

# PRODUCT INFORMATION PACKET

**marathon**<sup>®</sup>  
Motors

Model No: 254TTFCD6007  
Catalog No: GT1421A  
15,3600,TEFC,254TC,3/60/575  
Totally Enclosed Fan Cooled (TEFC)



Regal and Marathon are trademarks of Regal Beloit Corporation or one of its affiliated companies.  
©2018 Regal Beloit Corporation, All Rights Reserved. MC017097E

**REGAL**<sup>®</sup>



### Nameplate Specifications

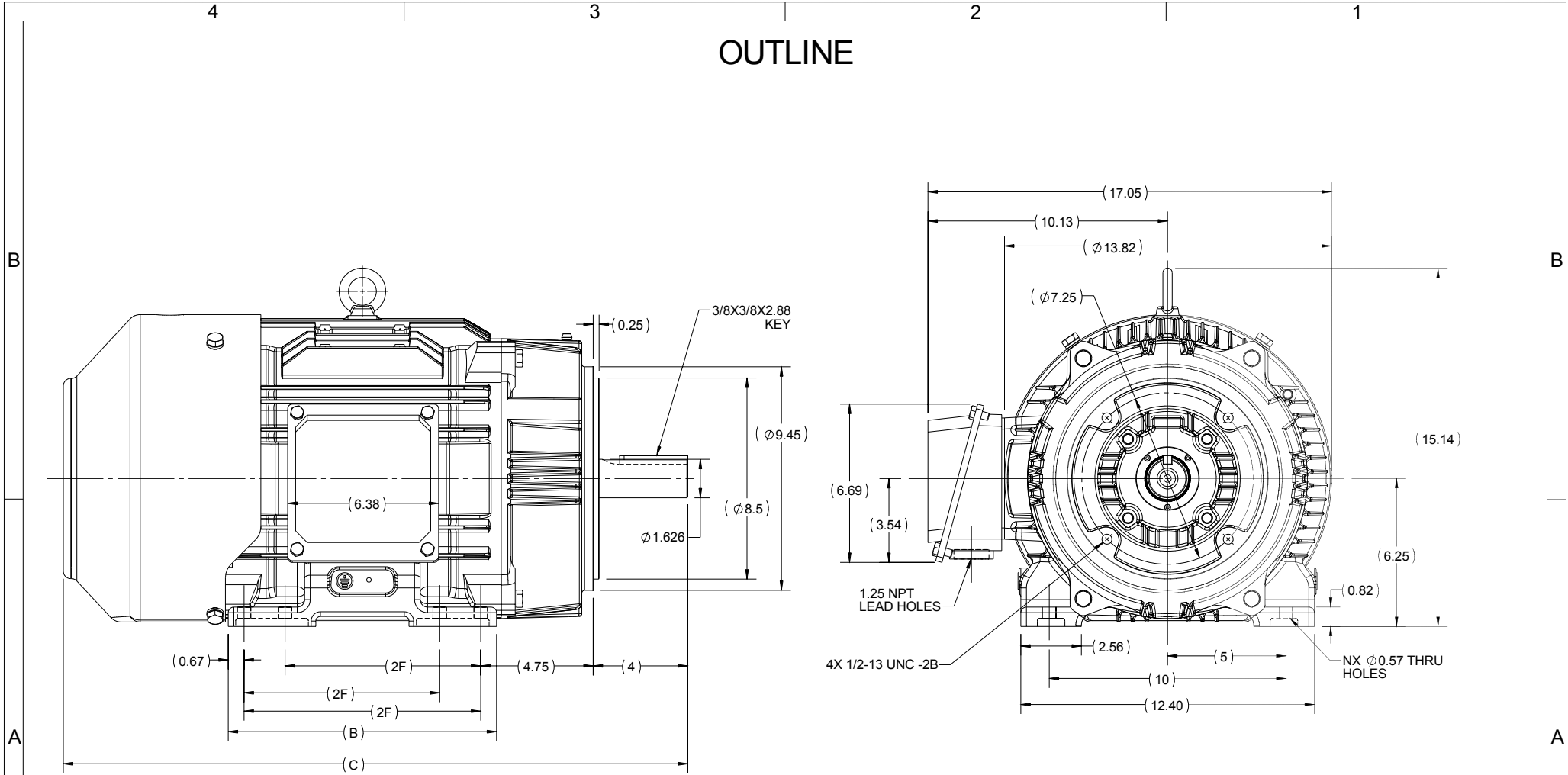
Output HP	<b>15 Hp</b>	Output KW	<b>11.2 kW</b>
Frequency	<b>60 Hz</b>	Voltage	<b>575 V</b>
Current	<b>14.3 A</b>	Speed	<b>3545 rpm</b>
Service Factor	<b>1.15</b>	Phase	<b>3</b>
Efficiency	<b>91 %</b>	Duty	<b>Continuous</b>
Insulation Class	<b>F</b>	Design Code	<b>B</b>
KVA Code	<b>G</b>	Frame	<b>254TC</b>
Enclosure	<b>Totally Enclosed Fan Cooled</b>	Overload Protector	<b>No</b>
Ambient Temperature	<b>40 °C</b>	Drive End Bearing Size	<b>6309</b>
Opp Drive End Bearing Size	<b>6209</b>	UL	<b>Listed</b>
CSA	<b>Y</b>	CE	<b>Y</b>
IP Code	<b>55</b>		

