

# Role of Mobile Banking in Banking Sector in The Present ERA

**KEYWORDS** 

Mobile Commerce, Mobile Banking, Mobile Financial Services

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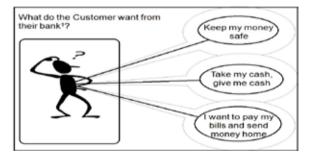
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ABSTRACT Mobile banking is a revolution that is driven by the world's one of the fastest growing sectors – mobile communication technology. This study explores the issues in mobile banking perceived critical for adoption by both mobile banking users as well as non-users. With electronic banking, users can now conveniently carry out banking transactions, but this convenience cannot be achieved if the user does not have access to the internet, hence, in other words, the user cannot carry out a banking transaction while waiting for a bus, or perhaps while having lunch in a restaurant. With m-banking, convenience can be achieved 24hrs a day. This is because a user has access to his mobile phone all day, at all times. So, to effectively achieve a truly convenient banking mode, a truly mobile mode of banking has to be explored, hence the need for m-banking. In the broader sense mobile banking is that type of execution of financial services in the course of which - within an electronic procedure - the customer uses mobile communication techniques in conjunction with mobile devices. Mobile Banking can be said to consist of three inter-related concepts viz. Mobile Accounting, Mobile Brokerage and Mobile Financial Information. Mobile Banking is an emerging alternate channel for providing banking services. India is the second largest telecom market in the world, which is having high potential for expanding banking services using mobile. In recent times, the Banking Sector has been making rapid straights by using information technology as a platform and endeavoring to scale higher heights. An attempt has been made in this paper to examine various innovative instruments that have been introduced by Banks in recent times among that mobile banking is one instrument and also explains about what are the recent trends in mobile banking.

### INTRODUCTION

The terms Mobile Phone banking and mobile banking (M-Banking) are used interchangeably. The term M-Banking is used to denote the access to banking services and facilities offered by financial institutions such as account-based savings, payment transactions and other products by use of an electronic mobile device. Mobile banking has yielded a multiple effect on the number of solutions available to clients. This is in addition to more efficient transactional environment and the high substitution of banking points.

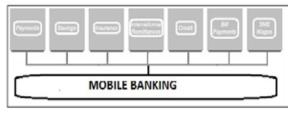
In the broader sense mobile banking is that type of execution of financial services in the course of which - within an electronic procedure - the customer uses mobile communication techniques in conjunction with mobile devices. Mobile Banking can be said to consist of three inter-related concepts viz. Mobile Accounting, Mobile Brokerage and Mobile Financial Information. Mobile Accounting is sometimes characterized as transaction-based banking services that revolve around a bank account and are availed using mobile devices. Not all Mobile Accounting services are however necessarily transaction-based. Whereas Mobile Brokerage, in context of banking services, refers to intermediary services related to the bourse, e.g. selling and purchasing of stocks. Mobile Brokerage can be thus defined as transaction based mobile financial services of non-informational nature that revolve around a securities account. Mobile financial information refers to non-transaction based banking and financial services of informational nature. It includes subsets from both banking and financial services and is meant to provide the customer with anytime, anywhere access to information. The information may either concern the bank and securities accounts of the customer or it may be regarding market developments with relevance for that individual customer. The information may be customized on the basis of preferences given by the customer and sent with a frequency decided by him.



## TRENDS IN MOBILE BANKING

- The advent of the Internet has revolutionized the way the financial services industry conducts business, empowering organizations with new business models and new ways to offer 24 hour accessibility to their customers.
- The ability to offer financial transactions online has also created new players in the financial services industry, such as online banks, online brokers and wealth managers who offer personalized services, although such players still account for a tiny percentage of the industry.
- Over the last few years, the mobile and wireless market has been one of the fastest growing markets in the world and it is still growing at a rapid pace. According to the GSM Association and Ovum, the number of mobile subscribers exceeded 2 billion in September 2005, and now exceeds 2.5 billion (of which more than 2 billion are GSM).
- 4. Mobile devices, especially smart phones, are the most promising way to reach the masses and to create "stickiness" among current customers, due to their ability to provide services anytime, anywhere, high rate of penetration and potential to grow. According to Gartner, shipment of smart phones is growing fast, and should top 20 million units (of over 800 million sold) in 2006 alone.

