

ABB BALDOR RELIANCE III

Customer information packet

EJPM2538T

40HP, 3510RPM, 3PH, 60HZ, 286JP, 3956M, OPSB, F

Class -

Division - Not Applicable

Specifications

Enclosure	OPSB
Frame	286JP
Frame Material	Steel
Frequency	60.00 Hz
Haz Area Division	Not Applicable
Motor Letter Type	Three Phase
Output @ Frequency	40.000 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	3600 RPM @ 60 HZ
Voltage @ Frequency	460.0 V @ 60 HZ 230.0 V @ 60 HZ
Agency Approvals	CSA EEV UR CSA
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	45.000 A @ 460.0 V 90.000 A @ 230.0 V 99.000 A @ 208.0 V
Design Code	A
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	92.4 %
Electrically Isolated Bearing	Not Electrically Isolated
Feedback Device	NO FEEDBACK
Front Face Code	Standard
Front Shaft Indicator	None
Heater Indicator	No Heater

Part Detail

Revision	W
Type	AC
Mech. spec.	39E303
Base	
Status	PRD/A
Elec. spec.	39WGX287
Layout	39LYE303
Eff. date	06-26-2024
CD Diagram	CD0180
Poles	02
Leads	9#8
Proprietary	False
Created date	05-05-2009

High Voltage Full Load Amps	45.0 a
Insulation Class	F
Inverter Code	Inverter Ready
KVA Code	H
Lifting Lugs	Standard Lifting Lugs
Locked Bearing Indicator	Locked Bearing
Motor Lead Exit	Ko Box
Motor Lead Quantity/Wire Size	9 @ 8 AWG
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	3956M
Mounting Arrangement	F1
Number of Poles	2
Overall Length	29.44 IN
Power Factor	90
Product Family	General Purpose
Pulley End Bearing Type	Ball
Pulley Face Code	C-Face
Pulley Shaft Indicator	Tapped & Key
Rodent Screen	Included
Service Factor	1.15
Shaft Diameter	1.750 IN
Shaft Extension Location	Pulley End
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	Shaft Slinger
Speed	3510 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

NP2138LUA												
CAT.NO.	EJPM2538T			P/N					ENCLOSURE			OPSB
SPEC.	39E303X287		CC	010A	FRAME		286JP	S/N				
HP	40			CLASS		F	HZ	60				
RPM	3510			PH	3	DES		A				
VOLT	230/460			KVA-CODE			H	ODE BRG	6208	DE BRG		6312
AMP	90/45											
RATING	40C AMB-CONT			GREASE		POLYREX EM						
NEMA-NOM-EFF	92.4	PF	90	SER.F.	1.15							
	50HZ 40HP 190/380V 110/55A					SF1.0						
HTR-VOLTS	HTR-AMPS											

Parts List

Part number	Description	Quantity
SA181650	SA 39E303X287	1.000 ea
RA169577	RA 39E303X287	1.000 ea
HW3201A01	1/2-13 EYEBOLT	1.000 ea
09CB2800A01	ADAPTER MACH FOR 09CB3000 AND 10CB3000	1.000 ea
19XW3118A08	.31-18 X .50 HEX WASHER HEAD TAPTITE II	2.000 ea
HW1001A31	LOCKWASHER 5/16, ZINC PLT.591 OD, .319 I	2.000 ea
HW4600B41	V-RING SLINGER 2.125 X 2.880 X 0.280	1.000 ea
WD1000B25	GND LUG, BURNDY L125HP OR T&B L125HP-BB	1.000 ea
19XW3118G08	.31-18X.50,HEX WSHR HD,TAPTITE 2,GREEN	1.000 ea
10CB3000SP	KOBX, CAST W/2.00 LEAD HOLE	1.000 ea
19XW3118A12	.31-18 X .75 HEX WASHER HEAD TAPTITE II	4.000 ea
39EP3200A01SP	FR/PU ENDPLATE, MACH	1.000 ea
HW5100A08	W3118-035 WVY WSHR (WB)	1.000 ea
HA1101A03	RODENT SCREEN, 39 FACE MTD.E.P.	1.000 ea
51XW1032A06	10-32 X .38, TAPTITE II, HEX WSHR SLTD S	4.000 ea
39EP1404A11	PUEP MACH, 284-6TC OPEN, RODENT SCREEN	1.000 ea
HA1101A06	RODENT SCREEN FOR 39EP1404	1.000 ea
51XW1032A06	10-32 X .38, TAPTITE II, HEX WSHR SLTD S	6.000 ea
10XN3118K40	5/16-18 X 2.50" HEX HD, GRADE 5	4.000 ea
HW1001A31	LOCKWASHER 5/16, ZINC PLT.591 OD, .319 I	4.000 ea
HW1001A31	LOCKWASHER 5/16, ZINC PLT.591 OD, .319 I	4.000 ea
80XN1032J06	10-32 X 3/8 SET SCREW, HEX SOC, CUP PT	1.000 ea
10CB3500SP	CONDUIT BOX LID, CAST	1.000 ea
51XW2520A12	.25-20 X .75, TAPTITE II, HEX WSHR SLTD	4.000 ea
HW2501E18	KEY, 1/4 SQ X 2.000	1.000 ea
MN416A01	TAG-INSTAL-MAINT no wire (2500 bx)11/25	1.000 ea
LD7020F09	LEAD SET, 8AWG, 9 LEAD, 20" LONG LEADS	1.000 ea
HW4500A03	GREASE FITTING, .125 NPT 1610(ALEMITE) 8	1.000 ea
HW4500A20	1/8NPT SL PIPE PLUG	1.000 ea
HA4051A00	PLASTIC CAP FOR GREASE FITTING	1.000 ea
MG1050Y01	CELEROL BALDOR GOLD *5 GALLON BUCKET*	0.050 ga

