ABB BALDOR RELIANCE

Customer information packet

IDVSM4314T

60HP, 1800RPM, 3PH, 60HZ, 364T, TEFC, FOOT,
Class - None
Division - Not Applicable

Copyright © All product information within this document is subject to ABB Motors and Mechanical Inc. copyright © protection, unless otherwise noted.
11/17/2026 3:32:58 PM

Specifications

Enclosure	TEFC
Frame	364T
Frame Material	Iron
Frequency	60.00 Hz
	90.00 Hz
Haz Area Class and Group	None
Haz Area Division	Not Applicable
Motor Letter Type	Three Phase
Output @ Frequency	60.000 HP @ 60 HZ
	60.000 HP @ 90 HZ
Phase	3
Synchronous Speed @ Frequency	3000 RPM @ 90 HZ
Voltage @ Frequency	460.0 V @ 60 HZ
	460.0 V @ 90 HZ
	230.0 V @ 90 HZ
	230.0 V @ 60 HZ
Agency Approvals	CCSA US
Ambient Temperature	40 °C
Auxiliary Box	NO AUXILLARY BOX
Base Indicator	Rigid
Bearing Grease Type	Polyrex EM (-20F +300F)
Constant Torque Speed Range	1000:1
Current @ Voltage	71.200 A @ 460.0 V
	69.100 A @ 460.0 V
	142.000 A @ 230.0 V
	138.000 A @ 230.0 V
Design Code	A
Drip Cover	No Drip Cover
Duty Rating	CONT
Feedback Device	NO FEEDBACK
Heater Indicator	No Heater
High Voltage Full Load Amps	69.1 a

Part Detail

Revision	M
Type	AC
Mech. spec.	
Base	
Status	PRD/A
Elec. spec.	A36WG4074
Layout	617431-412
Eff. date	07-23-2025
CD Diagram	416820-002
Poles	04
Leads	3#4,6#6
Proprietary	False
Created date	10-19-2010

Insulation Class	F
Inverter Code	Inverter Duty
KVA Code	J
Lifting Lugs	No Lifting Lugs
Max Speed	3600 rpm
Motor Lead Quantity/Wire Size	3 @ 4 AWG
Motor Standards	NEMA
Motor Type	A36062M
Mounting Arrangement	F1
Number of Poles	4
Overall Length	33.44 IN
Pulley End Bearing Type	Ball
Pulley Face Code	Standard
Service Factor	1.00
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	No Slinger
Speed	1785 rpm
	2675 rpm
Speed Code	Single Speed
Starting Method	Direct on line
Thermal Device - Bearing	None
Thermal Device - Winding	Normally Closed Thermostat

Nameplate

000613007HV

CAT NO	IDVSM4314T			**SPEC NO.**	P36G3221							
SER.NO.				**FRAME**	364T							
	HP	**RPM**	**VOLTS**	**AMPS**		**HZ**	**TYPE**	P				
BASE	60	1785	230/460	142/71		60	**SF**	1.00				
MAX	60	2675	230/460	136/68		90	**INSUL.CLASS**	F				
DRIVE END BEARING	65BC03J30X		**CONSTANT TORQUE**		**DUTY**	CONT	**AMB**	40				
OPP D.E. BEARING	65BC03J30X		1000:1	**ENCL**	TEFC	**PHASE**	3					
DESIGN NO.	A36WG4074-R002		**FLUX AMPS**	54/27		**VPWM INVERTER READY**						
MAX SPEED/RPM	3600		**OVERTEMP PROT**	2	**WK2**	14.32	**POLES**	4	**WEIGHT**			

				WYE CONN EQ CKT OHMS PER PHASE (BASE RATING, 20C)			
NP AMPS	230/460	Base Volt	460	R1	0.052	X1	0.286
NP AMPS	142/71//136/68	NL AMPS	27.38	R2	0.306	X2	0.113
HP	60	Slip (HZ)	0.53	R2B	0.023	X2B	0.418
BASE SPEED	1784	WK^2 (lb-ft^2)	14.300	R2E	0.007	XM	8.590
PHASE/HZ	3/60						

Rated Full Load Data

	RPM	HP	Torque	Volts	Freq-Hz	Amps
Base Speed	1784	59.8	176.0	460	60	70.1
Max Speed	2675	60.1	118.0	460	90	66.8
CT Min Speed	1.784	0.060	176.0	0.46	0.06	70.1

