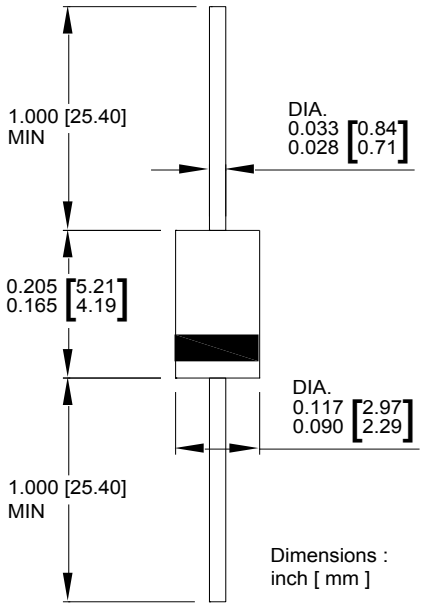
V_Z: 5.6 to 200 V
P_D: 1.5 W

Axial Lead Zener Diodes

DO-41



Features

- Glass passivated chip
- Low leakage
- Built-in strain relief
- Low inductance
- High peak reverse power dissipation
- Lead (Pb)-free component
- For use in stabilizing and clipping circuits with high power rating

Mechanical Data

- Case: Molded plastic
- Epoxy: UL 94V-0 rate flame retardant
- Lead: Axial leads, solderable per MIL-STD-202, method 208 guranteed
- Polarity: Color band denotes cathode end
- Mounting position: Any

Maximum Ratings(T_A=25℃ unless otherwise noted)

Parameter	Symbol	Value	Unit
DC power dissipation at T_L = 75 °C[(1)]	P_D	1.5	W
Maximum forward voltage at I_F = 200 mA	V_F	1.5	V
Junction temperature range	T_J	- 55 to + 175	°C
Storage temperature range	T_{STG}	- 55 to + 175	°C

Note:

(1) T_L = Lead temperature at 3/8 " (9.5mm) from body

Ratings and Characteristics Curves (T_A=25℃ unless otherwise noted)

