

**BALDOR® • RELIANCE** 

**Product Information Packet**

**CDM3538**

**.5HP, 1725RPM, 3PH, 60HZ, 56C, 3420M, TEFC, F1**

Part Detail							
Revision:	F	Status:	PRD/A	Change #:		Proprietary:	No
Type:	AC	Elec. Spec:	34WG0097	CD Diagram:	CD0005	Mfg Plant:	
Mech. Spec:	34M811	Layout:	34LYM811	Poles:	04	Created Date:	04-20-2016
Base:	RG	Eff. Date:	10-24-2019	Leads:	9#18		

Specs			
Catalog Number:	CDM3538	Heater Indicator:	No Heater
Enclosure:	TEFC	Insulation Class:	F
Frame:	56C	Inverter Code:	Inverter Duty
Frame Material:	Steel	KVA Code:	M
Output @ Frequency:	.500 HP @ 60 HZ	Lifting Lugs:	No Lifting Lugs
Synchronous Speed @ Frequency:	1800 RPM @ 60 HZ	Locked Bearing Indicator:	Locked Bearing
Voltage @ Frequency:	460.0 V @ 60 HZ	Motor Lead Quantity/Wire Size:	9 @ 18 AWG
	230.0 V @ 60 HZ	Motor Lead Exit:	Ko Box
XP Class and Group:	None	Motor Lead Termination:	Flying Leads
XP Division:	Not Applicable	Motor Type:	3420M
Agency Approvals:	UR	Mounting Arrangement:	F1
	CSA EEV	Power Factor:	69
	CCSA US	Product Family:	Dirty Duty Plus
Auxillary Box:	No Auxillary Box	Pulley End Bearing Type:	Sealed Bearing
Auxillary Box Lead Termination:	None	Pulley Face Code:	C-Face
Base Indicator:	Rigid	Pulley Shaft Indicator:	Standard
Bearing Grease Type:	Polyrex EM (-20F +300F)	Rodent Screen:	None
Blower:	None	RoHS Status:	ROHS COMPLIANT

<b>Constant Torque Speed Range:</b>	6	<b>Shaft Extension Location:</b>	Pulley End
<b>Current @ Voltage:</b>	.900 A @ 460.0 V	<b>Shaft Ground Indicator:</b>	No Shaft Grounding
	1.600 A @ 208.0 V	<b>Shaft Rotation:</b>	Reversible
	1.800 A @ 230.0 V	<b>Shaft Slinger Indicator:</b>	No Slinger
<b>Design Code:</b>	B	<b>Speed Code:</b>	Single Speed
<b>Drip Cover:</b>	No Drip Cover	<b>Motor Standards:</b>	NEMA
<b>Duty Rating:</b>	CONT	<b>Starting Method:</b>	Direct on line
<b>Electrically Isolated Bearing:</b>	Not Electrically Isolated	<b>Thermal Device - Bearing:</b>	None
<b>Feedback Device:</b>	NO FEEDBACK	<b>Thermal Device - Winding:</b>	None
<b>Front Face Code:</b>	Standard	<b>Vibration Sensor Indicator:</b>	No Vibration Sensor
<b>Front Shaft Indicator:</b>	None	<b>Winding Thermal 1:</b>	None
		<b>Winding Thermal 2:</b>	None

Nameplate NP3556E												
CAT NO	CDM3538											
SPEC.	34M811-0097G1						ENCL	TEFC				
FRAME	56C			HP	.5							
VOLTS	230/460 SFA 2/1											
FLA	1.8/.9				I.P.	56						
RPM	1725			RPM MAX	2700							
HZ	60			PH	3		CLASS	F				
SER.F.	1.25			DES	B		CC					
NEMA-NOM-EFF	75.5											
RATING	40C AMB-CONT											
DE BRG	6203			ODE BRG	6203							
GREASE	POLYREX EM											
C HP FR	60			C HP TO	90							
CT HZ FROM	6			CT HZ TO	60							
SER.NO												
	50C AT 1.0 SF											
							VT HZ FROM	6		VT HZ TO	60	

