

ABB BALDOR RELIANCE III

Customer information packet

EM2550T

100HP, 3540RPM, 3PH, 60HZ, 365TS, 4266M, OPSB

Specifications

Enclosure	OPSB
Frame	365TS
Frame Material	Steel
Frequency	60.00 Hz
Motor Letter Type	Three Phase
Output @ Frequency	100.000 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	3600 RPM @ 60 HZ
Voltage @ Frequency	230.0 V @ 60 HZ 460.0 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	220.000 A @ 230.0 V 244.000 A @ 208.0 V 110.000 A @ 460.0 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
Front Face Code	Standard
Front Shaft Indicator	None
Heater Indicator	No Heater
High Voltage Full Load Amps	110.0 a

Part Detail

Revision	R
Type	AC
Mech. spec.	42E212
Base	
Status	PRD/A
Elec. spec.	42WGW937
Layout	42LYE212
Eff. date	11-29-2023
CD Diagram	CD0180
Poles	02
Leads	9#4
Proprietary	False
Created date	05-14-2012

Insulation Class	F
Inverter Code	Inverter Ready
KVA Code	G
Lifting Lugs	Standard Lifting Lugs
Locked Bearing Indicator	Locked Bearing
Motor Lead Exit	Ko Box
Motor Lead Quantity/Wire Size	9 @ 4 AWG
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	4266M
Mounting Arrangement	F1
Number of Poles	2
Overall Length	27.81 IN
Power Factor	91
Product Family	General Purpose
Pulley End Bearing Type	Ball
Pulley Face Code	Standard
Pulley Shaft Indicator	Standard
Rodent Screen	None
RoHS Status	ROHS COMPLIANT
Service Factor	1.15
Shaft Diameter	1.875 IN
Shaft Extension Location	Pulley End
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	No Slinger
Speed	3540 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.	EM2550T			P/N					ENCLOSURE			OPSB
SPEC.	42E212W937		CC	010A	FRAME		365TS		S/N			
HP	100			CLASS		F	HZ		60			
RPM	3540			PH	3	DES		A				
VOLT	230/460			KVA-CODE			G		ODE BRG	6311	DE BRG	6313
AMP	220/110											
RATING	40C AMB-CONT			GREASE			POLYREX EM					
NEMA-NOM-EFF	93.6	PF	91	SER.F.	1.15							
	50HZ 75HP 190/380V 200/100A						SF 1.0					
HTR-VOLTS	HTR-AMPS											

Accessories

Part number	Description	Multiplier
42-1400	C FACE KIT	A8

AC Induction Motor Performance Data

Record # 38382

Typical performance - not guaranteed values

Winding: 42WGW937-R001			Type: 4266M		Enclosure: OPSB	
Nameplate Data				460 V, 60 Hz: High Voltage Connection		
Rated Output (HP)		100		Full Load Torque		148 LB-FT
Volts		230/460		Start Configuration		direct on line
Full Load Amps		220/110		Breakdown Torque		483 LB-FT
R.P.M.		3540		Pull-up Torque		172 LB-FT
Hz	60	Phase	3	Locked-rotor Torque		245 LB-FT
NEMA Design Code		B	KVA Code	Starting Current		771 A
Service Factor (S.F.)		1.15		No-load Current		23.5 A
NEMA Nom. Eff.		93.6	Power Factor	Line-line Res. @ 25°C		0.0539 Ω
Rating - Duty		40C AMB-CONT		Temp. Rise @ Rated Load		45°C
S.F. Amps				Temp. Rise @ S.F. Load		55°C
				Locked-rotor Power Factor		21
				Rotor inertia		5.16 LB-FT2

Load Characteristics 460 V, 60 Hz, 100 HP

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	72	87	90	91	91	89	91
Efficiency	91.3	93.9	94	93.6	92.7	91.6	93
Speed	3584	3568	3552	3536	3518	3496	3525
Line amperes	36.1	57.7	82.8	110	138	169	127

