

Payment and Settlement Systems

10.1 Considering the importance of having a modern state-of-the-art payment and settlement system, Bangladesh Bank (BB) has been actively working to implement a modern payment and settlement system in Bangladesh. With the technical and financial assistance from DFID, UK, Bangladesh Bank is going to start Bangladesh Automated Clearing House (BACH), the first electronic clearing house in the country from December 2009.

10.2 Payment Systems Division (PSD) under Department of Currency Management & Payment Systems is working on the essentials to put into operation a modern National Payment and Settlement Systems. PSD is working on the following core areas –

- National Payment Systems Strategy,
- Automated Clearing House,
- Legal & Regulatory Framework, and
- Remittance Issues.

10.3 The National Payment Systems Council (NPSC), an essential central institution for formulating strategies and policies of modernizing the country's payment systems for national and public interests, is made up of representatives from the banking industry and Government offices with the Deputy Governor in charge of the Department of Currency Management & Payment Systems as Chair. Terms of Reference (TOR) of NPSC are–

- To review, discuss and approve strategic documents for the national payment system,

- To promote common initiatives towards the implementation of the payment system infrastructure,
- To promote specific or new payment system channels which will ultimately lead to broadening the access of people to the financial system,
- To endorse the priority and the development and implementation schedule of payment system projects and
- To promote cooperation among all institutions active in payment, clearing and settlement systems within the region and at the international level.

10.4 National Payment Systems Strategy document has been prepared by PSD and adopted by the NPSC in the 2nd meeting held on 13 December 2007. Following is the strategic timeline to be implemented phase by phase –

Milestones to Achieve	Timeline
Formalize the Regulatory Framework	April 2009
Bangladesh Automated Cheque Processing System	March 2010
Establish Payment Oversight Function in Bangladesh Bank	March 2010
Bangladesh Electronic Fund Transfer Network	March 2010
Bangladesh Online Payment System (ATM, POS common Switch)	December 2010
Real-Time Gross Settlement (RTGS)	2014
Payment and Settlement for Scrip less Securities	2014

In addition, Payment Systems Division is also preparing to introduce mobile banking & e-commerce in the country.

10.5 Bangladesh Automated Clearing House (BACH), the Electronic Clearing House, has two components - the Automated Cheque Processing System and the Electronic Funds Transfer. Both the systems will operate in batch processing mode – transactions received from the banks during the day will be processed at a pre-fixed time and be settled through a single multilateral netting figure on each individual bank's respective books maintained with Bangladesh Bank.

10.6 Bangladesh Automated Cheque Processing Systems (BACPS), the electronic cheque processing of paper item, will use Cheque Imaging and Truncation (CIT) technology. In this system, cheque-leaves submitted for clearing will not be carried physically to the clearing house as it is done recently. Instead, banks will capture images and corresponding information of the submitted cheque leaves and will send them to the BACPS using a secured communication link. BACPS participants, i.e. commercial banks, financial institutions, money & capital market agencies and related Government offices have been sensitised. All the clearing instruments, i.e. cheques, drafts, payment orders, dividend and refund warrants, etc. have been standardised. The new cheques will contain Magnetic Ink Character Recognition (MICR) line which includes information on the amount, transaction code, clients account information, routing number and the cheque leaf's serial number. Specially schemed routing numbers have been assigned to the bank branches for easy identification of origin and destination of instruments. The system will support both intra-regional and inter-regional clearings and is based on a centralised processing centre located in Dhaka and in designated clearing regions. The proposed processes and systems

will conform to the international best practices and also will represent the most cost effective solution for cheque processing.

10.7 Bangladesh Electronic Funds Transfer Network (BEFTN) is the processing and delivery centre for the distribution and settlement of electronic debit and credit transactions among its participants. The BEFTN is envisaged as a system of participating banks connected with the EFT Operator via communication lines. This network will facilitate the transmission of payments between the banks electronically, which will make faster and efficient means of inter-bank clearing than the existing paper-based system. The Network will start with credit transactions and gradually progress to debit transactions. This will dramatically bring down the operational cost, reduce risk and will increase the efficiency of the payments process.

