

**BALDOR® • RELIANCE** 

**Product Information Packet**

**VBM3538**

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

Part Detail							
Revision:	AG	Status:	PRD/A	Change #:		Proprietary:	No
Type:	AC	Elec. Spec:	34WG0097	CD Diagram:	CD0005	Mfg Plant:	
Mech. Spec:	34K045	Layout:	34LYK045	Poles:	04	Created Date:	
Base:	N	Eff. Date:	10-12-2019	Leads:	9#18		

Specs			
Catalog Number:	VBM3538	Insulation Class:	B
Enclosure:	TENV	Inverter Code:	Not Inverter
Frame:	56C	KVA Code:	K
Frame Material:	Steel	Lifting Lugs:	No Lifting Lugs
Output @ Frequency:	.500 HP @ 60 HZ	Locked Bearing Indicator:	Locked Bearing
Synchronous Speed @ Frequency:	1800 RPM @ 60 HZ	Motor Lead Quantity/Wire Size:	9 @ 18 AWG
Voltage @ Frequency:	208.0 V @ 60 HZ	Motor Lead Exit:	Ko Box
	230.0 V @ 60 HZ	Motor Lead Termination:	Flying Leads
	460.0 V @ 60 HZ	Motor Type:	3420M
XP Class and Group:	None	Mounting Arrangement:	F1
XP Division:	Not Applicable	Power Factor:	69
Agency Approvals:	UR	Product Family:	General Purpose
	CSA	Product Type:	BRAKE MOTOR
Auxillary Box:	No Auxillary Box	Pulley End Bearing Type:	Ball
Auxillary Box Lead Termination:	None	Pulley Face Code:	C-Face
Base Indicator:	No Mounting	Pulley Shaft Indicator:	Standard
Bearing Grease Type:	Polyrex EM (-20F +300F)	Rodent Screen:	None
Blower:	None	RoHS Status:	ROHS COMPLIANT

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

Nameplate NP1256L										
CAT.NO.	VBM3538									
SPEC.	34K45-97-B									
HP	.5									
VOLTS	208-230/460									
AMP	1.9-1.8/.9									
RPM	1725									
FRAME	56C				HZ	60			PH	3
SER.F.	1.00		CODE	K	DES	B		CLASS	B	
NEMA-NOM-EFF	75.5		PF	69						
RATING	40C AMB-CONT									
CC									USABLE AT 208V	1.9
DE	6203				ODE	6203				
ENCL	TENV		SN							

Parts List		
Part Number	Description	Quantity
SA008186	SA 34K45-97-B	1.000 EA
RA004633	RA 34K45-97-B	1.000 EA
NS2512A01	INSULATOR, CONDUIT BOX X	1.000 EA
34CB3002A	CB CAST W/.88 DIA HOLE	1.000 EA
34GS1029A01	GASKET, CONDUIT BOX	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
34EP3900T09	FR ENDPLATE, MACH	1.000 EA
HW5100A03	WAVY WASHER (W1543-017)	1.000 EA
34EP3300A24SP	PU ENDPLATE, MACH	1.000 EA
51XN1032A20	10-32 X 1 1/4 HX WS SL SR	2.000 EA
18XN2520A12	1/4-20 X 3/4",FL HD SL ZN	2.000 EA
HW2500A13	KEY, USA #605, WOODRUFF	1.000 EA
34CB4517	CB LID 4 MTG HOLES .22 DIA STAMPED, FOR	1.000 EA
34GS1031A01	GASKET, FLAT CONDUIT BOX LID (LEXIDE)	1.000 EA
51XW0832A07	8-32 X .44, TAPTITE II, HEX WSHR SLTD SE	4.000 EA
HW2501D13	KEY, 3/16 SQ X 1.375	1.000 EA
HA7000A04	KEY RETAINER 0.625 DIA SHAFTS	1.000 EA
MG1000G27	MED CHARCOAL METALLIC GREY 400-0096	0.014 GA
85XU0407S04	4X1/4 U DRIVE PIN STAINLESS	2.000 EA
LB1185	LABEL,BRAKE CONNECTION (ON ROLLS)	1.000 EA
MJ5004A05	#242-21 LOCTITE GENERAL PURPOSE MED. STR	0.001 EA
HA3100A44	THRUBOLT 10-32 X 8.000	4.000 EA
48BK6101BP-	1-048-161-01-BP- BRAKE	1.000 EA

