
Algorithms and Recursion

CS 1110/1111 – Introduction to Programming
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Some slides courtesy Addison-Wesley / Tony Gaddis

Searching and Sorting

- There are two things we really like to do in CS
 - Searching through lists of things
 - Sorting lists of things
- There are numerous different ways of performing each of these
 - Each is a different *algorithm*
 - Each has pros and cons

Bubble Sort

- The algorithm:

Make a pass for each item in the array

- On each pass, flip two items if needed
- After each pass, decrease the number of things to look at by one (you know the highest item is at the end now)