BALDOR • RELIANCE

Product Information Packet

EM3713T

15HP,3500RPM,3PH,60HZ,215T,3752M,TEFC,F1

Part Detail

Revision:	R	**Status:**	PRD/A	**Change #:**		**Proprietary:**	No
Type:	AC	**Elec. Spec:**	37WGR228	**CD Diagram:**	CD0180	**Mfg Plant:**	
Mech. Spec:	37H244	**Layout:**	37LYH244	**Poles:**	02	**Created Date:**	01-16-2012
Base:	RG	**Eff. Date:**	07-31-2020	**Leads:**	9#14		

Specs

Catalog Number:	EM3713T	**Heater Indicator:**	No Heater
Enclosure:	TEFC	**Insulation Class:**	F
Frame:	215T	**Inverter Code:**	Inverter Ready
Frame Material:	Steel	**KVA Code:**	J
Output @ Frequency:	15.000 HP @ 60 HZ	**Lifting Lugs:**	Standard Lifting Lugs
Synchronous Speed @ Frequency:	3600 RPM @ 60 HZ	**Locked Bearing Indicator:**	No Locked Bearing
Voltage @ Frequency:	460.0 V @ 60 HZ	**Motor Lead Quantity/Wire Size:**	9 @ 14 AWG
	230.0 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:**	89
	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)	**Shaft Ground Indicator:**	No Shaft Grounding
Blower:	None	**Shaft Rotation:**	Reversible

Current @ Voltage:	36.800 A @ 208.0 V	**Shaft Slinger Indicator:**	No Slinger
	34.000 A @ 230.0 V	**Speed Code:**	Single Speed
	17.000 A @ 460.0 V	**Motor Standards:**	NEMA
Design Code:	A	**Starting Method:**	Direct on line
Drip Cover:	No Drip Cover	**Thermal Device - Bearing:**	None
Duty Rating:	CONT	**Thermal Device - Winding:**	None
Electrically Isolated Bearing:	Not Electrically Isolated	**Vibration Sensor Indicator:**	No Vibration Sensor
Feedback Device:	NO FEEDBACK	**Winding Thermal 1:**	None
Front Shaft Indicator:	None	**Winding Thermal 2:**	None

Nameplate NP3441LUA

CAT.NO.	EM3713T							
SPEC	37H244R228G1							
HP	15							
VOLTS	230/460							
AMPS	34/17							
RPM	3500							
FRAME	215T	**HZ**	60	**PH**	3			
SF	1.15	**CODE**	J	**DES**	A	**CLASS**	F	
NEMA NOM. EFF	91	**PF**	89					
RATING	40C AMB-CONT							
CC	010A	**USABLE AT 208V**	36.8					
ENCL	TEFC	**SER**						
DE	6307	**ODE**	6206					
VPWM INVERTER READY								
CT6-60H(10:1)VT3-60H(20:1								
	50Hz 15HP 190/380V 40.8/20.4A							SF1.0

Parts List

Part Number	Description	Quantity
SA237196	SA 37H244R228G1	1.000 EA
RA224129	RA 37H244R228G1	1.000 EA
37FN3002B01	EXFN, PLASTIC, 7.50 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
37EP3100A01	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
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
MJ1000A02	GREASE, MOBIL POLYREX EM - 124047	0.050 LB

Parts List (continued)

Part Number	Description	Quantity
51XB1214A20	12-14X1.25 HXWSSLD SERTYB	1.000 EA
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
LC0181	CONNECTION LABEL	1.000 EA
NP3441LUA	ALUM SUPER-E VPWM INV READY UL CSA-EEV C	1.000 EA
37PA1074	PALLET PACK GRP, PRINT BOX PK1026A06	1.000 EA
MN416A01	TAG-INSTAL-MAINT no wire (2100/bx) 4/22	1.000 EA

AC Induction Motor Performance Data
Record # 53380
Typical performance - not guaranteed values

