

ABB BALDOR RELIANCE III

Customer information packet

CDRX28344T-5

30HP, 1770RPM, 3PH, 60HZ, 286TC, XPFC, F1

Class - CLI GP C,D

Division - Division I

Specifications

Enclosure	XPFC
Frame	286TC
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	30.000 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	29.000 A @ 575.0 V
Design Code	A
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	93.6 %
Electrically Isolated Bearing	Not Electrically Isolated
Feedback Device	NO FEEDBACK
Haz Area Temp Code	T3C
Heater Indicator	No Heater
High Voltage Full Load Amps	29.0 a
Insulation Class	F
Inverter Code	Inverter Duty

Part Detail

Revision	H
Type	AC
Mech. spec.	
Base	
Status	PRD/A
Elec. spec.	10WGY759
Layout	10LYE949
Eff. date	11-22-2024
CD Diagram	CD0006
Poles	04
Leads	3#10
Proprietary	False
Created date	07-19-2019

IP Rating	NONE
KVA Code	G
Lifting Lugs	Standard Lifting Lugs
Locked Bearing Indicator	Locked Bearing
Max Speed	2700 rpm
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	1056M
Mounting Arrangement	F1
Number of Poles	4
Overall Length	28.61 IN
Power Factor	83
Product Family	Hazardous Location Motor
Pulley Face Code	C-Face
Rodent Screen	None
RoHS Status	ROHS NON-COMPLIANT
Service Factor	1.00
Shaft Diameter	1.875 IN
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Speed	1770 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.	10-0000-0938					INV.TYPE		PWM				
CAT.NO.	CDRX28344T-5					C HP FR	60	C HP TO	90			
HP	30					CT HZ FROM		6	CT HZ TO		60	
VOLTS	575					VT HZ FROM		6	VT HZ TO		60	
AMPS	29					MAG CUR	11.5					
RPM	1770					MX RPM	2700					
HZ	60	PH	3	CL	F	NOM.EFF.		93.6				
SER.F.	1.00	DES		A	SL HZ	1	WK2	4.46				
FRAME	286TC		RATING		40C AMB-CONT							
	55C AMB @ 1.0 SF, 60C RISE											
	1.15SF ON SINE WAVE					NEMA MG-1 PT.5,IP55						

Parts List

Part number	Description	Quantity
SA372040	SA 10-0000-0938	1.000 ea
RA361763	RA 10-0000-0938	1.000 ea
LC0006	CONNECTION LABEL	1.000 ea
NP1401XPSLEV	SS XP INV UL CSA-EEV CC CL-I GP-C&D	1.000 ea
85XU0407S04	4X1/4 U DRIVE PIN STAINLESS	2.000 ea
85XU0407S04	4X1/4 U DRIVE PIN STAINLESS	4.000 ea
MN416A01	TAG-INSTAL-MAINT no wire (2500 bx)11/25	1.000 ea
LB1081C	ALUM XP CAUTION LABEL (COL PLANT ONLY-	1.000 ea
14PA2000	PKGP, CTN ID 42X34X25, STD BASE	1.000 ea
10FH1008A01P	310 FAN HOUSING X-PROOF MACH. W/EPOXY PR	1.000 ea
HW1001A31	LOCKWASHER 5/16, ZINC PLT.591 OD, .319 I	3.000 ea
10XN3118K12	5/16-18 X .75 GRADE 5, ZINC PLATED	3.000 ea
09FN3001C02	EXTERNAL FAN, PLASTIC (COMES W/SCREW FRO	1.000 ea
HW2500A25	WOODRUFF KEY USA #1008 #BLOW CARBON STEE	1.000 ea
MJ1000A02	GREASE, POLYREX EM EXXON	0.130 lb
WD4100A03	DE-750 HEYCO PLUG 62MP0750 MICRO PLASTIC	1.000 ea
10EP1701A57P	FR ENDPLATE, MACH	1.000 ea
HA3050A03	3/8-16 X 2.25" GRADE 8 BOLT	4.000 ea
HW1001A38	LOCKWASHER 3/8, ZINC PLT .688 OD, .382 I	4.000 ea
HA2066A02	ALUM SLINGER 309 BRG DRILL RIG MOTOR)	1.000 ea
80XN1032J06	10-32 X 3/8 SET SCREW, HEX SOC, CUP PT	2.000 ea
HW5100A11	W3917-042 WVY WSHR (WB)	1.000 ea
HW4500A20	1/8NPT SL PIPE PLUG	2.000 ea
HW4505A02	BREATHER/DRAIN-EXP PROOF-.250-18 PTF AIS	1.000 ea
HW3023E06	.125 X .625 SPIRAL SPRING PIN	1.000 ea
10EP1710A09P	FACE MTD. EP MACH XPFC W/HW4505A02 W/PRI	1.000 ea
HW1001A38	LOCKWASHER 3/8, ZINC PLT .688 OD, .382 I	4.000 ea
HA3050A03	3/8-16 X 2.25" GRADE 8 BOLT	4.000 ea
HA2067A01	ALUM SLINGER 311 BRG DRILL RIG MOTOR	1.000 ea
80XN1032J06	10-32 X 3/8 SET SCREW, HEX SOC, CUP PT	2.000 ea
10XN2520K40	1/4-20 X 2-1/2 HEX HD CAPSCREW,GRADE 5,Z	4.000 ea

