

DATA SHEET



Three Phase Induction Motor - Squirrel Cage

Customer :

Product line : NEMA Premium Efficiency Three-Phase
 Product code : 12799394
 Catalog # : 00312OT3H213T-SG

Frame	: 213/5T	Locked rotor time	: 70s (cold) 39s (hot)
Output	: 3 HP (2.2 kW)	Temperature rise	: 80 K
Poles	: 6	Duty cycle	: Cont.(S1)
Frequency	: 60 Hz	Ambient temperature	: -20°C to +40°C
Rated voltage	: 575 V	Altitude	: 1000 m.a.s.l.
Rated current	: 3.33 A	Cooling method	: IC01 - ODP
L. R. Amperes	: 19.6 A	Mounting	: F-1
LRC	: 5.9x(Code H)	Rotation ¹	: Both (CW and CCW)
No load current	: 1.83 A	Noise level ²	: 55.0 dB(A)
Rated speed	: 1175 rpm	Starting method	: Direct On Line
Slip	: 2.08 %	Approx. weight ³	: 98.3 lb
Rated torque	: 13.4 ft.lb		
Locked rotor torque	: 210 %		
Breakdown torque	: 260 %		
Insulation class	: F		
Service factor	: 1.15		
Moment of inertia (J)	: 0.8104 sq.ft.lb		
Design	: B		

Output	25%	50%	75%	100%	Foundation loads
Efficiency (%)	85.4	86.5	87.5	88.5	Max. traction : 147 lb
Power Factor	0.33	0.56	0.68	0.75	Max. compression : 245 lb

	Drive end	Non drive end
Bearing type	: 6208 ZZ	: 6206 ZZ
Sealing	: Without Bearing Seal	: Without Bearing Seal
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 NEMA MG-1.

Rev.	Changes Summary	Performed	Checked	Date
Performed by		Page		Revision
Checked by		1 / 6		
Date	14/04/2022			

TORQUE AND CURRENT VS SPEED CURVE

Three Phase Induction Motor - Squirrel Cage



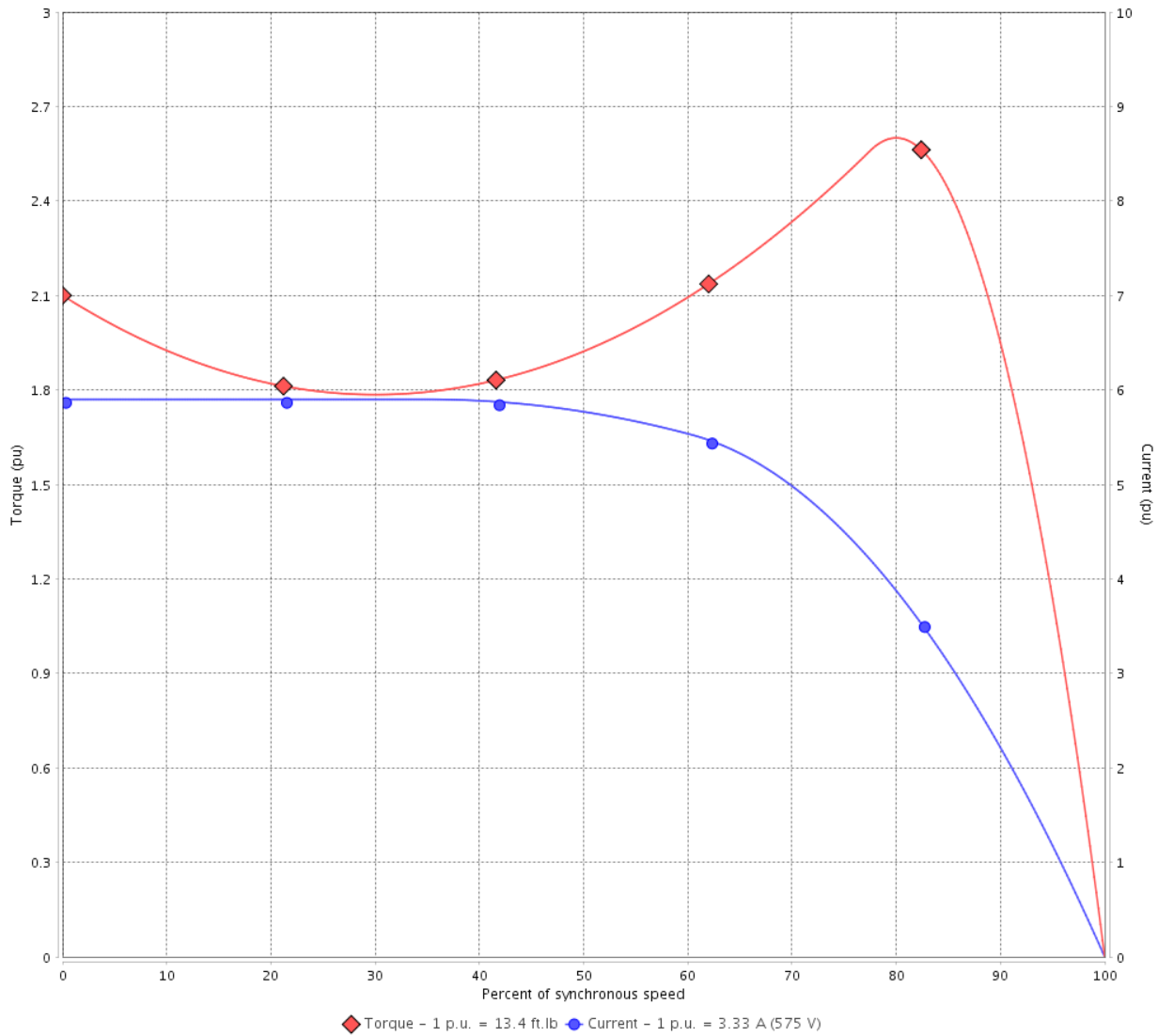
Customer :

