

NCR PERSPECTIVE

Security and convenience - the business case for mobility

By Claire Shufflebotham, NCR

Consumer trust continues to fuel the global growth in self-service

Retail placement and new emerging markets have accelerated the growth in self-service worldwide. This growth is accompanied by an increasing number of applications that go beyond the traditional ATM transaction set, including bill payment, remittances, airline check-in and ticketing. It is the popular convenience of these new services that will ensure the business case for growth into the new world of mobile services. But fundamental to their success is security and the continued trust of consumers.



NCR

*Claire Shufflebotham
Senior global marketing
manager for Financial
Solutions*

What examples are there of new self-service transactions?

Consumers in countries around the world are now using the ATM for bill payment. These include Romania, Turkey and Spain, Mexico and other countries in Latin America, as well Southeast Asia. Loan repayment via self-service is available in Russia. In the USA, cheque cashing and money transfers are two key services targeted at migrant workers who may desire to send money home. Coffee workers in Latin America can access their salary or benefits by entering their government social identification number into the ATM, along with their fingerprint, instead of using a personal identification number (PIN) and card.

In Malaysia, consumers can top-up or reload their pre-paid, contactless 'Touch 'n Go' travel cards at the ATM. The consumer pays a small fee for this convenience, the equivalent of about 30 US cents. This is proving so popular with consumers that

there are now more ATMs offering this service than kiosks or retail outlets. Furthermore, plans are in motion to offer ATM top-up to non-bank customers, using cash deposit functionality rather than account debit. Cardless transactions are popular in Turkey and Thailand where funds are withdrawn via the ATM upon entering a secure PIN sent via mobile phone.

So are consumers' needs changing?

Consumers always demand more! They want more convenience and are becoming increasingly credit challenged.

There is a growing migrant population worldwide. An estimated 200 million migrants reside in developed countries and send home an estimated \$232 billion a year. This comes at a price, with remitters charging between 5 and 15% of the remittance for the convenience.

Developing markets are also changing the rules. As these economies grow, there is increasing need to provide financing and loans for 'underbanked' segments, referred to as 'inclusion banking'. Self-service has a vital role to play in extending the reach of financial services in these markets.

It is ever-more appealing to be able to access cash, pay in cash at the last minute, to repay bills and loans via self-service, to cash cheques or send money home. For deployers, this offers new potential to acquire customers, build loyalty with existing customers and generate revenue.

What new technologies are enabling these new services?

There is a clear convergence now between established trusted channels, such as the ATM, and newer consumer interfaces such as the internet and mobile phone. Rapidly developing markets like India and China, for example, may leapfrog to the fastest and most accessible channels for convenience and speed.

Key technologies in play to enable these channels

Growth in self-service worldwide is accompanied by an increasing number of applications that go beyond the traditional ATM transaction set

There is a clear convergence now between established trusted channels, such as the ATM, and newer consumer interfaces such as the internet and mobile phone

Industry collaboration, best practice and new technologies are making a dent in global ATM crime

- ▶ include the chip or near-field communications (NFC) with 'contactless' and biometrics.

Chip technology brings added security to card-based transactions, but while the magnetic stripe is still on the card, precautions must be taken. The ATM, or indeed any card-reading device, needs to be protected so it does not become the place where the magnetic stripe data is compromised.

NFC technology is changing the way we pay for things and it is clear why it is becoming so popular – particularly in the transportation industry. Being able to 'tap' and 'go' pre-paid travel cards reduces queuing times and adds speed. It is not just cards – key fobs, watches as well as mobile phones – any hand-held device can communicate with other NFC-enabled devices.

The mobile phone is the most pervasive communications technology in the world. There are actually more mobile phone users in developing countries than in developed ones. It is hardly surprising then that this infrastructure provides a cost-effective platform for mobile banking and specifically, mobile funds transfer in those developing areas – as well as internationally.

As for biometrics, we are already witnessing growing consumer acceptance and business relevance for biometrics in the self-service environment – particularly in markets where inclusion banking is top of mind, such as India and Pakistan. As more central schemes develop, the business case for additional security from biometrics improves. When industry standards become more established and include matching to templates stored on cards, for example, the barriers to adoption should fall.

Have the old concerns about global ATM crime gone away?

Industry collaboration, best practice and new technologies are making a dent in global ATM crime. However, criminals are continuously looking for the path of least resistance. Card skimming remains the biggest challenge to the ATM industry worldwide. For example, the UK's investment into EMV and Chip and PIN may be effective in as far as it is difficult for criminals to copy data from the chip, but it is not preventing them from copying the data from the magnetic stripe. They can then use this data to make fraudulent transactions in countries that have not migrated to EMV. Until we see a ubiquitous Chip and PIN infrastructure worldwide, which is unlikely

in the foreseeable future, and whilst the magnetic stripe remains on most debit and credit cards, there will be the potential for compromise.

There are a variety of countermeasures that can be taken to protect the data on the magnetic stripe. Simple moulded profiles, such as NCR's Fraudulent Device Inhibitor, can be added to the area in front of the card reader to deter criminals from adding fraudulent devices to the fascia. There are almost 50,000 of these devices now in place around the world and we are seeing very positive results. There are also more sophisticated ways of detecting that criminals have tampered with the ATM, such as NCR's Intelligent Fraud Detection. This provides a real-time alert before the fraud has taken place so that the deployer can take the ATM out of service.

External fraud is a global concern, but another growing risk comes from within organisations. Insider knowledge can be a dangerous thing and with a move towards regulatory compliance, institutions are recognising the value in auditable IT control. An example of this is NCR's Solidcore for APTRA™ that 'locks down' ATM software against malware, or malicious software, preventing it from harming the system or bringing the network down. It is an innovative, efficient way of automating the audit process using instant logs and alerts.

An expanded definition of self-service!

Self-service means *anytime, anywhere* access to secure and convenient financial transactions. This could be at the ATM, a bill payment kiosk, a ticketing terminal or your mobile phone. Instant access to information, funds and a network of service providers means that goods and services can be bought and paid for securely and conveniently.

A component of NCR's mobility strategy is the integration of contactless technologies to allow consumers to make payments with RF-enabled cards and NFC mobile phones. NCR is working with VIVOTech, a leading provider of contactless solutions as well as mFoundry and MShift, leaders in mobile banking applications.

Success of these new channels depends fundamentally on one thing – consumer trust. The lessons learned from securing the ATM from all potential points of compromise leave the industry in good stead as we move forward to this next generation of self-service. Mobility will be driven not just by convenience, but also security! ■

Success of new self-service channels depends fundamentally on one thing – consumer trust



**BY THE TIME
YOU'VE READ THIS,
NCR WILL HAVE
PROCESSED OVER
3,000 **SECURE**
TRANSACTIONS**



No one is doing more to safeguard Self-Service.

NCR is protecting every potential point of compromise through continuous investment in award-winning solutions that prevent fraud and protect both the physical and software environments.

Visit www.ncr.com for more information.



SECURE

NCR SECURE™