HW4500A20	1/8NPT SL PIPE PLUG	2.000 ea
HW4505A02	BREATHER/DRAIN-EXP PROOF-.250-18 PTF AIS	1.000 ea
HW3023E06	.125 X .625 SPIRAL SPRING PIN	1.000 ea
12CB1003A02P	KOBX, MACH 1.50 NPT GROUP C MTRS ,EPOXY	1.000 ea
10XN3118K24	5/16-18 X 1.50" HEX HD, GRADE 5	4.000 ea
HW1001A31	LOCKWASHER 5/16, ZINC PLT.591 OD, .319 I	4.000 ea
WD1000B19	TERMINAL BURNDY L250HP	1.000 ea
10XN3816K08	3/8-16 X .50 HEX HD CAP SCREW GRADE 5	1.000 ea
HW1001A38	LOCKWASHER 3/8, ZINC PLT .688 OD, .382 I	1.000 ea
12CB1502A01P	CONDUIT BOX LID MACH. GROUP C MTRS	1.000 ea
84XN5013J32	SOCKET HD.CAP SCR,1/2-13 X 2"LG,ALLOY ST	10.000 ea
HW1001A50	LOCKWASHER 1/2, ZINC PLT, .879 OD, .509 I	10.000 ea
MG1025G29	WILKOFAS, 789.229, DARK CHARCOAL GRAY	0.125 ga
HW2501H28	KEY, 1/2 SQ X 3.250	1.000 ea
MJ5001A27	32220KN GRAY SEALER *MIN BUY 4 QTS=1GAL	0.001 qt
LB1624	COMBINED WARNING LABEL, ISO/ANSI PICTOGR	1.000 ea

AC Induction Motor Performance Data

Record # 77593

Typical performance - not guaranteed values

Winding: 10WGY759-R001			Type: 1056M	Enclosure: XPFC	
Nameplate Data			575 V, 60 Hz: Single Voltage Motor		
Rated Output (HP)		30	Full Load Torque		89.2 LB-FT
Volts		575	Start Configuration		direct on line
Full Load Amps		29	Breakdown Torque		255 LB-FT
R.P.M.		1770	Pull-up Torque		120 LB-FT
Hz	60	Phase	3	Locked-rotor Torque	136 LB-FT
NEMA Design Code	A	KVA Code	G	Starting Current	177 A
Service Factor (S.F.)			1	No-load Current	11.5 A
NEMA Nom. Eff.	93.6	Power Factor	83	Line-line Res. @ 25°C	0.384 Ω
Rating - Duty		40C AMB-CONT		Temp. Rise @ Rated Load	58°C
S.F. Amps				Temp. Rise @ S.F. Load	72°C
				Locked-rotor Power Factor	31.7
				Rotor inertia	4.45 LB-FT2

