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WORLD ECONOMIC FORUM

Accelerating Digital Payments in Latin America and the Caribbean

WHITE PAPER

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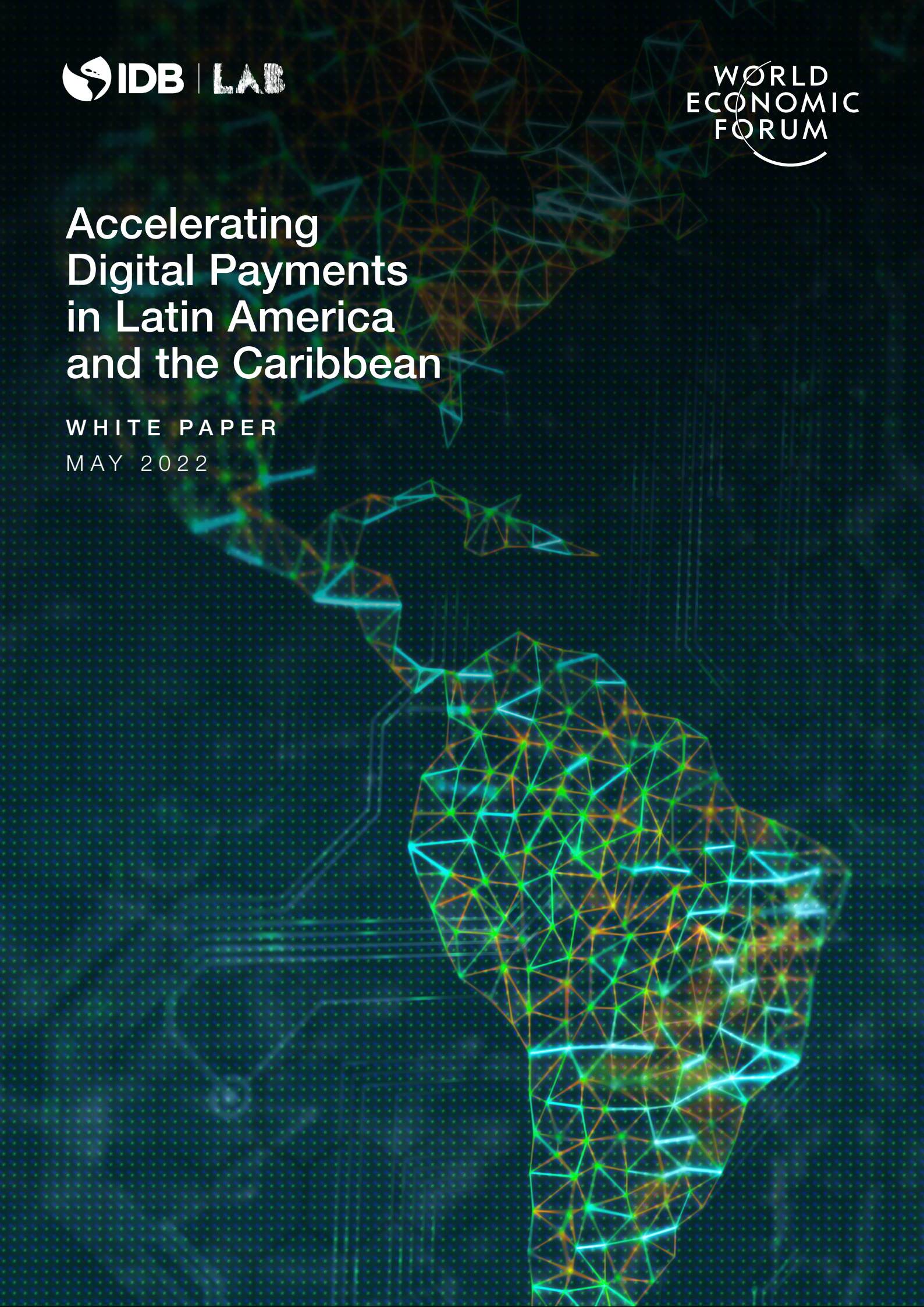

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Foreword

Digital trade has never been more popular in Latin America and the Caribbean (LAC) than it is today.

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Between the first and second quarters of 2020, e-commerce website traffic from five of the region's major markets increased by over 150%.[1] The COVID-19 pandemic has pushed and pulled tens of thousands of businesses in the region to go digital. The impact and advantages of such digitalization are quite telling for small and medium-sized enterprises (SMEs) in particular. SMEs in LAC can diversify their customer base and reach 20 foreign markets when operating online, while those that operate offline can only reach from two to five.[2] As today's digital economy becomes the norm, universal basic services such as education and medical care are also taking place online.

Digital payments are critical to enabling this transformation at both domestic and cross-border levels. But many challenges still exist that preclude the broadening of digital payment use throughout the region – from a lack of access, regulatory harmonization and affordable payment solutions, to a need for further public and private sector cooperation, consumer protections and an open, inclusive and interoperable payment ecosystem.

In 2021, the World Economic Forum and the innovation laboratory of the Inter-American Development Bank – IDB Lab – jointly launched the Payments to Advance Growth for All (PAGA) initiative to address these challenges. This initiative has convened a diverse community of over 100 public and private sector representatives to explore, through dialogue, how to best unlock the true benefits of digital payments in LAC. As digital payments continue to thrive and drive financial inclusion and economic growth, we hope this paper will provide a timely snapshot of the most pressing issues and highlight the importance of public-private and private-private cooperation to advance digital payments for all in an open, inclusive and safe manner.

Executive summary

Digital payments are a foundational part of economic activity, financial inclusion and business growth. Importantly, they are a driver of digital trade.

They shape how people spend and save and many of their daily interactions. With the onset of the global COVID-19 pandemic, the value of digital payments for individuals and businesses became even more apparent. In Latin America and the Caribbean (LAC) digital payments emerged as the preferred method of purchase: e-commerce grew 18% in 2020.[3]

Digital payments play an important role in financial inclusion. Research shows that when people have access to digital payments, these act as a gateway to other financial services, like credit and insurance; and people are more likely to use those services to save money, start or expand businesses, manage risk and better sustain financial shocks.[4] Digital payments also allow governments to disburse resources to more of their unbanked populations than they would using cash. Micro-, small and medium-sized enterprises (MSMEs) greatly benefit from the use of digital payments as it allows them to attract more customers and bring their business online, creating opportunities to sell beyond their immediate geography. Most importantly, digital payments level the playing field between large and small merchants.

Across LAC, digital payments are on the rise. The number of cards in circulation grew from 800 million in 2007 to 1.8 billion in 2021. New payment methods like real-time or faster payment systems, QR code payments and mobile payments are also gaining in popularity. In 2020, the number of active mobile accounts increased by 67%.[5] Despite this growth, myriad barriers remain. For starters, as recently as 2020, 45% of Latin Americans did not have a bank account and roughly 80% did not have a credit card.[6] Overly strict know-your-customer requirements have hindered access to financial institution accounts and payment products. A second barrier is outdated or onerous regulation and a lack of standardization that has hampered digital payment growth and innovation. The third barrier to digital payment growth is the lack of market access and competition. Strict licensing requirements, capital requirements, domestic processing and data restrictions exist, which create barriers to digital payment acceptance.

Considering the enabling function digital payments play in further unlocking opportunities in the economy, solutions to adoption challenges should take a holistic approach. The following key principles can help overcome the barriers to digital payment growth in LAC:

- ***Build good regulatory practices to reduce market barriers and promote innovation*:** Encouraging interoperability, adopting global industry standards and promoting a level playing field in digital payments and financial services are the foundation for a thriving digital payment ecosystem.

