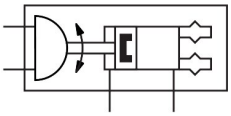
Swivel/gripper unit
HGDS-PP-20-YSRT-A-B

Part number: 1187963



Data sheet

Feature	Value
Size	20
Rotation angle adjustment range	0 deg...210 deg
Stroke per gripper jaws	7 mm
Max. angular gripper jaw backlash ax, ay	0.1 deg
Max. gripper jaw backlash Sz	0.02 mm
Swivel angle	210 deg
Repetition accuracy, gripper	0.015 mm
Repetition accuracy of swivel angle	0.02 deg
Number of gripper jaws	2
Cushioning of swivel drive	Shock absorber at both ends
Cushioning	Shock absorber at both ends, self-adjusting, with metal fixed stop
Cushioning adjustment range	1.4 mm
Mounting position	Any
Fine adjustment of swivel drive	-2.5 deg
Mode of operation	Double-acting
Gripper function	Parallel
Design	Quarter turn actuator With parallel gripper and gripper drive
Position detection, gripper	with proximity switch
Position detection, swivel drive	with proximity switch
Operating pressure	3 bar...8 bar
Max. operating frequency of gripper	4 Hz
Max. swivel frequency at 0.6 MPa (6 bar, 87 psi)	1.5 Hz
Min. opening time at 0.6 MPa (6 bar, 87 psi)	60 ms
Min. closing time at 0.6 MPa (6 bar, 87 psi)	70 ms
Operating medium	Compressed air to ISO 8573-1:2010 [7:4:4]
Note on operating and pilot medium	Lubricated operation possible (in which case lubricated operation will always be required)
Corrosion resistance class CRC	2 - Moderate corrosion stress
LABS (PWIS) conformity	VDMA24364-B2-L
Ambient temperature	5 °C...60 °C
Gripper force per gripper jaw, opening, 0.6 MPa (6 bar, 87 psi)	96 N

Feature	Value
Total gripping force, opening, 0.6MPa (6bar, 87 psi)	192 N
Gripper force per gripper jaw, closing, 0.6 MPa (6 bar, 87 psi)	84 N
Total gripping force, closing, 0.6MPa (6bar, 87 psi)	168 N
Max. force on gripper jaw Fz static	250 N
Max. torque at gripper Mx static	22 Nm
Max. torque at gripper My static	22 Nm
Max. torque at gripper Mz static	22 Nm
Theoretical torque at 0.6 MPa (6 bar, 87 psi)	2.5 Nm
Product weight	1260 g
Max. mass per external gripper finger	100 g
Max. mass per external gripper finger, throttled	250 g
Type of mounting	Either: Via female thread and centring sleeve Via through-hole and centring sleeve Via dovetail slot
Pneumatic connection	M5
Note on materials	RoHS compliant
Material drive shaft	Steel
Material cover	Aluminium POM
Material seals	NBR
Material housing	Wrought aluminium alloy
Material gripper jaws	High-alloy stainless steel