



**SOD-523 Schottky Barrier Diode 肖特基势垒二极管**

**Internal Configuration & Device Marking 内部结构与产品打标**

Type 型号	BAT54X
Pin 管脚	
Mark 打标	

**Absolute Maximum Ratings 最大额定值**

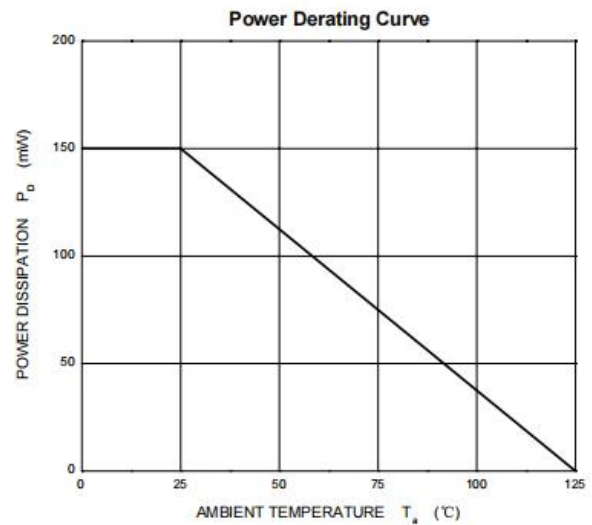
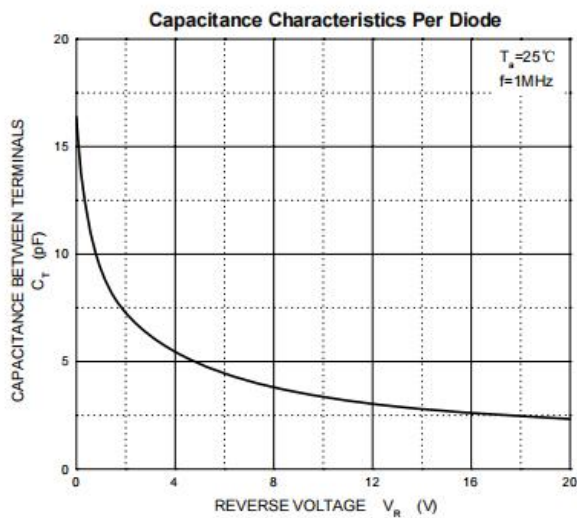
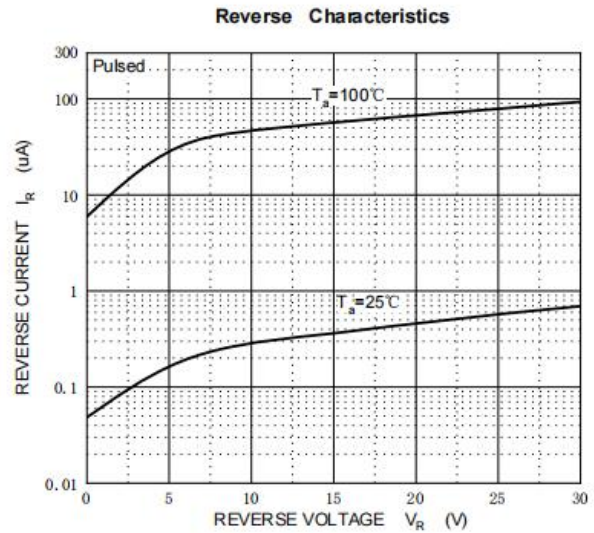
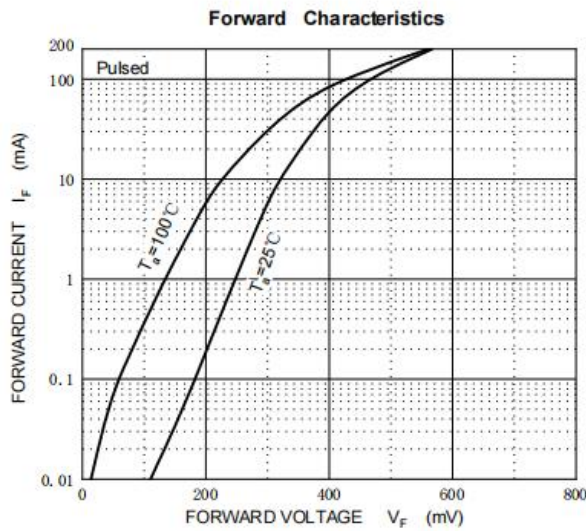
Characteristic 特性参数	Symbol 符号	Rat 额定值	Unit 单位
Peak Reverse Voltage 反向峰值电压	$V_{RM}$	30	V
DC Reverse Voltage 直流反向电压	$V_R$	21	
Forward Work Current 正向工作电流	$I_O$	100	mA
Forward Current 正向电流	$I_F$	200	mA
Peak Forward Surge Current 正向峰值浪涌电流	$I_{FSM}$	600	mA
Power dissipation 耗散功率	$P_D(T_a=25^\circ C)$	150	mW
Thermal Resistance J-A 结到环境热阻	$R_{\theta JA}$	668	$^\circ C/W$
Junction and Storage Temperature 结温和储藏温度	$T_J, T_{stg}$	-55to+125 $^\circ C$	

