

1N5614 1N5620
1N5616 1N5622
1N5618

GLASS PASSIVATED
SILICON RECTIFIERS
1.0 AMP, 200 THRU 800 VOLT



www.centralsemi.com

DESCRIPTION:

The CENTRAL SEMICONDUCTOR 1N5614 series types are silicon rectifiers mounted in a hermetically sealed, glass passivated package, designed for general purpose applications where high reliability is desired.

MARKING: FULL PART NUMBER

GPR-1A CASE

MAXIMUM RATINGS: ($T_A=25^\circ\text{C}$ unless otherwise noted)

	SYMBOL	1N5614	1N5616	1N5618	1N5620	1N5622	UNITS
Peak Repetitive Reverse Voltage	V_{RRM}	200	400	600	800	1000	V
DC Blocking Voltage	V_R	200	400	600	800	1000	V
RMS Reverse Voltage	$V_{R(RMS)}$	140	280	420	560	700	V
Average Forward Current ($T_A=55^\circ\text{C}$)	I_O			1.0			A
Peak Forward Surge Current, $t_p=8.3\text{ms}$	I_{FSM}			40			A
Operating and Storage Junction Temperature	T_J, T_{stg}				-65 to +200		$^\circ\text{C}$

ELECTRICAL CHARACTERISTICS: ($T_A=25^\circ\text{C}$ unless otherwise noted)

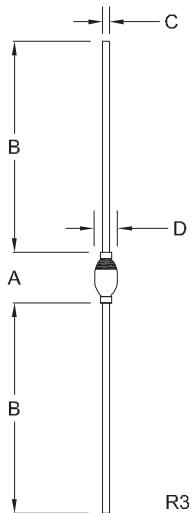
SYMBOL	TEST CONDITIONS	MIN	MAX	UNITS
I_R	$V_R=\text{Rated } V_{RRM}$		0.5	μA
I_R	$V_R=\text{Rated } V_{RRM}, T_A=100^\circ\text{C}$		25	μA
BV_R	$I_R=50\mu\text{A}$ (1N5614)	220		V
BV_R	$I_R=50\mu\text{A}$ (1N5616)	440		V
BV_R	$I_R=50\mu\text{A}$ (1N5618)	660		V
BV_R	$I_R=50\mu\text{A}$ (1N5620)	880		V
BV_R	$I_R=50\mu\text{A}$ (1N5622)	1100		V
V_F	$I_F=1.0\text{A}$		1.2	V
C_J	$V_R=12\text{V}, f=130\text{kHz}$		35	pF
t_{rr}	$I_F=0.5\text{A}, I_R=1.0\text{A}, I_{rr}=0.25\text{A}$		2.0	μs

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GPR-1A CASE - MECHANICAL OUTLINE



SYMBOL	DIMENSIONS		INCHES		MILLIMETERS	
	MIN	MAX	MIN	MAX	MIN	MAX
A	-	0.240	-	6.10	-	-
B	1.000	-	25.40	-	-	-
C	0.028	0.034	0.71	0.86	-	-
D	0.070	0.150	1.80	3.81	-	-

GPR-1A (REV: R3)

MARKING: FULL PART NUMBER

R3 (27-February 2013)

OUTSTANDING SUPPORT AND SUPERIOR SERVICES



PRODUCT SUPPORT

Central's operations team provides the highest level of support to insure product is delivered on-time.

- Supply management (Customer portals)
- Inventory bonding
- Consolidated shipping options
- Custom bar coding for shipments
- Custom product packing

DESIGNER SUPPORT/SERVICES

Central's applications engineering team is ready to discuss your design challenges. Just ask.

- Free quick ship samples (2nd day air)
- Online technical data and parametric search
- SPICE models
- Custom electrical curves
- Environmental regulation compliance
- Customer specific screening
- Up-screening capabilities
- Special wafer diffusions
- PbSn plating options
- Package details
- Application notes
- Application and design sample kits
- Custom product and package development

REQUESTING PRODUCT PLATING

1. If requesting Tin/Lead plated devices, add the suffix " TIN/LEAD" to the part number when ordering (example: 2N2222A TIN/LEAD).
2. If requesting Lead (Pb) Free plated devices, add the suffix " PBFREE" to the part number when ordering (example: 2N2222A PBFREE).

CONTACT US

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