```
import java.lang.Math;
8
   public class Main
9
       public static void main(String[] args)
10
  H
11
12
13
           char ch=" ;
           for(int i=4;i>=1;i--)
14
15
           ď
               int k=(int)Math.pow(2,i-1);
16
17
               if(i==4)
                  ch='*':
18
               else if(i==3)
19
                  ch="&";
20
               else if(i==2)
21
                  ch='%';
22
               for(int j=i;j<=4;j++)
23
24
25 System.out.println("Author:M.Hema Vardhini");
   System.out.println("SAP ID:51834505");
26
                    System.out.print(" ");
27
28
                for(int j=1;j<=k+2;j++)
29
30
                    if(j==1 || j==k+2 && i!=1)
31
32
                        System.out.print("#");
33
34
                    else if(i!=1)
35
36
                    ď
                        System.out.print(ch);
37
38
                    7
39
                System.out.println();
40
41
           42
43
       }
44
```

```
Author:M.Hema Vardhini
SAP ID:51834505
 #*****
Author:M.Hema Vardhini
SAP ID:51834505
Author: M. Hema Vardhini
SAP ID:51834505
#&&&&#
Author:M.Hema Vardhini
SAP ID:51834505
 Author:M.Hema Vardhini
SAP ID:51834505
Author: M. Hema Vardhini
SAP ID:51834505
 #%%#
Author:M.Hema Vardhini
SAP ID:51834505
 Author:M.Hema Vardhini
SAP ID:51834505
 Author:M.Hema Vardhini
SAP ID:51834505
Author:M.Hema Vardhini
SAP ID:51834505
#
Process finished.
```

```
1
   import java.util.Scanner;
2
3
4
5
6
7
8
   public class Ascending_Order
         public static void main(String[] args)
              int n, temp;
    Scanner s = new Scanner(System.in);
System.out.println("Author :M.Hema Vardhini");
System.out.println("SAP ID:51834505"); System.out.print("Enter no. of elements you want in array:
9
10
              n = s.nextInt();
              int a[] = new int[n];
System.out.println("Enter all the elements:");
11
12
13
              for (int i = 0; i < n; i++)
14
15
                    a[i] = s.nextInt();
16
                 r (int i = 0; i < n; i++)
     Share 1
                   for (int j = i + 1; j < n; j++)
```

```
for (int i = 0; i < n; i++)
7
8
           Н
9
                for (int j = i + 1; j < n; j++)
20
                ł
21
22
                    if (a[i] > a[j])
                     {
23
                         temp = a[i];
24
                         a[i] = a[j];
25
26
                         a[j] = temp;
                    3
27
28
29
30
           System.out.print("Ascending Order:");
31
           for (int i = 0; i < n - 1; i++)
32
           e l
                System.out.print(a[i] + ",");
```

```
26
27
28
29
           System.out.print("Ascending Order:");
30
           for (int i = 0; i < n - 1; i++)
31
32
33
                System.out.print(a[i] + ",");
34
35
           System.out.print(a[n - 1]);
36
37 }
```

```
Author :M.Hema Vardhini
SAP ID:51834505
Enter no. of elements you want in array:5
Enter all the elements:
25
5
8
2
11
Ascending Order:2,5,8,11,25
Process finished.
```

```
import java.util.Arrays;
1
2
3
   public class MergeArrayProgram
4
5
       private static int[] mergeArray(int[] arrayA, int[] arrayB)
6
7
           int[] mergedArray = new int[arrayA.length + arrayB.length];
8
9
          int i=0, j=0, k=0;
10
          while (i < arrayA.length)
11
12
              mergedArray[k] = arrayA[i];
13
14
              i++;
15
               k++;
16
```

```
20
21
22
               mergedArray[k] = arrayB[j];
               j++;
               k++;
23
24
25
           }
           Arrays.sort(mergedArray);
26
27
           return mergedArray;
28
       }
29
       public static void main(String[] args)
30
31
           int[] arrayA = new int[] {12, -7, 18, 9, 37, -1, 21};
32
33
              :[] arrayB = new int[] {27, 8, 71, -9, 18};
```

while (j < arrayB.length)

17

18 19

{

```
int[] arrayB = new int[] {27, 8, 71, -9, 18};
34
35
          int[] mergedArray = mergeArray(arrayA, arrayB);
36
37
38 System.out.println("Author:M.Hema Vardhini");
39 System.out.println("SAP ID:51834505");
40 System.out.println("Array A : "+Arrays.toString(arrayA));
41
          System.out.println("Array B : "+Arrays.toString(arrayB));
42
43
          System.out.println("Merged Array : "+Arrays.toString(mergedArray))
44
45
      П
46
```

Author:M.Hema Vardhini SAP ID:51834505 Array A : [12, -7, 18, 9, 37, -1, 21] Array B : [27, 8, 71, -9, 18]

Merged Array : [-9, -7, -1, 8, 9, 12, 18, 18, 21, 27, 37, 71]

Process finished.

SAP ID:51834505 Author:M.Hema vardhini 4 words.

Process finished.