

# Brake Motors

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**Model No:** 182TTTL7034

**Catalog No:** C405

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Brake Motor, 3 & 2 HP, 3 Ph, 60 & 50 Hz, 230/460 & 190/380 V, 1800 RPM, 182TC Frame, TENV

**Product Information Packet: Model No: 182TTTL7034, Catalog No: C405 Brake Motor, 3 & 2 HP, 3 Ph, 60 & 50 Hz, 230/460 & 190/380 V, 1800 RPM, 182TC Frame, TENV**

#### Nameplate Specifications

|                            |                                 |                        |                     |
|----------------------------|---------------------------------|------------------------|---------------------|
| Phase                      | 3                               | Output HP              | 3 & 2 Hp            |
| Output KW                  | 2.2 & 1.5 kW                    | Voltage                | 230/460 & 190/380 V |
| Speed                      | 1760 & 1470 r/min               | Synchronous RPM        | 1800 & 1500 r/min   |
| Service Factor             | 1.15 & 1.15                     | Frame                  | 182TC               |
| Enclosure                  | Totally Enclosed Non Ventilated | Thermal Protection     | No Protection       |
| Efficiency                 | 90.2 & 88.5 %                   | Ambient Temperature    | 40 °C               |
| Frequency                  | 60 & 50 Hz                      | Current                | 8/4 & 6.8/3.4 A     |
| Power Factor               | 80                              | Duty                   | Continuous          |
| Insulation Class           | F                               | Design Code            | B                   |
| KVA Code                   | K                               | Drive End Bearing Size | 6207                |
| Opp Drive End Bearing Size | 6206                            | UL                     | Recognized          |
| CSA                        | Y                               | CE                     | Y                   |
| IP Code                    | 43                              | Number of Speeds       | 1                   |

#### Technical Specifications

|                       |                              |                       |                  |
|-----------------------|------------------------------|-----------------------|------------------|
| Electrical Type       | Squirrel Cage Inverter Rated | Starting Method       | Line Or Inverter |
| Poles                 | 4                            | Rotation              | Reversible       |
| Resistance Main       | 3.76 O                       | Mounting              | Rigid Base       |
| Motor Orientation     | Horizontal                   | Drive End Bearing     | Ball             |
| Opp Drive End Bearing | Ball                         | Frame Material        | Aluminum         |
| Shaft Type            | T                            | Overall Length        | 19.68 in         |
| Frame Length          | 7.2 in                       | Shaft Diameter        | 1 1/8 in         |
| Shaft Extension       | 2.62 in                      | Assembly/Box Mounting | F1/F2 Capable    |
| Inverter Load         | Constant 2:1/Variable 10:1   |                       |                  |

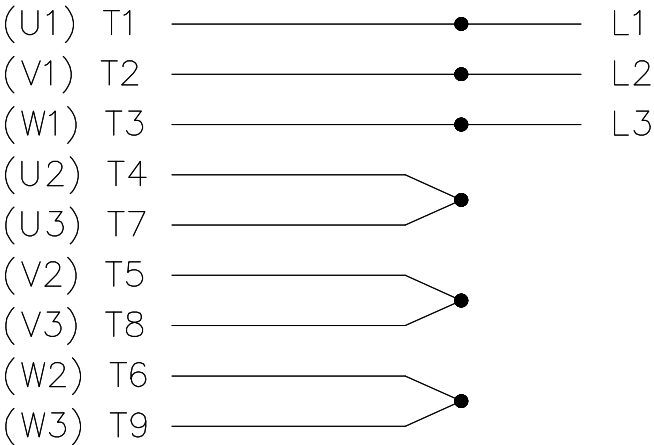
#### Drawings

|                    |        |                 |             |
|--------------------|--------|-----------------|-------------|
| Connection Drawing | EE7308 | Outline Drawing | SS68966-720 |
|--------------------|--------|-----------------|-------------|

