BYV95A

SINTERED GLASS JUNCTION
FAST AVALANCHE RECTIFIER

VOLTAGE: 200V **CURRENT: 1.5A**

GULF SEMI

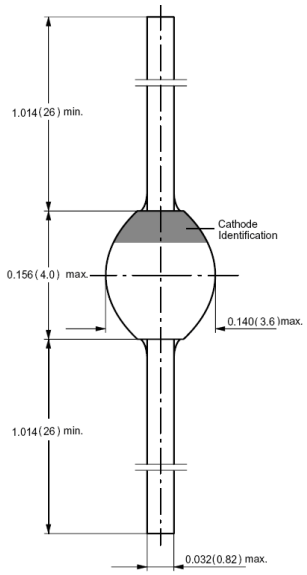
FEATURE

Glass passivated
High maximum operating temperature
Low leakage current
Excellent stability
Guaranteed avalanche energy absorption capability

MECHANICAL DATA

Case: SOD-57 sintered glass case
Terminal: Plated axial leads solderable per
MIL-STD 202E, method 208C
Polarity: color band denotes cathode end
Mounting position: any

SOD-57



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	BYV95A	units
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	200	V
Maximum RMS Voltage	V_{RMS}	140	V
Maximum DC blocking Voltage	V_{DC}	200	V
Reverse Breakdown Voltage at IR =0. 1mA	$V_{(BR)R}$	300min	V
Maximum Average Forward Rectified Current 3/8"lead length at Ta =65°C	$I_{F(AV)}$	1.5	A
Peak Forward Surge Current 8.3ms single half sine-wave superimposed on rated load	Ifsm	35	A
Maximum Forward Voltage at I_F = 3.0A and 25°C	V_F	1.6	V
Maximum DC Reverse Current Tj = 25°C at rated DC blocking voltage Tj = 150°C	I_R	5.0 150	μA
Maximum Reverse Recovery Time (Note 1)	Trr	250	nS
Non Repetitive Reverse Avalanche Energy (Note 2)	E_R	10	mJ
Typical Junction Capacitance (Note 3)	Cj	45	pF
Typical Thermal Resistance (Note 4)	Rth(ja)	46	K/W
Storage and Operating Junction Temperature	Tstg, Tj	-65 to +175	℃

Note:
1. Reverse Recovery Condition I_F = 0.5A, I_R = 1.0A, I_{RR} = 0.25A
2. L = 120 mH; Tj = Tj max prior to surge; inductive load switched off
3. Measured at 1.0 MHz and applied reverse voltage of 4Vdc
4. Thermal Resistance from Junction to Ambient at 3/8"lead length, P.C. Board Mounted

RATINGS AND CHARACTERISTIC CURVES BYV95A

FIG. 1 - FORWARD CURRENT DERATING CURVE

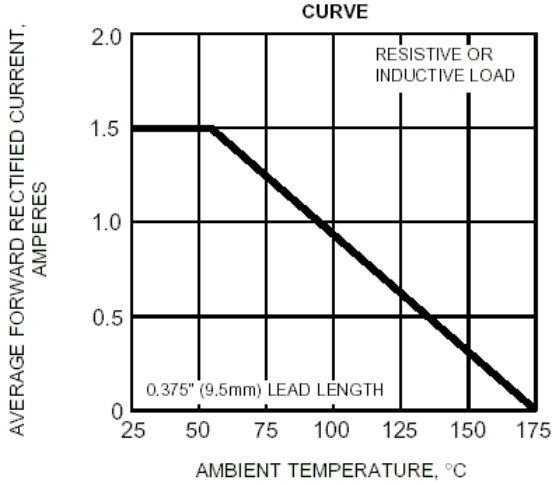


FIG. 2 - MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT

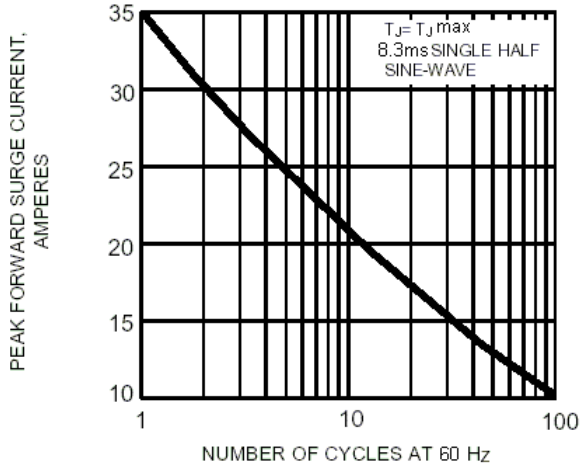


FIG. 3 - TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

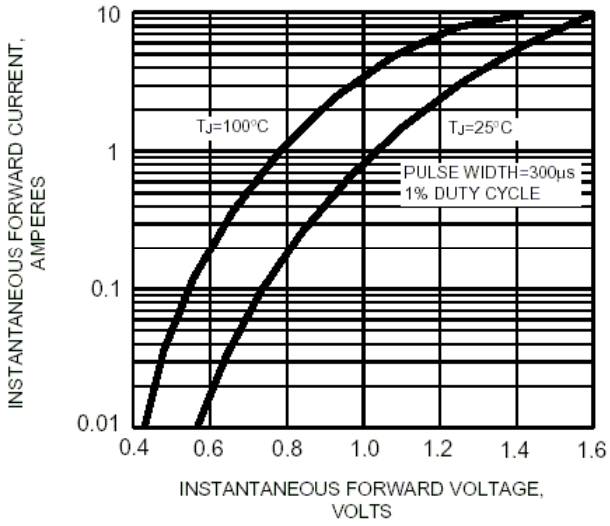


FIG. 4 - TYPICAL REVERSE CHARACTERISTICS

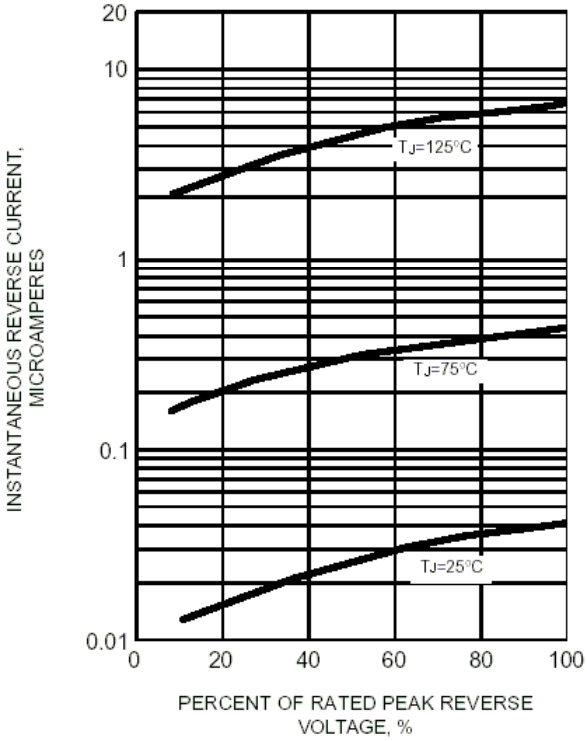


FIG. 5 - TYPICAL JUNCTION CAPACITANCE