



Customer information packet

ECP4115T

50HP, 1775RPM, 3PH, 60HZ, 326T, 1272M, TEFC, F1

Class - CLI GP A,B,C,D

Division - Division II

Specifications

Enclosure	TEFC
Frame	326T
Frame Material	Iron
Frequency	60.00 Hz
Haz Area Class and Group	CLI GP A,B,C,D
Haz Area Division	Division II
Motor Letter Type	Three Phase
Output @ Frequency	50.000 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	1800 RPM @ 60 HZ
Voltage @ Frequency	460.0 V @ 60 HZ 230.0 V @ 60 HZ
Agency Approvals	CCSA US CSA EEV NEMA PREMIUM NEMA_PREMIUM UR
Ambient Temperature	40 °C
Auxillary Box	No Auxillary Box
Auxillary Box Lead Termination	None
Base Indicator	Rigid
Bearing Grease Type	Polyrex EM (-20F +300F)
Blower	None
Constant Torque Speed Range	0.8
Current @ Voltage	58.000 A @ 460.0 V 116.000 A @ 230.0 V
Design Code	A
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	94.5 %
Electrically Isolated Bearing	Not Electrically Isolated
Feedback Device	NO FEEDBACK

Part detail

Revision	E
Type	AC
Mech. spec.	12F904
Base	
Status	PRD/A
Elec. spec.	12WGZ279
Layout	12LYF904
Eff. date	08-01-2023
CD Diagram	CD0180
Poles	04
Leads	9#6
Proprietary	False
Created date	02-03-2021

Front Shaft Indicator	None
Haz Area Temp Code	T3
Heater Indicator	No Heater
High Voltage Full Load Amps	58.0 a
Insulation Class	F
Inverter Code	Inverter Duty
KVA Code	H
Lifting Lugs	Standard Lifting Lugs
Locked Bearing Indicator	Locked Bearing
Max Speed	2700 rpm
Motor Lead Quantity/Wire Size	9 @ 6 AWG
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	1272M
Mounting Arrangement	F1
Number of Poles	4
Overall Length	30.28 IN
Power Factor	85
Product Family	Super-E Chemical Processing
Pulley End Bearing Type	Ball
Pulley Face Code	Standard
Pulley Shaft Indicator	Standard
Rodent Screen	None
Service Factor	1.15
Shaft Diameter	2.125 IN
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	Shaft Slinger
Speed	1775 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

NP3241

CAT.NO.	ECP4115T	P/N		ENCLOSURE	TEFC
SPEC.	12F904Z279G1	CC	010A	FRAME	326T
HP	50	CLASS	F	HZ	60
RPM	1775	RPM MAX	2700	PH	3
VOLT	230/460	MOTOR WEIGHT	641	DES	A
AMP	116/58	SER.F.	1.15	PF	85
RATING	40C AMB-CONT	NEMA-NOM-EFF	94.5	ODE BRG	6312
				DE BRG	6312
				GREASE	POLYREX EM
				INV.TYPE	PWM
TEMP CODE	T3	INVERTER-TEMP-CODE	200		
TEMP =	200	C HP FR	60	C HP TO	90
CT HZ FROM	0.8	CT HZ TO	60		
HTR-VOLTS		HTR-AMPS		HTR-WATTS	
				MAX. SPACE HEATER TEMP.	
				VT HZ FROM	0
				VT HZ TO	60

AC Induction Motor Performance Data

Record # 86839

Preliminary Data Sheet

Winding: 12WGZ279-R006		Type: 1272M	Enclosure: TEFC	
Nameplate Data			460 V, 60 Hz: High Voltage Connection	
Rated Output (HP)	50	Full Load Torque	147.8 LB-FT	
Volts	230/460	Start Configuration	direct on line	
Full Load Amps	116/58	Breakdown Torque	475 LB-FT	
R.P.M.	1775	Pull-up Torque	210 LB-FT	
Hz	60 Phase	Locked-rotor Torque	240 LB-FT	
NEMA Design Code	A KVA Code	Starting Current	413 A	
Service Factor (S.F.)	1.15	No-load Current	20.8 A	
NEMA Nom. Eff.	94.5 Power Factor	Line-line Res. @ 25°C	0.114 Ω	
Rating - Duty	40C AMB-CONT	Temp. Rise @ Rated Load	68°C	
S.F. Amps	132/68	Temp. Rise @ S.F. Load	88°C	
		Locked-rotor Power Factor	29.7	
		Rotor inertia	9.59 lb-ft ²	

Load Characteristics 460 V, 60 Hz, 50 HP

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	52	73	82	86	87	87	87
Efficiency	91.5	94.4	94.8	94.6	94	93.2	94.1
Speed	1794	1788	1782	1776	1769	1761	1770
Line amperes	24.8	33.9	45.3	57.9	71.6	87.5	66.1

