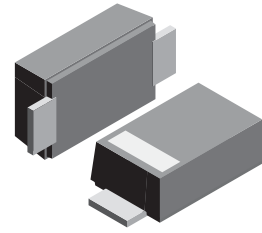


**VOLTAGE RANGE: 3.3 - 330V**  
**POWER: 1Watts**

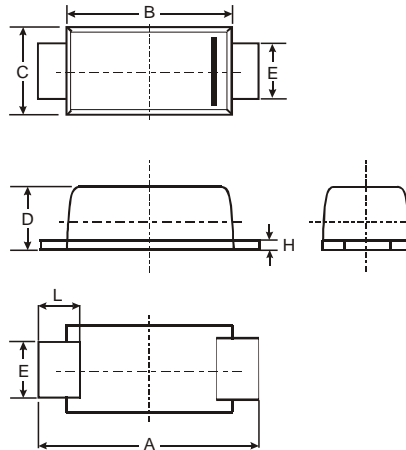
### Features

Small plastic package suitable for surface mounted design.



### Mechanical Data

- Case: JEDEC SOD-123FL, molded plastic over passivated chip
- Polarity: Color band denotes positive end ( cathode ) except for bidirectional
- Mounting position: Any
- Weight: 0.006 ounces, 0.02 gram



SOD-123FL			
Dim	Min	Max	Typ
A	3.58	3.72	3.65
B	2.72	2.78	2.75
C	1.77	1.83	1.80
D	1.02	1.08	1.05
E	0.097	1.03	1.00
H	0.13	0.17	0.15
L	0.53	0.57	0.55
All Dimensions in mm			

### Maximum Ratings $T_A = 25^\circ\text{C}$ unless otherwise specified

MDD Catalog Number	SYMBOLS	VALUE	UNITS
Power Dissipation at $T_L=75^\circ\text{C}$ ,	$P_D$	1.0	W
Forward Voltage at $I_F=200\text{mA}$	$V_F$	1.2	V
Typical thermal resistance junction to ambient <sup>(1)</sup>	$R_{\theta JA}$	55	$^\circ\text{C/W}$
Operating and Storage Temperature Range	$T_J, T_{stg}$	-55 to + 150	$^\circ\text{C}$

(1) Thermal resistance from junction to ambient at P.C.B. mounted with 0.2 X 0.2" (5 X 5 mm) copper areas pads.

Fig.1 Maximum Continuous Power Derating

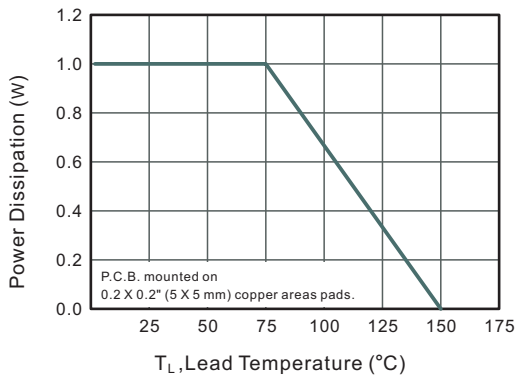
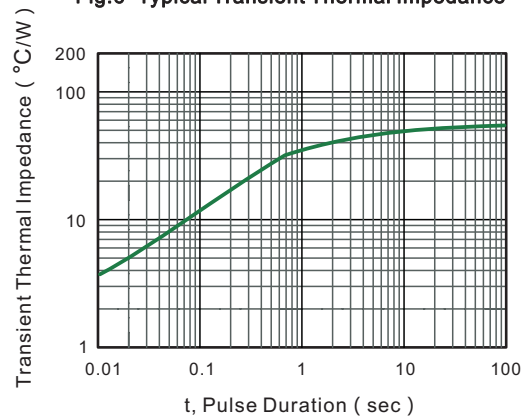