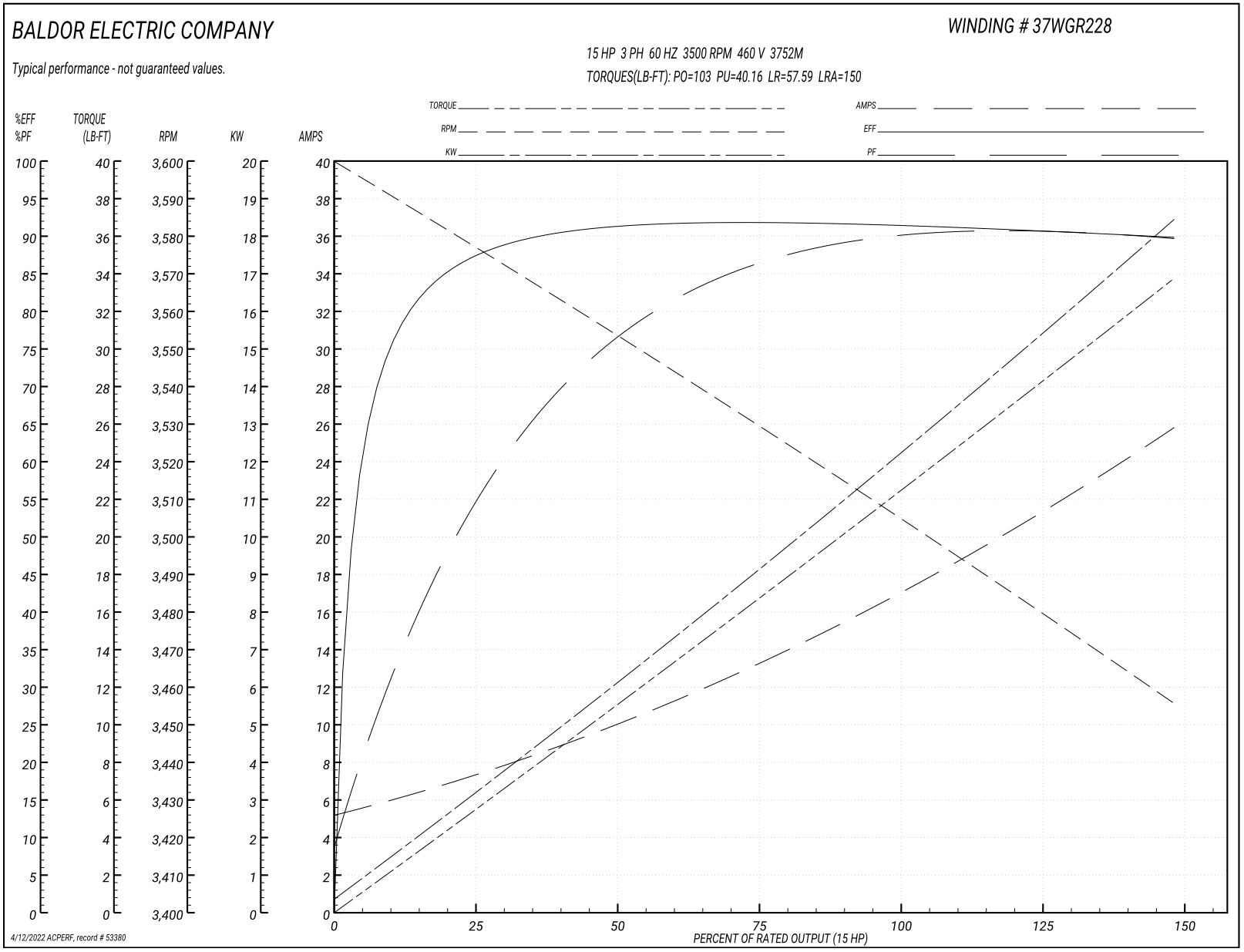
Winding: 37WGR228-R023	**Type:** 3752M	**Enclosure:** TEFC

Nameplate Data			**460 V, 60 Hz: High Voltage Connection**	
Rated Output (HP)		15	**Full Load Torque**	22.12 LB-FT
Volts		230/460	**Start Configuration**	direct on line
Full Load Amps		34/17	**Breakdown Torque**	103 LB-FT
R.P.M.		3500	**Pull-up Torque**	40.16 LB-FT
Hz	60 **Phase**	3	**Locked-rotor Torque**	57.59 LB-FT
NEMA Design Code	A **KVA Code**	J	**Starting Current**	150 A
Service Factor (S.F.)		1.15	**No-load Current**	5.55 A
NEMA Nom. Eff.	91 **Power Factor**	89	**Line-line Res. @ 25ºC**	0.47 Ω
Rating - Duty		40C AMB-CONT	**Temp. Rise @ Rated Load**	68°C
S.F. Amps			**Temp. Rise @ S.F. Load**	79°C
			Locked-rotor Power Factor	30.9
			Rotor inertia	0.474 LB-FT2