- 5. As the trend is shifting to mobile banking, there is a challenge for CIOs and CTOs of these banks to decide on how to leverage their investment in internet banking and offer mobile banking, in the shortest possible time.
- The proliferation of the 3G (third generation of wireless) and widespread implementation expected for 2007– 2013 will generate the development of more sophisticated services such as multimedia and links to m-commerce services.



#### MOBILE BANKING IN INDIA

In India, traditional branch-based banking remains the most widely adopted method of conducting banking transaction, at the same time commercial banks are undergoing a rapid change majorly driven by the information & telecommunication (ITC) technology. ICICI bank pioneered in mobile banking services in India. Among public banks, Union Bank of India was first to introduce mobile banking (2010). Today many commercial banks have launched mobile banking using ITC technology and now they can reach out to customers and provide them with not only general information about its services but also the opportunity of performing interactive retail banking transactions anytime, anywhere.

Some banks in India have started providing the mobile banking service to their customers that include State Bank of India (SBI), Union Bank of India (UBI), Punjab National Bank (PNB), HDFC, ICICI, Axis Bank, etc.

MOBILE BANKING SERVICES OFFERED BY SOME OF THE BANKS IN INDIA	
Name of the Bank	Mobile Banking Services
SBI	SMS Banking, FreedoM, USSD
Union Bank of India	SMS Banking, U-Mobile
PNB	SMS Banking
ICICI	SMS Banking, i-Mobile ,M-PESA, m-Rupee
HDFC	SMS Banking, App Based, Browser Based
AXIS	SMS Banking, Phone Banking, Internet Banking on Mobile

# RBI REGULATIONS IN INDIA ON MOBILE BANKING

The following are the Reserve Bank of India (RBI) Guidelines issued to provide Mobile Banking Service in India:

- Only such banks which are licensed and supervised in India and have a physical presence in India will be permitted to offer mobile payment services to residents of India
- The services should be restricted to only to bank accounts/ credit card accounts in India which are KYC/AML compliant.
- Only Indian Rupee based services should be provided.
- Banks may use the services of Business Correspondents for extending this facility, to their customers. The guidelines with regard to use of business correspondent would be as per the RBI circular on Business correspondents issued from time to time.
- The \_Risks and Controls in Computers and Telecommunications 'guidelines will equally apply to Mobile payments
- The —Know Your Customer (KYC) I and —Anti Money

Laundering (AML)I as prescribed by RBI from time to time would be applicable to customers opting for mobile based banking service.

## A. Transaction Limits in Mobile Banking

- Only Indian rupee transactions and these transactions are allowed within India only.
- Per day transaction cap of Rs.50000 has been removed by RBI, and every bank can change this cap depending upon their risk.
- Transactions without end-to-end encryption is Rs.5000/-(SMS Based).

#### **B. Security and Authentication**

The highlights of security and authentication guidelines provided by the RBI on Mobile Banking:

- The mPIN or higher standard of mechanism should be used to authenticate the Mobile Banking customer.
- End-to-end secure encryption mechanism should be followed in transactions
- Bank should conduct regular information security audits on the mobile banking systems to ensure complete security.

