

Installation/Operating Instructions 771B20GAD / 776BGADDR

Deadbreak Grounding Device and Insulated Cap with Test Point

Contents: 35kVB20GADDR = 771B20GAD Grounding Device, 776GADDR Insulating Cap, Installation Instructions and (2) Lubricant (DO NOT SUBSTITUTE – other lubricant may be harmful to the product or mating parts.

771B20GAD = 771B20GAD Grounding Device, Installation Instructions and Lubricant (DO NOT SUBSTITUTE – other lubricant may be harmful to the product or mating parts.

776BGADDR = 776BGADDR Insulating Cap, Installation Instructions and Lubricant (DO NOT SUBSTITUTE – other lubricant may be harmful to the product or mating parts..

DANGER

All apparatus must be de-energized during installation or removal of part(s).

Do not touch or move energized products in the work area.

These instructions do not attempt to provide for every possible contingency.

Failure to follow these instructions will result in damage to the product and serious or fatal injury.

This product should be installed only by competent personnel trained in good safety practices involving high voltage electrical equipment. These instructions are not intended as a substitute for adequate training or experience in such safety practices.

All apparatus must be installed and operated in accordance with individual user, local and national work rules and electrical standards.

For loadbreak products follow operating instructions. All deadbreak connectors must be de-energized before operating. All 200A deadbreak connectors must be mechanically secured with bails when connected.

If this product is supplied with a protective shipping cover(s), remove this shipping cover(s) and replace with the appropriate HV insulated cap(s) or connector(s) before submerging or energizing the circuit.

Inspect parts for damage, rating and compatibility with mating parts.

Excess distortion of the assembled product may result in its failure.

FOR MORE INFORMATION ON PARTS, INSTALLATION RATINGS AND COMPATIBILITY, CALL THE NEAREST ELASTIMOLD^R OFFICE.

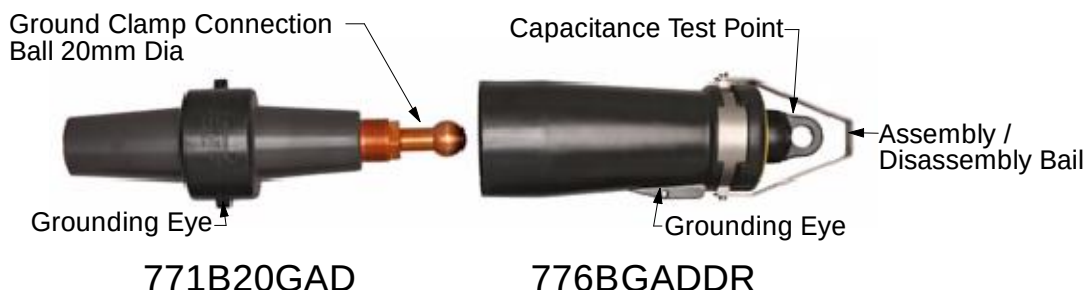
Limited Warranty:

1. T&B warrants that its products will be free from defects in materials or workmanship for a period of two (2) years, except for tools which are warranted separately (see warranty accompanying those products). Fisher Pierce[®] products and Elastimold[®] Reclosers are warranted for three years; and Joslyn[™] VBT and VBU capacitor switches are warranted for four years or 40,000 operations whichever occurs first. Upon prompt notification of a warranted defect, T&B will, at its option, repair or replace the defective product.
2. In no event shall T&B be liable for any consequential, indirect or special damages, nor will T&B be liable for transportation, labor, or other charges arising out of the removal or reinstallation of its products. Liability for breach of warranty is limited to the cost of repair or replacement of the warranted product only.
3. Misuse, misapplication or modification of T&B products immediately voids all warranties.

THE WARRANTIES AND REMEDIES CONTAINED HEREIN ARE EXCLUSIVE AND ARE IN LIEU OF ALL OTHER WARRANTIES AND REMEDIES, INCLUDING BUT NOT LIMITED TO ANY IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, WHICH ARE SPECIFICALLY DISCLAIMED.

