

Lionel Cantilever Signal Bridge Owner's Manual

Ongratulations on your purchase of the Lionel Cantilever Signal Bridge. Place the signal along side your mainline, and passing trains will automatically cause the lights to change from green to red.

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Installing the 153C Contactor

The 153C Contactor is activated by the weight of a passing train. Place the Contactor under the track, as shown in Figure 1.

One of the track ties should rest firmly upon the top of the pressure plate. If your layout is fastened to a board, loosen several sections on either side of the Contactor so that the track must be sufficiently flexible to bend under the weight of the train.

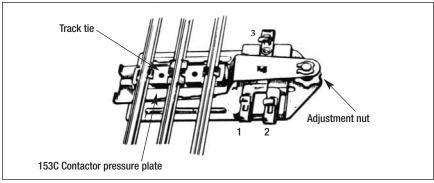


Figure 1. 153C Contactor

Wiring your Cantilever Signal Bridge to a power source

Your Cantilever Signal Bridge operates best at 12-18 volts (AC). Have an adult strip 1/4" of insulation from both ends of the four wires included with the Cantilever Signal Bridge, if they have not already been stripped.

Caution! Only an adult should perform this task. Always use care when stripping wires.

Connect the other wires to the #153C Contactor and transformer as shown in Figure 2 below. Note that the terminals on the bottom of the Signal are labeled R, C, and G.

To connect a wire to the Contactor's spring clips, press down the upper half of the spring clip terminal until the lower part projects through the slot. Insert the bare wire end into the loop, then release the upper part of the clip. Spring tension will hold the wire tight.

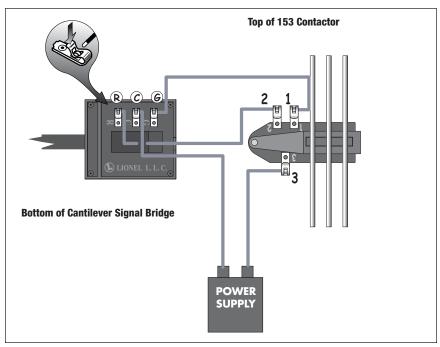


Figure 2. Accessory connections

Adjusting the Contactor

A fter all the connections are made and your layout is powered up, the Contactor must be adjusted so that the train will properly trigger the accessory.

- 1. Stop the train several sections away from the Contactor so that it does not press on the Contactor plate.
- 2. Turn the adjustment nut either up or down until the accessory's lights change from green to red. Refer to Figure 1 on page 3 for the location of the adjustment nut.
- 3. Back up the adjustment nut just enough to cause the lights to change back to green.

Operating the Cantilever Signal Bridge

When properly adjusted, the 153C Contactor will respond to light pressure on the track. The lights will change from green to red as long as any part of the train is passing over the Contactor plate. After the train has cleared the Contactor, the signal will change back to green.

Connecting your Cantilever Signal Bridge to a 153IR Controller

The 153 IR Controller (available separately, 6-14111) was designed as an alternative to the 153C Contactor. This device will activate you accessories when the train is reflected by the infrared beam. Connect the accessory to the 153 IR Controller as shown in Figure 4 below.

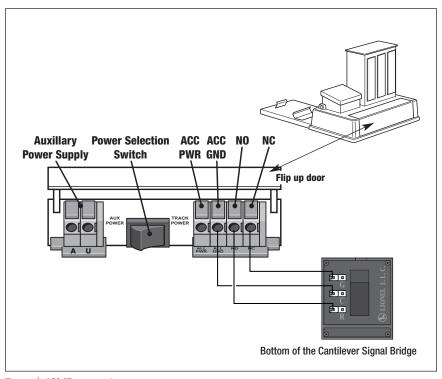


Figure 4. 153 IR connections

Replacing your Cantilever Signal Bridge's lamp

Your Cantilever Signal Bridge is illuminated by several lamps. During the course of normal operation, you may find that this lamp requires replacement. We recommend that you have the lamps replace at your authorized Lionel Service Center or from Lionel Service.

Limited Warranty/Lionel Service

his Lionel product, including all mechanical and electrical components, moving parts, motors and structural components, except for light bulbs, is warranted to the original consumer-purchaser, for **one year** against original defects in materials or workmanship when purchased through an authorized Lionel merchant.

This warranty does NOT cover normal wear and tear, light bulbs, defects appearing in the course of commercial use, or damage resulting from abuse or misuse of the product by the purchaser. Transfer of this product by the original consumer-purchaser to another person voids this warranty. Modification of this product voids this warranty.

Any warranted product which is defective in original materials or workmanship and is delivered by the original consumer-purchaser to Lionel L.L.C. or an authorized Lionel L.L.C. Service Center, together with proof of original purchase will, at the option of Lionel L.L.C., be repaired or replaced, without charge for parts or labor. In the event the defective product cannot be repaired, and a replacement is not available, a refund of the original purchase price will be granted. Any products on which warranty service is sought must be sent freight or postage prepaid, as transportation and shipping charges are not covered by the warranty.

In no event shall Lionel L.L.C. be liable for incidental or consequential damages.

Some states do not allow the exclusion or limitation of incidental or consequential damages, so the above exclusion may not apply to you.

This limited warranty gives you specific legal rights, and you may have other rights which vary from state to state

Instructions for Obtaining Service

If service for this Lionel L.L.C. product is required, bring the item, along with your dated sales receipt and completed warranty information

to the nearest Authorized Lionel Service Center. Your nearest Lionel Service Center can be found by calling 1-800-4-Lionel, or by accessing our Website at www.lionel.com.

If you prefer to send your product back to Lionel L.L.C. for repair in Michigan, you must first call 586-949-4100 or FAX 586-949-5429, or write to Customer Service, P.O. Box 748, New Baltimore, MI 48047-0748, stating what the item is, when it was purchased and what seems to be the problem. You will be sent a return authorization letter and label to ensure your merchandise will be properly handled upon receipt.

Once you have received your return authorization and label, make sure that the item is packed to prevent damage during shipping and handling. We suggest that you use the product's original packaging. This shipment must be prepaid and we recommend that it be insured.

Please make sure you have followed all of the above instructions carefully before returning any merchandise for service. You may choose to have your product repaired by one of our Authorized Lionel Service Centers after its warranty has expired. A reasonable service fee will be charged.

Warranty Information

Please complete the information below and keep it, along with your dated sales receipt. You must present this and your dated sales receipt when requesting warranty service.

Name
Address
Place of Purchase
Date of Purchase
Product Number
Product Description
Toddet Bescription