- ***Encourage public-private sector collaboration*:** Innovations in payments are accelerating. To ensure these developments are inclusive, sustainable and secure, the public and private sectors must work together to deliver products and services that meet individual and business needs.

- ***Explore digital trade agreements to secure safe cross-border digital payments*:** Regulators may consider codifying their commitment to international standards in trade agreements that encourage the adoption and promotion of international standards to enable technical and network interoperability.

- ***Facilitate new technologies and innovation:*** Technological innovations are creating new digital payment and trade opportunities and addressing important barriers. Governments can facilitate innovation by designing flexible regulations and policies that promote a level playing field for all players.

Introduction

Digital payments are an integral part of economic activity and financial inclusion.

MSMEs are the majority of businesses and formal employment in LAC. However, they cannot access credit and their financing gap is more than a third of regional GDP.

Payments provide access to financial services, empower trade and investment, and facilitate sustainable business growth. Importantly, digital payments level the playing field between large and small businesses. This is especially important for Latin America and the Caribbean (LAC), where micro-, small and medium-sized enterprises (MSMEs) make up the majority of business activity but where there is also a high degree of informality and exclusion from the formal financial system.

MSMEs make up 99% of businesses in LAC and account for 60% of formal employment.[7] However, they lack access to credit and their financing gap reaches 35% of regional gross domestic product.[8] On an individual basis, around 45% of the population does not have an account with a financial institution or with a mobile money service provider.[9]

Digital payments power economic activity and digital trade

Digital payments allow individuals and businesses to pay and be paid, quickly and securely, which helps stimulate trade and economic growth. Research shows that greater use of digital payment products such as cards (like credit, debit, prepaid) added $245 billion to global GDP between 2015 and 2019. That growth supported the creation of roughly 2.1 million jobs a year on average.[10] The same study also found that each 1% increase in the use of payment card products facilitated an annual increase in the consumption of goods and services of approximately $67 billion.

The COVID-19 pandemic has accelerated this trend as more consumers have shifted to digital payments because of physical restrictions, the perception that handling cash is unsafe, and as more governments began disbursing financial resources digitally. In 2020, retail merchants of all sizes worldwide adapted by moving more of their sales online.

Businesses that went online increased their sales as much as 20-30 percentage points higher than their peers who did not shift to digital selling.[11] In LAC, digital payments emerged as the preferred method of purchase, with e-commerce growing 18% in 2020.12 That same year, the number of active mobile accounts increased by 67%.[13]

Digital payments are also a strong driver of digital trade as they allow businesses to reach more customers through online sales and provide safer and a wider variety of ways consumers can pay. For example, marketplaces like Mercado Libre and super apps like Hugo have created new online communities connecting buyers and sellers and facilitating trade. These enterprises would not be possible without digital payments as the backbone driving use and growth.

Digital payments are a pillar of financial inclusion

According to the G20 Global Partnership for Financial Inclusion, the use of financial services by excluded groups is often initially done through digital payments (such as sending or receiving remittances, receiving government assistance).[14] Access to digital payments acts as a gateway to other financial services like credit or insurance and people are more likely to use those services to save money, start or expand businesses, manage risk, and better sustain financial shocks.[15] There is also evidence that electronic payments (and savings accounts) have the biggest impact on development goals like reducing poverty and inequality.[16]

Digital payments allow governments to disburse resources to more of their unbanked populations than they would by using cash. During the COVID-19 pandemic governments across LAC needed to disburse funds to their citizens to help them weather economic hardship. Peru implemented the Bono Familiar Universal (Universal Family Bond), which allowed payment transfers through digital wallets and mobile banking, among other modalities.[17] However, in many countries a large majority of people are unbanked and live in rural areas far from capital cities where they can collect government disbursements in-person. To overcome this barrier governments in countries like Guatemala and the Dominican Republic, among others, worked with industry (merchants, financial institutions, payment processing companies, fintechs) to digitally disburse funds to citizens without passing through a bank account by using virtual Bank Identification Numbers (BIN) or virtual prepaid cards using only government-issued identification.

Digital payments support MSMEs and women

Evidence shows that being connected to digital payments positively impacts small business resilience and growth. A survey of more than 3,000 MSMEs in five countries found that firms that embraced digital commerce and cross-border capabilities before and during the pandemic have generally weathered the pandemic better than those that continue to rely primarily on face-to-face transactions.[18] MSMEs that moved sales online during the pandemic increased sales by 20 to 30 percentage points higher than their peers that did not shift to digital sales.[19] In LAC, online MSME exporters reach on average 20 foreign markets, while offline exporters only reach two to five.[20] By allowing MSMEs to diversify and grow their business, digital payments level the playing field between large and small merchants.

Digital payments also play an important role in bridging the gender gap in access to financial services (box 1). Digital transfers provide safer, more secure access to payments for women and more control over use. For example, during the pandemic, many countries in LAC adopted digital payments to provide quick and safe disbursements of emergency relief; these, in turn, reduced the risks of having other family members appropriate women's funds and offered a gateway to additional financial services like savings, credit and insurance. Women have been disproportionately affected by income and employment losses throughout the pandemic, as they are overrepresented in the sectors impacted most during lockdown measures. Strengthening women's financial inclusion is a driver of sustainable growth, with digital tools playing a role in bridging the gender gap in access to financial products and services.

BOX 1

Prioritizing women in digital payments

Despite progress on financial equality, approximately 1 billion women today do not have access to formal financial services. In Latin America, only 51%[21] of adult women have access to an account. The prioritization of women is crucial to the realization of financial equity. To overcome the barriers affecting women, public-private collaboration to design products and services that meet women's needs is key. It is important to go beyond access to accounts and to understand how women are using these accounts. As many woman-owned MSMEs operate in the informal sector, information on usage can open the door for access to credit and other financial products and e-commerce opportunities.

Companies can also be essential in catalysing financial inclusion for women by digitizing payrolls. According to the World Bank's 2017 Global Findex Database, approximately 85 million women worldwide opened their first account to collect digital wages from a private sector employer.[22] Financial service providers (FSPs) and mobile operators can also increase access by ensuring sufficient representation of women agents in promoting women's use of digital financial services. Finally, designing affordable and safe digital financial products that women use can increase household financial security.

To achieve these goals, it is fundamental to collect, analyse and use gender-disaggregated data. If telecommunication companies and FSPs can collect and make available anonymized data disaggregated by gender, policy-makers will be able to design solutions to barriers affecting women's use of products.

1 Overview of digital payments in LAC

Payment ecosystems are the invisible infrastructure that powers commerce, trade and people's daily lives. They shape how people exchange goods and services.

1.1 Digital payment ecosystem

Advances in mobile technology, software development (such as application programming interfaces (APIs)), tokenization and hardware (for example contactless point-of-sale (POS) readers) have created new payment rails, form factors and actors. The result is a dramatically large payment ecosystem with a diverse, innovative set of players. Table 1 provides an overview of the main players in the digital payment ecosystem.

