1. Create function called swap ( ), which swaps the number values. Create a function pointer which points to a swap ( ) function and call function using pointer. Write a program which also checks whether the two number entered by user is palindrome or not after swaping.

2. Implement linked list to create and manage a set of elements. Set of elements contains integer values i.e. S = {4,5,6}. Also implement a method which shows all possible subsets of the created set by user i.e. {{4}, {5}, {6}, {4,5}, {4,6}, {5,6}, {4,5,6}, {Ø}}.

3. Write a program to check the balance of parenthesis if an expression. Implement required data structure for the same.

4. Implement a program to generate a linked list. For any unsorted linked list, write a method that will delete any duplicates from the linked list without using a temporary buffer.

5. Write a program to create a binary tree. Implement required method to generate a binary tree from user inputs and to display binary tree using level order and pre order traversals.

6. Given two values v1 and v2 (where v1 < v2) within a Binary Search Tree. Print all the keys of tree in range v1 to v2. i.e. print all x such that v1<=x<=v2 and x is a element of given BST. (Create a Binary Search Tree by any method).

7. Write a program to create a binary tree. Implement required method to generate a binary tree from user inputs and check whether the Binary Tree is a perfect binary tree.

8. Write a program to implement stack with all basic operations using linked list.

9. Write a program to implement Queue with all basic operations using linked list.

10. Write a program to implement stack with required operations using array.

11. Write a program to implement Queue with required operations using array.

12. Write a program to check whether the string is palindrome or not. Use Stack Data Structure for the same.

13. Write a program to implement Doubly Linked List.