



## DESCRIPTION

The 1SS226 is available in SOT-23 package

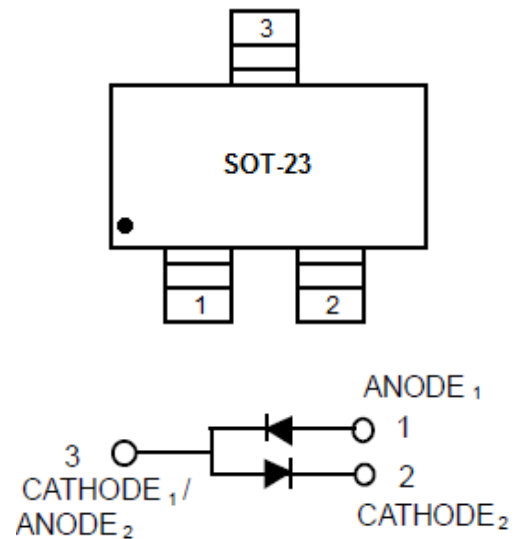
## ORDERING INFORMATION

Package Type	Part Number
SOT-23	1SS226
Note	SPQ: 3,000pcs/Reel
AiT provides all RoHS Compliant Products	

## FEATURES

- Low forward voltage :  $V_{F(3)} = 0.9V(\text{typ.})$
- Fast reverse recovery time :  $t_{RR}=1.6ns(\text{typ.})$
- Small total capacitance :  $C_T=0.9pF(\text{typ.})$
- Available in SOT-23 package

## PIN DESCRIPTION





## ABSOLUTE MAXIMUM RATINGS

$V_{RM}$ , Maximum (Peak) Reverse Voltage	85V
$V_R$ , Reverse Voltage	80V
$I_{FM}$ , Maximum (Peak) Forward Current	300mA <sup>NOTE1</sup>
$I_O$ , Average Forward Current	100mA <sup>NOTE1</sup>
$I_{FSM}$ , Surge Current (10ms)	2A <sup>NOTE1</sup>
P, Power Dissipation	150mW
$T_J$ , Junction Temperature	125°C
$T_{STG}$ , Storage Temperature Range	-55°C~125°C

Stresses above may cause permanent damage to the device. These are stress ratings only and functional operation of the device at these or any other conditions beyond those indicated in the Electrical Characteristics are not implied. Exposure to absolute maximum rating conditions for extended periods may affect device reliability.

NOTE1: Unit rating. Total rating = Unit rating  $\times$  0.7.

## ELECTRICAL CHARACTERISTICS

$T_A = 25^\circ\text{C}$

Parameter	Symbol	Conditions	Min.	Typ.	Max.	Unit
Forward Voltage	$V_{F(1)}$	$I_F=1\text{mA}$		0.60		V
	$V_{F(2)}$	$I_F=10\text{mA}$		0.72		
	$V_{F(3)}$	$I_F=100\text{mA}$		0.90	1.20	
Reverse Current	$I_{R(1)}$	$V_R=30\text{V}$			0.1	$\mu\text{A}$
	$I_{R(2)}$	$V_R=80\text{V}$			0.5	
Total Capacitance	$C_T$	$V_R=0, f=1\text{MHz}$		0.9	3.0	pF
Reverse Recovery Time	$t_{rr}$	$I_F=10\text{mA}$ (Fig.1)		1.6	4.0	ns