TABLE 1 **Digital payment operators and enablers**

Category	Entity	Description/role in digital payments
Private sector	Acquiring banks	Regulated financial institutions that process payment transactions on behalf of merchants
	Issuing banks	Regulated financial institutions that issue card products (i.e. credit and debit cards) to consumers
	Payment networks	Execute payment transactions by facilitating communication between buyers and sellers
	Distribution partners (marketplaces, super apps)	Online entity that brings together customers and sellers on a single platform, processes transactions and receives settlement proceeds on behalf of sellers
	Digital payment enablers: – Payment facilitators (Payfac) – Payment service providers (PSPs) – Digital wallet operators	**Payfac**: Non-bank, third-party merchant service provider that simplifies merchant account enrolment, manages the merchant relationship with an acquirer and provides value-added services and payment processing **PSP**: Non-bank, third-party entities that provide individual merchant accounts to businesses and payment services, allowing businesses to accept multiple payment types (e.g. card, cash, e-money) **Digital wallet operator**: Software-based system that stores and transmits payment credentials to complete transactions
	Fintechs & third-party providers	Firms that operate in payments and other related verticals (e.g. lending, investment) and provide value-added services to merchants and/or consumers, like APIs, omni channel payment services, mobile banking services, software solutions for business management
Public sector	National real-time payments (RTP)/faster payment system	Payment system where the transmission of the payment message and availability of the funds to the payee occur in real-time or near real-time. Examples: – Argentina: Transferencias 3.0 – Brazil: Pix – Mexico: SPEI
	Central bank digital currency (CBDC)	A digital form of central bank money that is widely available to the general public and is regulated by the central bank or national monetary authority. Examples: – Eastern Caribbean Central Bank: DCash – Central Bank of Uruguay: e-Peso – The Bahamas: Sand Dollar

As table 1 illustrates, there are many interconnected players providing services to facilitate digital payments. The ecosystem in LAC is evolving rapidly, with many new players like fintechs, payfacs, distribution partners and other third-party providers having emerged at every stage of the payment process to address paint points such as onboarding unbanked merchants, connecting MSMEs to more buyers online, or creating easier checkout for consumers by allowing them to pay through their preferred payment channel.

1.2 Digital payments in LAC are on the rise

Traditional payment methods and financial service infrastructure have increased

A large share of the population in LAC remains unbanked and large segments of the population still prefer cash. As recently as 2020, 45% of Latin Americans did not have a bank account and roughly 80% did not have a credit card (see also Box 2 for a snapshot of the Caribbean).[23]

BOX 2

Digital payments in the Caribbean

Over the past decade the number of cards in circulation has increased in absolute terms, growing 44%, from roughly 62 million in 2012 to 89 million in 2021.[24] However, year-over-year growth has not consistently increased and in 2020 it declined 1.6% before rebounding in 2021. Overall, the use of cash continues to dominate in Caribbean nations.

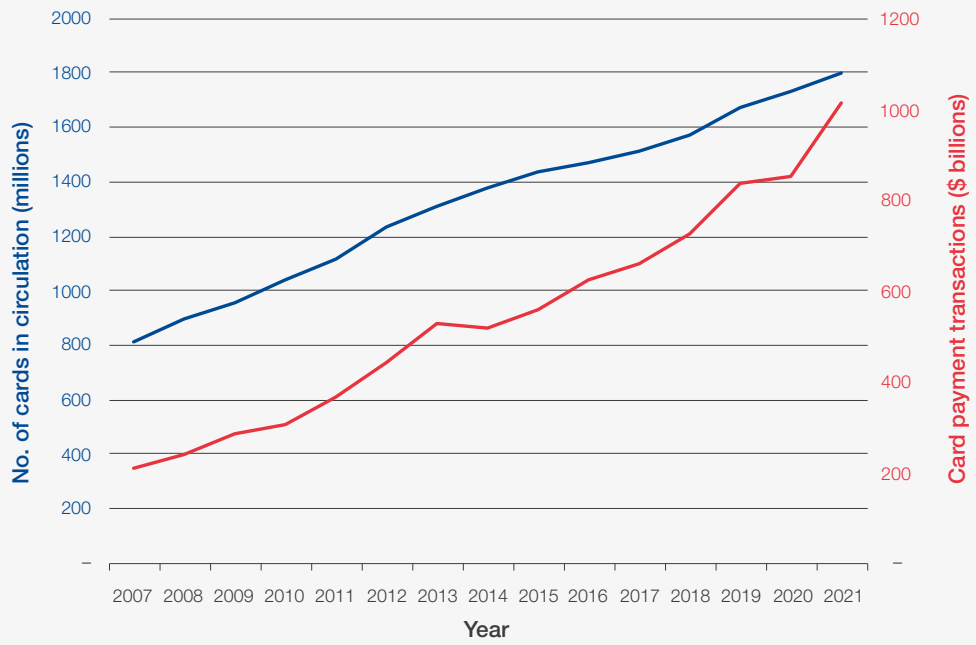
Slower growth in digital payments has its root in several factors. First, the commercial banking sector in the region comprises a mix of locally owned and foreign owned banks. Often this results in market differences in terms of platforms, services and modalities of protocols for dealing with transactions. The relative inconsistencies in platforms can slow the processes of integration required to have smooth online payment systems.

Weak interoperability between digital payment systems is another reason why cash payments remain the primary modality of settling transactions. For example, money held virtually in a mobile account or digital wallet cannot be easily moved into a bank account or easily used in other transactions, like making a purchase or paying a credit card bill. This challenge is compounded by unstable point-of-sale infrastructure, vendors' costs for using point-of-sale machines and the slow adoption of such technologies.

However, digital payments have been steadily increasing over the past 15 years, with traditional payment methods like cards and new payment methods like RTP/faster payments and QR codes gaining popularity throughout the region. The number of cards in circulation grew from 800 million in 2007 to 1.8 billion in 2021 and the payment volume of cards has gone from $200 billion in 2007 to around $1 trillion in 2021 (figure 1).

FIGURE 1

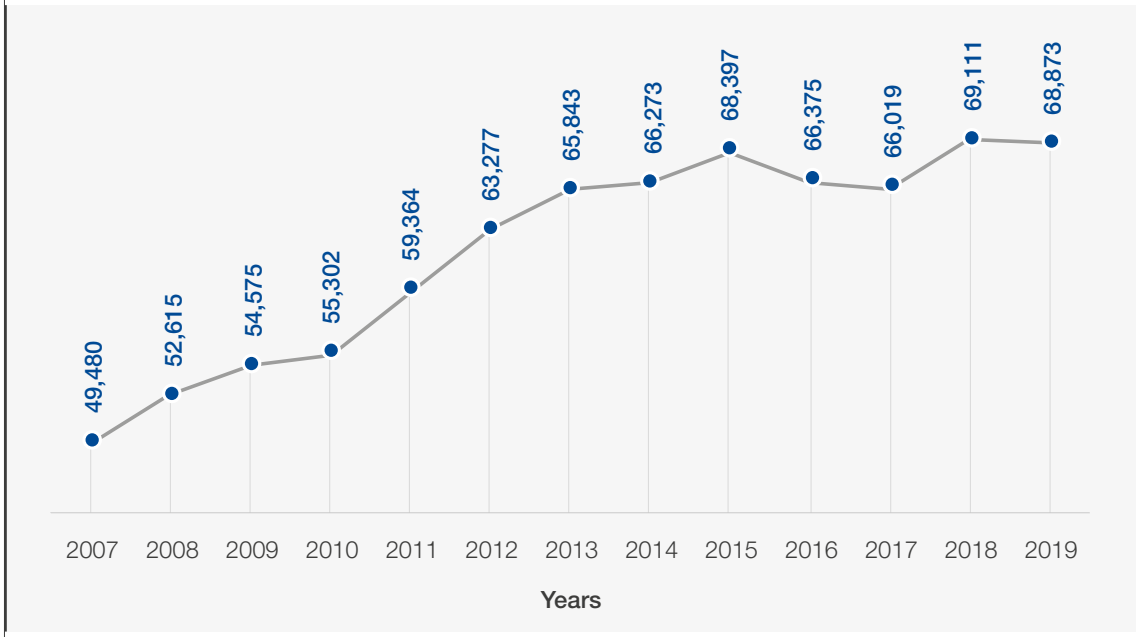
Card payments in LAC



Source: Euromonitor, Financial Cards and Payments in Latin America [Database].