Load Characteristics 575 V, 60 Hz, 30 HP

% of Rated Load	25	50	75	100	125	150
Power Factor	47	69	77	84	84	83
Efficiency	90.9	93.8	94.4	94.1	92.9	92.5
Speed	1794	1786	1780	1773	1764	1754
Line amperes	13.3	17.6	23.4	28.5	35.9	43.6

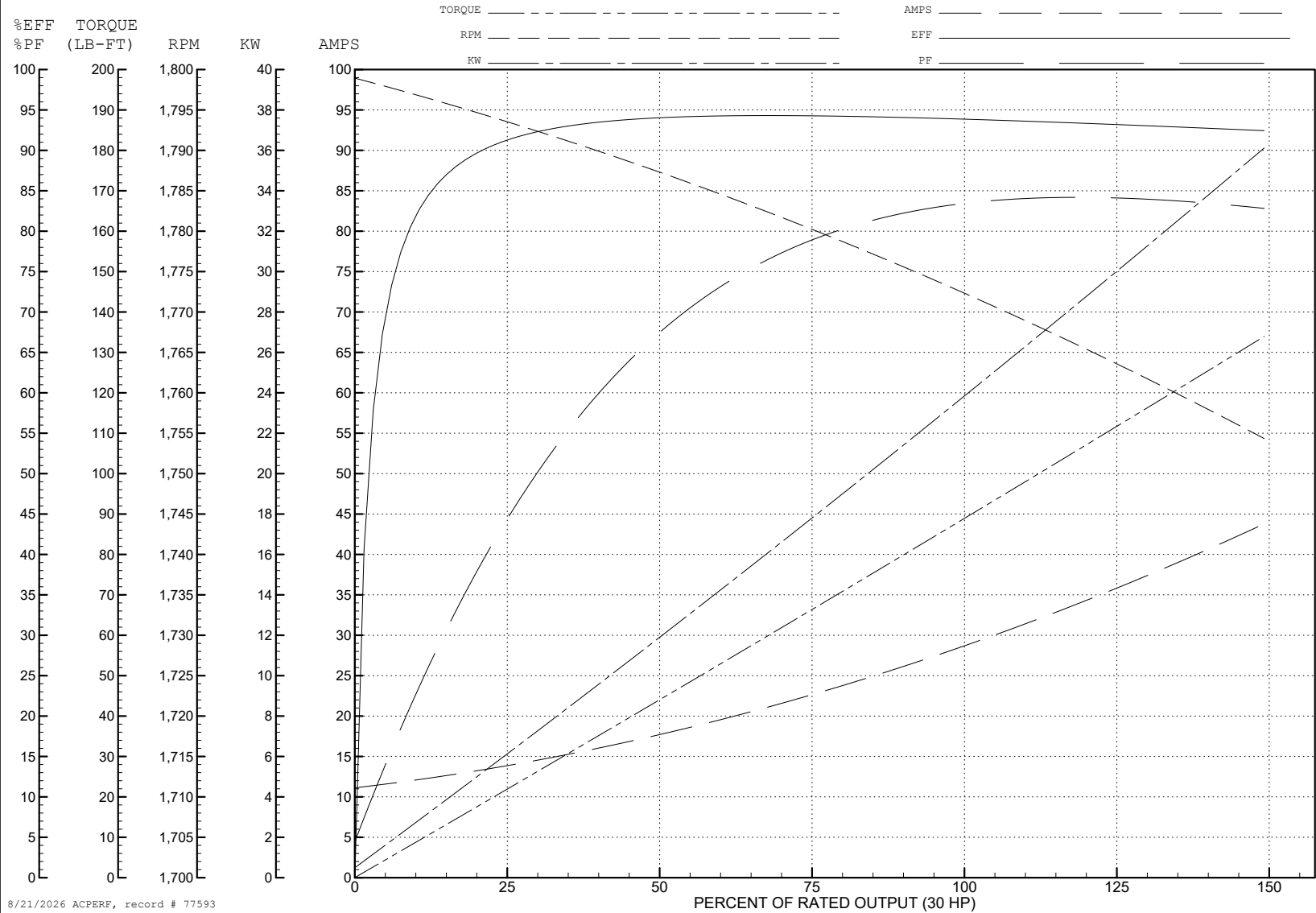
ABB Motors and Mechanical Inc.

