

# AREP 3th Laboratory

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## 1 Introduction

This laboratory intended us to create a java http server that is able to connect to a database, get information from it and return it

## 2 Design

### 2.1 HTTPServer

This challenge was accomplished creating an httpserver that receives a http petition. It analyzes the petitions and looks up for information on the database, then send that info in an html to the client.

## 3 Structure

### 3.1 Java http server

The java http server opens a server port and waits for a client to ask something to that port. When it receives a petition, the server creates a thread to manage that petition. If it is a get petition, the server proceeds to look for the info on the db.

```
String[] users = db.consultarUsuarios();
String res = createResponse(users);
rFile = new File(res);
respond(out, dataOut, rFile, "text/html", "200", res, outS);
```

Apart from this, it acts the same as the challenge 1 server.

If it is another get petition, it then tries to search for the file, if it is found, the server will give the client that file.

```
if (s[0].equals("ok")) {
    rFile = new File(ROOT+ s[1] + header[1]);
```

```

if (rFile.exists()) {
    respond(out, dataOut, rFile, s[2], "200",ROOT+ s[1] + header[1],outS);
}

```

If the file does not exists, the server will return the "notFound.html".

```

else {
    rFile = new File(ROOT, FILE_NOT_FOUND);
    respond(out, dataOut, rFile, "text/html", "404",ROOT+ FILE_NOT_FOUND,outS);
}

```

If the requested file is from a non supported media type, it will return the "notSupportedMedia.html" file.

```

else {
    rFile = new File(ROOT, UNSUPPORTED_MEDIA_TYPE);
    respond(out, dataOut, rFile, "text/html", "415",ROOT+ UNSUPPORTED_MEDIA_TYPE,outS);
}

```

Finally if it isn not a get petition, the server will return the method *not supported.html*.

```

else {

    File f = new File(ROOT, METHOD_NOT_ALLOWED);
    respond(out, dataOut, f, "text/html", "405",ROOT+METHOD_NOT_ALLOWED,outS);

}

```

## 4 Conclusions

This first challenge completed. laboratory helped us to better understand how frameworks such as spring or spark work in the db connection aspect.

## 5 Bibliography

[http://campusvirtual.escuelaing.edu.co/moodle/pluginfile.php/128612/mod\\_resource/content/0/ClientesServicio.pdf](http://campusvirtual.escuelaing.edu.co/moodle/pluginfile.php/128612/mod_resource/content/0/ClientesServicio.pdf)  
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