



---

# Customer information packet

## VEBM3615T-S

5HP, 1750RPM, 3PH, 60HZ, 184TC, 3642M, TEFC, F1

Class - None

Division - Not Applicable

## Specifications

|                                |                                                               |
|--------------------------------|---------------------------------------------------------------|
| Enclosure                      | TEFC                                                          |
| Frame                          | 184TC                                                         |
| Frame Material                 | Steel                                                         |
| Frequency                      | 60.00 Hz                                                      |
| Haz Area Class and Group       | None                                                          |
| Haz Area Division              | Not Applicable                                                |
| Motor Letter Type              | Three Phase                                                   |
| Output @ Frequency             | 5.000 HP @ 60 HZ                                              |
| Phase                          | 3                                                             |
| Synchronous Speed @ Frequency  | 1800 RPM @ 60 HZ                                              |
| Voltage @ Frequency            | 230.0 V @ 60 HZ<br>460.0 V @ 60 HZ                            |
| Agency Approvals               | CE<br>CURUSEEV<br>NEMA PREMIUM<br>UKCA<br>WEEE                |
| Ambient Temperature            | 40 °C                                                         |
| Auxiliary Box                  | NO AUXILLARY BOX                                              |
| Auxiliary Box Lead Termination | None                                                          |
| Base Indicator                 | No Mounting                                                   |
| Bearing Grease Type            | Polyrex EM (-20F +300F)                                       |
| Blower                         | None                                                          |
| Current @ Voltage              | 13.900 A @ 208.0 V<br>6.700 A @ 460.0 V<br>13.400 A @ 230.0 V |
| Design Code                    | B                                                             |
| Drip Cover                     | No Drip Cover                                                 |
| Duty Rating                    | CONT                                                          |
| Efficiency @ 100% Load         | 89.5 %                                                        |
| Electrically Isolated Bearing  | Not Electrically Isolated                                     |
| Feedback Device                | NO FEEDBACK                                                   |

## Part detail

|              |            |
|--------------|------------|
| Revision     | F          |
| Type         | AC         |
| Mech. spec.  | 36M815     |
| Base         |            |
| Status       | PRD/A      |
| Elec. spec.  | 36WGS268   |
| Layout       | 36LYM815   |
| Eff. date    | 05-27-2025 |
| CD Diagram   | CD0005     |
| Poles        | 04         |
| Leads        | 9#16       |
| Proprietary  | False      |
| Created date | 10-08-2015 |

|                               |                    |
|-------------------------------|--------------------|
| Front Face Code               | Standard           |
| Front Shaft Indicator         | None               |
| Heater Indicator              | No Heater          |
| High Voltage Full Load Amps   | 6.7 a              |
| Insulation Class              | F                  |
| Inverter Code                 | Inverter Ready     |
| KVA Code                      | J                  |
| Lifting Lugs                  | No Lifting Lugs    |
| Locked Bearing Indicator      | Locked Bearing     |
| Motor Lead Exit               | Ko Box             |
| Motor Lead Quantity/Wire Size | 9 @ 16 AWG         |
| Motor Lead Termination        | Flying Leads       |
| Motor Standards               | NEMA               |
| Motor Type                    | 3642M              |
| Mounting Arrangement          | F1                 |
| Number of Poles               | 4                  |
| Overall Length                | 20.56 IN           |
| Power Factor                  | 78                 |
| Product Family                | General Purpose    |
| Pulley End Bearing Type       | Ball               |
| Pulley Face Code              | C-Face             |
| Pulley Shaft Indicator        | Standard           |
| Rodent Screen                 | None               |
| Service Factor                | 1.15               |
| Shaft Diameter                | 1.125 IN           |
| Shaft Extension Location      | Pulley End         |
| Shaft Ground Indicator        | No Shaft Grounding |
| Shaft Rotation                | Reversible         |
| Shaft Slinger Indicator       | No Slinger         |
| Speed                         | 1750 rpm           |
| Speed Code                    | Single Speed       |
| Starting Method               | Direct on line     |
| Thermal Device - Bearing      | None               |
| Thermal Device - Winding      | None               |

| Vibration Sensor Indicator | No Vibration Sensor |
|----------------------------|---------------------|
| Winding Thermal 1          | None                |
| Winding Thermal 2          | None                |