Parts List		
Part Number	Description	Quantity
SA320621	SA 34M811-0097G1	1.000 EA
RA308352	RA 34M811-0097G1	1.000 EA
NS2512A01	INSULATOR, CONDUIT BOX X	1.000 EA
34CB1000A01E	CONDUIT BOX, WASHDOWN, W/E-COATED	1.000 EA
34GS1017	GASKET, CONDUIT BOX MODEL 34 (BLACK NEOP	1.000 EA
51XB1016A07	10-16 X 7/16 HXWSSLD SERTYB	2.000 EA
11XW1032G06	10-32 X .38, TAPTITE II, HEX WSHR SLTD U	1.000 EA
34EP1100A137LP2	FRONT EP TEFC 203 BRG W/ SEAL	1.000 EA
HW4601A23	INPRO SEAL, 203 BRG, VBX	1.000 EA
HW4500A33	1/8 NPT STAINLESS,HOLO-KROME #13002,PRES	3.000 EA
HA4054	SHORT T-DRAIN FITTING, .125" N.P.T.	1.000 EA
HW5100A03	WAVY WASHER (W1543-017)	1.000 EA
34EP1300A35E	ENDPLATE, MACH W/E-COAT	1.000 EA
HW4606A01	JM CLIPPER/SEAL (WDE-0667-1064-BH49)	1.000 EA
HW4500A33	1/8 NPT STAINLESS,HOLO-KROME #13002,PRES	3.000 EA
HA4054	SHORT T-DRAIN FITTING, .125" N.P.T.	1.000 EA
12XN1032S20	10-32 X 1-1/4 HEX M.S. , STAINLESS STEEL	2.000 EA
34FN3002A01SP	EXTERNAL FAN, PLASTIC, .637/.639 HUB W/	1.000 EA
34FH4002A01LP2	IEC FH NO GREASER	1.000 EA
11XW1032S06	10-32 X .38, TAPTITE II, HEX WSHR SLTD U	3.000 EA
34CB4500E	CONDUIT BOX LID, E-COAT	1.000 EA
34GS1007	GASKET, CONDUIT BOX LID MODEL 34 (BLACK	1.000 EA
59XW0832S07	TAPTITE II,HEX WSHR UNSLTD SER,410 S.S.,	4.000 EA
HW2502D13	SS KEY, 3/16 SQ X 1.375	1.000 EA

Parts List (continued)		
Part Number	Description	Quantity
HA7000A04	KEY RETAINER 0.625 DIA SHAFTS	1.000 EA
MJ5001A02	732 CL SEALANT 3 OZ DIXIE BEARING 289100	0.001 EA
LB1164	LABEL,WARNING AND DRAIN	1.000 EA
MJ5001A23	P.D. GEORGE B-276 AIR DRY VARNISH	0.001 GA
LB1000	LABEL, DIRTY DUTY	1.000 EA
HW3001B01	BRASS CUP WASHER, FOR #10 SCREW	1.000 EA
WD1000D21	TRM,T&B #B71M,RING,18-14,.25,NON-INSL	9.000 EA
85XU0407S04	4X1/4 U DRIVE PIN STAINLESS	2.000 EA
MG2000A17	RUST INHIBITOR PART # SRPO #20	0.001 GA
MG1025L01	WILKOFAS FD, 786.04, BLACK	0.014 GA
MG1500Y02	WILKOPON PRIMER YELLOW	0.014 GA
HA3100S08	THRUBOLT 7.375LG SS	4.000 EA
MN416A01	TAG-INSTAL-MAINT no wire (1200/bx) 3/19	1.000 EA
LC0005	CONN.DIA.,TY M,9-LD,DUAL VOLT,REVERSING	1.000 EA
NP3556E	SS DIRTY DUTY PLUS INV UL CSA-C US EEV C	1.000 EA
35PA1000	PKG GRP, PRINT PK1008A06	1.000 EA

**AC Induction Motor Performance Data**

Record # 55809

Typical performance - not guaranteed values

Winding: 34WG0097-R039			Type: 3420M			Enclosure: TEFC		
<b>Nameplate Data</b>				<b>460 V, 60 Hz: High Voltage Connection</b>				
Rated Output (HP)	.5		Full Load Torque	1.5 LB-FT				
Volts	230/460		Start Configuration	direct on line				
Full Load Amps	1.8/.9		Breakdown Torque	6.8 LB-FT				
R.P.M.	1725		Pull-up Torque	4.6 LB-FT				
Hz	60 Phase	3	Locked-rotor Torque	5.8 LB-FT				
NEMA Design Code	B	KVA Code	M	Starting Current	7 A			
Service Factor (S.F.)	1.25		No-load Current	0.54 A				
NEMA Nom. Eff.	75.5	Power Factor	69	Line-line Res. @ 25°C	27.5 Ω			
Rating - Duty	40C AMB-CONT		Temp. Rise @ Rated Load	45°C				
S.F. Amps	2/1		Temp. Rise @ S.F. Load	54°C				
			Locked-rotor Power Factor	56.3				
			Rotor inertia	0.0476 LB-FT <sup>2</sup>				

