

Roll No

MCA - 402**M.C.A. IV Semester**

Examination, December 2014

Information Storage and Management*Time : Three Hours**Maximum Marks : 70*

- Note:** i) Answer five questions. In each question part A, B, C is compulsory and D part has internal choice.
 ii) All parts of each question are to be attempted at one place.
 iii) All questions carry equal marks, out of which part A and B (Max.50 words) carry 2 marks, part C (Max.100 words) carry 3 marks, part D (Max.400 words) carry 7 marks.
 iv) Except numericals, Derivation, Design and Drawing etc.

Unit - I

1. a) What are the key components of an intelligent storage system?
 b) What is an advantage of reporting on storage arrays?
 c) What are the key storage infrastructure components?
 d) Explain disk drive components with neat diagram.

OR

Explain information Lifecycle. What are the key challenges in managing information?

Unit - II

2. a) What is a benefit of virtual storage provisioning over traditional provisioning?
 b) What is prevented using RAID technology?
 c) Which process minimizes the exposure to a loss of uncommitted cached data when there is a power failure?
 d) Explain RAID levels in detail with neat diagram.

OR

Explain the architecture of intelligent storage system in detail.

Unit - III

3. a) Which feature(s) ensures that the stored content has NOT been altered in a CAS system?
 b) What is a accurate statement about a gateway NAS solution?
 c) What is a key security consideration when a NAS device enables sharing of the same data among UNIX and Microsoft Windows users?
 d) What are the components of NAS? Explain NAS implementations.

OR

Explain object storage and retrieval in CAS.

Unit - IV

4. a) What is a key benefit of virtualization?
 b) What are the three elements of the risk triad from an information security perspective?
 c) When developing a disaster recovery plan, What is the result of choosing a particular recovery time objective for a system?
 d) Explain various forms of virtualization and storage virtualization challenges.

OR

Explain storage security domains with reference to threats, availability controls and examples.

Unit - V

5. a) What is a benefit of cloud computing over traditional computing?
 b) Which cloud computing characteristic enables consumers to grow and shrink the demand for resources dynamically?
 c) Which cloud computing capability enables monitoring and reporting resource usage?
 d) What is a challenge to consumers in adopting a public cloud?

OR

What is a characteristic of cloud-optimized storage?