

17CS42

USN

# Fourth Semester B.E. Degree Examination, June/July 2019 **Object Oriented Concepts**

Time: 3 hrs.

Max. Marks: 100

Note: Answer any FIVE full questions, choosing ONE full question from each module.

## Module-1

- Explain the various features of OOC. (08 Marks)
  - b. What is a constructor? Mention its types. Explain the parameterized constructor with a suitable code.
  - Give the difference between procedure oriented programming and object oriented programming. (04 Marks)

- What is an inline function? Write a C++ function to find the maximum of 2 numbers using (08 Marks)
  - b. Why friend function is required? Write a program to add two numbers using friend function. (08 Marks)
  - Write short note son function overloading.

## (04 Marks)

List and explain the Java Buzzwords.

(08 Marks) (04 Marks)

b. Describe the concept of bytecode.

c. Develop the program to calculate the average among the elements {4, 8, 10, 12} using foreach in java. How foreach is different from for? (08 Marks)

a. List the different types of operators. Explain any three.

(08 Marks)

b. What is an array? List the types and explain any one with a suitable code.

(06 Marks)

Explain switch case with an example.

(06 Marks)

## Module-3

a. Explain the packages in Java with an example.

(08 Marks)

b. Explain the interfaces in java using suitable code.

(08 Marks)

Write short notes on "this" keyword with an example.

(04 Marks)

Explain exception handling with a suitable code.

(08 Marks)

b. Explain the java garbage collector.

(08 Marks)

Write short notes on "super" keyword, with an example.

(04 Marks)

### Module-4

- Explain the concepts of multithreading in Java. Explain the two ways of making class threadable with examples. (10 Marks)
  - b. With a syntax, explain isAlive() and join() with suitable program.

(10 Marks)



OR

Write short notes on Event Listener interface and explain any two interfaces with syntax.

(08 Marks)

Write short notes on Event class and explain any two with syntax.

(08 Marks)

How inner classes are used in Java? Explain.

(04 Marks)

Module-5

What is an applet? Explain the life cycle of an applet. Explain passing parameters in Applets.

(10 Marks) (10 Marks)

Explain the following with a suitable code: 10

JLabel i)

**JTextField** ii)

iii). JList

JTable.

(20 Marks)