Infrastructure development has facilitated, to some extent, the increasing use of digital payments. For example, bank and non-bank agencies have been growing over the past decade. The number of bank branches in Latin America is continuing to grow and has remained relatively stable (figure 2).

FIGURE 2 | **Number of bank branches, regional aggregate**



Source: FELABAN, Indicadores FELABAN – Numero de Sucursales Bancarias [Database], https://indicadores.felaban.net/indicadores_homologados/indicador.php?id=4.

New payment systems and technology are also accelerating

The adoption of new payment technologies and payment methods like mobile payment – in particular QR code payments, crypto currencies and RTPs – are on the rise. Several countries have RTP and fast-payment systems in place (such as Transferencia 3.0 in Argentina, Pix in Brazil, SINPE in Costa Rica, SIPARD in the Dominican Republic, SPEI in Mexico) (see box 3). Several countries are exploring CBDCs (for example, Brazil, Peru, Uruguay and the Bahamas), using crypto assets (El Salvador) and QR payments. In fact, the growth in QR code use in payments in Latin America is among the highest in the world. Argentine-based Mercado Pago's closed-loop payment system was one of the first in the region to introduce a QR code for payments. It has grown from just 3% of its sales when it was launched in 2018 to 43% a year later.[25] HugoPay in El Salvador is another example of a fast-growing and popular QR payment method whose open-loop system allows users to make contactless payments using any card or account.

BOX 3 | **The development of real-time payments in Brazil**

In November 2020 Brazil's Central Bank, Banco Central do Brasil (BCB), launched Pix, an RTP aimed at providing further digitalization options to the population and a common settlement infrastructure. Through regulation, BCB mandated regulated financial institutions with more than 500,000 active accounts to provide Pix as a service.

Pix was designed with 8 objectives[26] in mind:

- **Speed**: Funds must be available in the beneficiary account within 10 seconds for 99% of transactions.
- **Availability**: Pix is available 24 hours a day, 365 days a year.
- **Convenience**: The transfer of funds via Pix is a simple and intuitive process, initiated by cell phone and conducted either through an alias (e.g. cell phone, email address) or a QR code.
- **Ease of reconciliation**: By using an open and standardized interface, Pix makes it possible to associate transaction information with the payment order, helping companies improve their account reconciliation.
- **Widespread usage**: Participating institutions include traditional banks and newcomer banks (known as "digital banks") and non-bank payment service providers.
- **Safety**: Pix employs security protocols that are at least as robust as those associated with any other electronic means of payment.
- **Low cost**: The cost of a Pix transfer is subsidized by the government and therefore provided at no cost to the individual and at a low cost to financial institutions.
- **Multiplicity of use cases**: Pix was created to serve a variety of use cases, including person-to-person (P2P), business-to-business (B2B), bill pay and the collection of taxes, among others.

The Pix system uses International Organization for Standardization (ISO) standard ISO 20022, allowing interoperability among payment systems. Pix uses the same operating standards for small and large financial institutions. Smaller institutions have access to the same settlement infrastructure operated by BCB, which allows the sending and receiving of funds at all participating institutions at the same cost. Before Pix, this was a barrier to entry due to high integration costs.

Pix transactions have increased rapidly. In September 2021, Pix had reached more than 100 million users – or 60% of Brazil's adult population – and surpassed 1 billion monthly transactions.[27] In addition, some 7.6 million companies have transacted via Pix. Data from BCB indicates that around 40 million people made their first bank transfer with Pix.[28] Between March and October 2021, there was a 52% increase in Pix users across all income levels and a 131% increase across low-income users. It is now widely used in government disbursement programmes like CadUnico (35%) and Bolsa Familia (25%).[29]

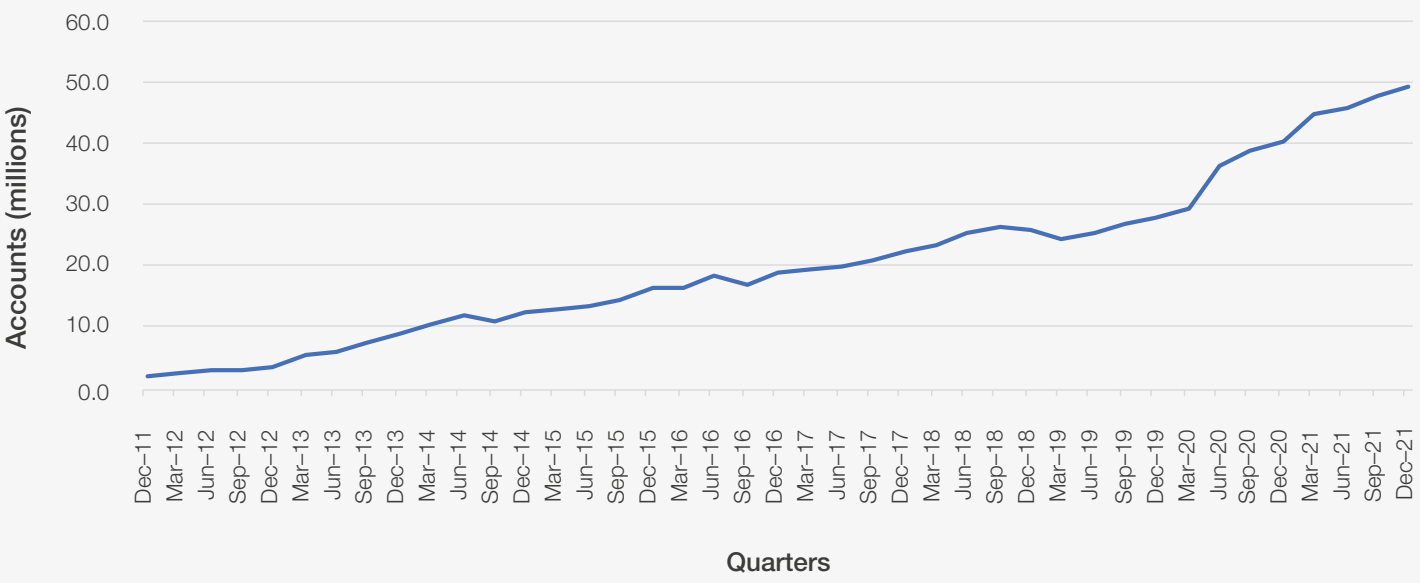
The adoption of new technology and payment methods can be attributed in some respects to the low – although growing – penetration of cards and the large share of the population that does not have a bank account with a traditional financial institution. At the same time, mobile penetration has surged. In 2002 only 19 out of 100 people in LAC had a mobile cellular subscription. Today, mobile cellular subscriptions are near 100% and around 70% of the population in Latin America has a smartphone. In some cases, policy actions have been important factors in improving infrastructure. For example, in Mexico telecommunications regulation reforms have resulted in lower costs for mobile phones and data, which has led to more connectivity and usage, a key component in the evolution of digital payment adoption.[31]

Trade and commerce are increasingly going digital

In 2021, consumers in the region paid for what they bought online using their mobile phone nearly two-thirds of the time.

