

CMHD3595

SURFACE MOUNT  
LOW LEAKAGE  
SILICON DIODE



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

**DESCRIPTION:**

The CENTRAL SEMICONDUCTOR CMHD3595 is a Silicon Diode, manufactured by the epitaxial planar process, epoxy molded in a surface mount package, designed for high conductance applications requiring low leakage.



SOD-123 CASE

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

	<b>SYMBOL</b>	<b>UNITS</b>
Peak Repetitive Reverse Voltage	$V_{RRM}$	V
Peak Working Reverse Voltage	$V_{RWM}$	V
Average Forward Current	$I_O$	mA
Continuous Forward Current	$I_F$	mA
Recurrent Peak Forward Current	$i_f$	mA
Peak Forward Surge Current, $t_p=1.0\text{s}$	$I_{FSM}$	mA
Peak Forward Surge Current, $t_p=1.0\mu\text{s}$	$I_{FSM}$	A
Power Dissipation	$P_D$	mW
Operating and Storage Junction Temperature	$T_J, T_{stg}$	${}^\circ\text{C}$
Thermal Resistance	$\Theta_{JA}$	${}^\circ\text{C}/\text{W}$

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

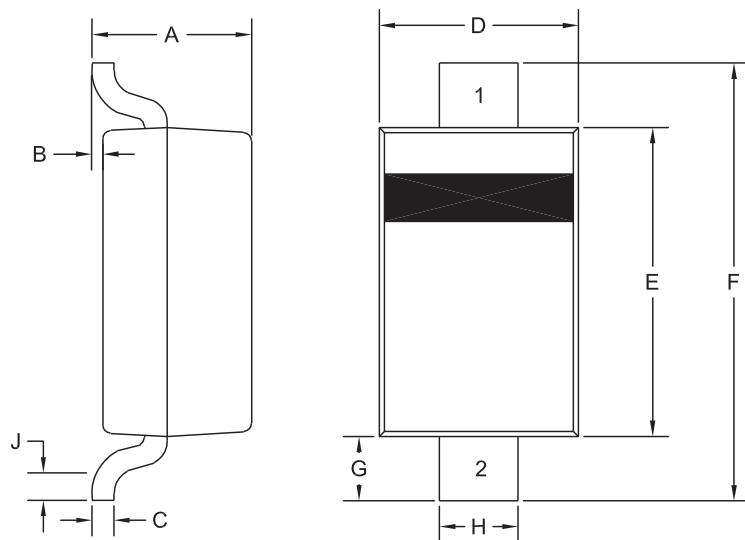
<b>SYMBOL</b>	<b>TEST CONDITIONS</b>	<b>MIN</b>	<b>MAX</b>	<b>UNITS</b>
$I_R$	$V_R=125\text{V}$		1.0	nA
$I_R$	$V_R=125\text{V}, T_A=125^\circ\text{C}$		500	nA
$I_R$	$V_R=125\text{V}, T_A=150^\circ\text{C}$		3.0	$\mu\text{A}$
$I_R$	$V_R=30\text{V}, T_A=125^\circ\text{C}$		300	nA
$BV_R$	$I_R=100\mu\text{A}$	150		V
$V_F$	$I_F=1.0\text{mA}$	0.54	0.69	V
$V_F$	$I_F=5.0\text{mA}$	0.62	0.77	V
$V_F$	$I_F=10\text{mA}$	0.65	0.80	V
$V_F$	$I_F=50\text{mA}$	0.75	0.88	V
$V_F$	$I_F=100\text{mA}$	0.79	0.92	V
$V_F$	$I_F=200\text{mA}$	0.83	1.00	V
$C_T$	$V_R=0, f=1.0\text{MHz}$		8.0	pF
$t_{rr}$	$V_R=3.5\text{V}, I_F=10\text{mA}, R_L=1.0\text{k}\Omega$		3.0	$\mu\text{s}$

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SOD-123 CASE - MECHANICAL OUTLINE



R5

LEAD CODE

- 1) Cathode
- 2) Anode

MARKING CODE: C95

DIMENSIONS				
SYMBOL	INCHES		MILLIMETERS	
	MIN	MAX	MIN	MAX
A	0.037	0.053	0.95	1.35
B	0.000	0.005	0.00	0.12
C	-	0.008	-	0.20
D	0.055	0.071	1.40	1.80
E	0.098	0.110	2.50	2.80
F	0.142	0.154	3.60	3.90
G	0.016	-	0.40	-
H	0.020	0.028	0.50	0.70
J	0.010	-	0.25	-

SOD-123 (REV:R5)

R5 (5-August 2010)