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CONTACTS

Phone: **97-748-70-03**

Website: https://ist-journal.uz

Email: munis.iriskulova@gmail.com

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UNIVERSITY STUDENTS' ADOPTION OF CASHLESS PAYMENTS IN UZBEKISTAN: BEHAVIOR, TRUST, AND CHALLENGES

Khikmatullaev Ismoilkhuja Khusan ugli
Tashkent state university of economics
and Universitas Pendidikan Indonesia
ORCID: 0009-0004-7698-9932
Email: ismoilkhuja7@gmail.com

Asep Miftahuddin
Universitas Pendidikan Indonesia
ORCID: 0000-0001-7409-2030

Abstract: As Uzbekistan accelerates its transition toward a cashless society through policy and technological reforms, understanding the perspectives of young citizens is crucial. This article focuses on university students as a key demographic of early adopters in the cashless transformation. Using an IMRAD structure, it presents the findings of an original survey (N = 150) examining students' payment behaviors, their level of trust in digital finance, and the challenges they face. The Introduction outlines the national shift toward digital payments and the importance of youth attitudes in sustaining this transition. The Literature Review highlights global and local insights on digital payment adoption, including factors of convenience, security, and generational differences, to provide context for the study. The Methodology details the survey design and data collection at multiple universities in Uzbekistan, covering usage patterns, perceptions, awareness of government incentives, and demographics.

Results reveal that an overwhelming majority of students use cashless methods frequently and prefer them for most transactions, citing convenience and better financial tracking as advantages. However, notable concerns are reported: nearly half worry about cybersecurity, many retain cash for backup due to occasional technical issues, and some are cautious about a fully cashless future primarily out of concern for less tech-savvy populations. Discussion interprets these findings, indicating that while students are largely enthusiastic and trusting of digital payments (with most seeing them as faster and easier than cash), their experiences underscore the need for continued improvements in security, reliability, and inclusion. The students' awareness of broader societal issues (like the digital divide for rural or older people) suggests they are thoughtful about the implications of a cashless society. The article concludes that university students in Uzbekistan are poised to be catalysts of the cashless transition – their positive adoption and peer influence can drive change – but it also stresses policy implications: enhancing educational campaigns, bolstering digital infrastructure, and ensuring no group is left behind. These insights offer valuable guidance for policymakers and stakeholders aiming to foster a secure and inclusive cashless economy.

Key words: cashless society; digital payment adoption; university students; trust in technology; financial behavior; youth and fintech.

INTRODUCTION

Around the world, younger generations often lead the way in the adoption of new financial technologies. In the context of cashless economies, this trend is particularly evident – tech-savvy youth are typically early adopters of mobile banking, digital wallets, and online payments. Uzbekistan is no exception. The country is in the midst of a national push toward digital payments, supported by government initiatives and a rapidly improving payment infrastructure.

In recent years, Uzbekistan has launched a "Digital Uzbekistan 2030" program, modernized its banking systems, and even set ambitious targets to reduce cash usage to 40% of transactions by 2026. As these top-down efforts unfold, the attitudes and behaviors of everyday users become critical. University students, in particular, represent a key demographic: they are typically well-educated, familiar with technology, and likely to be the first to embrace innovations. They also stand to become future professionals and opinion leaders who can influence others in their families and communities. Thus, understanding how students perceive and use cashless payment methods can offer valuable insight into the current success and future trajectory of Uzbekistan's cashless transition. Existing observations suggest that Uzbek youth have rapidly taken to cashless options. For instance, the proliferation of mobile payment apps (such as Payme, Click, and others) has been especially pronounced among young urban users, thanks to these apps' ease of use and smartphone ubiquity. Many universities and businesses now pay stipends or salaries via bank cards, nudging students into the banking system.

At the same time, challenges common to many countries' cashless journeys are present: concerns about security (e.g., fraud or hacking incidents), unequal access to technology (students from rural backgrounds may have seen their families struggle with poor internet connectivity), and a lingering cultural attachment to cash in certain situations.

Moreover, while students themselves might adapt quickly, they are often mindful of how older relatives or community members cope with digital finance – a factor that shapes their overall comfort with a completely cashless society. Public opinion polls globally (e.g., Gallup in the US) show that even amid increasing digital payment usage, a sizable portion of people feel uneasy about a fully cashless world.

In Uzbekistan's case, anecdotal evidence suggests students generally favor modern payment methods, but systematic data has been lacking. This study seeks to fill that gap by systematically examining university students' behavior and trust regarding cashless payments and by identifying the obstacles they encounter.

The core research questions are:

How extensively do university students in Uzbekistan use cashless payment methods, and for what types of transactions?

