

Prompt

Scratchpad

Our Solution(s)

Video Explanation

Difficulty: ■ **Category:** Searching **Successful Submissions:** 36,742+

Find Three Largest Numbers ○ ★

Write a function that takes in an array of at least three integers and, without sorting the input array, returns a sorted array of the three largest integers in the input array.

The function should return duplicate integers if necessary; for example, it should return `[10, 10, 12]` for an input array of `[10, 5, 9, 10, 12]`.

Sample Input

```
array = [141, 1, 17, -7, -17, -27, 18, 541, 8, 7, 7]
```

Sample Output

```
[18, 141, 541]
```

Hints

Hint 1 ▲

Can you keep track of the three largest numbers in an array as you traverse the input array?

Hint 2 ▲

Following the suggestion in Hint #1, try traversing the input array and updating the three largest numbers if necessary by shifting them accordingly.

Optimal Space & Time Complexity



$O(n)$ time | $O(1)$ space - where n is the length of the input array