

2009 ACHARYA NAGARJUNA UNIVERSITY
B.TECH II SEMESTER DEGREE EXAMINATIONS
C AND DATA STRUCTURES

TIME : 3 HOUR
MARK : 90

ANSWER ALL QUESTIONS

PART A [2*10=20]

- a. What is an array/
- b. Distinguish between user defined function and library functions.
- c. What is meant by storage class?
- d. Define array of pointers.
- e. Distinguish between structures and unions.
- f. Write operations of opening and closing a file.
- g. What is a binary search?
- h. What is a data structure?
- i. What is a sparse matrix?
- j. Define priority queue.

PART-B [7*10=70]

1. a. What are different string handling functions. Explain in detail.
- b. What are different types of arrays? Explain with example.
2. a. What is a function? Explain how parameters are passed in a function?
- b. Write a C program for Towers-of-Hanoi?
3. a. What is a Union? Write a C program using union?
- b. What is a C program for Binary search?
4. a. What is a structure? Write a C program using structure.
- b. Explain various I/O operations of files.
5. a. Write a C program to implement stack operation?
- b. What is circular double linked list? Write the operation on Circular double Linked List?
6. a. Write a C program to implement Queue operations?
- b. Explain CPU scheduling in multiprogramming environment?
7. a. What is a Binary tree? Explain various operations on binary tree?
- b. Write a C program to implement Merge Sort?