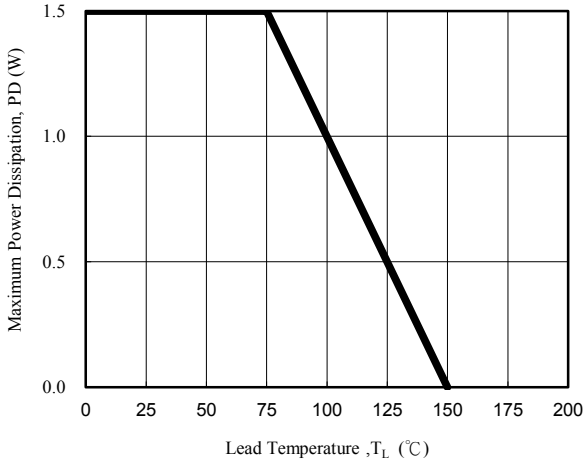


Fig. 1 - Power Temperature Derating Curve

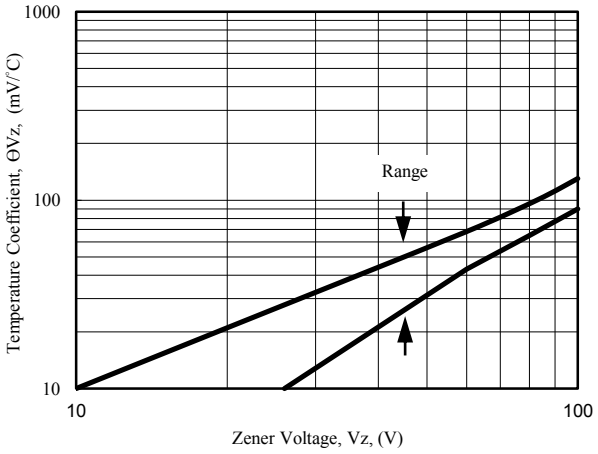


Fig. 2 - Temperature Coefficients v.s. Zener Voltage

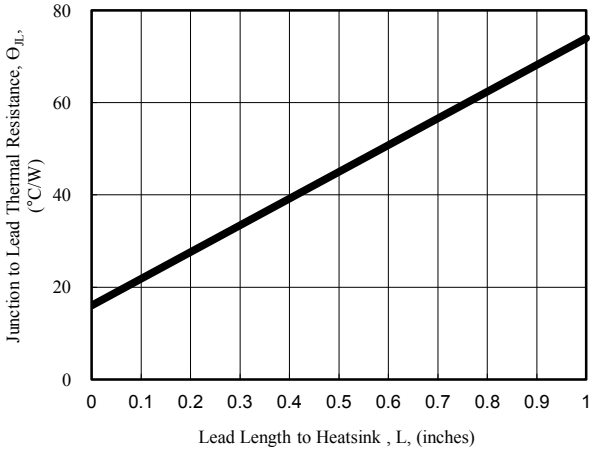


Fig. 3 - Typical Thermal Resistance v.s. Lead Length

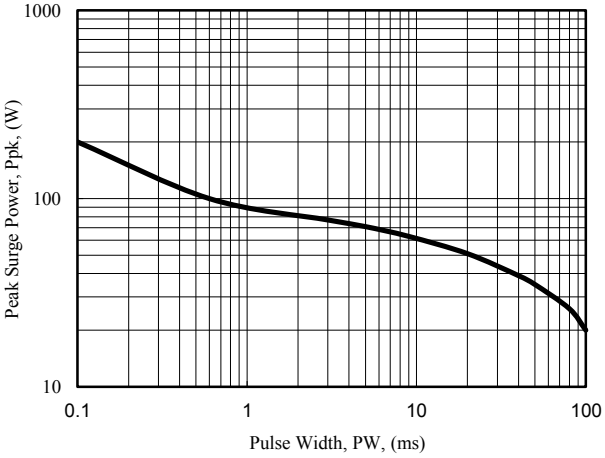


Fig. 4 - Maximum Surge Power

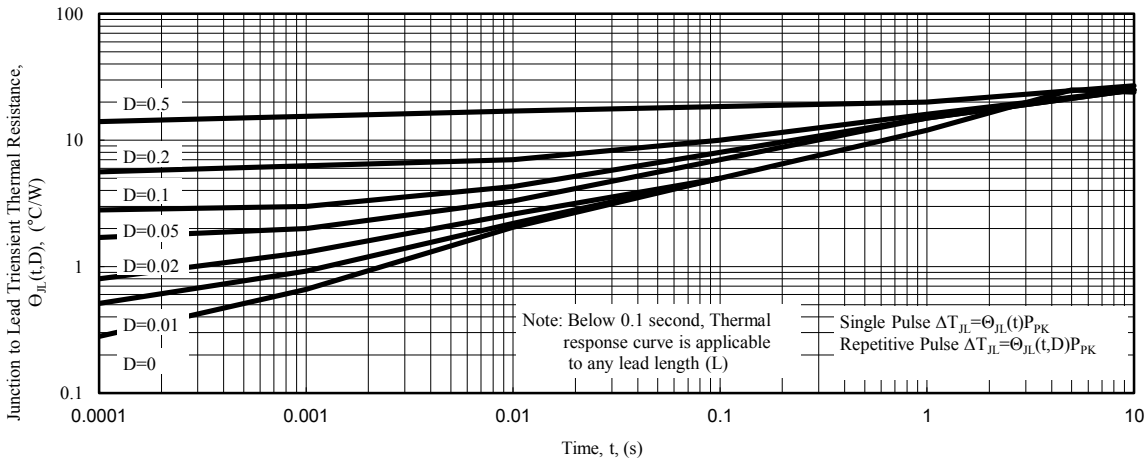


Fig. 5 - Typical Thermal Response L, Lead Length=3/8inch

Electrical Characteristics(T_A=25℃ unless otherwise noted)

