

BALDOR • RELIANCE

Customer information packet

L3503

.5HP, 3450RPM, 1PH, 60HZ, 56, 3413L, TEFC, F1

Class - None

Division - Not Applicable

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Specifications

Enclosure	TEFC
Frame	56
Frame Material	Steel
Frequency	60.00 Hz
Haz Area Class and Group	None
Haz Area Division	Not Applicable
Motor Letter Type	Cap Start, Induction Run
Output @ Frequency	.500 HP @ 60 HZ
Phase	1
Synchronous Speed @ Frequency	3600 RPM @ 60 HZ
Voltage @ Frequency	115.0 V @ 60 HZ 230.0 V @ 60 HZ
Agency Approvals	UR CSA
Ambient Temperature	40 °C
Auxillary Box	No Auxillary Box
Auxillary Box Lead Termination	None
Base Indicator	Rigid
Bearing Grease Type	Polyrex EM (-20F +300F)
Blower	None
Current @ Voltage	3.500 A @ 230.0 V 4.100 A @ 208.0 V 7.000 A @ 115.0 V
Design Code	N
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	66.0 %
Electrically Isolated Bearing	Not Electrically Isolated
Feedback Device	NO FEEDBACK
Front Face Code	Standard
Front Shaft Indicator	None
Heater Indicator	No Heater

Part detail

Revision	W
Type	AC
Mech. spec.	34G929
Base	
Status	PRD/A
Elec. spec.	34WGX716
Layout	34LYG929
Eff. date	10-25-2024
CD Diagram	CD0001
Poles	02
Leads	6#18
Proprietary	False
Created date	01-01-0001

High Voltage Full Load Amps	3.5 a
Insulation Class	B
Inverter Code	Not Inverter
KVA Code	L
Lifting Lugs	No Lifting Lugs
Locked Bearing Indicator	No Locked Bearing
Motor Lead Exit	Ko Box
Motor Lead Quantity/Wire Size	6 @ 18 AWG
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	3413L
Mounting Arrangement	F1
Number of Poles	2
Overall Length	11.35 IN
Power Factor	72
Product Family	General Purpose
Pulley End Bearing Type	Ball
Pulley Face Code	Standard
Pulley Shaft Indicator	Standard
Rodent Screen	None
RoHS Status	ROHS COMPLIANT
Service Factor	1.25
Shaft Diameter	0.625 IN
Shaft Extension Location	Pulley End
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	No Slinger
Speed	3450 rpm
Speed Code	Single Speed
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

NP1256L									
CAT.NO.	L3503								
SPEC.	34G929X716								
HP	.5								
VOLTS	115/230								
AMP	7/3.5								
RPM	3450								
FRAME	56		HZ	60		PH	1		
SER.F.	1.25	CODE	L	DES	N	CLASS	B		
NEMA-NOM-EFF	66	PF	72						
RATING	40C AMB-CONT								
CC									
DE	6203		ODE	6203					
ENCL	TEFC	SN							
	SFA 8/4								

Accessories

Part number	Description	Multiplier
34-171	C FACE KIT	A8

AC Induction Motor Performance Data

Record # 7566

Typical performance - not guaranteed values

Winding: 34WGX716-R001		Type: 3413L		Enclosure: TEFC	
Nameplate Data			230 V, 60 Hz: High Voltage Connection		
Rated Output (HP)	.5		Full Load Torque	0.75 LB-FT	
Volts	115/230		Start Configuration	direct on line	
Full Load Amps	7/3.5		Breakdown Torque	2.3 LB-FT	
R.P.M.	3450		Pull-up Torque	2 LB-FT	
Hz	60	Phase	1	Locked-rotor Torque	2.2 LB-FT
NEMA Design Code	N	KVA Code	L	Starting Current	21 A
Service Factor (S.F.)	1.25		No-load Current	2.76 A	
NEMA Nom. Eff.	66	Power Factor	72	Line-line Res. @ 25°C	4.163 Ω A Ph 4.624 Ω B Ph
Rating - Duty	40C AMB-CONT		Temp. Rise @ Rated Load	67°C	
S.F. Amps	8/4		Temp. Rise @ S.F. Load	84°C	

