

RoHS Compliant Product

A suffix of "-C" specifies halogen & lead-free

Application

Ultra high speed switching

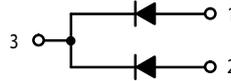
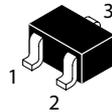
Features

Four types of packaging are available.

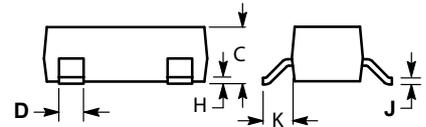
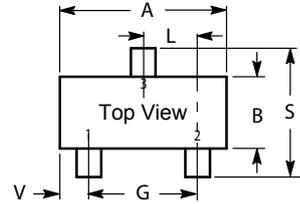
High speed. ($t_r=1.5ns$ Typ.)

Suitable for high packing density layout.

High reliability.



Marking code: MU or A3



Construction

Silicon epitaxial planar

MAXIMUM RATINGS (EACH DIODE)

Rating	Symbol	Value	Unit
Peak reverse voltage	V_{RM}	80	V
DC reverse voltage	V_R	80	V
Peak forward current	I_{FM}	300	mA
Mean rectifying current	I_o	100	mA
Surge current 1uS	I_{surge}	4	A
Power dissipation (TOTAL)	P_d	200	mW
Junction temperature	T_j	150	°C
Storage temperature	T_{stg}	-55~+155	°C

SOT-323(SC-70)		
Dim	Min	Max
A	1.800	2.200
B	1.150	1.350
C	0.800	1.000
D	0.300	0.400
G	1.200	1.400
H	0.000	0.100
J	0.100	0.250
K	0.350	0.500
L	0.590	0.720
S	2.000	2.400
V	0.280	0.420
All Dimension in mm		

ELECTRICAL CHARACTERISTICS (TA=25 unless otherwise noted) (EACH DIODE)

Characteristic	Symbol	Min	Max	Unit
Forward voltage ($I_F = 100mA$)	V_F	—	1.2	V
Reverse current ($V_R = 70V$)	I_R	—	0.1	uA
Capacitance between terminals ($V=6V, f=1MHz$)	C_T	—	3.5	pF
Reverse recovery time ($I_F=5mA, V_R=6V$)	t_{rr}	—	4	nS

1. FR-5 = 1.0 X 0.75 X 0.062 in. 2.Alumina = 0.4 X 0.3 X 0.024 in. 99.5% alumina.

Electrical characteristic curves (Ta=25°C)

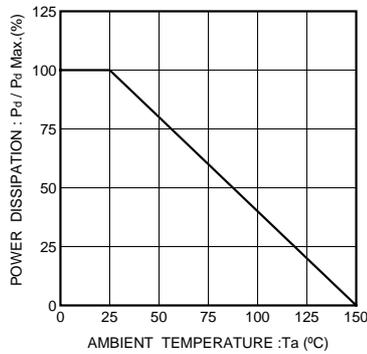


Fig.1 Power attenuation curve

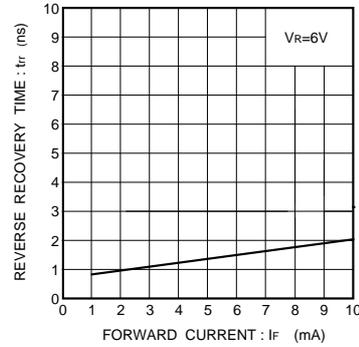


Fig.2 Reverse recovery time

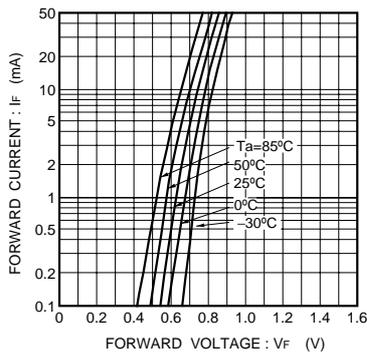


Fig.3 Forward characteristics

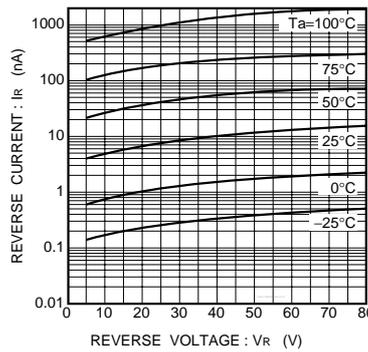


Fig.4 Reverse characteristics

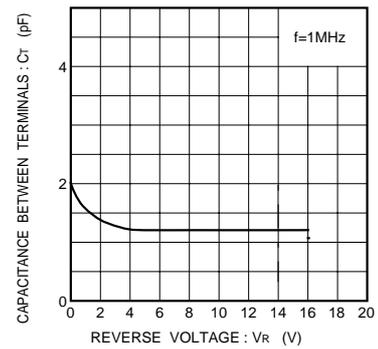


Fig.5 Capacitance between terminals characteristics

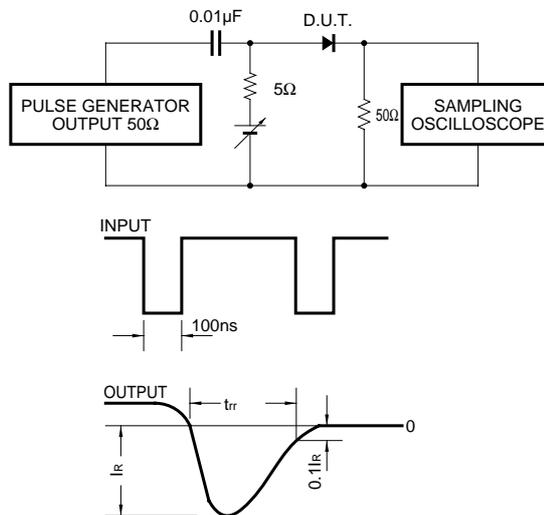


Fig.6 Reverse recovery time (t_{rr}) measurement circuit