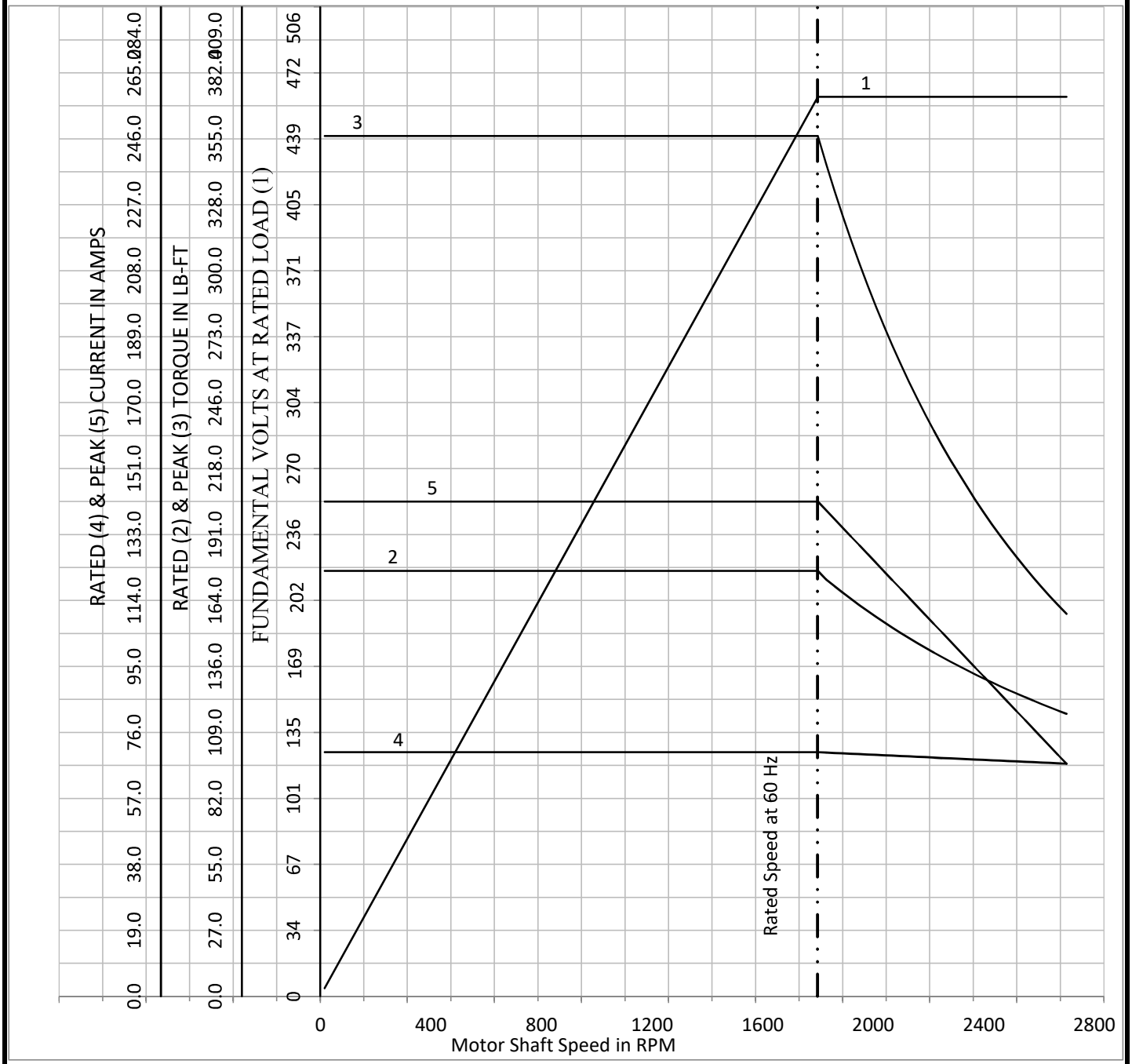
Load Performance at Base Speed

	RPM	HP	Torque	Volts	Freq-Hz	Amps
No Load	1799	0.0	0.0	460	60	27.4
1/4	1796	15.0	43.7	460	60	32.0
1/2	1792	29.9	87.7	460	60	42.2
3/4	1788	45.0	132.0	460	60	55.4
Full Load	1784	59.8	176.0	460	60	70.1
O/L	1766	119.8	356.0	460	60	142.0

