ABB BALDOR RELIANCE

Customer information packet

VEM3661T-5

3HP, 1755RPM, 3PH, 60HZ, 182TC, 0632M, TEFC, F1
Class - None
Division - Not Applicable

Copyright © All product information within this document is subject to ABB Motors and Mechanical Inc. copyright © protection, unless otherwise noted.
11/5/2026 12:49:00 PM

Specifications

Enclosure	TEFC
Frame	182TC
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	3.000 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	1800 RPM @ 60 HZ
Voltage @ Frequency	575.0 V @ 60 HZ
Agency Approvals	NEMA PREMIUM CURUSEEV NEMA PREMIUM (OLD LOGO)
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
Current @ Voltage	3.300 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	Standard
Front Shaft Indicator	None
Heater Indicator	No Heater
High Voltage Full Load Amps	3.3 a
Insulation Class	F

Part Detail

Revision	P
Type	AC
Mech. spec.	06H016
Base	
Status	PRD/A
Elec. spec.	06WGX319
Layout	06LYH016
Eff. date	06-09-2025
CD Diagram	CD0006
Poles	04
Leads	3#16
Proprietary	False
Created date	10-10-2011

Inverter Code	Inverter Ready
IP Rating	NONE
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	0632M
Mounting Arrangement	F1
Number of Poles	4
Overall Length	15.98 IN
Power Factor	77
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	1755 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

NP3441L									
CAT.NO.	VEM3661T-5								
SPEC.	06H016X319G1								
HP	3								
VOLTS	575								
AMP	3.3								
RPM	1755								
FRAME	182TC	**HZ**	60				**PH**	3	
SER.F.	1.15	**CODE**	J	**DES**	B	**CL**	F		
NEMA-NOM-EFF	89.5	**PF**	77						
RATING	40C AMB-CONT								
CC	010A								
DE	6206	**ODE**	6205						
ENCL	TEFC	**SN**							
VPWM INVERTER READY									
CT6-60H(10:1)VT3-60H(20:1									
	SFA 3.5								

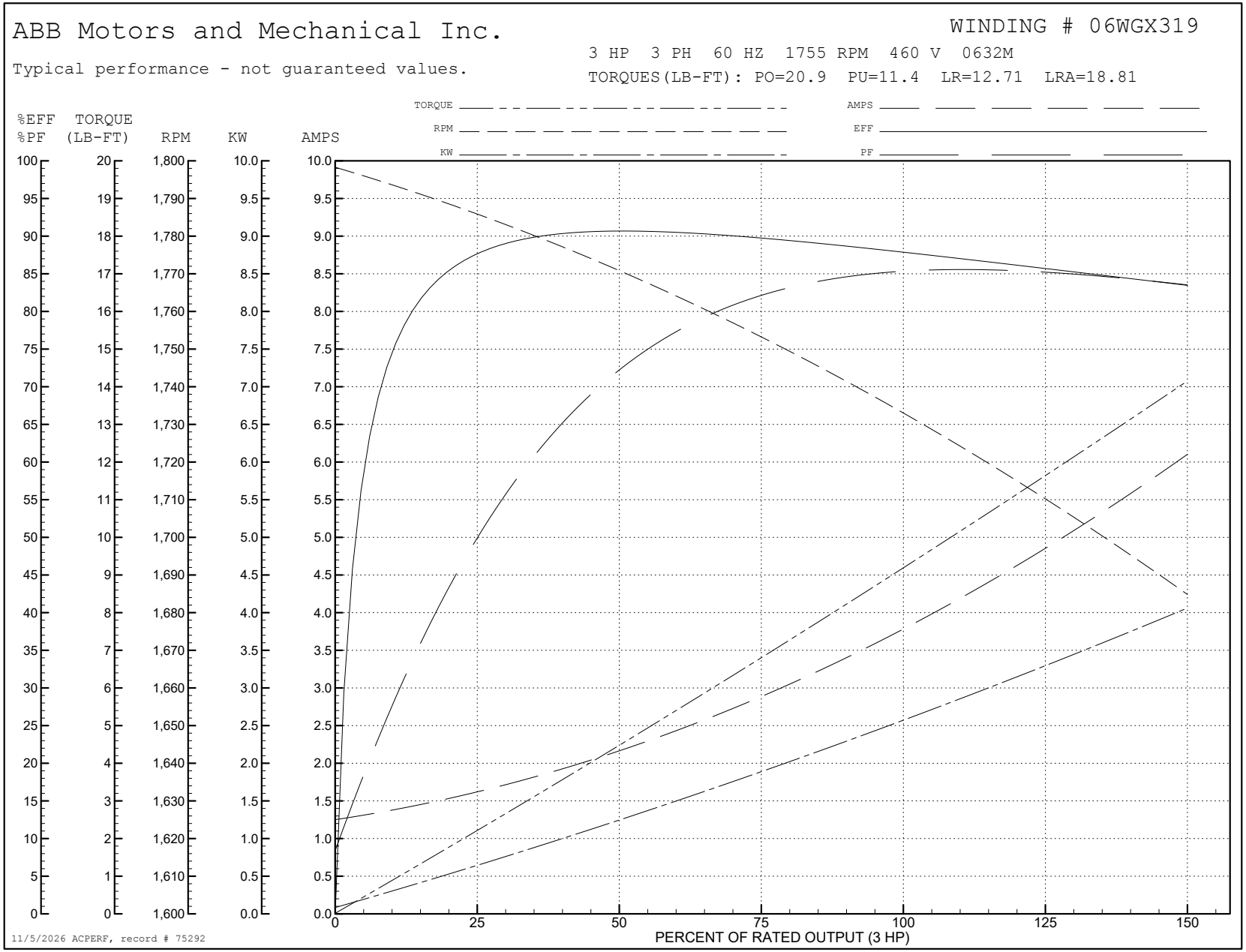
AC Induction Motor Performance Data
Record # 75292
Typical performance - not guaranteed values

