SIEMENS

Data sheet for SIMOTICS M-1PH8



Figure similar

Article No. : 1PH8101-1DF20-2FE1

Client order no. :
Order no. :
Offer no. :
Remarks :

Item no. :
Consignment no. :
Project :

Engineering data

		P_N [kW]	M_N [Nm]	I_N [A]	U_N [V]	f_N [Hz]	n_N [rpm]	M_{max} [Nm]	I_{max} [A]	n_{max} [rpm]	M_0 [Nm]	I_0 [A]	η	cos φ	Iμ [A]
Y	**ALM 400V**	**5.8**	**32.0**	**12.8**	**400**	**61.7**	**1,750**	**50**	**25.0**	**7,000**	**34.0**	**13**	**0.834**	**0.820**	**5.4**
	BLM/SLM 400V	5.0	32.0	12.8	357	53.1	1,500	50	25.0	7,000	34.0	13	0.813	0.810	6.0
	ALM 480V	7.2	31.0	12.5	480	76.6	2,200	50	25.0	7,000	34.0	13	0.860	0.800	4.4
	BLM/SLM 480V	6.6	32.0	12.5	450	69.9	2,000	50	25.0	7,000	34.0	13	0.858	0.820	4.4

Mechanical data

Motor type	Squirrel cage asynchronous motor
Shaft height	100
Cooling	Water cooling
Vibration severity grade	R/A
Shaft and flange accuracy	R
Degree of protection	IP65
Design acc. to Code I	IM B3 (IM V5, IM V6)
Temperature monitoring	Pt1000 temperature sensor in the stator winding
Color	Standard (Anthracite RAL 7016)
Type of the bearing	Increased cantilever forces
Shaft end	Feather key with half key balancing
Encoder system	Incremental encoder 22 bit with commutation position 11 bit, max. encoder speed = 12000 rpm

Physical constants

Thermal time constant	10 min
Moment of inertia	138 kgcm²
Weight (approx.)	51 kg

Connection

Type of electrical connection	Power connector
Position of the connection	Power connector, top
Power connection	right
Signal connection	DE

Cooling data and sound pressure level

Flow rate, min.	8 l/min
Sound pressure level LpA(1m) motor rated load, tolerance + 3dB	68 dB [1]
Pressure drop	0.4 bar
NDE thread connection	0.25 Inches

Cooling water specification

pH value	6 ... 9
Total hardness	1.7 mmol/l
Electrical conductivity	500 µS/cm
Chloride ions	40 mg/l
Sulfate ions	50 mg/l
Nitrate ions	50 mg/l
Dissolved substances	340 mg/l
Maximum particle size	100 µm
Antifreeze/corrosion protection	20 ... 30 %

[1] at a rated frequency of 4 kHz and a speed range of up to 5000 rpm