

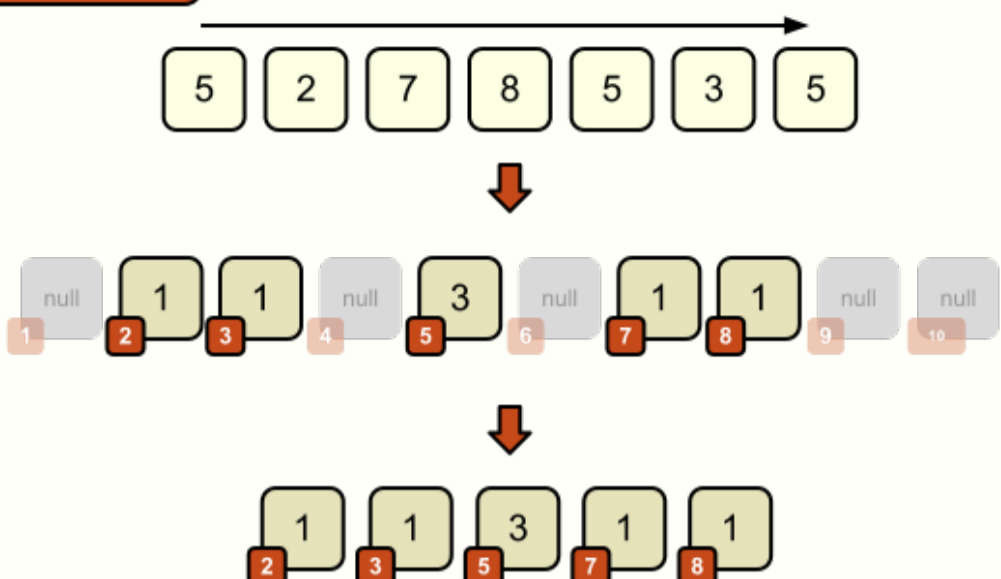
# RADIX SORT

cheatsheet

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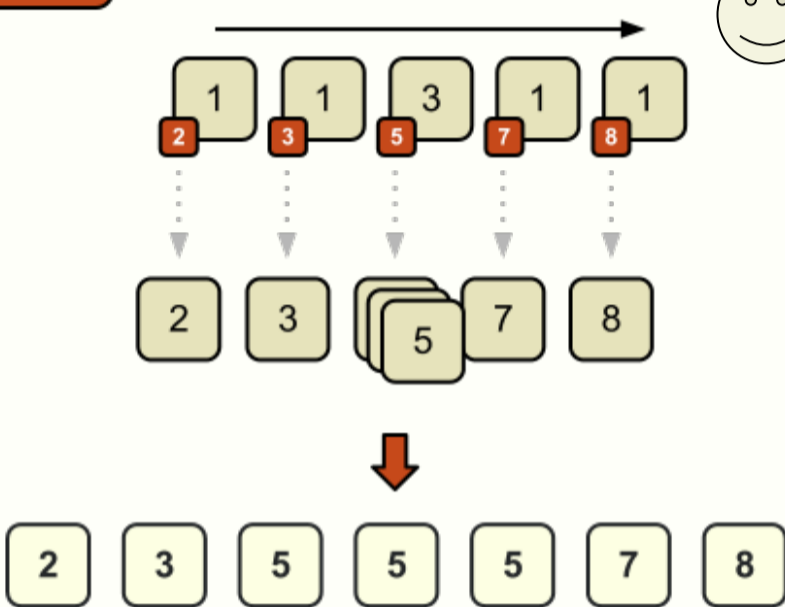
On the first pass put into a temporary array the number of occurrences of each value at the key that corresponds to this value. Thus "5" goes into  $temp[5] = 1!$

## 1st pass



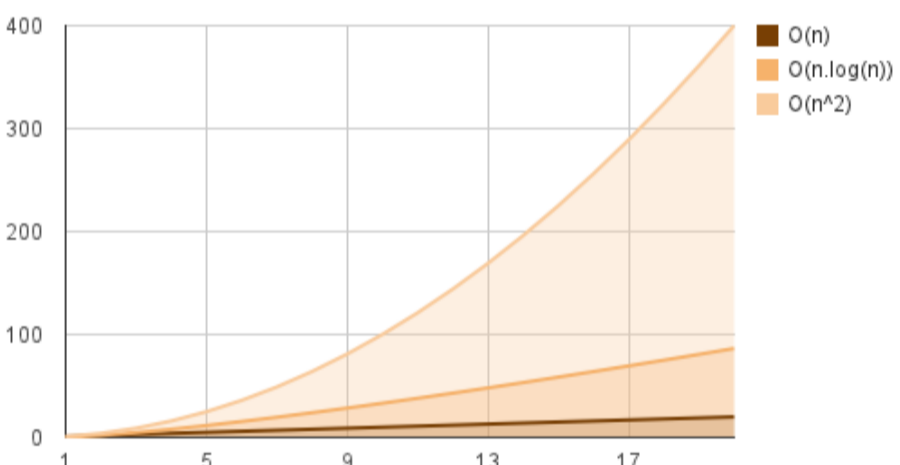
On the second the array is sorted just by counting the values from the temp array!

## 2nd pass



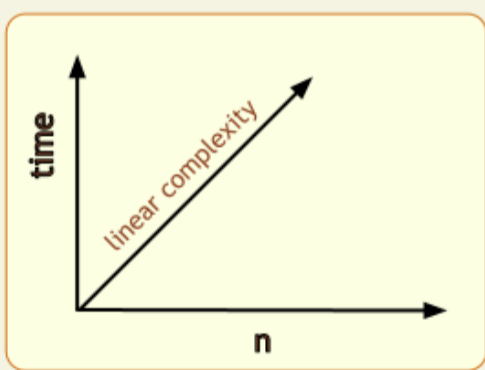
## COMPLEXITY

The complexity is  $O(n)$ , which makes radix sort **faster** than quicksort!



## ✓ pros

it's fast with **LINEAR** complexity



understand

**EASY**

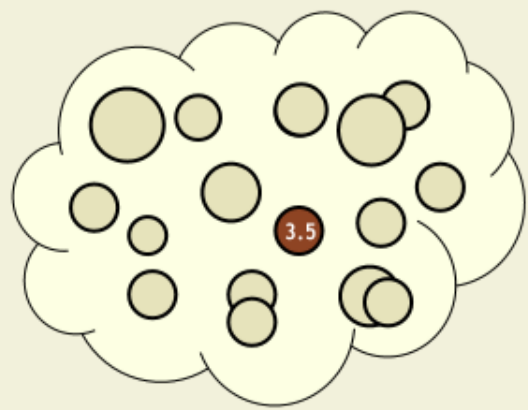
implement



## ✗ cons

works **ONLY** with **INTEGERS**

○ ≡ { INT }



requires **ADDITIONAL SPACE**

□ input data  
□ additional space