Load Characteristics 460 V, 60 Hz, 15 HP

% of Rated Load	**25**	**50**	**75**	**100**	**125**	**150**	**S.F.**
Power Factor	56	78	85	89	90	90	89
Efficiency	86.8	91	91.9	91.4	90.8	89.8	91.3
Speed	3579	3557	3534	3500	3484	3456	3495
Line amperes	6.7	9.57	13.19	17.03	21.12	25.61	19.5

Performance Graph at 460V, 60Hz, 15.0HP Typical performance - Not guaranteed values



AC Induction Motor Performance Data
Record # 57899
Typical performance - not guaranteed values

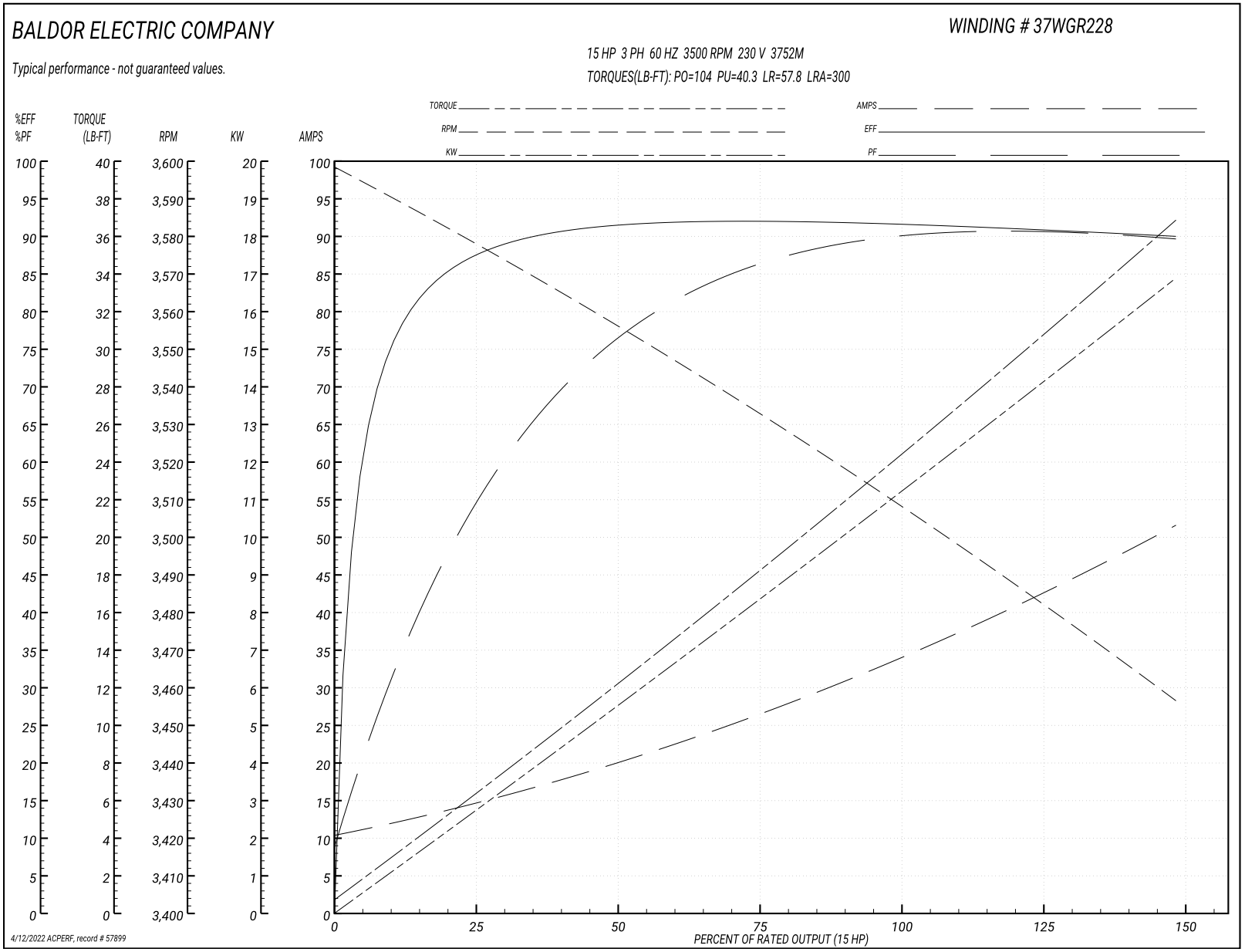
Winding: 37WGR228-R023	**Type:** 3752M	**Enclosure:** TEFC

