



SOD-123 Plastic-Encapsulate Diodes

BZT52C...

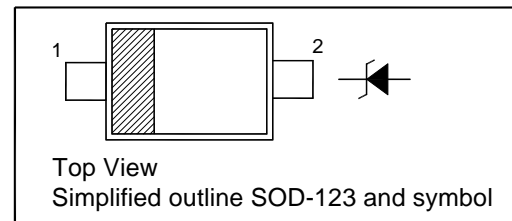
SILICON PLANAR ZENER DIODES

Features

- Ideally suited for automated assembly processes
- Total power dissipation: max. 500 mW

PINNING

PIN	DESCRIPTION
1	Cathode
2	Anode



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

Parameter	Symbol	Value	Unit
Power Dissipation	P_{tot}	500	mW
Junction Temperature	T_J	150	$^\circ\text{C}$
Storage Temperature Range	T_{stg}	- 65 to + 150	$^\circ\text{C}$

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

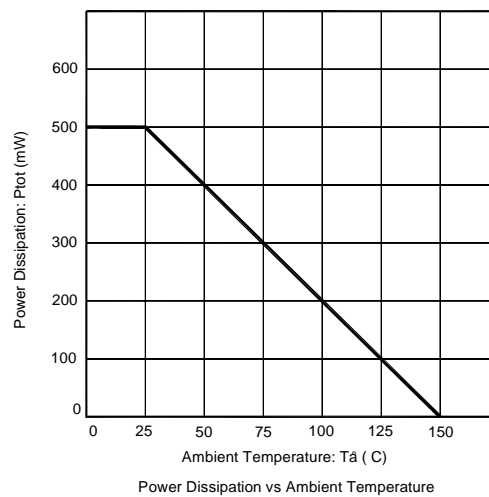
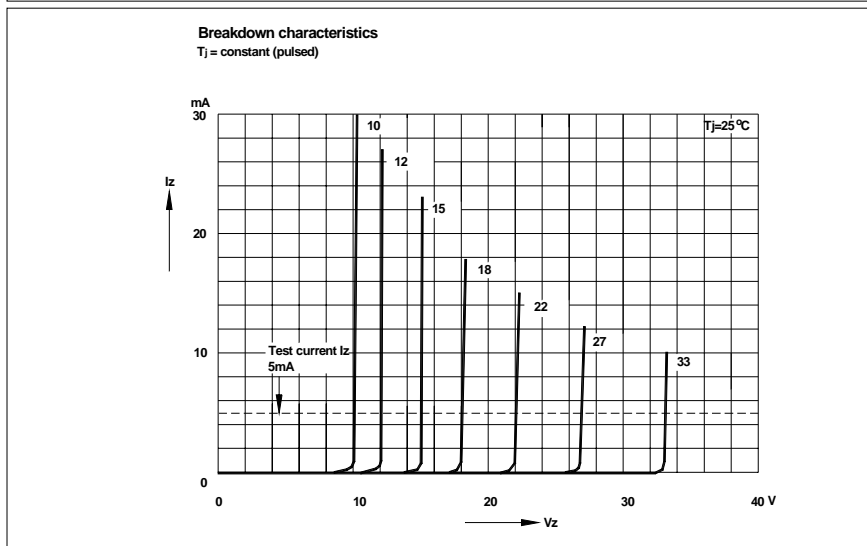
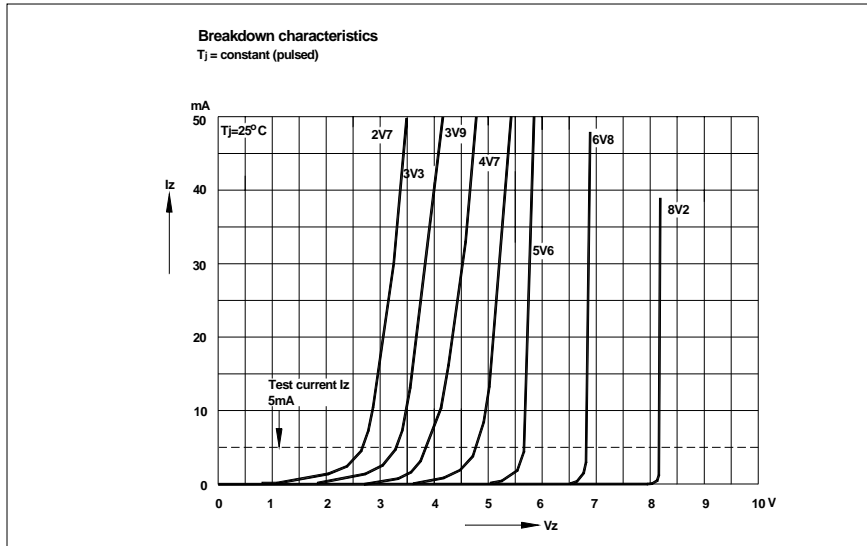
Parameter	Symbol	Max.	Unit
Thermal Resistance Junction to Ambient Air	R_{thA}	340	$^\circ\text{C}/\text{W}$
Forward Voltage at $I_F = 10 \text{ mA}$	V_F	0.9	V