<b>Parts List (continued)</b>		
<b>Part Number</b>	<b>Description</b>	<b>Quantity</b>
WD4006C05	ORANGE, WIRENUT, G-B #13-003 ORGSIZE 73B	3.000 EA
LC0005E01	CONN.DIA./WARNING LABEL (LC0005/LB1119N)	1.000 EA
NP1256L	ALUM UL CSA CC INDUSTRIAL MOTOR A60	1.000 EA
27PA1001	PKG GRP, PRINT PK1027A06	1.000 EA
PK3083	STYROFOAM PACKING CRADLE	1.000 EA
PK3088	MICROFOAM, 8"X"8 PERF. SHEETS 5,400/RL	1.000 EA
MN416A01	TAG-INSTAL-MAINT no wire (1200/bx) 3/19	1.000 EA

**AC Induction Motor Performance Data**

Record # 6542 - Typical performance - not guaranteed values

<b>Winding:</b> 34WG0097-R001	<b>Type:</b> 3420M	<b>Enclosure:</b> TENV
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Nameplate Data				460 V, 60 Hz: High Voltage Connection	
Rated Output (HP)	.5			Full Load Torque	1.5 LB-FT
Volts	208-230/460			Start Configuration	direct on line
Full Load Amps	1.9-1.8/.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	K	Starting Current	7 A
Service Factor (S.F.)	1			No-load Current	0.54 A
NEMA Nom. Eff.	75.5	Power Factor	69	Line-line Res. @ 25°C	27.56 Ω
Rating - Duty	40C AMB-CONT			Temp. Rise @ Rated Load	57°C

Load Characteristics 460 V, 60 Hz, 0.5 HP

% of Rated Load	25	50	75	100	125	150
Power Factor	38	53	65	71	75	81
Efficiency	55	69	74	78	75.5	74.4
Speed	1787	1774	1760	1749	1728	1717
Line amperes	0.6	0.65	0.74	0.84	1	1.1

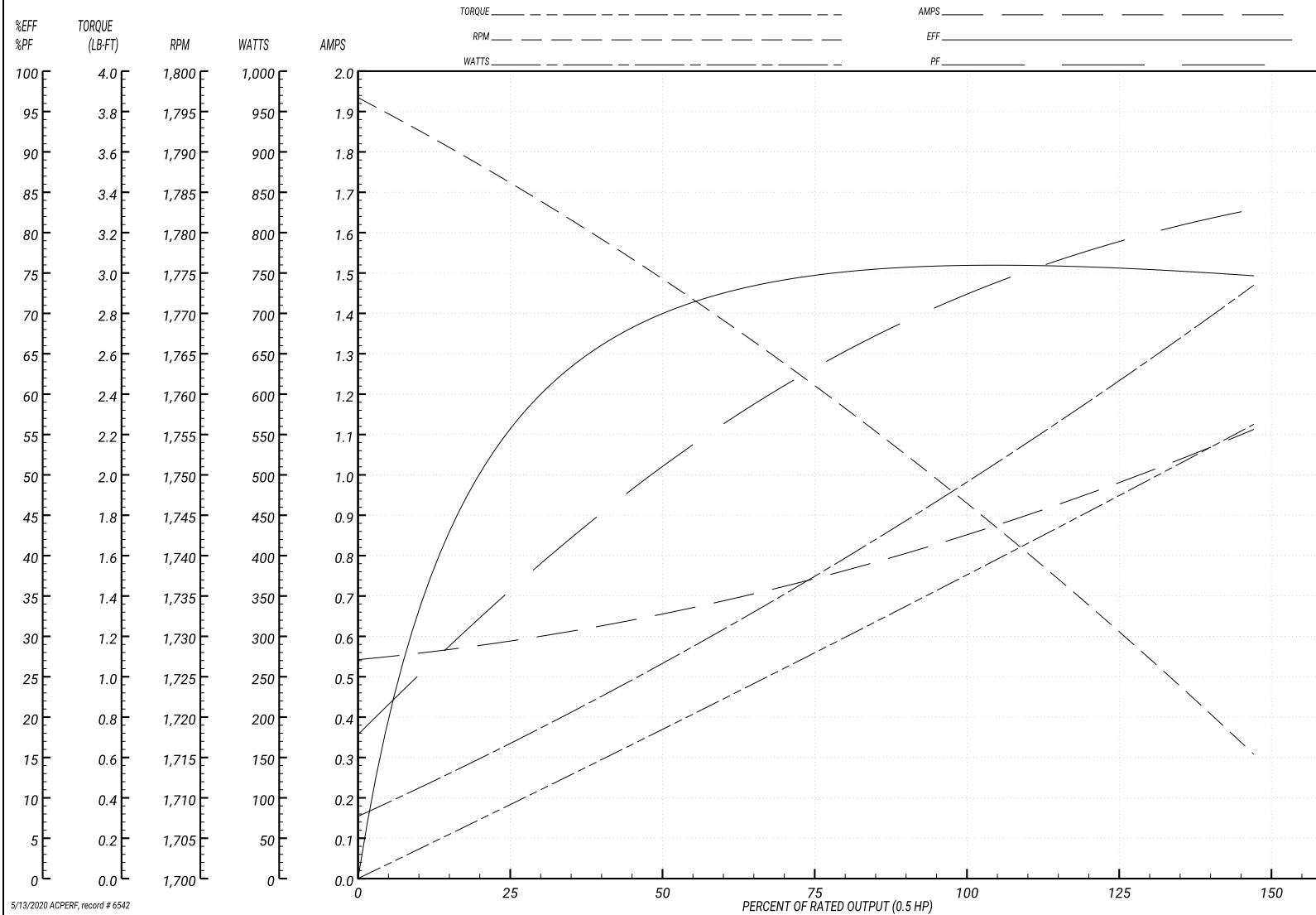
Performance Graph at 460V, 60Hz, 0.5HP Typical performance - Not guaranteed values

