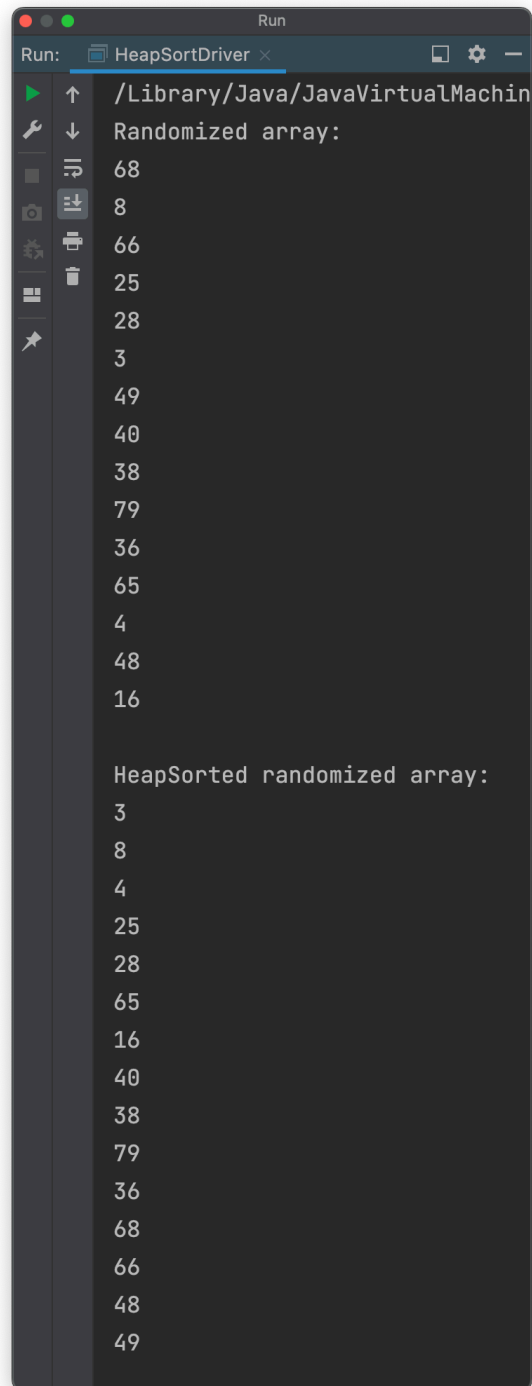


Question 1: HeapSort — Test Exhibits

Randomized array before and after sort:



```
Run: HeapSortDriver x
/Library/Java/JavaVirtualMachin
Randomized array:
68
8
66
25
28
3
49
40
38
79
36
65
4
48
16

HeapSorted randomized array:
3
8
4
25
28
65
16
40
38
79
36
68
66
48
49
```

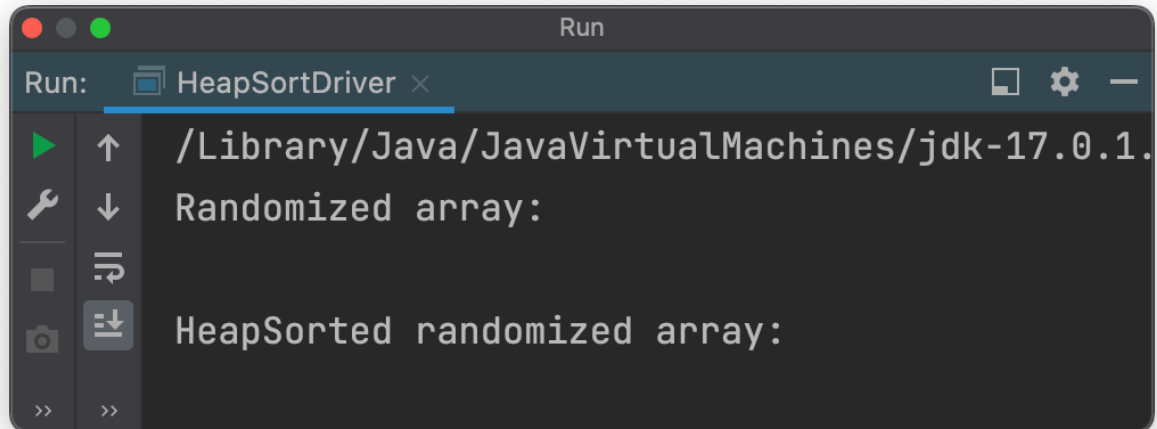
Sorted array before and after sort:



```
Run: HeapSortDriver x
Sorted string array:
a
b
b
c
c
c
c
d
d
d
d
d
d
d
d

HeapSorted string array:
a
b
b
c
c
c
c
d
d
d
d
d
d
d
d
```

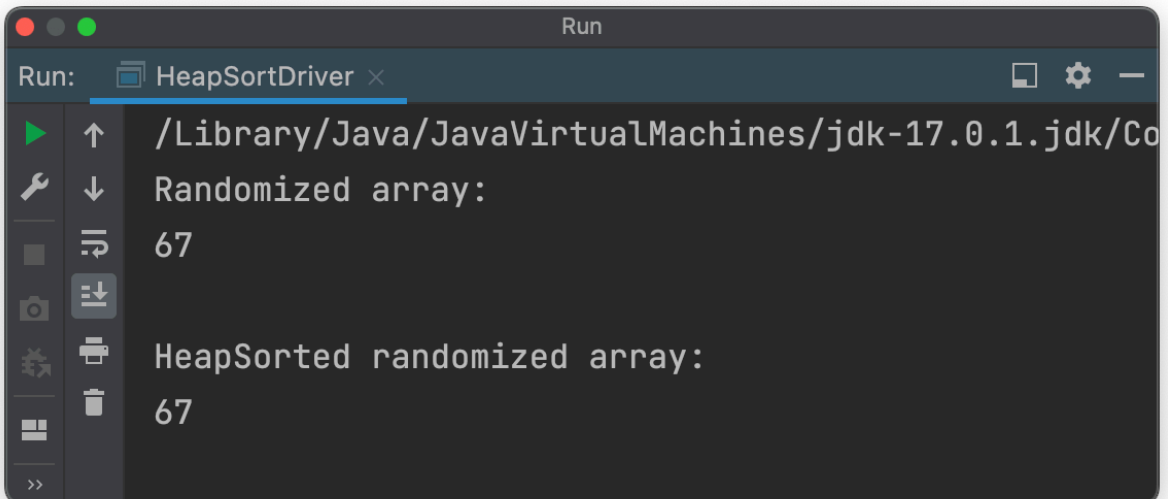
Sorting zero elements:



The screenshot shows a 'Run' console window for a class named 'HeapSortDriver'. The console output is as follows:

```
/Library/Java/JavaVirtualMachines/jdk-17.0.1.  
Randomized array:  
  
HeapSorted randomized array:
```

Sorting a single element:



The screenshot shows a 'Run' console window for a class named 'HeapSortDriver'. The console output is as follows:

```
/Library/Java/JavaVirtualMachines/jdk-17.0.1.jdk/Co  
Randomized array:  
67  
  
HeapSorted randomized array:  
67
```