

ABB BALDOR RELIANCE III

Customer information packet

VNM3541

.75HP, 3480RPM, 3PH, 60HZ, 56C, 3520M, TENV, F1

Class - None

Division - Not Applicable

Specifications

Enclosure	TENV
Frame	56C
Frame Material	Steel
Frequency	60.00 Hz
Haz Area Class and Group	None
Haz Area Division	Not Applicable
Motor Letter Type	Three Phase
Output @ Frequency	.750 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	3600 RPM @ 60 HZ
Voltage @ Frequency	460.0 V @ 60 HZ 230.0 V @ 60 HZ 208.0 V @ 60 HZ
Agency Approvals	C UR US CURUS
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	2.200 A @ 208.0 V 2.000 A @ 230.0 V 1.000 A @ 460.0 V
Design Code	B
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	84.0 %
Electrically Isolated Bearing	Not Electrically Isolated
Feedback Device	NO FEEDBACK
Front Face Code	Standard
Front Shaft Indicator	None

Part Detail

Revision	Y
Type	AC
Mech. spec.	35E010
Base	
Status	PRD/A
Elec. spec.	35WGR090
Layout	35LYE010
Eff. date	01-05-2026
CD Diagram	CD0005
Poles	02
Leads	9#18
Proprietary	False
Created date	01-08-2008

Heater Indicator	No Heater
High Voltage Full Load Amps	1.0 a
Insulation Class	H
Inverter Code	Inverter Ready
KVA Code	N
Lifting Lugs	No Lifting Lugs
Locked Bearing Indicator	Locked Bearing
Motor Lead Exit	Ko Box
Motor Lead Quantity/Wire Size	9 @ 18 AWG
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	3520M
Mounting Arrangement	F1
Number of Poles	2
Overall Length	11.06 IN
Power Factor	82
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 Extension Location	Pulley End
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	No Slinger
Speed	3480 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

NP1256L											
CAT.NO.	VNM3541										
SPEC.	35E010R090G2										
HP	.75										
VOLTS	208-230/460										
AMP	2.2-2/1										
RPM	3480										
FRAME	56C		HZ	60				PH	3		
SER.F.	1.25		CODE	N	DES	B		CLASS	H		
NEMA-NOM-EFF	84		PF	82							
RATING	40C AMB-CONT										
CC											
DE	6205		ODE	6203							
ENCL	TENV		SN								
	SFA 2.6-2.4/1.2										

AC Induction Motor Performance Data

Record # 37297

Typical performance - not guaranteed values

Winding: 35WGR090-R016			Type: 3520M		Enclosure: TENV	
Nameplate Data			460 V, 60 Hz: High Voltage Connection			
Rated Output (HP)		.75	Full Load Torque		1.12 LB-FT	
Volts		208-230/460	Start Configuration		direct on line	
Full Load Amps		2.2-2/1	Breakdown Torque		6.1 LB-FT	
R.P.M.		3480	Pull-up Torque		4.3 LB-FT	
Hz	60 Phase	3	Locked-rotor Torque		5.1 LB-FT	
NEMA Design Code		B KVA Code	Starting Current		11.3 A	
Service Factor (S.F.)		1.25	No-load Current		0.545 A	
NEMA Nom. Eff.		84 Power Factor	Line-line Res. @ 25°C		15.4 Ω	
Rating - Duty		40C AMB-CONT	Temp. Rise @ Rated Load		52°C	
S.F. Amps		2.6-2.4/1.2	Temp. Rise @ S.F. Load		63°C	
			Locked-rotor Power Factor		53	
			Rotor inertia		0.0553 LB-FT2	

Load Characteristics 460 V, 60 Hz, 0.75 HP

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	45	65	77	82	87	86	87
Efficiency	65	77.1	81.7	83.6	84.5	83.9	84.5
Speed	3573	3550	3528	3503	3478	3451	3478
Line amperes	0.599	0.71	0.848	1.02	1.18	1.41	1.18

ABB Motors and Mechanical Inc.

WINDING # 35WGR090

Typical performance - not guaranteed values.

0.75 HP 3 PH 60 HZ 3480 RPM 460 V 3520M

TORQUES (LB-FT) : PO=6.1 PU=4.3 LR=5.1 LRA=11.3





