

BALDOR • RELIANCE

Customer information packet

D1152

.5HP, 1750RPM, DC, 56, 3420D, TEFC, F1

Class - None

Division -

Specifications

| | |
|-------------------------------|----------------------------|
| Armature Voltage | 115 V |
| Base Speed | 1750 rpm |
| Enclosure | TEFC |
| Frame | 56 |
| Frame Material | Steel |
| Haz Area Class and Group | None |
| Output Power | 0.500 HP |
| Agency Approvals | CSA UR |
| Ambient Temperature | 40 °C |
| Armature Current | 4.8 a |
| Armature Inertia | 4.680 lb-ft ² |
| Base Indicator | Rigid |
| Bearing Grease Type | Polyrex EM (-20F +300F) |
| Drip Cover | No Drip Cover |
| Duty Rating | CONT |
| Feedback Device | NO FEEDBACK |
| Field Winding Type | COMPOUND |
| Heater Indicator | No Heater |
| Insulation Class | F |
| Lifting Lugs | No Lifting Lugs |
| Motor Lead Exit | Ko Box |
| Motor Lead Quantity/Wire Size | 2 @ 14 AWG 2 @ 18 AWG |
| Motor Lead Termination | Flying Leads |
| Motor Standards | NEMA |
| Mounting Arrangement | F1 |
| Overall Length | 13.54 IN |
| Product Family | WP Below Decks Marine Duty |
| Pulley End Bearing Type | Sealed Bearing |
| RoHS Status | ROHS COMPLIANT |
| Service Factor | 1.00 |

Part detail

| | |
|--------------|------------|
| Revision | AA |
| Type | DC |
| Mech. spec. | 34-6121 |
| Base | |
| Status | PRD/A |
| Elec. spec. | 34WG3116 |
| Layout | 34LY6121 |
| Eff. date | 10-25-2024 |
| CD Diagram | CD0862B01 |
| Poles | 00 |
| Leads | |
| Proprietary | False |
| Created date | 01-01-0001 |

| | |
|---------------------------------|--------------------|
| Shaft Diameter | 0.625 IN |
| Shaft Extension Location | Pulley End |
| Shaft Ground Indicator | No Shaft Grounding |
| Shaft Rotation | Reversible |
| Shaft Slinger Indicator | Shaft Slinger |

Nameplate

| NP2801L | | | |
|-----------------|----------------|----------------|-------|
| CAT.NO. | D1152 | | |
| SPEC. | 34-6121-3116 | | |
| HP | .5 | ENCL | TEFC |
| RPM | 1750 | | |
| FRAME | 56 | TYPE | 3420D |
| ARM V | 115 | ARM A | 4.6 |
| FLD V | 115 | FLD A | .37 |
| INSUL | F | AMB. | 40 |
| DUTY | CONT | SUPPLY | A |
| BRG/DE | 6203 | BRG/ODE | 6203 |
| BRUSHES | 2/BP5000H03 | | |
| | IEEE 45 | BLANK | |
| SER. | | | |
| BLANK | -- | | |
| APRV-CSA | APRV-UL | | |

