AMMSZS2V4H THRU AMMSZS75H

ZENER DIODES

REVERSE VOLTAGE: **2.4 TO 75 VOLTS**

POWER DISSIPATION: **500 mWATTS**

FEATURES

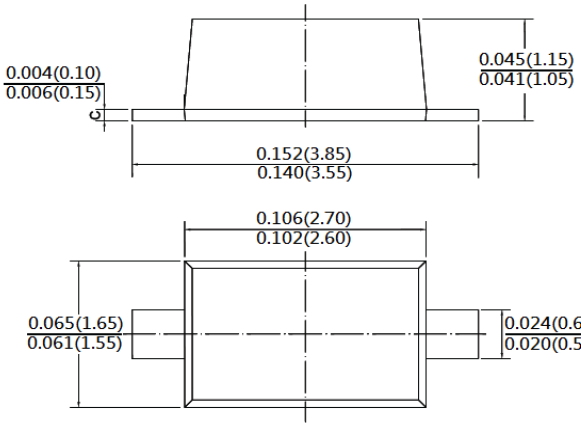
· AEC-Q101 Qualified

· Zener Voltage Range 2.4 to 75 Volts

· Zener Voltage Tolerance: ± 5%

· Suffix "H" indicates Halogen-free parts, ex. AMMSZS2V4H

SOD-123FL



Dimensions in inchs and (millimeters)

MECHANICAL DATA

Case : SOD-123FL

Mounting Position : Any

Maximum Ratings @ 25 °C Unless Otherwise Specified

Parameter	Symbol	Value	Unit
Power Dissipation T_L=75℃ (Note 1)	P_{tot}	500	mW
Junction Temperature	T_J	150	℃
Storage Temperature Range	T_{stg}	-55 to +150	℃

Parameter	Symbol	Value	Unit
Thermal Resistance from Junction to Ambient (Note 2)	$R_{\theta JA}$	340	℃/W
Thermal Resistance Junction to Lead (Note 2)	$R_{\theta JL}$	150	℃/W
Forward Voltage at I_F=10mA	V_F	0.9	V

Note :