Product line : NEMA Premium Efficiency Three-Phase

Product code : 12799394

Catalog # : 003120T3H213T-SG

TORQUE AND CURRENT VS SPEED CURVE



Performance : 575 V 60 Hz 6P

Rated current	: 3.33 A	Moment of inertia (J)	: 0.8104 sq.ft.lb
LRC	: 5.9	Duty cycle	: Cont.(S1)
Rated torque	: 13.4 ft.lb	Insulation class	: F
Locked rotor torque	: 210 %	Service factor	: 1.15
Breakdown torque	: 260 %	Temperature rise	: 80 K
Rated speed	: 1175 rpm	Design	: B

Locked rotor time : 70s (cold) 39s (hot)

Rev.	Changes Summary	Performed	Checked	Date
Performed by			Page 2 / 6	Revision
Checked by				
Date	14/04/2022			

LOAD PERFORMANCE CURVE

Three Phase Induction Motor - Squirrel Cage

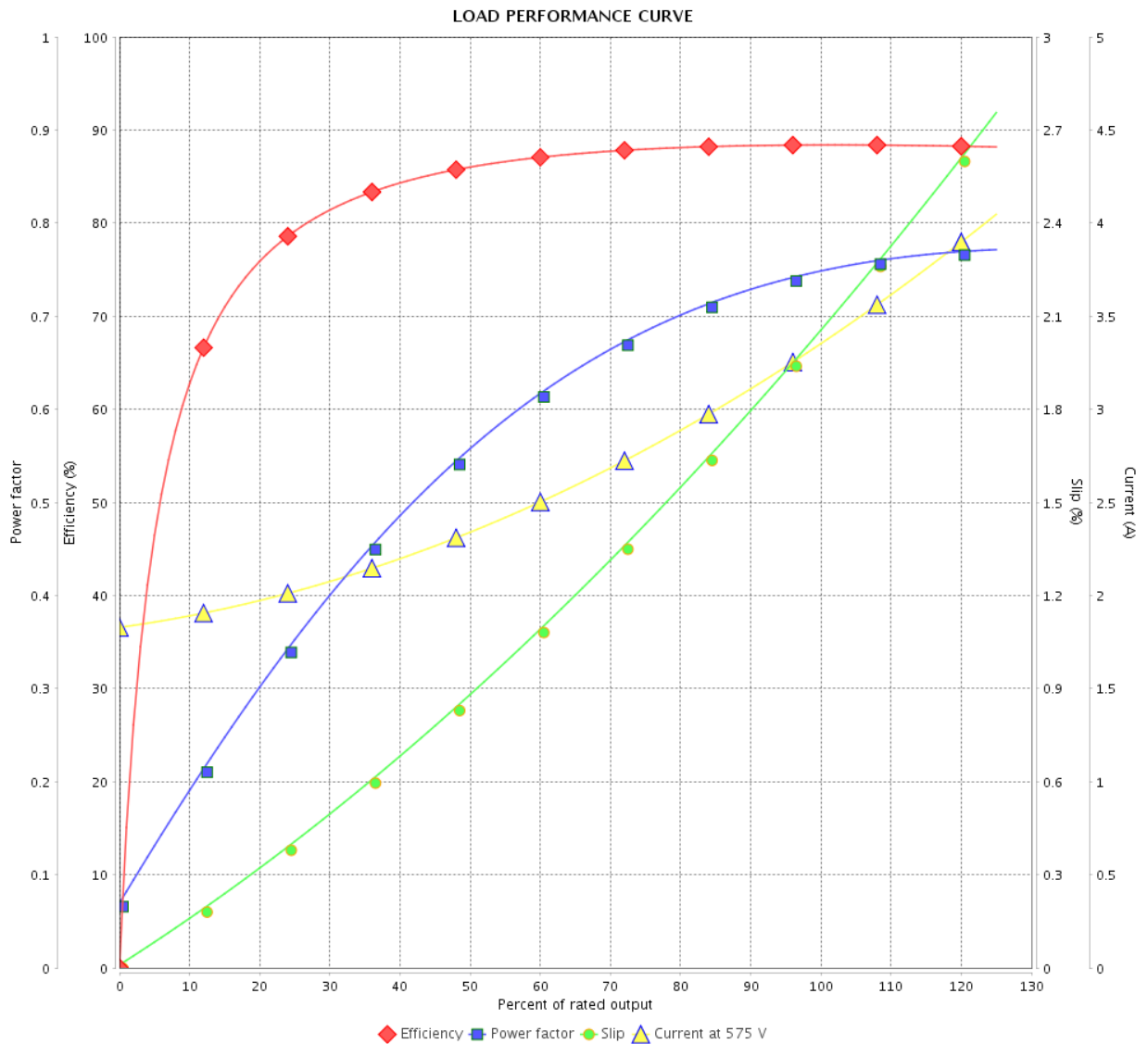


Customer :

Product line : NEMA Premium Efficiency Three-Phase

Product code : 12799394

Catalog # : 003120T3H213T-SG



Performance : 575 V 60 Hz 6P

Rated current : 3.33 A
 LRC : 5.9
 Rated torque : 13.4 ft.lb
 Locked rotor torque : 210 %
 Breakdown torque : 260 %
 Rated speed : 1175 rpm

Moment of inertia (J) : 0.8104 sq.ft.lb
 Duty cycle : Cont.(S1)
 Insulation class : F
 Service factor : 1.15
 Temperature rise : 80 K
 Design : B

Rev.	Changes Summary	Performed	Checked	Date
Performed by		Page		Revision
Checked by		3 / 6		
Date		14/04/2022		

THERMAL LIMIT CURVE



Three Phase Induction Motor - Squirrel Cage

Customer :

Product line : NEMA Premium Efficiency Three-Phase
Product code : 12799394
Catalog # : 00312OT3H213T-SG

Performance : 575 V 60 Hz 6P

Rated current	: 3.33 A	Moment of inertia (J)	: 0.8104 sq.ft.lb
LRC	: 5.9	Duty cycle	: Cont.(S1)
Rated torque	: 13.4 ft.lb	Insulation class	: F
Locked rotor torque	: 210 %	Service factor	: 1.15
Breakdown torque	: 260 %	Temperature rise	: 80 K
Rated speed	: 1175 rpm	Design	: B