What are their perceptions of the advantages of cashless payments (e.g., convenience, budgeting, safety) versus the advantages of cash?

What concerns or challenges (such as security fears, technical issues, or habit) might hinder them from fully embracing cashless payments?

How do these young people feel about the prospect of a near-future society where cash is minimal – are they supportive, hesitant, or opposed, and why?

By exploring these questions, the study aims to provide a nuanced understanding of the youth perspective on Uzbekistan's cashless transition. This micro-level lens complements macro-level analyses of policy and infrastructure (covered in a separate article on national cashless initiatives) by focusing on the end-users who ultimately validate or challenge the effectiveness of those initiatives.

LITERATURE REVIEW

The shift toward digital payments has been analyzed by scholars from technological, economic, and behavioral perspectives. Global studies on digital payment adoption consistently find that young adults tend to have higher uptake rates of cashless technologies. Often labeled as "digital natives," they have grown up with the internet and smartphones, which translates into greater comfort with mobile banking and e-wallet applications. Convenience is a major factor; studies in various countries note that youth appreciate not needing to carry cash and being able to transact anytime, anywhere via their phones. Speed and ease of use make cashless payments attractive for everyday activities from buying food to splitting bills and these preferences are reshaping payment landscapes around the world.

However, the literature also highlights that trust and security are pivotal in determining whether people (including youth) fully embrace cashless methods. If users fear fraud or misuse of their financial data, they may hesitate to adopt digital payments fully. For example, research from India by Garg and Panchal (2017) showed that even among relatively tech-aware individuals, cybercrime was perceived as the biggest threat in a cashless

economy. Young people, while generally more confident with technology, are not immune to such concerns they are often aware of phishing scams or card fraud incidents that circulate on social media. Building trust through secure platforms and user education is therefore crucial. At the same time, some studies suggest that familiarity can breed trust; as youth gain personal experience with reputable payment apps (especially those incorporating strong security measures like two-factor authentication), their confidence in digital payments tends to grow. This dynamic underscores the importance of studying current student sentiment: it can indicate whether a generation expected to be the most inclined toward cashless transactions still harbors reservations that need to be addressed.

Another relevant theme in the literature is the role of financial literacy and awareness of policies. Young consumers might be tech-savvy, but this does not automatically mean they are financially literate. Educational background in finance or lack thereof can influence how well they understand digital financial products and manage associated risks. In developing countries, researchers have noted that peer influence and informal learning often guide youth in adopting new financial tools for instance, students teaching one another how to use a payment app, or learning from family members' experiences. Government policies, such as incentives or mandates, also influence this demographic. If the state offers, say, cashback for using cards, are students aware of it, and does it affect their behavior? Studies from various countries show mixed awareness of such programs among youth; some are highly attuned to "freebies" and rewards, while others may remain unaware unless such initiatives are widely advertised. In Uzbekistan, the government has introduced incentives such as a 1% cashback on cashless purchases and has mandated the installation of POS terminals by merchants. How students perceive these initiatives whether as motivating factors or trivial changes is likely to influence their payment habits.

Locally in Uzbekistan, prior research specific to youth and digital payments is limited, but broader surveys and media reports provide some insights. A recent study by Erkinova (2025) chronicled the rise of digital payments nationwide and implied that young, urban populations are driving much of this growth. It also mentioned that many university students routinely use banking apps and cards for daily needs, especially in urban areas where infrastructure is developed. However, not all young people share the same experience: those from rural areas or smaller towns might not have had comparable exposure, potentially creating disparities within the student community. Additionally, cultural expectations (for example, whether parents give spending money in cash or via bank transfer) could shape a student's default financial behavior. Uzbek society is in a transitional phase, where traditional cash-based practices (such as giving "naqd" cash for allowances or celebrations) coexist with emerging digital habits. This coexistence can influence youth attitudes–they might use cashless methods for specific purposes (school fees, online shopping) while still viewing cash as normal for others (gifts, small market purchases).

In summary, the literature suggests that university students in an evolving economy like Uzbekistan's are likely to be enthusiastic adopters of cashless payments, but their actual usage and attitudes are moderated by factors such as trust in the system, awareness of incentives, infrastructure reliability, and cultural habits. This study will empirically assess these aspects through direct survey data, offering concrete evidence to supplement broader insights from existing research.

