

# Servo motor EMME-AS-80-M-LS-ASB

Part number: 2093170

FESTO



## Data sheet

Feature	Value
Type code	EMME-AS
Ambient temperature	-10 °C ... 40 °C
Storage temperature	-20 °C ... 70 °C
Relative air humidity	0 - 90 %
Conforms to standard	IEC 60034
Insulation protection class	F
Rating class according to EN 60034-1	S1
Degree of protection	IP21
Electrical connection technology	Plug
Note on materials	RoHS-compliant
Corrosion resistance class (CRC)	0 - No corrosion stress
LABS conformity	VDMA24364 zone III
Certification	RCM compliance mark c UL us - Recognized (OL)
CE marking (see declaration of conformity)	As per EU EMC directive As per EU low voltage directive
Nominal operating voltage DC	360 V
DC nominal voltage	360 V
Type of winding switch	Star inside
Number of pole pairs	3
Stall torque	3.5 Nm
Nominal torque	3.2 Nm
Peak torque	14 Nm
Nominal rotary speed	3000 1/min
Max. rotational speed	4627 1/min
Motor nominal power	1000 W
Continuous stall current	3.9 A
Motor nominal current	3.7 A
Peak current	15.6 A
Motor constants	0.865 Nm/A
Voltage constant, phase-to-phase	55 mVmin
Phase-phase winding resistance	2.8 Ohm
Winding inductance phase-phase	7.43 mH
Total output inertia moment	2.2 kgcm <sup>2</sup>
Product weight	4350 g
Permissible axial shaft load	72 N

Feature	Value
Permissible radial shaft load	360 N
Rotor position sensor	Absolute encoder, single-turn
Rotor position sensor interface	HIPERFACE®
Rotor position sensor measuring principle	Capacitive
Rotor position encoder, sinusoidal/cosinusoidal periods per revolution	16
Typical rotor position sensor resolution	12 bit
Rotor position encoder, typical angular accuracy	20 arcmin
Brake holding torque	4,5 Nm
Brake DC operating voltage	24 V
Brake power consumption	12 W
Brake mass moment of inertia	0.222 kgcm <sup>2</sup>
Switching cycles, holding brake	5 million idle actuations (without friction work!)
MTTF, subcomponent	797 years, holding brake
MTTFd, subcomponent	340 years, rotor position sensor
Energy efficiency	ENEFF (CN) / Class 2