

VOLTAGE RANGE: 40 - 60V

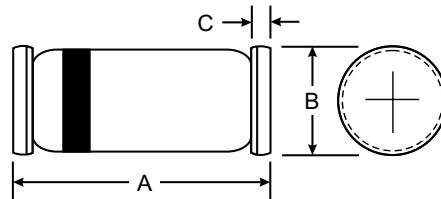
CURRENT: 0.03A

Features

- Integrated protection ring against static discharge
- Low capacitance
- Low leakage current
- Low forward voltage drop
- Very low switching time

Mechanical Data

- Case: SOD-80/LL34, Glass
- Terminals: Solderable per MIL-STD-202,
- Method 208
- Polarity: Cathode Band
- Weight: 0.05 grams (approx.)



LL34/ SOD-80		
Dim	Min	Max
A	3.30	3.70
B	1.30	1.60
C	0.28	0.50

All Dimensions in mm

Maximum Ratings @ $T_A = 25^\circ\text{C}$ unless otherwise specified

Parameter	Test Conditions	Type	Symbol	Value	Unit
Reverse voltage		BAS81	V_R	40	V
		BAS82	V_R	50	V
		BAS83	V_R	60	V
Peak forward surge current	$t_p=1\text{s}$		I_{FSM}	500	mA
Repetitive peak forward current			I_{FRM}	150	mA
Forward current			I_F	30	mA
Junction temperature			T_j	125	°C
Storage temperature range			T_{stg}	-65...+150	°C

Maximum Thermal Resistance $T_j = 25^\circ\text{C}$

Parameter	Test Conditions	Symbol	Value	Unit
Junction ambient	on PC board 50mmx50mmx1.6mm	R_{thJA}	320	K/W

Electrical Characteristics $T_j = 25^\circ\text{C}$

Parameter	Test Conditions	Type	Symbol	Min	Typ	Max	Unit
Forward voltage	$I_F=0.1\text{mA}$		V_F			330	mV
	$I_F=1\text{mA}$		V_F			410	mV
	$I_F=15\text{mA}$		V_F			1	V
Reverse current	$V_R=V_{Rmax}$		I_R			200	nA
Diode capacitance	$V_R=1\text{V}, f=1\text{MHz}$		C_D			1.6	pF



SUNMATE

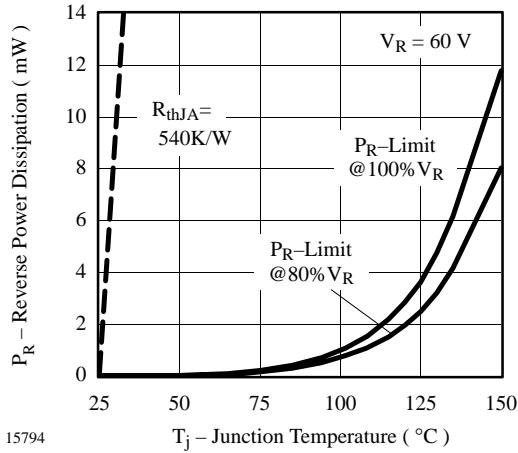


Figure 1. Max. Reverse Power Dissipation vs. Junction Temperature

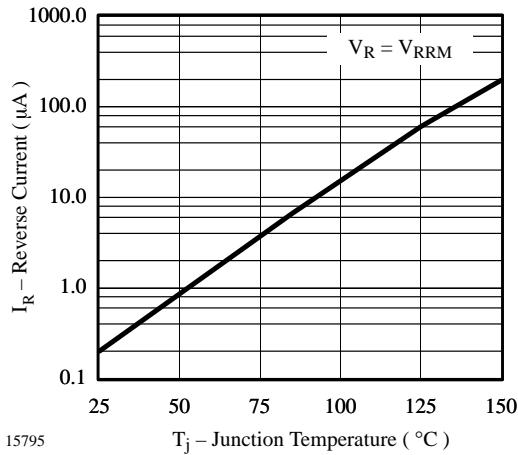


Figure 2. Reverse Current vs. Junction Temperature

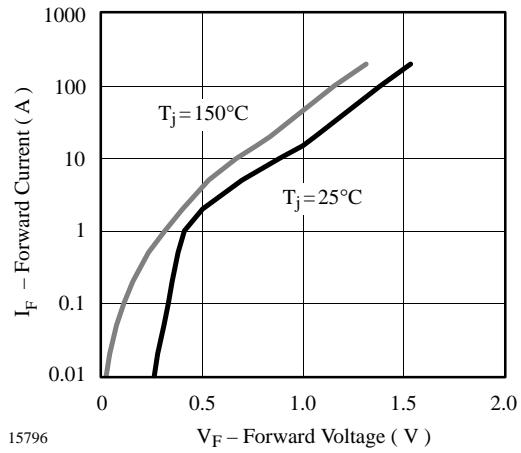


Figure 3. Forward Current vs. Forward Voltage

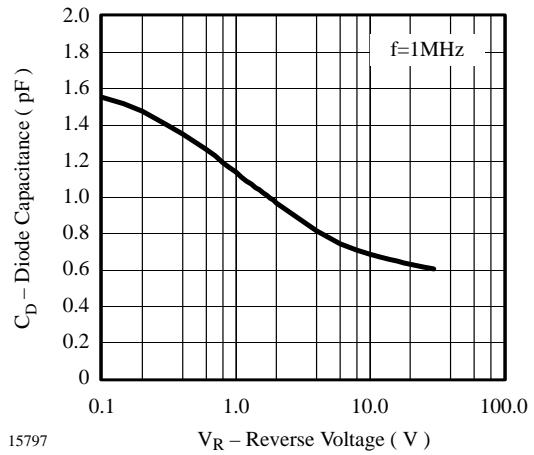


Figure 4. Diode Capacitance vs. Reverse Voltage