Resources @ ti.com/launchpad

- Code examples
- Open Source Design Files
- Documentation
- Example projects
- Videos
- Tutorials
- Other TI products

Below are the pins exposed @ the MSP-EXP430F5529LP BoosterPack connector.

Also shown are functions that map with the BoosterPack pinout standard. Refer to the MSP430F5529 Datasheet for additional details.

NOTE: Some LaunchPads & BoosterPacks do not 100% comply with the standard, so please check your specific LaunchPad to ensure pin compatibility.

(i) Denotes I/O pins that are interrupt-capable.

** Some LaunchPads do not have a GPIO here. De-prioritize this pin when making a BoosterPack.

BoosterPack Ecosystem

TMP006 Infrared MEMS temperature sensor BoosterPack

- I2C-based temperature sensor can read surface temperature without making contact
- Can enable real-time readings or datalogging

Sub-GHz RF BoosterPack

- CC1101L RF transceiver
- Great RF range!
- Includes 2x RF BoosterPacks
- Prototyping area
- Send & Receive RF data easily

>> See them all @ ti.com/boosterpacks

Software Tools

Energia

A simple open-source & community-driven code editor.

Easy-to-use functions for blinking LEDs, buzzing buzzers & sensing sensors.

>> www.energia.nu

Professional Software tools

LaunchPad is also supported by professional IDEs that provide industrial-grade features and full debug-capability. Set breakpoints, watch variables & more with LaunchPad.

>> www.ti.com/ccs

Meet the MSP430F5529

LaunchPad Evaluation Kit

Part Number: MSP-EXP430F5529LP

Texas Instruments

A closer look at your new LaunchPad

Featured microcontroller: MSP430F5529

This LaunchPad is great for…

- General purpose applications due to its 25MHz CPU, integrated Full-speed USB 2.0 & analog/digital integration
- Battery-operated applications thanks to it's low-power capabilities
- Beginners & experienced developers alike thanks to it's multiple points of entry into software development (Energia for beginners & industrial-grade tools like CCS or IAR for more advanced development)

What comes in the box?

MSP-EXP430F5529LP LaunchPad

New 100% open source on-board emulator
enables programming, debugging & application UART via USB.

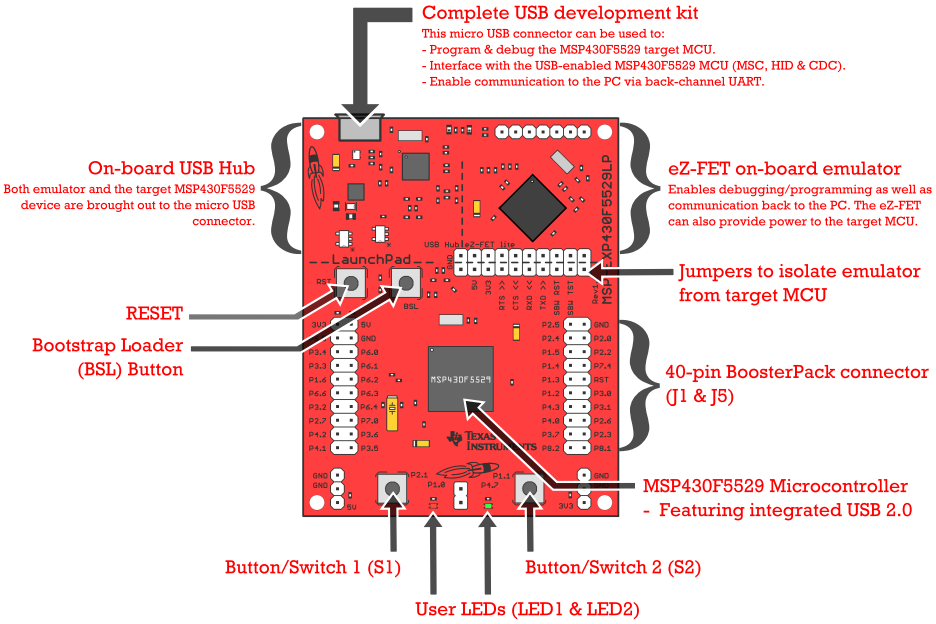
MSP430F5529 Microcontroller
- 25 MHz CPU
- 128 kB Flash / 8 kB RAM (+2 kB if USB not used)
- 12-bit SAR ADC, Comparators, Timers, HW multiplier
- SPI/UART/I2C
- Integrated Full-speed USB 2.0
  Complete software library available for HID, MSC & CDC implementations

QSG — This Quick Start Guide

Micro-USB Cable

Software can be downloaded online @ www.ti.com/msp-exp430f5529lp

MSP-EXP430F5529LP Overview



Let's get started!

See the unboxing & demo video for this LaunchPad @ ti.com/msp-exp430f5529lp

The out-of-box demo:

The MSP-EXP430F5529LP LaunchPad features an MSP430F5529 device that is pre-loaded with some demo functionality.

1. Connecting the hardware

Connect the LaunchPad using the included USB cable to a computer. If prompted, let it install necessary software.

2. The Demo Application

When connected to your computer, the device enumerates on the computer as a composite USB device to demonstrate 2 USB implementations.

MSC (Mass Storage Class) Hard drive

When plugged in over USB, the LaunchPad enumerates as a Mass Storage Class device. The LaunchPad shows up as a removable disk ("F5529LP") on the computer and contains several files on FAT volume.

- Button1.txt = "Hello World"
- Button2.txt = This contains ASCII art of the LaunchPad "Rocket" logo
- MSP430_USB_LaunchPad.url
- ReadMe.txt

HID (Human Interface Device) Keyboard

The LaunchPad also enumerates as a HID Keyboard. By pressing S1 or S2 button on your LaunchPad, the text stored in the Button1 and Button2.txt files will be sent to your computer as "keystrokes." Open up a text editor to see the incoming characters! You can personalize the pre-set character strings by simply editing the Button1 and Button2.txt files. This demo is limited to 2048 characters in each txt file.

3. Finding USB resources

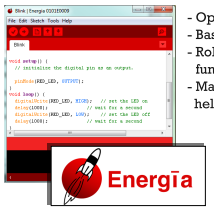
The MSP430F5529 device is supported by a robust USB development ecosystem, which includes open source APIs for MSC, HID & CDC USB implementations. Also, a GUI-based USB descriptor tool is available, which can help you generate your USB drivers to ease your development! You can find more @ www.ti.com/msp430usbdevpack

Where do I go next?

This LaunchPad provides multiple-points of entry in terms of software development. You can use a friendlier code editing tool, such as the open source, community-made Energia, or a full-fledged industrial-grade development environment like Code Composer Studio.

Energia

A wonderful community-driven, open-source code editor that provides a simple & friendly development environment.



- Open source & community-driven
- Based on the Wiring framework
- Robust collection of intuitive function calls & APIs
- Many code example & projects to help you get started quickly

www.energia.nu

Professional Tools

Professional development tools are also available and provide advanced capabilities like full debug support enabling you to set breakpoints, watch variables, step through your code & more.

Code Composer Studio™ IDE

www.ti.com/ccs

IAR Embedded Workbench®

www.ti.com/iar