## Nameplate

| NP2934L              |              |      |      |     |   |    |   |  |  |  |  |
|----------------------|--------------|------|------|-----|---|----|---|--|--|--|--|
| CAT.NO.              | VEBM3615T-S  |      |      |     |   |    |   |  |  |  |  |
| SPEC.                | 36M815S268G1 |      |      |     |   |    |   |  |  |  |  |
| HP                   | 5            |      |      |     |   |    |   |  |  |  |  |
| VOLTS                | 230/460      |      |      |     |   |    |   |  |  |  |  |
| AMP                  | 13.4/6.7     |      |      |     |   |    |   |  |  |  |  |
| R.P.M. (1/MIN)       | 1750         |      |      |     |   |    |   |  |  |  |  |
| FRAME                | 184TC        | HZ   | 60   | PH  | 3 |    |   |  |  |  |  |
| SER.F.               | 1.15         | CODE | J    | DES | B | CL | F |  |  |  |  |
| NEMA-NOM-EFF         | 89.5         | PF   | 78   |     |   |    |   |  |  |  |  |
| RATING               | 40C AMB-CONT |      |      |     |   |    |   |  |  |  |  |
| CC                   | 010A         |      |      |     |   |    |   |  |  |  |  |
| DE                   | 6206         | ODE  | 6206 |     |   |    |   |  |  |  |  |
| ENCL                 | TEFC         | SN   |      |     |   |    |   |  |  |  |  |
| IP22, BRAKE 25 FT-LB |              |      |      |     |   |    |   |  |  |  |  |

**AC Induction Motor Performance Data**

Record # 35063

Typical performance - not guaranteed values

| Winding: 36WGS268-R016 |    |          | Type: 3642M                              |                     | Enclosure: TEFC  |                           |        |              |
|------------------------|----|----------|------------------------------------------|---------------------|------------------|---------------------------|--------|--------------|
| Nameplate Data         |    |          | 460 V, 60 Hz:<br>High Voltage Connection |                     |                  |                           |        |              |
| Rated Output (HP)      |    | 5        | Full Load Torque                         |                     | 14.9 LB-FT       |                           |        |              |
| Volts                  |    | 230/460  | Start Configuration                      |                     | direct on line   |                           |        |              |
| Full Load Amps         |    | 13.4/6.7 | Breakdown Torque                         |                     | 52.2 LB-FT       |                           |        |              |
| R.P.M.                 |    | 1750     | Pull-up Torque                           |                     | 31.5 LB-FT       |                           |        |              |
| Hz                     | 60 | Phase    | 3                                        | Locked-rotor Torque |                  | 34.9 LB-FT                |        |              |
| NEMA Design Code       |    | B        | KVA Code                                 | J                   | Starting Current |                           | 49.1 A |              |
| Service Factor (S.F.)  |    | 1.15     |                                          | No-load Current     |                  | 3.24 A                    |        |              |
| NEMA Nom. Eff.         |    | 89.5     | Power Factor                             |                     | 78               | Line-line Res. @ 25°C     |        | 2.27 Ω       |
| Rating - Duty          |    | 40C      |                                          | AMB-CONT            |                  | Temp. Rise @ Rated Load   |        | 71°C         |
| S.F. Amps              |    |          |                                          |                     |                  | Temp. Rise @ S.F. Load    |        | 87°C         |
|                        |    |          |                                          |                     |                  | Locked-rotor Power Factor |        | 39.8         |
|                        |    |          |                                          |                     |                  | Rotor inertia             |        | 0.391 LB-FT2 |

