

# PRODUCT INFORMATION PACKET

Model No: 405TTDS16102  
Catalog No: M740  
60,900,DP,405HPV,3/60/230/460  
Vertical Solid Shaft P-Base



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



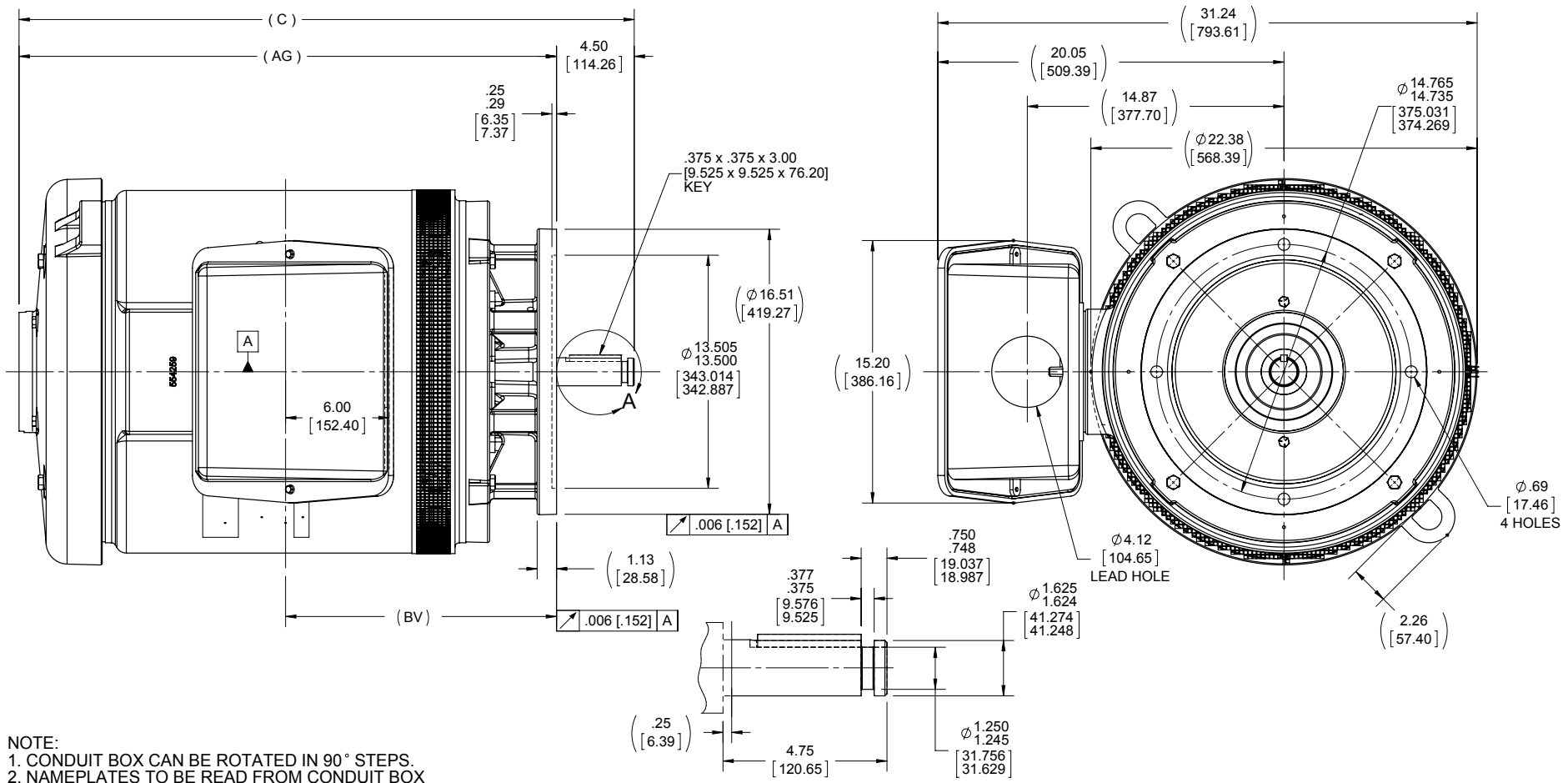
### Nameplate Specifications

Output HP	<b>60 Hp</b>	Output KW	<b>45.0 kW</b>
Frequency	<b>60 Hz</b>	Voltage	<b>230/460 V</b>
Current	<b>160.0/80.0 A</b>	Speed	<b>885 rpm</b>
Service Factor	<b>1.15</b>	Phase	<b>3</b>
Efficiency	<b>93 %</b>	Duty	<b>Continuous</b>
Insulation Class	<b>F</b>	Design Code	<b>B</b>
KVA Code	<b>G</b>	Frame	<b>405HPV</b>
Enclosure	<b>Drip Proof</b>	Overload Protector	<b>No</b>
Ambient Temperature	<b>40 °C</b>	Drive End Bearing Size	<b>6314</b>
Opp Drive End Bearing Size	<b>7314</b>	UL	<b>Recognized</b>
CSA	<b>Y</b>	CE	<b>Y</b>
IP Code	<b>22</b>		

