PRODUCT INFORMATION PACKET

Model No: 254TTFCD6576
Catalog No: E636A
XRI®-SD Severe Duty Motor, 7.50 HP, 3 Ph, 60 Hz, 460 V, 1200 RPM, 254T Frame, TEFC

marathon® Motors

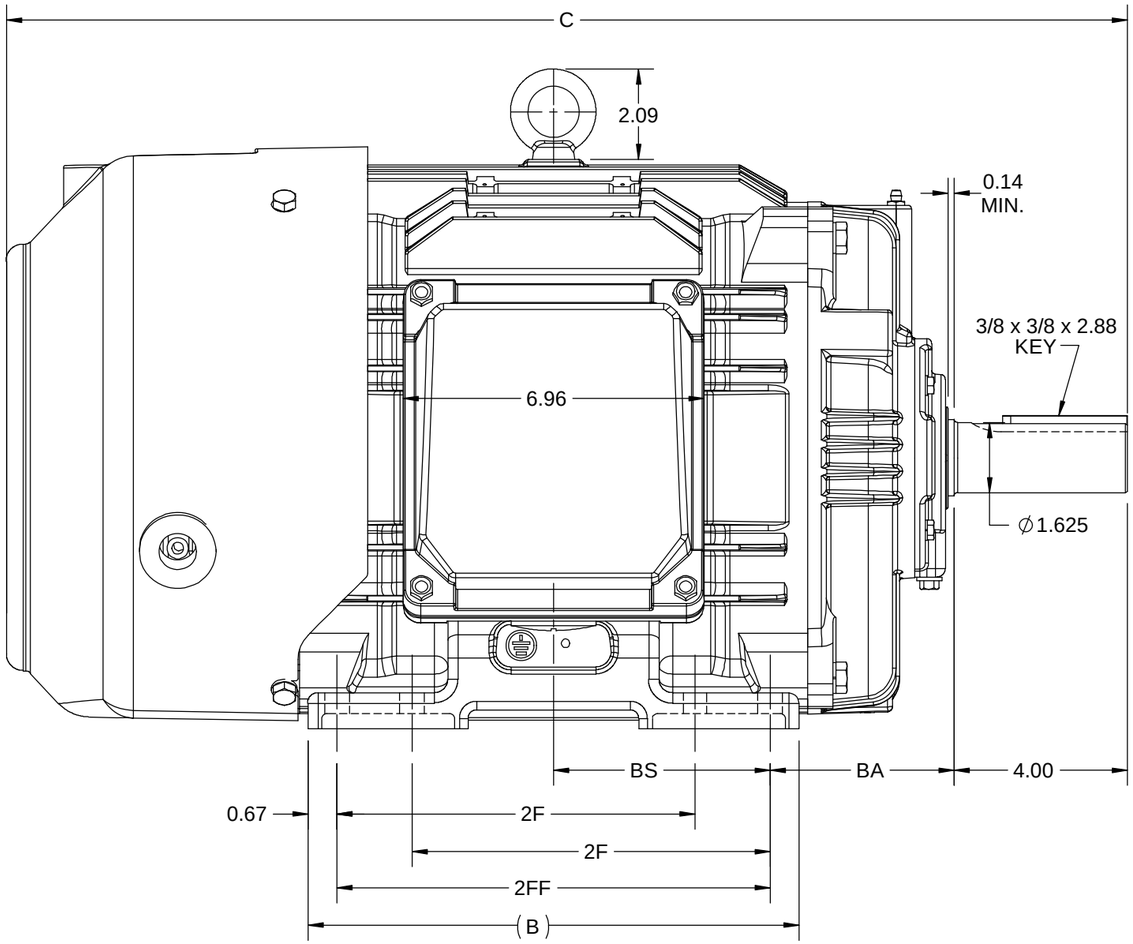
Nameplate Specifications

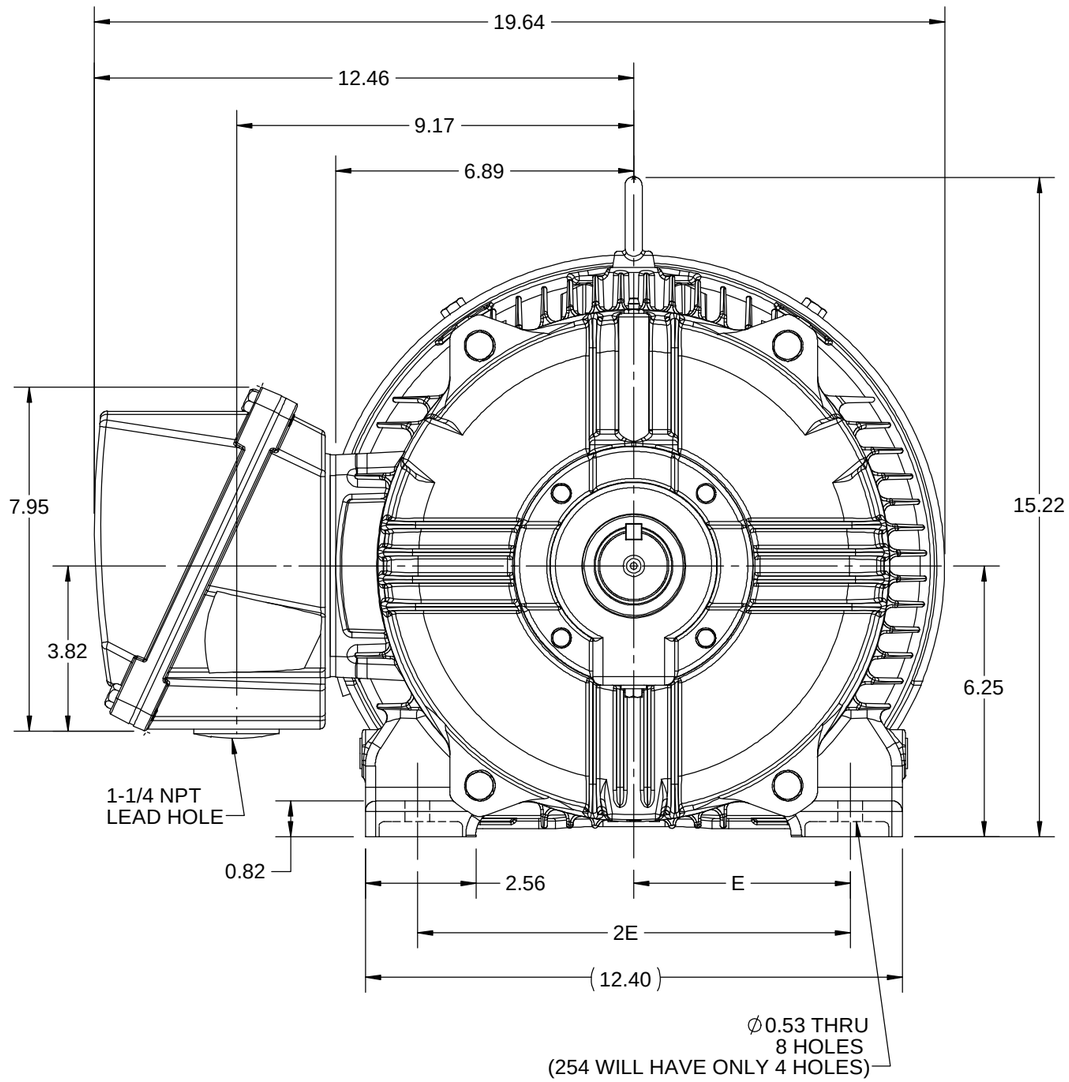
Output HP	7.50 Hp	Output KW	5.6 kW
Frequency	60 Hz	Voltage	460 V
Current	9.9 A	Speed	1182 rpm
Service Factor	1.15	Phase	3
Efficiency	91 %	Power Factor	78.5
Duty	Continuous	Insulation Class	H
Design Code	B	KVA Code	H
Frame	254T	Enclosure	Totally Enclosed Fan Cooled
Thermal Protection	No Protection	Ambient Temperature	40 °C
Drive End Bearing Size	6309	Opp Drive End Bearing Size	6209
UL	Listed	CSA	Y
CE	Y	IP Code	55
Hazardous Location	DIVISION 2 T2B	Number of Speeds	1

