PG DAC–March 2023
C-DAC THIRUVANANTHAPURAM
JAVA- LAB 4

1. Write a program to demonstrate switch case for displaying the corresponding day. For each number entered by the user

SwitchQues.java

```
1  package com.javaassignment4.main;
2  import java.util.Scanner;
3  public class SwitchQues {
4
5      public static void main(String[] args) {
6          Scanner sc  = new Scanner(System.in);
7          System.out.print("Enter the number of day of week :- ");
8          int day_of_week = sc.nextInt();
9
10             switch (day_of_week) {
11             case 1:
12                 System.out.println("Today is monday");
13                 break;
14             case 2:
15                 System.out.println("Today is Tuesday");
16                 break;
17             case 3:
18                 System.out.println("Today is Wednesday");
19                 break;
20             case 4:
21                 System.out.println("Today is Thursday");
22                 break;
23             case 5:
24                 System.out.println("Today is Friday");
25                 break;
26             case 6:
27                 System.out.println("Today is Saturday");
28                 break;
29             case 7:
30                 System.out.println("Today is Sunday");
31                 break;
32             default:
33                         System.out.println("Enter number between 1 to 7....."); }
34          }
35 }
36
```

Properties | Servers | Data Source Explorer | Snippets | Console

```
<terminated> SwitchQues [Java Application] D:\Eclipse\eclipse\plugins\org.eclips
Enter the number of day of week :- 5
Today is Friday
```

2. Write a program to concatenate two 1-D arrays.

ConcArray.java

```
1  package com.javaassignment4.main;
2
3  public class ConcArray {
4
5      public static void main(String[] args) {
6          int[] ar1 = {2, 4, 6, 8, 10};
7          int[] ar2 = {1, 3, 5, 7, 9};
8
9          int totalLength = ar1.length + ar2.length;
10
11         int[] concatArr = new int[totalLength];
12
13         for (int i = 0; i < ar1.length; i++) {
14             concatArr[i] = ar1[i];
15         }
16
17         for (int i = 0; i < ar2.length; i++) {
18             concatArr[ar1.length + i] = ar2[i];
19         }
20
21         for (int i = 0; i < concatArr.length; i++) {
22             System.out.print(concatArr[i] + " ");
23         }
24     }
25 }
26
```

Console

```
<terminated> ConcArray [Java Application] D:
2 4 6 8 10 1 3 5 7 9
```

3. Write a program to create two 2-D arrays named arr1 and arr2 of numbers. Find the sum of the corresponding elements and store in a third array arr3.

```
1  package com.javaassignment4.main;
2
3  import java.io.IOException;
4
5  public class AddArray2D {
6
7      public static void main(String[] args) throws IOException{
8          System.out.println("Addition of 2D Array");
9          int [][]ar1 = new int [][]{{1,2},{3,4}};
10         int [][] ar2 = new int[][] {{5,6},{7,8}};
11
12         int [][]ar3 = new int [2][2];
13
14         for(int i=0;i<ar1.length;i++) {
15             for(int j=0;j<ar2.length;j++) {
16             ar3[i][j]=ar1[i][j]+ar2[i][j];
17             System.out.print(ar3[i][j]+" ");
18             }
19         }
20     }
21 }
```

<terminated> AddArray2D [Java Application] D:

```
Addition of 2D Array
6 8 10 12
```

4. Create a 2-D array of numbers and display the lower half of the Array using loop statement(s) and break.
eg:- If the array was
10 20 30
40 50 60
70 80 90
The output should be like shown below.
10
40 50
70 80 90

```java
package com.javaassignment4.main;

public class LowerHalf {

        public static void main(String[] args){
            int [][]arr = {{10,20,30},{40,50,60},{70,80,90}};
            for (int i = 0; i < arr.length; i++) {
                for (int j = 0; j < arr[i].length; j++) {
                    if (j<=i) {
                        System.out.print(arr[i][j] + " ");
                    }
                    else
                    {
                        break;
                    }

                }
                System.out.println();
            }
        }
    }
```

```
<terminated> LowerHalf [Java Appli
10
40 50
70 80 90
```

5. Write a java program to reverse an array

```java
package com.javaassignment4.main;

public class Reverse {

    public static void main(String[] args) {
        int arr[]= {1,2,3,4,5,6,7};
        System.out.println("Array");
        for(int i=0;i<arr.length;i++)
        {
        System.out.print(arr[i]+" ");
        }
        System.out.println();
        System.out.println("Array in reverse order");
        for(int i=arr.length-1;i>=0;i--)
        {
        System.out.print(arr[i]+" ");
        }
    }
}
```

```
<terminated> Reverse [Java Application] D:\E
Array
1 2 3 4 5 6 7
Array in reverse order
7 6 5 4 3 2 1
```