Part Number	Nominal Zener Voltage		Maximum Zener Impedance			Maximum Reverse Leakage Current		Maximum DC Zener Current
	V_Z @ I_{ZT}	I_{ZT}	Z_{ZT} @ I_{ZT}	Z_{ZK} @ I_{ZK}	I_{ZK}	I_R @ V_R		I_{ZM}
	(V)	(mA)	(Ω)	(Ω)	(mA)	(μA)	(V)	(mA)
1N5919B	5.6	66.9	2.0	250	1.00	5.0	3.0	267
1N5920B	6.2	60.5	2.0	200	1.00	2.5	4.0	240
1N5921B	6.8	55.1	2.5	200	1.00	2.5	5.2	220
1N5922B	7.5	50.0	3.0	400	0.50	2.5	6.0	200
1N5923B	8.2	45.7	3.5	400	0.50	2.5	6.5	182
1N5924B	9.1	41.2	4.0	500	0.50	2.5	7.0	164
1N5925B	10.0	37.5	4.5	500	0.25	2.5	8.0	150
1N5926B	11.0	34.1	5.5	550	0.25	0.5	8.4	136
1N5927B	12.0	31.2	6.5	550	0.25	0.5	9.1	125
1N5928B	13.0	28.8	7.0	550	0.25	0.5	9.9	115
1N5929B	15.0	25.0	9.0	600	0.25	0.5	11.4	100
1N5930B	16.0	23.4	10.0	600	0.25	0.5	12.2	93
1N5931B	18.0	20.8	12.0	650	0.25	0.5	13.7	83
1N5932B	20.0	18.7	14.0	650	0.25	0.5	15.2	75
1N5933B	22.0	17.0	17.5	650	0.25	0.5	16.7	68
1N5934B	24.0	15.6	19.0	700	0.25	0.5	18.2	62
1N5935B	27.0	13.9	23.0	700	0.25	0.5	20.6	55
1N5936B	30.0	12.5	26.0	750	0.25	0.5	22.8	50
1N5937B	33.0	11.4	33.0	800	0.25	0.5	25.1	45
1N5938B	36.0	10.4	38.0	850	0.25	0.5	27.4	41
1N5939B	39.0	9.6	45.0	900	0.25	0.5	29.7	38
1N5940B	43.0	8.7	53.0	950	0.25	0.5	32.7	34
1N5941B	47.0	8.0	67.0	1000	0.25	0.5	35.8	31
1N5942B	51.0	7.3	70.0	1100	0.25	0.5	38.8	29
1N5943B	56.0	6.7	86.0	1300	0.25	0.5	42.6	26
1N5944B	62.0	6.0	100.0	1500	0.25	0.5	47.1	24
1N5945B	68.0	5.5	120.0	1700	0.25	0.5	51.7	22
1N5946B	75.0	5.0	140.0	2000	0.25	0.5	56.0	20
1N5947B	82.0	4.6	160.0	2500	0.25	0.5	62.2	18
1N5948B	91.0	4.1	200.0	3000	0.25	0.5	69.2	16
1N5949B	100.0	3.7	250.0	3100	0.25	0.5	76.0	15
1N5950B	110.0	3.4	300.0	4000	0.25	0.5	83.6	13
1N5951B	120.0	3.1	380.0	4500	0.25	0.5	91.2	12
1N5952B	130.0	2.9	450.0	5000	0.25	0.5	98.8	11
1N5953B	150.0	2.5	600.0	6000	0.25	0.5	114.0	10
1N5954B	160.0	2.3	700.0	6500	0.25	0.5	121.6	9
1N5955B	180.0	2.1	900.0	7000	0.25	0.5	136.8	8
1N5956B	200.0	1.9	1900.0	8000	0.25	0.5	152.0	7

Notes :

(1) The type number listed have a standard tolerance on the nominal zener voltage of ± 5 %

(2) The revese surge current is a non-repetitive, 8.3ms pulse width square wave or equivalent sine-wave superimposed on IZT per Method