



ATEX- MANUAL Ball valve

Instruction for Assembling, Operation and Maintenance of Ball-Valves acc. Richtlinie 94/9/EG

1 General

This is an additional Manual to the “Instruction for installation, operation and maintenance for “ball valves”.

If the directions and regulations mentioned in this Manual are not receiving attention risk or damage can arise which can occur to an ineffective guarantee of the manufacturer.

For questions pls contact the manufacturer any time.

Ball valve material is investment casting (Stainless steel, carbon steel and Hastelloy) and forged material (stainless steel and carbon steel).

The ball valves are hand operated valves using a hand lever.

The valves can be provided with stem extension (type 1621, 1621D, 1691) or heating jacket can be provided for some type of valves.

2 Intended use

Hand operated ball valves assembled into pipe work are exclusively designed to shut off or lead trough flow of medium in the tolerance of the allowed pressure- and temperature range.

Surface temperature of the valve is corresponding directly to the temperature of the medium inside the valve and never is higher because of missing self heating.

Material of body seal, packing and seats pls see prospectus.

3 Installation and assembling

For assembling and installation of the valve you have to follow the Manual “Instruction for installation, operation and maintenance” of the relevant valve type.

Further more it is necessary to connect the valve into the potential equalization of the pipe work!

For 3- piece ball valves the potential equalization is done by welding ends or screwing ends into pipe work.

For flanged ball valves the potential equalization is done by screwing flange to flange into pipe work.

Responsible for correct function of the potential equalization is part of the user.

If threaded ends for example are tightened with sealing tape potential equalization has to be made by an electrically conducting connection.

4 Replacement of seats and seals

For replacement of seats and seals you have to follow the Manual “Instruction for installation, operation and maintenance” of the relevant valve type.

(Attention to the right sequence of the replacement procedure)

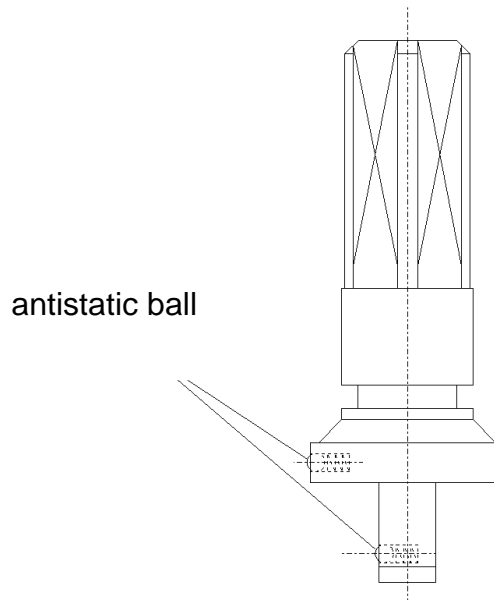
Further more pay attention to not damage function of ball of anti static device when mounting or demounting stem.

Part of the user's responsibility is to provide correct function of anti static device and the function has to be checked!

Both balls of the antistatic device have to be visually identified and has to work properly.

Spring behind the anti static ball has to work properly. Function must be warranted.

If malfunction occur stem has to be replaced.



5 Assembling

For assembling of the valve you have to follow the Manual “Instruction for installation, operation and maintenance” of the relevant valve type.

It is part of user’s responsibility to guarantee proper function of antistatic device between ball and stem and stem and body.

After assembling is done user has to check proper function of potential equalization of each single valve using right instrument for measurement.

Check function on following locations.

1. Between body and stem

Pay attention that neither stop pin nor locking lug on lever are in contact to body.

Turn ball in half open position, pull up locking lug.

2. Between ball and stem

To check function of potential equalization. Valve has to be in same position as No. 1.



6 Ex classification

There is no constriction concerning application in explosive environment.
There is no internal ignition source in ball valves nor stem extension.
Except PVC- Sleeve which can contain electric load.
See Details No. 7.

7 Details

Allowed application of Procol ball valves as follows.
(Classification according data sheet)

With PVC sleeve on handle

Gas, haze, fumes applicable without restrictions for zones 0 / 1 / 2 and group of gas IIA / IIB.
Explosive dust for zones 20 / 21 / 22. Ignition energy of atmosphere must be higher as 3mJ.
Ignition temperature of atmosphere must be higher as maximal temperature on surface restricted by medium.

Without PVC sleeve on handle

Gas, haze, fumes applicable without restrictions for zones 0 / 1 / 2 and group of gas IIA / IIB / IIC.
Explosive dust for zones 20 / 21 / 22 without restrictions of ignition energy.
Ignition temperature of atmosphere must be higher as maximal temperature on surface restricted by medium.

Allowable ambient temperature -20°C to +60°C.

8 Special conditions

None.

9 Marking on valves

The Valves are not especially marked.

Fehraltorf February 4th 2013, R. Zingg