Remarks: Calculated Data

VOLTS	230/460	Base Volt	460	WYE CONN EQ CKT OHMS PER PHASE (BASE RATING, 20C)			
NP AMPS	142/71//136/68	NL AMPS	27.38	R1	0.052	X1	0.286
HP	60	Slip (HZ)	0.53	R2	0.306	X2	0.113
BASE SPEED	1784	WK^2 (lb-ft^2)	14.300	R2B	0.023	X2B	0.418
PHASE/HZ	3/60			R2E	0.007	XM	8.590

Variable Speed AC Motor Curves



Calculated Data

Data Valid For Nameplate Speed Range only

BALDOR • RELIANCE

DR BY USBRRAN1
CK BY CD
APP BY USBRRAN1
DATE 8/17/2026

A-C MOTOR PERFORMANCE CURVES

A36WG4074

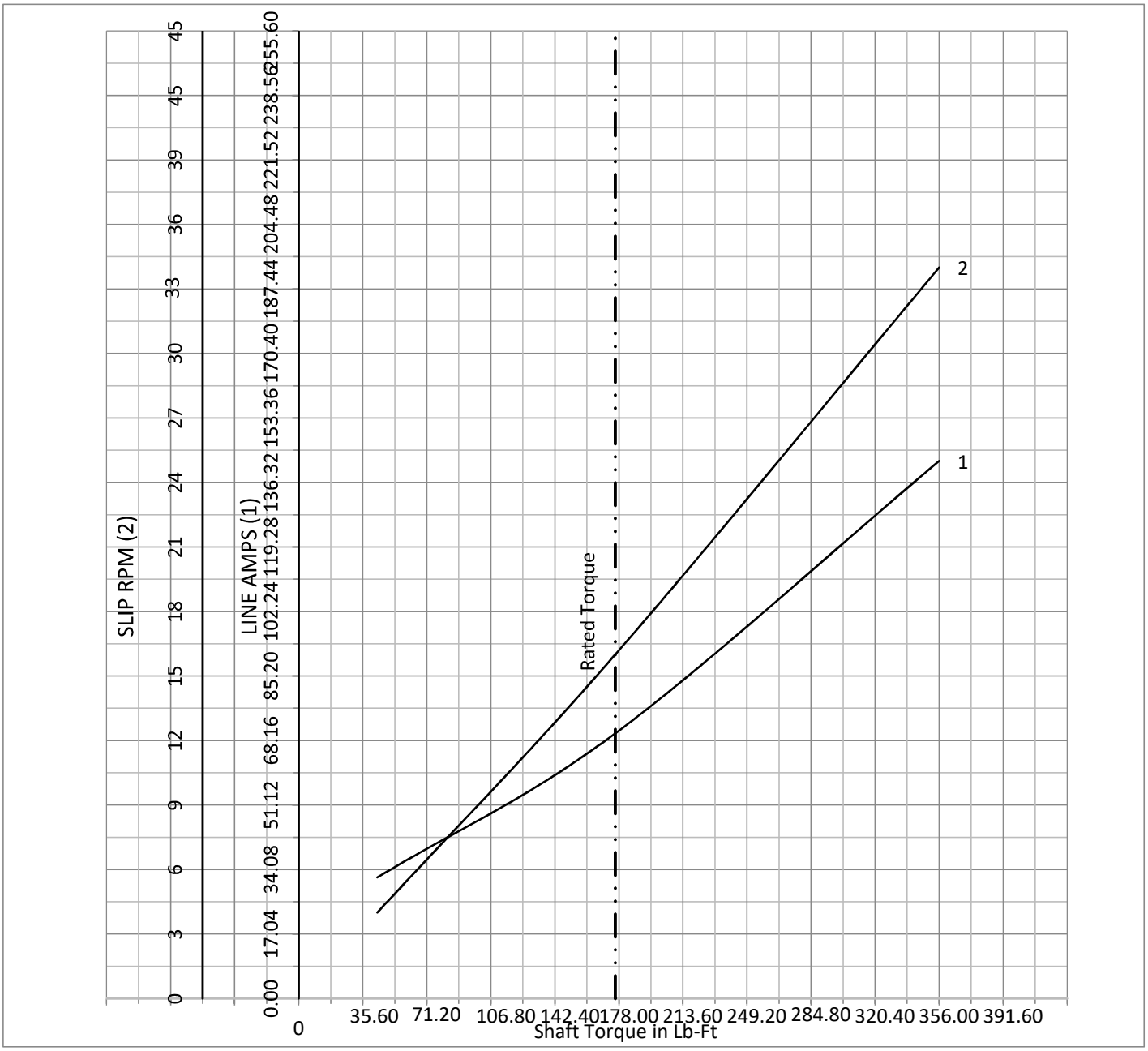
Record: 77714

IDVSM4314T - 60HP, 1800RPM, 3PH, 60HZ, 364T, TEFC, FOOT,

VOLTS	230/460	0	0	WYE CONN EQ CKT OHMS PER PHASE (BASE RATING, 20C)			
NP AMPS	142/71//136/68	Base Volt	460	R1	0.052	X1	0.286
HP	60	NL AMPS	27.38	R2	0.306	X2	0.113
BASE SPEED	1784	Slip (HZ)	0.53	R2B	0.023	X2B	0.418
PHASE/HZ	3/60	WK2 (lb-ft2)	14.300	R2E	0.007	XM	8.590

