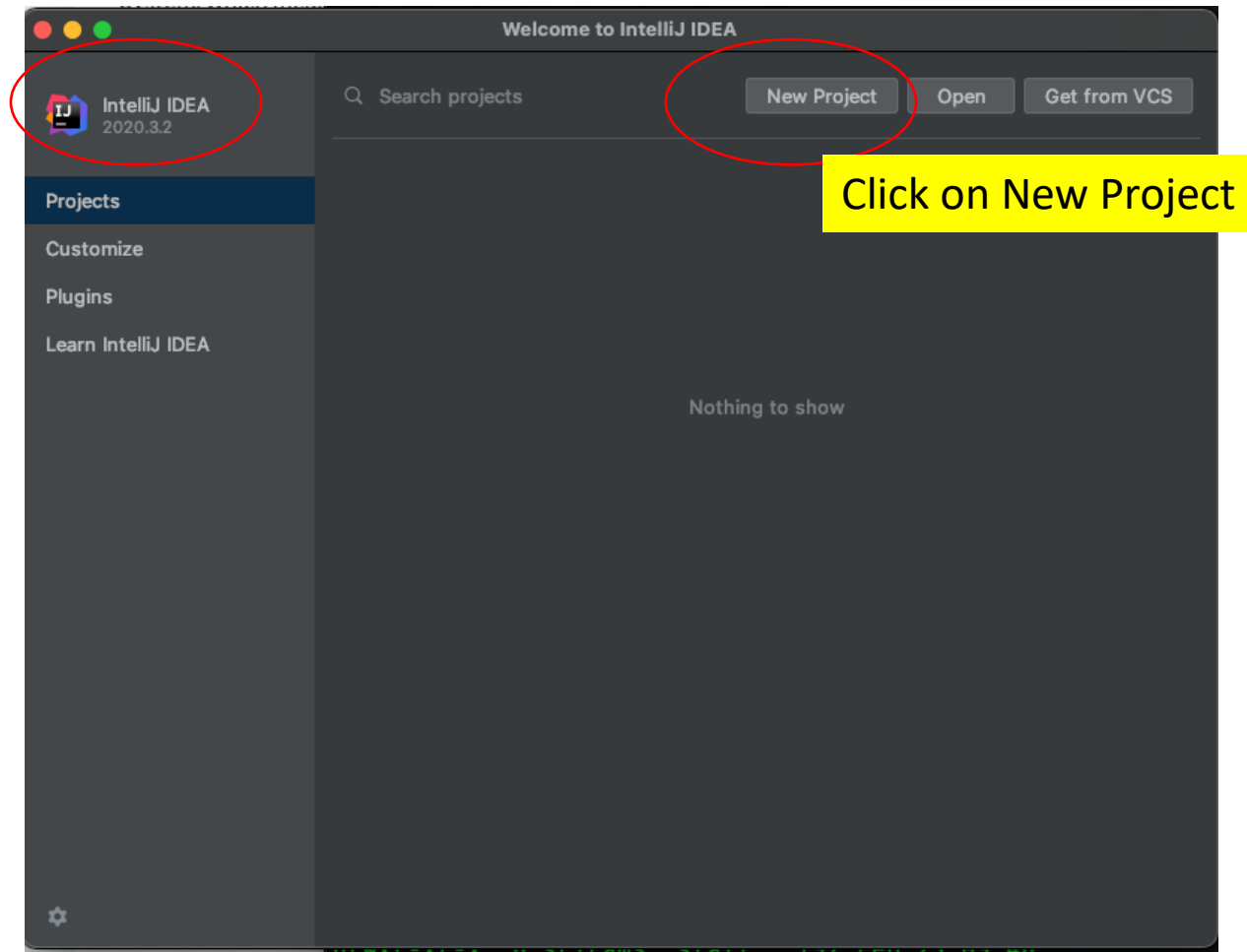


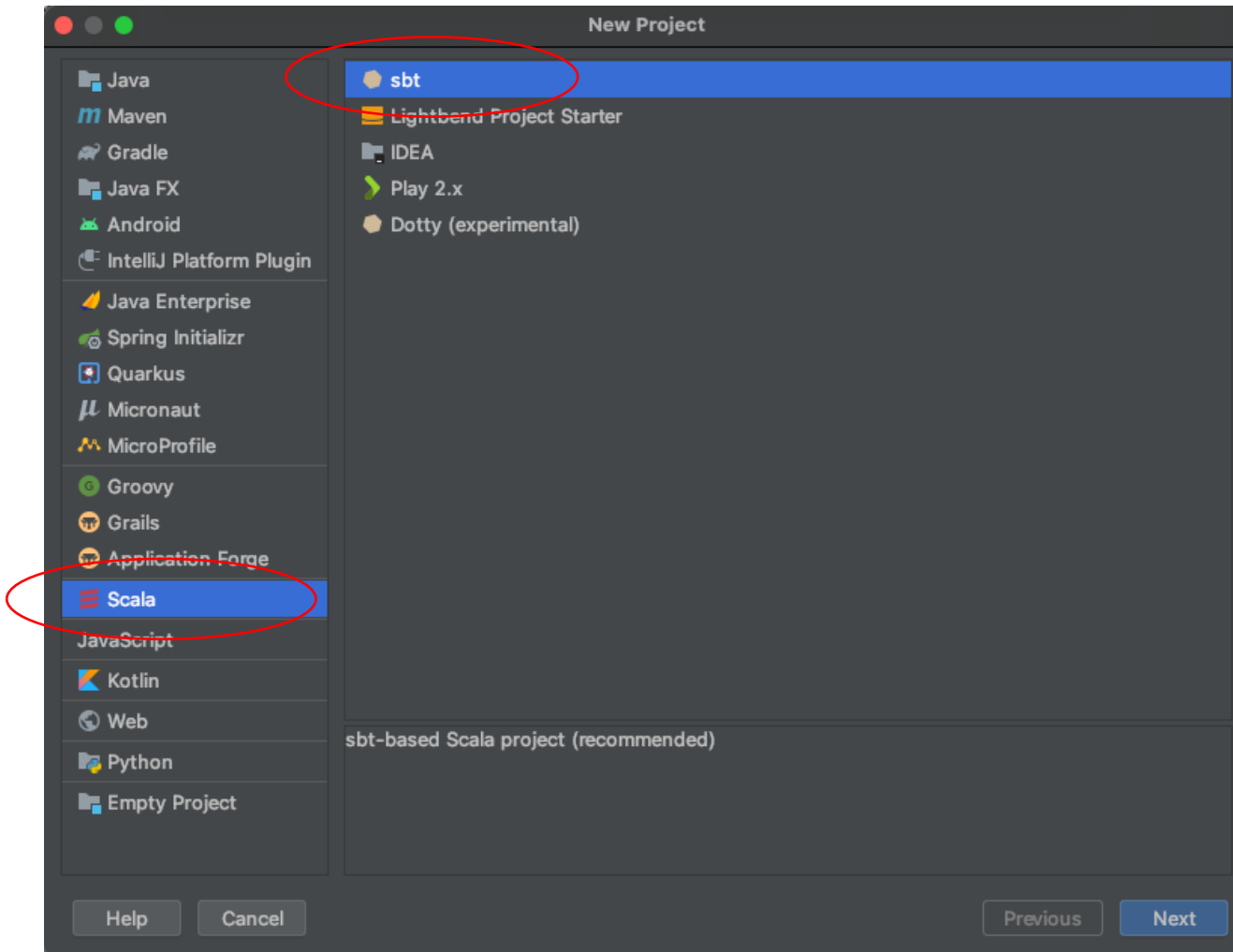
Setting up Project in IntelliJ

CSCI 3155

Open IntelliJ IDEA



Choose a Scala/SBT project



New Project

Name: project1

Location: /srirams/Courses/shared/csci3155/private/csci3155_spring2021_private/projects/mini-project1/project1 ...