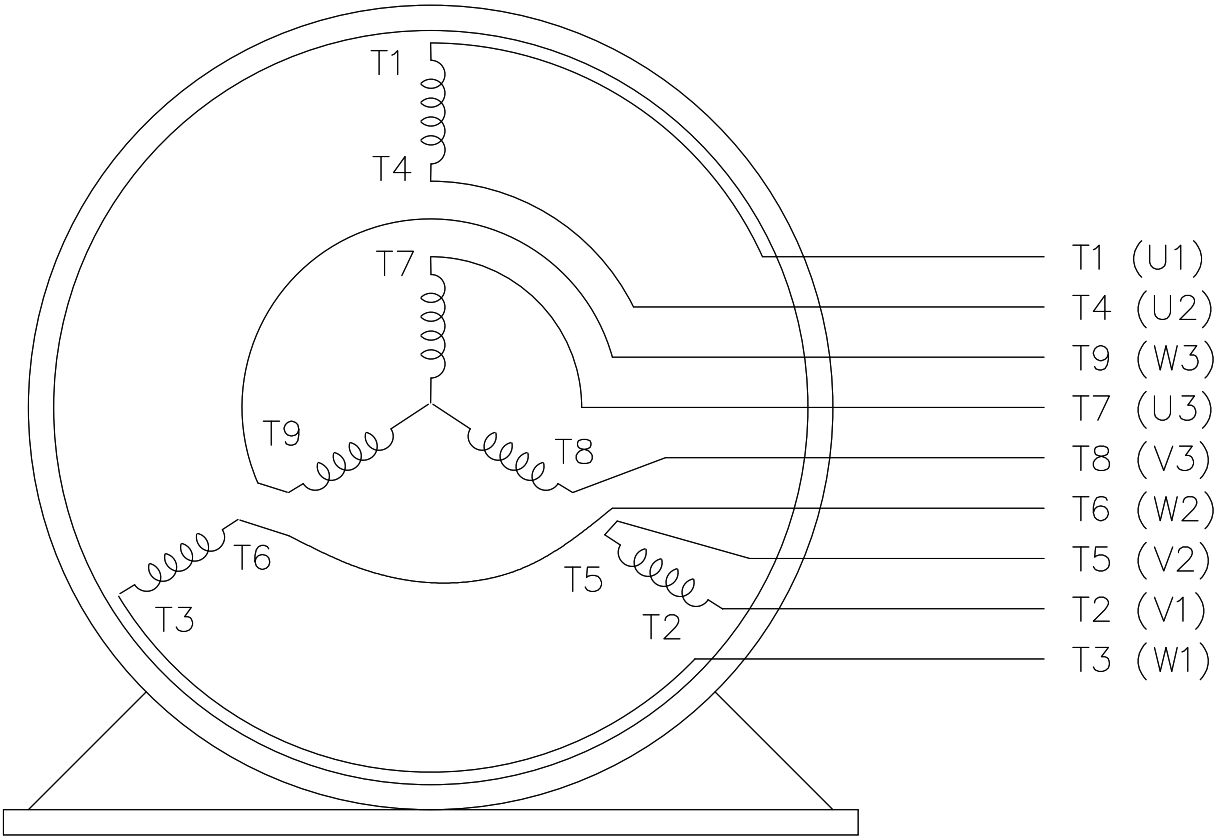
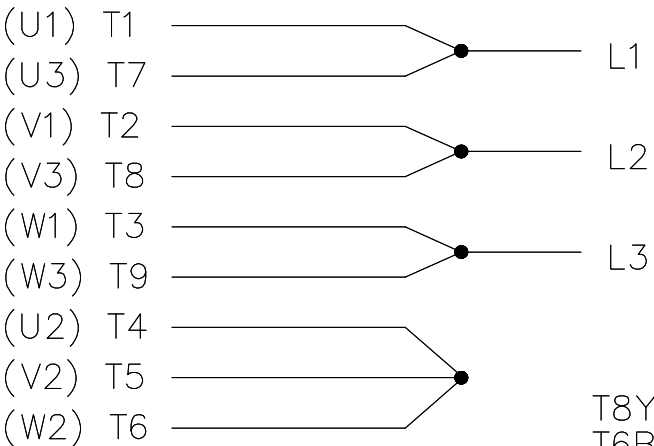


THREE PHASE  
DUAL VOLTAGE MOTOR

HIGH VOLTAGE



LOW VOLTAGE



VIEW OF TERMINAL END

REF.  
WINDING DIAGRAM

T8Y, T2Y, T2BL, T4BX, T2EC, T2G  
T6BZ, T2B, T6BL, T4AV, T6B, T4B

OPTIONAL CORD  
CONNECTION

L1 ——— WHITE ———  
L2 ——— RED ———  
L3 ——— BLACK ———

|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |                    |                                |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------|--------------------------------|
| DRAWING REVISION<br>J                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          | REVISION BY<br>SB  | REV DATE/ © DATE<br>08/01/2025 |
| REQUEST NUMBER<br>CR-0023654                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   | APPROVED BY<br>SBD | DATE<br>08/01/2025             |
| REQUEST NUMBER DESCRIPTION<br>DRAWING TITLE BLOCK UPDATED                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |                    |                                |
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mm DIMENSIONS IN [BRACKETS]  
ARE FOR REFERENCE ONLY

|                           |
|---------------------------|
| DRAWN BY<br>RM            |
| DATE<br>11/20/1990        |
| APPROVED BY<br>SAS        |
| DATE<br>04/24/2003        |
| REFERENCE                 |
| THIRD ANGLE<br>PROJECTION |

|                                                                 |                          |                 |
|-----------------------------------------------------------------|--------------------------|-----------------|
| marathon™                                                       |                          |                 |
| DESCRIPTION<br>CONN DIAGRAM-EXTERNAL<br>3Ø - DUAL VOLTAGE MOTOR |                          |                 |
| MATERIAL                                                        |                          | PROCESS/FINISH  |
| SIZE<br>A                                                       | DRAWING NUMBER<br>EE7308 | SHEET<br>1 OF 1 |
| 4 of 5                                                          |                          |                 |