MJ1000A02	GREASE, POLYREX EM EXXON	0.030 lb
HW4500A03	GREASE FITTING, .125 NPT 1610(ALEMITE) 8	1.000 ea
HW4500A20	1/8NPT SL PIPE PLUG	1.000 ea
HA4051A00	PLASTIC CAP FOR GREASE FITTING	1.000 ea
85XU0407S04	4X1/4 U DRIVE PIN STAINLESS	4.000 ea
39AD2002A01	BAFFLE PLATE 39 OPEN, SLOTTED BAND MTRS	1.000 ea
39AD2002A01	BAFFLE PLATE 39 OPEN, SLOTTED BAND MTRS	1.000 ea
HA3113A05	THRUBOLT 3/8 - 16 X 17.250	4.000 ea
LB1624	COMBINED WARNING LABEL, ISO/ANSI PICTOGR	1.000 ea
LC0181	CONNECTION LABEL	1.000 ea
NP2138LUA	ALUM SUPER-E UL PREM CC (300SER)	1.000 ea
42PA1032	PACKAGING GROUP PK1030A06	1.000 ea

AC Induction Motor Performance Data

Record # 13126

Typical performance - not guaranteed values

Winding: 39WGX287-R001				Type: 3956M		Enclosure: OPSB	
Nameplate Data				460 V, 60 Hz: High Voltage Connection			
Rated Output (HP)		40		Full Load Torque		60.7 LB-FT	
Volts		230/460		Start Configuration		direct on line	
Full Load Amps		90/45		Breakdown Torque		252 LB-FT	
R.P.M.		3510		Pull-up Torque		80.9 LB-FT	
Hz	60	Phase	3	Locked-rotor Torque		115 LB-FT	
NEMA Design Code		A	KVA Code	Starting Current		326 A	
Service Factor (S.F.)		1.15		No-load Current		11.3 A	
NEMA Nom. Eff.		92.4	Power Factor	Line-line Res. @ 25°C		0.211 Ω	
Rating - Duty		40C AMB-CONT		Temp. Rise @ Rated Load		60°C	
S.F. Amps				Temp. Rise @ S.F. Load		77°C	
				Locked-rotor Power Factor		28	
				Rotor inertia		1.43 LB-FT2	

Load Characteristics 460 V, 60 Hz, 40 HP

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	65	82	88	90	91	92	91
Efficiency	92.7	94.1	93.8	92.7	91.4	89.9	91.9
Speed	3578	3555	3531	3503	3474	3441	3486
Line amperes	16.1	24.4	34.1	45.3	56.6	68.6	52.08

ABB Motors and Mechanical Inc.

WINDING # 39WGX287

Typical performance - not guaranteed values.

40 HP 3 PH 60 HZ 3510 RPM 460 V 3956M

TORQUES (LB-FT): PO=252 PU=80.9 LR=115 LRA=326





