



SCHOTTKY BARRIER DIODES

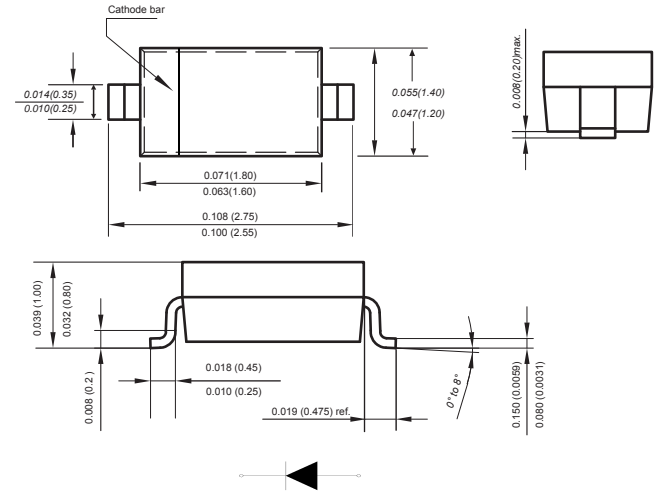
Features

SOD-323



- ◆ For super-high speed switching circuit.
- ◆ For small current rectification.
- ◆ Allowing to rectify under (I_{F(AV)}=200mA) condition.
- ◆ Allowing high-density mounting.

Mechanical Data



Case: JEDEC SOD-323 molded plastic body
 Terminals: Plated leads solderable per MIL-STD-750, Method 2026
 Polarity: Polarity symbols marked on case
 Weight : 0.0007 ounce, 0.02 grams
 Marking: 2B

Absolute Maximum Ratings at 25 °C

Dimensions in inches and (millimeters)

Parameter	Symbol	MA729	Unit
DC reverse voltage	V _R	30	V
Repetitive peak reverse voltage	V _{RRM}	30	V
Peak forward Current	I _{FM}	300	mA
Average forward Current	I _{F(AV)}	200	mA
Non-repetitive peak forward Surge Current	I _{FSM}	1000	mA
Power Dissipation	P _d	200	mW
Thermal resistance, junction to ambient air	R _{θjA}	635	°C/W
Junction temperature	T _j	150	°C
Storage temperature range	T _{stg}	-55-150	°C

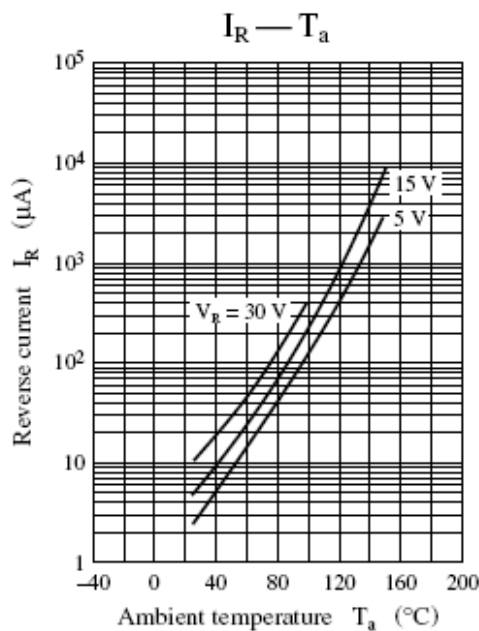
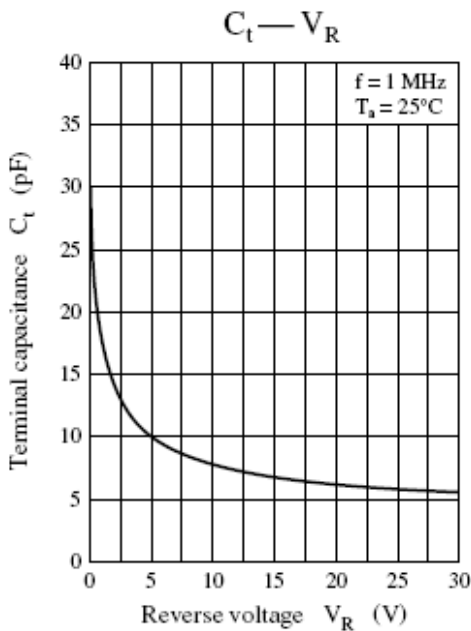
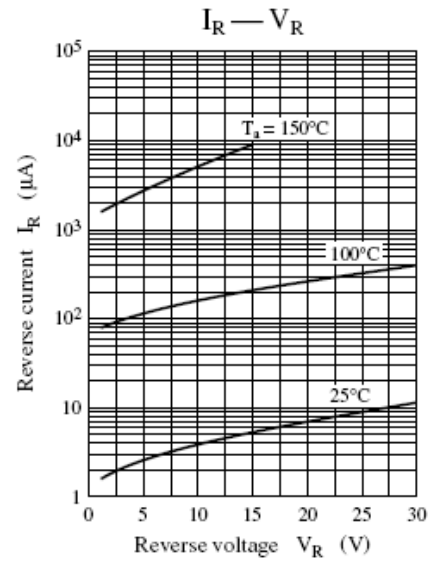
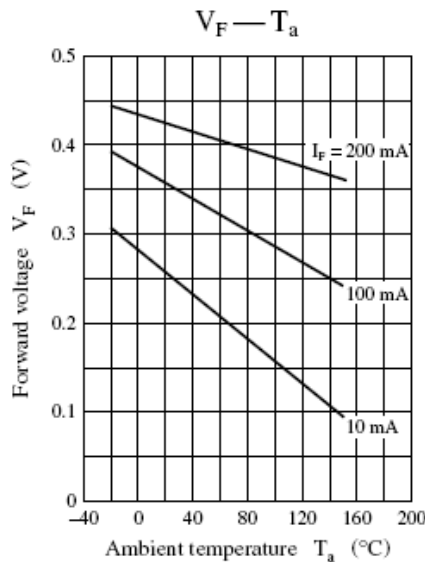
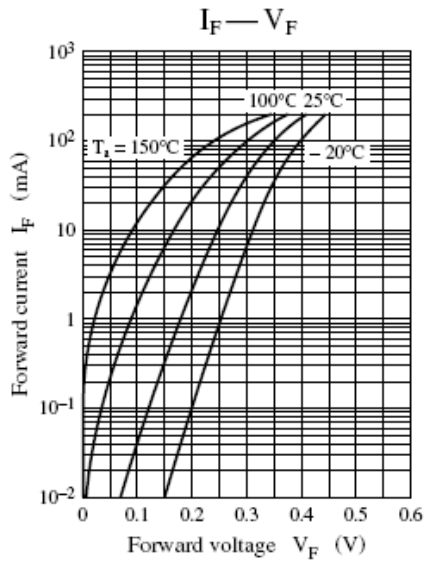
ELECTRICAL CHARACTERISTICS @ Ta=25°C unless otherwise specified

