DATA SHEET

Three Phase Induction Motor - Squirrel Cage



Customer

Product line : NEMA Premium Efficiency Three-Product code: 11408296

Catalog #: 35012ET3G449T-W22

Frame : L447/9T Cooling method : IC411 - TEFC

Insulation class Mounting : F-1

Duty cycle : Cont.(S1) Rotation¹ : Both (CW and CCW)

: -20°C to +40°C Ambient temperature Starting method : Direct On Line : 1000 m.a.s.l. Approx. weight³ Altitude : 3629 lb

Protection degre	Protection degree : IP55 Moment of inertia (J) : 278 sq.ft.lb				sq.ft.lb
Design		: A			
Output [HP]		350	300	300	300
Poles		6	6	6	6
Frequency [Hz]		60	50	50	50
Rated voltage [V]		460	380	400	415
Rated current [A]		415	420	409	404
L. R. Amperes [A]		2864	2730	2945	3192
LRC [A]		6.9x(Code H)	6.5x(Code G)	7.2x(Code H)	7.9x(Code J)
No load current [A		160	157	172	185
Rated speed [RPN	/ 1]	1190	990	990	990
Slip [%]	Slip [%]		1.00	1.00	1.00
Rated torque [ft.lb]	Rated torque [ft.lb]		1590	1590	1590
Locked rotor torqu	e [%]	250	220	250	280
Breakdown torque	[%]	270	250	280	300
Service factor		1.15	1.00	1.00	1.00
Temperature rise		80 K	80 K	80 K	80 K
Locked rotor time		41s (cold) 23s (hot)	45s (cold) 25s (hot)	39s (cold) 22s (hot)	34s (cold) 19s (hot)
Noise level ²		71.0 dB(A)	70.0 dB(A)	70.0 dB(A)	70.0 dB(A)
	25%	95.3	95.3	95.3	94.5
Efficiency (%)	50%	95.4	95.4	95.4	95.0
Liliciency (70)	75%	95.8	95.8	95.8	95.4
	100%	95.8	95.8	95.8	95.8
	25%	0.42	0.44	0.40	0.37
Power Factor	50%	0.66	0.68	0.64	0.60
I OWEL FACIOI	75%	0.77	0.78	0.75	0.73
	100%	0.82	0.83	0.81	0.79

Drive end Non drive end Foundation loads

Bearing type 6322 C3 6319 C3 Max. traction : 10913 lb Sealing WSeal WSeal Max. compression : 14541 lb

11000 h 13000 h Lubrication interval Lubricant amount 45 g 60 g Mobil Polyrex EM Lubricant type

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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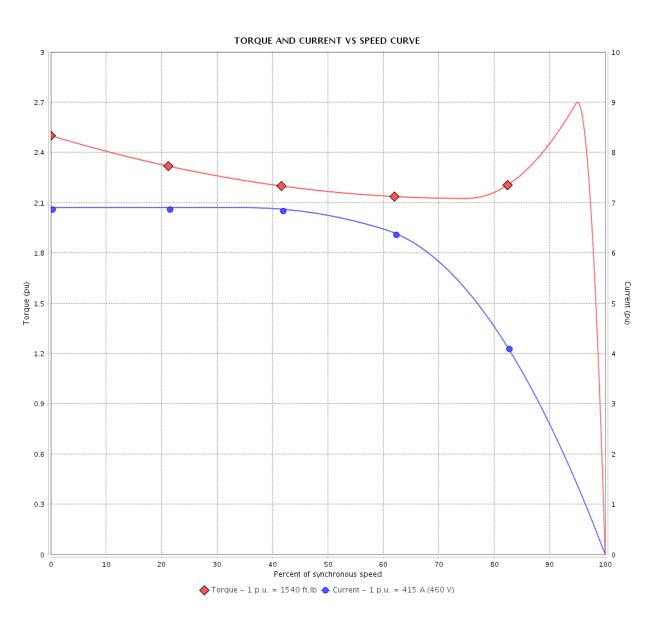
Three Phase Induction Motor - Squirrel Cage



Customer

Product line : NEMA Premium Efficiency Three-Product code: 11408296

Catalog #: 35012ET3G449T-W22



Performance : 460 V 60 Hz 6P Rated current : 415 A Moment of inertia (J) : 278 sq.ft.lb **LRC** : 6.9 Duty cycle : Cont.(S1) : F Insulation class Rated torque : 1540 ft.lb Service factor Locked rotor torque : 250 % : 1.15 : 80 K Breakdown torque : 270 % Temperature rise Rated speed : 1190 rpm Design : A Locked rotor time : 41s (cold) 23s (hot)