IMPORTANT

1. Check contents of package to ensure they are complete and undamaged.
2. Check all components to ensure proper fit with cable and/or mating products.
3. Read entire installation instructions before starting.
4. Have all required tools at hand and maintain cleanliness throughout the procedure.

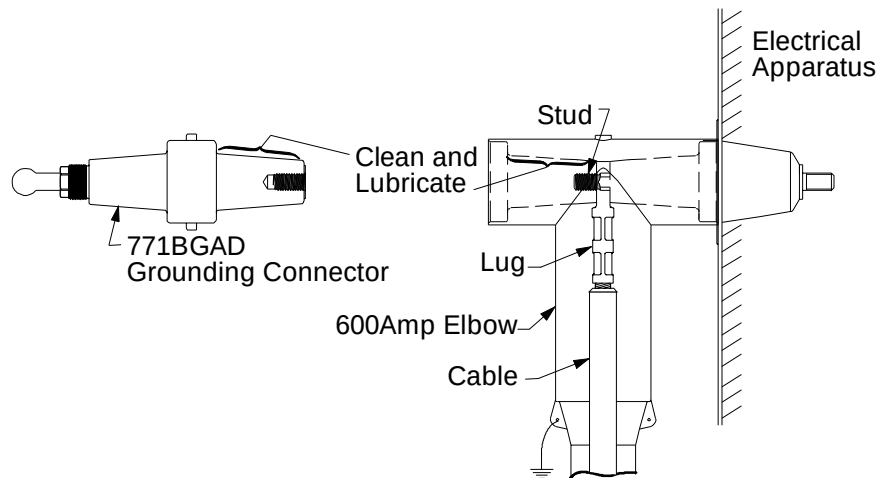


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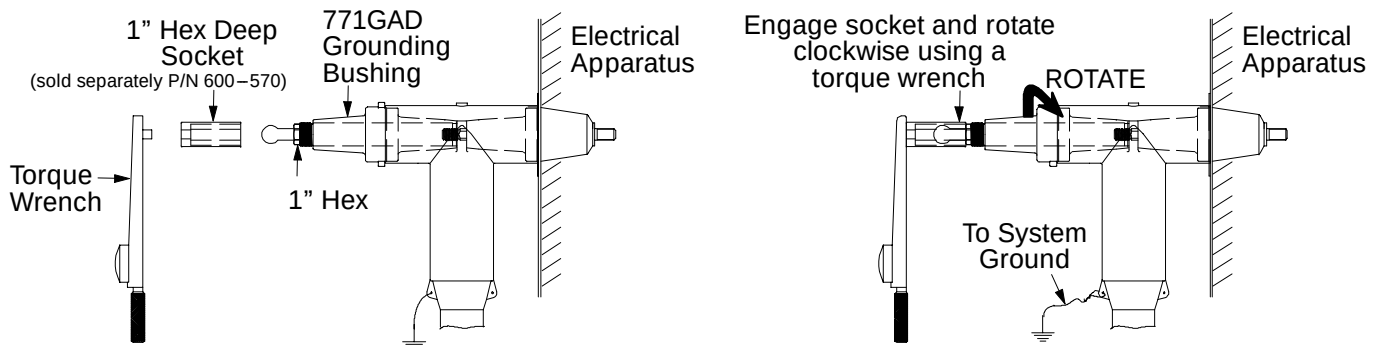
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STEP 1 (Installing the 771B20GAD Grounding Connector)

