

Parts and materials FieldQ valve actuator

Description	Qty.	Description	Specification	Note
Body	1	Aluminum Alloy	GAISi10Mg, DIN 1725/2	1/5
Pinion	1	Aluminum Alloy	AlZnMgCu1.5, DIN 1725/1	2
Upper pinion part	1	Aluminum Alloy	AlZnMgCu1.5, DIN 1725/1	2
Guide band housing	2	Nylatron	PA6.6 + MoS2	-
Washer pinion	2	CRMZX100	-	-
Bearing ring	2	Delrin	POM	-
Limitstop cam	1	Steel	42CrMo4V	-
Piston	2	Aluminum Alloy	GAISi 7Mg, DIN 1725/2	6
End cap QS	2	Aluminum Alloy	GAISi10Mg, DIN 1725/2	1
End cap QD	2	Aluminum Alloy	GAISi10Mg, DIN 1725/2	1
Guide band piston	2	PTFE, Carbon filled	PTFE + 25% C	-
O-ring piston	2	Nitrile Rubber	NBR	-
O-ring end cap	2	Nitrile Rubber	NBR	-
O-ring upper pinion part	1	Nitrile Rubber	NBR	-
O-ring pinion top	1	Nitrile Rubber	NBR	-
O-ring pinion bottom	1	Nitrile Rubber	NBR	-
O-ring B-port	2	Nitrile Rubber	NBR	-
O-ring retainer bolt	4	Nitrile Rubber	NBR	-
O-ring limit stop bolt	2	Nitrile Rubber	NBR	-
Outer spring	2	Carbon Spring Steel	Class C, DIN17223	3
Middle spring	2	Carbon Spring Steel	Class C, DIN17223	3
Inner spring	2	Carbon Spring Steel	Class C, DIN17223	3
Spring retainer	2	Steel	RSt 14-03, DIN 1623	4
Washer springpack	2	Steel	C35	4
Springpack retainer bolt	2	Stainless Steel	AISI 304 (DIN W nr 1.4301)	-
Washer	4	Nylon	PA6	-
Nut	4	Stainless Steel	AISI 304 (DIN W nr 1.4301)	-
Nut cover	2	Polyethylene	PE	-
End cap screws	8	Stainless Steel	AISI 304 (DIN W nr 1.4301)	-
Retaining ring pinion large	1	Carbon Spring Steel	C45, DIN 17200	3
Retaining ring pinion small	1	Carbon Spring Steel	C45, DIN 17200	3
Limit stop screw	1	Stainless Steel	AISI 304 (DIN W nr 1.4301)	-
Indicator cap	1	Nylon	PA6	-
Indicator arrow	1	Nylon	PA6	-
Indicator insert	1	Nylon	PA6	-
Type plate	1	Stainless Steel	AISI 303 (DIN W nr 1.4305)	-
Hammer drive	1	Stainless Steel	AISI 303 (DIN W nr 1.4305)	-
Insert	1	Aluminum Alloy	AlMgSi1	5

Notes

- 1 See paint system bellow
- 2 Hard anodized.
- 3 Deltatone Coating.
- 4 Zinc plated and passivated.
- 5 Anodized.
- 6 Chromitized

Paint System

The paint system has passed a 500 hour salt spray test as detailed by ASTM B117. This paint system consist of the following steps:

- 1 Sandblasting The parts are sand blasted before machining
- 2 Degreasing By washing with an alkaline solution (1-5% Eskaphor EM130-2, pH 8.8) at 80°C/176°F.
- 3 Primer Coat One coat (Fortis Poluran Fortissimo) of a two component chemical resistant epoxy/isocyanat coating, ±40µm thick.
- 4 Finish Coat One coat (Fortis Poluran Urevite) of a two component polyurethane coating, ±40µm thick.

Function Module

Material housing : Aluminum alloy
 Finish : Epoxy primer and two component polyurethane top coating

Pneumatic Control Module

Material:
 - Body : Aluminum
 - Valve housing : 30% glass-filled Nylon
 - Valve seats : NBR
 - Membrane : Reinforced NBR
 - Finish : Epoxy primer and two component polyurethane top coating