BALDOR • RELIANCE

Product Information Packet

EM3708T-5

5HP,1160RPM,3PH,60HZ,215T,3748M,TEFC,F1

Copyright © All product information within this document is subject to ABB Motors and Mechanical Inc. copyright © protection, unless otherwise noted.

Part Detail

Revision:	-	**Status:**	PRD/A	**Change #:**		**Proprietary:**	No
Type:	AC	**Elec. Spec:**	37WGQ070	**CD Diagram:**	CD0006	**Mfg Plant:**	
Mech. Spec:	37G813	**Layout:**	37LYG813	**Poles:**	06	**Created Date:**	09-22-2017
Base:	RG	**Eff. Date:**	09-26-2017	**Leads:**	3#14		

Specs

Catalog Number:	EM3708T-5	**Inverter Code:**	Inverter Ready
Enclosure:	TEFC	**KVA Code:**	J
Frame:	215T	**Lifting Lugs:**	Standard Lifting Lugs
Frame Material:	Steel	**Locked Bearing Indicator:**	No Locked Bearing
Output @ Frequency:	5.000 HP @ 60 HZ	**Motor Lead Quantity/Wire Size:**	3 @ 14 AWG
Synchronous Speed @ Frequency:	1200 RPM @ 60 HZ	**Motor Lead Exit:**	Ko Box
Voltage @ Frequency:	575.0 V @ 60 HZ	**Motor Lead Termination:**	Flying Leads
XP Class and Group:	None	**Motor Type:**	3752M
XP Division:	Not Applicable	**Mounting Arrangement:**	F1
Agency Approvals:	CSA	**Power Factor:**	73
	CSA EEV	**Product Family:**	General Purpose
	UR	**Pulley End Bearing Type:**	Ball
Auxillary Box:	No Auxillary Box	**Pulley Face Code:**	Standard
Auxillary Box Lead Termination:	None	**Pulley Shaft Indicator:**	Standard
Base Indicator:	Rigid	**Rodent Screen:**	None
Bearing Grease Type:	Polyrex EM (-20F +300F)	**RoHS Status:**	ROHS COMPLIANT
Blower:	None	**Shaft Extension Location:**	Pulley End
Current @ Voltage:	5.800 A @ 575.0 V	**Shaft Ground Indicator:**	No Shaft Grounding

Design Code:	A
Drip Cover:	No Drip Cover
Duty Rating:	CONT
Electrically Isolated Bearing:	Not Electrically Isolated
Feedback Device:	NO FEEDBACK
Front Face Code:	Standard
Front Shaft Indicator:	None
Heater Indicator:	No Heater
Insulation Class:	F

Shaft Rotation:	Reversible
Shaft Slinger Indicator:	No Slinger
Speed Code:	Single Speed
Motor Standards:	NEMA
Starting Method:	Direct on line
Thermal Device - Bearing:	None
Thermal Device - Winding:	None
Vibration Sensor Indicator:	No Vibration Sensor
Winding Thermal 1:	None
Winding Thermal 2:	None

Nameplate NP3441L

CAT.NO.	EM3708T-5								
SPEC.	37G813Q070G1								
HP	5								
VOLTS	575								
AMP	5.8								
RPM	1160								
FRAME	215T		**HZ**	60			**PH**	3	
SER.F.	1.15	**CODE**	J	**DES**	A	**CL**	F		
NEMA-NOM-EFF	89.5	**PF**	73						
RATING	40C AMB-CONT								
CC	010A			**USABLE AT 208V**					
DE	6307		**ODE**	6206					
ENCL	TEFC	**SN**							
VPWM INVERTER READY									
CT6-60H(10:1)VT3-60H(20:1									

