Daily Work Practice:- Date – 7/8/2023

Problem: Merge Sorted Arrays

```
package com.ishwarchavan;

import java.util.Arrays;

public class MergeSortedArrays {
	public static void main(String[] args) {		//main program started
		int[] nums1 = new int[] {1,2,3,0,0,0};		// creating and initializing arrays
		int[] nums2  = new int[] {2,5,6};
		int m=3;				//declare and initialize values
		int n=3;
		merge(nums1,m,nums2,n);			//calling the merge function

	}

	private static void merge(int[] nums1,int m,int[] nums2,int n) {	//passing parameter
		int[] nums1Copy =new int[m];			//creating new variable
		for(int i=0; i<m; i++) {		//loop iterating
			nums1Copy[i]=nums1[i];			//storing the indes value of nums1 to this variable

		}
		int pointer1=0;			//creating two pointer and initialozing with 0
		int pointer2=0;

		for(int i=0; i<m+n;i++) {	//loop iterating
			if(pointer2>=n || (pointer1<m && nums1Copy[pointer1]<nums2[pointer2])) {  //if satisfied the condition then pass the pointer1
				nums1[i]=nums1Copy[pointer1++];			//store the value in nums1copy1 and then increment pointer
			}else {
				nums1[i]=nums2[pointer2++];		//if the condition then executed this statement
			}
		}
		System.out.println(Arrays.toString(nums1));
	}
}
```

Problem: Reverse Integer

```
package com.ishwarchavan;

public class ReverseNumber {

	public static void main(String[] args) {	//main program started
		reverse(123);				// calling to the function
	}
	public static void reverse(int x) {	//passing integer x as parameter
		System.out.println("Given x: "+x);
		int y= 0;			//declared and initialized the y variable
		while(x !=0) {			//while condition is x is not equal to 0
			int rem = x%10;		//storing remainder in rem variable
			y=y*10+rem;
			x=x/10;		//sroring x value
		}
		System.out.println("Reversed x: "+y);
		}
	}
```