ASSIGNMENT WEEK-2

1.Take two string inputs, concatenate them and print it reverse order using loop.

2. Take 10 integer inputs and find sum of odd numbers and even numbers.

3.Take an integer input. Swap First and last digit of integer.

4.Rishi wants you juniors to find Fibonacci Series of N-number using loop.

5.initialise two 2*2 matrices and print their sum and product.

6.Take input N and print a square pattern like below with N *s per side.

If N=5, then the pattern should look this

```
* * * * *
*       *
*       *
*       *
* * * * *
```

Practice Questions:

Loops:

1. Write a C program to print all natural numbers from 1 to n.
2. Write a C program to print all natural numbers in reverse (from n to 1).
3. Write a C program to print all ASCII characters with their values.
4. Write a C program to find the first and last digit of a number.
5. Write a C program to calculate the sum of digits of a number.
6. Write a C program to enter a number and print its reverse.
7. Write a C program to find HCF (GCD) of two numbers.
8. Write a C program to find LCM of two numbers.
9. Write a C program to check whether a number is Prime number or not.

10.WAP a C program to print the following three patterns.

A. PATTERN-1

```
*
* *
* * *
```

```
* * * *
* * * * *
```

B. PATTERN-2

```
1
2 3
4 5 6
7 8 9 10
```

C. PATTERN-3

```
A
A B
A B C
A B C D
A B C D E
```

Arrays:

1. Write a C program to read and print elements of an array.
2. Write a C program to read the number of values in an array and display it in reverse order.
3. Write a C program to copy the elements of one array into another array.
4. Write a C program to merge two arrays.

Strings:

- Write a C program to take input to a string and print it out.
- Write a C program to find the length of a string without using library function.
- Write a C program to count the total number of alphabets, digits and special characters in a string.
- Write a C program to find maximum occurring character in a string.