

Roll No.

67245

**M.C.A. 5th Sem. (with new notes)
(Current Scheme)**

Examination-December, 2014

Computer Security

Paper-MCA-505

Time : 3 hours

Max. Marks : 80

Before answering the questions, candidates should ensure that they have been supplied the correct and complete question paper. No complaint in this regard will be entertained after the examination.

Note : Attempt **five** questions in all by selecting at least **one** question from each unit. All questions carry equal marks.

Unit-I

1. (a) How do you compare DES and AES ?
Illustrate suitability of each standard.

- (b) What characteristics would make an encryption absolutely unbreakable ? What characteristics would make an encryption impractical to break ? Explain.
2. What do you mean by computer security ? what are its goals and objectives ? How vulnerabilities, threats, attacks and control measures are inter-related ? Illustrate through a suitable example.

Unit-II

3. (a) What is program security ? What are important security concerns specific to programs ? Illustrate relevance of each.
- (b) What is trusted operating system ? What characterizes a good trusted operating system ? Explain.

4. (a) What are security models ? What is the purpose of these models ? Explain two popular models highlighting properties that characterize these models.
- (b) What are different security methods for an operating system ? Illustrate.

Unit-III

5. (a) What are various levels of protection that users might apply to codes or data? Illustrate.
- (b) What are IDSs ? What are its types ? What are their goals ? Discuss.
6. (a) What is security in networks ? What are threats in networks ? How can these be controlled ? Illustrate.
- (b) What are multilevel databases ? What is the purpose of encryption in a multilevel secure DBMS ? Discuss.

Unit-IV

7. (a) What do you understand by protection for computer objects ? Compare copyright, patent and trade secret protections.

(b) What are organizational security policies ? Discuss their relevance in the current scenario.

8. (a) What are ethical issues in computer security ? Chart and explain the significance of each.

(a) What is security plan ? What are the factors that should be considered when developing a security plan ? Discuss.
