

PRODUCT INFORMATION PACKET



Model No: LM80175
Catalog No: LM80175
350 HP Fire Pump Motor, 3 phase, 1800 RPM, 400 V, 447T Frame, ODP
Fire Pump Motors



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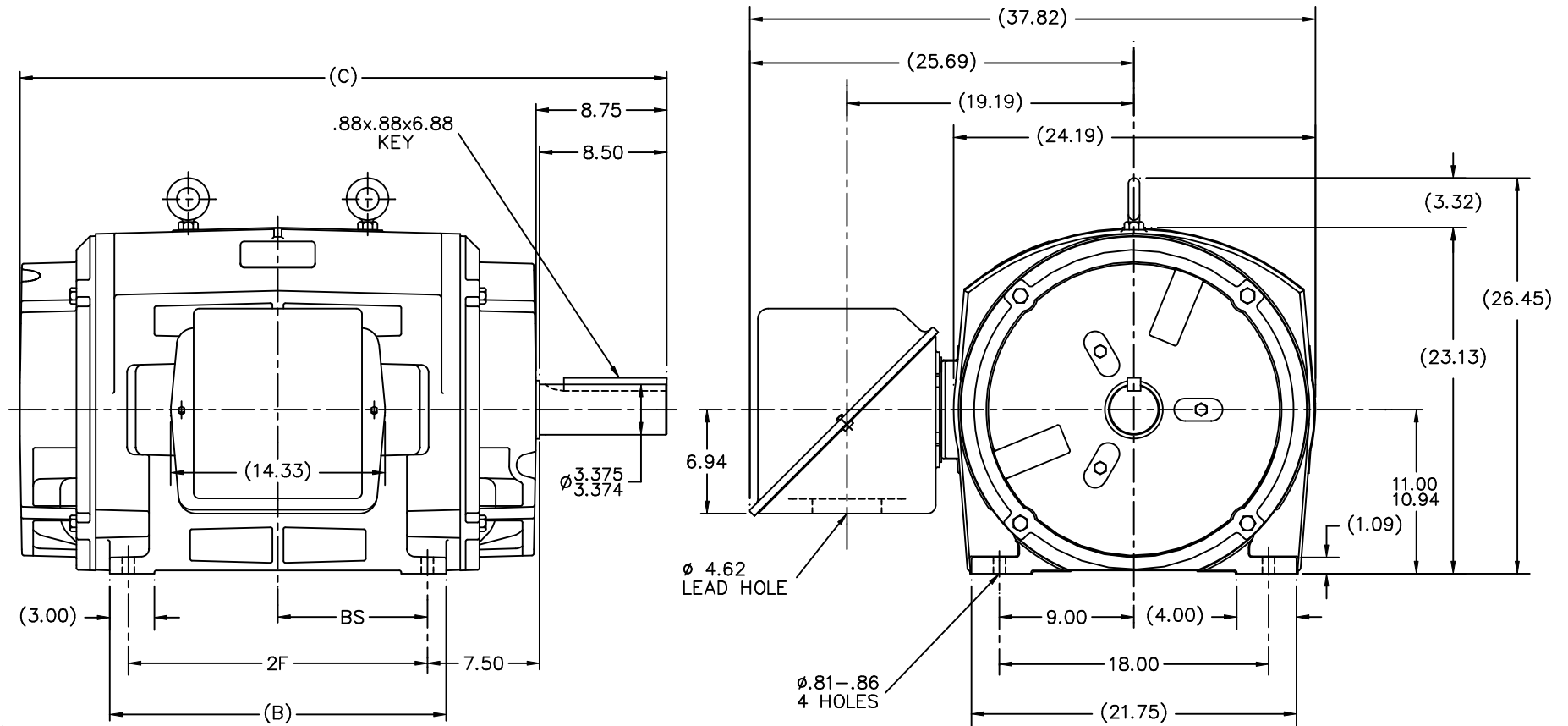
Nameplate Specifications