RESEARCH METHODOLOGY

This study employs a survey-based research design to collect primary data on university students' usage of and attitudes toward cashless payments in Uzbekistan. The approach is quantitative-descriptive, aiming to measure usage patterns and assess the prevalence of particular opinions or concerns within the student population. Key components of the methodology are as follows:

Participants**:** The survey targeted university students in Uzbekistan, with a total of N = 150 valid responses collected in March 2025. Respondents were drawn from three institutions: two major universities in Tashkent (the capital) and one regional university in the Fergana Valley. A convenience sampling strategy was used, leveraging university email lists and social media groups to distribute the online questionnaire. Although not a random sample of the national student body, the respondents represented a diverse mix of males and females, various academic majors, and both undergraduate (approximately 80%) and graduate (20%) students. Ages ranged from approximately 18 to 24 years. While the sample may be skewed toward students with internet access and interest in the topic (due to online distribution), it nonetheless provides a broad snapshot of young, educated individuals. Participation was voluntary and anonymous, and no personally identifiable information was collected, encouraging honest and uninhibited responses.

Survey Instrument: A structured questionnaire was developed, primarily comprising closed-ended questions, along with a few open-ended comment prompts. The survey was available in both English and Uzbek, allowing participants to choose their preferred language to ensure clarity. The instrument covered four main areas:

Usage Patterns: Respondents reported the frequency with which they used various cashless payment methods (e.g., bank debit/credit cards, mobile payment apps, online banking) versus cash. Students indicated usage frequency (daily / several times a week / a few times a month / rarely / never) for both cashless payments and cash. They also specified the types of transactions they commonly conducted cashlessly–such as food purchases, transportation, utility or phone bill payments, online shopping, and tuition payments.

Attitudes and Perceptions: This section measured subjective views using Likert-scale statements (from "strongly disagree" to "strongly agree"). Statements included: "Paying by card or app is more convenient than paying with cash," "I trust the security of digital payment systems," and "Using cashless payments helps me better track my finances." Additional questions addressed perceived disadvantages (e.g., "I worry about fraud when I use cashless payments") and preferences for cash vs. cashless in everyday life. A multiple-choice item asked students to select their preferred method (cash, card/app, or "depends on the situation"), with space for brief justification.

Awareness and Knowledge: Students were asked if they were aware of any government or bank-led incentives or policies promoting cashless payments, such as cashback programs, cash transaction limits, or requirements for merchants to accept cards. They also indicated whether their university had adopted cashless systems for fee or stipend payments and whether they had received any formal training in digital financial literacy (e.g., banking app workshops).

Demographics and Background: Collected demographic variables included age, gender, and academic year, as well as contextual information such as whether the student had a bank account and payment card, came from an urban or rural area, and whether their family typically used digital payments. These background variables were useful for subgroup analysis (e.g., exploring whether rural students use cashless payments less, or if gender affects trust levels).

The questionnaire was pilot-tested with five students to ensure clarity, resulting in minor revisions. Data were collected using an online survey platform and exported for analysis.

Data Analysis: Survey data were analyzed using basic descriptive statistics. Frequencies and percentages were computed for categorical variables to assess usage levels and opinion distributions. Likert-scale items were summarized by calculating the percentage of agreement/disagreement and mean scores to capture sentiment trends (e.g., the mean agreement score for "cashless is convenient"). Cross-tabulations were also performed to compare subgroups particularly between students in Tashkent and those in the Fergana Valley, as well as male and female respondents. These subgroup analyses revealed no substantial differences; both urban and regional students reported high usage rates, and gender differences in attitudes toward technology were minimal likely reflecting similar digital exposure levels across student populations. Qualitative comments provided through open-ended questions were reviewed, and a few representative quotes were selected to illustrate recurring themes or notable perspectives.

Ethical Considerations: Participants were informed about the academic purpose of the study and gave implicit consent by proceeding with the survey. No identifying data were collected, and all responses remain anonymous. Given the low-risk nature of the study (focused on personal habits and opinions), it qualified for exemption from full institutional ethics review. Nonetheless, participant autonomy and privacy were prioritized throughout.

ANALYSIS AND RESULTS

Adoption and usage frequency: The survey results indicate extremely high adoption of cashless payment methods among university students. An overwhelming 92% of respondents reported using some form of cashless payment (card or digital app) on a regular basis. In fact, 78% stated they make cashless transactions multiple times per week, and nearly half (49%) said they use cashless methods daily for various needs. These figures far exceed the self-reported frequency of cash usage only about 15% of students said they use cash daily, with many using it just a few times a week or less. Virtually all students in the sample (100%) own at least one bank card usually a debit card linked to their bank account, often used for receiving stipends or parental transfers. Every respondent also indicated that they have access to the internet via a smartphone. This ubiquity of cards and smartphones provides the essential tools needed for cashless transactions and reflects successful inclusion. Essentially, within the university environment, having a bank account and the ability to transact digitally is now the norm. Many students carry multiple cashless options (e.g., a bank card and one or two payment apps on their phone).

