

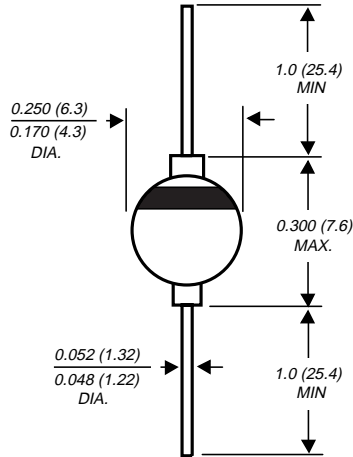
# 1N5624 THRU 1N5627

## GLASS PASSIVATED JUNCTION RECTIFIER

Reverse Voltage - 200 to 800 Volts Forward Current - 3.0 Amperes

**PATENTED \***

### CASE STYLE G3

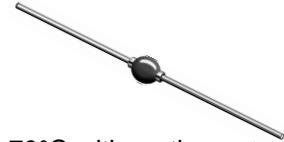


Dimensions in inches and (millimeters)

\* Brazed-lead assembly is covered by Patent No. 3,930,306

### FEATURES

- ◆ Glass passivated cavity-free junction
- ◆ High temperature metallurgically bonded constructed
- ◆ Hermetically sealed package
- ◆ Capable of meeting environmental standards of MIL-S-19500
- ◆ Typical  $I_R$  less than  $0.1\mu A$
- ◆ 3.0 Ampere operation at  $T_A=70^\circ C$  with no thermal runaway
- ◆ High temperature soldering guaranteed:  $350^\circ C/10$  seconds, 0.375" (9.5mm) lead length, 5 lbs. (2.3kg) tension



### MECHANICAL DATA

**Case:** Solid glass body

**Terminals:** Solder plated axial leads, solderable per MIL-STD-750, Method 2026

**Polarity:** Color band denotes cathode end

**Mounting Position:** Any

**Weight:** 0.04 ounce, 1.1 grams

### MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at  $25^\circ C$  ambient temperature unless otherwise specified.

	SYMBOLS	1N5624	1N5625	1N5626	1N5627	UNITS
*Maximum repetitive peak reverse voltage	$V_{RRM}$	200	400	600	800	Volts
Maximum RMS voltage	$V_{RMS}$	140	280	420	560	Volts
*Maximum DC blocking voltage	$V_{DC}$	200	400	600	800	Volts
*Maximum average forward rectified current 0.375" (9.5mm) lead length at $T_A=70^\circ C$	$I_{(AV)}$	3.0				Amps
Peak forward surge current 8.3ms single half sine-wave superimposed on rated load (JEDEC Method)	$I_{FSM}$	125.0				Amps
*Maximum instantaneous forward voltage at 3.0A $T_A=25^\circ C$ $T_A=70^\circ C$	$V_F$	1.0 0.95				Volts
*Maximum DC reverse current at rated DC blocking voltage $T_A=25^\circ C$ $T_A=175^\circ C$	$I_R$	300.0		200.0		$\mu A$
*Maximum full load reverse current, full cycle average, 0.375" (9.5mm) lead length at $T_A=70^\circ C$	$I_{R(AV)}$	150.0		100.0		$\mu A$
Typical junction capacitance (NOTE 1)	$C_J$	40.0				pF
Typical thermal resistance (NOTE 2)	$R_{\theta JA}$ $R_{\theta JL}$	20.0 10.0				$^\circ C/W$
*Operating junction temperature range	$T_J$	-65 to +175				$^\circ C$
*Storage temperature range	$T_{STG}$	-65 to +200				$^\circ C$

#### NOTES:

(1) Measured at 1.0 MHz and applied reverse voltage of 4.0 Volts

(2) Thermal resistance from junction to ambient and from junction to lead at 0.375" (9.5mm) lead length, with both leads attached between heatsinks

\*JEDEC registered values

# RATINGS AND CHARACTERISTIC CURVES 1N5624 THRU 1N5627

