

BALDOR • RELIANCE

Customer information packet

VJPFPM2531T

25//20HP, 1760//1460RPM, 3PH, 60//50HZ, 284J

Class -

Division - Not Applicable

Specifications

| | |
|--------------------------------|--|
| Enclosure | OPSB |
| Frame | 284JP |
| Frame Material | Steel |
| Frequency | 50.00 Hz 60.00 Hz |
| Haz Area Division | Not Applicable |
| Motor Letter Type | Three Phase |
| Output @ Frequency | 20.000 HP @ 50 HZ 25.000 HP @ 60 HZ |
| Phase | 3 |
| Synchronous Speed @ Frequency | 1500 RPM @ 50 HZ |
| Voltage @ Frequency | 460.0 V @ 60 HZ 380.0 V @ 50 HZ 230.0 V @ 60 HZ 190.0 V @ 50 HZ |
| Agency Approvals | CSA EEV UL |
| Ambient Temperature | 40 °C |
| Auxillary Box | No Auxillary Box |
| Auxillary Box Lead Termination | None |
| Base Indicator | No Mounting |
| Bearing Grease Type | Polyrex EM (-20F +300F) |
| Blower | None |
| Current @ Voltage | 58.000 A @ 230.0 V 58.000 A @ 190.0 V 29.000 A @ 460.0 V 29.000 A @ 380.0 V |
| Design Code | B |
| Drip Cover | Drip Cover |
| Duty Rating | CONT |
| Efficiency @ 100% Load | 92.4 % |
| Electrically Isolated Bearing | Not Electrically Isolated |

Part detail

| | |
|--------------|------------|
| Revision | T |
| Type | AC |
| Mech. spec. | 39T043 |
| Base | |
| Status | PRD/A |
| Elec. spec. | 39WGX929 |
| Layout | 39LYT043 |
| Eff. date | 06-26-2024 |
| CD Diagram | CD0104 |
| Poles | 04 |
| Leads | 12#10 |
| Proprietary | False |
| Created date | 01-07-2016 |

| | |
|-------------------------------|-----------------------|
| Feedback Device | NO FEEDBACK |
| Front Face Code | Drip Cover Mounting |
| Front Shaft Indicator | None |
| Heater Indicator | No Heater |
| High Voltage Full Load Amps | 29.0 a |
| Insulation Class | F |
| Inverter Code | Not Inverter |
| KVA Code | F |
| Lifting Lugs | Vertical Lifting Lugs |
| Locked Bearing Indicator | Locked Bearing |
| Motor Lead Exit | Ko Box |
| Motor Lead Quantity/Wire Size | 12 @ 10 AWG |
| Motor Lead Termination | Flying Leads |
| Motor Standards | NEMA |
| Motor Type | 3956M |
| Mounting Arrangement | F1 |
| Number of Poles | 4 |
| Overall Length | 31.44 IN |
| Power Factor | 87 |
| Product Family | Fire Pump Motor |
| Pulley End Bearing Type | Ball |
| Pulley Face Code | C-Face |
| Pulley Shaft Indicator | Tapped & Key |
| Rodent Screen | Included |
| Service Factor | 1.15 |
| Shaft Diameter | 1.750 IN |
| Shaft Extension Location | Pulley End |
| Shaft Ground Indicator | No Shaft Grounding |
| Shaft Rotation | Reversible |
| Shaft Slinger Indicator | Shaft Slinger |
| Speed | 1460 rpm 1760 rpm |
| Speed Code | Single Speed |
| Starting Method | Wye Start - Delta Run |

| | |
|-----------------------------------|---------------------|
| Thermal Device - Bearing | None |
| Thermal Device - Winding | None |
| Vibration Sensor Indicator | No Vibration Sensor |

