

These ratings represent those of current samples of this type. Refer to the Objective Technical Information sheet for design-objective ratings.

This technical information is proprietary and is furnished only as a service to customers.

ZP-1061 TRIODE

Internal Feedback for Oscillator Service
Grid-Pulsed or Plate-Pulsed Operation

Heat-Sink and Forced-Air Cooled
Metal and Ceramic

The ZP-1061 is a heat-sink-cooled triode especially designed for grid-pulsed oscillator service in L-band. The tube is particularly well suited for use in navigational aid applications.

The ZP-1061 features all necessary feedback within the tube envelope, which eliminates the need for the complicated external-circuit arrangements normally required in oscillator service.

Other features include small size, long pulse width, high duty capability, and long life and reliability.

ELECTRICAL

Heater Voltage*	5.0	Volts
Heater Current	2.5	Amperes
Cathode Heating Time, minimum	1	Minute
Direct Interelectrode Capacitances		
Input	17.0	uuf
Output	4.0	uuf

MECHANICAL

Mounting Position - Any	
Net Weight, approximate	2-1/2 Ounces

THERMAL

Cooling - Heat-sink or Forced Air	
Maximum Anode Temperature#	250 C
Maximum Ceramic Temperature at Any Point	200 C

GRID-PULSED OSCILLATOR - CLASS C **

Maximum Ratings	
DC Plate Voltage	2.5 Kilovolts
DC Plate Current, during pulse	2.0 Amperes
DC Grid Voltage	-200 Volts
Plate Dissipation	50 Watts
Pulse Width	10 Microseconds
Duty Factor	0.01
Typical Operation	
Grounded-Grid Circuit at 1090 mcs, 1/4 Output	
DC Plate Voltage	1800 Volts
DC Plate Current, during pulse	1.75 Amperes
DC Grid Voltage	-90 Volts
DC Grid Current, during pulse	1.0 Amperes
Power Output, during pulse (useful)	1000 Watts
Pulse Width	0.5 Microseconds
Duty Factor	0.01

- * Because of back-heating due to transit time effects, it may be necessary to reduce the heater voltage.
- # A suitable heat-sink clamping arrangement must be provided to limit the anode hub temperature to the value specified.
- ∅ Maximum ratio of on-time to elapsed time during any 250 microsecond period.
- ∅ Pulse duration is measured between points at 70 percent of the peak value. The **peak** value is defined at the maximum value of a smooth curve through the average of the fluctuations over the top portion of the pulse.
- & For recommendations on longer pulse width and higher duty factor refer to the manufacturer.
- ** Plate-pulsed oscillator operation may be used for considerably higher peak power output than that indicated under typical operation. For recommendations refer to the manufacturer.

