

RoHS Compliant Product  
A suffix of "-C" specifies halogen & lead-free

## FEATURES

- Low Forward Voltage Schottky Rectifier
- Fast Switching
- Ultra-Small Surface Mount Package

SOD-123



## MARKING

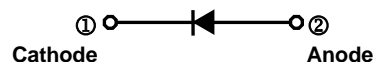
L9

## PACKAGE INFORMATION

Package	MPQ	Leader Size
SOD-123	3K	7 inch

## ORDER INFORMATION

Part Number	Type
BAT54P-C	Lead (Pb)-free and Halogen-free



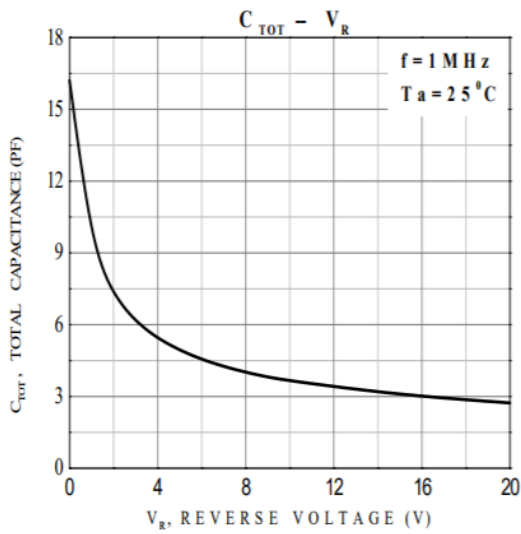
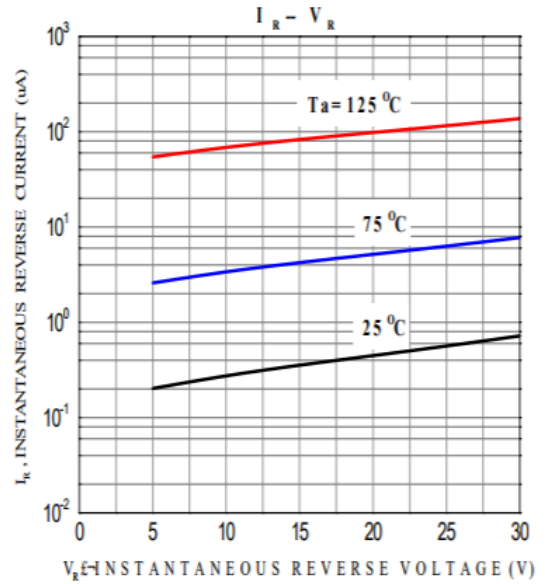
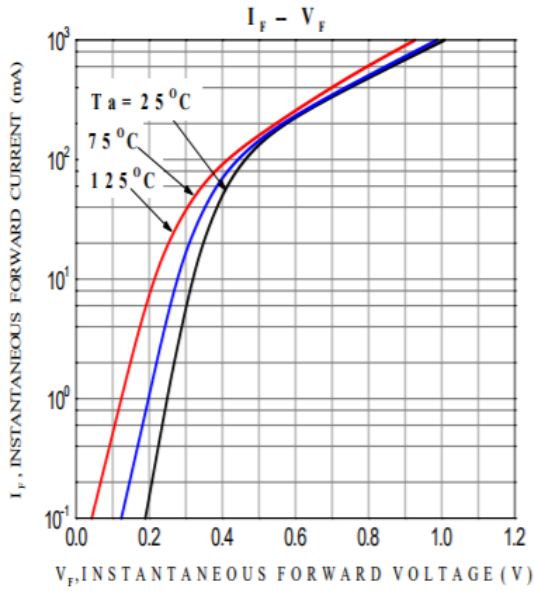
## ABSOLUTE MAXIMUM RATINGS (T<sub>A</sub>=25°C unless otherwise specified)

Parameter	Symbol	Ratings	Unit
DC Blocking Voltage	V <sub>R</sub>	30	V
Continuous Forward Current	I <sub>O</sub>	100	mA
Forward Continuous Current	I <sub>F</sub>	200	
Non-repetitive Peak Forward Surge Current @t=8.3ms	I <sub>FSM</sub>	600	
Repetitive Peak Forward Current	I <sub>FRM</sub>	300	
Power Dissipation	P <sub>D</sub>	500	mW
Operating Junction Temperature Range	T <sub>J</sub>	125	°C
Storage Temperature Range	T <sub>STG</sub>	-65~125	

## ELECTRICAL CHARACTERISTICS (T<sub>A</sub>=25°C unless otherwise noted)

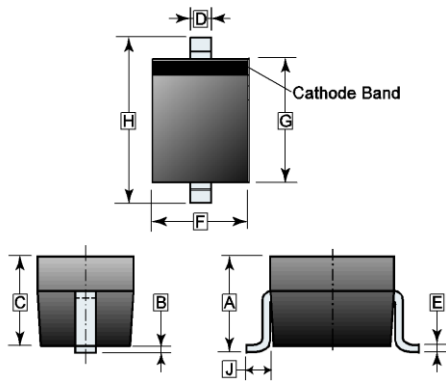
Parameter	Symbol	Min.	Typ.	Max.	Unit	Test Conditions
Reverse Voltage	V <sub>BR</sub>	30	-	-	V	I <sub>R</sub> =100μA
Forward Voltage	V <sub>F</sub>	-	-	0.24	V	I <sub>F</sub> =0.1mA
		-	-	0.32		I <sub>F</sub> =1mA
		-	-	0.4		I <sub>F</sub> =10mA
		-	-	0.5		I <sub>F</sub> =30mA
		-	-	1		I <sub>F</sub> =100mA
Reverse Current	I <sub>R</sub>	-	-	2	μA	V <sub>R</sub> =25V
Diode Capacitance	C <sub>T</sub>	-	10	-	pF	V <sub>R</sub> =1V, f=1MHz
Reverse Recovery Time	T <sub>rr</sub>	-	5	-	nS	I <sub>F</sub> =10mA, I <sub>R</sub> =10~1mA, R <sub>L</sub> =100Ω

**RATINGS AND CHARACTERISTIC CURVES**



**PACKAGE OUTLINE DIMENSIONS**

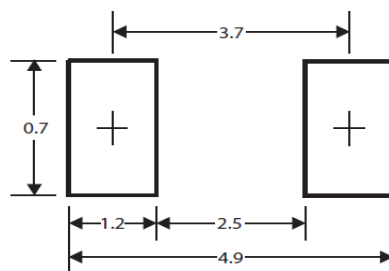
**SOD-123**



REF.	Millimeter	
	Min.	Max.
A	1.15 REF	
B	0.10 REF	
C	1.00	1.30
D	0.30	0.78
E	0.05	0.25
F	1.45	1.80
G	2.55	2.90
H	3.10	3.85
J	0.50 REF	

**MOUNTING PAD LAYOUT**

**SOD-123**



\*Dimensions in millimeters