**Electrical Characteristics 电特性**

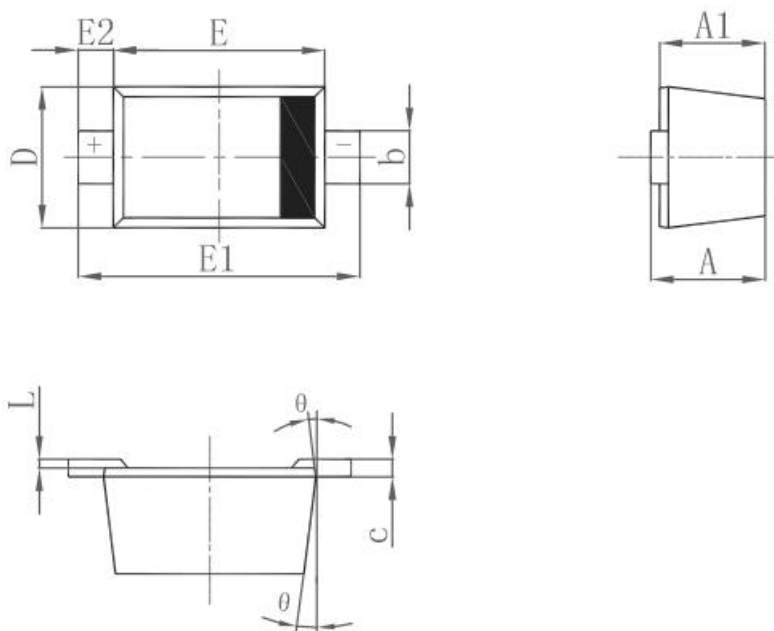
( $T_A=25^\circ C$  unless otherwise noted 如无特殊说明, 温度为  $25^\circ C$ )

Characteristic 特性参数	Symbol 符号	Min 最小值	Max 最大值	Unit 单位
Reverse Breakdown Voltage 反向击穿电压( $I_R=100\mu A$ )	$V_{(BR)}$	30	—	V
Reverse Leakage Current 反向漏电流( $V_R=25V$ )	$I_R$	—	2	$\mu A$
Forward Voltage( $I_F=0.1mA$ ) 正向电压( $I_F=1mA$ ) ( $I_F=10mA$ ) ( $I_F=30mA$ ) ( $I_F=100mA$ )	$V_F$		0.24 0.32 0.4 0.5 1	V
Diode Capacitance 二极管电容( $V_R=1V, f=1MHz$ )	$C_D$	—	10	pF
Reverse Recovery Time 反向恢复时间	$T_{rr}$	—	5	nS

■ Typical Characteristic Curve 典型特性曲线



■Dimension 外形封装尺寸



Symbol	Dimensions In Millimeters		Dimensions In Inches	
	Min	Max	Min	Max
A	0.510	0.770	0.020	0.031
A1	0.500	0.700	0.020	0.028
b	0.250	0.350	0.010	0.014
c	0.080	0.150	0.003	0.006
D	0.750	0.850	0.030	0.033
E	1.100	1.300	0.043	0.051
E1	1.500	1.700	0.059	0.067
E2	0.200 REF		0.008 REF	
L	0.010	0.070	0.001	0.003
θ	7° REF		7° REF	