

### Surface Mount Schottky Barrier Diodes

**(Pb)** Lead(Pb)-Free

\* Halogen Free

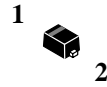
**Feature:**

- \* Silicon Epitaxial Planer
- \* Low Forward Voltage and Low Reverse Current
- \* High Reliability
- \* Schottky Barrier Diodes Encapsulated in a SOD-923 Package

**Description:**

These schottky barrier diodes are designed for high speed switching applications circuit protection, and voltage clamping. Extremely low forward voltage reduces conduction loss. Miniature surface mount package is excellent for hand held and portable applications where space is limited.

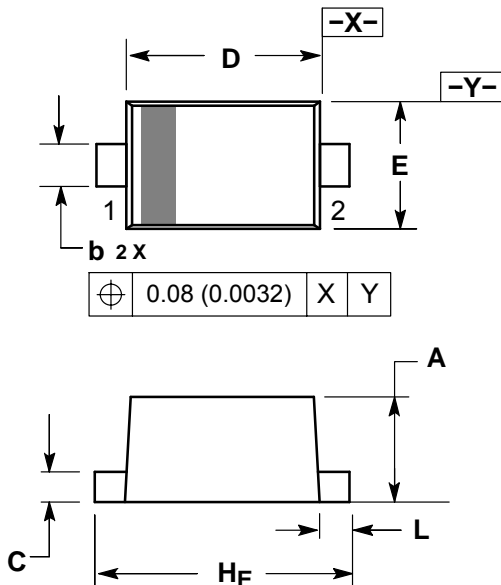
**SMALL SIGNAL  
SCHOTTKY DIODES  
30m AMPERES  
40 VOLTS**



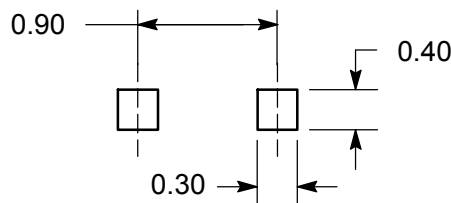
**SOD-923**

### SOD-923 Outline Dimensions

Unit:mm



MILLIMETERS			
DIM	MIN	NOM	MAX
A	0.34	0.39	0.43
b	0.15	0.20	0.25
c	0.07	0.12	0.17
D	0.75	0.80	0.85
E	0.55	0.60	0.65
HE	0.95	1.00	1.05
L	0.05	0.10	0.15



**SOLDERING FOOTPRINT**


**Maximum Ratings** ( $T_A=25^{\circ}\text{C}$  Unless otherwise noted)

Characteristic	Symbol	Value	Unit
Repetitive Peak Reverse Voltage	$V_{RM}$	40	V
DC Reverse Voltage	$V_R$	30	V
Average Rectifier Forward Current	$I_O$	30	mA
Peak Forward Surge Current <sup>(1)</sup>	$I_{FSM}$	200	mA
Thermal Resistance, Junction to Ambient	$R_{\theta JA}$	520	$^{\circ}\text{C}/\text{W}$
Power Dissipation	$P_D$	150	mW
Operation Junction Temperature Range	$T_J$	125	$^{\circ}\text{C}$
Storage Temperature Range	$T_{stg}$	-40 to +125	$^{\circ}\text{C}$

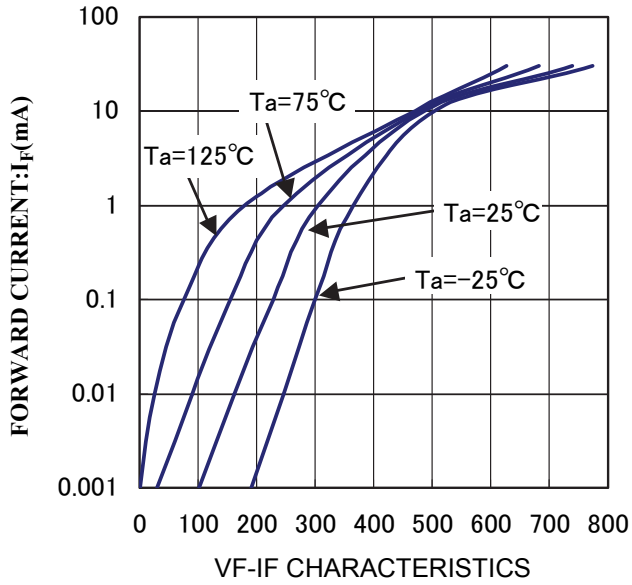
**Electrical Characteristics** ( $T_A=25^{\circ}\text{C}$  Unless otherwise noted)