Technical Specifications

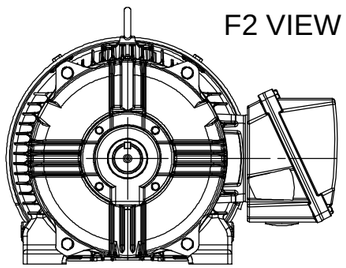
Electrical Type	Squirrel Cage Inverter Rated	Starting Method	Line Or Inverter
Poles	6	Rotation	Reversible
Resistance Main	1.366 Ohms	Mounting	Rigid Base
Motor Orientation	Horizontal	Drive End Bearing	Ball
Opp Drive End Bearing	Ball	Frame Material	Cast Iron
Shaft Type	T	Shaft Diameter	1.625 in
Assembly/Box Mounting	F1/F2 CAPABLE	Inverter Load	CONSTANT 10:1/VARIABLE 10:1
Connection Drawing	EE7300	Outline Drawing	SS208560-100

DASH NO.	B	C	E	2E	2F	2FF	BA	BS	MOUNTING	FRAME
100	9.60	24.15	5.00	10.00	-	8.25	4.25	4.13	F1 OR F2	254T
200	11.34	25.89			8.25	10.00		5.00		254/256T





F2 VIEW



DRAWING REVISION: E	REVISION BY: BISWA	REV DATE/© DATE: 10/07/2020
ECO: ECO-0194249	APPROVED BY: GNK	DATE: 10/07/2020
ECO DESCRIPTION: DRAWING UPDATED		

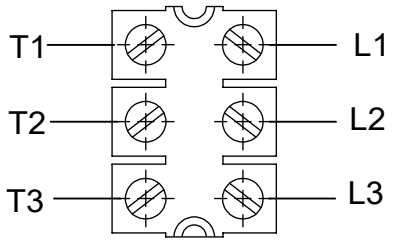
PRIMARY DIMENSIONS ARE INCH
mm DIMENSIONS IN [BRACKETS]
ARE FOR REFERENCE ONLY

DRAWN BY: BISWA	REGAL® Regal Beloit America, Inc.	
DATE: 26/09/2018		
APPROVED BY: SBD	DESCRIPTION: OUTLINE 254T/256T FR-NEMA-SD & IEEE841	
DATE: 26/09/2018		
REFERENCE	MATERIAL	PROCESS/FINISH
THIRD ANGLE PROJECTION	SIZE: B / DRAWING NUMBER: SS208560	SHEET: 1 OF 1

