Concurrent Programming

2: Java, Java, Java

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Java

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- Question: How many Java programs are concurrent?
- Go to socrative.com and let's find out.
- Room name: CP2016

Java

- We are going to freshen up on Java first.

- And maybe learn something new.

- Some things I'll use during the course:
    - Generics
    - Anonymous Inner Classes
    - Lambda expressions

Generics

- Type parameters for code.

- Meaning: You write code that is “generic” wrt types.

(note: wrt is short for “with respect to”)

- Or: Your code can work with data of different types.

- https://docs.oracle.com/javase/tutorial/java/generics/index.html

Anonymous Inner Classes

- Inner Class: A class defined within a class. It has a name.

- Anonymous Inner Class: An Inner Class without a name.

- https://docs.oracle.com/javase/tutorial/java/javaOO/nested.html

Lambda Expressions

- Functions defined within code.

- https://docs.oracle.com/javase/tutorial/java/javaOO/lambdaexpressions.html

For the next time

- Read up the previous links.

- **Opt:** Define a generic class Pair<K,V> that can store pairs of values of any types.

- **Opt:** Create a List of Pair<String, Integer> with some values. For each pair containing a string s and an integer n, we say that s is associated to n.

- **Opt:** For each string (first value of a pair) in the list, print the sum of all integers associated to that string.