ABB BALDOR RELIANCE

Customer information packet

FDEM4108T-5

50M 2P TEFC HOR 286TS FARM DUTY SE
Class - None
Division - Not Applicable

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11/16/2026 9:35:52 AM

Specifications

Enclosure	TEFC
Frame	286TS
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	30.000 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	3600 RPM @ 60 HZ
Voltage @ Frequency	575.0 V @ 60 HZ
Agency Approvals	CURUSEEV
	NEMA PREMIUM
	NEMA PREMIUM (OLD LOGO)
Ambient Temperature	40 °C
Auxiliary Box	NO AUXILLARY BOX
Auxiliary Box Lead Termination	None
Base Indicator	Rigid
Bearing Grease Type	Polyrex EM (-20F +300F)
Blower	None
Current @ Voltage	28.000 A @ 575.0 V
Design Code	A
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	91.7 %
Electrically Isolated Bearing	Not Electrically Isolated
Feedback Device	NO FEEDBACK
Front Shaft Indicator	None
Heater Indicator	No Heater
High Voltage Full Load Amps	28.0 a
Insulation Class	F
Inverter Code	Inverter Ready

Part Detail

Revision	M
Type	AC
Mech. spec.	09L813
Base	
Status	PRD/A
Elec. spec.	09WGT509
Layout	09LYL813
Eff. date	12-16-2025
CD Diagram	CD0006
Poles	02
Leads	3#10
Proprietary	False
Created date	06-14-2018

KVA Code	J
Lifting Lugs	Standard Lifting Lugs
Locked Bearing Indicator	Locked Bearing
Motor Lead Quantity/Wire Size	3 @ 10 AWG
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	0950M
Mounting Arrangement	F1
Number of Poles	2
Overall Length	24.77 IN
Power Factor	88
Product Family	General Purpose
Pulley End Bearing Type	Ball
Pulley Face Code	Standard
Pulley Shaft Indicator	Standard
Rodent Screen	None
Service Factor	1.15
Shaft Diameter	1.625 IN
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	Shaft Slinger
Speed	3520 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

NP3126L									
CAT.NO.	FDEM4108T-5								
SPEC.	09L813T509G1								
HP	30								
VOLTS	575								
AMP	28								
RPM	3520								
FRAME	286TS	**HZ**	60				**PH**	3	
SER.F.	1.15	**CODE**	J	**DES**	A	**CL**	F		
NEMA-NOM-EFF	91.7	**PF**	88						
RATING	40C AMB-CONT								
CC	010A								
DE	6311	**ODE**	6208						
ENCL	TEFC	**SN**							

AC Induction Motor Performance Data
Record # 68011
Typical performance - not guaranteed values

Winding: 09WGT509-R001	**Type:** 0950M	**Enclosure:** TEFC

Nameplate Data				**575 V, 60 Hz: Single Voltage Motor**	
Rated Output (HP)			30	**Full Load Torque**	44.62 LB-FT
Volts			575	**Start Configuration**	direct on line
Full Load Amps			28	**Breakdown Torque**	181 LB-FT
R.P.M.			3520	**Pull-up Torque**	92.38 LB-FT
Hz	60	**Phase**	3	**Locked-rotor Torque**	110 LB-FT
NEMA Design Code	A	**KVA Code**	J	**Starting Current**	238 A
Service Factor (S.F.)			1.15	**No-load Current**	9.64 A
NEMA Nom. Eff.	91.7	**Power Factor**	88	**Line-line Res. @ 25ºC**	0.367 Ω
Rating - Duty			40C AMB-CONT	**Temp. Rise @ Rated Load**	79°C
S.F. Amps				**Temp. Rise @ S.F. Load**	96°C
				Locked-rotor Power Factor	28.2
				Rotor inertia	1.28 lb-ft²

