

# **BALDOR® • RELIANCE**

## **Product Information Packet**

### **EL3510**

**1HP,1760RPM,1PH,60HZ,56H,3532LC,TEFC,F1**

| Part Detail |      |                |        |             |          |               |            |
|-------------|------|----------------|--------|-------------|----------|---------------|------------|
| Revision:   | AM   | Status:        | PRD/A  | Change #:   |          | Proprietary:  | No         |
| Type:       | AC   | Prod. Type:    | 3532LC | Elec. Spec: | 35WGS758 | CD Diagram:   | CD0055     |
| Enclosure:  | TEFC | Mfg Plant:     |        | Mech. Spec: | 35J385   | Layout:       | 35LYJ385   |
| Frame:      | 56H  | Mounting:      | F1     | Poles:      | 04       | Created Date: |            |
| Base:       | RG   | Rotation:      | R      | Insulation: | F        | Eff. Date:    | 09-10-2015 |
| Leads:      | 6#18 |                |        |             |          | Replaced By:  |            |
| Literature: |      | Elec. Diagram: |        |             |          |               |            |

## Nameplate NP2116L

|              |              |  |                |  |       |  |      |  |      |  |
|--------------|--------------|--|----------------|--|-------|--|------|--|------|--|
| CAT.NO.      | EL3510       |  |                |  |       |  |      |  |      |  |
| SPEC.        | 35J385S758G1 |  |                |  |       |  |      |  |      |  |
| HP           | 1            |  |                |  |       |  |      |  |      |  |
| VOLTS        | 115/230      |  |                |  |       |  |      |  |      |  |
| AMP          | 8.5/4.25     |  |                |  |       |  |      |  |      |  |
| RPM          | 1760         |  |                |  |       |  |      |  |      |  |
| FRAME        | 56H          |  |                |  | HZ 60 |  |      |  | PH 1 |  |
| SER.F.       | 1.15         |  | CODE L         |  | DES L |  | CL F |  |      |  |
| NEMA-NOM-EFF | 82.5         |  | PF 91          |  |       |  |      |  |      |  |
| RATING       | 40C AMB-CONT |  |                |  |       |  |      |  |      |  |
| CC           |              |  | USABLE AT 208V |  |       |  |      |  | 4.6  |  |
| DE           | 6205         |  | ODE 6203       |  |       |  |      |  |      |  |
| ENCL         | TEFC         |  | SN             |  |       |  |      |  |      |  |
|              | SFA 9.4/4.7  |  |                |  |       |  |      |  |      |  |

| Parts List    |                                           |          |
|---------------|-------------------------------------------|----------|
| Part Number   | Description                               | Quantity |
| SA025959      | SA 35J385S758G1                           | 1.000 EA |
| RA022009      | RA 35J385S758G1                           | 1.000 EA |
| OC3040F09SP   | CYL OIL CAP 40MFD/370V                    | 1.000 EA |
| EC1645A06SP   | ELEC CAP, 645-774 MFD, 125V, 2.06D X 4.   | 1.000 EA |
| NS2512A01     | INSULATOR, CONDUIT BOX X                  | 1.000 EA |
| 35CB3007      | 35 CB CASTING W/.88 DIA. LEAD HOLE        | 1.000 EA |
| 36GS1000      | GASKET-CONDUIT BOX, .06 THICK #SV-330 LE  | 1.000 EA |
| 51XB1016A07   | 10-16 X 7/16 HXWSSLD SERTYB               | 2.000 EA |
| 11XW1032G06   | 10-32 X .38, TAPTITE II, HEX WSHR SLTD U  | 1.000 EA |
| 35EP3100M02   | FREP TEFC 203 BRG W/O GR SR (RAISED FH MT | 1.000 EA |
| 51XW0832A07   | 8-32 X .44, TAPTITE II, HEX WSHR SLTD SE  | 2.000 EA |
| 35CB3801      | CAPACITOR COVER, CAST                     | 1.000 EA |
| 34GS3002      | GASKET, CAPACITOR BOX                     | 1.000 EA |
| HA7010        | CAPACITOR RETENTION CLAMP                 | 1.000 EA |
| 51XB1016A08   | 10-16X 1/2HXWSSLD SERTYB                  | 2.000 EA |
| NS2501A02     | INSULATOR, CAPACITOR BOX                  | 1.000 EA |
| HW5100A03     | WAVY WASHER (W1543-017)                   | 1.000 EA |
| 35EP3101A02SP | STD PU ENDPLATE-ENCL-205 BRG LESS GREASE  | 1.000 EA |
| XY1032A02     | 10-32 HEX NUT DIRECTIONAL SERRATION       | 4.000 EA |
| 35FN3002A05   | EXFN, PLASTIC, 6.376 OD, .638 ID          | 1.000 EA |
| NP2116L       | ALUM SUPER-E UL CSA CC                    | 1.000 EA |
| 51XB1214A16   | 12-14X1.00 HXWSSLD SERTYB                 | 1.000 EA |
| 35FH4005A32   | IEC FH NO GR SR W/3 HOLES - PRIMED        | 1.000 EA |
| 51XW1032A06   | 10-32 X .38, TAPTITE II, HEX WSHR SLTD S  | 3.000 EA |