Parts List

Part Number	Description	Quantity
SA345094	SA 37G813Q070G1	1.000 EA
RA333564	RA 37G813Q070G1	1.000 EA
37FN3002C01	EXFN, PLASTIC, 6.00 OD, 1.155 ID	1.000 EA
HW3200A01	3/8-16X3/4 I-BLT WELDED F/S	1.000 EA
37CB3006	37 CB CASTING W/1.38 LEAD HOLE @ 6:00	1.000 EA
37GS1000SP	GASKET, CONDUIT BOX STD., .06 THICK LEXI	1.000 EA
51XW2520A12	.25-20 X .75, TAPTITE II, HEX WSHR SLTD	2.000 EA
11XW1032G06	10-32 X .38, TAPTITE II, HEX WSHR SLTD U	1.000 EA
37EP3101A01	FR ENDPLATE, FOR ROUTING PURPOSES	1.000 EA
HW4500A01	1641B(ALEMITE)400 UNIV, GREASE FITT	1.000 EA
HW5100A06	W2420-025 WVY WSHR (WB)	1.000 EA
37PE3100A01	PUEP ASSEMBLY - ROUTING PUPROSES	1.000 EA
HW4500A01	1641B(ALEMITE)400 UNIV, GREASE FITT	1.000 EA
XY3118A12	5/16-18 HEX NUT DIRECTIONAL SERRATION	4.000 EA
51XB1214A20	12-14X1.25 HXWSSLD SERTYB	1.000 EA
07FH4007SP	PRIMED	1.000 EA
51XW1032A06	10-32 X .38, TAPTITE II, HEX WSHR SLTD S	3.000 EA
37CB4516	LIPPED LID FOR 37 FRAME NEC KOBX	1.000 EA
37GS1008	37 GS FOR CB LID - LEXIDE	1.000 EA
51XW0832A07	8-32 X .44, TAPTITE II, HEX WSHR SLTD SE	4.000 EA
HW2501F21	KEY, 5/16 SQ X 2.375	1.000 EA
HA7000A02	KEY RETAINER RING, 1 1/8 DIA, 1 3/8 DIA	1.000 EA
85XU0407S04	4X1/4 U DRIVE PIN STAINLESS	2.000 EA
LB1115N	LABEL,LIFTING DEVICE (ON ROLLS)	1.000 EA

Parts List (continued)

Part Number	Description	Quantity
MJ1000A02	GREASE, POLYREX EM EXXON (USe 4824-15A)	0.050 LB
MG1000Y03	MUNSELL 2.53Y 6.70/ 4.60, GLOSS 20,	0.028 GA
HA3104A25	THRUBOLT .31-18 X 14.75	4.000 EA
LB1119N	WARNING LABEL	1.000 EA
LC0006	CONNECTION LABEL	1.000 EA
NP3441L	ALUM SUPER-E VPWM INVERTER READY UL	1.000 EA
37PA1039	PALLET PACK GRP, PRINT PK1026A06	1.000 EA
MN416A01	TAG-INSTAL-MAINT no wire (1200/bx) 5/18	1.000 EA

