BELL SYSTEM PRACTICES
Outside Plant Construction and Maintenance

SECTION G73.115.1
Issue 1, September, 1952
AT&T Co Standard

PRESSURE TESTING
B BY-PASS VALVE

Contents **Page**

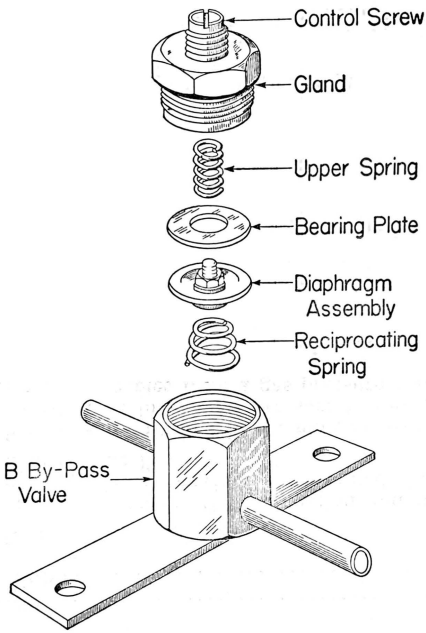
1. GENERAL

1.01 This section covers the installation and use of the B By-Pass Valve previously contained in Addendum G73.206 which is cancelled.

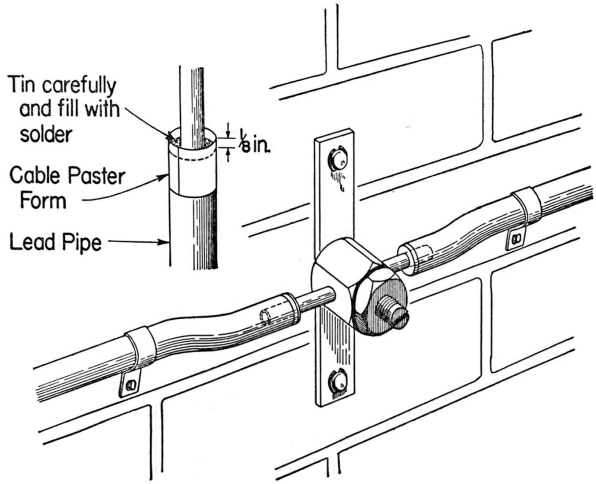
1.02 This valve is installed in a length of lead pipe joining two cables or bridging a pressure testing plug sectionalizing the cable or cables from a gas pressure standpoint.

2. DESCRIPTION

2.01 The component parts of the B By-Pass Valve are shown below in their correct order of assembly.



2.02 The by-pass valve is equipped with two 1/4-inch pipe tubes to which the lead pipe is soldered as shown in the following illustration. One tube is flush with the base of the valve and the other is slightly elevated. Normally, the lead pipes can be connected to either side of these tubes. However, if considerable difference in pressure is expected, such as where a valve by-passes a gas pressure plug at a submarine cable installation, the tube that is flush with the base should be connected toward the submarine cable. To ensure free flow of gas at by-passes, the assembly should be tested as outlined in the sections covering "Construction Tests."



2.03 Before soldering lead pipes to the B By-Pass Valve, the valve should be disassembled and the diaphragm removed to avoid damage by the heat during the soldering operation.

2.04 To take the valve apart, turn the gland counterclockwise until it disengages the thread in the body of the valve. When reassembling the valve, make sure that the parts are fitted together in the order shown in Paragraph 2.01.

2.05 To close the valve, the control screw is turned in a clockwise direction. The control screw should not be tightened excessively as this may injure the rubber seat of the diaphragm assembly.

2.06 As shown in the illustrations, the valve is equipped with a mounting plate having two 5/16-inch holes. It is attached to manhole walls by the use of 1/4-inch by 1-1/4-inch Hammer Drive Anchors and to poles by the use of 1-1/2-inch Strap Nails. When the valve is to be mounted on a cable sleeve or sheath, cut off the mounting plate at the valve base with a hacksaw.