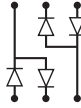


CMKD6000

**SURFACE MOUNT  
DUAL PAIR, IN SERIES  
ULTRA LOW LEAKAGE  
SILICON SWITCHING DIODES**

ULTRAmimi™



**SOT-363 CASE**

**Central**  
Semiconductor Corp.

[www.centrasemi.com](http://www.centrasemi.com)

**DESCRIPTION:**

The CENTRAL SEMICONDUCTOR CMKD6000 consists of two pair of electrically isolated, series configured Ultra Low Leakage Switching Diodes manufactured by the epitaxial planar process, epoxy molded in a ULTRAmimi™ SOT-363 surface mount package.

**MARKING CODE: CK0**

**APPLICATIONS:**

- Handheld Medical Devices
- Battery Operated Equipment
- High Speed Data Line Steering

**FEATURES:**

- Low Total Conduction Losses

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

Continuous Reverse Voltage  
Peak Repetitive Reverse Voltage  
Continuous Forward Current  
Peak Repetitive Forward Current  
Peak Forward Surge Current,  $t_p=1.0\mu\text{s}$   
Peak Forward Surge Current,  $t_p=1.0\text{s}$   
Power Dissipation  
Operating and Storage Junction Temperature  
Thermal Resistance

**SYMBOL**

$V_R$  75  
 $V_{RRM}$  100  
 $I_F$  250  
 $I_{FRM}$  500  
 $I_{FSM}$  4.0  
 $I_{FSM}$  1.0  
 $P_D$  250  
 $T_J, T_{stg}$  -65 to +150  
 $\theta_{JA}$  500

**UNITS**

V  
V  
mA  
mA  
A  
A  
mW  
 $^\circ\text{C}$   
 $^\circ\text{C/W}$

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

SYMBOL	TEST CONDITIONS	MIN	TYP	MAX	UNITS
$I_R$	$V_R=75\text{V}$		400	500	pA
$I_R$	$V_R=5.0, T_A=50^\circ\text{C}$		10	100	pA
$BV_R$	$I_R=100\mu\text{A}$	100	120		V
$V_F$	$I_F=1.0\text{mA}$		0.77	0.85	V
$V_F$	$I_F=10\text{mA}$		0.85	0.95	V
$V_F$	$I_F=100\text{mA}$		0.96	1.1	V
$C_T$	$V_R=0, f=1.0\text{MHz}$		1.7	2.0	pF
$t_{rr}$	$I_R=I_F=10\text{mA}, I_{rr}=1.0\text{mA}, R_L=100\Omega$			3.0	$\mu\text{s}$

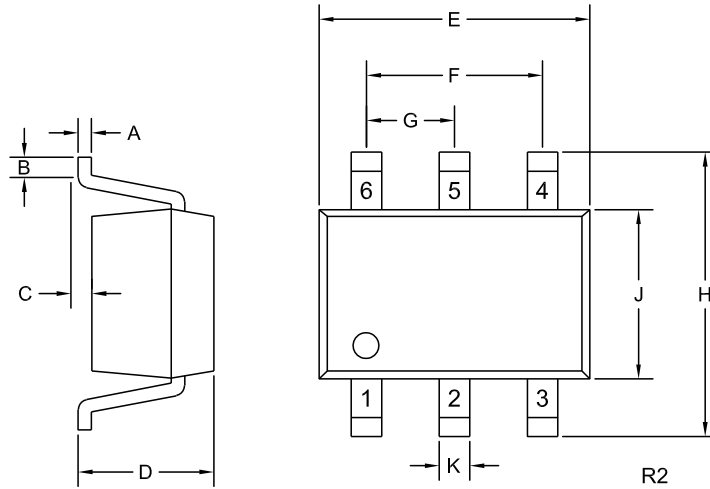
R1 (9-May 2011)

CMKD6000

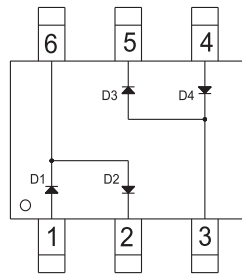
SURFACE MOUNT  
DUAL PAIR, IN SERIES  
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SILICON SWITCHING DIODES



SOT-363 CASE - MECHANICAL OUTLINE



PIN CONFIGURATION



SYMBOL	INCHES		MILLIMETERS	
	MIN	MAX	MIN	MAX
A	0.004	0.010	0.10	0.25
B	0.005	-	0.12	-
C	0.000	0.004	0.00	0.10
D	0.031	0.043	0.80	1.10
E	0.071	0.087	1.80	2.20
F	0.051		1.30	
G	0.026		0.65	
H	0.075	0.091	1.90	2.30
J	0.043	0.055	1.10	1.40
K	0.006	0.012	0.15	0.30

SOT-363 (REV: R2)

LEAD CODE:

- 1) Anode D1
- 2) Cathode D2
- 3) Anode D3, Cathode D4
- 4) Anode D4
- 5) Cathode D3
- 6) Cathode D1, Anode D2

MARKING CODE: CK0

R1 (9-May 2011)