

PTL-12.5kW 902-928 MHZSOLID-STATE HIGH-POWER MICROWAVE GENERATOR



Key Features

- Internal frequency and power control
- Software control utilizing a Windows™ based GUI
- Frequency sweeping capability
- Built in Forward and Reflected power measurement
- Distributed multi-processor control architecture
- WR975 Waveguide output (*external circulator required*)

Frequency Range

- 902-928 MHz
- Frequency Step Size: 100 kHz

Operating Modes

- Fixed, single frequency

Control System

- Windows-based interactive control software
- External E-Stop
- Local or remote operation
- Ethernet remote control
- PLC-type hardware control interface with 24VDC and 20ma current loop inputs and outputs
- Arc detection emergency stop inputs

Microwave Power Output

Model	Max Nominal Power
PTL-12.5W9-PREHU-0	12.5 KW

- Power set resolution input values: 1 watt
- Power Amplifiers: Rugged LDMOS transistors
- Comprised of Qty 6, 2.5 KW modular power blades
- Integrated RF output timer
- Power measurement indicators: Forward & Reflected
- Max. mismatch: 10 dB RL/2:1 VSWR

Software Highlights

- Point-Click power and frequency setting across the band
- Forward/Reflected power and return loss indicators

- Best frequency selection based on load measurements
- Variable power over frequency sweep creation tool
- Programmable initial pulse for applications such as gas / plasma ignite

Power Supply

- AC mains: 380 or 480 VAC three phase delta 50/60 Hz configurable
- 50-volt switch mode power supply
- Line-to-RF-conversion efficiency at full power: 50%
- Air Cooled

Dimensions and Weight:

- 45" (115cm) H x 38" (97cm) D x 42" (107cm) W
- Weight: 600 lbs. (272kg)

Facility Requirements:

- Input Water Flow Min: 15 GPM (57 LPM)
- Input Water Temperature: 15°C - 20°C
- Input Water Pressure: 60 Max PSI (2.5 Min–4.0 Max atm)
- Environmentally Controlled:
 - Ambient Room: 15°C - 25°C
 - Relative Humidity: < 95%
 - Conditions must be non-condensing
- Water Hook Up: 1 1/4" OD Barb
- Heat Load: ~50K BTU/hr @ Full Power

These are Preliminary Specification's. The information contained herein is subject to change without notice.