Output HP	350 Hp	Output KW	260.0 kW
Frequency	60 Hz	Voltage	400 V
Current	466.0 A	Speed	1780 rpm
Service Factor	1.15	Phase	3
Efficiency	95.4 %	Power Factor	86
Duty	Continuous	Insulation Class	F
Design Code	B	KVA Code	F
Frame	447T	Enclosure	Drip Proof
Thermal Protection	No	Ambient Temperature	40 °C
Drive End Bearing Size	6318	Opp Drive End Bearing Size	6314
UL	No	CSA	Y
CE	Y	IP Code	12
Number of Speeds	1		

Technical Specifications

Electrical Type	Squirrel Cage Induction Run	Starting Method	Part Wdg Start & Wye Start Delta Run
Poles	4	Rotation	Reversible
Resistance Main	.015 Ohms	Mounting	Rigid Base
Motor Orientation	Horizontal	Drive End Bearing	Ball
Opp Drive End Bearing	Ball	Frame Material	Cast Iron
Shaft Type	T	Overall Length	43.25 in
Frame Length	24.39 in	Shaft Diameter	3.375 in
Shaft Extension	8.5 in	Assembly/Box Mounting	F1/F2 CAPABLE
Connection Drawing	A-EE7300BH-LN	Outline Drawing	B-SS514258LN-2438

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NOTES:

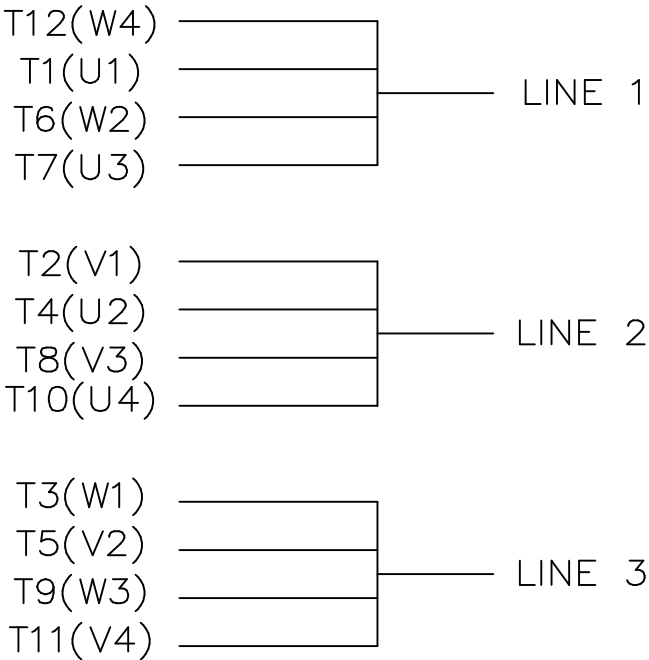
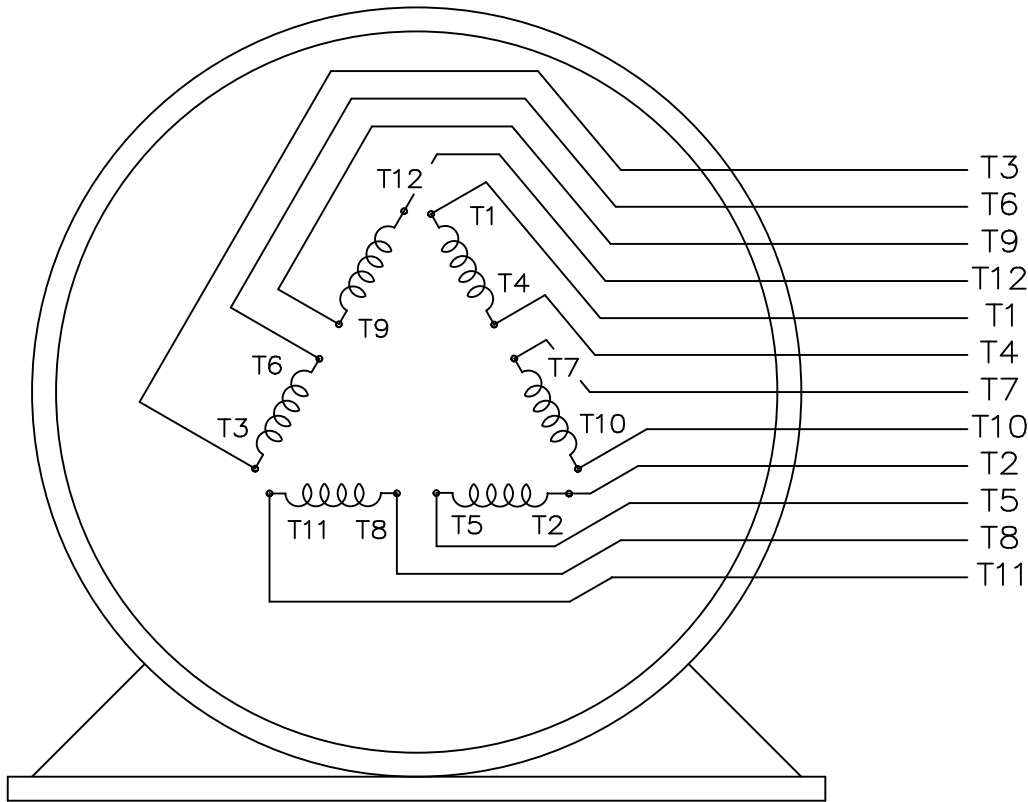
1. C.BOX CAN BE ROTATED IN 90° STEPS.
2. C.BOX CAN BE MOUNTED ON OPPOSITE SIDE BY REMOVING BRACKETS & TURNING FRAME 180°.
3. NAMEPLATES TO BE READ FROM CONDUIT BOX SIDE OF MOTOR.

2438	447T	43.25	----	22.50	20.00	----	----	10.00
2938	449T	48.25	----	27.50	25.00	----	----	12.50
DASH	FRAME	C	AG	B	2F	2FF	2FFF	BS

TOLERANCES UNLESS SPECIFIED		DEC.		INCHES		TITLE OUTLINE - DR.PR.		DRAWN TAT 06-25-2004	
.X	±.1							CHK	ML 06-25-2004
.XX	±.03							APPD	GK 06-25-2004
.XXX	±.005							SCALE	1=7
.XXXX	±.0005							REF	
								FMF	
								PREV	
NO.	REVISION	BY & DATE	CHK	ANG	±1/2"	FINISH		SIZE	DRAWING NO. PAGE OF REV.
			RFP			CAD FILE ss514258ln		B	SS514258LN
			DIST	WA					

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VIEW OF TERMINAL END

				TOLERANCES UNLESS SPECIFIED			DRAWN KL 04-23-2002					
				DEC.	INCHES		CHK	DJK	04-24-2002			
				.X	±.1		APPD	EAB	04-24-2002			
				.XX	±.01		SCALE 1=1					
2	ADDED IEC TERMINAL MARKINGS	CN 41429	JJB 05/24/2000	ML	.XXX ±.005	TITLE CONNECTION DIAGRAM – EXTERNAL 12 LEAD – SINGLE VOLTAGE				REF		
1	NEW DRAWING	MU41562	KL 04-12-02		.XXXX ±.0005	MAT'L.				FMF		
NO.	REVISION		BY & DATE	CHK	ANG	±1/2"	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 ee7300bh_ln		SIZE	DRAWING NO.	PAGE	OF	REV.
				DIST WA-SB				A	EE7300BH-LN			



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

DATA VOLTS: 460

CERTIFICATION DATA SHEET

CONN. DIAGRAM: A-EE7300BH-LN

CAT #: LM80175

OUTLINE: B-SS514258LN-2438

WINDING: T447445

NONE 3

TYPICAL MOTOR PERFORMANCE DATA

HP	KW	SYNC RPM	FL RPM	FRAME	ENCLOSURE	TYPE	KVA CODE	DESIGN
350	261	1800	1780	447T	DP	TDN	F	B

PH	HZ	VOLTS	AMPS	START TYPE	DUTY	INSL	S.F.	AMB	ELEV.
3	60	400	466	PWS & YDRUN	CONT	F	1.15	40	3300

F.L. EFF	95.4	3/4 LD EFF	95.4	1/2 LD EFF	95.4	GTD EFF		ELECT. TYPE	
F.L. PF	86.0	3/4 LD PF	83.0	1/2 LD PF	78.0	94.5		SQ CAGE IND RUN	

F.L. TORQUE	LR AMPS @ 460 V	L.R. TORQUE	B.D. TORQUE	F.L. RISE (° C)
1,032 LB-FT	2,415	1,375 LB-FT 133%	2,500 LB-FT 242%	70

PRESSURE @ 3	SOUND	POWER	ROTOR WK²	MAX. LOAD WK²	SAFE STALL TIME	STARTS/HOUR	MOTOR WGT
82 dBA	91 dBA		53.0 LB-FT²	1200 LB-FT²	15 SEC.	1	1950 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						
BALL BALL	POLYREX EM	T	NONE	NONE	1045 HOT ROLLED (C-204)	CAST IRON
6318 6314						

THERMOSTATS	PROTECTORS	WDG RTD's	BRG RTD's	THERMISTORS	CONTROL	SPACE HEATERS
NONE	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
0.009	0.005	0.072	0.07	1.846	0.150	ODE

* N O T E S *		INVERTER TORQUE: NONE INV. HP SPEED RANGE: NONE
	ENCODER: NONE NONE NONE	NONE PPR

DATE: 8/31/2018	BRAKE: NONE NONE	NONE
	FT-LB: NA	
	VOLTAGE: NONE	HZ:
	UL: NONE	

Date: 8/31/2018

Data Sheet

LM80175



Data @ 400 V

Motor Load Data

Load	0%	25%	50%	75%	100%	115%	125%	LR	
Current (Amps)	132	173	253	351	466	535	587	2,415	
Torque (ft-lb)	0.00	256	513	772	1,032	1,190	1,295	1,375	
RPM	1800	1795	1790	1785	1780	1,778	1775	0	
Efficiency (%)		93.6	95.4	95.4	95.4	95.0	94.5		
P.F. (%)	4.0	58.0	78.0	83.0	86.0	85.5	84.5	28.0	

Motor Speed Data

	LR	Pull-Up	BD	Rated	Idle																													
Speed (RPM)	0	900	1725	1780	1800																													
Current (Amps)	2,415	2,128	1,783	466	132																													
Torque (ft-lb)	1,375	1,150	2,500	1,032	0.00																													
— Efficiency (%) — P.F. (%) — Current (Amps) <table><caption>Graph Data Points (Estimated)</caption><thead><tr><th>Load (%)</th><th>Efficiency (%)</th><th>P.F. (%)</th><th>Current (Amps)</th></tr></thead><tbody><tr><td>25</td><td>94</td><td>58</td><td>132</td></tr><tr><td>50</td><td>95</td><td>80</td><td>200</td></tr><tr><td>75</td><td>95</td><td>84</td><td>268</td></tr><tr><td>100</td><td>95</td><td>86</td><td>336</td></tr><tr><td>125</td><td>94</td><td>84</td><td>580</td></tr></tbody></table>						Load (%)	Efficiency (%)	P.F. (%)	Current (Amps)	25	94	58	132	50	95	80	200	75	95	84	268	100	95	86	336	125	94	84	580					
						Load (%)	Efficiency (%)	P.F. (%)	Current (Amps)																									
						25	94	58	132																									
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						HP		350.0																										
						Sync. RPM		1800																										
						Frame		447																										
						Enclosure		DP																										
						Construction		TDN																										
						Voltage		400	V																									
						Frequency		60	Hz																									
						Design		B																										
						LR Code letter		F																										
						Service Factor		1.15																										
						Temp Rise @ FL		70	° C																									
						Duty		CONT																										
						Ambient		40	° C																									
						Elevation		1,000	feet																									
						Rotor/Shaft wk ²		53.0	Lb-Ft ²																									
						Ref Wdg		T447445	NONE																									
Sound Pressure @ 1M		82	dBA																															
VFD Rating		NONE																																
Outline Dwg		B-SS514258LN-2438																																
Conn. Diag		A-EE7300BH-LN																																
Additional Specifications:																																		
0																																		
0																																		
EQUIV CKT (OHMS / PHASE)																																		
R1		R2		X1		X2		Xm																										
0.0090		0.0050		0.0720		0.0700		1.8460																										

Speed - Torque Curve

