

ABB BALDOR RELIANCE III

Customer information packet

EM44352T-4

350HP, 3570RPM, 3PH, 60HZ, 449TS, TEFC, F1

Class - None

Division - Not Applicable

Specifications

Enclosure	TEFC
Frame	449TS
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	350.000 HP @ 60 HZ
Phase	3
Synchronous Speed @ Frequency	3600 RPM @ 60 HZ
Voltage @ Frequency	460.0 V @ 60 HZ
Agency Approvals	CURUSEEV
Ambient Temperature	40 °C
Auxiliary Box	NO AUXILLARY BOX
Base Indicator	Rigid
Bearing Grease Type	Polyrex EM (-20F +300F)
Current @ Voltage	377.000 A @ 460.0 V
Design Code	B
Drip Cover	No Drip Cover
Duty Rating	CONT
Efficiency @ 100% Load	95.8 %
Feedback Device	NO FEEDBACK
Heater Indicator	No Heater
High Voltage Full Load Amps	377.0 a
Insulation Class	F
Inverter Code	Inverter Ready
IP Rating	NONE
KVA Code	F
Motor Lead Quantity/Wire Size	12 @ 1 AWG
Motor Standards	NEMA
Motor Type	A44144M
Mounting Arrangement	F1

Part Detail

Revision	E
Type	AC
Mech. spec.	
Base	
Status	PRD/A
Elec. spec.	A44WG2866
Layout	617427-445
Eff. date	09-23-2024
CD Diagram	416820-008
Poles	02
Leads	6#1 (02 per group)
Proprietary	False
Created date	04-02-2015

Number of Poles	2
Overall Length	49.47 IN
Power Factor	90
Product Family	General Industrial
Pulley End Bearing Type	Ball
Pulley Face Code	Standard
Service Factor	1.15
Shaft Diameter	2.375 IN
Shaft Ground Indicator	No Shaft Grounding
Shaft Rotation	Reversible
Shaft Slinger Indicator	No Slinger
Speed	3570 rpm
Speed Code	Single Speed
Starting Method	Wye Start - Delta Run
Thermal Device - Bearing	None
Thermal Device - Winding	None

Nameplate

NP2496L	
MOBIL POLYREX EM	

NP2349L

SPEC NO.	A44-7089-2866			CAT.NO.	EM44352T-4				FRAME	449TS	
HP	350	VOLTS	460	PHASE	3	DESIGN	B	TYPE	P		
RPM	3570	AMPS	377	HZ	60	AMB	40	SF	1.15		
DRIVE END BEARING	65BC03J30X		DUTY	CONT	INSUL.CLASS		F				
OPP D.E. BEARING	65BC03J30X		ENCL	TEFC	CODE	F					
SER.NO.				POWER FACTOR	90	NEMA-NOM-EFFICIENCY			95.8		
						MAX CORR KVAR	42	GUARANTEED EFFICIENCY		95	
						NEMA NOM/CSA QUOTED EFF					
						MOTOR WEIGHT					

ABB BALDOR RELIANCE III S/O		CUSTOMER INFORMATION PACKET					EM44352T-4 - 350HP, 3570RPM, 3PH, 60HZ, 449TS, TEFC, F1	
		FRAME	HP	TYPE	PHASE/ HERTZ	RPM	VOLTS	
		449T	350	P	3/60	3570	460	
AMPS	DUTY	AMB °C/ INSUL		S.F.	NEMA DESIGN	CODE LETTER	ENCLOSURE	
377	CONT	40/F		1.15	B	G	TEFC	
E/S	ROTOR	TEST S.O.		TEST DATE	STATOR RES. @25 °C OHMS (BETWEEN LINES)			
433632	418143013VE	---		---	.00706			
PERFORMANCE								
LOAD	HP	AMPERES		RPM	% POWER FACTOR	% EFFICIENCY		
NO LOAD	0	74.9		3600	8.22	0		
1/4	87.5	117		3593	75.8	92.5		
2/4	175	194		3586	88.7	95.3		
3/4	263	282		3579	91.0	95.8		
4/4	350	377		3571	90.8	95.8		
5/4	437	471		3563	91.0	95.5		
SPEED TORQUE								
		RPM		TORQUE % FULL LOAD	TORQUE LB.-FT.	AMPERES		
LOCKED ROTOR		0		203	1047	2497		
PULL UP		2700		156	803	1756		
BREAKDOWN		3468		228	1175	1166		
FULL LOAD		3571		100	515	377		
AMPERES SHOWN FOR 460 VOLT CONNECTION. IF OTHER CONNECTIONS ARE AVAILABLE, THE AMPERES WILL VARY INVERSELY WITH THE RATED VOLTAGE.								
XE MOTOR-TYPICAL DATA-NEMA NOM. EFF. 96.2 PCT. GUARANTEED MIN. EFF. 95.8PCT.								
		DRAWN BY: <u>J.J.HARRISON</u> CHECKED BY: <u>W.L.SMITH</u> APPROVED BY: <u>W.L.SMITH</u> DATE: <u>03/20/08</u>			AC MOTOR PERFORMANCE DATA		A44WG2866-R001 DATE ISSUED 09/02/22	