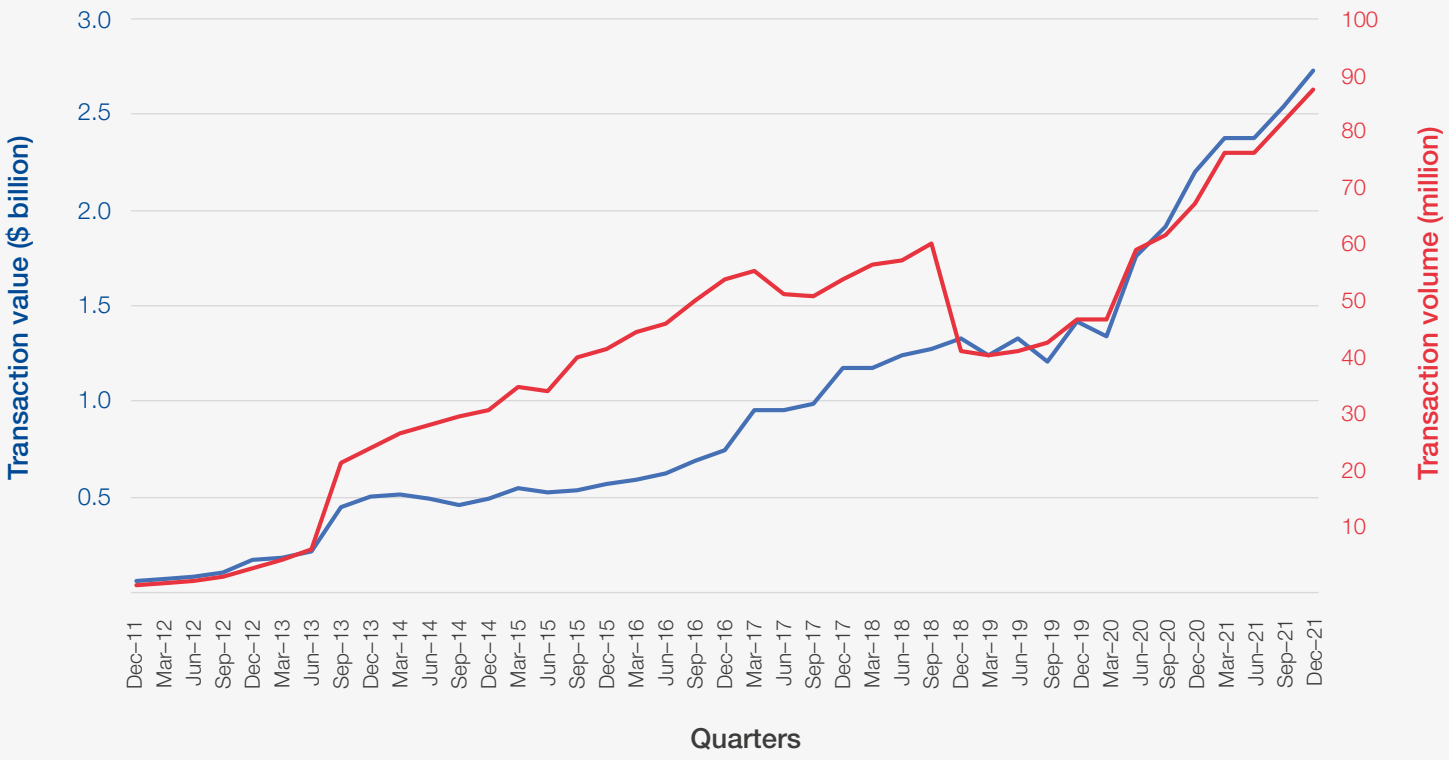
Digital payments are contributing to the surge in mobile commerce and the digitalization of retail. Research shows that the volume of mobile purchases surpassed desktop in digital trade. In 2021, almost 60% of the region's total e-commerce volume was paid through mobile phones, a 46% increase from 2020.[32] The use of mobile money – a service in which a mobile phone is used to access financial services – has also gained market share in LAC.[33] The number of registered mobile money accounts has been increasing over the past decade, with a spike in 2020 (figure 3).[34] In 2020, the number of registered accounts increased almost 40%. The same is true for the transaction value of mobile money; transaction values went from less than $1 billion in 2011 to nearly $2 billion in 2020. They increased 36% in 2020 alone (figure 4).

FIGURE 3 | **Mobile money accounts in LAC**



Source: GSMA, Mobile Money Metrics [Database], https://www.gsma.com/mobilemoneymetrics/.

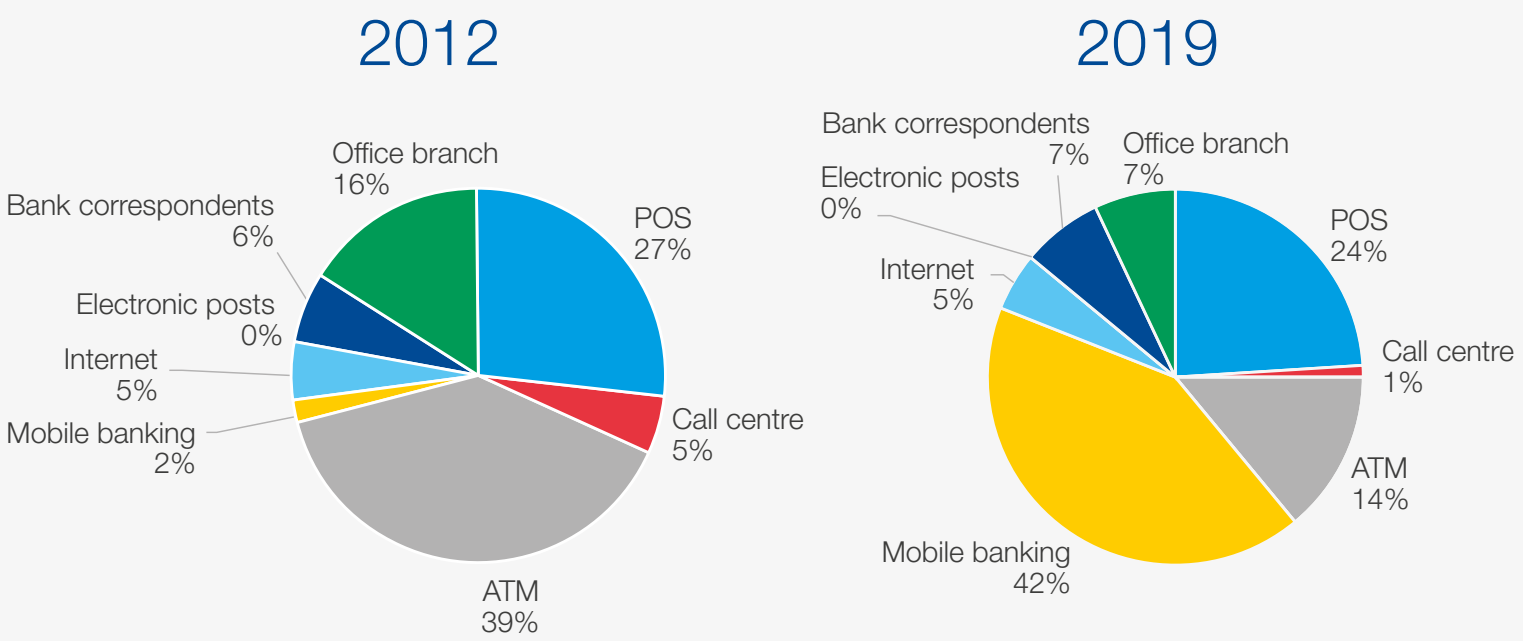
FIGURE 4 | **Mobile money transactions in Latin America and the Caribbean, value and volume**



Source: GSMA, Mobile Money Metrics [Database], https://www.gsma.com/mobilemoneymetrics/.

