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895. Maximum Frequency Stack

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Design a stack-like data structure to push elements to the stack and pop the most frequent element from the stack.

Implement the `FreqStack` class:

- `FreqStack()` constructs an empty frequency stack.
- `void push(int val)` pushes an integer `val` onto the top of the stack.
- `int pop()` removes and returns the most frequent element in the stack.
  - If there is a tie for the most frequent element, the element closest to the stack's top is removed and returned.

Example 1:

Input

["FreqStack", "push", "push", "push", "push", "push", "push", "pop", "pop", "pop", "pop"]

[[], [5], [7], [5], [7], [4], [5], [], [], [], []]

Output

[null, null, null, null, null, null, null, 5, 7, 5, 4]

Explanation

FreqStack freqStack = new FreqStack();  
freqStack.push(5); // The stack is [5]  
freqStack.push(7); // The stack is [5,7]  
freqStack.push(5); // The stack is [5,7,5]  
freqStack.push(7); // The stack is [5,7,5,7]  
freqStack.push(4); // The stack is [5,7,5,7,4]  
freqStack.push(5); // The stack is [5,7,5,7,4,5]  
freqStack.pop(); // return 5, as 5 is the most frequent. The stack becomes [5,7,5,7,4].  
freqStack.pop(); // return 7, as 5 and 7 is the most frequent, but 7 is closest to the top. The stack becomes [5,7,5,4].  
freqStack.pop(); // return 5, as 5 is the most frequent. The stack becomes [5,7,4].  
freqStack.pop(); // return 4, as 4, 5 and 7 is the most frequent, but 4 is closest to the top. The stack becomes [5,7].

Constraints:

- $0 \leq val \leq 10^9$
- At most  $2 * 10^4$  calls will be made to `push` and `pop`.
- It is guaranteed that there will be at least one element in the stack before calling `pop`.

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```
class FreqStack {  
  
    public FreqStack() {  
  
    }  
  
    public void push(int val) {  
  
    }  
  
    public int pop() {  
  
    }  
}  
  
/**  
 * Your FreqStack object will be instantiated and called as such:  
 * FreqStack obj = new FreqStack();  
 * obj.push(val);  
 * int param_2 = obj.pop();  
 */
```

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