

SILICON BRIDGE RECTIFIER

VOLTAGE RANGE: 200 --- 1300 V
CURRENT: 3.0 A

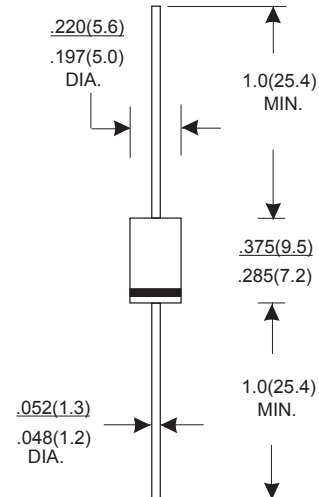
FEATURES

- Low forward voltage drop
- High current capability
- High surge current capability
- High reliability
- High temperature soldering guaranteed: 260 °C/10 seconds at terminals
- Component in accordance to RoHS 2002/95/EC and WEEE 2002/96/EC

MECHANICAL DATA

- Case style: DO-27 plastic molded
- Terminals: Lead solderable per MIL-STD-750, method 2026
- Polarity: Color band denotes cathode end
- Mounting Position: Any

DO-27



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND CHARACTERISTICS

@ 25°C Ambient Temperature (unless otherwise noted)

Single phase, half wave, 60 Hz, resistive or inductive load. For capacitive load, derate by 20%.

	Symbols	BY 251	BY 252	BY 253	BY 254	BY 255	Units
Maximum Recurrent Peak Reverse Voltage	V _{RRM}	200	400	600	800	1300	Volts
Maximum RMS Voltage	V _{RMS}	140	280	420	560	910	Volts
Maximum DC Blocking Voltage	V _{DC}	200	400	600	800	1300	Volts
Maximum average Forward Rectified Current 0.5"(12.5mm)lead length at T _A =75 °C	I(AV)	3.0					Amps
Peak Forward Surge Current (8.3ms half sine-wave superimposed on rated load (JEDEC method)	I _{FSM}	150.0					Amps
Maximum Instantaneous Forward Voltage at 3.0 A	V _F	1.0					Volts
Maximum Reverse current at rated DC Blocking Voltage	I _R	T _A = 25 °C					μA
		T _A = 100 °C					
Maximum Full-Load-Reverse-Current! Full Cycle=Average=K375?E9k5mmFL=Length @T75C		30					μA
Typical Junction Capacitance (Note 1)	C _J	40.0					pF
Typical Thermal Resistance (Note 2)	R _{θJA}	40.0					°C/W
Operating and Storage temperature Range	T _J	-65 to +150					°C
	T _{STG}						

NOTES:

1. Measured at 1MHz and applied reverse voltage of 4.0V D.C.
2. Thermal Resistance from Junction to Ambient. 375" (9.5mm) lead length.



RRATINGS AND CHARACTERISTIC CURVES

FIG.1-FORWARD CURRENT DERATING CURVE

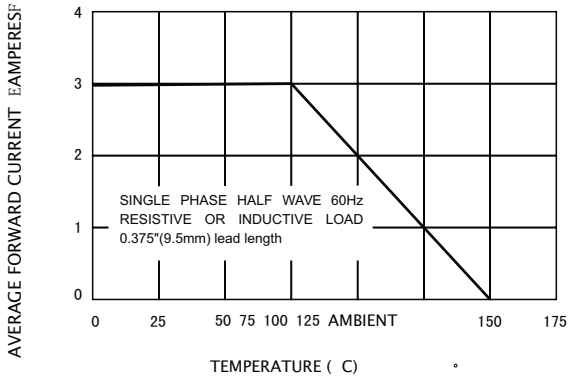


FIG.2-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

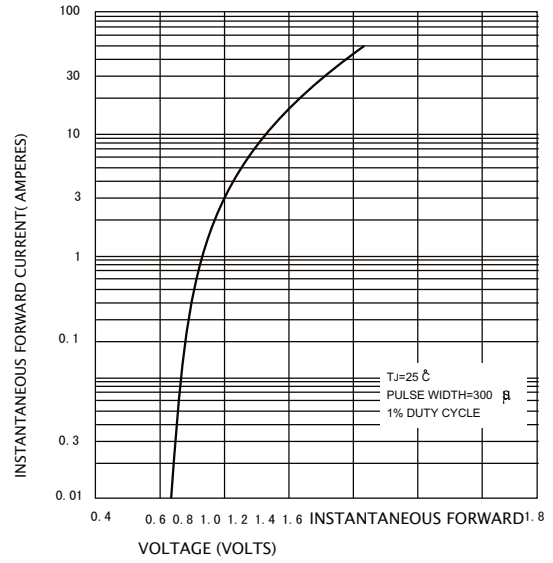


FIG.3-MAXIMUM PEAK NON-REPETITIVE FORWARD SURGE CURRENT

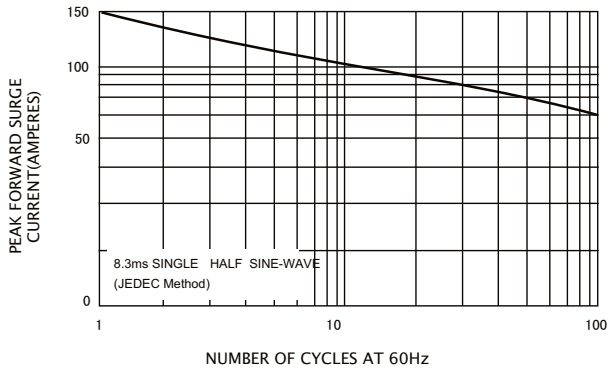


FIG.4-TYPICAL REVERSE CHARACTERISTICS

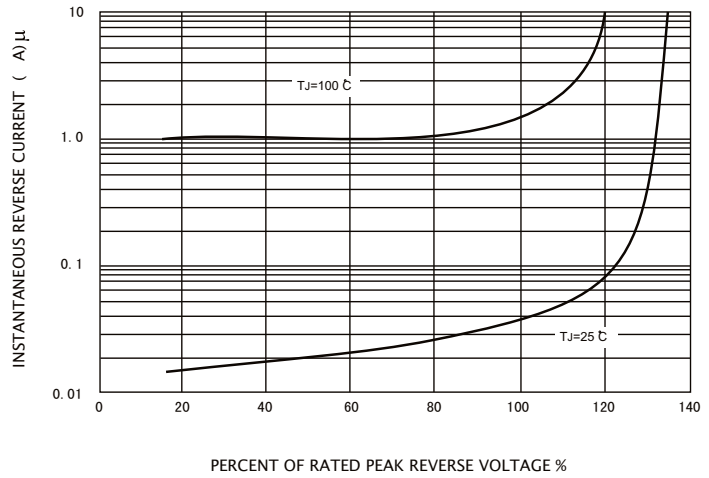


FIG.5-TYPICAL JUNCTION CAPACITANCE 100

