

# PRODUCT INFORMATION PACKET

**marathon®**  
Motors

Model No: 284TTFCA6013

Catalog No: GT3527

25 HP Close-Coupled Pump Motor, 3 phase, 3600 RPM, 575 V, 284JP Frame, TEFC  
Close-Coupled Pump Motors



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**RegalRexnord**

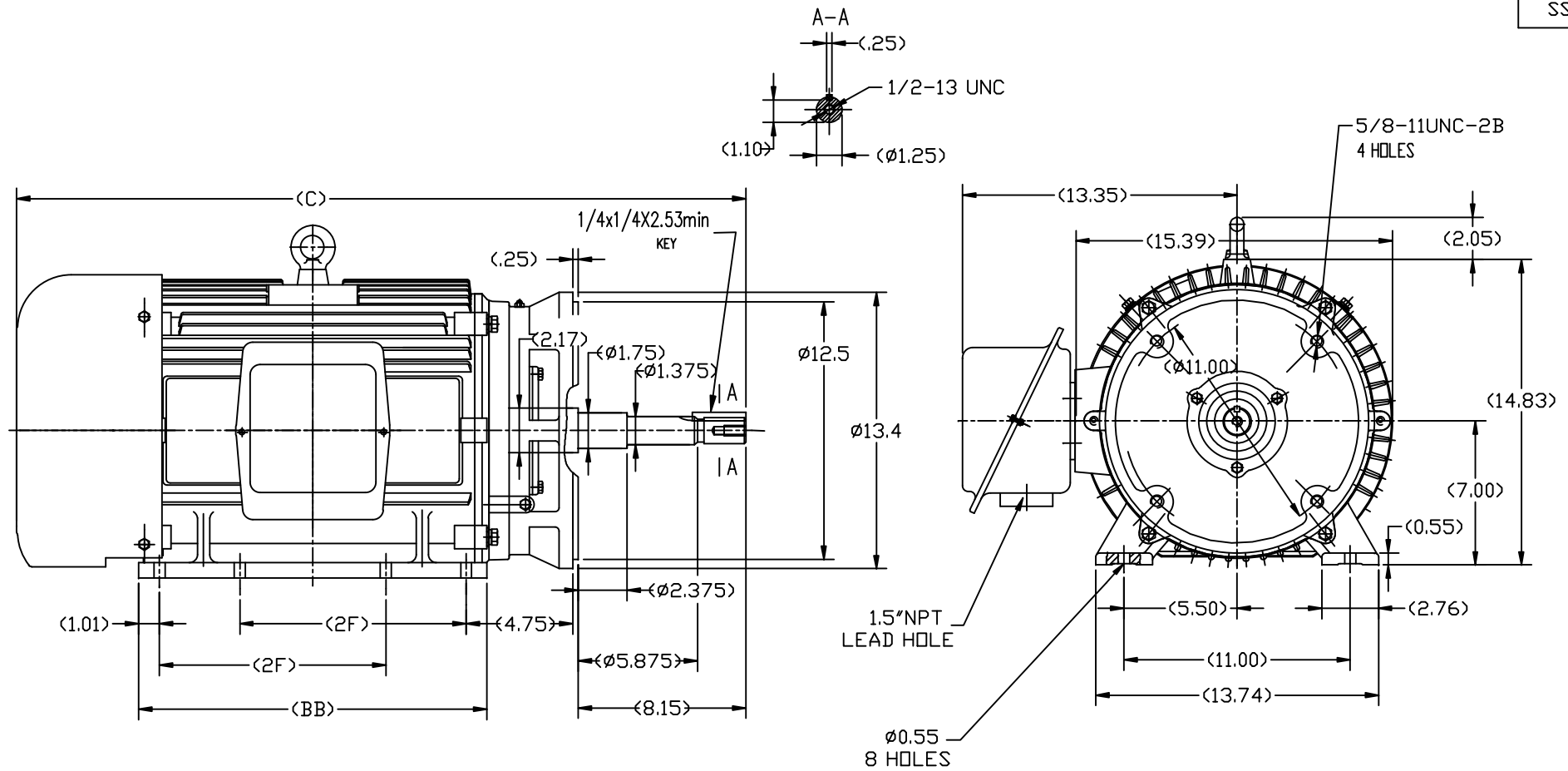
## Nameplate Specifications

Output HP	25 Hp	Output KW	18.7 kW
Frequency	60 Hz	Voltage	575 V
Current	22.4 A	Speed	3560 rpm
Service Factor	1.15	Phase	3
Efficiency	91.7 %	Power Factor	89
Duty	Continuous	Insulation Class	F
Design Code	B	KVA Code	G
Frame	284JP	Enclosure	Totally Enclosed Fan Cooled
Thermal Protection	No	Ambient Temperature	40 °C
Drive End Bearing Size	6211	Opp Drive End Bearing Size	6211
