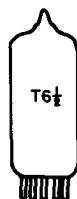
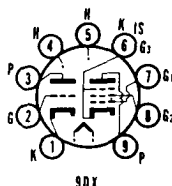


6JE8**8JE8, 11JE8****SYNC SEPARATOR or
VOLTAGE AMP. (T)
VIDEO AMPLIFIER (P)****High Mu Triode and
Sharp Cutoff Pentode**

Construction Miniature T-6½
 Base Button 9 Pin, E9-1
 Basing 9DX
 Outline 6-3
 Maximum Diameter 0.875 In.
 Maximum Seated Height 2.375 In.
 Maximum Overall Height 2.625 In.

**ELECTRICAL DATA****HEATER OPERATION**

	11JE8	8JE8	6JE8
Heater Voltage.....	10.9	8.2	6.3 Volts
Heater Current	450	600	780 Ma
Heater Warm-up Time	11	11	— Seconds
Maximum Heater-Cathode Voltage			
Heater Negative with Respect to Cathode			
Total DC and Peak.....			200 Volts
Heater Positive with Respect to Cathode			
DC			100 Volts
Total DC and Peak.....			200 Volts

DIRECT INTERELECTRODE CAPACITANCES (Unshielded)**Triode Section**

Grid to Plate	4.2 Pf
Input: g to (h + k)	2.4 Pf
Output: p to (h + k)	0.4 Pf

Pentode Section

Grid No. 1 to Plate (Max.).....	0.1 Pf
Input: g1 to (h + k + g2 + g3 + IS).....	10 Pf
Output: p to (h + k + g2 + g3 + IS).....	3.6 Pf

Coupling

Pentode Grid No. 1 to Triode Plate (Max.)	0.005 Pf
Triode Grid to Pentode Plate (Max.)	0.018 Pf
Pentode Plate to Triode Plate (Max.)	0.17 Pf

RATINGS (Design Maximum Rating System)

Plate Voltage (Max.)	300	330 Volts
Grid No. 2 Supply Voltage.....	—	330 Volts
Grid No. 2 Voltage	See Rating Chart (Gen. Info. Sec.)	
Plate Dissipation (Max.)	1.0	5 ⁽¹⁾ Watts
Grid No. 2 Dissipation (Max.)	—	2 ⁽¹⁾ Watts
Positive Grid No. 1 Voltage (Max.)	0	0 Volt
Grid No. 1 Circuit Resistance		
Fixed Bias (Max.)	0.5	0.25 Megohm
Self Bias (Max.)	1.0	1.0 Megohm

CHARACTERISTICS AND TYPICAL OPERATION

	Triode Section	Pentode Section
Class A1 Amplifier		
Plate Voltage	200	250 Volts
Grid No. 2 Voltage	—	170 Volts
Grid No. 1 Voltage	—2	0 Volts
Cathode Bias Resistor	—	82 Ohms
Plate Current	4.5	22 Ma
Grid No. 2 Current	—	4.0 Ma
Transconductance	4200	12,000 μ mhos
Amplification Factor	70	—
Plate Resistance (Approx.)	—	140,000 Ohms
E _{c1} for I _b = 10 μ a (Approx.)	—5	—10 Volts

INSTANTANEOUS PLATE KNEE CHARACTERISTICSE_b = 60 V; E_{c2} = 170 V, and E_{c1} = 0 VI_b = 48 Ma (Approx.) and I_{c2} = 12 Ma (Approx.)

NOTE:

- (1) These are design maximum dissipation ratings for television video amplifier applications. The two watts maximum Grid No. 2 Dissipation should not occur simultaneously with the five watts maximum plate dissipation. The two watts maximum Grid No. 2 Dissipation may be operated simultaneously with a Plate Dissipation of 4.0 Watts or 1.5 Watts Maximum Grid No. 2 Dissipation may be operated simultaneously with a Plate Dissipation of 5.0 Watts.

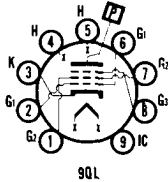
HORIZONTAL DEFLECTION AMPLIFIER

6JF6
22JF6

Beam Power Pentode

Construction Novar T-12
Base Button 9 Pin, E9-88
Top Cap C1-2 or C1-3
Basing 9QL
Outline

Maximum Diameter 1.563 In.
Maximum Seated Height 3.170 In.
Maximum Overall Height 3.550 In.



ELECTRICAL DATA

HEATER OPERATION

	22JF6	6JF6
Heater Voltage.....	22	6.3 Volts
Heater Current	450	1600 Ma
Heater Warm-up Time	11	— Seconds
Maximum Heater-Cathode Voltage		
Heater Negative with Respect to Cathode		
Total DC and Peak.....		200 Volts
Heater Positive with Respect to Cathode		
DC		100 Volts
Total DC and Peak.....		200 Volts

DIRECT INTERELECTRODE CAPACITANCES (Unshielded)

Grid No. 1 to Plate	1.2 Pf
Input: g1 to (k, g3, g2, H)	22.0 Pf
Output: p to (k, g3, g2, H)	9.0 Pf

RATINGS (Design Maximum Rating System)

Horizontal Deflection Amplifier⁽¹⁾

DC Plate Supply Voltage (Boost + DC Power Supply) (Max.)	770 Volts
Peak Positive Pulse Plate Voltage (Max.)	6500 Volts
Peak Negative Pulse Plate Voltage (Max.)	1500 Volts
Grid No. 3 Voltage (Max.)	75 Volts
Plate Dissipation (Max.) ⁽²⁾	100 Watts
Peak Negative Grid No. 1 Voltage (Max.)	330 Volts
Grid No. 2 Voltage (Max.)	220 Volts
Grid No. 2 Dissipation (Max.)	3.5 Watts
Average Cathode Current (Max.)	275 Ma
Peak Cathode Current (Max.)	950 Ma
Grid No. 1 Circuit Resistance (Max.)	2.2 Megohms
Bulb Temperature (At Hottest Point) (Max.)	240 °C

CHARACTERISTICS AND TYPICAL OPERATION

Plate Voltage	130 Volts
Grid No. 2 Voltage	125 Volts
Grid No. 1 Voltage	-20 Volts
Plate Current	80 Ma
Grid No. 2 Current	2.5 Ma
Transconductance	10,000 μ mhos
Plate Resistance	12,000 Ohms
Amplification Factor ⁽³⁾	4.1
Ec1 for Ib = 1.0 Ma (Approx.)	-40 Volts

INSTANTANEOUS PLATE KNEE VALUES

Eb = 50 V; Ec2 = 125 V and Ec1 = 0 V
Ib = 525 Ma, and Ic2 = 32 Ma