The Java™ Tutorials

Trail: Essential Classes
Lesson: Exceptions

> *The Java Tutorials have been written for JDK 8. Examples and practices described in this page don't take advantage of improvements introduced in later releases.*

Questions and Exercises

Questions

1. Is the following code legal?

```
try {

} finally {

}
```

2. What exception types can be caught by the following handler?

```
catch (Exception e) {

}
```

What is wrong with using this type of exception handler?

3. Is there anything wrong with the following exception handler as written? Will this code compile?

```
try {

} catch (Exception e) {

} catch (ArithmeticException a) {

}
```

4. Match each situation in the first list with an item in the second list.
   a. `int[] A;`
      `A[0] = 0;`
   b. The JVM starts running your program, but the JVM can't find the Java platform classes. (The Java platform classes reside in `classes.zip` or `rt.jar`.)
   c. A program is reading a stream and reaches the `end of stream` marker.
   d. Before closing the stream and after reaching the `end of stream` marker, a program tries to read the stream again.
   1. __error
   2. __checked exception
   3. __compile error
   4. __no exception

Exercises

1. Add a `readList` method to `ListOfNumbers.java`. This method should read in `int` values from a file, print each value, and append them to the end of the vector. You should catch all appropriate errors. You will also need a text file containing numbers to read in.
2. Modify the following `cat` method so that it will compile.

```
public static void cat(File file) {
    RandomAccessFile input = null;
    String line = null;

    try {
        input = new RandomAccessFile(file, "r");
        while ((line = input.readLine()) != null) {
            System.out.println(line);
        }
        return;
```

```
            } finally {
                if (input != null) {
                    input.close();
                }
            }
        }
```