AC Induction Motor Performance Data

Record # 68334 - Typical performance - not guaranteed values

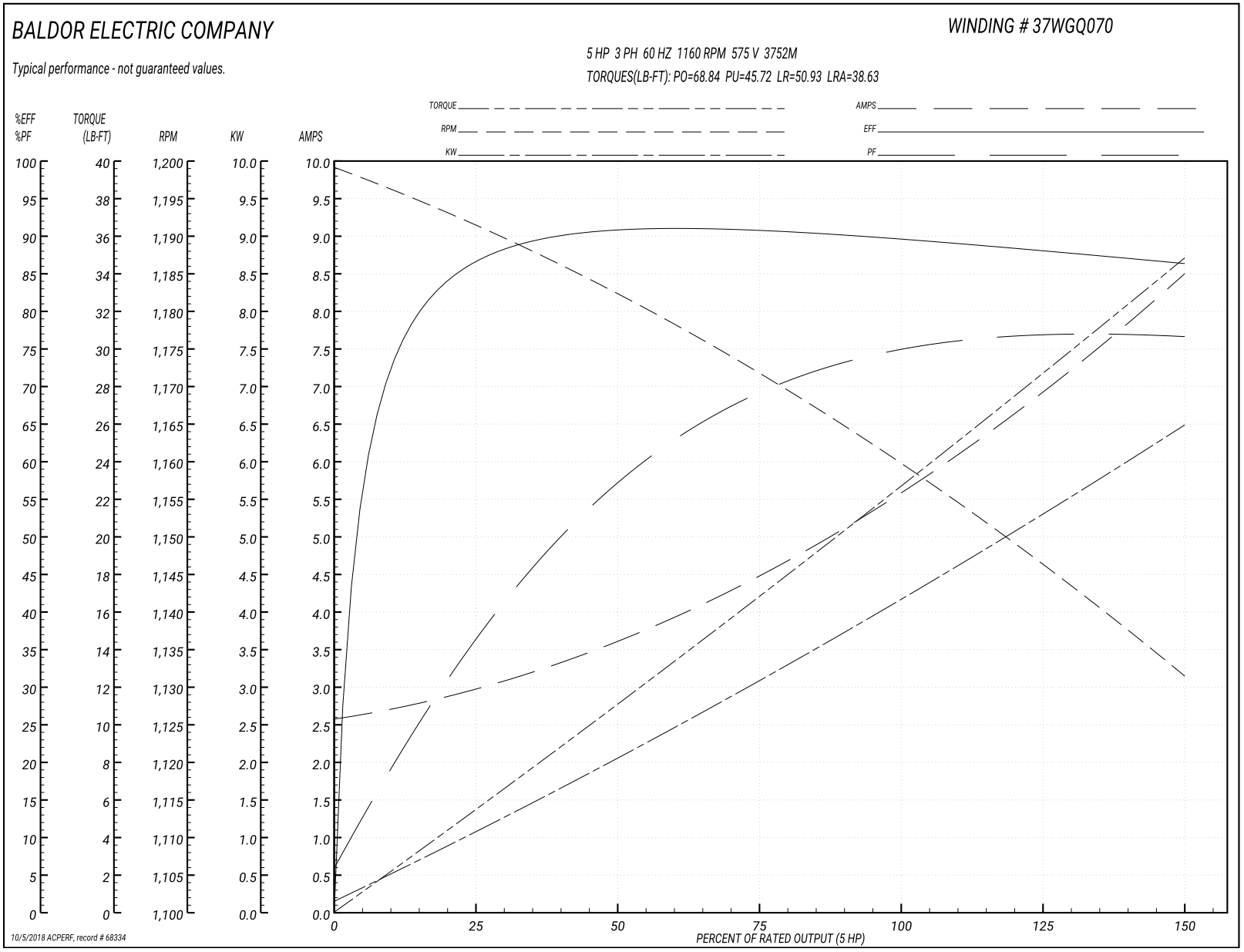
Winding: 37WGQ070-R001	**Type:** 3752M	**Enclosure:** TEFC

