

DATA SHEET

Three Phase Induction Motor - Squirrel Cage



Customer :					
Product line		: W22 Super Premium Efficiency Three-Phase		Product code :	11792519
				Catalog # :	10012EG3E444T-W22
Frame	: 444/5T	Locked rotor time	: 48s (cold) 27s (hot)		
Output	: 100 HP (75 kW)	Temperature rise	: 80 K		
Poles	: 6	Duty cycle	: Cont.(S1)		
Frequency	: 60 Hz	Ambient temperature	: -20°C to +40°C		
Rated voltage	: 230/460 V	Altitude	: 1000 m.a.s.l.		
Rated current	: 249/124 A	Protection degree	: IP55		
L. R. Amperes	: 1891/945 A	Cooling method	: IC411 - TEFC		
LRC	: 7.6x(Code J)	Mounting	: F-1		
No load current	: 102/51.0 A	Rotation ¹	: Both (CW and CCW)		
Rated speed	: 1189 rpm	Noise level ²	: 69.0 dB(A)		
Slip	: 0.92 %	Starting method	: Direct On Line		
Rated torque	: 442 ft.lb	Approx. weight ³	: 1970 lb		
Locked rotor torque	: 260 %				
Breakdown torque	: 280 %				
Insulation class	: F				
Service factor	: 1.25				
Moment of inertia (J)	: 106 sq.ft.lb				
Design	: A				
Output	50%	75%	100%	Foundation loads	
Efficiency (%)	94.5 94.6	95.4 95.0	95.8 95.0	Max. traction	: 2695 lb
	95.0 95.0	95.4 95.4	95.4 95.4	Max. compression	: 4665 lb
Power Factor	0.60 0.67	0.72 0.77	0.79 0.82		
	0.63 0.60	0.75 0.73	0.81 0.79		
Losses at normative operating points (speed;torque), in percentage of rated output power					
Losses (%)	P1 (0,9;1,0)	4.3	5.1	4.7	4.7
	P2 (0,5;1,0)	3.3	4.0	3.6	3.6
	P3 (0,25;1,0)	2.9	3.5	3.2	3.2
	P4 (0,9;0,5)	2.4	2.9	2.6	2.6
	P5 (0,5;0,5)	1.5	1.9	1.7	1.7
	P6 (0,5;0,25)	1.1	1.4	1.2	1.2
	P7 (0,25;0,25)	0.7	0.9	0.8	0.8
			Drive end	Non drive end	
Bearing type	:	6319 C3		6316 C3	
Sealing	:	WSeal		WSeal	
Lubrication interval	:	13000 h		16000 h	
Lubricant amount	:	45 g		34 g	
Lubricant type	:	Mobil Polyrex EM			
Notes:					
This revision replaces and cancel the previous one, which must be eliminated.			These are average values based on tests with sinusoidal power supply, subject to the tolerances stipulated in NEMA MG-1.		
(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.					
Rev.	Changes Summary			Performed	Checked
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