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Three Phase Induction Motor - Squirrel Cage Customer Product line : NEMA Premium Efficiency Three-Product code: 11408296 Catalog #: 35012ET3G449T-W22 TORQUE AND CURRENT VS SPEED CURVE 2.7 2.1 Current Torque (pu) 1.2 0.6 0.3 Percent of synchronous speed ◆ Torque - 1 p.u. = 1590 ft.lb ◆ Current - 1 p.u. = 420 A (380 V)

Performance : 380 V 50 Hz 6P IE3 Rated current : 420 A Moment of inertia (J) : 278 sq.ft.lb **LRC** : 6.5 Duty cycle : Cont.(S1) : 1590 ft.lb Insulation class : F Rated torque : 220 % Locked rotor torque Service factor : 1.00 Breakdown torque : 250 % Temperature rise : 80 K Rated speed : 990 rpm : A Design Locked rotor time : 45s (cold) 25s (hot)

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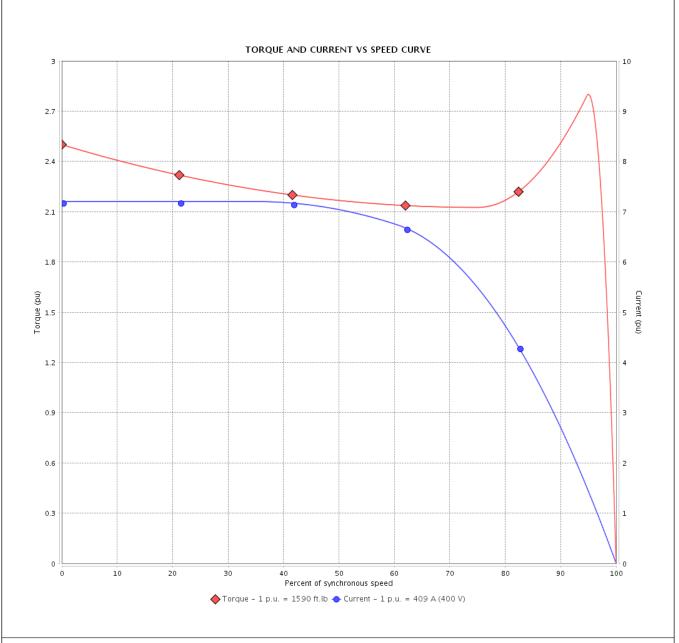
Customer :

Product line : NEMA Premium Efficiency Three-

Phase

Product code: 11408296

Catalog #: 35012ET3G449T-W22



Performance : 400 V 50 Hz 6P IE3 Rated current : 409 A Moment of inertia (J) : 278 sq.ft.lb **LRC** : 7.2 Duty cycle : Cont.(S1) : F : 1590 ft.lb Insulation class Rated torque Service factor Locked rotor torque : 250 % : 1.00 : 80 K Breakdown torque : 280 % Temperature rise

Locked rotor time : 39s (cold) 22s (hot)

: 990 rpm

Rated speed

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Design

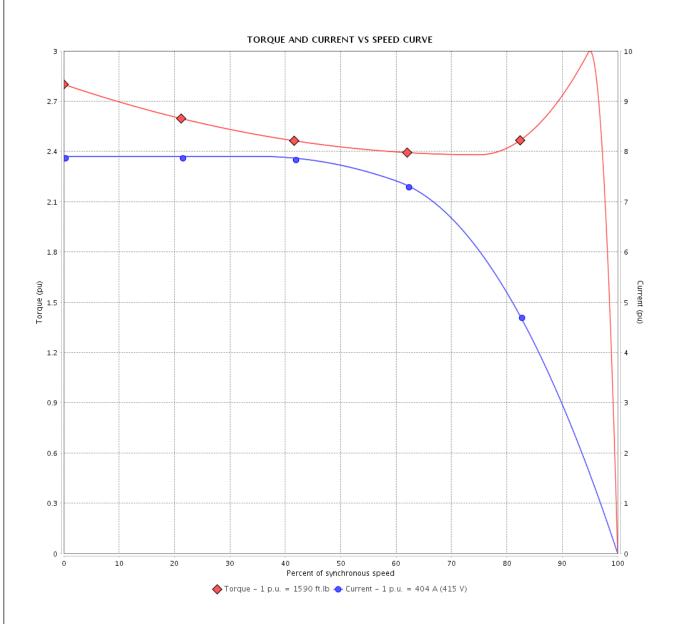
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Three Phase Induction Motor - Squirrel Cage



