DATA SHEET

Three Phase Induction Motor - Squirrel Cage



: 03018ST3QIE286TC-W22 Customer Product line : W22 IEEE 841 NEMA Premium Product code: 11545431 Efficiency Three-Phase Catalog #: 03018ST3QIE286TC-W22 Frame : 284/6TC Locked rotor time : 36s (cold) 20s (hot) Output : 30 HP (22 kW) Temperature rise : 80 K Poles Duty cycle : Cont.(S1) : -20°C to +40°C Frequency : 60 Hz Ambient temperature Rated voltage : 460 V : 1000 m.a.s.l. Altitude Rated current : 35.1 A Protection degree : IP55 L. R. Amperes : 214 A Cooling method : IC411 - TEFC LRC : 6.1x(Code G) Mounting : F-1 No load current : 13.0 A Rotation¹ : Both (CW and CCW) Rated speed : 1760 rpm Noise level² : 63.0 dB(A) Starting method Slip : 2.22 % : Direct On Line Rated torque : 88.3 ft.lb Approx. weight³ : 463 lb Locked rotor torque : 240 % Breakdown torque : 240 % Insulation class : F Service factor : 1.25 Moment of inertia (J) : 5.85 sq.ft.lb Design : B 25% 50% 75% 100% Output Foundation loads 93.6 : 996 lb Efficiency (%) 92.3 93.0 93.0 Max. traction Power Factor 0.80 0.84 0.46 0.70 Max. compression : 1459 lb Drive end Non drive end Bearing type 6311 C3 6211 C3 Inpro/Seal Inpro/Seal Sealing Lubrication interval 20000 h 20000 h Lubricant amount 18 g 11 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



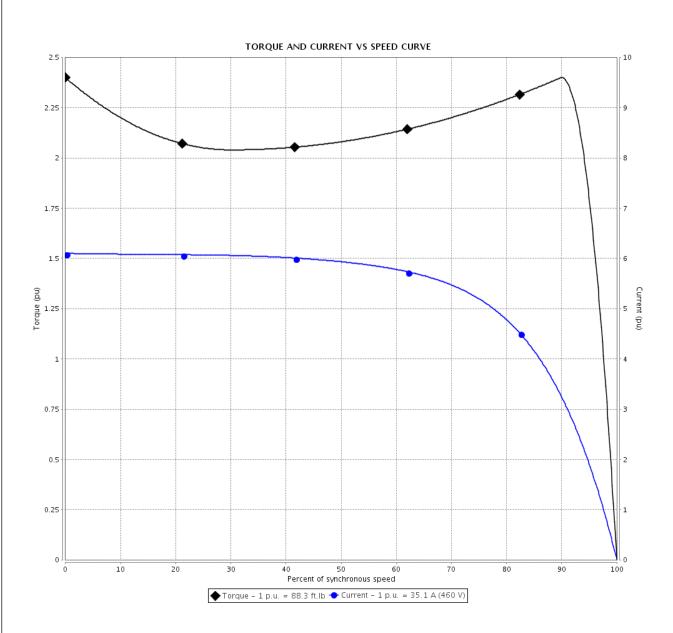
Customer : 03018ST3QIE286TC-W22

Product line : W22 IEEE 841 NEMA Premium

Efficiency Three-Phase

Product code: 11545431

Catalog #: 03018ST3QIE286TC-W22



: 460 V 60 Hz 4P Performance Rated current : 35.1 A Moment of inertia (J) : 5.85 sq.ft.lb **LRC** : 6.1 Duty cycle : Cont.(S1) : 88.3 ft.lb Insulation class Rated torque : F Service factor Locked rotor torque : 240 % : 1.25 Breakdown torque : 240 % Temperature rise : 80 K Rated speed : 1760 rpm Design : B

Locked rotor time : 36s (cold) 20s (hot)

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LOAD PERFORMANCE CURVE

Three Phase Induction Motor - Squirrel Cage



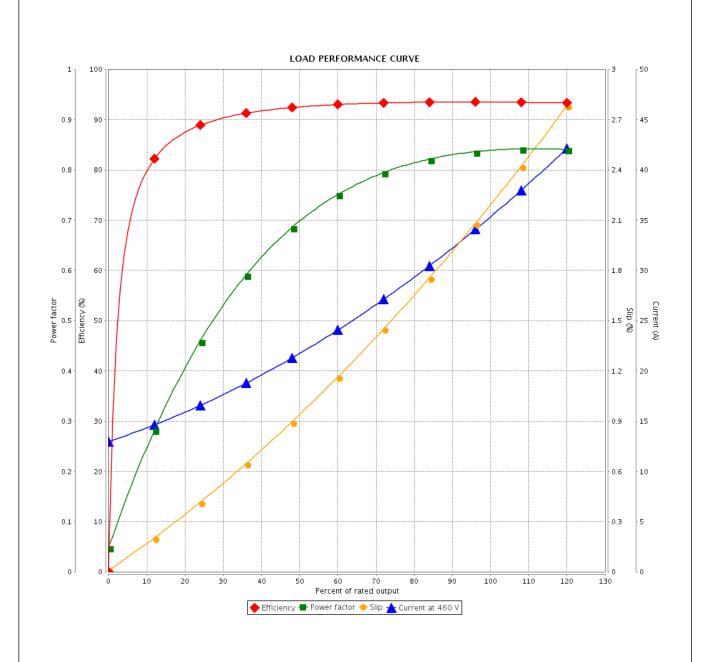
Customer : 03018ST3QIE286TC-W22

Product line : W22 IEEE 841 NEMA Premium Prod

Efficiency Three-Phase

Product code: 11545431

Catalog #: 03018ST3QIE286TC-W22



Performance	: 460 V 60 Hz 4P				
Rated current	: 35.1 A	Moment o	of inertia (J)	: 5.85 sq.ft.lb	
LRC	: 6.1	Duty cycle		: Cont.(S1)	
Rated torque	: 88.3 ft.lb	Insulation class		:F	
Locked rotor torque	: 240 %	Service fa	Service factor		
Breakdown torque	: 240 %	Temperature rise Design		: 80 K : B	
Rated speed	: 1760 rpm				
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THERMAL LIMIT CURVE

