**CS 2 – March 19**

**Sorting Exercise**

Trace insertion sort and selection, using …

* your own data
  + mixed list, no duplicates
  + ordered list
  + reverse-ordered list
  + mixed list with several duplicates
* show the updated array after each pass (one complete execution of the inner loop)
* count comparisons and swaps or shifts
* watch for:
  + data dependency
  + big-O of n2
  + behavior of largest and smallest values
  + behavior of duplicates
* verify your results with a classmate
* note any questions you have

Once you are comfortable with the algorithms, use the back to write both sorts as practice.

row 1 = initial data

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**Insertion Sort**

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**Selection Sort**

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