Customer Product line : NEMA Premium Efficiency Three-Product code: 11408296

> Catalog #: 35012ET3G449T-W22



Performance	: 415 V 50 Hz 6P IE3			
Rated current	: 404 A	Moment of inertia (J)	: 278 sq.ft.lb	
LRC	: 7.9	Duty cycle	: Cont.(S1)	
Rated torque	: 1590 ft.lb	Insulation class	: F	
Locked rotor torque	: 280 %	Service factor	: 1.00	
Breakdown torque	: 300 %	Temperature rise	: 80 K	
Rated speed	: 990 rpm	Design	: A	
Locked rotor time	: 34s (cold) 19s (hot)			

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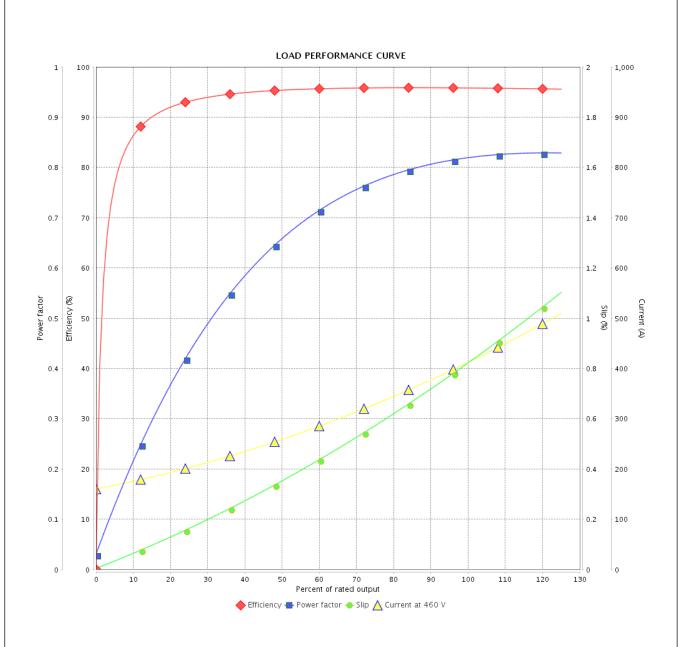
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Product line : NEMA Premium Efficiency Three-Product code:

11408296

Catalog #: 35012ET3G449T-W22



Performance		: 460 V 60 Hz 6P				
LRC : 6. Rated torque : 1! Locked rotor torque : 2! Breakdown torque : 2		: 415 A : 6.9 : 1540 ft.lb : 250 % : 270 % : 1190 rpm	Duty cycle Insulation Service fa	Moment of inertia (J) : 278 sq.ft.lb Duty cycle : Cont.(S1) Insulation class : F Service factor : 1.15 Temperature rise : 80 K Design : A		
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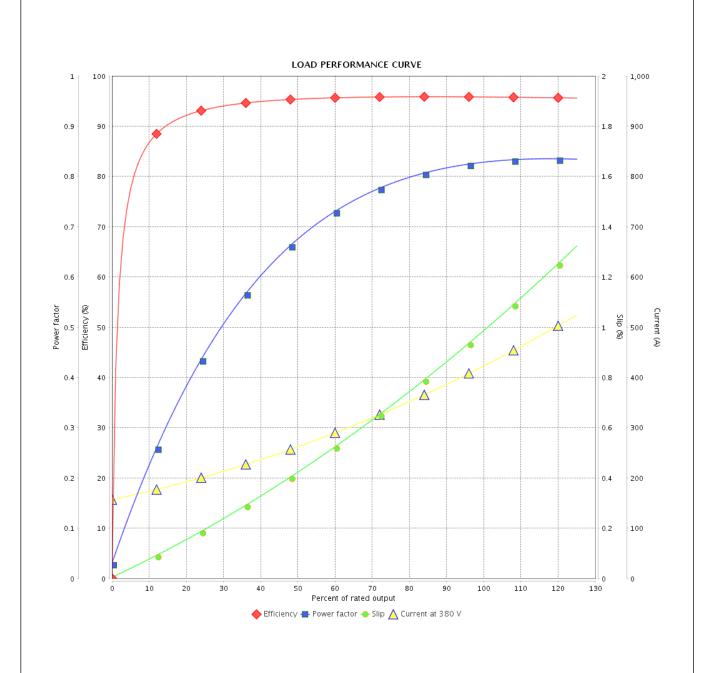
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Customer