Vector PWM Inverer Duty

Vaiable Speed AC Motor Curves



Calculated Data

Data Valid For Nameplate Speed Range only

BALDOR • RELIANCE

DR BY USBRRAN1
CK BY CD
APP BY USBRRAN1
DATE 8/17/2026

A-C MOTOR PERFORMANCE CURVES

A36WG4074

Record: 77714

617431-412

DUTY MASTER ALTERNATING CURRENT MOTORS

ENCLOSURE: TOTALLY ENCLOSED

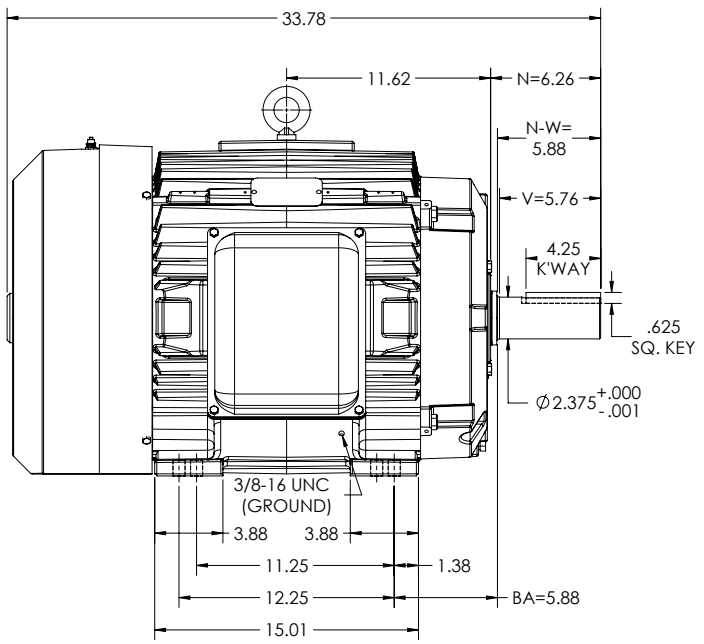
SQUIRREL-CAGE INDUCTION

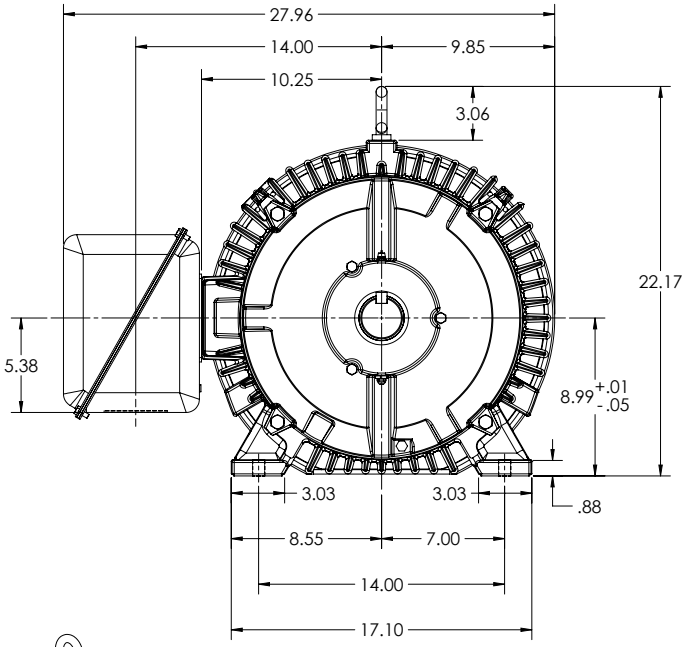
MOUNTING: FOOT, F-1 SIDE

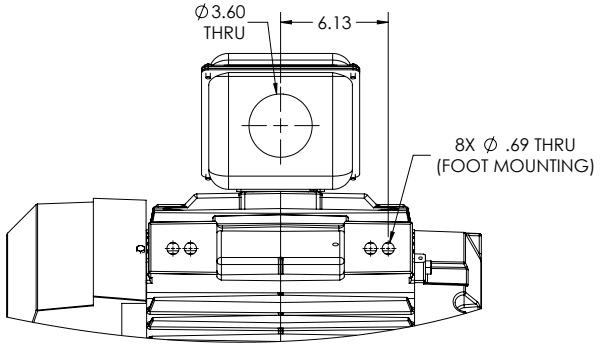
E365T/E364T FRAME MOUNTING

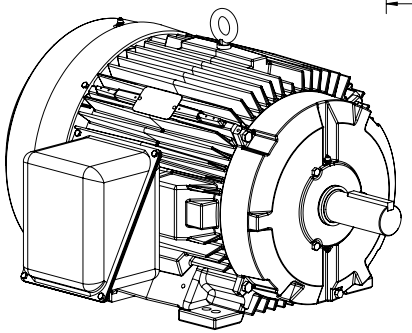
COOLING: FAN COOLED

STEEL CONDUIT BOX









DIMENSIONS ARE IN INCHES.
WEIGHT (LBS.) 800, MOTOR WEIGHT MAY VARY 15% DEPENDING ON RATING.
CUSTOMER IS RESPONSIBLE FOR DETERMINING THAT MOTOR PERFORMANCE IS SUITABLE IN THE APPLICATION.

SHEET NUMBER 1 OF 2

617431-412

IF MOUNTING CLEARANCE DETAILS ARE REQUIRED, CONSULT FACTORY.
MAX PERMISSIBLE SHAFT RUNOUT WHEN MEASURED AT END OF STANDARD SHAFT EXTENSION IS .003" T.I.R.

REV. DESC: UPDATE DS QUALITY			
REV: F	VERSION: 06	REVISED: 01:00:49 01/02/2024	TDR: 000001222947
MODEL NO. 617431-412			
BY: USJEDIL			C

