

Problem 2: SearchInRotatedArray

Time efficiency: $O(\log(n))$

Space efficiency: $O(1)$

Explanation: This explanation is much like the first, I'm using an array to store and query elements, but the core of what makes this works is Binary Search Algorithm. Using Start and End position to ones benefit. Instead of the algorithms growing in space and time linearly it's grow in space at a constant value.

And the time complexity is cut in half to find our solution.