Product line : NEMA Premium Efficiency Three-Product code: 11408296

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Performance	: 3	80 V 50 Hz 6P IE3				
Rated current	: 4:	20 A	Moment o	of inertia (J)	: 278 sq.ft.lb	
LRC	: 6	.5	Duty cycle	9	: Cont.(S1)	
Rated torque	: 1:	590 ft.lb	Insulation	class	: F	
Locked rotor torg	jue : 2:	20 %	Service fa	actor	: 1.00	
Breakdown torqu	ie : 2	50 %	% Temperature rise		: 80 K	
Rated speed	: 99	90 rpm	Design		: A	
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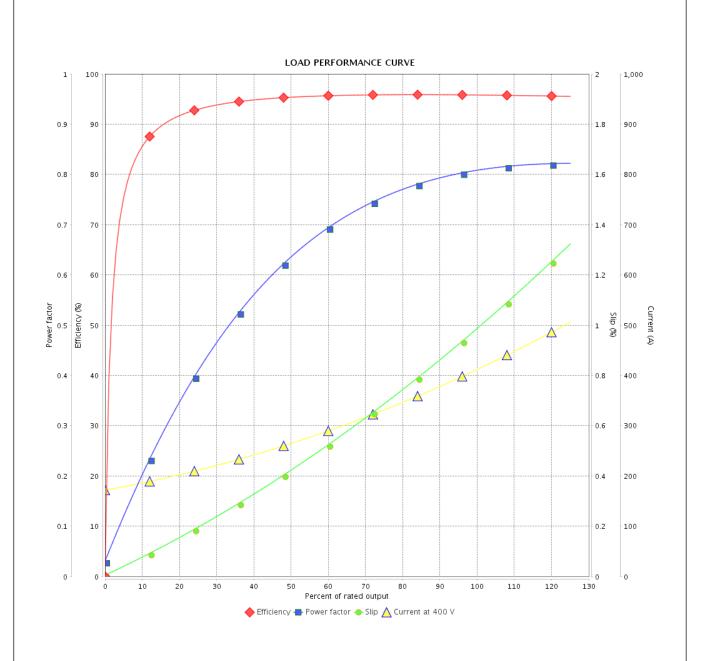
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Product line : NEMA Premium Efficiency Three- Product code :

Phase

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Performance	: 4	400 V 50 Hz 6P IE3				
Rated current	: 4	409 A	Moment of	of inertia (J)	: 278 sq.ft.lb	
LRC	: 7	7.2	Duty cycle	е	: Cont.(S1)	
Rated torque	: '	1590 ft.lb	Insulation	class	: F	
Locked rotor torg	que : 2	250 %	Service fa	actor	: 1.00	
Breakdown torqu	ie : 2	280 %	Temperat	ure rise	: 80 K	
Rated speed	: 9	990 rpm	Design		: A	
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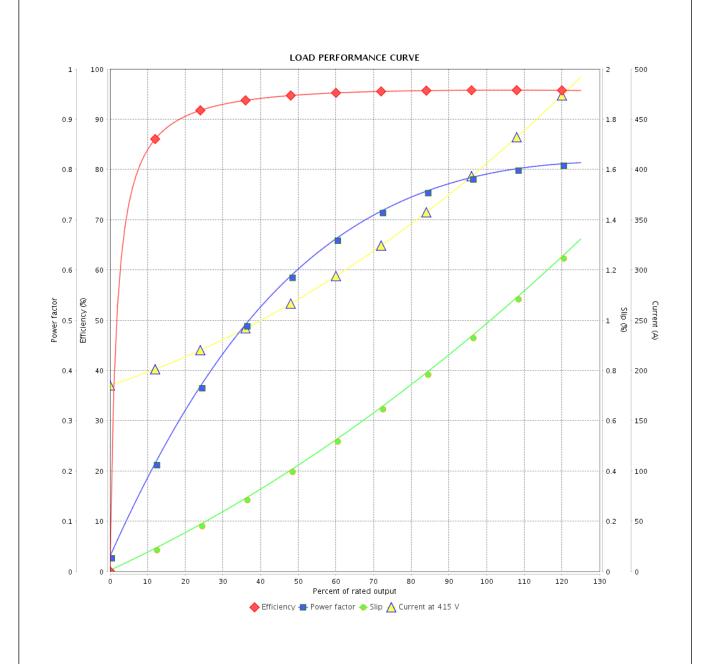


