LINEAR SEARCH ALGORITHM

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Searching:- It is a process of finding a given value position in a list of values.

* Linear Search:-

- It is basic & simple search algorithm
- In sequencial search, we compare the ~~item~~ target value with all the other elements given in the list.
- eg:- arr = [18, 12, 19, 77, 29, 50] (unsorted array)

start

target = 77

- Time complexity:-

① BEST :- O(1) ⇒ CONSTANT

⇒ How many check will the loop make in best case, i.e the element is found at 0th index ⇒ thus only one comparison will be made for best case.

② WORST CASE :- O(n)

⇒ Worst case, here it will go through every element and then it says element not found.

⇒

size of array	No of comparisons	time(ms)
100	100	100ms
200	200	200ms
n	n	n ms.