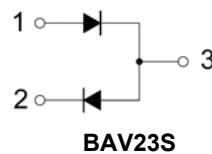
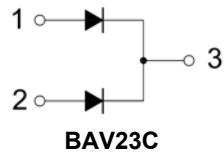
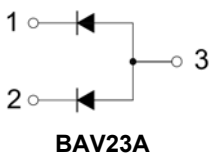


## Features

- Fast switching speed
- High conductance
- For general purpose switching applications

## Configurations



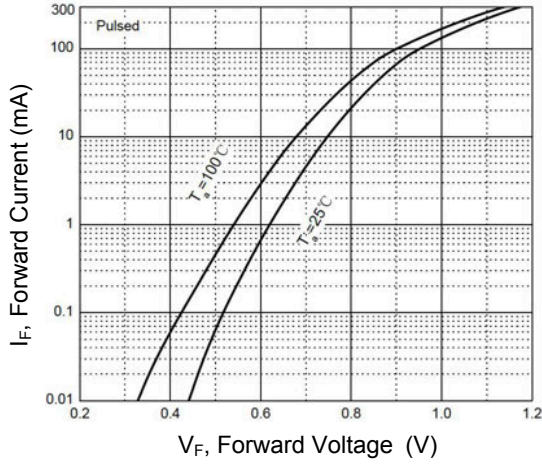
## Absolute Maximum Ratings (T<sub>A</sub>=25°C unless otherwise noted)

Parameter	Symbol	Value	Unit
Maximum Repetitive Reverse Voltage	V <sub>RRM</sub>	250	V
Working Peak Reverse Voltage	V <sub>RWM</sub>	175	V
Reverse Voltage	V <sub>R</sub>		
Average Rectified Output Current	I <sub>O</sub>	225	mA
Non-Repetitive Peak Forward Surge Current	I <sub>FSM</sub>	1.7	A
Power Dissipation	P <sub>D</sub>	350	mW
Thermal Resistance, Junction-to-Ambient	R <sub>θJA</sub>	357	°C/W
Operating Junction Temperature Range	T <sub>J</sub>	-55 To +150	°C
Storage Temperature Range	T <sub>STG</sub>	-55 To +150	°C

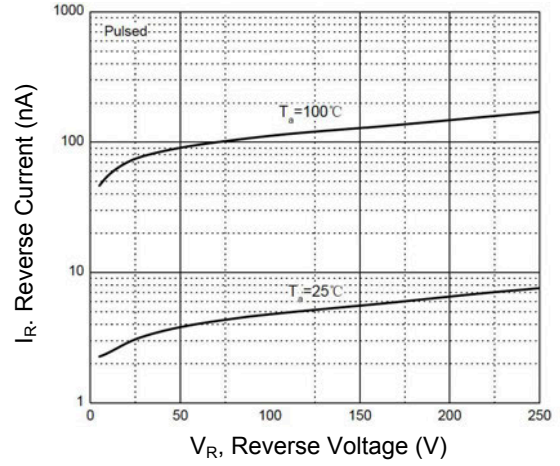
## Electrical Characteristics (T<sub>A</sub>=25°C unless otherwise noted)

Parameter	Symbol	Conditions	Min.	Max.	Unit
Reverse Breakdown Voltage	V <sub>BR</sub>	I <sub>R</sub> =100μA	250	-	V
Forward Voltage	V <sub>F</sub>	I <sub>F</sub> =100mA	-	1	V
		I <sub>F</sub> =200mA	-	1.25	
Reverse Current	I <sub>R</sub>	V <sub>R</sub> =250V	-	0.1	μA
Total Capacitance	C <sub>tot</sub>	V <sub>R</sub> =0, f=1MHz	-	5	pF
Reverse Recovery Time	t <sub>rr</sub>	I <sub>F</sub> =I <sub>R</sub> =30mA, R <sub>L</sub> =100Ω, I <sub>RR</sub> =0.1×I <sub>R</sub>	-	50	nS