**Load Characteristics 460 V, 60 Hz, 5 HP**

| % of Rated Load | 25   | 50   | 75   | 100  | 125  | 150  | S.F. |
|-----------------|------|------|------|------|------|------|------|
| Power Factor    | 39   | 60   | 72   | 78   | 83   | 83   | 81   |
| Efficiency      | 85   | 89.7 | 90.6 | 89.6 | 88.6 | 87   | 89   |
| Speed           | 1789 | 1776 | 1762 | 1750 | 1733 | 1714 | 1740 |
| Line amperes    | 3.55 | 4.31 | 5.43 | 6.65 | 7.94 | 9.64 | 7.42 |

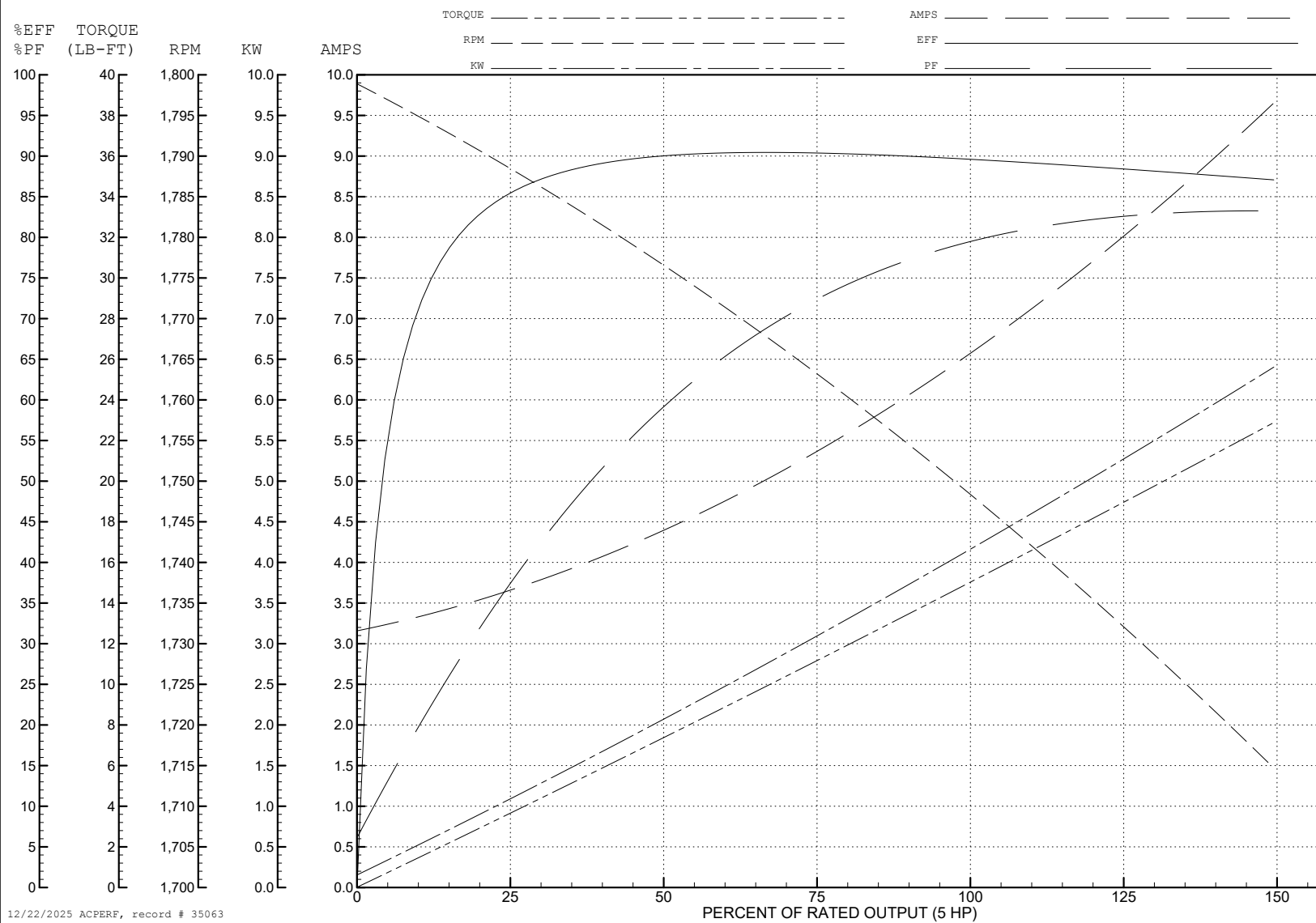
ABB Motors and Mechanical Inc.

