

Voltage Regulator Zener Diodes

Feature:

- Hermetically Sealed, Glass Passivated Silicon Diodes.



Polarity : Cathode is indicated by a blue band.

Absolute Maximum Ratings

Description	Symbol	Value	Unit
Power Dissipation $T_{tp} = 105^{\circ}\text{C}$	P_{tot}	2.3	W
Power Dissipation PCB mounted $T_{amb} = 55^{\circ}\text{C}$	P_{tot}	0.8	
Non-Repetitive Peak Reverse Power Dissipation $t_p = 100\mu\text{s}$, square pulse; $T_j = 25^{\circ}\text{C}$ prior to surge	P_{ZSM}	300	
Non-Repetitive Peak Reverse Power Dissipation; 10/100 μs , exponential pulse; $T_j = 25^{\circ}\text{C}$ prior to surge	P_{RSM}	150	
Storage Temperature	T_{stg}	- 65 to + 175	$^{\circ}\text{C}$
Junction Temperature	T_j		

Thermal Resistance

Junction to Tie Point	$R_{th\ j\ (t-p)}$	30	K/W
Junction to Ambient	$*R_{th\ (j-s)}$	150	

* Device mounted on an epoxy glass printed circuit board, 1.5mm thick; thickness of Cu layer $\geq 40\mu\text{m}$
Per type when used as Voltage Regulator Diodes

Electrical Characteristics ($T_a = 25^\circ\text{C}$ unless specified otherwise) $V_F < 1.2\text{V}$ at 200mA

Working Voltage			Differential Resistance r_{diff} (Ω) at I_Z maximum	Temperature Coefficient S_Z (%/K) at I_Z		Test Current at I_Z (mA)	Reverse Current at Reverse Voltage		Part Number
min	V_Z (V) at I_Z nom	max		min	max		I_R at (μA) maximum	V_R (V)	
11.40	12	12.70	7	0.05	0.10	50	3	9.1	BZD27-C12
20.80	22	23.30	15	0.06	0.11	25	1	16	BZD27-C22

Notes:

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