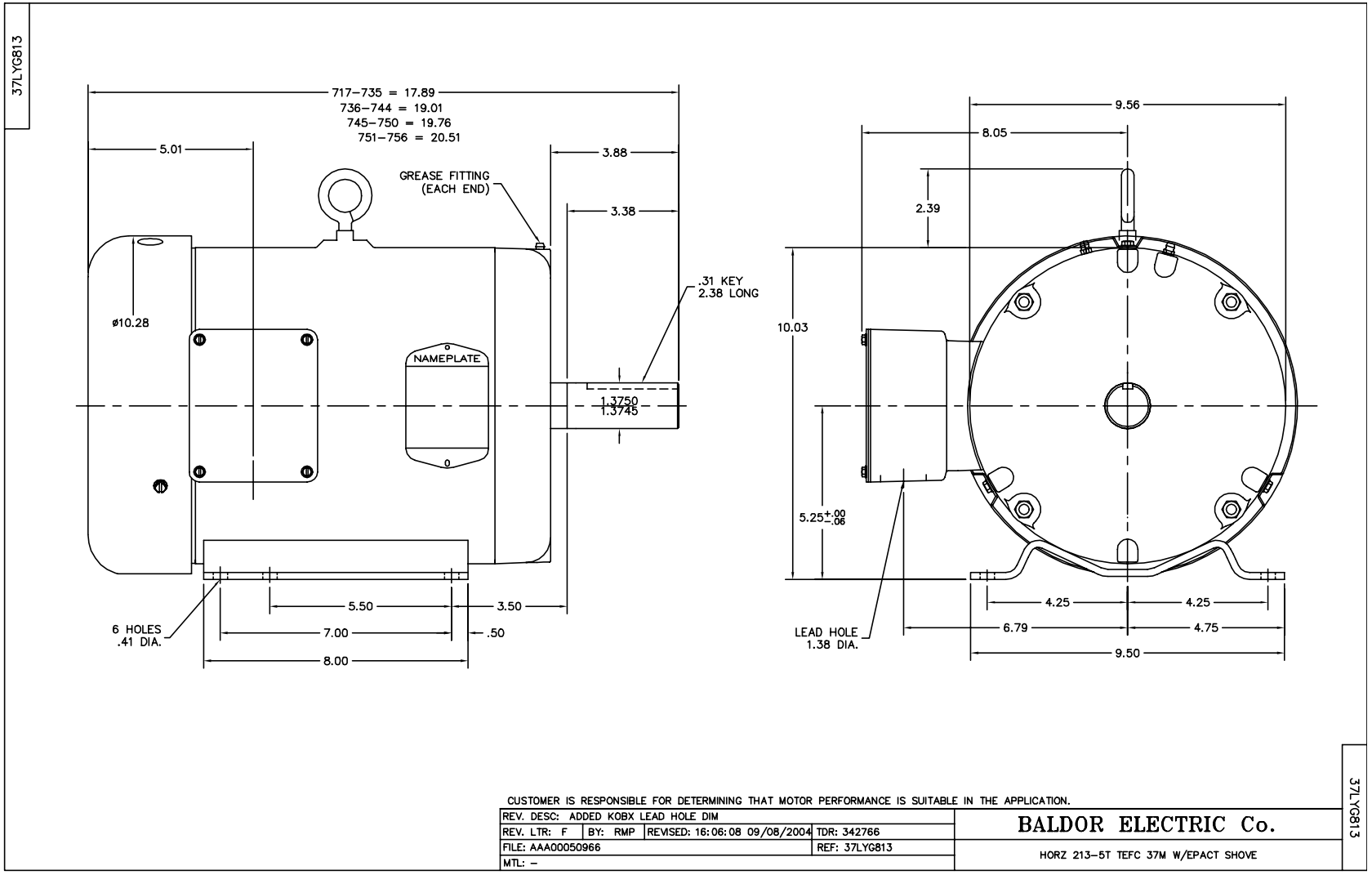
Nameplate Data				575 V, 60 Hz: Single Voltage Motor	
Rated Output (HP)	5			Full Load Torque	22.76 LB-FT
Volts	575			Start Configuration	direct on line
Full Load Amps	5.8			Breakdown Torque	68.84 LB-FT
R.P.M.	1160			Pull-up Torque	45.72 LB-FT
Hz	60	Phase	3	Locked-rotor Torque	50.93 LB-FT
NEMA Design Code	A	KVA Code	J	Starting Current	38.63 A
Service Factor (S.F.)	1.15			No-load Current	2.63 A
NEMA Nom. Eff.	89.5	Power Factor	73	Line-line Res. @ 25ºC	2.87 Ω
Rating - Duty	40C AMB-CONT			Temp. Rise @ Rated Load	55°C
S.F. Amps				Temp. Rise @ S.F. Load	69°C
				Locked-rotor Power Factor	21.8
				Rotor inertia	1.29 LB-FT2

Load Characteristics 575 V, 60 Hz, 5 HP

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	39	58	69	74	77	77	76
Efficiency	85.6	90.2	90.3	90	88.5	86	89.1
Speed	1192	1182	1171	1160	1147	1131	1152
Line amperes	2.9	3.58	4.54	5.62	6.93	8.49	6.41