Load Characteristics 575 V, 60 Hz, 30 HP

% of Rated Load	**25**	**50**	**75**	**100**	**125**	**150**	**S.F.**
Power Factor	54	76	84	88	90	90	89
Efficiency	87.4	91.7	92.4	92.1	91.4	90.4	91.7
Speed	3581	3563	3544	3523	3501	3475	3510
Line amperes	11.76	16.13	21.62	27.74	34.22	41.24	31.6

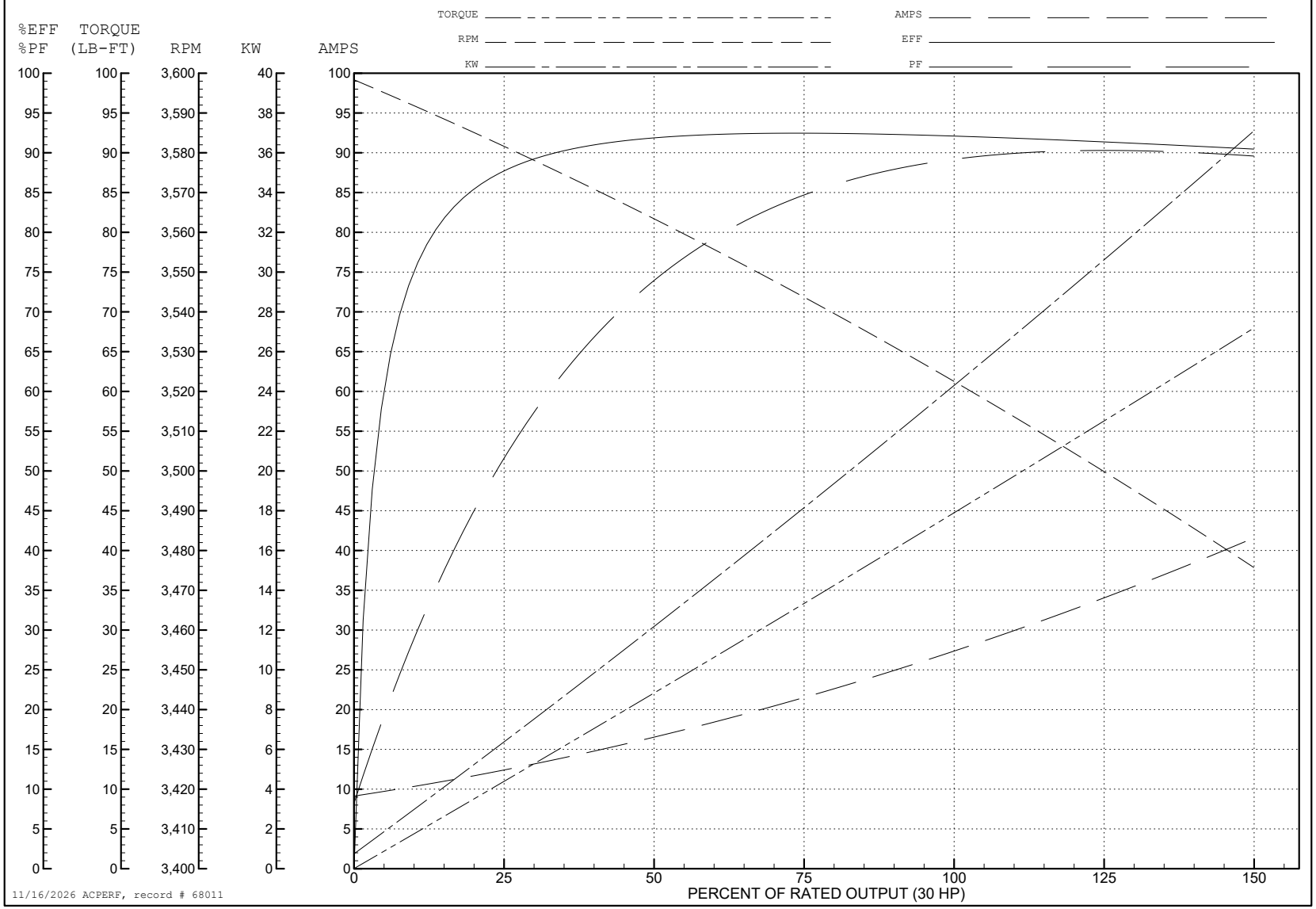
ABB Motors and Mechanical Inc.