| Parts List (continued) |                                          |          |
|------------------------|------------------------------------------|----------|
| Part Number            | Description                              | Quantity |
| 35CB4521GX             | CONDUIT BOX LID KIT                      | 1.000 EA |
| 51XW0832A07            | 8-32 X .44, TAPTITE II, HEX WSHR SLTD SE | 4.000 EA |
| HW2501D13              | KEY, 3/16 SQ X 1.375                     | 1.000 EA |
| HA7000A04              | KEY RETAINER 0.625 DIA SHAFTS            | 1.000 EA |
| 85XU0407S04            | 4X1/4 U DRIVE PIN STAINLESS              | 2.000 EA |
| WD1000A15              | 3-520132-2 AMP FLAG (4M/RL NON-CANC/NON- | 4.000 EA |
| MJ1000A02              | GREASE, POLYREX EM EXXON (USe 4824-15A)  | 0.050 LB |
| HA3100A22              | THRUBOLT 10-32 X 10.125                  | 4.000 EA |
| SP5181A01              | MODEL 35 LC TORQ STAT SWITCH LEAD ASSY   | 1.000 EA |
| MG1000Y03              | MUNSELL 2.53Y 6.70/ 4.60, GLOSS 20,      | 0.017 GA |
| LC0001A01              | CONN LABEL / WARNING LABEL (LC0001 / LB1 | 1.000 EA |
| 35PA1066               | PKG GRP, PRINT PK1008A06                 | 1.000 EA |
| MN416A01               | TAG-INSTAL-MAINT no wire (1200/bx) 11/14 | 1.000 EA |

| Accessories   |              |            |
|---------------|--------------|------------|
| Part Number   | Description  | Multiplier |
| 35-8762       | C FACE KIT   | A8         |
| 35EP1506A01SP | D-FLANGE KIT | A8         |

**AC Induction Motor Performance Data**

Record # 20986 - Typical performance - not guaranteed values

|                               |                     |                        |
|-------------------------------|---------------------|------------------------|
| <b>Winding:</b> 35WGS758-R002 | <b>Type:</b> 3532LC | <b>Enclosure:</b> TEFC |
|-------------------------------|---------------------|------------------------|

| Nameplate Data        |              |              |    | 230 V, 60 Hz:<br>High Voltage Connection |                                          |
|-----------------------|--------------|--------------|----|------------------------------------------|------------------------------------------|
| Rated Output (HP)     | 1            |              |    | Full Load Torque                         | 3 LB-FT                                  |
| Volts                 | 115/230      |              |    | Start Configuration                      | direct on line                           |
| Full Load Amps        | 8.5/4.25     |              |    | Breakdown Torque                         | 8 LB-FT                                  |
| R.P.M.                | 1760         |              |    | Pull-up Torque                           | 6.5 LB-FT                                |
| Hz                    | 60           | Phase        | 1  | Locked-rotor Torque                      | 8.6 LB-FT                                |
| NEMA Design Code      | L            | KVA Code     | L  | Starting Current                         | 40 A                                     |
| Service Factor (S.F.) | 1.15         |              |    | No-load Current                          | 1.7 A                                    |
| NEMA Nom. Eff.        | 82.5         | Power Factor | 91 | Line-line Res. @ 25°C                    | 0.706 $\Omega$ A Ph<br>1.8 $\Omega$ B Ph |
| Rating - Duty         | 40C AMB-CONT |              |    | Temp. Rise @ Rated Load                  | 39°C                                     |
| S.F. Amps             | 9.4/4.7      |              |    | Temp. Rise @ S.F. Load                   | 48°C                                     |

**Load Characteristics 230 V, 60 Hz, 1 HP**

|                 |      |      |      |      |      |      |      |
|-----------------|------|------|------|------|------|------|------|
| % of Rated Load | 25   | 50   | 75   | 100  | 125  | 150  | S.F. |
| Power Factor    | 65   | 81   | 88   | 91   | 93   | 94   | 92   |
| Efficiency      | 66.3 | 76.9 | 83.2 | 83.6 | 82   | 82   | 82.6 |
| Speed           | 1791 | 1781 | 1769 | 1758 | 1743 | 1725 | 1749 |
| Line amperes    | 1.95 | 2.55 | 3.4  | 4.25 | 5.3  | 6.5  | 4.88 |

## Performance Graph at 230V, 60Hz, 1.0HP Typical performance - Not guaranteed values







