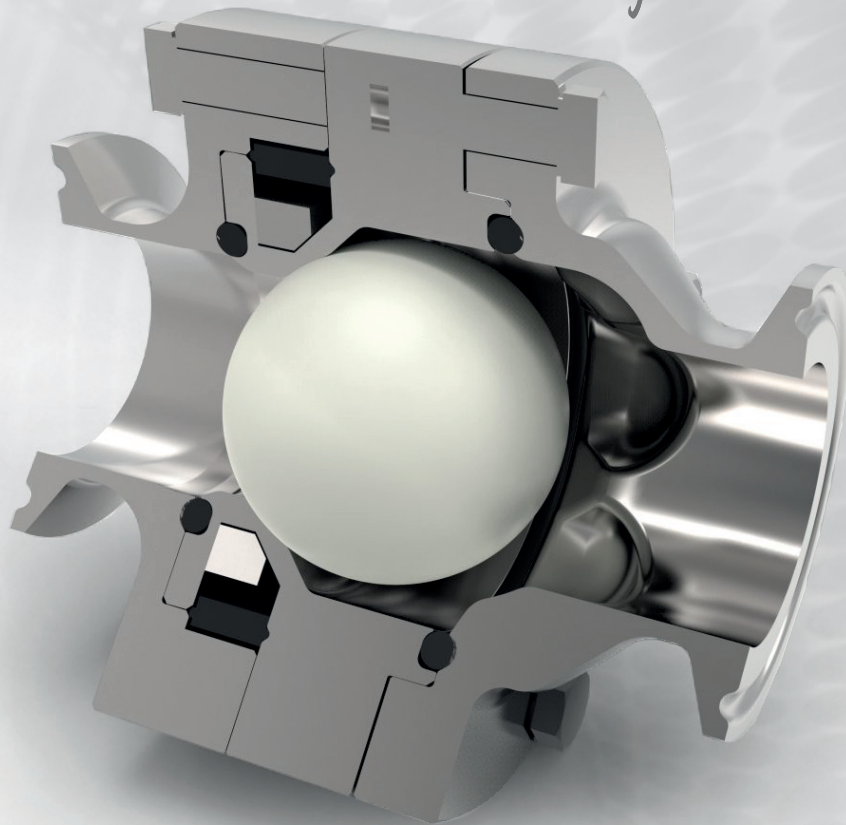


Fully hygienic design, materials and surfaces. Maintenance free

YGROS[®]
VALVES
Let it flow

PHARMABALL

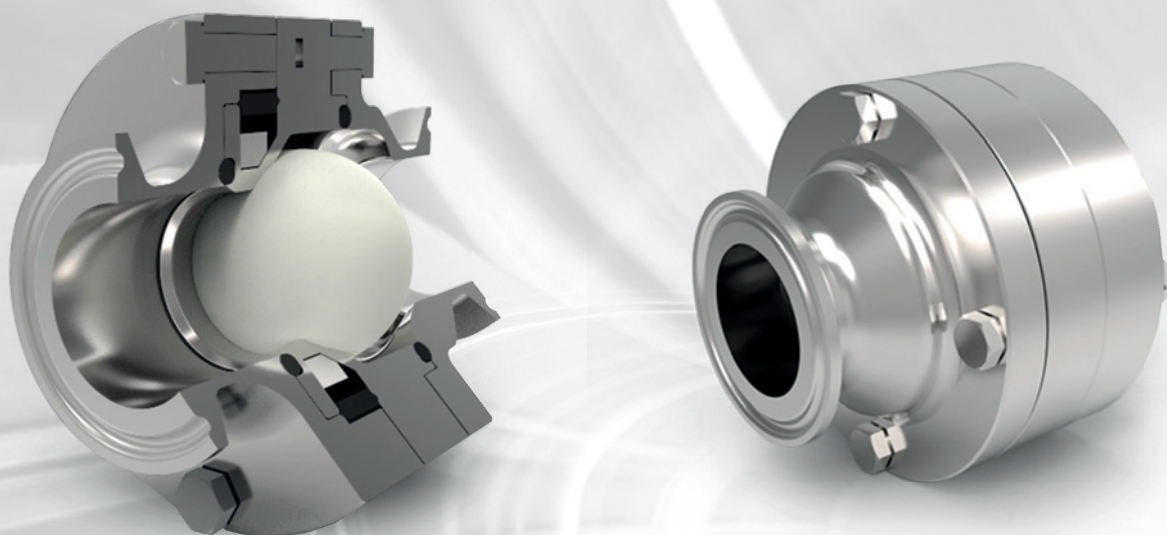


YGROS **patented technology** sets new standards in the world of plant design, thanks to a patented magnetic principle replacing the conventional spring in Non Return Valves. Suitable for horizontal, vertical up and down installation (even in vertical pipes with flow down). For fluids and steam. Up to +150°C . Finally a really clean solution for your pharma applications!

