

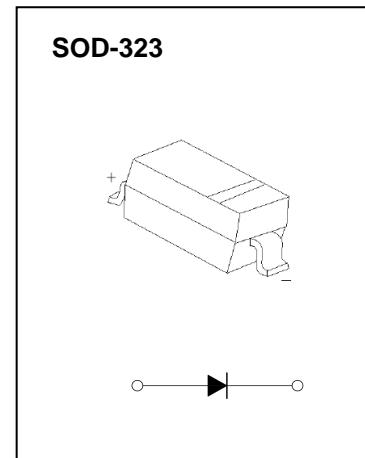
## SOD-323 Plastic-Encapsulate Diodes

### **BAP50-03 GENERAL PURPOSE PIN DIODE**

#### **FEATURES**

- Low diode capacitance
- Low diode forward resistance

**MARKING: A81**



#### **Maximum Ratings and Electrical Characteristics, Single Diode @Ta=25°C**

Parameter	Symbol	Limit			Unit
<b>Continuous Reverse Voltage</b>	$V_R$	50			V
<b>Continuous Forward Current</b>	$I_F$	50			mA
<b>Power Dissipation (Ta=90°C)</b>	$P_d$	200			mW
<b>Thermal Resistance Junction to Ambient</b>	$R_{\theta JA}$	85			°C/W
<b>Junction Temperature</b>	$T_j$	150			°C
<b>Storage Temperature</b>	$T_{STG}$	-55~+150			°C

#### **Electrical Ratings @Ta=25°C**

Parameter	Symbol	Min	Typ	Max	Unit	Conditions
<b>Continuous reverse voltage</b>	$V_R$	50			V	$I_R=10\mu A$
<b>Forward voltage</b>	$V_F$			1.1	V	$I_F=50mA$
<b>Reverse current</b>	$I_R$			100	nA	$V_R=50V$
<b>Diode capacitance</b>	$C_{d1A}$			0.91	pF	$V_R=0V, f=1MHz$
	$C_{d1B}$			1.11	pF	$V_R=0V, f=1MHz$
	$C_{d2}$			0.55	pF	$V_R=1V, f=1MHz$
	$C_{d3}$			0.35	pF	$V_R=5V, f=1MHz$
<b>Diode forward resistance</b>	$r_D$			40	Ω	$I_F=0.5mA, f=100MHz; note1$
	$r_D$			25	Ω	$I_F=1mA, f=100MHz; note1$
	$r_D$			5	Ω	$I_F=10mA, f=100MHz; note1$

Note 1. Guaranteed on AQL basis: inspection level S4,AQL 1.0.

# Typical Characteristics

**BAP50-03**

