

CMSD6001 CMSD6001A CMSD6001C **CMSD6001S**

SURFACE MOUNT LOW LEAKAGE SWITCHING DIODES



• Device is *Halogen Free* by design

CMSD6001: **SINGLE** CMSD6001A: DUAL, COMMON ANODE

CMSD6001C: DUAL, COMMON CATHODE

CMSD6001S: DUAL, IN-SERIES

Semiconductor Corp.

DESCRIPTION:

The CENTRAL SEMICONDUCTOR CMSD6001 SERIES are silicon switching diodes manufactured by the epitaxial planar process, epoxy molded in a SUPERmini™ surface mount package, designed for switching applications requiring an extremely low leakage diode.

MARKING CODE: 6C1 MARKING CODE: 61A MARKING CODE: 61C MARKING CODE: 61S

MAXIMUM RATINGS: (T _A =25°C)	SYMBOL		UNITS
Continuous Reverse Voltage	v_R	75	V
Peak Repetitive Reverse Voltage	V_{RRM}	100	V
Continuous Forward Current	lF	250	mA
Peak Repetitive Forward Current	I _{FRM}	250	mA
Forward Surge Current, tp=1.0µs	I _{FSM}	4.0	Α
Forward Surge Current, tp=1.0s	I _{FSM}	1.0	Α
Power Dissipation	P_{D}	275	mW
Operating and Storage Junction Temperature	T _J , T _{stg}	-65 to +150	°C
Thermal Resistance	$\Theta_{\sf JA}$	455	°C/W

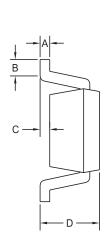
ELECTRICAL CHARACTERISTICS PER DIODE: (T _A =25°C unless otherwise noted)						
SYMBOL	TEST CONDITIONS	MIN	MAX	UNITS		
I_{R}	V _R =75V		500	pA		
BV_R	I _R =100μA	100		V		
V_{F}	I _F =1.0mA		0.85	V		
V_{F}	I _F =10mA		0.95	V		
V_{F}	I _F =100mA		1.1	V		
C_T	V _R =0, f=1.0MHz		2.0	pF		
t _{rr}	$I_R = I_F = 10$ mA, $R_L = 100\Omega$, Rec. to 1.0mA		3.0	μs		

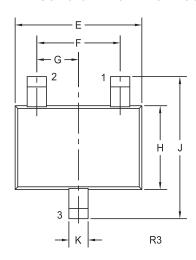


CMSD6001 CMSD6001A CMSD6001C **CMSD6001S**

SURFACE MOUNT LOW LEAKAGE SWITCHING DIODES

SOT-323 - MECHANICAL OUTLINE



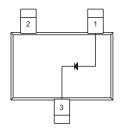


DIMENSIONS							
	INCHES		MILLIMETERS				
SYMBOL	MIN	MAX	MIN	MAX			
Α	0.002	0.008	0.05	0.20			
В	0.004	-	0.10	-			
С	-	0.004	-	0.10			
D	0.031	0.043	0.80	1.10			
Е	0.071	0.087	1.80	2.20			
F	0.051		1.30				
G	0.026		0.65				
Н	0.045	0.053	1.15	1.35			
J	0.079	0.087	2.00	2.20			
K	0.008	0.016	0.20	0.40			

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SOT-323 (REV: R3)

PIN CONFIGURATIONS

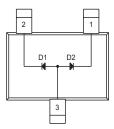


CMSD6001

LEAD CODE:

- 1) ANODE
- 2) NC
- 3) CATHODE

MARKING CODE: 6C1



CMSD6001A

LEAD CODE:

- 1) CATHODE D2
- 2) CATHODE D1
- 3) ANODE D1, D2
- **MARKING CODE: 61A**

2 D2 3

CMSD6001C

LEAD CODE:

- 1) ANODE D2
- 2) ANODE D1
- 3) CATHODE D1, D2

MARKING CODE: 61C

CMSD6001S LEAD CODE:

D1

3

- 1) ANODE D2
- 2) CATHODE D1
- 3) ANODE D1, CATHODE D2

MARKING CODE: 61S

R1 (22-July 2009)