BALDOR

E365/364T TEFC FOOT F1/STEEL CONDUIT BOX

617431-412

617431-412

DUTY MASTER ALTERNATING CURRENT MOTORS

ENCLOSURE: TOTALLY ENCLOSED

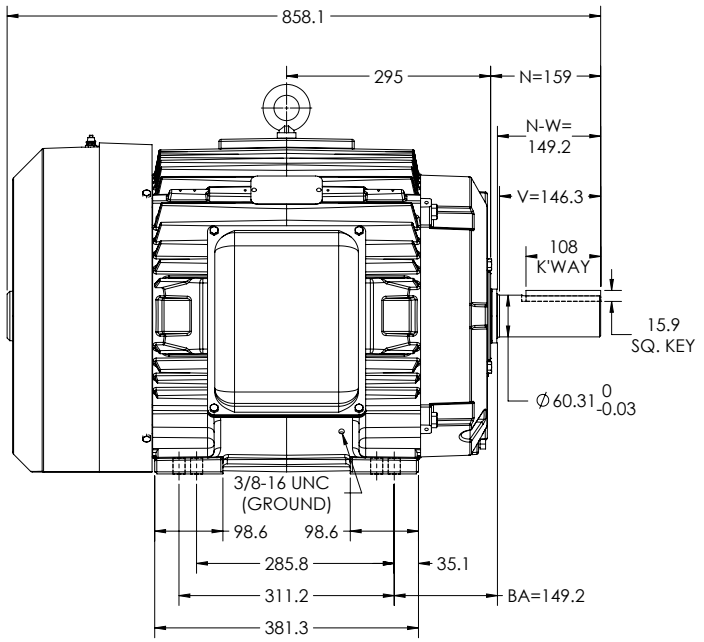
SQUIRREL-CAGE INDUCTION

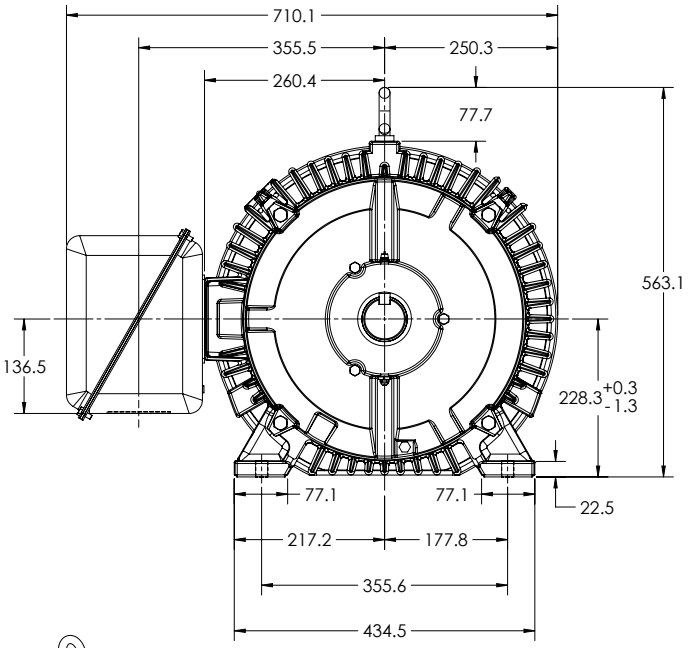
MOUNTING: FOOT, F-1 SIDE

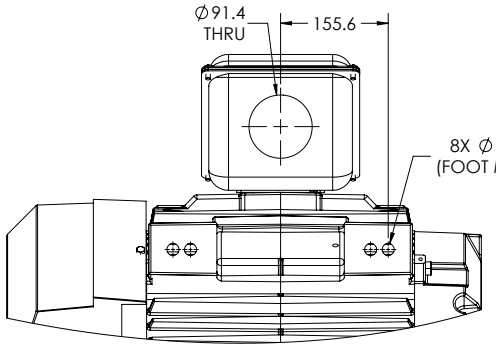
E365T/E364T FRAME MOUNTING

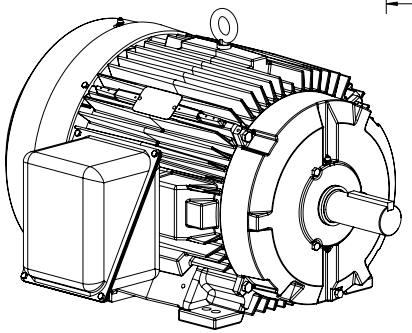
COOLING: FAN COOLED

STEEL CONDUIT BOX









DIMENSIONS ARE IN MILLIMETERS.
WEIGHT (KG) 362. MOTOR WEIGHT MAY VARY 15% DEPENDING ON RATING.
CUSTOMER IS RESPONSIBLE FOR DETERMINING THAT MOTOR PERFORMANCE IS SUITABLE IN THE APPLICATION.

IF MOUNTING CLEARANCE DETAILS ARE REQUIRED, CONSULT FACTORY.
