

PRODUCT INFORMATION PACKET

marathon®
Motors

Model No: 215TTFN16057

Catalog No: E204-P

XRI® General Purpose General Purpose Motor, 10 & 7.50 HP, 3 Ph, 60 & 50 Hz, 208-230/460 & 190/380 V,
1800 & 1500 RPM, 215T Frame, TEFC



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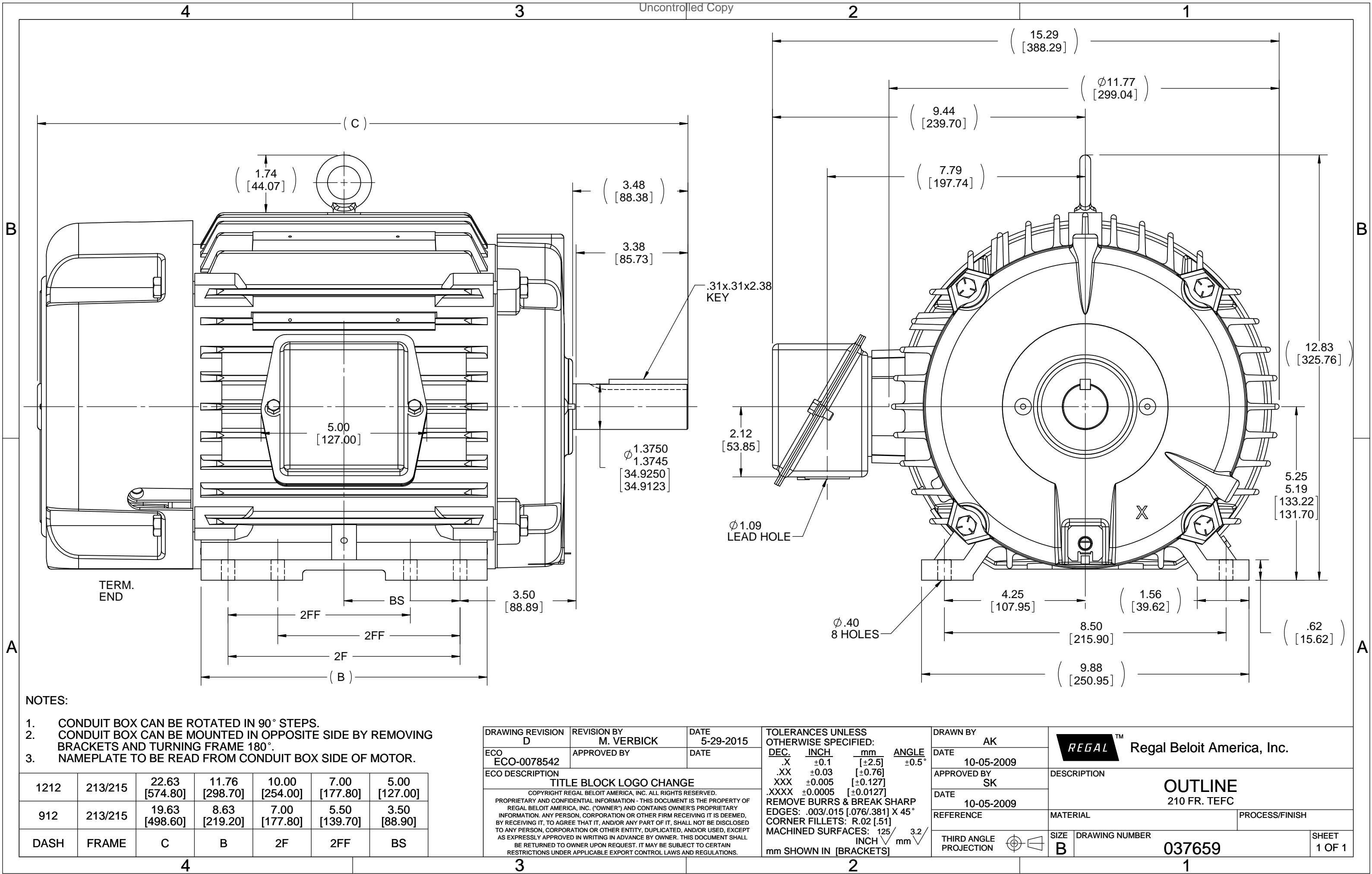
RegalRexnord

