

# DATA SHEET

## Three Phase Induction Motor - Squirrel Cage



Customer :

Product line : W21 Explosion Proof NEMA Premium  
Efficiency Three-Phase

Product code : 12408374

Catalog # : 10009XT3G445T

Frame : 444/5T  
Output : 100 HP (75 kW)  
Poles : 8  
Frequency : 60 Hz  
Rated voltage : 460 V  
Rated current : 125 A  
L. R. Amperes : 763 A  
LRC : 6.1x(Code G)  
No load current : 47.5 A  
Rated speed : 890 rpm  
Slip : 1.11 %  
Rated torque : 590 ft.lb  
Locked rotor torque : 170 %  
Breakdown torque : 200 %  
Insulation class : F  
Service factor : 1.15  
Moment of inertia (J) : 87.3 sq.ft.lb  
Design : B

Locked rotor time : 28s (cold) 16s (hot)  
Temperature rise : 80 K  
Duty cycle : Cont.(S1)  
Ambient temperature : -20°C to +40°C  
Altitude : 1000 m.a.s.l.  
Protection degree : IP55  
Cooling method : IC411 - TEFC  
Mounting : F-1  
Rotation<sup>1</sup> : Both (CW and CCW)  
Noise level<sup>2</sup> : 64.0 dB(A)  
Starting method : Direct On Line  
Approx. weight<sup>3</sup> : 2081 lb

Output	25%	50%	75%	100%				
Efficiency (%)	94.3	93.5	94.1	93.6	94.5	94.1	94.1	94.1
Power Factor	0.43	0.41	0.68	0.65	0.77	0.75	0.80	0.79
	0.37	0.34	0.61	0.58	0.72	0.70	0.78	0.76

Foundation loads  
Max. traction : 3805 lb  
Max. compression : 3805 lb

	Drive end	Non drive end
Bearing type	6219 C3	6316 C3
Sealing	Viton Oil Seal	Viton Seal
Lubrication interval	15247 h	15904 h
Lubricant amount	28 g	34 g
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 NEMA MG-1.

Rev.	Changes Summary	Performed	Checked	Date
Performed by		Page 1 / 2		
Checked by				
Date	28/03/2024			
		Revision		

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Customer :

Thermal protection

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

Rev.	Changes Summary		Performed	Checked	Date
Performed by				Page 2 / 2Revision	
Checked by					
Date	28/03/2024				