Characteristics at Ta= 25 °C

Parameter	Symbol	Conditions	Min.	Typ.	Max.	Unit
Reverse Breakdown Voltage	V _{(BR)R}	I _R =10μA	3			V
Forward voltage	V _F	I _F =200mA			0.55	V
Reverse leakage current	I _R	V _R =30V			50	μA
Reverse recovery time	t _{rr}	I _F = I _R =100mA, I _{rr} =10mA, R _L =100Ω		3.0		ns
Total capacitance	C _T	V _R =0V, f=1.0MHz		30		pF

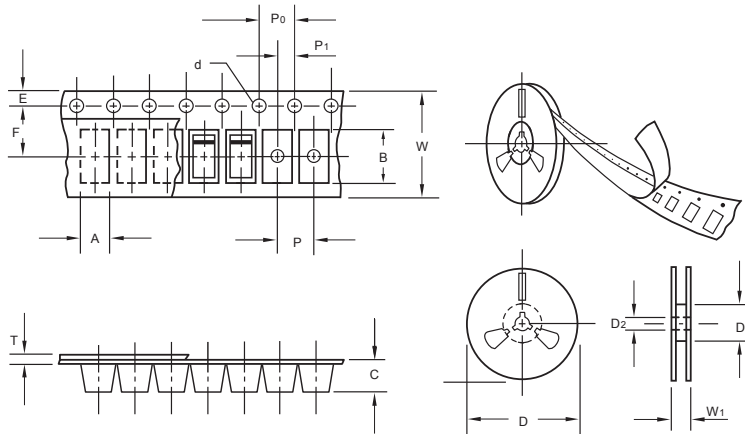


Typical Characteristics



The curve above is for reference only.

Packing information



unit:mm

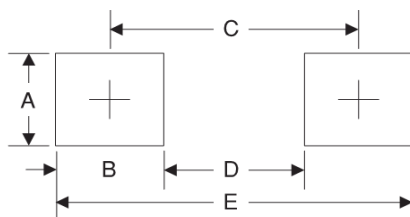
Item	Symbol	Tolerance	SOD-323
Carrier width	A	0.1	2.1
Carrier length	B	0.1	4.0
Carrier depth	C	0.1	1.60
Sprocket hole	d	0.05	1.55
7" Reel outside diameter	D	2.0	178.00
7" Reel inner diameter	D ₁	min	50.0
Feed hole diameter	D ₂	0.5	13.00
Sprocket hole position	E	0.1	1.75
Punch hole position	F	0.1	3.50
Punch hole pitch	P	0.1	4.00
Sprocket hole pitch	P ₀	0.1	4.00
Embossment center	P ₁	0.1	2.00
Overall tape thickness	T	0.1	0.25
Tape width	W	0.3	8.15
Reel width	W ₁	1.0	10.5

Note: Devices are packed in accordance with EIA standard RS-481-A and specifications listed above.

Reel packing

PACKAGE	REEL SIZE	REEL (pcs)	COMPONENT SPACING (m/m)	BOX (pcs)	INNER BOX (m/m)	REEL DIA, (m/m)	CARTON SIZE (m/m)	CARTON (pcs)	APPROX. GROSS WEIGHT (kg)
SOD-323	7"	3,000	4.0	45,000	210*208*203	178	430*430*235	180,000	

Suggested Pad Layout



Symbol	Unit (mm)	Unit (inch)
A	0.7	0.028
B	0.7	0.028
C	2.15	0.085
D	1.8	0.071
E	2.85	0.112