Nameplate Specifications


Phase	3	Output HP	10 & 7.50 Hp
Output KW	7.5 & 5.6 kW	Voltage	208-230/460 & 190/380 V
Speed	1765 & 1470 rpm	Service Factor	1.15 & 1.15
Frame	215T	Enclosure	Totally Enclosed Fan Cooled
Thermal Protection	No Protection	Efficiency	91.7 & 91.5 %
Ambient Temperature	40 °C	Frequency	60 & 50 Hz
Current	27-25/12.5 & 23/11.5 A	Power Factor	82
Duty	Continuous	Insulation Class	F
Design Code	B	KVA Code	G
Drive End Bearing Size	6307	Opp Drive End Bearing Size	6208
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	4	Rotation	Reversible
Resistance Main	.894 Ohms	Mounting	Rigid Base
Motor Orientation	Horizontal	Drive End Bearing	Ball
Opp Drive End Bearing	Ball	Frame Material	Cast Iron
Shaft Type	T	Overall Length	22.63 in
Frame Length	12.12 in	Shaft Diameter	1.375 in
Shaft Extension	3.48 in	Assembly/Box Mounting	F1/F2 Capable
Inverter Load	CONSTANT 20:1		
Connection Drawing	EE7308	Outline Drawing	037659-1212





				TOLERANCES UNLESS SPECIFIED		 Regal Beloit America, Inc.	DRAWN RM 11/20/1990
5	CHG TO REGAL LOGO	SL 09/10/2015	AB	DEC.	INCHES		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
NO.	REVISION	BY & DATE	CHK	ANG	±7°30"	FINISH	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	DRAWING NO. PAGE OF REV.
			DIST WP			A	EE7308 5

CERTIFICATION DATA SHEET

Model#: 215TTFN16057 AA

WINDING#: K2154249 NONE 1

CONN. DIAGRAM: EE7308

ASSEMBLY: F1/F2 CAPABLE

OUTLINE: 037659-1212

TYPICAL MOTOR PERFORMANCE DATA

HP	KW	SYNC. RPM	F.L. RPM	FRAME	ENCLOSURE	KVA CODE	DESIGN
10&7 1/2	7.5&5.6	1800	1765&1470	215T	TEFC	G	B

PH	Hz	VOLTS	FL AMPS	START TYPE	DUTY	INSL	S.F	AMB°C	ELEVATION
3	60/50	208- 230/460#190/ 380	27- 25/12.5&23/11 .5	LINE OR INVERTER	CONTINUOU S	F3	1.15/1.15	40	3300

FULL LOAD EFF: 91.7&91.5	3/4 LOAD EFF: 91.7	1/2 LOAD EFF: 91	GTD. EFF	ELEC. TYPE	NO LOAD AMPS
FULL LOAD PF: 82&81	3/4 LOAD PF: 78	1/2 LOAD PF: 68	91	SQ CAGE INV RATED	10 / 5

F.L. TORQUE	LOCKED ROTOR AMPS	L.R. TORQUE	B.D. TORQUE	F.L. RISE°C
29.8 LB-FT	160 / 80	60 LB-FT 201	81 LB-FT 272	55

SOUND PRESSURE @ 3 FT.	SOUND POWER	ROTOR WK^2	MAX. WK^2	SAFE STALL TIME	STARTS /HOUR	APPROX. MOTOR WGT
62 dBA	72 dBA	1.2 LB-FT^2	192 LB-FT^2	20 SEC.	2	240 LBS.

