



CHENMKO ENTERPRISE CO.,LTD

CH331H-10PT

Lead free devices

SURFACE MOUNT
SCHOTTKY BARRIER DIODE
VOLTAGE 10 Volts CURRENT 3 Ampere

APPLICATION

- * Low power rectification
- * For power supply
- * For detection and step-up-conversion

FEATURE

- * Small surface mounting type. (SC-76/SOD-323)
- * Low IR. (IR=10uA Typ.)
- * High reliability
- * High current rectifier Schottky diode with low Vf drop
- * Total power dissipation, Ptot= 1350 mW @TS = 28 °C.

CONSTRUCTION

- * Silicon epitaxial planar

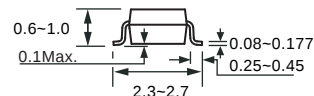
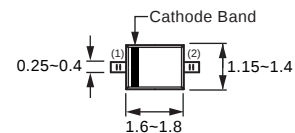
MARKING

- * JK

CIRCUIT



SC-76/SOD-323



Dimensions in millimeters

SC-76/SOD-323

MAXIMUM RATINGS (At TA = 25°C unless otherwise noted)

RATINGS	SYMBOL	CH331H-10PT			UNITS
		MIN.	TYP.	MAX.	
Maximum Recurrent Peak Reverse Voltage	VRRM	-	-	10	Volts
Maximum RMS Voltage	VRMS	-	-	7	Volts
Maximum DC Blocking Voltage	VDC	-	-	10	Volts
Maximum Average Forward Rectified Current	IO	-	-	3.0	Amps
Peak Forward Surge Current at 8.3 mSec single half sine-wave	IFSM	-	-	5	Amps
Typical Junction Capacitance between Terminal (Note 1)	CJ	12	25	30	pF
Maximum Operating Temperature Range	TJ	-	-	+150	°C
Storage Temperature Range	TSTG	- 55	-	+150	°C

ELECTRICAL CHARACTERISTICS (At TA = 25°C unless otherwise noted)

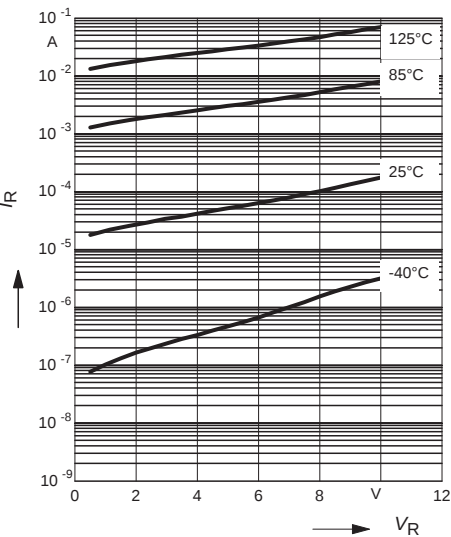
CHARACTERISTICS	SYMBOL	CH331H-10PT			UNITS
		MIN.	TYP.	MAX.	
Maximum Instantaneous Forward Voltage at IF= 10mA	VF	0.2	0.24	0.3	Volts
IF= 100mA		0.26	0.32	0.38	
IF= 500mA		0.32	0.4	0.5	
IF= 1000mA		0.36	0.48	0.6	
Maximum Average Reverse Current at VR= 5V @TA = 25°C	IR	-	40	50	uAmps
VR= 8V @TA = 25°C		-	75	100	

NOTES : 1. Measured at 1.0 MHz and applied reverse voltage of 5.0 volts.
 2. ESD sensitive product handling required.

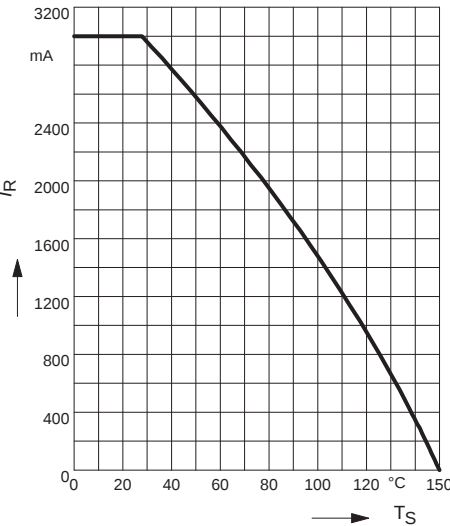
2002-11

RATING CHARACTERISTIC CURVES (CH331H-10PT)

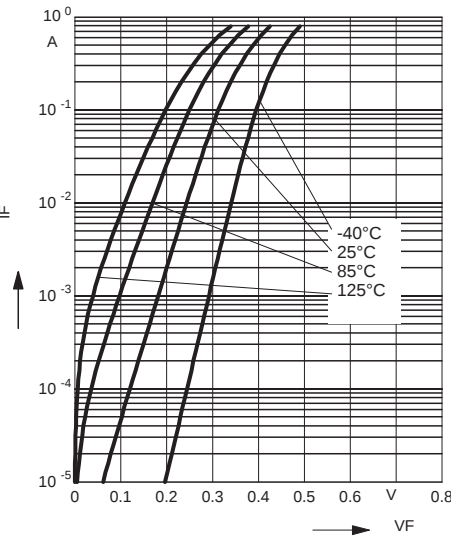
Reverse current $I_R = f(V_R)$
 $T_A = \text{Parameter}$



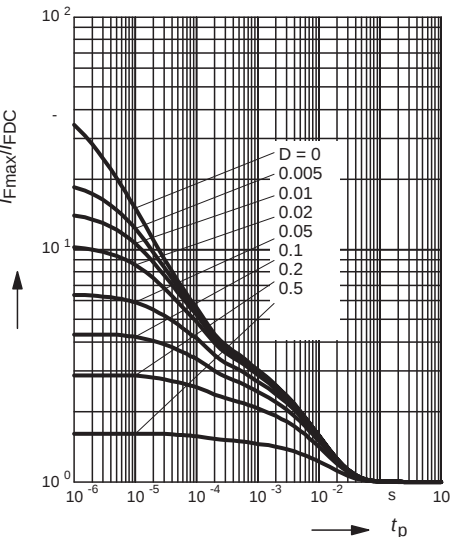
Forward current $I_F = f(T_S)$



Forward current $I_F = f(V_F)$
 $T_A = \text{Parameter}$



Permissible Pulse Load
 $I_{Fmax}/I_{FDC} = f(t_p)$



RATING CHARACTERISTIC CURVES (CH331H-10PT)

Permissible Puls Load $R_{thJS} = f(t_p)$

