

4000 VA
15-5,000 Hz

1Ø → 0 - 338 V_{L-N}
2Ø → 0 - 600 V_{L-L}



Standard Features:

- Advanced Linear Amplifiers Provide Very Low Voltage Distortion, no Switching Noise, Fast Voltage and Current Slew Rates, Exceptionally Low Output Impedance and High Peak Current Capability
- Single or Split phase selectable output from front panel or bus command
- 15 to 5,000 Hz. Full Power Bandwidth Operation – 5Hz to 50KHz small signal bandwidth, 3dB at 10% of full voltage
- Precision Voltage Programming – 0.05% with Continuous Self-Calibration (CSC) engaged
- True-RMS Metering of Volts, Amps, and Power
- Color touch screen front panel operation
- LAN (LXI), USB, GPIB and RS-232 Interfaces
- Arbitrary Waveforms
- Transients for Static and Dynamic Test Applications
- Programmable Output Impedance
- Harmonic Analysis and Waveform Synthesis
- PPSC Manager Windows 10 Software
- Embedded Web server
- Multi Unit Paralleling Option

Model 140LMX

The 140LMX offers low output voltage noise and distortion, ease of installation, and high AC waveform fidelity as found in all of Pacific Power's Linear AC Power Sources. Control and operational features provide a high degree of versatility and ease of use for applications ranging from simple, manually controlled frequency conversion to harmonic testing and sophisticated programmable transient simulation.

AC TEST POWER

All 140LMX models are equipped with a powerful micro-controller with the ability to operate as a fully integrated test system. This enables a variety of power conditions and transients to be applied to the device under test while metering and analyzing all output performance parameters. For higher power requirements, refer to the complete LMX series catalog.

FREQUENCY/VOLTAGE CONVERSION

The 140LMX is an excellent source of stable AC Voltage over the frequency range of 15 to 5,000 Hz. The output frequency is quartz-crystal stabilized. Output voltages up to 135V_{L-N} in single phase mode and up to 270V_{L-L} in split phase mode are available on the 140LMX model and up to 600V_{L-L} in split phase mode on the 140LMXT model.

PHASE CONVERSION

With the ability to provide two phase output, the 140LMX is a good choice to convert one-phase line voltage into precisely controlled split (two-phase) output power.



140LMX Models Output Ratings

MODEL	Rated Power (VA) ¹	Output Form ²	Output Voltage Max ³ (I-n/I-l)				Output Current ⁴ (A _{rms})			
			Direct	Transformer			Direct	Transformer		
				Ratio 1.5:1	Ratio 2.0:1	Ratio 2.5:1		Ratio 1.5:1	Ratio 2.0:1	Ratio 2.5:1
140LMX	4000	1/2	0-135/270	n/a	n/a	n/a	32/16	n/a	n/a	n/a
140LMXT	4000	1/2	0-135/270	0-202/404	0-270/540	0-338/600	32/16	21.3/10.7	16/8	12.8/6.4

- Notes:**
1. Rated output power is based on a combination of output voltage, current and load power factor. Values stated represent the rated capabilities of a given model. Consult factory for assistance in determining specific unit capabilities as they might apply to your application.
 2. All single phase units are operable with dual voltage ranges as listed. Output voltage ranges and 1Ø/2Ø conversions are selected by front panel or bus command.
 3. Output voltage ranges listed are for standard units. VMAX is achievable with nominal input voltage at full load.
 4. Current ratings at 125 V_{RMS} output. Current may vary with power factor.



FREQUENCY CONVERSION



AEROSPACE



R & D



MILITARY



MANUFACTURING



CUSTOM

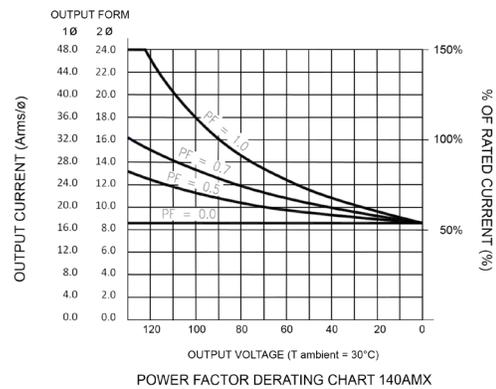
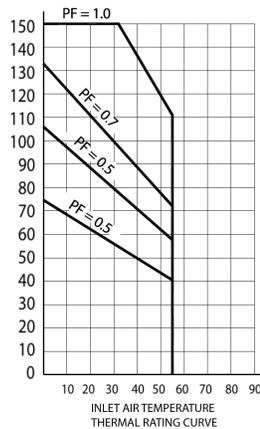
LMX Power Source Specifications (PF = 1.0, V_{out} > 25% F.S.)

