

PAPER 4 : INFORMATION TECHNOLOGY IN FINANCIAL SERVICES

Full Marks : 100

Module A: Introduction to IT and Computer Systems

- Concept and Importance of IT, Role of IT in Financial and Business World. MIS. Electronic Banking and Electronic Commerce.
- Computer Hardware – Anatomy of Computer, Types of Computers, Central Processing Unit (CPU), Main Memory, Computer Systems, Peripheral Controllers, Peripherals (Terminal, Printer, Floppy Drive, Disk Drive, Compact Disk, Tape Drive, Cartridge, Tape Drive Graph Plotter, Mark Sense Readers, Etc.), Current Trends.
- Computer Software – Need for Software, What is Software ? Types of Software, Systems Software, Operating Systems, Language Translators (Compilers, Interpreters), Programming Language Data Base Management Systems (DBMS), 4th Generation Language Tools, Application Software, Application Areas, Packaged and Tailored Software, Software Development, Current Trends.

Module B: Security Considerations

- Accidental Damage, Power Failures, Malicious Damage, Operational Problems, Data, Encryption and Decryption, Standards, Audit Trails. Accountability, Liability & Control ; System Vulnerability & Abuse ; Creating Control Environment ; Internet Security ; Development A Control Structure ; Ensuring System Quality.

Module C: Different Approaches to Bank Mechanization

- Stand Alone Computer System, Local Area Networks (LAN), Local Processing With Batch Updates, On-Line Updates With Shadow Posting, Remote Computing Facility With Batched Input – On Line Systems With Mini Computer Networking and With Mainframe Computer, Duplication of Databases at Different Levels.

Module D: Electronic Payment Systems & Funds Transfer Systems

- Teller Machines at Bank Counters, Cash Dispensers, Stand Alone Automated Teller Machines (ATMs), ATM with On-Line Inquiry and Update Facilities, Home Banking & E-Commerce (Corporate and Personal).
- Plain Messages (Telex or Data Communication), Structured Messages (SWIFT, Etc.), Direct Fund Settlement Systems (CHIPS, Etc.), two Level Funds Transfer Settlement (FEDWIRE, BANKWIRE Point-of Sale Systems).

Module E: Document Handling Systems, Additional Banking Applications & Other Aspects

- Cheque Sorting and Balancing Systems (MICR, OCR, Etc.), Document Storage and Retrieval Systems (Microfilming), Document Transmission Systems (FAX).
- Inter-Branch Reconciliation, Foreign Exchange Dealing, Investment Management Systems, Cash Management Systems, Statistical Analysis.

- Personal Identification Numbers and Their Use in Conjunction with Magnetic Cards of Both Credit and Debit Types, SMART Cards, Signature Storage and Display by Electronic Means, Cheque Truncation, Microfische, Note and Coin Counting Devices.

Module F: Risk Management and Legal Framework in IT

- National ICT Policy –2002, ICT Act-2006, Bangladesh Bank Guidelines, Cyber Law

References

- 1 Bajwa K.S. – Bank Mechanisation (Skylark Publication).
- 2 Different journals and periodicals on computer.
- 3 Hunt R. and Shelley J. – Computer and Common Sense (Prentice-Hall of India Private Limited, Latest Edition).
- 4 Lipis, Marschall, Linkers – Electronics Banking (John Wiley and Sons).
- 5 Rangarajan Committee Report – Mechanisation and Automation in the Banking Industry, Reserve Bank of India (1984).
- 6 Rajgopalan R. – Understanding Computer (Tata McGraw Hill Publishing Co. Ltd.)
- 7 Study of Use of Modern Tools in Banking (Indian Banks Association, 1993).
- 8 Srivastava – Computer Application in Banks (Bankers Training College, Reserve Bank of India).