Fig.6- Typical Transient Thermal Impedance





Characteristics at Ta = 25°C								
Type	Zener Voltage Range <sup>(1)</sup>			I <sub>ZT</sub>	Dynamic Impedance	Reverse Current		Admissible Zener Current
	V <sub>ZT</sub> ( at I <sub>ZT</sub> )				Z <sub>ZT</sub> ( at I <sub>ZT</sub> )	I <sub>R</sub>	at V <sub>R</sub>	
	Min ( V )	Nom ( V )	Max ( V )	(mA)	Max (Ω)	Max ( μA )	( V )	I <sub>ZM</sub> (mA)
MM1W3V3	3.10	3.3	3.50	75	10	100	1	285
MM1W3V6	3.40	3.6	3.80	69	10	100	1	263
MM1W3V9	3.70	3.9	4.10	64	9.0	50	1	243
MM1W4V3	4.06	4.3	4.56	58	9.0	25	1	219
MM1W4V7	4.50	4.7	4.93	53	8.0	10	1	203
MM1W5V1	4.84	5.1	5.36	49	7.0	10	1	186
MM1W5V6	5.32	5.6	5.92	45	5.0	10	2	170
MM1W6V2	5.86	6.2	6.51	41	2.0	10	3	154
MM1W6V8	6.46	6.8	7.18	37	3.5	10	4	140
MM1W7V5	7.12	7.5	7.88	34	4.0	10	5	127
MM1W8V2	7.79	8.2	8.67	31	4.5	10	6	116
MM1W9V1	8.60	9.1	9.59	28	5.0	10	7	104
MM1W10	9.50	10	10.5	25	7.0	10	7	95
MM1W11	10.4	11	11.6	23	8.0	5	8	86
MM1W12	11.4	12	12.6	21	9.0	5	9	79
MM1W13	12.4	13	14.1	19	10	5	10	71
MM1W15	13.8	15	15.8	17	14	5	11	63
MM1W16	15.2	16	17.1	16	16	5	12	58
MM1W18	16.8	18	19.2	14	20	5	13	52
MM1W20	19.0	20	21.2	13	22	5	15	47
MM1W22	20.8	22	23.3	12	23	5	17	43
MM1W24	22.8	24	26.0	11	25	5	18	38
MM1W27	25.3	27	28.9	9.5	35	5	21	35
MM1W30	28.2	30	32.0	8.5	40	5	23	31
MM1W33	31.3	33	34.9	7.5	45	5	25	28
MM1W36	34.2	36	37.9	7.0	50	5	27	26
MM1W39	37.2	39	41.5	6.5	60	5	30	24
MM1W43	40.9	43	45.6	6.0	70	1	32	22
MM1W47	44.9	47	49.8	5.5	80	1	35	20
MM1W51	48.6	51	54.0	5.0	95	1	38	18
MM1W56	53.6	56	58.8	4.5	110	1	42	17
MM1W62	58.9	62	65.6	4.0	125	1	47	15
MM1W68	64.6	68	71.7	3.7	150	1	52	14
MM1W75	71.2	75	78.8	3.3	175	1	56	12
MM1W82	77.9	82	87.0	3.0	200	1	62	11
MM1W91	86.0	91	96.0	2.8	250	1	69	10
MM1W100	95.0	100	105	2.5	350	1	76	9.5
MM1W110	104	110	116	2.3	450	1	84	8.6
MM1W120	114	120	127	2.0	550	1	91	7.8
MM1W135	125	135	142	1.9	700	1	100	7.0
MM1W150	140	150	157	1.7	900	1	110	6.3
MM1W165	155	165	172	1.6	1100	1	120	5.8
MM1W180	170	180	191	1.4	1200	1	135	5.2
MM1W200	189	200	211	1.2	1400	1	150	4.7
MM1W220	209	220	231	1.0	1600	1	165	4.3
MM1W240	229	240	251	1.0	1800	1	180	3.9
MM1W260	249	260	271	1.0	2000	1	190	3.7
MM1W280	269	280	291	1.0	2100	1	205	3.4
MM1W300	289	300	315	1.0	2300	1	230	3.1
MM1W330	313	330	346	1.0	2500	1	250	2.8

( 1 ) V<sub>ZT</sub> is tested with pulses (20 ms)