

```
// Function to find the peak element
// arr[]: input array
// n: size of array a[]
// A peak element in an array is the one that is not smaller than its neighbours.
// Function to return the index of any one of its peak elements.
public int peakElement(int[] arr, int n) {
    if (n == 1) {
        return 0;
    }
    if (arr[0] >= arr[1]) {
        return 0;
    }
    if (arr[n - 1] >= arr[n - 2]) {
        return n - 1;
    }
    for (int i = 1; i < n - 1; i++) {
        if (arr[i] >= arr[i - 1] && arr[i] >= arr[i + 1]) {
            return i;
        }
    }
    return -1;
}
```