Seat No.: _____ **Enrolment No._____**

GUJARAT TECHNOLOGICAL UNIVERSITY

BE - SEMESTER–VI (OLD) - EXAMINATION – SUMMER 2017

Subject Code: 160805 **Date: 01/05/2017**

Subject Name: Advanced Microprocessors

Time: 10:30 AM to 01:00 PM **Total Marks: 70**

Instructions:

1. **Attempt all questions.**
2. **Make suitable assumptions wherever necessary.**
3. **Figures to the right indicate full marks.**

Q.1	**(a)**	Explain Internal Architecture of 8086 Microprocessor.	**07**
	(b)	Briefly Describe Macros.	**07**
Q.2	**(a)**	Briefly describe memory bank of 8086 Microprocessor.	**07**
	(b)	Explain following Pins of 8086 Microprocessor 1. READY 2. INTR 3. HLDA 4. DT/R’	**07**
		OR	
	(b)	Explain Flag register of 8086 Microprocessor.	**07**
Q.3	**(a)**	Describe different addressing modes of 8086 Microprocessor.	**07**
	(b)	Explain following instructions of 8086 Microprocessor. 1. CMC 2. DAD 3. IRET 4. JAE	**07**
		OR	
Q.3	**(a)**	Explain Processor control Instructions of 8086 Microprocessor with example.	**07**
	(b)	What is Multiprocessing system? Write applications of Multiprocessing system.	**07**
Q.4	**(a)**	Explain memory interfacing of 8086 Microprocessor.	**07**
	(b)	Explain following assembler directives in detail 1. DUP 2. END 3.OFFSET 4. PTR	**07**
		OR	
Q.4	**(a)**	Draw and Interrupt pointer table of 8086 microprocessor and explain type-0 and Type-2 interrupts in detail.	**07**
	(b)	Explain following concept in detail 1. Memory Segmentation 2. Pipelining	**07**
Q.5	**(a)**	Write ALP for addition of two random numbers by using MACRO	**07**
	(b)	Write a program that square any number from 00H to FFH placed in AL and placed it in AX.	**07**
		OR	
Q.5	**(a)**	Write ALP to find maximum number from given array.	**07**
	(b)	Write a program to transfer the block of data from one memory location(02345H to 0234AH) to another memory locations(04567H to 0456CH).	**07**

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