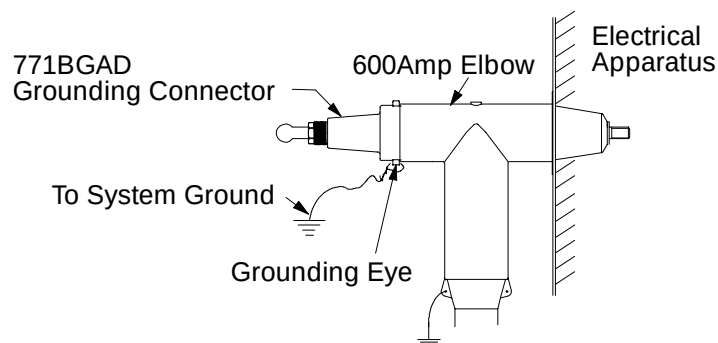
- A) The following tools are required to perform installation. These tools are not supplied.
- S (1) Torque Wrench
 - S (1) 1" Hex Deep Socket
 - S (2) Hotstick
- B) Install the 600Amp elbow onto the apparatus bushing following the instructions supplied with the elbow. **DO NOT INSTALL THE INSULATING PLUG OR CAP.**
- C) Clean and lubricate the 771B20GAD Grounding Connector interface and 600Amp elbow interface with lubricant supplied.
- D) Insert 771BGAD Grounding Connector into the elbow and rotate clockwise to engage the stud.



- E) Engage the 1" deep socket (sold separately p/n 600-570) onto the 771BGAD Grounding Connector and using a torque wrench continue rotating clockwise. When the 771B20GAD Grounding Connector stops rotating, tighten to 55/60 foot/pounds torque. Remove the socket.



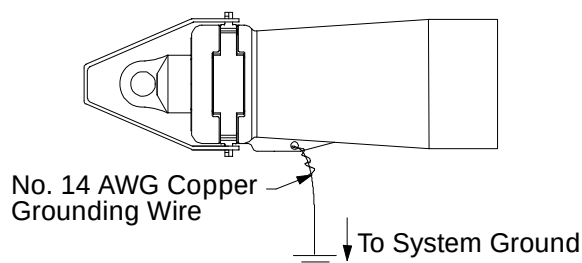
- F) Using a separate copper wire (No 14AWG/2.55mm²) or equivalent, insert one end through the grounding eye on the 771B20GAD Grounding Connector. Twist tightly taking care not to damage the eye. The other end of the wire must be attached to the system ground.



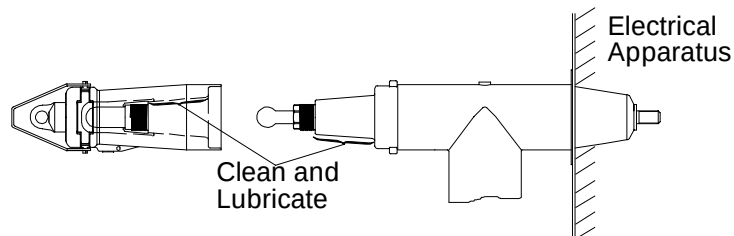
STEP 2 (Installing the 776BGADDR Insulating Cap)

Note: 2 hotsticks will be needed for Steps 2 & 3)

- A) Insert a length of No. 14 AWG (2.5mm²) copper wire (or equivalent) through the grounding eye of the insulated cap. Make a small loop and twist tightly, taking care not to damage the grounding eye. Connect free end of grounding wire to the system ground. Length of grounding wire should be sufficient for the distance from the grounding point to the grounding eye of the insulated cap plus enough to wrap around the insulated cap 10 times (90") during assembly (see Step C).

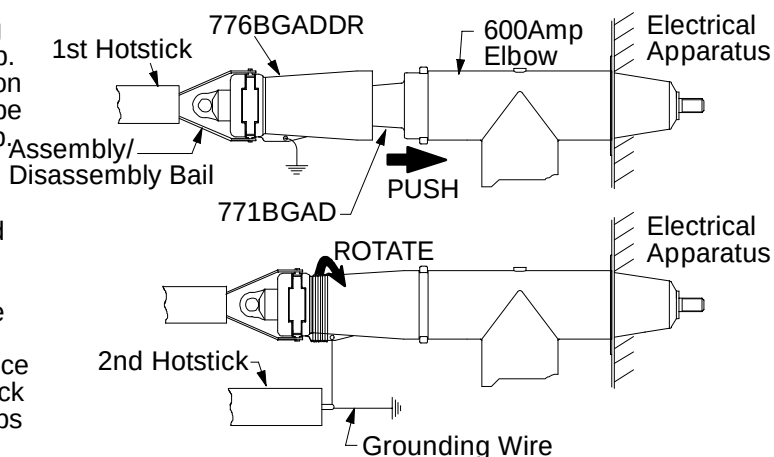


- B) Clean and lubricate the 776BGADDR insulating cap and the 771B20GAD interface with lubricant supplied.