Heating constant

Cooling constant

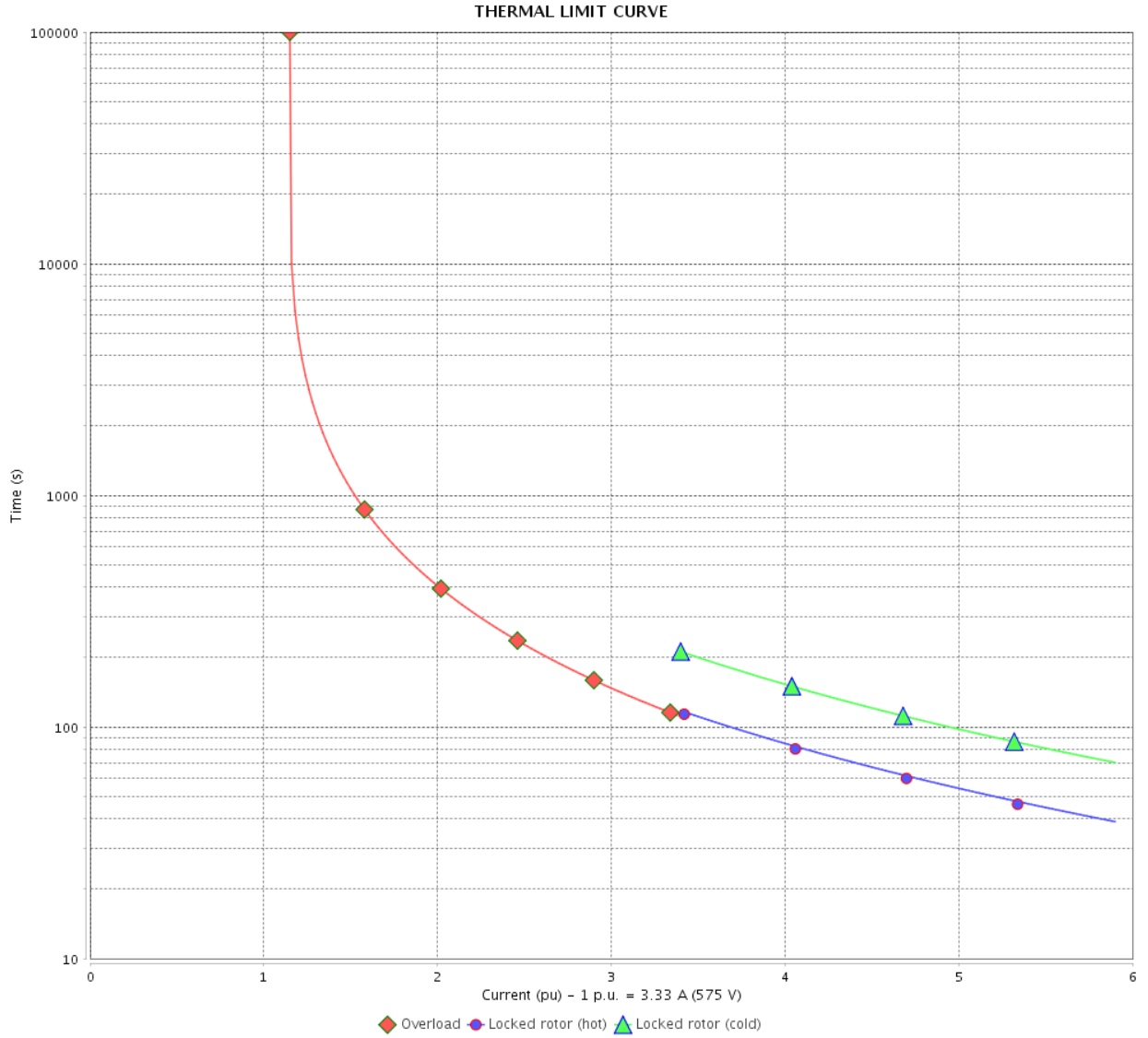
Rev.	Changes Summary	Performed	Checked	Date
Performed by				
Checked by			Page	Revision
Date	14/04/2022		4 / 6	