Winding: 06WGX319-R001	**Type:** 0632M	**Enclosure:** TEFC

Nameplate Data				**460 V, 60 Hz: Single Voltage Motor**	
Rated Output (HP)			3	**Full Load Torque**	9.17 LB-FT
Volts			575	**Start Configuration**	direct on line
Full Load Amps			3.3	**Breakdown Torque**	20.9 LB-FT
R.P.M.			1755	**Pull-up Torque**	11.4 LB-FT
Hz	60	**Phase**	3	**Locked-rotor Torque**	12.71 LB-FT
NEMA Design Code	B	**KVA Code**	J	**Starting Current**	18.81 A
Service Factor (S.F.)			1.15	**No-load Current**	1.29 A
NEMA Nom. Eff.	89.5	**Power Factor**	77	**Line-line Res. @ 25ºC**	6.2 Ω
Rating - Duty			40C AMB-CONT	**Temp. Rise @ Rated Load**	41°C
S.F. Amps				**Temp. Rise @ S.F. Load**	54°C
				Locked-rotor Power Factor	41.1
				Rotor inertia	0.298 LB-FT2

Load Characteristics 460 V, 60 Hz, 3 HP

% of Rated Load	**25**	**50**	**75**	**100**	**125**	**150**	**S.F.**
Power Factor	54	74	81	84	85	84	85
Efficiency	86.9	89.6	89.6	88.1	86.2	83.1	87
Speed	1785	1769	1753	1734	1711	1684	1720
Line amperes	1.57	2.17	2.94	3.81	4.83	6.1	4.42


ABB Motors and Mechanical Inc.
WINDING # 06WGX319
3 HP 3 PH 60 HZ 1755 RPM 460 V 0632M
Typical performance - not guaranteed values.
TORQUES(LB-FT): PO=20.9 PU=11.4 LR=12.71 LRA=18.81
TORQUE
RPM
KW
AMPS
EFF
PF
%EFF
%PF
TORQUE (LB-FT)
RPM
KW
AMPS
PERCENT OF RATED OUTPUT (3 HP)
11/5/2026 ACPERF, record # 75292

AC Induction Motor Performance Data
Record # 84796
Typical performance - not guaranteed values

