

Code No: **R41042****R10****Set No. 1****IV B.Tech I Semester Supplementary Examinations, March/April - 2016****EMBEDDED SYSTEMS****(Common to Electronics & Communication Engineering and
Electronics & Computer Engineering)****Time: 3 hours****Max. Marks: 75****Answer any FIVE Questions
All Questions carry equal marks***********

- 1 a) What are Embedded systems? Give the classification of Embedded systems.
b) Explain various interfaces for external communication
- 2 a) Explain important characteristics of an embedded system.
b) Briefly discuss different application areas for Embedded systems.
- 3 a) Explain VLSI and Integrated Circuit design.
b) Discuss the guidelines for PCB layout.
- 4 a) Compare Super loop based and OS based embedded firmware design.
b) What are the interrupt sources and explain interrupt service mechanism.
- 5 Explain Task Scheduling including its scheduling Algorithms.
- 6 Discuss fundamental issues in Hardware software Co-Design.
- 7 a) Explain the various elements of an embedded system development environment.
b) Explain Disassembler and Decompiler and their role in embedded firmware development.
- 8 Discuss all the Laboratory tools for embedded system implementation and testing.