Parts list

| Part number | Description | Quantity |
|---------------|--|----------|
| SA006736 | SA 34-6121-3116 | 1.000 ea |
| AA003370 | AA 34-6121-3116 | 1.000 ea |
| BP5000H03SP | BRUSH ASSY, GRADE H619 | 1.000 ea |
| 11XW1032G06 | 10-32 X .38, TAPTITE II, HEX WSHR SLTD U | 1.000 ea |
| HW3001B02 | BRASS CUP WASHER W/GROUND SYMBOL TAB, | 1.000 ea |
| 34EP3103A06 | FR ENDPLATE MACH 34DC F-1 MTG W/.50 N.P. | 1.000 ea |
| WD4100A109 | PLUG STIMPSON D3550 | 1.000 ea |
| HW5100A03 | WAVY WASHER (W1543-017) | 1.000 ea |
| 34EP3110A06 | PU ENDPLATE, MACH | 1.000 ea |
| HA1005A05SP | SLINGER, OD 1.50, ID .659, 203 BRG | 1.000 ea |
| BP5201A10SP | BRUSH HOLDER ASSY W/BP4509A01 & B | 1.000 ea |
| 80XN1032J03 | 10-32 X 3/16 SET SCREW, HEX SOC, CUP PT | 2.000 ea |
| 34FN3002A01SP | EXTERNAL FAN, PLASTIC, .637/.639 HUB W/ | 1.000 ea |
| 34FH4002A03SP | IEC FH NO GREASER W/.88 DIA SHAFT HOLE, | 1.000 ea |
| 51XW1032A06 | 10-32 X .38, TAPTITE II, HEX WSHR SLTD S | 3.000 ea |
| WD4100A81 | CAPLUG BPF-7/8, FOR .86-.88 HOLE | 1.000 ea |
| 34CB4504SP | CONDUIT BOX LID, STAMPED | 1.000 ea |
| 34GS1014 | GASKET, CONDUIT BOX LID BLACK NEOPRENE | 1.000 ea |
| 51XW0832A07 | 8-32 X .44, TAPTITE II, HEX WSHR SLTD SE | 2.000 ea |
| HW2501D13 | KEY, 3/16 SQ X 1.375 | 1.000 ea |
| HA7000A04 | KEY RETAINER 0.625 DIA SHAFTS | 1.000 ea |
| MG2000A17 | RUST INHIBITOR PART # SRPO #20 | 0.001 ga |
| MJ5004A05 | #242-21 LOCTITE GENERAL PURPOSE MED. STR | 0.001 ea |
| MJ5001A27 | 32220KN GRAY SEALER *MIN BUY 4 QTS=1GAL | 0.001 qt |
| WD4102A07 | STRAIN RELIEF - MICRO PLASTIC #23MP07W20 | 1.000 ea |
| MG1050G01 | CELEROL MEDIUM CHARCOAL METALLIC GRAY | 0.014 ga |
| 85XU0407S04 | 4X1/4 U DRIVE PIN STAINLESS | 2.000 ea |
| HA3100A12 | THRUBOLT 10-32 X 7.375 | 4.000 ea |
| MN416A01 | TAG-INSTAL-MAINT no wire (2500bx)4/22 | 1.000 ea |
| LB1624 | COMBINED WARNING LABEL, ISO/ANSI PICTOGR | 1.000 ea |
| 27PA1001 | PKG GRP, PRINT PK1027A06 | 1.000 ea |

| | | |
|---------|--|----------|
| LC0862 | DC -- COMPOUND WOUND MOTOR CONNECTION LA | 1.000 ea |
| NP2801L | SS DC UL CSA REV MTG | 1.000 ea |

DC Motor Performance Data

Record # 1419

Typical performance - not guaranteed values

| Winding: 34WG3116-R001 | | Type: 3420D | Enclosure: TEFC |
|------------------------|--------------|----------------------------------|-----------------|
| Nameplate Data | | General Characteristics | |
| Rated Output (HP) | 0.5 | Armature Resistance @ 25°C | 2.6 Ω |
| R.P.M. | 1750 | Series Winding Resistance @ 25°C | 0.493 Ω |
| Armature Volts | 115 | Shunt Winding Resistance @ 25°C | 247 Ω |
| Armature Amps | 4.8 | | |
| Field Volts | | | |
| Field Amps | | | |
| Rating - Duty | 40C AMB-CONT | | |
| Power Supply Code | K | | |

Load Characteristics at 115 Armature Volts

| Load Point | 1 | 2 | 3 | 4 | 5 | 6 |
|------------------|------|------|-------|------|-------|------|
| Armature Amps | 0.34 | 2.04 | 3.05 | 3.84 | 4.74 | 5.64 |
| R.P.M. | 1982 | 1854 | 1781 | 1733 | 1671 | 1602 |
| Torque (LB-FT) | 0 | 0.75 | 1.125 | 1.5 | 1.875 | 2.25 |