JDK: 1.8 java version "1.8.0_171"

sbt: 1.4.7 Sources

Scala: 2.13.5 Sources

Package prefix: Such as 'org.example.application'

More Settings

Module name: project1

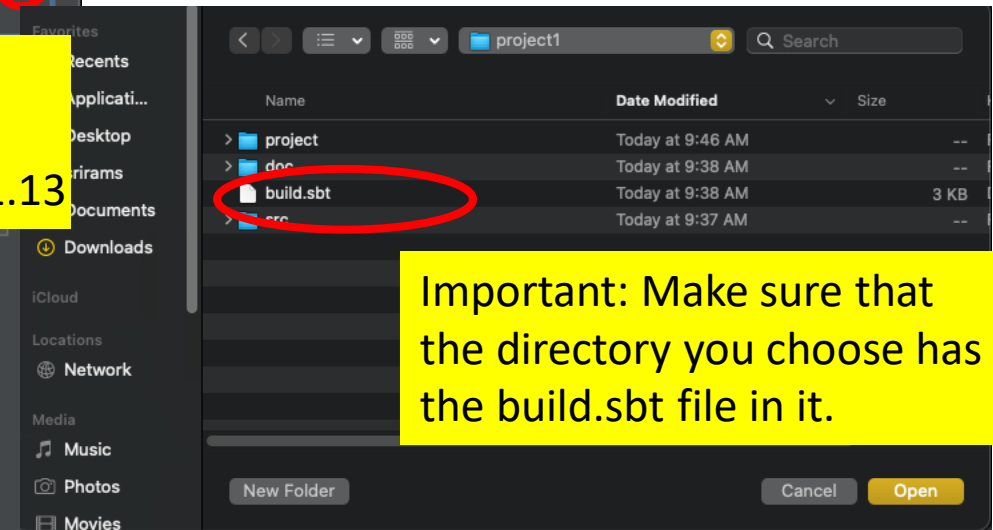
Content root: ns/Courses/shared/csci3155/private/csci3155_spring2021_private/projects/mini-project1/project1

Module file location: ns/Courses/shared/csci3155/private/csci3155_spring2021_private/projects/mini-project1/project1

Project format: .idea (directory based)

Help Cancel Previous Finish

Important: Java version may matter. We are not sure about compatibility. Suggested: JDK 1.8 or JDK 1.13



Important: Make sure that the directory you choose has the build.sbt file in it.

Click on project tab to examine the directory structure

Look under directory src/

Look under directory test/

Open file StackMachineTest under "test"

If you see green arrows, you can click on them to run tests.

Same for CompilerTest

It may take 2-3 minutes to load. But should not take much more than that.

You would expect to fail all the tests starting out.

The screenshot shows an IDE interface with a dark theme. On the left, a sidebar contains icons for 'Structure', 'Favorites', and a star icon. The main area is divided into two panes. The left pane, titled 'Test Results', shows a tree view with 'StackMachineTest' expanded, listing five failed tests: 'stack machine test 1' through 'stack machine test 5'. A red status bar at the bottom left indicates 'Tests failed: 5, passed: 0'. The right pane displays a stack trace in red text, starting with 'an implementation is missing' and 'scala.NotImplementedError'. The stack trace includes the following lines: 'at scala.Predef\$.qmark\$qmark\$qmar', 'at edu.colorado.csci3155.project1.', 'at edu.colorado.csci3155.project1.', 'at org.scalatest.OutcomeOf.outcome', 'at org.scalatest.OutcomeOf.outcome', 'at org.scalatest.OutcomeOf\$.outcom', 'at org.scalatest.Transformer.apply', 'at org.scalatest.Transformer.apply', and 'at org.scalatest.FunSuiteLike\$\$ano'. The bottom of the IDE features a toolbar with icons for 'Git', 'Run', 'TODO', 'Problems', 'Terminal', 'Profiler', 'sbt shell', and 'Build'.

