

442. Find All Duplicates in an Array

Solved 

Medium

Topics

Companies

Given an integer array `nums` of length `n` where all the integers of `nums` are in the range `[1, n]` and each integer appears **once** or **twice**, return an array of all the integers that appears **twice**.

You must write an algorithm that runs in $O(n)$ time and uses only constant extra space.

Example 1:

Input: `nums = [4,3,2,7,8,2,3,1]`

Output: `[2,3]`

Example 2:

Input: `nums = [1,1,2]`

Output: `[1]`

Example 3:

Input: `nums = [1]`

Output: `[]`

```
class Solution {
    func findDuplicates(_ nums: [Int]) -> [Int] {
        var hash:[Int:Int] = [:]

        for i in nums {
            hash[i,default:0]+=1
        }

        var ans = [Int]()

        for (i,v) in hash {
            if(v > 1) {
                ans.append(i)
            }
        }

        return ans
    }
}
```