Throughout the region there has been a major shift to digital banking, particularly the use of mobile banking. Digital banking grew at an average annual rate of 144% from 2009 to 2019 and transactions through mobile banking grew by at least 48% in 2020 in Latin America (figure 5). This trend is projected to continue.

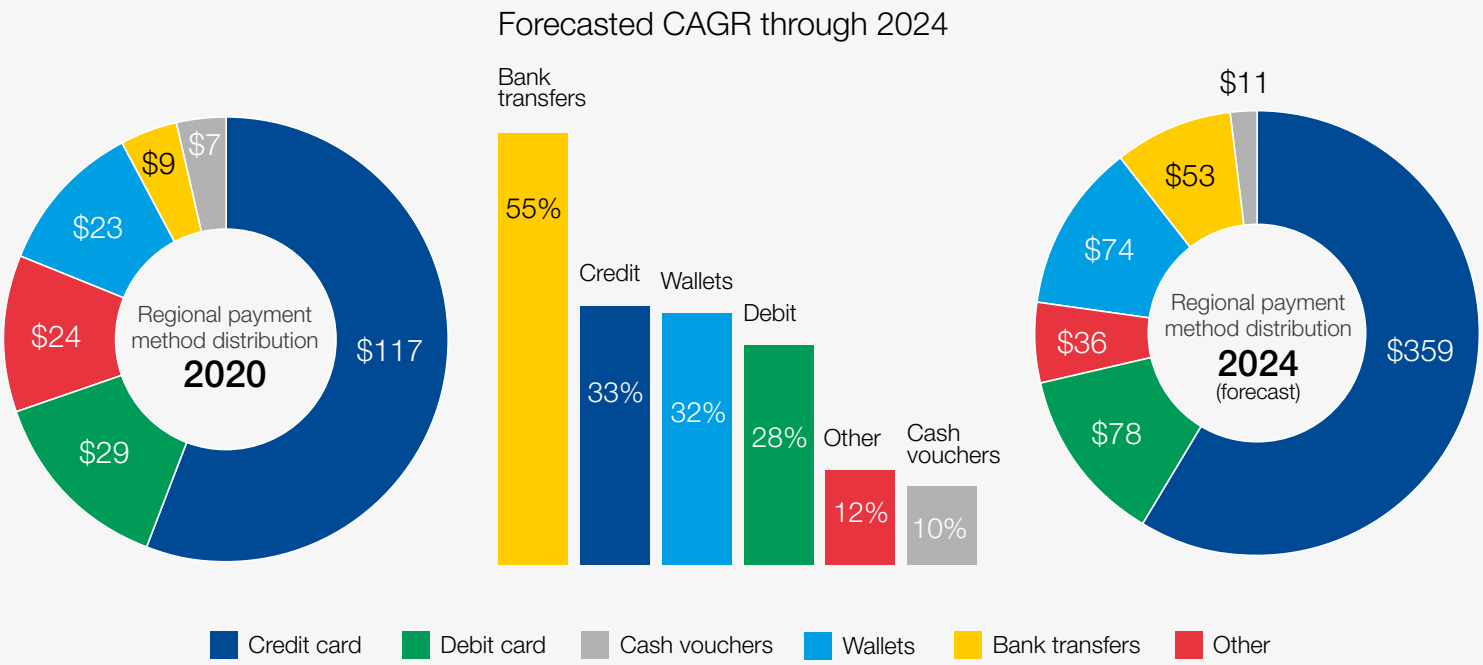
FIGURE 5 | **Relative share of the number of transactions in Latin America, 2012 vs 2019**



Source: FELABAN, Acceso Financiero Edición # 4, 16 February 2021, https://felaban.s3-us-west-2.amazonaws.com/acceso_financiero/ACCESO%20FINANCIERO%20No.4.pdf.

The primary payment method for e-commerce across LAC is credit cards. However, bank transfers, especially online, are driving the growth of payments across the region. Bank transfers in LAC are expected to achieve a compound annual growth rate (CAGR) of 55% between 2020 and 2024, according to a 2021 report by AMI.[35] This trend has prompted all financial services players, from central banks to fintechs, to invest in creating better user experiences for customers using bank account-based payments on online-digital platforms, such as smartphone-based apps.

FIGURE 6 | **Composition of e-commerce digital payments in Latin America and the Caribbean**



Source: Americas Market Intelligence, Latin America E-Commerce Blueprint 2020-2024, August 2021.

2

Barriers to digital payment adoption

Despite the steady growth of digital payments in LAC, cash remains the preferred transaction method for a large share of the population and many remain financially excluded.

2.1 Access to digital payments

Low-cost, reliable access to the internet and mobile broadband internet are a foundational building block for digitalization. A World Bank study of 120 nations from 1980 to 2006 found that each 10-point increase in broadband penetration added 1.3% to a country's GDP.[36] Access to payment hardware like POS terminals or QR readers can also be a barrier. For MSMEs in particular, these technologies may not be readily available or may be cost prohibitive. Another barrier is the large financially excluded segment of the population. An awareness of available products and services and the knowledge to use them is equally as important as access to infrastructure. Without it, entrenched behaviour such as mistrust in the formal financial system can lead merchants to miss out on opportunities to digitalize their business, go online or upgrade their existing operations. In Latin America, 50% of unbanked adults report not having an account because of a lack of trust in financial institutions.[37]

Overly strict know-your-customer (KYC) requirements are another barrier to MSME participation in the financial system. KYC is a standard due diligence process that requires banks to verify the identity and assess the risk factors associated with doing business with potential merchants and is used to verify the identity of individuals opening a bank account. Most KYC relies on in-person, paper-based processes, which can be a barrier to people living in rural areas and lower-income segments of the population that may not have the necessary documentation (such as a government-issued ID) or knowledge and skills to fill out long forms. One study has found that merchant onboarding processes are one of the reasons 80% of MSMEs are relegated to the informal economy.[38]

2.2 Regulatory barriers and lack of standardization

When many aspects of the regulatory framework were designed (for instance, consumer protection, taxation, financial supervision, know-your-customer), regulators did not imagine how players would apply the new technological developments to financial services such as open banking, digital wallets or cryptocurrencies. These new business models are bringing new challenges for regulators. Outdated or onerous regulation and a lack of standardization hinder digital payment growth and innovation.

Adherence to international standards like ISO messaging standards and the EMVCo standard helps facilitate payments among different payment methods. The harmonization of standards is especially important for facilitating international digital trade, which relies on cross-border payments. Financial institutions that operate on older messaging systems or their own proprietary domestic standards cannot easily connect with newer systems and are not able to pass on the necessary information to facilitate cross-border transactions (such as information need to comply with anti-money laundering and KYC requirements) or pass along enough data to allow for straight-through processing without manual interventions or delays.[39] International standards such as ISO 20022 and EMVCo provide wide-ranging benefits. ISO 20022-based transaction systems allow rich data collection functionality that enables the adoption of data analysis solutions and added value services for customer insights and reduces the cost associated with integrating payment systems.

