

**BACHELOR OF COMPUTER APPLICATIONS
(BCA) (Pre-Revised)**

00542 **Term-End Examination**

June, 2019

**CS-05 : ELEMENTS OF SYSTEM ANALYSIS
AND DESIGN**

Time : 3 hours

Maximum Marks : 75

*Note : Question number 1 is **compulsory**. Attempt any **three** questions from the rest.*

1. (a) Consider “University Information System” (UIS) wherein a university provides information about its programmes etc. Draw DFDs upto 3 levels depicting various processes, data flows and data repositories after making necessary assumptions. 15
- (b) What is System Analysis ? Explain any five techniques for System Analysis. 10
- (c) Explain Benchmark testing. When is it used ? 5

2. (a) What is Software Piracy ? Why is piracy so prevalent in the society ? Explain any five forms of software piracy. 10
- (b) What is a Decision Tree ? Explain it with the help of an example. 5
3. (a) Explain what kind of fact finding techniques should be used for deciding the design of a new application for a library of an institution. Make necessary assumptions. 10
- (b) Explain the areas that would be covered in a formal technical review of a system. 5
4. (a) What are the objectives of a Preliminary Investigation ? List and explain the methods to gather the data during a preliminary investigation. 10
- (b) Explain the features of Presentation Graphics. 5
5. (a) Explain the considerations for the input and output designs briefly. 5
- (b) Define the term "Data Dictionary". What is its purpose ? 5
- (c) How are CASE tools beneficial in conceptual data modelling ? 5
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