### Technical Specifications

Electrical Type	<b>Squirrel Cage Inverter Rated</b>	Starting Method	<b>Line Or Inverter</b>
Poles	<b>2</b>	Rotation	<b>Reversible</b>
Mounting	<b>Rigid base</b>	Motor Orientation	<b>Horizontal</b>
Drive End Bearing	<b>Ball</b>	Opp Drive End Bearing	<b>Ball</b>
Frame Material	<b>Cast Iron</b>	Shaft Type	<b>T</b>
Frame Length	<b>10.00 in</b>	Shaft Diameter	<b>1.626 in</b>
Shaft Extension	<b>4 in</b>	Assembly/Box Mounting	<b>F1/F2 Capable</b>
Outline Drawing	<b>SS620700</b>	Connection Diagram	<b>EE7300</b>

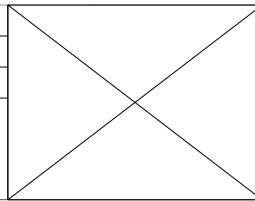
This is an uncontrolled document once printed or downloaded and is subject to change without notice. Date Created: 07/02/2018

# OUTLINE



256TC	11.34	26.39	10	8
254TC	9.60	24.65	8.25	4
FRAME	B	C	2F	N

DRAWING REVISION A	REVISION BY UDAY	DATE 08/09/2015
ECO ECO-0084584	APPROVED BY SBD	DATE 08/09/2015
ECO DESCRIPTION NEW DRAWING RELEASE		
<small>COPYRIGHT REGAL BELOIT AMERICA, INC. ALL RIGHTS RESERVED.                  PROPRIETARY AND CONFIDENTIAL INFORMATION - THIS DOCUMENT IS THE PROPERTY OF                  REGAL BELOIT AMERICA, INC. ("OWNER") AND CONTAINS OWNER'S PROPRIETARY                  INFORMATION. ANY PERSON, CORPORATION OR OTHER FIRM RECEIVING IT IS DEEMED,                  BY RECEIVING IT, TO AGREE THAT IT, AND/OR ANY PART OF IT, SHALL NOT BE DISCLOSED                  TO ANY PERSON, CORPORATION OR OTHER ENTITY, DUPLICATED, AND/OR USED, EXCEPT                  AS EXPRESSLY APPROVED IN WRITING IN ADVANCE BY OWNER. THIS DOCUMENT SHALL                  BE RETURNED TO OWNER UPON REQUEST. IT MAY BE SUBJECT TO CERTAIN                  RESTRICTIONS UNDER APPLICABLE EXPORT CONTROL LAWS AND REGULATIONS.</small>		