- C) During installation of the insulated cap, the grounding wire will be wrapped around the body of the insulated cap. A second hotstick will be required to control the tension and position of the grounding wire. The wire should be wrapped loosely about the center of the insulated cap.

Attach the first hotstick tool to the insulated cap assembly/disassembly bail and push receptacle onto bushing interface as far as it will go. With the second hotstick, engage grounding wire and establish slight tension (see illustration). While pushing against the bushing interface with first "hotstick", rotate clockwise until the threads between bushing and insulated cap engage; continue turning without pushing until resistance is felt. The insulating cap is to be installed with a hot stick only with a maximum torque applied by hand of 15 ft/lbs (20.3 Nm). **DO NOT OVERTIGHTEN.** Remove 2nd hotstick.



STEP 3

Removing The Insulated Cap

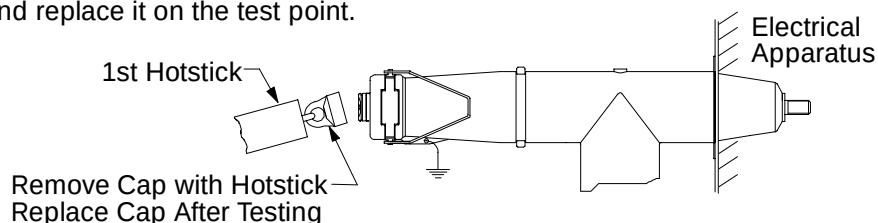
WARNING: DO NOT DISCONNECT WHILE ENERGIZED.

Conduct Voltage Test as described below to ensure system is de-energized.

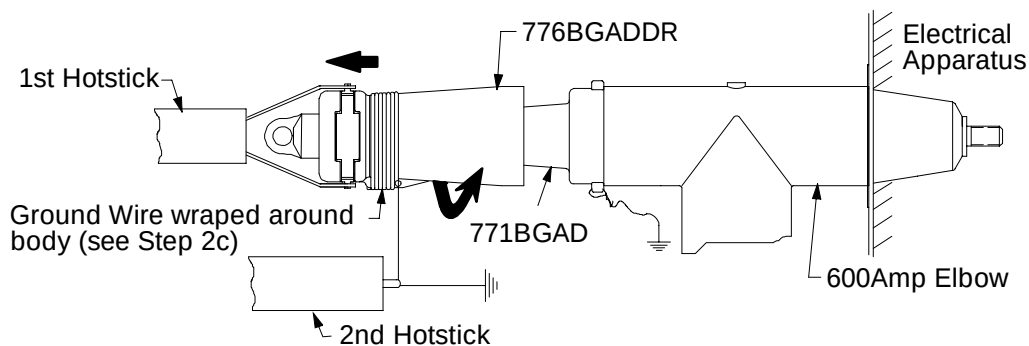
A) Voltage Test

The ELASTIMOLDR 776BGADDR insulated cap is equipped with an integral capacitance test point that can be used to establish whether or not the circuit is energized. When using the test point, complete the following steps:

1. Remove the voltage detection point cap with a hotstick. When removing cap, PEEL OFF AT AN ANGLE rather than pulling directly in line with the test point assembly.
2. **WARNING: THE VOLTAGE TEST POINT IS A CAPACITANCE DEVICE, IT IS NOT DIRECTLY CONNECTED TO THE CONDUCTOR.** Do not use conventional voltage measuring equipment. Follow the manufacturer's directions for the meter that is used. Test with a suitable sensing device, made for use with separable connectors manufactured with capacitive test points, to determine if cable is energized. Contamination, moisture, dirt, etc. around the test point or use of the wrong measuring equipment can provide a false "no voltage" indication on an energized elbow. To prevent serious or fatal injury, treat the elbow as energized until the "no voltage" test point indication is confirmed by other means.
3. After voltage detection has been made, clean and lubricate the inside surface of the cap with Elasmold^R approved silicone lubricant and replace it on the test point.

