DATA SHEET

Three Phase Induction Motor - Squirrel Cage



Customer

Product line : W40 NEMA Premium Efficiency Three-Product code: 14427706

: 364/5TSC Frame Cooling method : IC01 - ODP

Insulation class Mounting : F : F-1

Duty cycle : Cont.(S1) Rotation¹ : Both (CW and CCW) Ambient temperature : -20°C to +40°C Starting method : Direct On Line

Altitude : 1000 m.a.s.l. Approx. weight³ : 344 kg Protection degree : IP23 Moment of inertia (J) : 0.3034 kgm²

| Design | | : B | | | |
|--------------------------|-------------|----------------------|----------------------|----------------------|----------------------|
| Output [HP] | | 100 | 75 | 75 | 75 |
| Poles | | 2 | 2 | 2 | 2 |
| Frequency [Hz] | | 60 | 50 | 50 | 50 |
| Rated voltage [V] | | 230/460 | 230/460 380 400 | | 415 |
| Rated current [A] | | 232/116 | 103 | 100 | 97.8 |
| L. R. Amperes [A] | | 1531/766 | 773 | 800 | 773 |
| LRC [A] | | 6.6x(Code G) | 7.5x(Code H) | 8.0x(Code J) | 7.9x(Code J) |
| No load current [A |] | 59.0/29.5 | 28.5 | 32.5 | 35.0 |
| Rated speed [RPN | / 1] | 3555 | 2960 | 2964 | 2967 |
| Slip [%] | | 1.25 | 1.33 | 1.20 | 1.10 |
| Rated torque [kgfm] | | 20.4 | 18.4 | 18.4 | 18.3 |
| Locked rotor torque [%] | | 180 | 220 | 240 | 250 |
| Breakdown torque [%] | | 229 | 260 | 280 | 320 |
| Service factor | | 1.25 | 1.00 | 1.00 | 1.00 |
| Temperature rise | | 80 K | 80 K | 80 K | 80 K |
| Locked rotor time | | 23s (cold) 13s (hot) | 19s (cold) 11s (hot) | 18s (cold) 10s (hot) | 19s (cold) 11s (hot) |
| Noise level ² | | 84.0 dB(A) | | | |
| | 25% | | | | |
| Efficiency (%) | 50% | 92.4 | 90.2 | 90.3 | 90.3 |
| Liliciency (70) | 75% | 93.6 | 91.9 | 92.0 | 92.0 |
| | 100% 93.6 | | 94.3 | 94.3 | 94.3 |
| | 25% | | | | |
| Power Factor | 50% | 0.77 | 0.74 | 0.69 | 0.70 |
| 1 OWCI I actor | 75% | 0.84 | 0.83 | 0.78 | 0.80 |
| | 100% | 0.87 | 0.86 | 0.84 | 0.83 |

Non drive end Foundation loads Drive end 6314 C3 6212 Z C3

Bearing type Max. traction : 488 kgf Sealing Without Without Max. compression : 832 kgf

Bearing Seal Bearing Seal Lubrication interval 14418 h 20000 h Lubricant amount 13 g 27 g

Mobil Polyrex EM Lubricant type

Notes

USABLE @208V 257A SF 1.15 SFA 295A

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 |
|--------------|------------|-----------------|-----------|---------|----------|
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| Performed by | | | | | |
| Checked by | | | | Page | Revision |
| Date | 15/01/2024 | | | 1/5 | |

