

# electric cylinder

## EPCC-BS-45-100-3P-A

Part number: 5428861

★ Core product range

FESTO



### Data sheet

Feature	Value
Size	45
Stroke	100 mm
Stroke reserve	0 mm
Piston rod thread	M10x1,25
Reversing backlash	100 µm
Spindle diameter	10 mm
Spindle pitch	3 mm/U
Max. angular deflection of piston rod +/-	1 deg
Assembly position	Any
Piston-rod end	Male thread
Motor type	Stepper motor Servomotor
Position detection	For proximity sensor
Design structure	Electric cylinder With ball screw
Spindle type	Ball screw
Protection against torque/guide	with plain-bearing guide
Max. acceleration	5 m/s <sup>2</sup>
Max. speed	0.18 m/s
Repetition accuracy	±0,02 mm
Duty cycle	100 %
Corrosion resistance classification CRC	0 - No corrosion stress
PWIS conformity	VDMA24364 zone III
RSBP classification to CD-0033	F1a
Cleanroom class	ISO class 9
Storage temperature	-20 ... 60 °C
Relative air humidity	0 - 95 % non-condensing
Protection class	IP40
Ambient temperature	0 ... 60 °C
Impact energy in end positions	0.012 J
Max. torque Mx	0 Nm
Max. torque My	2.9 Nm
Max. torque Mz	2.9 Nm
Max. radial force at drive shaft	180 N
Max. feed force Fx	450 N
Reference value for working load, horizontal	60 kg
Reference value for working load, vertical	30 kg
Mass moment of inertia JH per metre of stroke	0.0503 kgcm <sup>2</sup>
Mass moment of inertia JL per kg of working load	0.0023 kgcm <sup>2</sup>
Mass moment of inertia, JO	0.0109 kgcm <sup>2</sup>
Moving mass with 0 mm stroke	179 g
Additional mass factor per 10 mm of stroke	4.9 g
Basic weight for 0 mm stroke	555 g
Additional weight per 10 mm stroke	41 g
Mounting type	with internal (female) thread

Feature	Value
	with accessories
Materials note	Conforms to RoHS
Material housing	Wrought Aluminium alloy Smooth anodised
Material piston rod	High alloy steel, non-corrosive
Material spindle nut	Steel
Material spindle	Roller bearing steel