(1) Even or Odd.

Input :-

Enter the value of n : 12

Output

given number 23 is Odd

(2) Sum of 50 numbers

Input :-

Enter the value of n : 50

output :-

The Sum of 50 numbers is : 1275

(3) Sum of even numbers Using While Loop?

Input :- Enter the limit : 50

Output :- The Sum of Numbers 1 to 50 is 650

(4) reverse a given number.

Input :- Enter the value of n = 3456

Output :- The reverse of a number is 6543

(5) Check palindrome.

Input :- Enter the Value of n = 121

Output :- The given number is palindrome

(6) Check armstrong or not

Input :- Enter the value of n : 371

Output :- Given number is armstrong

(7) factorial of a number ?

Input :- Enter the value of n = 5

Output :- The factorial of a number 5 is 120

(8) Factorial with recursion ?

Input ; Enter the value of n = 5

Output :- The factorial of a number 5 is 120

(9) fibonacci Series. ?

Input :- Enter the value of n : 5

Output :- fibonacci Series : 0 1 1 2 3

(10) fibonacci Series Using recursion ?

Input :- Enter the value of n : 5

Olp :- fibonacci Series : 0 1 1 2 3

Day-2

(1) To Search a particular Element in a list Using Linear Search?

I/P :- Enter the number of elements in an array : 5

Enter 5 Numbers
45
58
90
4
3

O/P :- Enter number to Search : 3

3 is present at position 5

(2) To Search an Element Using binary Search?

I/P :- Enter the size of array : 5

Enter the Element :
23
45
67
80
45

O/P :- Enter the Element to Search : 67.

67 is found at position 3

(3) To Cal Sum of Element in an array?

I/P :- Enter the size of an array 5

O/P :- Enter the Elements

1
2
3
4
5

The Sum of an array is 15

(4) To Merge two arrays

I/P :- Enter the Size of first array : 3

Enter the elements :

1
2
9

ENTER the Size of Second array.

:4

Enter the elements

5
6
7
8

New array after Merging is :

1 2 3 5 6 7 8

(5) To perform insertion, deletion of Elements in the middle of an array :

I/P :- Enter the Size of first array : 5

Enter the elements :

1
2
3
4
5

O/P :- Enter the Element to be inserted.

:6

O/P :- 1
2
6
3
4
5

I/P :- Enter the position to delete : 4

O/P : 1 2 6 3 5

(6) Reverse a string

I/P :- Enter a string to reverse : rohith

O/P :- reverse of the string : htihor

(7) Check String is a palindrome Or not?

I/P :- Enter the String : malayalam

O/P :- String is palindrome.

(8) To search a particular char in a string?

I/P :- Mistuha ; Enter the char to Search 's'

O/P : The char 's' was found in the string

(9) Count Number of times a, e, i, o, u present in the given string

I/p :- Enter a String : banny

Vowels Counts (a e i o u) :

1 0 0 0 1

(10) Matrix Mutiplication

I/p Matrix A :- 1 2 3
4 5 6
7 8 9

Matrix B :-
9 8 7
6 5 4
3 2 1

O/p :- Result of Matrix Multiplication (A * B) :

30 24 18
84 69 54
138 114 90

(11) String Manpulation ?

Enter the Main string : banny

Enter the Secondary string : royal

O/p :- Length : 5

Concatenated : banny royal

Compare : Not equal

Revers: : layorunnab

Upper case : BANNU ROYAL

Lower Case : bannu royal

Day-3.

(1) Single linked list.

(a) beginning
(b) middle
(c) Last

I/P :- Enter number of elements to insert at the beginning : 3

Enter 3 values

1
2
3

(a) At beginning : 3 → 2 → 1 → NULL

(b) Middle : 3 → 2 → 6 → 1 → NULL

Value = 6

(c) at the end : 3 → 2 → 6 → 1 → 7 → 8 → 9 → 0

value = 7, 8, 9, 0

(2) STACK data structure. PUSH & POP element

I/P Enter the element to PUSH : 4.

O/P :- 1, 2, 3, 4

(3) To implement Queue Operation Enqueue, dequeue, display

I/p: Enter ~~element~~ to Equeue :-

1
2
3
4

Enter element to dequeue : 2

Display : 1 3 4

(4) To Convert infix Exp to postfix exp Using STACK?

I/p Enter Infix Exp : ((A+B)*(C-D))/(f-g)

postfix exp : AB+CD-*fg-/

(6) To evaluate the given postfix Exp Using STACK?

I/p :- Enter the postfix Exp : 5432-+/

O/p :- postfix evaluation = 1

Day 4

(1) Write a C- program to implement binary tree traversal

I/P :- 27, 14, 35, 10, 19, 31, 42

O/P :- pre Order : 27 14 10 19 35 31 42

In order : 10 14 19 27 31 35 42

post Order : 10 19 14 31 42 35 27

(2) Write C-program for AVL tree

I/P :- 10, 20, 30, 40, 25

O/P :- 30 20 10 25 40 50.

(3) Linear Probing

I/P :- Enter a value to insert into hash table : 3

Press
1 Insert
2 Display
3 Search
4 Exit

Element in the hash table = 0, 1,

(4) Bubble Sort

I/P :- Enter number of elements : 5

23
54
12
3
69

O/P :- Sorted list : 3 12 25 54 69

(5) Selection Sort

I/P :- Elements : 64, 25, 12, 22, 11

O/P :- Sorted array : 11 12 22 25 64

(6) Insertion Sort

I/P :- Elements : 12
31
25
8
32
17

O/P :- Before Sorting array elements are
12 31 25 8 32 17

After Sorting array element are.

8 12 17 25 31 32

(7) To implement Quick Sort?

I/p:- Number of elements 5
1
56
78
3
40

O/p:- Order of Sorted elements:

1 3 40 56 78

(8) To Implement Merge sort?

I/p :- a[11] = 10, 14, 19, 26, 27, 31, 33, 35, 42, 44
0..0

O/p:- List before Sorting:

10 14 19 26 27 31 33 35 42 44 0

Lis After Sorting

0 10 14 19 26 27 31 33 35 42 44