BENEFITS AT A GLANCE

- _ **Maximum hygiene:** Only the shuttle comes into contact with the product. There are no springs, discs or other components, which means no contamination and no stagnation point. Top quality surface finishings and materials (PVDF and 1.4435 with <1% Ferrite)
- _ **Safe closing:** Provided by integral magnets
- _ **Any installation position possible:** Unlike other springless check valves, an YGROS Valve can be installed in the horizontal, vertical up and down positions
- _ **Energy saving:** The innovative working principle and design allow for a smooth flow, minimising pressure drop
- _ **Laminar flow:** No turbulence
- _ **Maintenance free**
- _ **Extra high chemical resistance and longer valve life:** Through solid construction materials

Product contact materials	Body & Flanges: Stainless steel 1.4435 (AISI 316LM), max. <1% ferrite Ball: PVDF
Non product contact materials	Magnet: Neodymium
Seals material options	EPDM, NBR, HNBR, VMQ (Silicone), FKM (Viton), FEP, PTFE
Surface finishes	Internal: Ra $\mu\text{m} \leq 0.4$ electropolished External: Ra $\mu\text{m} \leq 1.2$ electropolished Passivation or request (optional)
End connection options	WELDING DIN 11850 (DIN 11866 Reihe A) WELDING DIN 11850 (DIN11866 Reihe C) TRI-CLAMP ASME-BPE
Temperature range	-40°C/+150°C
Operating pressure	PN16 (standard). Further operating pressures on request
Media	Fluids
Certifications (on request)	Materials: (EN10204-3.1)/seals and PVDF Ball (FDA – USP VI) Surface roughness EC 1935/2004

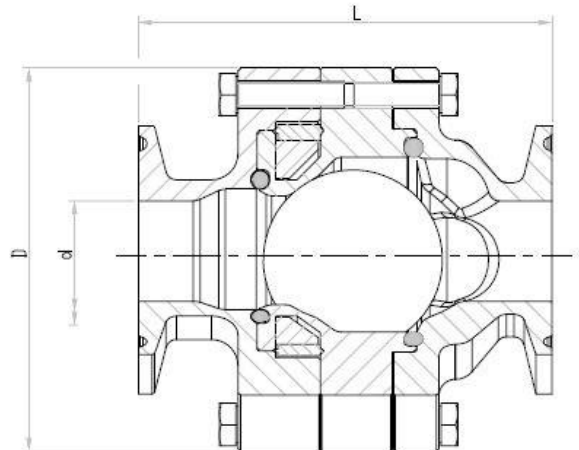
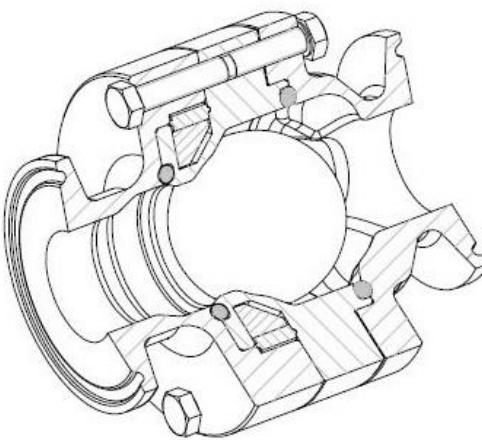


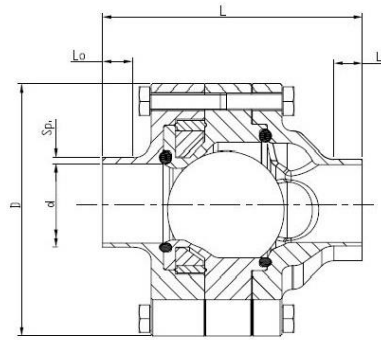
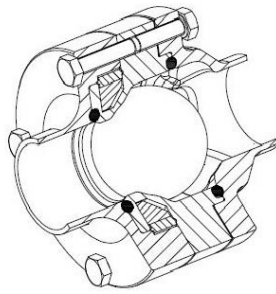
YGROS[®]

VALVES

Let it flow

PHARMABALL TECHNICAL DATA



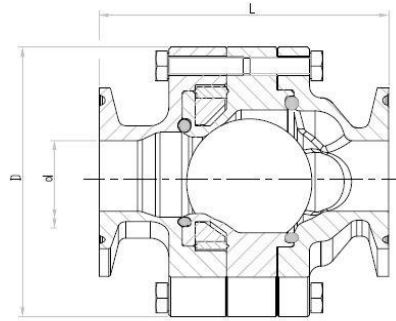
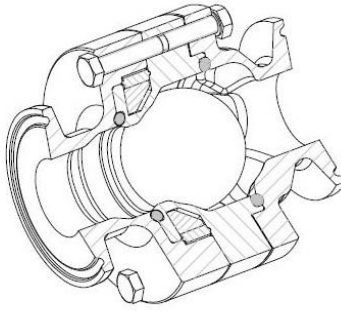


DIN 11850 (DIN 11866 Reihe A) > R

Dimension	L (mm)	D (mm)	d (mm)	Sp (mm)	Lo (mm)	Weight (kg)
DN15	59	54	19	1,5	6	0,6
DN20	72	72	23	1,5	5	0,8
DN25	75,3	72	29	1,5	5	1
DN32	97,8	90	35	1,5	5	1,8
DN40	88	90	41	1,5	10	1,8
DN50	109,5	104	53	1,5	10	2,7
DN65	127,4	130	70	2	10	5,3
DN80	153	153	85	2	8	9
DN100	154,25	174	105	2,5	10	12

ASME BPE (DIN 11866 Reihe C) > T

Dimension	L (mm)	D (mm)	d (mm)	Sp (mm)	Lo (mm)	Weight (kg)
¾"	59	54	19,05	1,65	6	0,6
1"	72	72	25,4	1,65	9	1,3
1-1/2"	88	90	38,1	1,65	10	1,8
2"	98	104	50,8	1,65	10	2,7
2-1/2"	115	130	63,5	1,65	5	5,2
3"	140	153	76,2	1,65	8	9
4"	150	173	101,6	2,11	9	11,7



ASME BPE > C

Dimension	L (mm)	D (mm)	d (mm)	Weight (kg)
¾"	64,25	54	15,7	0,6
1"	77,8	72	22,1	1,2
1-1/2"	100,5	90	34,8	1,8
2"	112,5	104	47,5	3
2-1/2"	131,4	130	60,2	5,2
3"	146	153	72,9	9,5
4"	156,75	174	97,4	12,2

