



CHENMKO ENTERPRISE CO.,LTD

Halogens free devices

SURFACE MOUNT

SCHOTTKY BARRIER RECTIFIER

VOLTAGE RANGE 60 Volts CURRENT 1.0 Ampere

SMD16AGP

FEATURES

- * For surface mounted applications
- * Metal silicon junction, majority carrier conduction
- * Low power loss, high efficiency
- * High current capability, low forward voltage drop
- * High surge capability
- * For use in low voltage high frequency inverters, free wheeling, and polarity protection applications
- * Lead free devices

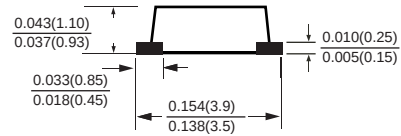
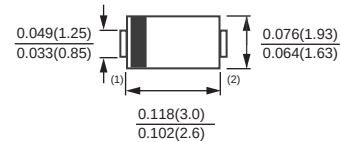
MARKING

* 16

CIRCUIT



SOD-123S



Dimensions in inches and (millimeters)

SOD-123S

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

RATINGS	SYMBOL	SMD16AGP	UNITS
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	60	Volts
Maximum RMS Voltage	V_{RMS}	42	Volts
Maximum DC Blocking Voltage	V_{DC}	60	Volts
Maximum Average Forward Rectified Current	I_O	1.0	Amps
Peak Forward Surge Current 8.3 ms single half sine-wave superimposed on rated load (JEDEC method)	I_{FSM}	40	Amps
Typical Junction Capacitance (Note 2)	C_J	110	pF
Typical Thermal Resistance (Note 1)	$R_{\theta JL}$	60	$^\circ\text{C} / \text{W}$
Operating Temperature Range	T_J	-65 to +150	$^\circ\text{C}$
Storage Temperature Range	T_{STG}	-65 to +150	$^\circ\text{C}$

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

CHARACTERISTICS	SYMBOL	SMD16AGP	UNITS
Maximum Instantaneous Forward Voltage at 1.0 A DC	V_F	0.65	Volts
Maximum Average Reverse Current	I_R	50	uAmps
at Rated DC Blocking Voltage		10	mAmps

NOTES : 1. Thermal Resistance (Junction to Lead) : PC Board Mounted on 0.2 X 0.2" (5 X 5mm) copper pad area.
2. Measured at 1.0 MHz and applied reverse voltage of 4.0 volts.

2007-06

RATING CHARACTERISTIC CURVES (SMD16AGP)

FIG. 1 - TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

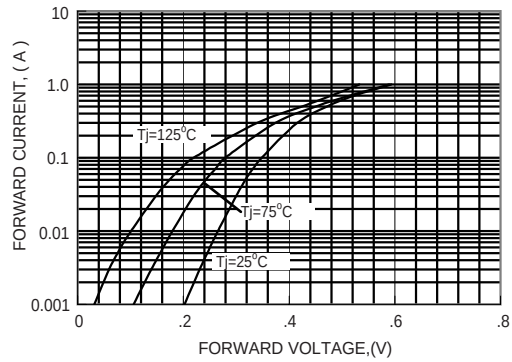


FIG. 2 - TYPICAL REVERSE CHARACTERISTICS

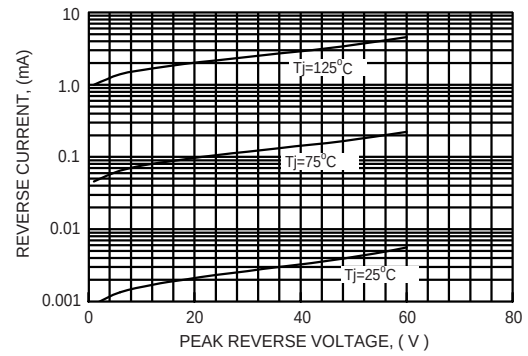


FIG. 3 - TYPICAL JUNCTION CAPACITANCE

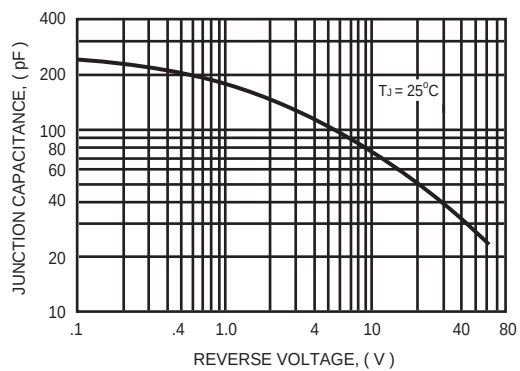


FIG. 4 - MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

