

## PRODUCT INFORMATION PACKET

**marathon®**  
Motors

Model No: 213TTFN16326

Catalog No: E203-P

7 1/2, 1800, TEFC, 213T, 3/60/208-230/460

Totally Enclosed Fan Cooled (TEFC)



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**REGAL**

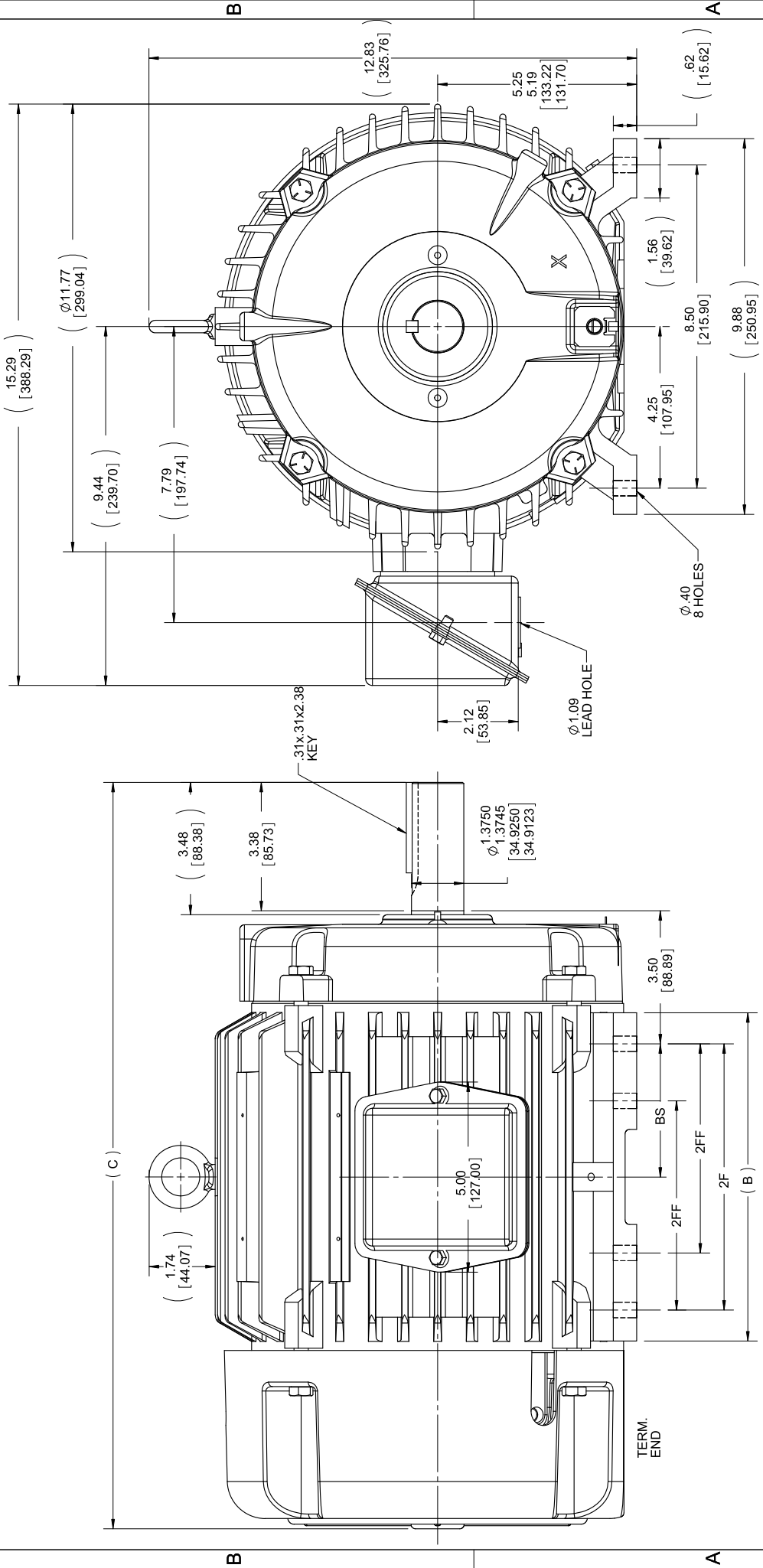


### Nameplate Specifications

|                            |                             |                        |               |
|----------------------------|-----------------------------|------------------------|---------------|
| Output HP                  | 7.50 Hp                     | Output KW              | 5.6 kW        |
| Frequency                  | 60 Hz                       | Voltage                | 208-230/460 V |
| Current                    | 21.4-20.0/10.0 A            | Speed                  | 1770 rpm      |
| Service Factor             | 1.15                        | Phase                  | 3             |
| Efficiency                 | 91.7 %                      | Duty                   | Continuous    |
| Insulation Class           | F                           | Design Code            | B             |
| KVA Code                   | H                           | Frame                  | 213T          |
| Enclosure                  | Totally Enclosed Fan Cooled | Overload Protector     | No            |
| Ambient Temperature        | 40 °C                       | Drive End Bearing Size | 6208          |
| Opp Drive End Bearing Size | 6307                        | UL                     | Recognized    |
| CSA                        | Y                           | CE                     | Y             |
| IP Code                    | 43                          |                        |               |

### Technical Specifications

|                       |                              |                       |                  |
