

Scoping study to support the Bangladesh Bank to scale digital transactions in Bangladesh

Consolidated microcosm study report

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Gates Foundation



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MSC undertook a scoping study with the Gates Foundation's support to generate evidence on payment behavior in rural Bangladesh.



01

The Bangladesh Bank seeks to transition to a predominantly cashless or cash-lite economy by 2031. This study intends to help the central bank develop a roadmap to this transition.



02

We examined the payments ecosystem and behavioral barriers within cashless payments. We also generated insights into opportunities and barriers to increase digital payments. This includes MFS, agent banking, and online payments facilitated by NPSB, BEFTN, and RTGS.



03

We adopted a unique study design and identified Singair *upazila* as a microcosm. We segmented the population into 12 distinct user segments (read occupation) based on their cash inflow. We engaged in extensive qualitative discussions with users and observations in the microcosm, with more than 8,512 person-hours.



04

We followed an effective method to regularly share insights with the supply-side players, such as bKash, Dutch Bangla Bank, Pubali Bank, Sonali Bank, Islami Bank, Bank Asia, Southeast Bank, and the Bangladesh Bank. As the scoping study continued, providers addressed operational challenges we had identified.



05

The project's outcome is to reveal behavioral insights, develop a strategic roadmap, and design scalable interventions. It strengthens collaboration to accelerate digital payment adoption and advance the vision of a cashless Bangladesh.

Digital payments in Bangladesh: The Bangladesh Bank's strategic infrastructure lays the foundation for a digitally inclusive economy.



Bangladesh modernized its payment system in the late 2000s from the erstwhile paper-based system. In 2008, the Bangladesh Bank established the Bangladesh Automated Clearing House (BACH). This included the Bangladesh Automated Cheque Processing System (BACPS), which was launched on 7th October 2010. The Bangladesh Electronic Fund Transfer Network (BEFTN) was also introduced on 28th February 2011. These systems enabled paperless transfers and dividend payments.



A unified platform became essential as transaction volumes increased. The National Payment Switch Bangladesh (NPSB) was soft-launched on 27th December 2012. It linked interbank ATM, point of sale (POS), and Internet Banking Fund Transfer systems for easier cross-institution transactions. The unified platform is crucial for a fast and inclusive financial system.



The Bangladesh Bank accelerated the adoption of mobile financial services (MFS) and expanded digital access through the country's mobile network. MSC enhanced digital transactions for unbanked and underbanked people.



In October 2015, the Bangladesh Bank launched the Real Time Gross Settlement (RTGS) system for high-value payments. The RTGS allows instant settlement of large transactions and enhances the country's digital infrastructure.



The Bangladesh Bank has strengthened its digital strategy with the introduction of personal retail accounts (PRA) and the Bangla QR system. PRA improves digital payment access for micro-merchants. Bangla QR provides a uniform, interoperable QR code standard across banks and merchants and makes mobile payments effortless. The Bangladesh Bank advised a pilot test of Bangla QR in the Singair *upazila* of Manikganj district. The bank chose Singair for its representation of all segments of the population, an even urban-rural split, and close proximity to Dhaka for monitoring.

*NPSB: National Payment Switch Bangladesh; BEFTN: Bangladesh Electronic Funds Transfer Network; BD-RTGS: Bangladesh Real Time Gross Settlement

In the research geography, the following infrastructure is fairly visible.



A network of bank branches, agent banking points, and MFS agent points

Bank branches, agent banking points, and MFS agent points are widely spread and available within the proximity of Singair's residents.

Singair has:

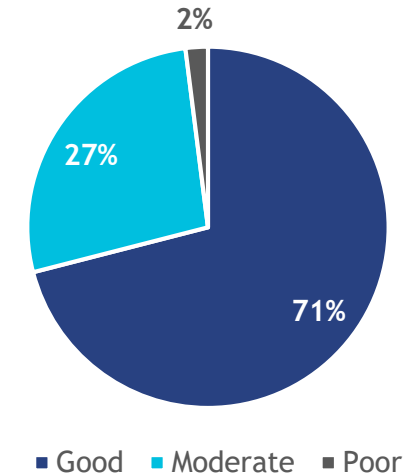
- 20 bank branches of 13 different banks, with 11 commercial banks and two specialized banks;
- 600 MFS agents, 1,400 DFS micro-merchants, and 11 banking agents with 89 outlets, the highest in Manikganj. Singair's present population is [328,104](#). Each agent serves around 4,900 people through agent banking services in Singair;
- More than 500 merchant points that have *Bangla* QR of different providers (non-exclusive - Bangla QR merchant points in Singair are not limited to just one provider).



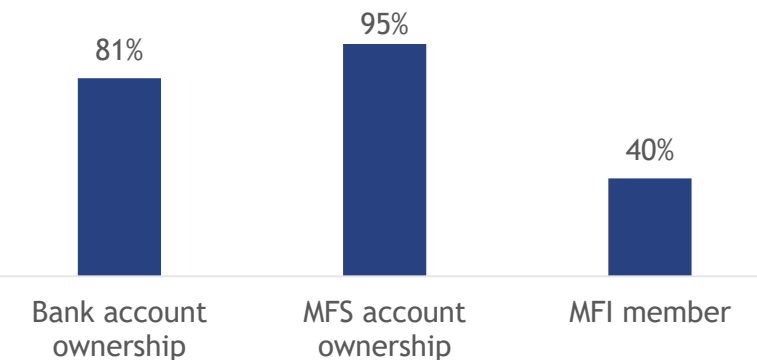
Ownership of bank account, MFS account, or MFI membership

- Almost all, or 95% of NID holders, have their own MFS account due to the seamless account opening procedure. bKash is the most prominent MFS in Singair.
- Some people use their family member's bank account to receive remittances.

Status of internet connectivity



Usage of formal financial channels



About the microcosm: Singair is an agri-dependent rural *upazila*, 32 km from Dhaka.



The *upazila* is primarily agricultural and rural.



People in Singair rely the cultivation of paddy, jute, and vegetables.



The wholesale markets in Singair and Joy Mantap support agricultural trade.



Remittance is the second-largest contributor to Singair's economy.



Singair has a blend of rural and peri-urban cultures due to its proximity to Dhaka and Savar.

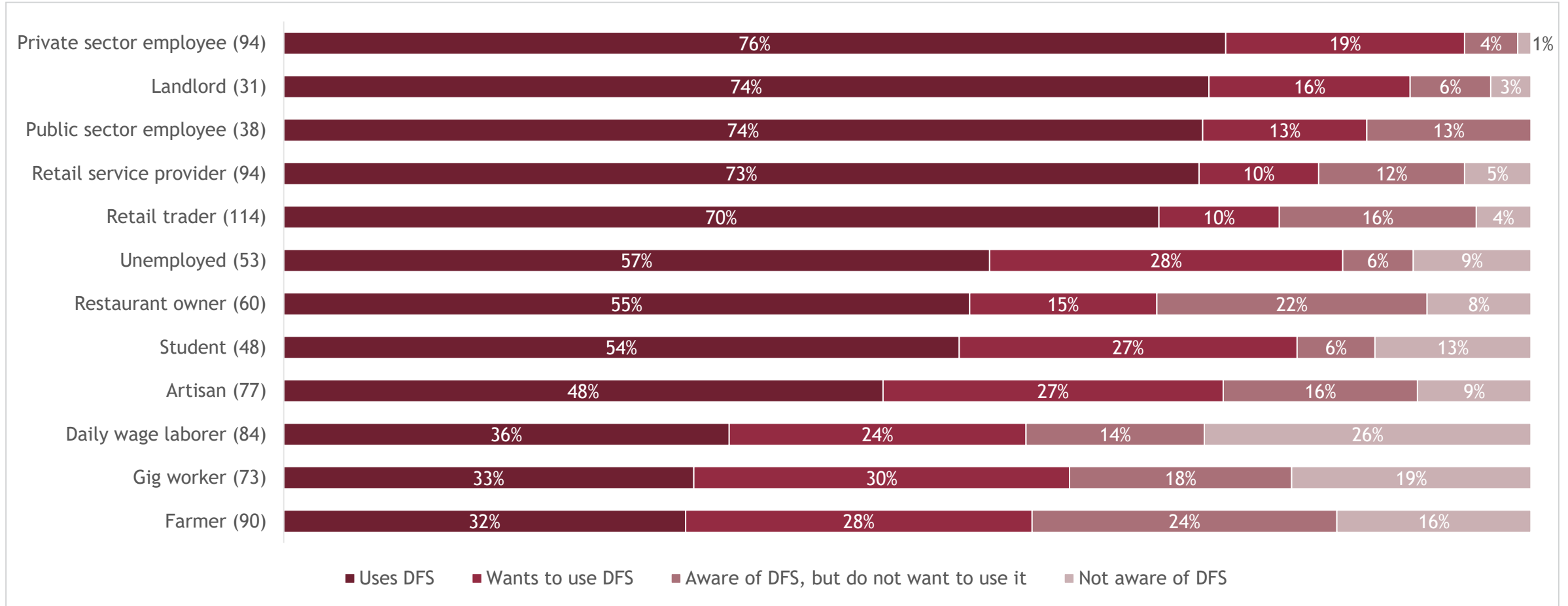


Retrieved from: singair.manikganj.gov.bd/

Upazila: An administrative unit in Bangladesh, meaning sub-district. Typically, a district has five to nine upazilas. Singair is a sub-district of Manikganj district.

In Singair, 56% of people use DFS, 20% want to use DFS, while 14% do not, and 10% are not even aware of it.

A higher proportion of farmers, gig workers, the unemployed, artisans, and students want to use DFS. We examine the reasons in slides 7 to 11.

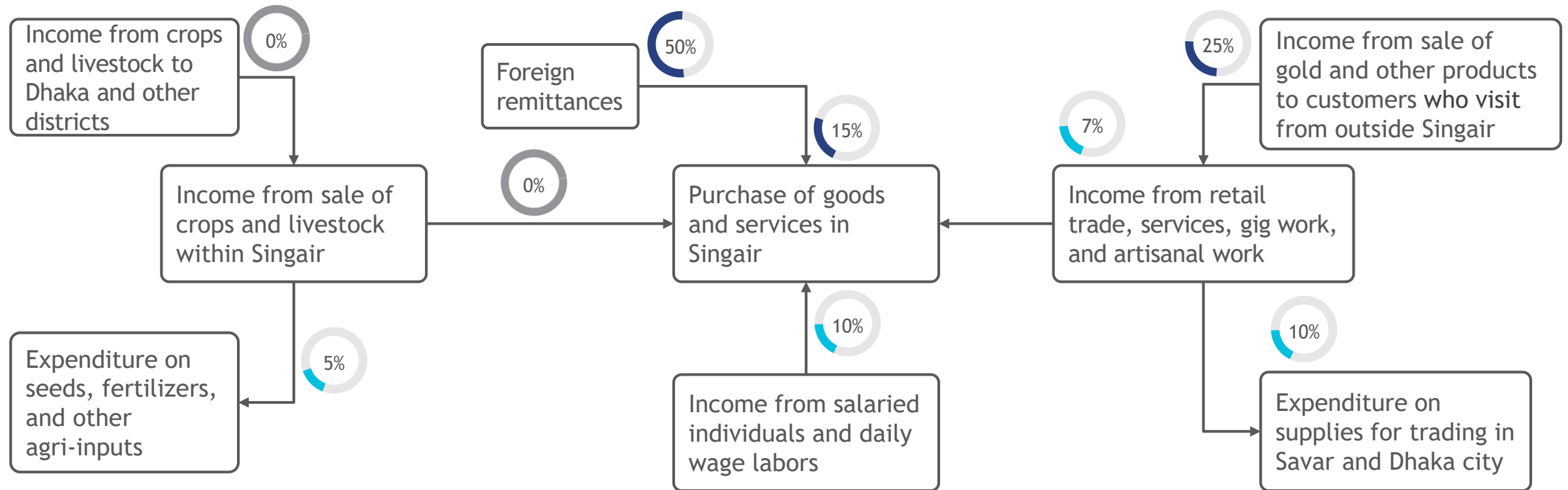


n = 856 (the segments are sorted from highest to lowest percentage of respondents who use DFS)

*Those who transact digitally, regardless of device ownership.

However, the value for DFS payments is as low as 10% of the overall value of transactions.

Remittance payments, immigrants' spends, and supplier payments outside Singair have a higher incidence of DFS payments than agriculture, retail, and salary receipts.



The percentage in the denotes the proportion of agent-assisted or self-accessed DFS transactions.

Agent-assisted includes cash-in and cash-out at MFS agent, through utility bill payments or mobile top-up at MFS or agent banking agent, and money transfer through agents.

Self accessed DFS Includes MFS transfers and payments, card-based payments, QR-payments, and internet banking from own device.

Salaried employees, retail traders, landlords, and service providers use DFS the most. Farmers, artisans, and daily wage laborers fall behind.

We analyzed Singair's payment landscape and categorized the local population into 12 segments based on their main income activities.

| | |
|--------------------------------|--|
| Artisan | Craft handmade goods *(USD 161 / BDT 19,328; 2.7% received and 7.4% spent digitally) |
| Daily-wage laborer | Receive a daily amount for labor (USD 150 / BDT 17,955; 4.6% received and 5.5% spent digitally) |
| Farmer | Sell crops or livestock to markets (USD 279 / BDT 33,433; 5.7% received and 4.1% spent digitally) |
| Gig worker | Trade goods or provide services from a temporary workplace (USD 300 / BDT 35,977; 4.5% received and 11.3% spent digitally) |
| Landlord | Own land or buildings and rent it (USD 462 / BDT 55,435; 7.4% received and 14% spent digitally) |
| Private sector employee | Work at private organizations (USD 202 / BDT 24,256; 35% received and 17% spent digitally) |

| | |
|-------------------------------|---|
| Public sector employee | Employed by government-owned or controlled organizations (USD 251 / BDT 30,167; 40% received and 12% spent digitally) |
| Restaurant owner | Own a food service store (USD 411 / BDT 49,323; 3.8% received and 4.4% spent digitally) |
| Retail service | Provide services directly to consumers (USD 318 / BDT 38,198; 13.6% received and 10% spent digitally) |
| Retail trader | Sell goods directly to consumers (USD 420 / BDT 50,395; 10.7% received and 10% spent digitally) |
| Student | Enrolled in a school, college, or university (USD 89 / BDT 10,703; 35% received and 15% spent digitally) |
| Unemployed | Do not generate income (USD 124 / BDT 14,872; 56% received and 7.9% spent digitally) |

*Indicates monthly household income in USD and BDT, followed by percentage of monthly income spent digitally)

We identified the segments based on secondary research, discussions with opinion leaders, and preliminary fieldwork. The user segment is detailed in the annex.

All user segments recognize the value of DFS, yet digital readiness, affordability, and trust gaps shape adoption patterns.

| User group | Drivers | Barriers |
|---------------------------------|---|--|
| DFS users | <ul style="list-style-type: none">➤ Appreciate the convenience and speed DFS delivers.➤ Already possess the required digital literacy and smartphone access. | <ul style="list-style-type: none">➤ High fees and service charges➤ Limited local acceptance by merchants and customers, which hinders further scaling of usage |
| Aspiring users ¹ | <ul style="list-style-type: none">➤ Desire the same convenience and speed as existing users. | <ul style="list-style-type: none">➤ A wider gap between the benefits desired and the conditions required to use DFS➤ Lower digital literacy and issues with affordability, for example, expensive devices and high fees➤ Limited customer awareness and merchant acceptance, which reduce the ability to adopt DFS |
| Reluctant nonusers ² | <ul style="list-style-type: none">➤ Recognize convenience, speed, and the value of strong network effects, for instance, wide merchant acceptance of digital payment | <ul style="list-style-type: none">➤ Share similar barriers with users, such as low literacy, affordability, and limited acceptance, and also lack control and transparency over their money➤ High sensitivity to risks and trust gaps |

➤ All groups³ value DFS for its convenience and time-saving benefits, but while existing users have overcome digital and device barriers, aspiring users struggle with access and affordability.

➤ Reluctant nonusers, although aware of the benefits, are particularly cautious due to risk sensitivity and concerns over transparency.

¹ Aspiring users are those who currently do not use DFS but want to use it.

² Reluctant non-users are those who are aware of DFS but do not currently use it and do not want to use it.

³ These three user groups are present in all segments.

Trends and barriers to DFS adoption in Singair

1. Trends in DFS adoption
2. Barriers to DFS adoption
3. Barriers to Bangla QR and PRA
4. Association of gender with DFS



Trends in DFS adoption (1/2)



DFS usage in Singair varies widely by profession and financial access. (1/2)

- ▼ **Retail traders and landlords show the highest DFS adoption. More than 70% use DFS for different financial activities.**
 - Retail traders and landlords benefit from DFS for high transaction volumes. These transactions include rent collection and recurring diverse financial transactions, such as peer-to-peer (P2P) transfers. DFS fulfills the need for efficient, secure money transfers. Retail traders and landlords have a higher income, broader spending patterns, and strong social connections. These factors drive extensive DFS engagement beyond business-related payment or rent transactions.
- ▼ **Public and private sector employees are more financially literate. Yet they primarily use DFS for receiving salary (65% for public and 28% for private sector employees) rather than everyday transactions due to limited merchant acceptance and concerns over fees on small transactions.**
 - Salaried individuals mainly use digital financial services for merchant payments, P2P, and person-to-government (P2G) transactions. The local ecosystem largely favors cash for everyday purchases.
- ▼ **Only 33% of farmers, 30% of gig workers, and 17% of daily wage laborers have adopted DFS. These numbers demonstrate low engagement due to a lack of digital income sources and high cash-out fees. 50% of daily wage earners cite extra costs as a major reason why they do not adopt DFS.**
 - These groups earn low, irregular incomes or work in cash-dominant economies. For 50% of daily wage earners, the high fees to convert digital funds to cash discourage DFS use. This proves that any extra cost is a significant barrier.

Trends in DFS adoption (2/2)



DFS usage in Singair varies widely by profession and financial access. (2/2)

- ▼ **93% of gig workers** immediately withdraw their digital earnings, which highlights **trust issues** and the **absence of incentives** to keep money in DFS accounts.
 - Nearly all gig workers immediately convert their digital earnings to cash due to a lack of trust in holding funds within DFS accounts and slow settlement processes.
- ▼ **45% of restaurant owners** and **58% of retail traders** see **digital payments** as unprofitable due to the **high MDR** and **slow settlement periods**. They prefer cash transactions to maintain liquidity.
 - High merchant discount rates and slow settlements reduce profit margins. Slow settlements take an average of three to four days, sometimes more than seven days. This delay occurs due to technical glitches and manual complaint processes with local FSP officials.
 - For businesses that depend on quick cash flow, these delays and extra costs make digital payments less attractive. Many businesses prefer cash transactions to maintain liquidity and control over their finances.



Barriers to DFS adoption (1/6)



Digital literacy

- Low literacy and digital skills are barriers to DFS adoption, especially among **artisans** and **farmers**. 64% of artisans cite literacy as a barrier, and 39% of **farmers** cite formal education as a hindrance.
 - Those with limited reading, writing, and technology skills struggle with digital interfaces and DFS platforms. 64% of artisans see literacy as a barrier. **This indicates** that many artisans lack confidence when they use apps or websites for basic navigation.
 - 39% of farmers lack formal education. Hence, their unfamiliarity with technology leads to hesitation to adopt DFS. Without targeted education or user-friendly interfaces, these groups will remain excluded.



Barriers to DFS adoption (2/6)



Limited accessibility

- ▼ **All farmers** in the study purchase essential inputs from dealers and suppliers in **cash**. **Wholesalers and *aratdars**** prefer cash at the *haat bazaar*.
 - Farmers purchase essential inputs, such as seeds and fertilizers, in cash from local dealers. If wholesalers and *aratdars* also insist on cash, especially in traditional markets like haat bazaars, the ecosystem discourages the use of digital payments. Farmers have little incentive or opportunity to change from cash where dealers and suppliers mostly do not accept digital payments.
- ▼ **Only 17% of day **laborers have bank accounts**, while **33% of them use mobile financial services (MFS)**, which limits digital transactions.
 - Limited financial services penetration means many laborers lack access to the full suite of DFS that providers offer. These include services, such as secure savings, credit facilities, and comprehensive digital payment options.
- ▼ **27% of students lack a National ID**, which prevents DFS account access. **21% of them use DFS solely for cash withdrawals**.
 - The use of DFS exclusively for cash withdrawals indicates that even when access is available, the actual benefits of a fully digital financial account are minimal. This limited functionality further lowers broader DFS usage among younger users.