When asked about their preferred payment method for day-to-day transactions, 64% of students indicated a preference for using non-cash methods (either card or mobile app). Only 18% said they actively prefer cash, and the remaining 18% answered "it depends." Those who prefer cashless methods cited reasons such as speed, convenience, and not having to worry about carrying change. Students who preferred cash often

mentioned habit or better control over spending in certain situations, while those in the "it depends" group clarified that they use cashless methods for most purchases but might opt for cash when making very small transactions (e.g., bus fare or buying a snack from a street vendor) where digital payment options may not be accepted. Common use cases for cashless payments among students included paying at campus cafeterias or nearby fast-food outlets (most of which now support card terminals or QR code payments), purchasing mobile airtime or internet data through apps, splitting bills with friends via peer-to-peer transfer apps, paying monthly utility bills for their apartments or dorms online, and paying tuition or other university fees through bank transfers. A 21-year-old economics student noted, "Pretty much everything I pay for, I use my card or Click. I only use cash if I absolutely have to, like when a place has no terminal." This sentiment was widely echoed, illustrating that students have integrated cashless payments seamlessly into their daily routines.

Perceived benefits – convenience and financial management: The data show that students overwhelmingly recognize convenience as a key advantage of cashless payments. When presented with the statement "Paying by card or app is more convenient and faster than paying with cash," 72% of respondents agreed (with 40% "strongly" agreeing), only 10% disagreed, and the rest were neutral. Many students elaborated that using a card or phone saves them time they don't need to stand in ATM lines or carry large amounts of cash. One student commented, "All our utility bills and even university tuition can be paid online now it saves so much time." Not having to deal with physical money (like counting change) and being able to pay exactly the amount due were also cited as advantages. A significant number of students mentioned safety and hygiene as additional benefits a mindset possibly reinforced by the COVID-19 pandemic. They expressed that not carrying cash reduced concerns about losing a wallet or handling banknotes that have passed through many hands.

Another major perceived benefit is improved tracking and budgeting. About 55% of students reported that using digital payments helps them better monitor their spending. Since every transaction is recorded in a banking app or via SMS notifications, students can easily review where their money is going. Some mentioned they periodically check their transaction history to monitor expenses something that is not feasible with cash unless expenditures are recorded manually. One female respondent noted that after she began using a budgeting app synchronized with her debit card, she became more aware of her monthly spending on food and transport, which helped her cut unnecessary expenses. This ability to view transaction records was highly valued and aligns with global observations that young users appreciate digital tools for managing personal finances. As one student put it, "When I use cash, I lose track of where I spent it. With my card, I can see every payment, so I feel more in control of my budget." For a cohort balancing studies, possibly part-time work, and limited budgets, such financial transparency represents a considerable advantage of cashless methods.

Despite the generally positive outlook, the survey uncovered notable concerns regarding security. The most prominent concern is the fear of fraud or cybercrime related to digital payments. 48% of respondents agreed that they worry about the safety of cashless payments (with most of the rest being neutral and only a small fraction outright dismissing the concern). When asked in an open-ended way what specific worries they had, students most commonly mentioned the risk of their card or account being hacked, scams involving fake payment links, or the possibility of losing money due to technical errors. Indeed, 20% of the students reported that they or their close family had personally experienced some form of attempted cyber-fraud related to digital payments in the past year. In nearly all those cases, the incidents were unsuccessful fraud attempts (such as phishing messages asking for OTP codes or scam phone calls pretending to be from a bank), and the students or their family members did not lose money because they recognized the scam. Nonetheless, just hearing about these attempts was enough to make some respondents cautious. This finding powerfully underscores a point often noted in literature: cybersecurity is perceived as a primary challenge in cashless ecosystems, even among those who otherwise see the benefits.

On a more reassuring note, practical trust in familiar systems remains high. When asked to react to the statement "I feel confident that my money is safe when I use digital payment services," 70% of students agreed, 15% disagreed, and the rest were neutral. This suggests that while nearly half have abstract worries about fraud, a larger majority still trusts that their own usage presumably on reputable platforms is secure. This somewhat paradoxical result (fearing fraud in general but trusting one's own services) likely reflects nuance: students trust well-established providers like their bank's app or popular payment platforms, especially if they have used them without issue, but they remain wary of unknown or unofficial schemes. Some respondents explicitly said they trust their bank but are cautious about third-party or new apps. It appears that familiarity and branding play a role in trust.

Many students acknowledged that their confidence has been bolstered by safety features and education. About 60% said they had seen information campaigns (on social media or via their bank) about how to use digital payments safely for example, warnings about not sharing PINs or OTP codes. In fact, some universities and banks have organized seminars or sent guidelines on cybersecurity, which a few students credited for their awareness. One student shared, "Our university had a workshop with a bank on safe online banking. It made

me more comfortable because I learned how to spot scams." Thus, while theoretical concerns linger, practical trust in day-to-day use is fairly strong among educated youth, given exposure to security practices and the generally safe track record they have experienced personally.