Output Frequency	Line Regulation	Load Regulation ¹	Output Distortion	Ripple & Noise	Response Time
Full Power 15-5,000 Hz Direct Coupled 45-5,000 Hz Transformer Coupled	0.1% max for a ±10% line change	Direct Coupled Ranges: 0.25% 15 to 2,000 Hz. 0.50% 2,000 to 5,000 Hz.	0.1% THD _{AVG} 45 to 1,000 Hz 0.25% THD _{AVG} 15 to 5,000 Hz	< 50 mVrms	5 μsec typ. For step load change. Small signal bandwidth = 5 Hz to 50 KHz

Note 1: Improves to less than 0.05% with external sense and CSC mode enabled. For transformer coupled voltage ranges, load regulation by step-up ratio is: 1.5:1 - 2%, 2.0:1 - 4%, 2.5:1 - 5%. Improves to < 0.1% with external sense and CSC mode enabled.

Thermal and Load Power Factor Rating Curves

Rated Continuous Load Current as a Function of Ambient Temperature and Power Factor and Output Voltage at Nominal Input Line.

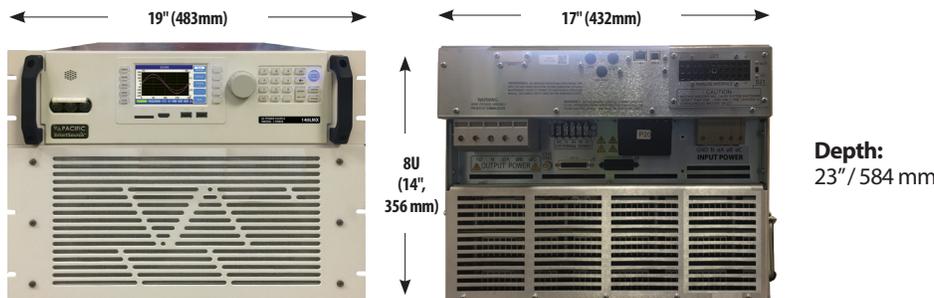


AC Input Power Requirements (47-63 Hz)

Input Voltage:	208 Vac 3ØΔ ± 10%	220 Vac 3ØΔ ± 10%	230 Vac 3ØΔ ± 10%	380 Vac 3ØΔ ± 10%	400 Vac 3ØΔ ± 10%	480 Vac 3ØΔ Opt.
AC Input Current:	23 Arms	22 Arms	21 Arms	13 Arms	12 Arms	11 Arms
Recommended Input Service:	40 A	40 A	40 A	20 A	20 A	20 A

Note; Other AC input voltage settings available are 240Vac 3Ø Delta and 416Vac 3Ø

Chassis Dimensions (w/o T Option) and Weights



Model	Lbs / Kg
140LMX	185 / 84
140LMXT	310 / 140.8

Parallel Bus Option

The 140LMX AC power source can be paralleled to create higher power systems. When equipped with the Parallel Bus (-PB) option, up to five units can be paralleled.

Ordering Information

Model	T Option Ratio	AC Input Voltage	Options
140LMX	n/a	Specify: 208, 220, 230,	PPSC Test Manager SW License
140LMXT	1.5:1 or 2.0:1 or 2.5:1	240, 380, 400, 416 or 480	Avionics or IEC Test Sequences

Order Example:

- 140LMXT, T= 2.0:1, V_{IN}: 380VAC
- 4000VA, 1-Phase, AC Power Source with optional transformer
 - 2.0:1 Transformer Ratio
 - 380VAC, 3 Phase Input Voltage