Arat - A wholesale marketplace or trading hub where agricultural products are aggregated, traded, and distributed.

**Aratdar* - A commission agent or intermediary who operates within an *arat*. *Aratdars* manage the flow of goods in the agricultural market.

***Laborer* - Blue color workers

Barriers to DFS adoption (3/6)



Affordability concerns due to high transaction costs

- ▶ People view DFS as expensive. **36% of respondents consider it a luxury** due to high cash-out fees.
 - Users view DFS as a luxury because of expensive transaction fees, such as cash-out fees and merchant discount rate (MDR) fees. This shows that transaction costs can make DFS seem disproportionately costly than traditional cash methods.
 - This perception is particularly acute among price-sensitive groups, such as farmers, artisans, retail traders, retail service providers, restaurant owners, and others.
- ▶ **33% of farmers find the MFS fees high and suggest decreasing them to 0.5%-1%.**
 - Farmers work on thin margins and are highly fee-sensitive. About 33% suggest that MFS cash-out fees are too high and should be reduced to 0.5%-1%. Lower fees could make digital financial services a more attractive option.
- ▶ **51% of retail traders and restaurant owners avoid DFS due to the high merchant discount rate (MDR), which they say reduces profits. Businesses even encourage cash transactions to bypass fees.**
 - Retail traders and restaurant owners avoid DFS and favor cash transactions to maintain better profit margins.
 - As a result, affordability is a significant barrier, especially in small or margin-sensitive enterprises.

Barriers to DFS adoption (4/6)



Infrastructure issues

- 41% of respondents report delayed transactions, which proves that reliability concerns persist.
 - Such delayed transactions can disrupt daily financial planning for regular users and erode confidence in digital alternatives.
 - Infrastructure problems can quickly undermine the confidence of new users in their ability to use DFS in daily life.
- 46% farmers report **system outages**, especially during harvests.
 - For farmers, system outages can cause irreversible damage during harvests, when cash flow is critical.
 - These numbers indicate that the digital infrastructure is not adequate enough to meet the demands of rural or seasonal users. These reliability issues further discourage users in their shift to DFS.



Barriers to DFS adoption (5/6)



Trust concerns

27% of users view DFS as riskier than cash.

- A notable 27% of users consider DFS riskier than cash. This reflects deep-seated concerns about DFS security. This caution is linked to past experiences with fraud or a general mistrust of digital platforms. Users are reluctant to shift away from the tangible nature of cash.

42% of gig workers worry about fraud and transparency.

- 42% of gig workers perceive digital transactions as more vulnerable to manipulative practices or errors.
- For gig workers who rely on quick and secure payments, any hint of instability or risk in DFS systems can be a deal-breaker.

15% of retail traders feel DFS reduces control over their finances.

- 15% of retail traders find that digital payments reduce their financial control. This occurs due to delayed settlements or tracking errors. They view the immediate clarity of cash transactions as a more viable option due to this lack of control.
- Retail traders see DFS as an alternative to cash rather than a tool to manage and scale their business.
- Loss of trust in the digital system can severely limit DFS adoption.

Barriers to DFS adoption (6/6)



Limited value perception

- DFS adoption remains low among businesses, as **merchants report that suppliers and distributors do not accept digital payments.**
 - Merchants have little motivation to adopt DFS if their suppliers and distributors do not accept digital payments. The absence of a fully integrated payment ecosystem limits the perceived benefits of DFS. This reinforces the status quo of cash transactions.
- Only 12% of restaurant owners see business value** in digital payments, although **72% use them for personal usage.**
 - Digital tools are helpful for personal use but offer limited benefits to businesses. This prevents broader DFS adoption in commercial settings.
- Among students, 65% find DFS useful to receive money** but do not see **benefits beyond withdrawals.**
 - 65% of students view DFS only as a way to receive money. They overlook benefits, such as bill payments, savings options, and mobile recharge. This narrow perception limits the use of DFS as a comprehensive tool.



Barriers to the adoption of Bangla QR and PRA (1/3)

Bangla QR enables low-cost, interoperable payments for small merchants. A personal retail account (PRA) provides a secure channel for informal workers and microentrepreneurs to receive digital payments. However, our research reveals several barriers that prevent the wider adoption and impact of these vital digital tools.



Awareness barriers

- 80% of the Bangla QR merchants are unaware of the benefits of Bangla QR.
 - Bangla* QR merchants do not fully understand its benefits and functionality. Providers do not provide much guidance, and bKash merchants mostly use bKash QRs.
 - Customers are unaware of Bangla QR and the interoperability feature.



MDR issues

- Merchants perceive the merchant discount rate (MDR) as higher than their profit margin.
 - Merchants view MDR for Bangla QR as too high compared to their profit margins. Many merchants prefer cash transactions without promised long-term benefits, such as a larger customer base or lower operational costs.
- MDR variations from different providers and channels confuse merchants.
 - Merchants are confused by the various MDR rates across different providers and channels. This makes it difficult for them to understand which payment method offers the best value. These inconsistencies increase their reluctance to adopt digital payment systems like Bangla QR.

Barriers to the adoption of Bangla QR and PRA (2/3)



Perceived complexity

- ✦ A lack of clarity for the users on how QR operates, with unclear promotions.
 - Banks have limited resources allocated to acquire and promote Bangla QR. This leads to fewer instances of merchant onboarding, low visibility, and weak adoption at the grassroots level.
- ✦ Lack of instant visibility of the e-money balance complicates merchants' bookkeeping.
 - Merchants' lack of instant visibility of the e-money balance complicates bookkeeping. They struggle to track incoming payments in real time. This creates confusion in daily sales records, hampers inventory planning, and reduces their trust in digital transactions.
- ✦ Lack of provider support and prioritization.
 - Lack of provider support and prioritization slows Bangla QR adoption. Banks and MFSs do not actively promote it or help merchants adopt Bangla QR. This limits its awareness, uptake, and impact.



Infrastructural issues

- ✦ Poor Internet connectivity delays payments. Some users report that settlement takes three to four days.
 - Poor internet connectivity leads to transaction delays, which causes frustration for both merchants and customers. This reduces trust in digital payments and pushes users back to cash. These barriers slow the growth of a cashless ecosystem.
- ✦ Users experience issues with Bangla QR, while other payment methods like bKash function smoothly.

Barriers to the adoption of Bangla QR and PRA (3/3)



Lack of support by providers to local branches. Due to resource allocation constraints, other areas of the bank were prioritized

Real-time data access is lacking.

- Local bank branches cannot access QR-based transaction data, which limits their ability to assist merchants and resolve issues. This undermines trust in the system and hampers real-time grievance resolution and support. Bank branches have limited resources to acquire Bangla QR and promote it.

Banks have limited technical capacity.

- Local bank staff lack basic knowledge of QR payment systems. They also cannot distinguish between Bangla QR and proprietary QR codes. Structured or standardized training programs are unavailable, which leads to inconsistent support during merchant onboarding.

Banks lack standardized processes.

- Banks lack clear standard operating procedures (SOPs) for merchant onboarding. Bank staff are unsure how to explain the value and usage of QR payments to merchants. This leads to merchant confusion and reluctance.

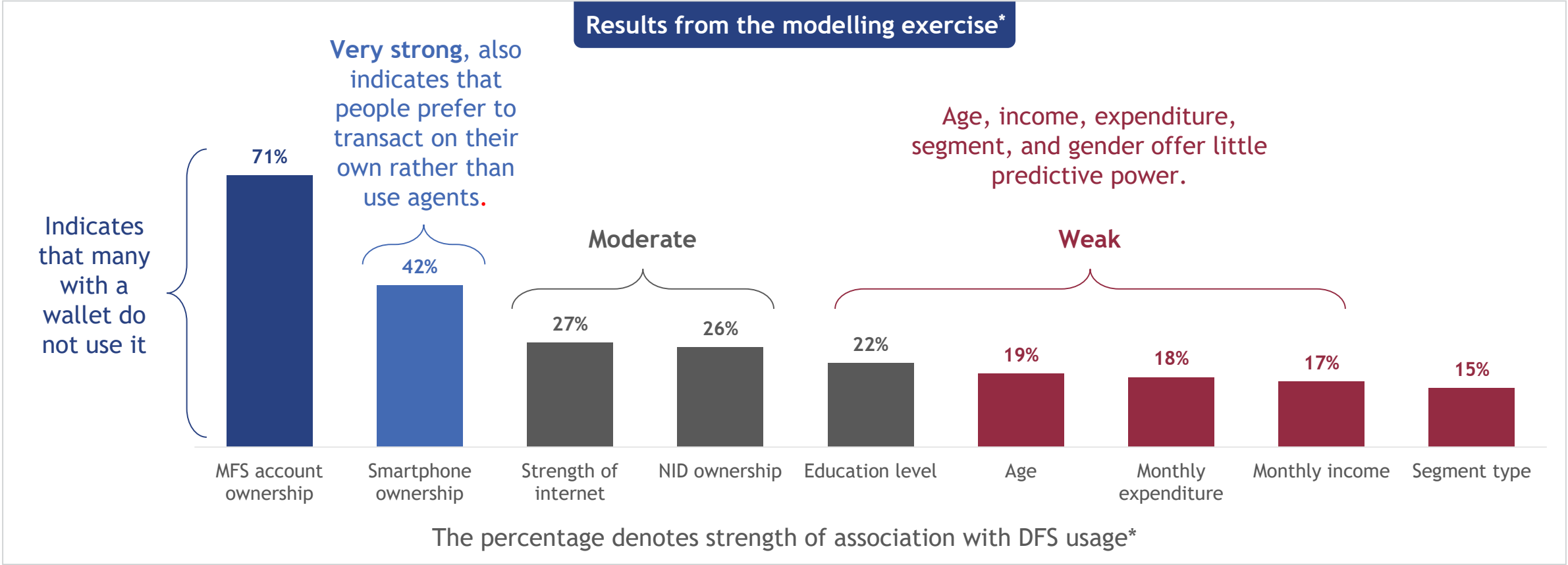
Fragmented and inconsistent merchant onboarding.

- Without SOPs or uniform guidance, onboarding is inconsistent, inefficient, and often dependent on individual branch initiative or staff motivation.

Banks do not have adequate support materials.

- Banks do not give merchants reference materials or follow-up support. This limits their confidence and ability to use the system independently.

A modelling exercise revealed that age, income, expenditure, segment-type, and gender play a limited role in DFS adoption.



Women represent 11% of respondents. Female respondents refer to all 95 female respondents in the sample. We report the disaggregated insights only where sample variability allows for meaningful interpretation, as discussed in the next slide.

*Cramer's V, calculated using chi-square test and normalized to range between 0 and 1—0 meaning no association at all, and 1 indicating a perfect relationship.

Phone and internet access are not enough. Gender gaps in DFS reflect deeper issues of control and confidence.*



Limited access to personal phones remains a significant barrier for women.

- Among those without phones, men are four times more likely to use DFS than women.
- Even when the female respondent owns the only smartphone in the household, men still use DFS more frequently than women.
- In households where someone else owns a smartphone, men are 93% more likely to use DFS than women.



Men are more likely to use digital payments than women, even with the same type of internet access.

- Men are 2.8 times more likely to use digital payments with mobile data, 1.7 times more likely with WiFi, and 5.6 times more likely to do so when they lack internet access (agent-assisted).



For respondents with formal schooling, men are far more likely to use DFS than their female counterparts.

- In the 36-50 age group, men are almost six times as likely to use digital payments. For those who are above 50 years old, this figure rises to nearly seven times.



These gaps go beyond devices and connectivity, which are leading factors identified in the modelling exercise. They highlight deeper issues of control, confidence, and digital exposure.

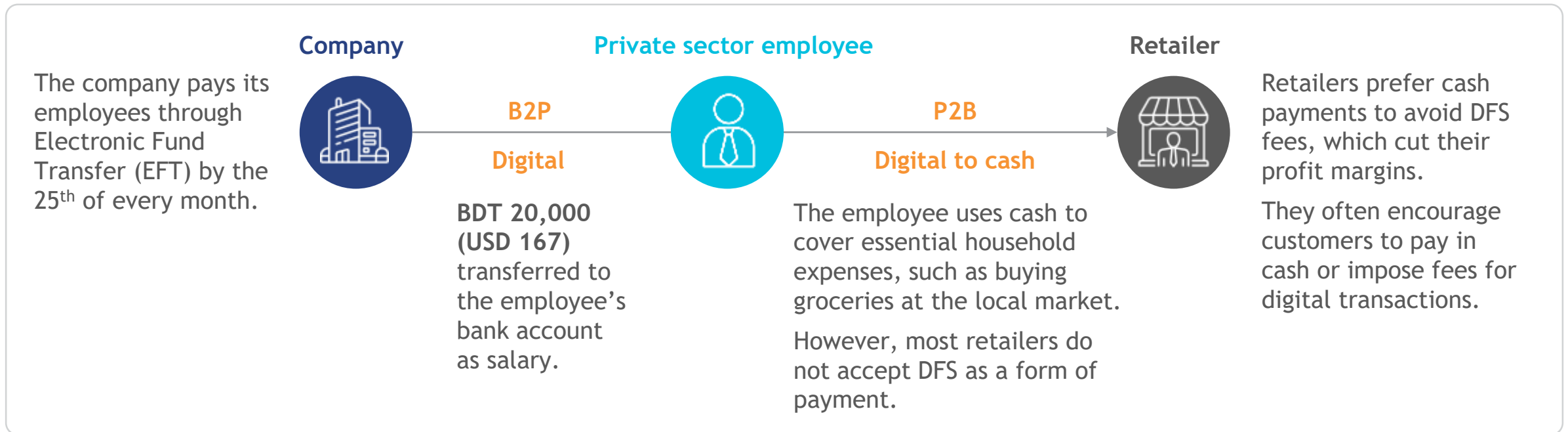
*Subgroup trends (e.g. by gender) are presented where sample size permits stable estimates. However, due to limited observations in some categories, findings should be viewed as indicative rather than conclusive.



Payments use case-specific insights

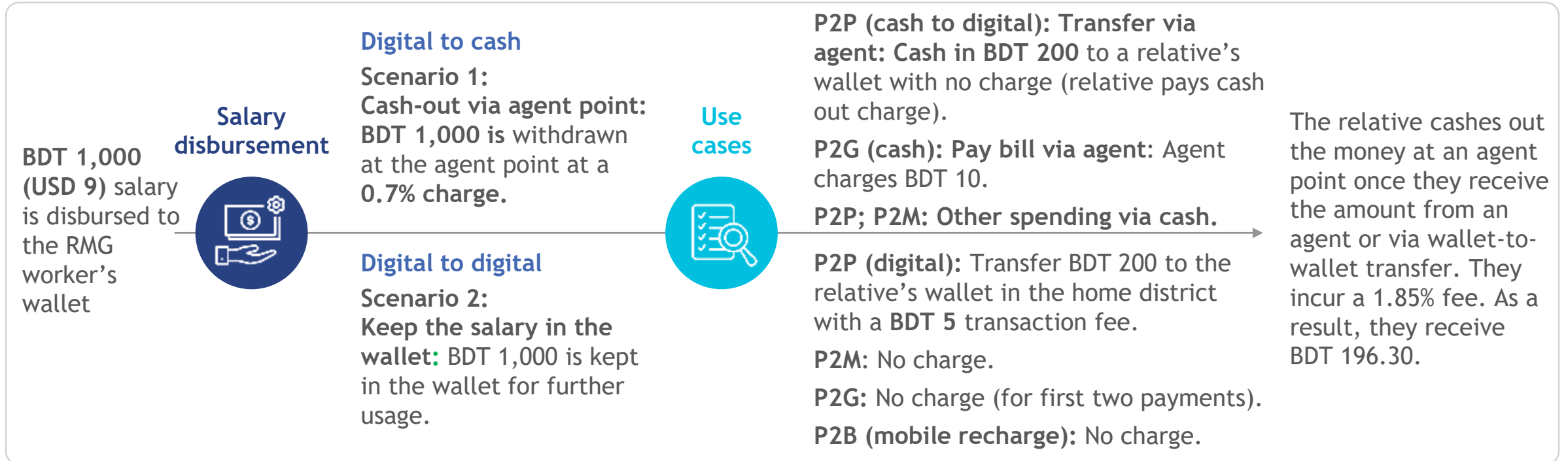
These insights map the transition of cash to digital and digital to cash, where it goes, and how it is used. The mapping also identifies the factors that influence these inflection points.

Private sector employees receive their salaries in bank accounts. However, many withdraw a significant portion to simplify financial management and reduce the risk of payment rejections.



- Although employees receive their salaries via EFT, retailers often prefer cash payments. This is also discussed in the next slide.
- Some stores, such as superstores and pharmacies, do accept digital payments through MFS or cards. However, the **availability of such options in areas like Singair** is quite limited. As a result, private sector employees need to have cash and electronic money for their purchase needs. These constant switches can exhaust employees, which leads to decision fatigue and a general preference for cash payments.

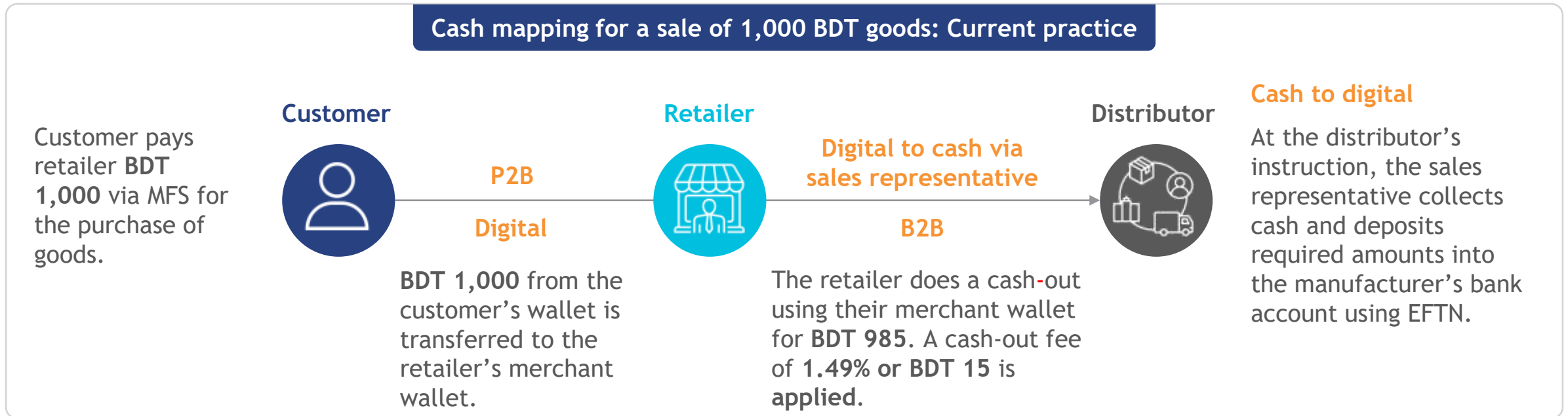
Ready-made garments (RMG) salary comes with a cash-out charge, and low digital acceptance keeps RMG workers dependent on cash.



- **Salary disbursement costs:** RMG workers receive wages via MFS. The factory and the MFS provider negotiate the total cash-out fee. The factory covers a portion, while workers typically bear 0.7%. The factory informs the workers about this arrangement when they join.
- **Cash withdrawal:** Most workers withdraw around 80% of their salary. They prefer to spend in cash, as most retailers prefer it. Also see slide 27.
- **Money transfers to home:** Transfers via agent wallets are free, while wallet-to-wallet transfers cost BDT 5 per transaction, which makes digital transfers more expensive.