ABB Motors and Mechanical Inc.

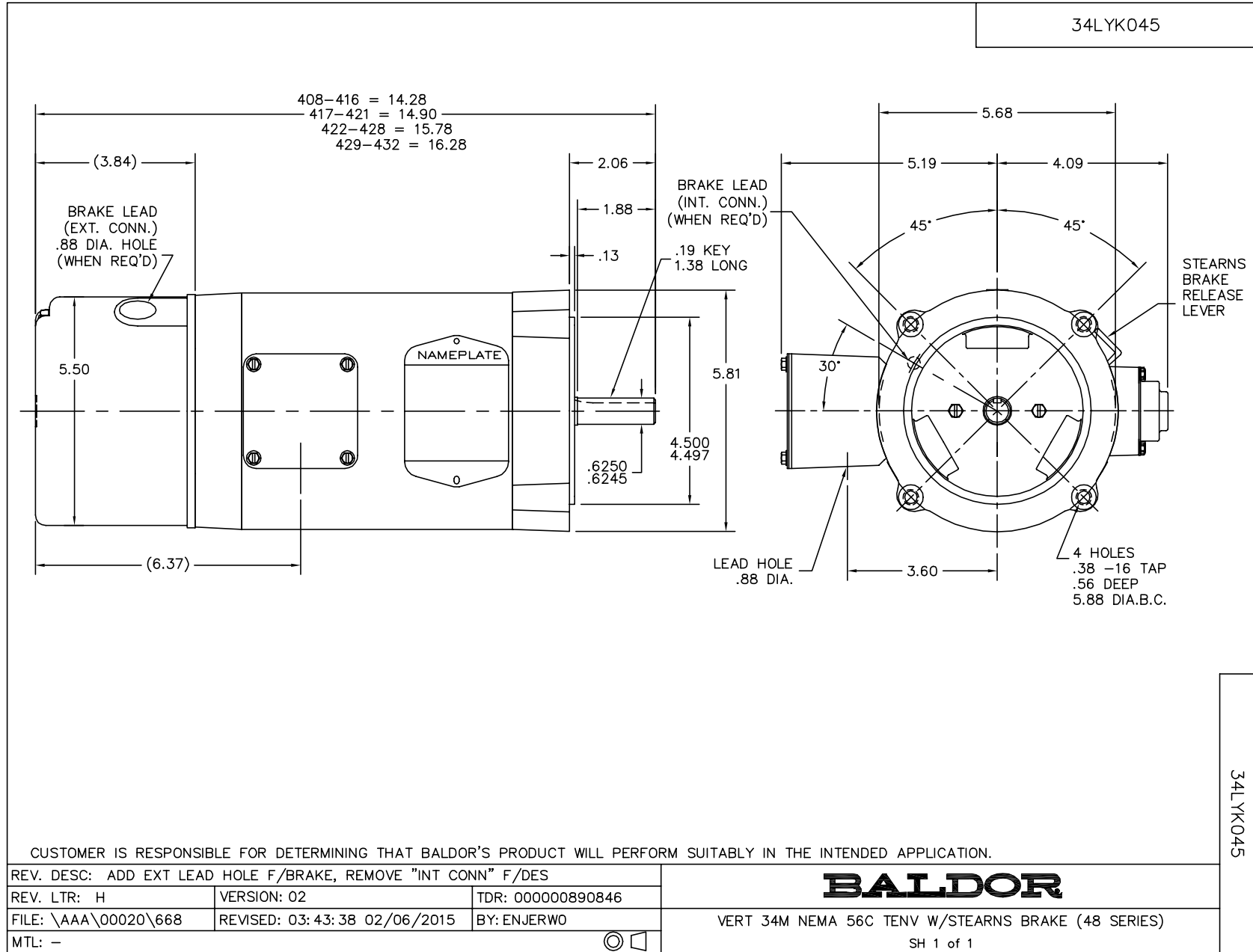
WINDING # 34WG0097

Typical performance - not guaranteed values.

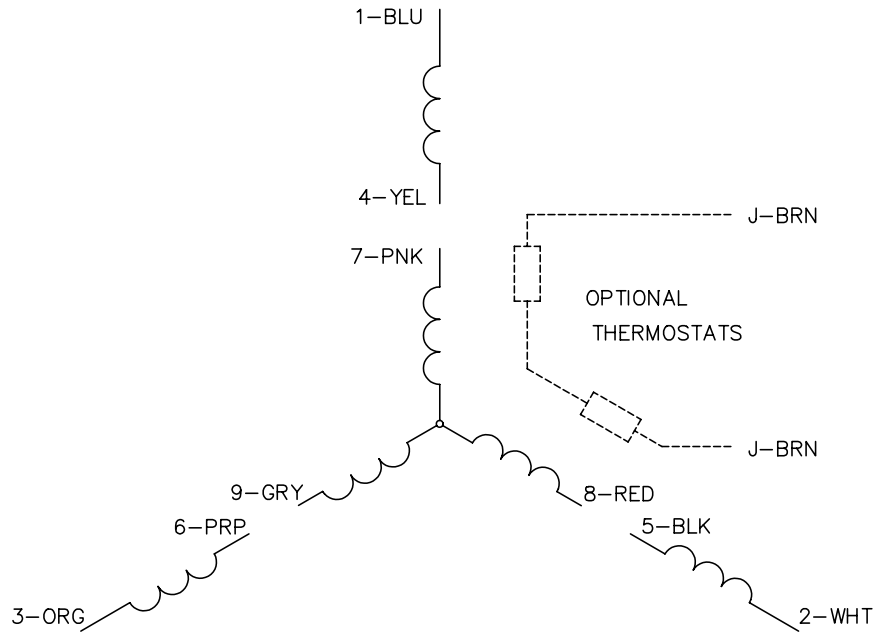
0.5 HP 3 PH 60 HZ 1725 RPM 460 V 3420M  
 TORQUES(LB-FT): PO=6.8 PU=4.6 LR=5.8 LRA=7



5/13/2020 ACPERF, record # 6542



CD0005

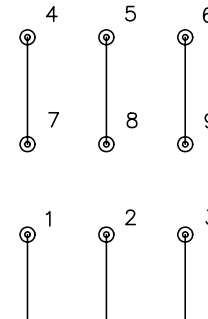


LOW VOLTAGE  
(2Y)



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