

V240 Kit for the GT-102– 220/240 Volt Operation

Revision 1p3, August 23, 2020

The V240 Kit contains the components needed to wire the GT-102 for AC mains voltages in the range from 220-240 Volts RMS, 50 or 60 Hz.

Transformer Preparation and Installation

Locate the 5” long black and white 18 AWG wires with FASTON connectors pre-installed on one end. For 220-240 Volt wiring, the FASTON and toroidal primary wires will be connected as shown in Figure 1.

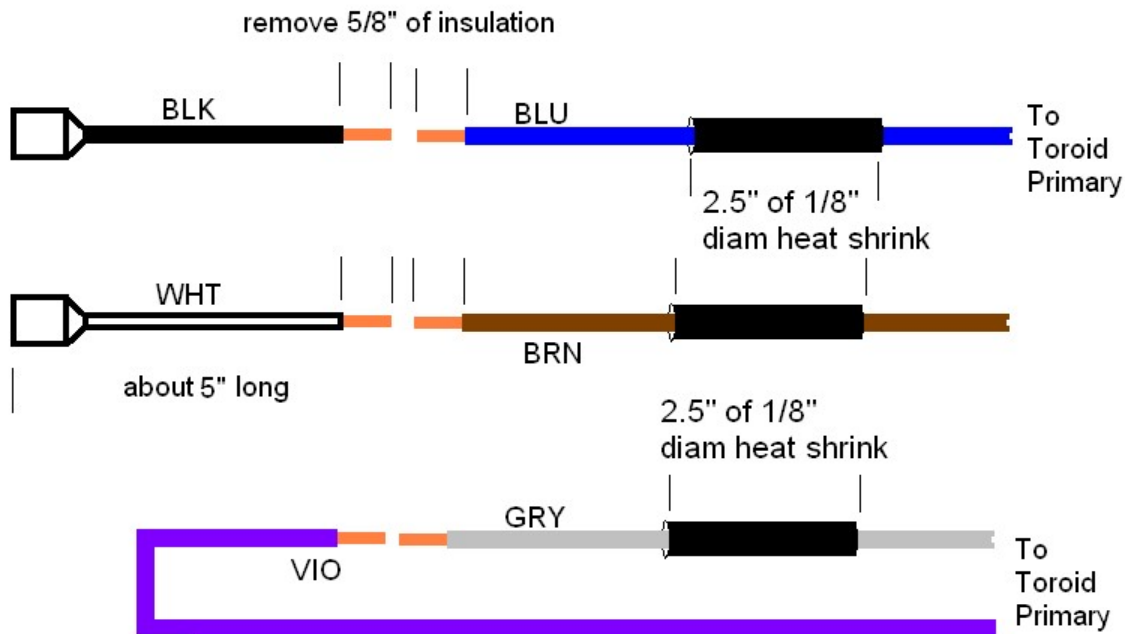


Figure 1-Wiring toroidal transformer for 240 Volt operation

1. Cut a 2.5” length of 1/8” diameter heat-shrink tubing. Slide it over the blue lead of the power transformer. Slide it as far from the cut end of the wire as possible.
2. Cut a second 2.5” length of 1/8” diameter heat-shrink tubing. Slide it over the brown lead of the power transformer. Slide it as far from the cut ends of the wire as possible.
3. Cut a third 2.5” length of 1/8” diameter heat-shrink tubing. Slide it over the gray lead of the power transformer. Slide it as far from the cut ends of the wire as possible.
4. Remove 5/8” of insulation from the following 6 wires:
 - i. Black 5” FASTON wire
 - ii. White 5” FASTON wire
 - iii. Blue Transformer wire
 - iv. Violet Transformer wire
 - v. Gray Transformer wire
 - vi. Brown Transformer wire
5. All of the splices will be Western Union splices, as diagrammed in Figure 2. Twist wires carefully so that no sharp edges project from the ends of the wires.

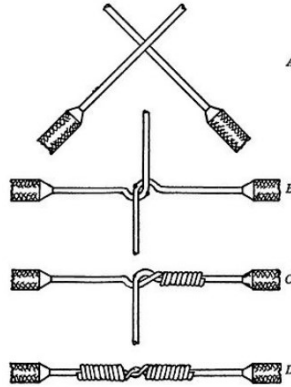
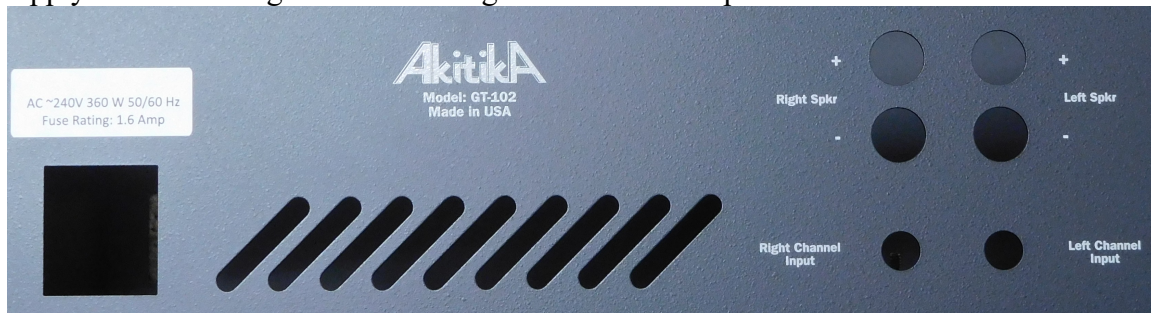


Figure 2-Western Union splice has diameter less than the insulated wires and no sharp points

6. Make Western Union splices between the following pairs of wires:
 - i. Black FASTON wire and blue transformer wire
 - ii. White FASTON wire and brown transformer wire
 - iii. Violet transformer wire and gray transformer wire
7. For each splice:
 - i. Solder the splice.
 - ii. Slide the heat-shrink tubing evenly over the splice
 - iii. Use the tip of the iron to shrink the heat-shrink tubing.
8. Once the heat-shrink tubing has cooled, test your work by tugging on the heat-shrink to assure that it remains in place.
9. Feel the heat-shrink tubing where it covers the splices. If you feel sharp points of the wire projecting into the heat-shrink tubing, then it will be best to wrap each piece of heat-shrink tubing with a layer (or layers) of electrical insulating tape.
10. Bundle the blue, brown, violet and gray wires with the included cable tie.
11. Open the fuse drawer in the IEC power entrance connector. **Replace the 3 Amp fuse with the 1.5 Amp fuse supplied in this kit!**
12. Continue assembly with step 9 of the “Transformer Preparation” section of the manual. This step details joining the red and orange transformer wires. **There will be no power supply output voltage if you don’t do this step!**

Apply the New Voltage and Fuse Rating Label

Apply the new voltage and fuse-rating label to the back panel as shown here:



The V240 kit does not include a country specific power cord. The kit builder must supply that cord.

¹ A 1.6 Amp fuse may also have been supplied in your kit. Either value is acceptable.