UL	Recognized	CSA	Y
CE	Y	IP Code	43
Number of Speeds	1		

## Technical Specifications

Electrical Type	Squirrel Cage Inverter Rated	Starting Method	Line Or Inverter
Poles	2	Rotation	Reversible
Resistance Main	.275 Ohms	Mounting	Rigid Base
Motor Orientation	Horizontal	Drive End Bearing	Ball
Opp Drive End Bearing	Ball	Frame Material	Cast Iron
Shaft Type	JP	Overall Length	33.82 in
Frame Length	11.42 in	Shaft Diameter	1.250 in
Shaft Extension	8.15 in	Assembly/Box Mounting	F1/F2 CAPABLE
Inverter Load	VARIABLE 10:1		
Connection Drawing	EE7300	Outline Drawing	SS620568-284TC





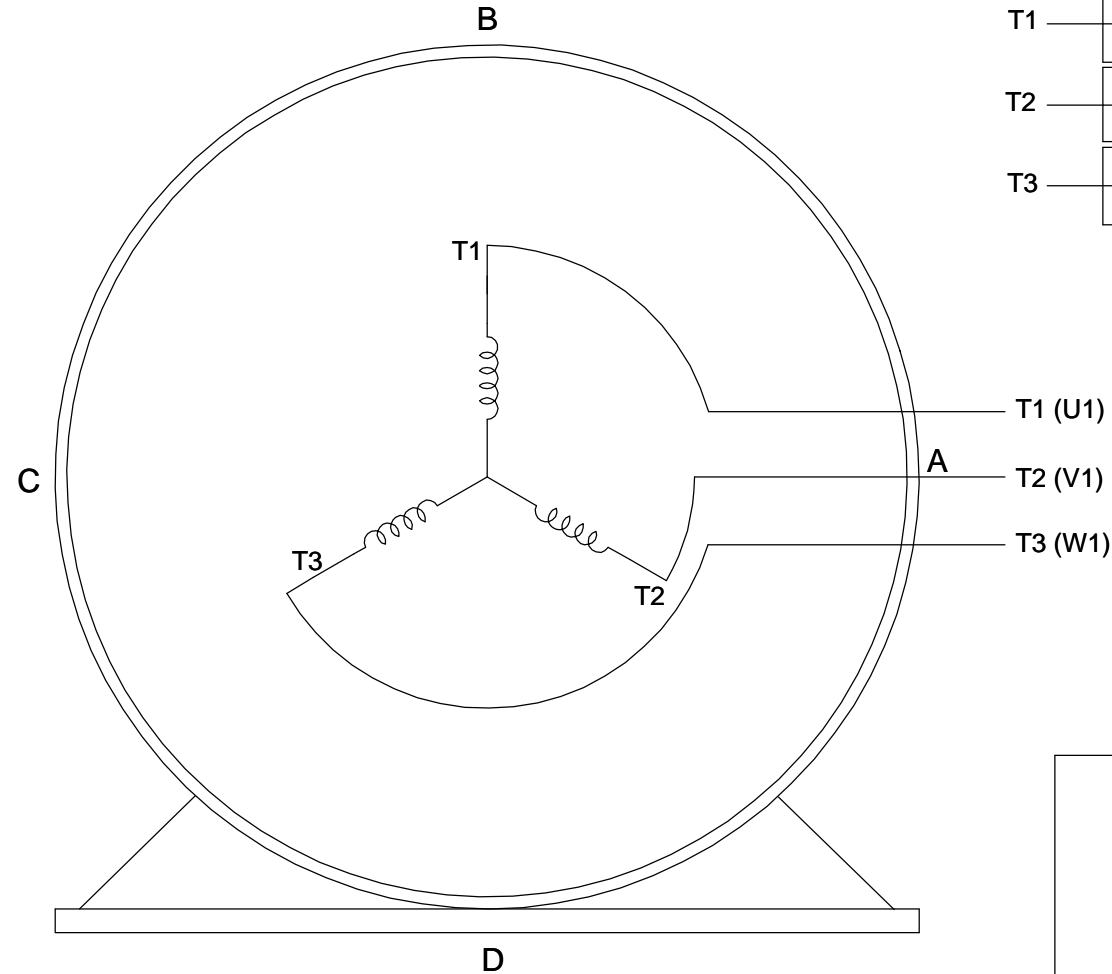
284TC	33.82	15.75	9.50
286TC	35.00	16.93	11.00
FRAME	C	BB	2F