MAX PERMISSIBLE SHAFT RUNOUT WHEN MEASURED AT END OF STANDARD SHAFT EXTENSION IS .08 T.I.R.

REV. DESC: UPDATE DS QUALITY			
REV: F	VERSION: 06	REVISED: 01:00:49 01/02/2024	TDR: 000001222947
MODEL NO. 617431-412			
BY: USJEDIL			C

BALDOR

E365/364T TEFC FOOT F1/STEEL CONDUIT BOX

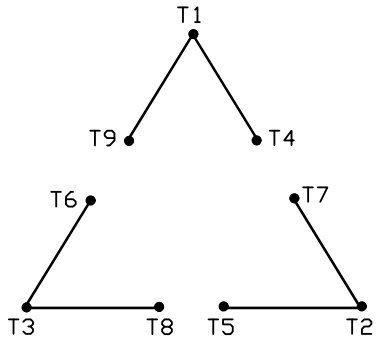
SHEET NUMBER 2 OF 2

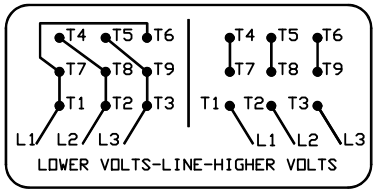
617431-412

617431-412

416820-002

A-C MOTOR
CONNECTION DIAGRAM
STANDARD 9 LEAD DELTA-CONNECTED





(N. P. 1575-B)

REV. DESC: ADJUST TEXT DARKNESS		
REV. LTR: B	VERSION: 02	TDR: 000001285318
FILE: \RAG\00022\453	REVISED: 09:36:26 09/24/2026	BY: USJOSUL
MTL: –		

ABB

CONN DIAG – STANDARD 9 LEAD, DELTA-CONNECTED

SH1 of 1

416820-002