

## Features

- High Reliability
- High Speed ( $T_{rr}=1.5ns$  Typ.)
- Halogen Free. "Green" Device (Note 1)
- Moisture Sensitivity Level 1
- Epoxy Meets UL 94 V-0 Flammability Rating
- Lead Free Finish/RoHS Compliant ("P" Suffix Designates RoHS Compliant. See Ordering Information)

## Maximum Ratings

- Operating Junction Temperature Range:  $-55^{\circ}C$  to  $+150^{\circ}C$
- Storage Temperature Range:  $-55^{\circ}C$  to  $+150^{\circ}C$

MCC Part Number	Device Marking	Peak Reverse Voltage $V_{RM}$
DAP202U	P	80V

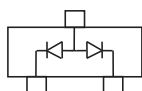
Peak Forward Current	$I_{FM}$	300mA
Average Rectified Output Current	$I_o$	100mA
Power Dissipation	$P_D$	200mW

## Electrical Characteristics @ 25°C Unless Otherwise Specified

Minimum Reverse Breakdown Voltage	$V_{BR}$	80V	$I_R=100\mu A$
Maximum Forward Voltage	$V_F$	1.2V	$I_F=100.0mA$
Maximum Reverse Current	$I_R$	0.1 $\mu A$	$V_R=70V$
Maximum Diode Capacitance	$C_D$	3.5pF	$V_R=6.0V, f=1.0MHz$
Maximum Reverse Recovery Time	$t_{rr}$	4.0ns	$I_F=5mA, V_R=6V$

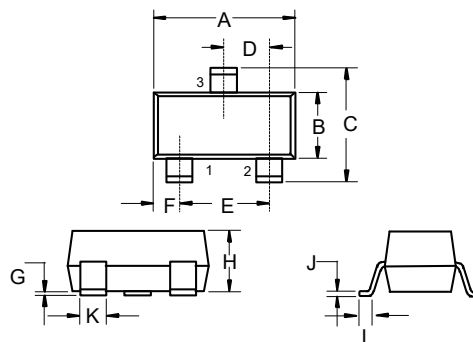
Note: 1. Halogen free "Green" products are defined as those which contain <900ppm bromine, <900ppm chlorine (<1500ppm total Br + Cl) and <1000ppm antimony compounds.

## Internal Structure



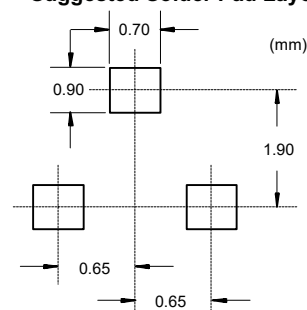
# 100 mA Switching Diode 80 Volts

## SOT-323



DIM	INCHES		MM		NOTE
	MIN	MAX	MIN	MAX	
A	0.071	0.087	1.80	2.20	
B	0.045	0.053	1.15	1.35	
C	0.083	0.096	2.10	2.45	
D	0.026		0.65		TYP.
E	0.047	0.055	1.20	1.40	
F	0.012	0.016	0.30	0.40	
G	0.000	0.004	0.00	0.10	
H	0.035	0.044	0.90	1.10	
J	0.002	0.010	0.05	0.25	
K	0.006	0.016	0.15	0.40	
L	0.010	0.018	0.26	0.46	

## Suggested Solder Pad Layout



## Curve Characteristics

Fig. 1 - Typical Instantaneous Forward Characteristics

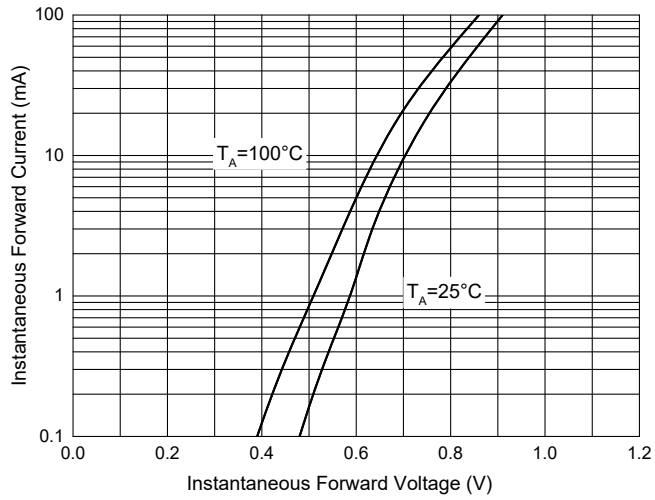


Fig. 2 - Typical Reverse Leakage Characteristics

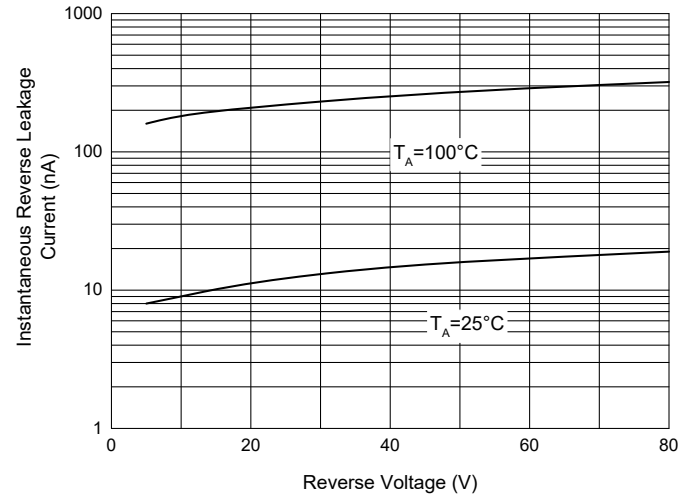
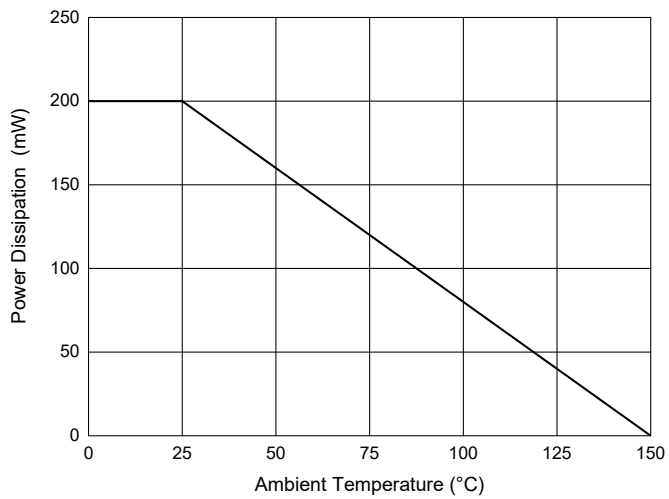


Fig. 3 - Power Derating Curve



## Ordering Information

Device	Packing
Part Number-TP	Tape&Reel: 3Kpcs/Reel

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