Code No: R1622054 **R16** SET - 1

II B. Tech II Semester Regular/ Supplementary Examinations, April/May - 2019
COMPUTER ORGANIZATION
(Com to CSE, IT, ECC)

Time: 3 hours Max. Marks: 70

Note: 1. Question Paper consists of two parts (**Part-A** and **Part-B)**
2. Answer **ALL** the question in **Part-A**
3. Answer any **FOUR** Questions from **Part-B**

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PART –A

1. a) Define system software.
   b) Mention different types of Bus structures.
   c) Write about microprogramming.
   d) What is an interrupt cycle?
   e) What are optical disks?
   f) Define hardwired control?

PART –B

2. a) Explain the structure of a computer system.
   b) Write about logical structure of a simple personal computer.

3. a) Illustrate with examples logic instruction and shift instructions.
   b) What are different addressing modes? Explain.

4. a) Explain the 4 bit binary adder with a diagram.
   b) Differentiate between ROM and PROM.

5. a) What is meant by micro-program sequencing? Mention its importance.
   b) Write the advantages and usage of universal serial bus(USB).

6. a) Write about basic memory circuits.
   b) Write about enabling and disabling interrupts.

7. a) What are magnetic hard disks? Mention the purpose of its usage.
   b) What is meant by interleaving? Explain.

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Code No: R1622054 **R16** SET - 2

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COMPUTER ORGANIZATION
(Com to CSE, IT, ECC)

Time: 3 hours Max. Marks: 70

Note: 1. Question Paper consists of two parts (**Part-A** and **Part-B)**
2. Answer **ALL** the question in **Part-A**
3. Answer any **FOUR** Questions from **Part-B**

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PART –A

1. a) What is microprocessor, how it is different from micro computer?
   b) Write about I/O controller.
   c) What is a register transfer language?
   d) What is cache memory?
   e) What is Direct Memory Access?
   f) What are different shift micro-operations?

PART –B

2. a) Explain the organization of a computer system and its input-output processor.
   b) Illustrate with examples rotate instruction?

3. a) What are different addressing modes? Explain.
   b) Write about real time computers.

4. a) What is instruction cycle? Explain with flowchart.
   b) Write the advantages and usage of peripheral component Interconnect Bus?

5. a) What is flash memory, how it is different from cache memory?
   b) Mention the standard I/O interfaces and describe the each one.

6. a) Differentiate between virtual memory and main memory.
   b) What is micro programmed control?

7. a) Differentiate between EPROM and EEPROM.
   b) Write the basic instruction types.

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Code No: R1622054 **R16** SET - 3

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(Com to CSE, IT, ECC)

Time: 3 hours Max. Marks: 70

Note: 1. Question Paper consists of two parts (**Part-A** and **Part-B)**
2. Answer **ALL** the question in **Part-A**
3. Answer any **FOUR** Questions from **Part-B**

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PART –A

1. a) What is instruction cycle?
   b) Write about hierarchy of memory.
   c) Explain the components of the computer system?
   d) What is the use of priority interrupts.
   e) Differentiate between main memory and cache memory.
   f) What are shift micro- operations?

PART -B

2. a) Differentiate between synchronous and Asynchronous modes of data transfer.
   b) Explain the basic organization of micro-programmed control unit.

3. a) Explain about associative memory.
   b) Explain diary chain priority interrupts.

4. a) Briefly explain various peripheral devices used in computer system.
   b) Explain the basic components of memory management unit?

5. a) Differentiate between shift and rotate instructions.
   b) Write about optical disks.

6. a) How data transfer can be controlled using handshaking technique?
   b) Differentiate between flash memory and cache memory.

7. a) What is interrupt? Explain different types of interrupts.
   b) Write about Direct memory Access.

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Code No: R1622054 **R16** SET - 4

II B. Tech II Semester Regular/ Supplementary Examinations, April/May - 2019
COMPUTER ORGANIZATION
(Com to CSE, IT, ECC)

Time: 3 hours Max. Marks: 70

Note: 1. Question Paper consists of two parts (**Part-A** and **Part-B)**
2. Answer **ALL** the question in **Part-A**
3. Answer any **FOUR** Questions from **Part-B**

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PART –A

1. a) Write differences between RISC and CISC.
   b) Mention the advantages of memory hierarchy?
   c) What is micro-operation?
   d) What is cache memory? Mention its importance?
   e) What are i/o peripherals? Mention its advantages.
   f) What is Direct Memory Access?

PART -B

2. a) What is micro operation? Briefly explain the arithmetic micro operation.
   b) Explain the organization of registers?

3. a) Explain the function of typical i/p-o/p interfaces.
   b) Explain the components of the system.

4. a) Write about logic instruction and its significance.
   b) Write about magnetic hard disks.

5. a) Differentiate between peripheral component interconnect (PCI) Bus and universal serial Bus.
   b) Differentiate between EPROM and EEPROM.

6. a) Write about different types of addressing modes.
   b) Write about branch instruction and its significance.

7. a) What are different forms of parallelism?
   b) What is parity? Give its significance.

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