*Customers can pay up to two bills per month free of charge; respective fees apply for additional bills.

Distributors discourage digital payments because the current systems do not allow distributors to map the payments back to the retailer.














- The sale and collection of payments for the goods sold is done via a sales representative. If a retailer directly pays the distributor's wallet or account, the distributor does not have any mechanism to determine which retailer has paid for what goods. Without a digital reconciliation system, distributors prefer that sales representatives collect cash from retailers and deposit it into the distributors' accounts.
- If the current system for retailer-to-distributor B2B payments were digital and allowed for traceability, the **MDR would be 0.2%**. This is the MDR for B2B payments as prescribed by the Bangladesh Bank. This change would lower the cost of digital by more than 1.29% and simplify the payment process.

* Here, "distributors" primarily refer to company distributors dealing in physical goods, such as FMCG distributors, not those associated with MFS providers or MNOs.

Opportunities for Bangladesh Bank and providers



Highlighted findings and suggested activities for the Bangladesh Bank to enhance the uptake and use of DFS (1/4)

| Key highlights | Insights | Illustration / Segment feedback | Suggestive actions for BB |
|--|--|---|---|
| Trust in system or technology | 41% of users report delayed transactions, and 27% view DFS as riskier than cash because of low certainty. |  44% of farmers cite system outages, which indicates patchy internet infrastructure in rural markets. |  Review infrastructure in rural markets, such as internet coverage, with BTRC and other providers; suitable actions will be taken after the review  Establish oversight mechanisms to ensure products meet consumer protection standards; these actions could include a centralized GRM on payments  Streamline UI/UX to improve user experience |
| Lack of trust or interest among supply-side players | Providers are reluctant to put effort into Bangla QR, as using it reduces their income share. |  80% of merchants with a Bangla QR do not know how or why it should be used. |  Review staff training on merchant payments and Bangla QR  Incentivize players with high active Bangla QR merchants  Encourage payment service providers (PSPs) to participate in the Bangla QR initiative |
| Cost to merchants | Retail traders and restaurant owners (58%) avoid DFS due to high MDR, which reduces their profit margin (1.2% to 1.6%) |  Only 12% of restaurant owners see business value in DFS even though 72% use it for personal purposes. |  Encourage providers to use a tiered MDR that will lower the MDR rate on low-value transactions  Do not charge MDR for transactions below BDT 500 to encourage lower value transactions |

Highlighted findings and suggested activities for the Bangladesh Bank to enhance the uptake and use of DFS (2/4)

| Key highlights | Insights | Illustration / Segment feedback | Suggestive actions for BB |
|-----------------------------------|---|--|--|
| Prevalence of cash economy | DFS acceptance in high-cash industries, such as agriculture, retail, and gig work, is minimal. | <ul style="list-style-type: none"> 55% of retail service providers and 37% of traders say distributors do not accept digital payments. Essential inputs from dealers and suppliers is primarily in cash. | <ul style="list-style-type: none"> Test if incentives, such as referral bonuses and cashback for customers, will encourage them.* Launch an “Accelerating digital payments month mission;” under this program, FSPs and district administration will promote digital transactions through camps and merchant onboarding at high-volume transaction places* |
| Cost to customers | The cost of devices, such as a smartphone, is a barrier for adoption in lower-income households. Additional fees, such as cash-out charges further discourage lower income groups from using DFS. | <ul style="list-style-type: none"> 36% consider DFS a luxury due to high cash-out fees. The 1.8% cash-out fee is a major barrier for 50% of the sample. | <ul style="list-style-type: none"> Encourage partnerships between MNOs, DFS providers, and device manufacturers to offer cheaper smartphones; these phones could come with affordable DFS plans, which can include lower cash-out fees Collaborate with schools, colleges, and madrasas to place QR codes at payment points across campuses |

*Funds for these activities shall come from the central bank or a suitable government channel

Highlighted findings and suggested activities for the Bangladesh Bank to enhance the uptake and use of DFS (3/4)

| Key highlights | Insights | Illustration / Segment feedback | Suggestive actions for BB |
|--|--|--|--|
| Lack of use cases beyond cash withdrawals | <p>Bundled DFS products transform DFS from an emergency tool to a comprehensive solution.</p> <p>Women who receive remittances have limited DFS exposure.</p> <p>Users mention that remittances will help DFS adoption if it helps unlock access to credit or loans.</p> | <ul style="list-style-type: none"> Pilot programs indicate an increased engagement when additional DFS products are bundled. Retail traders, retail service providers, gig workers, restaurant owners, farmers, and artisans use loans to grow their income-generating activities. | <ul style="list-style-type: none"> The Regulatory FinTech Facilitation Office (RFFO) at the central bank can help providers innovate and test DFS products Encourage providers to link DFS usage history with microloan eligibility. Promote this benefit during onboarding and awareness campaigns Encourage providers to expand their merchant base, innovate, and invest in marketing campaigns to increase adoption and usage |
| Customer capability building | <p>Personalized, in-person assistance overcomes literacy challenges.</p> <p>Capability building increases DFS familiarity and builds user confidence.</p> | <ul style="list-style-type: none"> Only 9% of DFS users have no formal education compared to 25% of nonusers. This indicates a need for more inclusive support measures. | <ul style="list-style-type: none"> Partner with local NGOs and educational institutions to deliver one-on-one support Guide providers to develop and distribute user-friendly DFS support materials Train local women as DFS ambassadors to guide others through informal sessions* |

*Funds for these activities shall come from the central bank or a suitable government channel

Highlighted findings and suggested activities for the Bangladesh Bank to enhance the uptake and use of DFS (4/4)

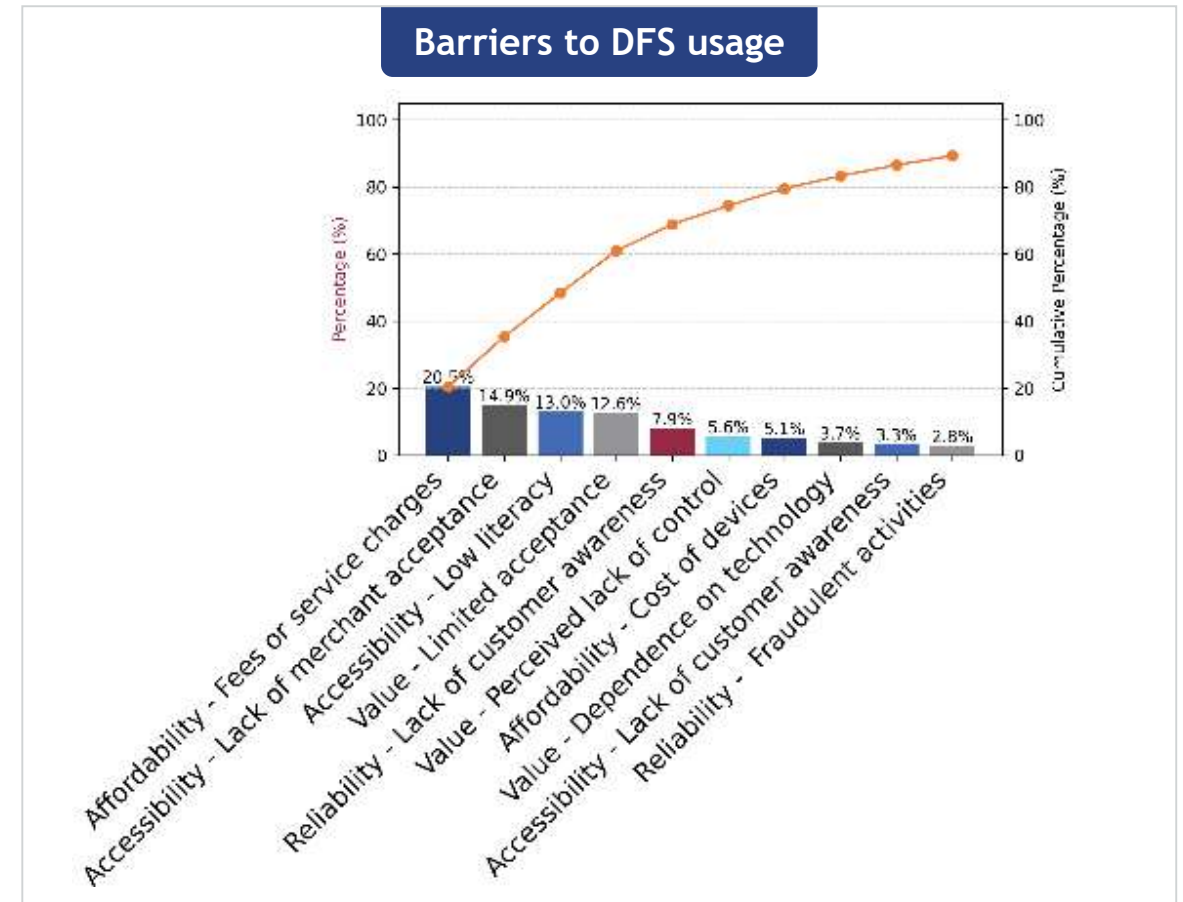
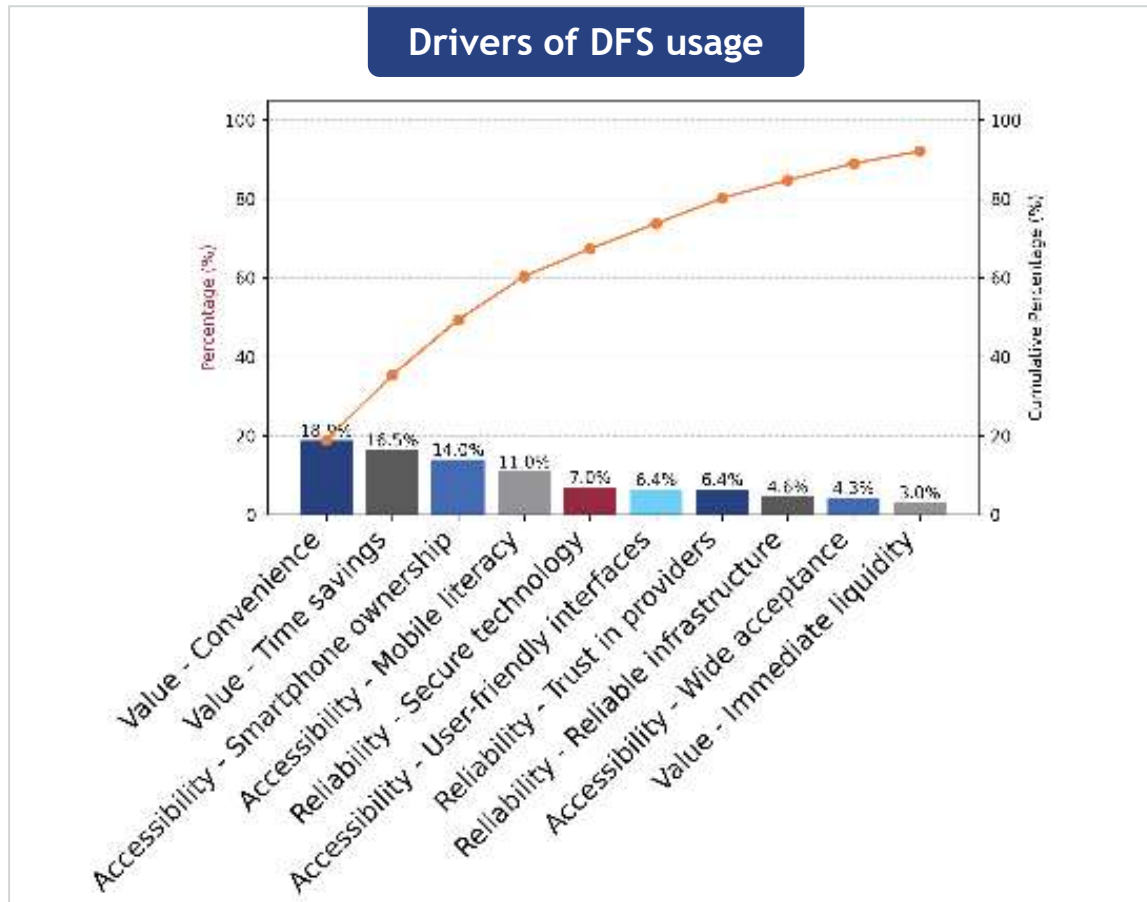
| Key highlights | Insights | Illustration / Segment feedback | Suggestive actions for BB |
|--|--|--|---|
| Distributors lack a mechanism to combine records of retailer payments if payments are received digitally. | <p>Distributors mention that digital payments from retailers will be difficult to manage, as many such payments will be difficult to record.</p> <p>If the current system for retailer-to-distributor or B2B payments is digital and permits traceability, the MDR will be 0.2%. This is the recommended MDR for B2B payments as prescribed by the BB. This change would lower the cost of digital payments by more than 1.29% and simplify the payment process.</p> | <ul style="list-style-type: none"> 37% of retailers do not use digital payments because distributors prefer cash payments. Retailers see the MDR 1.2%-1.6% as an additional cost | <ul style="list-style-type: none"> Encourage development of a digital reconciliation system for distributors, which primarily refer to company distributors dealing in physical goods, such as FMCGs |



Segment-wise insights

Convenience drives DFS use, even though fees and lack of merchant acceptance remain a key barrier for private sector employees.

Private sector employees primarily adopt DFS for convenience (18%), time savings (16.5%), and smartphone ownership (14.2%), which collectively account for 50% of the drivers. However, service charges and limited merchant acceptance hinder further usage.



Providers should reduce charges for low-value transactions and introduce workplace incentives to enhance DFS adoption among private sector employees.



Accessibility

- Only 28% of private sector employees receive their salary through DFS channels.
 - Despite high personal access to banks, MFS accounts, and internet usage, the low acceptance of DFS in payment channels, especially for small transactions and remote unions, continues to limit adoption.
- 41% of private sector employees have bank accounts, 59% have MFS accounts, and 94% use the Internet.
 - High access levels of formal finance and the internet make it a green field for DFS adoption. However, external factors, such as low merchant acceptance, limit DFS usage.



Affordability

- Cash-out charges and service fees, such as annual debit or credit card charges, make digital transactions less effective.
 - Even with access, additional fees create a cost burden that reduces DFS's viability compared to cash.



Providers should enhance private sector employees' affordability through fee waivers, and drive value addition through incentives for regular DFS usage.



Reliability

- Respondents suggested an improvement to the NPSB interface by adding an option to verify whether the beneficiary details refer to the beneficiary's name when processing an NPSB transaction. This is similar to the confirmations shown during MFS merchant payments.
- Employees trust MFS platforms, such as Rocket and Upay, for salary accounts and use them regularly with confidence.
 - This has demonstrated that DFS can be reliable and accepted when offered through trusted channels for salary-related transactions.
- Private sector employees enjoy fee-free salary cash-outs through Rocket, but their funds remain in cash, which undermines the reliability of digital financial services.
 - Rocket is trusted for its free salary disbursement, yet low merchant acceptance forces employees to convert digital funds into cash.
 - The need to convert to cash restricts the ability to make digital transactions.

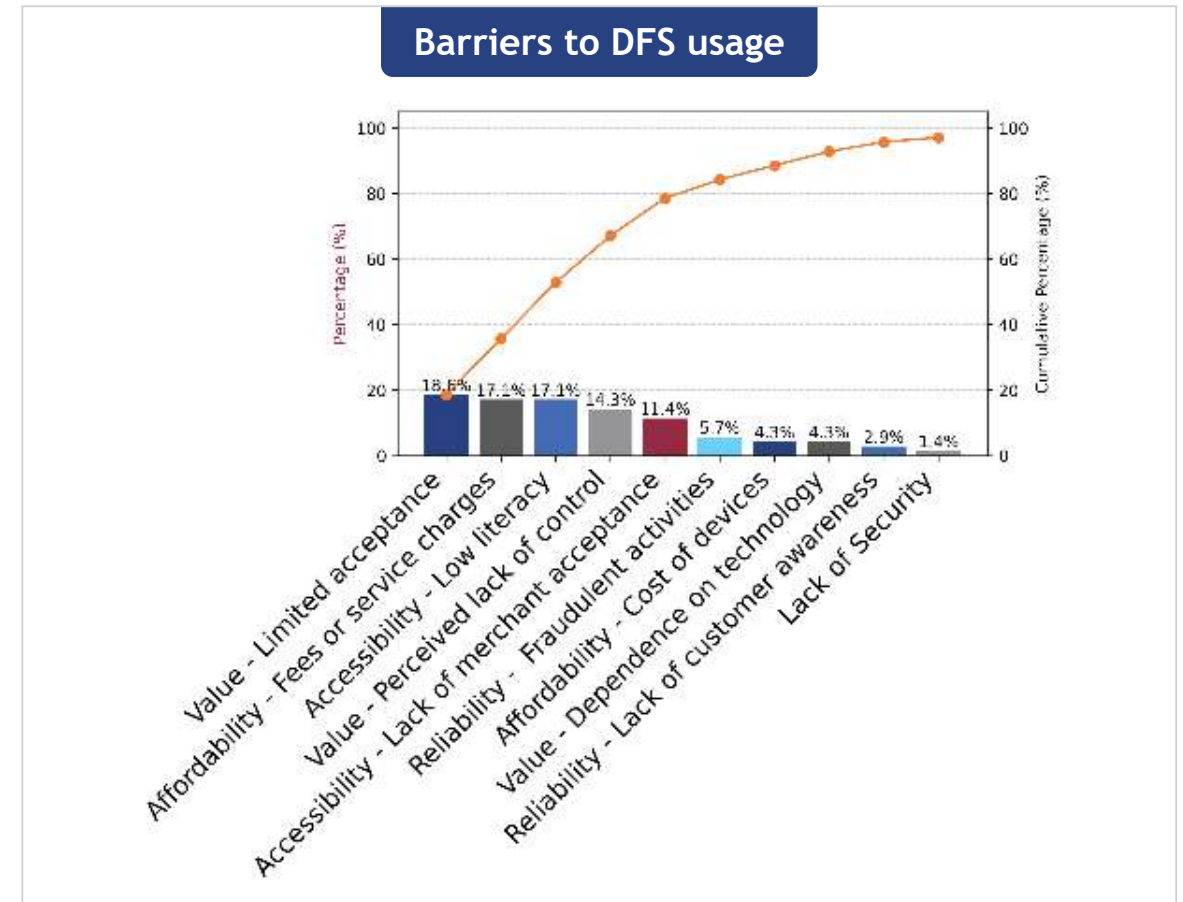
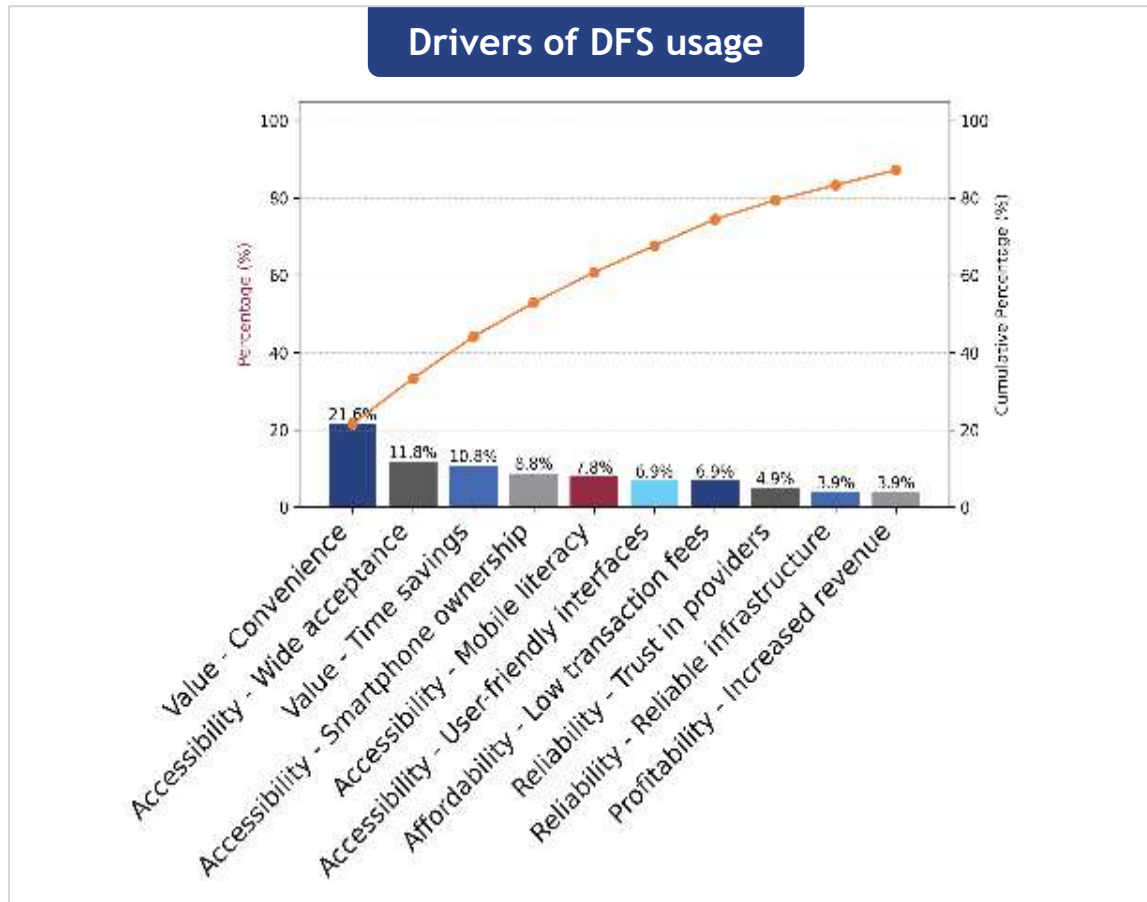


Value

- 47% of private sector employees** highlighted that **cashback, dining offers, and credit card benefits** motivate them to use digital payments instead of cash. This drives DFS engagement.
 - Incentives and value-added benefits drive DFS engagement, which indicates that the use of DFS increases when it offers extra perks.

