electric cylinder ESBF-BS-80-300-15P Part number: 574109

FESTO

With ball screw, electrically actuated spindle that converts the rotary motion of the motor into linear motion of the piston rod.





Data sheet

Feature	Value	
Size	80	
Stroke	300 mm	
Piston rod thread	M20x1,5	
Reversing backlash	30 μm	
Spindle diameter	32 mm	
Spindle pitch	15 mm/U	
Max. angular deflection of piston rod +/-	0.5 deg	
Based on the standard	ISO 15552	
Assembly position	Any	
Piston-rod end	Male thread	
Motor type	Servomotor	
Position detection	For proximity sensor	
Design structure	Electro-cylinder with ball screw	
Spindle type	Ball screw spindle	
Protection against torque/guide	with plain-bearing guide	
Max. acceleration	15 m/s2	
Max. speed	0.7 m/s	
Repetition accuracy	±0,01 mm	
Duty cycle	100 %	
Corrosion resistance classification CRC	2 - Moderate corrosion stress	
Storage temperature	-20 60 °C	
Food-safe	See Supplementary material information	
Relative air humidity	0 - 95 %	
Protection class	IP40	
Ambient temperature	0 60 °C	
Max. drive torque	33.7 Nm	
Max. radial force at drive shaft	1,100 N	
Max. feed force Fx	12,000 N	
No-load driving torque	0.6 Nm	
Reference value for working load, horizontal	1,200 kg	
Reference value for working load, vertical	1,200 kg	
Mass moment of inertia JH per metre of stroke	7.8147 kgcm2	
Mass moment of inertia JL per kg of working load	0.05699 kgcm2	
Mass moment of inertia, JO	1.6478 kgcm2	
Moving mass with 0 mm stroke	5,300 g	
Additional weight per 10 mm stroke	155 g	
Basic weight for 0 mm stroke	7,393 g	
Additional mass factor per 10 mm of stroke	103 g	
Mounting type	with internal (female) thread	
	or accessories	
Interface code, actuator	D80	
Materials note	Contains PWIS substances	
	Conforms to RoHS	



Feature	Value
Material cover	Aluminium casting
	coated
Material piston rod	High alloy steel, non-corrosive
Material screws	Steel
	Galvanised
Material spindle nut	Roller bearing steel
Material spindle	Roller bearing steel
Material cylinder barrel	Wrought Aluminium alloy
	Smooth anodised