

Engineered Valves 1110 Bankhead Avenue Amory, MS 38821 Tel: (662) 256-7185

Fax: (662) 256-7932

Recommended Long Term Storage Procedure for Fabri-Valve® Products

I. Handwheel, Lever, or manual gear operated gate valve.

A. Objective

The following are Fabri-Valve's recommendations for storage procedures to retain maximum product integrity during long-term storage of 1 to 5 years.

B. Location

- 1. The preferred storage location is a clean, dry, protected warehouse.
- 2. If valves are to be stored outside, precautions should be taken to keep valves clean and dry.

C. Equipment Orientation

Valves may be stored in the vertical or horizontal position.

D. Storage Preparation

- 1. Valves may be stored as shipped, provided the above storage location and equipment orientation instructions are followed
- 2. If valve shipping condition must be altered for receiving inspection reattach flange covers and repackage valve.
- 3. Then follow the above Instructions for location and equipment orientation.

NOTE: O-ring valves should be stored with the gate slightly open (Gate off of seating wedges)

E. Storage Inspection

- 1. Visual inspection shall be performed on a semi-annual basis and results recorded.
- 2. Visual inspection as a minimum shall include checking the following: Packaging, Covers, Dryness, and Cleanliness.

F. Maintenance

Maintenance shall consist of correcting deficiencies noted during inspection. All maintenance activity shall be recorded.

II. Cylinder Operated Gate Valve

A. Objective

The following are Fabri-Valve's recommendations for storage procedures to retain maximum product integrity during long-term storage of 1 to 5 years.

B. Location

- 1. The preferred location is a clean, dry protected warehouse.
- 2. If valves are to be stored outside, precautions should be taken to keep valves clean and dry.

C. Equipment Orientation

- 1. The preferred orientation for optimum protection of cylinder is with the valve fully opened and with the cylinder in the vertical position.
- 2. An acceptable alternate for valves with cylinder diameters 6" or less is with the cylinder in the horizontal position.
- 3. If valves with cylinders larger than 6" in diameter must be stored with the cylinder in the horizontal position then the cylinder must be operated 6-12 times every 3-4 months.

NOTE: O-ring valves should be stored with the gate slightly open (Gate off of seating wedges)

D. Storage Preparation

- 1a. For storage of up to 3 years Squirt a good grade of hydraulic oil into cylinder ports and operate cylinder 6-12 times on a yearly basis
- 1b. For storage of 3-5 years Squirt a good grade of hydraulic oil into cylinder ports and operate cylinder 6-12 times. Extend cylinder rod, until valve is fully closed. Then coat cylinder gland and rod with heavy grease. Retract cylinder rod until valve is fully open, drawing good grade of hydraulic oil into rod end of cylinder.
- 2. Securely plug cylinder ports with pipe plugs, if cylinder is not piped.
- 3. Cover flange faces with flange covers. Plywood flange covers installed at factory are acceptable.
- 4. Then follow the above instructions on location and equipment orientation.

NOTE: O-ring valves should be stored with the gate slightly open. (Gate off of seating wedges)

E. Storage Inspection

- 1. Visual inspection shall be performed on a semi-annual basis and results recorded.
- 2. Visual inspection as a minimum, shall include checking the following: Packaging, Covers, Dryness and Cleanliness.

F. Maintenance

Maintenance shall consist of correcting deficiencies noted during inspection. All maintenance activity shall be recorded.

III. Electric Motor Operated Gate Valve - Normal Storage

A. Objective

The following are Fabri-Valves recommendations for storage procedures to retain maximum product integrity during long-term storage of 1 to 5 years.

B. Location

Valves to be stored in a clean, dry protected warehouse, free from excessive vibration and rapid temperature changes.

NOTE: The maximum source of equipment deterioration anticipated during long-term storage is from possible condensation within the actuator enclosure that may be produced by rapid temperature changes. The user should consider the addition of heat sources in the electrical enclosures during storage.

C. Equipment Orientation

- 1. The preferred storage position is with the valve stem and motor shaft in the horizontal position and the actuator limit switch compartment cover vertically up.
- 2. An acceptable alternate position is with the valve stem vertical, the motor shaft horizontal and the limit switch compartment cover either facing to the side or vertically up.
- 3. The assembly shall be stored off the floor on suitable skids and shall be covered with an unsealed dust cover with the bottom open and air holes in the side.

NOTE: O-ring valves should be stored with the gate slightly open (Gate off of seating wedges)

D. Storage Preparation, Inspection and Maintenance

- 1. For storage situations of 1 to 2 years maximum, spray electric contacts with CRC #2-26. (This preservative does not have to be removed prior to usage of the actuator.)
- 2. For storage situations between 2 and 5 years, spray electric contacts with CRC Lectra Shield spray coating. (This coating must be removed with a suitable cleaner, such as any standard petroleum solvent, prior to making electrical connections.)
- 3. Cover flange faces with flange covers. Plywood flange covers installed at factory are acceptable.

E. Storage Inspection

- I. Visual inspection shall be performed on a semi-annual basis and results recorded.
- 2. Visual inspection as a minimum, shall include checking the following: Packaging, Plugs, Covers, Dryness, Cleanliness, and Function of heat sources (when used).

F. Maintenance

Maintenance shall consist of correcting deficiencies noted during inspection. All maintenance activity shall be recorded.

IV. Storage of Rubber Products

While the various rubbers possess differing degrees of resistance to the deteriorating influences which may be present during storage, the same general recommendations apply to all. Vulcanized rubber products should be stored in a cool, dry, dark place away from steam pipes, sunlight, etc. The Pro duct should be supported so that no portion of it is under undue stress from loading or bending. For example, replacement seals should not be hung over a hook or allowed to kink, but should be stored in a flat position. Seals in assembled valves and actuators should be positioned to minimize compression on the seals. For example valves stored in vertical position with the gate or disc open will minimize the chance for compression on the seals.