Landlords value the convenience of DFS, but usage remains limited due to low acceptance, high charges, and limited digital literacy.

Landlords are attracted to DFS due to the high value they place on convenience (21.6%). However, DFS usage is restricted by factors, such as limited acceptance (18.5%), service charges (17.2%), and low digital literacy (17.1%), which account for more than half the responses.



Limited DFS transaction capacity, cash dependence, and cost concerns hinder digital payment adoption among landlords.



Accessibility

- 18% of landlords receive rent digitally, despite high DFS access. 73% of them have bank accounts, and 55% use MFS.
 - Even though most have formal accounts, tenants prefer cash and have limited DFS capability in rental markets, which hinders their digital adoption.
- Landlords prefer banks for large payments due to low DFS transaction limits.
 - Landlords own one or a maximum of two digital wallets. Even with two wallets, MFS caps daily transactions to around BDT 50,000 (USD 415) and monthly transactions around BDT 150,000 (USD 1,250). The transaction limits are insufficient to accept rent digitally.
 - Multiple tenants often pay on similar dates between the 26th and 5th of a month to align with their salary cycles. As a result, rent payments can quickly exceed these limits.
 - Consequently, banks become the preferred option for handling large sums without the hassle of transaction caps.



Affordability

- Landlords view handling cash as cost-free since it avoids DFS transaction costs. High cash-out fees reduce landlords' income, which makes DFS less attractive.
 - The absence of explicit fees in cash handling creates a perception of lower cost and higher profitability.
 - When fees cut significantly into revenue, landlords find cash transactions more profitable, which they perceive as "free."



Landlords require reliable, cost-effective, and integrated DFS solutions to transition from cash-based transactions.



Reliability

- Landlords find DFS slower and less reliable because they lack awareness of instant bank transfers, such as Real-Time Gross Settlement (RTGS), Electronic Fund Transfer (EFT), and National Payment Switch Bangladesh (NPSB).
 - Many landlords believe digital transactions hold up funds, as they believe money gets stuck or takes days to settle. This misconception delays their adoption of digital channels for rent collection, which means they do not receive payments when needed.
 - If they knew that RTGS and NPSB transfer money instantly, and EFT settles within one working day, they might choose these faster methods.
- 36% of landlords worry about scams and fraudulent activities through digital channels.
 - Security concerns reduce trust and discourage the use of digital platforms for high-stakes transactions, such as rent.

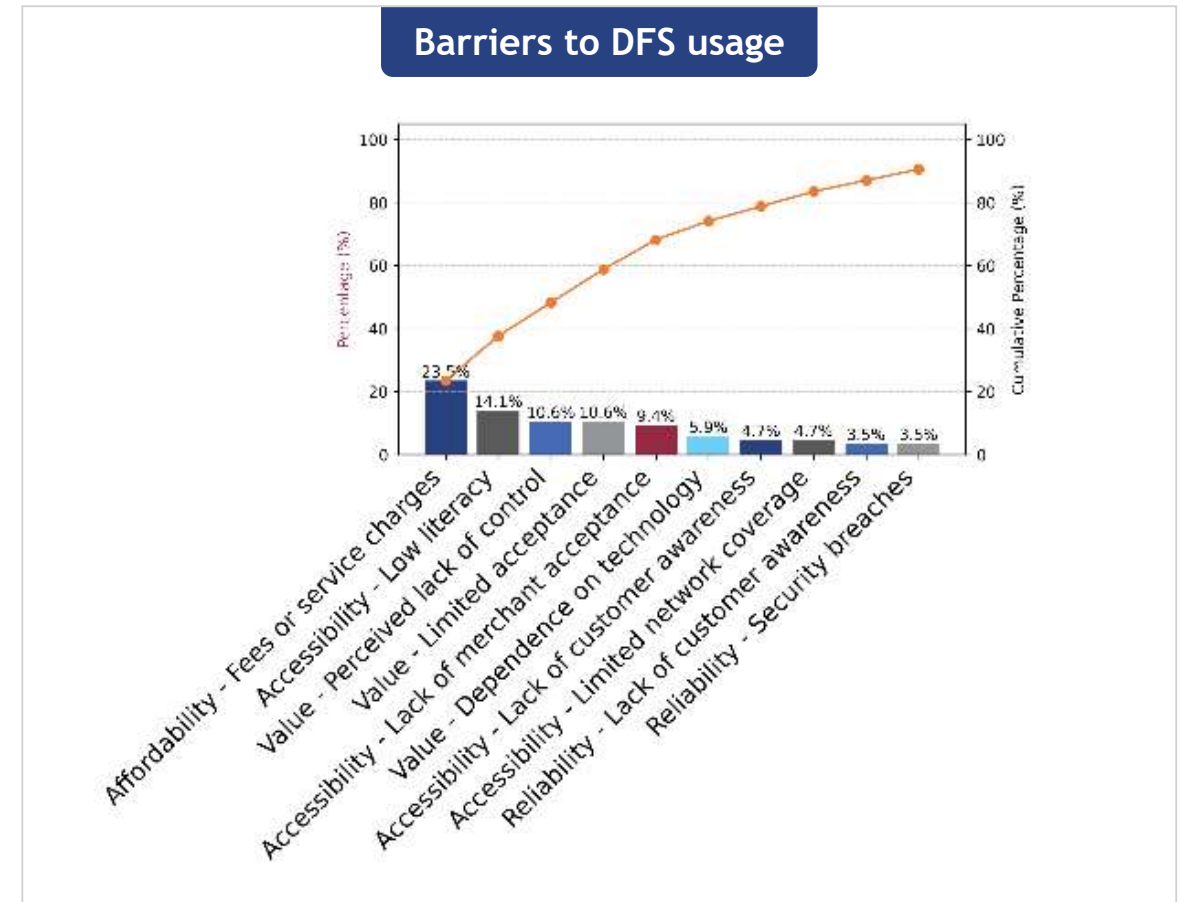
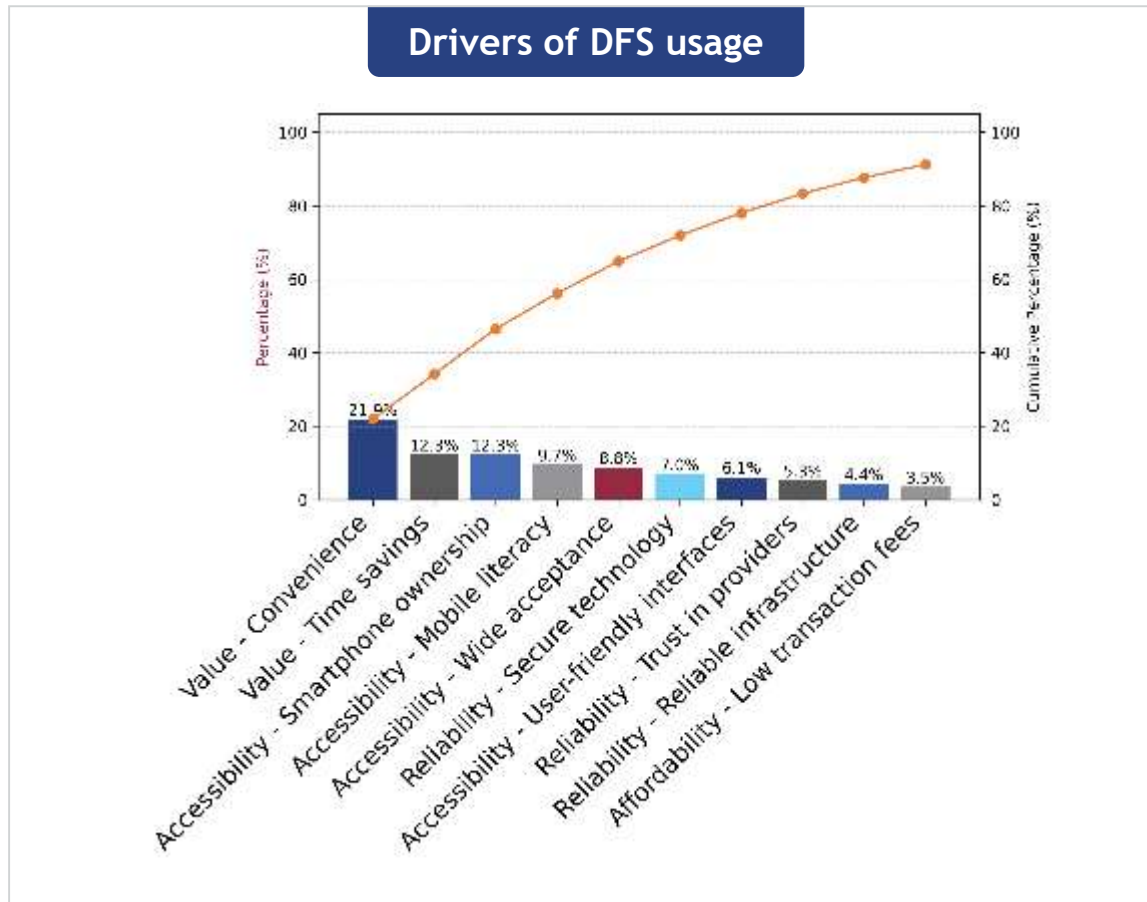


Value

- 54% of landlords use MFS for emergency transactions during nonbanking hours.
 - They use DFS as a backup when banks are closed, which indicates limited value for regular operations.
- For example, a landlord's staff collects BDT 100,000 (USD 818) monthly rent, but only BDT 8,000 (USD 66) is received through bank transfer. They collect the rest in cash to make local payments in cash.
 - This split suggests that the perceived convenience and reliability of DFS are too low to replace cash.

Public sector employees are driven to use DFS due to convenience and time-saving, though limited by fees and low digital literacy.

Public sector employees use DFS for convenience (21.9%) and time savings, with smartphone access and mobile literacy driving more than 56% of adoption. However, growth is limited by fees (23.5%), digital illiteracy (14.1%), and lack of control (10.6%).



Barriers to DFS adoption among public sector employees include limited infrastructure and usage, with opportunities for AI-driven learning.



Accessibility

- 64% of public sector employees use smartphones. 94% of them use the internet. While 52% of them access the internet through Wi-Fi at their workplace or home.
 - High digital access should enable DFS adoption. However, supply-side barriers, such as a lack of acceptance infrastructure and cultural factors, which include traditional gender roles, limit usage, especially among female employees.
- 35% indicated that a **lack of DFS acceptance** is a barrier.
 - This reflects the mismatch between high personal access and low merchant participation.
- Traditional gender roles limit female teachers' involvement in household finances. They often leave the financial decision to their husbands.
 - Such cultural norms restrict DFS use even when access is available.



Affordability

- 45% of public sector employees view fees or service charges as a significant barrier to their DFS adoption.
 - For employees on fixed salaries, even modest transaction fees can feel like an unnecessary deduction from their net income, which makes digital channels less attractive than cash methods.
- 65% of public sector employees are unaware of the detailed **cost structure** associated with digital transactions.
 - This gap creates uncertainty and hesitancy. Peer influence and social norms often lead individuals to assume high transaction costs without knowing the actual fees.
- While fees are a concern, **35% of public sector employees** indicated that **incentives**, such as cashback or discounts, would **encourage DFS usage**.
 - This suggests that if providers offer value-added benefits, it could offset the perceived cost burden, which would make digital payments more appealing and competitive with cash transactions.



Providers can introduce gamified savings with rewards for public sector employees to address system inefficiencies and unlock saving habits.



Reliability

- Many public sector employees struggle during emergencies but lack quick solutions.
 - In critical moments, delays in fund transfers or transaction notifications become a serious drawback.
- Users are frustrated due to the **delayed updates in account balances**.
 - Inconsistent performance lowers trust in DFS. For instance, users highlighted delays in the Agrani Smart Banking App.

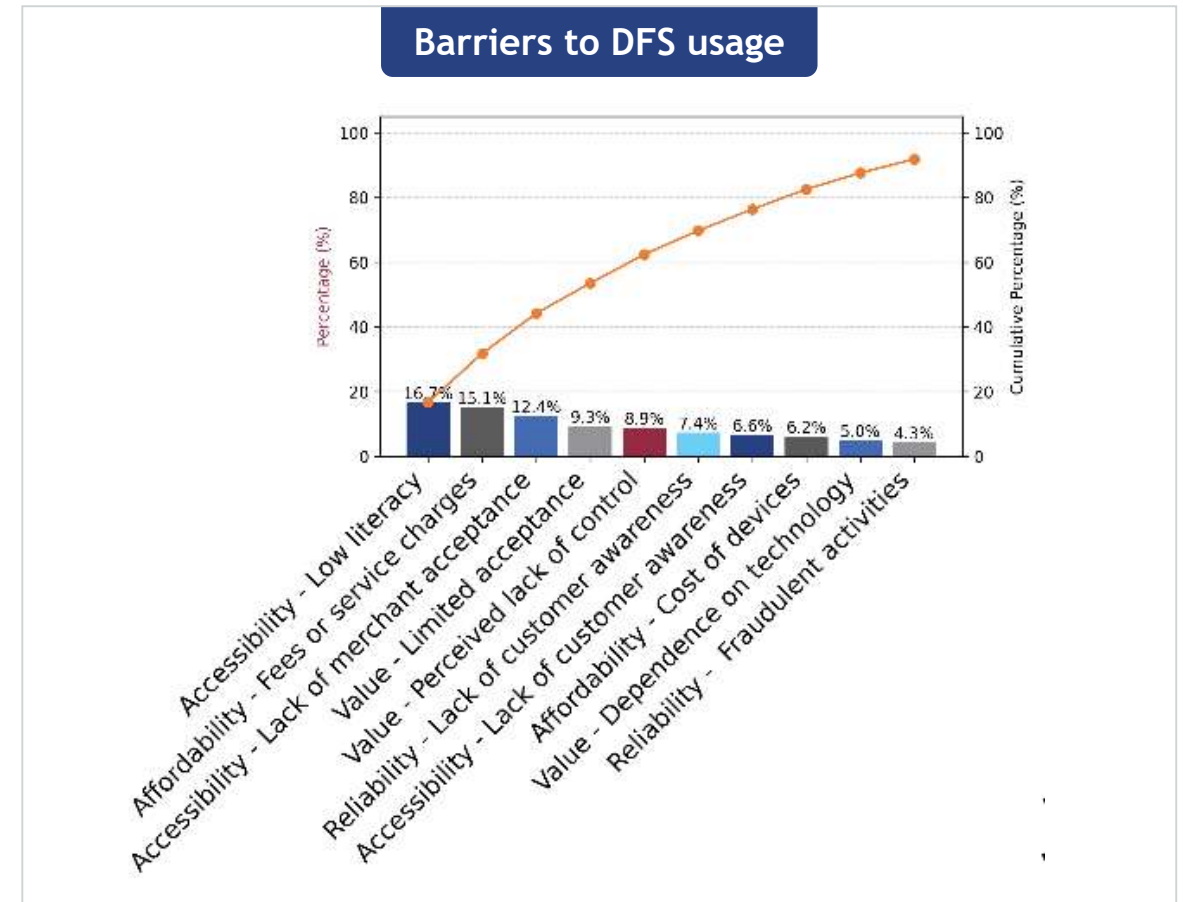
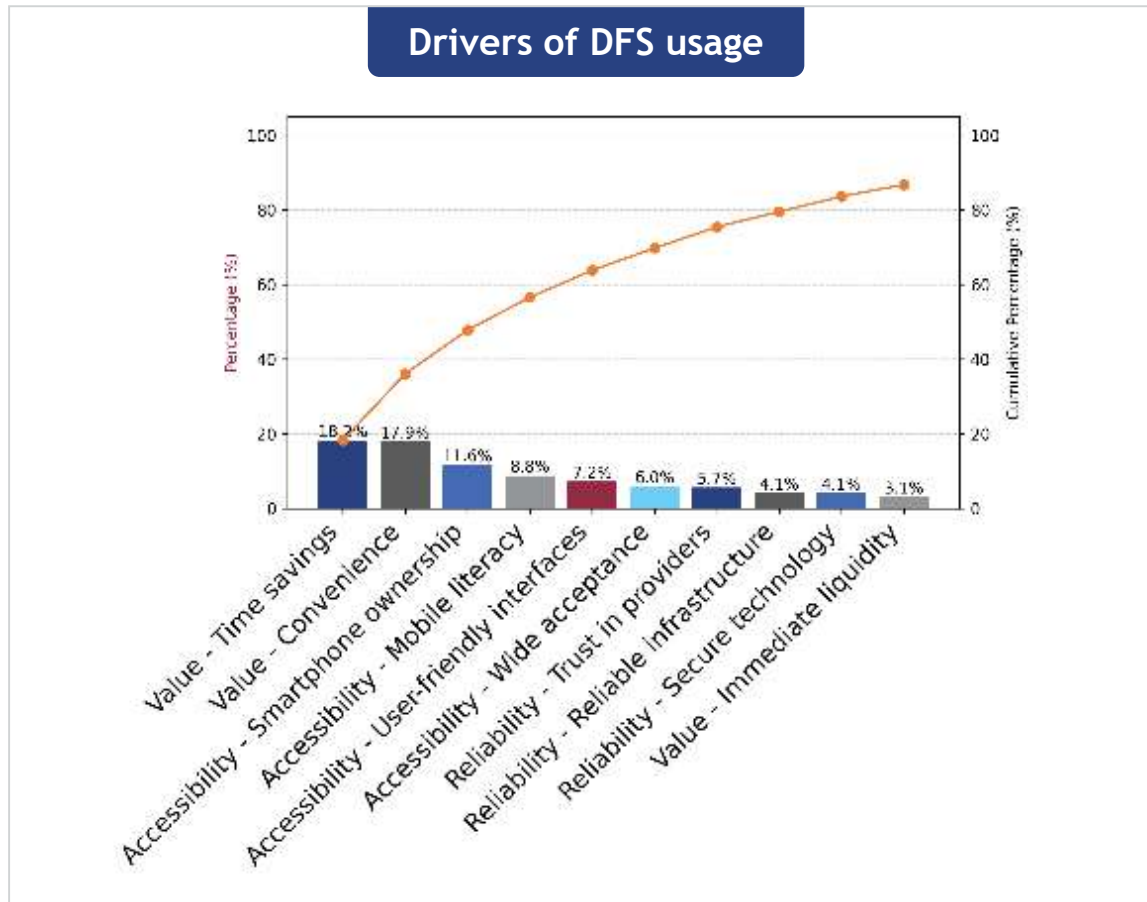


Value


- Public sector employees **lack awareness of savings products. They prefer to invest locally in cattle or land** when they have a surplus.
 - Many prefer to invest surplus funds in tangible assets, such as cattle or land, which indicates a limited perceived value of DFS beyond immediate consumption benefits.
 - Also, employees have hardly any avenue to use DFS for these local investments.
- Users use DFS only in specific scenarios, such as online shopping, where they can access discounts or cashback.
 - Using DFS only for incentives restricts broader DFS engagement, which reduces overall value perceptions.

