

BAT54STB-TB6

SURFACE MOUNT SCHOTTKY DIODE ARRAYS

VOLTAGE 30 Volt **POWER** 200 mWatt

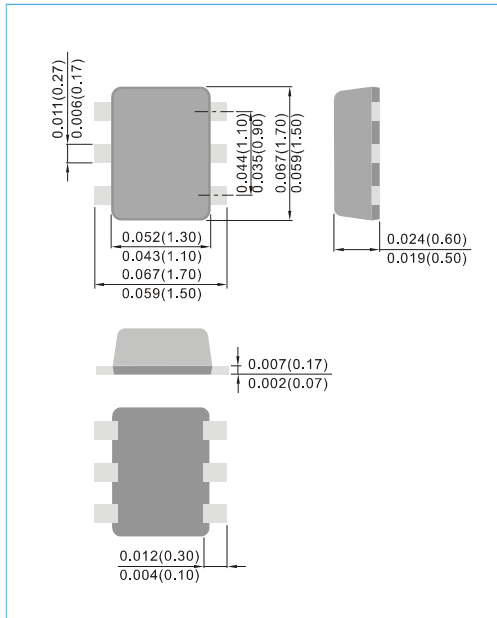
SOT-563 Unit : inch(mm)

FEATURES

Isolated diode arrays for significant board space savings
Surface mount package ideally suited for automatic insertion
Extremely Fast Switching Speed
Very Low VF: 0.347V (Typ) at IF = 10mA
Lead free in compliance with EU RoHS 2011/65/EU directive
Green molding compound as per IEC61249 Std. . (Halogen Free)

MECHANICAL DATA

Case : SOT-563 plastic
Terminals : Solderable per MIL-STD-750, Method 2026
Approx Weight : 0.00009 ounces, 0.0026 grams
Marking : TK



ABSOLUTE RATINGS (each diode)

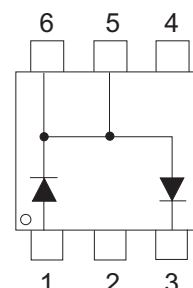
Parameter	Symbol	Value	Units
Maximum Reverse Voltage	V_R	30	V
Peak Reverse Voltage	V_{RRM}	30	V
Continuous Forward Current	I_F	0.2	A

THERMAL CHARACTERISTICS

Parameter	Symbol	Value	Units
Power Dissipation (Note 1)	P_{TOT}	200	mW
Thermal Resistance, Junction to Ambient (Note 1)	$R_{\theta JA}$	625	°C/W
Junction Temperature	T_J	-55 to 125	°C
Storage Temperature	T_{STG}	-55 to 150	°C

NOTE:

1. FR-4 Board = 70 x 60 x 1mm.





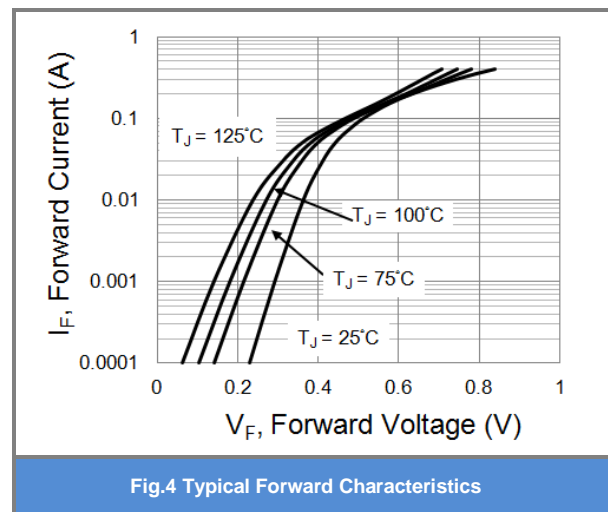
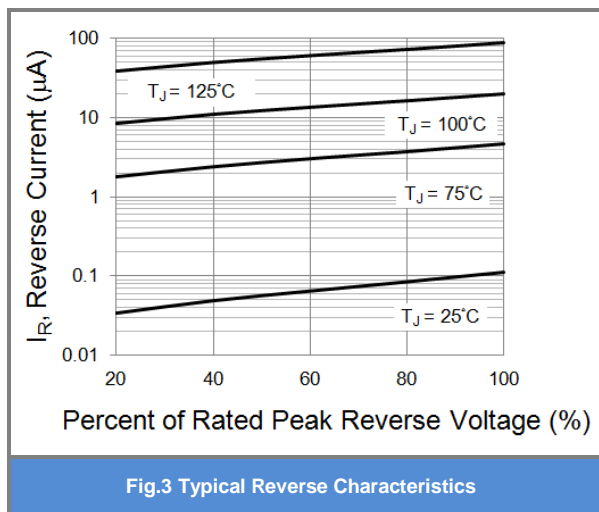
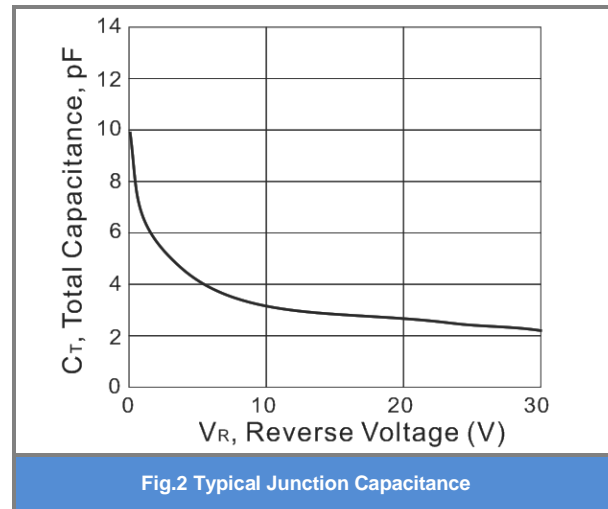
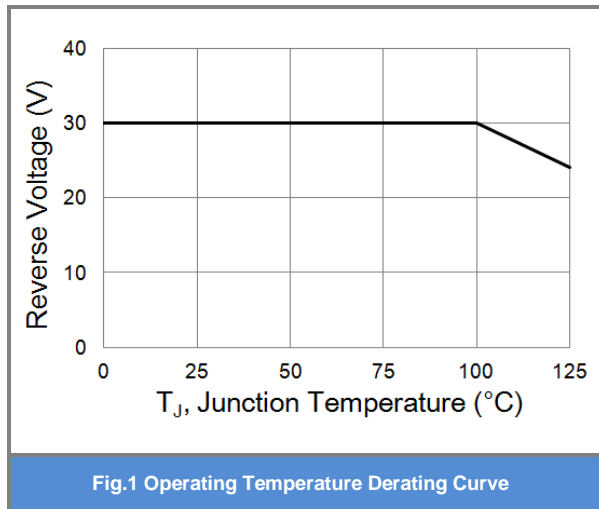
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ELECTRICAL CHARACTERISTICS (each diode) (TA=25°C, unless otherwise noted)

