



CHENMKO ENTERPRISE CO.,LTD

SURFACE MOUNT

SCHOTTKY BARRIER RECTIFIER

VOLTAGE RANGE 20 - 40 Volts CURRENT 350 mAmperes

CH320BPT

THRU

CH340BPT

Lead free devices

APPLICATION

- * Ultra high speed switching

FEATURE

- * Small surface mounting type. (SOD-123)
- * High speed. ($T_{RR}=10\text{ns}$ Typ.)
- * Maximum total power dissipation is 400mW.

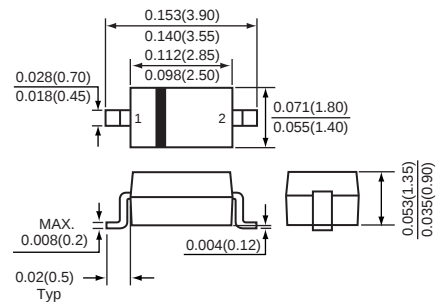
CONSTRUCTION

- * Silicon epitaxial planar

CIRCUIT



SOD-123



Dimensions in inches and (millimeters)

SOD-123

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

RATINGS	SYMBOL	CH320BPT	CH330BPT	CH340BPT	UNITS
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	20	30	40	Volts
Maximum RMS Voltage	V_{RMS}	14	21	28	Volts
Maximum DC Blocking Voltage	V_{DC}	20	30	40	Volts
Forward Continuous Current	I_{FM}	350			mAmps
Peak Forward Surge Current 1.0 S single half sine-wave superimposed on rated load (JEDEC method)	I_{FSM}	1.5			Amps
Typical Thermal Resistance (Note 1)	$R_{\theta JA}$	300			$^\circ\text{C} / \text{W}$
Total Capacitance (Note 2)	C_T	5.0			pF
Reverse Recovery Time at $I_F=I_R=200\text{mA}$, $I_{RR}=20\text{mA}$	T_{rr}	1.0			nS
Operating Temperature Range	T_J	-55 to $+125$			$^\circ\text{C}$
Storage Temperature Range	T_{STG}	-55 to $+125$			$^\circ\text{C}$

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

CHARACTERISTICS		SYMBOL	CH320BPT	CH330BPT	CH340BPT	UNITS
Maximum Instantaneous Forward Voltage	@ $I_F = 20\text{mA}$	V_F	370			mVolts
	@ $I_F = 200\text{mA}$		600			mVolts
Maximum Average Reverse Current at Rated DC Blocking Voltage		I_R	5.0			μAmps

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 0 volts.

2004-06

RATING CHARACTERISTIC CURVES (CH320BPT THRU CH340BPT)

FIG. 1 - TYPICAL POWER DERATING CURVE

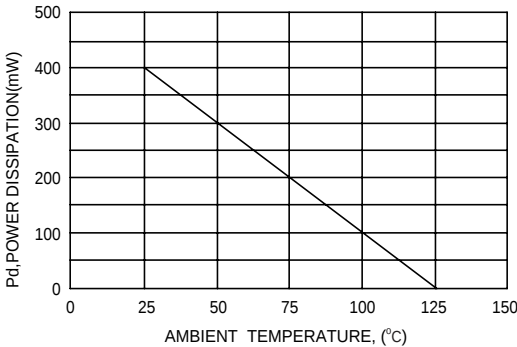


FIG. 2 - FORWARD CHARACTERISTICS

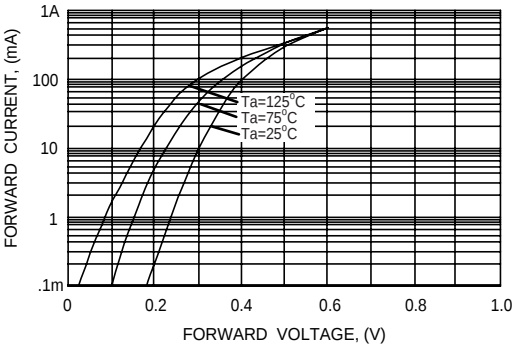


FIG. 3 - REVERSE CHARACTERISTICS