10.8 **Legal & Regulatory Framework:** In order to give legal and regulatory support to such electronic exchange of images of paper items and electronic transfer of funds, Bangladesh Bank has approved and assigned the Bangladesh Payment and Settlement Systems Regulation 2009. This regulation is the bedrock of the payment system's modernization in Bangladesh. In addition, Bangladesh Bank is now drafting the Rules & Procedures for Automated Cheque Processing and Electronic Clearing House. Moreover, for providing comprehensive legal backing to the operation of Electronic Clearing House, Bangladesh Bank is also examining to bring amendment in certain provision of the existing Negotiable Instruments Act, 1881 and Bankers Book of Evidence Act, 1891.

10.9 **Remittance Issues:** Remittance being the major source for foreign exchange has drawn the attention of decision makers for encouraging the remitters to use formal channel instead of risky informal channels. The scheme of PSD for improving the current scenario is to

implement a country-wide safe and efficient payment systems to expedite faster delivery of remittances across the country. PSD is also working on simplifying the procedure of sending remittances both domestically and internationally.

10.10 For stimulating and catalyzing innovation of new remittance transfer products, improving existing remittance infrastructure and ensuring the best use of remittances - DFID, UK has provided a £2.122 million risk-sharing grant facility named Remittances and Payments Challenge Fund (RPCF). The Challenge Fund (CF) invited proposals in three rounds eliciting 117 concept notes out of which the Challenge Fund Assessment Panel has nominated 14 proposals to award grants. Grant commitments are £2.044 million approximately.

10.11 In order to raise awareness of the migrant workers and their families in sending remittances through the formal channel and to

ensure best use of remittances, Refugee and Migratory Movement Research Unit (RMMRU) & International Migration Organization (IOM) have launched media campaign (electronic/print). A house hold survey has also been launched by IOM to collect information on migrant families and use of remittances.

10.12 Increasing trade and investment flows are already putting pressure on the demand for financial services to exceed the present performing levels of efficiency. So, need for an efficient and cost-effective payment system, is gaining amplified importance. The initiative of Bangladesh Bank to modernise country's payment and settlement system will significantly change the financial landscape of Bangladesh. The convergence of paper and electronic modes of payment, improvement in operational efficiency and flexibility through adoption of IT intensive processes will result in a sound National Payment and Settlement System consistent with its neighbours and international standards.

Box 10.1

Image Based Cheque Clearing

Bangladesh Bank has taken an initiative to implement Bangladesh Automated Cheque Processing Systems (BACPS) in order to minimize risks associated with cheque-based retail payments, strengthen processing efficiency and expand accessibility.

BACPS is a state-of-the-art image based electronic cheque clearing system utilising Cheque Imaging and Truncation (CIT) technology. In this system, cheque leaves submitted for clearing will not be carried physically to the Clearing House as it is done today. Instead, banks will capture images and corresponding information from the cheque leaves submitted for collection and send them for electronic clearing using a secured communication link. Physical movement of instruments, i.e. cheques, drafts, pay orders, etc. across bank-branches would not be required, except in special circumstances. This would effectively reduce the time required for payment of cheques, the associated cost of transit and delay in processing, etc., thus speeding up the process of collection or realisation of the cheques.

Bangladesh Bank has issued new cheque design specifications as a requirement of image based clearing. The following figures are the sample replica of both sides of the new cheques –

The image shows a sample replica of a new cheque from Bank of Motijheel. The cheque is numbered 4123818 and dated 10/10/11. It is payable to 'Pay To' for the sum of Tk 100,00,00,000.00. The client's account number, name, and address are provided. The cheque is signed by the client. The bank's name and address are also visible.

Figure 1: Front Side of New Cheque

