



S.E. (Comp.) (Sem. IV) (Revised 07-08) Examination, May/June 2009
SYSTEM ANALYSIS AND DESIGN

Duration : 3 Hours

Total Marks : 100

Note : 1) Answer any 5 full questions, by selecting at least 1 full question from each Module.

2) Assume necessary details, if any.

MODULE – I

1. a) What are the characteristics of a system ? 5
- b) Describe the technical skills that a system analyst must possess. 5
- c) Write short notes on : 5
 - i) Management Information Systems.
 - ii) Decision Support Systems.
- d) Explain the various steps in system design with a neat diagram. 5
2. a) Discuss the analyst / user interface with regards to the following. 5
 - i) User Motivation
 - ii) Analyst / user differences.
- b) Explain 5 important characteristics of open systems. 5
- c) Discuss the primary functions of an MIS facility. 7
- d) What are the reasons for project termination ? 3

MODULE – II

3. a) What are the classifications of costs and benefits ? 6
- b) What is a feasibility report ? What are its contents ? 8



c) Draw a DFD for the following scenario :

6

A system that allows a visitor who has registered to upload and download photos.

- Members must register to use the system by entering their details , username and password.
- After successfully registering themselves there will be a registration confirmation message given to them.
- Now they can log into the system using the username and password they have registered with.
- A login confirmation message will be displayed as a feedback from the login process.
- Once they have successfully logged into the system, they can do the following :
 - View and update their profile
 - Upload and download photos.

4. a) What are the symbols and rules in DFD construction ?

6

b) Compare interviews and questionnaires as tools for information gathering.

6

c) Construct a decision table for the following scenario.

8

A telecom company has the following tariff. For calls made within 200 kms the tariff is Rs. 1.20 per minute. Minimum billing is for 3 minutes. For calls beyond 200 kms the tariff is Rs. 1.80 per minute. Minimum billing is for 2 minutes. This rate is applicable from 9.00 a.m. to 10.00 p.m. From 10.00 p.m. to 9.00 a.m. the rate is half.

MODULE - III

5. a) Discuss importance of normalization. Explain steps involved in.

8

b) Explain the role of the data base administrator.

6

c) Explain the various classifications of forms with examples.

6



6. a) What does the HIPO package format consist of? 4
- b) Explain the following in the context of form layout. 6
- i) Data classification and zoning
 - ii) Paper selection
 - iii) Spacing requirements.
- c) Discuss the goal of input and output design. 4
- b) Discuss carbon paper as a form copier. 6

MODULE - IV

7. a) Explain the activity network for system planning. 8
- b) Write short notes on the following : 6
- i) File conversion
 - ii) Test files
 - iii) Audit control.
- c) "A project manager must be the kingpin of personnel motivation". Do you agree? Discuss in detail. 6
8. a) What is a disaster/recovery team? Explain its objectives. 6
- b) Discuss advantages and disadvantages of the lease option. 8
- c) What are the elements of user training? 6
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