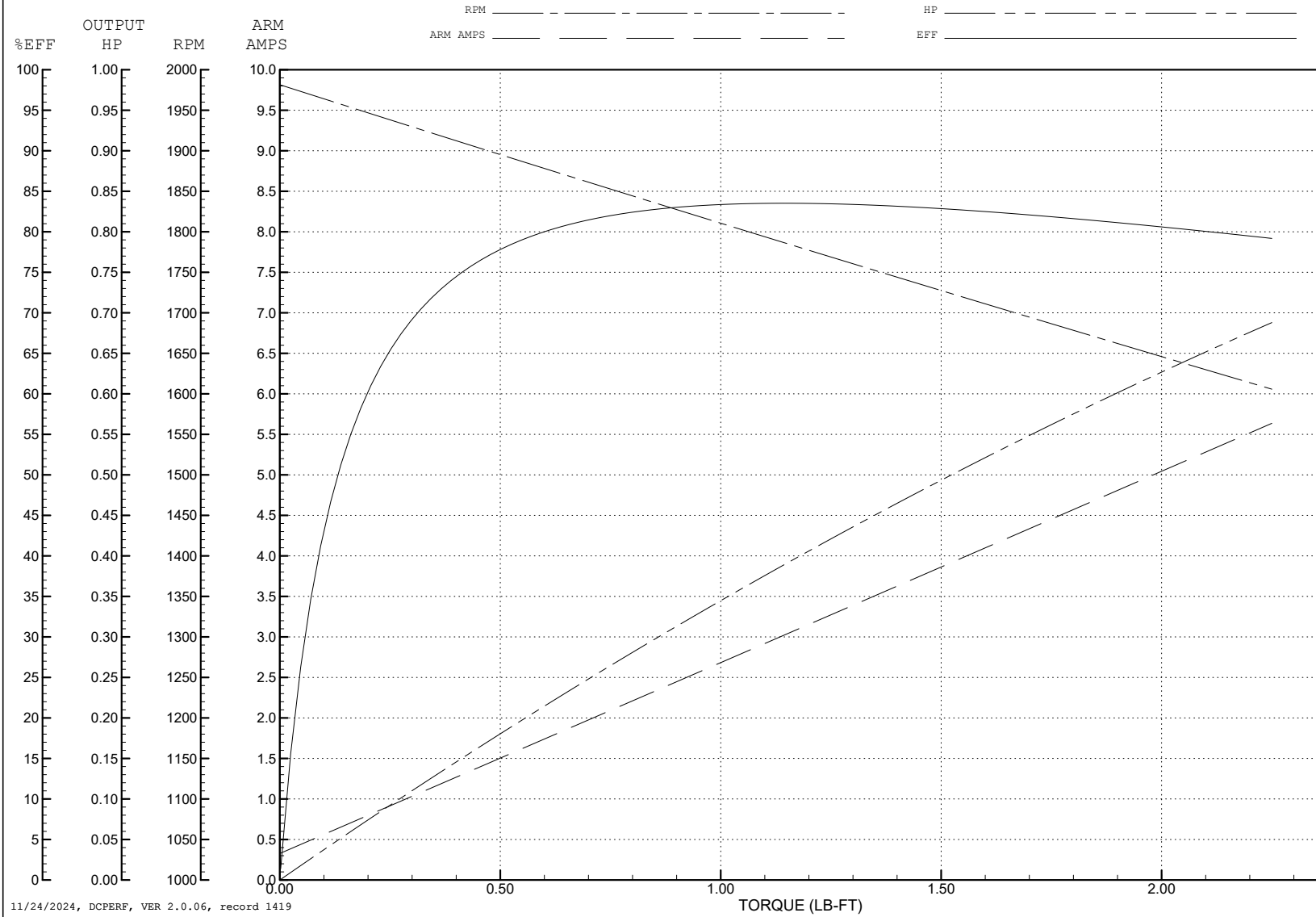
ABB Motors and Mechanical Inc.

WINDING # 34WG3116

0.5 HP DC 1750 RPM 115 V 3420D

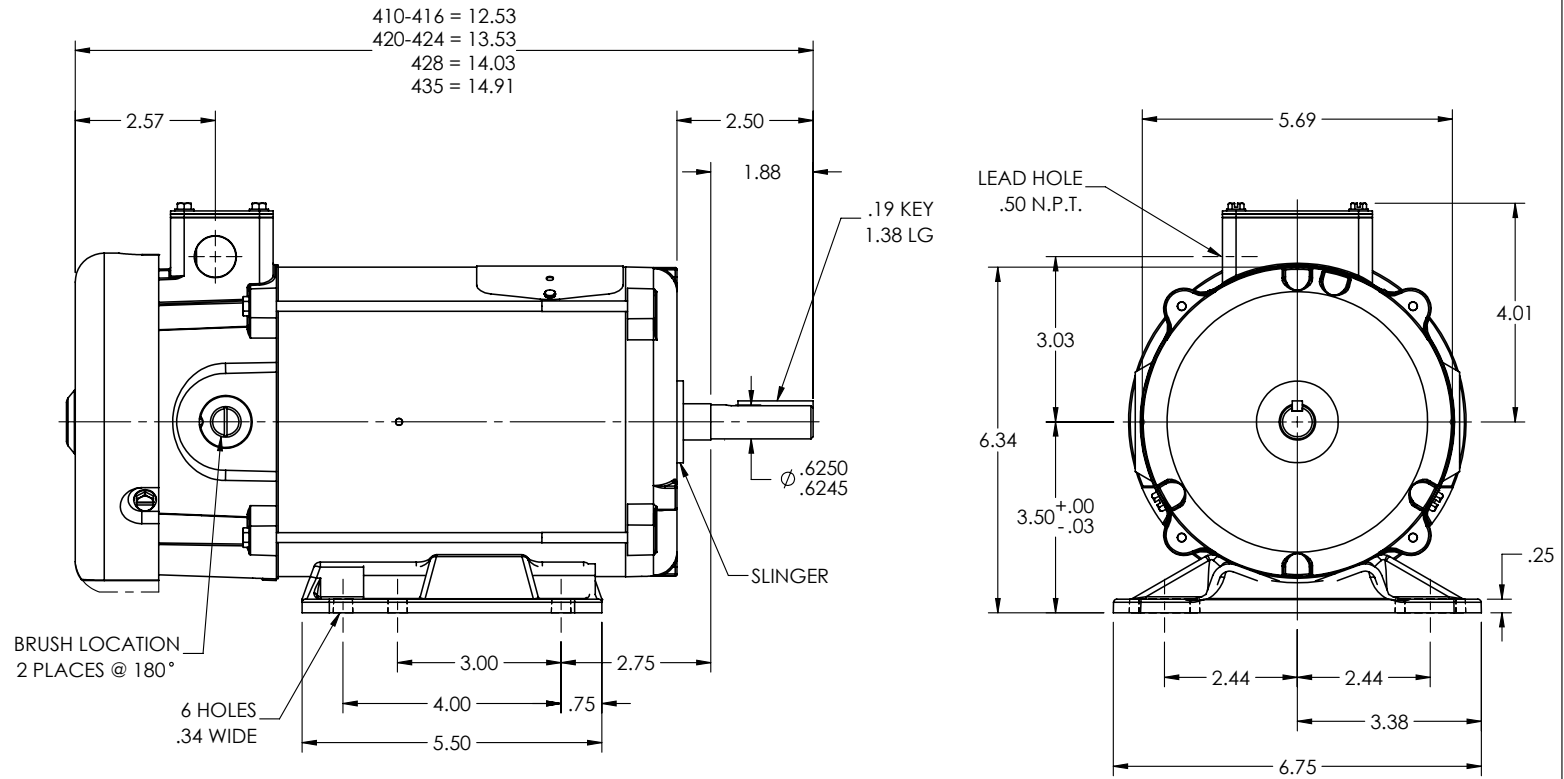
Typical performance - not guaranteed values.