Nameplate Data			**230 V, 60 Hz: Low Voltage Connection**	
Rated Output (HP)		15	**Full Load Torque**	22.1 LB-FT
Volts		230/460	**Start Configuration**	direct on line
Full Load Amps		34/17	**Breakdown Torque**	104 LB-FT
R.P.M.		3500	**Pull-up Torque**	40.3 LB-FT
Hz	60 **Phase**	3	**Locked-rotor Torque**	57.8 LB-FT
NEMA Design Code	A **KVA Code**	J	**Starting Current**	300 A
Service Factor (S.F.)		1.15	**No-load Current**	11.1 A
NEMA Nom. Eff.	91 **Power Factor**	89	**Line-line Res. @ 25ºC**	0.111 Ω
Rating - Duty		40C AMB-CONT	**Temp. Rise @ Rated Load**	67°C
S.F. Amps			**Temp. Rise @ S.F. Load**	82°C
			Locked-rotor Power Factor	30.3
			Rotor inertia	0.474 LB-FT2

Load Characteristics 230 V, 60 Hz, 15 HP

% of Rated Load	**25**	**50**	**75**	**100**	**125**	**150**	**S.F.**
Power Factor	56	77	85	89	90	90	90
Efficiency	86.8	91.1	92	91.8	91	90	91.3
Speed	3579	3558	3534	3510	3485	3456	3495
Line amperes	13.4	19.1	26.4	34	42.2	51.2	38.9

Performance Graph at 230V, 60Hz, 15.0HP Typical performance - Not guaranteed values



AC Induction Motor Performance Data
Record # 70097
Typical performance - not guaranteed values

