

## Features

- Schottky barrier diodes
- Low forward voltage drop
- Low leakage current
- Moisture sensitivity: level 1, per J-STD-020
- Solder dip 260 °C, 10 s
- Low profile, typical thickness 1.0mm
- AEC-Q101 qualified



eSGB (SMAF)

## Typical Applications

For use in low voltage, high frequency inverters, free wheeling, and polarity protection application

<b>Maximum Ratings</b> (TA = 25 °C unless otherwise noted)			
Parameter	Symbol	LS3C0	Unit
Maximum repetitive peak reverse voltage	VRRM	200	V
Maximum RMS voltage	VRMS	140	V
Maximum DC blocking voltage	VDC	200	V
Maximum average forward rectified current	IF(AV)	3.0	A
Peak forward surge current 8.3 ms single half sine-wave superimposed on rated load	IFSM	100	A
Operating junction and storage temperature	TJ, TSTG	- 55 to + 150	°C

<b>Electrical Characteristics</b> (TA = 25 °C unless otherwise noted)					
Parameter	Test Conditions	Symbol	TYP	MAX	Unit
Instantaneous forward voltage	IF=3A, TA=25°C	VF	-	0.87	Volts
Maximum DC reverse current at rated DC blocking voltage	TA=25°C	IR	50		uA
	TA=125°C		10		mA
Typical junction capacitance	4.0 V, 1 MHz	C <sub>J</sub>	69		pF
Typical thermal resistance	junction to lead	R <sub>θJL</sub> <sup>1)</sup>	20		°C/W

Note1: Thermal resistance from junction to lead, mounted on PCB with 30.0x30.0mm copper pads



# LS3C0

Surface Mount Schottky Rectifier  
Reverse Voltage 200V Forward Current 3A

## Ratings and Characteristics Curves

(TA = 25°C unless otherwise noted)

