Chicago Fed Letter

Evaluating the potential of immediate funds transfer for general-purpose payments in the United States

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Immediate funds transfer (IFT) is a convenient, certain, secure, and low-cost means of electronically transferring money between bank accounts with no or minimal delay in receivers' receipt and use of funds. Yet IFT is not widely available in the U.S. This article summarizes discussions on the potential for IFT in the U.S. held at the Symposium on Immediate Funds Transfer for General-Purpose Payments, sponsored by the Federal Reserve Bank of Chicago, on September 7, 2011.

While immediate funds transfers are not widely available in the U.S., they are becoming routine in some other countries. **In** the U.S. today, it is next to impossible for most individual consumers and businesses to make an immediate funds transfer.1 Cash is the main vehicle for immediate payment transactions, despite the fact that advanced technology has enabled real-time transfer of information in many other areas of daily life. Consider, for instance, the immediate nature of email, text messaging, social media, and e-commerce. As Jeff Lacker, president of the Federal Reserve Bank of Richmond, pointed out in a keynote speech at the symposium, "The dramatic innovations in information processing and communication technology that we have seen in recent decades have made payments practices feasible that not too long ago were utopian. People now carry around with them their own personal connections to universal communications networks."2 This technology is currently used for information and communications immediacy, but one could imagine that it could be adapted for immediate funds transfer as well. In fact, as highlighted at the symposium, other countries, such as Mexico and the UK, have already implemented IFT for general-purpose use through the banking system. Thus far, IFT for generalpurpose payments in the U.S. has been

developed chiefly by nonbank players (like PayPal) using closed-loop, proprietary systems not denominated in commercial bank money. The primary objective of convening the symposium was to address the obvious question: What is the potential for IFT in the U.S., especially in light of the experience of its use in other countries?

How are payments made in the U.S. today?

Options for making and receiving generalpurpose payments in the U.S.—whether by individuals, businesses, or governments-abound. Most small-value transactions are made in cash, though debit cards have been gaining traction for such payments. Checks, though declining in usage, are still commonly used by individuals to pay friends, household workers, and utility bills. Checks are also routinely used by all but the largest businesses for trade payments. Debit, credit, and prepaid cards are used by individuals at the point of sale in brick-and-mortar stores and for online and mobile commerce. Businesses and governments use a form of direct credits to make salary and benefit payments. Many people use direct debits, which are the electronic equivalent of checks, to pay monthly

recurring bills, such as mortgage and insurance payments. Direct credits and direct debits are also used by businesses to make and receive trade payments and for cash management. Yet the ability to make an *immediate payment* between bank accounts *does not exist today in the U.S.*—at least not in a convenient, certain, and low-cost way.

Businesses and financial institutions routinely make immediate large-dollar payments using wire transfers. However, wire transfers are extremely cumbersome and expensive for individuals to use for can easily, cheaply, and quickly send an electronic payment from their bank accounts to the payees'. Senders and receivers of IFT get immediate notifications that the transfer was made, and receivers can use the money right away for other transactions. These international case studies may have implications for the U.S., since they shed light on the possibility of IFT being more widely offered here.

The case of Mexico

In 2004, Banco de México—the central bank of Mexico—unveiled a real-time

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general-purpose, everyday payments. In addition, online shoppers and small merchants can transfer value between themselves quickly with private currency that has been transferred from their bank accounts and then converted for use in a closed-loop system (e.g., PayPal dollars). However, such systems do not provide the ubiquity and thus the convenience of bank account payments, where any sender can pay virtually any receiver regardless of which bank holds the funds. Moreover, certain closed-loop systems currently charge ad valorem fees, going against the long-standing policy preference for clearing payments at par.

While immediate funds transfers are not widely available in the U.S., they are becoming routine in some other countries. At the Chicago Fed's IFT symposium, participants learned about IFT in Mexico and the UK. In Mexico, IFT has been available via a system operated by the central bank since 2004. In the UK, IFT has been available via a privately operated system since 2008. In both cases, the only requirement is that the sender and receiver have a bank account with a bank that participates in the IFT system.3 While the history of IFT implementation in these two countries is completely different, its impact on payment system users is the same: Using a bank website or telephone, consumers, businesses, and governments

gross settlement (RTGS) payment system called SPEI (Sistema de Pagos Electrónicos Interbancarios). Real-time gross settlement means that transactions are processed and settled individually in real time between banks with finality. (In the U.S., the RTGS system is Fedwire, operated by the Federal Reserve Banks.)4 In many countries, RTGS systems are used for specialized interbank transactions. In Mexico, SPEI is used both for specialized interbank transactions and for general-purpose transactions originated by end-users, such as consumers and businesses.5 End-users access IFT through commercial banks, primarily via Internet banking. Once an IFT is initiated by a sender, the payment is final to the receiver within one minute; the interbank portion of the transfer is completed within one second. As the system operator, Banco de México charges a small fixed fee to commercial banks for an SPEI transfer. Banks set their own customer fees for an SPEI transfer, typically about \$0.40, although many banks offer the service free of charge to retail customers or provide it bundled with other services for a single set fee. Senders and receivers are able to view the status of an SPEI payment on the central bank's website, and in the near future, the central bank will provide the receiving bank capability to send an "official receipt" to payment recipients. In short, consumers and

businesses can send a payment quickly at low cost with immediate assurance of payment receipt.