A lack of internationally recognized standards like the ISO messaging standards ISO 20022 and EMVCo standards can add friction to transactions, which can increase costs for merchants and consumers and reduce adoption.[40] For example, the Mexican QR payment CODI framework uses domestic standards rather than EMV international standards, which has contributed in part to the low adoption by non-banking institutions and MSMEs. In the Caribbean, weak interoperability between digital payments systems has influenced the continued preference for cash. For example, money can be held virtually in a mobile account or even a digital wallet but the framework is not in place to allow for the easy transfer from these types of accounts to a debit or a credit card account.[41] Another example is the lack of uniformity in e-commerce authentication tools across LAC countries. Aligning international standards and adoption facilitates payment transactions between different applications and infrastructure to enable straight-through processing.

Regulatory frameworks can prevent non-bank digital financial service providers (such as payfacs, fintechs) from entering the market. Worldwide, 59% of countries have a regulatory framework in place for non-bank e-money issuers, including over 70% of countries in sub-Saharan Africa and East Asia.[42] However, just 44% of countries in LAC report having a regulatory framework in place for non-bank e-money issuers. Without such regulatory frameworks in place, non-bank e-money issuers may be restricted from providing mobile money and other digital financial services. Such regulatory frameworks are also needed

The lack of internationally recognized standards adds friction to transactions, increasing costs for merchants and consumers and reducing adoption.

to attract investment, establish a level playing field with incumbent providers, ensure adequate risk management, and put in place consumer protections. Open banking and open finance, which are gaining popularity in the region, rely broadly on the adoption of standards for sharing information and initiating payments.

2.3 Market access and competition

Government policies or regulation can create barriers to entry for payment providers trying to innovate in the market. Many countries adopt onerous licensing requirements, capital requirements, domestic processing and data restrictions to enhance security, control costs or address privacy concerns but have the unintended consequence of creating market access barriers. For example, some countries may require strict requirements to grant a business license, such as capital requirements, forced joint ventures or a requirement to set up a local entity. This disincentivizes international payment service providers from operating or investing in those markets. Smaller companies like fintech start-ups may not have the capital or personnel needed to meet those requirements. When governments enact these types of onerous requirements it can limit the supply of cross-border payments in their market, which impacts the ability of local businesses to participate in international trade. Similarly, requirements to process all transactions by a single local switch or process transactions onshore can impact the ability of firms to offer digital payment solutions for e-commerce, especially cross-border digital trade.

A lack of competition within a market or region can also prevent digital payment growth. In LAC, as in many regions, digital financial services are bank-centric and characterized by low competition and high costs for financial consumers. For example, without a competitive acquiring market there may not be adequate incentives in place to serve the long-tail segment of MSMEs that are higher risk and lower value return. A 2020 World Bank study on competition in retail banking services in LAC found evidence of high and growing market concentration as well as inadequate contestability.[43] Descriptive and empirical evidence suggests that higher bank market shares are correlated with less competitive pricing in retail products. Indeed, according to the World Bank's Global Findex, 52% of unbanked adults in LAC cite high costs as a barrier to financial inclusion, a significantly higher rate than the unbanked in other regions.[44]

Open and non-discriminatory access to payment infrastructure is necessary to foster competition and innovation. In most LAC countries, payment infrastructure is either controlled by the banking sector or has been developed by the central bank around a bank-centred model. Non-bank payment providers often do not meet eligibility criteria for accessing payment infrastructure such as licensing requirements or face prohibitively high capital requirements. This limits interoperability among products and constrains the growth of innovation and new providers.

3

Growing digital payments in LAC: Proposed solutions to overcome barriers

Just like international trade requires a good enabling environment to function, so too do digital payments.

For payments to work the whole ecosystem needs a regulatory and policy environment that reduces friction and encourages competition and innovation. Governments and industry should cooperate to define rules and standards that enable a level playing field and provide equitable and secure access to payments. Solutions should consider not just merchants but also the consumer perspective, which will contribute to building trust and ensure further adoption in the long run.

The following key principles can help overcome the barriers to digital payment growth in LAC.

3.1 Build good regulatory practices to reduce market barriers and promote innovation

Encouraging interoperability, adopting global industry standards and promoting a level playing field in digital payments and financial services is the foundation for a thriving digital payment ecosystem.

Implement rules to promote financial inclusion: Adjusting regulations to allow flexible account requirements for low-value and low-risk accounts can facilitate access to financial services. Several countries in LAC have updated their regulations to allow for tiered and risk-based KYC procedures. For example, in Colombia the government implemented SARLAFT 4.0 (AML 4.0), which changes the conception of the KYC and anti-money laundering (AML) rules from one based on in-person interviews and highly prescriptive rules to a principle-based approach where financial entities are allowed to design and implement their own AML procedures as long as they comply with general rules and principles prescribed by the authorities.[45] In Mexico, the government introduced a tiered KYC system in 2011 that allows banks to offer a wider variety of bank accounts and bring more people into the formal financial system. During the first two years of the new system 9.1 million new accounts were opened.[46]

Adopt global standards: Adopting global standards such as EMVCo and ISO 20022 messaging standards can facilitate more seamless transactions and compliance with regulatory and AML/KYC requirements. In the payment sector, EMVCo and ISO are two organizations that set relevant standards for messaging transactions. For example, EMVCo worked with payment companies, banks and merchants worldwide to create Three-Domain Secure (also known as 3-D Secure or 3DS). This technology is designed to provide an extra layer of fraud protection for online credit or debit card payments by establishing an additional security protocol for e-commerce transactions. When relevant standards already exist, regulators can use them as a reference to facilitate adoption, depending on the level of implementation by the industry. For instance, when EMV standards (enabling PIN and chip technology) became broadly used in LAC, some regulators started mandating their adoption by financial institutions as a mechanism to ensure 100% of transactions use a technology that has proven efficient to prevent fraud without impacting the consumer and merchant experience. Recently, both the SFC in Colombia and the SBS in Peru have enacted regulations to promote the adoption of the 3DS standard.

Encourage greater interoperability: Payment system interoperability allows an end-user to make a transaction, regardless of the network and without having to worry about the operational aspects behind the scenes. Imagine the telecommunications world without interoperability. A consumer would have to worry about the mobile network chosen by friends and family and, in extreme cases, have contracts with all carriers. The same holds true for payments. The bank, credit union or payment network shouldn't be a factor in making a payment and global commerce. Without interoperability, modern electronic commerce would look far different and the friction in basic payments would be a massive obstacle to millions of consumers and merchants, including increased costs.

When digital payment infrastructure is structured to be both open and inclusive, it drives payment volume and reduces unit costs and end-user fees, while encouraging robust competition and innovation in the ecosystem.[47] Adopting internationally recognized standards facilitates payment transactions between different applications and infrastructure to enable straight-through processing. For example, adopting global standards like ISO 20022 messaging standards promotes interoperability by standardizing messaging formats and by enabling service providers to pass along information between their payment systems. This facilitates transactions between different applications and infrastructure, reducing time and costs for consumers and merchants. Interoperability can be facilitated through regulators, for example, through mandates or by embedding interoperability into the design of new payments systems.