FRAME 449T

VOLTS 460

NEMA DESIGN B

TEST S.O. ---

HP 350

AMPS 377

CODE LETTER G

TEST DATE ---

TYPE P

DUTY CONT

ENCLOSURE TEFC

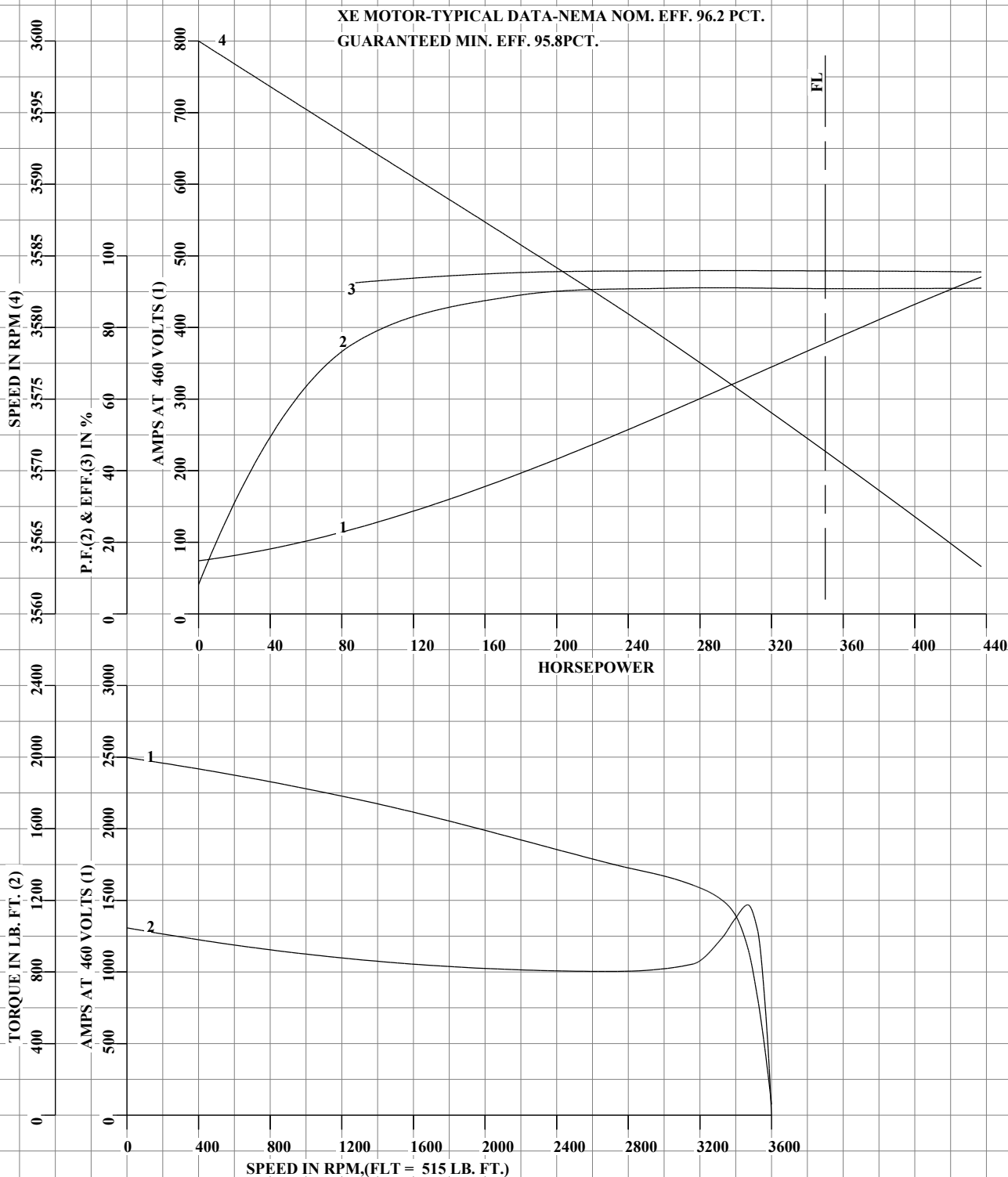
STATOR RES. @ 25°C .00706

PHASE / HERTZ 3/60

AMB °C / INSUL 40/F

E/S 433632

OHMS (BETWEEN LINES)



AMPERES SHOWN FOR 460 VOLT CONNECTION, IF OTHER VOLTAGE CONNECTIONS ARE AVAILABLE, THE AMPERES WILL VARY INVERSELY WITH THE RATED VOLTAGE.



DRAWN BY: J.J.HARRISON
CHECKED BY: W.L.SMITH
APPROVED BY: W.L.SMITH
DATE: 03/20/08

AC MOTOR
PERFORMANCE
DATA

A44WG2866-R001

ISSUE DATE 09/02/22

DUTY MASTER ALTERNATING CURRENT MOTORS

SQUIRREL-CAGE INDUCTION

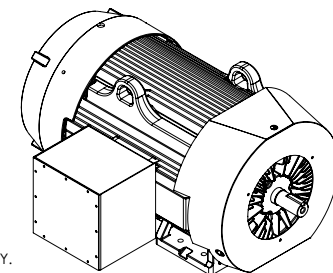
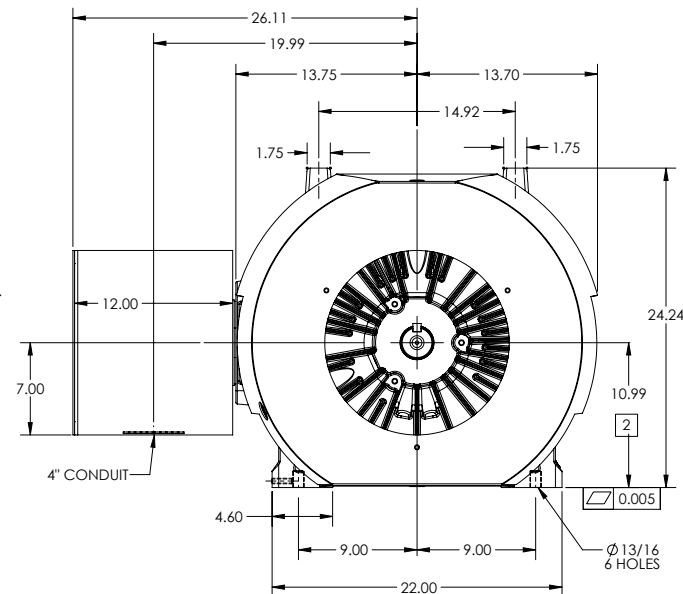
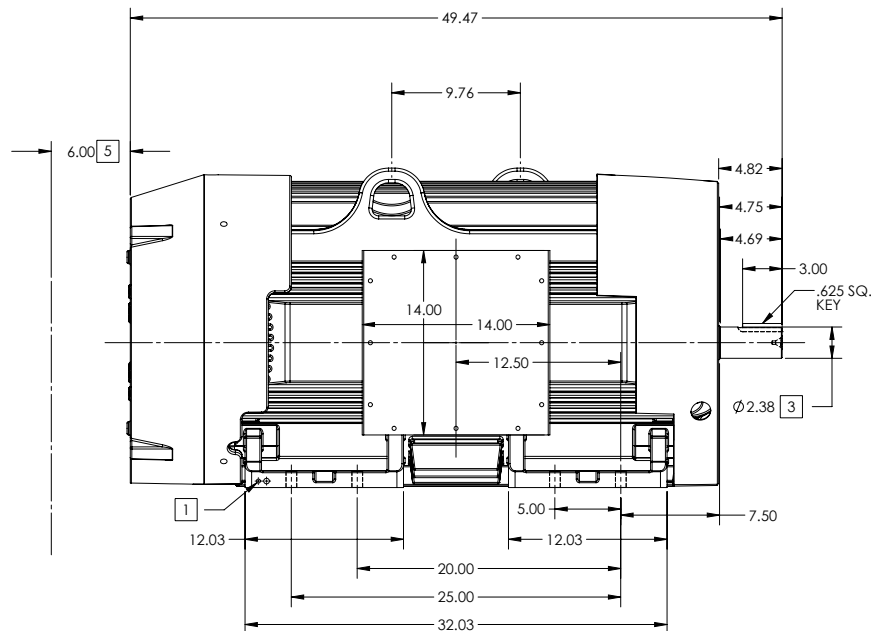
ENCLOSURE: TOTALLY ENCLOSED

FRAME 449TS ABOVE NEMA RATINGS (3600 RPM MAX)

COOLING: FAN COOLED

MOUNTING: FOOT

INCLUDES 447TS FRAME MOUNTING HOLES



4 WEIGHT (LBS): 3080

DRIVE END AIR DEFLECTOR IS ONLY INCLUDED WHEN NECESSARY.

DIMENSIONS ARE IN INCHES

CUSTOMER IS RESPONSIBLE FOR DETERMINING THAT MOTOR PERFORMANCE IS SUITABLE IN THE APPLICATION.

1. GROUND HOLES QTY 1 1/2-13 TAP; QTY 1 3/8-16 TAP
2. VARIES +.00, -.06
3. VARIES +.000, -.001
4. MOTOR WEIGHTS MAY VARY BY 1.5% DEPENDING ON RATING.
5. OBSTRUCTION MUST NOT ENCR OACH ON AIR INLET

CONDUIT BOX LOCATED ON OPPOSITE SIDE WHEN F-2.
IF MOUNTING CLEARANCE DETAILS ARE REQUIRED, CONSULT FACTORY.
MAXIMUM PERMISSIBLE SHAFT RUNOUT WHEN MEASURED AT END OF
STANDARD SHAFT EXTENSION IS .003" T.I.R. TO 5 INCH DIA.

SHEET NUMBER
1 OF 2

617427-445

REV. DESC: NEW DRAWING

REV: - VERSION: 00

REVISED: 11-13-38 04/02/2015

TDR: 00000918312

MODEL NO. 617427-445

BY: RAGEC

BALDOR

G449TS/447TS-FOOTED-SIDE/CENTER CONDUIT BOX-14X14X12

617427-445

DUTY MASTER ALTERNATING CURRENT MOTORS

SQUIRREL-CAGE INDUCTION

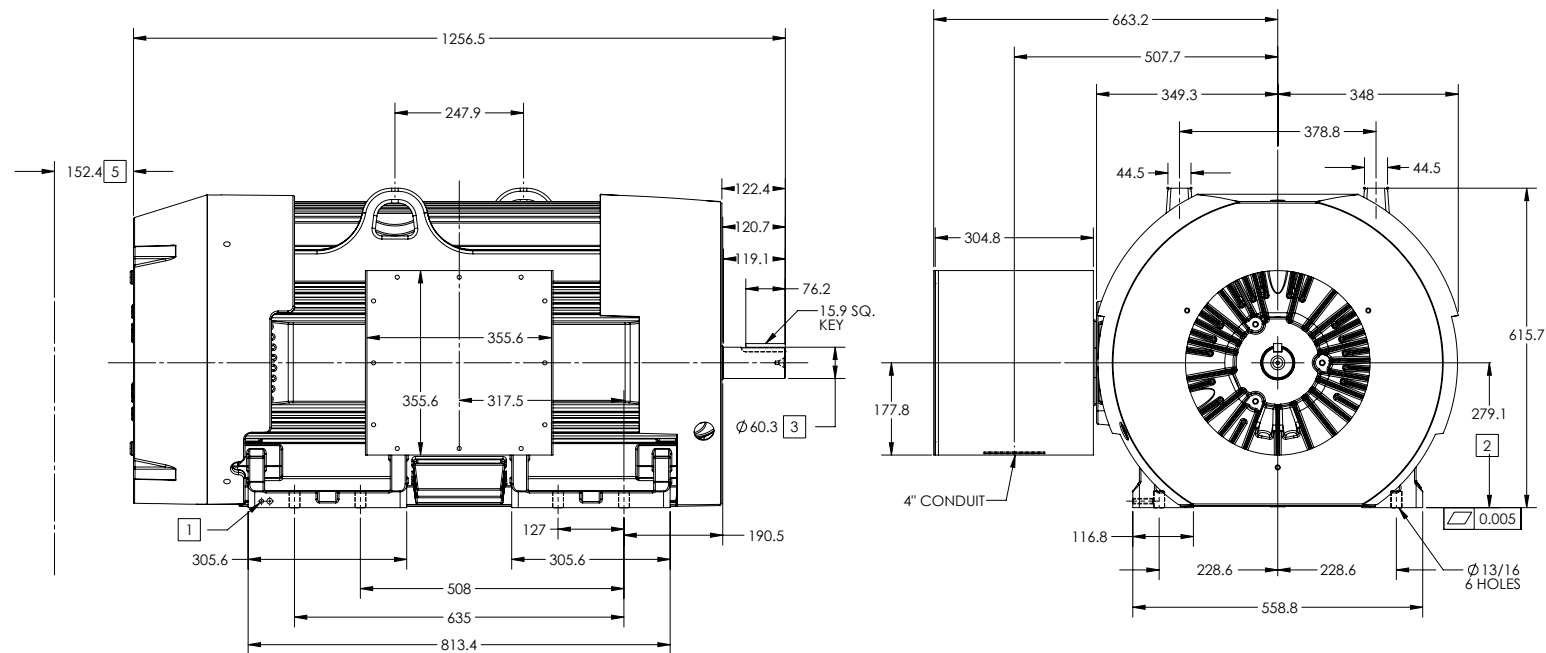
ENCLOSURE: TOTALLY ENCLOSED

FRAME 449TS ABOVE NEMA RATINGS (3600 RPM MAX)

COOLING: FAN COOLED

MOUNTING: FOOT

INCLUDES 447TS FRAME MOUNTING HOLES



1. GROUND HOLES QTY 1 1/2-13 TAP; QTY 1 3/8-16 TAP
2. VARIES +0.1-1.5
3. VARIES +.00-.03
