

ABB BALDOR RELIANCE III

Customer information packet

EM25402T-4

400HP, 3570RPM, 3PH, 60HZ, 449TS, DP, F1

Class - None

Division - Not Applicable

Specifications

Enclosure	DP
Frame	449TS
Frame Material	Iron
Frequency	60.00 Hz
Haz Area Class and Group	None
Haz Area Division	Not Applicable
Motor Letter Type	Three Phase
Output @ Frequency	400.000 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	3600 RPM @ 60 HZ
Voltage @ Frequency	460.0 V @ 60 HZ
Agency Approvals	CURUSEEV
Ambient Temperature	40 °C
Auxiliary Box	NO AUXILLARY BOX
Base Indicator	Rigid
Bearing Grease Type	Polyrex EM (-20F +300F)
Current @ Voltage	431.000 A @ 460.0 V
Design Code	B
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	96.2 %
Feedback Device	NO FEEDBACK
Heater Indicator	No Heater
High Voltage Full Load Amps	431.0 a
Insulation Class	F
Inverter Code	Inverter Ready
IP Rating	NONE
KVA Code	F
Lifting Lugs	Standard Lifting Lugs
Motor Lead Quantity/Wire Size	6 @ 2/0 AWG
Motor Standards	NEMA
Motor Type	A44112M

Part Detail

Revision	C
Type	AC
Mech. spec.	
Base	
Status	PRD/A
Elec. spec.	A44WG2659
Layout	604989-595
Eff. date	07-18-2022
CD Diagram	416820-008
Poles	02
Leads	6#2/0
Proprietary	False
Created date	11-23-2015

Mounting Arrangement	F1
Number of Poles	2
Overall Length	44.31 IN
Power Factor	90
Product Family	General Industrial
Pulley End Bearing Type	Ball
Pulley Face Code	Standard
Service Factor	1.15
Shaft Diameter	2.375 IN
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	No Slinger
Speed	3570 rpm
Speed Code	Single Speed
Starting Method	Wye Start - Delta Run
Thermal Device - Bearing	None
Thermal Device - Winding	None

Nameplate

NP2496L	
MOBIL POLYREX EM	

NP2349L

SPEC NO.	A44-8053-2659			CAT.NO.	EM25402T-4				FRAME	449TS	
HP	400	VOLTS	460	PHASE	3	DESIGN	B	TYPE	P		
RPM	3570	AMPS	431	HZ	60	AMB	40	SF	1.15		
DRIVE END BEARING	65BC03J30X			DUTY	CONT	INSUL.CLASS	F				
OPP D.E. BEARING	65BC03J30X			ENCL	DP	CODE	F				
SER.NO.				POWER FACTOR	90	NEMA-NOM-EFFICIENCY			96.2		
						MAX CORR KVAR	50	GUARANTEED EFFICIENCY		95.4	
						NEMA NOM/CSA QUOTED EFF					
									MOTOR WEIGHT	2415	

