

State of the Array After Each Pass

Bubble Sort

```
4  9  6 12  1 15  8  3 10 17
4  6  9  1 12  8  3 10 15 17
4  6  1  9  8  3 10 12 15 17
4  1  6  8  3  9 10 12 15 17
1  4  6  3  8  9 10 12 15 17
1  4  3  6  8  9 10 12 15 17
1  3  4  6  8  9 10 12 15 17
1  3  4  6  8  9 10 12 15 17
1  3  4  6  8  9 10 12 15 17
```

Selection Sort

```
10  4  9  6 12  1 15  8  3 17
10  4  9  6 12  1  3  8 15 17
10  4  9  6  8  1  3 12 15 17
 3  4  9  6  8  1 10 12 15 17
 3  4  1  6  8  9 10 12 15 17
 3  4  1  6  8  9 10 12 15 17
 3  1  4  6  8  9 10 12 15 17
 1  3  4  6  8  9 10 12 15 17
```

Merge Sort

```
4 17  9  6 12  1 15  8  3 10
4  9 17  6 12  1 15  8  3 10
4  9 17  6 12  1 15  8  3 10
4  6  9 12 17  1 15  8  3 10
4  6  9 12 17  1 15  8  3 10
4  6  9 12 17  1  8 15  3 10
4  6  9 12 17  1  8 15  3 10
4  6  9 12 17  1  3  8 10 15
1  3  4  6  8  9 10 12 15 17
```

Quick Sort

```
10  4  9  6 12  1 15  8  3 17
 3  4  9  6  1  8 10 12 15 17
 1  3  9  6  4  8 10 12 15 17
 1  3  8  6  4  9 10 12 15 17
 1  3  4  6  8  9 10 12 15 17
```