

CP210X USB-TO-UART EVALUATION KIT QUICK-START GUIDE

The CP210x USB-to-UART smart-interface family provides a simple solution for connecting UART serial peripheral-based designs to USB using a minimum of components and PCB space. The CP210x devices include a USB 2.0 full-speed function controller, USB transceiver, oscillator, EEPROM or One-Time Programmable ROM, and one or more UART interfaces.

The CP210x Evaluation Kits contain the following:

- CP210x evaluation board (CP2104 board pictured as an example)
- required cables (USB or RS232 serial)
- DVD
- Quick Start Guide (this document)



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Mailing Address:
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Austin, TX 78701

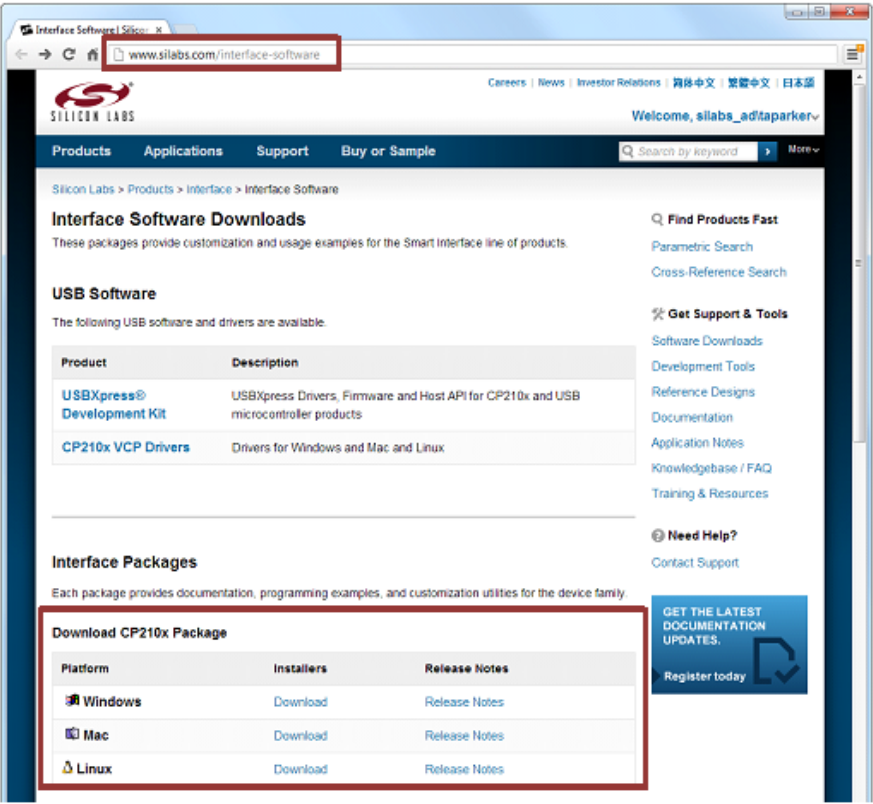
A. Getting Started

1

Insert the DVD included in the kit to install the CP210x-related software. The latest version of this installer can also be found on the Silicon Labs website: www.silabs.com/interface-software.



OR

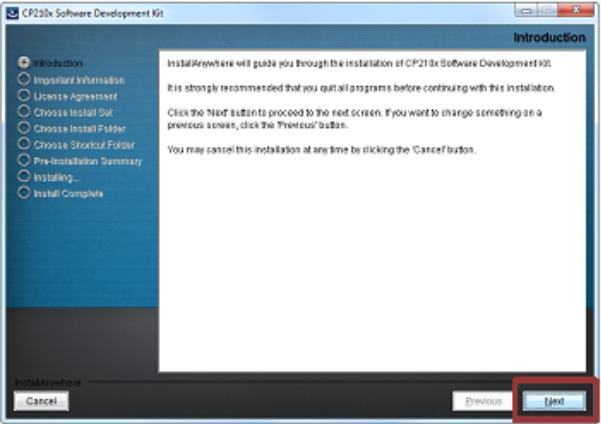


Platform	Installers	Release Notes
Windows®	Download	Release Notes
Mac	Download	Release Notes
Linux	Download	Release Notes

<http://www.silabs.com/interface-software>

2

After inserting the DVD or downloading the SDK, run the installer. Click **Next** to proceed through the installer steps.



Note: Windows installation process shown.

3

If on a Windows PC, the SDK installer will detect the current operating system and automatically start installing the drivers. Click **Next** to install the driver to the system.



4

Connect the CP210x evaluation board to a PC as shown using the USB cable. Connect a RS232 serial cable to a DB9 connector on the evaluation board with the end attachment connecting to the target serial device.

5

The CP210x device will appear as a COM port in Device Manager in Windows. As a virtual COM port, the CP210x functions identically to a real COM port, from the reference point of both the host application and the serial device, and it can support serial device control requests defined in the Microsoft Win32® Communications API.

6

As a quick test, rotate the jumpers on the CP210x RX and TX pins to tie RX and TX together and perform a loop back test.

7

In Windows, open a serial terminal program (downloaded separately, RealTerm pictured) to verify the CP210x UART functionality. Set the baud rate and select the COM port from from Device Manager.

8

Access all CP210x-related material directly from the website or from the SDK installed to **C:\Silabs\MCU\CP210x_SDK** by default. Software can be accessed from the Start menu.

Start→
All Programs→
Silicon Labs→
CP210x Software Development Kit

The material installed as part of the SDK includes :

- Documentation
- Data Sheets
- Application Notes
- Users Guides
- and more
- AN721: Device Customization Utility
- Virtual COM Port (VCP) Drivers
- Software
- AN197: Serial COM Port Examples
- AN220: Driver Customization Utility (Windows)
- AN223: GPIO Read/Write Examples

B. Relevant Documentation

- **AN721:** CP210x/CP211x Device Customization Guide
- **AN571:** CP210x Virtual COM Port Interface
- **AN220:** USB Driver Customization
- **AN197:** Serial Communications Guide for the CP210x

Software Development Kit:
<http://www.silabs.com/interface-software>

Device Information:
<http://www.silabs.com/smartinterface>

Data Sheets:
<http://www.silabs.com/smartinterface>→USB to UART Bridges→Documentation tab→Data Sheet section

Users Guides
<http://www.silabs.com/smartinterface>→USB to UART Bridges→Documentation tab→User Guides section

MCU Knowledge Base:
www.silabs.com→Support→Knowledge Base

Contact an Applications Engineer:

www.silabs.com→Support→Contact Technical Support

Quality Documents:

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