Technical Issues and Cash as Backup: The survey also shed light on practical barriers to using cashless payments. Roughly 30% of students reported that they have encountered situations in the past few months where they could not use a cashless method when they wanted to, due to technical or infrastructural issues. The most common examples were point-of-sale terminals being temporarily offline or out of service, and occasions of weak internet or mobile network coverage hindering a mobile payment. For instance, one respondent mentioned, "Sometimes the payment terminals at small cafes don't work, so I have to have cash as a backup," highlighting a scenario where device malfunction forces a reversion to cash. Another noted that during a trip to a more remote town, they found very few places accepting cards, which taught them always to carry some cash outside the city. These anecdotes align with known infrastructural challenges: even if overall connectivity is good, spotty service or technical outages can occur, reminding users that cash can still be indispensable in a pinch.

Importantly, 65% of the surveyed students said they still carry some cash in their wallet on a daily basis (often a small amount like 20,000–50,000 UZS, equivalent to a few dollars) specifically for emergencies or for transactions at places that accept only cash. This indicates that even among avid digital payment users, cash has not been rendered completely obsolete–it remains a contingency plan. Students generally described this as a pragmatic approach: they prefer to pay by card or app, but if that fails, they don't want to be stranded, so having cash "just in case" is considered wise. This mirrors behavior observed in other countries where, despite low cash usage, people keep a little cash for backup.

The prevalence of carrying cash also ties into habit and the slow pace of change in certain contexts. For example, some public transportation (older buses or rural taxis) and traditional bazaars in Uzbekistan might still be cash-only. Students who commute or shop in those settings will naturally have to use cash. The survey did not find strong frustration about these instances; students seem to accept that a hybrid payment environment is currently the reality. They adapt by using cashless when available and cash when necessary, demonstrating a practical flexibility. However, the fact that a majority always carry cash implies that there is not yet full confidence that one can get by with digital means alone for all needs. As infrastructure improves further and as more merchants get onboard with cashless options, this behavior might change.

A particularly revealing part of the survey asked students whether they would support Uzbekistan becoming an almost entirely cashless society in the future (where nearly all transactions are digital). About 58% of students responded "Yes" – they would support such a development. Another 25% answered "Maybe/Not sure," and 17% said "No," they would not support an almost entirely cashless society. These proportions show a clear majority in favor but also a substantial minority with reservations. The follow-up reasoning provided by respondents offers deeper insight into their thinking.

Those in favor (58%) tended to emphasize themes of modernization and national progress. They viewed a cashless society as inevitable and beneficial, using phrases like "it's the future, we should embrace it." They believed it would make transactions more efficient and align Uzbekistan with global trends. Some also mentioned the potential reduction in corruption: if everything is digital, "envelope salaries" (unofficial off-the-record payments) and unreported cash dealings would be curtailed, leading to greater transparency. This reflects a surprisingly civic-minded perspective among the youth – they connect cashlessness not just with personal convenience but with societal improvements like less tax evasion and corruption. Indeed, a few students wrote that a cashless economy could mean "less envelope salary payments if all is digital," directly recognizing that digital transactions leave trails that can deter shadow economy practices. These pro-cashless students generally trust technology and assume that any current issues will be resolved with time and innovation.

Those who were hesitant or opposed (42% combined, with 17% outright "No") had nuanced reasons. A majority of the "Maybe" and "No" respondents did not cite themselves as the issue but rather pointed to concerns about other people and the country's readiness. They worried that "it might be hard for our parents or grandparents" to cope in a nearly cashless scenario, and that "villages need better internet first" before such a change. This demonstrates a commendable awareness of inclusivity on the students' part. Even if they personally are ready to be 100% digital, they recognize not everyone in Uzbekistan is in the same position and are reluctant to support a societal shift that could disadvantage others. Essentially, their hesitation is rooted in empathy and realism about the digital divide.

Another set of concerns among the cautious minority relates to personal habits and the potential downsides of going fully cashless. A few "No" respondents admitted they "simply like the feel of cash" or fear overspending

if everything becomes just a card swipe or phone tap. This latter point reflects a known psychological aspect: research has shown people often spend more when using cards than when using cash, because the “pain” of paying is less immediate. Some students are aware of this in themselves – one wrote that having cash in hand gives her a better sense of budgeting, whereas with a card she might lose track and overspend. Such personal finance concerns indicate that cash can function as a self-imposed budgeting tool for some – e.g., only spending the cash you have in your wallet.

