

Demo Home Auto

To conclude this article and to allow you to quickly test some of **Fishino's** cool features we present in short the **FishinoHomeAuto** demo.

It's a small web server that allows handling of Fishino's digital I/O pins with a web browser and with a nice graphical interface.

Given the complexity of the example, we will just show it in short its setup and usage, in order to make you able to test its features quickly; we'll write a more detailed description on next article.

We state that the demo is NOT a complete home automation application, but the basis to write your own one; in detail we just handle digital outputs (shown as home lights in following pictures). Software is anyway easily extensible, so we'll implement more features on next releases, like digital inputs and analog I/O.

Libraries setup

Unpack **FishinoLibs.zip** file in 'libraries' folder inside your sketchbook.

Once done, you'll find following new libraries :

- Fishino
- FishinoWebServer
- Flash

FishinoHomeAuto demo setup

- Unpack **FishinoHomeAuto.zip** file in your sketchbook folder.
You'll get a new folder named **FishinoHomeAuto** with some files and a folder named **STATIC** inside of it.
- Copy **ALL STATIC** folder content (**NOT** the folder, **JUST** the files contained in it) in root folder of a MicroSD card.
You don't need to wipe your SD previous content, just copy the additional file inside its root folder.
The application doesn't write nor erase anything on SD card, so you can use a microSD card found, for example, in your smartphone.
- Start IDE and open **FishinoHomeAuto** sketch.
At top of file you'll find the configuration part, which must be adapted to match your WiFi network :

```
////////////////////////////////////  
////////////////////////////////////  
// CONFIGURATION DATA          -- ADAPT TO YOUR NETWORK !!!  
// DATI DI CONFIGURAZIONE       -- ADATTARE ALLA PROPRIA RETE WiFi !!!  
  
// here put SSID of your network  
// inserire qui lo SSID della rete WiFi  
#define SSID  ""  
  
// here put PASSWORD of your network. Use "" if none  
// inserire qui la PASSWORD della rete WiFi -- Usare "" se la rete non è protetta  
#define PASS  ""
```

```

// here put required IP address of your Fishino
// comment out this line if you want AUTO IP (dhcp)
// NOTE : if you use auto IP you must find it somehow !
// inserire qui l'IP desiderato per il fishino
// commentare la linea sotto se si vuole l'IP automatico
// nota : se si utilizza l'IP automatico, occorre un metodo per trovarlo !
#define IPADDR 192, 168, 1, 251

// NOTE : for prototype green version owners, set SD_CS to 3 !!!
// NOTA : per i possessori del prototipo verde di Fishino, impostare SD_CS a 3 !!!
const int SD_CS = 4;

// END OF CONFIGURATION DATA
// FINE DATI DI CONFIGURAZIONE
////////////////////////////////////////////////////////////////////////////////////////////////////////////////////////////////
////////////////////////////////////////////////////////////////////////////////////////////////////////////////////////////////

```

- Read the comments and do all the changes as requested.
- Save your sketch and flash it on **Fishino**.
- Insert your MicroSD card on **Fishino**
- If you want to see some logs of what's going behind the scenes, open serial monitor.
- If you want a visual feedback with leds turning on and off following web commands, connect one or more leds (with companions series resistors!) on following **Fishino's** pins :

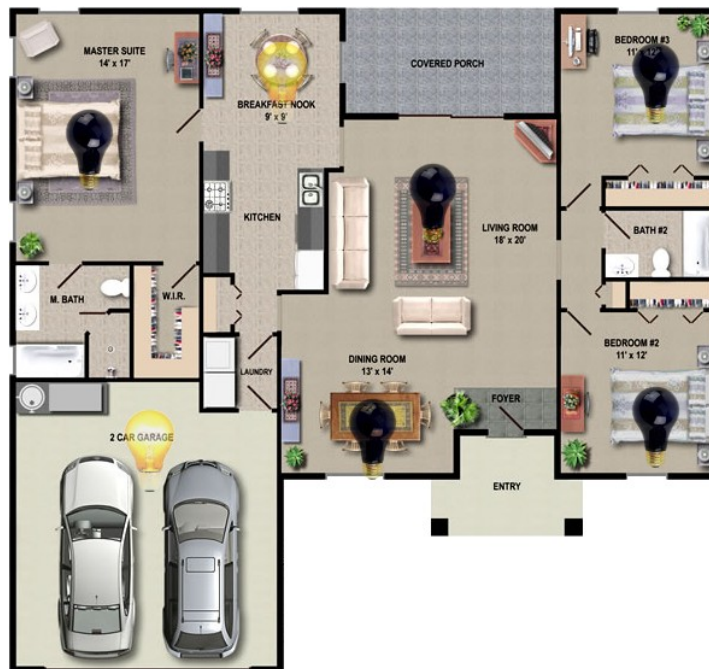
2, 5, 6, 8, 9, 14 and 15

Those are the digital output handled by the demo, each of them has an associated "room" associated inside browser's floorplan picture.

- Press RESET button
- Fire up your web browser (Internet Explorer, Firefox or whatever you use) and put **Fishino's** IP address on address bar (the one chosen when you configured the sketch). If you chose a dynamic IP things becomes more complicated, as you shall find a way to locate **Fishino's** dynamic IP, for example looking into your router's logs.
We strongly recommend a static IP on first tests.
If all is ok, following picture will appears on your web browser :



This page is fully configurable just changing some files in your SD card. Because of tight space here we can't explain it in deep, so we'll postpone it to a next article. Clicking on a light (off at startup, so black color) its picture will change showing an on lamp (yellow) and at same time a led connected to corresponding Fishino's port will light. Clicking again on same lamp will turn it off again, and so will do the corresponding led



As said, this demo doesn't aim to be a complete home automation application but just a small example on how to use **Fishino**.

Anyway the app is configurable enough to allow you to change the floorplan picture, lights placement and pictures and so on.

We already started the implementation of analog data handling (for example to display a temperature value or to change it) which will be available on next releases.