

# DATA SHEET

## Three Phase Induction Motor - Squirrel Cage



Customer :

Product line : W22 NEMA Premium Efficiency Three-Phase Product code : 11723870  
Catalog # : 00318ET3E182T-W22

Frame	: 182/4T	Locked rotor time	: 41s (cold) 23s (hot)
Output	: 3 HP (2.2 kW)	Temperature rise	: 80 K
Poles	: 4	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	: 7.82/3.91 A	Protection degree	: IP55
L. R. Amperes	: 63.3/31.7 A	Cooling method	: IC411 - TEFC
LRC	: 8.1x(Code K)	Mounting	: F-1
No load current	: 4.00/2.00 A	Rotation <sup>1</sup>	: Both (CW and CCW)
Rated speed	: 1760 rpm	Noise level <sup>2</sup>	: 56.0 dB(A)
Slip	: 2.22 %	Starting method	: Direct On Line
Rated torque	: 8.95 ft.lb	Approx. weight <sup>3</sup>	: 93.3 lb
Locked rotor torque	: 229 %		
Breakdown torque	: 340 %		
Insulation class	: F		
Service factor	: 1.25		
Moment of inertia (J)	: 0.3401 sq.ft.lb		
Design	: B		

Output	50%	75%	100%	Foundation loads	
Efficiency (%)	87.5	88.5	89.5	Max. traction	: 175 lb
Power Factor	0.61	0.73	0.79	Max. compression	: 268 lb

	Drive end	Non drive end
Bearing type	: 6207 ZZ	: 6206 ZZ
Sealing	: V'Ring	: V'Ring
Lubrication interval	: -	: -
Lubricant amount	: -	: -
Lubricant type	Mobil Polyrex EM	

Notes  
USABLE @208V 8.65A SF 1.15 SFA 9.95A

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.

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Performed by				
Checked by				
Date	30/01/2021			

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Revision

# TORQUE AND CURRENT VS SPEED CURVE

Three Phase Induction Motor - Squirrel Cage



Customer :

Product line

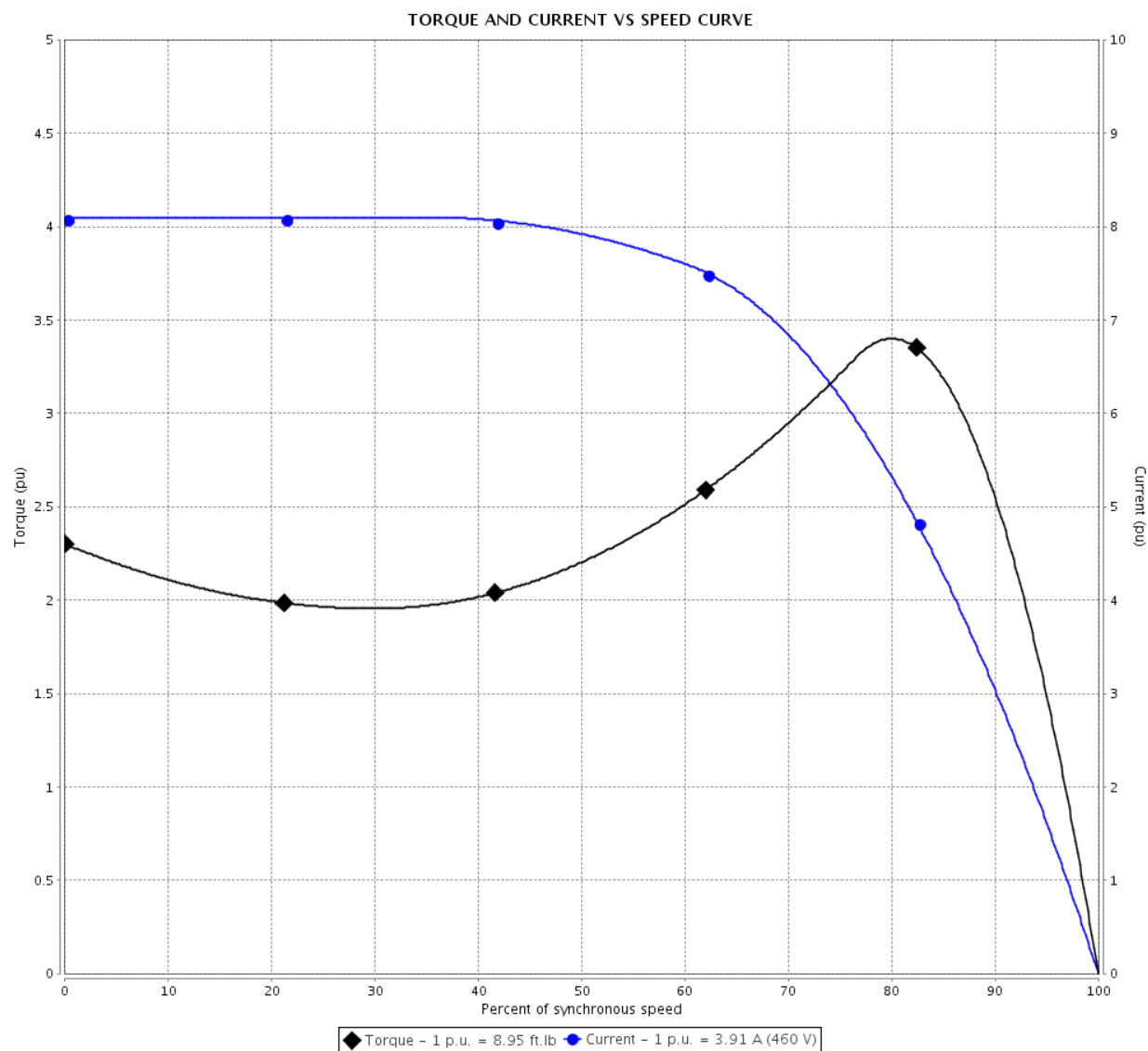
: W22 NEMA Premium Efficiency  
Three-Phase