Customer

Product line : NEMA Premium Efficiency Three- Product code : 11408296

Phase

Catalog #: 35012ET3G449T-W22



Performance	: 4	415 V 50 Hz 6P IE3				
Rated current	: 4	404 A	Moment o	f inertia (J)	: 278 sq.ft.lb	
LRC	:	7.9	Duty cycle	;	: Cont.(S1)	
Rated torque	:	1590 ft.lb	Insulation	class	: F	
Locked rotor torqu	ie ::	280 %	Service fa	ctor	: 1.00	
Breakdown torque	e ::	300 %	Temperature rise		: 80 K	
Rated speed	: 9	990 rpm	Design		: A	
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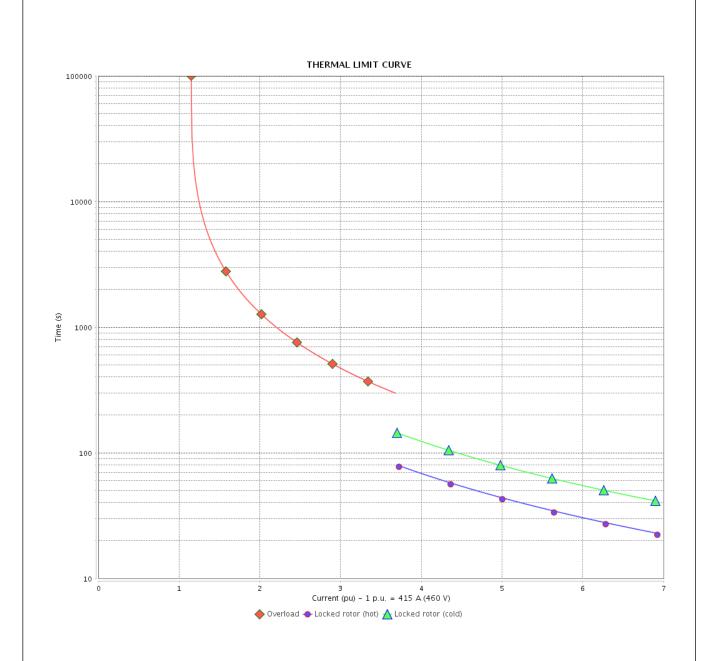


Customer	:				
Product line	: NEMA Premium Efficiency Phase		Product code : Catalog # :	11408296 35012ET3G4	49T-W22
Performance	: 460 V 60 Hz 6P				
Rated current	: 415 A	Moment o	f inertia (J)	: 278 sq.ft.lb	
LRC Rated torque	: 6.9 : 1540 ft.lb	Duty cycle Insulation	e class	: Cont.(S1) : F	
Locked rotor torque	: 250 %	Service fa	ctor	: 1.15	
Breakdown torque Rated speed	: 270 % : 1190 rpm	Temperatu Design	ıre rise	: 80 K : A	
Heating constant	•				
Cooling constant					
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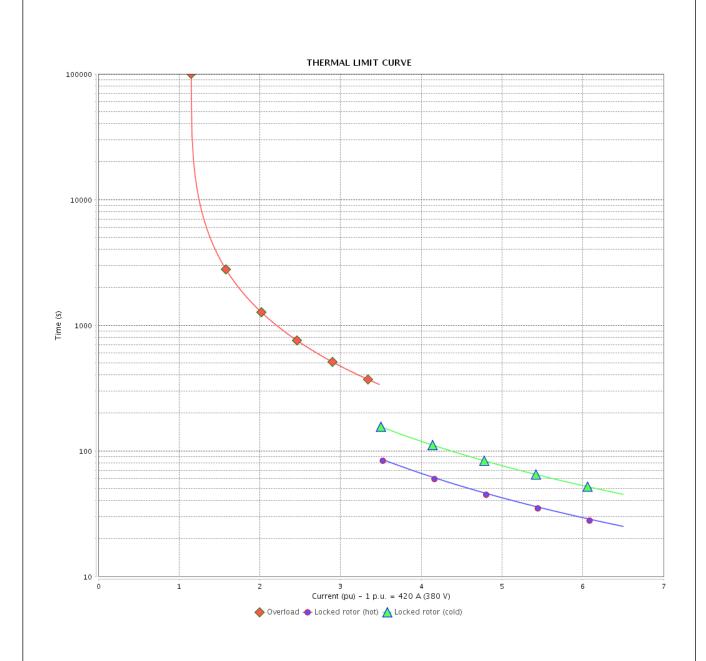


