Using Scala with Sling

Using Scala with Sling

Sling supports the Scala programming language version 2.8.1 through optional modules located in `/contrib/scripting/scala`.

Installation

The following bundles are required for Scala support: scala-library, scala-compiler, Scala Script Engine, Apache Sling Scala Scripting Configuration. *Note*: In order to see the Scala scripting engine in action you can also use the Launchpad Contrib Testing module which comes with all necessary bundles (including the examples) pre-installed. See below.

Manual installation

- Start Sling

- Download the scala-library bundle and the scala-compiler bundle and install them using for example the Apache Felix Web Management Console.

- Install the Scala Script Engine bundle. Goto `/contrib/scripting/scala/script` and type `mvn org.apache.sling:maven-sling-plugin:install`.

- Install the Apache Sling Scala Scripting Configuration bundle. Goto `/contrib/scripting/scala/config` and type `mvn org.apache.sling:maven-sling-plugin:install`.

Using Launchpad Contrib Testing

- Goto `/contrib/launchpad/testing` and type `mvn jetty:run -Pjcrinstall-tests` to start Sling.

- Sling is now running at http://localhost:8888/. All required bundles and examples are pre-installed. See next section on how to access the examples. Remember to substitute the port number with 8888!

- See `/contrib/launchpad/testing/README.txt` for details.

Examples Applications

There are two example applications available in `/contrib/scripting/scala/samples`: A simple Hello World programm and a more advanced Forum application. The examples require the Apache Sling Sample Path Based Resource Type Provider bundle. So lets install this bundle first:

- Goto `/samples/path-based-rtp` and type `mvn -P autoInstallBundle clean install -Dsling.url=`http://localhost:8888/system/console.

Now the examples themselves:

- Install the Scala for Sling Demo Application - Hello World bundle. Goto `/contrib/scripting/scala/samples/hello-world` and type `mvn -P autoInstallBundle clean install -Dsling.url=`http://localhost:8888/system/console. The hello world application is then available at http://localhost:8888/content/helloworld.html

- Install the Scala for Sling Demo Application - Forum bundle. Goto `/contrib/scripting/scala/samples/forum` and type `mvn -P autoInstallBundle clean install -Dsling.url=`http://localhost:8888/system/console. The form application is the available at http://localhost:8888/content/forum.html?sling:authRequestLogin=true. When prompted for credentials use admin/admin.

Configuration

The Scala scripting bundle is configurable through the Apache Felix Web Management Console (PID: org.apache.sling.scripting.scala.config. SlingSettingsProvider).

- Scala compiler options. Scala compiler settings as documented by `scalac -help`. Default is blank.

- Compiler output directory. Output directory for files generated by the Scala compiler. Default is `/var/classes`.

Further Information

See these session slides for further information:

- Jazoon 2009 : Scala for Sling
- Scala Days 2010 : Scala for Scripting