

the Repair Guys

Backflow Prevention Security Equipment

In our line of work, we field questions from contractors and technicians concerning repairs, installations, and general backflow prevention practices. We'd like to share some questions that we receive as well as our answers. Everyone has different opinions on these subjects and we would like to hear yours. Contact us with questions and ideas via email at: imark@backflowparts.com or mail us at American Backflow Products Co., PO Box 37025, Tallahassee, Florida 32315.

— Mark Inman and Jason Gregg

Question:

I have a gate valve on an 8 inch Febco 825YD, with a substantial amount of water leaking around the stem. The leak started after I tested the device and opened the gate valve to re-establish water to the customer. Can I obtain a repair kit from Febco to repair this gate valve, or should I just replace the gate valve with a new one?

Mark:

I would always try to repair or adjust first and replace only as a last resort. But before you get into that, we need to determine what type of gate valve you have. Inlet and outlet shut off valves for backflow assemblies come in two basic styles. A Non-Rising Stem gate valve (NRS) or an Outside Stem and Yoke gate valve (OS&Y). An NRS gate valve uses a stem that is internally sealed which simply means that the stem stays in the same vertical position whether the gate valve is opened or closed.



NRS Gate Valve

An OS&Y gate valve is different in that the stem is external and will rise through the handwheel when the gate valve is opened. OS&Y gate valves are used primarily so that the position of the valve (ON/OFF) can be detected easily. Now that you have identified the type of gate valve, you will need to know the manufacturer of the gate valve.

Jason:

Although backflow assemblies are shipped from the manufacturer with gate valves attached, some technicians fail to realize that the manufacturer usually buys these from an outside source. So you will need to provide your supplier with the gate valve manufacturer's name (e.g. Clow, Kennedy, Mueller, and AVK etc.). Also any numbers that you find will be helpful. Most gate valves have model numbers and date codes that are important as well. The name, model number, date codes, and other important information is usually stamped or cast into the body of the gate valve itself.



OS&Y Gate Valve

Mark:

Like anything else, it is much easier to order repair parts for a gate valves with all the correct information. Now, if you have a leak from the stem on an OS&Y valve you can try tightening the packing gland. The packing glad is held into place by two hex head bolts. Simply tighten the bolts equally until the leak stops. If the leak does not stop, you will probably have to replace the packing inside the valve. If you are trying to make the decision to replace the valve entirely, one thing to consider is the age of the gate valve. If the gate valve is older and has problems closing tight, the gate valve may have a cast iron wedge that is worn or corroded. If this is the case and the budget allows, this may be the time to update the older gate valve to an approved resilient wedge gate valve, which is now the standard for gate valves on all backflow prevention assemblies.

Jason:

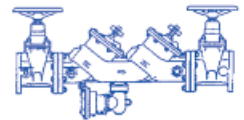
However if this is a relatively new gate valve, the repair parts should be easy to obtain and most likely inexpensive. Usually the leaks are caused by dry or rotten o-rings and/or packing. This is probably the result of the gate valve not being exercised enough. Be prepared to find a lot of leaking gate valves in this line of business because of the lack of exercising that the gate valve receives until we are there to test the assembly. Just remember that before ordering repair parts, to get all of the information you can off of the gate valve. This will insure that you get the correct parts. ▼



Grooved Gate Valves



American Backflow
Products Company



Mid-West
Instrument

WATTS
REGULATOR

SAFE-T-COVER

CLA-VAL

FLOMATIC

RAIN BIRD

**Your Complete Source For:
Backflow Preventer Repair Parts
Accessories • Enclosures
Test Gauge Calibration**

800-575-9618

www.backflowparts.com

AMES
FIRE & WATERWORKS

ZURN / WILKINS

Hersey
PRODUCTS

HOT BOX

CONBRACO
'Apollo' Valves

FEBCO