

# How to use the MSP-EXP430FR2355 board as programmer? (Windows/Linux/Apple)

We use the FET-interface on the MSP-EXP430FR2355 board as a universal programmer interface for all MSP430 chips with the exception of the 100-series.

## I - What's needed?

- MSP430FR2355 Experimenter's board
- Four wires
- Flash programmer software (UniFlash 4.4.0), link:  
[http://processors.wiki.ti.com/index.php/Category:CCS\\_UniFlash](http://processors.wiki.ti.com/index.php/Category:CCS_UniFlash)

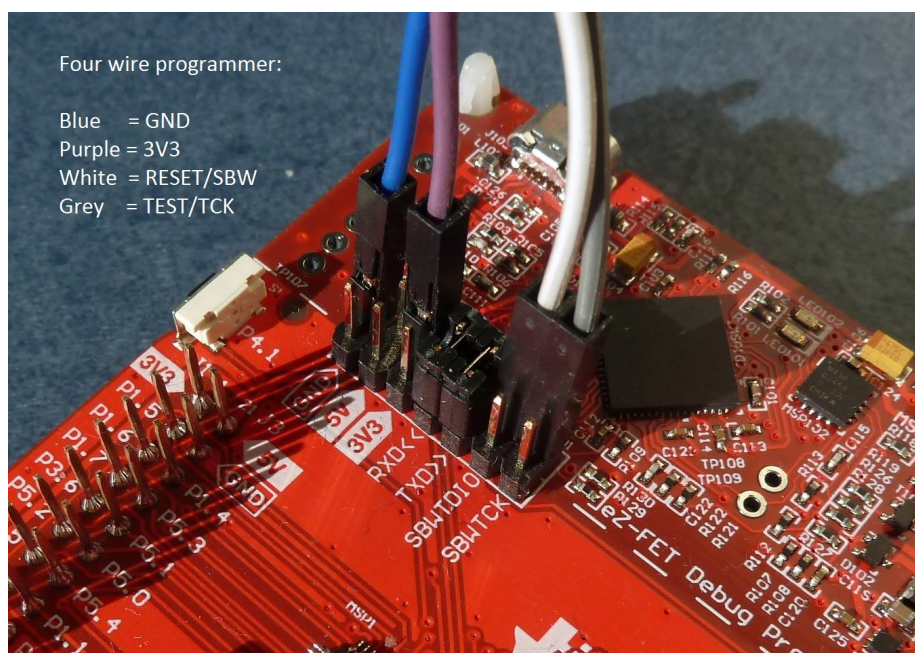
## II - MSP-EXP430FR2355 programmer connections:

SBWTCK = To TEST, TST, TCK or T

SBWTDIO = To RESET, RST or R

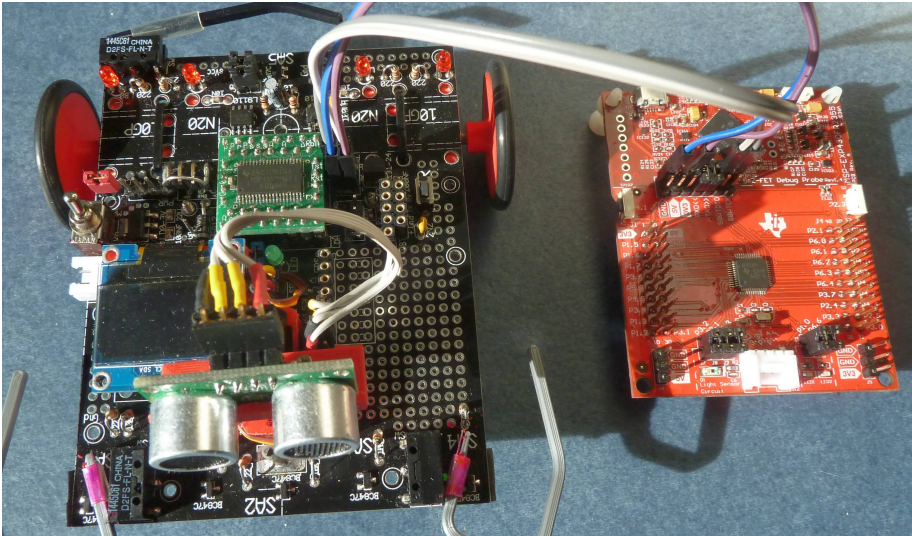
3V3 = To 3V3, VCC or +

GND = To GND or -

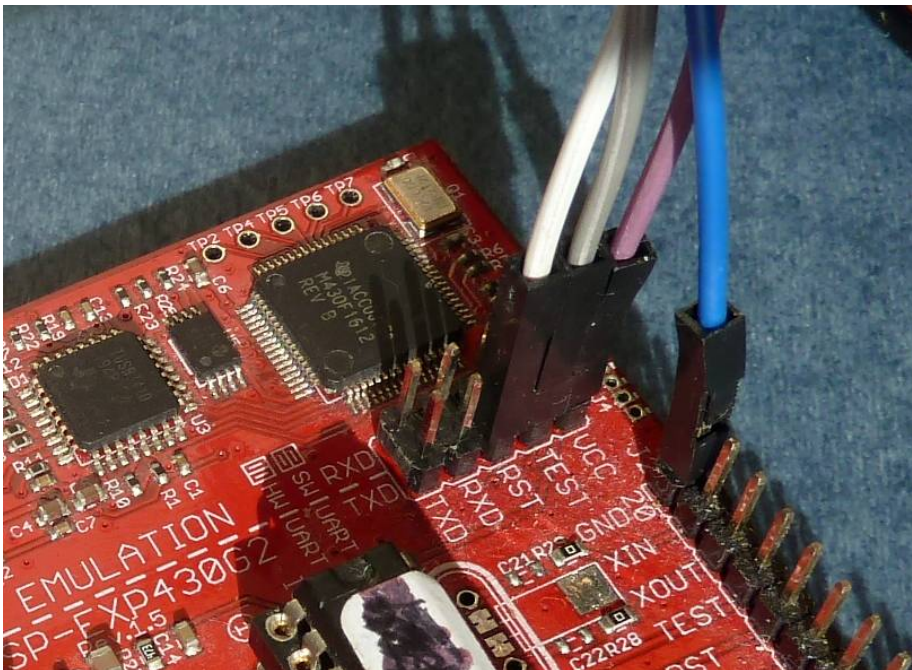


### III - Target boards connections:

As example: MSP-EXP430FR2355 connected to Cosey PROG-connector

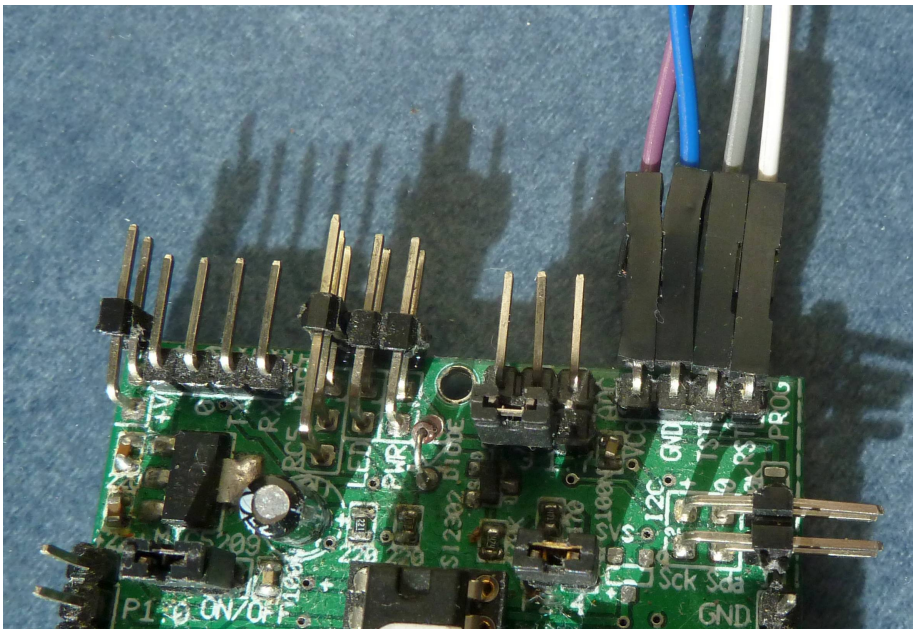


MSP-EXP430G (MSP430G2553)