In summary, the survey reveals a university student population in Uzbekistan that is largely enthusiastic and engaged with cashless payments. Daily usage is common, and most view digital payments as a positive, progressive part of their lives. They enjoy the convenience and ability to manage finances digitally. Trust in established digital payment systems is relatively high, although concerns about security persist – pointing to the importance of continued vigilance and education on cybersecurity. Students also pragmatically keep cash around, highlighting that certain infrastructural and cultural transitions are still in progress. Their attitudes toward a fully cashless society are mostly positive but tempered by thoughtful consideration of broader societal readiness. In many ways, these young people are acting as a bellwether: their experiences signal both the achievements and the gaps in Uzbekistan’s cashless journey so far.

The findings from the student survey offer a microcosm of Uzbekistan’s cashless transition, highlighting encouraging signs as well as areas requiring attention. On one hand, the high adoption rate and positive sentiment among university students indicate that the younger generation is essentially on board with the cashless movement. This demographic is using digital payments frequently and for a wide array of purposes, effectively driving demand for cashless services. Their comfort with technology and willingness to trust digital finance bode well for the country’s efforts to reduce cash reliance.

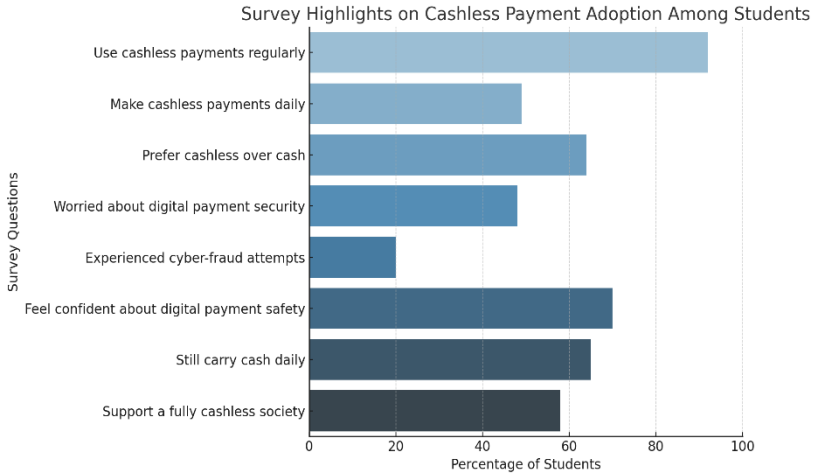
In fact, this youth embrace of cashless methods provides a supportive micro-environment for Uzbekistan’s national cashless initiatives – it creates momentum that policy measures can build upon. As these students graduate and enter the workforce, they are likely to carry their cashless habits with them, influencing workplaces and households alike. In essence, they can act as catalysts and ambassadors of the cashless society, encouraging others (including older family members) to adopt these technologies, as some have already reported doing. This peer effect is invaluable: it complements official programs by organically spreading digital payment literacy and normalizing non-cash transactions in everyday life.

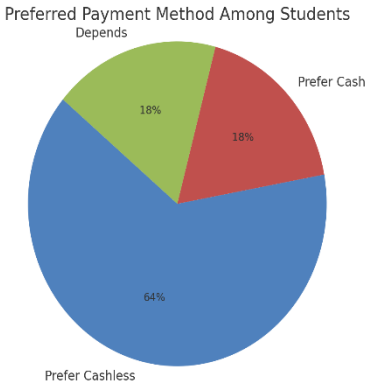
The survey results also underscore that the fundamental value proposition of cashless payments – convenience and efficiency – is clearly recognized by young users. Students largely find digital payments faster, easier, and even helpful in managing their money. This aligns perfectly with the government’s portrayal of cashless payments as a modern and convenient solution. The fact that many students see advantages like budgeting control and safety (less risk of theft, etc.) means the case for going cashless is internally strong among them. When a majority of young consumers prefer cashless methods and only use cash when necessary, it suggests that a cultural shift is well underway. This is significant in a country that a decade ago was overwhelmingly cash-dependent. The generational shift is evident: these students are a cohort for whom using a card or phone for transactions feels normal, whereas using cash can at times feel like an inconvenience. Such a perspective, if it continues to spread, indicates that cashless habits will deepen over time, simply through generational replacement and peer influence.

However, the persistence of certain concerns and behaviors (like carrying cash as a backup) indicates that the transition is not yet complete or free from issues. Chief among these are security fears. The fact that nearly half of surveyed students worry about digital payment security shows that even digital natives need reassurance and protection. Young people are often assumed to be less concerned about privacy or security, but these findings challenge that stereotype – they are quite aware of the risks.