Load Characteristics 230 V, 60 Hz, 0.5 HP

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	29	48	60	69	76	78	76
Efficiency	50.7	58.5	64.8	66.2	65.8	64.6	65.8
Speed	3548	3520	3489	3449	3405	3346	3405
Line amperes	2.78	2.88	3.13	3.5	3.95	4.64	3.95

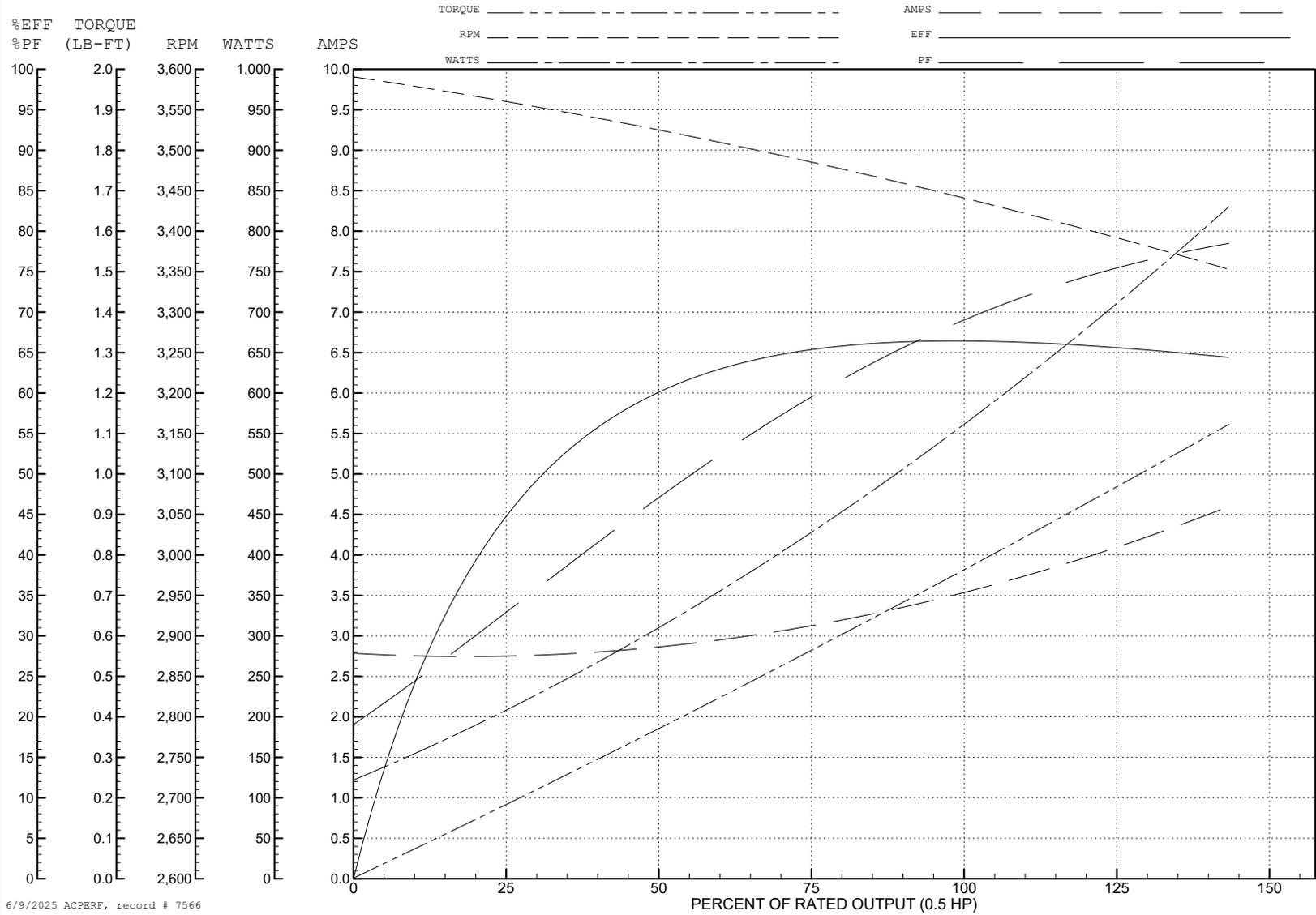
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WINDING # 34WGx716

