

ABB BALDOR RELIANCE III

Customer information packet

VL3509-50

1/.75KW, 2890RPM, 1PH, 50HZ, 56C, 3524LC, TEFC

Class - None

Division - Not Applicable

Specifications

Enclosure	TEFC
Frame	56C
Frame Material	Steel
Frequency	50.00 Hz
Haz Area Class and Group	None
Haz Area Division	Not Applicable
Motor Letter Type	Cap Start, Cap Run
Output @ Frequency	.750 KW @ 50 HZ
Phase	1
Synchronous Speed @ Frequency	3000 RPM @ 50 HZ
Voltage @ Frequency	110.0 V @ 50 HZ 220.0 V @ 50 HZ
Agency Approvals	C UR US CE CURUS UKCA WEEE
Ambient Temperature	40 °C
Auxiliary Box	NO AUXILLARY BOX
Auxiliary Box Lead Termination	None
Base Indicator	No Mounting
Bearing Grease Type	Polyrex EM (-20F +300F)
Blower	None
Current @ Voltage	9.400 A @ 110.0 V 4.700 A @ 220.0 V
Design Code	-
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	77.4 %
Electrically Isolated Bearing	Not Electrically Isolated
Feedback Device	NO FEEDBACK
Front Shaft Indicator	None

Part Detail

Revision	D
Type	AC
Mech. spec.	35E022
Base	
Status	PRD/A
Elec. spec.	35WGG630
Layout	35LYE022
Eff. date	09-17-2025
CD Diagram	CD0055
Poles	02
Leads	4#16 A PH,2#18 B PH
Proprietary	False
Created date	10-10-2023

Heater Indicator	No Heater
High Voltage Full Load Amps	4.7 a
Insulation Class	B
Inverter Code	Not Inverter
KVA Code	J
Lifting Lugs	No Lifting Lugs
Locked Bearing Indicator	Locked Bearing
Motor Lead Quantity/Wire Size	4 @ 16 AWG, A PH
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	3524LC
Mounting Arrangement	F1
Number of Poles	2
Overall Length	13.23 IN
Power Factor	95
Product Family	General Purpose
Pulley End Bearing Type	Ball
Pulley Face Code	C-Face
Pulley Shaft Indicator	Standard
Rodent Screen	None
Service Factor	1.25
Shaft Diameter	0.625 IN
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	No Slinger
Speed	2890 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

NP1372L											
CAT.NO.	VL3509-50										
SPEC.	35E022G630										
HP	1/.75KW										
VOLTS	110/220										
AMP	9.4/4.7										
R.P.M. (1/MIN)	2890										
FRAME	56C		HZ		50		PH		1		
SER.F.	1.25	CODE		J	DES		-	CL	B		
NEMA-NOM-EFF	77.4	PF		95							
RATING	40C AMB-S1 CONT										
CC			IP44 IC411 26KG								
DE	6205		ODE		6203						
ENCL	TEFC	SN									
IE2-50HZ 76.7(75%),72.9(50%)											

AC Induction Motor Performance Data

Record # 101537

Typical performance - not guaranteed values

Winding: 35WGG630-R001			Type: 3524LC		Enclosure: TEFC	
Nameplate Data			220 V, 50 Hz: High Voltage Connection			
Rated Output (KW)		.75	Full Load Torque		1.851 LB-FT	
Volts		110/220	Start Configuration		direct on line	
Full Load Amps		9.4/4.7	Breakdown Torque		4.41 LB-FT	
R.P.M.		2890	Pull-up Torque		3.89 LB-FT	
Hz		50	Phase		1	
NEMA Design Code			- KVA Code		J	
Service Factor (S.F.)		1.25	No-load Current		1.22 A	
NEMA Nom. Eff.		77.4	Power Factor		0	
Rating - Duty		40C	AMB-CONT		Temp. Rise @ Rated Load	
S.F. Amps		11.6/5.8	Temp. Rise @ S.F. Load		63°C	

Load Characteristics 220 V, 50 Hz, 0.75 KW

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	82	90	94	95	95	95	95
Efficiency	59.8	72.9	76.7	78	76.7	74.6	76.7
Speed	2969.7	2947.7	2923.2	2894.6	2863.5	2822.9	2864
Line amperes	1.85	2.68	3.61	4.68	5.85	7.19	5.85

