# imall

Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from, Europe, America and south Asia, supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of "Quality Parts, Customers Priority, Honest Operation, and Considerate Service", our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip, ALPS, ROHM, Xilinx, Pulse, ON, Everlight and Freescale. Main products comprise IC, Modules, Potentiometer, IC Socket, Relay, Connector. Our parts cover such applications as commercial, industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



## Contact us

Tel: +86-755-8981 8866 Fax: +86-755-8427 6832 Email & Skype: info@chipsmall.com Web: www.chipsmall.com Address: A1208, Overseas Decoration Building, #122 Zhenhua RD., Futian, Shenzhen, China



#### MSP430-JTAG-TINY LOW COST FAST USB JTAG FOR PROGRAMMING AND FLASH EMULATION



#### FEATURES

- program all MSP430Fxxx flash microcontrollers
- ultra **fast programming 14KB/s** faster several times than TI-USB-FET (1.4 KB/s with spy-biwire)
- uses TI standard 2x7 pin JTAG connector
- Spy-By-Wire support for the newest TI MSP430 devices
- can supply target with 3.3V fixed voltage 50mA maximum current, no short circuit protection (!)
- MSP430.dll makes it compatible with all existing software which works with TI-USB-FET (emulates TI-USB-FET)
- compatible with IAR Kickstart software for programming, real time emulation, debugging, step by step program execution, breakpoints, memory dump etc everything all high priced emulators do
- with IAR Kickstart you can write in assembler unlimited code size and to write in C with 2K limit for all MSP430 microcontrollers
- works with free GCC C compiler and Insight MSP430 toolchain and debugger
- for MAC-OS users: reported to work with PS X 10.4 and current Parallels
- dimensions 50x40 mm (2x1.6") + 20 cm (8") cable

### **DOCUMENTS:**

- How to install Olimex USB MSP430 programmers
- <u>SPY-BI-WIRE connection</u> please pay attention if you want to use SBW devices as the JTAG connection is differ
- How to install and use Olimex JTAGs with CCS 4.x
- How to install and use Olimex JTAGs with CrossWorks

### HARDWARE:

• <u>MSP430-JTAG-TINY connector</u> (top view)

### **SOFTWARE:**

- <u>OLIMEX MSP430-PROGRAMMER</u> GUI 1.3.0.4\_CLI 2.0.1.2\_DLL1.0.4.2/ 17.11.2011 freeware - stand alone software which allow you to program MSP430 devices without any 3rd party
- <u>MSP430 JTAG drivers Ver.1.042 -26-JUL-2011</u> add support for all devices released by TI to July 2011
- <u>MSP430 JTAG drivers Ver.1.039</u>
- MSP430 Kick Start C compiler and debugger (free for assembly language, limited for C)
- MSPGCC free C compiler and debugger
- <u>MSPdebug support for Linux</u> for MSP430-JTAG-TINY made by Daniel bear, tested to work fine in both JTAG and SBW mode with MSPdebug 0.16

### FAQ:

Q: Can I use MSP430-JTAG-TINY with XYZ development IDE/tools?

A: MSP430.dll which is provided with MSP430-JTAG-TINY is100% compliant to Texas Instruments MSP430.dll and will work with \*every\* development software which supports the original TI MSP430-FET and MSP430-USBFET hardware platforms, we have tested EW-MSP430, Rowley CrossWorks, our customers have reported success with MSPGCC.

Q: Other companies charge money for MSP430 programming software, why yours is free? A: To write MSP430 programming software using the TI MSP430.dll is very easy job, there would be probably tons of such programmers available if TI was not keeping the DLL content secret. The programmer software we offer is beta testing software so it may have bugs although we use it for years in house. Now we decided to release it for the public as we got number of request if we know for such software :). As we are more hardware company than software and we never got involved in sales of software we decided just to release it as freeware and not hassle with software copy protections and such.Note that it's not open source but copyrighted software, but it cost you nothing to obtain or distribute it. We are going to fix all reported bugs in timely manner but keep in mind that it's not commercial project and our peoples have lot of other stuff to do.

#### ORDERING CODES:

**MSP430-JTAG-TINY** completely assembled and tested