CS E-76:
Building Mobile Applications

Java Primer

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Installing Java

- MAC: Java is updated with software update
- PC: Download from
  - http://www.oracle.com/technetwork/java/javase/downloads/index.html
- and choose JDK 7

Coding in Java

- Use any text editor you'd like

- Recommendation: Eclipse (due to Android development later in the course)
  - Download from :
    - http://www.eclipse.org/downloads
    - Eclipse Classic

JAVA Fundamentals

- Has a .java extension
- Each class definition in a source file is compiled into a separate class file
- Name of compiled file is comprised of name of class with .class extension
- Class file and source file need to match
- Include a main method in program to know execution of program

Compiling and Running in Java

1) Save the program with .java extension

2) Compile file from terminal by typing

   javac <filename>

3) A successful compilation results in creation of .class containing byte code

4) Execute file by typing

   java <filename without extension>

Standard Naming Conventions

- Mixed case with first letter of each internal word capitalized: class names, interface names

- All-Lower case: method names, variables

- All-Upper case: constants

Some Fun Terms

- Class – template for creating different objects which defines properties and behaviors

- Methods – members of a class that provide some service for an object or perform some logic

- Object – instance of a class creating using the **new** operator. (returns a reference to a new instance of a class)

Method Overloading

- Two or more methods in the same class that have the same name but different parameters

- Compiler matches the parameters and chooses the correct method when a number of choices exist