**Load Characteristics 460 V, 60 Hz, 0.5 HP**

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	36	53	64	71	77	84	77
Efficiency	55	69	74.4	78	75.7	74.4	75.7
Speed	1787	1774	1760	1749	1728	1717	1728
Line amperes	0.6	0.65	0.74	0.84	1	1.1	1

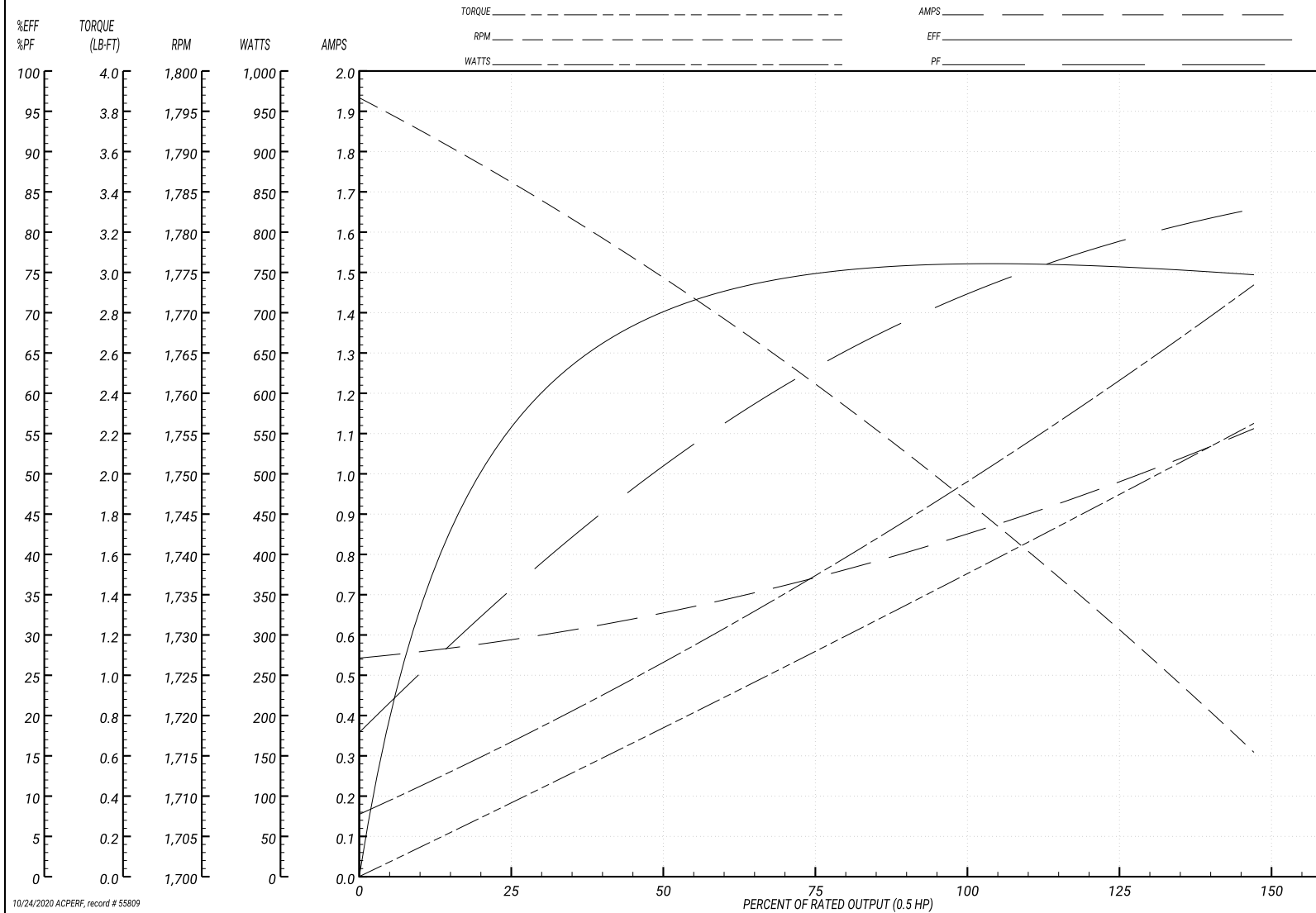
Performance Graph at 460V, 60Hz, 0.5HP Typical performance - Not guaranteed values

ABB Motors and Mechanical Inc.

