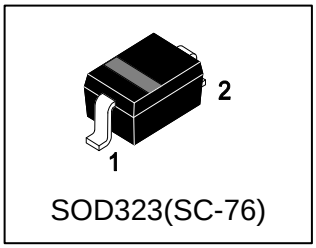
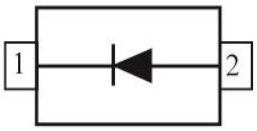
LBAS16HT1G
S-LBAS16HT1G

Switching Diode



SOD323(SC-76)



1. FEATURES

- We declare that the material of product compliance with RoHS requirements and Halogen Free.
- S- prefix for automotive and other applications requiring unique site and control change requirements; AEC-Q101 qualified and PPAP capable.
- Small plastic SMD package
- Continuous reverse voltage: max. 75 V.
- High-speed switching in hybrid thick and thin-film circuits.

2. DEVICE MARKING AND ORDERING INFORMATION

Device	Marking	Shipping
LBAS16HT1G	A6	3000/Tape&Reel
LBAS16HT3G	A6	10000/Tape&Reel

3. MAXIMUM RATINGS(Ta = 25ºC)

Parameter	Symbol	Limits	Unit
Non-Repetitive Peak Reverse Voltage	VRM	100	V
Repetitive Peak Reverse Voltage Working Peak Reverse Voltage DC Blocking Voltage	VRRM VRWM VR	100	V
RMS Reverse Voltage	VR(RMS)	71	V
Forward Continuous Current	IFM	500	mA
Average Rectified Output Current	IO	250	mA
Non-Repetitive Peak Forward Current t=1μs t=1s	IFSM	 4 1.5	 A A

4. THERMAL CHARACTERISTICS

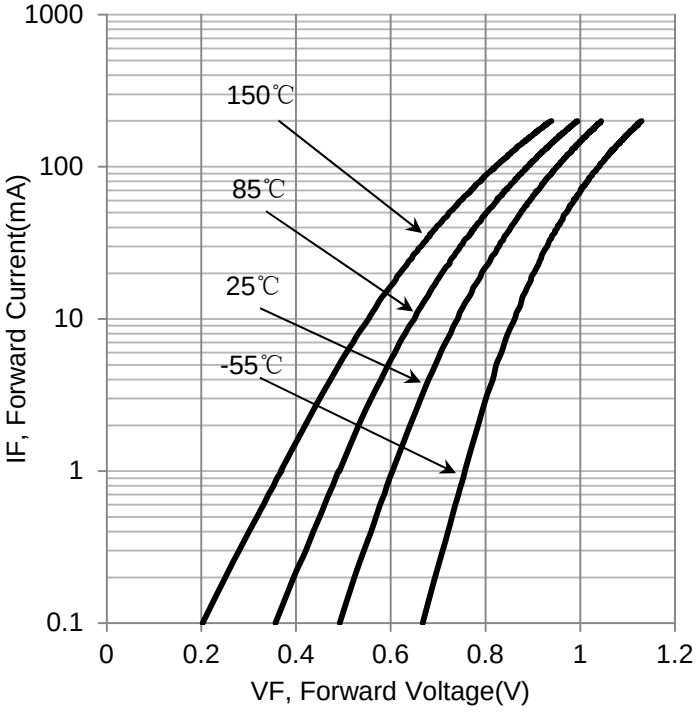
Parameter	Symbol	Limits	Unit
Total Device Dissipation, FR−5 Board (Note 1) @ TA = 25ºC Derate above 25ºC	PD	 200 1.57	 mW mW/ºC
Thermal Resistance, Junction–to–Ambient(Note 1)	RΘJA	635	ºC/W
Junction and Storage temperature	TJ,Tstg	−55~+150	ºC

1. FR–5 = 1.0×0.75×0.062 in.

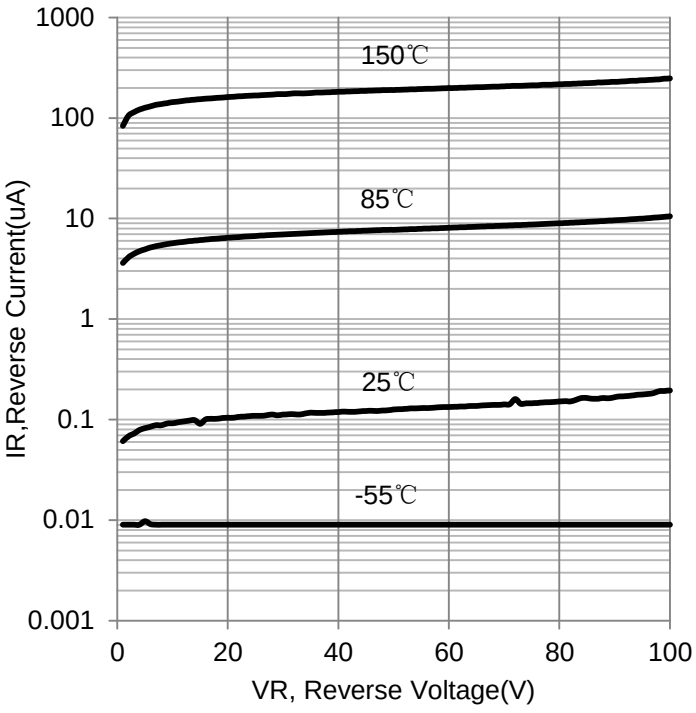
5. ELECTRICAL CHARACTERISTICS (Ta= 25°C)

Characteristic	Symbol	Min.	Typ.	Max.	Unit
Reverse Breakdown Voltage (I(BR)=100μA)	VBR	75	-	-	V
Forward Voltage	VF				mV
(IF = 1.0 mAdc)		-	-	715	
(IF = 10 mAdc)		-	-	855	
(IF = 50 mAdc)		-	-	1000	
(IF = 150 mAdc)		-	-	1250	
Reverse Voltage Leakage Current	IR				μA
(VR = 75Vdc)		-	-	1.0	
(VR = 75Vdc,TJ = 150°C)		-	-	50	
(VR = 25Vdc,TJ = 150°C)		-	-	30	
Diode Capacitance (VR = 0V, f = 1.0 MHz)	CD	-	-	2.0	pF
Reverse Recovery Time (IF=IR=10mAd,RL =50Ω)	trr	-	-	4.0	ns
Forward Recovery Voltage (IF = 10 mAdc, tr = 20 ns)	VFR	-	-	1.75	V

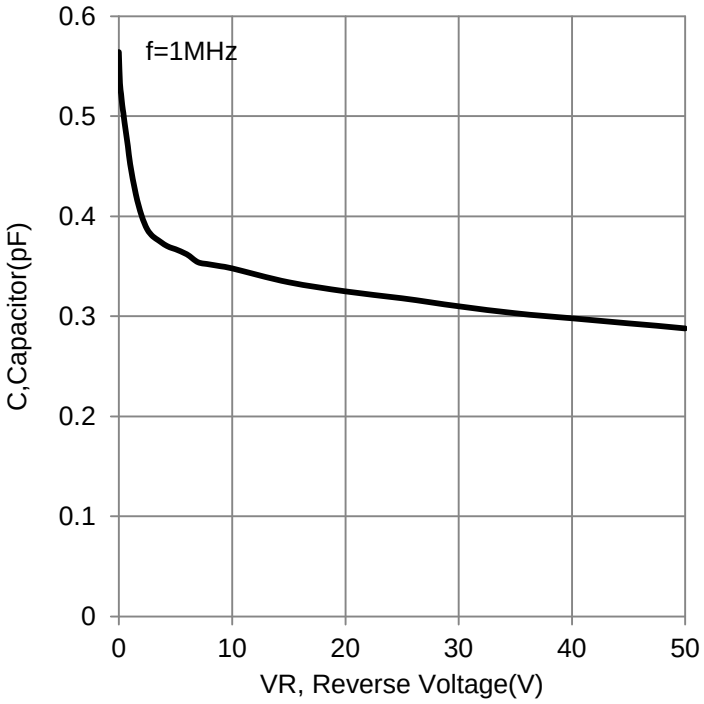
6. ELECTRICAL CHARACTERISTICS CURVES



Forward Characteristics

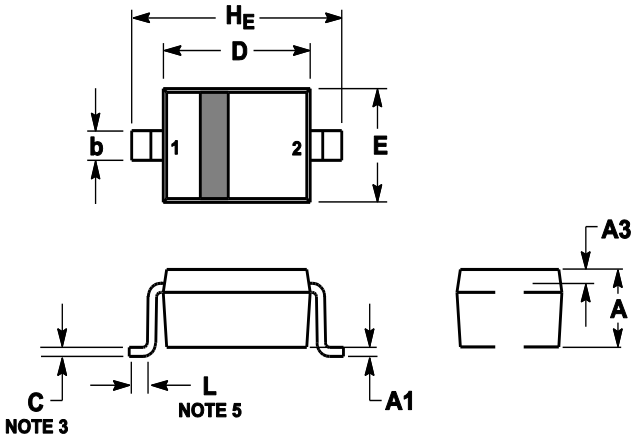


Reverse Characteristics



Capacitor Characteristics

7.OUTLINE AND DIMENSIONS



Notes:

1. DIMENSIONING AND TOLERANCING PER ANSI Y14.5M, 1982.
2. CONTROLLING DIMENSION: MILLIMETERS.
3. MAXIMUM LEAD THICKNESS INCLUDES LEAD FINISH. MINIMUM LEAD THICKNESS IS THE MINIMUM THICKNESS OF BASE MATERIAL.
4. DIMENSIONS D AND E DO NOT INCLUDE MOLD FLASH, PROTRUSIONS OR GATE BURRS.

	MILLIMETERS			INCHES		
DIM	MIN	NOM	MAX	MIN	NOM	MAX
A	0.8	0.9	1	0.031	0.035	0.04
A1	0	0.05	0.1	0	0.002	0.004
A3	0.15REF			0.006REF		
b	0.25	0.32	0.4	0.01	0.012	0.016
C	0.089	0.12	0.177	0.003	0.005	0.007
D	1.6	1.7	1.8	0.062	0.066	0.07
E	1.15	1.25	1.35	0.045	0.049	0.053
L	0.08			0.003		
H_E	2.3	2.5	2.7	0.09	0.098	0.105

8.SOLDERING FOOTPRINT