# **150W CW TWT Power Amplifier**

for EMI/EMC Testing & Communications

# The New VZK-2790J1 Series

150 watt CW
K-band TWT
Power Amplifier—
Environmentally
sealed compact
design for outdoor
operation



#### Plays in the Rain

Rugged, compact and lightweight amplifier designed for outdoor use.

# **Efficient and Cost Effective**

Mounting at the antenna improves performance through minimized cable losses and saves cost in system design. Employs a high efficiency helix traveling wave tube, reducing operating costs.

## Simple to Operate

User-friendly microprocessor-controlled logic with integrated RS422/485 computer interface. Digital metering is standard.

### **Easy to Maintain**

Modular design and built-in fault diagnostic capability via remote monitor and control.

# **Global Applications**

Meets International Safety Standard EN-60215, Electromagnetic Compatibility 89/336/EEC and Harmonic Standard EN-61000-3-2 to satisfy worldwide requirements.

#### **Worldwide Support**

Backed by over three decades of satellite communications experience, and CPI's worldwide 24-hour customer support network that includes fifteen regional factory service centers.



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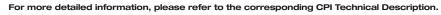
OPTIONS: • Ethernet Interface

• Outdoor Operation

# SPECIFICATIONS, K-band Outdoor LPA

Electrical		
Model Number	VZK-2790J1	
Frequency	18.0 - 26.5 GHz	
Output Power		
TWT	150 W	
Flange	100 W, min., 125 W typ.	
Bandwidth	8.5 GHz	
RF Level Adjust Range	0 to 20 dB	
Attenuator Step Size	0.1 dB typ.	
Gain		
at rated power	50 dB min.	
at small signal	53 dB min.	
Small Signal Gain Variation	±5.0 dB pk-pk across the full bandwidth	
Gain Stability (at constant	±0.25 dB/24 hours max. (after 30 minute warm-up)	
drive and temperature)	±1.0 dB over temperature range	
VSWR		
Input	2:1	
Output	2:1	
Load	1.5:1 max.; no degradation, infinite VSWR without damage	
Phase Noise	IESS 308 continuous mask	
AM/PM Conversion	2.5°/dB max. for a single carrier up to 6 dB below rated power (1.0°/dB up to 3 dB 0B0 with linearizer)	
Noise and Spurious	-50 dBc	
Noise Figure	10 dB typ.	
Primary Power	Single phase, 100-240 VAC $\pm$ 10%, 47-63 Hz	
Power Consumption	650 VA typ, at saturated RF output power; 750 VA max.	
Power Factor	0.95 min.	
Environmental (operating)		
Ambient Temperature	-40°C to +45°C	
Relative Humidity	100% condensing with outdoor option, 95% non-condensing standard	
Altitude	10,000 ft with standard adiabatic derating of 2°C/1000 ft	
Shock and Vibration	20 g peak estimated, truck transportation	
Mechanical		
Cooling	Forced air with integral blower	
RF Input Connection	WR-42F	
RF Output Connection	WR-42G	
RF Output Monitor	2.9 mm SMA Female	
Dimensions (WxHxD)	10.25 x 9.5 x 20 inches (261 x 242 x 508 mm)	
Weight	52 lbs (23.6 kg) max.	

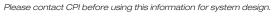
COMPANY EVENINATION	
	ANAB
ISO 9001	Certificate Number: 30515



Note: Specifications may change without notice as a result of additional data or product refinement.

**Heat and Acoustic Heat Dissipation** 

Acoustic





450 W typ.

65 dBA typ.

