# Electronic Warfare (EW) Radar Products

#### CPI EW Radar Product Platforms customized for your application.

#### **TWTs**

**Typical Operating Parameters** 

Band	Frequency	Output Power	<b>Duty Cycle</b>
S/C Band	2–8 GHz	Up to 200 W	CW/Pulse
I/J Band	8–18 GHz	Up to 200 W	CW/Pulse
I/J Band	6–18 GHz	Up to 200 W	CW/Pulse
K-Band	18.5 -26.5 GHz	Up to 50 W	CW/Pulse
Ka-Band	26.5–40.0 GHz	Up to 50 W	CW/Pulse

### **Coupled Cavity TWTs Typical Operating Parameters**

Band	Frequency	Output Power	Duty Cycle
S-Band	2.1-3.1 GHz	150 kW Pk	Various
C-Band	5.25–5.90 GHz	Up to 200 kW Pk	Various
X-Band	8.4–11.8 GHz	Up to 120 kW Pk	Various
Ku-Band	15.7–17.7 GHz	Up to 60 kW	Various
Ka-Band	34.5–36.0 GHz	Up to 1.1 kW	Various

## **Klystrons & Gyrotrons**

**Typical Operating Parameters** 

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Band	Freq. (GHz)	<b>Output Power</b>	<b>Duty Cycle</b>
UHF band	Various	Up to 3.0 MW	Various
S-band	Various	Up to 5.0 MW	Various
C-band	Various	Up to 3.0 MW	Various
X-band	Various	Up to 5.0 MW	Various
Ku-band	Various	Up to 30 kW	Various
W-band	Various	Up to 2.5 MW	Various

#### **Power Supplies**

Typical Operating Parameters

Frequency	perating raranic	Operating	Operating		
(GHz)	Peak Power	Voltage	Temperatures	Altitude	VED Type
X-Band	800 Watts	2750 V	-45 to +88°C	70,000 ft	Magnetron
I/J-Band	50-100 Watts	4400 V (cathode)	-30 to +60°C	10,000 ft	Helix TWT
Ku-Band	400 Watts (pulsed)	28 VDC	-40 to +70°C	36,000 ft	Booster Helix TWT
Low band	400-1000 Watts	4.4 kV	-30 to +80°C	50,000 ft	Helix TWT

Power levels and frequencies are dependent on the TWT selected

With a history of producing high power, high quality products, we can help you with your EW radar. Contact us at ElectronDevices@cpii.com or at call us at +1 978-922-6000



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Microwave Power Products

For more detailed information, please refer to the corresponding CPI technical description if one has been published, or contact CPI. Specifications may change without notice as a result of additional data or product refinement. Please contact CPI before using this information for system design.

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## **Communications & Power Industries Electronic Warfare (EW) Radar Products**

HIGH POWER HELIX TWTs

**COUPLED CAVITY TWTs** 

**KLYSTRONS** 

**GYROTRONS** 

**POWER GRID DEVICES** 

**TRANSMITTERS** 

**POWER SUPPLIES** 

INTEGRATED MICROWAVE **ASSEMBLIES** 



## **Communications & Power Industries EW Radar Products**

**High Power TWTs** 

• Available in 1 GHz to 40 GHz

• Available in pulsed and CW modes

Wideband

 Moderate power up to 2.5 kW CW and 2.5 kW peak power

**Coupled Cavity TWTs** 

• Up to 15% IBW

• Up to 150 kW

• Up to 35% duty

• Military environemnt qualified

• Efficient and compact

• Air and liquid cooled

# Klystrons & Gyrotrons

- UHF to W band
- Up to 5 MW peak power
- Mobile, ground, and shipborne radar applications

• Directed energy

### **Power Grid Devices**

• Over 600 power grid devices

- Diodes
- Triodes
- Tetrodes
- Pentodes
- Planar Triodes (Power levels to 3 GHz)

• Sockets & hardware



Designed to meet and exceed the most stringent military environments...

#### **Transmitters**

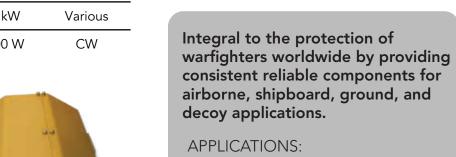
- Available in 1 GHz to 18 GHz
- Low noise figures
- Available in pulsed and CW modes

**Typical Operating Parameters** 

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Band	Frequency (GHz)	Output Power	Duty Cycle
Low band	2 – 8 GHz	Up to 4 kW	Various
High band	8 – 18 GHz	Up to 8 kW	Various
I/J band	6 – 18 GHz	Up to 200 W	CW

# **Power supplies**

- Available in:
- Low band
- High band
- I/J band
- Military environment qualified
- Efficient



- Missile seekers
- Airborne radar and EW
- Unmanned aerial vehicles (UAV)
- Ground based systems

## Integrated Microwave Assemblies

- Available in .5 50 GHz
- Fast switching time
- Fast recovery time
- Military environment qualified
- Available with or without coax interfaces
- Efficient

products

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go to

- Compact
- Long pulse
- High duty





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