



NATIONAL SCHOOL OF BUSINESS MANAGEMENT
BSc. in Management Information Systems (Special) – 20.2
BSc. (Honours) in software Engineering – 20.2
BSc. (Honours) in Computer Science – 20.2
BSc. (Honours) in Computer Networks – 20.2
BSc (Hons) Software Engineering (PU) – 20.2
BSc (Hons) Computer Networks (PU) – 20.2
BSc (Hons) Computer Security (PU) – 20.2
Year 01 Semester 01 Examination
06 January 2021

Instructions to Candidates

- 1) Answer all questions
- 2) Total Number of Pages 3
- 3) Time allocated for the examination is three (03) hours and 30 minutes
(Including downloading and uploading time)
- 4) Weightage of Examination: 60% out of final grade
- 5) Download the paper, provide answers to the selected questions in a word document.
- 6) Please upload the document with answers (Answer Script) to the submission link before the submission link expires
- 7) Answer script should be uploaded in PDF Format
- 8) Under any circumstances E-mail submissions would not be taken into consideration for marking. Incomplete attempt would be counted as a MISSED ATTEMPT.
- 9) The Naming convention of the answer script – Module Code_Subject name_Index No
- 10) You must adhere to the online examination guidelines when submitting the answer script to N-Learn.
- 11) Your answers will be subjected to Turnitin similarity check, hence, direct copying and pasting from internet sources, friend's answers etc. will be penalized.

1. Write a C language program to display the Employee Name, Gross Salary, when the user inputs Employee Name, Basic Salary, and Sales Amount (in dollars). You can refer to the following formula and the table to calculate the Gross Salary:

$$\text{Gross Salary} = \text{Basic Salary} + \text{Commission}$$

<u>Sales Amount (Dollars)</u>	<u>Commission</u>
More than or equal 1000	10% from Sales Amount
800-1000	8% from Sales Amount
600-800	6% from Sales Amount
<600	4% from Sales Amount

(15 marks)

2. There are 30 students in the class sat for a module examination (One module).
 - a. Write a program to input marks all the students and display the highest marks and average marks.

(10 marks)

- b. Write a program to COUNT and display the total number of 'A','B','C' and 'F' grades. The grades are computed as given below:

Marks Range	Grade
80-100	A
60-80	B
40-60	C
<40	F

(15 marks)

3.
 - a. Create a function which read three (3) numbers (Allow the user to input) from the user and displays the highest number. After creating the function, call the function inside the main function.

(10 marks)

b. Create a function which accepts an integer as a parameter and display the factorial value of the number. Then call for the inside the main function.

(10 marks)

c. Write a program and explain the behaviour of a 'recursive' function.

(5 marks)

d. Declare an integer variable and assign a number. Write appropriate statements to indirectly access the above variable and display the variable 'Memory Address'.

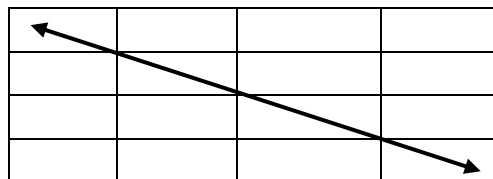
(10 marks)

4.

a. Write a C program to declare an array to store temperature values (temperature may contain decimal values) of 10 individuals. Display all the temperature values and the highest temperature value.

(10 marks)

b. Write a C program to declare a multi-dimensional array with a size of 4 x 4. Allow the user input numbers and display a) All the values b) Diagonal Values (Refer to the below).



(15 marks)

End of Paper