WINDING # 34WG0097

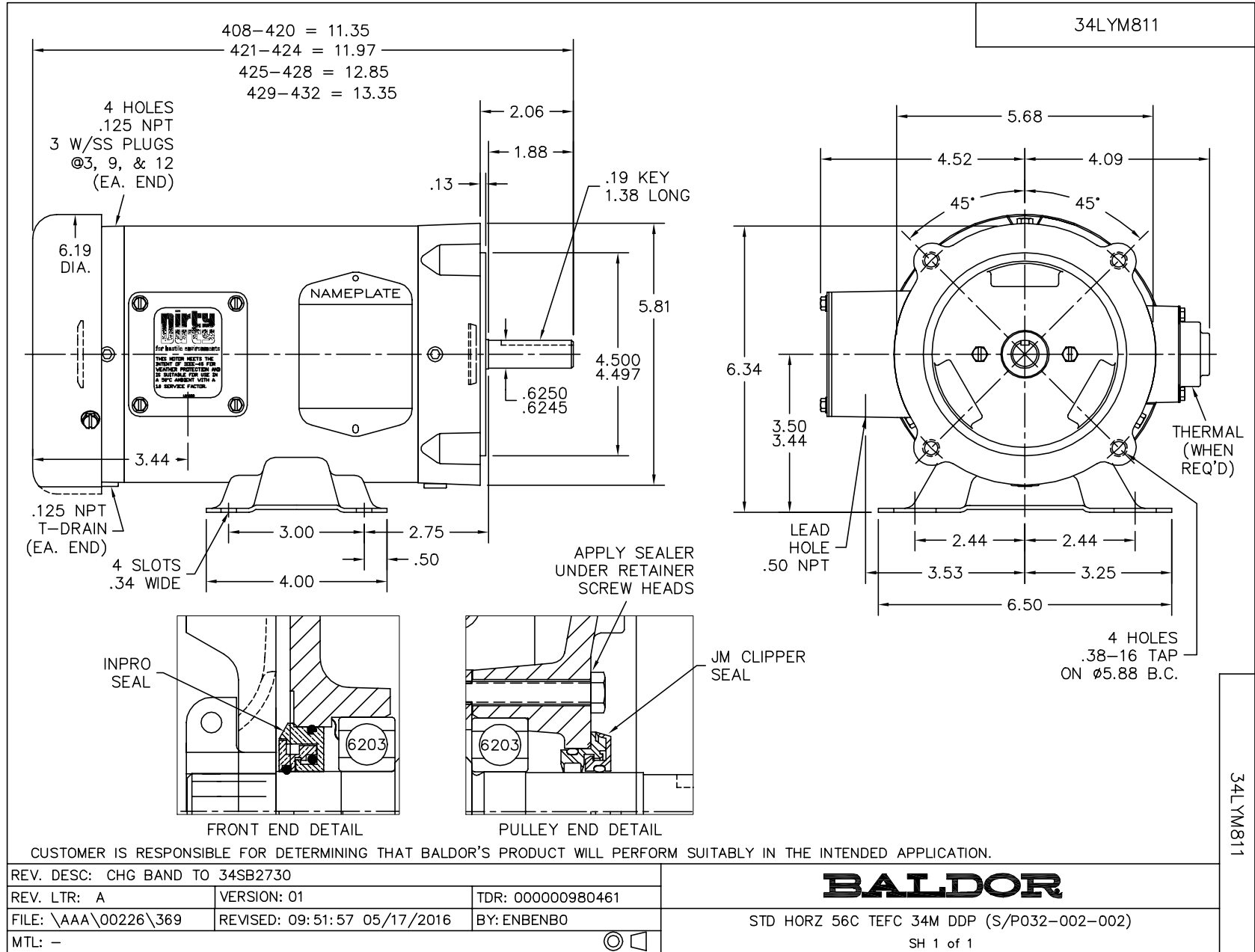
Typical performance - not guaranteed values.

0.5 HP 3 PH 60 HZ 1725 RPM 460 V 3420M  
 TORQUES(LB-FT): PO=6.8 PU=4.6 LR=5.8 LRA=7



10/24/2020 ACPERF, record # 55809





CD0005



LOW VOLTAGE  
(2Y)



LINE

HIGH VOLTAGE  
(1Y)



LINE

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.

REV. DESC: REVISE TO SHOW OPTIONAL COLORS			
REV. LTR: E	BY: JLP	REVISED: 01/19/99 10:15	TDR: 0171435
90000		FILE: AAA00005140	MDL: -
		MTL: -	

**BALDOR ELECTRIC Co.**

3PH, DV, 9 LEADS

CD0005