



Excellence in Electronics

TYPE CK6763

The CK6763 is a ruggedized, instant starting, cold cathode, gas-filled, half-wave rectifier of miniature construction suitable for high voltage, low current power supplies up to 12 mAdc output. Several tubes can be operated in cascade to produce very high voltages. The CK6763 is designed for use in high vibration environmental conditions such as found in mobile and aircraft equipments.

MECHANICAL DATA

ENVELOPE: T-5 1/2 Glass

BASE: Miniature Button 7-Pin

TERMINAL CONNECTIONS:

- Pin 1 Cathode
- Pin 2 Cathode
- Pin 3 Cathode
- Pin 4 Cathode
- Pin 5 Cathode
- Pin 6 Cathode
- Pin 7 Cathode
- Top Lead Anode

MOUNTING POSITION: Any

ELECTRICAL DATA

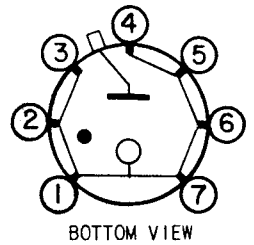
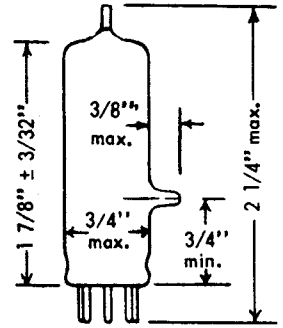
RATINGS - ABSOLUTE MAXIMUM VALUES:

Peak Inverse Voltage	2800 volts
Peak Cathode Current (Steady state) *	100 ma
Peak Cathode Current (surge) *	300 ma
Average Cathode Current (dc)	12 mAdc
Maximum Anode Supply Voltage (RMS)	1200 volts
Minimum Anode Supply Voltage (RMS)	500 volts
Minimum Surge Limiting Impedance *	6000 ohms
Ambient Temperature Range	-55 to +90 °C

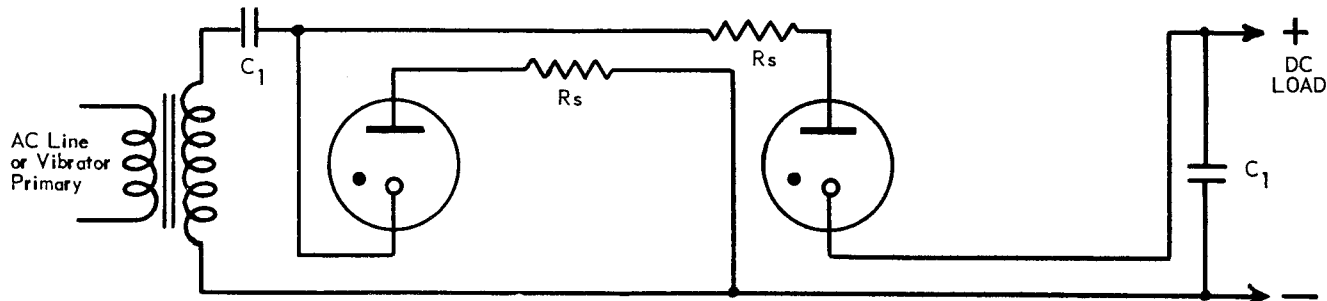
CHARACTERISTICS AND TYPICAL OPERATION - HALF - WAVE RECTIFIER:

Anode Supply Voltage (RMS)	1200 volts
Minimum Anode Supply Impedance	6000 ohms
Load Current (dc)	12 mAdc
Approximate Anode to Cathode Drop	85 volts

\* To avoid damage to the equipment or tube, it is recommended that the anode supply impedance be adjusted to limit forward currents and intermittent reverse peak currents to stated values. Typical resistance is 6000 ohms minus the effective equivalent transformer loss, but never less than 2000 ohms dc resistance. For voltage multiplier circuits, a separate limiting resistor should be connected in series with the anode or cathode of each tube. In the event of a reverse arc, the absence of a surge limiting resistor causes all of the energy of the filter condenser to be dissipated in the tube.



VOLTAGE DOUBLER HIGH VOLTAGE POWER SUPPLY TYPICAL CIRCUIT FOR AC LINE OR BATTERY OPERATION



Rs = Surge Resistor. Adjust to keep Peak Cathode Current (steady state) and Peak Cathode Current (surge) within ratings of 100 ma. and 300 ma., respectively. Rs should not be less than 2000 ohms in voltage doubler circuits regardless of transformer characteristics. C1 = 1.0 μf, (Typical for 60 cycle operation).

Tentative Data

RAYTHEON MANUFACTURING COMPANY

RECEIVING AND CATHODE RAY TUBE OPERATIONS