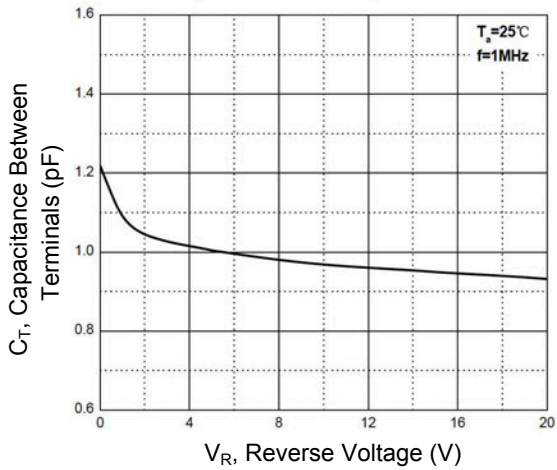
**Typical Electrical Characteristic Curves**



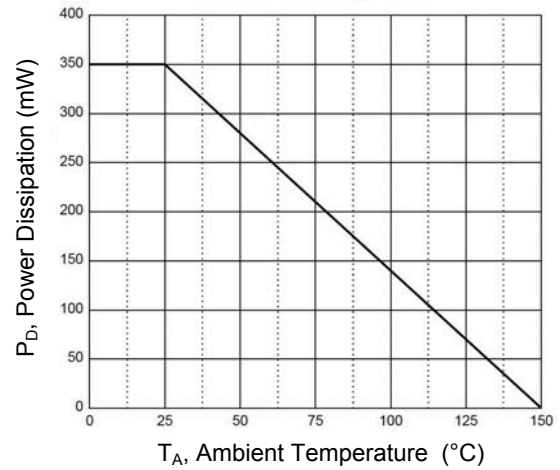
**Figure 1. Forward Characteristics**



**Figure 2. Reverse Characteristics**

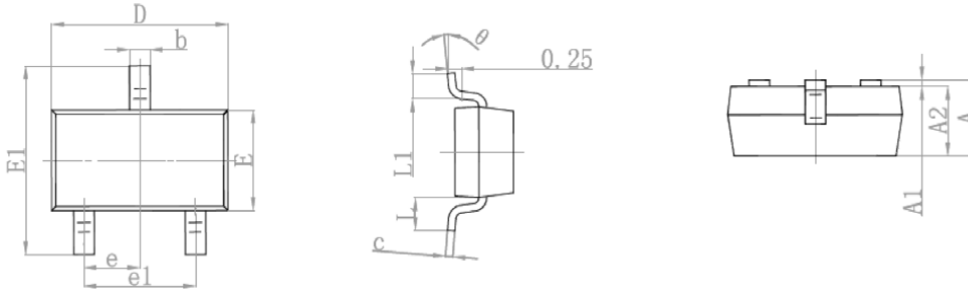


**Figure 3. Capacitance Characteristics**



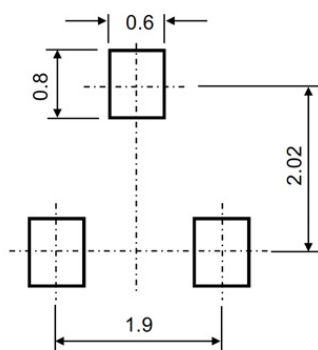
**Figure 4. Power Derating Curve**

**Package Outline Dimensions (SOT-23)**



Symbol	Dimensions In Millimeters		Dimensions In Inches	
	Min	Max	Min	Max
A	0.900	1.150	0.035	0.045
A1	0.000	0.100	0.000	0.004
A2	0.900	1.050	0.035	0.041
b	0.300	0.500	0.012	0.020
c	0.080	0.150	0.003	0.006
D	2.800	3.000	0.110	0.118
E	1.200	1.400	0.047	0.055
E1	2.250	2.550	0.089	0.100
e	0.950 TYP		0.037 TYP	
e1	1.800	2.000	0.071	0.079
L	0.550 REF		0.022 REF	
L1	0.300	0.500	0.012	0.020
θ	0°	8°	0°	8°

**Recommended Pad Layout**



Note:

1. Controlling dimension: in millimeters
2. General tolerance: ±0.05mm
3. The pad layout is for reference purposes only

**Order Information**

Device	Package	Marking	Carrier	Quantity
BAV23A	SOT-23	KT7	Tape & Reel	3,000pcs / Reel
BAV23C	SOT-23	KT6	Tape & Reel	3,000pcs / Reel
BAV23S	SOT-23	KL31	Tape & Reel	3,000pcs / Reel