



ELECTRONICS, INC.  
44 FARRAND STREET  
BLOOMFIELD, NJ 07003  
(973) 748-5089  
<http://www.nteinc.com>

## 1N5624 thru 1N5627 Glass Passivated Junction Rectifier 3 Amp

### **Features:**

- Glass Passivated Cavity-Free Junction
- High Temperature Metallurgically Bonded Construction
- Hermetically Sealed Package
- Typical  $I_R$  Less Than  $0.1\mu A$
- 3 Amp Operation at  $T_A = +70^\circ C$  with No Thermal Runaway
- High Temperature Soldering Guaranteed

**Maximum Ratings and Electrical Characteristics:** ( $T_A = +25^\circ C$  unless otherwise specified)

Maximum Repetitive Peak Reverse Voltage,  $V_{RRM}$

1N5624 .....	200V
1N5625 .....	400V
1N5626 .....	600V
1N5627 .....	800V

Maximum RMS Voltage,  $V_{RMS}$

1N5624 .....	140V
1N5625 .....	280V
1N5626 .....	420V
1N5627 .....	560V

Maximum DC Blocking Voltage,  $V_{DC}$

1N5624 .....	200V
1N5625 .....	400V
1N5626 .....	600V
1N5627 .....	800V

Maximum Average Forward Rectified Forward Current,  $I_{(AV)}$

(.375" (9.5mm) Lead Length at $T_A = +70^\circ C$ ) .....	3A
---	----

Peak Forward Surge Current,  $I_{FSM}$

(8.3ms Single Half Sine-Wave Superimposed on Rated Load) .....	125A
--	------

Maximum Instantaneous Forward Voltage (at 3A),  $V_F$

$T_A = +25^\circ C$ .....	1V
$T_A = +70^\circ C$ .....	0.95V

Maximum DC Reverse Current ( $V_{DC} = \text{Rated Voltage}$ ),  $I_R$

$T_A = +25^\circ C$ .....	5 $\mu A$
$T_A = +175^\circ C$ .....	
1N5624, 1N54625 .....	300 $\mu A$
1N5627, 1N54628 .....	200 $\mu A$

Maximum Full Load Reverse Current,  $I_{R(AV)}$

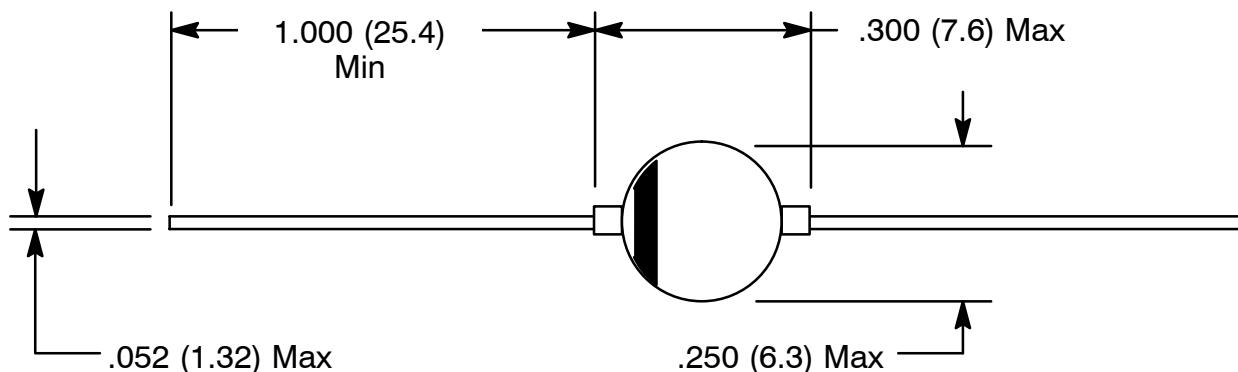
(Full Cycle Average, .375" (9.5mm) Lead Length at $T_A = +70^\circ C$ ) .....	
1N5624, 1N54625 .....	150 $\mu A$
1N5626, 1N54627 .....	100 $\mu A$

**Maximum Ratings and Electrical Characteristics (Cont'd):** ( $T_A = +25^\circ\text{C}$  unless otherwise specified)

Typical Junction Capacitance (Note 1), $C_J$ .....	40pF
Typical Thermal Resistance, Junction-to-Ambient (Note 2), $R_{thJA}$ .....	+20°C/W
Typical Thermal Resistance, Junction-to-Lead (Note 2), $R_{thJL}$ .....	+10°C/W
Operating Junction Temperature Range, $T_J$ .....	-65° to +175°C
Storage Junction Temperature Range, $T_{stg}$ .....	-65° to +200°C

Note 1. Measured at 1Mhz and applied reverse voltage of 4V.

Note 2. Thermal resistance from junction-to-ambient and from junction-to-lead at .375" (9.5mm) lead length with both leads attached between heatsinks.



Color Band Denotes Cathode