THERMAL LIMIT CURVE

Three Phase Induction Motor - Squirrel Cage



Customer : _____



Rev.	Changes Summary	Performed	Checked	Date
Performed by				
Checked by				
Date				
			Page 5 / 6	Revision

VFD OPERATION CURVE

Three Phase Induction Motor - Squirrel Cage

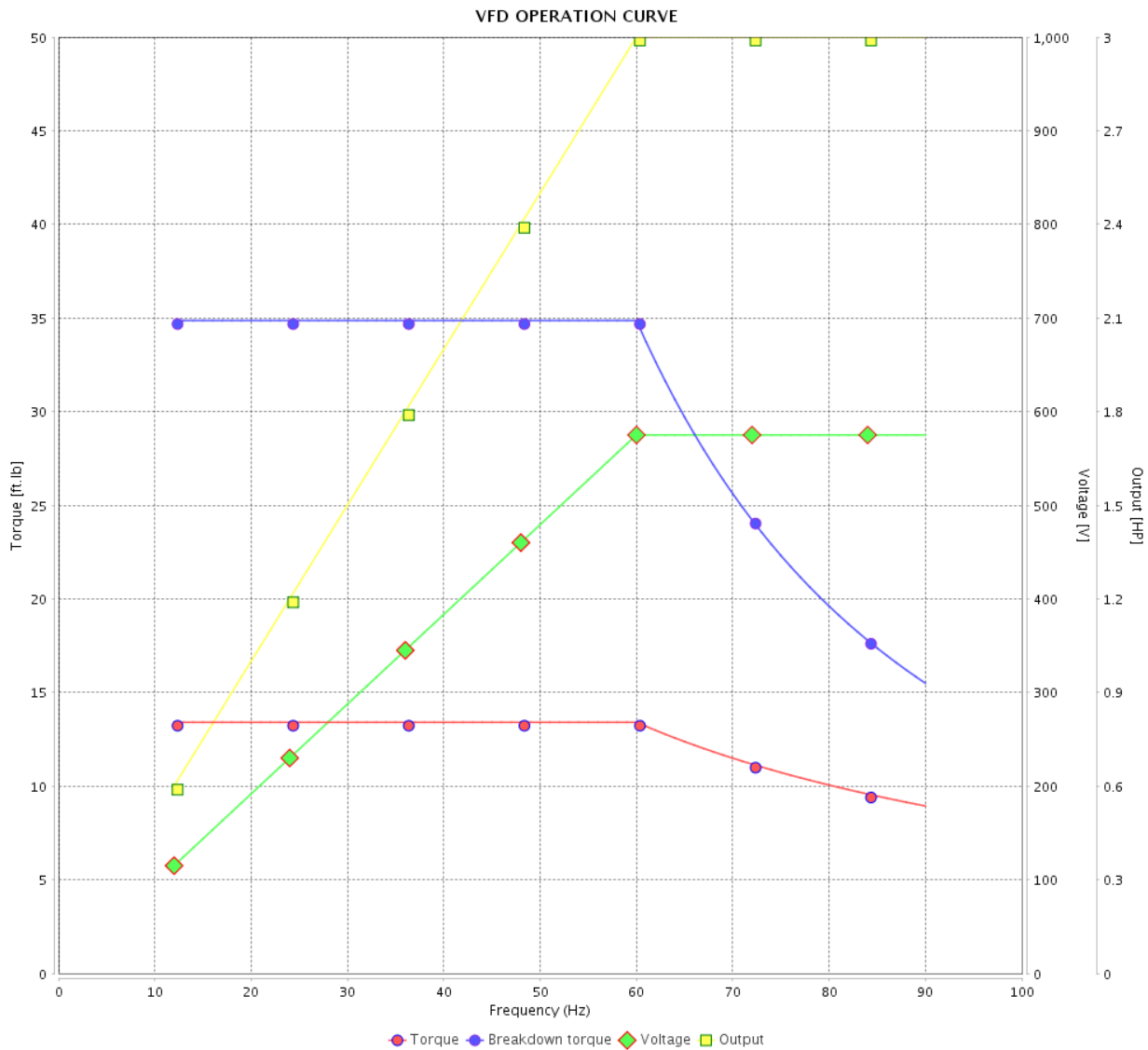


Customer :

