FACULTY OF ENGINEERING
B.E. 3/4 (CSE) I Sem. (Main) Examination, December 2011
SOFTWARE ENGINEERING

Time: 3 Hours]   [Max. Marks: 75

Note : *Answer **all** questions from Part **A**. Answer **any five** questions from Part **B**.*

PART – A   (25 Marks)

1. Define "Software Engineering". What is its importance ?   3
2. Specifically bring out the difference between Analysis and Design.   4
3. How do module and sub-system relate to product design ?   3
4. What are the different size metrics ?   3
5. With example explain glass box testing.   3
6. What is the importance of pattern and framework ?   4
7. How are verification and validation important individually ?   2
8. "Software maintenance is very essential". Justify.   3

PART – B   (50 Marks)

9. a) Briefly explain the software types and its application domains.   5
   b) Explain capability maturity model.   5
10. a) What are requirements engineering tasks ? Explain validating requirements.   5
    b) What are analysis modeling approaches ? Explain flow-oriented modeling.   5
11. a) Briefly discuss about design process and design quality.   5
    b) What are the user interface design rules ? Discuss the techniques for evaluation of UI.   5
12. Explain the process of mapping the data flow diagrams into software architecture.   10
13. What is pattern based software design ? Describe any two patterns known to you in addition with a general pattern template.   10
14. Explain the difference between cohesion and coupling. Discuss different types of coupling with examples.   10
15. a) What is meant by structural complexity of a program ? Write a metric for measuring the structural complexity of a program.   5
    b) Distinguish between software testing methods black box and white box testing with examples.   5