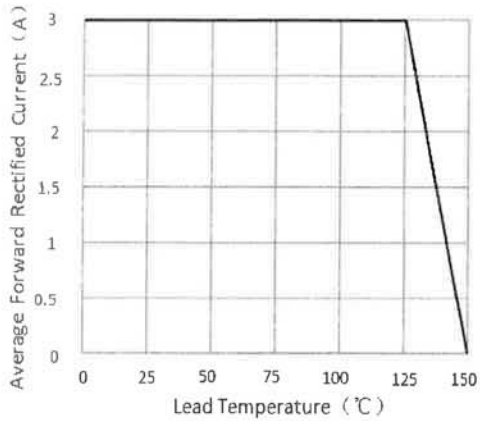


Figure 1. Forward Current Derating Curve

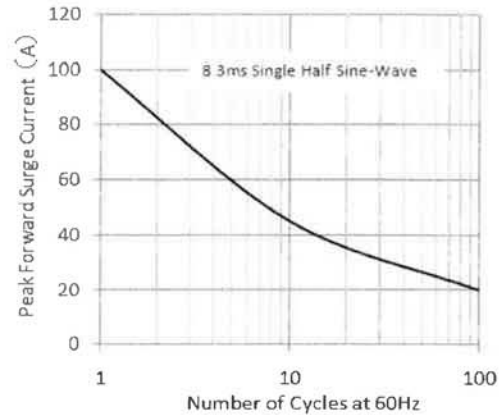


Figure 2. Maximum Non-Repetitive Peak Forward Surge Current

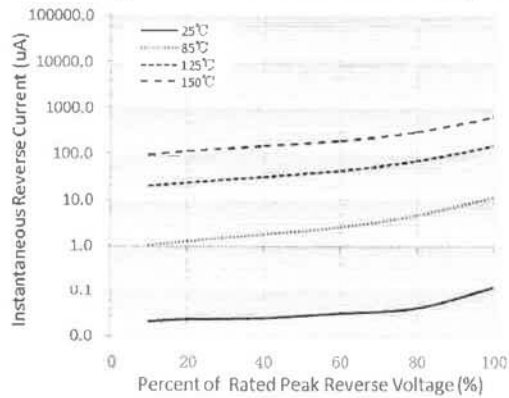


Figure 3. Typical Reverse Characteristics

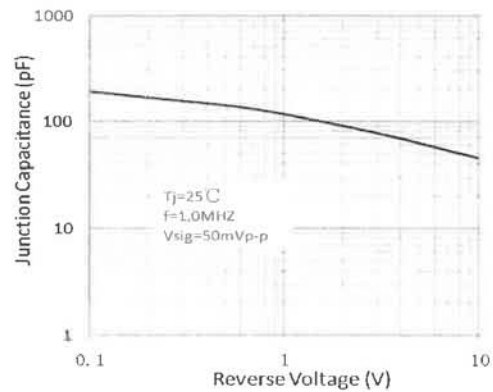


Figure 4. Typical Junction Capacitance

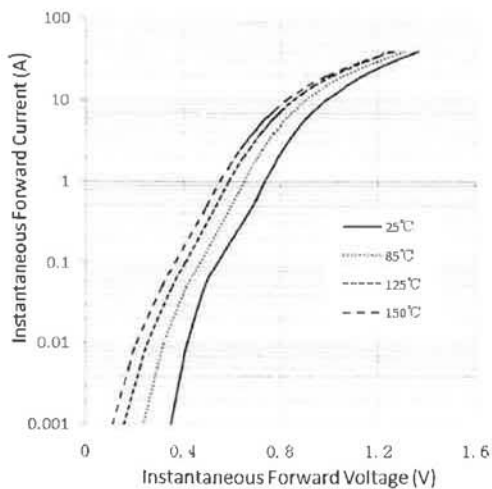
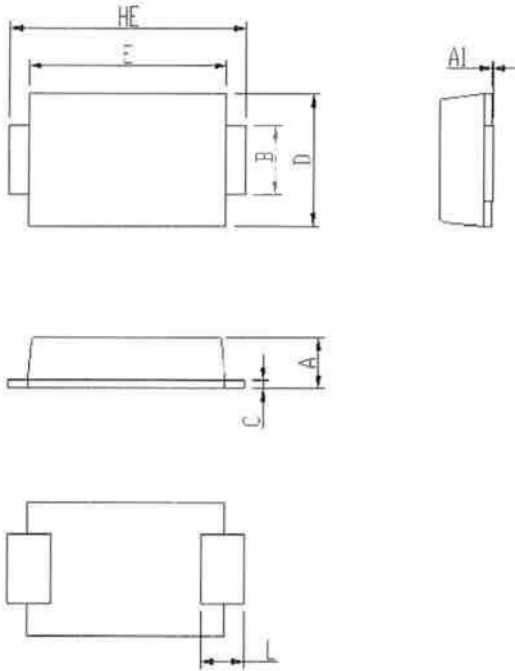


Figure 5. Typical Instantaneous Forward Characteristics

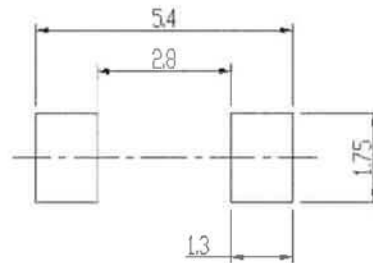
## Package Outline Dimensions

in inches (millimeters)



DIM	Unit: mm		Unit: inch	
	MIN	MAX	MIN	MAX
A	0.92	1.08	0.036	0.043
A1	0	0.1	0.000	0.004
B	1.25	1.45	0.049	0.057
C	0.1	0.25	0.004	0.010
D	2.6	2.8	0.102	0.110
E	4.1	4.3	0.161	0.169
L	0.7	1.1	0.028	0.043
HE	4.8	5.2	0.189	0.205

Soldering footprint



## Packing Information

**Packing quantities:**

10,000 pcs/Reel, 12mm Tape, 13" Reel

**Tape & Reel Specification**

