

ABB BALDOR RELIANCE III

Customer information packet

VEBM3615T-5D

5HP, 1750RPM, 3PH, 60HZ, 184TC, 3640M, TEFC, F1

Class - None

Division - Not Applicable

Specifications

Enclosure	TEFC
Frame	184TC
Frame Material	Steel
Frequency	60.00 Hz
Haz Area Class and Group	None
Haz Area Division	Not Applicable
Motor Letter Type	Three Phase
Output @ Frequency	5.000 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	1800 RPM @ 60 HZ
Voltage @ Frequency	575.0 V @ 60 HZ
Agency Approvals	UR CE CSA
Ambient Temperature	40 °C
Auxiliary Box	NO AUXILLARY BOX
Auxiliary Box Lead Termination	None
Base Indicator	No Mounting
Bearing Grease Type	Polyrex EM (-20F +300F)
Blower	None
Brake Torque	15.0 lb-ft
Current @ Voltage	5.200 A @ 575.0 V
Design Code	B
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	89.5 %
Electrically Isolated Bearing	Not Electrically Isolated
Feedback Device	NO FEEDBACK
Front Face Code	Fan Housing Cover For Brake
Front Shaft Indicator	None
Heater Indicator	No Heater
High Voltage Full Load Amps	5.2 a

Part Detail

Revision	R
Type	AC
Mech. spec.	36M111
Base	
Status	PRD/A
Elec. spec.	36WGY461
Layout	36LYM111
Eff. date	07-18-2026
CD Diagram	CD0006
Poles	04
Leads	3#16
Proprietary	False
Created date	05-20-2010

Insulation Class	F
Inverter Code	Inverter Ready
KVA Code	J
Lifting Lugs	Standard Lifting Lugs
Locked Bearing Indicator	Locked Bearing
Motor Lead Exit	Ko Box
Motor Lead Quantity/Wire Size	3 @ 16 AWG
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	3640M
Mounting Arrangement	F1
Number of Poles	4
Overall Length	23.14 IN
Power Factor	82
Product Family	General Purpose
Pulley End Bearing Type	Ball
Pulley Face Code	C-Face
Pulley Shaft Indicator	Standard
Rodent Screen	None
Service Factor	1.15
Shaft Diameter	1.125 IN
Shaft Extension Location	Pulley End
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	No Slinger
Speed	1750 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

NP4304L									
CAT.NO.	VEBM3615T-5D								
SPEC.	36M111Y461G1								
HP	5/3.7KW					PH	3		
VOLTS	575								
AMPS	5.2								
R.P.M. (1/MIN)	1750					WT.	53		KG
FRAME	184TC		HZ	60		I.P.	44		
SER.F.	1.15	CODE	J	DES.	B	CLASS	F		
NOM.EFF.	89.5		% (100%)						
P.F.	82								
RATING	40C AMB-CONT				CC	010A			
DE	6206		ODE	6205					
ENCL	TEFC	SN							
	IE3 90.5 (75%) 89.8 (50%)								
	53KG IC411								

AC Induction Motor Performance Data

Record # 15184

Typical performance - not guaranteed values

Winding: 36WGY461-R001			Type: 3640M		Enclosure: TEFC		
Nameplate Data			575 V, 60 Hz: Single Voltage Motor				
Rated Output (HP)		5	Full Load Torque		15 LB-FT		
Volts		575	Start Configuration		direct on line		
Full Load Amps		5.2	Breakdown Torque		52 LB-FT		
R.P.M.		1750	Pull-up Torque		30 LB-FT		
Hz	60	Phase	3	Locked-rotor Torque		32 LB-FT	
NEMA Design Code		B	KVA Code	J	Starting Current		38 A
Service Factor (S.F.)		1.15	No-load Current		2.6 A		
NEMA Nom. Eff.		89.5	Power Factor	82	Line-line Res. @ 25°C		4.15 Ω
Rating - Duty		40C AMB-CONT		Temp. Rise @ Rated Load		64°C	
S.F. Amps				Temp. Rise @ S.F. Load		79°C	
				Locked-rotor Power Factor		54	
				Rotor inertia		0.372 LB-FT2	

