

PRODUCT INFORMATION PACKET

marathon[®]
Motors

Model No: 256TTFNA16031
Catalog No: M893B
20,1800,TEFC,256HPV,3/60/230/460
Vertical Solid Shaft P-Base



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REGAL[®]



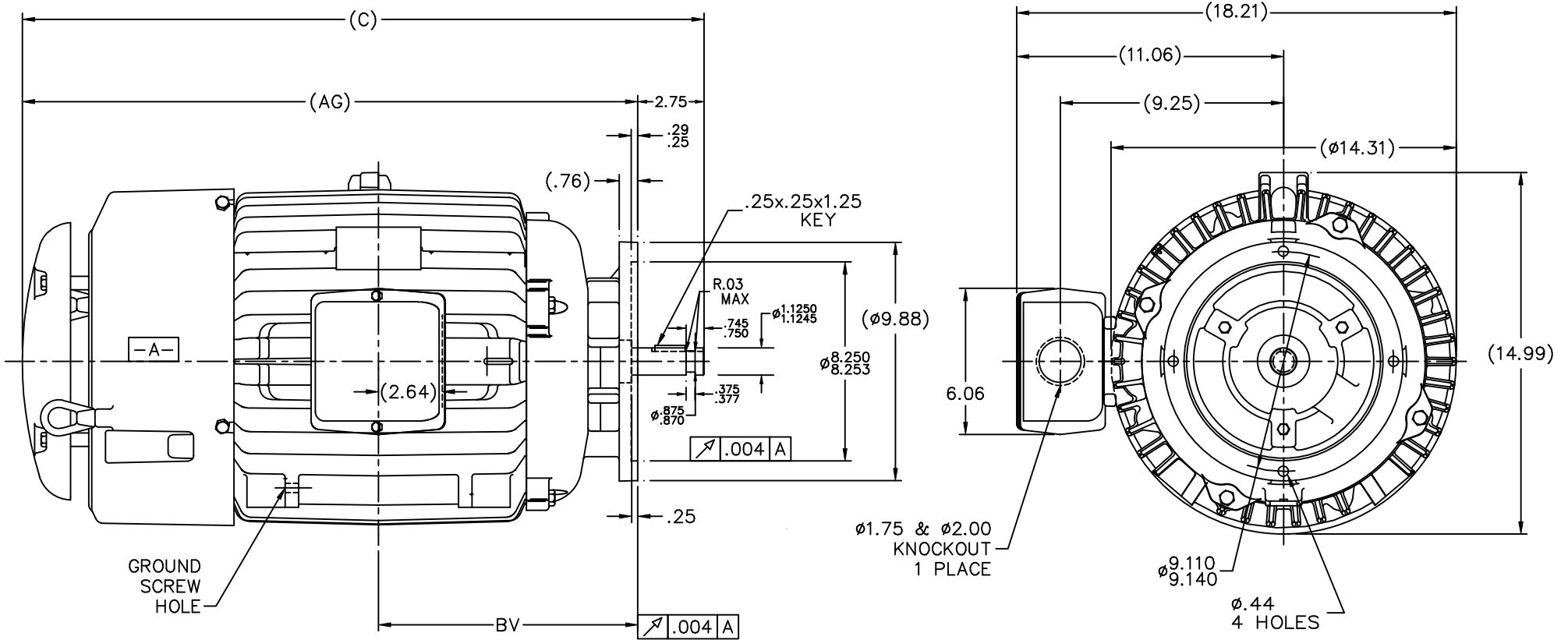
Nameplate Specifications

Output HP	20 Hp	Output KW	14.9 kW
Frequency	60 Hz	Voltage	230/460 V
Current	48.0/24.1 A	Speed	1775 rpm
Service Factor	1.15	Phase	3
Efficiency	93 %	Duty	Continuous
Insulation Class	F	Design Code	B
KVA Code	G	Frame	256HPV
Enclosure	Totally Enclosed Fan Cooled	Overload Protector	No
Ambient Temperature	40 °C	Drive End Bearing Size	6309
Opp Drive End Bearing Size	6210	UL	Recognized
CSA	Y	CE	Y
IP Code	43		

Technical Specifications

Electrical Type	Squirrel Cage Induction Run	Starting Method	Across The Line
Poles	4	Rotation	Reversible
Mounting	Round	Motor Orientation	SHAFT DOWN
Drive End Bearing	BALL	Opp Drive End Bearing	BALL
Frame Material	Cast Iron	Shaft Type	HP
Overall Length	28.26 in	Frame Length	12.25 in
Shaft Diameter	1.125 in	Shaft Extension	2.75 in
Assembly/Box Mounting	F1/F2 CAPABLE		
Outline Drawing	B-SS203116-1225	Connection Diagram	A-EE7308

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- NOTES:
 1. BOX CAN ONLY BE ROTATED CLOCKWISE UP TO 270° FROM ITS ORIGINAL POSITION.
 2. NAMEPLATE TO BE READ FROM CONDUIT BOX SIDE OF MOTOR.