Nameplate

NP3454L

| | | | | | |
|------------------|--------------|-----------------|------|------------------|------------|
| CAT.NO. | VJPFPM2531T | CUST P/N | | I.P. | 23 |
| SPEC. | 39T043X929H2 | SER.NO. | | FRAME | 284JP |
| HZ | 60 | HP | 25 | RPM | 1760 |
| | | | | HZ | 50 |
| | | | | HP | 20 |
| | | | | RPM | 1460 |
| VOLTS | 230/460 | CODE | F | VOLTS | 190/380 |
| | | CODE | F | | |
| AMPS | 58/29 | DES | B | AMPS | 58/29 |
| | | DES | B | | |
| EFF | 92.4 | SER.F. | 1.15 | PF | 87 |
| | | | | EFF | 91 |
| | | | | SER.F. | 1.15 |
| | | | | PF | 87 |
| RATING | 40C AMB-CONT | DE BRG | 6312 | GREASE | POLYREX EM |
| BLANK | | ODE BRG | 6208 | MTR. WT. | 300 |
| | | CLASS | F | PH | 3 |
| | | ENCL | OPSB | CC | 010A |
| HTR-VOLTS | | HTR-AMPS | | HTR-WATTS | |

AC Induction Motor Performance Data

Record # 54768

Typical performance - not guaranteed values

| Winding: 39WGX929-R001 | | Type: 3956M | | Enclosure: OPSB | |
|-------------------------------|-------------------|---------------------|--|----------------------------------|-----------|
| Nameplate Data | | | 460 V, 60 Hz: High Voltage Connection | | |
| Rated Output (HP) | 25//20 | | Full Load Torque | 75.1 LB-FT | |
| Volts | 230/460//190/380 | | Start Configuration | direct on line | |
| Full Load Amps | 58/29 | | Breakdown Torque | 202 LB-FT | |
| R.P.M. | 1760//1460 | | Pull-up Torque | 99.1 LB-FT | |
| Hz | 60//50 | Phase | 3 | Locked-rotor Torque | 120 LB-FT |
| NEMA Design Code | B KVA Code | | F | Starting Current | 172 A |
| Service Factor (S.F.) | | | 1.15 | No-load Current | 8.92 A |
| NEMA Nom. Eff. | 92.4 | Power Factor | 87 | Line-line Res. @ 25°C | 0.4172 Ω |
| Rating - Duty | | | 40C AMB-CONT | Temp. Rise @ Rated Load | 52°C |
| S.F. Amps | | | | Temp. Rise @ S.F. Load | 66°C |
| | | | | Locked-rotor Power Factor | 32.1 |

Load Characteristics 460 V, 60 Hz, 25 HP

| % of Rated Load | 25 | 50 | 75 | 100 | 125 | 150 | S.F. |
|------------------------|-----------|-----------|-----------|------------|------------|------------|-------------|
| Power Factor | 57 | 77 | 85 | 87 | 88 | 87 | 88 |
| Efficiency | 91.8 | 93.7 | 93.4 | 92.5 | 91.1 | 89.4 | 91.7 |
| Speed | 1790.4 | 1780.8 | 1771.1 | 1759.6 | 1746.7 | 1731.2 | 1752 |
| Line amperes | 11.3 | 16 | 22.5 | 29.2 | 36.4 | 45.1 | 33.5 |