Product code :

11723870

Catalog # :

00318ET3E182T-W22



Performance : 230/460 V 60 Hz 4P

Rated current : 7.82/3.91 A  
LRC : 8.1  
Rated torque : 8.95 ft.lb  
Locked rotor torque : 229 %  
Breakdown torque : 340 %  
Rated speed : 1760 rpm

Moment of inertia (J) : 0.3401 sq.ft.lb  
Duty cycle : Cont.(S1)  
Insulation class : F  
Service factor : 1.25  
Temperature rise : 80 K  
Design : B

Locked rotor time : 41s (cold) 23s (hot)

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# LOAD PERFORMANCE CURVE

## Three Phase Induction Motor - Squirrel Cage

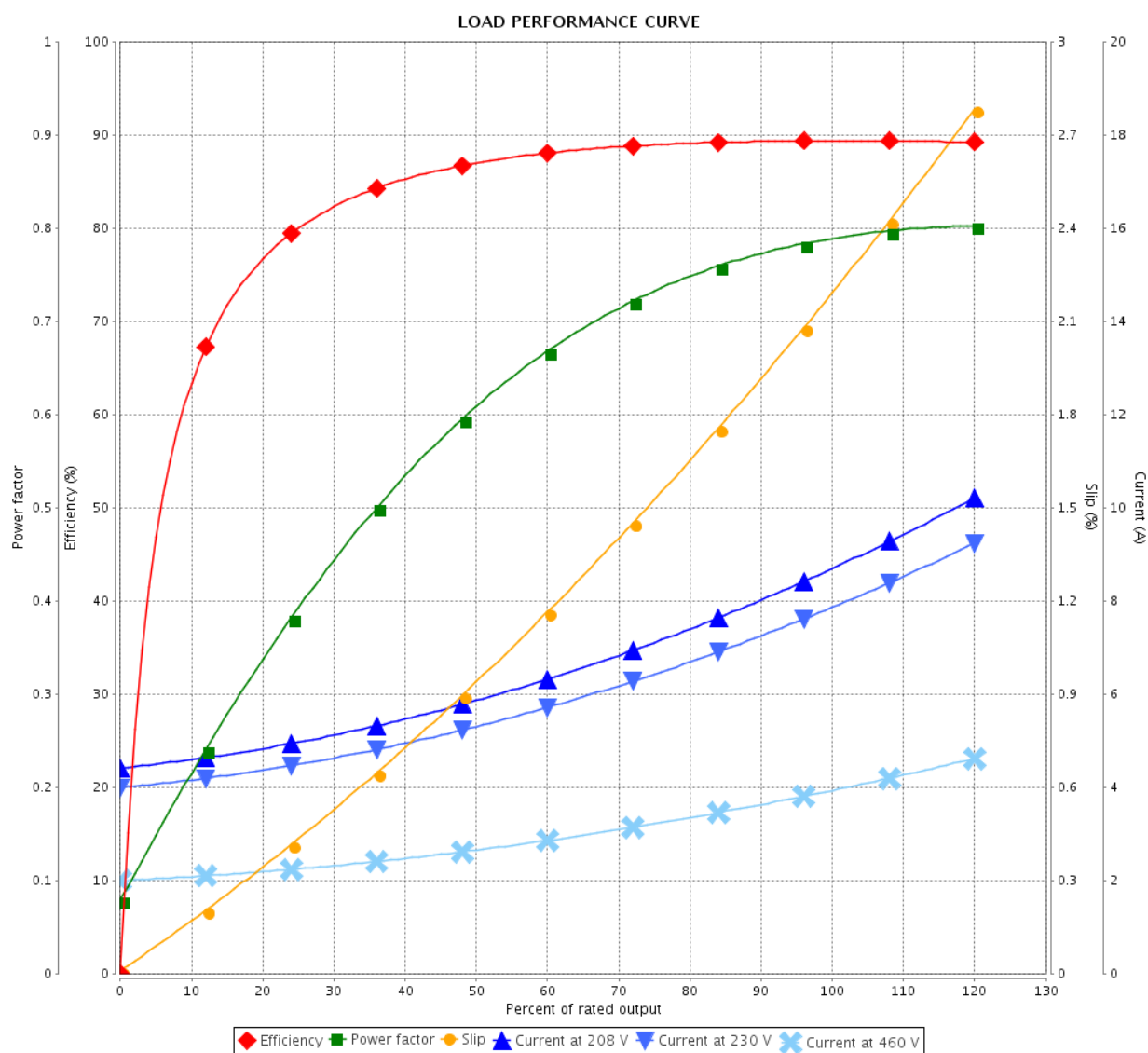


Customer :

Product line : W22 NEMA Premium Efficiency  
Three-Phase

Product code : 11723870

Catalog # : 00318ET3E182T-W22



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# THERMAL LIMIT CURVE

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Service factor : 1.25  
Temperature rise : 80 K  
Design : B

