#### **Developer Documentation**

Code Howtos / HTTP Server

# HTTP Server

JabRef has a built-in http server. For example, the resource for a library is implemented at org.jabref.http.server.LibraryResource.

### Start http server

The class starting the server is org.jabref.http.server.Server.

Test files to server can be passed as arguments. If no files are passed, the last opened files are served. If that list is also empty, the file src/main/resources/org/jabref/http/server/http-serverdemo.bib is served.

#### Starting with gradle

Does not work.

Current try:

```
./gradlew run -Pcomment=httpserver
```

However, there are with ForkJoin (discussion at https://discuss.gradle.org/t/is-it-ok-to-use-collection-parallelstream-or-other-potentially-multi-threaded-code-within-gradle-plugin-code/28003)

Gradle output:

```
> Task :run
2023-04-22 11:30:59 [main] org.jabref.http.server.Server.main()

DEBUG: Libraries served: [C:\git-repositories\jabref-all\jabref\src\main\resources\org\jabref\http\serve
2023-04-22 11:30:59 [main] org.jabref.http.server.Server.startServer()

DEBUG: Starting server...
<========-> 92% EXECUTING [2m 27s]
> :run
```

Intelli] output, if org.jabref.http.server.Server#main is executed:

```
DEBUG: Starting server...

2023-04-22 11:44:59 [ForkJoinPool.commonPool-worker-1] org.glassfish.grizzly.http.server.NetworkListener
INFO: Started listener bound to [localhost:6051]

2023-04-22 11:44:59 [ForkJoinPool.commonPool-worker-1] org.glassfish.grizzly.http.server.HttpServer.star
```

INFO: [HttpServer] Started.
2023-04-22 11:44:59 [ForkJoinPool.commonPool-worker-1] org.jabref.http.server.Server.lambda\$startServer\$
DEBUG: Server started.

### Developing with IntelliJ

Intellij Ultimate offers a Markdown-based http-client. One has to open the file src/test/java/org/jabref/testutils/interactive/http/rest-api.http. Then, there are play buttons appearing for interacting with the server.

## Get SSL Working

When interacting with the <u>Microsoft Word AddIn</u>, a SSL-based connection is required. <u>The Word-AddIn</u> is currentely under development.

(Based on https://stackoverflow.com/a/57511038/873282)

Howto for Windows - other operating systems work similar:

- 1 As admin choco install mkcert
- 2 As admin: mkcert -install
- 3 cd %APPDATA%\..\local\org.jabref\jabref\ssl
- 4 mkcert -pkcs12 jabref.desktop jabref localhost 127.0.0.1 ::1
- 5 Rename the file to server.p12

Note: If you do not do this, you get following error message:

Could not find server key store C:\Users\USERNAME\AppData\Local\org.jabref\jabref\ssl\server.p12.