

DATA SHEET

Three Phase Induction Motor - Squirrel Cage



Customer :

Product line : W22 Super Premium Efficiency Three-Phase

Product code : 12604367

Catalog # : 02512EG3E324T-W22

| | | | |
|-----------------------|-------------------|-----------------------------|------------------------|
| Frame | : 324/6T | Locked rotor time | : 54s (cold) 30s (hot) |
| Output | : 25 HP (18.5 kW) | Temperature rise | : 80 K |
| Poles | : 6 | 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 | : 61.6/30.8 A | Protection degree | : IP55 |
| L. R. Amperes | : 480/240 A | Cooling method | : IC411 - TEFC |
| LRC | : 7.8x(Code J) | Mounting | : F-1 |
| No load current | : 31.4/15.7 A | Rotation ¹ | : Both (CW and CCW) |
| Rated speed | : 1187 rpm | Noise level ² | : 62.0 dB(A) |
| Slip | : 1.08 % | Starting method | : Direct On Line |
| Rated torque | : 111 ft.lb | Approx. weight ³ | : 583 lb |
| Locked rotor torque | : 280 % | | |
| Breakdown torque | : 330 % | | |
| Insulation class | : F | | |
| Service factor | : 1.25 | | |
| Moment of inertia (J) | : 11.2 sq.ft.lb | | |
| Design | : A | | |

| | | | | | |
|----------------|-----------|-----------|-----------|------------------|-----------|
| Output | 50% | 75% | 100% | Foundation loads | |
| Efficiency (%) | 92.4 92.4 | 93.6 93.0 | 94.1 93.0 | Max. traction | : 1294 lb |
| | 92.4 92.4 | 93.0 93.6 | 93.0 93.6 | | |
| Power Factor | 0.61 0.68 | 0.73 0.79 | 0.80 0.83 | Max. compression | : 1877 lb |
| | 0.64 0.61 | 0.76 0.73 | 0.82 0.80 | | |

Losses at normative operating points (speed;torque), in percentage of rated output power

| | | | | | |
|------------|----------------|-----|-----|-----|-----|
| Losses (%) | P1 (0,9;1,0) | 6.1 | 7.3 | 7.3 | 6.6 |
| | P2 (0,5;1,0) | 4.6 | 5.5 | 5.5 | 5.0 |
| | P3 (0,25;1,0) | 3.9 | 4.7 | 4.7 | 4.3 |
| | P4 (0,9;0,5) | 3.7 | 4.5 | 4.5 | 4.1 |
| | P5 (0,5;0,5) | 2.4 | 2.8 | 2.8 | 2.6 |
| | P6 (0,5;0,25) | 1.8 | 2.2 | 2.2 | 2.0 |
| | P7 (0,25;0,25) | 1.2 | 1.4 | 1.4 | 1.3 |

| | | | |
|----------------------|---|------------------|---------------|
| | | Drive end | Non drive end |
| Bearing type | : | 6312 C3 | 6212 C3 |
| Sealing | : | V'Ring | V'Ring |
| Lubrication interval | : | 20000 h | 20000 h |
| Lubricant amount | : | 21 g | 13 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.

| Rev. | Changes Summary | Performed | Checked | Date |
|--------------|-----------------|-----------|---------|----------|
| | | | | |
| Performed by | | | | |
| Checked by | | | | |
| Date | 29/03/2024 | | | |
| | | | Page | Revision |
| | | | 1 / 1 | |