



ELECTRONIC TUBE REFERENCE

HK257B

Power - Beam (NOT sweep) electronic tube

CONSOLIDATED TECHNICAL DATA

1 SECTION

CONSTRUCTION

BEAMPOWER

Radiation-cooled Gammatron beam pentode with exceptional VHF performance, high transconductance, and very low feedback allowing operation without neutralization.

GENERAL CHARACTERISTICS

BASE DESIGNATION	—	BASE PINS	7
NOMINAL HEATER	5 V / 7.5 A	PARALLEL HEATER	— / —
HEATING	Direct	SERIES OPERATION	Not specified
CATHODE ARRANGEMENT	Separate cathodes	SECTION CONSTRUCTION	Similar

SECTION RATINGS

SECTION 1 Beam Power	
MAXIMUM PLATE VOLTAGE	4000 V
MAXIMUM SCREEN VOLTAGE	750 V
MAXIMUM PLATE DISSIPATION	75 W
MAXIMUM SCREEN DISSIPATION	25 W
MAXIMUM CATHODE CURRENT	150 mA
<i>Published maximum ratings and characteristics promoted from the datasheet; typical application values remain parameter rows.</i>	

75-watt radiation-cooled beam pentode with exceptional very-high-frequency performance, high transconductance, and operation without neutralization. The source describes Gammatron construction using tantalum electrode structures and a thoriated-tungsten filament where applicable.

SOURCE OPERATING CONDITIONS

[SOURCE PDF](#)

1944 Heintz and Kaufman

Published test conditions and operating points. Values on this page are preserved as reported by this source.

1944 HEINTZ AND KAUFMAN

Section 1 · Beam Power

CHARACTERISTIC		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Filament Voltage	5 V	—
Filament Current	7.5 A	—
Plate-Grid Capacitance	0.08 pF	InterelectrodeCapacitance
Input Capacitance	10.5 pF	InterelectrodeCapacitance
Output Capacitance	4.7 pF	InterelectrodeCapacitance

OTHER		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Normal Plate Dissipation	75 W	—
Maximum Plate Voltage	4000 V	—
Maximum Average Plate Current	150 mA	—
Maximum Screen Input	25 W	—
RF Class C Unmodulated Maximum Screen Current	30 mA	ClassC;Unmodulated
RF Class C Unmodulated Maximum Control Grid Current	25 mA	ClassC;Unmodulated
RF Class C Plate-Modulated Maximum Plate Voltage	3000 V	ClassC;PlateModulated
RF Class C Plate-Modulated Maximum Screen Voltage	600 V	ClassC;PlateModulated

TUBE TINKER

An independent reference for electronic tubes, vacuum tubes, and their source documents.