WINDING # 36WGS268

Typical performance - not guaranteed values.

5 HP 3 PH 60 HZ 1750 RPM 460 V 3642M

TORQUES (LB-FT): PO=52.2 PU=31.5 LR=34.9 LRA=49.1



**AC Induction Motor Performance Data**

Record # 93277

Typical performance - not guaranteed values

| Winding: 36WGS268-R016 |    |          | Type: 3642M                             |                     | Enclosure: TEFC  |                           |        |              |
|------------------------|----|----------|-----------------------------------------|---------------------|------------------|---------------------------|--------|--------------|
| Nameplate Data         |    |          | 230 V, 60 Hz:<br>Low Voltage Connection |                     |                  |                           |        |              |
| Rated Output (HP)      |    | 5        | Full Load Torque                        |                     | 14.9 LB-FT       |                           |        |              |
| Volts                  |    | 230/460  | Start Configuration                     |                     | direct on line   |                           |        |              |
| Full Load Amps         |    | 13.4/6.7 | Breakdown Torque                        |                     | 52.2 LB-FT       |                           |        |              |
| R.P.M.                 |    | 1750     | Pull-up Torque                          |                     | 31.5 LB-FT       |                           |        |              |
| Hz                     | 60 | Phase    | 3                                       | Locked-rotor Torque |                  | 34.9 LB-FT                |        |              |
| NEMA Design Code       |    | B        | KVA Code                                | J                   | Starting Current |                           | 98.2 A |              |
| Service Factor (S.F.)  |    | 1.15     |                                         | No-load Current     |                  | 6.48 A                    |        |              |
| NEMA Nom. Eff.         |    | 89.5     | Power Factor                            |                     | 78               | Line-line Res. @ 25°C     |        | 0.567 Ω      |
| Rating - Duty          |    | 40C      |                                         | AMB-CONT            |                  | Temp. Rise @ Rated Load   |        | 71°C         |
| S.F. Amps              |    |          |                                         |                     |                  | Temp. Rise @ S.F. Load    |        | 86°C         |
|                        |    |          |                                         |                     |                  | Locked-rotor Power Factor |        | 39.8         |
|                        |    |          |                                         |                     |                  | Rotor inertia             |        | 0.391 lb-ft² |

**Load Characteristics 230 V, 60 Hz, 5 HP**

| % of Rated Load | 25   | 50   | 75    | 100  | 125   | 150   | S.F. |
|-----------------|------|------|-------|------|-------|-------|------|
| Power Factor    | 38   | 60   | 72    | 78   | 83    | 83    | 81   |
| Efficiency      | 84.9 | 89.6 | 90.5  | 89.6 | 88.5  | 87    | 88.9 |
| Speed           | 1789 | 1776 | 1762  | 1750 | 1733  | 1714  | 1740 |
| Line amperes    | 7.1  | 8.62 | 10.86 | 13.3 | 15.88 | 19.28 | 14.8 |

ABB Motors and Mechanical Inc.

WINDING # 36WGS268

Typical performance - not guaranteed values.

5 HP 3 PH 60 HZ 1750 RPM 230 V 3642M

TORQUES (LB-FT): PO=52.2 PU=31.5 LR=34.9 LRA=98.2