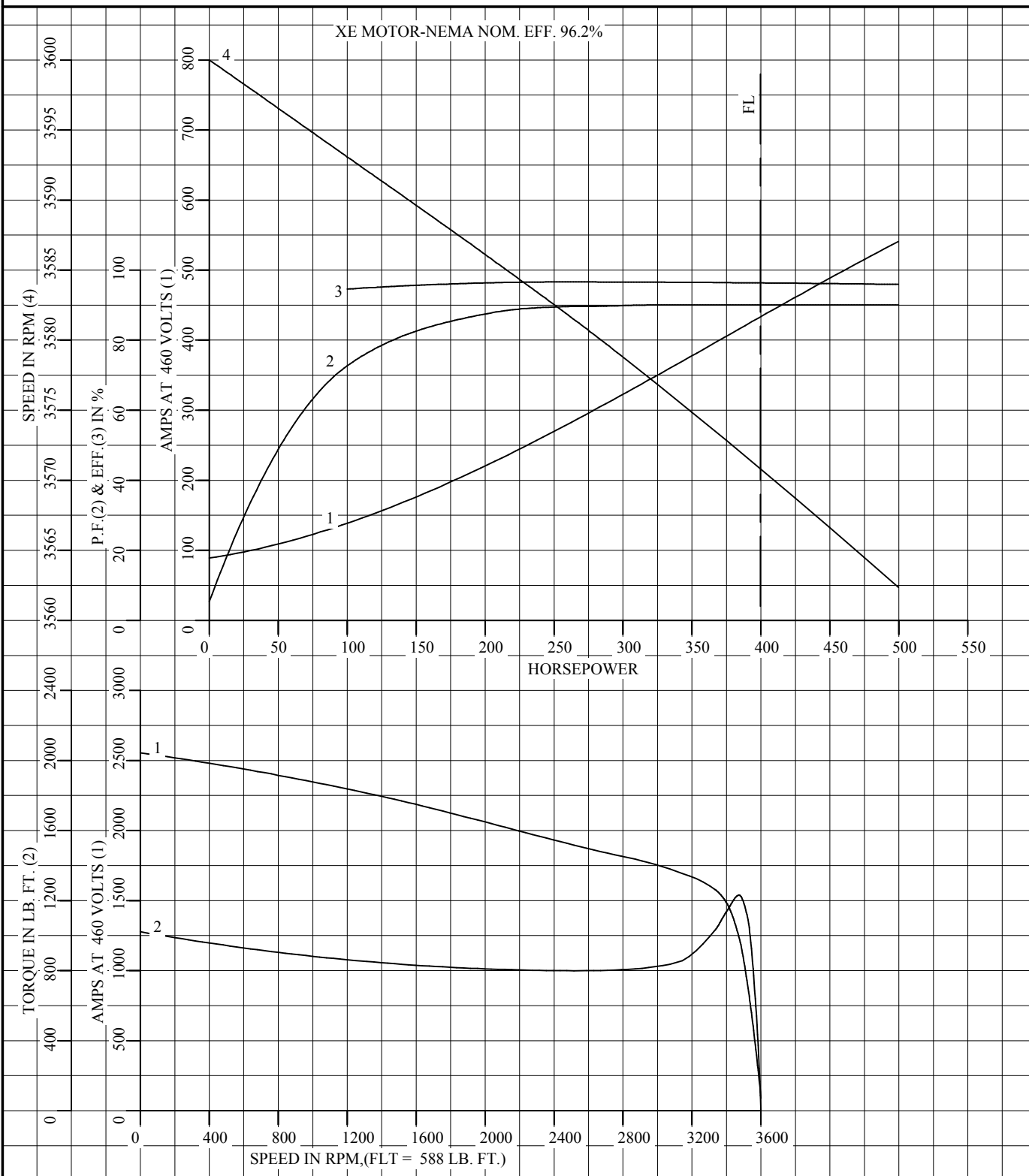
Parts List

Part number	Description	Quantity
SA310792	SA A44-8053-2659	1.000 ea
RA298188	RA A44-8053-2659	1.000 ea
421948044	LABEL, MYLAR	1.000 ea
NP2496L	MOTOR LUBE NAMEPLATE	1.000 ea
000613006PU	N/P (RELEASE QTY 10,000) UL CSA LABEL	1.000 ea
000692000FF	N/P	1.000 ea
000692000VD	LABEL WARNING	1.000 ea
NP2349L	SUPER-E ,SS, CURUS EEV, CC, LASER	1.000 ea
702611001A	BAFFL 440 SUB PAINT	1.000 ea
089438082A	BRKT 440 089438081WCB	1.000 ea
004824015A	GREASE POLYREX EM	0.540 lb
032018028EK	HHCS 5/8-11X3-1/2L PLTD	4.000 ea
032018028CK	HHCS 3/8-16X3-1/2 PLTD.	3.000 ea
410700004F	WSHR	1.000 ea
035000001G	GREASE RELIEF FITTING, ALEMITE 317400	1.000 ea
034017012AB	LCKW 1/4 STD. PLATED 034017012AF	4.000 ea
405851012AB	SPACE	4.000 ea
032018006AK	HHCS 1/4-20X3/4L PLATED	4.000 ea
034000012AB	WSHR 1/4 STD. PLATED	4.000 ea
034600001AA	BUSH 1/4TO1/8 BLACK	1.000 ea
405851012AB	SPACE	4.000 ea
034017012AB	LCKW 1/4 STD. PLATED 034017012AF	4.000 ea
034600001AA	BUSH 1/4TO1/8 BLACK	1.000 ea
034000012AB	WSHR 1/4 STD. PLATED	4.000 ea
032018006AK	HHCS 1/4-20X3/4L PLATED	4.000 ea
089438082A	BRKT 440 089438081WCB	1.000 ea
702611001A	BAFFL 440 SUB PAINT	1.000 ea
032018028EK	HHCS 5/8-11X3-1/2L PLTD	4.000 ea
032018028CK	HHCS 3/8-16X3-1/2 PLTD.	3.000 ea
035000001G	GREASE RELIEF FITTING, ALEMITE 317400	1.000 ea
406056008A	GASKET, TERBD 440	1.000 ea

