

Code: 7P2B12

M.C.A. I Semester Supplementary Examinations January 2020

**Problem solving with 'C'**

Max. Marks: 60

Time: 3 Hours

Answer all five units by choosing one question from each unit ( 5 x 12 = 60 Marks )

\*\*\*\*\*

**UNIT-I**

1. a) Define Operator? Discuss operator precedence and associativity 6M  
 b) What is ternary Operator? Write a program to find the largest of the two numbers using ternary operator 6M

**OR**

2. a) Compare and contrast the difference between automatic and static storage class. 6M  
 b) Write the structure of the C Program and Explain? 6M

**UNIT-II**

3. a) Explain formatted input / output functions used in the C program with examples 6M  
 b) A farm produces several food grains, namely wheat, barley, oats and flax. The monthly production details (in Kg) and price per Kg (in INR) received during the year are recorded. Read the production details and price of the food grains and print its details through your C program 6M

**OR**

4. a) Explain different types of branching statements in C with an example 6M  
 b) Discuss the break and continue statements with an examples 6M

**UNIT-III**

5. a) Write different string handling functions in C with examples 8M  
 b) Write a program to check whether the given string is a palindrome or not using built in functions 4M

**OR**

6. a) Explain different types of arrays in C 6M  
 b) Write a program to store and print the elements in a two dimensional array using while or do-while 6M

**UNIT-IV**

7. a) Define structure? Write the differences between arrays and structures 6M  
 b) **Mr. John runs a pizza-analysis service. For each pizza, he needs to record the following information:** The name of the pizza company, which can consist of more than one word, The weight of the pizza(in gms), price of the pizza **devise a structure in C that can hold this information and write a program to get the information about pizza from the user and then it should display the pizza details.** 6M

**OR**

8. a) What is modularity? How modularity is implemented in C functions? 6M  
 b) Define function? Write its advantages and disadvantages 6M

**UNIT-V**

9. Discuss different file handling functions in C 12M

**OR**

10. a) What is pointer? Explain pointer to a pointer with an example 6M  
 b) Write a program to allocate and release the memory dynamically 6M

\*\*\*\*\*

		CO	Blooms Level
1.	a)	CO1	L2
	b)	CO1	L3
2.	a)	CO3	L3
	b)	CO2	L2
3.	a)	CO2	L2
	b)	CO2	L4
4.	a)	CO1	L2
	b)	CO1	L3
5.	a)	CO4	L2
	b)	CO4	L3
6.	a)	CO3	L2
	b)	CO4	L3
7.	a)	CO3	L3
	b)	CO2	L4
8.	a)	CO4	L2
	b)	CO4	L2
9.		CO5	L2
10.	a)	CO5	L2
	b)	CO5	L3