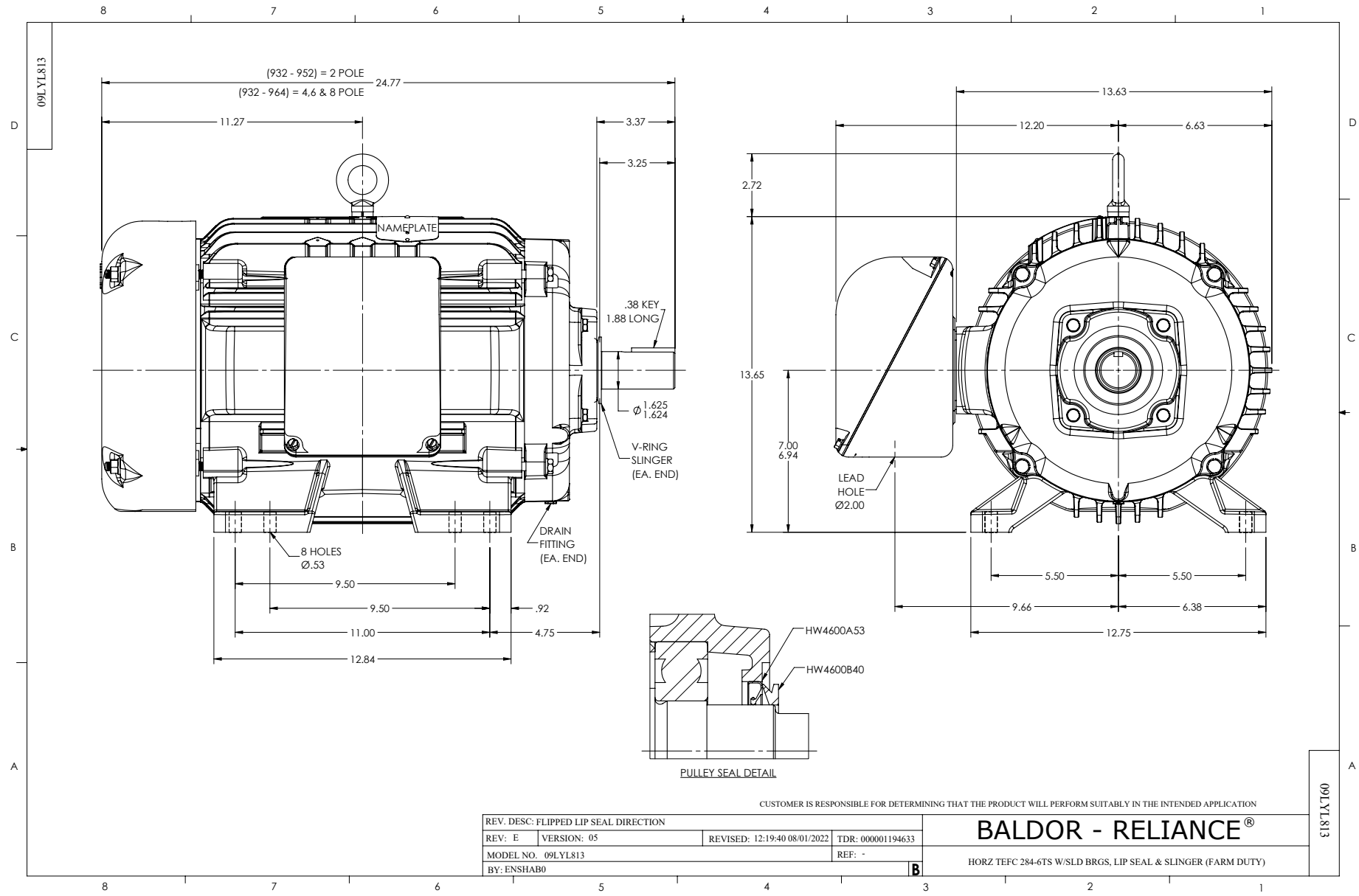
WINDING # 09WGT509

30 HP 3 PH 60 HZ 3520 RPM 575 V 0950M

Typical performance - not guaranteed values.