Promote a level playing field: Digital payments thrive when all players – including domestic operators, payment networks and non-bank entities – are able to participate and compete in the market. Regulators can create an enabling environment by reducing barriers to entry, such as by streamlining and harmonizing licensing requirements so fintechs, for example, can easily operate in the market and so the market can accommodate technological changes and payment system modernization. Streamlining licensing requirements is the idea that operator licenses in one

Governments and industry should cooperate to define rules and standards that enable a level playing field and provide equitable and secure access to payments.

country can be passported into another if certain regulatory requirements are met. This currently exists among European Union (EU) member states, with potential plans to expand outside of the EU. With sufficient coordination among regulators, streamlining license requirements offers a good way for fintechs to scale and expand into more markets.[48]

Another critical aspect of creating a level playing field is to adopt best practices related to the provision and supervision of public services. Where central banks are developing their own domestic payment systems there should be a clear separation between regulatory oversight responsibilities and managerial responsibilities, and the transparency of policies and functioning of the system. This ensures no one player is advantaged over another. This concept is similar to the national treatment principles and most favoured nation principles that are the norm in international trade practice. In fact, international organizations like the Organisation for Economic Co-operation and Development (OECD) recognize the importance of the separation of roles of regulator and market participant, and of frameworks that ensure a level playing field for all market actors.[49]

3.2 Encourage public-private sector collaboration

Innovations in payments are accelerating. To ensure these developments are inclusive, sustainable and secure the public and private sectors must work together to deliver products and services that meet individual and business needs.

A great way that government and industry can work together is through the use of regulatory sandboxes and innovation hubs. Regulatory sandboxes are a controlled environment in which certain regulatory requirements are temporarily suspended or additional support measures are provided to allow experimentation with new products, often with a limited number of players. Colombia was the first country in South America to launch a regulatory sandbox. The Financial Superintendence (Superintendencia Financiera de Colombia (SFC)) did this in 2018 alongside an innovation hub. During its first two years of operation, it "graduated" four pilots related to financial services, including financial education, digital accounts and transactions. A recent pilot was launched among nine entities to test for payments using crypto-assets.[50] Regulatory sandboxes allow governments to encourage efficient product innovation in the financial services sector while limiting systemic risks. They also provide opportunities for governments to take advantage of the benefits fintech brings (such as lower cost solutions and enhanced competition) while testing out the optimal regulation.

Partnering across industry and government can leverage the strengths of the private and public sectors and thereby accelerate digital payment growth. A World Bank review of 13 studies on enabling acceptance finds that successful programmes tend to implement a mix of incentives, with governments focused more on subsidies, fiscal incentives and regulation, and the private sector focused on product and service innovations.[51] Examples of incentives implemented across markets typically involve: (1) merchant incentives that include subsidies for point-of-sale (POS) terminals and tax reductions, such as value-added tax (VAT) credits, for transactions using electronic means of payment; (2) consumer incentives like VAT rebates[52] or income tax deductions based upon volume of digital payment spending, lottery promotions based upon usage; (3) government adoption of electronic payments leading by example through a comprehensive electronic government programme that includes both disbursement of funds with electronic payments and acceptance across the range of services provided by government agencies.[53]

3.3 Explore digital trade agreements to secure safe cross-border digital payments

Accelerating the adoption of digital payments can be facilitated through trade agreements that promote digitalization, industry standards and interoperability and provide incentives for domestic industries to promote them by ensuring reciprocity among trading partners.

The recently finalized Digital Economy Partnership Agreement (DEPA) among Comprehensive and Progressive Agreement for Trans-Pacific Partnership (CPTPP) countries Chile, New Zealand and Singapore is novel in both its handling of digital financial services and its focus on digital payments. The agreement has a dedicated chapter on digital payments (2.7) with a focus on international standards. Signing parties of the DEPA "agree to support the development of efficient, safe and secure cross-border electronic payments by

fostering the adoption and use of internationally accepted standards, promoting interoperability and the interlinking of payment infrastructures, and encouraging useful innovation and competition in the payments ecosystem."[54]

DEPA is also the first agreement to promote open banking in a trade agreement. Parties agree to stimulate the use of open APIs and advise third-party players to "facilitate greater interoperability and innovation in the electronic payments ecosystem." By committing to adopt internationally accepted standards and boost data sharing between payment providers, the DEPA seeks to increase interoperability and promote a more seamlessly integrated network of networks for digital payments. This additional commitment rounds out DEPA's holistic approach to reducing cross-border payment friction, which takes into account the full value chain of interconnected payment networks.

3.4 Facilitate new technologies and innovation

Three areas of innovation are impacting the development of digital payments in LAC.

Fintechs and open banking: Open banking regulations and fintechs are playing a significant role in creating innovative products and advancing financial services and digital transformation. Open banking refers to consumers and businesses sharing their financial data with third-party applications and firms in order to access new and innovative financial services. Open banking promotes the participation of new fintechs and other players by lowering the barriers to market entry, thereby encouraging more competition. This tends to lower costs for consumers and businesses. Regulators should encourage reciprocity, strengthen collaboration on sharing experience and formulate policy recommendations related to various approaches at regional and international levels.

Several countries in LAC have open banking frameworks in place or are consulting with industry on how to develop a suitable regulatory framework. Brazil, for example, completed its phased approach to open banking earlier this year. Colombia and Mexico are in the process of developing their respective frameworks and Peru is contemplating open banking.

Modernizing payment systems: With the development of new technologies and new demands from consumers and merchants, modernizing payment infrastructure and systems can contribute positively to digital payment growth. Many countries in LAC have developed RTP systems. Pix in Brazil, for example, was created in part as a financial inclusion initiative to serve those without a traditional financial institution account. RTPs can be further developed and improved through value-added services that are already available from existing payment players and industry experts. To ensure payment system modernization contributes to the growth and improvement of the overall digital payment economy governments should ensure they are operating under good governance practices to encourage competition and a level playing field. For example, there should be a clear separation between the operator and regulator of payment systems, something the Pix system in Brazil has not yet achieved. A level playing field and open systems that allow competition can greatly enhance the benefits RTPs bring. This requires the adoption of common standards and cooperation between government and industry.

Digital currency: CBDC and crypto assets, among other digital currencies, are gaining traction in LAC. Like other new technology and payment systems they have the potential to improve financial inclusion, contribute to more efficient digital trade and facilitate broader digital payment growth. Countries throughout LAC are experimenting with digital currencies. The Bahamas was the first country in the world to launch a CBDC. Countries like Brazil, Trinidad and Tobago, Peru and Uruguay are now consulting with industry on the value of and how to create their own CBDC. El Salvador made Bitcoin – a crypto asset – legal tender in 2021 and Paraguay recently approved a bill to facilitate the commercialization of crypto assets. Digital currency is appealing to governments as a means to increase access to digital payments, improve efficiency by potentially lowering costs, or provide a government-backed alternative to cash.

4 Going forward

Despite the challenges facing LAC – the persistence of financial exclusion, a preference for cash, regulatory barriers and market access issues – the region has seen incredible growth in the digitalization of payments and the benefits that come with it, such as the empowerment of MSMEs, growth in digital trade and providing more people with access to financial services.

To further advance digital payments, there needs to be an "all hands on deck" approach with all public and private sector actors: governments and industry adopting new technology to help modernize payments and facilitating innovation in the payments ecosystem; individuals and businesses taking advantage of these new innovations and digitalizing; and intergovernmental and multilateral institutions actively investing in the development of fintech and innovation sectors.

The recommendations in this report should be viewed as a holistic and integrated approach: public and private sector cooperation could lead to better informed regulatory practices, digital trade agreements could further lower market barriers, and better regulatory practices could, in turn, foster more innovation.

Ultimately, the goal of this work is to accelerate digital payments itself and increase financial inclusion, create more jobs and grow the regional economy in LAC as a whole in the age of the Fourth Industrial Revolution.

Contributors

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