

## TRIODE-PENTODE CONVERTER TYPE 6KZ8

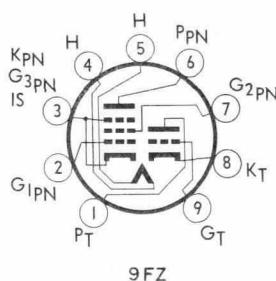
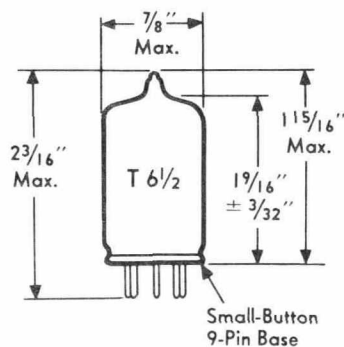
The 6KZ8 is a 9-Pin miniature medium-mu triode and sharp-cutoff pentode type designed for service as combined oscillator and mixer in television receiver tuners.

### ELECTRICAL

|                                              |                     |
|----------------------------------------------|---------------------|
| Cathode.....                                 | Coated Unipotential |
| Heater:                                      |                     |
| Voltage (ac or dc).....                      | 6.3±0.6 Volts       |
| Current.....                                 | 0.45 Amperes        |
| Direct Interelectrode Capacitances: (Note 1) |                     |
| Triode Unit                                  |                     |
| Grid to Plate.....                           | 1.6 pf              |
| Input.....                                   | 3.2 pf              |
| Output.....                                  | 0.9 pf              |
| Heater to Cathode (Note 2).....              | 3.2 pf              |
| Pentode Unit                                 |                     |
| Grid 1 to Plate.....                         | 0.01 max. pf        |
| Input.....                                   | 5.5 pf              |
| Output.....                                  | 3.4 pf              |
| Heater to Cathode (Note 2).....              | 3.2 pf              |

### MECHANICAL

|               |                              |
|---------------|------------------------------|
| Bulb.....     | T-6½                         |
| Base.....     | Miniature 9-pin (JEDEC E9-1) |
| Basing.....   | 9FZ                          |
| Outline.....  | 6-2                          |
| Mounting..... | Any                          |



### MAXIMUM RATINGS

Design Maximum Values

|                                                                 | Triode Unit | Pentode Unit                  |
|-----------------------------------------------------------------|-------------|-------------------------------|
| Plate Voltage.....                                              | 330         | 330 max. Volts                |
| Grid 2 (Screen) Voltage.....                                    | —           | See Grid 2 Input Rating Curve |
| Grid 2 Supply Voltage.....                                      | —           | 330 max. Volts                |
| Grid 1 (Control Grid) Voltage                                   |             |                               |
| Positive Bias Value.....                                        | 0           | 0 max. Volts                  |
| Plate Dissipation.....                                          | 2.5         | 2.5 max. Watts                |
| Grid 2 Input.....                                               | —           | 0.55 max. Watt                |
| Heater Cathode Voltage                                          |             |                               |
| Heater Positive with Respect to Cathode                         |             |                               |
| DC Component.....                                               | 100         | 100 max. Volts                |
| Total DC and Peak.....                                          | 200         | 200 max. Volts                |
| Heater Negative with Respect to Cathode, Total DC and Peak..... | 200         | 200 max. Volts                |

### LIMITING CIRCUIT VALUES

|                                 |      |                  |
|---------------------------------|------|------------------|
| Grid 1 Circuit Resistance:      |      |                  |
| With Fixed Bias.....            | 0.25 | 0.25 max. Megohm |
| With Cathode Resistor Bias..... | 0.5  | 0.5 max. Megohm  |

### CHARACTERISTICS

|                                  | Triode Unit | Pentode Unit |
|----------------------------------|-------------|--------------|
| Plate Voltage.....               | 125         | 125 Volts    |
| Grid 2 Voltage.....              | —           | 125 Volts    |
| Grid 1 Voltage.....              | —1.0        | —1.0 Volts   |
| Amplification Factor.....        | 46          | — Ohms       |
| Plate Resistance (approx.).....  | 5400        | 200000 Ohms  |
| Transconductance.....            | 8500        | 7500 μmhos   |
| Grid 1 Cutoff Bias (Note 3)..... | —8          | —8 Volts     |
| Plate Current.....               | 13.5        | 12 Ma.       |
| Grid 2 Current.....              | —           | 4 Ma.        |

### NOTES

1. With JEDEC shield #315 connected to Cathode of unit under test.
2. With JEDEC shield #315 connected to ground.
3. For plate current of 10 microamperes.