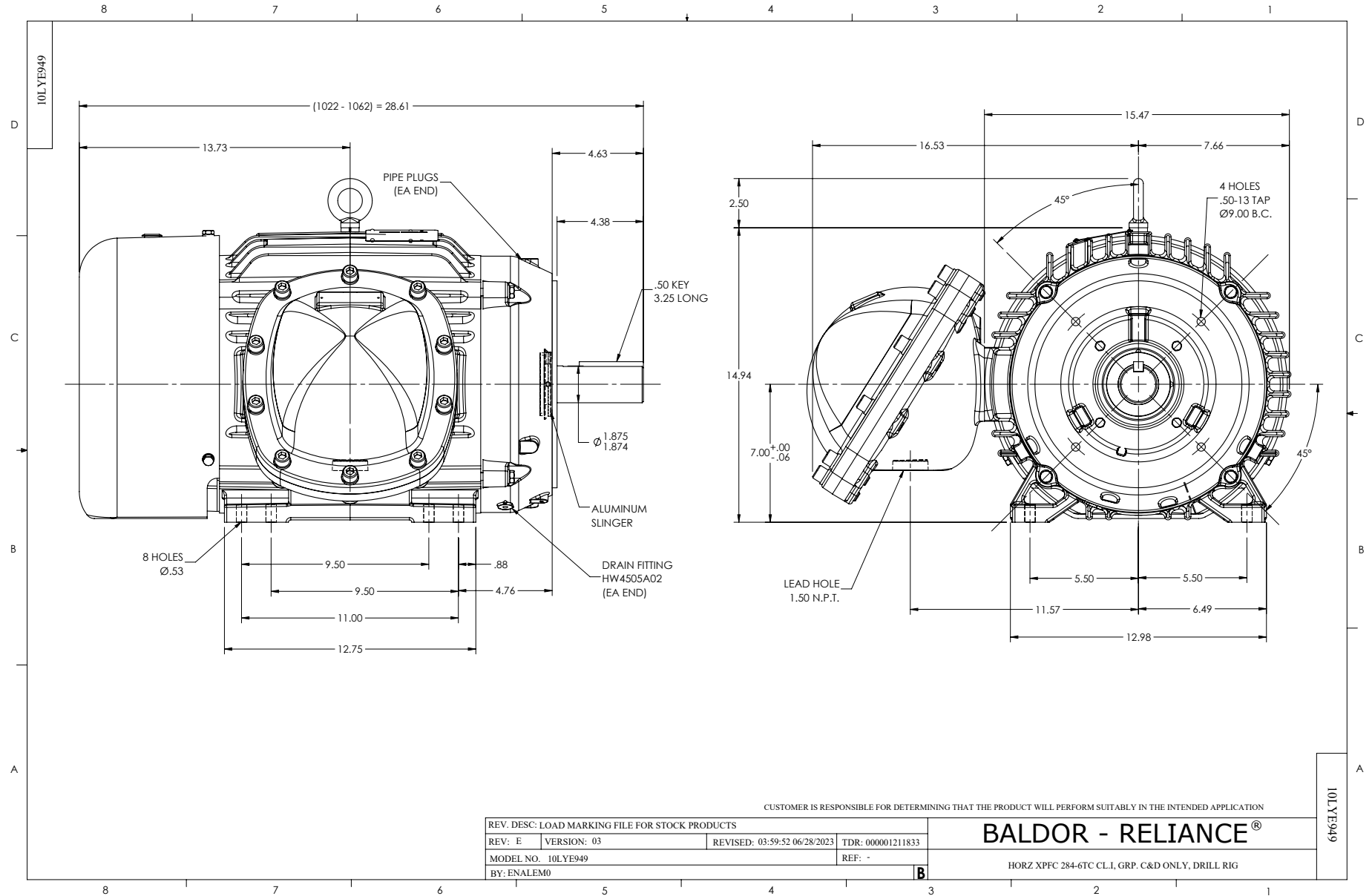
WINDING # 10WGY759

Typical performance - not guaranteed values.

30 HP 3 PH 60 HZ 1770 RPM 575 V 1056M

TORQUES (LB-FT): PO=255 PU=120 LR=136 LRA=177





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

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