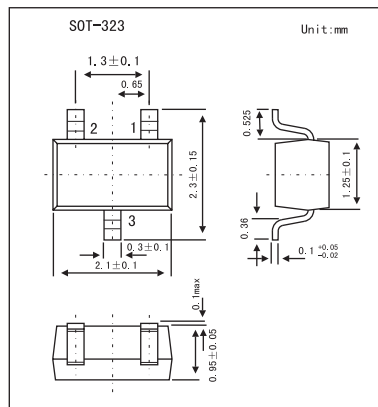


# BAT854W;BAT854AW BAT854CW;BAT854SW

### ■ Features

- Very low forward voltage
- Very low reverse current
- Guard ring protected
- Very small SMD package.



### ■ Absolute Maximum Ratings Ta = 25°C

Parameter	Symbol	Conditions	Min	Max	Unit
Continuous reverse voltage	V <sub>R</sub>			40	V
Continuous forward current	I <sub>F</sub>			200	mA
Repetitive peak forward current	I <sub>FRM</sub>	t <sub>p</sub> ≤ 1 s; d ≤ 0.5		300	mA
Non-repetitive peak forward current	I <sub>FSM</sub>	t = 8.3 ms half sinewave; JEDEC method		1	A
Storage temperature	T <sub>stg</sub>		-65	+150	°C
Junction temperature	T <sub>j</sub>			150	°C
Operating ambient temperature	T <sub>amb</sub>		-65	+150	°C
Thermal resistance from junction to ambient	R <sub>th j-a</sub>			625	K/W

### ■ Electrical Characteristics Ta = 25°C

Parameter	Symbol	Conditions	Typ	Max	Unit
Forward voltage	V <sub>F</sub>	I <sub>F</sub> = 0.1 mA	200		mV
		I <sub>F</sub> = 1 mA	260		
		I <sub>F</sub> = 10 mA	340		
		I <sub>F</sub> = 30 mA		420	
		I <sub>F</sub> = 100 mA		550	
Continuous reverse current	I <sub>R</sub>	V <sub>R</sub> = 25 V; Note 1		0.5	μA
Diode capacitance	C <sub>d</sub>	f = 1 MHz; V <sub>R</sub> = 1 V		20	pF

Note

1. Pulse test: t<sub>p</sub> < 300 μs; δ ≤ 0.02.

### ■ Marking

Type	BTA854W	BAT854AW	BAT854CW	BAT854SW
Marking	81	82	83	84