Customer	:				
Product line	: NEMA Premium Efficiency ⁻ Phase		Product code :	11408296	
			Catalog # :	35012ET3G4	49T-W22
Performance	: 380 V 50 Hz 6P IE3	1			
LRC Rated torque Locked rotor torque Breakdown torque	: 420 A : 6.5 : 1590 ft.lb : 220 % : 250 % : 990 rpm	Moment o Duty cycle Insulation Service fa Temperatu Design	class ctor	: 278 sq.ft.lb : Cont.(S1) : F : 1.00 : 80 K : A	
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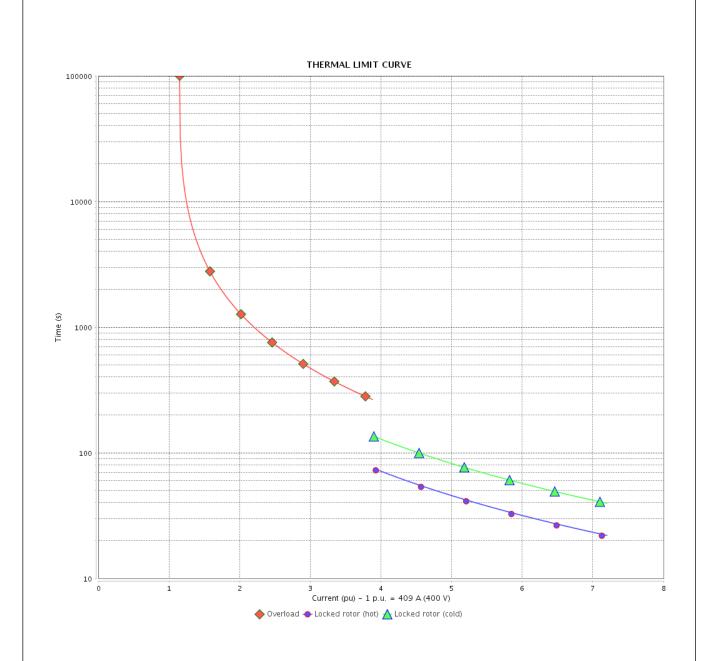


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Product line	: NEMA Premium Efficiency ⁻ Phase		Product code :	11408296	
			Catalog # :	35012ET3G4	49T-W22
Performance	: 400 V 50 Hz 6P IE3				
LRC Rated torque Locked rotor torque Breakdown torque	: 409 A : 7.2 : 1590 ft.lb : 250 % : 280 % : 990 rpm	Moment o Duty cycle Insulation Service fa Temperatu Design	class ctor	: 278 sq.ft.lb : Cont.(S1) : F : 1.00 : 80 K : A	
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Heating constant					
Cooling constant	Changes Cumman		Dorformad	Chaakad	Doto
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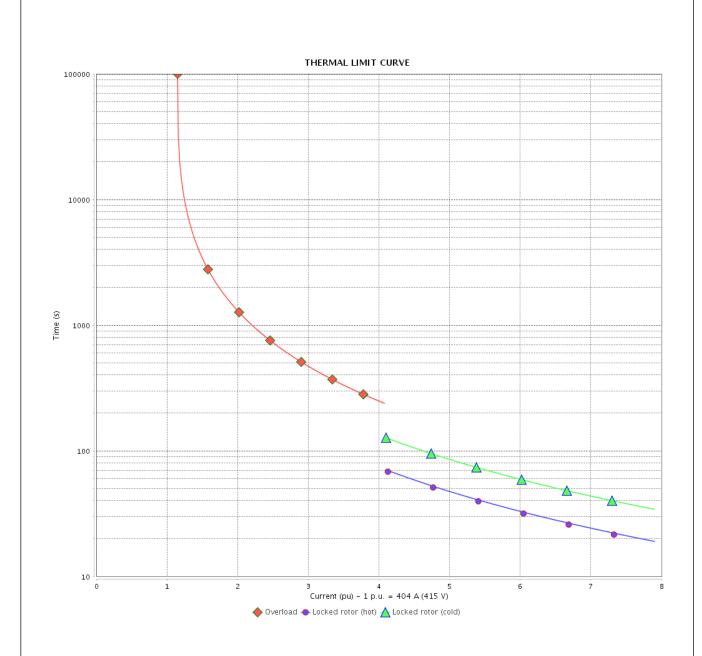


