G 1619　　　　　　　　(Pages : 2)　　　　　　Reg. No...................................

Name.................................

B.TECH. DEGREE EXAMINATION, MAY 2016

Fourth Semester

Branch : Electrical and Electronics Engineering

COMPUTER PROGRAMMING (E)

(Old Scheme—Prior to 2010 Admissions)

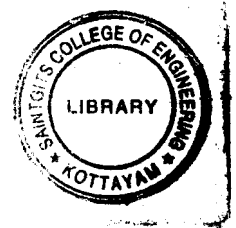[Supplementary/Mercy Chance]

Time : Three Hours　　　　　　　　　　　　　　　　　　　Maximum : 100 Marks

Write neat and efficient C programs wherever needed.

Part A

Answer **all** *questions.*
*Each question carries 4 marks.*

1. Distinguish between Global and Local variables.

2. With syntax, explain the conditional operator.

3. Mention the keywords used in defining the storage class of a variable and explain the signifiance of each.

4. Explain entry controlled and exit controlled loops with one example each.

5. Give the syntax and purpose of stramp() function used in handling strings. Illustrate with an example.

6. How does array definition differ from that of an ordinary variable ? How are individual array elements identified ?

7. What is the purpose of the fclose function ? Must a call to this function appear within a program that utilizes a data file ?

8. Illustrate accessing a variable through its pointer.

9. How can structure variables be defined ? How do structure declarations differ from structure type declarations ?

10. What is meant by dynamic memory allocation ? What library function is used to allocate memory dynamically ?

(10 × 4 = 40 marks)

Turn over

Part B

*Answer **all** questions.*
Each question carries 12 marks.
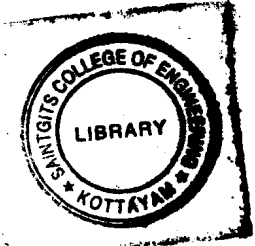
11. (a) With examples, describe the data types in C. (6 ma

(b) Mention the heirarchy of the whole set of opeators in C. (6 ma

Or

12. Write a C program to read a triplet (set of three numbers). Determine whether it represen traingle or not. If yes, identify its type as right angled, equilateral isoscles or ordinary type.

13. Write a C function to scan a character string passed as an argument and convert all the lower characters of that string into uppercase equivalents.

Or

14. Write a C program to find the number of 3 digit integers divisible by 7. Also find the sum of s numbers.

15. Write a program to find whether the matrices A and B are conformable for multiplication. I find the product matrix and print it.

Or

16. The names of 60 students of a class are available in the increasing order of their Entra Examination ranks. Read the names and prepare a roll list in the alphabetical order.

17. Using pointers, write a program to find the smallest of a list of N given numbers.

Or

18. A text file is to be copied into another after squeezing out all blank spaces in the original f Write a C program to carryout this operation.

19. (a) List and explain any *three* preprocessor·derivatives, giving suitable examples. (6 mar

(b) Write a C program to create a linked list to read N numbers, obtained from the user and pr the list.

(6 mar

Or

20. Write a C program to sort a set of mark sheets of N students. The mark sheet contains Regist number, name, marks of eight subjects and total marks. Make use of a structure to develop t program.

[5 × 12 = 60 mark