

No: \_\_\_\_\_

Date: \_\_\_\_/\_\_\_\_/\_\_\_\_

\* Shuffle an Array with same randomness

[1, 2, 3, 4, 5]

↑  
pointer 1

take position  
in this range  
pointer 2

swap

→ then take range  $(posi - 1)$   
proceed till  $posi = 0$

$O(n)$   
 $O(n)$   
↓  
return  
array / no extra  
space

no time, space for reset.  
initiation  $O(1)$   
 $O(1)$