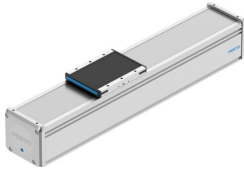


Guide axis ELFD-KF-120- -

Part number: 8182489

FESTO



Data sheet

Feature	Value
Working stroke	50 mm...5000 mm
Size	120
Stroke reserve	5.5 mm
Mounting position	Any
Guide	Recirculating ball bearing
Structural design	Guide
Max. acceleration	50 m/s ²
Max. speed	3 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	Suitable for battery production with reduced Cu/Zn/Ni values (F1a)
Cleanroom suitability, measured according to ISO 14644-14	Class 4 according to ISO 14644-1 (with vacuum insert) Class 6 according to ISO 14644-1
Storage temperature	-20 °C...60 °C
Degree of protection	IP40
Ambient temperature	0 °C...60 °C
Impact energy in the end positions	0.001 J
2nd moment of area Iy	3550000 mm ⁴
2nd moment of area Iz	8985000 mm ⁴
Max. force Fy	4300 N...8400 N
Max. force Fz	4300 N...8400 N
Max. torque Mx	170 Nm...350 Nm
Max. torque My	50 Nm...620 Nm
Max. torque Mz	60 Nm...580 Nm
Max. force Fy total axis	2957 N...5914 N
Max. force Fz total axis	6500 N...9000 N
Max. moment Mx total axis	251 Nm...520 Nm
Max. moment My total axis	80 Nm...674 Nm
Max. moment Mz total axis	105 Nm...527 Nm
Torsion moment of inertia It	1433600 mm ⁴
Displacement force	12.5 N

Feature	Value
Reference service life	5000 km
Maintenance interval	Lifetime lubrication
Fy with theoretical service life of 100 km (from a guide perspective only)	17576 N...35153 N
Fz with theoretical service life of 100 km (from a guide perspective only)	17576 N...35153 N
Mx with theoretical service life of 100 km (from a guide perspective only)	730 Nm...1459 Nm
My with theoretical service life of 100 km (from a guide perspective only)	162 Nm...1920 Nm
Mz with theoretical service life of 100 km (from a guide perspective only)	162 Nm...1920 Nm
Moving mass	1519 g...2820 g
Product weight	4553 g...101775 g
Basic weight with 0 mm stroke	3993 g...6575 g
Additional weight per 10 mm stroke	112 g
Material of end caps	Aluminum gravity die-cast, painted
Profile material	Wrought aluminum alloy, anodized
Note on materials	RoHS compliant
Cover strip material	high-alloy stainless steel
Cover material	Aluminum gravity die-cast, painted
Slide carriage material	Steel
Guide rail material	Steel
Slide material	Wrought aluminum alloy