## **Guide axis ELFC-KF-80-500** Part number: 8062828

**FESTO** 





## **Data sheet**

Feature	Value
Working stroke	500 mm
Size	80
Mounting position	optional
Guide	Recirculating ball bearing guide
Design	Guidance
Position detection	Via proximity switch Via inductive sensors
Max. acceleration	15 m/s²
Max. speed	1.5 m/s
Duty cycle	100%
Corrosion resistance class CRC	0 - No corrosion stress
LABS (PWIS) conformity	VDMA24364 zone III
Suitability for the production of Li-ion batteries	Product corresponds to the internal product definition from Festo for use in battery production:Metals with more than 1% by mass of copper, zinc or nickel are excluded from use.The exceptions are nickel in steel, chemically nickel-plated surfaces, printed circuit boards, cables, electrical plug connectors and coils
Cleanroom class	Class 7 according to ISO 14644-1
Degree of protection	IP40
Ambient temperature	0 °C50 °C
2nd moment of area ly	1370000 mm <sup>4</sup>
2nd moment of area Iz	1660000 mm <sup>4</sup>
Max. force Fy	5543 N
Max. force Fz	5543 N
Max. moment Mx	59.8 Nm
Max. moment My	56.2 Nm
Max. moment Mz	56.2 Nm
Max. force Fy total axis	900 N
Max. force Fz total axis	2700 N
Max. moment Mx total axis	59.8 Nm
Max. moment My total axis	56.2 Nm
Max. moment Mz total axis	56.2 Nm
Torsional mass moment of inertia It	90500 mm⁴

Feature	Value
Displacement force	15 N
Reference service life	5000 km
Maintenance interval	Life-time lubrication
Fy at theoretical life value of 100 km (only guide consideration)	20400 N
Fz at theoretical life value of 100 km (only guide consideration)	20400 N
Mx at theoretical life value of 100 km (only guide consideration)	220 Nm
My at theoretical life value of 100 km (only guide consideration)	207 Nm
Mz at theoretical life value of 100 km (only guide consideration)	207 Nm
Moving mass	815 g
Basic weight for 0 mm stroke	1905 g
Additional weight per 10 mm stroke	73 g
Dynamic deflection (moving load)	0.05% of the axis length, max. 0.5 mm
Static deflection (load in standstill)	0.1% of the axis length
Material end cap	Painted die cast aluminium
Material profile	Anodised wrought aluminium alloy
Note on materials	RoHS-compliant
Material cover tape	High-alloy stainless steel
Material guide slide	Steel
Material guide rail	Steel
Material slide	Die-cast aluminium