While developing electronic devices for smart home it is very handy to build a prototype device for a start and only after checking that the device is working to assemble a final device.

To achieve this there are a lot of debugging boards exists, and of course some of them costs so much and, as a rule, couldn't be modified by someone else except vendor. To overcome these restrictions, I've decided to create my own debugging board.

It was made about 5 years ago but I sometimes use it even nowadays. It's very flexible and may be modified easily by adding new features, components etc.

Here is the top view of this board.

I placed the most frequently used components on the board and, as you see, it is consists of the following parts:

1 – DIP8 microcontroller Atmel AtMega8

2 – DIP40 microcontroller Atmel AtMega16 with JTAG switch

3 - Power supply (3.3V, 5V) based on Motorola MC34064 microchip

4 – Switch array

5 – Powerful MOSFET switch

6 - substrates for microchips testing

7 – set of resistors

8 - digital leds with chip-driver

9 - set of transistor’s keys

10 – USB module (may be used with V-USB framework)

11 - 20x2 LCD display

All the parts may be connected using simple wires, as it shown on picture: