

PRODUCT INFORMATION PACKET

Model No: LM21189

Catalog No: LM21189

Speed Ratio Motors, TEFC, 3 HP, 3 Ph, 60 Hz, 230/460 V, 3480 RPM, 182T Frame



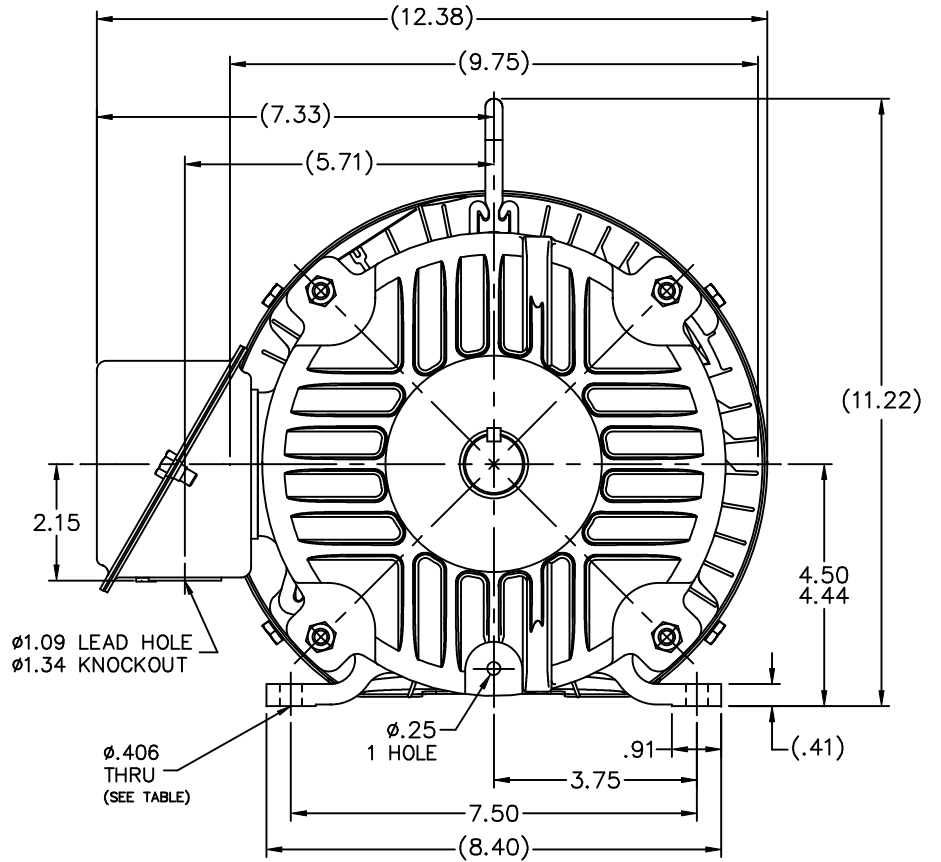
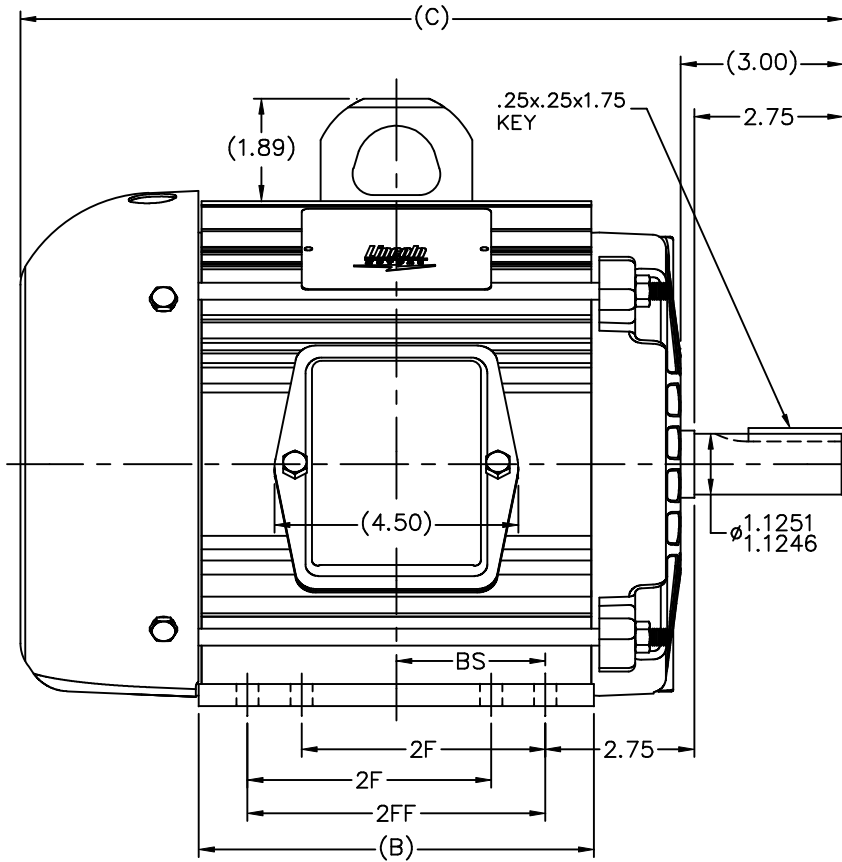
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Nameplate Specifications

Output HP	3 Hp	Output KW	2.2 kW
Frequency	60 Hz	Voltage	230/460 V
Current	7.4/3.7 A	Speed	3480 rpm
Service Factor	1	Phase	3
Efficiency	85.5 %	Power Factor	88.5
Duty	Continuous	Insulation Class	F
Design Code	INV	KVA Code	J
Frame	182T	Enclosure	Totally Enclosed Fan Cooled
Thermal Protection	No Protection	Ambient Temperature	40 °C
Drive End Bearing Size	207	Opp Drive End Bearing Size	205
UL	No	CSA	Y
CE	Y	IP Code	43
Number of Speeds	1		

Technical Specifications

Electrical Type	Squirrel Cage Inverter Duty	Starting Method	Inverter Only
Poles	2	Rotation	Reversible
Resistance Main	3.9 Ohms	Mounting	Rigid Base
Motor Orientation	Horizontal	Drive End Bearing	Ball
Opp Drive End Bearing	Ball	Frame Material	Aluminum
Shaft Type	T	Overall Length	14.19 in
Frame Length	6.30 in	Shaft Diameter	1.125 in
Shaft Extension	2.75 in	Assembly/Box Mounting	F1/F2 CAPABLE
Inverter Load	CONSTANT 4:1		
Outline Drawing	B-SS601006LN-620	Connection Drawing	A-EE7308T-LN



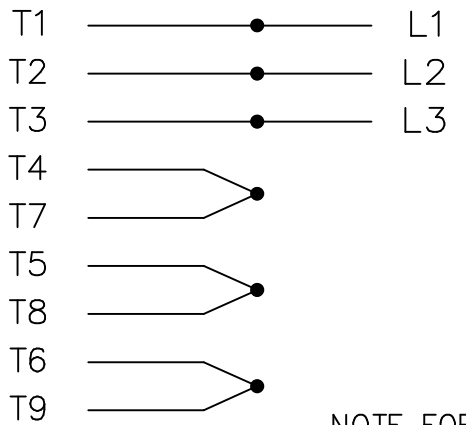
- NOTES:
 1. CONDUIT BOX BE ROTATED IN 90° STEPS.
 2. NAMEPLATE TO BE READ FROM CONDUIT BOX SIDE OF MOTOR.

DASH	FR.	C	BS	B	2FF	2F	FOOT HOLE	NO.	REVISION	BY & DATE	CHK	ANG	±1/2"	FINISH	PREV			
620	182T	14.19	2.25	6.30	4.50	---	4	12	REVISED 'B' DIMENSION IN DASH TABLE	ECN 14167	MSG	8/19/2009	BW	TOLERANCES UNLESS SPECIFIED	DRAWN BLR 01-13-2000			
720	182/4T	15.19	2.75	7.30	5.50	4.50	8	11	DE EXTN WAS 3.1 CHANGED TO 3.0	SVL	7/22/2009	ML	DEC.	INCHES	CHK ML 01-18-2009			
720	184T	15.19	2.75	7.30	5.50	---	4	10	REVISED DASH TABLE INFORMATION	CN 32829	DRS	09-10-2004	ML	.X	±.1	APPD GK 01-18-2000		
820	184T	16.19	3.25	8.30	---	5.50	8	9	REVISED -820, 2FF WAS 5.50 & 2F WAS BLANK	TAT	06-23-2004	ML	.XX	±.03	SCALE 7=16			
								8	RE-ISSUE CLARIFIED HOLES	TAT	01-30-2004	ML	.XXX	±.005	REF			
								7	CHANGED 2F TO 2FF	TAT	01-27-2004	ML	.XXXX	±.0005	FMF			
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											DIST	LB	B	SS601006LN	12			



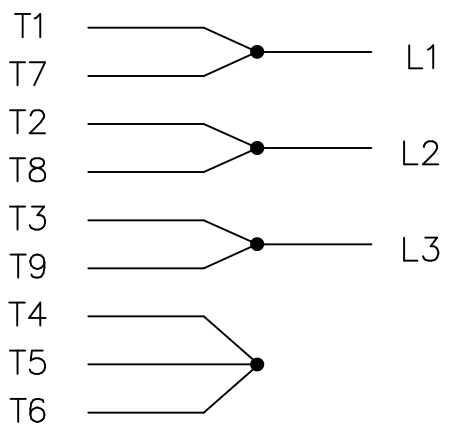
THREE PHASE
DUAL VOLTAGE MOTOR

HIGH VOLTAGE

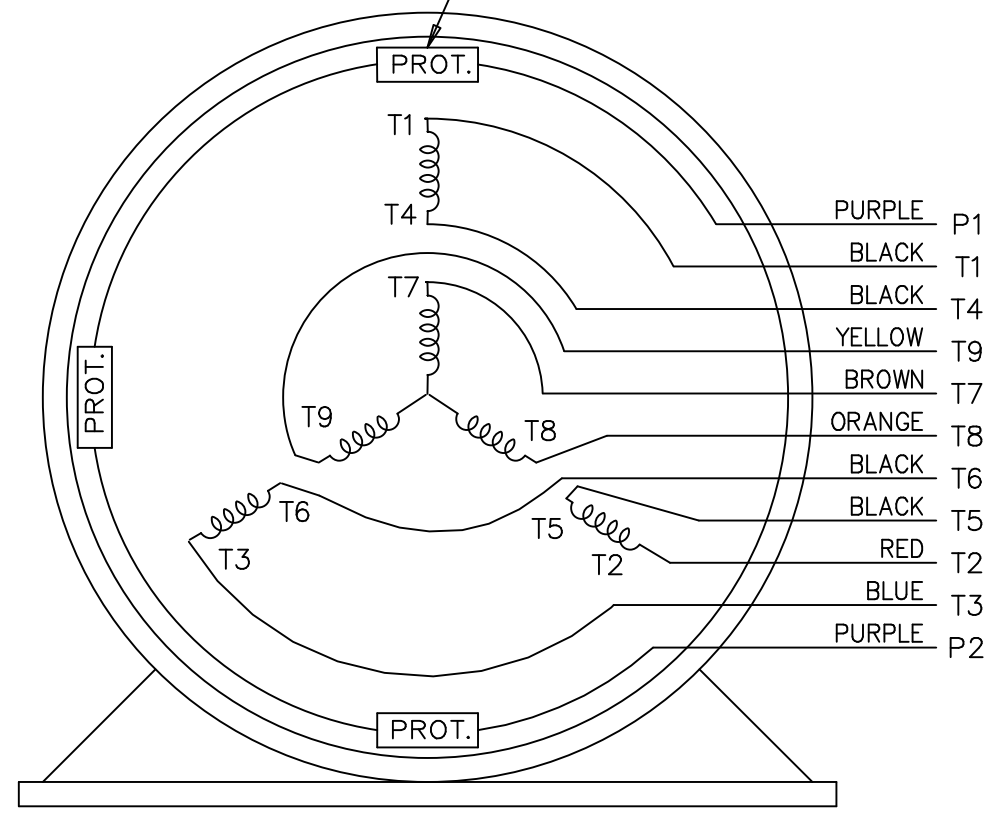


NOTE FOR FACTORY USE ONLY:
TO SURGE TEST FOR COMMON CONNECT:
HIGH VOLT: CONNECT P1 TO T1
THEN P2 TO L1
LOW VOLT: CONNECT P1 TO T1 & T7,
THEN P2 TO L1

LOW VOLTAGE



THREMO-PROTECTORS
CONNECTED IN SERIES.



VIEW OF TERMINAL END

				TOLERANCES UNLESS SPECIFIED			DRAWN BJK 07-16-2002			
				DEC.	INCHES		CHK DRS 07-18-2002			
				.X	±.1		APPD GK 07-18-2002			
				.XX	±.02	TITLE CONNECTION DIAGRAM			SCALE 1=1	
2 ADDED COLORS TO "T & P" LEADS CN 40494 MSG 08-08-2006 ML .XXX ±.005				3 PHASE - DUAL VOLTAGE MOTOR			REF			
1 NEW DRAWING BJK 07-18-2002 DRS .XXXX ±.0005				MAT'L.			FMF			
NO.	REVISION	BY & DATE	CHK	ANG	±7'30"	FINISH	PREV			
THIS DRAWING IN DESIGN AND DETAIL IS OUR PROPERTY AND MUST NOT BE USED EXCEPT IN CONNECTION WITH OUR WORK ALL RIGHTS OF DESIGN AND INVENTION ARE RESERVED THIS IS AN ELECTRONICALLY GENERATED DOCUMENT - DO NOT SCALE THIS PRINT				RFP	CAD FILE ee7308t_ln		SIZE	DRAWING NO.	PAGE OF	REV.
				DIST LB			A	EE7308T-LN	2	4 of 6



1051 CHEYENNE AVE.
GRAFTON, WI 53024
PH. 262-277-8810

DATA VOLTS: 460

CERTIFICATION DATA SHEET

CONN. DIAGRAM: A-EE7308T-LN
OUTLINE: B-SS601006LN-620
WINDING: K182276

CAT #: LM21189

R5 1

TYPICAL MOTOR PERFORMANCE DATA

HP	KW	SYNC RPM	FL RPM	FRAME	ENCLOSURE	TYPE	KVA CODE	DESIGN
3	2.2	3600	3480	182T	TEFC	TFL	J	INC

PH	HZ	VOLTS	AMPS	START TYPE	DUTY	INSL	S.F.	AMB	ELEV.
3	60	230/460	7.4/3.7	INVERTER ONLY	CONT	F	1.15	40	3300

F.L. EFF	85.5	3/4 LD EFF	85.5	1/2 LD EFF	84.0	GTD EFF	ELECT. TYPE
F.L. PF	88.5	3/4 LD PF	85.5	1/2 LD PF	78.5	82.5	SQ CAGE INV DUTY

F.L. TORQUE	LR AMPS @ 460 V	L.R. TORQUE	B.D. TORQUE	F.L. RISE (° C)
4.5 LB-FT	30.0	11.8 LB-FT 262%	16.0 LB-FT 356%	40

PRESSURE @ 3	SOUND	POWER	ROTOR WK²	MAX. LOAD WK²	SAFE STALL TIME	STARTS/HOUR	MOTOR WGT
72 dBA	81 dBA		0.16 LB-FT²	0 LB-FT²	0 SEC.	0	70 LB.

***** SUPPLEMENTAL INFORMATION *****

DE BRACKET TYPE	ODE BRACKET TYPE	MOUNT TYPE	MOTOR ORIENTATION	SEVERE DUTY	HAZARDOUS LOCATION	DRIP COVER	SCREENS	PAINT
STANDARD	STANDARD	RIGID	HORIZONTAL	NO	NONE	NO	NONE	WATTSAVER

BEARINGS		GREASE	SHAFT TYPE	SPECIAL DE	SPECIAL ODE	SHAFT MATERIAL	FRAME MATERIAL
DE	ODE	POLYREX EM	T	NONE	NONE	1144 STRESSPROOF (C-223)	ALUMINUM
BALL	BALL						
207	205						

THERMOSTATS	PROTECTORS	WDG RTD's	BRG RTD's	THERMISTORS	CONTROL	SPACE HEATERS
TSTATS (N/C)	NOT	NONE	NONE	NONE	FALSE	NA

R1 (ohms/ph)	R2 (ohms/ph)	X1 (ohms/ph)	X2 (ohms/ph)	Xm (ohms/ph)	VIBRATION (in/sec)	FLOAT
2.327	2.195	7.776	4.957	218.526	0.080	ODE

* N O T E S *	INVERTER TORQUE: CONSTANT 4:1 INV. HP SPEED RANGE: NONE					
	ENCODER: NONE NONE NONE					
	BRAKE: NONE NONE NONE					
	FT-LB: NA VOLTAGE: NONE					
	UL: NONE-OVER HEAT PROT DEVICE					

DATE: 9/10/2018

Data Sheet

Date: 9/10/2018

LM21189



Data @ **460 V**

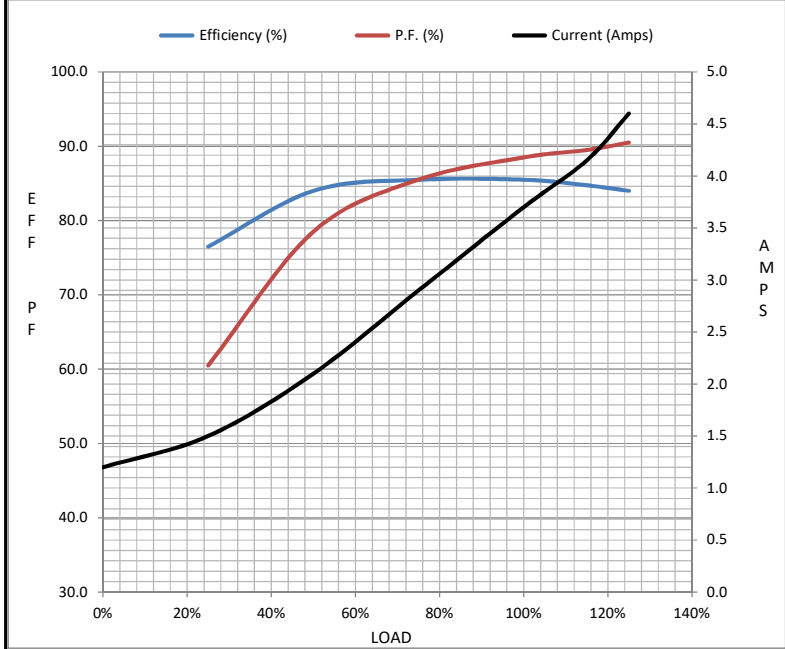
Motor Load Data

Load	0%	25%	50%	75%	100%	115%	125%	LR
Current (Amps)	1.20	1.50	2.10	2.90	3.7	4.2	4.6	30.0
Torque (ft-lb)	0.00	1.10	2.20	3.4	4.5	5.1	5.7	11.8
RPM	3600	3570	3545	3515	3480	3,466	3445	0
Efficiency (%)		76.5	84.0	85.5	85.5	84.8	84.0	
P.F. (%)	15.0	60.5	78.5	85.5	88.5	89.5	90.5	50.0

Motor Speed Data

	LR	Pull-Up	BD	Rated	Idle
Speed (RPM)	0	1600	2770	3480	3600
Current (Amps)	30.0	26.0	19.5	3.7	1.20
Torque (ft-lb)	11.8	11.2	16.0	4.5	0.00

Information Block				
HP	3.0			
Sync. RPM	3600			
Frame	182			
Enclosure	TEFC			
Construction	TFL			
Voltage	230/460 V			
Frequency	60 Hz			
Design	B			
LR Code letter	J			
Service Factor	1.15			
Temp Rise @ FL	40 ° C			
Duty	CONT			
Ambient	40 ° C			
Elevation	1,000 feet			
Rotor/Shaft wk ²	0.16 Lb-Ft ²			
Ref Wdg	K182276 R5			
Sound Pressure @ 1M	72 dBA			
VFD Rating	CONSTANT 4:1			
Outline Dwg	B-SS601006LN-620			
Conn. Diag	A-EE7308T-LN			
Additional Specifications:				
0				
0				
EQUIV CKT (OHMS / PHASE)				
R1	R2	X1	X2	Xm
2.3270	2.1950	7.7760	4.9570	218.5260



Speed - Torque Curve