Heating constant

Cooling constant

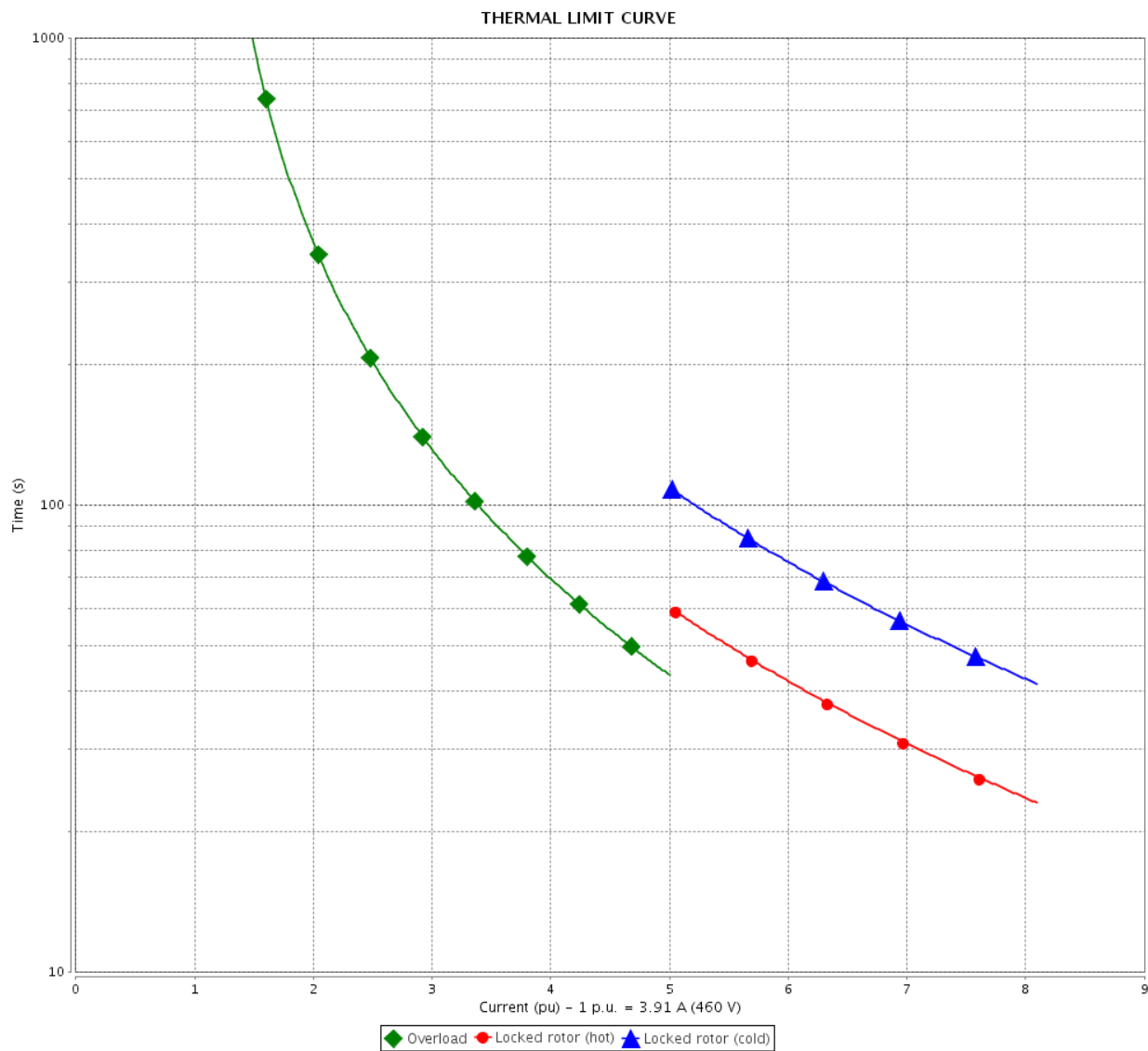
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# THERMAL LIMIT CURVE