|-----------------------|------------------------------|-----------------------|------------------|
| Electrical Type       | Squirrel Cage Inverter Rated | Starting Method       | Line Or Inverter |
| Poles                 | 4                            | Rotation              | Reversible       |
| Mounting              | Rigid base                   | Motor Orientation     | Horizontal       |
| Drive End Bearing     | Ball                         | Opp Drive End Bearing | Ball             |
| Frame Material        | Cast Iron                    | Shaft Type            | T                |
| Overall Length        | 19.63 in                     | Frame Length          | 9.12 in          |
| Shaft Diameter        | 1.375 in                     | Shaft Extension       | 3.38 in          |
| Assembly/Box Mounting | F1/F2 Capable                |                       |                  |
| Outline Drawing       | 037659-912                   | Connection Diagram    | EE7308           |



**NOTES:**

- CONDUIT BOX CAN BE ROTATED IN 90° STEPS.
- CONDUIT BOX CAN BE MOUNTED IN OPPOSITE SIDE BY REMOVING BRACKETS AND TURNING FRAME 180°.
- NAMEPLATE TO BE READ FROM CONDUIT BOX SIDE OF MOTOR.

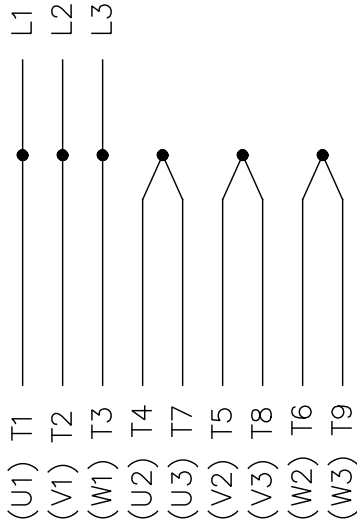
|      |         |                   |                   |                   |                  |                  |                  |
|------|---------|-------------------|-------------------|-------------------|------------------|------------------|------------------|
| 1212 | 213/215 | 22.63<br>[574.80] | 11.76<br>[298.70] | 10.00<br>[254.00] | 7.00<br>[177.80] | 5.00<br>[127.00] | 5.00<br>[127.00] |
| 912  | 213/215 | 19.63<br>[498.60] | 8.63<br>[219.20]  | 7.00<br>[177.80]  | 5.50<br>[139.70] | 3.50<br>[88.90]  | 3.50<br>[88.90]  |
| DASH | FRAME   | C                 | B                 | 2F                | 2FF              | BS               | BS               |