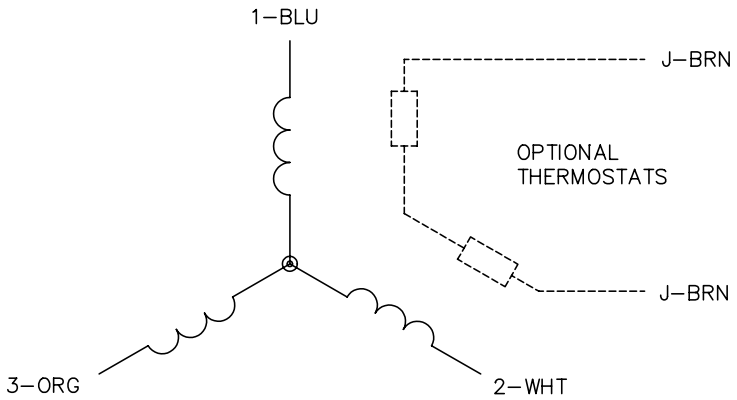
Performance Graph at 575V, 60Hz, 5.0HP Typical performance - Not guaranteed values

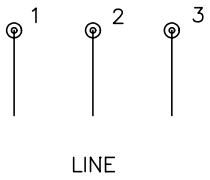



37LYG813
717–735 = 17.89
736–744 = 19.01
745–750 = 19.76
751–756 = 20.51
5.01
3.88
GREASE FITTING
(EACH END)
3.38
.31 KEY
2.38 LONG
ø10.28
NAMEPLATE
1.3750
1.3745
5.50
3.50
7.00
.50
8.00
6 HOLES
.41 DIA.
9.56
8.05
2.39
10.03
5.25 +.00 -.06
4.25
4.25
6.79
4.75
9.50
LEAD HOLE
1.38 DIA.
CUSTOMER IS RESPONSIBLE FOR DETERMINING THAT MOTOR PERFORMANCE IS SUITABLE IN THE APPLICATION.
REV. DESC: ADDED KOBX LEAD HOLE DIM
REV. LTR: F
BY: RMP
REVISED: 16:06:08 09/08/2004
TDR: 342766
FILE: AAA00050966
REF: 37LYG813
MTL: –
BALDOR ELECTRIC Co.
HORZ 213–5T TEFC 37M W/EPACT SHOVE
37LYG813

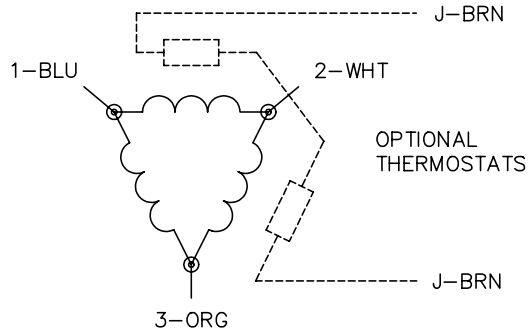
CD0006

TYPICAL WYE–CONNECTED MOTOR





TYPICAL DELTA–CONNECTED MOTOR



NOTES:

1. THREE LEAD MOTOR MAY BE EITHER WYE CONNECTED OR DELTA CONNECTED.
2. INTERCHANGE ANY TWO LINE LEADS TO REVERSE ROTATION.
3. OPTIONAL THERMOSTATS ARE PROVIDED WHEN SPECIFIED.
4. ACTUAL NUMBER OF INTERNAL PARALLEL CIRCUITS MAY VARY.
5. LEAD COLORS ARE OPTIONAL. LEADS MUST BE NUMBERED AS SHOWN.

CD0006

REV. DESC: REVISE TO SHOW OPTIONAL COLORS			BALDOR ELECTRIC Co.
REV. LTR: D	BY: JLP	REVISED: 01/21/99 4:02	TDR: 0171435
9000CD		FILE: AAA00005141	MDL: –
		MTL: –	3PH, SV, 3 LEADS, WYE OR DELTA CONNECTED