Characteristics at Ta = 25°C

Type	Marking Code	Zener Voltage Range ¹⁾			Dynamic Impedance				Reverse Leakage Current	
		V _{znom}	V _{ZT}	at I _{ZT}	Z _{ZT}	at I _{ZT}	Z _{ZK}	at I _{ZK}	I _R	at V _R
		V	V	mA	Max. (Ω)	mA	Max. (Ω)	mA	Max. (μA)	V
BZT52C2V4	MH	2.4	2.2...2.6	5	100	5	600	1	50	1
BZT52C2V7	MJ	2.7	2.5...2.9	5	100	5	600	1	20	1
BZT52C3V0	MK	3.0	2.8...3.2	5	95	5	600	1	10	1
BZT52C3V3	MM	3.3	3.1...3.5	5	95	5	600	1	5	1
BZT52C3V6	MN	3.6	3.4...3.8	5	90	5	600	1	5	1
BZT52C3V9	MP	3.9	3.7...4.1	5	90	5	600	1	3	1
BZT52C4V3	MR	4.3	4...4.6	5	90	5	600	1	3	1
BZT52C4V7	MX	4.7	4.4...5	5	80	5	500	1	3	2
BZT52C5V1	MY	5.1	4.8...5.4	5	60	5	480	1	2	2
BZT52C5V6	MZ	5.6	5.2...6	5	40	5	400	1	1	2
BZT52C6V2	NA	6.2	5.8...6.6	5	10	5	150	1	3	4
BZT52C6V8	NB	6.8	6.4...7.2	5	15	5	80	1	2	4
BZT52C7V5	NC	7.5	7...7.9	5	15	5	80	1	1	5
BZT52C8V2	ND	8.2	7.7...8.7	5	15	5	80	1	0.7	5
BZT52C9V1	NE	9.1	8.5...9.6	5	15	5	100	1	0.5	6
BZT52C10	NF	10	9.4...10.6	5	20	5	150	1	0.2	7
BZT52C11	NH	11	10.4...11.6	5	20	5	150	1	0.1	8
BZT52C12	NJ	12	11.4...12.7	5	25	5	150	1	0.1	8
BZT52C13	NK	13	12.4...14.1	5	30	5	170	1	0.1	8
BZT52C15	NM	15	13.8...15.6	5	30	5	200	1	0.1	10.5
BZT52C16	NN	16	15.3...17.1	5	40	5	200	1	0.1	11.2
BZT52C18	NP	18	16.8...19.1	5	45	5	225	1	0.1	12.6
BZT52C20	NR	20	18.8...21.2	5	55	5	225	1	0.1	14
BZT52C22	NX	22	20.8...23.3	5	55	5	250	1	0.1	15.4
BZT52C24	NY	24	22.8...25.6	5	70	5	250	1	0.1	16.8
BZT52C27	NZ	27	25.1...28.9	2	80	2	300	0.5	0.1	18.9
BZT52C30	PA	30	28...32	2	80	2	300	0.5	0.1	21
BZT52C33	PB	33	31...35	2	80	2	325	0.5	0.1	23.1
BZT52C36	PC	36	34...38	2	90	2	350	0.5	0.1	25.2
BZT52C39	PD	39	37...41	2	130	2	350	0.5	0.1	27.3
BZT52C43	6A	43	40...46	2.5	130	2	500	1	2	33
BZT52C47	6B	47	44...50	2.5	150	2	500	1	2	36
BZT52C51	6C	51	48...54	2.5	180	2	500	1	1	39
BZT52C56	6D	56	52...60	2.5	180	2	500	1	1	43
BZT52C62	6E	62	58...66	2.5	200	2	500	1	0.2	47
BZT52C68	6F	68	64...72	2.5	250	2	500	1	0.2	52
BZT52C75	6H	75	70...79	2.5	300	2	500	1	0.2	57

¹⁾ V_{ZT} is tested with pulses (20 ms).

