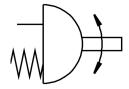
Quarter turn actuator DFPD-80-RP-90-RS45-F07-R3-C-VDE2

Part number: 8102816







Data sheet

Value
80
F07
90 deg
-5 deg5 deg
-5 deg5 deg
19 mm
ISO 5211
Any
Single-acting Single-acting
Gear rack/pinion
Clockwise closing
VDI/VDE 3845 (NAMUR)
VDI/VDE 3845 size AA 1
Safety device
The safety function consists of the drive switching to the defined safety switching position when the compressed air is switched off and the spring chamber is exhausted. This switching movement is achieved by the spring force of the spring assembly.
Up to SIL 2 low demand mode up to SIL 3 in a redundant architecture up to SIL 1 high demand mode
Product can be used in safety-related parts of control systems up to SIL 2, low demand Product can be used in safety-related parts of control systems up to SIL 1, high demand up to SIL 3 in a redundant architecture
0.2 MPa0.8 MPa 2 bar8 bar 29 psi116 psi
0.45 MPa 4.5 bar 65.25 psi
See certificate
as per EU explosion protection directive (ATEX)

Feature	Value
UKCA marking (see declaration of conformity)	acc. to UK EX instructions
Explosion protection certification outside the EU	EPL Db (GB) EPL Gb (GB)
Explosion prevention and protection	Zone 1 (ATEX) Zone 1 (UKEX) Zone 2 (ATEX) Zone 21 (ATEX) Zone 21 (UKEX) Zone 22 (ATEX)
Certificate issuing authority	DNV TAP00001CE German Technical Control Board (TÜV) Rheinland 968/V 1106.01/2023
ATEX category gas	II 2G
ATEX category for dust	II 2D
Type of ignition protection for gas	Ex h IIC T4 Gb X
Type of (ignition) protection for dust	Ex h IIIC T105°C Db X
Explosive ambient temperature	-20°C <= Ta <= +80°C
Operating medium	Compressed air as per ISO 8573-1:2010 [7:4:4]
Information on operating and pilot media	Dew point min. 10 °C below the ambient temperature and temperature of medium Operation with oil lubrication possible (required for further use)
Corrosion resistance class (CRC)	1 - Low corrosion stress
LABS (PWIS) conformity	VDMA24364-B1/B2-L
Storage temperature	-20 °C60 °C
Ambient temperature	-20 °C80 °C
Torque at nominal operating pressure and 0° swivel angle	45.2 Nm
Torque at nominal operating pressure and 90° swivel angle	23.6 Nm
Note about the torque	The actuator's operating torque must not be higher than the maximum permissible torque listed in ISO 5211, based on the size of the mounting flange and the coupling.
Spring return torque at 0° swivel angle	22.2 Nm
Spring return torque with 90° swivel angle	43.8 Nm
MTTFd	1126 years
PFH	0.00000101
PFD	0.00078
Air consumption at 6 bar per cycle 0°-nominal swivel angle-0°	3.1 l
Product weight	3856 g
Shaft connection	T17
Pneumatic connection	G1/8
Note on materials	RoHS-compliant
Material of sub-base	Wrought aluminum alloy, anodized
Cover material	Die-cast aluminum, coated
Seals material	NBR
Material of spring	Spring steel
Housing material	Wrought aluminum alloy, anodized
Material of piston	Die-cast aluminum
Material of bearing	POM
Cam material	High-alloy stainless steel
Material of screws	High-alloy stainless steel
Shaft material	High-alloy stainless steel