U.S.N

P.E.S. College of Engineering, Mandya - 571 401
(An Autonomous Institution affiliated to VTU, Belagavi)
Eighth Semester, B.E. - Computer Science and Engineering
Semester End Examination; May / June - 2019
Software Testing

Time: 3 hrs   Max. Marks: 100

Note: *i) Answer **FIVE** full questions, selecting **ONE** full question from each unit.*
ii) Missing data, if any, may be suitably assumed.

UNIT - I

1 a.	With the help of a diagram, discuss the different components of testing life cycle and also discuss about the test cases and test case information.	10
b.	Discuss Error and Fault taxonomies in detail and list the levels of testing.	10
2 a.	With a neat sketch, explain the features of 'THE SATM SYSTEM'.	10
b.	Using Pseudo-code implement the simple version for the commission problem.	10

UNIT - II

3 a.	Discuss the following with an example : i) Slice based testing ii) Definition-use testing	10
b.	Explain altenative life cycle models with a neat diagram.	10
4 a.	Differentiate between Top-down integration and Bottom-up integration approaches with examples.	10
b.	Discuss the first try and second try for the test cases of next date function with suitable tables.	10

UNIT - III

5 a.	Briefly explain about structural strategies for thread testing.	10
b.	Discuss in detail static interaction in single processor, static interaction in multiple processors and dynamic interaction in single processor.	10
6 a.	Discuss in detail the implicants of following : i) Composition and Encapsulation ii) Inheritance iii) Polymorphism	10
b.	Discuss client / server testing in interaction testing.	10

UNIT - IV

7 a.	Discuss in detail framework for object oriented data flow integration testing.	10
b.	Discuss in detail the unit testing and integration testing for currency conversion program.	10
8 a.	Explain in detail UML-Based system testing.	10
b.	Explain the following in currency converter UML description : i) Presentation layer ii) High level use cases iii) Essential use cases	10

UNIT - V

9 a.	Discuss in detail use case-based testing.	10
b.	Evaluate first exploration, second exploration and third exploration for the commission problem example.	10
10.	Illustrate MDD and TDD approach considering Boolean function, Is leap to determine whether the given year is a common or leap year.	20

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