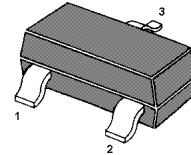
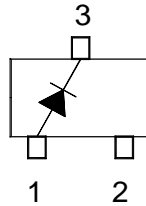


## SILICON EPITAXIAL PLANAR SCHOTTKY BARRIER DIODE

for low power rectification and switching power supply

### Features

- Small surface mounting type.
- High reliability.




SOT-23 Plastic Package

### Marking

Marking Code: FE

### Absolute Maximum Ratings ( $T_a = 25^\circ\text{C}$ )

Parameter	Symbol	Value	Unit
Peak Reverse Voltage	$V_{RM}$	40	V
DC Reverse Voltage	$V_R$	20	V
Mean Rectifying Current	$I_o$	0.5	A
Peak Forward Surge Current <sup>1)</sup>	$I_{FSM}$	3	A
Junction Temperature	$T_j$	125	$^\circ\text{C}$
Storage Temperature Range	$T_s$	-40 to +125	$^\circ\text{C}$

<sup>1)</sup> 60Hz for 1 

### Characteristics at $T_a = 25^\circ\text{C}$

Parameter	Symbol	Min	Typ	Max	Unit
Forward Voltage at $I_F = 10\text{mA}$ at $I_F = 500\text{mA}$	$V_F$	-	-	0.3 0.5	V
Reverse Current at $V_R = 10\text{V}$	$I_R$	-	-	30	$\mu\text{A}$
Capacitance Between Terminals at $V_R = 10\text{V}$ , $f = 1\text{MHz}$	$C_T$	-	20	-	pF

● **Electrical characteristic curves (Ta = 25°C)**

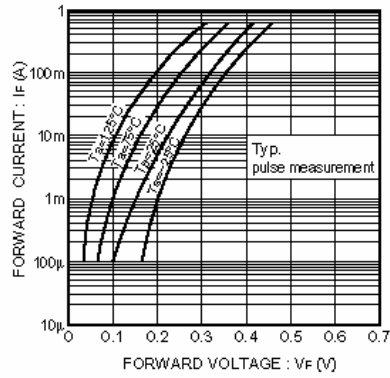


Fig. 1 Forward characteristics

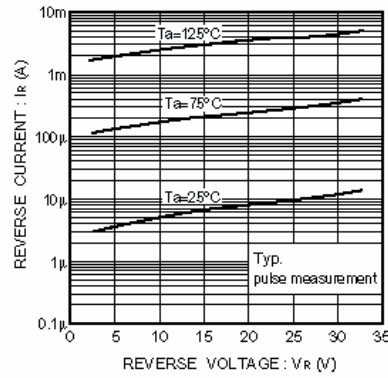


Fig. 2 Reverse characteristics

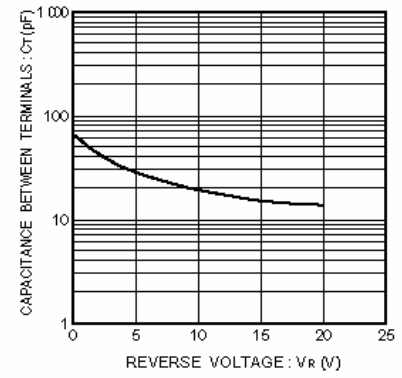
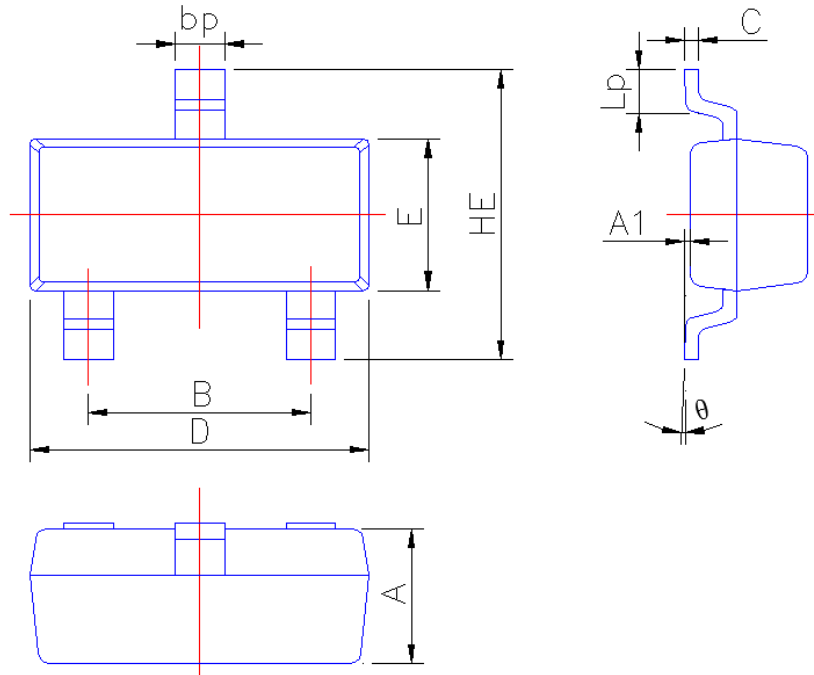


Fig. 3 Capacitance between terminals characteristic

## PACKAGE OUTLINE

Plastic surface mounted package; 3 leads

SOT-23



Symbol	Dimension in Millimeters	
	Min	Max
A	0.90	1.10
A1	0.013	0.100
B	1.80	2.00
bp	0.35	0.50
C	0.09	0.150
D	2.80	3.00
E	1.20	1.40
HE	2.20	2.80
Lp	0.20	0.50
$\theta$	0°	5°