

# DATA SHEET



## Three Phase Induction Motor - Squirrel Cage

Customer :

Product line : W22 Tru-Metric IE3 Three-Phase Product code : 14955334

Frame	: 200L	Locked rotor time	: 21s (cold) 12s (hot)
Output	: 50 HP (37 kW)	Temperature rise	: 80 K
Poles	: 2	Duty cycle	: S1
Frequency	: 60 Hz	Ambient temperature	: -20°C to +40°C
Rated voltage	: 230/460 V	Altitude	: 1000 m.a.s.l.
Rated current	: 120/59.8 A	Protection degree	: IP55
L. R. Amperes	: 1136/568 A	Cooling method	: IC411 - TEFC
LRC	: 9.5	Mounting	: B35R(D)
No load current	: 48.4/24.2 A	Rotation <sup>1</sup>	: Both (CW and CCW)
Rated speed	: 3575 rpm	Noise level <sup>2</sup>	: 76.0 dB(A)
Slip	: 0.69 %	Starting method	: Direct On Line
Rated torque	: 10.2 kgfm	Approx. weight <sup>3</sup>	: 272 kg
Locked rotor torque	: 350 %		
Breakdown torque	: 370 %		
Insulation class	: F		
Service factor	: 1.25		
Moment of inertia (J)	: 0.2119 kgm <sup>2</sup>		
Design	: N		

Output	50%	75%	100%	Foundation loads	
Efficiency (%)	91.7	93.0	93.6	Max. traction	: 336 kgf
Power Factor	0.67	0.77	0.83	Max. compression	: 608 kgf

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

P1 (0,9;1,0)	P2 (0,5;1,0)	P3 (0,25;1,0)	P4 (0,9;0,5)	P5 (0,5;0,5)	P6 (0,5;0,25)	P7 (0,25;0,25)
6.5	4.5	3.8	4.1	2.3	1.8	1.1

		<u>Drive end</u>	<u>Non drive end</u>
Bearing type	:	6312 C3	6212 C3
Sealing	:	V'Ring	V'Ring
Lubrication interval	:	12000 h	15000 h
Lubricant amount	:	21 g	13 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				
Checked by			Page	Revision
Date	14/01/2024		1 / 3	

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Customer : \_\_\_\_\_

### Thermal protection

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

Rev.	Changes Summary	Performed	Checked	Date
Performed by				
Checked by			Page	Revision
Date	14/01/2024		2 / 3	

# LOAD PERFORMANCE CURVE

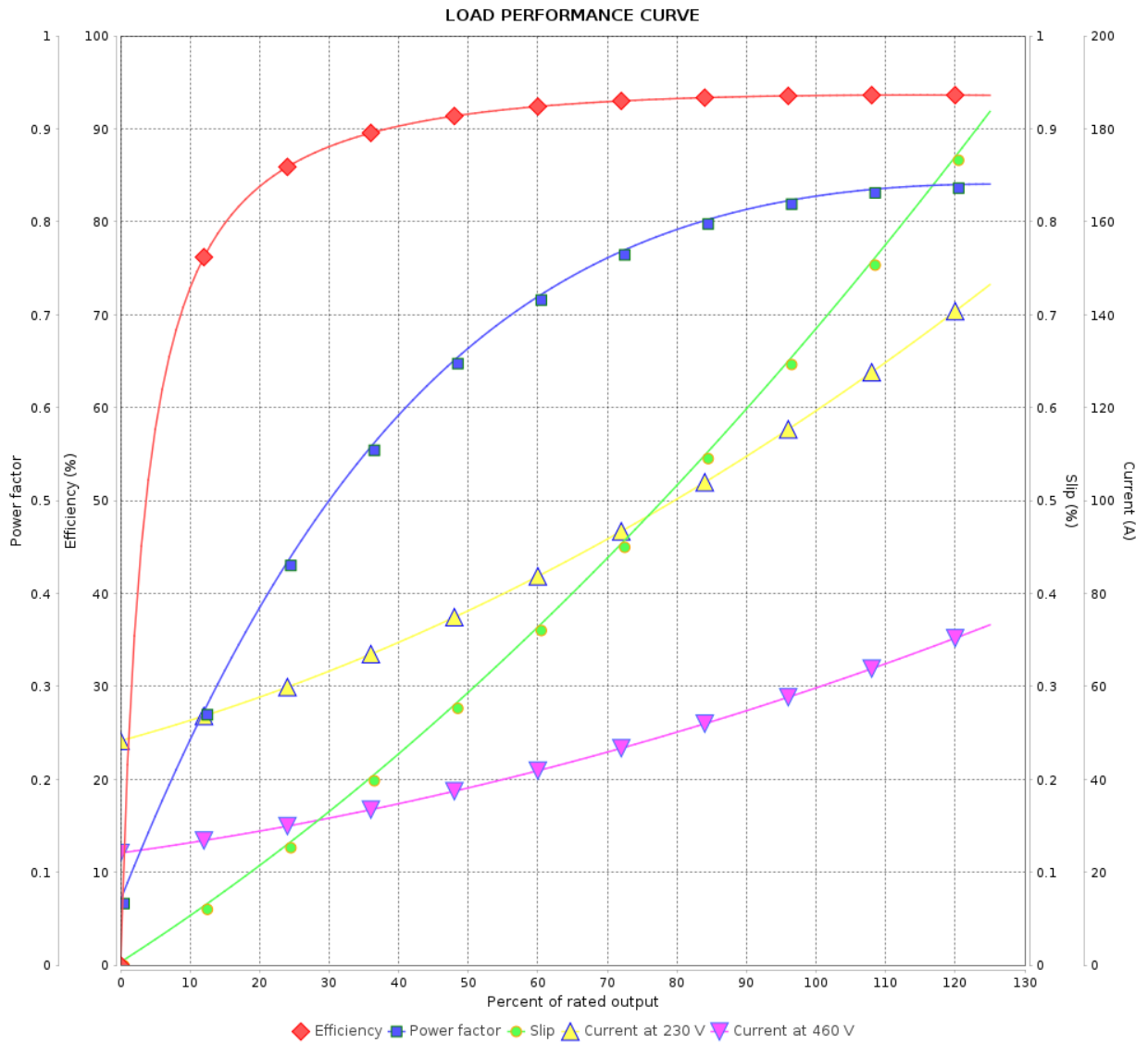
Three Phase Induction Motor - Squirrel Cage



Customer : \_\_\_\_\_

Product line : W22 Tru-Metric IE3 Three-Phase

Product code : 14955334



Performance : 230/460 V 60 Hz 2P

Rated current : 120/59.8 A  
 LRC : 9.5  
 Rated torque : 10.2 kgfm  
 Locked rotor torque : 350 %  
 Breakdown torque : 370 %  
 Rated speed : 3575 rpm

Moment of inertia (J) : 0.2119 kgm<sup>2</sup>  
 Duty cycle : S1  
 Insulation class : F  
 Service factor : 1.25  
 Temperature rise : 80 K  
 Design : N

Rev.	Changes Summary	Performed	Checked	Date
Performed by			Page	Revision
Checked by				
Date				
			3 / 3	