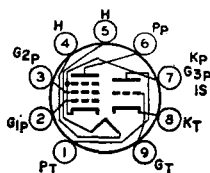


Refer to chart at end of section.
 For replacement use type 8FQ7/8CG7.
 Refer to type 6CM7.
 Refer to chart at end of section.
 Refer to type 6CS7.
 Refer to type 6CW5/EL86.
 Refer to type 6CW5.
 Refer to type 6CX8.
 Refer to chart at end of section.
 For replacement use type 8GN8/8EB8.
 Refer to type 6EM5.
 Refer to chart at end of section.
 Refer to chart at end of section.
 Refer to type 6FQ7/6CG7.
 Refer to chart at end of section.
 Refer to type 6GJ7/ECF801.

8CB11
 8CG7
 8CM7
 8CN7
 8CS7
 8CW5/XL86
 8CW5
 8CX8
 8EB8
 8EM5
 8ET7
 8FQ7
 8FQ7/8CG7
 8GJ7
 8GJ7/PCF801
 8GN8
 8GN8/8EB8
 8GU7
 8JU8A
 8JV8
 8KA8
 8LC8
 8LT8
 9A8

Refer to type 6GN8.
 Refer to type 6GU7.
 Refer to type 6JU8A.
 Refer to type 6JV8.
 Refer to type 6KA8.
 Refer to type 6LC8.
 Refer to type 6LT8.
 Refer to chart at end of section.



9DC

MEDIUM-MU TRIODE— SHARP-CUTOFF PENTODE

9A8/
 PCF80

Miniature type used as combined oscillator and mixer tubes in vhf color and black-and-white television receivers. Outlines section, 6B; requires miniature 9-contact socket. Heater: volts (ac/dc), 9; amperes, 0.3; maximum heater-cathode volts, +100, -200 peak; -120 average.

Class A₁ Amplifier

MAXIMUM RATINGS (Design-Center Values)	Triode Unit	Pentode Unit	
Plate Supply Voltage	550	550	volts
Plate Voltage	250	250	volts
Grid-No.2 (Screen-Grid) Voltage	—	175	volts
Cathode Current	14	14	mA
Plate Dissipation	1.5	1.7	watts
Grid-No.2 Input	—	0.5	watt

CHARACTERISTICS

Plate Voltage	100	170	volts
Grid-No.2 Voltage	—	170	volts
Grid-No.1 Voltage	—2	—2	volts
Amplification Factor	20	47*	
Plate Resistance (Approx.)	—	0.4	megohm
Transconductance	5000	6200	μ mhos
Plate Current	14	10	mA
Grid-No.2 Current	—	2.8	mA

MAXIMUM CIRCUIT VALUES

Grid-No.1-Circuit Resistance:			
For fixed-bias operation	0.5	0.5	megohm
For cathode-bias operation	0.5	1	megohm

* Grid No.2 to Grid No.1.

9AH9

Refer to chart at end of section.

9AK10

Refer to chart at end of section.

9AM10

Refer to chart at end of section.

9AQ8/PCC85

Refer to chart at end of section.

9AU7

Refer to type 12AU7A.

9BJ11

Refer to chart at end of section.

9BR7

Refer to chart at end of section.

9CL8

Refer to chart at end of section.

9EA8

Refer to chart at end of section.

9GH8A

Refer to type 6GH8A.

9GV8

Refer to chart at end of section.

9GV8/XCL85

Refer to type 6GV8/ECL85.

9JW8/PCF802

Refer to type 6JW8/ECF802.

9KC6

Refer to chart at end of section.

9KX6**SHARP-CUTOFF PENTODE**

Miniature type with frame grid used as video output amplifier in color and black-and-white television receivers. Outlines section, 6E; requires miniature 9-contact socket. Heater: volts, 8.7; amperes, 0.45; warm-up time, 11 seconds; maximum heater-cathode volts, ± 200 peak, 100 average.

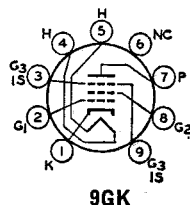
**9GK****Class A₁ Amplifier****MAXIMUM RATINGS (Design-Maximum Values)**

Plate Voltage	400	volts
Grid-No.3 (Suppressor-Grid) Voltage, Positive value	0	volts
Grid-No.2 (Screen-Grid) Supply Voltage	330	volts
Grid-No.2 Voltage	See curve page 300	
Grid-No.1 (Control-Grid) Voltage, Positive value	0	volts
Plate Dissipation	11.5	watts
Grid-No.2 Input	1.5	watts

CHARACTERISTICS

Plate Voltage	250	50	volts
Grid-No.3 Voltage	Connected to cathode at socket		
Grid-No.2 Supply Voltage	150	125	volts
Grid-No.1 Voltage	0	0	volts

Cathode-Bias Resistor, Bypassed	56	—	ohms
Plate Resistance (Approx.)	50000	—	ohms
Transconductance (Grid No.1 to Plate)	36000	—	μ mhos
Plate Current	28	70	mA
Grid-No.2 Current	6.5	24	mA
Grid-No.1 Voltage (Approx.) for plate current of 100 μ A	—5.7	—	volts

MAXIMUM CIRCUIT VALUES

Grid-No.1-Circuit Resistance:			
For fixed-bias operation	0.1		megohm
For cathode-bias operation	0.25		megohm

Refer to type 6KZ8.	9KZ8
Refer to chart at end of section.	9LA6
Refer to type 6MN8.	9MN8
For replacement use type 10DE7.	9RAL1
Refer to type 6U8A.	9U8A
Refer to chart at end of section.	10
Refer to type 6AL11.	10AL11
Refer to type 6BQ5.	10BQ5
Refer to chart at end of section.	10C8
Refer to chart at end of section.	10CW5
Refer to type 6CW5/EL86.	10CW5/LL86
Refer to type 6DE7.	10DE7
Refer to type 6DR7.	10DR7
Refer to chart at end of section.	10DX8
Refer to type 6DX8/ECL84.	10DX8/LCL84
Refer to chart at end of section.	10EG7
Refer to type 6EM7.	10EM7
Refer to type 6EW7.	10EW7
Refer to chart at end of section.	10GF7
Refer to type 6GF7A.	10GF7A
Refer to type 6GK6.	10GK6
Refer to type 6GN8.	10GN8
Refer to type 6GV8/ECL85.	10GV8/LCL85
Refer to type 6HF8.	10HF8
Refer to chart at end of section.	10JA5
Refer to type 10JA8/10LZ8	10JA8