Three Phase Induction Motor - Squirrel Cage



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



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# VFD OPERATION CURVE

Three Phase Induction Motor - Squirrel Cage

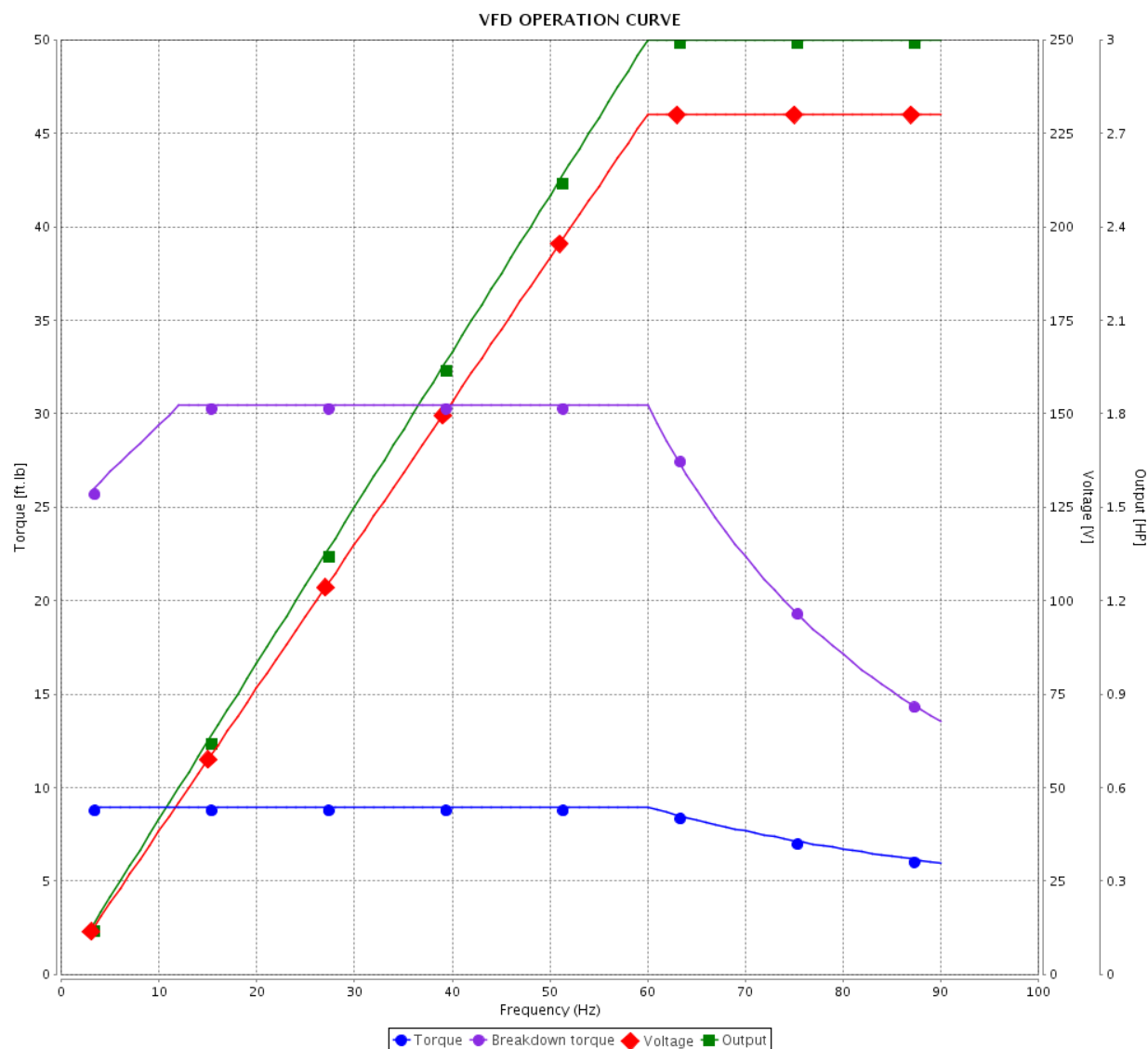


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Catalog # : 00318ET3E182T-W22