Typical performance - not guaranteed values.

0.5 HP 1 PH 60 HZ 3450 RPM 230 V 3413L

TORQUES (LB-FT): PO=2.3 PU=2 LR=2.2 LRA=21



6/9/2025 ACPERP, record # 7566

AC Induction Motor Performance Data

Record # 95820

Typical performance - not guaranteed values

Winding: 34WGX716-R001		Type: 3413L		Enclosure: TEFC	
Nameplate Data			115 V, 60 Hz: Low Voltage Connection		
Rated Output (HP)	.5	Full Load Torque	0.75 LB-FT		
Volts	115/230	Start Configuration	direct on line		
Full Load Amps	7/3.5	Breakdown Torque	2.3 LB-FT		
R.P.M.	3450	Pull-up Torque	2 LB-FT		
Hz	60	Phase	1	Locked-rotor Torque	2.2 LB-FT
NEMA Design Code	N	KVA Code	L	Starting Current	42 A
Service Factor (S.F.)	1.25	No-load Current	5.52 A		
NEMA Nom. Eff.	66	Power Factor	72	Line-line Res. @ 25°C	1.01 Ω A Ph 4.65 Ω B Ph
Rating - Duty	40C	AMB-CONT	Temp. Rise @ Rated Load 67°C		
S.F. Amps	8/4	Temp. Rise @ S.F. Load 77°C			Locked-rotor Power Factor 90.1
			Rotor inertia 0.0121 lb-ft ²		

Load Characteristics 115 V, 60 Hz, 0.5 HP

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	29	48	60	69	76	78	76
Efficiency	51	58	65	66	66	64	66
Speed	3548	3520	3489	3449	3405	3346	3405
Line amperes	5.56	5.76	6.26	7	7.9	9.28	7.9