#### MOBILE BANKING IN THE WORLD

Mobile banking is used in many parts of the world with an exception of remote and rural areas with little or no infrastructure. This aspect is also popular in countries where most of their population is unbanked. In most of these places, banks can only be found in big cities, and customers have to journey hundreds of miles to the nearest bank. Hence, Numbers of cities have introduced such kind of services. In Iran, banks such as Parsian, Tejarat, Mellat, Saderat, Sepah, Edbi and Bankmelli offer the service. Banco Industrial provides the service in Guatemala. Citizens of Mexico can access mobile banking with Omnilife, Bancomer and MPower Venture. Kenya's Safaricom has the M-Pesa Service, which is mainly used to transfer limited amounts of money, but increasingly used to pay utility bills as well. In 2009, Zain launched their own mobile money transfer business, known as ZAP, in Kenya and other African countries. In Somalia, the many telecom companies provide mobile banking, the most prominent being Hormuud Telecom and its ZAAD service. Telenor Pakistan has also launched a mobile banking solution, in coordination with Taameer Bank, under the label Easy Paisa, which was begun in Q4 2009.

# MAJOR SERVICES IN MOBILE BANKING Account information

- 1. Alerts on account activity or passing of set thresholds
- 2. Monitoring of term deposits
- 3. Access to loan statements
- 4. Access to card statements
- 5. Mutual funds / equity statements
- 6. Insurance policy management

#### Payments, Deposits, Withdrawals and Transfers.

- 1. Cash-in, cash-out transactions on an ATM
- 2. Domestic and international fund transfers
- 3. Micro-payment handling
- 4. Mobile & Direct to Home package recharging
- 5. Purchasing tickets for travel and entertainment
- 6. Commercial payment processing
- 7. Bill payment processing
- 8. Peer to Peer payments (e.g., Pop money, Isis)
- 9. Withdrawal at banking agent
- 10. Deposit at banking agent

# ISSUES AND CHALLENGES IN MOBILE BANKING

The rapid technology development in Mobile technology like 2G, 3G, 4G has become major challenges for banks. It is visible that the bank which started Mobile Banking in the form of SMS banking, then adopted application (software) based model for traditional mobile handsets, the evaluation

of Smart phones, mobile operating system and Mobile Apps posed the banks to adopt the current technology. The customers are mostly using ATM and online banking services. Most of the customers feel comfortable without mobile banking. They also feel, there are chances of misuse in mobile banking due to mobile handset theft.

#### MOBILE BANKING FUTURE FUNCTIONALITIES

Based on the 'International Review of Business Research Papers' from World business Institute, Australia, following are the key functional trends possible in world of Mobile Banking.

With the advent of technology and increasing use of smartphone and tablet based devices, the use of Mobile Banking functionality would enable customer connect across entire customer life cycle much comprehensively than before. With this scenario, current mobile banking objectives of say building relationships, reducing cost, achieving new revenue stream will transform to enable new objectives targeting higher level goals such as building brand of the banking organization.

#### **CONCLUSIONS**

- Though M- banking seems to cut across all groups, usage is more pronounced among youngsters.
- With the help of mobile banking users can send money using their phone to any other customer in the country, deposits and withdrawals in less time.
- According to the country Mobile banking provides financial services, including solutions facilitating savings and insurance.
- Mobile Banking facilitates payments, giving users a way to pay their bills and to pay for goods at shops that accept Orange Money electronically without cash.
- Mobile Banking, as has been demonstrated, has gained non-negligible relevance for banks today. Developments in the banking sector, e.g. increased competition on account of technological developments coupled with the process of globalization have produced new challenges for banks. Its main contribution, however, can be expected to take place in the strategic field as it is all set to become an instrument of differentiation.
- Mobile Banking seems to possess the potential to become one of the widely spread and accepted application in the field of Mobile Commerce, particularly in the backdrop of its high acceptance across commercially important sections of the society. We may expect to see Mobile Banking go into the footsteps of Online Banking, i.e. to become a standard service offered by every bank worth its name. Hence, the future for banking sector is going to make rapid straights in near future.
- One of the draw back in Mobile Banking is most of the customers feel comfortable without mobile banking.
   They also feel, there are chances of misuse in mobile banking due to mobile handset theft.

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