

## CHARACTERISTICS

### GENERAL DATA

|                             |               |
|-----------------------------|---------------|
| Focusing Method . . . . .   | Electrostatic |
| Deflecting Method . . . . . | Electrostatic |
| Phosphor . . . . .          | P1            |
| Fluorescence . . . . .      | Green         |
| Persistence . . . . .       | Medium        |
| Faceplate . . . . .         | Clear         |

### ELECTRICAL DATA

|                                                                   |                 |
|-------------------------------------------------------------------|-----------------|
| Heater Voltage . . . . .                                          | 6.3 Volts       |
| Heater Current (approx.) . . . . .                                | 0.6 Ampere      |
| Direct Interelectrode Capacitances (approx.)                      |                 |
| Cathode to All Other Electrodes . . . . .                         | 9 $\mu\text{f}$ |
| Grid No. 1 to All Other Electrodes . . . . .                      | 8 $\mu\text{f}$ |
| Between Deflecting Plates 1-2 <sup>1</sup> . . . . .              | 2 $\mu\text{f}$ |
| Between Deflecting Plates 3-4 <sup>1</sup> . . . . .              | 2 $\mu\text{f}$ |
| Deflecting Plate 1 <sup>1</sup> to All Other Electrodes . . . . . | 9 $\mu\text{f}$ |
| Deflecting Plate 2 <sup>1</sup> to All Other Electrodes . . . . . | 9 $\mu\text{f}$ |
| Deflecting Plate 3 <sup>1</sup> to All Other Electrodes . . . . . | 7 $\mu\text{f}$ |
| Deflecting Plate 4 <sup>1</sup> to All Other Electrodes . . . . . | 8 $\mu\text{f}$ |

### MECHANICAL DATA

|                                                      |           |
|------------------------------------------------------|-----------|
| Minimum Useful Screen Dimension (Diameter) . . . . . | 4½ Inches |
| Bulb Contact (Recessed Small Ball Cap) . . . . .     | J1-22     |
| Base (Medium Shell Diheptal 12-Pin) . . . . .        | B12-37    |
| Basing . . . . .                                     | 14J       |

## RATINGS

### MAXIMUM RATINGS (Design Center Values)

|                                                   |                |
|---------------------------------------------------|----------------|
| Anode No. 3 Voltage . . . . .                     | 4,000 Volts dc |
| Anode No. 2 Voltage . . . . .                     | 2,000 Volts dc |
| Anode No. 1 Voltage . . . . .                     | 1,000 Volts dc |
| Grid No. 1 Voltage                                |                |
| Negative Bias Value . . . . .                     | 200 Volts dc   |
| Positive Bias Value . . . . .                     | 0 Volts dc     |
| Positive Peak Value . . . . .                     | 2 Volts        |
| Peak Heater Cathode Voltage                       |                |
| Heater Negative with Respect to Cathode . . . . . | 125 Volts      |
| Heater Positive with Respect to Cathode . . . . . | 125 Volts      |
| Peak Voltage Between Anode No. 2                  |                |
| And Any Deflecting Plate . . . . .                | 500 Volts      |

### RECOMMENDED OPERATING CONDITIONS

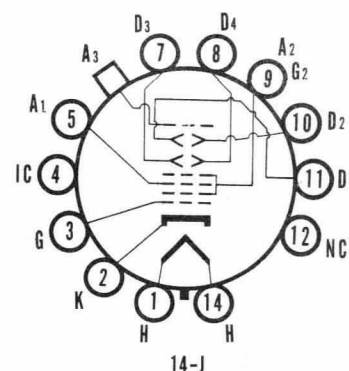
|                                                               |                     |
|---------------------------------------------------------------|---------------------|
| Anode No. 3 Voltage . . . . .                                 | 4,000 Volts dc      |
| Anode No. 2 Voltage . . . . .                                 | 2,000 Volts dc      |
| Anode No. 1 Voltage . . . . .                                 | 375 to 690 Volts dc |
| Grid No. 1 Voltage Required for Cutoff <sup>2</sup> . . . . . | -30 to -90 Volts dc |
| Deflection Factor                                             |                     |
| Deflecting Plates 1-2 <sup>3</sup> . . . . .                  | 92 Volts dc/Inch    |
| Deflecting Plates 3-4 <sup>4</sup> . . . . .                  | 78 Volts dc/Inch    |

