

DATA SHEET

Three Phase Induction Motor - Squirrel Cage



Customer		: 02018EG3E256T-W22			
Product line		: W22 Super Premium Efficiency Three-Phase		Product code :	11715185
				Catalog # :	02018EG3E256T-W22
Frame	:	254/6T		Locked rotor time	: 54s (cold) 30s (hot)
Output	:	20 HP (15 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	:	49.4/24.7 A		Protection degree	: IP55
L. R. Amperes	:	366/183 A		Cooling method	: IC411 - TEFC
LRC	:	7.4x(Code J)		Mounting	: F-1
No load current	:	22.0/11.0 A		Rotation ¹	: Both (CW and CCW)
Rated speed	:	1770 rpm		Noise level ²	: 64.0 dB(A)
Slip	:	1.67 %		Starting method	: Direct On Line
Rated torque	:	59.3 ft.lb		Approx. weight ³	: 372 lb
Locked rotor torque	:	260 %			
Breakdown torque	:	300 %			
Insulation class	:	F			
Service factor	:	1.25			
Moment of inertia (J)	:	4.29 sq.ft.lb			
Design	:	A			
Output	25%	50%	75%	100%	Foundation loads
Efficiency (%)	92.4	93.0	93.6	94.1	Max. traction : 805 lb
Power Factor	0.39	0.63	0.75	0.81	Max. compression : 1176 lb
		<u>Drive end</u>		<u>Non drive end</u>	
Bearing type	:	6309 C3		6209 C3	
Sealing	:	V'Ring		V'Ring	
Lubrication interval	:	20000 h		20000 h	
Lubricant amount	:	13 g		9 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.		
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TORQUE AND CURRENT VS SPEED CURVE