4. MOTOR WEIGHTS MAY VARY BY 15% DEPENDING ON RATING.
5. OBSTRUCTION MUST NO ENCROACH ON AIR INLET

CONDUIT BOX LOCATED ON OPPOSITE SIDE WHEN F-2.
IF MOUNTING CLEARANCE DETAILS ARE REQUIRED, CONSULT FACTORY.
MAXIMUM PERMISSIBLE SHAFT RUNOUT WHEN MEASURED AT END OF
STANDARD SHAFT EXTENSION IS .08 MM T.I.R. TO 127 MM DIA.

5 WEIGHT (KGS): 1400

DRIVE END AIR DEFLECTOR IS ONLY INCLUDED WHEN NECESSARY.

DIMENSIONS ARE IN MILLIMETERS

CUSTOMER IS RESPONSIBLE FOR DETERMINING THAT MOTOR PERFORMANCE IS SUITABLE IN THE APPLICATION.

SHEET NUMBER
2 OF 2

5117-17427-119

REV. DESC: NEW DRAWING
REV: - VERSION: 00
MODEL NO. 617427-445
BY: RAGEC

BALDOR

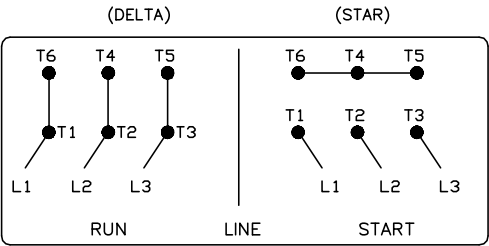
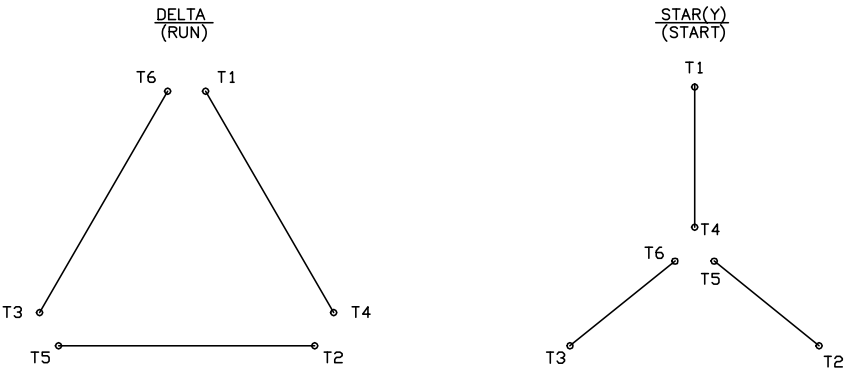
G449TS/447TS-FOOTED-SIDE/CENTER CONDUIT BOX-14X14X12

617427-445

416820-008

A-C MOTOR
CONNECTION DIAGRAM

STANDARD 6 LEAD Y START – DELTA RUN



(N. P. 1767-DC)

REV. DESC: ADDED T4 TO Y CONNECT DIAGRAM		
REV. LTR: D	VERSION: 04	TDR: 000000847713
FILE: \RAG\00001\808	REVISED: 10: 41: 26 04/08/2014	BY: RAGJSS1
MTL: —		

BALDOR

CONNECT DIAGRAM STD 6 LEAD Y START DELTA RUN
SH 1 of 1

416820-008