Winding: 06WGX319-R001	**Type:** 0632M	**Enclosure:** TEFC

Nameplate Data				**575 V, 60 Hz: Single Voltage Motor**	
Rated Output (KW)			2.2	**Full Load Torque**	12.21 N-M
Volts			575	**Start Configuration**	direct on line
Full Load Amps			3.3	**Breakdown Torque**	28.35 N-M
R.P.M.			1755	**Pull-up Torque**	15.46 N-M
Hz	60	**Phase**	3	**Locked-rotor Torque**	17.23 N-M
NEMA Design Code	B	**KVA Code**	J	**Starting Current**	18.81 A
Service Factor (S.F.)			1.15	**No-load Current**	1.29 A
NEMA Nom. Eff.	89.5	**Power Factor**	77	**Line-line Res. @ 25ºC**	6.2 Ω
Rating - Duty			40C AMB-CONT	**Temp. Rise @ Rated Load**	40°C
S.F. Amps				**Temp. Rise @ S.F. Load**	48°C
				Locked-rotor Power Factor	41.5
				Rotor inertia	0.0126 kg-m²

Load Characteristics 575 V, 60 Hz, 2.2 KW

% of Rated Load	**25**	**50**	**75**	**100**	**125**	**150**	**S.F.**
Power Factor	43	59	65	67	68	67	68
Efficiency	86.7	89.8	89.5	88.1	86.3	83.1	87
Speed	1785	1769	1753	1735	1713	1685	1722
Line amperes	1.56	2.16	2.91	3.76	4.75	6	4.35

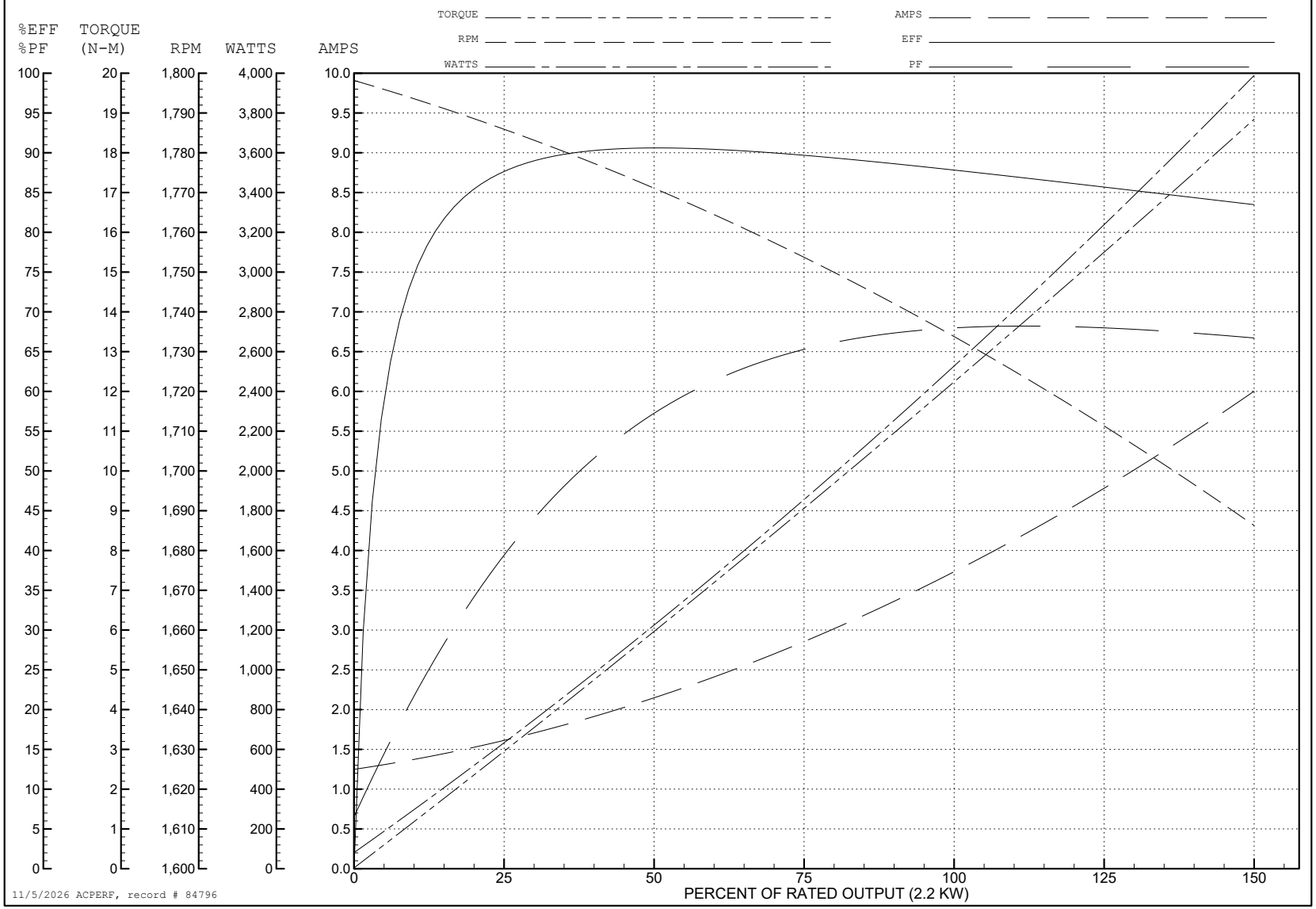
ABB Motors and Mechanical Inc.