Three Phase Induction Motor - Squirrel Cage

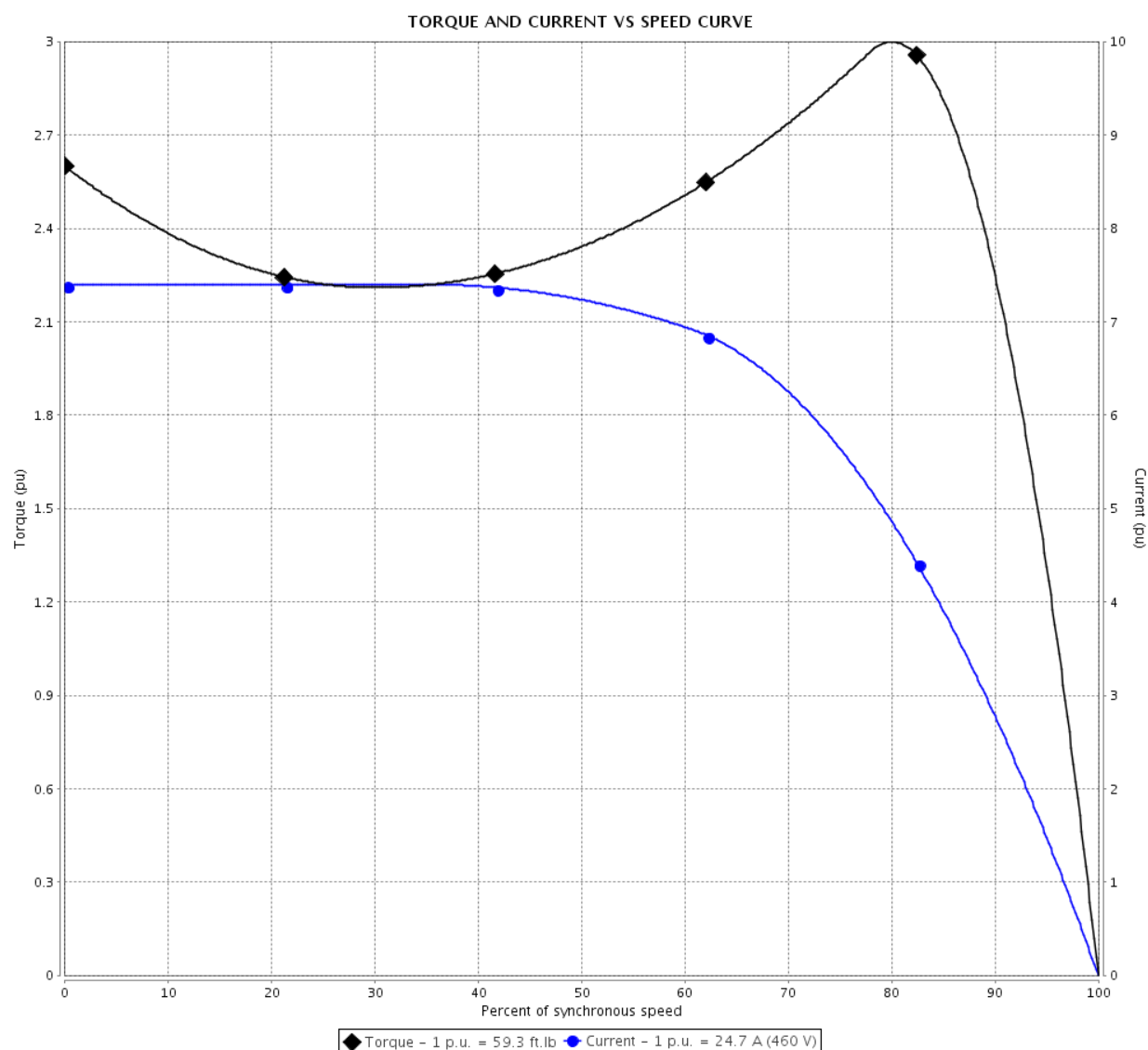


Customer : 02018EG3E256T-W22

Product line : W22 Super Premium Efficiency
Three-Phase

Product code : 11715185

Catalog # : 02018EG3E256T-W22



Performance : 230/460 V 60 Hz 4P

Rated current : 49.4/24.7 A
LRC : 7.4
Rated torque : 59.3 ft.lb
Locked rotor torque : 260 %
Breakdown torque : 300 %
Rated speed : 1770 rpm

Moment of inertia (J) : 4.29 sq.ft.lb
Duty cycle : Cont.(S1)
Insulation class : F
Service factor : 1.25
Temperature rise : 80 K
Design : A

Locked rotor time : 54s (cold) 30s (hot)

