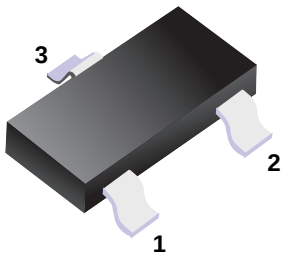
EVVOSEMI®
THINK CHANGE DO

BAT54/A/C/S

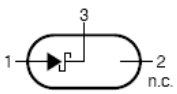
Schottky Diodes



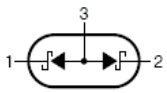
■ Simplified outline(SOT-23)

■ Features

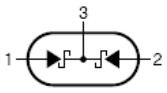
- ●Low forward voltage
- ●Guard ring protected
- ●Small plastic SMD package.



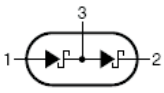
BAT54



BAT54A



BAT54C



BAT54S

■ Absolute Maximum Ratings Ta = 25℃

Parameter	Symbol	Rating	Unit
Maximum Repetitive Reverse Voltage	V_{RRM}	30	V
Average Rectified Forward Current	$I_{F(AV)}$	200	mA
Non-repetitive Peak Forward Surge Current Pulse width = 1.0 second	I_{FSM}	600	mA
Power Dissipation	P_D	200	mW
Thermal Resistance, Junction to Ambient	$R_{\theta JA}$	430	℃/W
Storage Temperature Range	T_{stg}	-55 to +150	℃
Operating Junction Temperature	T_J	150	℃

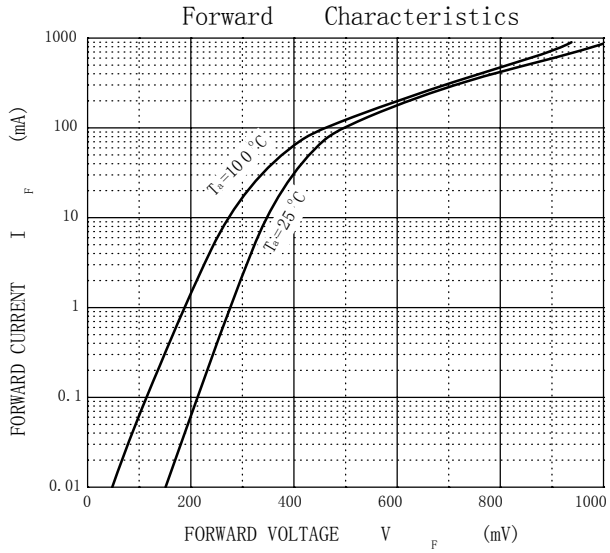
■ Electrical Characteristics Ta = 25℃

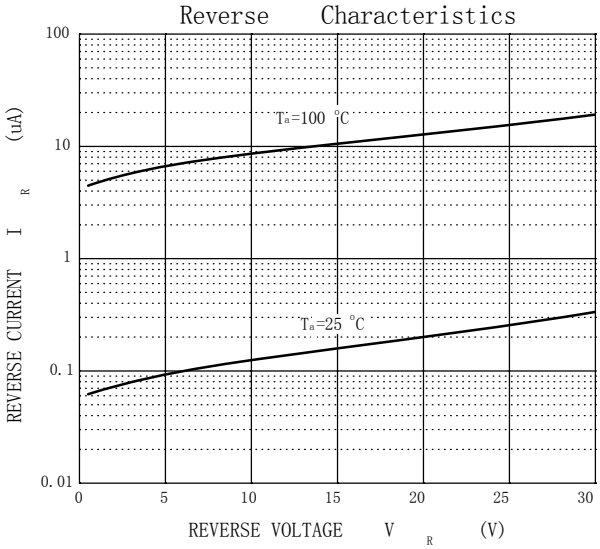
Parameter	Symbol	Testconditions	Min	Typ	Max	Unit
Breakdown Voltage	V_R	I_R = 100 μA	30			V
Forward Voltage	V_F	I_F = 0.1 mA			240	mV
		I_F = 1 mA			320	mV
		I_F = 10 mA			400	mV
		I_F = 30 mA			500	mV
		I_F = 100 mA			0.8	V
Reverse Current	I_R	V_R =25 V			2	μA
Total Capacitance	C_T	V_R = 1V, f = 1.0 MHz			10	pF
Reverse Recovery Time	t_{rr}	I_F = I_R = 10 mA, I_{RR} = 1.0 mA,R_L = 100Ω			5	ns

