### CHARACTERISTICS

**GENERAL DATA**
- Focusing Method: Magnetic
- Deflecting Method: Magnetic
- Deflection Angle (approx.):
  - Horizontal: 85 Degrees
  - Diagonal: 90 Degrees
- Phosphor: P4
- Fluorescence: White
- Persistence: Medium
- Faceplate: Gray Filter Glass
- Light Transmittance (approx.): 68 Percent

**ELECTRICAL DATA**
- Heater Voltage: 6.3 Volts
- Heater Current (approx.): 0.6 Ampere
- Direct Inter electrode Capacitances (approx.):
  - Cathode to All Other Electrodes: 5 µF
  - Grid No. 1 to All Other Electrodes: 6 µF
  - External Conductive Coating to Anode: 750 µF Max.
  - 500 µF Min.
- Ion Trap Magnet: External, Single Field Type

**MECHANICAL DATA**
- Minimum Useful Screen Dimensions: 24 1/4 x 18 1/2 Inches
- Bulb Contact (Recessed Small Cavity Cap): J1-21
- Base (Small Shell Duodecal 5-Pin): B5-57
- Basing: 12N

**RATINGS**

#### MAXIMUM RATINGS (Design Center Values)
- Anode Voltage: 18,000 Volts dc
- Grid No. 2 Voltage: 500 Volts dc
- Grid No. 1 Voltage:
  - Negative Bias Value: 125 Volts dc
  - Positive Bias Value: 0 Volts dc
  - Positive Peak Value: 2 Volts
- Peak Heater-Cathode Voltage
- Heater Negative with Respect to Cathode
  - During Warm-up Period: Not to Exceed 410 Volts
  - After Equipment Warm-up Period: 180 Volts
- Heater Positive with Respect to Cathode: 180 Volts

#### RECOMMENDED OPERATING CONDITIONS
- Anode Voltage:
- Grid No. 2 Voltage: 300 Volts dc
- Grid No. 1 Voltage:
  - Required for Cutoff: -28 to -72 Volts dc
- Focusing Coil Current:
- Ion Trap Magnet Strength (approx.): 35 Gausses

#### CIRCUIT VALUES
- Grid No. 1 Circuit Resistance: 1.5 Megohms Max.

**NOTES:**
1. Conductive Coating must be grounded.
2. Brilliance and definition decrease with decreasing anode voltage. In general, the anode voltage should not be less than this value.
3. Visual extinction of focused raster. Extinction of the stationary focused spot will require that these values be about 5 volts more negative.
4. For JETEC focusing coil No. 109 or equivalent 3 inches from reference line with the combined grid No. 1 bias voltage and video signal adjusted to produce a highlight brightness of 20 foot lamberts on a picture area of 24 1/4 x 18 1/2 inches.
DIAGRAM NOTES
1. Reference line is determined by the plane C-C1 of the reference line gauge (JETEC No.116) when the
gauge is resting on the cone. The neck diameter near the cone may exceed 1.500" but is limited by the
internal contour of the yoke reference line gauge.
2. Suggested mask opening.
3. Bulb contact aligns with vacant pin position No.6 ± 30 degrees.

WARNING
X-ray radiation shielding may be necessary to protect against possible danger of personal injury from
prolonged exposure at close range if this tube is operated at higher than the manufacturer's Maximum Rated
Anode Voltage or 16,000 volts, whichever is less.