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# -CENG421 Project-

In my Project I have implemented an small web server called tiny that supports GET requests made from any web browser of your choice via http protocol (beware https does not work!! because I haven’t implemented openSSL functionality) following are the commands to build and run the web server:

## Folder Structure of the Project

* bin
  + - tiny
* obj
  + - helpers.o
    - tiny.o
* public
  + - form.html
    - index.html
    - page2.html
    - smile.png
    - test.txt
* src
  + - helpers.h
    - helpers.c
    - tiny.c
* Makefile

## Building the Server

**Run the *make* command from the top-level directory (PROJECT directory) as follows:**

**make**

**Running the *make* command will create object files under the *obj* directory. As an output of running *make* command you should see output on your terminal similar to following if program was built successfully:**

**mkdir -p obj**

**gcc -Wall -Werr -c src/helpers.c -o obj/helpers.o**

**gcc -Wall -Werr -c src/tiny.c -o obj/tiny.o**

**gcc -Wall -Werr obj/helpers.o obj/tiny.o -o bin/tiny**

**Final step is running our tiny web server via following command and command must be in the form *<path\_to\_tiny\_executable> <port\_number>*:**

**./bin/tiny 1095**

**If all the above steps are successfully done, you can go to your favorite web browser and type the URL in the following format to access our local web server:**

[http://localhost:<port\_number>/public/<any\_file\_to\_be\_served](http://localhost:%3cport_number%3e/public/%3cany_file_to_be_served)**>**

**When making http request to our web server tiny, you should provide a path to any file that you want to get located under the public directory, available files are as follows:**

* + - * **Public**
        + **Form.html**
        + **index.html**
        + **page2.html**
        + **test.txt**

**Cleaning up the Project Directory**

Run the following command from the top-level directory (which is PROJECT) to clean up the project directory, so that you can later rebuild the project:

**make clean**

You can find steps to be followed in image format as follows:

We can also see log messages of our web server tiny on terminal when we make a GET request to valid file, for example for test.txt file log is as follows: