

**SURFACE MOUNT UNIDIRECTIONAL
TRANSIENT VOLTAGE SUPPRESSORS**

STAND-OFF VOLTAGE - **5.0 to 51** Volts
POWER DISSIPATION - **200** WATTS

FEATURES

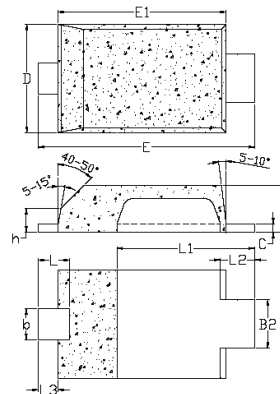
- For surface mounted applications
- Reliable low cost construction utilizing molded plastic technique
- Plastic material has UL flammability classification 94V-0
- Typical IR less than 1uA above 10V
- Fast response time: typically less than 1.0ns
- IEC6100-4-2, >30KV(air); >30KV(Contact)
- RoHS compliant
- AEC-Q101 qualified
- PPAP capable
- Automotive grade



MECHANICAL DATA

- Case Material: "Green" molding compound, UL flammability classification 94V-0, (No Br. Sb. Cl.)
- Terminals: Lead Free Plating (Matte Tin Finish)
- Component in accordance to RoHS 2002/95/EC
- Polarity : Cathode designated by TAB1
- Weight : 10 mg

Mite Flat



DO-222AA		
DIM.	MIN.	MAX.
A	0.80	0.95
b	0.40	0.65
b2	0.70	1.00
C	0.10	0.25
D	1.75	2.05
E	3.60	3.90
E1	2.80	3.10
h	0.35	0.50
L	0.50	0.80
L1	2.10	2.60
L2	0.45	0.75
L3	0.20	0.50

All Dimensions in millimeter

ANODE → CATHODE
TAB 2 → TAB 1

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25℃ ambient temperature unless otherwise specified.

CHARACTERISTICS	SYMBOLS	VALUE	UNIT
PEAK POWER DISSIPATION AT T _J = 25 ℃ , TP = 1ms (Note 1)	P _{PK}	Minimum 200	WATTS
Non repetitive Peak Forward Surge Current 8.3ms single half sine-wave @ T _J = 25 ℃	I _{FSM}	25	AMPS.
Operating Temperature Range	T _J	-55 to +175	℃
Storage Temperature Range	T _{STG}	-55 to +175	℃

NOTES : 1. Non-repetitive current pulse, per Fig. 3 and derated above T_J= 25 ℃ per Fig.2.

REV. 0 Dec-2017, KSIA14

Please be aware that an **Important Notice and Disclaimer** concerning availability, disclaimers, and use in critical applications of LSC products thereto appears at the end of this Data Sheet.