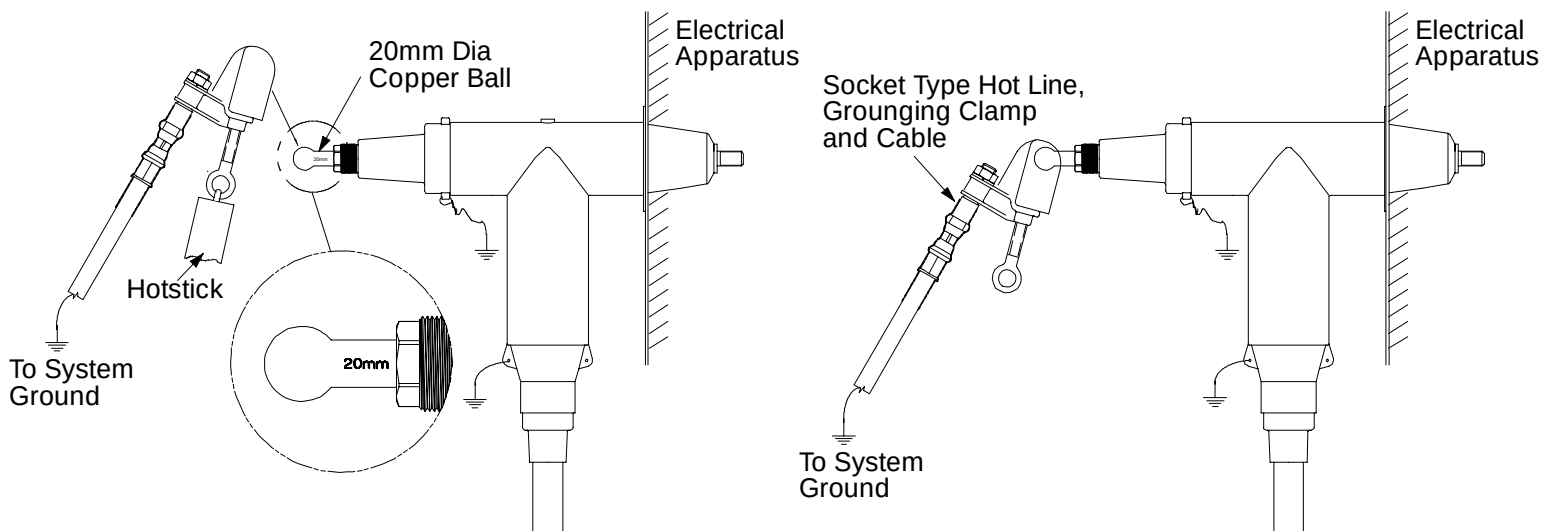


- B) After the circuit is known to be de-energized, securely fasten a hotstick to the assembly/disassembly bail. Without exerting any pulling force, rotate the receptacle **counter-clockwise** eight or nine turns. With a second hotstick tool, control the unwound ground wire so that the wire will not interfere with adjacent devices or entangle itself with the first hotstick tool. Then, exert pulling force to remove the insulated cap from the bushing interface.



STEP 4 (Install Ground Clamp)

The 771B20GAD has a 20mm copper ball extending out from the interface end so that a socket type hot line grounding clamp can be attached. **FOR THIS STEP FOLLOW YOUR UTILITY'S OPERATING PROCEDURE.**



STEP 5 (Remove Ground Clamp and Re-install Cap)

When Repairs have been completed, remove the hot line grounding clamp. Re-install the 776BGADDR following Step 2.

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