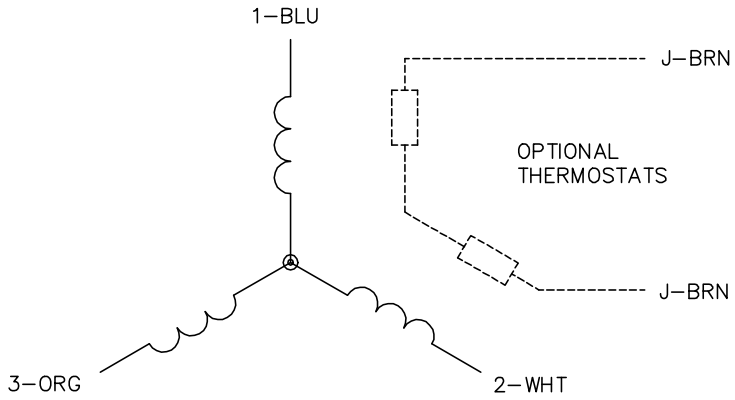
TORQUES(LB-FT): PO=181 PU=92.38 LR=110 LRA=238

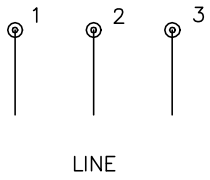



09LYL813
(932 - 952) = 2 POLE
(932 - 964) = 4,6 & 8 POLE
24.77
11.27
3.37
3.25
NAMEPLATE
.38 KEY
1.88 LONG
Ø 1.625
1.624
V-RING
SLINGER
(EA. END)
DRAIN
FITTING
(EA. END)
8 HOLES
Ø.53
9.50
9.50
.92
11.00
4.75
12.84
13.63
12.20
6.63
2.72
13.65
7.00
6.94
LEAD
HOLE
Ø2.00
5.50
5.50
9.66
6.38
12.75
HW4600A53
HW4600B40
PULLEY SEAL DETAIL
CUSTOMER IS RESPONSIBLE FOR DETERMINING THAT THE PRODUCT WILL PERFORM SUITABLY IN THE INTENDED APPLICATION
REV. DESC: FLIPPED LIP SEAL DIRECTION
REV: E
VERSION: 05
REVISED: 12:19:40 08/01/2022
TDR: 000001194633
MODEL NO. 09LYL813
REF: -
BY: ENSHAB0
B
BALDOR - RELIANCE®
HORZ TEFC 284-6TS W/SLD BRGS, LIP SEAL & SLINGER (FARM DUTY)
09LYL813

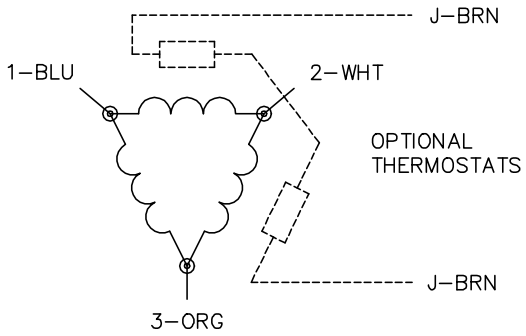
CD0006

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			BALDOR - RELIANCE®
REV. LTR: E	VERSION: 01	TDR: 000001099922	
FILE: \AAA\00005\141	REVISED: 10:24:49 02/19/2019	BY: ENBRIR0	3PH, SV, 3 LEADS, WYE OR DELTA CONNECTED
MTL: –			SH 1 of 1