

TM

BAT54TW/ADW/ CDW/SDW/BRW

Features

- Lead Free Finish/RoHS Compliant(Note 1) ("P" Suffix designates RoHS Compliant. See ordering information)
- Fast Switching and Low Forward Voltage Drop
- Ultra-Small Surface Mount Package
- PN Junction Guard Ring for Transient and ESD Protection
- Available in Lead Free Version
- Case Material: Molded Plastic. UL Flammability Classification Rating 94V-0 and MSL Rating 1

Maximum Ratings

Continuos Reverse Voltage	V_R	30V
Forward Continuous Current	I_F	200mA
Repetitive Peak Forward Current	I_{FRM}	300mA
Peak Forward Current $t < 1s$	I_{FSM}	600mA
Power Dissipation @ $T_A = 25^\circ C$	P_D	200mW
Thermal Resistance , Junction to Ambient	$R_{\theta JA}$	625 $^\circ C/W$
Storage Temperature Range	T_{stg}	-65 $^\circ C$ to 125 $^\circ C$
Operating Temperature Range	T_j	-65 $^\circ C$ to 125 $^\circ C$

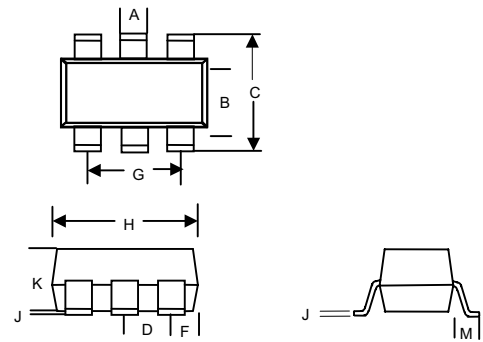
Electrical Characteristics @ 25 $^\circ C$ Unless Otherwise Specified

Ratings	Symbol	Max.	Notes
Forward Voltage at $I_F = 0.1mA$ $I_F = 1mA$ $I_F = 10mA$ $I_F = 30mA$ $I_F = 100mA$	V_F	240mV 320mV 400mV 500mV 1000mV	Note 2
Reverse Current	I_R	2.0 μA	$V_R = 25V$
Reverse Breakdown Voltage	$V_{(BR)}$	>30V	
Capacitance	C_J	10pF	Measured at 1.0MHz, $V_R=1.0V$
Reverse Recovery Time	t_{rr}	5.0nS	$I_F=I_R=10mA$; $I_{REC}=1mA, R_L=100\Omega$

Notes:1.High Temperature Solder Exemption Applied, see EU Directive Annex 7.
2.Short duration test pulse used to minimize self-heating effect

200mWatt, 30Volt Schottky Barrier Diode

SOT-363



DIM	DIMENSIONS				NOTE
	INCHES		MM		
A	0.004	0.010	0.10	0.30	
B	0.045	0.053	1.15	1.35	
C	0.079	0.087	2.00	2.20	
D	0.026 Nominal		0.65 Nominal		
F	0.010	0.016	0.30	0.40	
H	0.071	0.087	1.80	2.20	
J	---	0.004	---	0.10	
K	0.035	0.039	0.90	1.00	
L	0.010	0.016	0.25	0.40	
M	0.004	0.010	0.10	0.25	

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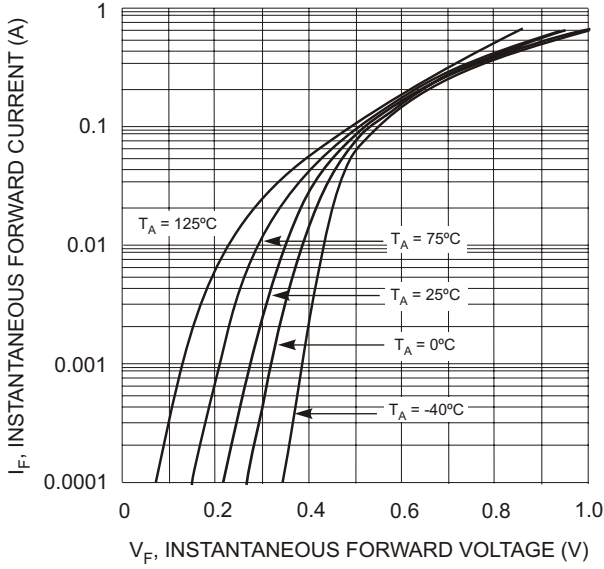


