

## UG4KB100-81C-T22

### SINGLE PHASE GLASS PASSIVATED BRIDGE RECTIFIER

Voltage: 1000V

Current: 4.0A

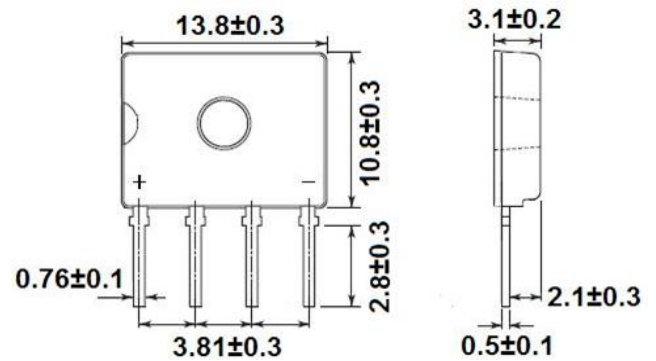
#### Features

Glass passivated chip junction  
High case dielectric strength  
High surge current capability  
Ideal for printed circuit board  
This series is UL listed under Recognized Component Index, file number E330278

#### Mechanical Data

Terminal: Plated leads solderable per J-STD-002  
Case: UL-94 Class V-0 recognized Flame Retardant Epoxy  
Polarity: Polarity symbol marked on body  
Mounting position: any

#### D3K-T22



Dimensions in millimeters

#### MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

(single-phase, half -wave, 60HZ, resistive or inductive load rating at 25°C, unless otherwise stated)

	Symbol	UG4KB100-81C-T22	units
Maximum repetitive peak reverse voltage	V <sub>rrm</sub>	1000	V
Maximum RMS voltage	V <sub>rms</sub>	700	V
Maximum DC blocking voltage	V <sub>dc</sub>	1000	V
Maximum average forward rectified output current T <sub>c</sub> 100°C with heatsink	I <sub>f(av)</sub>	4.0	A
Peak forward surge current single sine-wave superimposed on rated load (JEDEC Method)	I <sub>fsm</sub>	135	A
Maximum instantaneous forward voltage drop per leg at 2.0A	V <sub>f</sub>	1.00	V
Rating for fusing (3ms ≤ t < 8.3ms)	I <sup>2</sup> t	75	A <sup>2</sup> Sec
Maximum DC reverse current at rated DC blocking voltage per leg	I <sub>r</sub>	10.0 500	μA
Thermal resistance	without heatsink R <sub>th(ja)</sub>	55	°C/W
	with heatsink R <sub>th(jc)</sub>	1.5	
	without heatsink R <sub>th(jl)</sub>	15	
Operating junction and storage temperature range	T <sub>j</sub> , T <sub>stg</sub>	-55 to +150	°C

Note:

## RATINGS AND CHARACTERISTIC CURVES UG4KB100-81C-T22

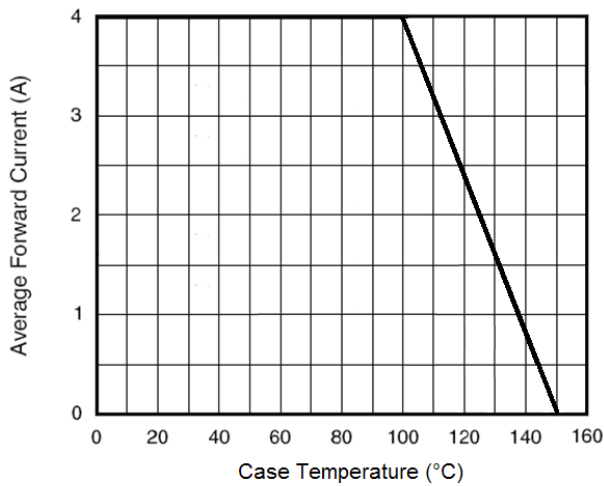


Figure 1. Forward Current Derating Curve

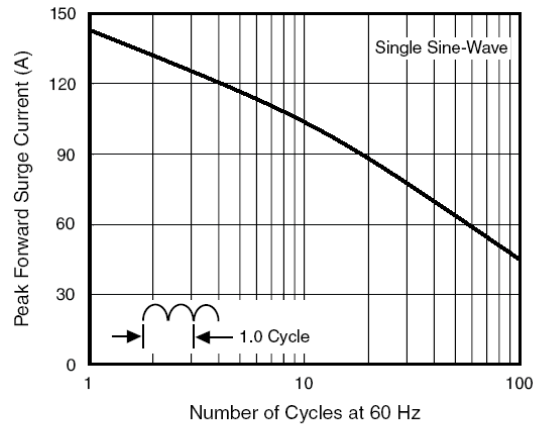


Figure 2. Maximum Non-Repetitive Peak Forward Surge Current Per Diode

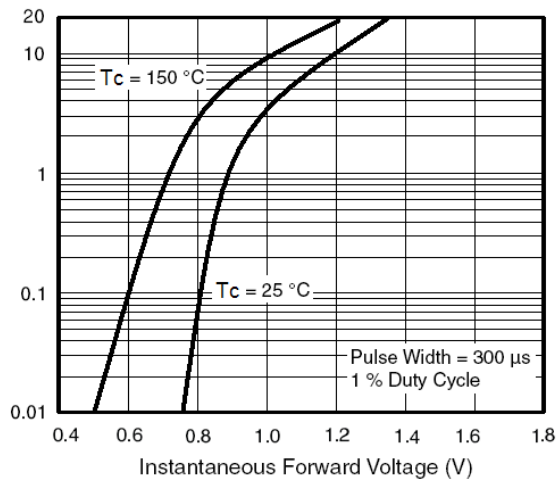


Figure 3. Typical Forward Characteristics Per Diode

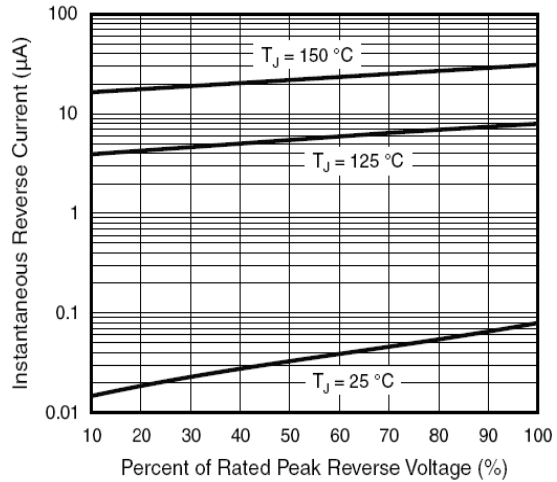


Figure 4. Typical Reverse Leakage Characteristics Per Diode

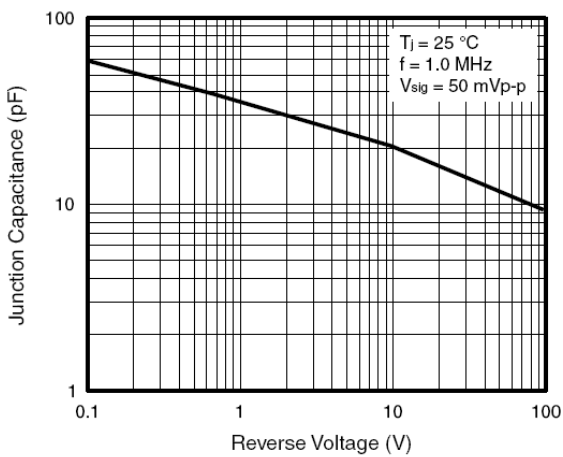


Figure 5. Typical Junction Capacitance Per Diode