### CIRCUIT VALUES

|                                         |                  |
|-----------------------------------------|------------------|
| Grid No. 1 Circuit Resistance . . . . . | 1.5 Megohms Max. |
| Deflection Circuit Resistance . . . . . | 5.0 Megohms Max. |

## QUICK REFERENCE DATA

Special Purpose Tube  
5" Direct Viewed  
Round Glass Type  
Electrostatic Deflection  
Electrostatic Focus  
Post Deflection Accelerator



SYLVANIA ELECTRIC  
PRODUCTS INC.

TELEVISION PICTURE TUBE  
DIVISION  
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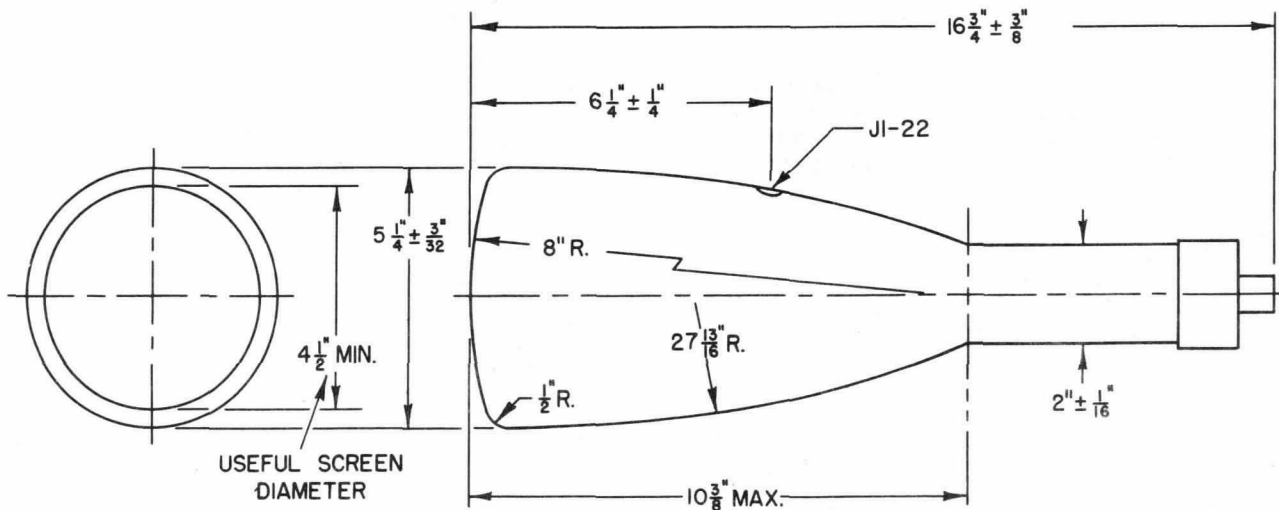
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## 5CP1A

5CP7A, 5CP11A  
5CP12

### NOTES:

1. Deflecting Plate 1 is Pin No. 11  
Deflecting Plate 2 is Pin No. 10  
Deflecting Plate 3 is Pin No. 7  
Deflecting Plate 4 is Pin No. 8
2. Visual extinction of undeflected focused spot.
3. Deflecting Plates 1-2 are nearer the screen.
4. Deflecting Plates 3-4 are nearer the base.
5. The plane through the tube axis and each of the following items may vary from the trace produced by deflecting plates 1-2 by the following angular tolerances measured about the tube axis: Pin 5 10 degrees; cap (on same side of tube as Pin 5) 10 degrees.



S53005

## 5CP7A

The Sylvania Type 5CP7A is identical to the Type 5CP1A except it has a blue-white fluorescence, yellow phosphorescence, long persistence phosphor.

## 5CP11A

The Sylvania Type 5CP11A is identical to the Type 5CP1A except it has blue phosphor and a short persistence.

## 5CP12

The Sylvania Type 5CP12 is identical to the Type 5CP1A except it has an orange phosphor and a medium long persistence.