Load Characteristics 575 V, 60 Hz, 5 HP

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	38	61	73	81	84	86	83
Efficiency	85	89.8	90.5	90	88.8	87.3	89.3
Speed	1786	1773	1761	1747	1732	1715	1738
Line amperes	2.8	3.4	4.2	5.2	6.1	7.2	5.74

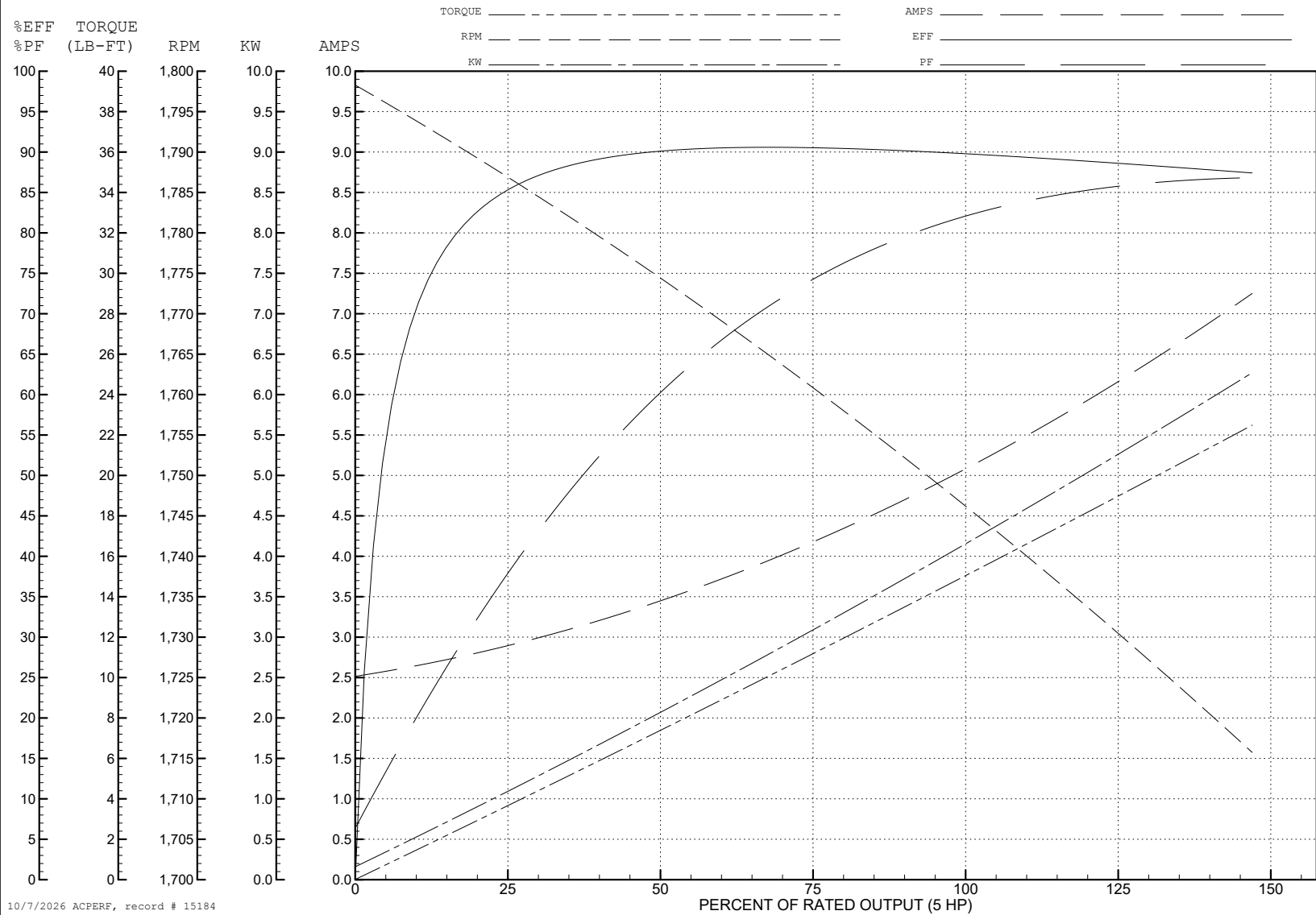
ABB Motors and Mechanical Inc.

