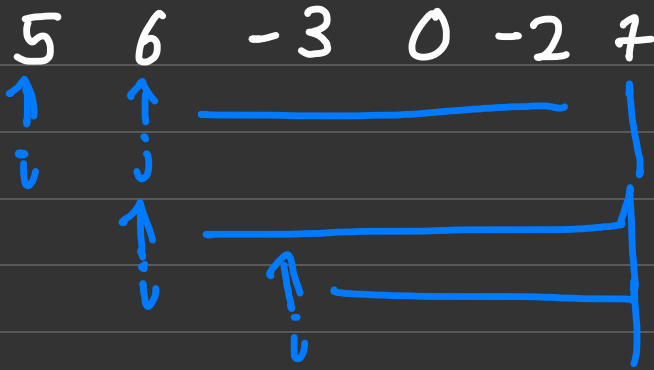


Longest Subarray Sum

Brute force :



For every element, Count the total sum of all the subarrays starting from it.

Update a max-sum variable accordingly

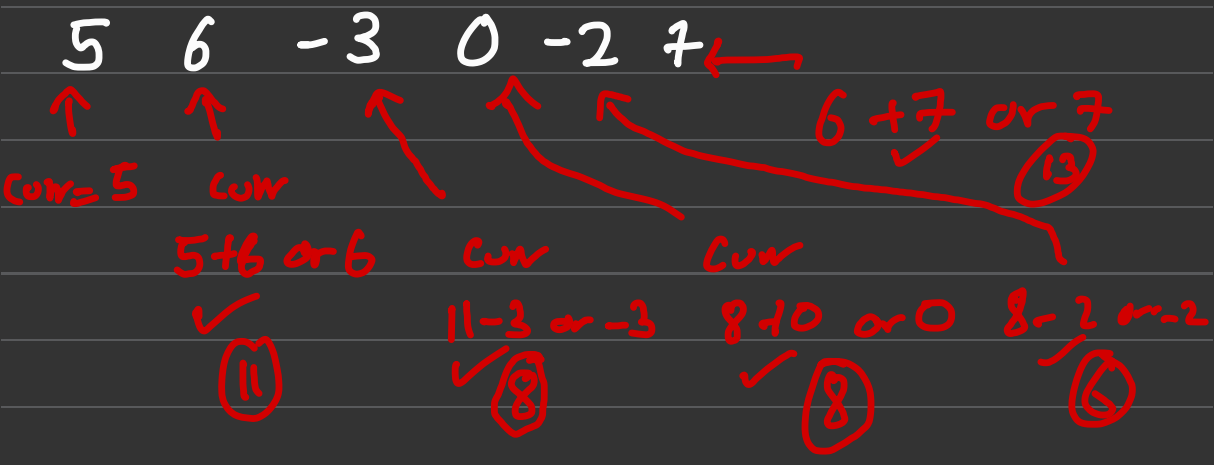
$$T.C \rightarrow O(n^2)$$

$$S.C \rightarrow O(1)$$

Optimised Solution (Kadane's Algorithm)

Kadane's Algorithm states
Maximum sum of a subarray
ending at any element can be

- 1) previous maximum sum + cur elem
- 2) current element

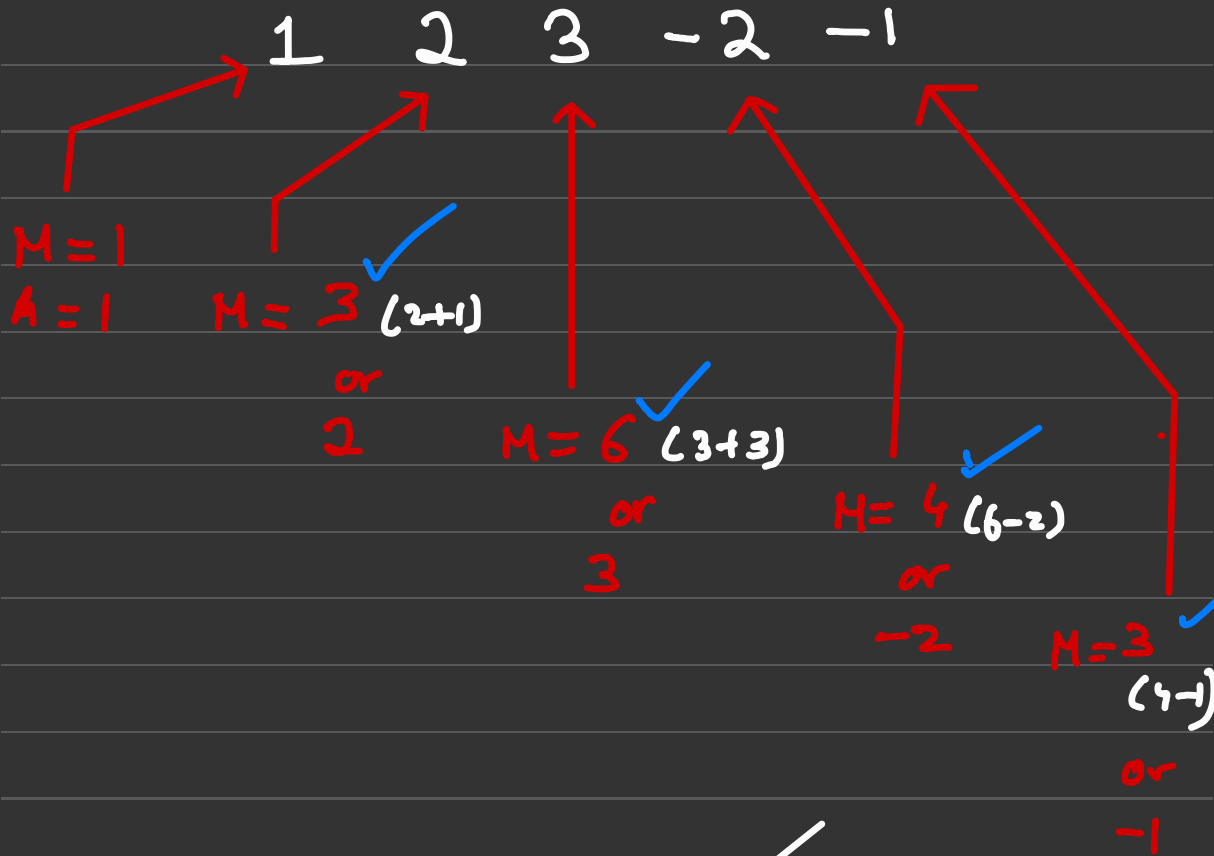


final_max = ~~5~~ ~~11~~ **13**

T.C $\rightarrow O(n)$, S.C $\rightarrow O(1)$

Dry run :

final-max, cur-max = arr[0]
= 1



Final-max = ~~1~~ / ~~3~~ / 6 ✓

