



CMLSH2-4LA CMLSH2-4LS
CMLSH2-4LC CMLSH2-4LSB

**SURFACE MOUNT
DUAL PAIR, LOW V_F
SILICON SCHOTTKY DIODES**

PICOmini™



SOT-563 CASE

Central™

Semiconductor Corp.

DESCRIPTION:

The CENTRAL SEMICONDUCTOR CMLSH2-4L Series consists of Dual pairs of Common Anode, Common Cathode, and In-Series Low V_F Schottky Diodes, manufactured in a PICOmini™ SOT-563 surface mount package.

- Devices are **Halogen Free** by design

DEVICE CONFIGURATIONS:

CMLSH2-4LA	DUAL PAIR, COMMON ANODE	MARKING CODE: 4AL
CMLSH2-4LC	DUAL PAIR, COMMON CATHODE	MARKING CODE: 4CL
CMLSH2-4LS	DUAL PAIR, IN SERIES	MARKING CODE: 4SL
CMLSH2-4LSB	DUAL PAIR, IN SERIES	MARKING CODE: 4SB

MAXIMUM RATINGS: (T_A=25°C)

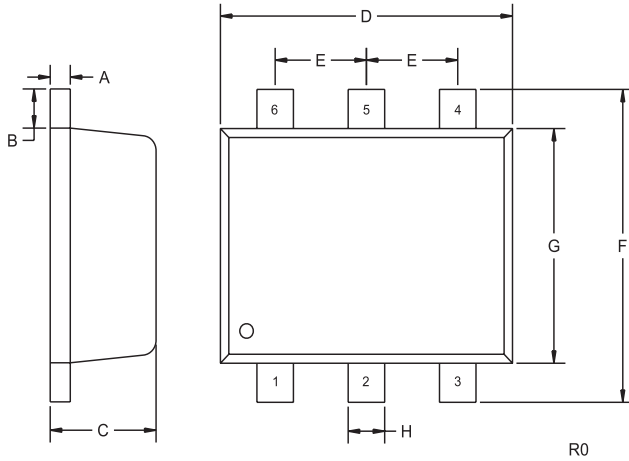
	SYMBOL		UNITS
Peak Repetitive Reverse Voltage	V _R RM	40	V
Continuous Forward Current	I _F	200	mA
Peak Repetitive Forward Current	I _{FRM}	300	mA
Forward Surge Current, tp=10ms	I _{FSM}	600	mA
Power Dissipation (Note 1)	P _D	350	mW
Power Dissipation (Note 2)	P _D	300	mW
Power Dissipation (Note 3)	P _D	150	mW
Operating and Storage Junction Temperature	T _J , T _{stg}	-65 to +150	°C
Thermal Resistance (Note 1)	θ _{JA}	357	°C/W

ELECTRICAL CHARACTERISTICS PER DIODE: (T_A=25°C unless otherwise noted)

SYMBOL	TEST CONDITIONS	MIN	TYP	MAX	UNIT
I _R	V _R =30V		100	200	nA
BV _R	I _R =100µA	40	55		V
V _F	I _F =100µA		0.24	0.26	V
V _F	I _F =500µA		0.29	0.31	V
V _F	I _F =1.0mA		0.31	0.33	V
V _F	I _F =50mA		0.54	0.60	V
V _F	I _F =100mA		0.67	0.75	V
C _T	V _R =1.0V, f=1.0MHz			10	pF
t _{rr}	I _F =I _R =10mA, I _{rr} =1.0mA, R _L =100Ω			5.0	ns

- Notes: (1) Ceramic or aluminum core PC Board with copper mounting pad area of 4.0 mm²
 (2) FR-4 Epoxy PC Board with copper mounting pad area of 4.0 mm²
 (3) FR-4 Epoxy PC Board with copper mounting pad area of 1.4 mm²

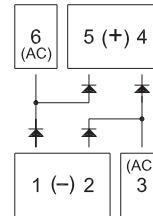
SOT-563 CASE - MECHANICAL OUTLINE



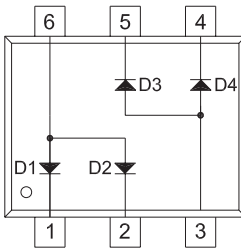
SYMBOL	DIMENSIONS			
	INCHES		MILLIMETERS	
	MIN	MAX	MIN	MAX
A	0.004	0.007	0.10	0.18
B	0.008		0.20	
C	0.022	0.024	0.56	0.60
D	0.059	0.067	1.50	1.70
E	0.020		0.50	
F	0.061	0.067	1.55	1.70
G	0.047		1.20	
H	0.006	0.012	0.15	0.30

SOT-563 (REV: R0)

SUGGESTED MOUNTING PAD CONFIGURATION
(FOR CMLSH2-4LSB BRIDGE RECTIFIER)



PIN CONFIGURATIONS

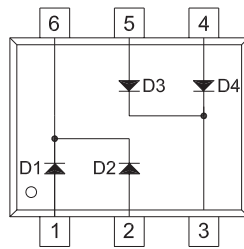


CMLSH2-4LA

LEAD CODE:

- 1) CATHODE D1
- 2) CATHODE D2
- 3) ANODE D3, D4
- 4) CATHODE D4
- 5) CATHODE D3
- 6) ANODE D1, D2

MARKING CODE: 4AL

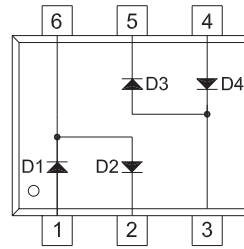


CMLSH2-4LC

LEAD CODE:

- 1) ANODE D1
- 2) ANODE D2
- 3) CATHODE D3, D4
- 4) ANODE D4
- 5) ANODE D3
- 6) CATHODE D1, D2

MARKING CODE: 4CL

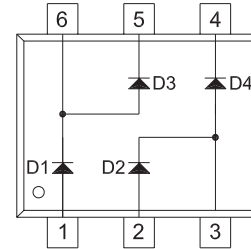


CMLSH2-4LS

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: 4SL



CMLSH2-4LSB

LEAD CODE:

- 1) ANODE D1
- 2) ANODE D2
- 3) CATHODE D2, ANODE D4
- 4) CATHODE D4
- 5) CATHODE D3
- 6) CATHODE D1, ANODE D3

MARKING CODE: 4SB