Fortunately, most still trust the systems they use, which implies that efforts by banks and fintech providers to secure their platforms and educate users have had a positive effect. To maintain and strengthen this trust, continuous improvements in cybersecurity are essential. Banks and payment companies, likely in collaboration with regulators, should keep upgrading encryption, fraud detection, and user authentication methods. At the same time, expanding financial education specifically focused on digital security is important. The fact that some students cited attending workshops and seeing safety tips on social media as helpful suggests that such educational outreach has an audience and impact. Universities could integrate basic digital finance literacy into orientation programs, and banks could continue partnering with educational institutions for seminars. Given that attempted scams are reaching a notable fraction of students (20% experienced an attempt), proactive educational campaigns can prevent successful fraud by staying one step ahead of scammers in informing potential victims. Essentially, a well-informed user base is a key line of defense in any cashless ecosystem.

The chart below summarizes key survey responses:





These findings reflect a tech-ready youth who largely align with government efforts, while highlighting areas needing continued attention – especially digital literacy, infrastructure reliability, and user trust. A particularly insightful aspect of the discussion is the students' concern for inclusivity and the broader societal context. It's notable that many students, even while being personally enthusiastic, tempered their support for a fully cashless society out of concern for those who might struggle. They specifically called out older generations and rural communities as potential weak links in an all-digital future.

This mirrors points raised in the literature about the digital divide, but here we see those abstract concerns reflected in the actual attitudes of young people. What this means for policy is that the government's narrative and planning for a cashless transition should continue to emphasize inclusion – something it has indeed been focusing on through financial inclusion programs and infrastructure expansion.

It may also suggest involving youth themselves in bridging that divide: for instance, youth volunteers or university outreach programs could help train older citizens in using banking apps or ATMs (some local banks already have volunteer initiatives along these lines).

The students in the survey clearly have a sense of responsibility – or at least awareness – which could be harnessed in positive ways, such as peer-led community workshops on digital literacy, possibly as part of university community service. Additionally, this inclusive mindset indicates that pushing for a completely cashless society will gain public support only if people believe no one will be left behind. Transparent communication about how the government intends to support vulnerable groups during the transition will therefore be crucial in maintaining public buy-in, including that of idealistic youth who care about their parents' and grandparents' well-being.

Finally, it's worth reflecting on the psychological and cultural factors that emerged. A subset of students acknowledged liking cash or fearing overspending with digital payments. These sentiments echo the notion that cash provides a tangible sense of money that some find useful for self-control. While this was not the majority view, it is a reminder that behavior around money is not purely about convenience – it's also about personal comfort and discipline.

Fintech solutions might consider integrating features that address this, such as spending limit alerts or visualizations that simulate the feeling of budgeting with envelopes (some budgeting apps use digital "envelope systems" to help people allocate money into categories). If students – or people in general – feel they lose a bit of financial self-control by abandoning cash, innovative digital tools could compensate by giving them new ways to impose limits or visualize their spending in concrete terms. Over time, as people adjust, these psychological barriers often diminish, but recognizing them is important in the interim.

In conclusion, the discussion of these findings paints a picture of a young generation largely acting as early adopters and champions of Uzbekistan's cashless initiative, while also pragmatically aware of its current limitations. Their behavior and attitudes confirm that the foundations – widespread usage, trust in familiar systems, and recognition of benefits – are in place among youth.

At the same time, their concerns align with known challenges: ensuring security, reliability, and inclusivity. This alignment with global experiences (e.g., security concerns like in India, carrying cash as backup like many users elsewhere) suggests that Uzbekistan's path is following a typical trajectory, albeit at a rapid pace.

Importantly, nothing in the data indicates insurmountable resistance; rather, it points to issues that can be addressed with thoughtful policy and technological enhancements.

In the next section, we outline specific implications and recommendations drawn from these insights, aimed at policymakers, financial institutions, and educational bodies, to further smooth the road toward a cashless society – leveraging the positivity of youth while mitigating the concerns that remain.

CONCLUSION AND IMPLICATIONS

Uzbekistan's university students are emerging as a driving force in the country's transition toward a cashless society. The survey conducted for this study shows that these young adults have largely embraced digital payments in their daily lives, finding them convenient, fast, and aligned with a modern lifestyle. They trust the well-established digital payment platforms and appreciate the control and transparency these tools provide over their finances. In many ways, the behaviors and attitudes of this demographic validate the government's push for a cashless economy: students are using the very infrastructure and incentives that have been put in place, and they are reaping benefits in terms of ease and efficiency. Furthermore, their openness to a future where most transactions are electronic indicates that the cultural shift away from cash is already underway in the minds of the next generation. However, the journey is not complete, and the voices of these students also highlight important caveats. Their concerns about security underscore that sustaining trust is paramount–any lapse in protecting users could slow adoption or even reverse it among a cohort that is otherwise positive. Their habit of keeping cash for backup reminds us that the cashless ecosystem must be as reliable and accessible as cash to truly replace it. Perhaps most significantly, their empathetic worry for those less adaptable (older relatives, rural communities) sends a clear message: inclusion must be front and center in the cashless transition. A cashless society will fall short of its promise if large segments of citizens feel alienated or inconvenienced by it.