Retail service providers enjoy time-saving and convenience factors, but are discouraged by low digital literacy and high fees.

Retail service providers adopt DFS for time savings (18.2%) and convenience (17.9%), supported by smartphone access and digital literacy. However, 44% face barriers due to low digital literacy (16.7%), high fees (15.1%), and limited merchant acceptance (12.4%).




Limited smartphone access, digital literacy, and high cash-out charges hinder DFS adoption among retail service providers.

Accessibility

Some respondents use DFS to repay **BRAC MFI loans**. **However**, they require help from family members or BRAC loan officers due to low digital literacy.

- This dependence shows that device ownership alone is insufficient; 79% have smartphones but cannot operate DFS independently.

Affordability

38% of retail service providers hesitate to use DFS due to **high cash-out charges**.

- The extra cost to convert digital funds into cash discourages usage, especially for those with tight margins.

27% would **use DFS over cash** if they received **incentives**, such as cashback or discounts.

- This suggests that value-added benefits could tip the balance in favor of DFS adoption.



Retail service providers need stronger value propositions and improved trust in DFS to increase the adoption of digital payments in their business.



Reliability

- ✦ **48% of retail service providers** hesitate to rely on DFS. Of these, 71% blame user negligence rather than provider issues or fraud for system unreliability.
 - This indicates that users' low digital literacy and operational errors, such as mis-tapping or poor device handling, are significant barriers.
- ✦ **30% of retail service providers** indicated they prefer in-person transactions and find “**faceless**” transactions unsafe.
 - The desire for human interaction reflects the concerns about the impersonal nature of digital systems.

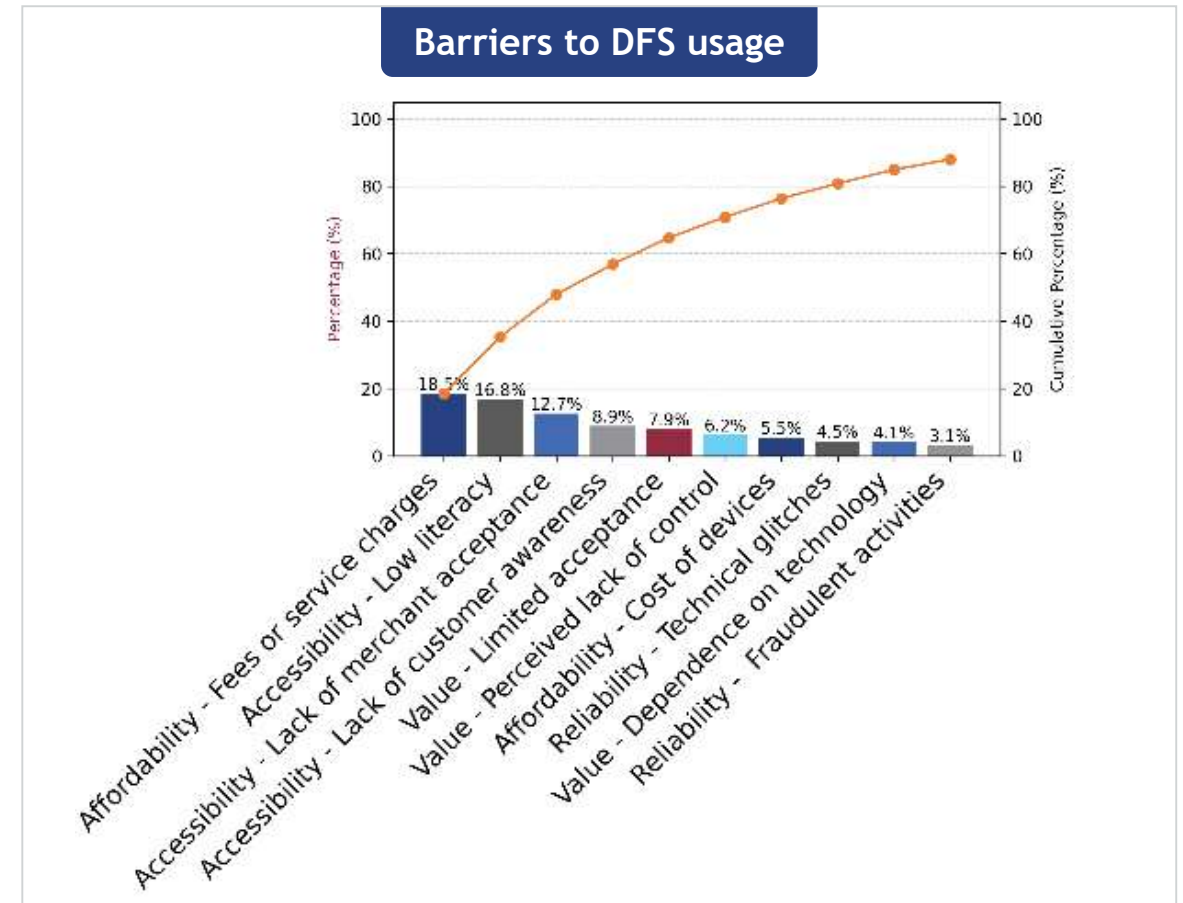
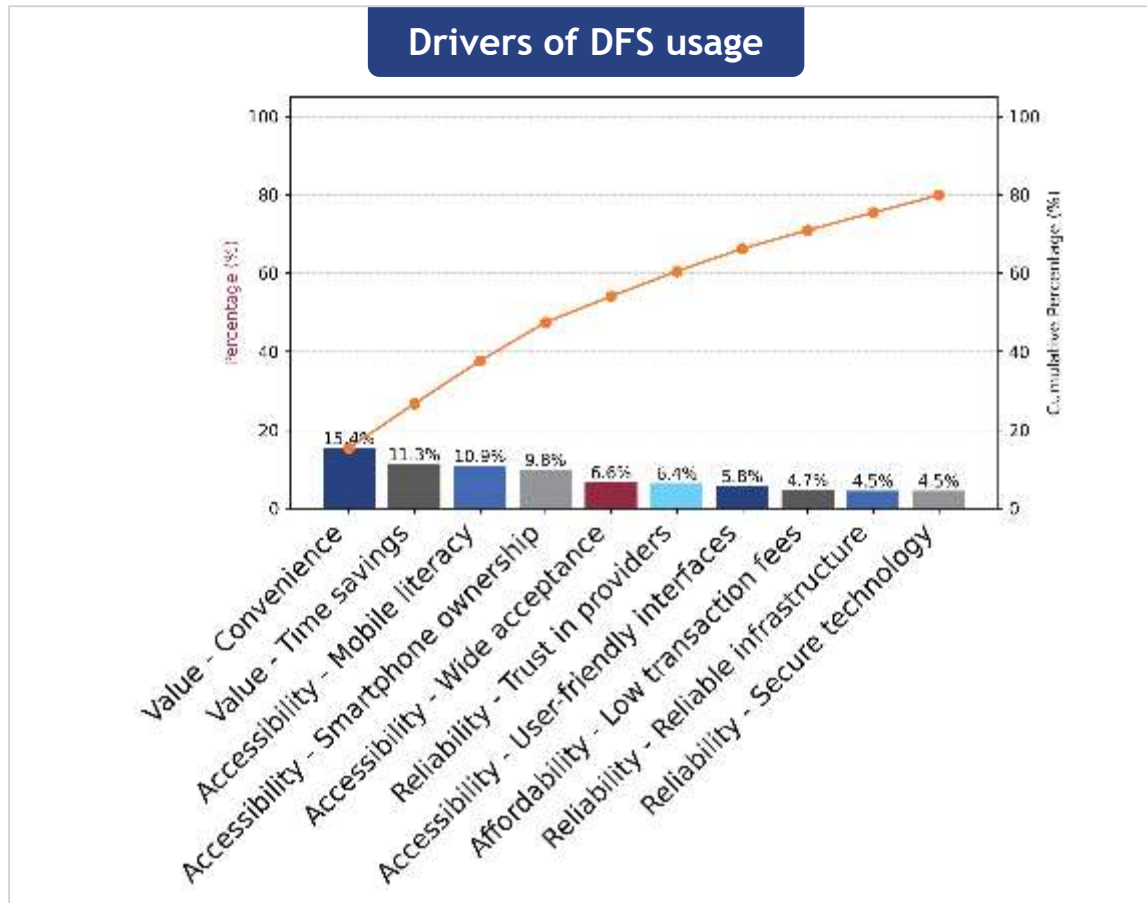


Value

- ✦ **55% of retail service providers** see the **low usage of DFS among customers** as a major barrier. They **fear the loss of customers to competitors** who offer cash payments.
 - If customers predominantly use cash, the adoption of digital payment can drive away a significant customer base to competitors who only accept cash.
- ✦ **Only 10% of retail service providers** find DFS profitable for business use, compared to **82% who find DFS valuable for personal use**.
 - This split indicates that while personal benefits exist, the business case is weak without broader customer adoption.

Retail traders value DFS for convenience but are held back by MDR, fees, and low digital literacy.

Retail traders appreciate DFS for its convenience (15.4%), time-saving (11.3%), and supportive mobile literacy and ownership. However, they face significant barriers in the form of steep service charges (18.5%) and low digital literacy (16.5%) that hinder usage.



Limited DFS infrastructure, cash reliance, and profitability concerns hinder digital payment adoption among retail traders.



Accessibility

- 73% of retail traders own smartphones.
 - Despite high smartphone ownership, most retail traders still hesitate to adopt merchant accounts for digital payments.
- 37% of retailers do not use digital payments because distributors prefer cash payments.
 - Distributors handle large cash transactions and fear tax scrutiny from digital records. So, they encourage retailers to use cash instead of DFS.
 - This reinforces the ecosystem barrier. When key players in the value chain remain cash-focused, retailers lack the incentive to switch.



Affordability

- 58% of retailers believe DFS lacks profitability due to the high merchant discount rate (MDR).
 - Excessive fees reduce profit margins.
- Many retailers who also operate as CICO agents request their customers to use cash-out instead of the payment option. This is to avoid paying MDR and earn commissions on cash-out.
 - The incentive structure currently favors cash transactions, which further reduces DFS attractiveness.
- Long settlement periods with providers disrupt cash flow.
 - Delayed fund availability hampers liquidity, which affects business operations.



Retail traders require secure, seamless, and profitable DFS to adopt them.



Reliability

- 32% of retail traders do not trust DFS due to fear of fraud or transaction failures.
 - Past negative experiences or risk perceptions discourage reliance on digital systems.
- Retail traders prefer cash transactions for immediate liquidity. 15% of retail traders feel that digital payments reduce their control over their liquidity, often due to delays in settlements or issues with tracking payments.
 - Cash transactions appeal more to users as they provide immediate clarity. Trust in digital financial systems is essential, as any breach in trust can greatly hinder the adoption of DFS.
- Negative experiences, such as **alleged bribery demands** from local government banks, **reduce trust** in formal banking and DFS channels.
 - Such incidents deepen distrust in DFS and banking channels.

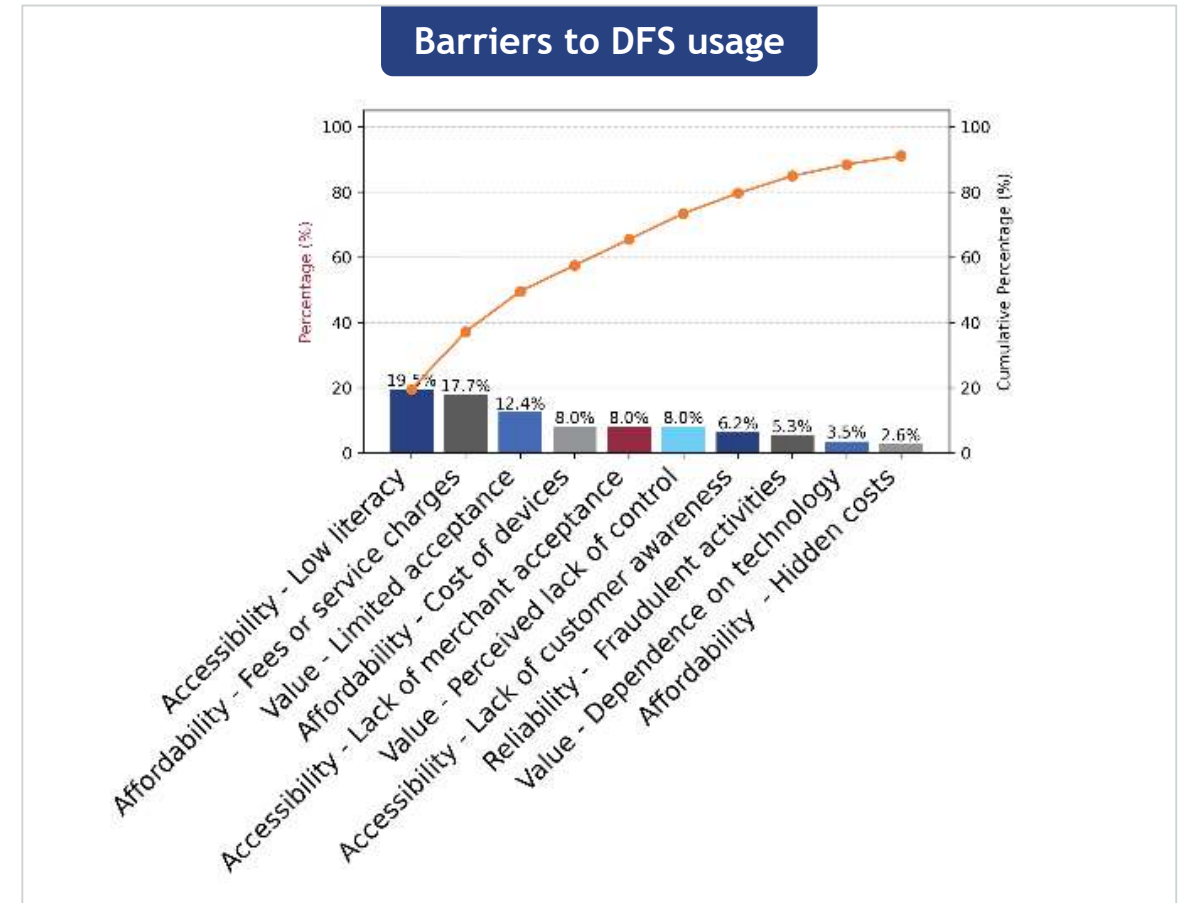
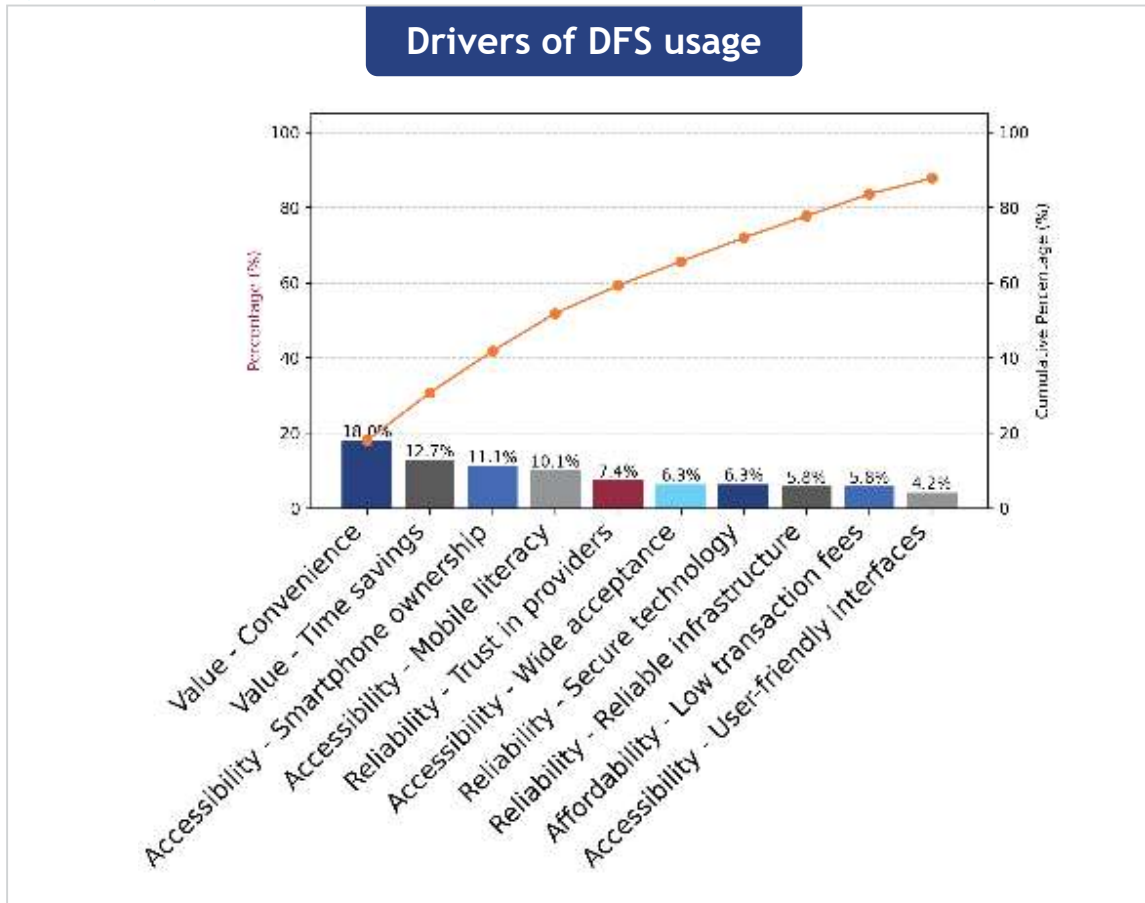


Value

- 63% of retail traders acknowledge the benefits of DFS, but they seek more security assurances.
 - Users see potential but require secure safety measures to commit fully.
- 31% experienced that promotions, such as cashback and discount offers, **increase DFS adoption**.
 - Incentive-driven campaigns can temporarily enhance usage, which suggests potential for targeted promotions.
- 80% of retailers with Bangla QR reported that the provider did not brief them on its **cost structure, usage, and benefits**.
 - Poor onboarding and a lack of clear guidance reduce the perceived value of DFS.

Low literacy and high charges restrict unemployed individuals from using DFS.

This segment finds DFS attractive for convenience and time savings, with digital access contributing to more than 50% of usage drivers. However, adoption is limited by low literacy (19.5%), high fees (17.7%), and limited acceptance (12.4%).



Providers can use the unemployed segment's high internet usage and education levels to drive DFS adoption.



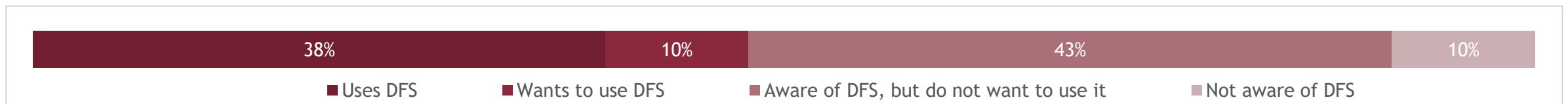
Accessibility

- 77% of the unemployed segment includes homemakers with no source of income.
 - They rely on male family members for financial transactions, which limits their direct exposure to DFS. In rural areas, cultural norms further restrict women's interactions with men and make it difficult for them to engage with DFS agents or merchants.
- Cultural norms in rural areas
 - These sociocultural factors restrict exposure to DFS despite high internet usage.