The system has worked so well that in 2008, the Mexican federal government began using SPEI for some payroll and vendor payments. Today, all federal government payroll and vendor payments are made using SPEI, and soon social security pension payments will be made on SPEI as well. Banco de México also intends to make IFT available via mobile phones—which is key in Mexico because a high percentage of residents do not have bank accounts, although mobile phone penetration is nearly universal.

The case of the UK

The push for IFT in the UK came from its federal government, when the Office of Fair Trading announced its intention to push banks to reduce float time on "standing order" payments (i.e., the time in transit of these uncollected payments) from three days to one day.6 With the looming pressure of regulation, UK banks took up the challenge to reduce the float time; in the end, the banks voluntarily agreed to go beyond the one-day clearing mandate and developed a payment mechanism that would be better suited to end-users' demand for payments that could be completed within minutes. The UK banking industry came up with Faster Payments, a service that provides irrevocable, immediate payments for general-purpose use. VocaLink, a private sector electronic payments company, built the Faster Payments service in cooperation with all the major UK banks (13 at the time, now 11). Faster Payments is not an RTGS system like SPEI in Mexico. Rather, Faster Payments updates the sender's and receiver's bank account balances immediately once a payment is initiated and provides confirmation of payment to the sender and receiver as well. Movement of customer funds between banks is completed on a net basis every few hours. Faster Payments is managed by the CHAPS Clearing Company, a bank-owned company that also manages the RTGS system in the UK.

Banks offer Faster Payments to their customers via Internet banking, which customers access on either a computer or mobile phone. As with transfers on Mexico's SPEI, customer fees for Faster Payments are left to the commercial banks to decide. However, because of a long-standing custom in the UK, consumers are typically not charged for payment transactions. Rather, they may pay a fixed monthly fee for a transaction account. Business users of Faster Payments pay a low fixed fee per transaction. Faster Payments has caught on so quickly that it is being used for more types of payments than originally envisioned. For example, Faster Payments is now used for spontaneous personal payments, urgent business payments, and lastminute bill payments. Furthermore, industry data indicate that growth is not simply a shift in payments from other electronic systems to Faster Payments.

IFT in the U.S.?

Anecdotal evidence from participants at the Chicago Fed's IFT symposium suggests that, while consumers, businesses, and governments are fairly content with the existing payment options in the U.S., there are cases in which the ability to make an immediate funds transfer could be useful. Examples include:

- Households—to transfer money between family members;
- Individuals—to make spontaneous payments;
- The U.S. Treasury Department—to improve cash management related to tax revenue collection and other federal payments;
- Merchants—to enable quicker delivery of goods upon receipt of payment;
- Small businesses—to better manage cash inflows and outflows:
- Special cases—to disburse timesensitive life insurance or annuity payments; and
- Extreme cases—to ensure that payment transfers can still be made even when existing methods of exchange may not be available (e.g., after major disasters, such as Hurricane Katrina or September 11, or in the event of a mass compromise of payment card transactions).

These and other examples suggest that there is a need that is not being met by existing payment services in the U.S. Additionally, the public policy implication of these examples is that payment system users in the U.S. may be better off with a convenient, certain, and lowcost IFT service. The extent of the need for IFT has not been measured, and the potential costs of such a service have not been compared against its potential benefits. That said, the potential benefits of an IFT service to the overall economy might be greater than the sum of its benefits to individual users. For example, as noted earlier, Faster Payments in the UK is currently being used for more payment types than originally envisioned.

So why does the U.S. continue to rely on existing slower payment mechanisms? As many symposium participants stated, the answer is complex. Several factors stand in the way of innovation, including the sheer number of banks and the extremely wide range in the size of institutions. Also, many banks operate legacy "core" processing systems that operate in batch mode—in other words, most bank systems do not keep track of customer accounts on a transaction-by-transaction basis during the day. So, the costs of an IFT service could be substantial if backoffice retooling was required. In addition, regulatory uncertainty created by recent banking reform legislation may have a dampening effect on large-scale investment in innovation. Finally, banks profit handsomely today from the fees they charge their corporate customers for wire transfers, and thus, a low-cost option for immediate payments might adversely affect their existing revenue streams.

Payments governance in the U.S.

The previous section addresses the potential impediments to implementing IFT, but it does not necessarily explain *why* such a system should not exist if it is technologically feasible and justifiable on public policy grounds. Apparently, the one major barrier to IFT innovation in the U.S. is governance. In Mexico and the UK, the push to make IFT more widely available came from a public sector body: the Mexican central bank and the Office of Fair Trading, respectively.

Not only did the push come from a public authority, but ongoing oversight rests with the public sector as well. In Mexico, the central bank has statutory oversight responsibilities for all payment systems, including systemically important financial market infrastructures, retail payments, and private clearinghouses. In the UK, the Payments Council, which grew out of a task force of the Office of Fair Trading, sets strategy for all UK payments in cooperation with payment system operators and banks.