FIG.1 - PEAK PULSE POWER DERATING CURVE

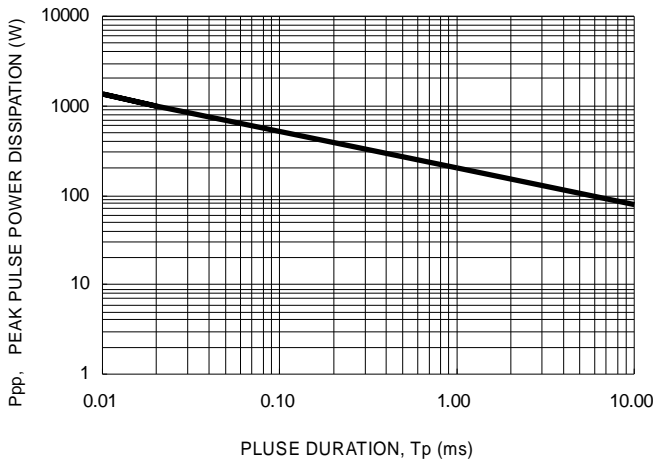


FIG.2 - PEAK PULSE POWER DERATING CURVE

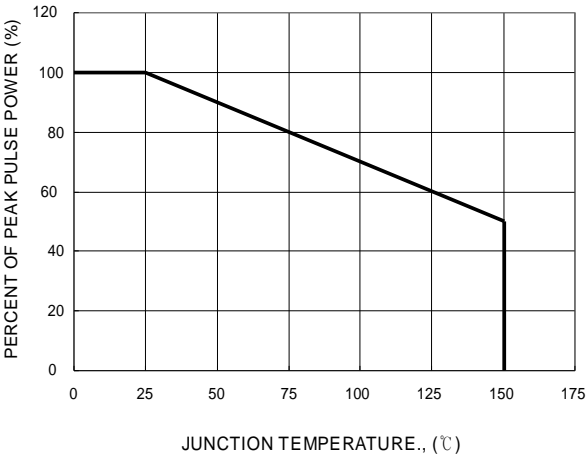


FIG.3 - PULSE WAVEFORM

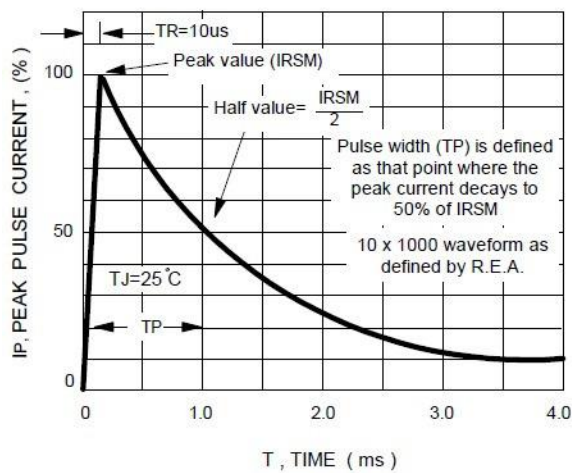
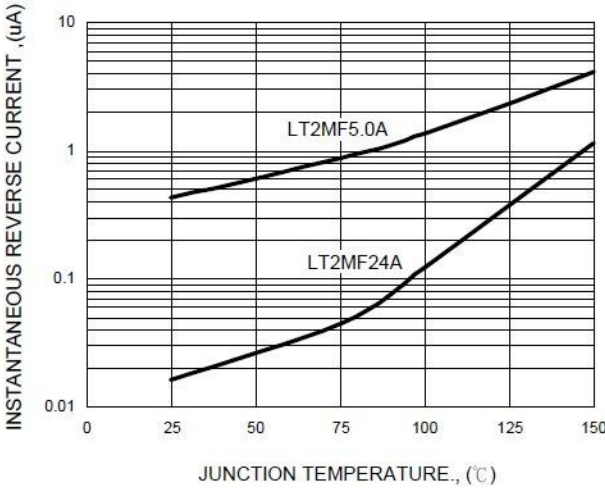


FIG.4 - TYPICAL REVERSE CHARACTERISTICS



Device Uni-directional	Marking	Working Peak Reverse Voltage	Breakdown voltage			Maximum Reverse Leakage at V_{RWM}	Maximum Reverse Surge Current	Maximum Reverse Voltage at I_{RSM} (Clamping Voltage)
		$V_{RWM}(V)$	Min.(V)	Max.(V)	@IT(mA)	IR (uA)	IPP (A)	VC (V)
ALT2MF5.0A	AMFB	5.0	6.40	7.07	10	50	21.7	9.2
ALT2MF6.0A	AMFC	6.0	6.67	7.37	10	50	19.4	10.3
ALT2MF8.5A	AMFD	8.5	9.44	10.43	1	10	13.9	14.4
ALT2MF10A	AMFE	10	11.10	12.3	1	5.0	11.8	17.0
ALT2MF12A	AMFF	12	13.3	14.7	1	1.0	10.1	19.9
ALT2MF13A	AMFG	13	14.4	15.9	1	1.0	9.3	21.5
ALT2MF15A	AMFP	15	16.7	18.5	1	1.0	8.2	24.4
ALT2MF16A	AMFH	16	17.1	18.9	1	1.0	7.7	26.0
ALT2MF18A	AMFI	18	20.0	22.1	1	1.0	6.9	29.2
ALT2MF20A	AMFJ	20	22.2	24.5	1	1.0	6.2	32.4
ALT2MF22A	AMFQ	22	24.4	27.0	1	1.0	5.6	35.5
ALT2MF24A	AMFK	24	25.7	28.4	1	1.0	5.1	38.9
ALT2MF26A	AMFL	26	28.9	31.9	1	1.0	4.8	42.1
ALT2MF28A	AMFM	28	31.1	34.4	1	1.0	4.4	45.4
ALT2MF30A	AMFN	30	33.3	36.8	1	1.0	4.1	48.4
ALT2MF36A	AMFO	36	40.0	44.2	1	1.0	3.4	58.1
ALT2MF40A	AMFR	40	44.4	49.1	1	1.0	3.1	64.5
ALT2MF43A	AMFS	43	47.8	52.8	1	1.0	2.88	69.4
ALT2MF45A	AMFT	45	50.0	55.3	1	1.0	2.75	72.7
ALT2MF48A	AMFU	48	53.3	58.9	1	1.0	2.58	77.4
ALT2MF51A	AMFV	51	56.7	62.7	1	1.0	2.43	82.4

IMPORTANT NOTICE AND DISCLAIMER

LSC reserves the right to make changes to this document and its products and specifications at any time without notice. Customers should obtain and confirm the latest product information and specifications before final design purchase or use.

ALL INFORMATION ARE PROVIDED AS-IS, EVEN IT HAS QUALIFIED BY THE AEC-Q101 WHICH SATISFY INDUSTRIAL APPLICATION REQUIREMENT, EXCEPT AS EXPRESSLY STATED IN THIS DATA SHEET IS APPLIED FOR AUTOMOTIVE GRADE, LSC MAKE NO WARRANTIES, REPRESENTATION OR GUARANTEE, WHETHER EXPRESS, IMPLIED OR STATUTORY, INCLUDING, WITHOUT LIMITATION, REGARDING ANY MERCHANTABILITY, SATISFACTORY QUALITY, OR FITNESS FOR A PARTICULAR PURPOSE WITH RESPECT TO THE LSC TECHNOLOGY.

LSC DOES NOT ASSUME ANY LIABILITY OR COMPENSATION FOR ANY APPLICATION ASSISTANCE OR CUSTOMER PRODUCT DESIGN, AND MAKE NO WARRANTY OR ACCEPT ANY LIABILITY WITH PRODUCTS, WHICH ARE PURCHASED OR USED FOR ANY UNINTENDED OR UNAUTHORIZED APPLICATION.

No license is granted by implication or otherwise under any intellectual property rights of LSC.

LSC products are not authorized for use as critical components in life support devices or systems without express written approval of LSC.