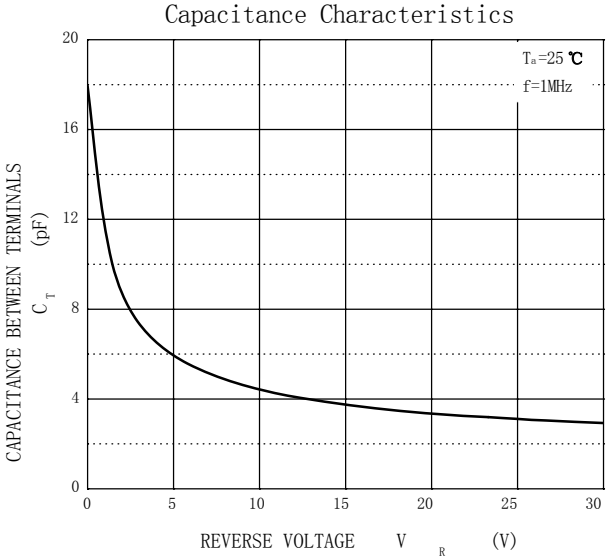
■ Marking

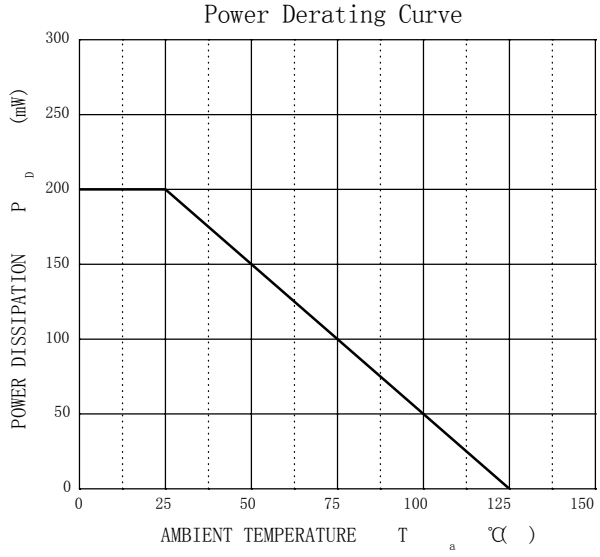
TYPE	BAT54	BAT54A	BAT54C	BAT54S
Marking	KL1	L42 or KL2	L43 or KL3	L44 or KL4

■ Typical Characteristics

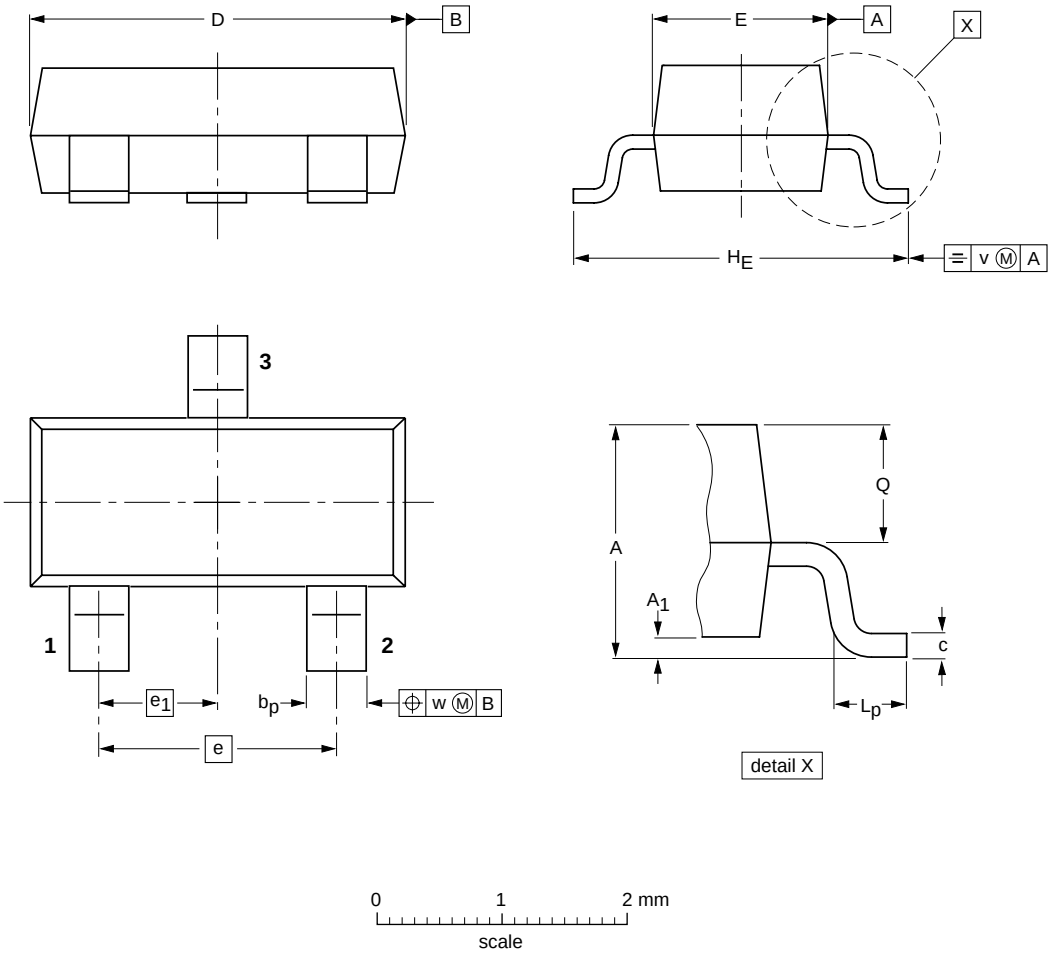








■ SOT-23



DIMENSIONS (mm are the original dimensions)

UNIT	A	A_1 max.	b_p	c	D	E	e	e_1	H_E	L_p	Q	v	w
mm	1.1 0.9	0.1	0.48 0.38	0.15 0.09	3.0 2.8	1.4 1.2	1.9	0.95	2.5 2.1	0.45 0.15	0.55 0.45	0.2	0.1