Seat No.:	Enrolment No.

Subject Code: 150701

**Subject Name: Advance Processors** 

## GUJARAT TECHNOLOGICAL UNIVERSITY BE - SEMESTER- V • EXAMINATION – WINTER 2016

Date: 02/12/2016

Time: 10:30AM – 01:00PM **Total Marks: 70** Instructions: 1. Attempt all questions. 2. Make suitable assumptions wherever necessary. 3. Figures to the right indicate full marks. 0.1 Draw and explain 8086 pin diagram. 07 (a) Explain the addressing modes of 8086 with example. 07 **(b) Q.2** Draw and explain 8086 internal block diagram. 07 (a) Explain 8086 interrupt vector table. **(b)** 07 OR What is segmentation? List the various segment registers in 8086 and 07 **(b)** explain their role. What are the differences between minimum mode and maximum mode 07 0.3 (a) operation of 8086? Draw minimum mode system with RAM, ROM and I/O port. Briefly explain respond of 8086 when it receive signal on hardware interrupt 07 **(b)** pin NMI and INTR. OR Draw and explain memory read machine cycle of 8086 in minimum mode. 0.3 07 Briefly explain ODD and EVEN bank concept in 8086. Explain different categories of Assembly Language Instruction Set. 07 **(b) Q.4** Draw and explain the internal block diagram of 80286 microprocessor. **07** (a) Explain the 80386 microprocessor register set. 07 **(b)** OR **Q.4** Draw and explain the internal block diagram of 80486 microprocessor. 07 (a) Explain the addressing modes of 80386 with examples. **07 (b) Q.5** Describe Reentrant and Recursive procedures. 07 (a) Explain the architecture of SUN SPARC processor. 07 **(b)** OR 0.5 Differentiate the RISC architecture and CISC architecture. 07 (a) Briefly explain superscalar architecture, Hyper thread technology and core 2 **(b)** 07 duo technology in Intel P6 family processor.

\*\*\*\*\*

1