C_STAMP Operational Test

(The following instructions are also valid for C_MICRO module)

After putting the C_STAMP kit together, its operation can be verified with the help of Windows Hyper Terminal communication program.

These instructions assume that you have a 9-pin serial communication port available on your computer and are familiar with basic serial device connection procedures.

Some possible problems you can run into are:

- Many newer desktop and laptop computers no longer provide a serial communication port. In this case you need to buy a USB to Serial Port Adapter cable. It is available from most online and retail computer stores for $15 - $30. Also check eBay for bargain deals.

- The serial communication port (COM1 or COM2) is in use by another device such as a modem. In this case you need to disable or disconnect the internal or external device that is using the COM port in order to connect C_STAMP to the port.

- The serial communication port (COM1 or COM2) is disabled in the BIOS. In this case you need to go into the BIOS setup to enable the COM port.

Once a serial COM port is available and working, proceed as follows:

- Connect the C_STAMP serial cable to the RJ11 connector on the kit and to the serial COM port on the computer. The C_STAMP serial cable is shown below.

- Connect power adapter to C_STAMP kit and verify that C_STAMP module power LED is on.
- Start Hyper Terminal program. It is usually found in Start Menu -> Programs -> Accessories -> Communications.

![Hyper Terminal](image)

- Create a new connection setting and give it the name C_STAMP. Select the COM port to which you previously connected the C_STAMP serial cable.

![Connection Description](image)

![Connect To](image)
Configure the COM port with the communication settings as shown in the picture below. C_STAMP module operates at a fixed baud rate of 19200 bits per second, 8 Data bits, No Parity and 1 Stop bit. Make sure Flow Control is set to None.

After clicking OK to save the port settings, look at the status at the bottom left of Hyper Terminal window. If it does not say Connected, then select Call from Call menu to connect Hyper Terminal to the C_STAMP module.

Press the RESET button on C_STAMP kit. A BOOT prompt should appear in the Hyper Terminal window.
The **BOOT** prompt verifies that the C_STAMP module, the BootLoader program present in the PIC18F252 micro-controller and the serial communication between C_STAMP module and the computer are working correctly. You can now close the Hyper Terminal program, disconnect the serial cable and disconnect the C-STAMP power adapter.

If you fail to get the **BOOT** prompt, try the following suggestions in the order given, to troubleshoot the problem:

- Carefully repeat all steps given in this instruction sheet.
- Try connecting the C_STAMP module through its serial cable to another computer. This will help you figure out whether the problem is with the computer and its serial port setup or with the C_STAMP module and its serial cable.
- Seek the help of a knowledgeable person or computer expert.