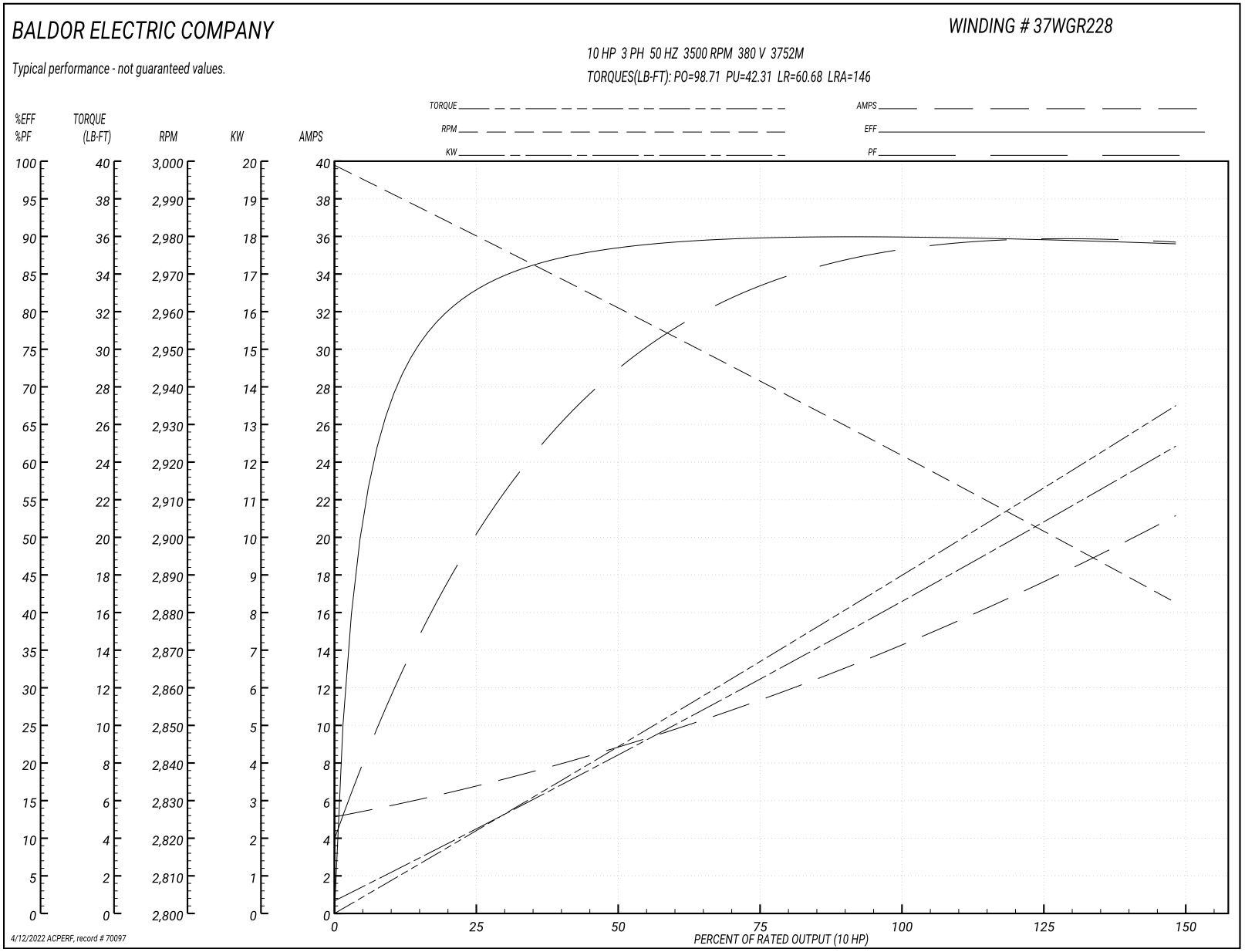
Winding: 37WGR228-RXXX	**Type:** 3752M	**Enclosure:** TEFC

Nameplate Data			**380 V, 50 Hz: High Voltage Connection**	
Rated Output (HP)		15	**Full Load Torque**	17.68 LB-FT
Volts		230/460	**Start Configuration**	direct on line
Full Load Amps		34/17	**Breakdown Torque**	98.71 LB-FT
R.P.M.		3500	**Pull-up Torque**	42.31 LB-FT
Hz	60 **Phase**	3	**Locked-rotor Torque**	60.68 LB-FT
NEMA Design Code	A **KVA Code**	J	**Starting Current**	146 A
Service Factor (S.F.)		1.15	**No-load Current**	5.43 A
NEMA Nom. Eff.	91 **Power Factor**	89	**Line-line Res. @ 25ºC**	0.47 Ω
Rating - Duty		40C AMB-CONT	**Temp. Rise @ Rated Load**	52°C
S.F. Amps			**Temp. Rise @ S.F. Load**	63°C
			Locked-rotor Power Factor	34.6
			Rotor inertia	0.474 LB-FT2

Load Characteristics 380 V, 50 Hz, 10 HP

% of Rated Load	**25**	**50**	**75**	**100**	**125**	**150**	**S.F.**
Power Factor	51	73	82	87	89	90	88
Efficiency	81.7	88	89.8	89.9	89.6	88.9	89.7
Speed	2982	2964	2945	2918	2905	2883	2910
Line amperes	6.27	8.45	11.29	14.27	17.46	20.98	16.2

Performance Graph at 380V, 50Hz, 10.0HP Typical performance - Not guaranteed values



AC Induction Motor Performance Data
Record # 73419
Typical performance - not guaranteed values