Product line : NEMA Premium Efficiency Three-Phase

Product code : 12799394

Catalog # : 003120T3H213T-SG



Performance : 575 V 60 Hz 6P

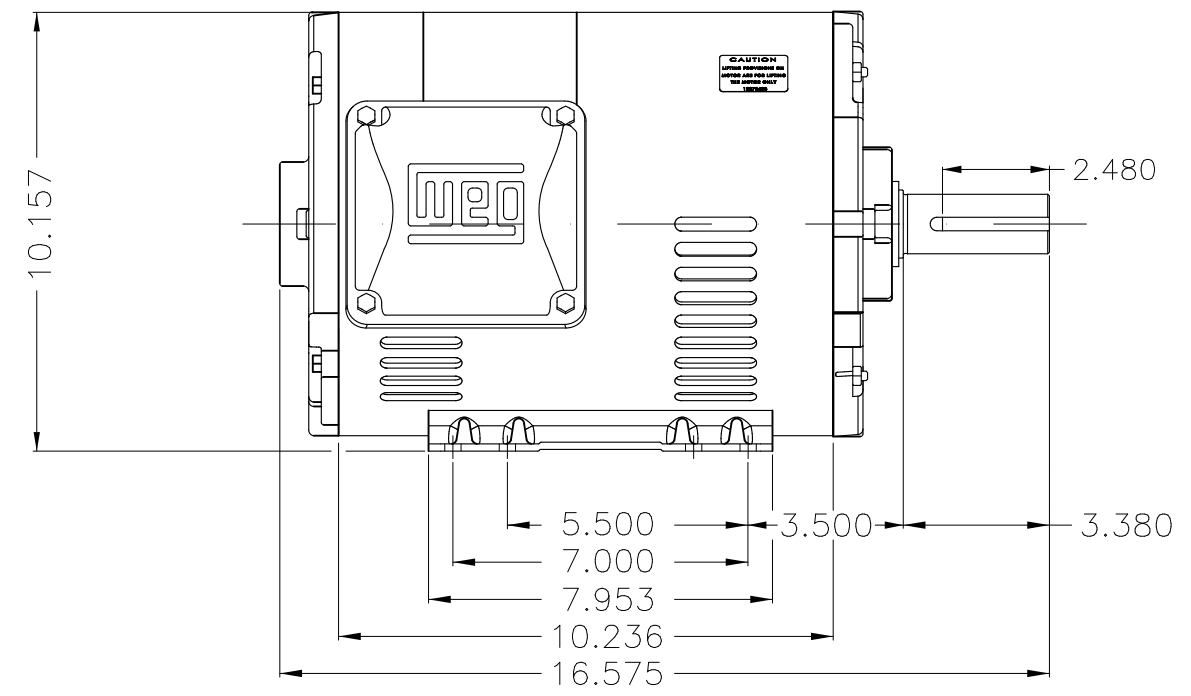
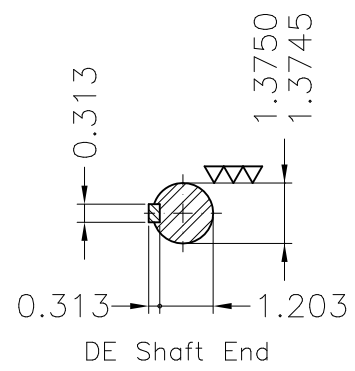
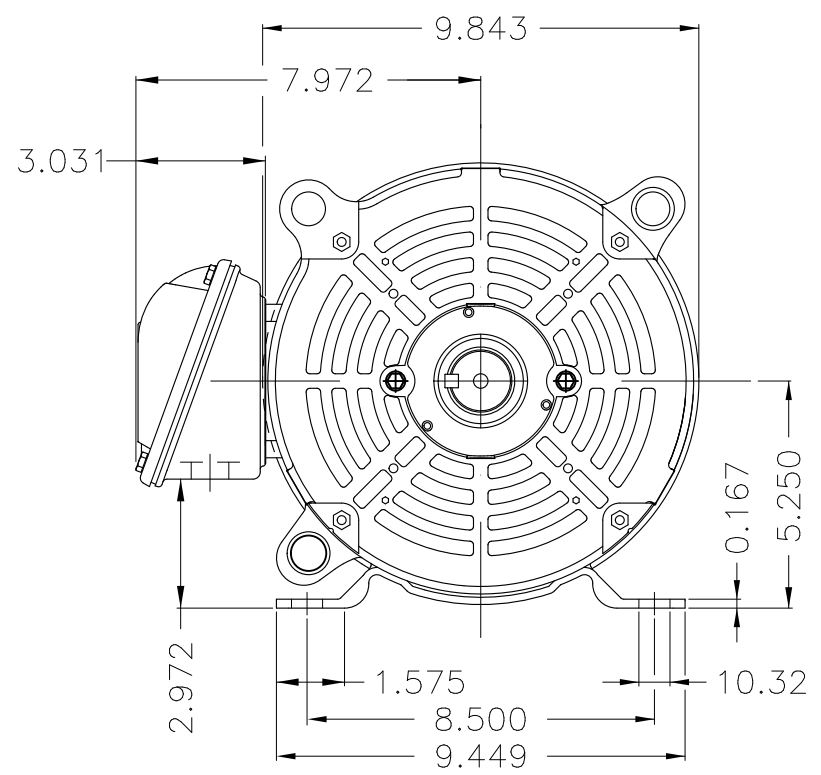
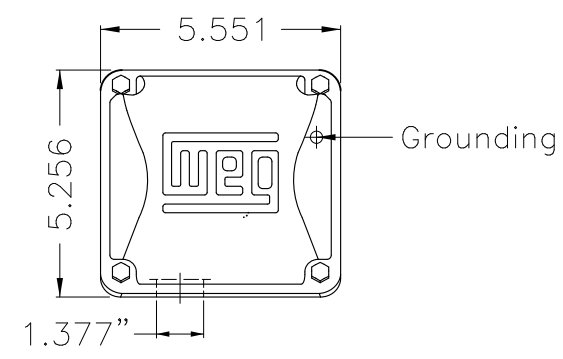
Rated current : 3.33 A
 LRC : 5.9
 Rated torque : 13.4 ft.lb
 Locked rotor torque : 210 %
 Breakdown torque : 260 %
 Rated speed : 1175 rpm

Moment of inertia (J) : 0.8104 sq.ft.lb
 Duty cycle : Cont.(S1)
 Insulation class : F
 Service factor : 1.15
 Temperature rise : 80 K
 Design : B

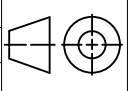

Rev.	Changes Summary	Performed	Checked	Date
Performed by			Page 6 / 6	Revision
Checked by				
Date	14/04/2022			

1 2 3 4 5 6

A
B
C
D
E



Bearing cap
 Internal AEGIS ground ring on the DE
 Color Munsell N 1 matte black
 Painting plan 207N
 Mounting F-1/B3R(D)

ECM	LOC	SUMMARY OF MODIFICATIONS	EXECUTED	CHECKED	RELEASED	DATE	VER
EXECUTED	PIRWUSER	 THREE PH. MOTOR ROLLED STEEL PREM. EFF. FRAME 213/5T IP21 ODP					
CHECKED							
RELEASED							
REL DT.	WMO	Jaragua do Sul	Product Engineering	SHEET 1 / 1		PREVIEW WDD 	

3 HP 06 Poles 60 Hz

Dimensions in inches XME A3