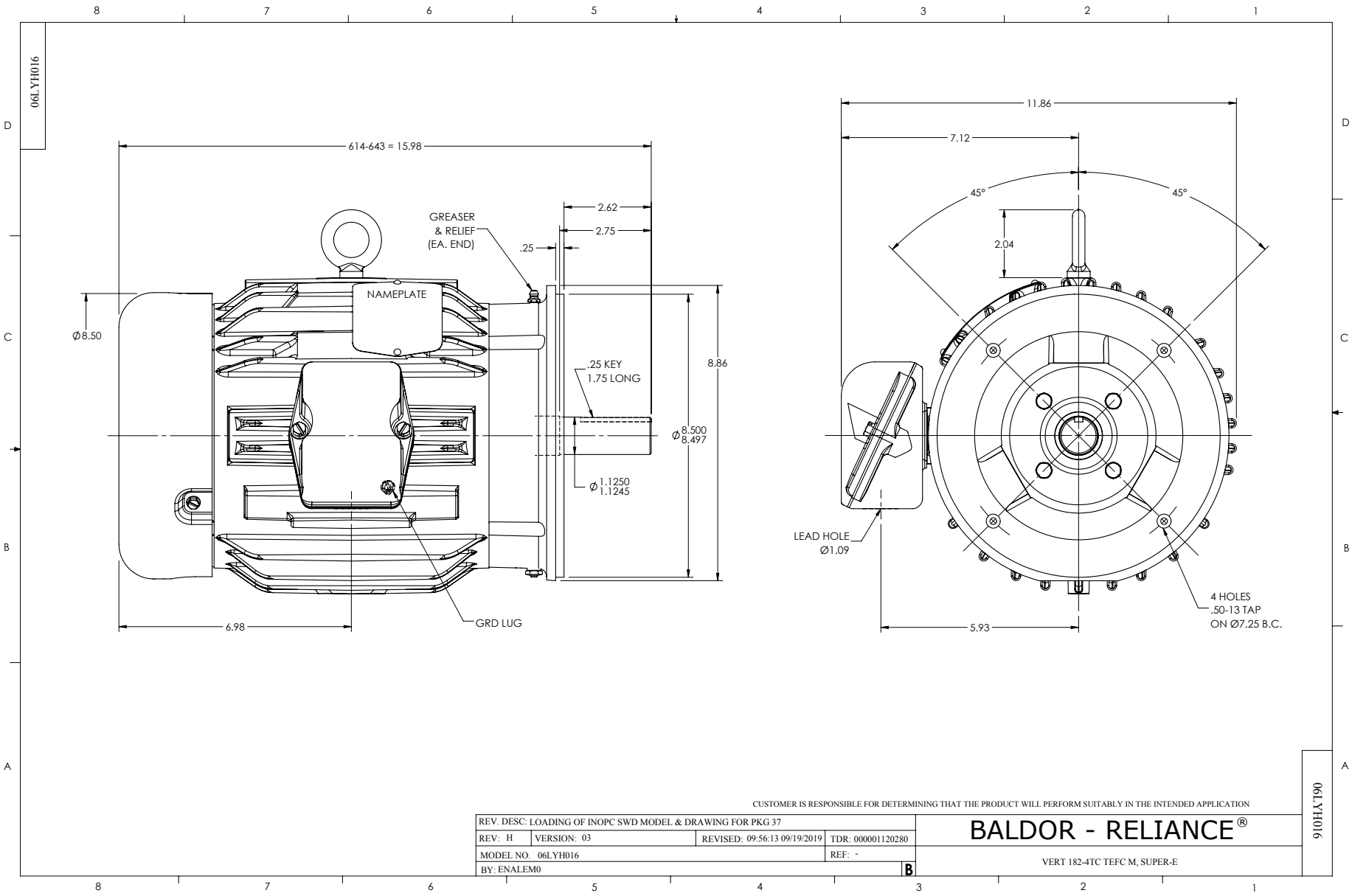
WINDING # 06WGX319

2.2 KW 3 PH 60 HZ 1755 RPM 575 V 0632M

Typical performance - not guaranteed values.

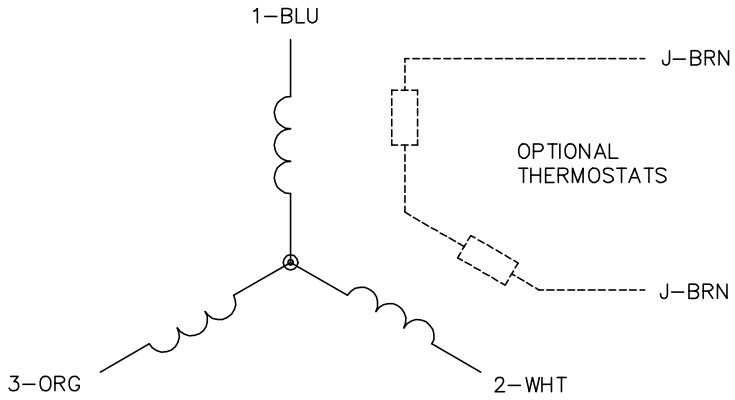
TORQUES(N-M): PO=28.35 PU=15.46 LR=17.23 LRA=18.81

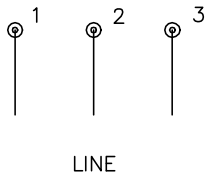



06LYH016
614-643 = 15.98
GREASER
& RELIEF
(EA. END)
2.62
2.75
.25
NAMEPLATE
Ø8.50
.25 KEY
1.75 LONG
8.86
Ø 8.500
8.497
Ø 1.1250
1.1245
6.98
GRD LUG
11.86
7.12
45°
45°
2.04
LEAD HOLE
Ø1.09
5.93
4 HOLES
.50-13 TAP
ON Ø7.25 B.C.