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

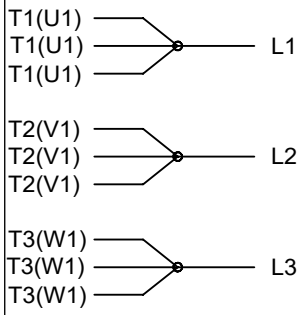
TO REVERSE ROTATION:
INTERCHANGE ANY TWO LINE
LEAD CONNECTIONS

TERMINAL BLOCK WHEN SPECIFIED

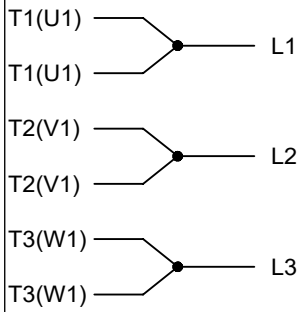


VIEW OF TERMINAL END

IF MOTOR HAS
9 LEADS



IF MOTOR HAS
6 LEADS



A-9806 DECAL

OPTIONAL CORD
CONNECTION

L1	WHITE
L2	RED
L3	BLACK

DRAWING REVISION AC	REVISION BY BS	REV DATE/© DATE 26/07/2022	PRIMARY DIMENSIONS ARE INCH mm DIMENSIONS IN [BRACKETS] ARE FOR REFERENCE ONLY	DRAWN BY DA	Regal Rexnord — Regal Beloit America, Inc.
REQUEST NUMBER CR-0010402	APPROVED BY SN	DATE 26/07/2022		DATE 03-26-1993	
REQUEST NUMBER DESCRIPTION DRAWING UPDATED				APPROVED BY TB	DESCRIPTION CONNECTION DIAGRAM EXTERNAL - SINGLE VOLTAGE - 3Ø MOTOR
				DATE 03-26-1993	
				REFERENCE	MATERIAL / PROCESS/FINISH
				THIRD ANGLE PROJECTION	SIZE A / DRAWING NUMBER EE7300 / SHEET 1 OF 1

marathon® Motors

DATA VOLTS: 460

CERTIFICATION DATA SHEET

REFERENCE MODEL #: 254TTFCD6576
CONN. DIAGRAM: EE7300 **CAT #:** E636A
OUTLINE: SS208560
WINDING: HA31606007 NONE 4 **MOUNTING:** F1/F2 CAPABLE

TYPICAL MOTOR PERFORMANCE DATA

HP	KW	SYNC RPM	FL RPM	FRAME	ENCLOSURE	TYPE	KVA CODE	DESIGN
7.5	5.6	1200	1182	254T	TEFC	TFC	H	B

PH	HZ	VOLTS	AMPS	START TYPE	DUTY	INSL	S.F.	AMB (° C)	ELEV. (Ft)
3	60	460	9.9	LINE OR INVERTER	CONT	H	1.15	40	3300

F.L. EFF	91.0	3/4 LD EFF	91.0	1/2 LD EFF	89.5	GTD EFF	ELECT. TYPE
F.L. PF	78.5	3/4 LD PF	72.0	1/2 LD PF	60.0	90.2	SQ CAGE INV RATED

F.L. TORQUE	LR AMPS	L.R. TORQUE	B.D. TORQUE	F.L. RISE (° C)	
33.4 LB-FT	60.0	65.0 LB-FT 195%	89.0 LB-FT 266%	40	

SOUND PRESSURE	SOUND	ROTOR WK²	MAX. LOAD WK²	SAFE STALL TIME	STARTS/HOUR	APROX.
56 dBA	65 dBA	2.30 LB-FT²	150 LB-FT²	20 SEC.	2	299 LB.

*** SUPPLEMENTAL INFORMATION ***

DE BRACKET TYPE	ODE BRACKET TYPE	MOUNT TYPE	MOTOR ORIENTATION	SEVERE DUTY	HAZARDOUS LOCATION	DRIP COVER	SCREENS	PAINT
STANDARD	STANDARD	RIGID	HORIZONTAL	PREMIUM SEVERE DUTY	DIVISION 2 T2B	NO	NONE	BLUE (EPOXY)

BEARINGS DE	BEARINGS ODE	GREASE	SHAFT TYPE	SPECIAL DE	SPECIAL ODE	SHAFT MATERIAL	FRAME MATERIAL
BALL	BALL	POLYREX EM	T	NONE	NONE	1045 HOT ROLLED (C-204)	CAST IRON
6309	6209						

THERMOSTATS	PROTECTORS	WDG RTD's	BRG RTD's	THERMISTORS	CONTROL	SPACE HEATERS
NONE	NOT	NONE	NONE	NONE	FALSE	NA

R1 (ohms/ph)	R2 (ohms/ph)	X1 (ohms/ph)	X2 (ohms/ph)	Xm (ohms/ph)	VIBRATION (in/sec)	FLOAT
0.839	0.465	2.37	3.081	51.106	0.080	ODE

*
NOTES
*

If Inverter equals NONE, contact factory for further information
INVERTER TORQUE: CONSTANT 10:1/VARIABLE 10:1
INV. HP SPEED RANGE: NONE

ENCODER: NONE
NONE
NONE NONE **PPR**

BRAKE: NONE
NONE NONE
FT-LB: NA
VOLTAGE: NONE **HZ:**

PREPARED BY:
DATE: 5/13/2020

FORM: 3531 REV_4 2/27/06
** Subject to change without notice.