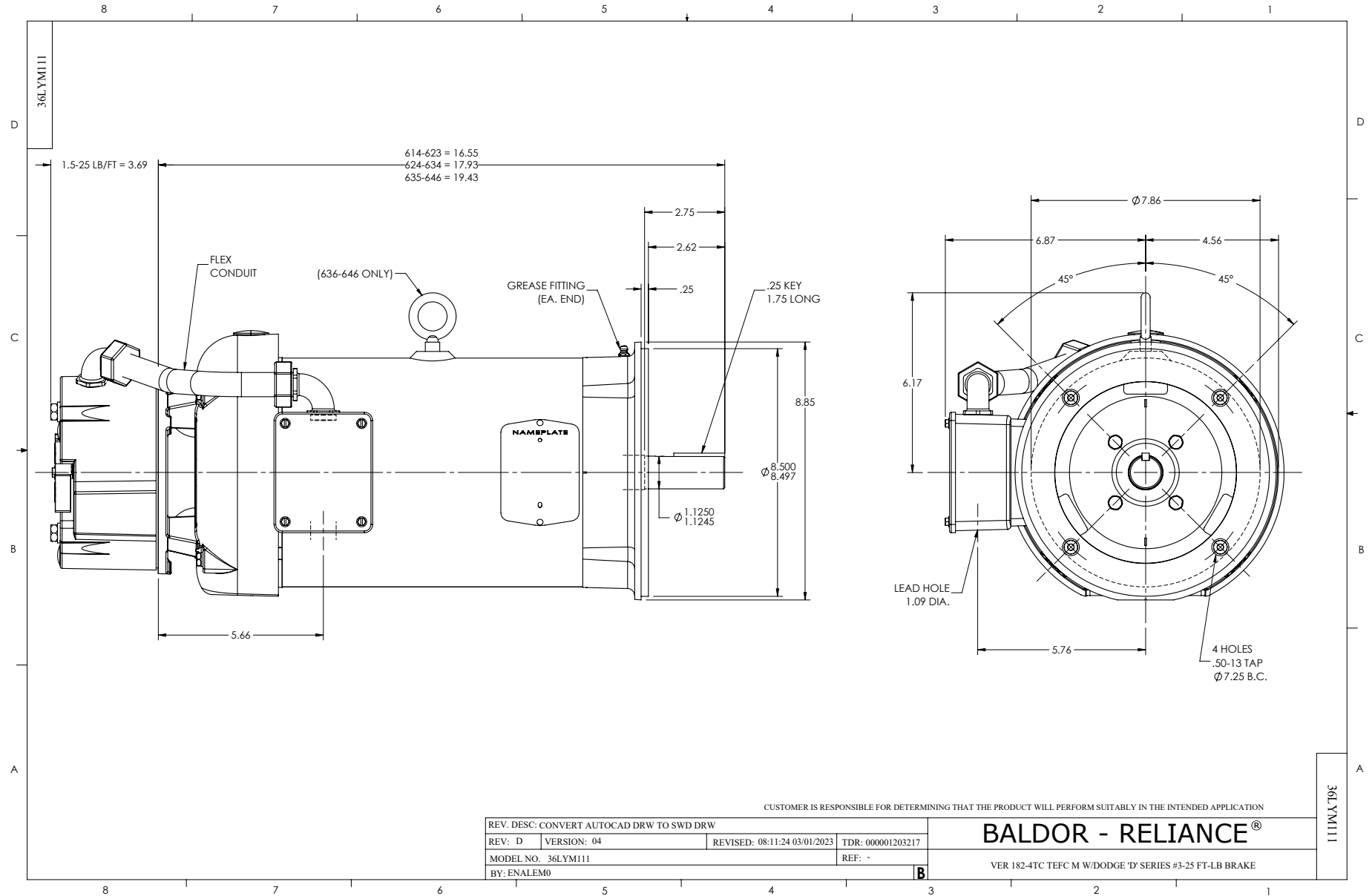
WINDING # 36WGY461

Typical performance - not guaranteed values.

