



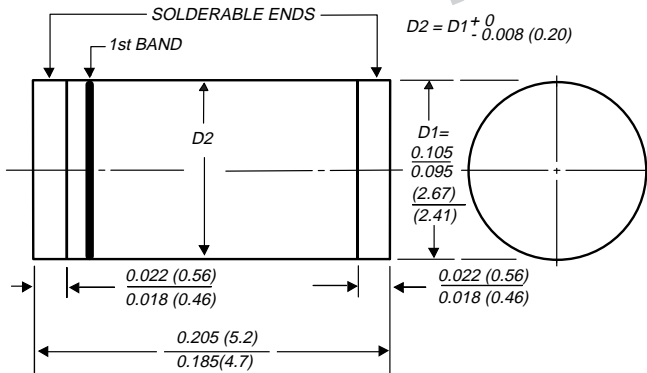
Surface Mount Glass Passivated Junction Rectifiers

Rev. Voltage 50 to 1000V
Forward Current 1.0A



DO-213AB

Patented*



1st band denotes type and positive end (cathode)

Dimensions in inches and (millimeters)

*Glass-plastic encapsulation is covered by

Patent No. 3,996,602 and brazed-lead assembly to Patent No. 3,930,306

Features

- Plastic package has Underwriters Laboratories Flammability Classification 94V-0
- For surface mount applications
- High temperature metallurgically bonded construction
- Cavity-free glass passivated junction
- Capable of meeting environmental standards of MIL-S-19500
- High temperature soldering guaranteed: 450°C/5 seconds at terminals. Complete device submersible temperature of 265°C for 10 seconds in solder bath

Mechanical Data

Case: JEDEC DO-213AB, molded plastic over glass body

Terminals: Plated terminals, solderable per MIL-STD-750, Method 2026

Polarity: Two bands indicate cathode end - 1st band denotes device type and 2nd band denotes repetitive peak reverse voltage rating

Mounting Position: Any

Weight: 0.0046 oz., 0.116 g

Maximum Ratings & Thermal Characteristics Ratings at 25°C ambient temperature unless otherwise specified.

Standard recovery time device: 1st band is White	Symbol	1N6478	1N6479	1N6480	1N6481	1N6482	1N6483	1N6484	Unit
Polarity color bands (2nd Band)		Gray	Red	Orange	Yellow	Green	Blue	Violet	
* Maximum repetitive peak reverse voltage	V _{RRM}	50	100	200	400	600	800	1000	V
Maximum RMS voltage	V _{RMS}	35	70	140	280	420	560	700	V
* Maximum DC blocking voltage	V _{DC}	50	100	200	400	600	800	1000	V
* Maximum average forward rectified current	I _{F(AV)}				1.0				A
* Peak forward surge current 8.3ms single half sine-wave superimposed on rated load at T _A =75°C (JEDEC Method)	I _{FSM}				30				A
* Maximum full load reverse current, full cycle average at T _A = 75°C	I _{R(AV)}				100				µA
* Maximum thermal resistance (Note 1)	R _{θJA}				50				°C/W
(Note 2)	R _{θJT}				20				
* Operating junction and storage temperature range	T _J , T _{STG}				-65 to +175				°C

Electrical Characteristics Ratings at 25°C ambient temperature unless otherwise specified.

* Maximum instantaneous forward voltage at 1.0A	T _A = 25°C T _A = 75°C	V _F	1.1 1.0	V
* Maximum DC reverse current at rated DC blocking voltage	T _A = 25°C T _A = 125°C	I _R	10 200	µA
* Typical junction capacitance at 4.0V, 1MHz		C _J	8.0	pF

Notes: (1) Thermal resistance from junction to ambient, 0.24 x 0.24" (6.0 x 6.0mm) copper pads to each terminal
(2) Thermal resistance from junction to terminal, 0.24 x 0.24" (6.0 x 6.0mm) copper pads to each terminal
*JEDEC Registered Values

1N6478 thru 1N6484



Vishay Semiconductors
formerly General Semiconductor

Ratings and Characteristic Curves ($T_A = 25^\circ\text{C}$ unless otherwise noted)