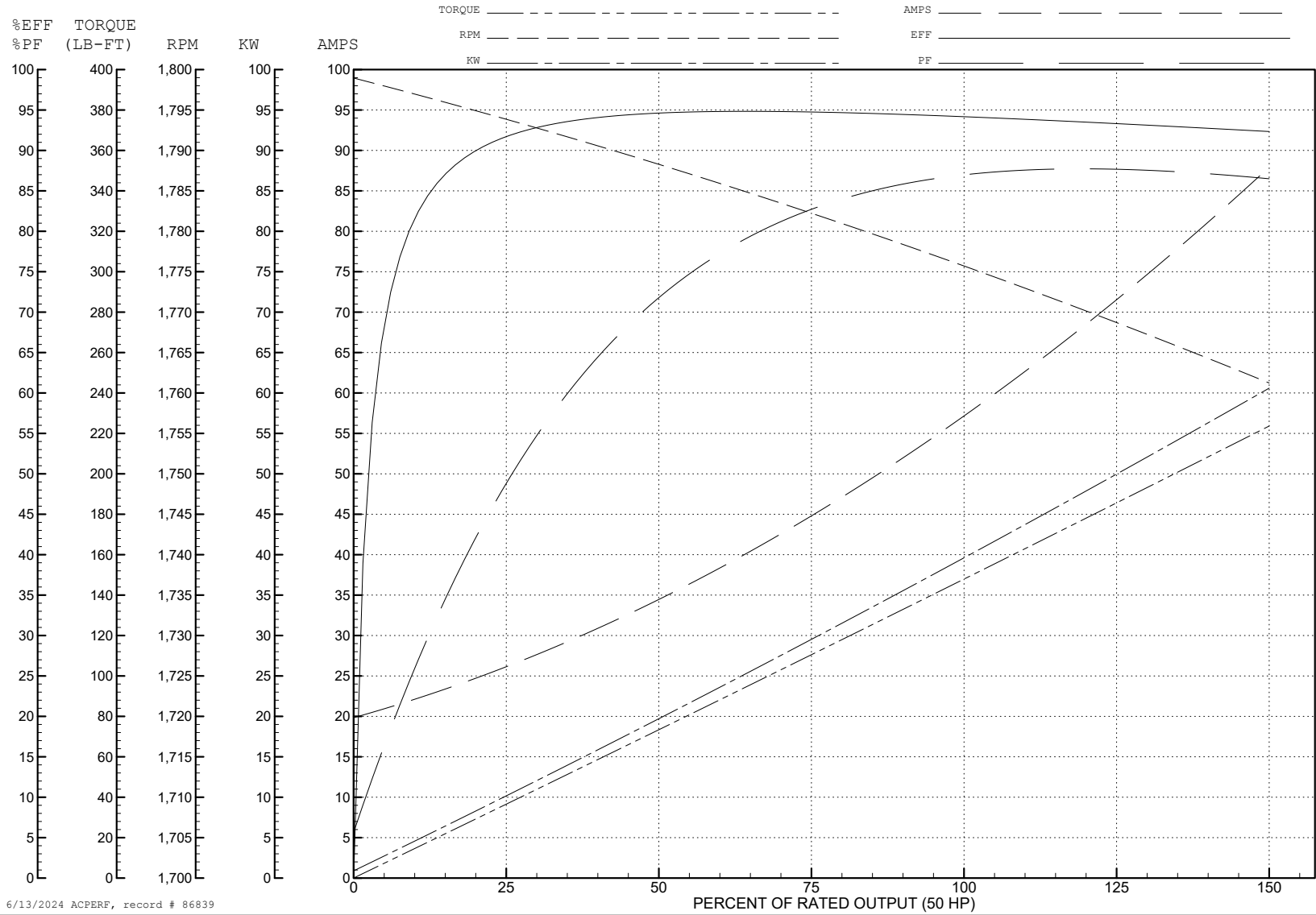
ABB Motors and Mechanical Inc.

