

ABB BALDOR RELIANCE III

Customer information packet

EM3216T

1HP, 850RPM, 3PH, 60HZ, 182T, 3628M, OPEN, F1, N

Class - None

Division - Not Applicable

Specifications

Enclosure	OPEN
Frame	182T
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	1.000 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	900 RPM @ 60 HZ
Voltage @ Frequency	460.0 V @ 60 HZ 230.0 V @ 60 HZ
Agency Approvals	C UR US CURUS CURUSEEV
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	4.200 A @ 208.0 V 4.200 A @ 230.0 V 2.100 A @ 460.0 V
Design Code	B
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	75.5 %
Electrically Isolated Bearing	Not Electrically Isolated
Feedback Device	NO FEEDBACK
Front Face Code	Standard
Front Shaft Indicator	None

Part Detail

Revision	J
Type	AC
Mech. spec.	36B001
Base	
Status	PRD/A
Elec. spec.	36WGR622
Layout	36LYB001
Eff. date	01-05-2026
CD Diagram	CD0005
Poles	08
Leads	9#16
Proprietary	False
Created date	04-27-2015

Heater Indicator	No Heater
High Voltage Full Load Amps	2.1 a
Insulation Class	F
Inverter Code	Not Inverter
IP Rating	NONE
KVA Code	J
Lifting Lugs	No Lifting Lugs
Locked Bearing Indicator	No Locked Bearing
Motor Lead Exit	Ko Box
Motor Lead Quantity/Wire Size	9 @ 16 AWG
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	3628M
Mounting Arrangement	F1
Number of Poles	8
Overall Length	15.00 IN
Power Factor	60
Product Family	General Purpose
Pulley End Bearing Type	Ball
Pulley Face Code	Standard
Pulley Shaft Indicator	Standard
Rodent Screen	None
Service Factor	1.15
Shaft Diameter	1.125 IN
Shaft Extension Location	Pulley End
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	No Slinger
Speed	850 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

NP2116L											
CAT.NO.	EM3216T										
SPEC.	36B001R622G1										
HP	1										
VOLTS	230/460										
AMP	4.2/2.1										
RPM	850										
FRAME	182T			HZ	60			PH	3		
SER.F.	1.15		CODE	J		DES	B	CL	F		
NEMA-NOM-EFF	75.5		PF	60							
RATING	40C AMB-CONT										
CC	010A										
DE	6206		ODE	6205							
ENCL	OPEN		SN								

AC Induction Motor Performance Data

Record # 50457

Typical performance - not guaranteed values

Winding: 36WGR622-R003			Type: 3628M		Enclosure: OPEN	
Nameplate Data			460 V, 60 Hz: High Voltage Connection			
Rated Output (HP)		1	Full Load Torque		6.26 LB-FT	
Volts		230/460	Start Configuration		direct on line	
Full Load Amps		4.2/2.1	Breakdown Torque		19.8 LB-FT	
R.P.M.		850	Pull-up Torque		12.1 LB-FT	
Hz	60	Phase	Locked-rotor Torque		15.7 LB-FT	
NEMA Design Code	B	KVA Code	Starting Current		9.52 A	
Service Factor (S.F.)		1.15	No-load Current		1.55 A	
NEMA Nom. Eff.	75.5	Power Factor	Line-line Res. @ 25°C		15.2 Ω	
Rating - Duty		40C AMB-CONT	Temp. Rise @ Rated Load		62°C	
S.F. Amps			Temp. Rise @ S.F. Load		72°C	
			Locked-rotor Power Factor		46.4	
			Rotor inertia		0.263 LB-FT2	

Load Characteristics 460 V, 60 Hz, 1 HP

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	26	39	51	60	66	71	64
Efficiency	60.3	71.7	75.3	76	74.6	72.1	75.2
Speed	890	879	868	855	840	822	846
Line amperes	1.57	1.69	1.87	2.09	2.39	2.77	2.27

ABB Motors and Mechanical Inc.

WINDING # 36WGR622

Typical performance - not guaranteed values.

1 HP 3 PH 60 HZ 850 RPM 460 V 3628M

TORQUES (LB-FT): PO=19.8 PU=12.1 LR=15.7 LRA=9.52





