

Nov-Dec-2012

Total No. of Questions : 12]

SEAT No. :

P1025

[Total No. of Pages : 3

[4264] - 702

B.E. (Computer Engg.)

ADVANCED COMPUTER ARCHITECTURE

(2008 Pattern) (Semester - II)

Time : 3 Hours]

[Max. Marks :100

Instructions to the candidates:

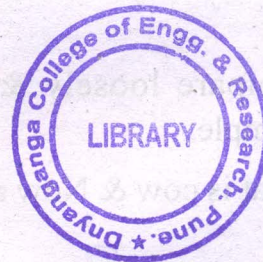
- 1) Attempt Q. 1 or Q. 2, Q. 3 or Q. 4, Q. 5 or Q. 6 from section - I and Q. 7 or Q. 8, Q. 9 or Q. 10, Q. 11 or Q. 12 from section - II.
- 2) Answers to the two sections should be written in separate books.
- 3) Neat diagrams must be drawn wherever necessary.
- 4) Assume suitable data, if necessary.

SECTION - I

- Q1) a) What is VLIW architecture? Compare EPIC architecture with super scalar architecture. [8]
- b) What is scalability? Define speedup and efficiency w.r.t. Parallel computer systems in terms of scalability. State any four parameters affecting the scalability. [8]

OR

- Q2) a) What is parallel Processing? How flynn has classified parallel computers? Why MISD architecture does not exist? [8]
- b) State the following terms in brief: [8]
- i) Instruction level parallelism.
 - ii) Thread level parallelism.
 - iii) Software parallelism.
 - iv) Hardware parallelism.



- Q3) a) State the following terms w.r.t. Pipeline processing : [8]
- i) Hazards
 - ii) Efficiency
 - iii) Dynamic pipeline
 - iv) Internal forwarding.
- b) What is the use of reservation Table? How it is presented? Explain how a control strategy can be implemented for job sequencing problem. [10]

OR

P.T.O.