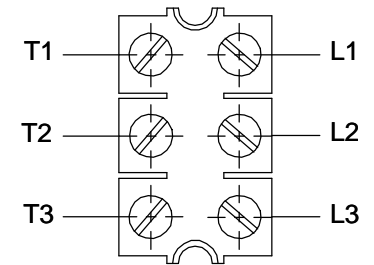
DRAWN BY SMAR
DATE 06/07/2015
APPROVED BY SBD
DATE 06/07/2015
REFERENCE
THIRD ANGLE PROJECTION

REGAL-BELOIT CORPORATION	
DESCRIPTION <b>OUTLINE</b>	
254/256TC FR-TEFC-CAST IRON	
MATERIAL	PROCESS/FINISH
SIZE B	DRAWING NUMBER SS620700
	SHEET 1 OF 1

**THREE PHASE - SINGLE VOLTAGE  
MOTOR - CONDUIT BOX @ 'A'**

**TO REVERSE ROTATION:  
INTERCHANGE ANY TWO  
LINE LEAD CONNECTIONS.**

**TERMINAL BLOCK WHEN SPECIFIED**



**VIEW OF TERMINAL END**

**IF MOTOR HAS  
6 LEADS**




**A-9806 DECAL**

**OPTIONAL CORD  
CONNECTION**

- L1 WHITE
- L2 RED
- L3 BLACK

DRAWING REVISION <b>AB</b>	REVISION BY <b>JJB</b>	DATE <b>06-27-2017</b>
ECO <b>ECO-0125361</b>	APPROVED BY <b>TB</b>	DATE <b>06-27-2017</b>
ECO DESCRIPTION <b>UPDATED TO CURRENT STANDARDS</b>		
<small>COPYRIGHT REGAL BELOIT AMERICA, INC. ALL RIGHTS RESERVED.                  PROPRIETARY AND CONFIDENTIAL INFORMATION - THIS DOCUMENT IS THE PROPERTY OF                  REGAL BELOIT AMERICA, INC. ("OWNER") AND CONTAINS OWNER'S PROPRIETARY                  INFORMATION. ANY PERSON, CORPORATION OR OTHER FIRM RECEIVING IT IS DEEMED,                  BY RECEIVING IT, TO AGREE THAT IT, AND/OR ANY PART OF IT, SHALL NOT BE DISCLOSED                  TO ANY PERSON, CORPORATION OR OTHER ENTITY, DUPLICATED, AND/OR USED, EXCEPT                  AS EXPRESSLY APPROVED IN WRITING IN ADVANCE BY OWNER. THIS DOCUMENT SHALL                  BE RETURNED TO OWNER UPON REQUEST. IT MAY BE SUBJECT TO CERTAIN                  RESTRICTIONS UNDER APPLICABLE EXPORT CONTROL LAWS AND REGULATIONS.</small>		



DRAWN BY <b>DA</b>	 <b>Regal Beloit America, Inc.</b>
DATE <b>03-26-1993</b>	
APPROVED BY <b>TB</b>	DESCRIPTION <b>CONNECTION DIAGRAM</b>
DATE <b>03-26-1993</b>	<b>EXTERNAL - SINGLE VOLTAGE - 3Ø MOTOR</b>
REFERENCE	MATERIAL
PROCESS/FINISH	
THIRD ANGLE PROJECTION 	SIZE <b>A</b>
DRAWING NUMBER <b>EE7300</b>	SHEET <b>1 OF 1</b>



**P.O. BOX 8003  
WAUSAU, WI 54401-8003  
PH. 715-675-3311**

**CERTIFICATION DATA SHEET**

**CUSTOMER:** CUSTOMER PO #:  
**ORDER #:** MODEL #: 254TTFCDD6007 AA  
**CONN. DIAGRAM:** EE7300 CUSTOMER PART #:  
**OUTLINE:** SS620700 MOUNTING: F1/F2 CAPABLE  
**WINDING #:** HE31602008 3