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LOAD PERFORMANCE CURVE

Three Phase Induction Motor - Squirrel Cage

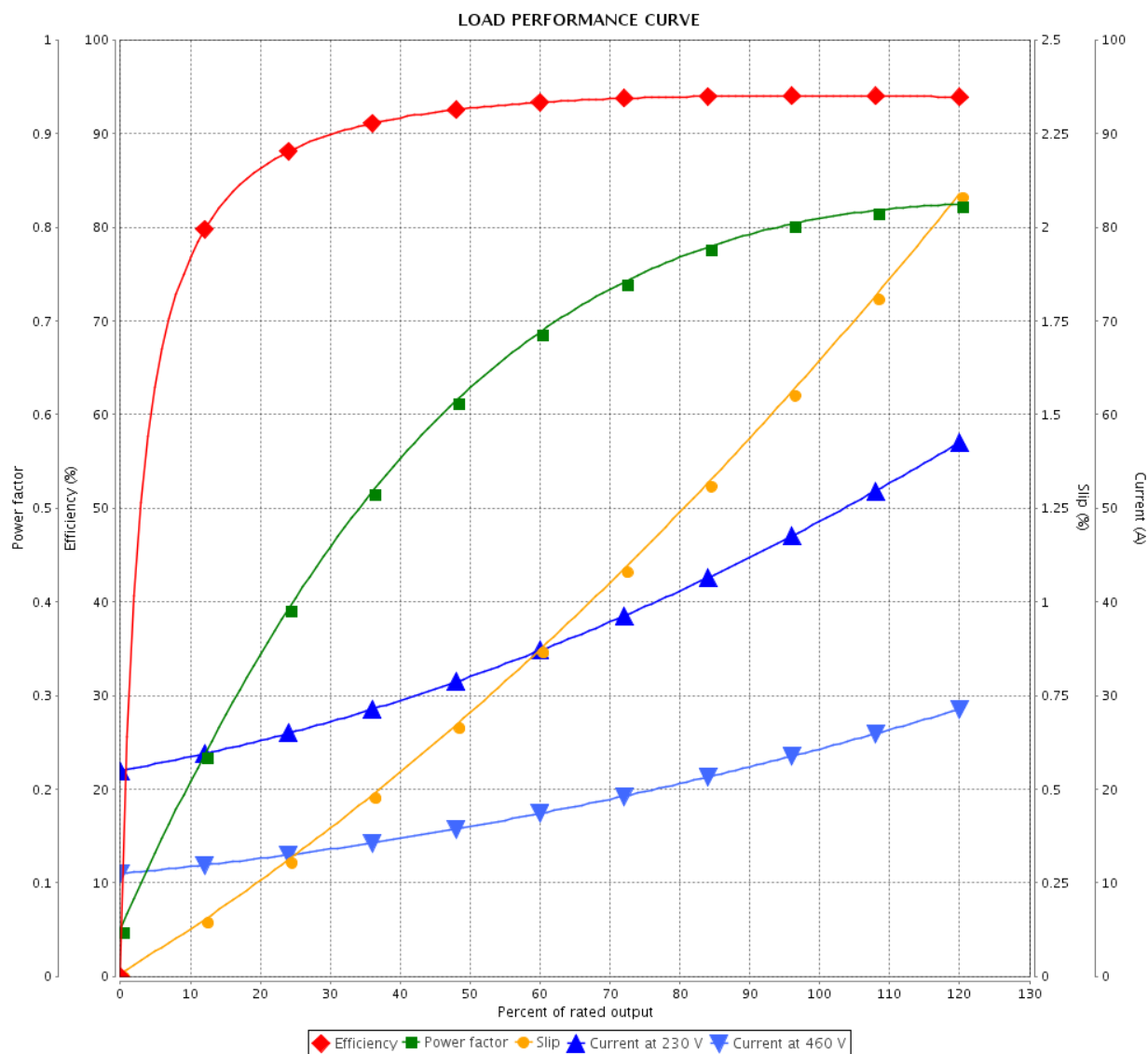


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THERMAL LIMIT CURVE

