

Jakarta RESTful Web Services 3.1 Workshop

Presenter

Module 3: Se Bootstrap web service implementation.

In this module the participants work with the project `Mod_03_RestSeBootstrap_participant` that contains an embedded RESTful server web service. They must compile and run the service. They can test its functionality by using cURL. This project is complete and contains one GET service.

The participant's document goes over the code and pom file. In the sample project they will add the equivalent of an HTML form field, commonly called a query parameter, to the service URL such as:

<http://localhost:8080/services/hello?name=Ken>

There are three tasks that participants should carry out.

Task #1

The first task is to enter the source code described in the participant's document. Once the code is in place have the participants run the project and test, using cURL or in the address bar of a web browser, that their service works.

Task #2

The second task is to write services that use the Request methods `@POST`, `@PUT`, and `@DELETE`. Either they can simply copy the `@GET` method, give it a new name, and change the Request type or create their own service demonstrating that it will work for all four Request types. The cURL command for a POST will look like:

```
curl -X POST http://localhost:8080/services/hello?name=Ken
```

Task #3

The last task in this module is to take the compound interest calculator from the `Mod_02_CompoundInterest_participant` project and turn it into a service in this project. You must use the `@QueryParam` parameters. The `Mod_03_RestSeBootstrap_presenter` project has the compound interest calculation.

To test the calculation, use this cURL command. Enter it as a single line in the console/terminal. The String returned by the service should contain the result.

```
curl  
"http://localhost:8080/services/compound?principal=100&annualInterestRate=0.05&compoundPerTimeUnit=12&time=5"
```