Executing the program to verify the execution of the bubble sort algorithm

Program:

public class BubbleSort {

public static void main(String[] args)

{

int arr[] ={860,8,200,9};

System.out.println("---Array BEFORE Bubble Sort---");

printArray(arr);

bubbleSort(arr);//sorting array elements using bubble sort

System.out.println("---Array AFTER Bubble Sort---");

printArray(arr);

}

static void bubbleSort(int[] array)

{

int n = array.length;

int temp = 0;

for(int i=0; i < n; i++)

{

System.out.println("Sort Pass Number "+(i+1));

for(int j=1; j < (n-i); j++)

{

System.out.println("Comparing "+ array[j-1]+ " and " + array[j]);

if(array[j-1] > array[j])

{

temp = array[j-1];

array[j-1] = array[j];

array[j] = temp;

System.out.println(array[j] + " is greater than " + array[j-1]);

System.out.println("Swapping Elements: New Array After Swap");

printArray(array);

}

}

}

}

static void printArray(int[] array){

for(int i=0; i < array.length; i++)

{

System.out.print(array[i] + " ");

}

System.out.println();

}

}

OUTPUT:

860 8 200 9

Sort Pass Number 1

Comparing 860 and 8

860 is greater than 8

Swapping Elements: New Array After Swap

8 860 200 9

Comparing 860 and 200

860 is greater than 200