**TYPICAL MOTOR PERFORMANCE DATA**

HP	KW	SYNC. RPM	F.L. RPM	FRAME	ENCLOSURE	KVA CODE	DESIGN	
15	11.2	3600	3545	254TC	TEFC	G	B	
PH	HZ	VOLTS	AMPS	START TYPE	DUTY	INSL	S.F.	AMB°C
3	60	575	14.3	LINE OR INVERTER	CONTINUOUS	F7	1.15	40

<b>FULL LOAD EFF:</b>	91	<b>3/4 LOAD EFF:</b>	91	<b>1/2 LOAD EFF:</b>	90.6	<b>GTD. EFF</b>		<b>ELEC. TYPE</b>
<b>FULL LOAD PF:</b>	87	<b>3/4 LOAD PF:</b>	83.5	<b>1/2 LOAD PF:</b>	75		90.2	SQ CAGE INV RATED
<b>F.L. TORQUE</b>	<b>LOCKED ROTOR AMPS</b>	<b>L.R. TORQUE</b>	<b>B.D. TORQUE</b>	<b>F.L. RISE°C</b>				
22.2 LB-FT	91.2	37 LB-FT	167 %	60 LB-FT	270 %	55		

<b>SOUND PRESSURE @ 3 FT.</b>	<b>SOUND POWER</b>	<b>ROTOR WK^2</b>	<b>MAX. WK^2</b>	<b>SAFE STALL TIME</b>	<b>STARTS / HOUR</b>	<b>APPROX. MOTOR WGT</b>
72 DBA	82 DBA	1.2 LB-FT^2	22 LB-FT^2	20 SEC.	2	375 LBS.

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

DE BRACKET TYPE	ODE BRACKET TYPE	MOUNT TYPE	ORIENTATION	SEVERE DUTY	HAZARDOUS LOCATION	DRIP COVER	SCREENS	PAINT
C-FACE	STANDARD	RIGID	HORIZONTAL	FALSE	DIVISION 2 T2B	FALSE	NONE	BLUE (ENAMEL)
BEARINGS		GREASE	SHAFT TYPE	SPECIAL DE	SPECIAL ODE	SHAFT MATERIAL	FRAME MATERIAL	
DE BALL	ODE BALL	POLYREX EM	T	NONE	NONE	1045 HOT ROLLED (C-204)	CAST IRON	
6309	6209							

THERMO-PROTECTORS				THERMISTORS			SPACE HEATERS	
THERMOSTATS	PROTECTORS	WDG RTDS	BRG RTDS	NONE	FALSE	NONE	NONE	VOLTS
NONE	NOT	NONE	NONE					

**INVERTER**  
**TORQUE:** CONSTANT 20:1/VARIABLE 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

**PREPARED BY:** Anusha Muthyala  
**DATE:** 05/04/2018 12:12:46 AM  
**FORM** 3531 REV.3 02/07/99  
 \*\* Subject to change without notice.

