

CMSD2836
CMSD2838

SURFACE MOUNT
SUPERmini™
DUAL SILICON
SWITCHING DIODES

SUPERmini™



SOT-323 CASE

Central™
Semiconductor Corp.

DESCRIPTION:

The CENTRAL SEMICONDUCTOR CMSD2836 and CMSD2838 types are ultra-high speed silicon switching diodes manufactured by the epitaxial planar process, in an epoxy molded SUPERmini™ surface mount package, designed for high speed switching applications.

The following configurations are available:

CMSD2836 DUAL, COMMON ANODE
CMSD2838 DUAL, COMMON CATHODE

MARKING CODE: A2C
MARKING CODE: A6C

MAXIMUM RATINGS: ($T_A=25^\circ\text{C}$)

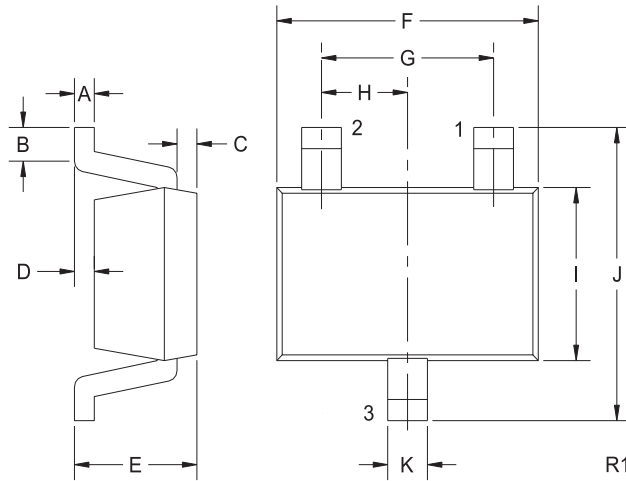
	SYMBOL		UNITS
Peak Repetitive Reverse Voltage	V_{RRM}	75	V
Average Forward Current	I_O	200	mA
Peak Forward Current	I_{FM}	300	mA
Power Dissipation	P_D	250	mW
Operating and Storage Junction Temperature	T_J, T_{stg}	-65 to +150	$^\circ\text{C}$
Thermal Resistance	θ_{JA}	500	$^\circ\text{C}/\text{W}$

ELECTRICAL CHARACTERISTICS PER DIODE: ($T_A=25^\circ\text{C}$ unless otherwise noted)

SYMBOL	TEST CONDITIONS	MIN	TYP	MAX	UNITS
B_{VR}	$I_R=100\mu\text{A}$	75			V
I_R	$V_R=50\text{V}$			100	nA
V_F	$I_F=10\text{mA}$			1.0	V
V_F	$I_F=50\text{mA}$			1.0	V
V_F	$I_F=100\text{mA}$			1.2	V
C_T	$V_R=0, f=1\text{ MHz}$		1.5	4.0	pF
t_{rr}	$I_R=I_F=10\text{mA}, R_L=100\Omega, \text{Rec. to } 1.0\text{mA}$			4.0	ns

R2 (14-November 2002)

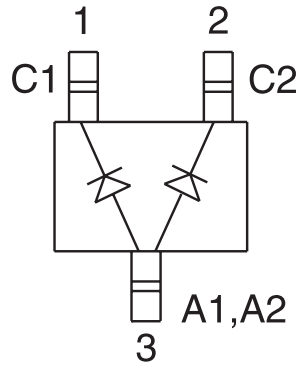
SOT-323 CASE - MECHANICAL OUTLINE



SYMBOL	DIMENSIONS			
	INCHES		MILLIMETERS	
	MIN	MAX	MIN	MAX
A	0.004	0.008	0.10	0.20
B	0.004	-	0.10	-
C	0.004	0.008	0.10	0.20
D	-	0.004	-	0.10
E	0.031	0.043	0.80	1.10
F	0.071	0.087	1.80	2.20
G	0.051		1.30	
H	0.026		0.65	
I	0.045	0.053	1.15	1.35
J	0.079	0.087	2.00	2.20
K	0.008	0.016	0.20	0.40

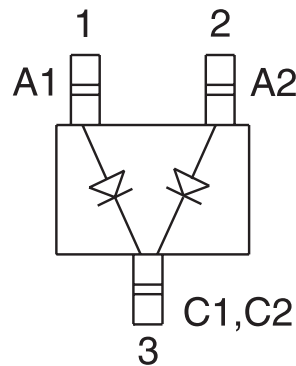
SOT-323 (REV: R1)

Bottom View



**CMSD2836
MARKING CODE: A2C**

Bottom View



**CMSD2838
MARKING CODE: A6C**