Winding: 37WGR228-RXXX **Type:** 3752M **Enclosure:** TEFC

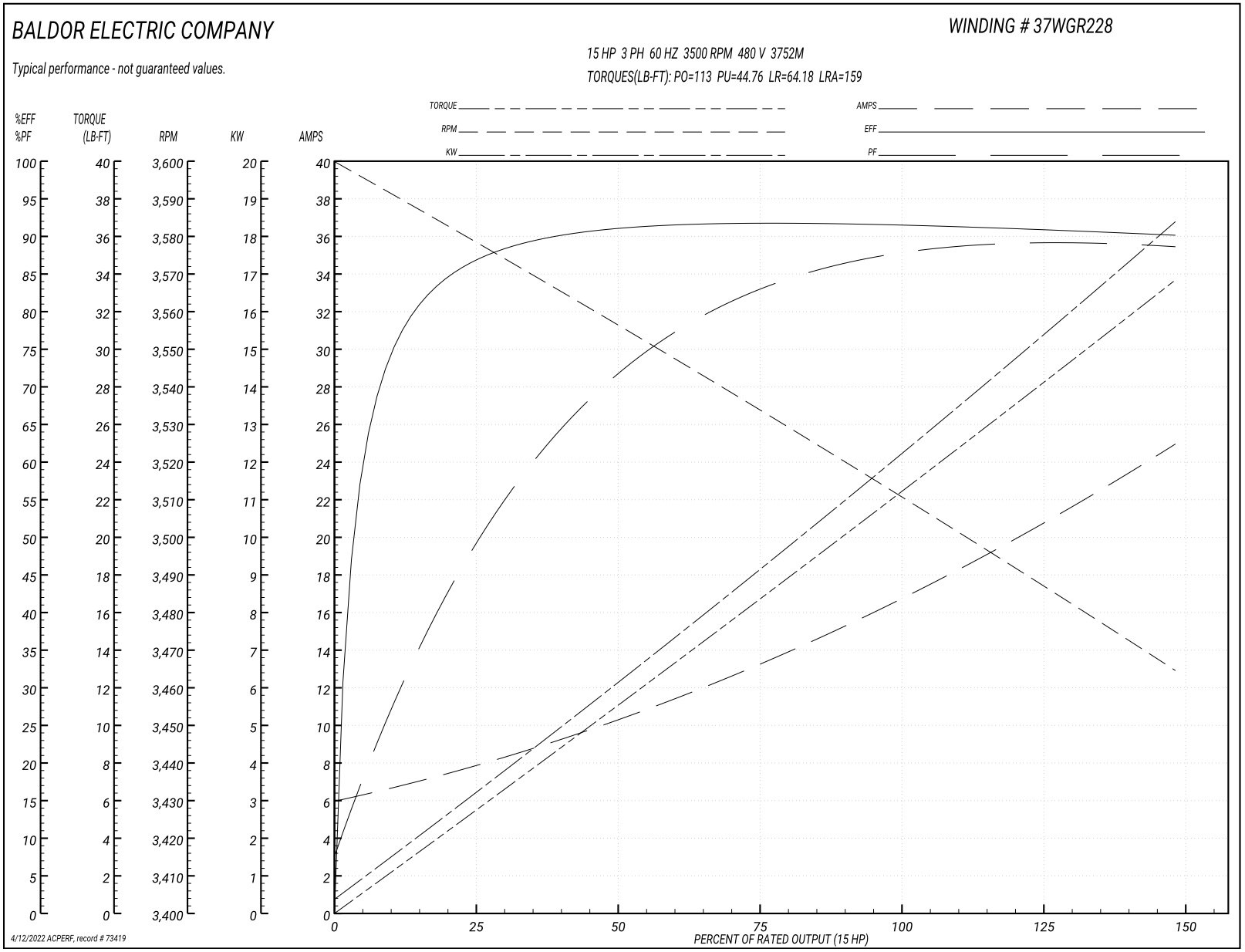
Nameplate Data		
Rated Output (HP)		15
Volts		230/460
Full Load Amps		34/17
R.P.M.		3500
Hz	60 **Phase**	3
NEMA Design Code	A **KVA Code**	J
Service Factor (S.F.)		1.15
NEMA Nom. Eff.	91 **Power Factor**	89
Rating - Duty		40C AMB-CONT
S.F. Amps		