### Technical Specifications

Electrical Type	<b>Squirrel Cage Induction Run</b>	Starting Method	<b>Across The Line</b>
Poles	<b>8</b>	Rotation	<b>Reversible</b>
Mounting	<b>Round</b>	Motor Orientation	<b>SHAFT DOWN</b>
Drive End Bearing	<b>BALL</b>	Opp Drive End Bearing	<b>BALL</b>
Frame Material	<b>Cast Iron</b>	Shaft Type	<b>HP</b>
Overall Length	<b>35.64 in</b>	Frame Length	<b>20.88 in</b>
Shaft Diameter	<b>1.625 in</b>	Shaft Extension	<b>4.50 in</b>
Assembly/Box Mounting	<b>F1/F2 CAPABLE</b>		
Outline Drawing	<b>B-SS555070-2088</b>	Connection Diagram	<b>A-EE7308</b>

This is an uncontrolled document once printed or downloaded and is subject to change without notice. Date Created: 10/30/2018



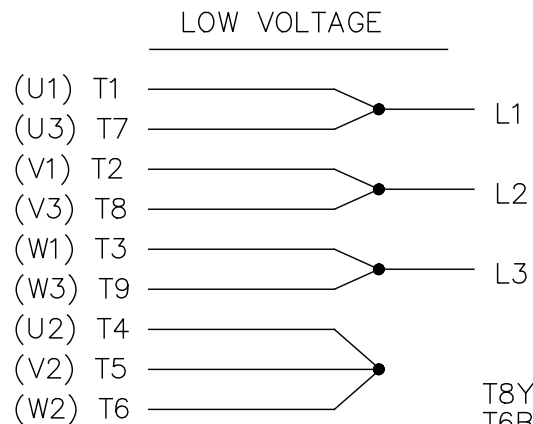
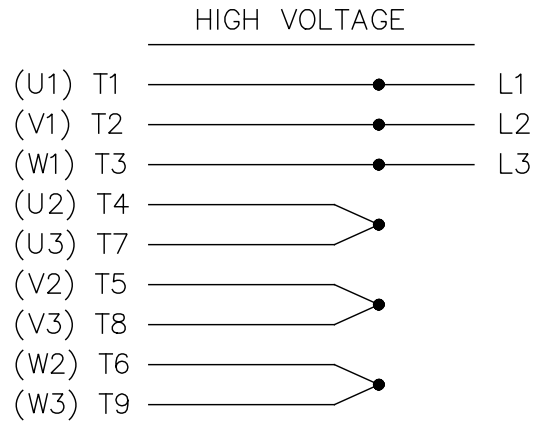
NOTE:  
 1. CONDUIT BOX CAN BE ROTATED IN 90° STEPS.  
 2. NAMEPLATES TO BE READ FROM CONDUIT BOX SIDE OF THE MOTOR.

DETAIL OF SHAFT EXT.

DRAWING REVISION D ECO-0048460 ECO DESCRIPTION UPDATED TO CURRENT STANDARDS <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>					REVISION BY JJB APPROVED BY DATE 03-31-2014 DATE			TOLERANCES UNLESS OTHERWISE SPECIFIED: DEC. INCH mm ANGLE .X ±0.1 [±2.5] ±0.5° .XX ±0.01 [±0.25] .XXX ±0.005 [±0.127] .XXXX ±0.0005 [±0.0127] REMOVE BURRS & BREAK SHARP EDGES: .003/.015 [.076/.381] CORNER FILLETS: .02 [51] MACHINED SURFACES: 125/3.2 mm SHOWN IN [BRACKETS]			DRAWN BY CJR DATE 03-01-2012 APPROVED BY DJK DATE 03-01-2012 PROCESS/FINISH THIRD ANGLE PROJECTION		REGAL™ Regal Beloit America, Inc. DESCRIPTION 400PV FR. - DR. PR. - VERTICAL MATERIAL DRAWING NUMBER SS55070 SHEET 1 OF 1	
DASH	FRAME	C	AG	BV										
2088	400PV	35.64 [905.26]	31.14 [790.96]	15.70 [398.78]										