it will complain about :

```
an implementation is missing
scala.NotImplementedError Create breakpoint
  at scala.Predef$.qmark$qmark$qmar
  at edu.colorado.csci3155.project1.
  at edu.colorado.csci3155.project1.
  at org.scalatest.OutcomeOf.outcome
  at org.scalatest.OutcomeOf.outcome
  at org.scalatest.OutcomeOf$.outcom
  at org.scalatest.Transformer.apply
  at org.scalatest.Transformer.apply
  at org.scalatest.FunSuiteLike$$ano
```

Tests failed: 5, passed: 0

Git Run TODO Problems Terminal Profiler sbt shell Build

If green arrow does not appear automatically?

```
sbt shell  csci3155_s19_project1

[info] loading project definition from /Users/srirams/Courses/shared/csci3155/private/csci3155_spr
/Users/srirams/Courses/shared/csci3155/private/csci3155_spring2021_private/projects/mini-project1/
(Compile / compile).value
^
/Users/srirams/Courses/shared/csci3155/private/csci3155_spring2021_private/projects/mini-project1/
IO.zip(submissionFilePairs , new File(zipFileAbsPath))
^

[info] loading settings for project project1 from build.sbt ...
[info] set current project to csci3155_s19_project1 (in build file:/Users/srirams/Courses/shared/c
[info] Defining Global / ideaPort
[info] The new value will be used by Compile / compile, Test / compile
[info] Reapplying settings...
[info] set current project to csci3155_s19_project1 (in build file:/Users/srirams/Courses/shared/c
[IJ]

> test |
```

type "test" at the prompt.

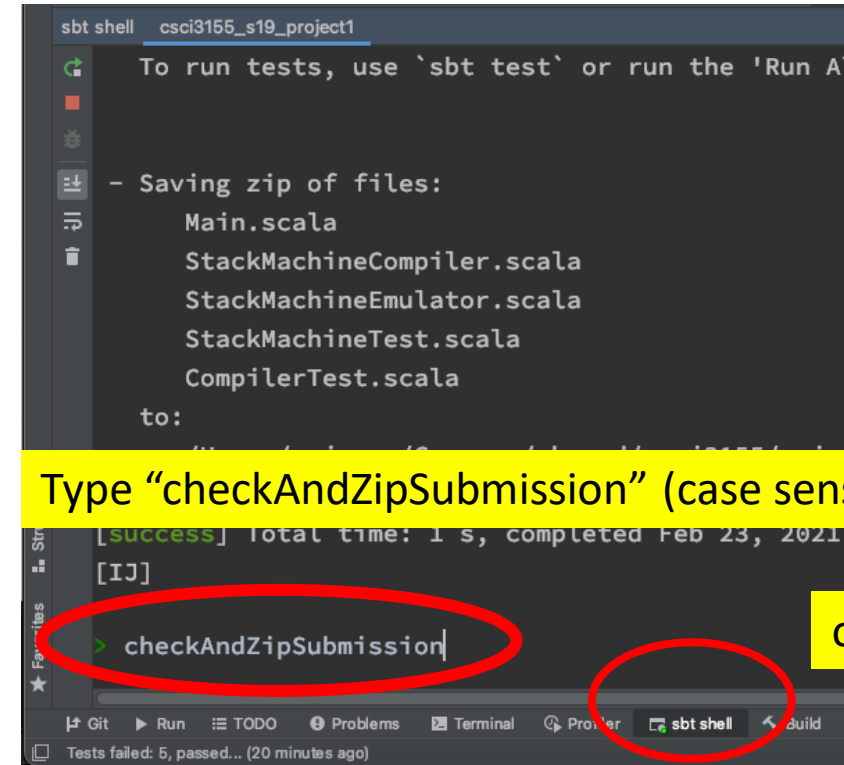
Click on this little tab at the bottom "sbt shell"
Wait for 2-3 minutes to load
You will see a prompt ">"

Tests failed: 5, passed... (a minute ago)

Common Issues

- Java version is incompatible (Not JDK 1.8 or JDK 1.11)
 - You will get an error that says something like “Package URI not valid”.
- Top-Level does not have build.sbt
 - You will not be able to load the project or get the SBT shell to appear.