DASH	FRAME	C	AG	BV	NO.	REVISION	BY & DATE	CHK	ANG	TOLERANCES UNLESS SPECIFIED	FINISH	PREV
					8	REVISED DRAWING	RJW 04-04-2007			INCHES		
					7	ROTATED C'BOX 90° CN 32714	DRS 06-02-2004	ML	DEC.	±.1		
					6	ADDED GROUND SCREW HOLE CN 31554	TJB 05-03-2001		.X	±.1		
					5	.29/.25 WAS .19/.25 CN 29300-133	DRS 09-05-2000		.XX	±.03		
					4	UPDATED CONDUIT BOX CN 28427	TJB 01-25-2000		.XXX	±.005		
					3	REV. PART DESCRIPTION TEFC WAS			.XXXX	±.0005		
					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	ANG	±7'30"			
							DIST	LB				
							CAD FILE		ss203116			
							SIZE	B				
							DRAWING NO.	SS203116				
							PAGE	OF				
							REV.	8				

EE7308

THREE PHASE
DUAL VOLTAGE MOTOR



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

NO.	REVISION	BY & DATE	CHK	ANG	TOLERANCES UNLESS SPECIFIED		FINISH	DRAWN RM 11/20/1990				
					DEC.	INCHES						
5	CHG TO REGAL LOGO	SL 09/10/2015	AB					CHK ML 11/21/1990				
4	REVISED IEC NOTATIONS	MSG 11/15/2011	CMN	.X	±.1			APPD SAS 04/24/2003				
3	ADDED IEC NOTATIONS... (U1), (V1) ETC. MU95194	MSG 5/10/2010	MJS	.XX	±.02			SCALE 1=1				
2	ADDED THE OPTIONAL CORD CONNECTION MU46318	RDH 04/24/2003	DRS	.XXX	±.005		TITLE CONNECTION DIAGRAM 3Ø - DUAL VOLTAGE MOTOR	REF				
1	REDRAWN	RM 11/20/1990		.XXXX	±.0005		MAT'L.	FMF				
					±7'30"			PREV				
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	CAD FILE ee7308	SIZE A	DRAWING NO. EE7308	PAGE OF 5	REV. 5
							DIST WP					





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

DATA VOLTS: 460

CERTIFICATION DATA SHEET

CUSTOMER: _____ CUSTOMER P.O. #: _____
 ORDER #: _____ REFERENCE MODEL #: 256TTNVA16031
 CONN. DIAGRAM: A-EE7308 CAT #: M893B
 OUTLINE: B-SS203116-1225 CUSTOMER PART #: _____
 WINDING: K2564164 NONE 6 MOUNTING: F1/F2 CAPABLE
 SPEED: _____

TYPICAL MOTOR PERFORMANCE DATA

HP	KW	SYNC RPM	FL RPM	FRAME	ENCLOSURE	TYPE	KVA CODE	DESIGN	
20	14.9	1800	1775	256HPV	TEFC	TEN	G	B	
PH	HZ	VOLTS	AMPS	START TYPE	DUTY	INSL	S.F.	AMB	ELEV.
3	60	230/460	48/24.1	ACROSS-THE LINE	CONT	F	1.15	40	3300
	F.L. EFF	93.0	3/4 LD EFF	93.6	1/2 LD EFF	93.0	GTD EFF	ELECT. TYPE	
	F.L. PF	84.0	3/4 LD PF	81.0	1/2 LD PF	72.0	92.4	SQ CAGE IND RUN	
F.L. TORQUE	LR AMPS @ 460 V	L.R. TORQUE	B.D. TORQUE	F.L. RISE (°C)					
59.2 LB-FT	138	105 LB-FT	177%	146 LB-FT	247%	65			
@ 3 FT.	POWER	ROTOR WK ²	MAX. LOAD WK ²	SAFE STALL TIME	START/SHOUR	MOTOR WGT			
65 DBA	74 DBA	3.2 LB-FT ²	125 LB-FT ²	25 SEC.	2	400 LB.			