Parameter	Symbol	Test Condition	MIN.	TYP.	MAX.	Units
Reverse Breakdown Voltage	$V_{(BR)}$	$I_R=100\ \mu A$	30	-	-	V
Reverse Current	I_R	$V_R=25\ V$	-	-	2.0	μA
Forward Voltage	V_F	$I_F=0.1mA$	-	-	0.24	V
		$I_F=1.0mA$	-	-	0.32	
		$I_F=10mA$	-	0.347	0.40	
		$I_F=30mA$	-	-	0.50	
		$I_F=100mA$	-	-	0.60	
Total Capacitance	C_T	$V_R=1V, f=1.0MHz$	-	-	10	pF

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TYPICAL CHARACTERISTIC CURVES

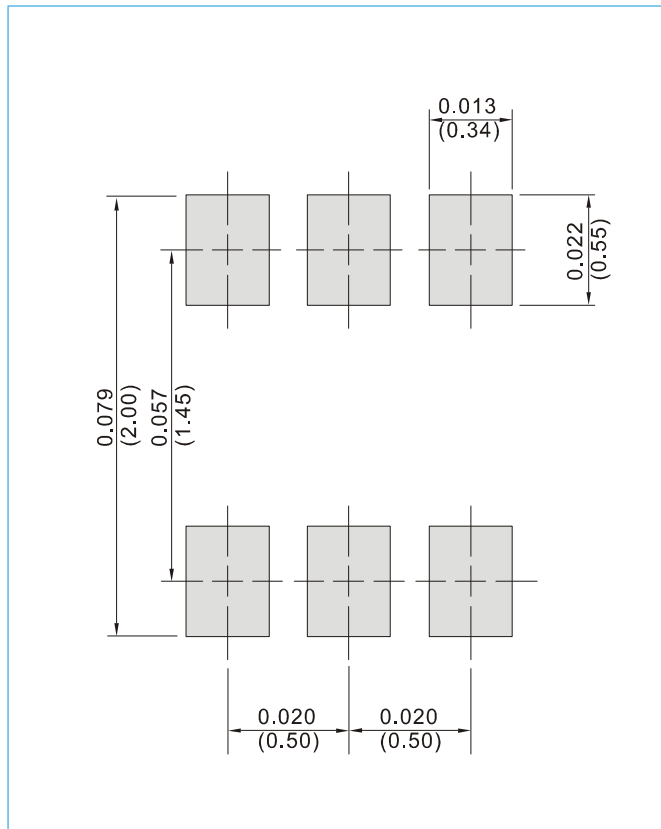


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MOUNTING PAD LAYOUT

SOT-563

Unit : inch(mm)



ORDER INFORMATION

- Packing information
 - T/R - 4K per 7" plastic Reel
 - T/R - 8K per 7" plastic Reel
 - T/R - 10K per 13" plastic Reel
 - T/R - 20K per 13" plastic Reel

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Part No_packing code_Version

BAT54TB6_R1_00001

BAT54TB6_R2_00001

BAT54TB6_R1_00002

BAT54TB6_R2_00002

For example :

RB500V-40_R2_00001

Part No.

Serial number

Version code means HF

Packing size code means 13"

Packing type means T/R

Packing Code XX				Version Code XXXXX		
Packing type	1 st Code	Packing size code	2 nd Code	HF or RoHS	1 st Code	2 nd ~5 th Code
Tape and Ammunition Box (T/B)	A	N/A	0	HF	0	serial number
Tape and Reel (T/R)	R	7"	1	RoHS	1	serial number
Bulk Packing (B/P)	B	13"	2			
Tube Packing (T/P)	T	26mm	X			
Tape and Reel (Right Oriented) (TRR)	S	52mm	Y			
Tape and Reel (Left Oriented) (TRL)	L	PANASERT T/B CATHODE UP (PBCU)	U			
FORMING	F	PANASERT T/B CATHODE DOWN (PBCD)	D			



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