

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



Motor type : 1CV3405B

SIMOTICS SD Pro - 400 - IM B3 - 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 155(F)																	
400	Δ	50	615.00	-/-	1060.00	1492	3950.0	96.3	96.4	95.9	0.87	0.83	0.74	6.9	1.9	2.8	IE3
690	Y	50	615.00	-/-	610.00	1492	3950.0	96.3	96.4	95.9	0.87	0.83	0.74	6.9	1.9	2.8	IE3
460	Δ	60	615.00	-/-	930.00	1794	3250.0	96.3	96.0	94.9	0.86	0.81	0.71	7.8	2.1	3.2	IE3
460	Δ	60	710.00	-/-	1050.00	1792	3800.0	96.4	96.2	95.6	0.88	0.84	0.77	6.9	1.8	2.7	IE3
460	Δ	60		800	920.00	1794	3200.0	96.3	95.9	94.8	0.86	0.81	0.71	7.9	2.1	3.2	MG1
IM B3 / IM1001 ₄₎		SF:	FS 400				IP55	UKCA		IEC/EN 60034		IEC, EN, UL, CSA, NEMA MG1-Part 20					
Environmental conditions : -20 °C - +40 °C / 1,000 m									Locked rotor time (hot / cold) : 2.56 s 3.66 s								

Mechanical data

Sound level (SPL / SWL) at 50Hz 60Hz	78 / 94 dB(A) ³⁾	83 / 99 dB(A) ³⁾	Condensate drainage holes	(Standard) Yes
Moment of inertia	14.4000 kg m ²		External earthing terminal	(Standard) Yes
Bearing DE NDE	DIN625-6224-C3	DIN625-6224-C3	Vibration severity grade	Grade A
permissible lateral force on (N)	X ₀ : 6830	X _{0.5} : N/A	Thermal class	F
bearing lifetime			Duty type	S1
L _{10mh} F _{Rad min} for coupling operation 50 60Hz ¹⁾	40000 h	32000 h	Direction of rotation	bidirectional
Relubrication interval/quantity DE NDE	40 g 40 g	6000 h	Frame material	cast iron
Lubricants	SHELL GADUS S2 V100 3		Net weight of the motor	3000 kg
Regreasing device	-/-		Coating (paint finish)	Standard paint finish C2
Grease nipple	-/-		Color, paint shade	RAL7030
Type of bearing	Locating bearing DE		Motor protection	1 temperature sensor KTY84-130 (2 terminals)
Bearing insulation DE / Bearing insulation NDE	Yes (Non-drive end)		Method of cooling	IC416 - separately ventilated, surface cooled

Terminal box

Terminal box position	box at the top, socket right	Max. cross-sectional area	240 mm ²
Material of terminal box	cast iron	Cable diameter from ... to ...	56 mm - 64.5 mm
Type of terminal box	TB3R61	Cable entry	4xM80x2 - 2xM25x1,5
Contact screw thread	12xM16	Cable gland	6 plugs

Notes:

I_A/I_N = locked rotor current / current nominal
M_K/M_N = locked rotor torque / torque nominal
M_B/M_N = break down torque / nominal torque

1) L_{10mh} 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
4) For IM B5 design additionally support foot (not scope of delivery) is required

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	
IN LVM		SPC					
	document type	datasheet			document status		
					released		
	title	1LE5583-4AB53-4AF1-Z			document number		
© INNOMOTICS 2023	F70+L51+Q01+Q82				rev.	creation date	language
					951	2023-12-14	en
							Page
							1/2

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



Motor type : 1CV3405B

SIMOTICS SD Pro - 400 - IM B3 - 4p

Special design

F70	Mounting of separately driven fan	Q01	Measuring nipple for SPM shock pulse measurement to monitor bearings
L51	Bearing insulation NDE	Q82	Extension of the liability for defects by 24 months to a total of 36 months (3 years) from delivery

Notes:

responsible dep. IN LVM	technical reference	created by SPC	approved by	Technical data are subject to change! There may be discrepancies between calculated and rating plate values.		Link documents	
	document type datasheet			document status released			
	title 1LE5583-4AB53-4AF1-Z			document number			
© INNOMOTICS 2023	F70+L51+Q01+Q82			rev. 951	creation date 2023-12-14		