

Data sheet for three-phase Squirrel-Cage-Motors SIMOTICS



Motor type : 1CV3220B

SIMOTICS SD - 225 S - IM B5 - 4p

Client order no.	Item-No.	Offer no.
Order no.	Consignment no.	Project
Remarks		

Electrical data

Safe Area

U	Δ / Y	f	P	P	I	n	M	η ³⁾			cosφ ³⁾			I _A /I _N	M _A /M _N	M _K /M _N	IE-CL
[V]		[Hz]	[kW]	[hp]	[A]	[1/min]	[Nm]	4/4	3/4	2/4	4/4	3/4	2/4	I _I /I _N	T _I /T _N	T _B /T _N	
DOL duty (S1) - 155(F) to 130(B)																	
400	Δ	50	37.00	-/-	66.00	1478	240.0	93.9	94.5	94.4	0.86	0.83	0.74	6.4	2.5	2.7	IE3
690	Y	50	37.00	-/-	38.50	1478	240.0	93.9	94.5	94.4	0.86	0.83	0.74	6.4	2.5	2.7	IE3
460	Δ	60	42.50	-/-	66.00	1778	230.0	93.6	94.1	93.9	0.86	0.83	0.75	6.7	2.4	2.7	IE2
460	Δ	60	37.00	-/-	58.00	1782	198.0	94.5	94.7	94.2	0.85	0.81	0.71	7.5	2.8	3.0	IE3
IM B5 / IM 3001		FS 225 S				IP55	UKCA	IEC/EN 60034		IEC, DIN, ISO, VDE, EN							
Environmental conditions : -20 °C - +40 °C / 1000 m									Locked rotor time (hot / cold) : 36.5 s 55.3 s								

Mechanical data

Sound level (SPL / SWL) at 50Hz 60Hz	65 / 78 dB(A) ^{2) 3)}	68 / 82 dB(A) ^{2) 3)}	Vibration severity grade	A
Moment of inertia	0.4200 kg m ²		Thermal class	F
Bearing DE NDE	6213 Z C3	6213 Z C3	Duty type	S1
bearing lifetime			Direction of rotation	bidirectional
L _{10mh} F _{Rad min} for coupling operation 50 60Hz ¹⁾	40000 h	32000 h	Frame material	cast iron
Regreasing device	Without		Net weight of the motor (IM B3)	285 kg
Grease nipple	-/-		Coating (paint finish)	Standard paint finish C2
Type of bearing	Locating bearing NDE		Color, paint shade	RAL7030
Condensate drainage holes	With (standard)		Motor protection	(B) 3 PTC thermistors - for tripping (2 terminals)
External earthing terminal	With (standard)		Method of cooling	IC411 - self ventilated, surface cooled

Terminal box

Terminal box position	top	Max. cross-sectional area	35 mm ²
Material of terminal box	cast iron	Cable diameter from ... to ...	27 mm - 35 mm
Type of terminal box	TB1 L01	Cable entry	2xM50x1,5-2xM20x1,5
Contact screw thread	M8	Cable gland	4 plugs

Notes:

I_A/I_N = locked rotor current / current nominal

M_K/M_N = locked rotor torque / torque nominal

M_K/M_N = break down torque / nominal torque

1) L10mh according to DIN ISO 281 10/2010

2) at rated power / at full load

3) Value is valid only for DOL operation with motor design IC411

responsible dep.	technical reference	created by	approved by	Technical data are subject to change! There may be discrepancies between calculated and rating plate values.		Link documents		
DI MC LVM		DT Configurator						
	document type	datasheet			document status			
					released			
	title	1LE1503-2BB03-4FB4-Z			document number			
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Special design

M10	Additional rating plate, loose	R11	Terminal box rotated through 90°, cable entry from NDE
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Notes:

Link documents

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