|  |         |             |           |  |                             |                        |            |                            |  |
|--|---------|-------------|-----------|--|-----------------------------|------------------------|------------|----------------------------|--|
| DRAWING REVISION   |         | REVISION BY | DATE      | TOLERANCES UNLESS OTHERWISE SPECIFIED: |                             | DRAWN BY               |            | Regal Beloit America, Inc. |  |
| D  | 0078542 | M. VERBICK  | 5-29-2015 | DEC                                    | ±0.03                       | AK                     | AK         | DESCRIPTION                |  |
| ECO DESCRIPTION  |         |             |           | ANG                                    | ±0.125                      | DATE                   | 10-05-2009 | OUTLINE                    |  |
| TITLE BLOCK LOGO CHANGE  |         |             |           | XXX                                    | ±0.005                      | APPROVED BY            | SK         | 210 FR. TEFC               |  |
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|  |         |             |           | EDGES:                                 | 0.03/0.15 [0.76/3.81] X 45° | REFERENCE              |            | PROCESS FINISH             |  |
|  |         |             |           | CORNER FILLETS:                        | R.02 [.51]                  | THIRD ANGLE PROJECTION |            | SIZE                       |  |
|  |         |             |           | MACHINED SURFACES:                     | 125/3.2                     |                        |            | DRAWING NUMBER             |  |
|  |         |             |           |  |                             |                        |            | 037659                     |  |
|  |         |             |           |  |                             |                        |            | SHEET                      |  |
|  |         |             |           |  |                             |                        |            | 1 OF 1                     |  |

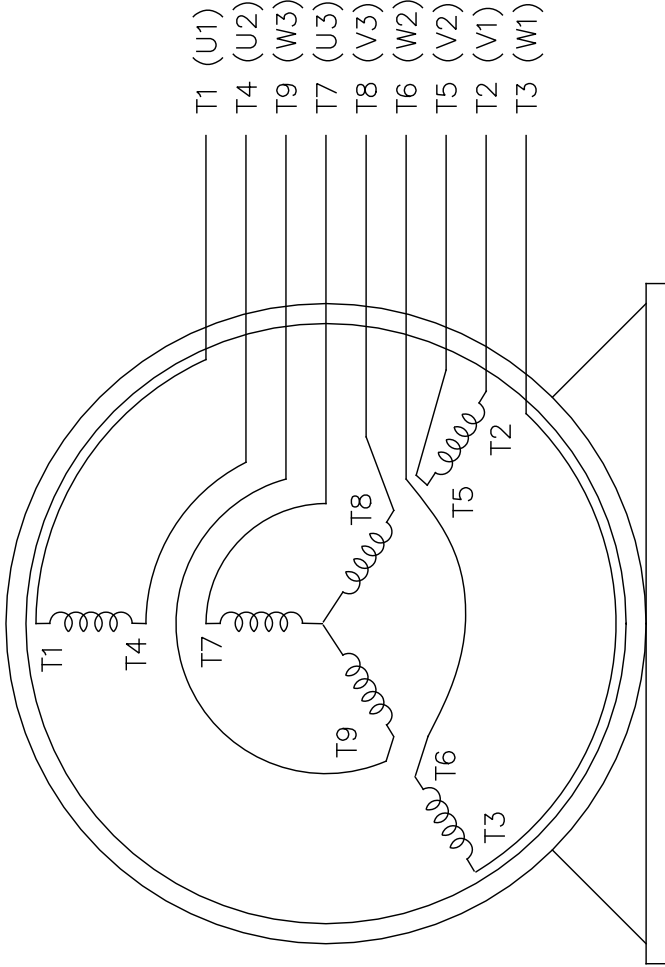
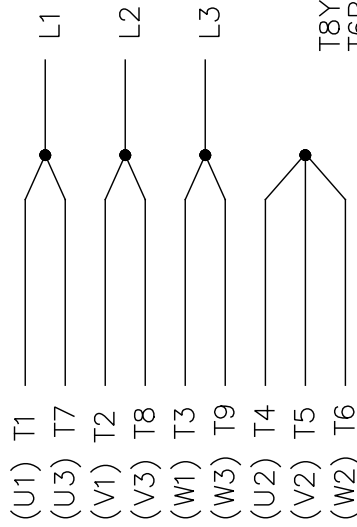
THREE PHASE  
DUAL VOLTAGE MOTOR