Affordability

- Without independent income, unemployed individuals often follow instructions and fail to consider affordability a personal concern.
- In traditional households, male members typically make financial decisions—what, where, and how to spend.



*The unemployed segment includes homemakers, returnee migrant workers, and individuals not engaged in any income-generating activities.

Providers should address security concerns and expand use cases for women to better serve remittance recipients.



Reliability

- ✦ **19% of remittance recipients** receive foreign remittance in their **bank account**, and **29%** receive remittance through **MFS**.
 - Despite the availability of digital channels, most remittance recipients still prefer the informal (*hundi*) channels.
 - Limited trust in digital systems, a preference for immediate access to cash, and a lack of familiarity with banking or MFS platforms contribute to this trend.
- ✦ **42% of remittance recipients fear scams and fraud**, which makes them reluctant to engage with DFS.
 - Security concerns persist even among relatively educated users, which limits DFS adoption.

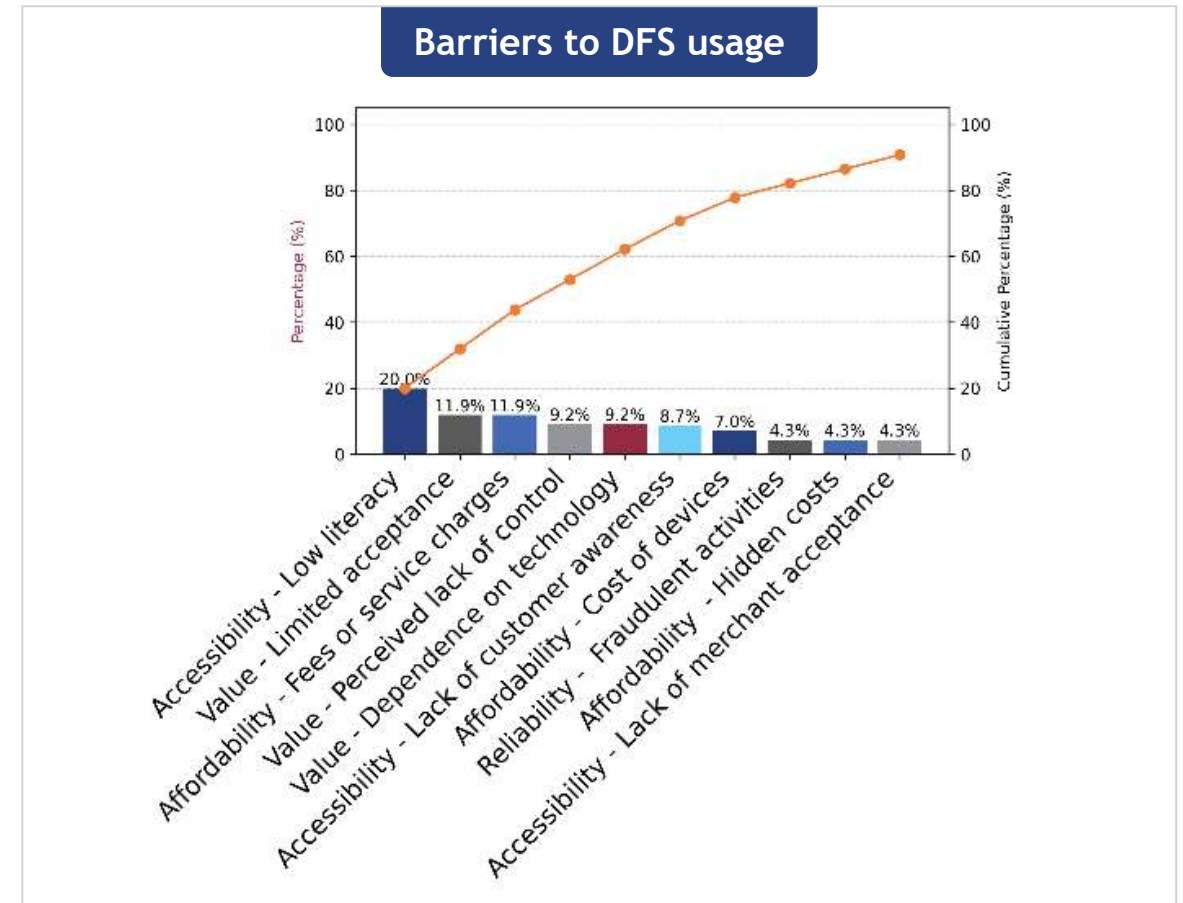
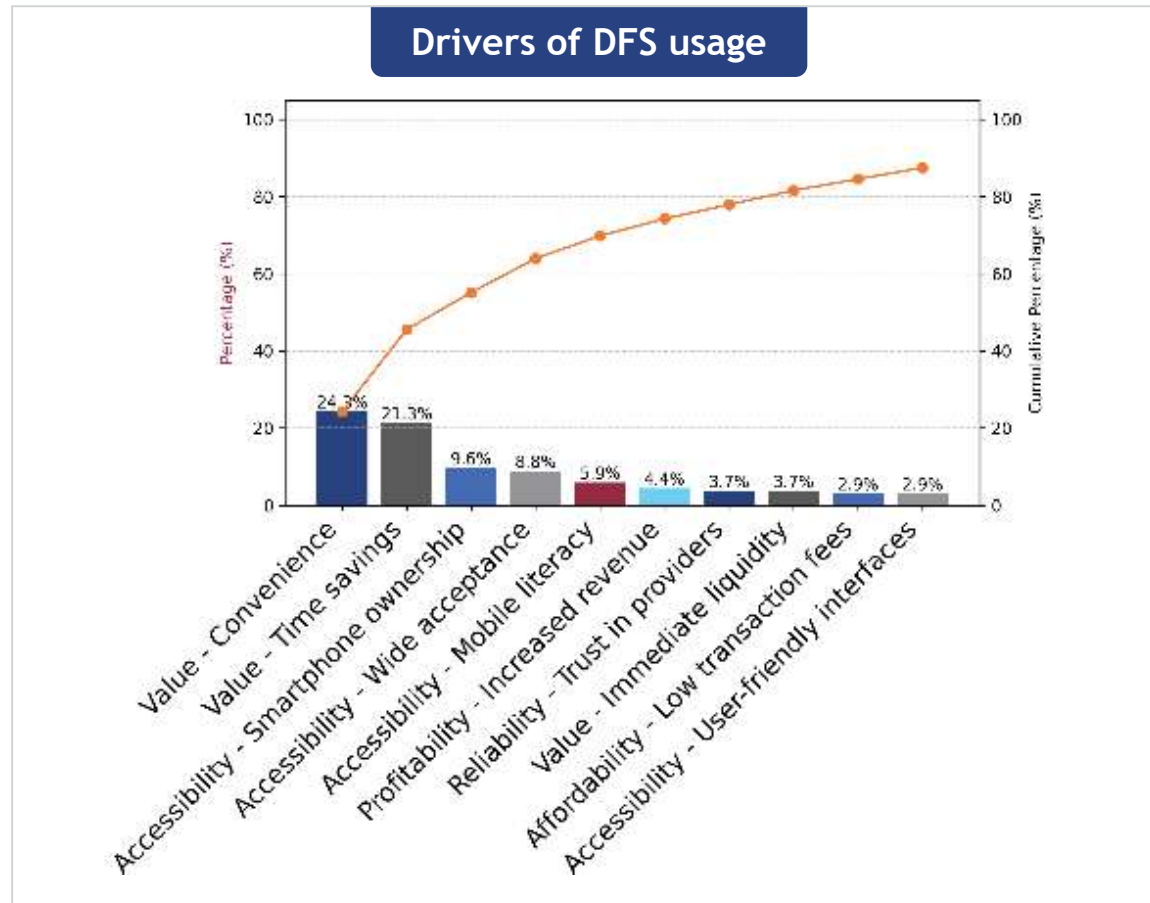


Value

- ✦ **62% of remittance recipients** find DFS useful for **receiving remittances or stipends**. They appreciate the convenience, speed, and ease of remote payment.
 - For remittance recipients, DFS clearly offers tangible benefits they recognize and value.

Restaurant owners are slow to adopt DFS due to low digital literacy, a lack of acceptance of their vendors, and high MDR.

Restaurant owners primarily adopt DFS for convenience (24.3%) and time savings (21.3%). Yet, low digital literacy (20%) and concerns over acceptance (11.9%) and service charges (11.9%) limit their use of DFS.



Cash dependence, costly fees, and low awareness limit digital payment adoption among restaurant owners.



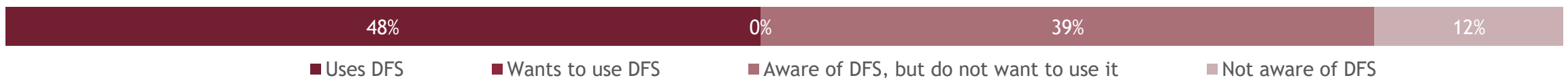
Accessibility

- Restaurant owners prefer payments in cash.
 - This established cash usage leaves little room for DFS adoption in many restaurants.
- Among those who accept payments through digital channels, **only 11% of their total revenue** comes from digital payments. Meanwhile, **60% are transacted through their personal MFS accounts**.
 - This indicates that digital payments still play a minor role in their overall income. Restaurant owners mainly rely on personal MFS accounts rather than merchant accounts.
 - As a result, their ability to fully tap into efficient, scalable DFS is restricted, which makes them largely dependent on cash transactions.
- 54% are still unaware of the costs of digital payments** through merchant accounts.
 - A lack of cost transparency restricts informed adoption of DFS among restaurant owners.



Affordability

- 51% of restaurant owners** perceive DFS as costly due to **high cash-out fees**.
 - The perceived cost depends on whether restaurant owners accept payments through merchant accounts (an average of 1.2% MDR) or personal MFS accounts (1.85% cash-out fee).
 - Since 60% of digital payments go through personal MFS accounts rather than merchant accounts, restaurant owners pay higher fees, which reinforces the belief that DFS is expensive.
- They discourage digital merchant payments to protect their **profit margins** from the MDR. They suggest MDR can be 0.1%-0.3%.
 - The sensitivity to MDR indicates that fee structures must be reduced significantly to expand DFS adoption.



Restaurant owners need transparent and value-driven DFS solutions with lower MDR to increase trust and DFS adoption.



Reliability

- ✦ 57% of restaurant owners distrust DFS due to the fear of fraud or technical glitches during transactions.
 - Negative experiences and uncertainty about transaction integrity have led to a reluctance to adopt DFS.
- ✦ A few lost trust in DFS after they experienced bank service charges that wiped out dormant account balances.
 - Such incidents highlight the need for more reliable and transparent fee transaction systems.

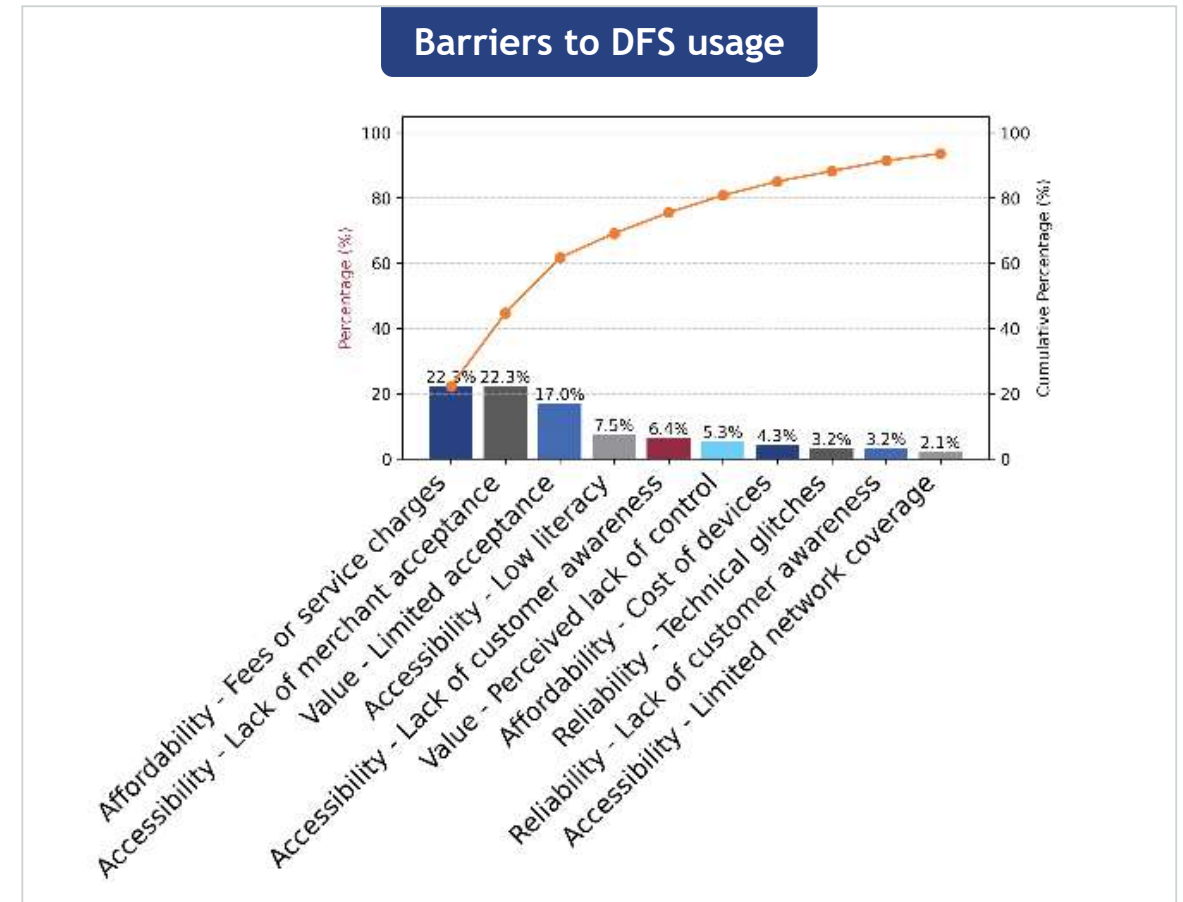
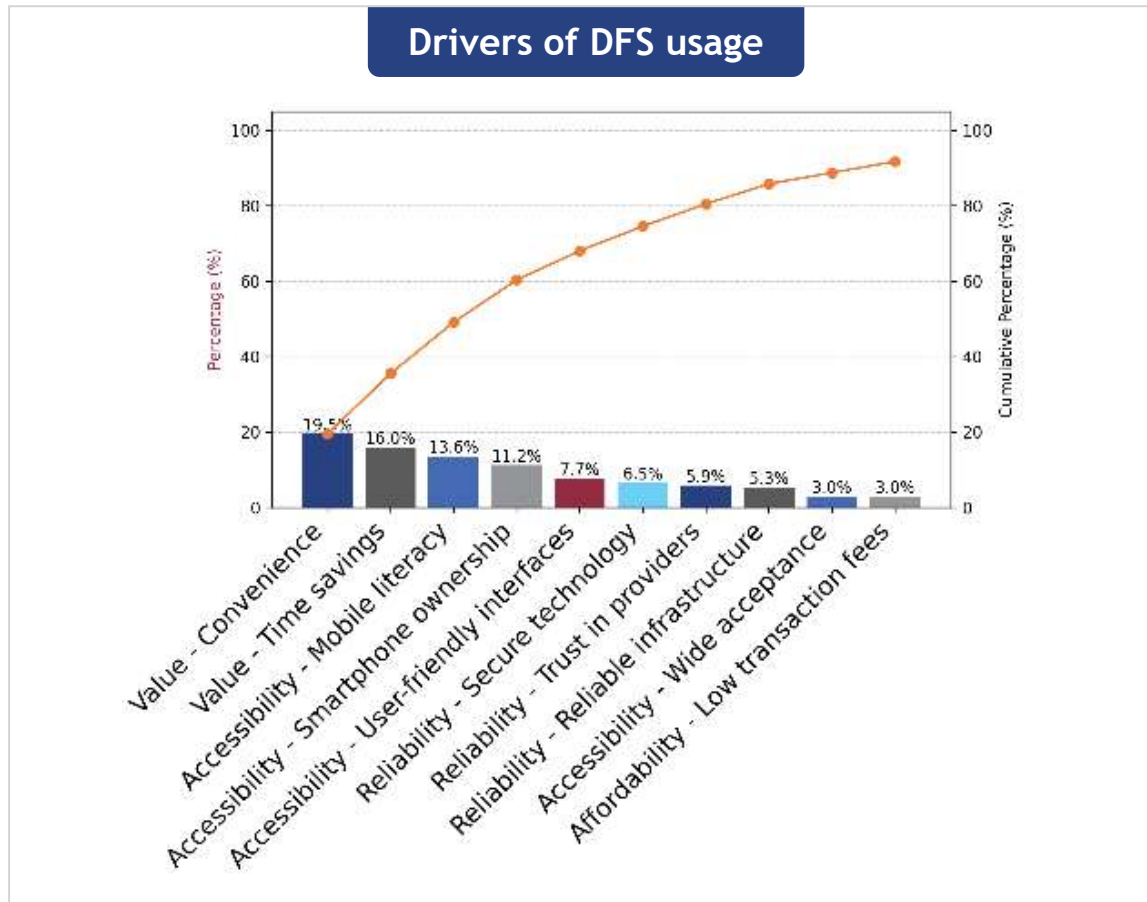


Value

- ✦ 72% of restaurant owners see value in DFS for personal use, but only 12% of them see its value for their business.
 - This disparity indicates that while individuals may appreciate certain DFS benefits, the business case is restricted without improvements in reliability and cost.
- ✦ Some restaurants accept low-value digital payments (for example, BDT 50 USD 0.40).
 - Small-value digital transactions show promise but remain insufficient to shift overall business practices.
- ✦ Restaurant owners prefer direct transfers to their personal bank accounts over digital payment options for large orders or events due to high MDR.
 - High MDR and the absence of real-time settlement discourage using DFS for significant transactions.

40% of students find it difficult to use DFS due to a lack of acceptance, while 22% are deterred by transaction costs.

Students adopt DFS for convenience (19.5%) and time savings (16%), supported by mobile literacy (13.6%) and smartphone access (11.2%). However, usage is hindered by high service charges (22.3%), limited merchants (22.3%), and digital acceptance (17%).



A lack of NID and high cash-out charges hinder students' access to DFS.



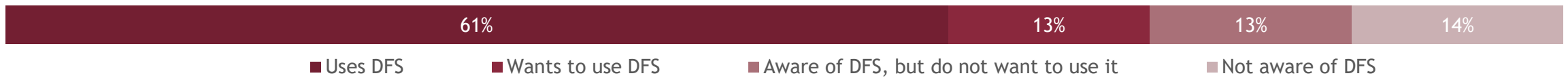
Accessibility

- 43% of students lack personal MFS accounts and often use their parents' accounts when needed.
 - Dependence on parental accounts restricts autonomy and discourages regular use of DFS.
- 39% of students cannot open an MFS account because they lack an NID.
 - Document and age requirements are an entry barrier to young users, which limits their access to DFS.
 - Providers, such as bKash, have introduced student accounts for teens aged 14-18, with reduced transaction limits to ensure consumer protection of children. Students can open this account with their birth certificate, which eliminates the need for an NID. This is a positive step toward digital financial inclusion of the youth. Other providers can adopt such a model.



Affordability

- 39% of students find cash-out charges too high.
 - High fees are particularly burdensome for students with limited budgets.
- 30% consider their pocket money to be low, which makes DFS unaffordable.
 - When cash inflow is minimal, even small fees represent a large proportion of available funds.
- Students propose **cost-sharing models**, such as an equal split of fees on Bangla QR for merchants and customers, to make DFS **adoption more viable**.
 - Collaborative fee models could make DFS more financially viable for low-income users.



Students need reliable DFS that provide more functionality and targeted incentives to build trust and expand usage.