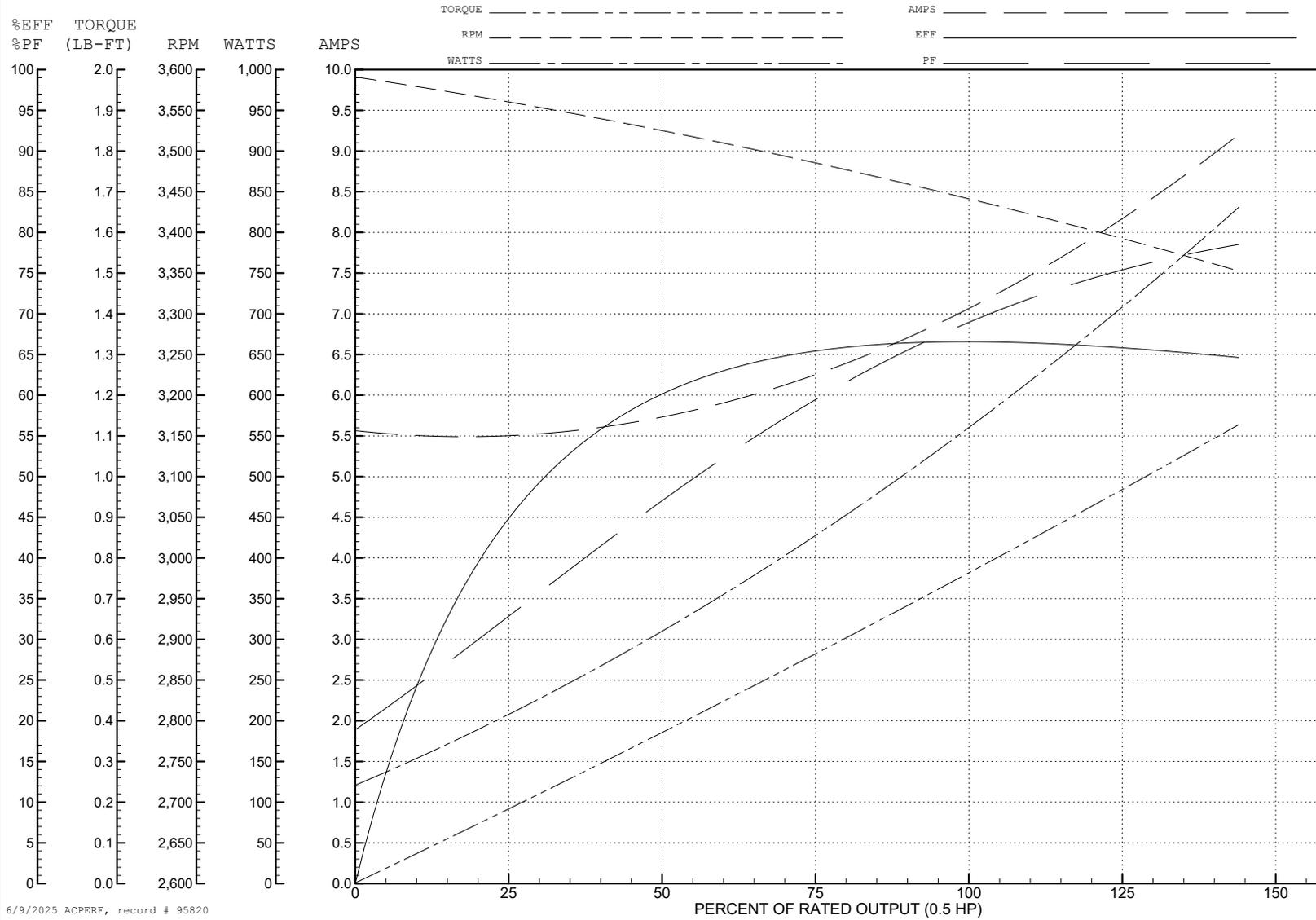
ABB Motors and Mechanical Inc.

WINDING # 34WGX716

Typical performance - not guaranteed values.

