

# GENERAL PURPOSE HIGH CONDUCTANCE DIODES

1N461A  
1N462A  
1N463A

## ABSOLUTE MAXIMUM RATINGS

- $V_F$  1.0 V @ 100 mA
- $I_R$  500 nA @ WIV

### Temperatures

|                                        |                   |
|----------------------------------------|-------------------|
| Storage Temperature Range              | -65 °C to +200 °C |
| Maximum Junction Operating Temperature | +175 °C           |
| Lead Temperature                       | +260 °C           |

### Power Dissipation

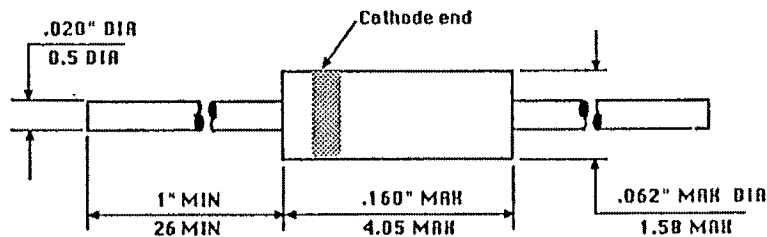
|                                                  |             |
|--------------------------------------------------|-------------|
| Maximum Total Power Dissipation at 25 °C Ambient | 500 mW      |
| Linear Power Derating Factor (from 25 °C)        | 3.33 mW/ °C |

### Maximum Voltage and Currents

|                                          | 1N461A | 1N462A | 1N463A | 1N464A |
|------------------------------------------|--------|--------|--------|--------|
| WIV Working Inverse Voltage              | 25V    | 60V    | 175V   | 125V   |
| $I_O$ Average Rectified Current          | 200 mA | 200 mA | 200 mA | 200mA  |
| $I_F$ Continuous Forward Current         | 500mA  | 500mA  | 500mA  | 500mA  |
| $i_F$ Peak Repetitive Forward Current    | 600mA  | 600mA  | 600mA  | 600mA  |
| $i_F$ (surge) Peak Forward Surge Current |        |        |        |        |
| Pulse Width = 1μs                        | 4.0 A  | 4.0 A  | 4.0 A  | 4.0 A  |
| Pulse Width = 1s                         | 1.0A   | 1.0A   | 1.0A   | 1.0A   |

## ELECTRICAL CHARACTERISTICS (25 °C Ambient Temperature unless otherwise noted)

| SYMBOL | CHARACTERISTIC    | MIN | MAX       | UNITS    | TEST CONDITIONS                                        |
|--------|-------------------|-----|-----------|----------|--------------------------------------------------------|
| $V_F$  | Forward Voltage   |     | 1.0       | V        | $I_F = 100$ mA                                         |
| $I_R$  | Reverse Current   |     | 500<br>30 | nA<br>μA | $V_R =$ Rated WIV<br>$V_R =$ Rated WIV, $T_A = 150$ °C |
| $B_V$  | Breakdown Voltage |     |           |          |                                                        |
|        | 1N461A            | 30  |           | V        | $I_R = 100\mu$ A                                       |
|        | 1N462A            | 70  |           | V        | $I_R = 100\mu$ A                                       |
|        | 1N463A            | 200 |           | V        | $I_R = 100\mu$ A                                       |
|        | 1N464A            | 150 |           | V        | $I_R = 100\mu$ A                                       |



DO-35 PACKAGE