EE7308

HIGH VOLTAGE



LOW VOLTAGE



VIEW OF TERMINAL END

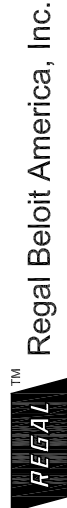
OPTIONAL CORD  
CONNECTION

- L1 — WHITE
- L2 — RED
- L3 — BLACK

REF.  
WINDING DIAGRAM

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

|     |  |  |           |                 |         |                             |      |                     |            |
|-----|--|--|-----------|-----------------|---------|-----------------------------|------|---------------------|------------|
| 5   |  | CHG TO REGAL LOGO  | SL        | 09/10/2015      | AB      | TOLERANCES UNLESS SPECIFIED |      | DRAWN RM 11/20/1990 |            |
| 4   |  | REVISED IEC NOTATIONS  | MSG       | 11/15/2011      | CMN.X   | INCHES                      | DEC. | ML                  | 11/21/1990 |
| 3   |  | ADDED IEC NOTATIONS... (U1), (V1) ETC.   | MSG       | 5/10/2010       | MJS.XX  | ±.1                         |      | APPD SAS            | 04/24/2003 |
| 2   |  | ADDED THE OPTIONAL CORD CONNECTION   | RDH       | 04/24/2003      | DRS.XXX | ±.02                        |      | SCALE               | 1=1        |
| 1   |  | REDRAWN  | RM        | 11/20/1990      | .XXXX   | ±.0005                      |      | REF                 |            |
| NO. |  | REVISION   | BY & DATE |                 | CHK     | ANG                         |      | FMF                 |            |
|     |  | THIS DRAWING IN DESIGN AND DETAIL IS OUR PROPERTY AND MUST NOT BE USED EXCEPT IN CONNECTION WITH OUR WORK ALL RIGHTS OF DESIGN AND INVENTION ARE RESERVED THIS IS AN ELECTRONICALLY GENERATED DOCUMENT - DO NOT SCALE THIS PRINT |           | RFP             | DIST    |                             | WP   | PREV                |            |
|     |  |  |           | CAD FILE ee7308 |         | SIZE                        |      | DRAWING NO.         | PAGE       |
|     |  |  |           |                 |         | A                           |      | EE7308              | OF         |
|     |  |  |           |                 |         |                             |      |                     | REV.       |
|     |  |  |           |                 |         |                             |      |                     | 5          |



TITLE CONNECTION DIAGRAM  
3φ - DUAL VOLTAGE MOTOR

CERTIFICATION DATA SHEET

Model#: 2131TFN16326 AA  
 CONN. DIAGRAM: EE7308  
 OUTLINE: 037659-912

WINDING#: K2134268 NONE 1  
 ASSEMBLY: F1/F2 CAPABLE

TYPICAL MOTOR PERFORMANCE DATA

|             |           |           |           |       |           |          |        |
|-------------|-----------|-----------|-----------|-------|-----------|----------|--------|
| HP          | KW        | SYNC. RPM | F.L. RPM  | FRAME | ENCLOSURE | KVA CODE | DESIGN |
| 7.1/2&7 1/2 | 5.60&5.60 | 1800      | 1770&1460 | 213T  | TEFC      | H        | B      |