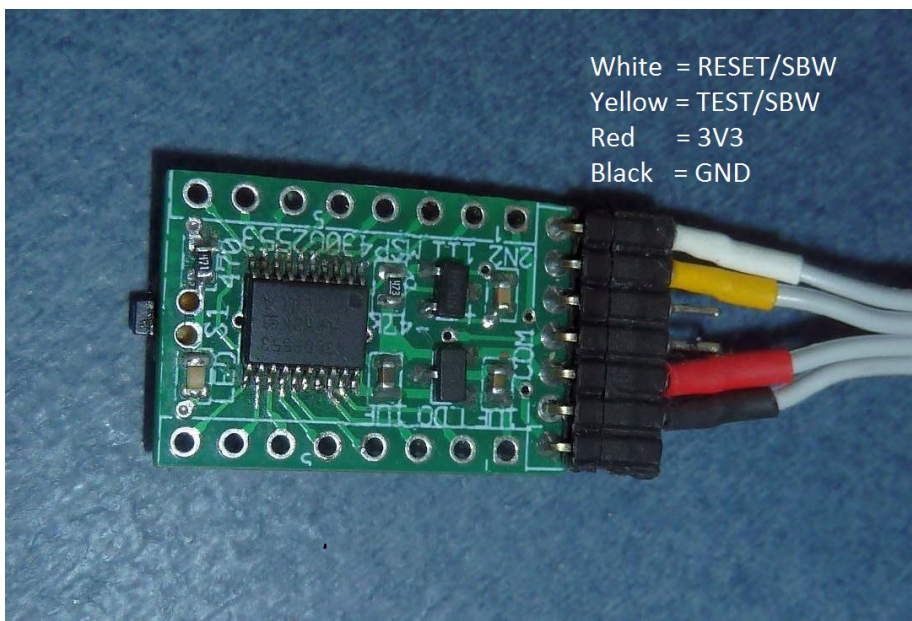




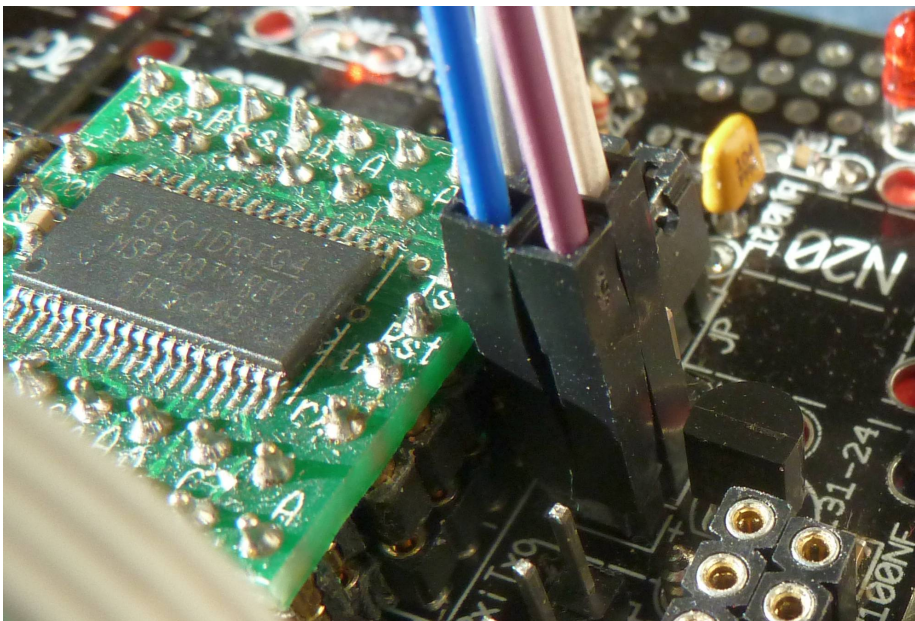
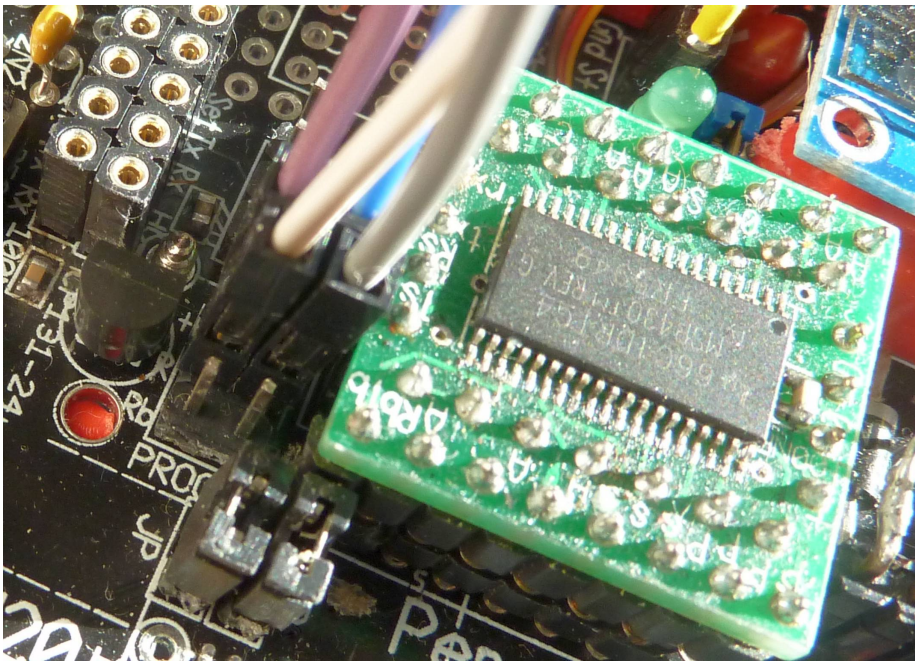
Egel kit (MSP430G2553)



Micro Launchpad (MSP430G2553)



Cosey robot (MSP430G2955 or MSP430FR5949)



## IV - What to do?

- Connect the MSP-EXP430FR2355, wait for the beep
- Start UniFlash 4.4.0
- Connect your target board using the four wires, as shown in the pictures

The programming session:

1. Go to: (1) Choose your device  
Category: **MSP**  
Select: **MSP430xxxx** where xxxx is the MSP430 on the connected target board!
2. Then (2) Choose the Connection.  
Select: **TI MSP430 USB1**
3. Then (3) Click: **Start** button  
Now select a flash image using the green **Browse** button and select the wanted noForth image from the file list.
4. Select: **Setting & Utilities** (in the menu on your left)  
Tag: On connect, erase user code and unlock the device
5. Select: **Program** (again, in the menu on your left)  
Click: **Load Image**

If all goes well, you will see the message [SUCCESS] in the console below.

- Now click: **Session** (In the upper left red bar)  
Click: **Save Session** (And click the **save** button in lower left corner)  
Now the software will remember all settings for you

