

ELECTRONIC TUBE REFERENCE

GI11B

Power - Tetrode (NOT beam) electronic tube

CONSOLIDATED TECHNICAL DATA

1 SECTION
CONSTRUCTION
TETRODE

Forced-air-cooled metal-ceramic RF power tetrode for self-excited oscillators in continuous-wave or pulsed anode-modulated operation.

GENERAL CHARACTERISTICS

BASE DESIGNATION	—	BASE PINS	—
NOMINAL HEATER	12.6 V / 1.8 A	PARALLEL HEATER	— / —
HEATING	Indirect	SERIES OPERATION	Not specified
CATHODE ARRANGEMENT	Separate cathodes	SECTION CONSTRUCTION	Similar

SECTION RATINGS

SECTION1 Tetrode	
MAXIMUM PLATE VOLTAGE	2000 V
Promoted-field completeness audit performed from English ratings/characteristics.	

The GI-11B tetrode is used in a self-excited RF oscillator in continuous-wave or pulsed operation with anode modulation; it uses metal-ceramic construction and forced-air cooling.

SOURCE OPERATING CONDITIONS

[SOURCE PDF](#)

1968 Electronintorg

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

1968 ELECTRONINTORG

Section 1 · Tetrode

OTHER		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
grid	11	11— heater; C — grid;
temperature, °C [1]	343 C	CYCKOPEHUEM, M/CZ it 343 Ambient temperature, °C —60to +100
temperature, °C [2]	-60 C	CYCKOPEHUEM, M/CZ it 343 Ambient temperature, °C —60to +100
temperature, °C [3]	100 C	CYCKOPEHUEM, M/CZ it 343 Ambient temperature, °C —60to +100
voltage	400 uS	KpyTusHa xapakTepucTiki (Npu HanpsiXxeHun aHoga Mutual conductance (at anode voltage 400 V,
current [1]	400 mA	400 B, usmeHeHun HanpshxeHus ceTkv Ha 0,5 B, Toke grid voltage change 0.5 V, anode current 15 mA),
current [2]	5 mA	400 B, usmeHeHun HanpshxeHus ceTkv Ha 0,5 B, Toke grid voltage change 0.5 V, anode current 15 mA),
current [3]	0.5 mA	400 B, usmeHeHun HanpshxeHus ceTkv Ha 0,5 B, Toke grid voltage change 0.5 V, anode current 15 mA),
current [4]	15 mA	400 B, usmeHeHun HanpshxeHus ceTkv Ha 0,5 B, Toke grid voltage change 0.5 V, anode current 15 mA),
voltage change to	0.4 kV	MNpoHuLaeMocTb (Npy M3MEHEHUN HaNPSXXEHUs aHoaa Penetration factor (at anode voltage change to 0.4 kV,
anode	0 V	Pa6o4as Touka (OTpuLaTesibHoe HanpsikeHne Operating point (negative grid voltage at anode
current [1]	400 mA	CeTKv Npu HanpshxeHun aHoaa 400 B, Toke aHopa voltage 400 V, anode current 15mA), V..... 4.5-1

PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
current [2]	400 mA	CeTKv Npu HanpshxeHun aHoaa 400 B, Toke aHopa voltage 400 V, anode current 15mA), V..... 4.5-1
current [3]	15 mA	CeTKv Npu HanpshxeHun aHoaa 400 B, Toke aHopa voltage 400 V, anode current 15mA), V..... 4.5-1
current [4]	4.5 mA	CeTKv Npu HanpshxeHun aHoaa 400 B, Toke aHopa voltage 400 V, anode current 15mA), V..... 4.5-1
current [5]	-1 mA	CeTKv Npu HanpshxeHun aHoaa 400 B, Toke aHopa voltage 400 V, anode current 15mA), V..... 4.5-1
Interelectrode capacitance, pF [1]	15 pF	15MA), B 4,51 Interelectrode capacitance, pF:
Interelectrode capacitance, pF [2]	451 pF	15MA), B 4,51 Interelectrode capacitance, pF:
output [1]	9	e 9-13 output ... 0.11-0.21
output [2]	-13	e 9-13 output ... 0.11-0.21
output [3]	0.11	e 9-13 output ... 0.11-0.21
output [4]	-0.21	e 9-13 output ... 0.11-0.21
voltage [1]	2 V	MPOXOAHAA . ..ottt ii e eanannns 2-3,3 Warm up time (at anode voltage 600 V),
voltage [2]	-33 V	MPOXOAHAA . ..ottt ii e eanannns 2-3,3 Warm up time (at anode voltage 600 V),
voltage [3]	600 V	MPOXOAHAA . ..ottt ii e eanannns 2-3,3 Warm up time (at anode voltage 600 V),
power in CW operation, W [1]	600 W	600B),c,Hebonee i, 60 Output power in CW operation, W:
power in CW operation, W [2]	60 W	600B),c,Hebonee i, 60 Output power in CW operation, W:
wavelength [1]	14 cm	npv AnvHe BONHbI 14CM 8 Output power over 500 h of service (at wavelength
wavelength [2]	8 cm	npv AnvHe BONHbI 14CM 8 Output power over 500 h of service (at wavelength
wavelength [3]	500 cm	npv AnvHe BONHbI 14CM 8 Output power over 500 h of service (at wavelength

PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
pulse duration about5 us)	2 us	B MMNynsce (MpY ANIMTeNbHOCTU UMNYNbca peak (with pulse duration about5 us) 2
pulse duration about	4 V	HanpsikeHne ceTkun B umnynsce (Npu 4NMTensHOCTY Peak grid voltage (with pulse duration about
anode	80	 80 anode:
grid [1]	2	PacceVbaeman MOWHOCTb ceTkON, BT 2 grid .. 2
grid [2]	2	PacceVbaeman MOWHOCTb ceTkON, BT 2 grid .. 2
Wavelength,em L [1]	11 cm	OAMHA BOMHBEL CM .. oo 11-100 Wavelength,em L 11-100
Wavelength,em L [2]	-100 cm	OAMHA BOMHBEL CM .. oo 11-100 Wavelength,em L 11-100
Wavelength,em L [3]	11 cm	OAMHA BOMHBEL CM .. oo 11-100 Wavelength,em L 11-100
Wavelength,em L [4]	-100 cm	OAMHA BOMHBEL CM .. oo 11-100 Wavelength,em L 11-100
anode heatsink	200	pPaaMaTOPaaHOAA 200 anode heatsink
grid circuit, kK oL [1]	10 ohm	Conporuenexue B yenm ceTkun, KOM 10 Resistance in grid circuit, kK oL 10
grid circuit, kK oL [2]	10 ohm	Conporuenexue B yenm ceTkun, KOM 10 Resistance in grid circuit, kK oL 10