MAZA0xx Series

Silicon planar type

For constant voltage, constant current, waveform clipper and surge absorption circuit

■ Features

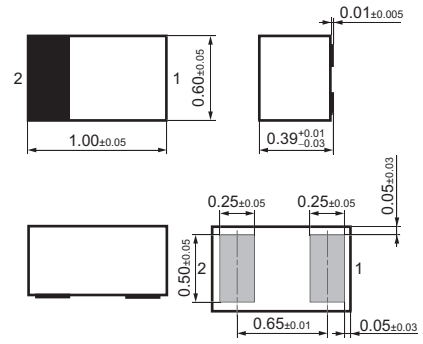
- Low noise type

■ Absolute Maximum Ratings $T_a = 25°C$

Parameter	Symbol	Rating	Unit
Repetitive peak forward current	I_{FRM}	200	mA
Total power dissipation *	P_T	100	mW
Junction temperature	T_j	125	°C
Storage temperature	T_{stg}	–55 to +125	°C

Note) *: P_{tot} = 100 mW achieved with a printed circuit board.

Unit: mm



1: Anode
2: Cathode

ML2-N1 Package

■ Electrical Characteristics $T_a = 25°C \pm 3°C$

Parameter	Symbol	Conditions		Min	Typ	Max	Unit
Forward voltage	V_F	I_F = 10 mA			0.9	1.0	V
Zener voltage *1	V_Z	I_Z	Specified value				V
Zener rise operating resistance	R_{ZK}	I_Z	Specified value	Refer to the list of the electrical characteristics within part numbers			Ω
Zener operating resistance	R_Z	I_Z	Specified value				Ω
Reverse current	I_R	V_R	Specified value				μA
Temparature coefficient of zener voltage *2	S_Z	I_Z	Specified value				mV/°C

Note) 1. Measuring methods are based on JAPANESE INDUSTRIAL STANDARD JIS C 7031 measuring methods for diodes.
2. Absolute frequency of input and output is 5 MHz
3. The temperature must be controlled 25°C for V_Z mesurement.
V_Z value measured at other temperature must be adjusted to V_Z (25°C)
4. *1: V_Z guaranted 20 ms after current flow.
*2: T_j = 25°C to 125°C

■ Electrical Characteristics within Part Numbers $T_a = 25°C \pm 3°C$

Part number	Zener voltage V_Z (V)				Zener rise operating resistance R_{ZK} (Ω)		Zener operating resistance R_Z (Ω)		Reverse current I_R (μA)		Temparature coefficient of zener voltage S_Z (mV/°C)		Marking symbol
	I_Z (mA)	Min	Typ	Max	I_Z (mA)	Max	I_Z (mA)	Max	V_R (V)	Max	I_Z (mA)	typ	
MAZA024	5	2.28	2.40	2.60	—	—	5	100	1.0	120	5	–1.6	1F
MAZA027	5	2.50	2.70	2.90	—	—	5	110	1.0	120	5	–2.0	2F
MAZA030	5	2.80	3.00	3.20	—	—	5	120	1.0	50	5	–2.1	3F
MAZA033	5	3.10	3.30	3.50	—	—	5	130	1.0	20	5	–2.4	4F
MAZA036	5	3.40	3.60	3.80	—	—	5	130	1.0	10	5	–2.4	5F
MAZA039	5	3.70	3.90	4.10	—	—	5	130	1.0	10	5	–2.5	6F
MAZA043	5	4.00	4.30	4.60	—	—	5	130	1.0	10	5	–2.5	AF
MAZA047	5	4.40	4.70	5.00	1.0	800	5	80	1.0	2.0	5	–1.4	HF
MAZA051	5	4.80	5.10	5.40	1.0	500	5	60	2.0	1.0	5	– 0.8	BF
MAZA056	5	5.30	5.60	6.00	0.5	200	5	40	2.5	0.5	5	1.2	CF
MAZA062	5	5.80	6.20	6.60	0.5	100	5	30	4.0	0.2	5	2.3	DF
MAZA068	5	6.40	6.80	7.20	0.5	60	5	20	4.0	0.1	5	3.0	WF
MAZA075	5	7.00	7.50	7.90	0.5	60	5	20	5.0	0.1	5	4.0	TF
MAZA082	5	7.70	8.20	8.70	0.5	60	5	20	5.0	0.1	5	4.6	EF
MAZA091	5	8.50	9.10	9.60	0.5	60	5	20	6.0	0.1	5	5.5	FF
MAZA100	5	9.40	10.00	10.60	0.5	60	5	30	7.0	0.05	5	6.4	GF
MAZA110	5	10.40	11.00	11.60	0.5	60	5	30	8.0	0.05	5	7.4	JF
MAZA120	5	11.40	12.00	12.70	0.5	80	5	30	9.0	0.05	5	8.4	KF
MAZA130	5	12.40	13.00	14.10	0.5	80	5	35	10.0	0.05	5	9.4	LF
MAZA150	5	13.90	15.00	15.60	0.5	80	5	40	11.0	0.05	5	11.4	MF
MAZA160	5	15.30	16.00	17.10	0.5	80	5	50	12.0	0.05	5	12.4	NF
MAZA180	5	16.90	18.00	19.10	0.5	80	5	60	13.0	0.05	5	14.4	PF
MAZA200	5	18.80	20.00	21.20	0.5	100	5	80	15.0	0.05	5	16.4	RF
MAZA220	5	20.80	22.00	23.30	0.5	100	5	80	17.0	0.05	5	18.4	SF
MAZA240	5	22.80	24.00	25.60	0.5	120	5	100	19.0	0.05	5	20.4	UF
MAZA270	2	25.10	27.00	28.90	0.5	120	2	120	21.0	0.05	2	23.4	VF
MAZA300	2	28.00	30.00	32.00	0.5	160	2	160	23.0	0.05	2	26.6	XF
MAZA330	2	31.00	33.00	35.00	0.5	200	2	200	25.0	0.05	2	29.7	YF
MAZA360	2	34.00	36.00	38.00	0.5	250	2	250	27.0	0.05	2	33.0	ZF
MAZA390	2	37.00	39.00	41.00	0.5	300	2	300	30.0	0.05	2	35.6	7F

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