



Sorting based top 15 problem commonly asked in interview questions.

give input and output of the problem.

list 5 easy, 5 medium, 5 hard difficulty problems.

< 8/8 >



Here's a list of 15 commonly asked sorting-related problems in interviews, categorized by difficulty. I'll include the input and output for each.

### Easy Problems:

#### 1. Sort Colors (LeetCode 75)

• Input: `[2, 0, 2, 1, 1, 0]`

• Output: `[0, 0, 1, 1, 2, 2]`



Get citation

#### 2. Merge Sorted Array (LeetCode 88)

• Input: `nums1 = [1, 2, 3, 0, 0, 0], m = 3, nums2 = [2, 5, 6], n = 3`

• Output: `[1, 2, 2, 3, 5, 6]`

#### 3. Intersection of Two Arrays II (LeetCode 350)

• Input: `nums1 = [1, 2, 2, 1], nums2 = [2, 2]`

• Output: `[2, 2]`

#### 4. Single Number (LeetCode 136)

• Input: `[2, 2, 1]`

• Output: `1`

#### 5. Valid Anagram (LeetCode 242)

• Input: `s = "anagram", t = "nagaram"`

• Output: `true`



### Medium Problems:

#### 1. 3Sum (LeetCode 15)

• Input: `[-1, 0, 1, 2, -1, -4]`

• Output: `[[-1, -1, 2], [-1, 0, 1]]`

#### 2. Sort an Array (LeetCode 912)

• Input: `[5, 2, 3, 1]`

• Output: `[1, 2, 3, 5]`

#### 3. Top K Frequent Elements (LeetCode 347)

• Input: `nums = [1, 1, 1, 2, 2, 3], k = 2`

• Output: `[1, 2]`

#### 4. Kth Largest Element in an Array (LeetCode 215)

• Input: `[3, 2, 1, 5, 6, 4], k = 5`

• Output: `5`

#### 5. Contains Duplicate II (LeetCode 219)

• Input: `nums = [1, 2, 3, 1], k = 3`

• Output: `true`

### Hard Problems:

### 1. Median of Two Sorted Arrays (LeetCode 4)

- Input: `nums1 = [1, 3], nums2 = [2]`
- Output: `2.0`

### 2. Largest Rectangle in Histogram (LeetCode 84)

- Input: `[2, 1, 5, 6, 2, 3]`
- Output: `10`

### 3. Find the K-th Smallest Pair Distance (LeetCode 719)

- Input: `nums = [1, 3, 1], k = 1`
- Output: `0`

### 4. Wiggle Sort II (LeetCode 324)




- Input: `[1, 5, 1, 1, 6, 4]`
- Output: `[1, 6, 1, 5, 1, 4]`

### 5. Counting Inversions (Variation of LeetCode 493)


- Input: `[1, 3, 2, 3, 1]`
- Output: `4`





These problems test various aspects of sorting and manipulation of arrays, from basic sorting to more complex scenarios involving multiple data structures and algorithms.

Is this conversation helpful so far?   

Two interesting problems

 Upgrade plan  
Get GPT-4, DALL-E, and more

 Message ChatGPT   

ChatGPT can make mistakes. Check important info.