*** SUPPLEMENTAL INFORMATION ***

DE BRACKET TYPE	ODE BRACKET TYPE	MOUNT TYPE	MOTOR ORIENTATION	SEVERE DUTY	HAZARDOUS LOCATION	DRIP COVER	SCREENS	PAINT
P-BASE	STANDARD	ROUND	SHAFT DOWN	NO	NONE	YES	NONE	BLUE (ENAMEL)
BEARINGS	GREASE	SHAFT TYPE	SPECIAL DE	SPECIAL ODE	SHAFT	MATERIAL	FRAME MATERIAL	
DE BALL 6309	POLYREX EM	HP	NONE	NONE	1045 HOT ROLLED (C-204)		CAST IRON	
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		
0.267	0.207	0.99	1.491	28.4	0.150	ODE		

* _____		INVERTER TORQUE: NONE	
O _____		INV. HP SPEED RANGE: NONE	
T _____		ENCODER: NONE	
E _____		NONE	
S _____		BRAKE: NONE	
		NONE	
		FT-LB: NA	
		VOLTAGE: NONE	
		HZ: _____	

PREPARED BY: FAREEDA DUDEKULA
 DATE: 9/11/2018
 FORM: 3531 REV 4 2/27/06
 UL: V-INS, CONST UL REC

Data Sheet

256TTFNA16031

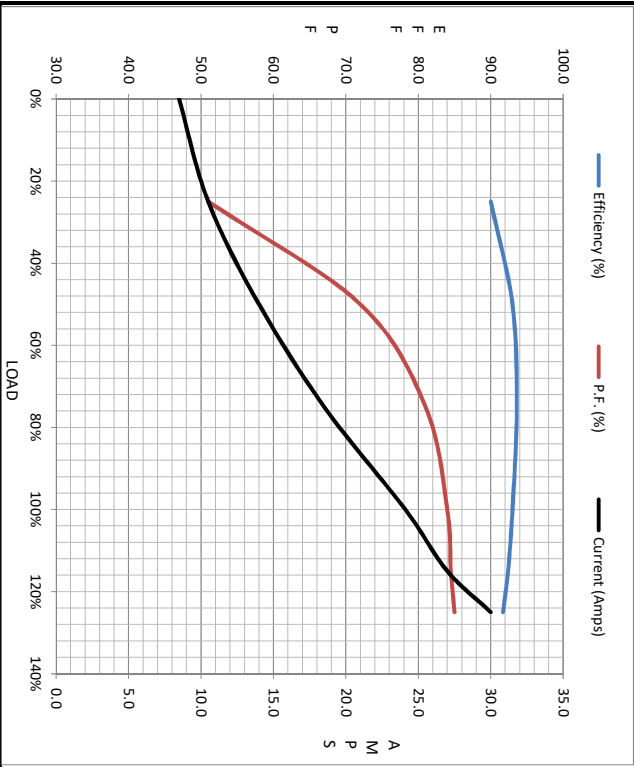


Date: 9/11/2018
 Customer: _____
 Attention: _____
 Submitted by: FAREEDA DUDEKULA

Submital
 Data @ 460 V

Load	Motor Load Data									
	0%	25%	50%	75%	100%	115%	125%	LR		
Current (Amps)	8.5	10.5	14.0	18.5	24.1	27.0	30.0	138		
Torque (ft-lb)	0.00	14.5	29.5	44.5	59.2	68.0	74.5	105		
RPM	1800	1795	1785	1780	1775	1,770	1760	0		
Efficiency (%)		90.0	93.0	93.6	93.0	92.4	91.7			
P.F. (%)	8.5	51.0	72.0	81.0	84.0	84.5	85.0	40.0		

	Motor Speed Data					Information Block																				
	LR	Pull-Up	BD	Rated	Idle	HP	Frame	Enclosure	Construction	Voltage	Frequency	Design	LR Code letter	Service Factor	Temp Rise @ FL	Duty	Ambient	P Elevation	Motor/Shaft wk ²	Ret Wdg	Sound Pressure @ 1M	VFD Rating	Outline Dwg	Conn. Diag	Additional Specifications:	
Speed (RPM)	0	900	1625	1775	1800	20.0	1800	TEFC	TFN	230/460	60	B	G	1.15	65	CONT	40 °C	1,000 feet	3.2 Lb-Ft ²	NONE	65	NONE	B-SS203116-1225	A-EE7308		
Current (Amps)	138	115	86.0	24.1	8.5																					
Torque (ft-lb)	105	100	146	59.2	0.00																					



R1	R2	X1	X2	Xm
0.2670	0.2070	0.9900	1.4910	28.4000