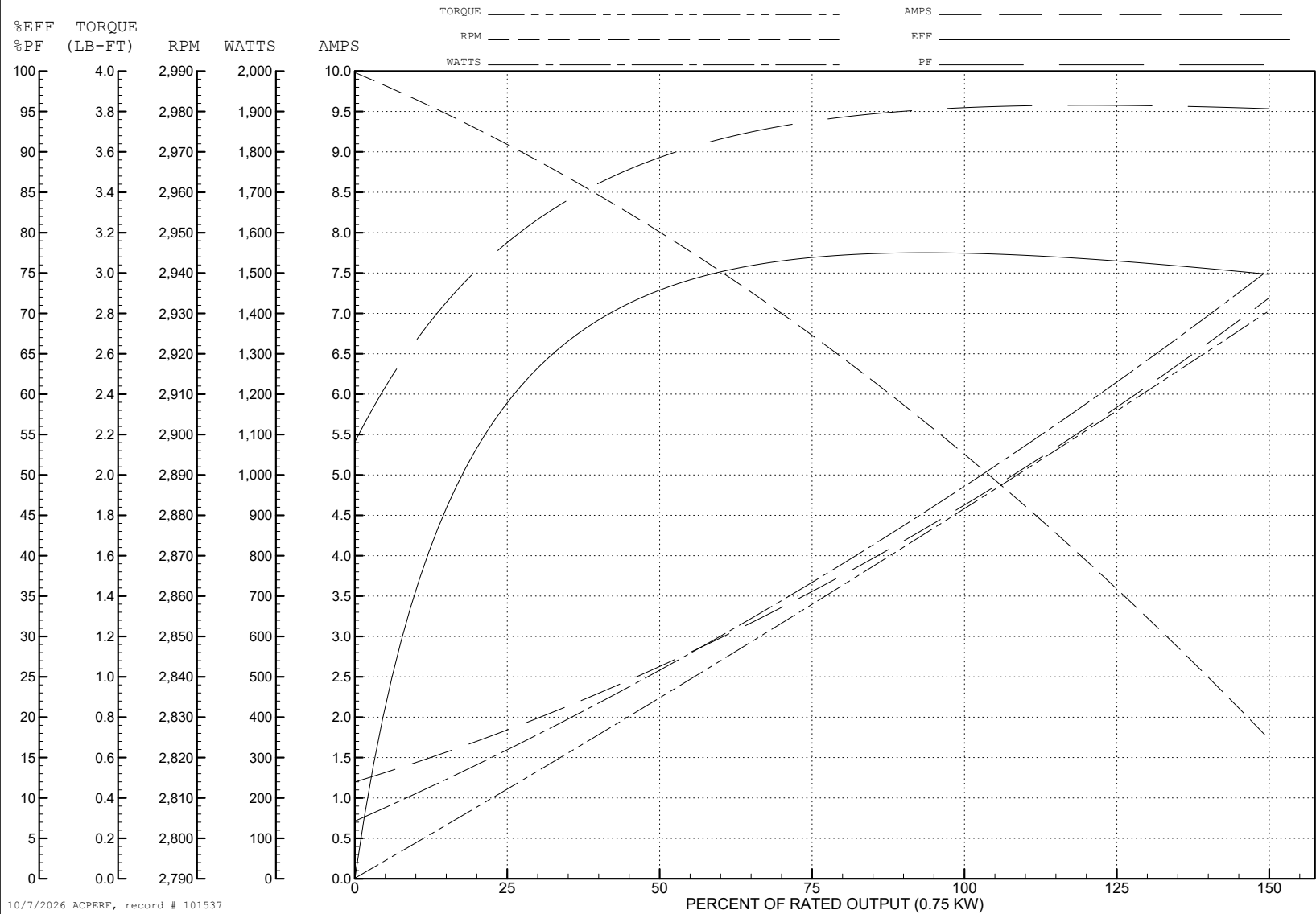
ABB Motors and Mechanical Inc.

WINDING # 35WGG630

Typical performance - not guaranteed values.

0.75 KW 1 PH 50 HZ 2890 RPM 220 V 3524LC

TORQUES (LB-FT) : PO=4.41 PU=3.89 LR=5.54 LRA=34.1



CD0055