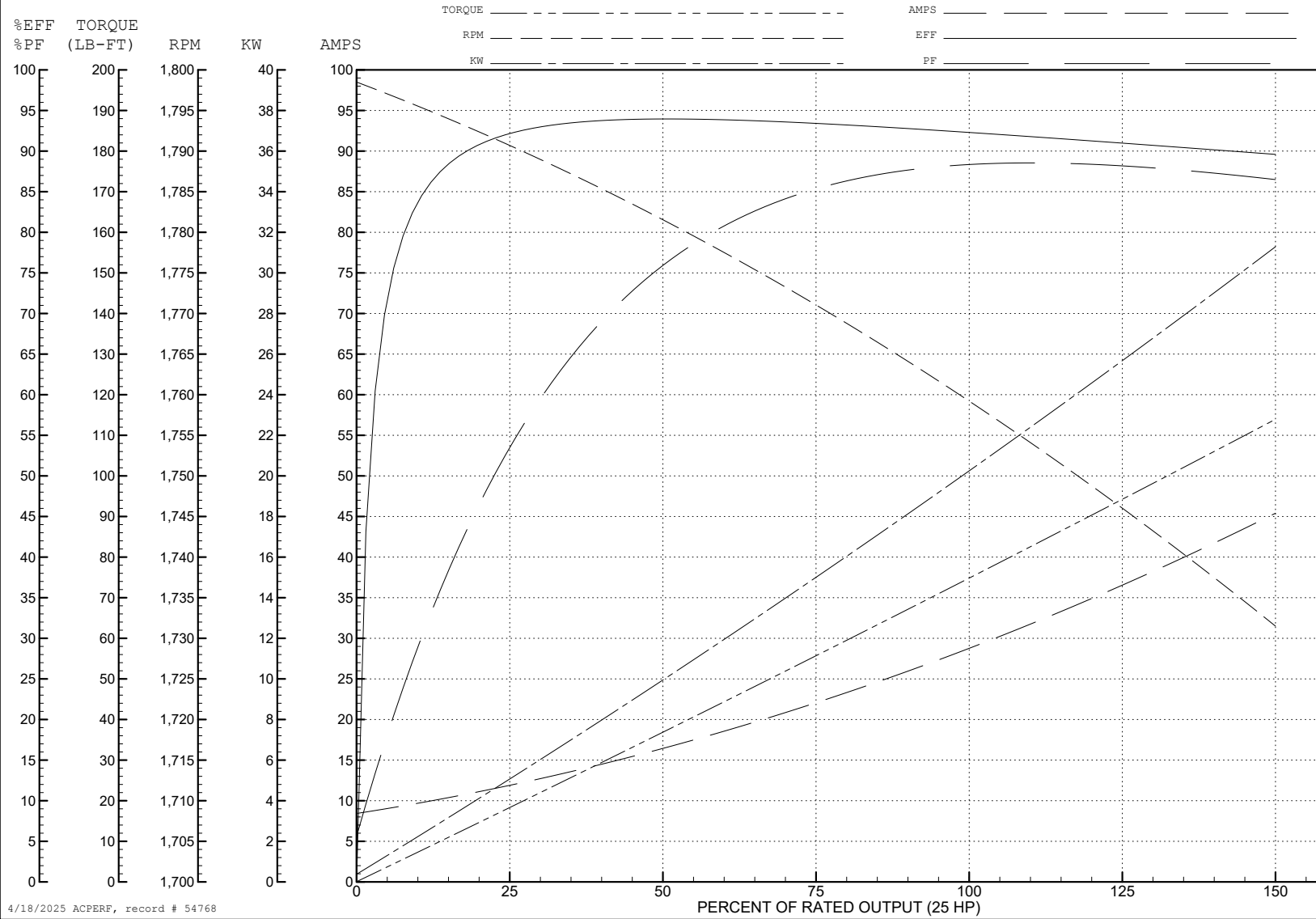
ABB Motors and Mechanical Inc.

WINDING # 39WGX929

Typical performance - not guaranteed values.

25 HP 3 PH 60 HZ 1759.6 RPM 460 V 3956M

TORQUES (LB-FT): PO=202 PU=99.1 LR=120 LRA=172



4/18/2025 ACPERF, record # 54768

AC Induction Motor Performance Data

Record # 54786

Typical performance - not guaranteed values

| Winding: 39WGX929-R001 | | Type: 3956M | Enclosure: OPSB | | | |
|------------------------|------------------|--------------|--|---------------------------|-------------------------|---------|
| Nameplate Data | | | 380 V, 50 Hz: High Voltage Connection | | | |
| Rated Output (HP) | 25//20 | | Full Load Torque | 72.4 LB-FT | | |
| Volts | 230/460//190/380 | | Start Configuration | direct on line | | |
| Full Load Amps | 58/29 | | Breakdown Torque | 194 LB-FT | | |
| R.P.M. | 1760//1460 | | Pull-up Torque | 102 LB-FT | | |
| Hz | 60//50 | Phase | 3 | Locked-rotor Torque | 123 LB-FT | |
| NEMA Design Code | B | | KVA Code | F | Starting Current | 167 A |
| Service Factor (S.F.) | 1.15 | | No-load Current | 8.77 A | | |
| NEMA Nom. Eff. | 92.4 | Power Factor | 87 | | Line-line Res. @ 25°C | 0.392 Ω |
| Rating - Duty | 40C | | AMB-CONT | Temp. Rise @ Rated Load | 51°C | |
| S.F. Amps | | | | Temp. Rise @ S.F. Load | 65°C | |
| | | | | Locked-rotor Power Factor | 35.4 | |
| | | | | Rotor inertia | 2.45 LB-FT ² | |

