ABB BALDOR RELIANCE

Customer information packet

DRX32544T-5

50HP, 1775RPM, 3PH, 60HZ, 326T, XPFC, F1
Class - CLI GP C,D
Division - Division I

Copyright © All product information within this document is subject to ABB Motors and Mechanical Inc. copyright © protection, unless otherwise noted.
11/16/2026 9:24:28 AM

Specifications

Enclosure	XPFC
Frame	326T
Frame Material	Iron
Frequency	60.00 Hz
Haz Area Class and Group	CLI GP C,D
Haz Area Division	Division I
Motor Letter Type	Three Phase
Output @ Frequency	50.000 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	1800 RPM @ 60 HZ
Voltage @ Frequency	575.0 V @ 60 HZ
Agency Approvals	CSA EEV
	UL
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
Constant Torque Speed Range	6
Current @ Voltage	47.000 A @ 575.0 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
Haz Area Temp Code	T3C
Heater Indicator	No Heater
High Voltage Full Load Amps	47.0 a
Insulation Class	F
Inverter Code	Inverter Duty

Part Detail

Revision	E
Type	AC
Mech. spec.	
Base	
Status	PRD/A
Elec. spec.	12WGY593
Layout	12LYS077
Eff. date	06-08-2023
CD Diagram	CD0006
Poles	04
Leads	3#8
Proprietary	False
Created date	07-16-2019

IP Rating	NONE
KVA Code	J
Lifting Lugs	Standard Lifting Lugs
Locked Bearing Indicator	Locked Bearing
Max Speed	2700 rpm
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	1276M
Mounting Arrangement	F1
Number of Poles	4
Overall Length	32.00 IN
Power Factor	84
Product Family	Hazardous Location Motor
Pulley Face Code	Standard
Rodent Screen	None
RoHS Status	ROHS NON-COMPLIANT
Service Factor	1.00
Shaft Diameter	2.125 IN
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Speed	1775 rpm
Speed Code	Single Speed
Starting Method	Direct on line
Thermal Device - Bearing	None
Thermal Device - Winding	Normally Closed Thermostat
Vibration Sensor Indicator	No Vibration Sensor
Winding Thermal 1	None
Winding Thermal 2	None

Nameplate

NP1401XPSLEV											
NO.					**CC**	010A					
S/N					**TEMP CODE**	T3C					
SPEC.	12-0000-0857				**INV.TYPE**	PWM					
CAT.NO.	DRX32544T-5				**C HP FR**	60	**C HP TO**	90			
HP	50				**CT HZ FROM**	6			**CT HZ TO**	60	
VOLTS	575				**VT HZ FROM**	6			**VT HZ TO**	60	
AMPS	47			**MAG CUR**							
RPM	1775			**MX RPM**	2700						
HZ	60	**PH**	3	**CL**	F	**NOM.EFF.**	94.5				
SER.F.	1.00	**DES**	A	**SL HZ**	0.83	**WK2**	10.1				
FRAME	326T	**RATING**	40C AMB-CONT								
	55C AMB @ 1.0 SF, 60C RISE										
	1.15SF ON SINEWAVE				NEMA MG-1 PT.5,IP55						

AC Induction Motor Performance Data
Record # 77585
Typical performance - not guaranteed values

Winding: 12WGY593-R002	**Type:** 1276M	**Enclosure:** XPFC

Nameplate Data				**575 V, 60 Hz: Single Voltage Motor**	
Rated Output (HP)			50	**Full Load Torque**	148 LB-FT
Volts			575	**Start Configuration**	direct on line
Full Load Amps			47	**Breakdown Torque**	560 LB-FT
R.P.M.			1775	**Pull-up Torque**	235 LB-FT
Hz	60	**Phase**	3	**Locked-rotor Torque**	278 LB-FT
NEMA Design Code	A	**KVA Code**	J	**Starting Current**	378 A
Service Factor (S.F.)			1	**No-load Current**	19.8 A
NEMA Nom. Eff.	94.5	**Power Factor**	84	**Line-line Res. @ 25ºC**	0.145 Ω
Rating - Duty			40C AMB-CONT	**Temp. Rise @ Rated Load**	55°C
S.F. Amps				**Temp. Rise @ S.F. Load**	66°C
				Locked-rotor Power Factor	26.3
				Rotor inertia	10.1 LB-FT2

Load Characteristics 575 V, 60 Hz, 50 HP

% of Rated Load	**25**	**50**	**75**	**100**	**125**	**150**
Power Factor	45	68	78	84	86	87
Efficiency	91.1	94.3	94.8	95.2	94.7	94
Speed	1794	1789	1784	1779	1774	1767
Line amperes	22.6	29.3	37.6	47	57.7	68.8

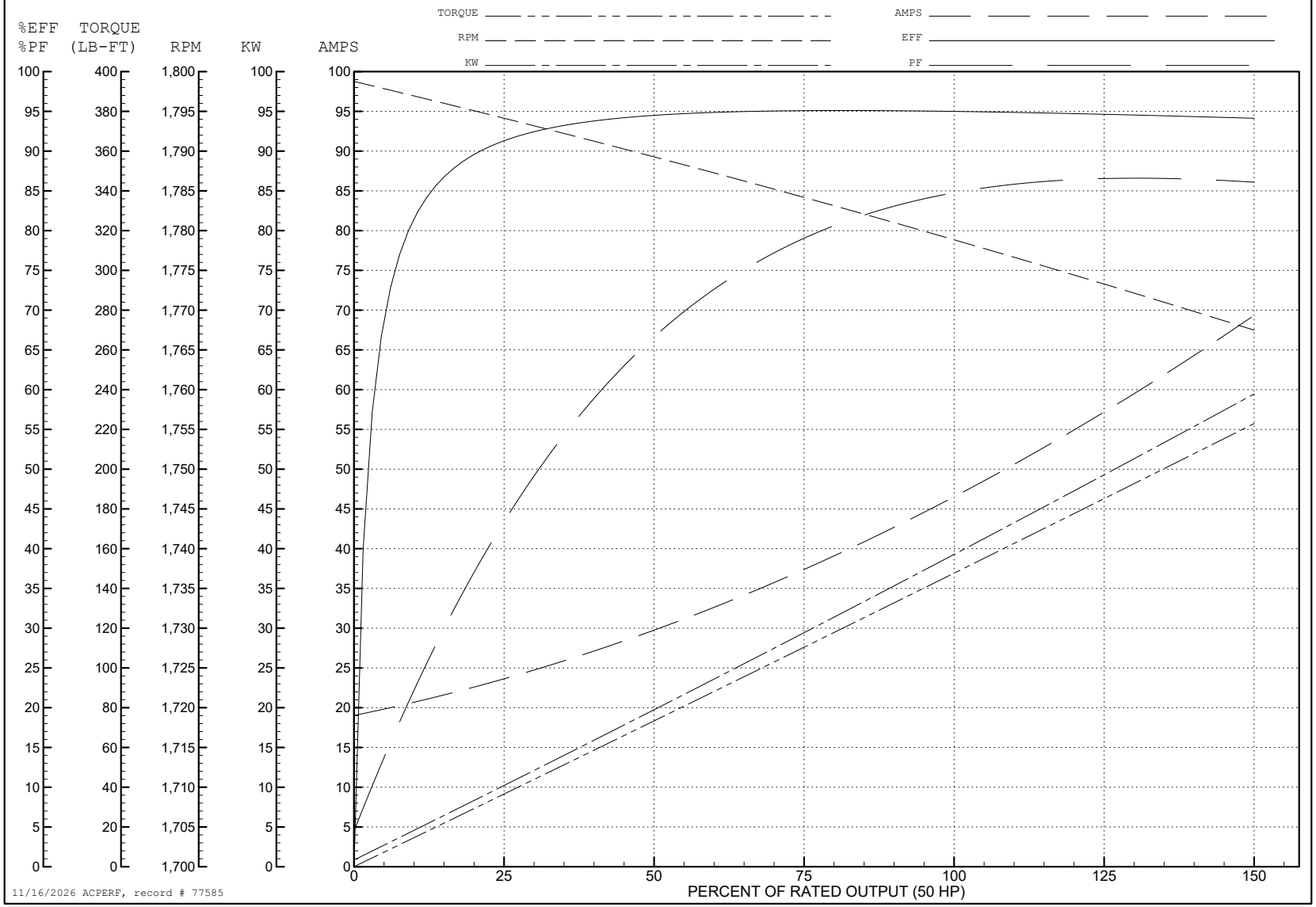
ABB Motors and Mechanical Inc.

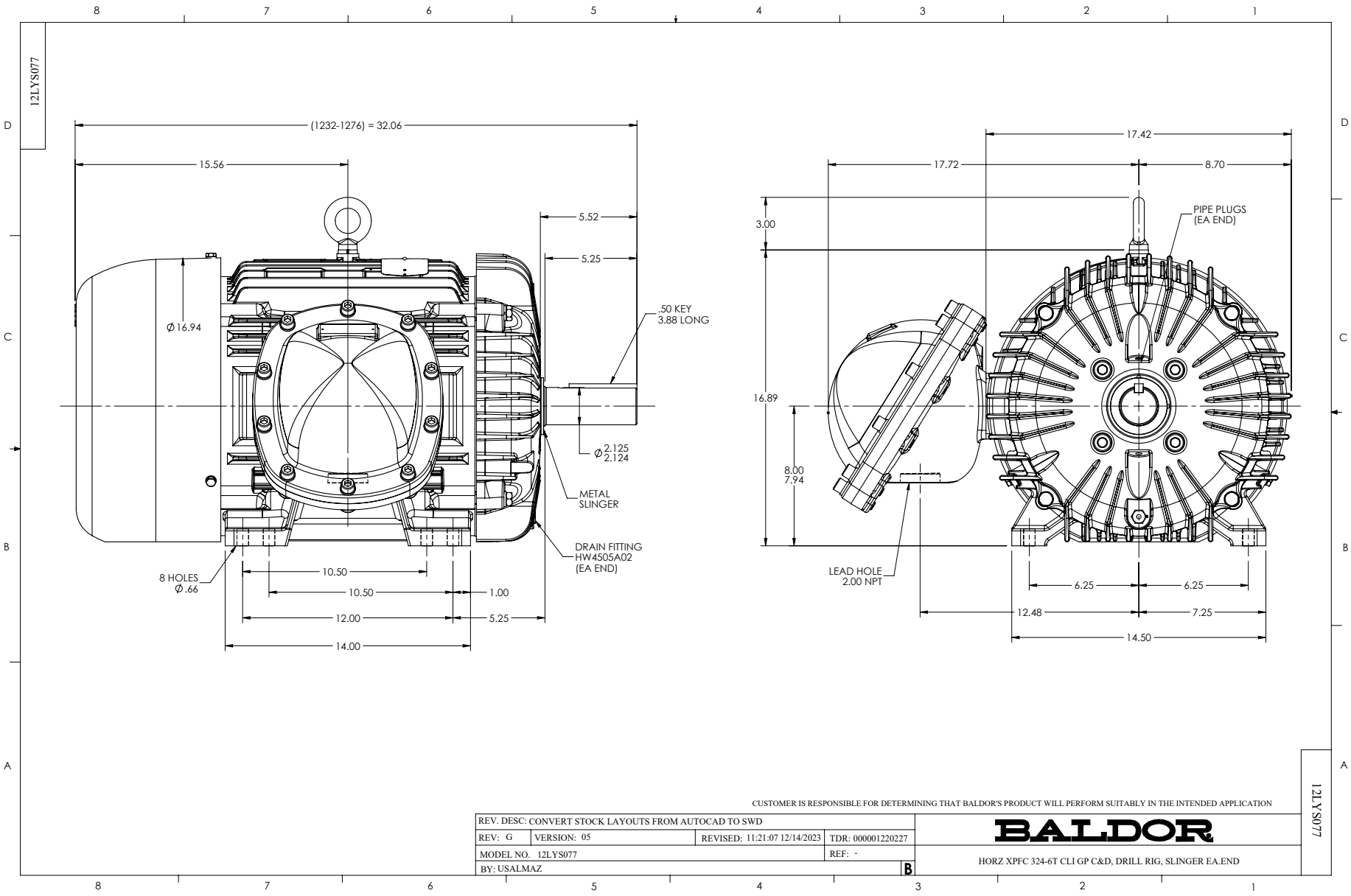
WINDING # 12WGY593

50 HP 3 PH 60 HZ 1775 RPM 575 V 1276M

Typical performance - not guaranteed values.

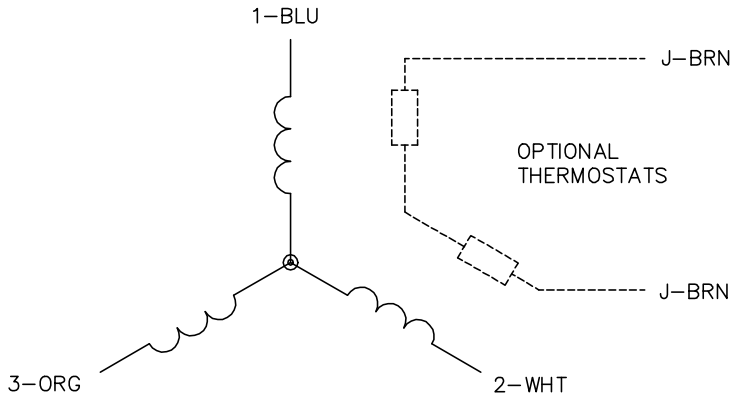
TORQUES(LB-FT): PO=560 PU=235 LR=278 LRA=378

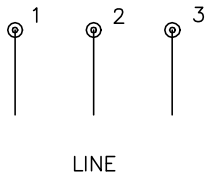



12LYS077
(1232-1276) = 32.06
15.56
5.52
5.25
.50 KEY
3.88 LONG
Ø16.94
Ø2.125
2.124
METAL
SLINGER
DRAIN FITTING
HW4505A02
(EA END)
8 HOLES
Ø.66
10.50
10.50
1.00
12.00
5.25
14.00
17.42
17.72
8.70
PIPE PLUGS
(EA END)
3.00
16.89