The U.S. lacks a central public sector overseer of the payment system. To some extent this role is handled by the Federal Reserve Banks and Board, as operators of retail and large-value payment systems and as statutory overseer of certain payment system regulations, respectively. Yet the total amount of retail payments that are cleared by the Federal Reserve Banks has shrunk dramatically in the past few decades as private card networks and competitors in check and automated clearinghouse (ACH) clearing have emerged. And the Board's statutory oversight is limited to certain aspects of payment clearing and settlement. Indeed, today each payment servicei.e., checks; debit, credit, and prepaid

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cards; direct debits and credits; and wire transfers—is governed by a different rulemaking body. As a result, the U.S. payments industry has one of the most fragmented and decentralized governance structures in the world. The bodies that govern payments are often private, operate independently, and have no overall coordination structure or strategic oversight. This decentralized system of payments governance makes it difficult to push for the implementation of IFT across the entire industry.

The decentralized system of payments governance in the U.S. may reflect preference in the U.S. for market solutions to payments needs. Some would argue that in the U.S., an industry-wide push made by a public sector body to implement a payment innovation like IFT is unnecessary because the market will eventually fill any gaps; a public authority such as the Federal Reserve should focus on core central bank issues that affect payments such as price stability. After all, because of the decentralized, "Wild West"

nature of payments governance in the U.S., innovations such as PayPal and Amazon Payments were able to emerge and thrive, changing the course of payment transactions around the world.

While there may very well be benefits to decentralized payments governance, there may be drawbacks as well. Individual banks evaluate the costs and benefits of a payment service from an internal perspective, whereas an independent central body would presumably focus on the bigger picture. Such a body could address the following questions: What are the public policy benefits of payment innovations? And what are the elements of an ideal payment system? A perfect example of the benefits of a big-picture perspective on the U.S. payments industry was a push by the central bank, with a corresponding change in federal law, to induce check electronificationdeemed a resounding and almost universal success; Check 21,10 which makes check processing quicker and more efficient, has been the single fastest

improvement to payments in the history of the U.S. economy.¹¹

Conclusion

The Federal Reserve has long-standing policy goals that the U.S. payment system should operate efficiently and securely and without barriers to access. Central bank interest in IFT arises because of public policy considerations—i.e., the potential for IFT to improve the U.S. payment system and bring overall efficiencies to the U.S. economy. Whether the benefits of an IFT service would outweigh the costs is unclear. However, it is important to remember that while onetime costs required to start up a new system or retrofit an existing system could be significant, the benefits associated with IFT would be ongoing. The Federal Reserve Bank of Chicago values further exploration of the need for IFT in the U.S., with cooperation from industry partners to develop a research and action agenda.

- ¹ For more on IFT, see Bruce J. Summers and Kirstin E. Wells, 2011, "Emergence of immediate funds transfer as a general-purpose means of payment," *Economic Perspectives*, Federal Reserve Bank of Chicago, Vol. 35, Third Quarter, pp. 97–112, available at www.chicagofed.org/digital_assets/publications/economic_perspectives/2011/3qtr2011_part2_summers_wells.pdf.
- ² Jeffrey M. Lacker, 2011, "Immediate funds transfer: A central bank perspective," speech at the Symposium on Immediate Funds Transfer for General-Purpose Payments, Federal Reserve Bank of Chicago, September 7, available at www.richmondfed.org/press_room/ speeches/president_jeff_lacker/2011/ lacker_speech_20110907.cfm.
- ³ It is important to note that IFT is not readily available to the unbanked in either country.

- According to panelists at the symposium, approximately 4% of residents in the UK are unbanked, while that number is close to 80% in Mexico.
- ⁴ RTGS contrasts with systems that process payments in batches with delayed settlement, such as an automated clearinghouse (ACH) system.
- 5 About 90% of payments on SPEI are for under \$8,000.
- ⁶ In the UK, a standing order payment is a prearranged, recurring payment.
- ⁷ See www.paymentscouncil.org.uk.
- 8 It should be noted that the banking industries in Mexico and the UK are much more centralized than those in the U.S. Mexico has about 40 commercial banks and the UK has about 380, according to the

- Bank for International Settlements. In contrast, the U.S. has over 7,000 commercial banks and savings institutions, as well as over 7,000 credit unions, according to the Federal Deposit Insurance Corporation and National Credit Union Administration.
- ⁹ See, e.g., Lacker (2011).
- ¹⁰For more details on Check 21, see www. federalreserve.gov/paymentsystems/ check21_faq.htm.
- ¹¹For more information on the public policy benefits of payments efficiencies, see Katy Jacob, Daniel Littman, Richard D. Porter, and Wade Rousse, 2010, "Two cheers for the Monetary Control Act," *Chicago Fed Letter*, Federal Reserve Bank of Chicago, No. 275, June, available at www.chicagofed.org/digital_assets/publications/chicago_fed_letter/2010/cfljune2010_275.pdf.