**MARATHON ELECTRIC CORPORATION**

TYPICAL PERFORMANCE CURVE for AC MOTOR

Customer

Curve at

575

Volts

HP 15.00

PHASE 3

Model No 254TTFC6007

60

HZ

VOLTS 575

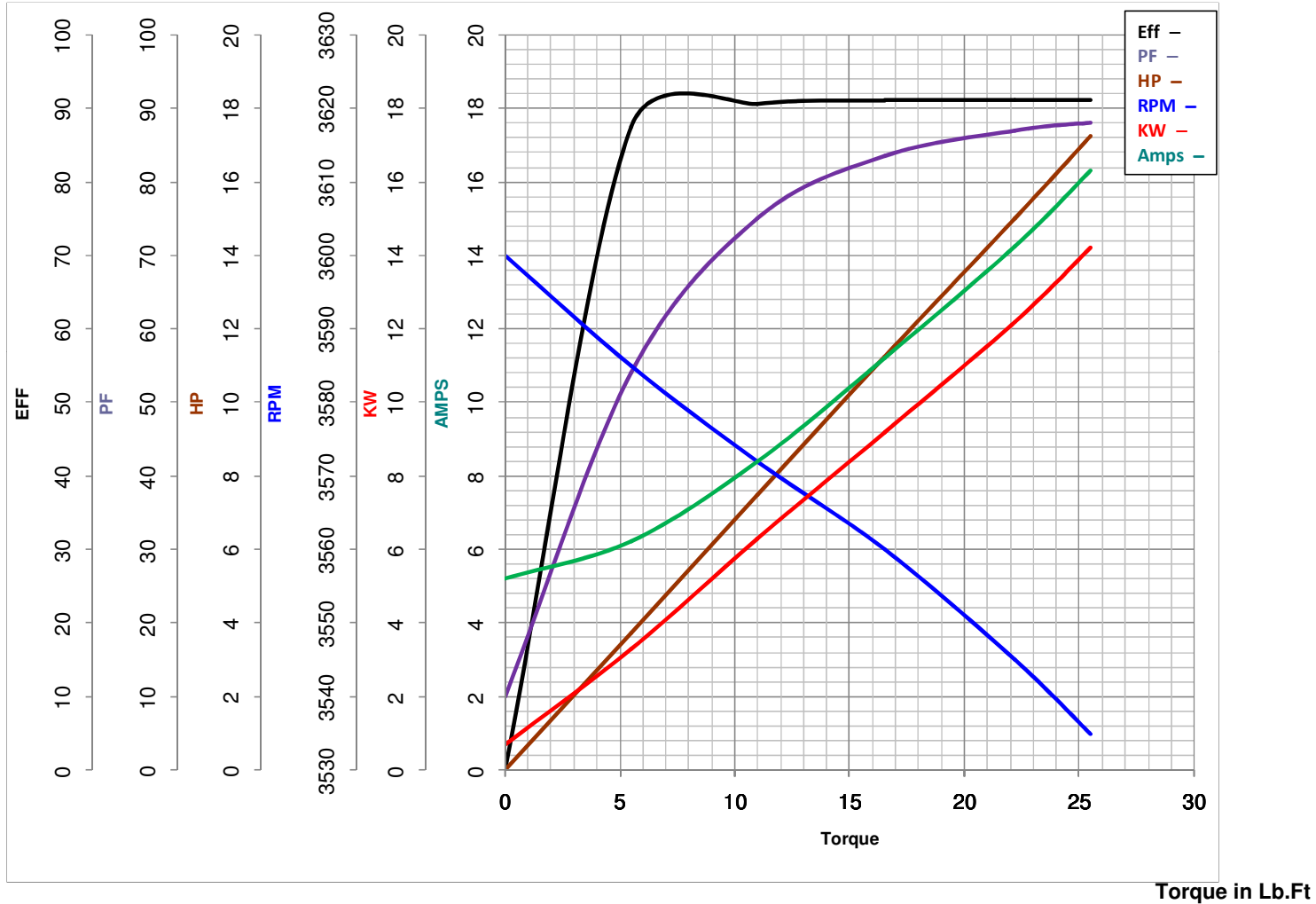
15

HP

Catalog No GT1421A

HZ 60

RPM 3545



FL TORQUE	<u>22.2</u>	Lb.Ft	FL AMPS	<u>14.3</u>	
BD TORQUE	<u>60.0</u>	Lb.Ft	PU TORQUE	<u>31.5</u>	Lb.Ft
LR TORQUE	<u>37</u>	Lb.Ft	LR AMPS	<u>91.2</u>	
WINDING	HE31602008-3	Prepared By	ANUSHA M	Date	5/4/2018