Data Sheet

Date: 5/6/2020
Customer:
Attention:
Submitted by:

marathon® Motors

254TTFCD6576

Submittal

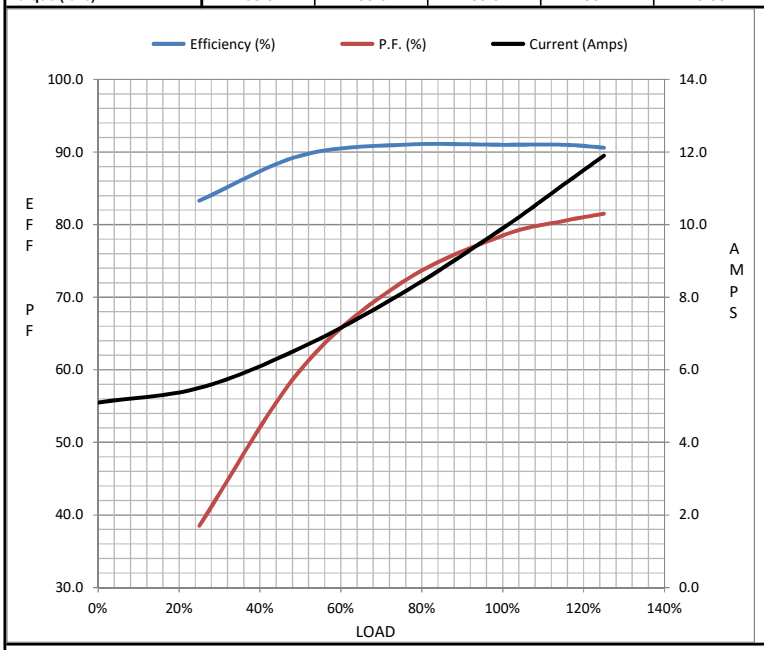
Data @ 460 V

Motor Load Data

Load	0%	25%	50%	75%	100%	115%	125%	LR	
Current (Amps)	5.1	5.5	6.6	8.1	9.9	11.1	11.9	60.0	
Torque (ft-lb)	0.00	8.3	16.5	25.0	33.4	38.5	41.9	65.0	
RPM	1200	1195	1190	1185	1182	1,178	1175	0	
Efficiency (%)		83.3	89.5	91.0	91.0	91.0	90.6		
P.F. (%)	6.5	38.5	60.0	72.0	78.5	80.5	81.5	42.0	

Motor Speed Data

	LR	Pull-Up	BD	Rated	Idle
Speed (RPM)	0	600	1090	1182	1200
Current (Amps)	60.0	53.0	36.0	9.9	5.1
Torque (ft-lb)	65.0	55.0	89.0	33.4	0.00



Information Block

HP	7.5	
Sync. RPM	1200	
Frame	254	
Enclosure	TEFC	
Construction	TFC	
Voltage	460	V
Frequency	60	Hz
Design	B	
LR Code letter	H	
Service Factor	1.15	
Temp Rise @ FL	40	° C
Duty	CONT	
Ambient	40	° C
Elevation	3,300	feet
Rotor/Shaft wk²	2.30	Lb-Ft²
Ref Wdg	HA31606007 NONE	
Sound Pressure @ 1M	56	dBA
VFD Rating	CONSTANT 10:1/VARIABLE 10:1	
Outline Dwg	SS208560	
Conn. Diag	EE7300	

Additional Specifications:

