platforms like e-Faas to achieve their intended impact, they must not only function technically but also resonate with users. National strategies should prioritize human-centred design and public confidence in digital services through the enactment of legal frameworks. In particular, enhanced data protection measures and a strengthened e-ID system will be critical steps forward. This will be essential for deepening digital participation and advancing accountable, responsive governance in the years ahead.

Acknowledgements

The author wishes to express sincere gratitude to the government institutions of the Maldives and to the individuals who contributed to this study. Special thanks are extended to Dato' Professor Raja Rasiah for his guidance and mentorship as the author's postdoctoral supervisor.

Disclaimer

The author declares that this article did not benefit from research funding.

The author also declares no conflict of interest in writing this article.

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