

DATA SHEET

Three Phase Induction Motor - Squirrel Cage



Customer :

Product line : W22 IE2 Three-Phase

Product code : 14414748
Catalog # : E01136EP3Y160MF3-W22

Frame	: 160M	Locked rotor time	: 18s (cold) 10s (hot)
Output	: 11 kW (15 HP)	Temperature rise	: 80 K
Poles	: 2	Duty cycle	: S1
Frequency	: 50 Hz	Ambient temperature	: -20°C to +40°C
Rated voltage	: 380/660 V	Altitude	: 1000 m.a.s.l.
Rated current	: 21.0/12.1 A	Protection degree	: IP55
L. R. Amperes	: 147/84.6 A	Cooling method	: IC411 - TEFC
LRC	: 7.0	Mounting	: B3T
No load current	: 7.00/4.03 A	Rotation ¹	: Both (CW and CCW)
Rated speed	: 2940 rpm	Noise level ²	: 67.0 dB(A)
Slip	: 2.00 %	Starting method	: Direct On Line
Rated torque	: 26.4 ft.lb	Approx. weight ³	: 256 lb
Locked rotor torque	: 220 %		
Breakdown torque	: 290 %		
Insulation class	: F		
Service factor	: 1.00		
Moment of inertia (J)	: 1.06 sq.ft.lb		
Design	: N		

Output	25%	50%	75%	100%	Foundation loads		
Efficiency (%)	88.8	88.5	89.0	88.7	89.4	89.4	Max. traction : 280 lb
	88.1	87.7	88.3	88.0	89.4	90.2	
Power Factor	0.52	0.49	0.78	0.74	0.86	0.84	Max. compression : 536 lb
	0.45	0.45	0.71	0.72	0.82	0.82	

Losses at normative operating points (speed;torque), in percentage of rated output power

Losses (%)	P1 (0,9;1,0)	11.6	11.6	11.6	10.6
	P2 (0,5;1,0)	9.8	9.8	9.8	9.0
	P3 (0,25;1,0)	8.7	8.7	8.7	7.9
	P4 (0,9;0,5)	5.7	5.7	5.7	5.2
	P5 (0,5;0,5)	3.7	3.7	3.7	3.4
	P6 (0,5;0,25)	2.4	2.4	2.4	2.2
	P7 (0,25;0,25)	1.5	1.5	1.5	1.4

		<u>Drive end</u>	<u>Non drive end</u>
Bearing type	:	6309 ZZ C3	6209 ZZ C3
Sealing	:	V'Ring	V'Ring
Lubrication interval	:	-	-
Lubricant amount	:	-	-
Lubricant type	:	Mobil Polyrex EM	

Notes:

This revision replaces and cancel the previous one, which must be eliminated.

- (1) Looking the motor from the shaft end.
- (2) Measured at 1m and with tolerance of +3dB(A).
- (3) Approximate weight subject to changes after manufacturing process.
- (4) At 100% of full load.

These are average values based on tests with sinusoidal power supply, subject to the tolerances stipulated in IEC 60034-1.

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Date	26/03/2024			

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Customer :

Thermal protection

ID	Application	Type	Quantity	Sensing Temperature
1	Winding	Thermistor - 2 wires	1 x Phase	155 °C

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