Three Phase Induction Motor - Squirrel Cage



Customer

Product line : W40 NEMA Premium Efficiency Three-

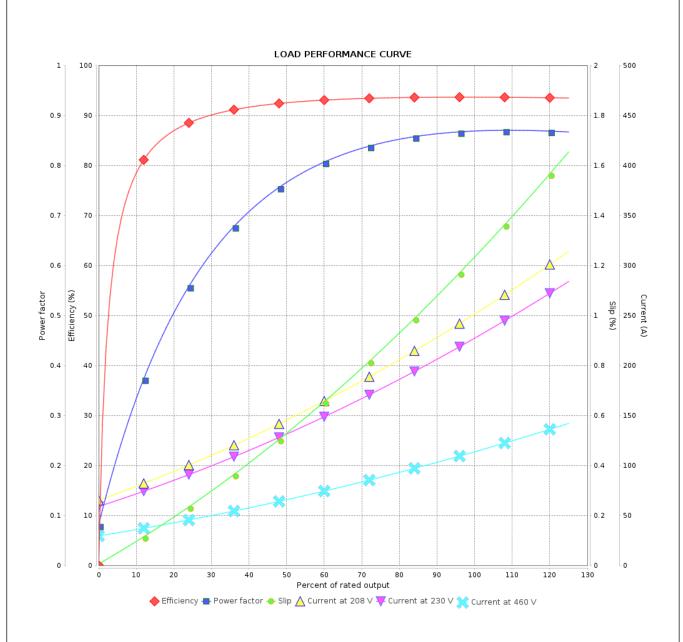
Product code:

14427706



15/01/2024

Date



| Performance | : 230/460 V 60 Hz 2P | | | | |
|--|---|--|-----------|--|----------|
| Rated current LRC Rated torque Locked rotor torque Breakdown torque Rated speed | : 232/116 A : 6.6 : 20.4 kgfm : 180 % : 229 % : 3555 rpm | Moment of ir Duty cycle Insulation cla Service facto Temperature Design | ass or | : 0.3034 kgm ² : Cont.(S1) : F : 1.25 : 80 K : B | 2 |
| Rev. | Changes Summary | | Performed | Checked | Date |
| Performed by | | | | | |
| Checked by | | | | Page | Revision |

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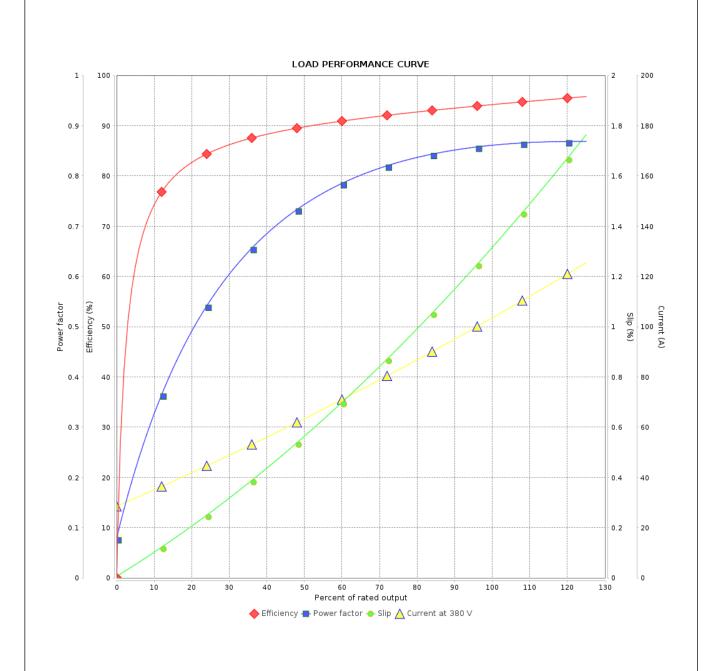
Three Phase Induction Motor - Squirrel Cage



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Customer

Product line : W40 NEMA Premium Efficiency Three-Product code:



| Performance | : 380 V 50 Hz 2P II | | | |
|---|---------------------|--|---|------|
| Rated current LRC Rated torque Locked rotor tord Breakdown torqu Rated speed | • | Moment of inertia (J) Duty cycle Insulation class Service factor Temperature rise Design | : 0.3034 kgm : Cont.(S1) : F : 1.00 : 80 K : B | 2 |
| Rev. | Changes Sumn | | Checked | Date |
| Performed by | | | | |

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|------------|---------------------|--|---------------------|----------|
| Date | 15/01/2024 | | 3/5 | |
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Three Phase Induction Motor - Squirrel Cage



Customer :