418150003A	GREASE FITTING CAP	1.000 ea
MG1025Y17	WILKOFAST, 789.701, SUPER E PEARL GOLD	0.500 ga
032018008DK	HHCS 1/2-13X1 PLATED	4.000 ea
048897010DG	PLUG,ODE BRKT - 360	1.000 ea
406055001E	GRFTG - 440	1.000 ea
702616012T	CONDUIT BOX	1.000 ea
035000001A	ALFTG 1/8" 1610-BL	1.000 ea
035000001A	ALFTG 1/8" 1610-BL	1.000 ea
418150003A	GREASE FITTING CAP	1.000 ea
033775004EA	DRSCR #6-1/4 304 S.S.	2.000 ea
034180024HA	KEY 5/8X5/8X3 L	1.000 ea
604797056	400-447 FRAME 60 X 42	1.000 ea
032510026D	CARRIAGE BOLT - 440	2.000 ea
034001014AB	FLAT WASHER 3/8"PLATED	2.000 ea
034001016AB	WSHR .562ID 1.375OD .109	2.000 ea
033300014AC	HEX NUT, SHIPPING - 400	2.000 ea
604799003C	PLASTIC BAG 42X32X46	1.000 ea

REL. S.O.	FRAME	HP	TYPE	PHASE/ HERTZ	RPM	VOLTS		
	449T	400	P	3/60	3570	460		
AMPS	DUTY	AMB °C/ INSUL.	S.F.	NEMA DESIGN	CODE LETTER	ENCL.		
431	CONT	40/F	1.15	B	F	PRXE		
E/S	ROTOR	TEST S.O.	TEST DATE	STATOR RES. @25 °C OHMS (BETWEEN LINES)				
433472	418143013KE	---	---	.00865				
PERFORMANCE								
LOAD	HP	AMPERES	RPM	% POWER FACTOR	% EFFICIENCY			
NO LOAD	0	89.7	3600	5.37	0			
1/4	100	136	3593	72.7	94.6			
2/4	200	222	3586	87.5	96.4			
3/4	300	324	3579	89.9	96.6			
4/4	400	431	3571	90.0	96.4			
5/4	500	541	3562	90.1	95.9			
SPEED TORQUE								
		RPM	TORQUE % FULL LOAD	TORQUE LB.-FT.	AMPERES			
LOCKED ROTOR		0	174	1022	2555			
PULL UP		2550	136	800	1885			
BREAKDOWN		3474	209	1231	1235			
FULL LOAD		3571	100	588	431			
AMPERES SHOWN FOR 460. VOLT CONNECTION. IF OTHER VOLTAGE CONNECTIONS ARE AVAILABLE, THE AMPERES WILL VARY INVERSELY WITH THE RATED VOLTAGE REMARKS: TYPICAL DATA XE MOTOR-NEMA NOM. EFF. 96.2%								
		DR. BY	D. M. BYRD	A-C MOTOR PERFORMANCE DATA A44WG2659-R002 ISSUE DATE 05/14/02				
		CK. BY	C.E. JAMISON					
		APP. BY	D. M. BYRD					
		DATE	05/14/02					

REL S.O.	RPM 3570	S.F. 1.15	ROTOR 418143013KE
FRAME 449T	VOLTS 460	NEMA DESIGN B	TEST S.O. TYPICAL DATA
HP 400	AMPS 431	CODE LETTER F	TEST DATE ---
TYPE P	DUTY CONT	ENCLOSURE PRXE	STATOR RES. @ 25 °C .00865
PHASE/HERTZ 3/60	AMB °C/INSUL 40/F	E/S 433472	OHMS (BETWEEN LINES)



