

# Escalate Scala Exercises Set Up

# Agenda

1. Installing Java
2. Installing Scala
3. Installing SBT
4. Installing IntelliJ IDEA Community Edition
5. Unpacking and Importing the Course Exercises

# Installing Java

- Ensure you have Java 8 (or 9) installed, must be JDK, not JRE
- Oracle JDK is recommended  
<http://www.oracle.com/technetwork/java/javase/downloads/jdk8-downloads-2133151.html>

- Test with

```
09:26 $ javac -version
javac 1.8.0_162
```

- Your version may vary, but checking javac ensures you have the JDK installed correctly
- For apt-based Linux, PPA is available at  
<https://launchpad.net/~webupd8team/+archive/ubuntu/java>

# Installing Scala

- Follow the instructions at <http://www.scala-lang.org/download/>
- We recommend installing **both** IntelliJ Community Edition and SBT
- If you also scroll down to the bottom of the page you will find Scala standalone installers for most OSs
- For Mac OS X, download and unpack the tgz file, and put the bin directory on your path
- Get the latest versions of each that are available, for Scala, make sure it is at least version 2.12
- Test it with:

```
09:41 $ scala
Welcome to Scala 2.12.4 (Java HotSpot(TM) 64-Bit Server VM, Java 1.8.0_162).
Type in expressions for evaluation. Or try :help.

scala>
```

- Hit Ctrl-D or type :quit to exit the Scala REPL

# Installing SBT

- Follow the instructions at <http://www.scala-sbt.org/download.html>
- These should be correct for your operating system
- After installing, test with:

```
dick@Hercules:~/Downloads$ sbt sbtVersion
[info] Set current project to downloads (in build file:/home/dick/Downloads/)
[info] 1.1.0
```

- Running SBT for the first time may give out many more messages, these are expected
- The main thing is that you see a number at the end, and that the number is 1.0 or higher

# Installing IntelliJ

- Follow the instructions at <https://www.jetbrains.com/idea/download>
- Download the Community Edition for your operating system
- Install, and follow the install wizard
- When prompted, make sure you select Scala support
- VI mode is not recommended unless you know what you are doing
- Ensure IntelliJ sees your JVM in the default project settings

# Unpacking and Importing the Exercises

- Download the zip file that accompanies this course, and unzip it
- In the extracted folder you will find PDFs of the slides, and a directory containing the exercises
- In IntelliJ, close any projects if open, and use the dialog to import a new project
- Navigate to the exercises directory and find the `build.sbt` file, select it and open (or double click it)
- Accept all of the defaults in the following dialogs
- Wait for the import to complete (progress bar at the bottom of IntelliJ)
- Build the project
- Find the first module, and the test sources, open the file, right click on the class name and select "Run"
- You should see failures, fixing the failures is how the exercises work

# Congratulations

- You are now ready to take the course.
- If at any point you have trouble with any part of the setup, follow these instructions again
- In particular you can always delete the exercises folder and unpack it and import it again