EE7308

THREE PHASE  
DUAL VOLTAGE MOTOR



VIEW OF TERMINAL END

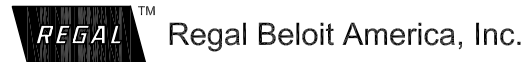
REF.  
WINDING DIAGRAM

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 #: 40STTDS16102  
 CONN. DIAGRAM: A-EE7308 CAT #: M740  
 B-SS555070-2088  
 OUTLINE: 1405818 NONE 1 CUSTOMER PART #: \_\_\_\_\_  
 WINDING: 1405818 NONE 1 MOUNTING: F1/F2 CAPABLE  
 SPEED: \_\_\_\_\_

TYPICAL MOTOR PERFORMANCE DATA

HP	KW	SYNC RPM	FL RPM	FRAME	ENCLOSURE	TYPE	KVA CODE	DESIGN	
60	45	900	885	405HPV	DP	TDS	G	B	
PH	HZ	VOLTS	AMPS	START TYPE	DUTY	INSL	S.F.	AMB	ELEV.
3	60	230/460	160/80	ACROSS-THE LINE	CONT	F	1.15	40	3300
	F.L. EFF	93.0	3/4 LD EFF	92.8	1/2 LD EFF	91.7	GTD EFF	ELECT. TYPE	
	F.L. PF	75.5	3/4 LD PF	69.5	1/2 LD PF	58.0	92.4	SQ CAGE IND RUN	
F.L. TORQUE	LR AMPS @ 460 V	L.R. TORQUE	B.D. TORQUE	F.L. RISE (°C)					
355 LB-FT	435	745 LB-FT	210%	25.4%	55				
@ 3 FT. DBA	POWER	ROTOR WK <sup>2</sup>	MAX. LOAD WK <sup>2</sup>	SAFE STALL TIME	START/SHOUR	MOTOR WGT			
70	79 DBA	36.5 LB-FT <sup>2</sup>	0 LB-FT <sup>2</sup>	20 SEC.	0	1100 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	RODENT	BLUE (ENAMEL)
BEARINGS	GREASE	SHAFT TYPE	SPECIAL DE	SPECIAL ODE	SHAFT MATERIAL	FRAME MATERIAL		
DE BALL 6314	DEM ANGUILL 7314	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		
0.084	0.049	0.373	0.563	6.953	0.150	DE		

\* INVERTER TORQUE: NONE  
 INV. HP SPEED RANGE: NONE  
 ENCODER: NONE  
 NONE  
 NONE  
 BRAKE: NONE  
 NONE  
 NONE  
 FT-LB: NA  
 VOLTAGE: NONE  
 NONE  
 NONE PPR

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

Data Sheet

405TDS16102



Submital

Data @ 460 V

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

Motor Load Data									
Load	0%	25%	50%	75%	100%	115%	125%	LR	
Current (Amps)	40.5	43.5	52.5	65.0	80.0	92.5	97.5	435	
Torque (ft-lb)	0.00	88.0	176	265	355	408	445	745	
RPM	900	896	894	890	885	884	882	0	
Efficiency (%)		86.5	91.7	92.8	93.0	92.4	91.7		
P.F. (%)	4.5	37.0	58.0	69.5	75.5	77.0	78.0	39.0	

Motor Speed Data									
	LR	Pull-Up	BD	Rated	Idle				
Speed (RPM)	0	400	850	885	900				
Current (Amps)	435	350	260	80.0	40.5				
Torque (ft-lb)	745	675	900	355	0.00				

Information Block

HP	60.0			
Sync. RPM	900			
Frame	4051B2TFC6080			
Enclosure	DP			
Construction	TDS			
Voltage	230/460 V			
Frequency	60 Hz			
Design	B			
LR Code letter	G			
Service Factor	1.15			
Temp Rise @ FL	55 °C			
Duty	CONT			
Ambient	40 °C			
Elevation	1,000 feet			
Motor/Shaft wk <sup>2</sup>	36.5 Lb-Ft <sup>2</sup>			
Ret Wdg	T405818 NONE			
Sound Pressure @ 1M	70 DBA			
VFD Rating	NONE			
Outline Dwg	B-SS555070-2088			
Conn. Diag	A-EE7308			
Additional Specifications:				
EQUIV CKT (OHMS / PHASE)				
R1	R2	X1	X2	Xm
0.0840	0.0490	0.3730	0.5630	6.9530