Three Phase Induction Motor - Squirrel Cage



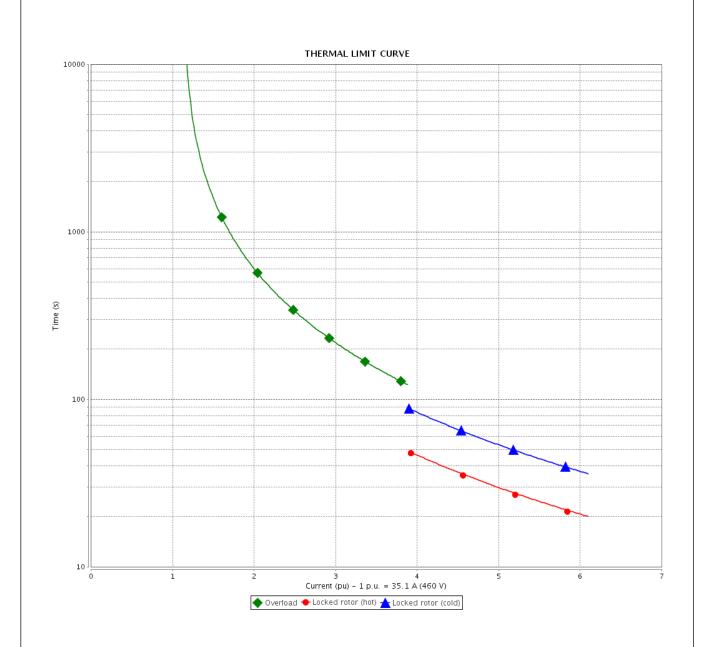
Customer	: (03018ST3QIE286TC-W22				
Product line		N22 IEEE 841 NEMA Prem fficiency Three-Phase		Product code :	11545431 03018ST3QIE	E286TC-W22
Performance Rated current LRC	: 35 : 6.		Moment of Duty cycle		: 5.85 sq.ft.lb : Cont.(S1)	
Rated torque Locked rotor torc Breakdown torqu Rated speed Heating constant	: 88 que : 2 ⁴ ue : 2 ² : 17	3.3 ft.lb 40 % 40 % 760 rpm	Insulation Service fac Temperatu Design	class ctor	: F : 1.25 : 80 K : B	
Cooling constant Rev.	<u> </u>	Changes Summary		Performed	Checked	Date
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THERMAL LIMIT CURVE

Three Phase Induction Motor - Squirrel Cage



Customer : 03018ST3QIE286TC-W22



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VFD OPERATION CURVE

Three Phase Induction Motor - Squirrel Cage



Customer : 03018ST3QIE286TC-W22

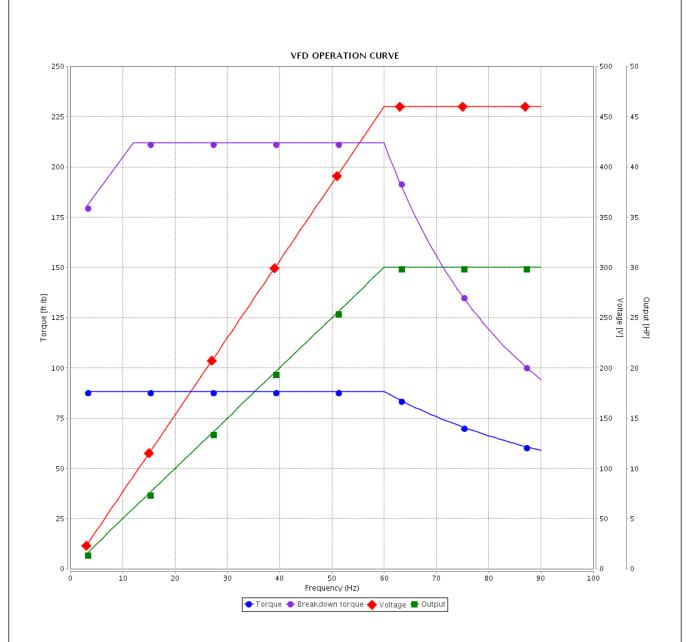
Product line : W22 IEEE 841 NEMA Premium

Efficiency Three-Phase

Product code: 11545431

Catalog #: 03018ST3QIE286TC-W22

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Performance	: 460 V 60 Hz 4P				
Rated current	: 35.1 A	Moment of inertia (J)		: 5.85 sq.ft.lb	
LRC	: 6.1	Duty cycle		: Cont.(S1)	
Rated torque	: 88.3 ft.lb	Insulation class Service factor Temperature rise		: F	
Locked rotor torque	: 240 %			: 1.25	
Breakdown torque	: 240 %			: 80 K	
Rated speed	: 1760 rpm	Design		: B	
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