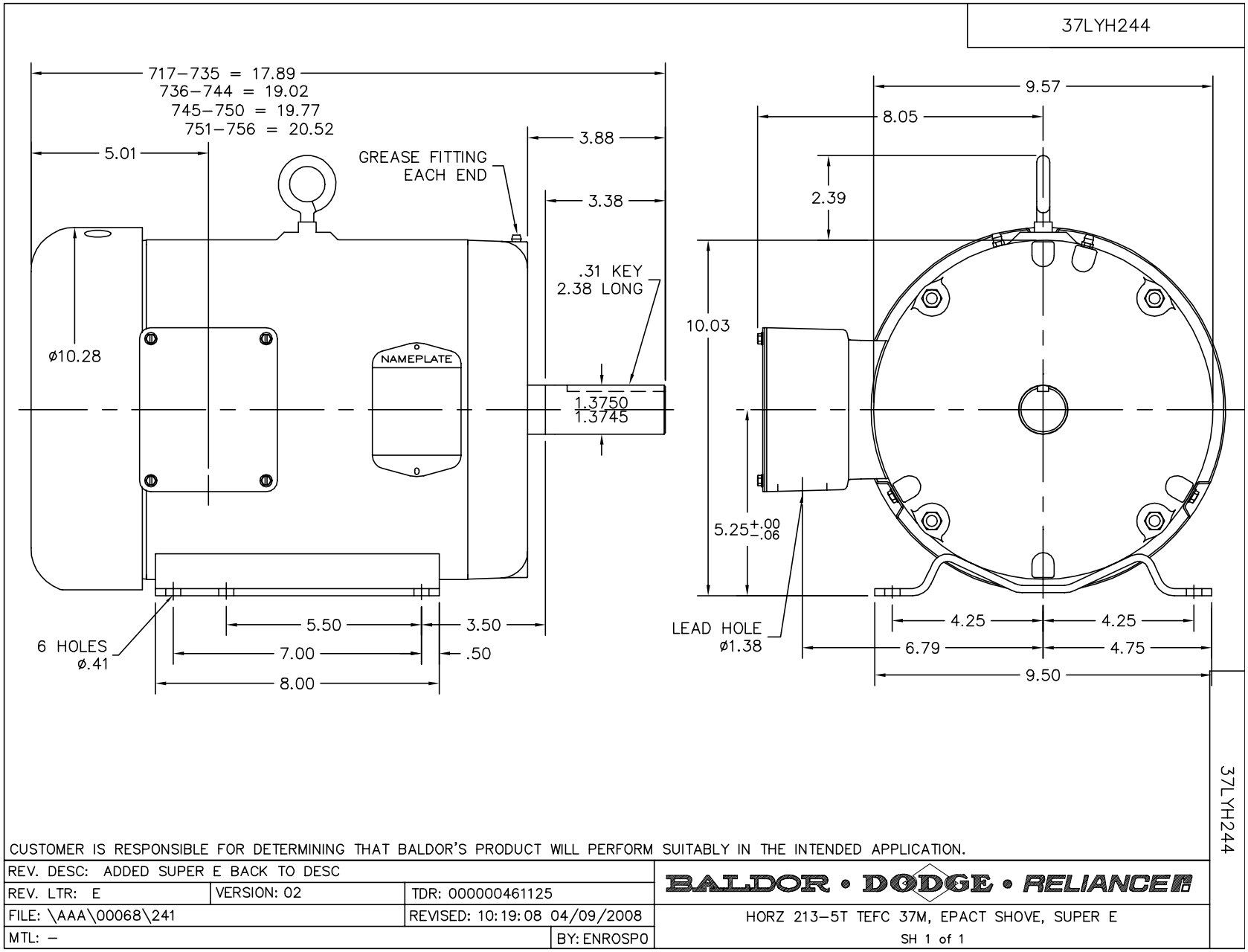
480 V, 60 Hz: High Voltage Connection	
Full Load Torque	22.12 LB-FT
Start Configuration	direct on line
Breakdown Torque	113 LB-FT
Pull-up Torque	44.76 LB-FT
Locked-rotor Torque	64.18 LB-FT
Starting Current	159 A
No-load Current	6.32 A
Line-line Res. @ 25ºC	0.47 Ω
Temp. Rise @ Rated Load	67°C
Temp. Rise @ S.F. Load	83°C
Locked-rotor Power Factor	31.2
Rotor inertia	0.474 LB-FT2

