

TOSHIBA DIODE SILICON EPITAXIAL SCHOTTKY BARRIER TYPE

# 1SS393

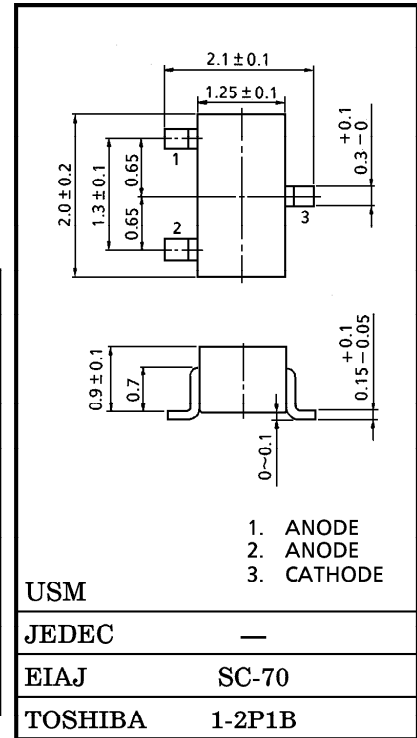
LOW VOLTAGE HIGH SPEED SWITCHING

Unit in mm

- Low Forward Voltage :  $V_F(3) = 0.54V$  (TYP.)
- Low Reverse Current :  $I_R = 5\mu A$  (MAX.)
- Small Package : SC-70

MAXIMUM RATINGS ( $T_a = 25^\circ C$ )

CHARACTERISTIC	SYMBOL	RATING	UNIT
Maximum (Peak) Reverse Voltage	$V_{RM}$	45	V
Reverse Voltage	$V_R$	40	V
Maximum (Peak) Forward Current	$I_{FM}$	300*	mA
Average Forward Current	$I_O$	100*	mA
Surge Current (10ms)	$I_{FSM}$	1*	A
Power Dissipation	P	100	mW
Junction Temperature	$T_j$	125	$^\circ C$
Storage Temperature Range	$T_{stg}$	-55~125	$^\circ C$
Operating Temperature Range	$T_{opr}$	-40~100	$^\circ C$



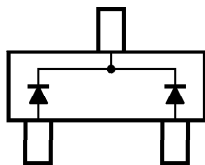
\* : Unit Rating. Total Rating = Unit Rating  $\times$  1.5

Weight : 0.006g

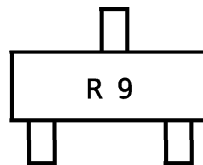
ELECTRICAL CHARACTERISTICS ( $T_a = 25^\circ C$ )

CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Forward Voltage	$V_F(1)$	$I_F = 1mA$	—	0.28	—	V
	$V_F(2)$	$I_F = 10mA$	—	0.36	—	
	$V_F(3)$	$I_F = 100mA$	—	0.54	0.60	
Reverse Current	$I_R$	$V_R = 40V$	—	—	5	$\mu A$
Total Capacitance	$C_T$	$V_R = 0, f = 1MHz$	—	18	25	pF

EQUIVALENT CIRCUIT (TOP VIEW)



MARKING



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