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Product line	: NEMA Premium Efficiency Phase		oduct code :	11408296	
		Ca	talog # :	35012ET3G44	19T-W22
Performance	: 415 V 50 Hz 6P IE3				
Rated current LRC Rated torque Locked rotor torque Breakdown torque Rated speed	: 404 A : 7.9 : 1590 ft.lb : 280 % : 300 % : 990 rpm	Moment of in Duty cycle Insulation cla Service facto Temperature Design	ass or	: 278 sq.ft.lb : Cont.(S1) : F : 1.00 : 80 K : A	
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Heating constant Cooling constant					
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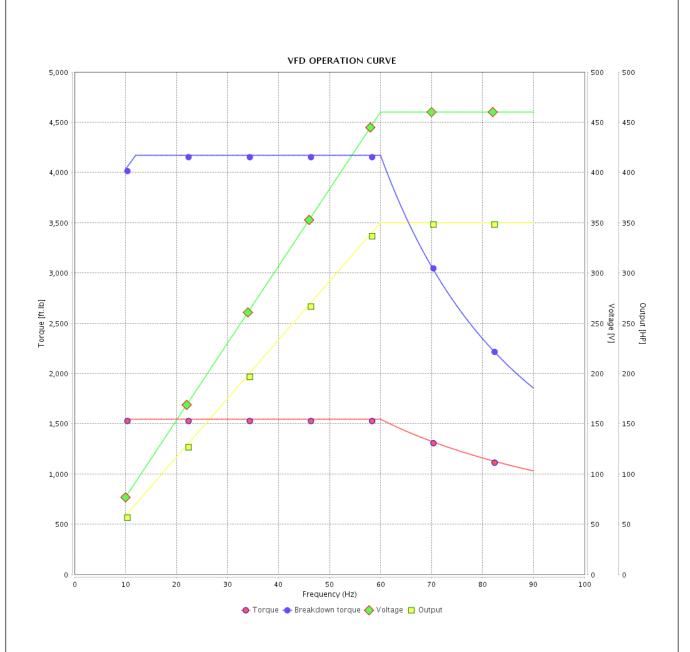
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Product line : NEMA Premium Efficiency Three-

Phase

Product code: 11408296

Catalog #: 35012ET3G449T-W22



Performance : 460 V 60 Hz 6P Rated current : 415 A Moment of inertia (J) : 278 sq.ft.lb **LRC** Duty cycle : 6.9 : Cont.(S1) : 1540 ft.lb Insulation class : F Rated torque Locked rotor torque : 250 % Service factor : 1.15 Breakdown torque : 270 % Temperature rise : 80 K Rated speed : 1190 rpm Design : A Rev. Performed Checked Date **Changes Summary** Performed by Checked by Revision Page

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Product line : NEMA Premium Efficiency Three- Product code : 11408296

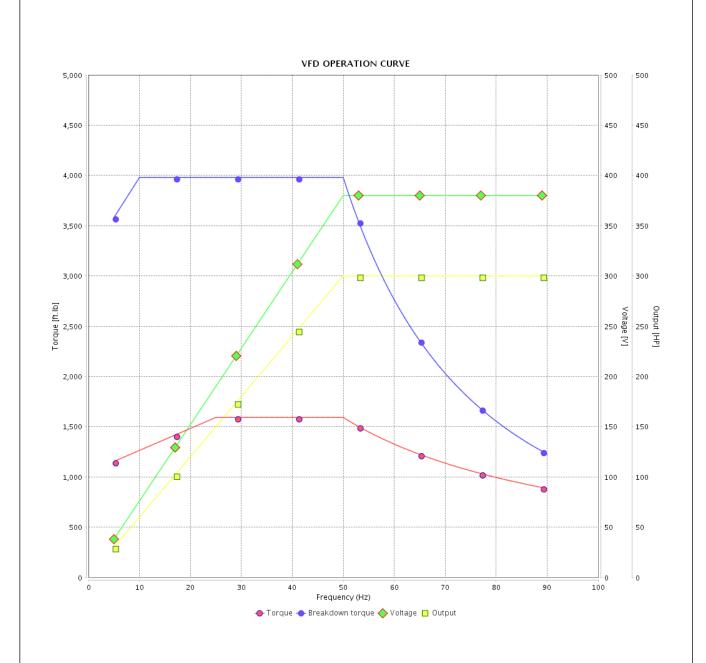
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Performance	: 380 V 50 Hz 6P IE3				
Rated current LRC Rated torque Locked rotor torque Breakdown torque Rated speed	: 420 A : 6.5 : 1590 ft.lb : 220 % : 250 % : 990 rpm	Duty cycle : Cont.(S1) Insulation class : F Service factor : 1.00 Temperature rise : 80 K		: F : 1.00	
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Product line : NEMA Premium Efficiency Three- Product code :