Reliability

- ✦ 26% of students face failed transactions or delayed confirmations, which creates trust issues with DFS.
 - Inconsistent performance undermines confidence, which is crucial for a demographic that values immediacy of transactions.

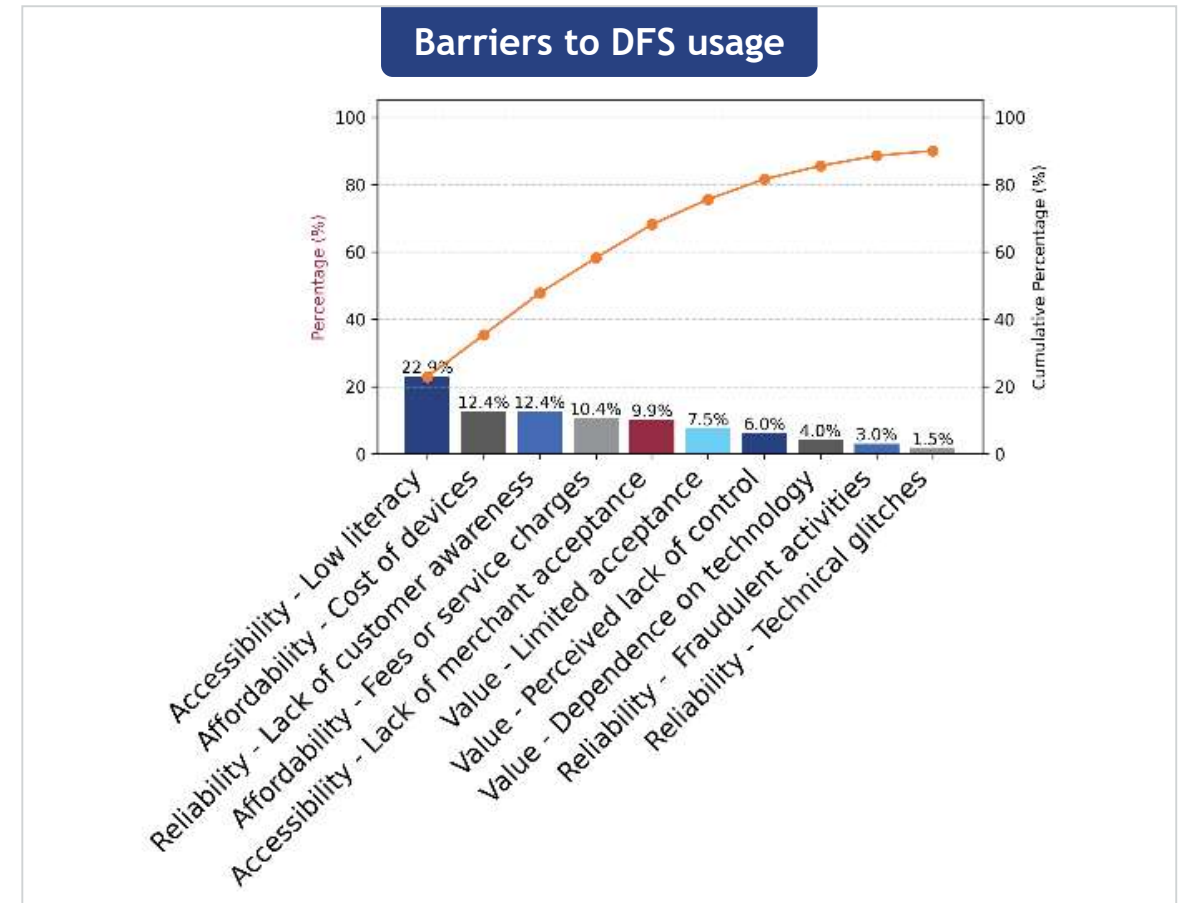
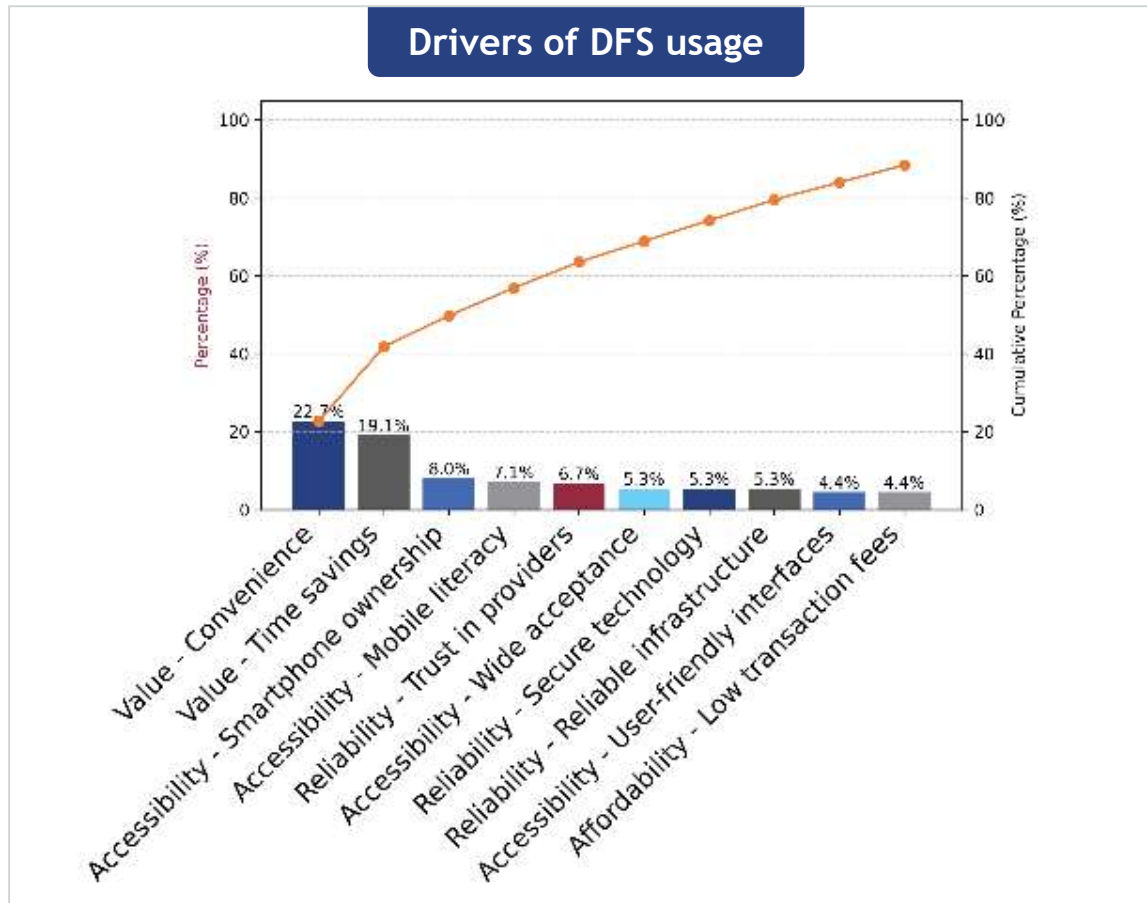


Value

- ✦ 65% of students find DFS more convenient to receive money from relatives. However, they do not see broader value beyond cash withdrawals.
 - While DFS is useful for transferring pocket money, students are yet to recognize its overall utility in daily financial management.
- ✦ Some students view DFS as a pathway to financial independence, especially for those who freelance.
 - This group sees potential long-term benefits, which could be harnessed with improved product features.

Artisans avoid DFS due to low literacy, inability to afford the high cost of devices, and a general lack of awareness.

Artisans adopt DFS for convenience (22.7%) and time savings (19.1%), supported by trust in providers and smartphone access. However, more than 58% face barriers, such as low literacy (22.9%), device cost (12.4%), lack of awareness (12.4%), and high fees (10.4%).



Low literacy, poor connectivity, and high costs hinder digital payment's accessibility and affordability for artisans.



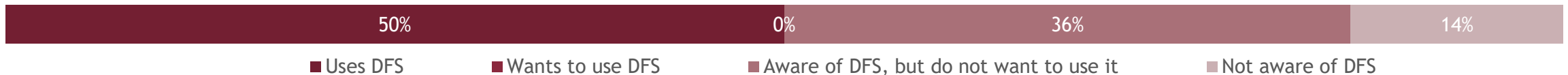
Accessibility

- 64% cite low literacy as a barrier to digital payment.
 - Limited literacy restricts artisans' ability to understand digital interfaces, instructions, and transaction processes. This makes DFS usage complex and prone to errors.
- Only 16% of internet users among artisans have a strong connection.
 - Poor network quality leads to slow or interrupted transactions. This discourages artisans from the use of digital systems that require stable connectivity.
- Artisans use **agent-assisted DFS services**, which leads to **opportunity costs from repeated visits**.
 - A reliance on intermediaries means additional opportunity costs for each transaction. This reduces DFS's efficiency and increases the overall cost.



Affordability

- 36% find **cash out charges** too high, and do not find DFS efficient enough to justify the costs.
 - High fees, especially to convert digital funds to cash, make DFS more expensive than its benefits. These expenses discourage DFS usage among artisan businesses that run on low margins.
- Artisans pay **informal fees**, such as extra charges, to merchants who use personal wallets.
 - These unofficial costs add to the financial burden and reduce the net value of DFS for artisans who already operate on tight budgets.
- 41% find **smartphones costly**.
 - Many artisans find the smartphones required for DFS too costly. This limits their direct engagement with DFS.



Artisans need reliable DFS with enhanced security, transparency, and incentives to switch from cash.



Reliability

- ✦ 41% of artisans view DFS as risky due to **delayed transaction confirmations** and **system outages**. They are also concerned about alleged corruption by bank staff in the local branches.
 - Artists do not trust DFS for timely financial transactions. Unpredictable delays and technical failures undermine their trust in DFS.
- ✦ 27% feel that DFS transactions are **more susceptible to fraud** than cash.
 - Artisans fear potential financial losses. Concerns about fraud and the perceived security of physical cash lead to a reluctance to adopt digital methods.

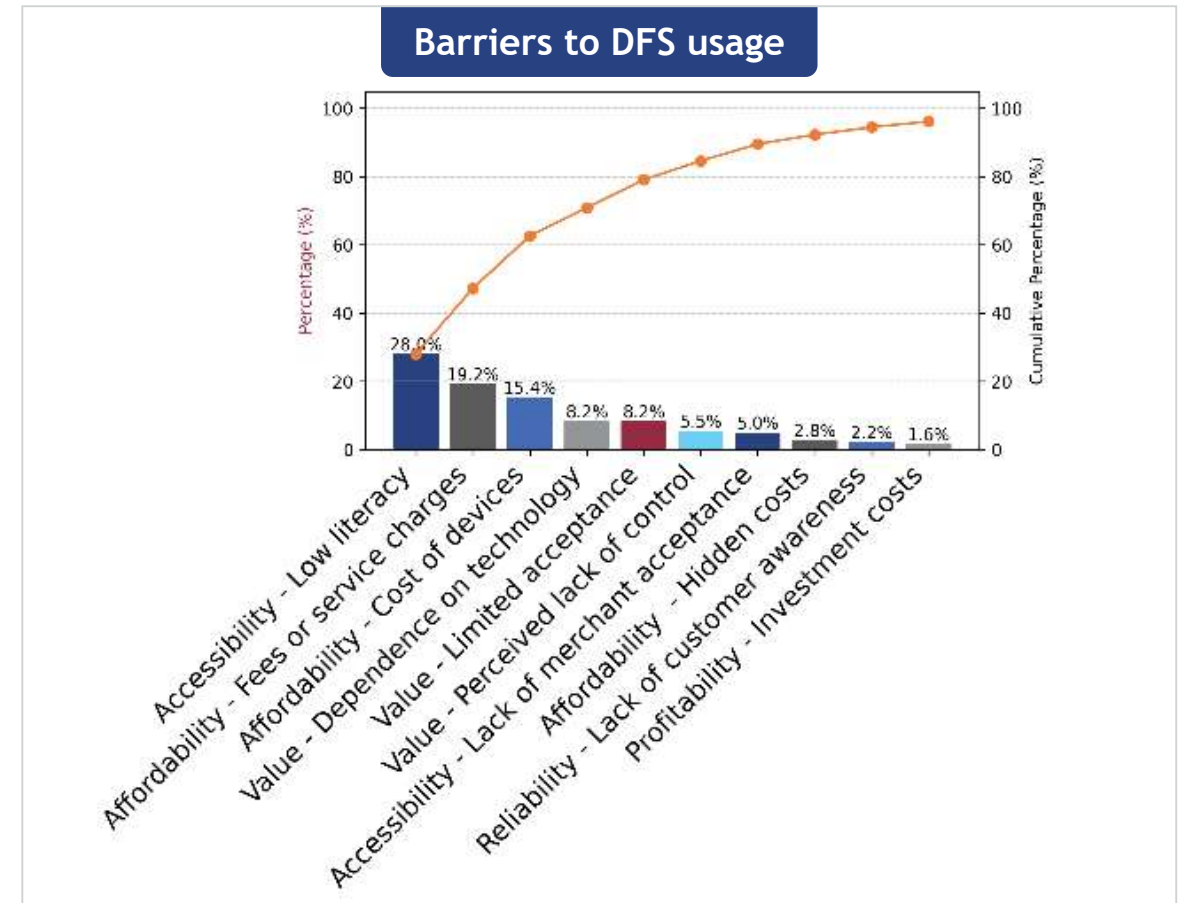
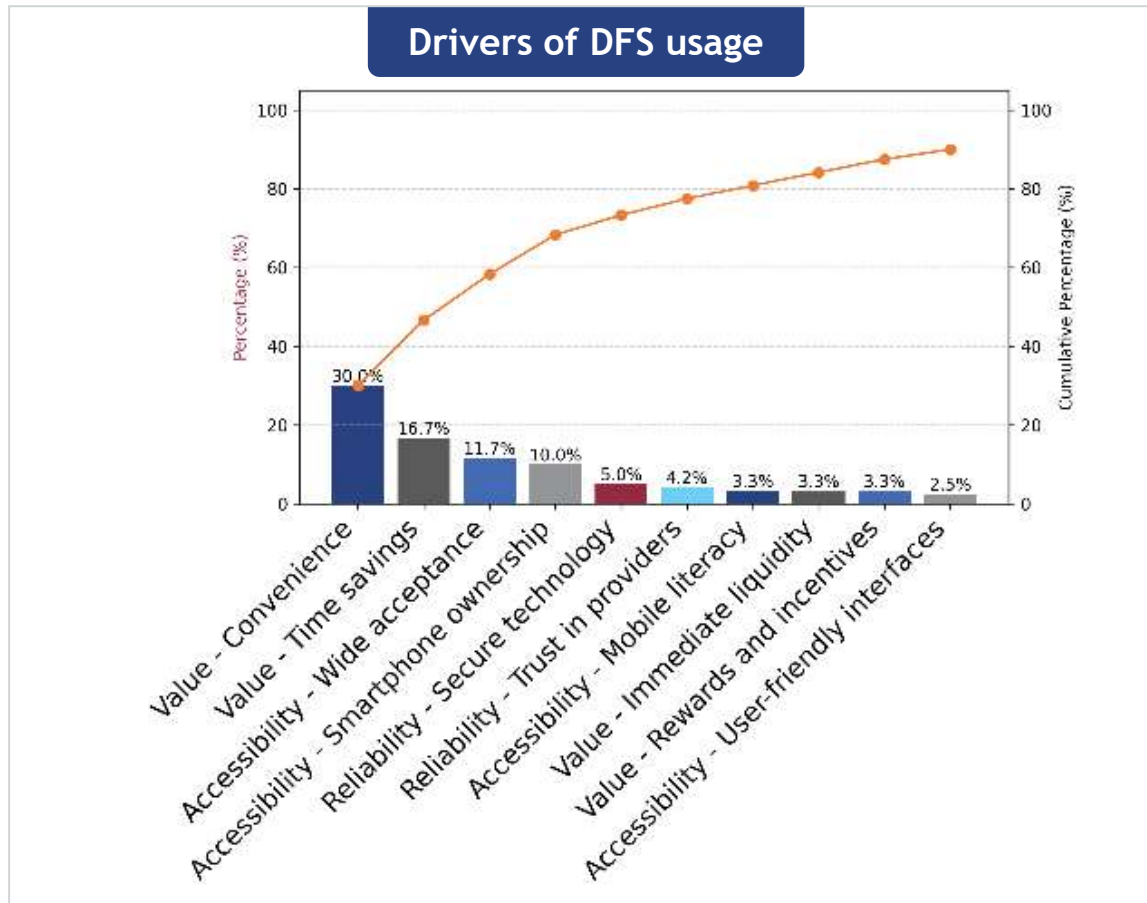


Value


- ✦ 36% value DFS due to the **convenience** when they lack cash or need to send money remotely.
 - Many artisans choose DFS only in specific situations, such as during emergencies or for remittances, rather than as a comprehensive financial tool.
- ✦ 27% value local **digital payment acceptance**, and 18% use DFS to receive buyers' payments. Aarong is a good example of this.
 - A nominal proportion of artisans benefit from localized digital payment options. The total value proposition is limited because most local networks and buyers do not yet support or recognize DFS.
- ✦ Artisans are yet to recognize other values of DFS.
 - The broader benefits, such as improved recordkeeping, access to credit, or integrated financial management tools, are largely unappreciated. This prevents DFS adoption.

Daily wage laborers fail to secure DFS access due to the high cost of the device, transaction charges, and digital illiteracy challenges.

30% of daily wage laborers are highly motivated to adopt DFS due to its convenience. 16.7% want to adopt DFS due to its speed. However, they cannot avail DFS due to low literacy, high fees, and additional expenses. 28% have low literacy, 19.2% cite high fees, and 15.4% cite high cost of devices as barriers to adoption.



A lack of digital income and high fees prevent daily wage laborers from the use of digital payments.

Accessibility

17% of daily wage laborers have a bank account. 33% have an MFS account. 33% use smartphones. 33% use the internet.


- These numbers indicate that only a small fraction of daily wage laborers are integrated into the formal digital ecosystem. Most of them lack even basic financial accounts or connectivity. They have minimal capacity to access DFS.

All daily wage laborers rely on cash for daily expenses as they do not receive income digitally.

- Since laborers receive cash payments, they have little opportunity or incentive to transition to digital channels. The lack of digital pay channels creates a self-reinforcing cycle in which DFS remains underutilized.

Many merchants do not accept digital payments.

- Daily wage laborers primarily shop at cash-only businesses. This ecosystem discourages DFS use and reinforces their reliance on cash.

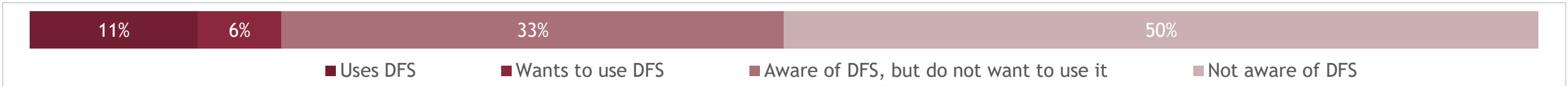
Affordability

50% see high cash-out fees and transaction charges as barriers.

- High fees to cash out digital funds directly erode the already thin earnings of daily wage laborers. DFS is an expensive alternative for them.

Merchants charge extra for the cost of digital payments.

- Some merchants pass on merchant fees to customers, which adds extra unofficial charges. These costs discourage DFS usage and outweigh the benefits.



Daily wage laborers see DFS as unreliable, which compels most users to rely on cash or use DFS only in emergencies.



Reliability

- ✦ Fear of fraud and loss of control over funds reduces trust in DFS.
 - Users have concerns over potential fraud or mismanagement. For example, they fear funds will not be credited in time. These concerns contribute to a pervasive distrust and keep users tied to the tangible certainty of cash.
- ✦ **40% find DFS platforms unreliable due to delayed transaction confirmations and failures at agent points.**
 - Frequent delays in transactions, completion, and settlements undermine confidence in digital systems. Unreliability is a major barrier when workers rely on timely access to funds.