*** SUPPLEMENTAL INFORMATION ***

DE BRACKET TYPE	ODE BRACKET TYPE	MOUNT TYPE	ORIENTATION	SEVERE DUTY	HAZARDOUS LOCATION	DRIP COVER	SCREENS	PAINT
STANDARD	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	POLYREX EM	T	NONE	NONE	1045 HOT ROLLED (C-204)	CAST IRON
6307	6208						

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

* N O T E S *	INVERTER TORQUE: CONSTANT 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

DATE: 06/22/2017 07:57:17 AM

FORM 3531 REV.3 02/07/99

** Subject to change without notice.

Data Sheet

Date: 1/7/2019

Customer: _____

Attention: _____

Submitted by: FAREEDA DUDEKULA

215TTFN16057



Submittal

Data @ 460 V

Motor Load Data

Load	0%	25%	50%	75%	100%	115%	125%	LR	
Current (Amps)	5.0	5.5	7.5	10.0	12.5	14.0	15.5	80.0	
Torque (ft-lb)	0.00	7.5	14.5	22.0	29.8	34.5	37.5	60.0	
RPM	1800	1790	1785	1775	1765	1,755	1750	0	
Efficiency (%)		87.5	91.0	91.7	91.7	91.0	90.2		
P.F. (%)	6.5	47.0	68.0	78.0	82.0	83.5	83.5	42.0	

Motor Speed Data

	LR	Pull-Up	BD	Rated	Idle																																									
Speed (RPM)	0	900	1675	1765	1800																																									
Current (Amps)	80.0	72.0	46.0	12.5	5.0																																									
Torque (ft-lb)	60.0	54.0	81.0	29.8	0.00																																									
<div><div>— Efficiency (%) — P.F. (%) — Current (Amps)</div><table><thead><tr><th>LOAD</th><th>Efficiency (%)</th><th>P.F. (%)</th><th>Current (Amps)</th></tr></thead><tbody><tr><td>0%</td><td></td><td></td><td>5.0</td></tr><tr><td>20%</td><td>88.0</td><td>4.5</td><td>5.5</td></tr><tr><td>40%</td><td>90.0</td><td>6.5</td><td>6.5</td></tr><tr><td>60%</td><td>91.5</td><td>7.5</td><td>7.5</td></tr><tr><td>80%</td><td>92.0</td><td>8.0</td><td>8.5</td></tr><tr><td>100%</td><td>92.0</td><td>82.5</td><td>12.5</td></tr><tr><td>120%</td><td>91.0</td><td>83.5</td><td>16.0</td></tr><tr><td>125%</td><td></td><td></td><td>18.0</td></tr></tbody></table></div>						LOAD	Efficiency (%)	P.F. (%)	Current (Amps)	0%			5.0	20%	88.0	4.5	5.5	40%	90.0	6.5	6.5	60%	91.5	7.5	7.5	80%	92.0	8.0	8.5	100%	92.0	82.5	12.5	120%	91.0	83.5	16.0	125%			18.0	Information Block				
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						Frequency		60 Hz																																						
Design		B																																												
LR Code letter		G																																												
Service Factor		1.15																																												
Temp Rise @ FL		55 °C																																												
Duty		CONT																																												
Ambient		40 °C																																												
Elevation		3,300 feet																																												
Rotor/Shaft wk²		1.20 Lb-Ft²																																												
Ref Wdg		K2154249 NONE																																												
Sound Pressure @ 1M		62 dBA																																												
VFD Rating		CONSTANT 20:1																																												
Outline Dwg		037659-1212																																												
Conn. Diag		EE7308																																												
Additional Specifications:																																														
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EQUIV CKT (OHMS / PHASE)																																														
R1		R2		X1		X2		Xm																																						
0.5400		0.4880		2.0930		3.2090		51.1200																																						

Speed -Torque Curve

