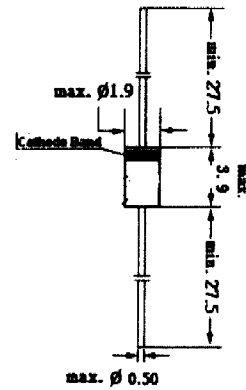


**BZX79...**

**ZENER DIODES**

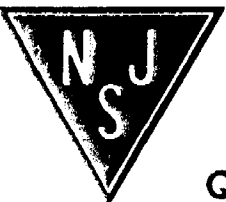


Glass case JEDEC DO-35  
 Dimensions in mm

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

Parameter	Symbol	Value	Unit
Power Dissipation	$P_{tot}$	500 <sup>1)</sup>	mW
Junction Temperature	$T_j$	- 65 to + 200	$^\circ\text{C}$
Storage Temperature Range	$T_s$	- 65 to + 200	$^\circ\text{C}$
Continuous forward current	$I_F$	250	mA
Thermal resistance junction to ambient air	$R_{\theta JA}$	0.3 <sup>1)</sup>	$^\circ\text{C}/\text{mW}$
Peak reverse power dissipation (non-repetitive) $t_p = 100$ ms square wave	$P_{ZSM}$	40	W

<sup>1)</sup> Valid provided that leads are kept at ambient temperature at a distance of 8 mm from case.



NJ Semi-Conductors reserves the right to change test conditions, parameter limits and package dimensions without notice. Information furnished by NJ Semi-Conductors is believed to be both accurate and reliable at the time of going to press. However, NJ Semi-Conductors assumes no responsibility for any errors or omissions discovered in its use. NJ Semi-Conductors encourages customers to verify that datasheets are current before placing orders.

# BZX79...

Characteristics at  $T_A = 25^\circ\text{C}$  ( $V_F = 1.5\text{ V}$ ,  $I_F = 100\text{ mA}$ )

Type <sup>2)</sup>	Zener Voltage <sup>1)</sup>			Impedance (Ohm) @ $I_{ZT}$ $f = 1000\text{ Hz}$	Leakage Current ( $\mu\text{A}$ )		Temp. Coefficient (Typical) (mV/°C)		Capacitance (Typical) (pF) $V_A=0$ , $f=1\text{MHz}$
	Min.	Max.	$I_Z$ (mA)	Max <sup>3)</sup>	Max.	@ $V_R$ (V)	Min.	Max.	
BZX79C2V4	2.2	2.6	5	100	100	1	-3.5	0	255
BZX79C2V7	2.5	2.9	5	100	75	1	-3.5	0	230
BZX79C3V0	2.8	3.2	5	95	50	1	-3.5	0	215
BZX79C3V3	3.1	3.5	5	95	25	1	-3.5	0	200
BZX79C3V6	3.4	3.8	5	90	15	1	-3.5	0	185
BZX79C3V9	3.7	4.1	5	90	10	1	-3.5	+0.3	175
BZX79C4V3	4	4.6	5	90	5	1	-3.5	+1	160
BZX79C4V7	4.4	5	5	80	3	2	-3.5	+0.2	130
BZX79C5V1	4.8	5.4	5	60	2	2	-2.7	+1.2	110
BZX79C5V6	5.2	6	5	40	1	2	-2	+2.5	95
BZX79C6V2	5.8	6.6	5	10	3	4	0.4	3.7	90
BZX79C6V8	6.4	7.2	5	15	2	4	1.2	4.5	85
BZX79C7V5	7	7.9	5	15	1	5	2.5	5.3	80
BZX79C8V2	7.7	8.7	5	15	0.7	5	3.2	6.2	75
BZX79C9V1	8.5	9.6	5	15	0.5	6	3.8	7	70
BZX79C10	9.4	10.6	5	20	0.2	7	4.5	8	70
BZX79C11	10.4	11.6	5	20	0.1	8	5.4	9	65
BZX79C12	11.4	12.7	5	25	0.1	8	6	10	65
BZX79C13	12.4	14.1	5	30	0.1	8	7	11	60
BZX79C15	13.8	15.6	5	30	0.05	10.5	9.2	13	55
BZX79C16	15.3	17.1	5	40	0.05	11.2	10.4	14	52
BZX79C18	16.8	19.1	5	45	0.05	12.6	12.9	16	47
BZX79C20	18.8	21.2	5	55	0.05	14	14.4	18	36
BZX79C22	20.8	23.3	5	55	0.05	15.4	16.4	20	34
BZX79C24	22.8	25.6	5	70	0.05	16.8	18.4	22	33
BZX79C27	25.1	28.9	2	80	0.05	18.9		23.5	30
BZX79C30	28	32	2	80	0.05	21		26	27
BZX79C33	31	35	2	80	0.05	23.1		29	25
BZX79C36	34	38	2	90	0.05	25.2		31	23
BZX79C39	37	41	2	130	0.05	27.3		34	21
BZX79C43	40	46	2	150	0.05	30.1		37	21
BZX79C47	44	50	2	170	0.05	32.9		40	19
BZX79C51	48	54	2	180	0.05	35.7		44	19
BZX79C56	52	60	2	200	0.05	39.2		47	18
BZX79C62	58	66	2	215	0.05	43.4		51	17
BZX79C68	64	72	2	240	0.05	47.6		56	17
BZX79C75	70	79	2	255	0.05	52.5		60	16.5
BZX79C82	77	87	2	280	0.1	62	46	95	29
BZX79C91	85	96	2	300	0.1	69	51	107	28
BZX79C100	94	108	1	500	0.1	76	57	119	27
BZX79C110	104	116	1	650	0.1	84	63	131	26
BZX79C120	114	127	1	800	0.1	91	69	144	24
BZX79C130	124	141	1	950	0.1	99	75	158	23
BZX79C150	138	156	1	1250	0.1	114	87	185	21
BZX79C160	153	171	1	1400	0.1	122	93	200	20
BZX79C180	168	191	1	1700	0.1	137	105	228	18
BZX79C200	188	212	1	2000	0.1	152	120	255	17

<sup>1)</sup> Zener voltage is measured under pulse conditions such that  $T_J$  is no more than  $2^\circ\text{C}$  above  $T_A$

<sup>2)</sup> Tolerance designation - The type numbers listed have zener voltage min/max limits as shown. Device tolerances at  $\pm 2\%$  are indicated by a "B" instead of a "C".

<sup>3)</sup>  $Z_{ZT}$  is measured by dividing the ac voltage drop across the device by the ac current applied. The specified limits are for  $I_Z$  (ac) =  $0.1I_Z$  (dc) with the ac frequency = 1 KHz

<sup>4)</sup> Tested with pulses  $t_p = 20\text{ ms}$ .