INDIAN MARITIME UNIVERSITY

(A Central University Government of India)

END SEMESTER EXAMINATIONS-June/July 2019 B.Tech(Marine Engineering) Semester-II

COMPUTER SCIENCE (UG11T2205)

Date: 04-07-2019 Maximum Marks: 100

Duration: 3 hrs Pass Marks: 50

Section – A (10x3 = 30 marks) (All questions are compulsory)

- 1. a) Explain analog, digital & hybrid computer.
 - b) Differentiate between data & information.
 - c) What is volatile memory & non volatile memory?
 - d) List the symbols used for flowchart.
 - e) Convert binary number (1010100)₂ into decimal number.
 - f) Why compiler & interpreter used? Is there any difference between compiler & interpreter? explain.
 - g) Why do we include < stdio.h > in c programs?
 - h) How one dimensional array is initialized?
 - i) What are formal parameter & actual parameter in functions?
 - j) What is pointer? How is pointer declared in c programs?

Section – B (5x14 = 70 marks) (Answer any Five of the following)

- 2. a) Convert following numbers:
 - (i) Hexadecimal (1E2)_H into decimal equivalent. (3)
 - (ii) decimal number 54.6875 into binary equivalent. (4)
 - b) Briefly explain software development steps. (7)
- 3. a) Explain briefly "The development of electronic computers (7) divided into five generations depending upon the technologies used."

	b)	What is programming language? Write a short note on machine language & assembly language.	(7)
4.	a) b)	Explain major types of computer networks based on size. Design an algorithm & flowchart to input fifty numbers & calculate their sum.	(7) (7)
5.	a) b)	Write C program to print fibbinacci series in given range. Write a short note on operators available in C language.	(7) (7)
6.	a)	Explain different loops available in c language with example.	(7)
	b)	Write a C program to print the following pattern using for loop. * ** ** ** *** ***	(7)
7.	a) b)	Write a C program to calculate sum of array elements. Explain various string operation with examples.	(7)(7)
8.	a)	Mention different types of functions (based on input & return value). Explain recursive function with an example.	(7)
	b)	Write a C program using pointer to print a character. Also print its ASCII value & rewrite the character in upper case.	(7)
