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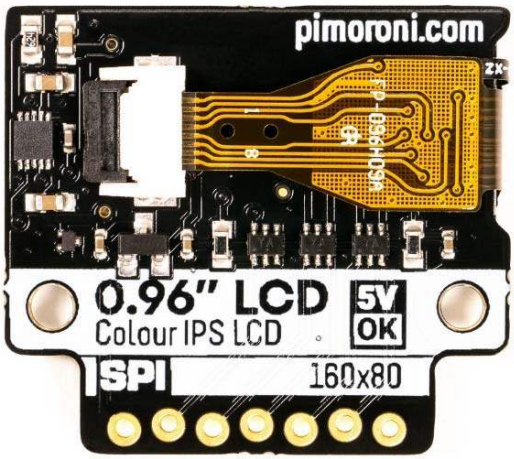

0.96" SPI Colour LCD (160x80) Breakout PIM436

A handy lil' LCD to add readouts to your projects. This 0.96" SPI LCD has a 2:1 widescreen aspect ratio, has great viewing angles (IPS), and works with Raspberry Pi or Arduino.

The display is great for displaying tidbits of information like timers, clocks, sensor readings, and more. Why not use it to display the IP address of a headless Raspberry Pi, so that you don't have to connect a full display or fiddle around with nmap?

Despite being so diminutive, this LCD is a gorgeous little display. It's bright, has great resolution and, because it's an IPS panel, it has wide viewing angles and looks great whichever way you look at it. It's driven by SPI and you should be able to run it at up to ~50FPS, although we've found that anywhere from 10FPS looks good for most uses.

*Note that this breakout is **not compatible with our current Breakout Garden**(more news on that front soon!), since it uses SPI rather than I2C, and has 7 pins rather than 5 like most of our other breakouts.*

Features

- 0.96" colour LCD (160x80 pixels)
- SPI interface
- 3.3V or 5V compatible
- Reverse polarity protection
- **Requires soldering**
- Compatible with all models of Raspberry Pi and Arduino
- Python library

Display specifications

- 160x80 pixels (~190 PPI)
- 10.8x21.7mm active area
- 400cd/m2 luminance
- 800:1 contrast ratio
- 160° viewing angle (horizontal and vertical)
- ST7735S driver chip

Software

We've adapted an existing Python library to drive this display. The library makes it straightforward to display images, text or graphics, and even display animated GIFs! There's a one-line-installer to get the library all set up for you. Just open a terminal and type: `curl https://get.pimoroni.com/st7735 | bash`

Connecting to your Raspberry Pi

Our library is set up to use SPI 0 on the Pi (BCM 8 for CS, BCM 11 for SCK, and BCM 10 for MOSI), BCM 9 for DC, and BCM 18 for the backlight.

Here's which pins to connect between your 0.96" LCD Breakout and your Pi's GPIO (**note that it's BCM pin numbering**):

- 3-5V to any 5V or 3V pin
- CS to BCM 8
- SCK to BCM 11
- MOSI to BCM 10
- DC to BCM 9
- BL to BCM 18
- GND to any ground pin

  You can of course use other pins with your LCD Breakout, but you'll have to change them accordingly when you instantiate the display in your code.

Notes

Dimensions: 29.1x25.9x5.4mm