Based on these findings, several implications and recommendations can be outlined for policymakers and stakeholders:

Enhance digital security and trust-building: Continuous investment in cybersecurity by banks and payment providers is non-negotiable. Two-factor authentication, biometric verification, and real-time fraud monitoring should be standard. In addition, public education campaigns aimed at young users (and the general public) should be amplified–for instance, social media infographics on how to spot phishing scams, or interactive modules in banking apps that teach safe usage. Building a culture of security-mindedness will help keep users confident. Encouragingly, many students have responded well to seminars and tips; scaling these efforts will further fortify trust.

Improve infrastructure reliability and coverage: To reduce the need for cash as a fallback, the reach and dependability of cashless payment infrastructure must keep improving. This includes ensuring that POS terminals are maintained and network downtimes are minimized. Telecom companies should be incentivized to provide strong mobile data coverage even in remote or densely populated areas (perhaps leveraging the *Digital Uzbekistan 2030* program to prioritize connectivity in lagging regions). Additionally, expanding merchant acceptance is key. Small businesses and traditional marketplaces might need support (such as subsidized transaction fees or provision of low-cost QR code payment systems) to join the cashless network. The more ubiquitous cashless options become, the more comfortable users will be leaving their cash at home.

Financial Literacy and Inclusion Initiatives: The government, in partnership with educational institutions and community organizations, should continue and expand programs that bring digital financial literacy to all segments of society. This could mean integrating digital payment tutorials in university orientations (to capture new students early), as well as outreach to older adults through community centers or television/radio campaigns in Uzbek and other local languages. Since students themselves worry about their parents' ability to adapt, involving youth in teaching their families could be a powerful strategy. For example, a national *"Teach Your Family Tech"* initiative could encourage students to show elders how to use payment apps, perhaps with some incentive or recognition for participating. On the inclusion front, maintaining some hybrid approaches during the transition period is important: for instance, ensuring that essential services (hospitals, public transport) accept both cash and cashless until virtually all users are comfortable with digital payments. No one should feel cut off from basic commerce or public services due to lack of access or understanding–the transition's success should be measured not just in percentage of digital transactions, but in how universally accessible those digital channels are.

Leverage Youth as Champions of Cashless Culture: The positive attitude of university students can be harnessed in broader campaigns to normalize digital payments. Their stories and testimonials could be featured in media to show how cashless is working for the new generation. Peer influence is a strong force; as these young people advocate for the convenience of cashless life (as many do informally), it creates social proof that can sway more hesitant individuals. Authorities might collaborate with student associations or influential young figures (for example, popular Uzbek bloggers or entrepreneurs) to promote cashless practices and at the same time communicate messages about security and smart financial habits.

Monitor and Address Psychological Barriers: The findings that some youths prefer cash to avoid overspending suggest that cashless tools could integrate features to help users maintain self-discipline. Banks and fintech apps might introduce spend tracking, budgeting tools, or even voluntary spending caps to replicate the control some feel with cash. Policymakers and consumer protection agencies should also be mindful of not encouraging reckless spending–the aim is a cashless and financially healthy society. If going cashless inadvertently promotes irresponsible spending among youth (as one student feared), that would be a counterproductive outcome. Therefore, part of financial education should include money management in a digital age–for instance, teaching students how to use expense management apps or set limits on contactless payments if needed.

In conclusion, Uzbekistan's experience as reflected through its youth is largely a story of optimism and rapid progress. The student population is ready and willing to move forward into a cashless future, viewing it as part of the nation's development and their own modern identity. This is a strong foundation for the country's goals, as it ensures that the upcoming workforce and consumer base will demand and use digital financial services. The government's vision of a cashless society is, in essence, being enthusiastically lived out by these young people ahead of schedule. Yet, the cautionary notes they provide are invaluable. They remind us that a cashless society is not achieved by technology alone; it requires trust, education, and thoughtful inclusion. If those elements are addressed–and if the current positive trajectory of reforms continues–Uzbekistan is well on its way to a future where digital payments are the norm, cash is a rarity, and the benefits (transparency, efficiency, integration into the global economy) are widely realized. The insights from this study of university students thus offer a guiding light: by listening to the voices of its young citizens, Uzbekistan can navigate the remaining challenges and ensure that its cashless transformation is successful, sustainable, and beneficial for all.

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