## Data Sheet

Date: 6/19/2017

Customer: \_\_\_\_\_

Attention: \_\_\_\_\_

Submitted by: FAREEDA DUDEKULA



182TTTL7034

Submittal

Data @ 460 V

## Motor Load Data

| Load           | 0%   | 25%  | 50%  | 75%  | 100% | 115%  | 125% | LR   |  |
|----------------|------|------|------|------|------|-------|------|------|--|
| Current (Amps) | 2.00 | 2.20 | 2.60 | 3.2  | 4.0  | 4.5   | 4.8  | 32.0 |  |
| Torque (ft-lb) | 0.00 | 2.20 | 4.4  | 6.7  | 9.0  | 10.4  | 11.2 | 22.5 |  |
| RPM            | 1800 | 1790 | 1780 | 1770 | 1760 | 1,755 | 1750 | 0    |  |
| Efficiency (%) |      | 82.5 | 88.5 | 89.5 | 90.2 | 89.5  | 88.5 |      |  |
| P.F. (%)       | 6.5  | 38.0 | 60.0 | 72.5 | 80.0 | 81.5  | 82.5 | 47.0 |  |

## Motor Speed Data

|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               | LR            | Pull-Up | BD     | Rated    | Idle | Information Block |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------|---------|--------|----------|------|-------------------|------------------|----------|----------------|----|------|----|---|----|----|----|-----|----|----|----|-----|-----|----|----|-----|-----|----|------|------|-----------|------|--|--|--|
| Speed (RPM)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   | 0             | 750     | 1500   | 1760     | 1800 | HP                | 3.0              |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| Current (Amps)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | 32.0          | 30.0    | 23.0   | 4.0      | 2.00 | Sync. RPM         | 1800             |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| Torque (ft-lb)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | 22.5          | 20.0    | 35.0   | 9.0      | 0.00 | Frame             | 182              |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| <div><div>— Efficiency (%) — P.F. (%) — Current (Amps)</div><table><caption>Graph Data Points (Approximate)</caption><thead><tr><th>Load (%)</th><th>Efficiency (%)</th><th>P.F. (%)</th><th>Current (Amps)</th></tr></thead><tbody><tr><td>25</td><td>82.5</td><td>38</td><td>-</td></tr><tr><td>50</td><td>88</td><td>60</td><td>2.0</td></tr><tr><td>75</td><td>89</td><td>75</td><td>3.0</td></tr><tr><td>100</td><td>90</td><td>80</td><td>4.0</td></tr><tr><td>125</td><td>88</td><td>82.5</td><td>32.0</td></tr></tbody></table></div> |               |         |        |          |      | Load (%)          | Efficiency (%)   | P.F. (%) | Current (Amps) | 25 | 82.5 | 38 | - | 50 | 88 | 60 | 2.0 | 75 | 89 | 75 | 3.0 | 100 | 90 | 80 | 4.0 | 125 | 88 | 82.5 | 32.0 | Enclosure | TENV |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | Load (%)          | Efficiency (%)   | P.F. (%) | Current (Amps) |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | 25                | 82.5             | 38       | -              |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | 50                | 88               | 60       | 2.0            |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | 75                | 89               | 75       | 3.0            |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | 100               | 90               | 80       | 4.0            |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | 125               | 88               | 82.5     | 32.0           |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | Construction      | TTL              |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | Voltage           | 30/460#190/381 V |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | Frequency         | 60 Hz            |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | Design            | B                |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | LR Code letter    | K                |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | Service Factor    | 1.15             |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | Temp Rise @ FL    | 60 ° C           |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | Duty              | CONT             |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | Ambient           | 40 ° C           |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |               |         |        |          |      | Elevation         | 1,000 feet       |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| Rotor/Shaft wk²                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               | 0.40 Lb-Ft²   |         |        |          |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| Ref Wdg                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       | K1824116 TL   |         |        |          |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| Sound Pressure @ 1M                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 62 dBA        |         |        |          |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| VFD Rating                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    | NONE          |         |        |          |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| Outline Dwg                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   | B-SS68966-720 |         |        |          |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| Conn. Diag                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    | A-EE7308      |         |        |          |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| Additional Specifications:                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |               |         |        |          |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| 0                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |               |         |        |          |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| 0                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |               |         |        |          |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| EQUIV CKT (OHMS / PHASE)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |               |         |        |          |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| R1                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            | R2            | X1      | X2     | Xm       |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |
| 2.3530                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | 1.6160        | 5.0840  | 7.9000 | 130.4100 |      |                   |                  |          |                |    |      |    |   |    |    |    |     |    |    |    |     |     |    |    |     |     |    |      |      |           |      |  |  |  |

## Speed -Torque Curve

