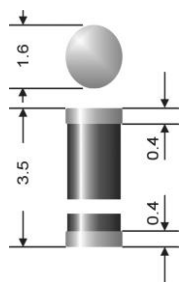


GLA 1A ... GLA 1M



Surface mount diode

Standard Avalanche Diodes

GLA 1A ... GLA 1M

Forward Current: 1 A

Reverse Voltage: 50 to 1000 V

Features

- Max. solder temperature: 260°C
- Plastic material has UL classification 94V-0
- white ring denotes "cathode" and "Standard Avalanche family"
- colored ring denotes "repetitive peak reverse voltage"

Mechanical Data

- Plastic case: MiniMelf / SOD-80 / DO-213AA
- Weight approx.: 0,04 g
- Terminals: plated terminals solderable per MIL-STD-750
- Mounting position: any
- Standard packaging: 10000, 2500 pieces per reel

- 1) Max. temperature of the terminals $T_T = 75$ °C
- 2) $I_F = 1$ A, $T_J = 25$ °C
- 3) $T_A = 25$ °C
- 4) Mounted on P.C. board with 25 mm² copper pads at each terminal

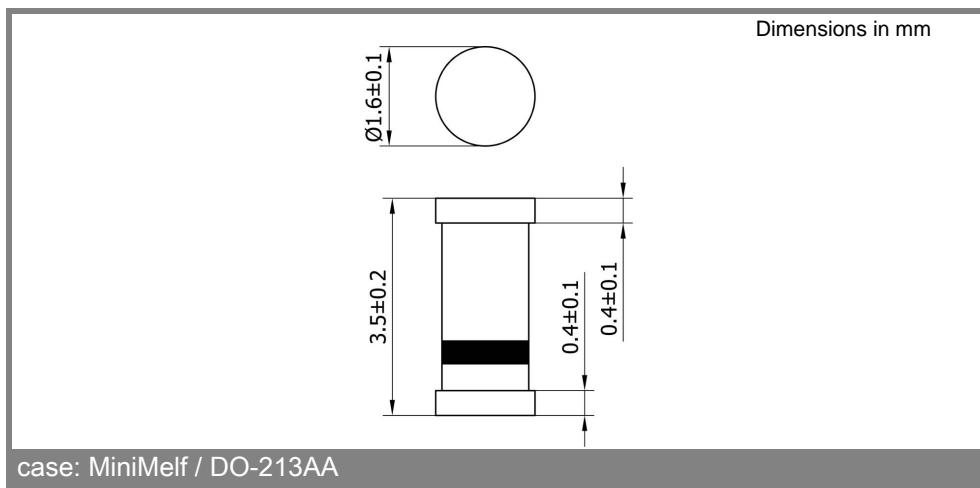
Type	Polarity color band	Repetitive peak reverse voltage V_{RRM} V	Surge peak reverse voltage V_{RSM} V	Maximum forward voltage $T_j = 25$ °C $I_F = 1$ A $V_F^{(2)}$ V	Maximum reverse recovery time $I_F = -A$ $I_R = -A$ $I_{RR} = -A$ t_{rr} ns
GLA 1A	gray	50	50	1,2	-
GLA 1B	red	100	100	1,2	-
GLA 1D	orange	200	200	1,2	-
GLA 1G	yellow	400	400	1,2	-
GLA 1J	green	600	600	1,2	-
GLA 1K	blue	800	800	1,2	-
GLA 1M	violet	1000	1000	1,2	-

Absolute Maximum Ratings $T_A = 25$ °C, unless otherwise specified

Symbol	Conditions	Values	Units
I_{FAV}	Max. averaged fwd. current, R-load, $T_T = 75$ °C ¹⁾	1	A
I_{FRM}	Repetitive peak forward current $f > \text{Hz}$	-	A
I_{FSM}	Peak fwd. surge current 50 Hz half sinus-wave ³⁾	25	A
I^2t	Rating for fusing, $t < 10$ ms ³⁾	3,1	A ² s
R_{thA}	Max. thermal resistance junction to ambient ⁴⁾	150	K/W
R_{thT}	Max. thermal resistance junction to terminals	60	K/W
T_j	Operating junction temperature	- 50 ... + 175	°C
T_s	Storage temperature	- 50 ... + 175	°C

Characteristics $T_A = 25$ °C, unless otherwise specified

Symbol	Conditions	Values	Units
I_R	Maximum leakage current, $T_j = 25$ °C; $V_R = V_{RRM}$ $T_j = \text{°C}$; $V_R = V_{RRM}$	<1	µA
C_j	Typical junction capacitance (at MHz and applied reverse voltage of V)	-	pF
Q_{rr}	Reverse recovery charge ($U_R = V$; $I_F = A$; $dI_F/dt = A/ms$)	-	µC
E_{RSM}	Non repetitive peak reverse avalanche energy ($I_R = 1$ mA; $T_j = 25$ °C; inductive load switched off)	20	mJ



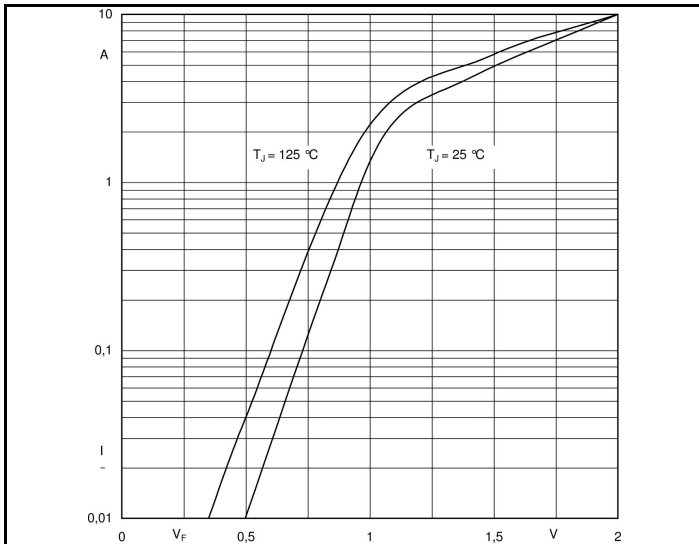


Fig. 1 Forward characteristics (typical values)

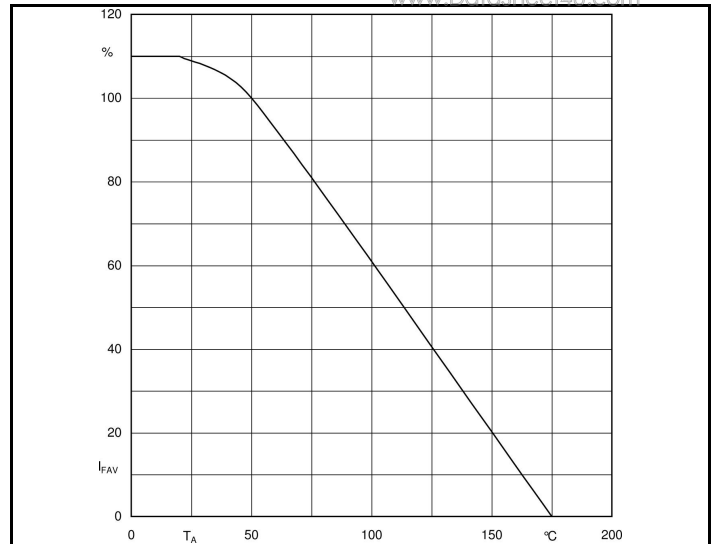


Fig. 2 Rated forward current vs. temp. of the terminals⁴⁾