

LTG3 Cage Control Valves

Globe straight-way **LTG3** series is a very versatile control valve for the main applications. Its high performance derives by using a balanced and cage-guided plug. LTG3 is particularly suitable for heavy duties and for any other application under most demanding service conditions. Due to their simple construction, to the large range of trim types and available materials, these valves are suitable for a wide range of applications, including also high temperature and corrosive fluids, severe low-noise requirements and sour service in accordance with NACE standard.

- Main advantages:**
- **High pressure drop** capability with no practical limitations
 - **Improved plug stability** due to large guiding areas
 - **Wide-range capability** is allowed by a great number of reduced capacity trims
 - **Excellent noise attenuation** with low-noise single-stage trim for gas and steam service
 - **Improved cavitation protection** on liquid services
 - **Multistage trims** also available for cavitation control.
 - **Balanced plug construction** reduces thrust and actuator sizes
 - **Piloted plug construction** for tight shut-off up to class V in high temperature services



LTG3 20" ANSI 900

LTA design

LTG3 are also available with **angle body**. In this case they are designated as **LTA3 Control Valves**. LTA series are special engineered designs. The advantages provided by LTA design are the same of LTA1 series.

Technical characteristics:

- Body:**
- **Sizes:** 2", 3", 4", 6", 8", 10", 12", 14", 16", 18", 20"
 - **Ratings:** up to ANSI 150, 300, 600, 900, 1500, 2500 and equivalent PN
 - **Flanged, butt-welded, socket-welded and threaded**
 - Cast standard construction; wrought or bar for 2" and 3" sizes
 - Face-to-face dimensions as per IEC 60534-3-2 - long series
 - materials: carbon, Cr-Mo and AISI 316 stainless steel
 - **Flow direction:** – *to open* - general feature
– *to close* - for piloted plugs and some flashing services
 - **Materials:** Carbon, Cr-Mo and Stainless Steels
- Bonnet:**
- **Standard or extended** type either for high or low temperature applications
 - Bolted to body
 - Same materials as body
- Trim:**
- **Balanced and fully cage-guided** plug
 - **Unbalanced design** for small ports or low pressure drop applications
 - **Piloted design** for tight shut-off associated to high fluid temperature
 - **Plug seal rings:** PTFE, metal or metal and graphite
- Cage:**
- **Low-noise** drilled cage single stage **LN** and special **ELN** type with additional acoustical benefit of 4 dB.
 - **MPS multistage trim** special design for high pressure drops
 - Multi-cage construction up to 6 stages. 7 stages and over are obtained from a solid disk stack
 - **Linear and equal% characteristics** for standard trim design



LTG3 balanced plug

Seat Ring:

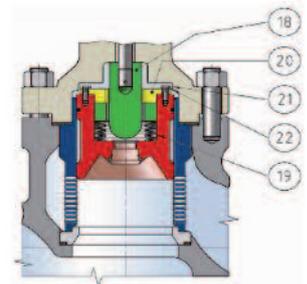
- Quick-change and free-expanding type, precisely coupled to the cage to ensure a perfect plug alignment

Leakage Class:

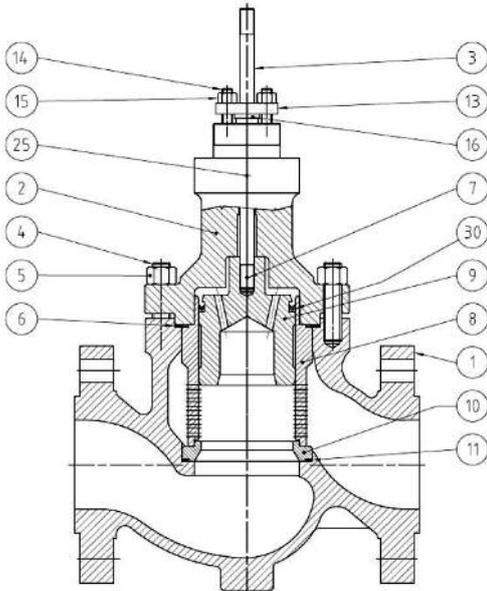
- Classes III, IV, IV S1 and V according to IEC 60534-4
Class VI is also available with soft-seat

Actuators:

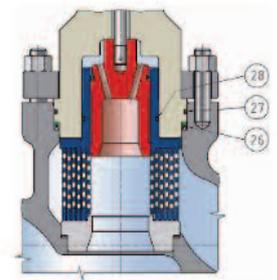
- Pneumatic diaphragm or Piston type
- Electric and Electro-Hydraulic actuators



Single stage
Low noise cage



Item	Part name
1	BODY
2	BONNET
3	STEM
4	STUD
5	NUT
6	BODY GASKET
7	PIN
8	CAGE
9	PLUG
10	SEAT RING
11	SEAT GASKET
13	PACKING FLANGE
14	PACKING STUD
15	PACKING NUT
16	PACKING FOLLOWER
18	PILOT
19	SPRING
20	FLANGE
21	SCREW
22	WASHER
25	PACKING
26	SEAL RING
27	O-RING
28	O-RING
30	SEAL RING



MPS trim
balanced plug



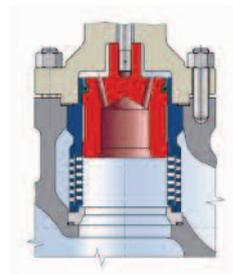
LTG3 plug with soft insert



Linear characterized LTG3 cages



MPS multistage trim



Double stage
balanced plug



Low noise cage construction



LTG3 - cage assembling



LTG3 - control valve under cryogenic test