TOLERANCES UNLESS SPECIFIED				REGAL-BELOIT CORPORATION		DRAWN Lee 05-16-2012	
DEC.	INCHES					CHK	HPH 05-16-2012
X	±.1					APPD	JGX 05-16-2012
XX	±.03					SCALE	2=13
XXX	±.005					REF	
XXXX	±.0005					FMF	HWADA
ANG	± 1/2					PREV	
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							DRAWING NO.
							SS620568
							REV.

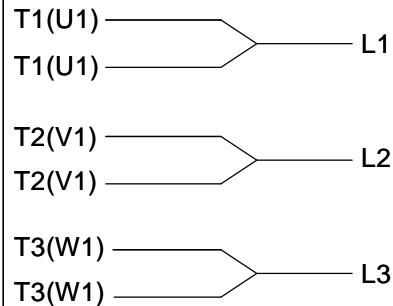
# THREE PHASE - SINGLE VOLTAGE MOTOR - CONDUIT BOX @ 'A'

TO REVERSE ROTATION:  
INTERCHANGE ANY TWO  
LINE LEAD CONNECTIONS.

## TERMINAL BLOCK WHEN SPECIFIED



### IF MOTOR HAS 6 LEADS



A-9806 DECAL

### OPTIONAL CORD CONNECTION



### VIEW OF TERMINAL END

DRAWING REVISION AB	REVISION BY JJB	DATE 06-27-2017
ECO ECO-0125361	APPROVED BY TB	DATE 06-27-2017
ECO DESCRIPTION UPDATED TO CURRENT STANDARDS		
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DRAWN BY DA
DATE 03-26-1993
APPROVED BY TB
DATE 03-26-1993
REFERENCE
THIRD ANGLE PROJECTION



Regal Beloit America, Inc.

DESCRIPTION  
**CONNECTION DIAGRAM**  
EXTERNAL - SINGLE VOLTAGE - 3Ø MOTOR

MATERIAL PROCESS/FINISH

SIZE A	DRAWING NUMBER EE7300	SHEET 1 OF 1
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## CERTIFICATION DATA SHEET

Model#: 284TTFCA6013 AA  
 CONN. DIAGRAM: EE7300  
 OUTLINE: SS620568

WINDING#: CHT28420001 NONE 3  
 ASSEMBLY: F1/F2 CAPABLE

## TYPICAL MOTOR PERFORMANCE DATA

HP	KW	SYNC. RPM	F.L. RPM	FRAME	ENCLOSURE	KVA CODE	DESIGN
25	18.7	3600	3560	284JP	TEFC	G	B

PH	Hz	VOLTS	FL AMPS	START TYPE	DUTY	INSL	S.F	AMB°C	ELEVATION
3	60	575	22.4	LINE OR INVERTER	CONTINUOUS	F7	1.15	40	3300

FULL LOAD EFF: 91.7	3/4 LOAD EFF: 92.4	1/2 LOAD EFF: 91.7	GTD. EFF	ELEC. TYPE	NO LOAD AMPS
FULL LOAD PF: 89	3/4 LOAD PF: 87	1/2 LOAD PF: 80	91	SQ CAGE INV RATED	6.4

F.L. TORQUE	LOCKED ROTOR AMPS	L.R. TORQUE	B.D. TORQUE	F.L. RISE°C
37 LB-FT	145.6	84 LB-FT 225	110 LB-FT 295	50

SOUND PRESSURE @ 3 FT.	SOUND POWER	ROTOR WK^2	MAX. WK^2	SAFE STALL TIME	STARTS /HOUR	APPROX. MOTOR WGT
72 dBA	82 dBA	3 LB-FT^2	32 LB-FT^2	20 SEC.	2	525 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	NONE	FALSE	NONE	BLUE (ENAMEL)