Load Characteristics 380 V, 50 Hz, 20 HP

| % of Rated Load | 25 | 50 | 75 | 100 | 125 | 150 | S.F. |
|-----------------|------|------|------|------|------|------|------|
| Power Factor | 57 | 77 | 85 | 87 | 88 | 87 | 88 |
| Efficiency | 90.9 | 93.1 | 92.7 | 91.6 | 90.2 | 88.2 | 90.8 |
| Speed | 1491 | 1482 | 1472 | 1461 | 1449 | 1434 | 1454 |
| Line amperes | 11.1 | 15.6 | 21.9 | 28.5 | 35.6 | 44.2 | 32.8 |

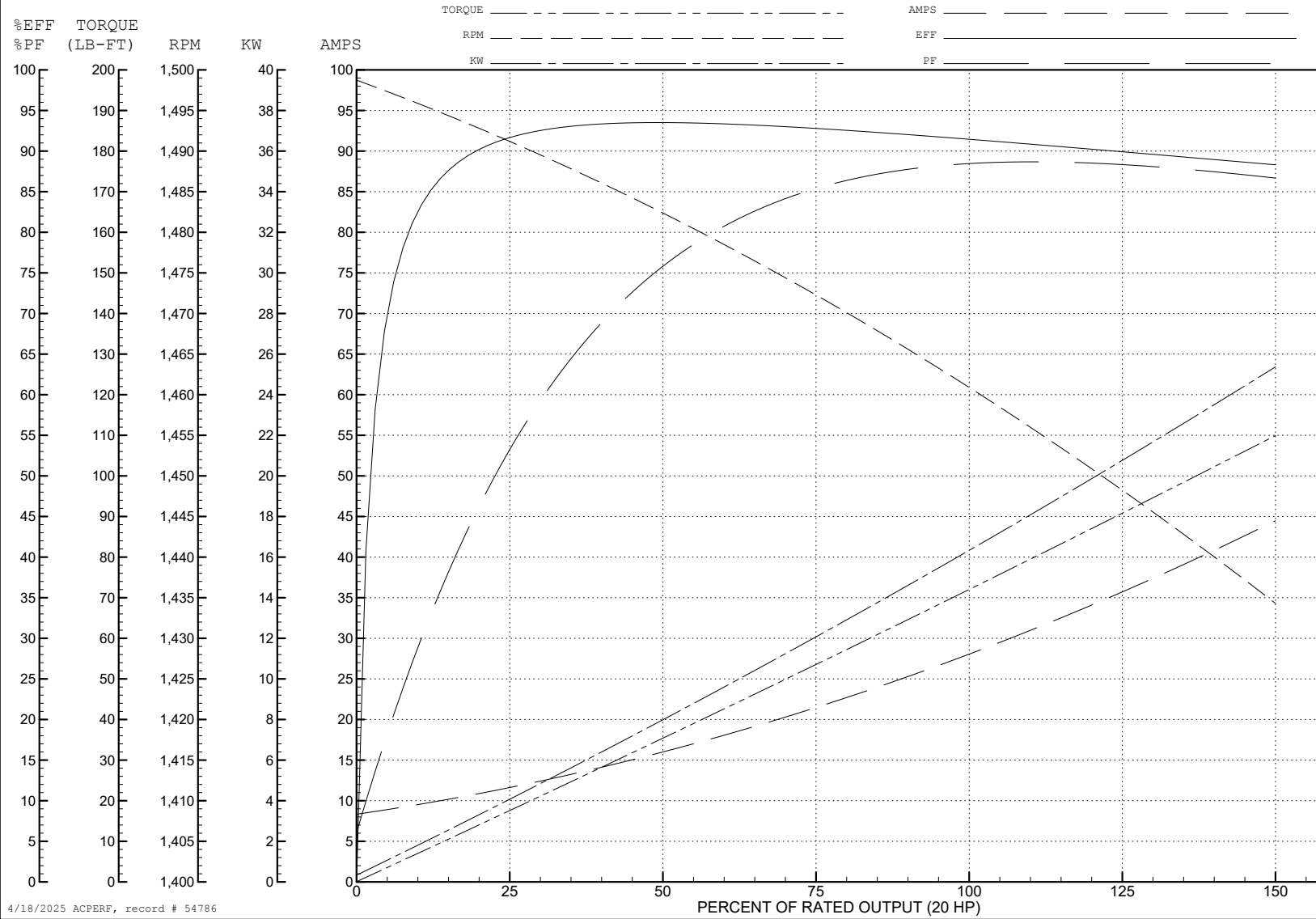
ABB Motors and Mechanical Inc.

