

Bharati Vidyapeeth's
Institute of Computer Applications and Management (BVICAM)
A-4, Paschim Vihar, New Delhi-63
THIRD SEMESTER [MCA] Internal Examination, December 2022

Paper Code: MCA-225	Subject: e-Business Systems
Time: 2 Hours	Maximum Marks: 45
Note: Attempt THREE questions in all. Question No. 1 is compulsory, and attempt one question from each unit.	

1. Answer all the following questions briefly: - 1.5 × 10 = 15
- (a) State the reason why B2B e-Commerce is called e-Procurement. CO1
 - (b) Compare e-Commerce with e-Business. CO1
 - (c) Describe different tools used to manage an e-Commerce business. List the names of five popular e-Commerce platform services. CO1
 - (d) List the support activities, provided by the central corporate organization, of the strategic business unit. CO1
 - (e) Identify the key drivers of e-Commerce in India. CO1
 - (f) List the best practices for implementing confidentiality and availability of information system resources. CO2
 - (g) Describe various mechanisms used to assure the integrity of a data in database. CO2
 - (h) Explain the Rail Fence transposition encryption technique. Encrypt the plain text "e-business systems examination is on wednesday" using Rail Fence technique with depth 2. CO2
 - (i) Demonstrate the working of Data Encryption Standard (DES) algorithm with an appropriate diagram. CO2
 - (j) Differentiate between digital certificate and digital signature. Classify classes of digital certificates. CO2

UNIT - I

2. (a) Describe various categories of e-Commerce. List the benefits and limitations of e-Commerce. 5 CO1
 - (b) Identify the need of private computer network. List the drawbacks of private computer network. Compare circuit-switched network with packet-switched network. 5 CO1
 - (c) Discuss various web-based tools available for e-Commerce. Explain the role of enterprise resource planning (ERP) for an e-Commerce business. 5 CO1
3. (a) Explain the role of industry value chain. Describe the industry value chain for a wooden chair. 5 CO1
 - (b) Identify the role of a strategic business unit of a business. Discuss the primary activities conducted by the strategic business unit of a business. 5 CO1

- (c) Describe virtual private network and its need. Compare intranet with 5 CO1
extranet.

UNIT - II

4. (a) Differentiate between HTTP and HTTPS. Explain the working and importance 5 CO2
of Secure Sockets Layer (SSL). Suppose an organization wants to secure its
website (single domain and all its subdomains), which type of SSL certificate
will be applicable for the organization?
- (b) List the steps of Rivest-Shamir-Adleman (RSA) algorithm of cryptography. 5 CO2
Given $p = 17$, $q = 11$ and plain-text message $m = 18$, determine the cypher-text
message using RSA algorithm.
- (c) Discuss various security threats and issues of e-Commerce. 5 CO2
5. (a) Identify the need of public key infrastructure. Describe various components of 5 CO2
public key infrastructure.
- (b) Compare symmetric key cryptography with asymmetric key cryptography. 5 CO2
Explain the encryption process performed with digital signature.
- (c) Demonstrate the working of digital signature using an appropriate diagram. 5 CO2
Discuss the importance of digital signature.