|    |       |                     |                  |                  |            |      |           |       |           |
|----|-------|---------------------|------------------|------------------|------------|------|-----------|-------|-----------|
| PH | HZ    | VOLTS               | FLAMPS           | START TYPE       | DUTY       | INSL | S.F       | AMB°C | ELEVATION |
| 3  | 60/50 | 208-230/460#190/380 | 21.4-20/10&24/12 | LINE OR INVERTER | CONTINUOUS | F3   | 1.15/1.15 | 40    | 3300      |

|                          |                    |                    |          |                   |              |
|--------------------------|--------------------|--------------------|----------|-------------------|--------------|
| FULL LOAD EFF: 91.7&90.2 | 3/4 LOAD EFF: 91.4 | 1/2 LOAD EFF: 90.6 | GTD. EFF | ELEC. TYPE        | NO LOAD AMPS |
| FULL LOAD PF: 76.5&79.5  | 3/4 LOAD PF: 88.1  | 1/2 LOAD PF: 56    | 91       | SQ CAGE INV/RATED | 11 / 5.5     |

|             |                   |                |              |             |
|-------------|-------------------|----------------|--------------|-------------|
| F.L. TORQUE | LOCKED ROTOR AMPS | L.R. TORQUE    | B.D. TORQUE  | F.L. RISE°C |
| 22.2 LB-FT  | 135 / 67.5        | 52.9 LB-FT 238 | 75 LB-FT 338 | 45          |

|                        |             |              |            |                 |               |                   |
|------------------------|-------------|--------------|------------|-----------------|---------------|-------------------|
| SOUND PRESSURE @ 3 FT. | SOUND POWER | ROTOR WK*2   | MAX. WK*2  | SAFE STALL TIME | STARTS / HOUR | APPROX. MOTOR WGT |
| 62 dBA                 | 72 dBA      | 0.85 LB-FT*2 | 45 LB-FT*2 | 25 SEC.         | 2             | 140 LBS.          |

\*\*\* SUPPLEMENTAL INFORMATION \*\*\*

|                 |                  |            |             |             |                         |                |         |              |
|-----------------|------------------|------------|-------------|-------------|-------------------------|----------------|---------|--------------|
| DE BRACKET TYPE | ODE BRACKET TYPE | MOUNT TYPE | ORIENTATION | SEVERE DUTY | HAZARDOUS LOCATION      | DRIP COVER     | SCREENS | PAINT        |
| STANDARD        | STANDARD         | RIGID      | HORIZONTAL  | FALSE       | NONE                    | FALSE          | NONE    | BLUE (EPOXY) |
| BEARINGS        | GREASE           | SHAFT TYPE | SPECIAL DE  | SPECIAL ODE | SHAFT MATERIAL          | FRAME MATERIAL |         |              |
| DE              | OPE              |            |             |             | 1045 HOT ROLLED (C-204) | CAST IRON      |         |              |
| BALL            | POLYREX EM       | T          | NONE        | NONE        |                         |                |         |              |
| 6208            | 6307             |            |             |             |                         |                |         |              |

|                   |          |             |            |          |          |                  |                  |
|-------------------|----------|-------------|------------|----------|----------|------------------|------------------|
| THERMO-PROTECTORS |          | THERMISTORS |            | CONTROL  |          | SPACE IN HEATERS |                  |
| PROTECTORS        | WDG RTDs | BRG RTDs    | PROTECTORS | WDG RTDs | BRG RTDs | CONTROL          | SPACE IN HEATERS |
| NONE              | NOT      | NONE        | NONE       | NONE     | NONE     | FALSE            | NONE VOLTS       |

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If Inverter equals NONE, contact factory for further information

|                                |
|--------------------------------|
| INVERTER TORQUE: CONSTANT 20:1 |
| INV. HP SPEED RANGE: NONE      |
| ENCODER: NONE                  |
| NONE NONE                      |
| NONE NONE PPR                  |
| BRAKE: NONE NONE               |
| NONE P/N NONE                  |
| NONE NONE                      |
| NONE FT-LB NONE V NONE HZ      |