WINDING # 12WGZ279

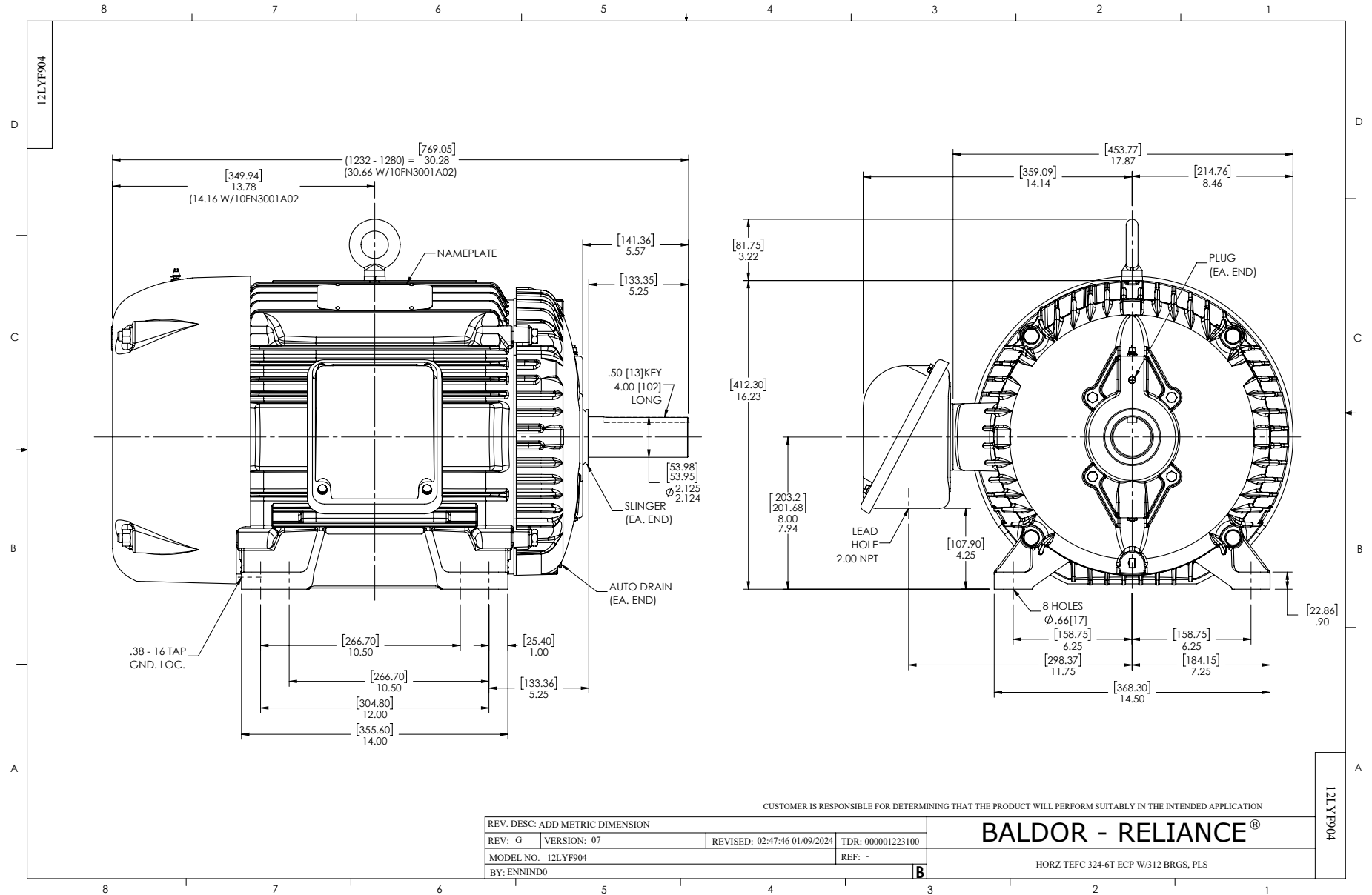
Typical performance - not guaranteed values.

50 HP 3 PH 60 HZ 1775 RPM 460 V 1272M

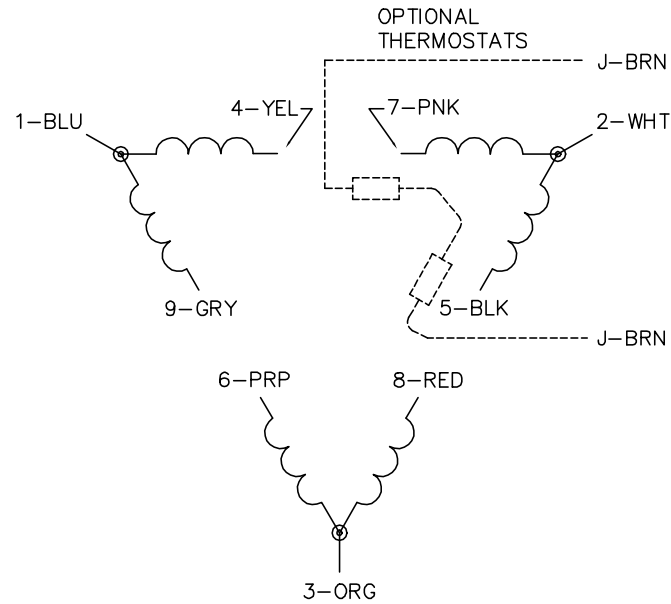
TORQUES (LB-FT): PO=475 PU=210 LR=240 LRA=413



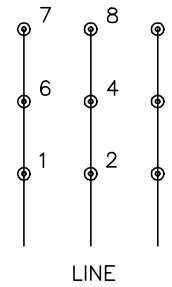
6/13/2024 ACPERF, record # 86839



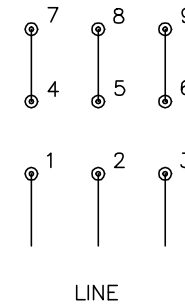
CD0180



LOW VOLTAGE
(2D)



HIGH VOLTAGE
(1D)



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.

CD0180

REV. DESC: ADD CLASS CONN00000007		
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BALDOR - RELIANCE®

3PH, DV, 9 LEADS, DELTA CONNECTION

SH 1 of 1