

Scrolling LED Sign V1.0

Assembly Instructions

Introduction

Thank you for your purchase of the Scrolling LED Sign kit. These instructions will show you how build your kit and get it scrolling your messages.

Tools and Supplies You Will Need

Soldering iron / Solder / Wire cutters / Eye Protection

Additional Components You Will Need (not supplied with the kit)

Arduino Nano / USB cable / +5VDC regulated power supply / RGB LED strips (WS2812B or NeoPixel compatible) / Header pins for LED strips

Kit Contents

Check your kit to make sure you have all the following components before assembling the kit:

Printed Circuit Board (PCB) / 5.5×2.5mm power connector / Qty (2) 15 pin female headers (for Arduino Nano) / Qty (7) 3 pin female right-angle headers (for LED strips) / Qty (8) 10uF electrolytic capacitors / Qty (2) potentiometers

Assembly Steps

Step 1: Install and solder the 3 pin headers for the LED strips (7 times)

Step 2: Install and solder the 15 pin female headers for the Arduino Nano (2 times)

Step 3: Install and solder the 5.5×2.5mm power connector

Step 4: Install and solder the 10uF electrolytic capacitors

(Important note: The long lead goes in hole with square pad!)

Step 5: Install and solder the potentiometers (two times)

This completes the assembly of the Scrolling LED Sign PCB. You now need to complete the build by installing the remaining components (not supplied with the kit).

Step 1: Install Arduino Nano (USB connector goes toward edge of PCB)

Step 2: Connect Arduino Nano to computer with USB cable

Step 3: Upload Scrolling LED Sign sketch to Arduino using Arduino IDE software (arduino.cc)

Step 4: Solder 3 pin header to each LED strip ("DI" end)

Step 5: Connect LEDs strips to PCB

Step 6: Connect regulated +5VDC power supply

The Scrolling LED Sign should now start displaying your message.