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Heating constant

Cooling constant

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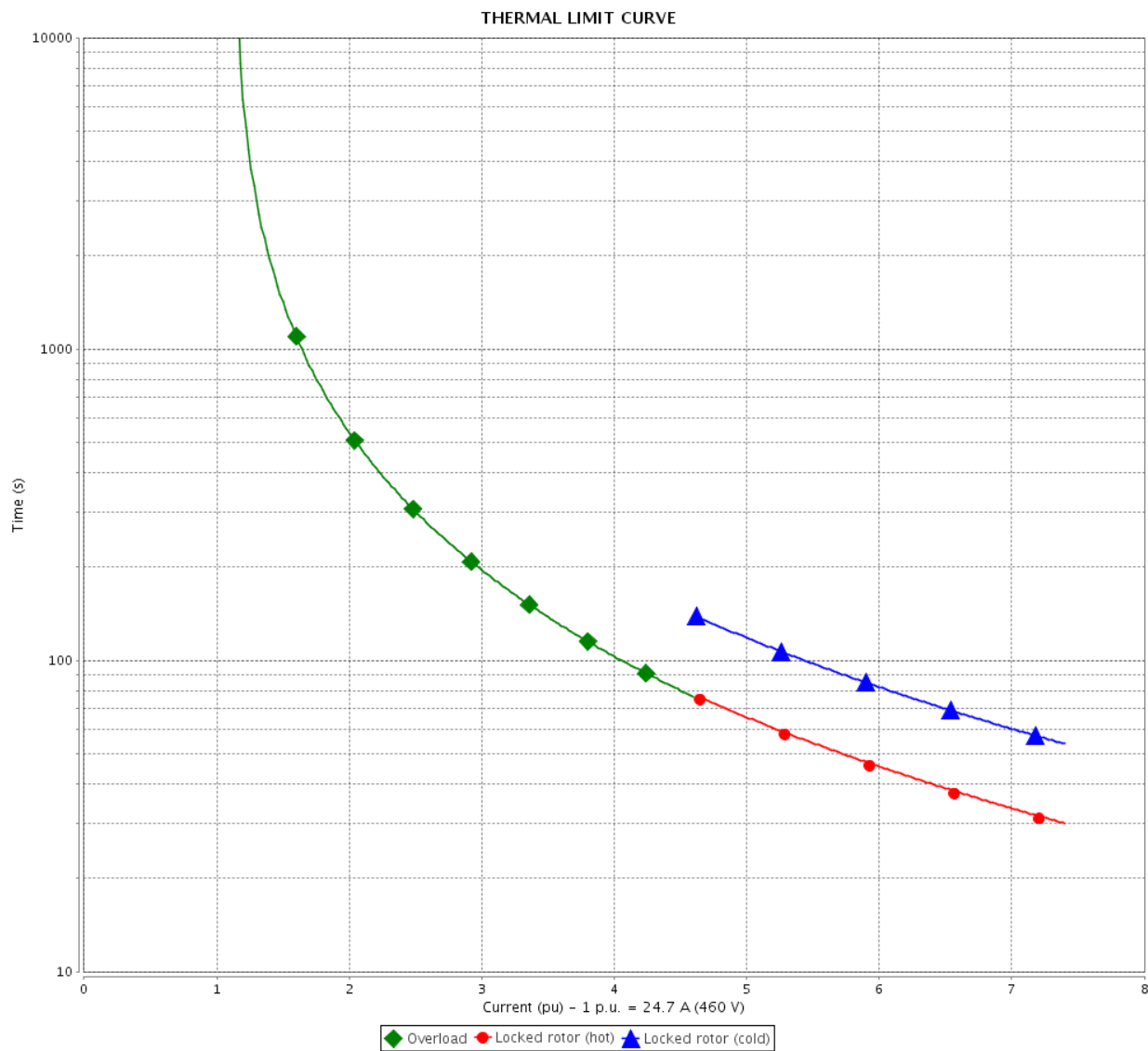
THERMAL LIMIT CURVE