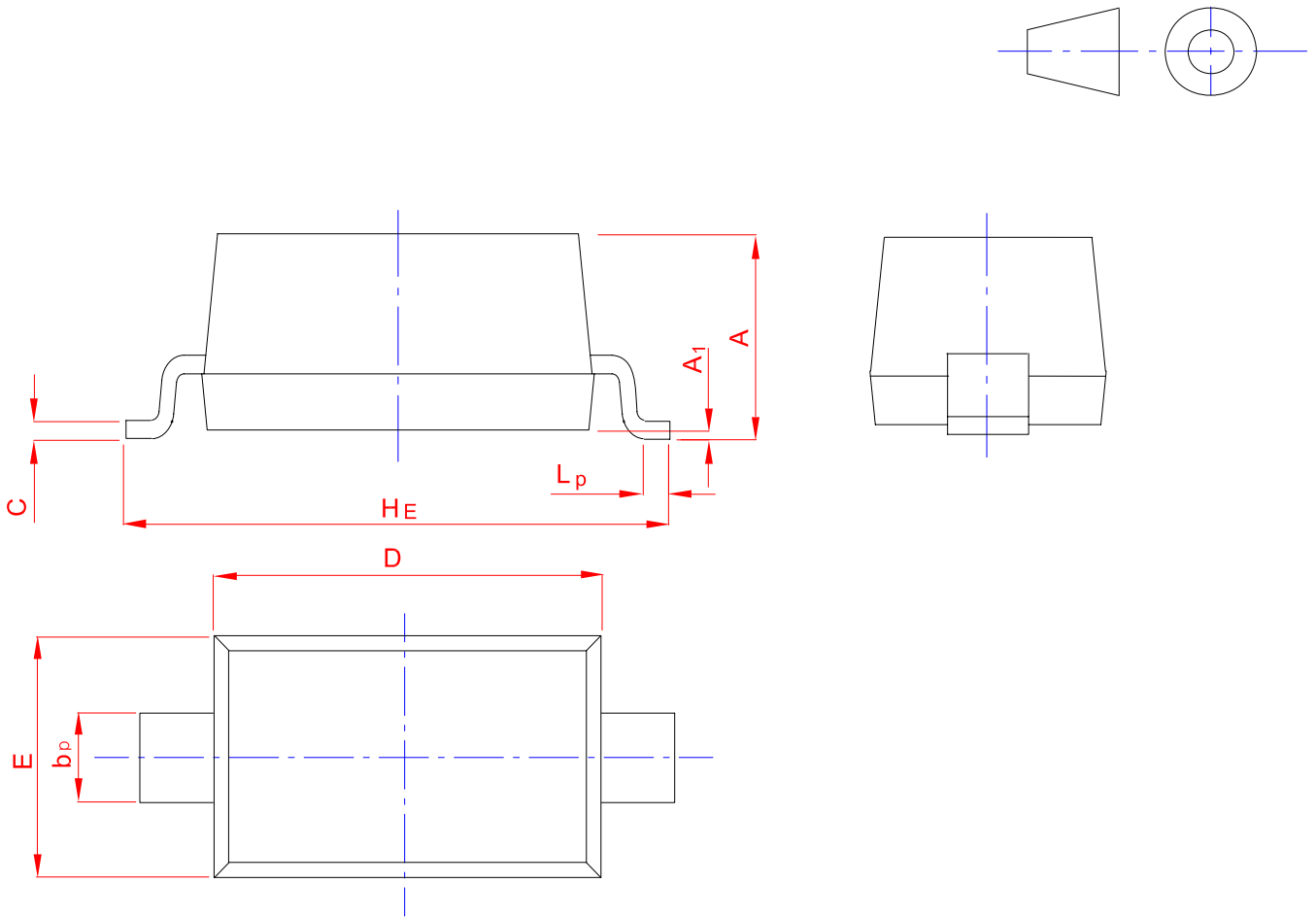




PACKAGE OUTLINE

Plastic surface mounted package; 2 leads

SOD-123



UNIT	A	b _p	C	D	E	H _E	A ₁	L _p
mm	1.20	0.60	0.135	2.75	1.65	3.85	0.10	0.50
	0.90	0.50	0.100	2.55	1.55	3.55	0.01	0.20