

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



Motor type : 1AV3164A

SIMOTICS GP - 160 L - IM B3 - 2p

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

Remarks

Safe Area

Electrical data

-/-

U [V]	Δ / Y	f [Hz]	P [kW]	P [hp]	I [A]	n [1/min]	M [Nm]	η ³⁾			$\cos\phi$ ³⁾			I_A/I_N I_I/I_N	M_A/M_N T_I/T_N	M_K/M_N T_B/T_N	IE-CL
								4/4	3/4	2/4	4/4	3/4	2/4				
DOL duty (S1) - 155(F) to 130(B)																	
380	Δ	50	18.50	-/-	34.00	2955	60.0	92.4	92.8	92.4	0.90	0.87	0.80	9.0	2.8	4.2	IE3
660	Y	50	18.50	-/-	19.50	2955	60.0	92.4	92.8	92.4	0.90	0.87	0.80	9.0	2.8	4.2	IE3
440	Δ	60	21.30	-/-	33.50	3555	57.0	91.7	91.5	90.3	0.91	0.88	0.80	9.0	2.6	4.2	IE3
440	Δ	60	18.50	-/-	29.50	3560	49.5	91.7	91.5	90.3	0.89	0.86	0.78	10.2	3.0	4.8	IE3
IM B3 / IM 1001		FS 160 L		IP55		UKCA		IEC/EN 60034		IEC, DIN, ISO, VDE, EN							
Environmental conditions : -40 °C - +40 °C / 1000 m										Locked rotor time (hot / cold) : 13.5 s 19.9 s							

Mechanical data

Sound level (SPL / SWL) at 50Hz 60Hz	70 / 82 dB(A) ^{2) 3)}	77 / 89 dB(A) ^{2) 3)}	Vibration severity grade	A
Moment of inertia	0.0680 kg m ²		Thermal class	F
Bearing DE NDE	6209 2Z C3	6209 2Z 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	aluminum
Regreasing device	Without		Net weight of the motor (IM B3)	94 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	(A) without (Standard)
External earthing terminal	With		Method of cooling	IC411 - self ventilated, surface cooled

Terminal box

Terminal box position	top	Max. cross-sectional area	16 mm ²
Material of terminal box	Aluminium	Cable diameter from ... to ...	19 mm - 28 mm
Type of terminal box	TB1 J00	Cable entry	2xM40x1,5-1xM16x1,5
Contact screw thread	M5	Cable gland	3 plugs

I_A/I_N = locked rotor current / current nominal
 M_A/M_N = locked rotor torque / torque nominal
 M_K/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

Transmittal, reproduction, dissemination and/or editing of this document as well as utilization of its contents and communication thereof to others without express authorization are prohibited. Offenders will be held liable for payment of damages. All rights created by patent grant or registration of a utility model or design patent are reserved.

Responsible department IN LVM	Technical reference	Created by SPC	Approved by Created automatically	<i>Technical data are subject to change! There may be discrepancies between calculated and rating plate values.</i>	Link documents
	Document type Technical data sheet	Document status Released			
	Document title 1LE1003-1DA43-3AA4-Z	Document number TDS-240419-083014			
Restricted © Innomotics 2024	B02+D03+F76+H04+N30+Q02	Revision AA	Creation date 2024-04-19		

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



Motor type : 1AV3164A

SIMOTICS GP - 160 L - IM B3 - 2p

Special design

B02	Acceptance test certificate 3.1 acc. to EN 10204	H04	External grounding at housing
D03	Minimum ambient temperature -40°C	N30	Increased air humidity/temperature with 30 to 60 g water per m3 air
F76	Metal external fan	Q02	Anti-condensation heating for 230 V (2 terminals)

Additional information:

Space heaters

Technical data: 1-phase, 230 V 50W

Transmittal, reproduction, dissemination and/or editing of this document as well as utilization of its contents and communication thereof to others without express authorization are prohibited. Offenders will be held liable for payment of damages. All rights created by patent grant or registration of a utility model or design patent are reserved.

Responsible department IN LVM	Technical reference	Created by SPC	Approved by Created automatically	<i>Technical data are subject to change! There may be discrepancies between calculated and rating plate values.</i>		Link documents
	Document type Technical data sheet	Document status Released				
	Document title 1LE1003-1DA43-3AA4-Z	Document number TDS-240419-083014				
Restricted © Innomotics 2024	B02+D03+F76+H04+N30+Q02		Revision AA	Creation date 2024-04-19	Language en	Page 2/2