Submitting the Project

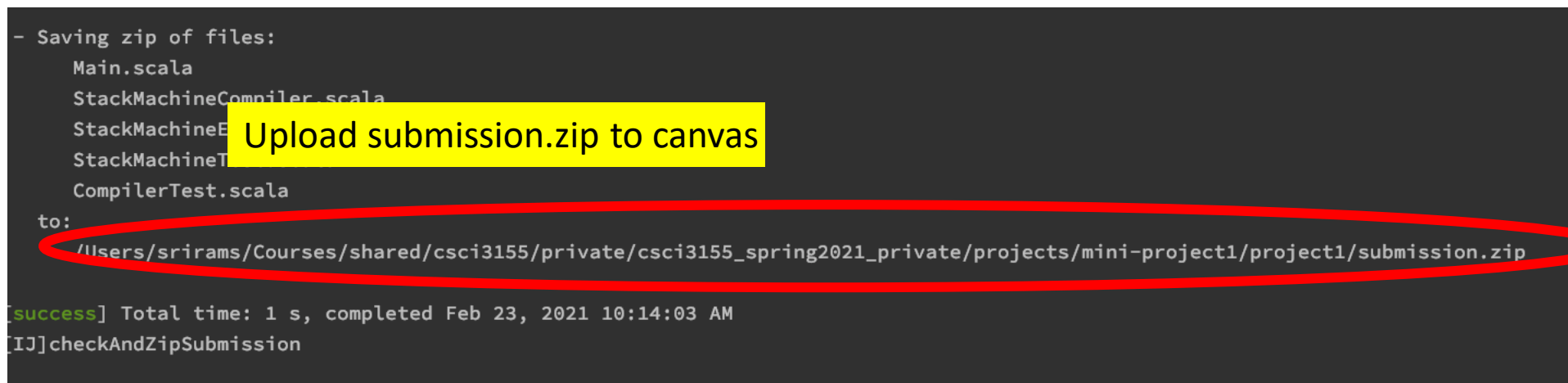


The screenshot shows an IDE window titled 'sbt shell csci3155_s19_project1'. The main text area displays the command 'To run tests, use `sbt test` or run the `Run A`' and a list of files being saved to a zip: 'Main.scala', 'StackMachineCompiler.scala', 'StackMachineEmulator.scala', 'StackMachineTest.scala', and 'CompilerTest.scala'. Below this, the command 'checkAndZipSubmission' is entered in the SBT shell. A red circle highlights the 'sbt shell' tab in the bottom right corner of the IDE.

```
sbt shell csci3155_s19_project1  
To run tests, use `sbt test` or run the `Run A`  
  
- Saving zip of files:  
  Main.scala  
  StackMachineCompiler.scala  
  StackMachineEmulator.scala  
  StackMachineTest.scala  
  CompilerTest.scala  
to:  
[success] Total time: 1 s, completed Feb 23, 2021  
[IJ]  
> checkAndZipSubmission
```

Type "checkAndZipSubmission" (case sensitive)

open SBT Shell



The screenshot shows the SBT shell output after running 'checkAndZipSubmission'. It displays the files being saved to a zip and the destination path: '/Users/srirams/Courses/shared/csci3155/private/csci3155_spring2021_private/projects/mini-project1/project1/submission.zip'. A red circle highlights the destination path.

```
- Saving zip of files:  
  Main.scala  
  StackMachineCompiler.scala  
  StackMachineEmulator.scala  
  StackMachineTest.scala  
  CompilerTest.scala  
to:  
/Users/srirams/Courses/shared/csci3155/private/csci3155_spring2021_private/projects/mini-project1/project1/submission.zip  
[success] Total time: 1 s, completed Feb 23, 2021 10:14:03 AM  
[IJ]checkAndZipSubmission
```

Upload submission.zip to canvas