Product line : W40 NEMA Premium Efficiency Three-

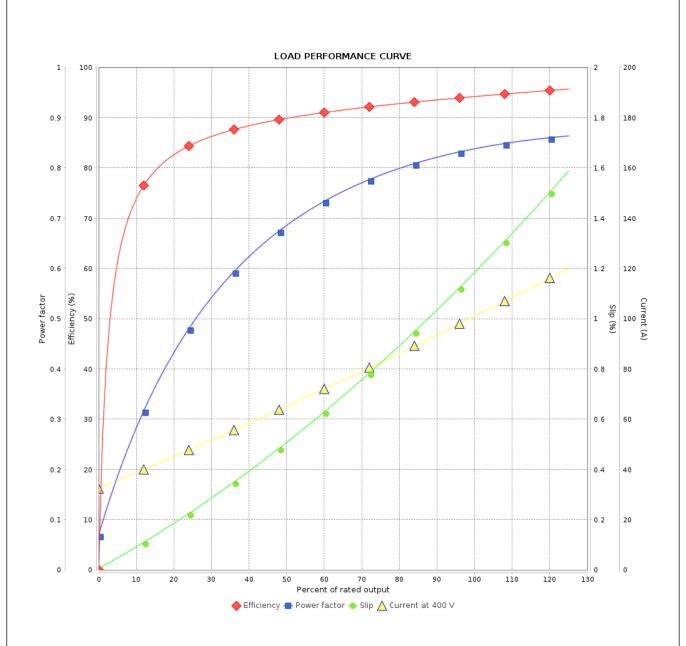
Product code:

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Date



| Performance | : 400 V 50 Hz 2P IE3 | | | | |
|---|---|---|---------------|--|----------|
| Rated current LRC Rated torque Locked rotor torque Breakdown torque Rated speed | : 100 A : 8.0 : 18.4 kgfm : 240 % : 280 % : 2964 rpm | Moment o Duty cycle Insulation Service fa Temperatu Design | class ctor | : 0.3034 kgm² : Cont.(S1) : F : 1.00 : 80 K : B | |
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Three Phase Induction Motor - Squirrel Cage



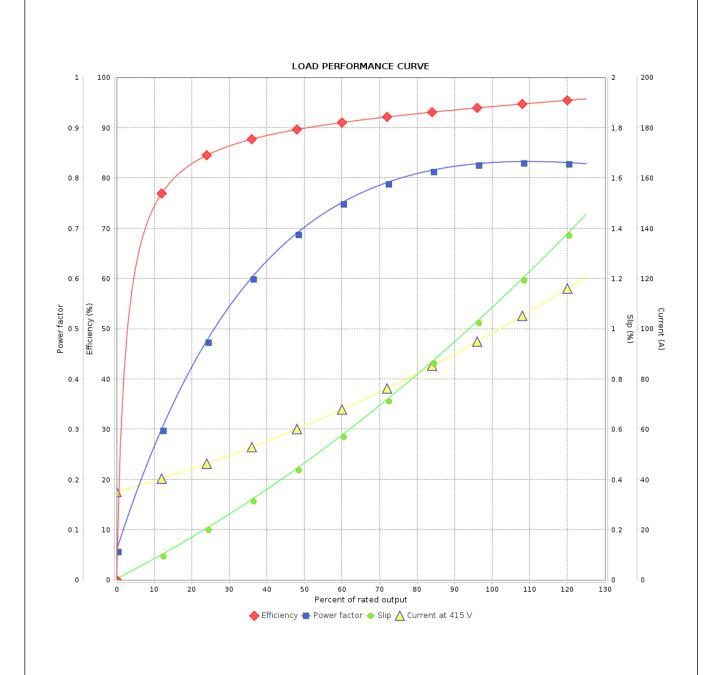
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Customer :

Product line : W40 NEMA Premium Efficiency Three- Product code :

Phase



| Performance | : 415 V 50 Hz 2P IE3 | | | | |
|--|--|---|---------------|--|----------|
| Rated current LRC Rated torque Locked rotor torque Breakdown torque Rated speed | : 97.8 A : 7.9 : 18.3 kgfm : 250 % : 320 % : 2967 rpm | Moment o Duty cycle Insulation Service fa Temperatu Design | class ctor | : 0.3034 kgm² : Cont.(S1) : F : 1.00 : 80 K : B | |
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