

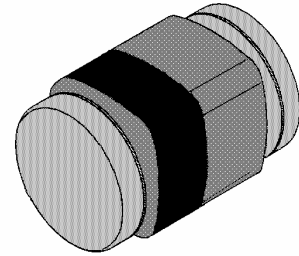
MCL245

SILICON EPITAXIAL PLANAR DIODE

LS-31

Features

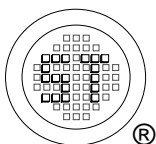
- Fast switching diode
- Fits onto SOD 323 / SOT 23 footprints
- Micro Melf package



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

	Symbol	Value	Unit
Reverse Voltage	V_R	220	V
Peak Reverse Voltage	V_{RM}	250	V
Mean Rectified Current Half Wave Rectification with Resistance load at $T_{amb} = 25^\circ\text{C}$ and $f/50\text{ Hz}$	I_O	200	mA
Maximum Forward Current	I_{FM}	625	mA
Surge Forward Current at $t < 1\text{s}$ and $T_j = 25^\circ\text{C}$	I_{FSM}	1000	mA
Junction Temperature	T_j	175	$^\circ\text{C}$
Storage Temperature Range	T_S	-65 to +175	$^\circ\text{C}$

¹⁾ Valid provided that electrodes are kept at ambient temperature



SEMTECH ELECTRONICS LTD.

(Subsidiary of Sino-Tech International Holdings Limited, a company
listed on the Hong Kong Stock Exchange, Stock Code: 724)



ISO/TS 16949 : 2002
Certificate No. 05103



ISO 14001:2004
Certificate No. 71116



ISO 9001:2000
Certificate No. 0506098

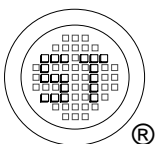
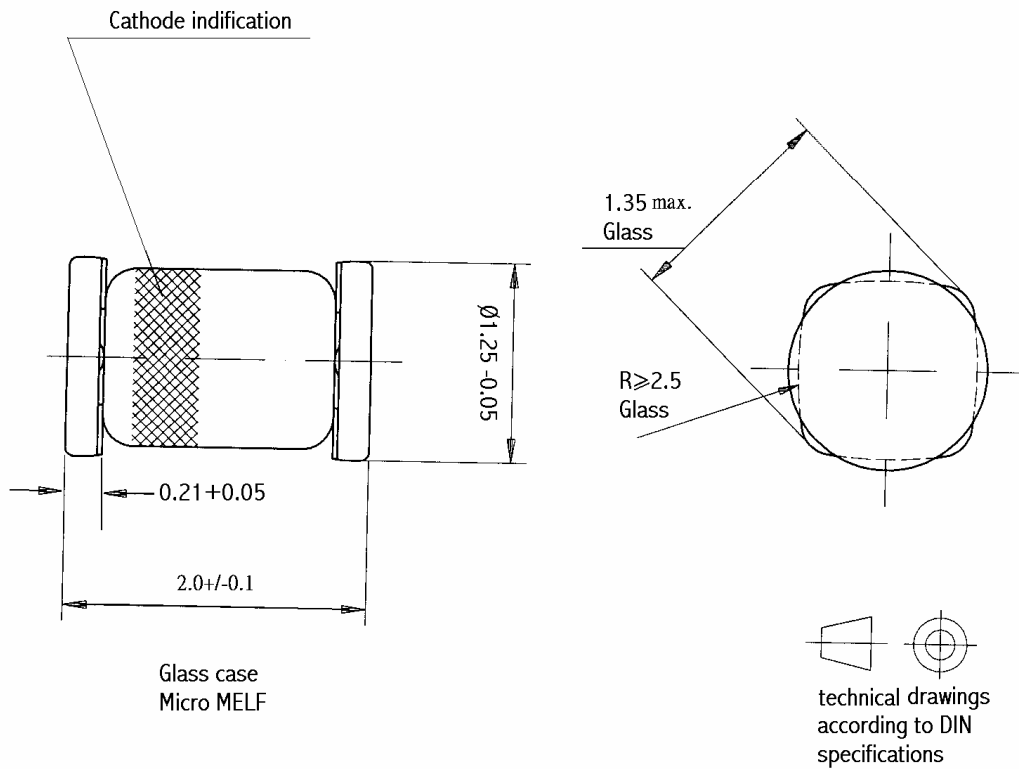
Dated : 20/08/2002

MCL245

Characteristics at $T_j = 25^\circ\text{C}$

	Symbol	Min.	Typ.	Max.	Unit
Forward Voltage at $I_F = 200\text{mA}$	V_F	-	-	1.5	V
Leakage Current at $V_R = 220\text{V}$	I_R	-	-	10	μA
Reverse Breakdown Voltage tested with 100uA Pulses	V_{BR}	250	-	-	V
Capacitance at $V_F = V_R = 0, f = 1\text{MHz}$	C_{tot}	-	-	3	pF
Reverse Recovery Time From $I_F = I_R = 20\text{mA}$	t_{rr}	-	-	75	ns

Dimensions in mm



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