

Lab 04 - Sorting & Nodes

Direction: Submit typed work in the Labs directory of your github repository and/or as an attachment on Google classroom under the accurate Lab04 assessment. All submissions should have their appropriate extensions (either txt, xls, cpp).

Part A: In class

Your objective is to write an array trace table of the array below for one of the three sorting methods (bubble sort, insertion sort or selection sort) discussed in the sorting lecture. The table should show the swaps that will occur to the array when it is the argument for the sorting method. Make sure to indicate which method the table is implementing.

5	6	1	8	4	2	3	9	7
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Part B: Take home

Your objective is to write the definition of the function `Similar()` whose header is

```
template <typename T>
bool Similar(Node<T>* ar1, Node<T>* ar2)
```

Given that *ar1* and *ar2* are referencing the head of singly linked lists, the function returns true if the nodes of the linked lists of *ar1* and *ar2* in the same position have the same values, but the lists are not necessarily the same length; otherwise, it returns false.