

SOD-323 SURFACE MOUNT
Small Outline Gull Wing Lead Plastic Package
Schottky Barrier Diode

Green Product

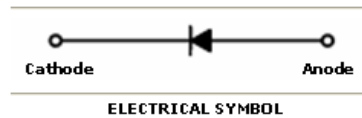
Absolute Maximum Ratings $T_A = 25^\circ\text{C}$ unless otherwise noted

Symbol	Parameter	Value	Units
P_D	Power Dissipation	250	mW
T_{STG}	Storage Temperature Range	-55 to +125	$^\circ\text{C}$
T_J	Junction Temperature	+125	$^\circ\text{C}$
V_{RM}	Repetitive Peak Reverse Voltage	40	V
I_O	Average Rectified Output Current	1	A
I_{FSM}	Peak Forward Surge Current (t=8.3ms Single Half Sine-wave)	9	A
I_{FRM}	Repetitive Peak Forward Current	1.5	A

These ratings are limiting values above which the serviceability of the diode may be impaired.



SOD-323 Gull Wing Lead



Specification Features:

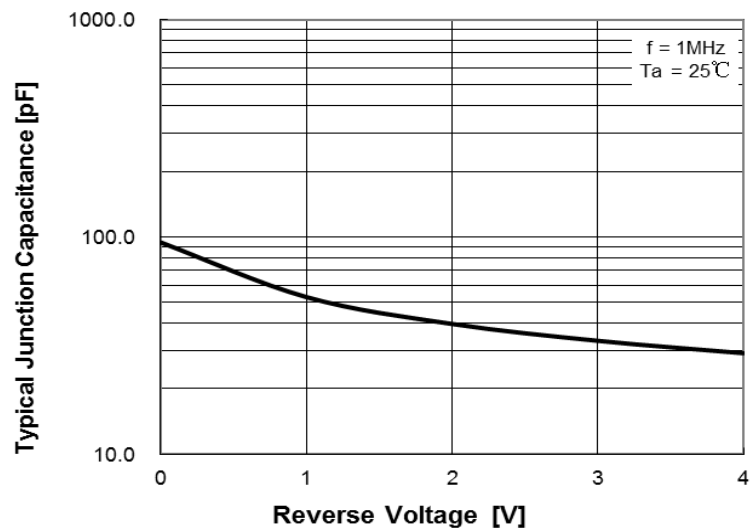
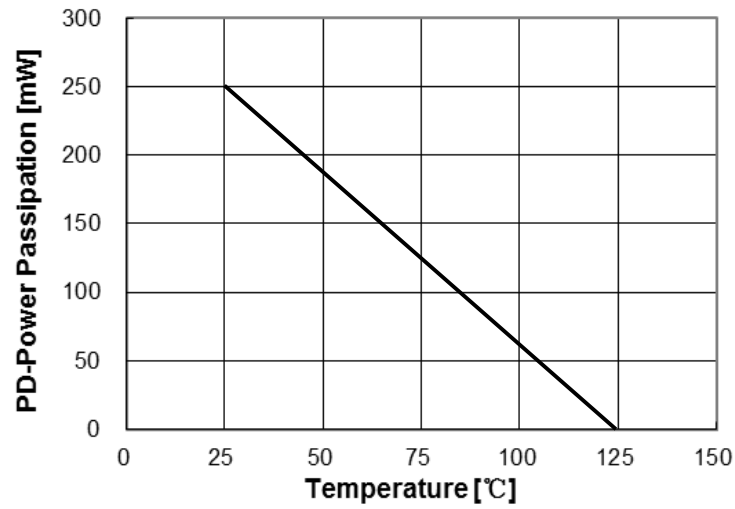
- Low Forward Voltage Drop
- Gull Wing Lead SOD-323 Small Outline Plastic Package
- Surface Device Type Mounting
- RoHS Compliant
- Green EMC
- Matte Tin(Sn) Lead Finish
- Band Indicates Cathode

DEVICE MARKING CODES:

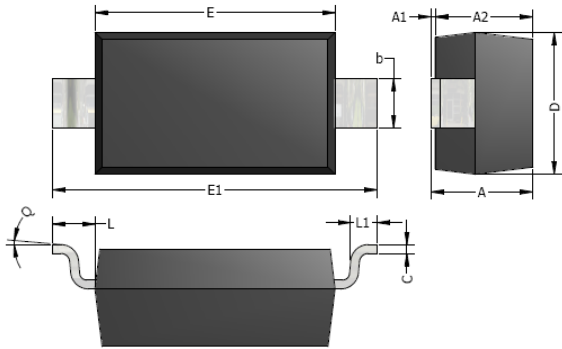
Device Type	Device Marking
B5819WSG	SL

Electrical Characteristics $T_A = 25^\circ\text{C}$ unless otherwise noted

Symbol	Parameter	Test Condition	Limits			Unit
			Min	Typ	Max	
V_{BR}	Reverse Breakdown Voltage	$I_R=1\text{mA}$	40	--	--	Volts
I_R	Reverse Leakage Current	$V_R=40\text{V}$	--	--	1	mA
V_F	Forward Voltage	$I_F=1\text{A}$	--	--	0.60	Volts
C_d	Diode Capacitance	$V_R=4\text{V}, f=1\text{MHz}$	--	30	--	pF

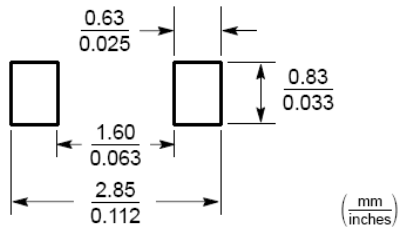
RATING AND CHARACTERISTIC CURVES


SOD-323 Gull Wing Lead Package Outline



DIM	MILLIMETERS		INCHES	
	MIN	MAX	MIN	MAX
A	0.80	1.00	0.031	0.039
A1	0.00	0.10	0.000	0.004
A2	0.80	0.90	0.031	0.035
b	0.30	0.40	0.012	0.016
c	0.08	0.15	0.003	0.006
D	1.20	1.40	0.047	0.055
E	1.60	1.80	0.063	0.071
E1	2.50	2.70	0.098	0.106
L	0.475 REF.		0.019 REF.	
L1	0.25	0.40	0.010	0.016
θ	0°	8°	0°	8°

Typical Soldering Pattern:



Note:
Dimensions are exclusive of Burrs, Mold Flash & Tie Bar extrusions.

NOTICE

The information presented in this document is for reference only. Tak Cheong reserves the right to make changes without notice for the specification of the products displayed herein.

The product listed herein is designed to be used with ordinary electronic equipment or devices, and not designed to be used with equipment or devices which require high level of reliability and the malfunction of which would directly endanger human life (such as medical instruments, transportation equipment, aerospace machinery, nuclear-reactor controllers, fuel controllers and other safety devices), Tak Cheong Semiconductor Co., Ltd., or anyone on its behalf, assumes no responsibility or liability for any damages resulting from such improper use of sale.

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