Characteristic	Symbol	Min	Typ	Max	Unit
Forward Voltage $I_F=1\text{mA}$	$V_F$	-	-	0.37	V
Reverse Leakage $V_R=30\text{V}$	$I_R$	-	-	0.5	$\mu\text{A}$
Capacitance between terminals $V_R=1\text{V}, f=1\text{MHz}$	$C_t$	-	2	-	pF

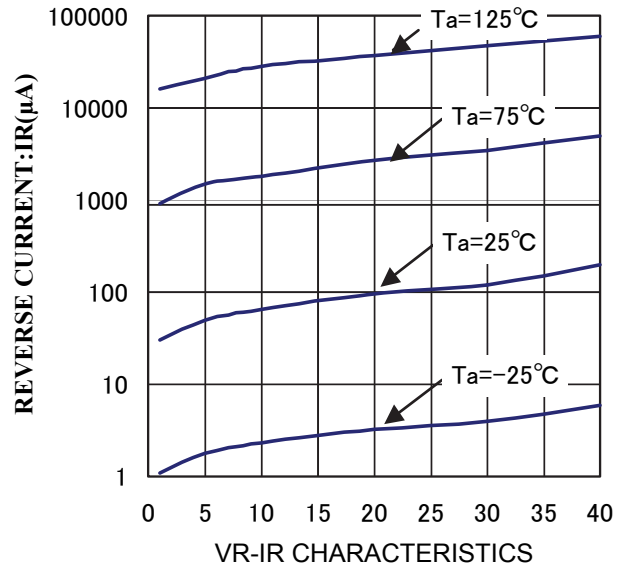
**Device Marking**

Item	Marking	Equivalent Circuit diagram
WSD751D	5	

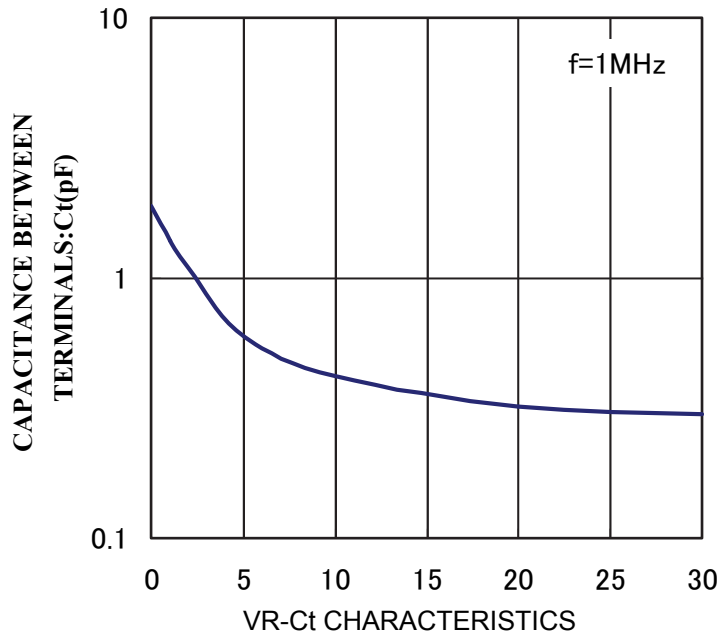
**Electrical Characteristic Curves (T<sub>A</sub>=25°C)**



**Fig.1 FORWARD VOLTAGE :  $V_F$ (mV)**



**Fig.2 REVERSE VOLTAGE:  $V_R$ (V)**



**Fig.3 REVERSE VOLTAGE:  $V_R$ (V)**