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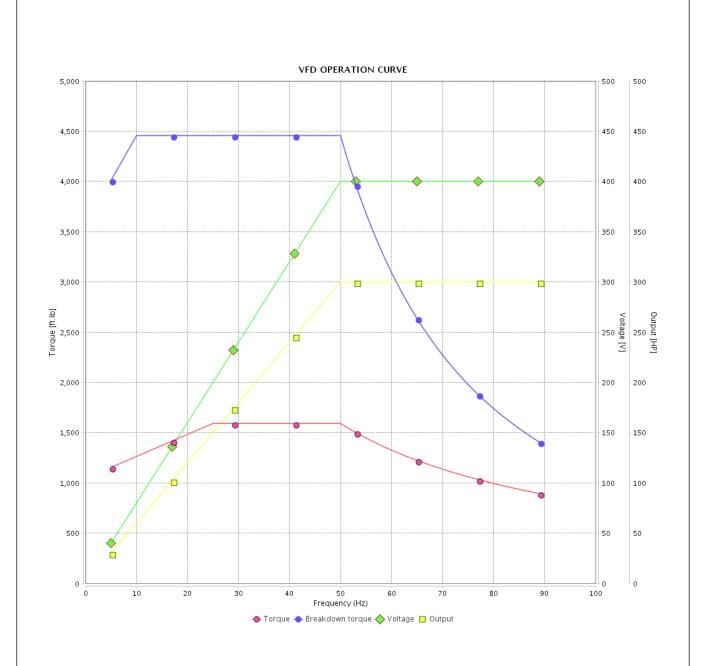
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Performance	:	400 V 50 Hz 6P IE3				
Rated current LRC Rated torque Locked rotor tord Breakdown torqu Rated speed	: : : : : : : :	409 A 7.2 1590 ft.lb 250 % 280 % 990 rpm	Moment of Duty cycle Insulation Service fa Temperat Design	class ector	: 278 sq.ft.lb : Cont.(S1) : F : 1.00 : 80 K : A	
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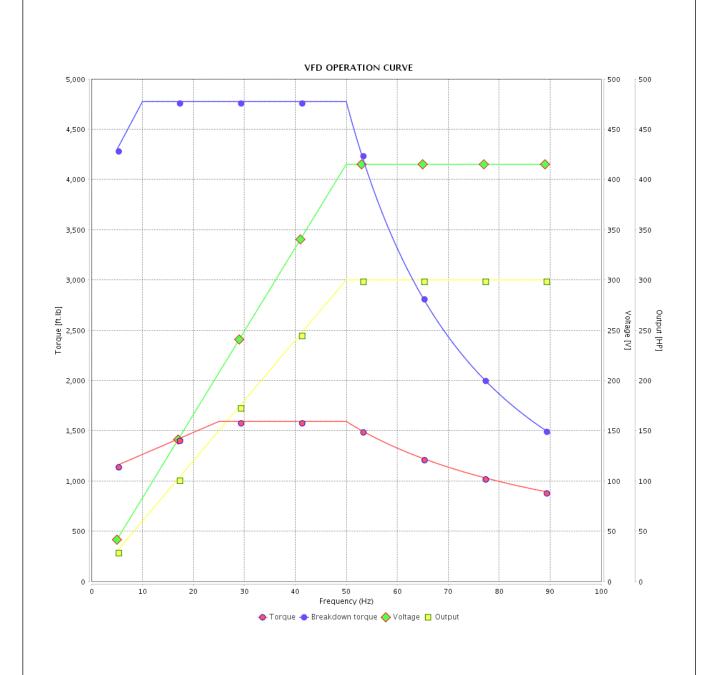


Customer

Product line : NEMA Premium Efficiency Three- Product code : 11408296

Phase

Catalog #: 35012ET3G449T-W22



Performance	: 4	115 V 50 Hz 6P IE3	5 V 50 Hz 6P IE3			
Rated current	: 4	104 A	04 A Moment of inertia (J)		: 278 sq.ft.lb	
LRC	: 7	7.9	Duty cycle	;	: Cont.(S1)	
Rated torque	: 1	1590 ft.lb	Insulation	class	: F	
Locked rotor tord	que : 2	280 %	Service factor		: 1.00	
Breakdown torque		300 %	Temperati	Temperature rise		
Rated speed	: 9	0 rpm Design		: A		
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