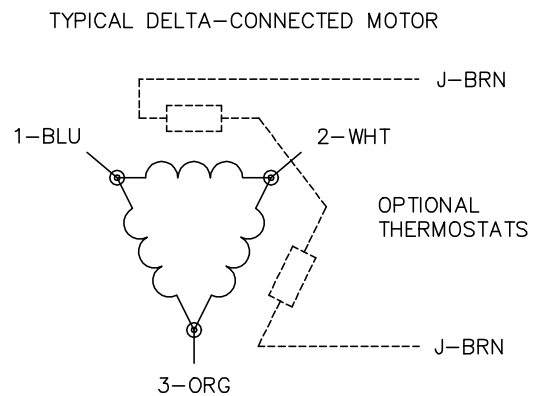
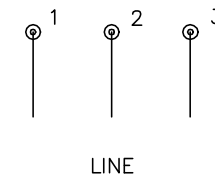
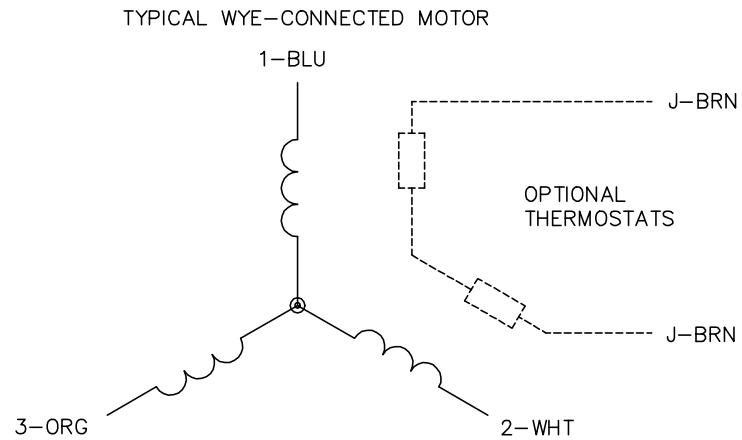
5 HP 3 PH 60 HZ 1750 RPM 575 V 3640M

TORQUES (LB-FT) : PO=52 PU=30 LR=32 LRA=38





CD0006


NOTES:

1. THREE LEAD MOTOR MAY BE EITHER WYE CONNECTED OR DELTA CONNECTED.
2. INTERCHANGE ANY TWO LINE LEADS TO REVERSE ROTATION.
3. OPTIONAL THERMOSTATS ARE PROVIDED WHEN SPECIFIED.
4. ACTUAL NUMBER OF INTERNAL PARALLEL CIRCUITS MAY VARY.
5. LEAD COLORS ARE OPTIONAL. LEADS MUST BE NUMBERED AS SHOWN.

CD0006

REV. DESC: ADD CLASS CONN00000007

REV. LTR: E

VERSION: 01

TDR: 000001099922

FILE: \AAA\00005\141

REVISED: 10: 24: 49 02/19/2019

BY: ENBRIRO

MTL: -


BALDOR - RELIANCE®

3PH, SV, 3 LEADS, WYE OR DELTA CONNECTED

SH 1 of 1

CD2120

WIRING CONNECTIONS (1 PHASE VAC)

	POWER LINE A	POWER LINE B	CAP TOGETHER	CAP ALONE
AC LOW VOLT.	B1	B2	B3 & B5	B4
AC HIGH VOLT.	B1 & B5	B2	---	B3 CAP ALONE B4 CAP ALONE
DC VOLT.	B1	B2	B3 & B5	B4

B1 WHITE
 B2 BLACK
 B3 GRAY
 B4 BLUE
 B5 RED

CD2120

REV. DESC: NEW

REV. LTR: -

VERSION: 00

TDR: 000000741785

FILE: \CKA\00037\282

REVISED: 12: 28: 11 04/12/2012

MTL: -

BY: CKRONSO

BALDOR • DODGE • RELIANCE

D-SERIES MOTOR BRAKE 5LD AC\DC

SH 1 of 1