WINDING # 39WGX929

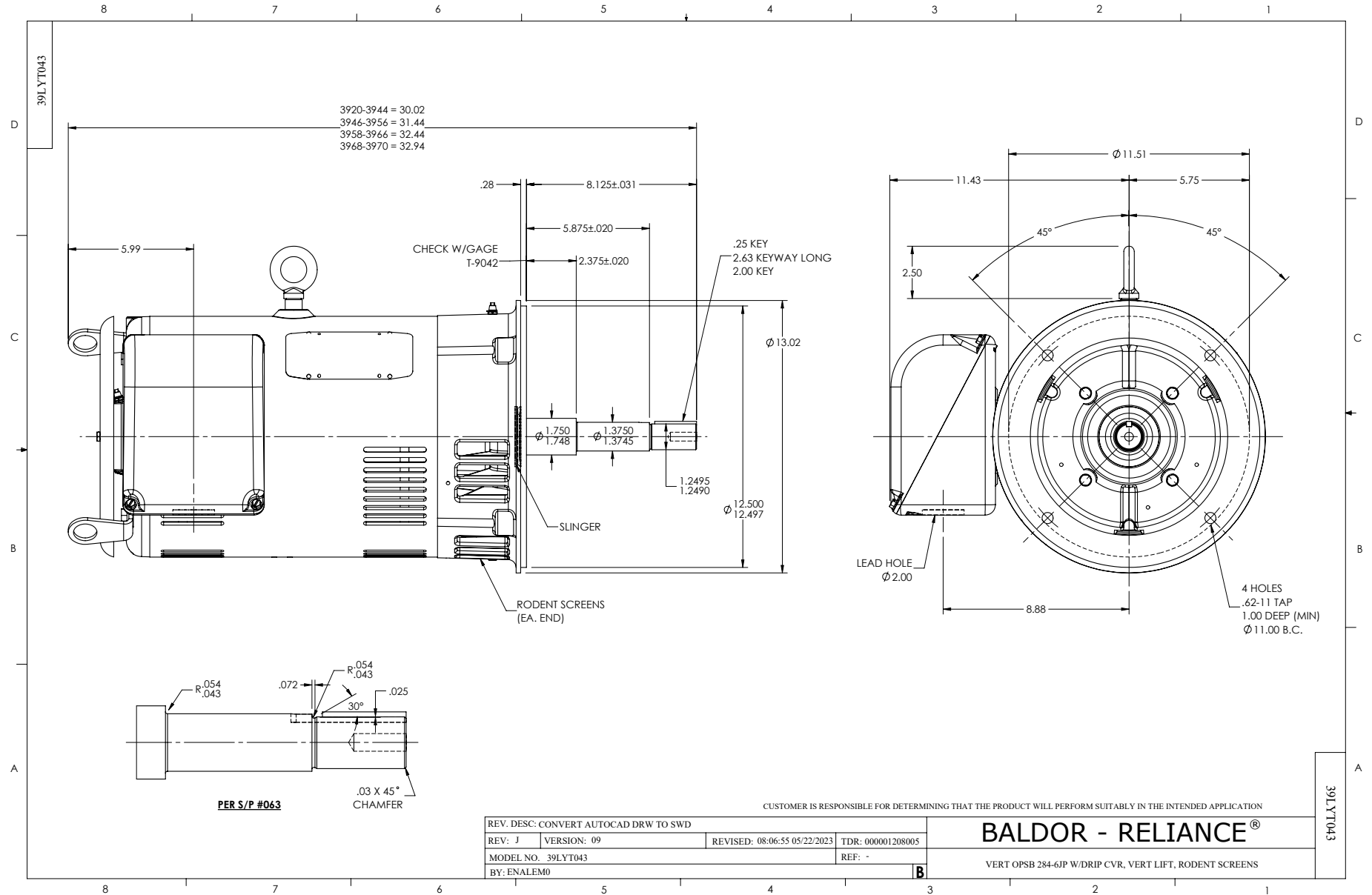
Typical performance - not guaranteed values.