Fig. 1 Forward Characteristics

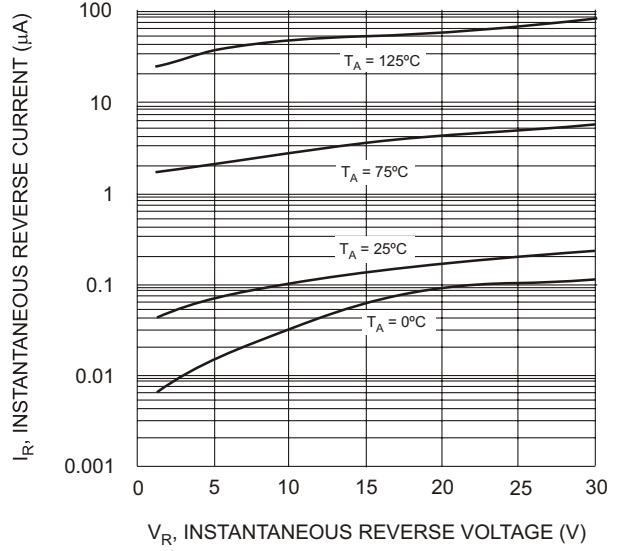


Fig. 2 Typical Reverse Characteristics

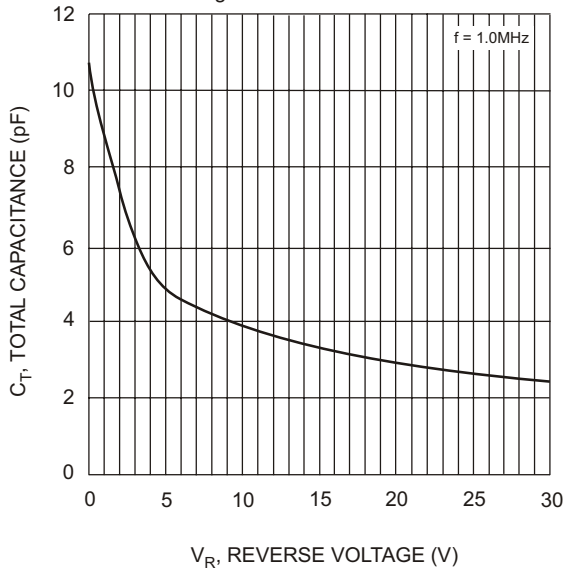


Fig. 3 Typical Capacitance vs. Reverse Voltage

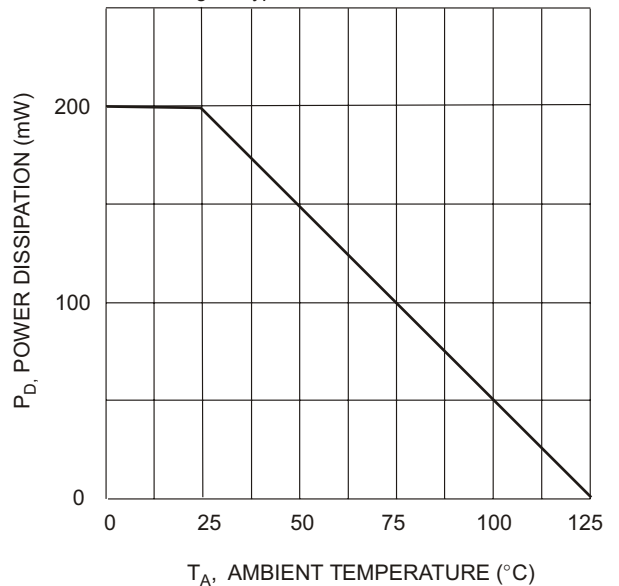
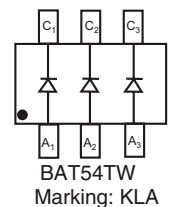
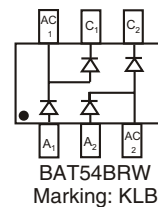
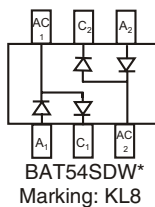
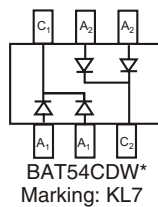
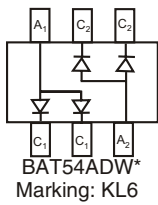


Fig. 4 Power Derating Curve



Ordering Information

Device	Packing
(Part Number)-TP	Tape&Reel;3Kpcs/Reel

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