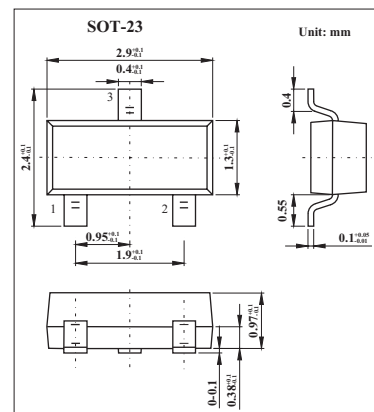


Silicon Schottky Diode

BAT68;BAT68-04
BAT68-05;BAT68-06

■ Features

- For mixer applications in VHF/UHF range
- For high-speed switching application

■ Absolute Maximum Ratings $T_a = 25^\circ\text{C}$

Parameter	Symbol	Value	Unit
Diode reverse voltage	V_R	8	V
Forward current	I_F	130	mA
Total power dissipation BAT68, $T_s \leq 77^\circ\text{C}$ BAT68-04, BAT68-06, $T_s \leq 61^\circ\text{C}$ BAT68-05, $T_s \leq 46^\circ\text{C}$	P_{tot}	150	mW
Junction temperature	T_j	150	$^\circ\text{C}$
Storage temperature	T_{stg}	-55 to +150	$^\circ\text{C}$
Junction - soldering point(Note 1) BAT68 BAT68-04, BAT68-06 BAT68-05	R_{thJS}	≤ 490 ≤ 590 ≤ 690	K/W

Note

1. For calculation of R_{thJA} please refer to Application Note Thermal Resistance

BAT68;BAT68-04 BAT68-05;BAT68-06

■ Electrical Characteristics $T_a = 25^\circ\text{C}$

Parameter	Symbol	Conditions	Min	Typ	Max	Unit
Breakdown voltage	$V_{(BR)}$	$I_{(BR)} = 10\ \mu\text{A}$	8			V
Reverse current	I_R	$V_R = 1\text{ V}$			0.1	μA
		$V_R = 1\text{ V}, T_A = 60^\circ\text{C}$			1.2	
Forward voltage	V_F	$I_F = 1\text{ mA}$		318	340	mV
		$I_F = 10\text{ mA}$	340	390	500	
Diode capacitance	C_T	$V_R = 0, f = 1\text{ MHz}$			1	pF
Differential forward resistance	R_F	$I_F = 5\text{ mA}, f = 10\text{ kHz}$			10	Ω

■ Marking

Type	BAT68	BAT68-04	BAT68-05	BAT68-06
Marking	83s	84s	85s	86s