20 HP 3 PH 50 HZ 1461 RPM 380 V 3956M

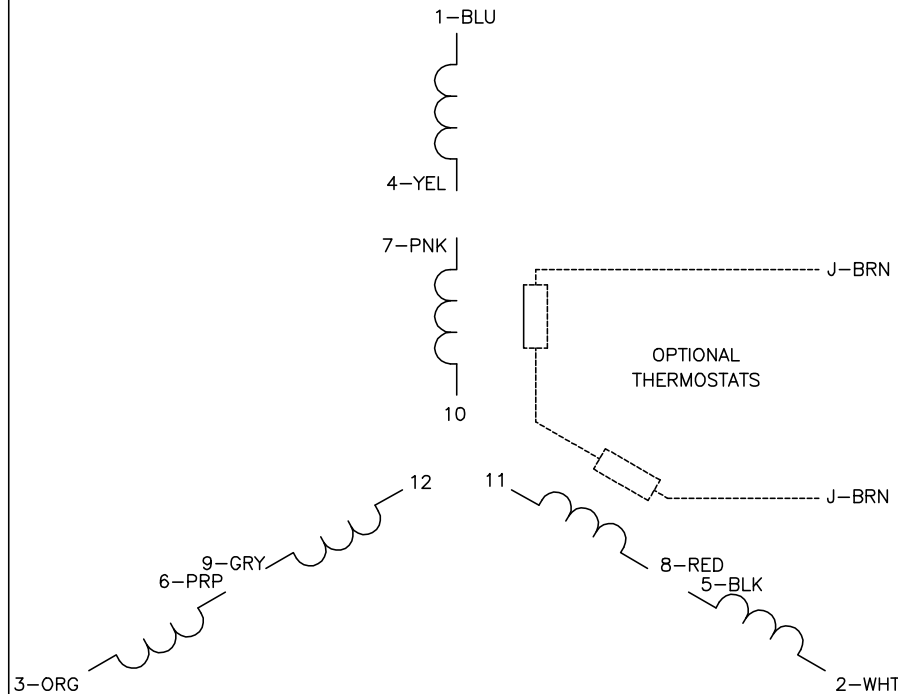
TORQUES (LB-FT): PO=194 PU=102 LR=123 LRA=167



4/18/2025 ACPERF, record # 54786

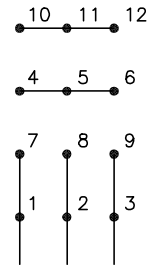


CD0104



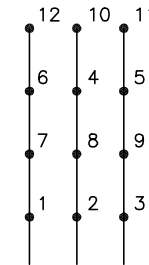
LOW VOLTAGE

START (2Y)



LINE

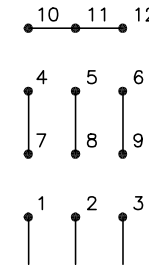
RUN (2D)



LINE

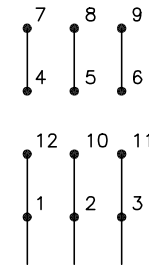
HIGH VOLTAGE

START (1Y)



LINE

RUN (1D)



LINE

NOTES:

1. INTERCHANGE ANY TWO LINE LEADS TO REVERSE ROTATION.
2. OPTIONAL THERMOSTATS ARE PROVIDED WHEN SPECIFIED.
3. ACTUAL NUMBER OF INTERNAL PARALLEL CIRCUITS MAY BE A MULTIPLE OF THOSE SHOWN ABOVE.
4. LEAD COLORS ARE OPTIONAL. LEADS MUST ALWAYS BE NUMBERED AS SHOWN.

CD0104

| | | |
|-----------------------------------|------------------------------|-------------------|
| REV. DESC: ADD CLASS CONN00000007 | | |
| REV. LTR: D | VERSION: 01 | TDR: 000001099922 |
| FILE: \AAA\00008\377 | REVISED: 09:02:55 02/19/2019 | BY: ENBRIRO |
| MTL: - | © □ | |

BALDOR - RELIANCE®

3PH, DV, 12 LEADS, Y START/D RUN

SH 1 of 1