Load Characteristics 480 V, 60 Hz, 15 HP

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	50	72	82	86	88	89	87
Efficiency	86.2	90.7	91.8	91.5	90.9	90.1	91.1
Speed	3580	3560	3538	3506	3491	3465	3497
Line amperes	7.28	9.85	13.18	16.77	20.58	24.75	19.1

Performance Graph at 480V, 60Hz, 15.0HP Typical performance - Not guaranteed values




37LYH244
717–735 = 17.89
736–744 = 19.02
745–750 = 19.77
751–756 = 20.52
5.01
GREASE FITTING
EACH END
3.88
3.38
.31 KEY
2.38 LONG
ø10.28
NAMEPLATE
1.3750
1.3745
6 HOLES
ø.41
5.50
3.50
7.00
.50
8.00
9.57
8.05
2.39
10.03
5.25 +.00 −.06
LEAD HOLE
ø1.38
4.25
4.25
6.79
4.75
9.50
37LYH244
CUSTOMER IS RESPONSIBLE FOR DETERMINING THAT BALDOR'S PRODUCT WILL PERFORM SUITABLY IN THE INTENDED APPLICATION.
REV. DESC: ADDED SUPER E BACK TO DESC
REV. LTR: E
VERSION: 02
TDR: 000000461125
FILE: \AAA\00068\241
REVISED: 10:19:08 04/09/2008
MTL: –
BY: ENROSP0
BALDOR • DODGE • RELIANCE
HORZ 213–5T TEFC 37M, EPACT SHOVE, SUPER E
SH 1 of 1

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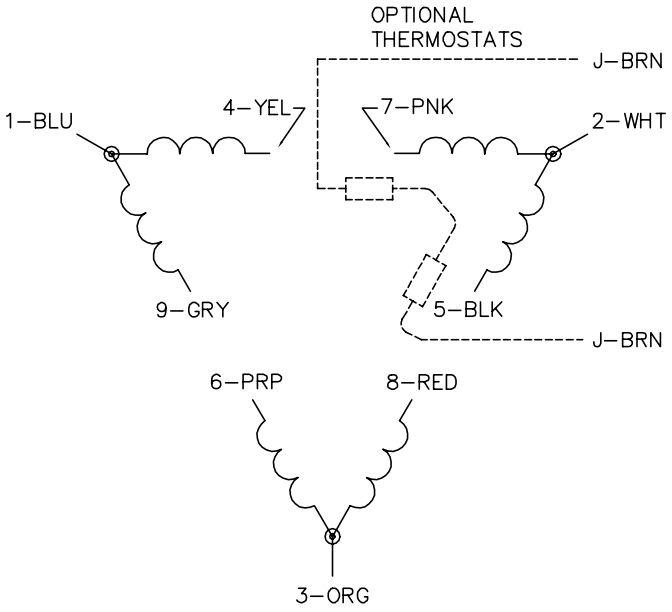

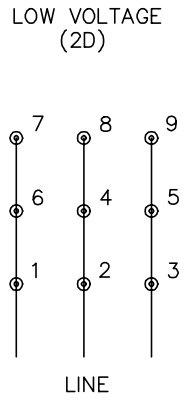

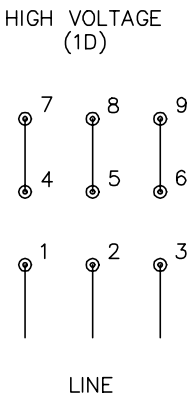

NOTES:

1. INTERCHANGE ANY TWO LINE LEADS TO REVERSE ROTATION.
2. OPTIONAL THERMOSTATS ARE PROVIDED WHEN SPECIFIED.
3. ACTUAL NUMBER OF INTERNAL PARALLEL CIRCUITS MAY BE A MULTIPLE OF THOSE SHOWN ABOVE.
4. LEAD COLORS ARE OPTIONAL. LEADS MUST ALWAYS BE NUMBERED AS SHOWN.

CD0180

REV. DESC: ADD CLASS CONN00000007		BALDOR - RELIANCE®
REV. LTR: D	VERSION: 01	TDR: 000001099922
FILE: \AAA\00005\148	REVISED: 10:25:29 02/19/2019	BY: ENBRIR0
MTL: –		3PH, DV, 9 LEADS, DELTA CONNECTION
		SH 1 of 1