## TYPICAL CHARACTERISTICS

Figure 1. Forward Voltage  $V_{F(V)}$

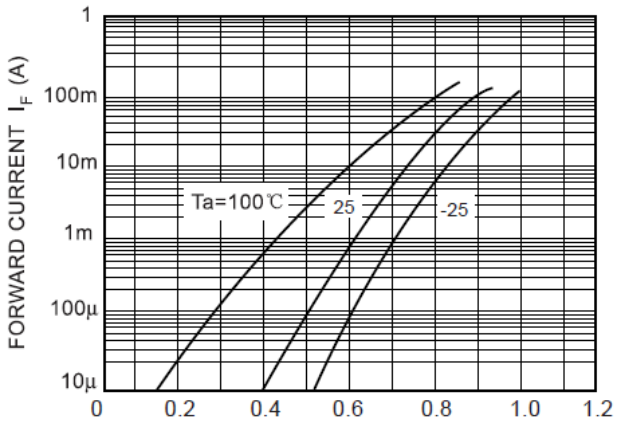


Figure 2. Reverse Voltage  $V_{R(V)}$

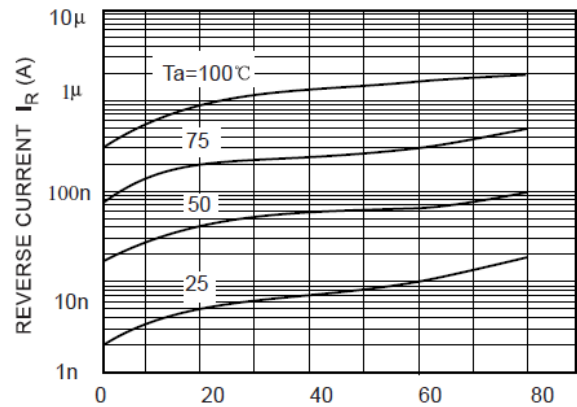


Figure 3. Reverse Voltage  $V_{R(V)}$

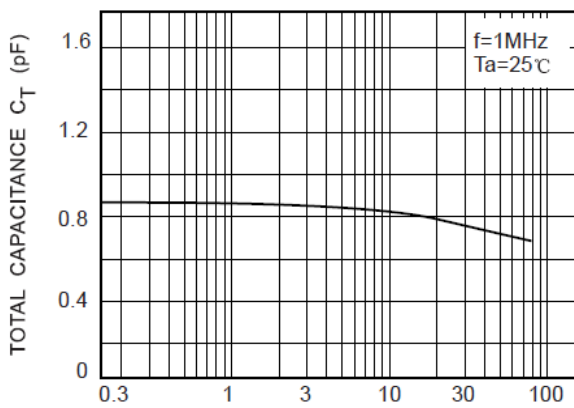


Figure 4. Forward Current  $I_{F(mA)}$

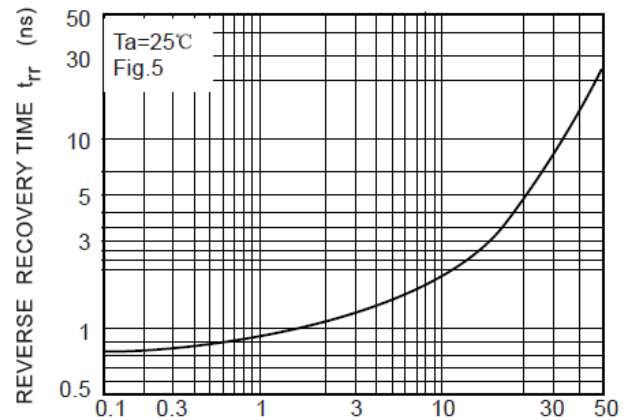
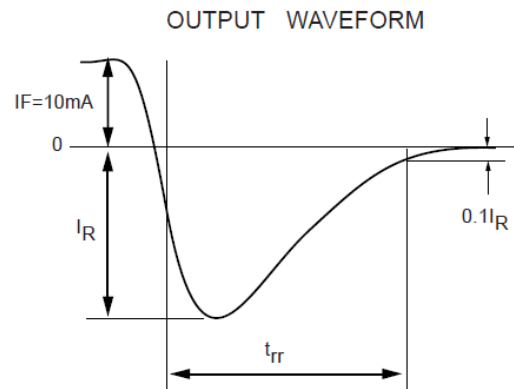
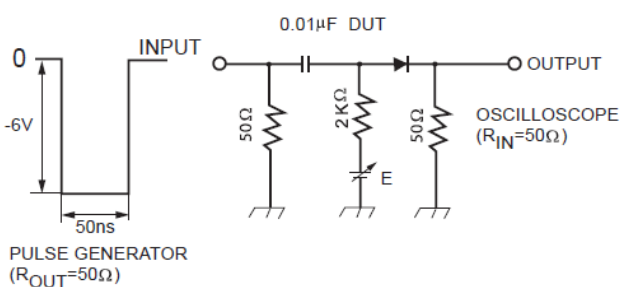


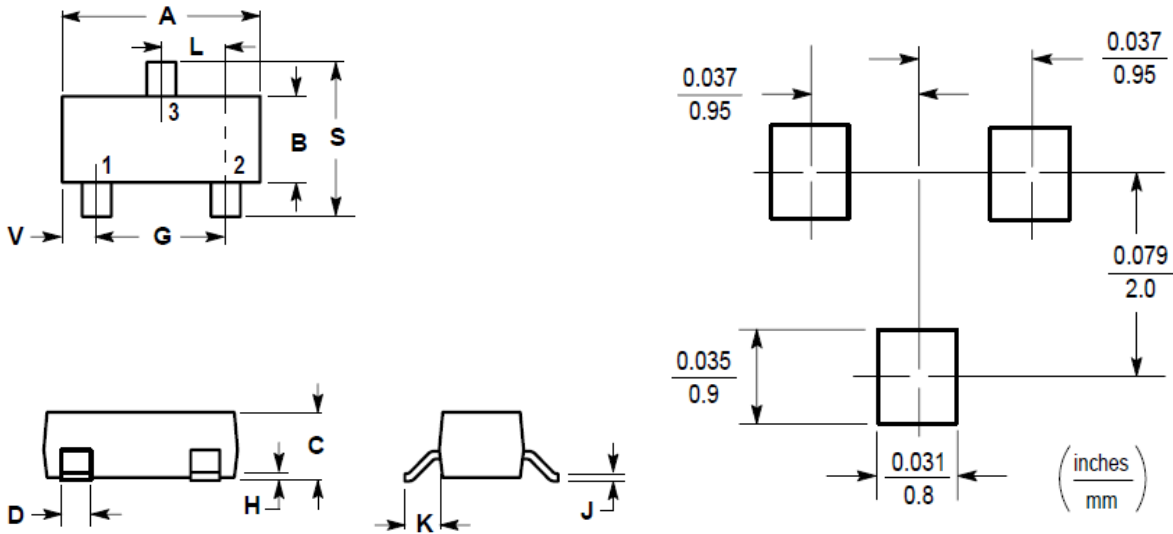
Figure 5. Reverse Recovery Time ( $t_{rr}$ ) Test Circuit





**PACKAGE INFORMATION**

Dimension in SOT-23 Package (Unit: mm)



DIM	MILLIMETERS		INCHES	
	MIN	MAX	MIN	MAX
A	2.800	3.040	0.1102	0.1197
B	1.200	1.400	0.0472	0.0551
C	0.890	1.110	0.0350	0.0440
D	0.370	0.500	0.0150	0.0200
G	1.780	2.040	0.0701	0.0807
H	0.013	0.100	0.0005	0.0040
J	0.085	0.177	0.0034	0.0070
K	0.350	0.690	0.0140	0.0285
L	0.890	1.020	0.0350	0.0401
S	2.100	2.640	0.0830	0.1039
V	0.450	0.600	0.0177	0.0236



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