CUSTOMER IS RESPONSIBLE FOR DETERMINING THAT THE PRODUCT WILL PERFORM SUITABLY IN THE INTENDED APPLICATION
REV. DESC: LOADING OF INOPC SWD MODEL & DRAWING FOR PKG 37
REV: H
VERSION: 03
REVISED: 09:56:13 09/19/2019
TDR: 000001120280
MODEL NO. 06LYH016
REF: -
BY: ENALEM0
B
BALDOR - RELIANCE®
VERT 182-4TC TEFC M, SUPER-E
06LYH016

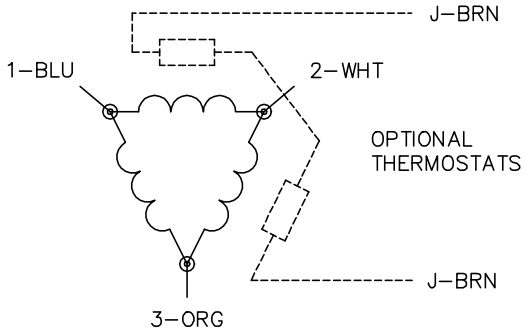
CD0006

TYPICAL WYE–CONNECTED MOTOR





TYPICAL DELTA–CONNECTED MOTOR



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: ENBRIR0
MTL: –		

BALDOR - RELIANCE®

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

SH 1 of 1