8.00
7.94
LEAD HOLE
2.00 NPT
6.25
6.25
12.48
7.25
14.50
CUSTOMER IS RESPONSIBLE FOR DETERMINING THAT BALDOR'S PRODUCT WILL PERFORM SUITABLY IN THE INTENDED APPLICATION
REV. DESC: CONVERT STOCK LAYOUTS FROM AUTOCAD TO SWD
REV: G
VERSION: 05
REVISED: 11:21:07 12/14/2023
TDR: 000001220227
MODEL NO. 12LYS077
REF: -
BY: USALMAZ
B
BALDOR
HORZ XPFC 324-6T CLI GP C&D, DRILL RIG, SLINGER EA.END
12LYS077

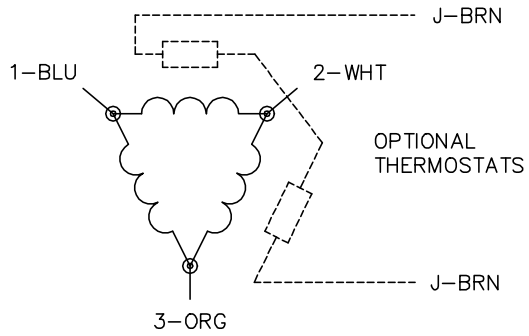
CD0006

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