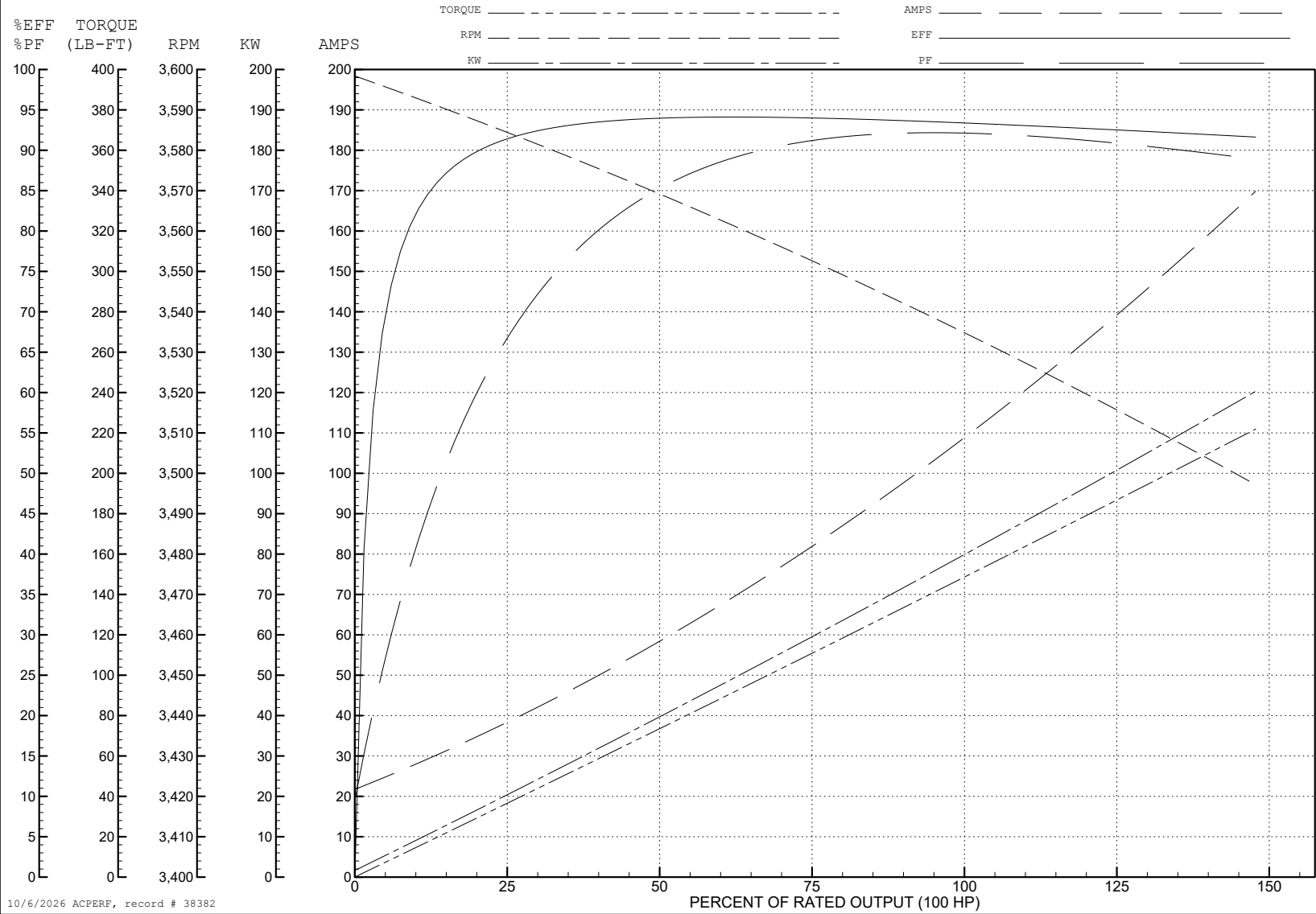
ABB Motors and Mechanical Inc.

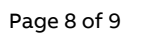
WINDING # 42WGW937

Typical performance - not guaranteed values.

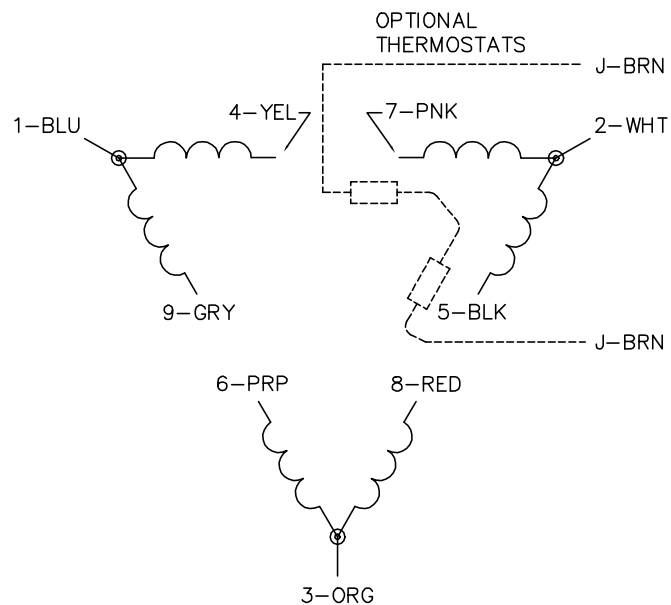
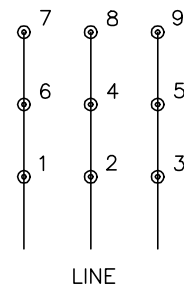
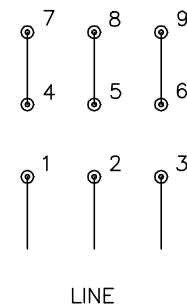
100 HP 3 PH 60 HZ 3540 RPM 460 V 4266M

TORQUES (LB-FT): PO=483 PU=172 LR=245 LRA=771





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.

REV. DESC: ADD CLASS CONN00000007

REV. LTR: D

VERSION: 01

TDR: 000001099922

FILE: \AAA\00005\148

REVISED: 10: 25: 29 02/19/2019

BY: ENBRIRO

MTL: -


BALDOR - RELIANCE®

3PH, DV, 9 LEADS, DELTA CONNECTION

SH 1 of 1

CD0180