BEARINGS		GREASE	SHAFT TYPE	SPECIAL DE	SPECIAL ODE	SHAFT MATERIAL	FRAME MATERIAL
DE	OPE						
BALL	BALL						
6211	6211	POLYREX EM	JP	NONE	NONE	1045 HOT ROLLED (C-204)	CAST IRON

THERMO-PROTECTORS				THERMISTORS	CONTROL	SPACE /n HEATERS
THERMOSTATS	PROTECTORS	WDG RTDs	BRG RTDs			
NONE	NOT	NONE	NONE	NONE	FALSE	NONE VOLTS

If Inverter equals NONE, contact factory for further information

INVERTER TORQUE: VARIABLE 10:1  
 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

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DATE: 06/27/2017 12:59:42 AM  
 FORM 3531 REV.3 02/07/99  
 \*\* Subject to change without notice.

## Data Sheet

Date: 6/29/2017

Customer:

Attention:

Submitted by: FAREEDA DUDEKULA



284TTFCA6013

Submittal

Data @ 575 V

## Motor Load Data

Load	0%	25%	50%	75%	100%	115%	125%	LR	
Current (Amps)	6.4	8.0	12.4	17.6	22.4	25.6	28.4	146	
Torque (ft-lb)	0.00	9.2	18.5	27.5	37.0	42.5	46.2	84.0	
RPM	3600	3590	3580	3570	3560	3,555	3550	0	
Efficiency (%)		87.5	91.7	92.4	91.7	91.7	91.0		
P.F. (%)	9.0	68.0	80.0	87.0	89.0	90.0	90.0	35.0	

## Motor Speed Data

	LR	Pull-Up	BD	Rated	Idle																													
Speed (RPM)	0	1800	3350	3560	3600																													
Current (Amps)	146	132	88.0	22.4	6.4																													
Torque (ft-lb)	84.0	60.0	110	37.0	0.00																													
<div><div>Efficiency (%)</div><div>P.F. (%)</div><div>Current (Amps)</div></div> <table><caption>Graph Data Points (Estimated)</caption><thead><tr><th>Load (%)</th><th>Efficiency (%)</th><th>P.F. (%)</th><th>Current (Amps)</th></tr></thead><tbody><tr><td>25</td><td>87</td><td>68</td><td>4.5</td></tr><tr><td>50</td><td>91</td><td>80</td><td>7.5</td></tr><tr><td>75</td><td>92</td><td>87</td><td>11.5</td></tr><tr><td>100</td><td>91</td><td>89</td><td>15.5</td></tr><tr><td>125</td><td>90</td><td>90</td><td>19.5</td></tr></tbody></table>						Load (%)	Efficiency (%)	P.F. (%)	Current (Amps)	25	87	68	4.5	50	91	80	7.5	75	92	87	11.5	100	91	89	15.5	125	90	90	19.5					
						Load (%)	Efficiency (%)	P.F. (%)	Current (Amps)																									
						25	87	68	4.5																									
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						HP		25.0																										
						Sync. RPM		3600																										
						Frame		284																										
						Enclosure		TEFC																										
						Construction		TFC																										
						Voltage		575 V																										
						Frequency		60 Hz																										
						Design		A																										
						LR Code letter		G																										
Service Factor		1.15																																
Temp Rise @ FL		50 ° C																																
Duty		CONT																																
Ambient		40 ° C																																
Elevation		1,000 feet																																
Rotor/Shaft wk²		3.0 Lb-Ft²																																
Ref Wdg		CHT28420001 NONE																																
Sound Pressure @ 1M		72 dBA																																
VFD Rating		VARIABLE 10:1																																
Outline Dwg		SS620568																																
Conn. Diag		EE7300																																
Additional Specifications:																																		
0																																		
0																																		
EQUIV CKT (OHMS / PHASE)																																		
	R1	R2	X1	X2	Xm																													
	0.2920	0.1680	1.1160	1.4530	52.2700																													

## Speed -Torque Curve

