Arrays

CSE 114 INTRODUCTION TO OBJECT-ORIENTED PROGRAMMING

Announcements

Topics:
- Arrays (Chapter 7 in Think Java)
- Scope of a variable
- Memory diagrams involving arrays
- null as the default object reference value
- Random numbers (7.6 and notes)

Reading Data and Random Numbers

Random numbers
- ◦ Random numbers will be useful as we write programs with arrays later
- ◦ So, let's study random numbers first before we study arrays, which we will do next
- ◦ Yes, we will still be expanding the …… part of a function in our program structure when we introduce arrays next
- ◦ See RandomNumbers.java

Arrays (also for loop)

Discuss the idea of arrays

See Average.java to see how arrays are created and used

Another example:
◦ See ArrayExamples.java

Arrays as Arguments and Return values Memory Representation

Function taking an array as argument

- See largest and scale methods in ArrayExamples.java

Function returning an array as its return value

- See randomIntArray in ArrayExamples.java

Scope of a variable

- See Scope.java

Memory representation with arrays

- Will do this together in class
- It is very **important** that you understand this!
  - See MemoryRep.java
- See scale in ArrayExamples.java as well