1. FR 4 PCB = 89 * 38 mm.

2. Mounted on an FR-4 PCB 38 * 38 * 1.6 mm with single-sided Cu pad areas 25mm^2(>70 μm thick).

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Electrical Characteristics

Tamb = 25 °C, unless otherwise specified

Type	Marking Code	Zener Voltage[3]				Dynamic Impedance[4]		Reverse Leakage Current	
		V_Z			I_{ZT}	Z_{ZT}	I_{ZT}	I_R	V_R
		Min. (V)	Nom. (V)	Max. (V)	mA	Max. (Ω)	mA	Max. (μA)	V
AMMSZS2V4H	4C	2.28	2.4	2.56	5.0	100	5.0	120	1.0
AMMSZS2V7H	4D	2.50	2.7	2.90	5.0	110	5.0	120	1.0
AMMSZS3V0H	4E	2.80	3.0	3.20	5.0	120	5.0	50	1.0
AMMSZS3V3H	4F	3.10	3.3	3.50	5.0	130	5.0	20	1.0
AMMSZS3V6H	4H	3.40	3.6	3.80	5.0	130	5.0	10	1.0
AMMSZS3V9H	4J	3.70	3.9	4.10	5.0	130	5.0	5.0	1.0
AMMSZS4V3H	4K	4.00	4.3	4.60	5.0	130	5.0	5.0	1.0
AMMSZS4V7H	4M	4.40	4.7	5.00	5.0	130	5.0	2.0	1.0
AMMSZS5V1H	4N	4.80	5.1	5.40	5.0	130	5.0	2.0	1.5
AMMSZS5V6H	4P	5.20	5.6	6.00	5.0	80	5.0	1.0	2.5
AMMSZS6V2H	4R	5.80	6.2	6.60	5.0	50	5.0	1.0	3.0
AMMSZS6V8H	4X	6.40	6.8	7.20	5.0	30	5.0	0.5	3.5
AMMSZS7V5H	4Y	7.00	7.5	7.90	5.0	30	5.0	0.5	4.0
AMMSZS8V2H	4Z	7.70	8.2	8.70	5.0	30	5.0	0.5	5.0
AMMSZS9V1H	5A	8.50	9.1	9.60	5.0	30	5.0	0.5	6.0
AMMSZS10H	5B	9.40	10.0	10.60	5.0	30	5.0	0.1	7.0
AMMSZS11H	5C	10.40	11.0	11.60	5.0	30	5.0	0.1	8.0
AMMSZS12H	5D	11.40	12.0	12.70	5.0	35	5.0	0.1	9.0
AMMSZS13H	5E	12.40	13.0	14.10	5.0	35	5.0	0.1	10
AMMSZS15H	5F	13.80	15.0	15.60	5.0	40	5.0	0.1	11
AMMSZS16H	5H	15.30	16.0	17.10	5.0	40	5.0	0.1	12
AMMSZS18H	5J	16.80	18.0	19.10	5.0	45	5.0	0.1	13
AMMSZS20H	5K	18.80	20.0	21.20	5.0	50	5.0	0.1	15
AMMSZS22H	5M	20.80	22.0	23.30	5.0	55	5.0	0.1	17
AMMSZS24H	5N	22.80	24.0	25.60	5.0	60	5.0	0.1	19
AMMSZS27H	5P	25.10	27.0	28.90	5.0	70	2.0	0.1	21
AMMSZS30H	5R	28.00	30.0	32.00	5.0	80	2.0	0.1	23
AMMSZS33H	5X	31.00	33.0	35.00	5.0	80	2.0	0.1	25
AMMSZS36H	5Y	34.00	36.0	38.00	5.0	90	2.0	0.1	27
AMMSZS39H	5Z	37.00	39.0	41.00	2.5	100	2.0	2.0	30
AMMSZS43H	6A	40.00	43.0	46.00	2.5	130	2.0	2.0	33
AMMSZS47H	6B	44.00	47.0	50.00	2.5	150	2.0	2.0	36
AMMSZS51H	6C	48.00	51.0	54.00	2.5	180	2.0	1.0	39
AMMSZS56H	6D	52.00	56.0	60.00	2.5	180	2.0	1.0	43
AMMSZS62H	6E	58.00	62.0	66.00	2.5	200	2.0	0.2	47
AMMSZS68H	6F	64.00	68.0	72.00	2.5	250	2.0	0.2	52
AMMSZS75H	6H	70.00	75.0	79.00	2.5	300	2.0	0.2	57

Note:

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

4. Z_{ZT} is measured at I_Z by given a very small A.C. current signal.

RATINGS AND CHARACTERISTIC CURVES

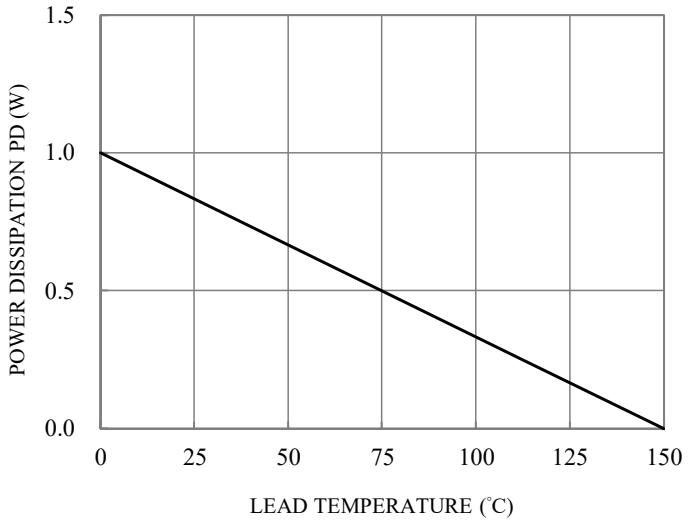

Fig. Power Derating Curve