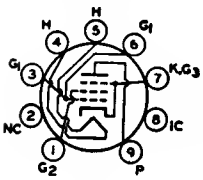
	Unit No.1	Unit No.2	
Cathode-Bias Resistor	—	620	ohms
Amplification Factor	68	5	
Plate Resistance (Approx.)	52000	920	ohms
Transconductance	1300	5400	μmhos
Plate Current	1.2	30	mA
Plate Current for grid voltage of —30 volts	—	3.5	mA
Grid Voltage (Approx.) for plate current of 10 μA	—5.5	—	volts
Grid Voltage (Approx.) for plate current of 200 μA	—	—40	volts

Vertical-Deflection Oscillator and Amplifier

For operation in a 525-line, 30-frame system

MAXIMUM RATINGS (Design-Maximum Values)	Unit No.1 Oscillator	Unit No.2 Amplifier	
DC Plate Voltage	350	350	volts
Peak Positive-Pulse Plate Voltage#	—	1800	volts
Peak Negative-Pulse Grid Voltage	—400	—250	volts
Peak Cathode Current	—	120	mA
Average Cathode Current	—	35	mA
Plate Dissipation	1	5.5	watts
MAXIMUM CIRCUIT VALUES			
Grid-Circuit Resistance	2.2	2.2†	megohms

Pulse duration must not exceed 15% of a vertical scanning cycle (2.5 milliseconds).
† For cathode-bias operation.



9HN

6CZ5
BEAM POWER TUBE
5CZ5

Miniature type used as a vertical-deflection amplifier in high-efficiency deflection circuits of color and black-and-white television receivers and in the audio output stage of television and radio receivers. **Outlines section, 6G;** requires miniature 9-contact socket. Type 5CZ5 is identical with type 6CZ5 except for heater ratings.

	5CZ5	6CZ5	
Heater Voltage (ac/dc)	4.7	6.3	volts
Heater Current	0.6	0.45	ampere
Heater Warm-up Time (Average)	11	11	seconds
Heater-Cathode Voltage:			
Peak value	±200 max	±200 max	volts
Average value	100 max	100 max	volts
Direct Interelectrode Capacitances:			
Grid No.1 to Plate		0.4 max	pF
Grid No.1 to Cathode, Heater, Grid No.2, and Grid No.3		9	pF
Plate to Cathode, Heater, Grid No.2, and Grid No.3		6	pF

Class A_1 Amplifier

CHARACTERISTICS			
Plate Voltage	75	250	volts
Grid-No.2 Voltage	250	250	volts
Grid-No.1 Voltage	0	—15	volts
Plate Resistance	—	73000	ohms
Transconductance	—	4800	μmhos
Plate Current	130•	46	mA
Grid-No.2 Current	16•	4.6	mA
Grid-No.1 Voltage (Approx.) for plate current of 100 μA	—	—40	volts

Vertical-Deflection Amplifier

For operation in a 525-line, 30-frame system

MAXIMUM RATINGS (Design-Maximum Values)		
DC Plate Voltage	350	volts
Peak Positive-Pulse Plate Voltage#	2200	volts
Grid-No.2 (Screen-Grid) Voltage	315	volts
Peak Negative-Pulse Grid-No.1 (Control-Grid) Voltage	275	volts
Peak Cathode Current	155	mA
Average Cathode Current	45	mA
Plate Dissipation	10	watts
Grid-No.2 Input	2.2	watts
Bulb Temperature (At hottest point)	250	°C
MAXIMUM CIRCUIT VALUES		
Grid-No.1-Circuit Resistance:		
For fixed-bias operation	0.5	megohm
For cathode-bias operation	1	megohm