Fig. 1 - Forward Current Derating Curve

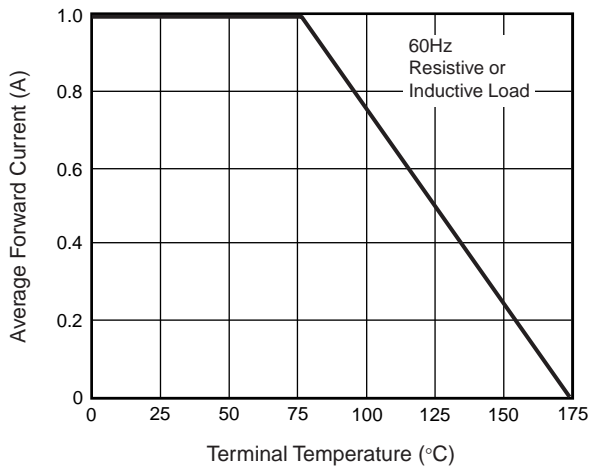


Fig. 2 - Maximum Non-Repetitive Peak Forward Surge Current

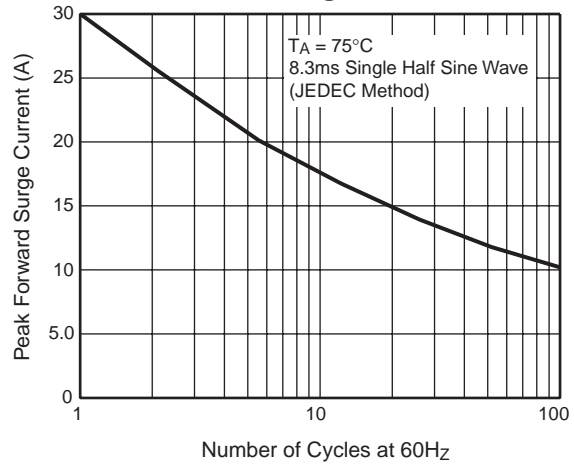


Fig. 3 - Typical Instantaneous Forward Characteristics

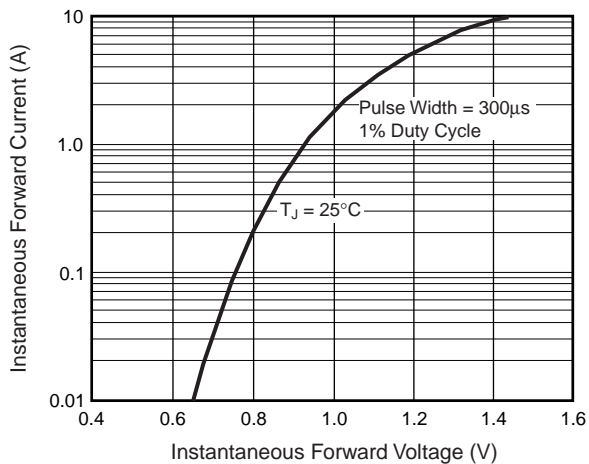


Fig. 4 - Typical Reverse Characteristics

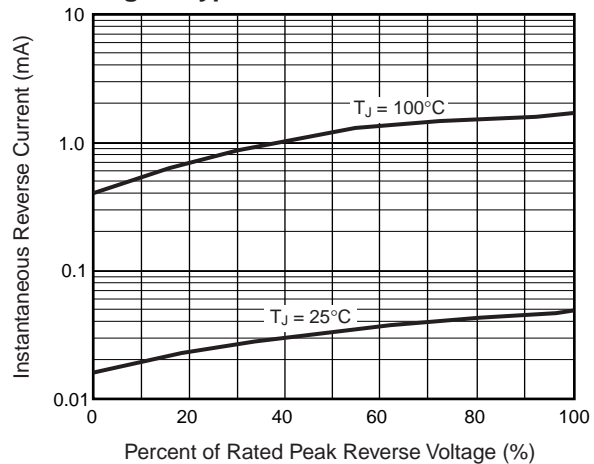


Fig. 5 - Typical Junction Capacitance

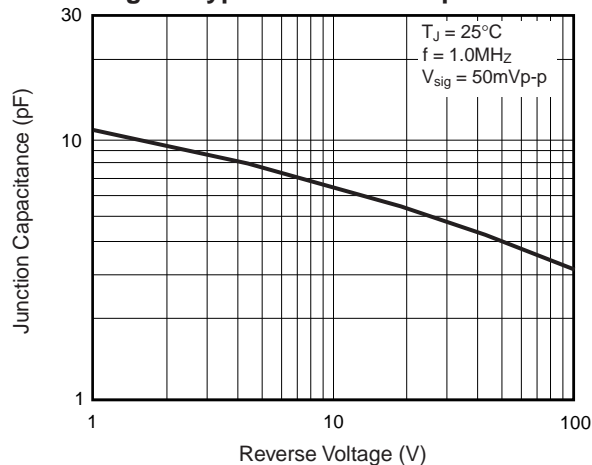


Fig. 6 - Typical Transient Thermal Impedance

