

ABB BALDOR RELIANCE III

Customer information packet

HBAO2333T

15 AIR OVERHP, 1765RPM, 3PH, 60HZ, 254T, 0944

Class - None

Division - Not Applicable

Specifications

Enclosure	TEAO
Frame	254T
Frame Material	Iron
Frequency	60.00 Hz
Haz Area Class and Group	None
Haz Area Division	Not Applicable
Motor Letter Type	Three Phase
Output @ Frequency	15.000 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	1800 RPM @ 60 HZ
Voltage @ Frequency	460.0 V @ 60 HZ 230.0 V @ 60 HZ
Agency Approvals	CSA EEV CURUSEEV NEMA PREMIUM NEMA_PREMIUM WEEE
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	38.000 A @ 208.0 V 36.200 A @ 230.0 V 18.100 A @ 460.0 V
Design Code	A
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	92.4 %
Electrically Isolated Bearing	Electrically Isolated Bearings
Feedback Device	NO FEEDBACK

Part Detail

Revision	L
Type	AC
Mech. spec.	09M871
Base	
Status	PRD/A
Elec. spec.	09WGT597
Layout	09LYM871
Eff. date	09-30-2024
CD Diagram	CD0005
Poles	04
Leads	9#12
Proprietary	False
Created date	09-21-2021

Front Shaft Indicator	None
Heater Indicator	No Heater
High Voltage Full Load Amps	18.1 a
Insulation Class	F
Inverter Code	Inverter Ready
KVA Code	H
Lifting Lugs	Standard Lifting Lugs
Locked Bearing Indicator	Locked Bearing
Max Speed	2700 rpm
Motor Lead Quantity/Wire Size	9 @ 12 AWG
Motor Lead Termination	Flying Leads
Motor Standards	NEMA
Motor Type	0944M
Mounting Arrangement	F1
Number of Poles	4
Overall Length	20.75 IN
Power Factor	84
Product Family	General Purpose
Pulley End Bearing Type	Sealed Bearing
Pulley Face Code	Standard
Pulley Shaft Indicator	Standard
Rodent Screen	None
Service Factor	1.15
Shaft Diameter	1.625 IN
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	Shaft Slinger
Speed	1765 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

NP4312A01M01L																					
CAT #		HBAO2333T								SER #				CC		WGT		268	LBS		
SPEC		09M871T597G2								RATING				40C AMB-CONT							
HZ		VOLTS				AMPS				RPM		HP		SF		NEMA NOM. EFF					
60		230/460				36.2/18.1								1765		15AO		1.15		92.4	
PH	3	CL	H	CODE	H	DES	A	ENCL	TEAO			IP	54	PF	84	%	AIR OVER				
DE BRG		6309						ODE BRG				6208				FRAME		254T			
INV TYPE:				VPWM				SL HZ		1.17		CHP		60	TO		90	1.5:1			
WK2		1.93		LB FT2				MAX RPM				2700		CT	6	TO		60	10:1		
14.6/7.3												VT		3	TO		60	20:1			
SFA 41/20.5																					
YR:																					

AC Induction Motor Performance Data

Record # 95848

Preliminary Data Sheet

Winding: 09WGT597-R013			Type: 0944M		Enclosure: TEAO		
Nameplate Data			460 V, 60 Hz: High Voltage Connection				
Rated Output (HP)		15 AIR OVER	Full Load Torque		44.5 LB-FT		
Volts		230/460	Start Configuration		direct on line		
Full Load Amps		36.2/18.1	Breakdown Torque		154 LB-FT		
R.P.M.		1765	Pull-up Torque		67.2 LB-FT		
Hz	60	Phase	3	Locked-rotor Torque		83.5 LB-FT	
NEMA Design Code		A	KVA Code	H	Starting Current		129 A
Service Factor (S.F.)		1.15		No-load Current		7.32 A	
NEMA Nom. Eff.		92.4	Power Factor	84	Line-line Res. @ 25°C		0.61 Ω
Rating - Duty		40C AMB-CONT		Temp. Rise @ Rated Load		52°C	
S.F. Amps		41/20.5		Temp. Rise @ S.F. Load		67°C	
				Locked-rotor Power Factor		33.3	
				Rotor inertia		1.92 lb-ft²	

Load Characteristics 460 V, 60 Hz, 15 HP

% of Rated Load	25	50	75	100	125	150	S.F.
Power Factor	48	69	79	84	86	87	86
Efficiency	88	92.1	92.7	92.5	91.7	90.7	91.9
Speed	1792	1785	1777	1768	1759	1749	1761
Line amperes	8.45	11	14.3	18.1	22.2	26.7	20.5

ABB Motors and Mechanical Inc.

WINDING # 09WGT597

Typical performance - not guaranteed values.

15 HP 3 PH 60 HZ 1765 RPM 460 V 0944M

TORQUES (LB-FT): PO=154 PU=67.2 LR=83.5 LRA=129