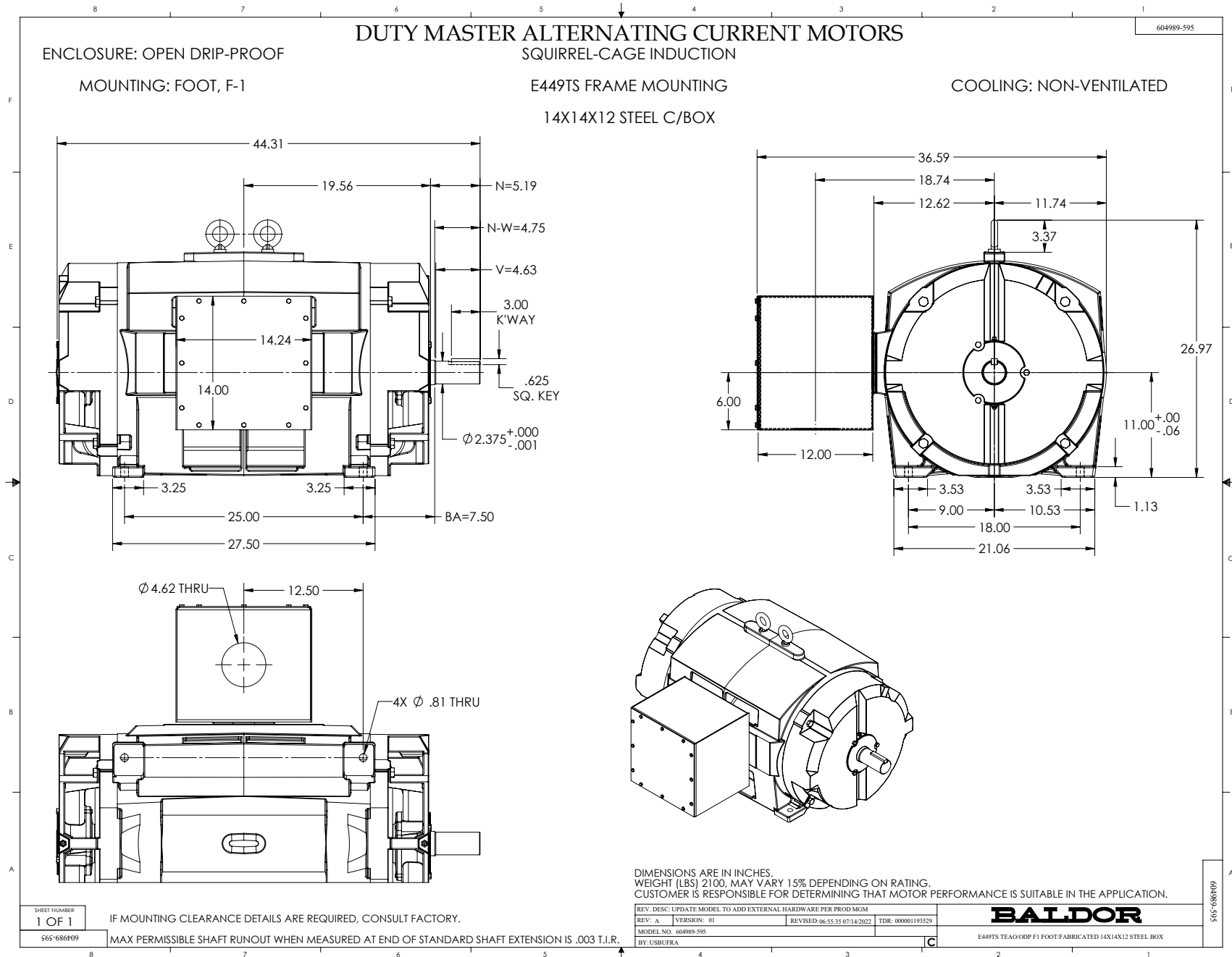
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BALDOR
A MEMBER OF THE ABB GROUP

DR. BY D. M. BYRD
CK. BY C. E. JAMISON
APP. BY D. M. BYRD
DATE 05/14/02

**A-C MOTOR
PERFORMANCE
CURVES**

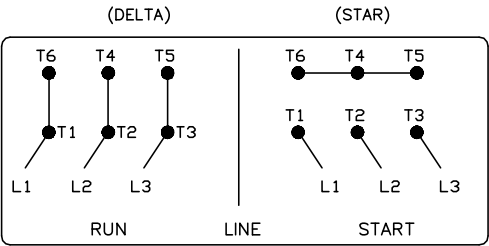
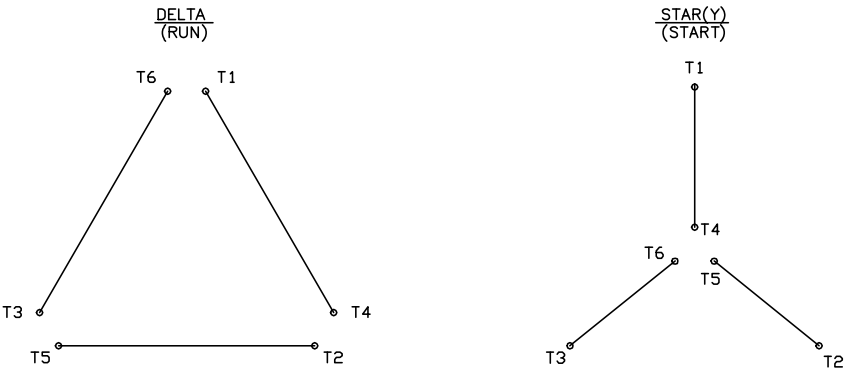
A44WG2659-R002
ISSUE DATE 05/14/02



416820-008

A-C MOTOR
CONNECTION DIAGRAM

STANDARD 6 LEAD Y START – DELTA RUN



(N. P. 1767-DC)

REV. DESC: ADDED T4 TO Y CONNECT DIAGRAM

REV. LTR: D

VERSION: 04

TDR: 000000847713

FILE: \RAG\00001\808

REVISED: 10: 41: 26 04/08/2014

BY: RAGJSS1

MTL: -

BALDOR

CONNECT DIAGRAM STD 6 LEAD Y START DELTA RUN

SH 1 of 1

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