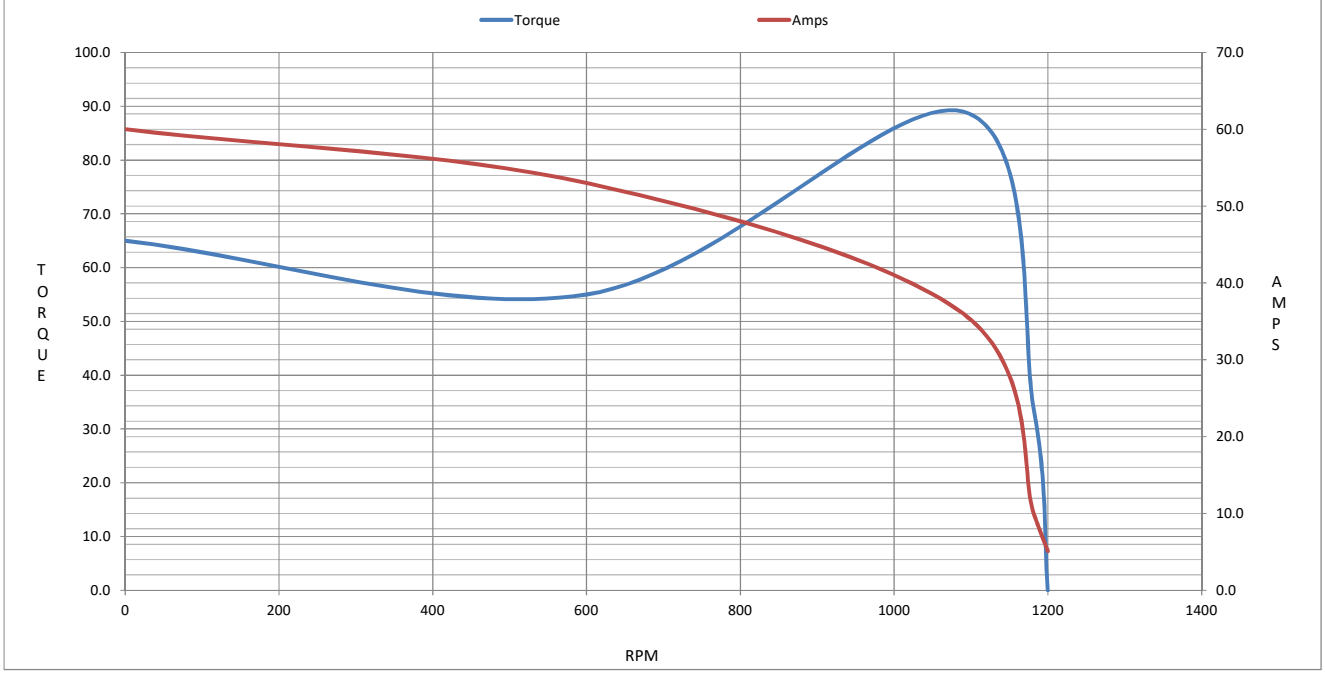
0

0

EQUIV CKT (OHMS / PHASE)

R1	R2	X1	X2	Xm
0.8390	0.4650	2.3700	3.0810	51.1060

Speed -Torque Curve



EC Declaration of Conformity

The undersigned representing
the manufacturer:

Regal Beloit America
100 East Randolph St.
Wausau, WI 54401

and the authorized representative
established within the Community:

Marathon Electric UK
6F Thistleton Road Ind. Estate
Market Overton
Oakham, Rutland LE15 7PP UK

are committed to providing customers with products that comply with applicable regulations and international protocols to which they are subject, including the requirements of the European Parliament Directive on the Harmonization of the laws relating to electrical equipment designed for use within certain voltage limits (2014/35/EU).

Regal Beloit America declares that the following product(s), to which this declaration relates, are in conformity with the relevant sections of the EC standards listed below.

This statement supersedes any statements previously issued pertaining to the product(s) listed below and is subject to change without notice.

Model No : 254TTFCD6576

(Model No. may contain prefix and/or suffix characters)

Catalog No : E636A

Rework No : N/A

Directives :

Low Voltage Directive 2014/35/EU

Harmonized Standards Used :

EN 60034-1: 2010 (IEC 60034-1: 2010)
EN 60034-5: 2001/A1:2007 (IEC 60034-5: 2000/A1:2006)

Authorized Representative:

Michael A. Logsdon
Vice President, Technology

Authorized Representative in the Community:

Julian Clark
Marketing Engineer

Created on 09/01/2022

CE 22