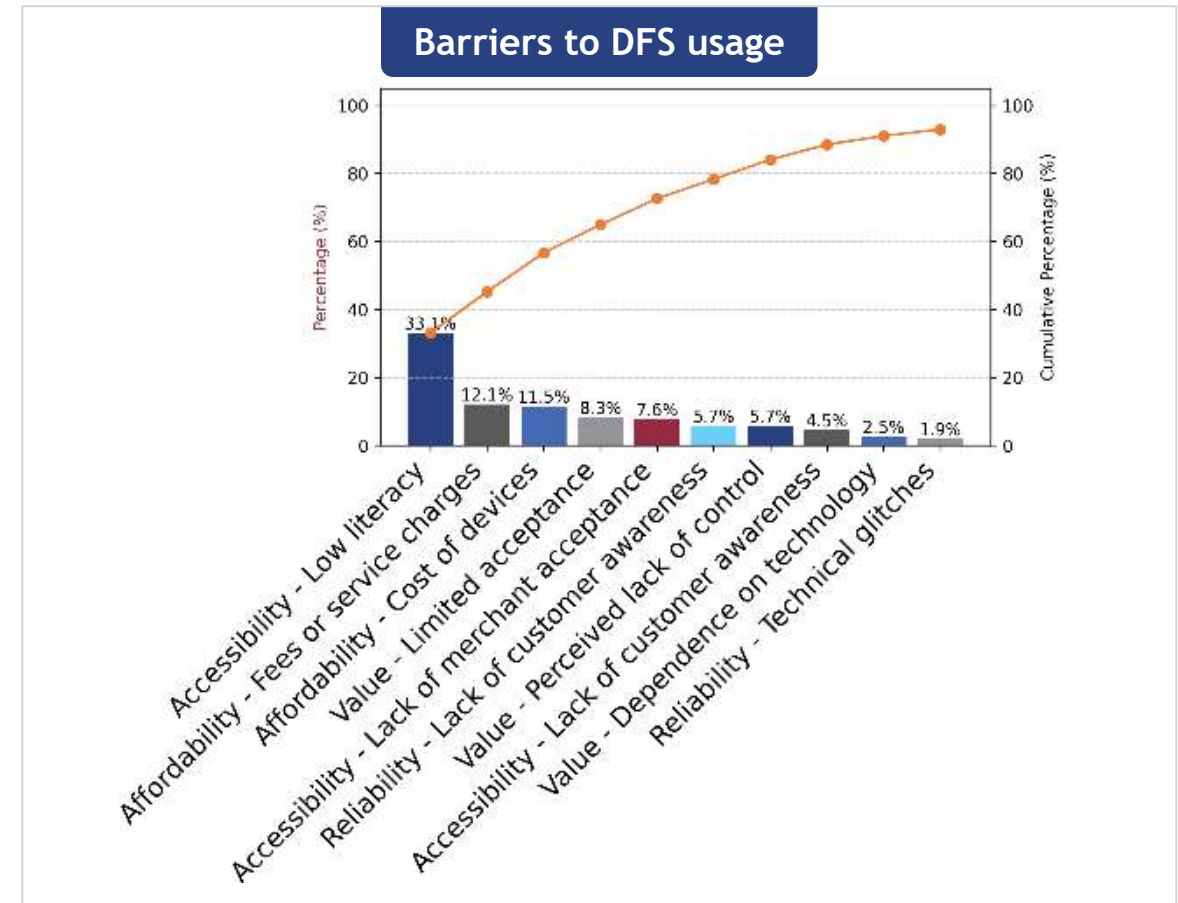
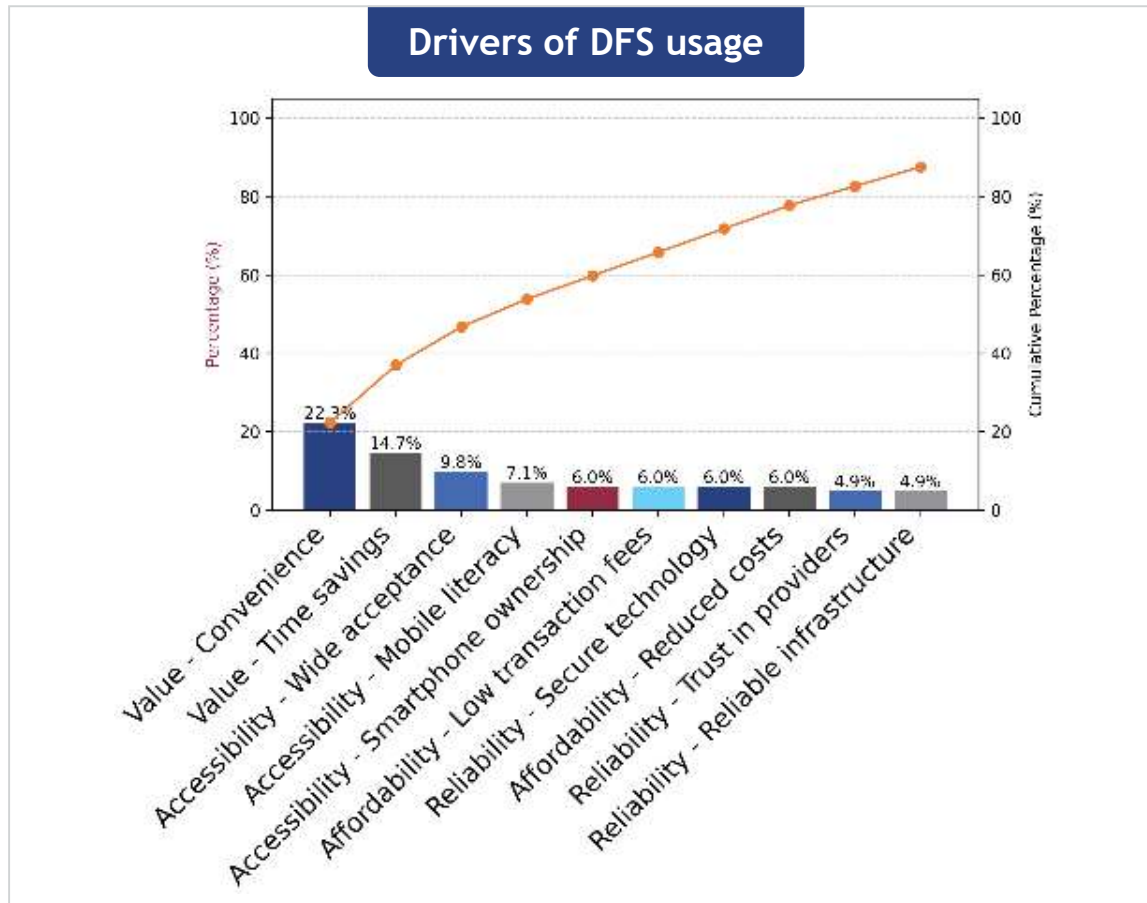


Value

- ✦ **28% find DFS a useful option to receive remittances.**
 - Some users rely on DFS to receive money from relatives or employers. However, this limited function does not extend to everyday transactions.
- ✦ **80% of users rely on DFS only in emergencies.**
 - DFS is seen as a backup option rather than a primary payment method. This highlights its limited perceived usefulness in routine financial management.
- ✦ **33% do not want to use DFS and rely on cash for simplicity and familiarity.**
 - Cultural and habitual preferences for cash persist due to its straightforward nature and long-standing use. Many laborers do not want to switch due to these traditional reasons.

Gig workers struggle to access DFS due to low literacy, and find it unaffordable due to high service charges and device cost.

Gig workers lean on DFS for its convenience (22.3%) and time-savings (14.7%). However, a major barrier remains low literacy (33.1%), compounded by service charges (12.1%) and device cost concerns (11.5%) that limit their full adoption.



Low DFS acceptance, high cash-out fees, and income constraints hinder digital payment adoption among gig workers.



Accessibility

- 30% of gig workers immediately withdraw digital earnings due to **low DFS acceptance** among local vendors.
 - As vendors rarely accept digital payments, gig workers must quickly convert earnings to cash. This process damages the motivation to hold digital funds.
- 93% prefer cash for large transactions, such as electronics and rental payments. They **never have enough digital balance in their bank or MFS account**.
 - Gig workers' inability to build or maintain sufficient digital balances for high-value transactions forces them to rely on cash.
- 21% say their **clients lack DFS access or awareness**. This reduces the demand for digital transactions, and they hesitate to consider DFS options.
 - When clients, such as service recipients, cannot use DFS, gig workers are less motivated to use or promote it.



Affordability

- 45% cite **low earnings as a barrier** to DFS usage.
 - Limited income means that even modest cash-out or transaction charges represent a substantial proportion of their earnings.
- 18% consider high cash-out fees as a major deterrent.
 - When fees consume a significant share of low earnings, DFS becomes financially unattractive.



Gig workers need secure, seamless, and rewarding DFS to shift from cash-based transactions.



Reliability

- ✦ 42% find DFS **too risky** due to their literacy limitations, as they lack formal education.
 - Limited understanding increases the perceived risk of errors or fraud, which reduces trust in digital platforms.
- ✦ 24% lack trust in DFS for external reasons and fear **fraud or system failures**.
 - Broader concerns about system stability and security further discourage DFS adoption.

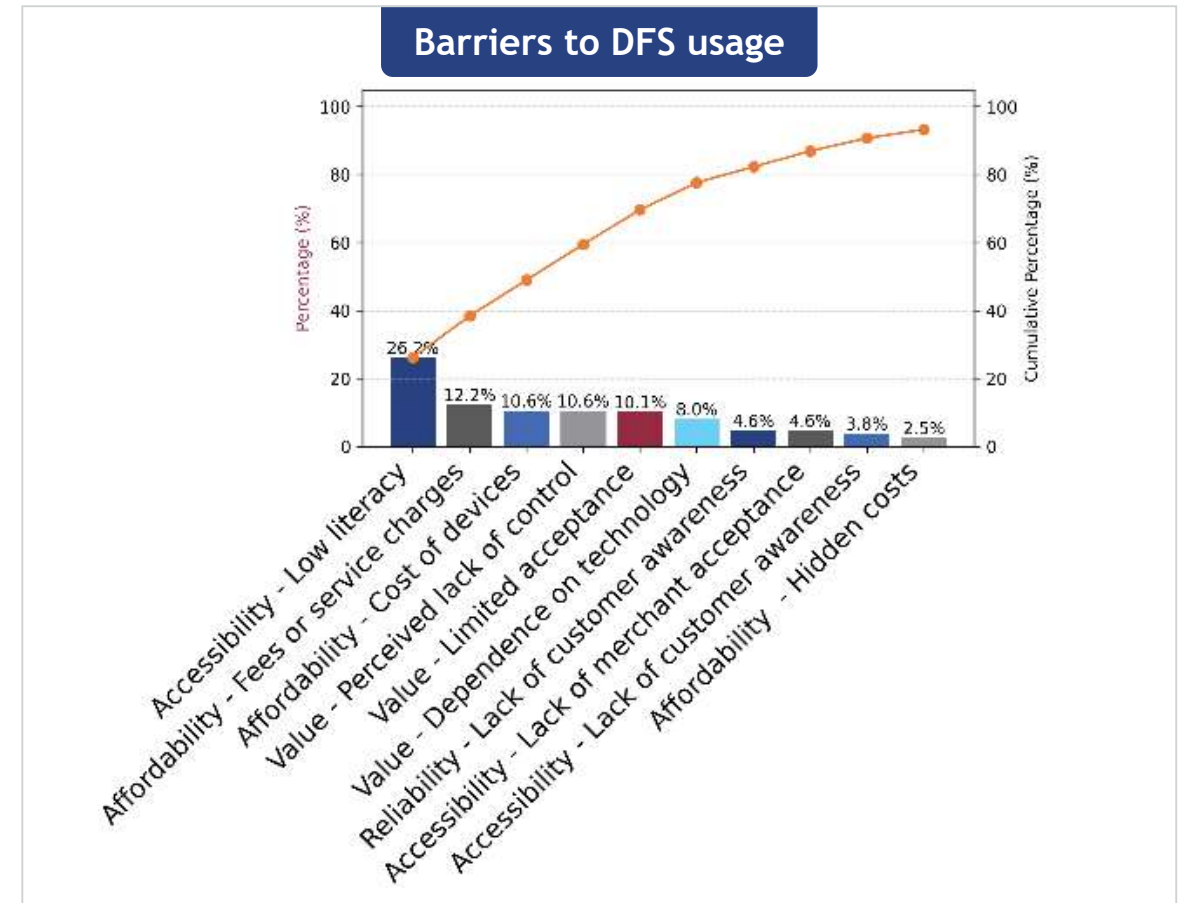
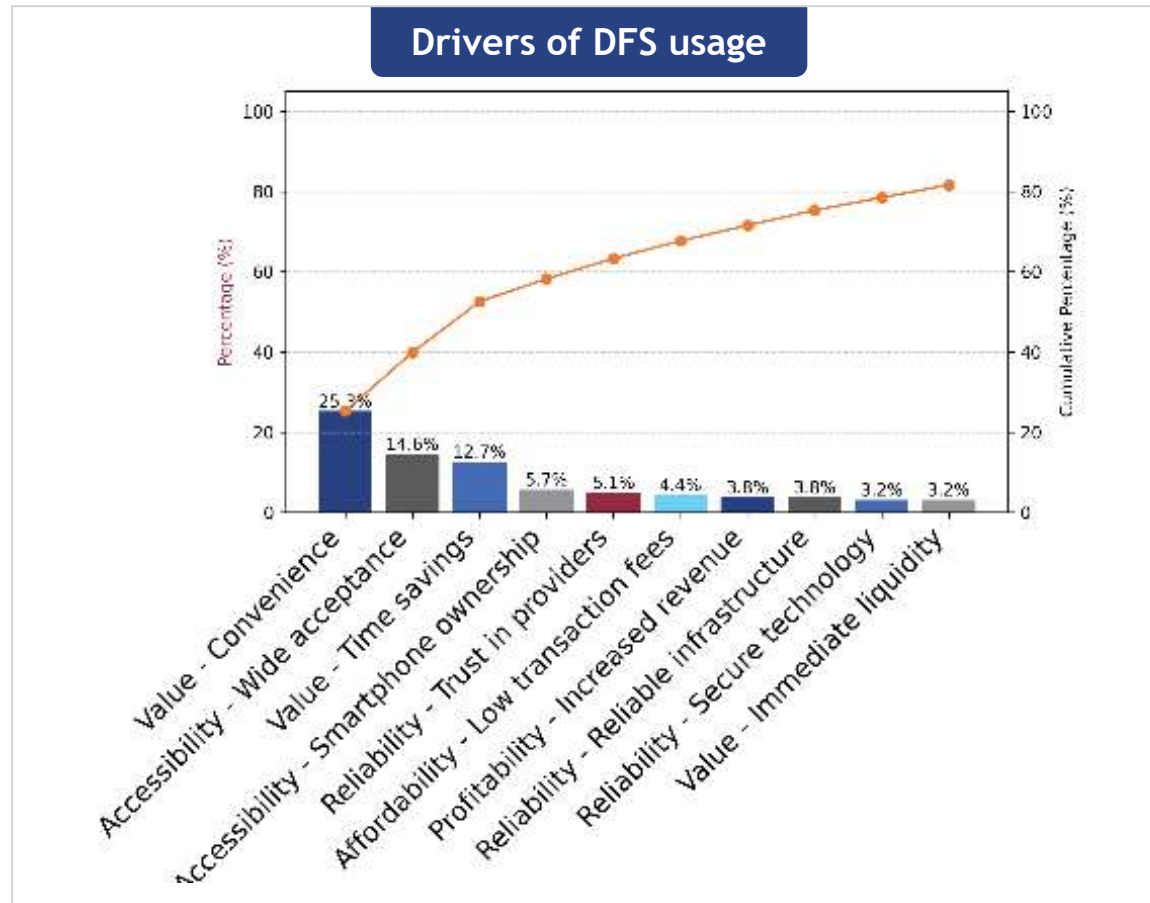


Value

- ✦ 45% see **no value in the use of DFS over cash**.
 - Without clear additional benefits, gig workers comfortable with cash find little reason to switch to DFS.
- ✦ **Low ticket sizes of BDT 50-100 (USD 0.40-0.80)** reduce DFS's appeal for daily operations among 21% of gig workers.
 - For small transactions, the cost and effort of using DFS outweigh its benefits.
- ✦ 24% cited **religious beliefs** as a reason they avoid formal financial systems, which include DFS.
 - Cultural and religious factors can lead to a preference for informal, cash-based systems and bypass the existing formal financial system.

Farmers find low literacy, high transaction costs, and expensive devices to be barriers to DFS adoption.

Farmers adopt DFS primarily for convenience (25.3%), supported by acceptability and reliability. However, 60% face barriers, such as low literacy (26.2%), service charges (12.2%), device costs (10.6%), and lack of control (10.6%).



High cash-out fees, seasonal income cycles, and a lack of market acceptance of digital payments limit farmers' adoption of DFS.



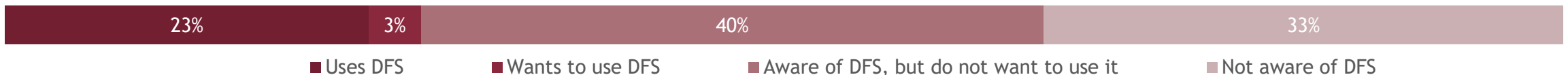
Accessibility

- 39% of farmers lack formal education. They find DFS tools complex to use.
 - Lower educational levels limit the understanding and navigation of digital tools, which makes DFS interfaces appear complex and intimidating.
 - Complex user interfaces and multi-step procedures discourage farmers, who may prefer simple, direct cash transactions.
- 50% lack smartphones.
 - Half of farmers do not own a smartphone, so the primary device for DFS access is unavailable, which directly limits digital adoption.
- Many farmers are unaware of existing loan products, due to poor communication from providers.
 - A lack of effective outreach means useful DFS products, such as AB Bank's Smart Agri Loan or *Ekti Bari Ekti Khamar*, remain unknown, which further limits adoption.



Affordability

- Farmers' income is irregular due to seasonality.
 - The unpredictable cash flow makes it difficult for farmers to commit to any system that involves fixed or recurring fees, which makes high DFS costs prohibitive.
- 33% of farmers highlighted that high cash out fees in MFS are a significant barrier to their usage.
 - These fees can significantly lower their limited and variable income, which reduces the attractiveness of digital payments.
- Farmers suggested cash-out fees can be reduced from 0.5% to 1%.
 - Their feedback indicates that DFS might become a more viable option if transaction fees were lower.



Fear of fraud and corruption, delayed payment confirmations, and limited awareness of DFS incentives are key barriers to farmers' DFS adoption.



Reliability

- ✦ **46%** are concerned about system outages, especially during **critical harvest seasons**.
 - During harvest or other peak season, any downtime in DFS can lead to missed opportunities or delays in obtaining essential funds, which directly impact livelihood.
- ✦ **20%** lack confidence in using DFS for **high-value transactions**.
 - For larger or critical transactions, farmers hesitate to trust a system they have perceived as unstable. They prefer cash, which offers immediate settlement.
 - Farmers' DFS transactions are limited to **CICO, P2P transfers, and utility bill payments**.



Value

- ✦ **57%** are **unaware of the incentives** that providers offer for DFS use, such as discounts and cashback deals.
 - Without clear communication of added benefits, farmers do not find any compelling reason to switch from cash to digital payments.
- ✦ Farmers **primarily** buy essential inputs from dealers and suppliers in cash, with **only 6%** using digital payments in urgent situations.
 - Most farmers rely on cash to purchase essential inputs because local dealers and suppliers rarely accept digital payments. As a result, they find little value in using DFS.
 - Only 6% of farmers have ever paid digitally for inputs, usually in urgent cases or when they source from online platforms outside their district.
 - This low adoption highlights the lack of DFS integration in the traditional supply chain, which further reduces its perceived usefulness among farmers.

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Data Insight



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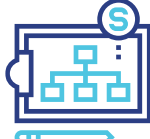
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