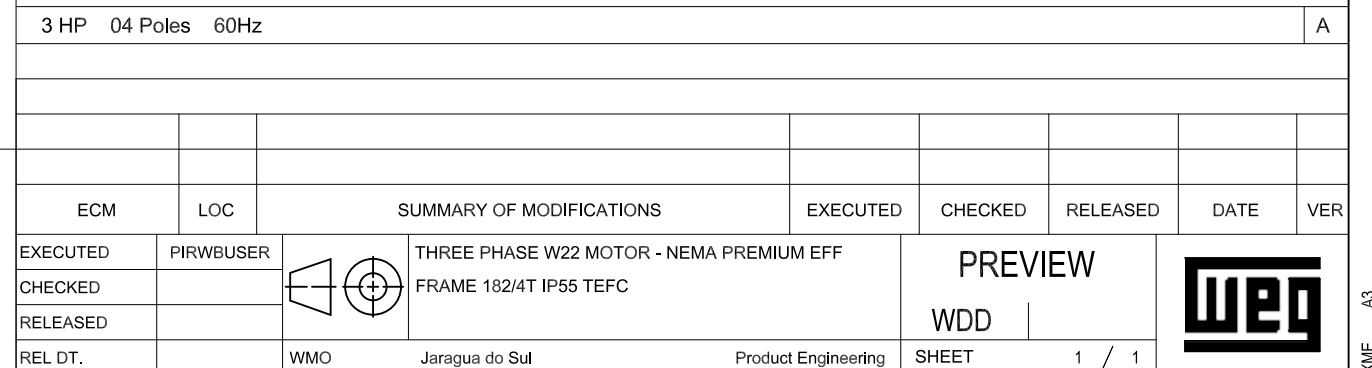
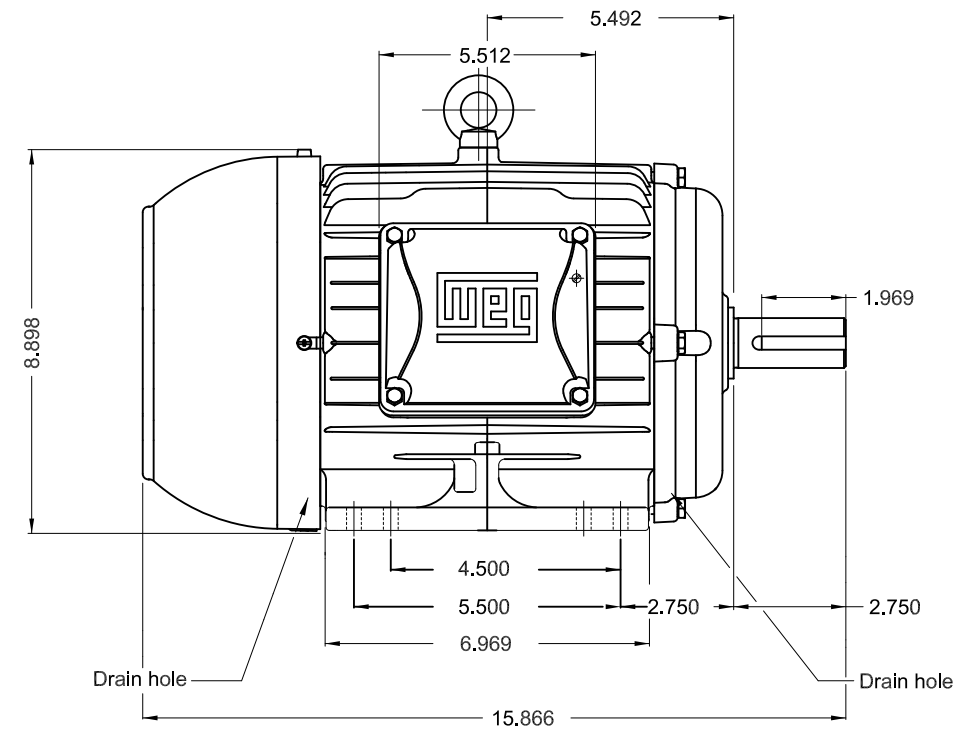


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Design : B

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### Calcium in Singapore

NAME	AGE
...	...

**W22**  
CC029A**NEMA**  
**Premium**® Inverter Duty Motor  
Severe Duty

11723870

MADE IN MEXICO MODEL 00318ET3E182T-W22

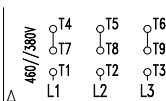
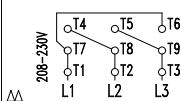
PH 3 | FR 182/4T | HP(kW) 3.0(2.2) | Hz 60 | SF 1.25 | PF 0.79

V 230/460 | A 7.82/3.91 | RPM 1760 | INS. CL. F  $\Delta$ T 80 K | IP55

NEMA NOM EFF 89.5 % | DES B | DUTY CONT. | AMB 40°C

ENCL TEFC | SFA 9.78/4.89 | USABLE @208V 8.65 A | SF 1.15 SFA 9.95

3.0HP 2.2kW 50Hz 380V 4.60A 1445RPM SF1.25 EFF 87.5% (IE3) | CODE K



MOBIL POLYREX EM

ALT 1000 m.a.s.l. | 93 Lbs

For 60Hz: Class I, Div 2, Gr. A, B, C and D - T3  
 Class I, Zone 2, IIC - T3  
 Class II, Div 2, Gr. F and G - T5

For use on PWM, Gr. A, B, C, D, F and G  
 VT1000:1, CT20:1, 1.0SF, T4A



FOR SAFE AREA  
 MOD.TE1BFOXON