Three Phase Induction Motor - Squirrel Cage



Customer

: 02018EG3E256T-W22



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VFD OPERATION CURVE

Three Phase Induction Motor - Squirrel Cage

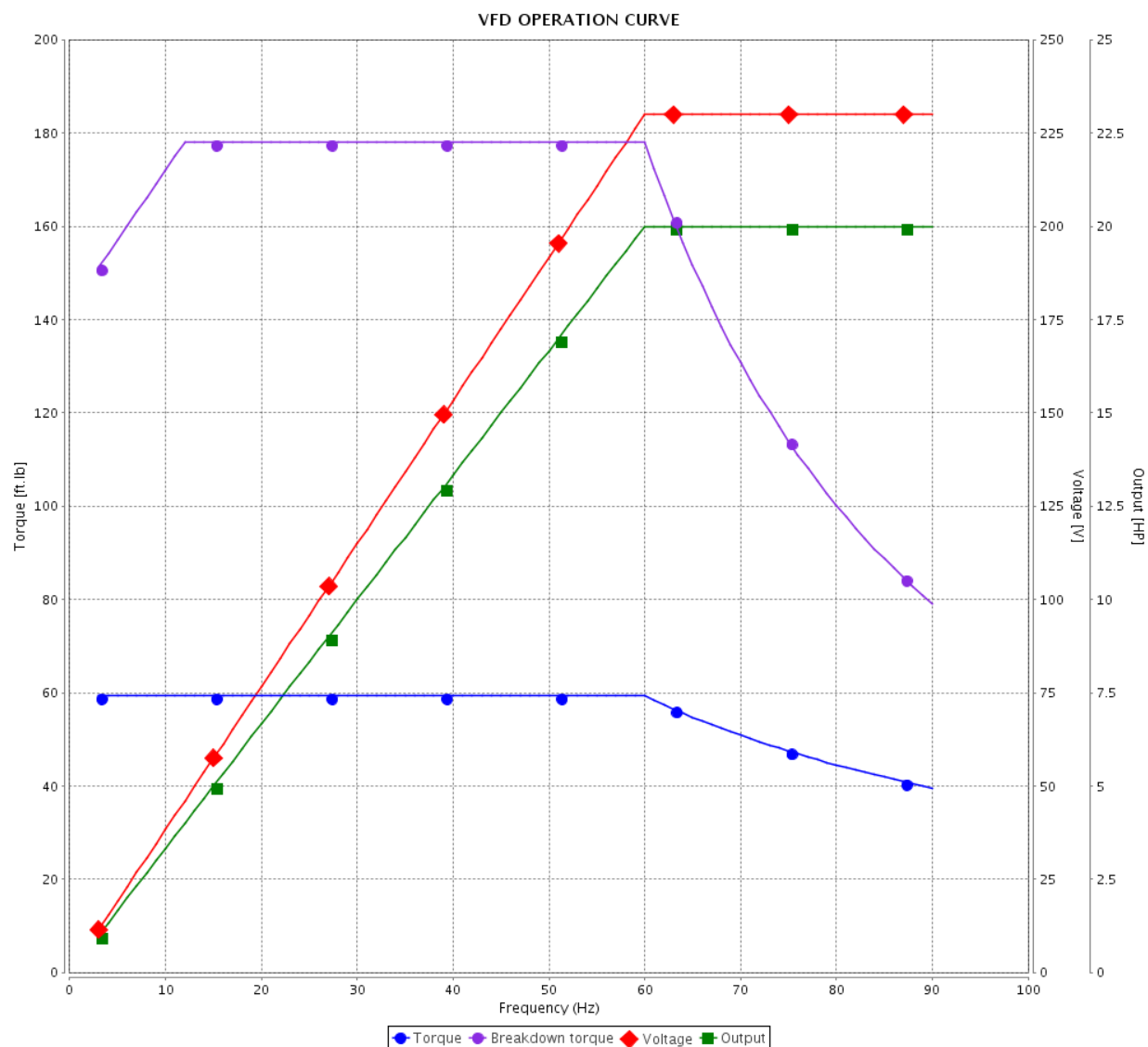


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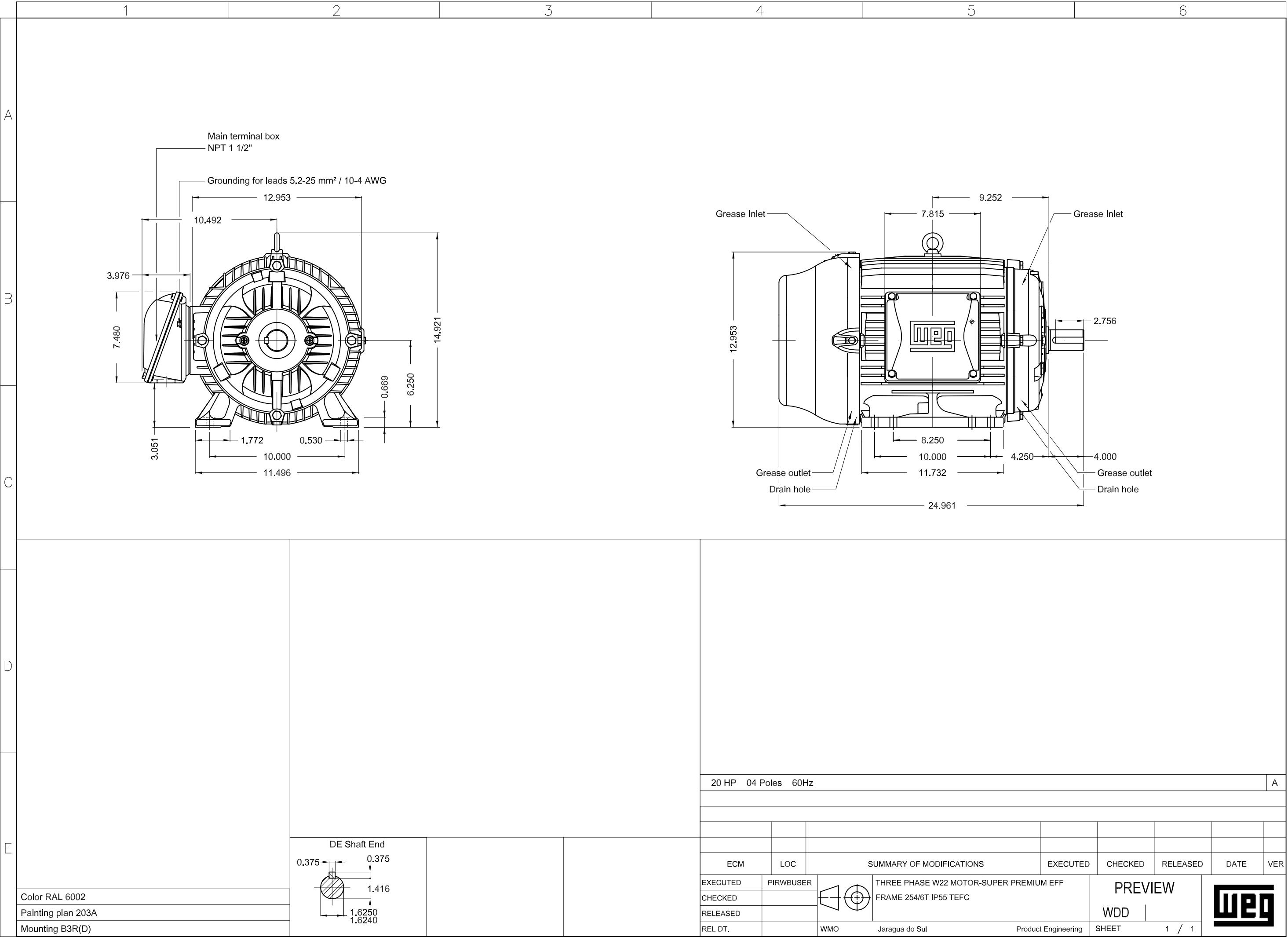


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MODEL 02018EG3E256T-W22
MADE IN BRAZIL
11715185



W22 Super
CC029A Premium

*Inverter Duty Motor
Severe Duty*

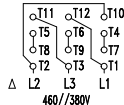
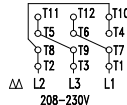


IEC 60034-1
FOR SAFE AREA
MOD.TE1BFOX0+



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 - T4
For 60Hz use on PWM, Gr. A, B, C, D and F,
VT 1000:1, CT 20:1, 1.0SF, T3A

PH 3	FR 254/6T	HP(kW) 20.0(15.0)	Hz 60
V 230/460	A 49.4/24.7	RPM 1770	DES A
NEMA NOM EFF 94.1 %	INS. CL. F Δ T 80 K	IP55	
ENCL TEFC	DUTY CONT.	AMB. 40°C	
CODE J	PF 0.81	SF 1.25	SFA 61.8/30.9
USABLE @208V 54.6 A	SF 1.15	SFA 62.8	
20HP 15kW 50Hz 380V 29.2A 1465RPM SF1.25 EFF 93.0% (IE3)			



→ 6309-C3
→ 6209-C3

MOBIL POLYREX EM
13 g 20000 h

ALT 1000 m.a.s.l. 373 Lbs