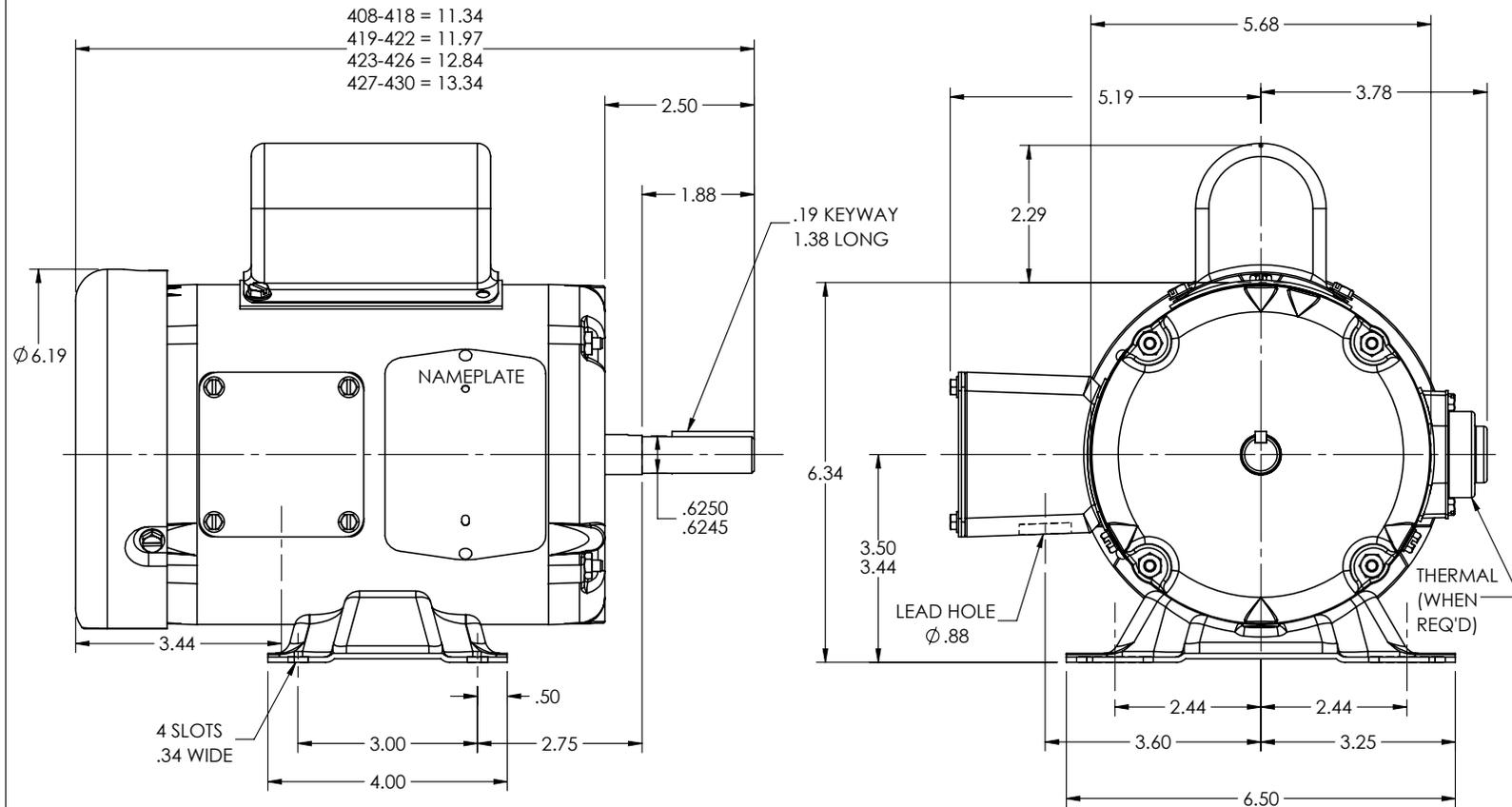
0.5 HP 1 PH 60 HZ 3450 RPM 115 V 3413L

TORQUES (LB-FT): PO=2.3 PU=2 LR=2.2 LRA=42



6/9/2025 ACPERF, record # 95820

34LYG929



CUSTOMER IS RESPONSIBLE FOR DETERMINING THAT THE PRODUCT WILL PERFORM SUITABLY IN THE INTENDED APPLICATION

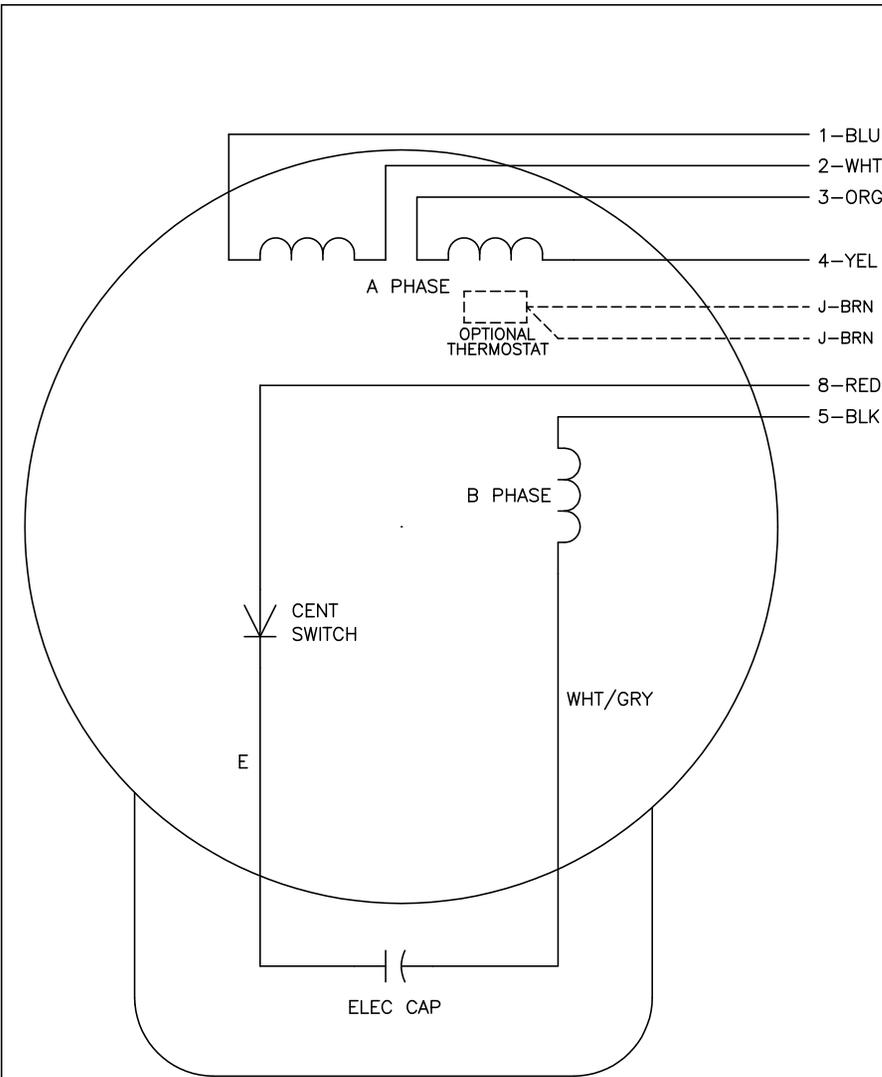
REV. DESC: LOAD TO SOLIDWORKS			
REV: C	VERSION: 03	REVISED: 09:59:22 08/31/2022	TDR: 000001194274
34LYG929	MODEL NO. 34LYG929	REF: -	
	BY: ENFRAJ0		

BALDOR - RELIANCE®

HORZ 34L NEMA 56 TEFC W/35 CAPAC BOX AND 3 PH ER

34LYG929

CD0001



	LINE A	LINE B	JOIN
HIGH STD	1	4,5	2,3,8
HIGH OPP	1	4,8	2,3,5
LOW STD	1,3,8	2,4,5	-
LOW OPP	1,3,5	2,4,8	-

NOTES:

1. STANDARD ROTATION IS CCW FACING END OPPOSITE SHAFT EXTENSION.
2. OPTIONAL THERMOSTAT IS PROVIDED WHEN SPECIFIED.
3. MULTIPLE CAPACITORS ARE CONNECTED IN PARALLEL UNLESS OTHERWISE SPECIFIED.
4. LEAD COLORS ARE OPTIONAL. LEADS MUST ALWAYS BE NUMBERED AS SHOWN.

REV. DESC: REVISE TO SHOW OPTIONAL COLORS			
REV. LTR: D	BY: JLP	REVISED: 04/08/99 1:16	TDR: 0178636
100000		FILE: AAA00007405	MDL: -
		MTL: -	

BALDOR ELECTRIC Co.

TYPE L, DV, REV, 6 LEADS

CD0001