ENCL: TEFC DUTY: CONT CL: F



11/24/2024, DCPERF, VER 2.0.06, record 1419

34LY6121



CUSTOMER IS RESPONSIBLE FOR DETERMINING THAT THE PRODUCT WILL PERFORM SUITABLY IN THE INTENDED APPLICATION

REV. DESC: LOAD TO SOLIDWORKS - REV D

REV: E VERSION: 01 REVISED: 08:22:18 12/22/2022 TDR: 000001201165

34LY6121

MODEL NO. 34LY6121
 BY: ENFRAJ0

REF: -

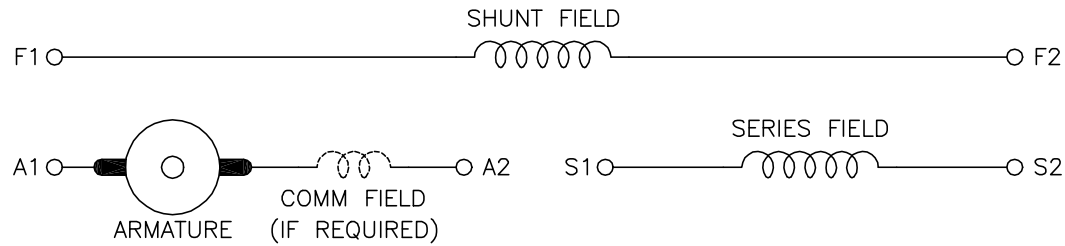
BALDOR - RELIANCE®

STD. HORZ 34DC NEMA 56 TEFC S/P 14-2 WEATHERPROOF

34LY6121

CD0862B01

COMPOUND WOUND



| DIRECTION OF ROTATION | | | |
|-----------------------|--------------|-----------------|--------------|
| CWDE | | CCWDE | |
| POS TERM (+) | NEG TERM (-) | POS TERM (+) | NEG TERM (-) |
| A1 | S2 | A2 | S2 |
| F1 | F2 | F1 | F2 |
| CONNECT A2 & S1 | | CONNECT A1 & S1 | |

NOTES:

- LIMIT STARTING INRUSH CURRENT TO NOT MORE THAN 3 TIMES RATED AMPERES BY ENERGIZING THE FULL SHUNT FIELD BEFORE BRINGING THE ARMATURE VOLTAGE UP SLOWLY OR IN STEPS.
- OPTIONAL FIELD REOSTAT MAY BE CONNECTED IN SERIES WITH THE SHUNT FIELD.
- OPTIONAL THERMOSTAT LEADS ARE MARKED J,J.

| | | | |
|--------------------------------|---------|------------------------------|----------------|
| REV. DESC: NEW, REPLACE CD0862 | | | |
| REV. LTR: - | BY: JLP | REVISED: 16:10:51 11/03/2004 | TDR: 347796 |
| CD0862B01 | | FILE: AAA00121482 | REF: CD0862B01 |
| | | MTL: - | |

BALDOR ELECTRIC Co.

DC CONNECTION DIAGRAM, COMPOUND FIELD, 6 LEAD

CD0862B01