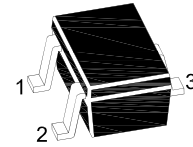
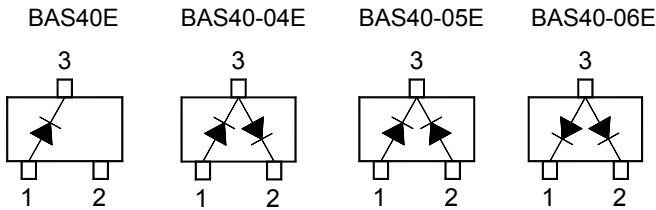


# BAS40E / -04E / -05E / -06E

## SURFACE MOUNT SCHOTTKY BARRIER DIODE

### Features

- Low forward voltage
- Fast switching



SOT-523 Plastic Package

BAS40E Marking Code: **43**  
 BAS40-04E Marking Code: **44**  
 BAS40-05E Marking Code: **45**  
 BAS40-06E Marking Code: **46**

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

Parameter	Symbol	Value	Unit
Repetitive Peak Reverse Voltage	$V_{RRM}$	40	V
DC Blocking Voltage	$V_R$	40	V
Forward Continuous Current	$I_F$	200	mA
Peak Forward Surge Current (at $t_p \leq 8.3$ ms)	$I_{FSM}$	600	mA
Power Dissipation	$P_d$	150	mW
Junction Temperature	$T_J$	150	$^\circ\text{C}$
Storage Temperature Range	$T_{Stg}$	- 65 to + 150	$^\circ\text{C}$

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

Parameter	Symbol	Min.	Max.	Unit
Forward Voltage at $I_F = 1$ mA	$V_F$	-	0.38	V
at $I_F = 40$ mA	$V_F$	-	1	V
Reverse Breakdown Voltage at $I_R = 10$ $\mu\text{A}$	$V_{(BR)R}$	40	-	V
Reverse Current at $V_R = 30$ V	$I_R$	-	200	nA
Total Capacitance at $V_R = 0$ V, $f = 1$ MHz	$C_T$	-	5	pF
Reverse Recovery Time at $I_F = I_R = 10$ mA, $I_{rr} = 0.1 I_R$	$t_{rr}$	-	5	ns

**TOP DYNAMIC**

# BAS40E / -04E / -05E / -06E

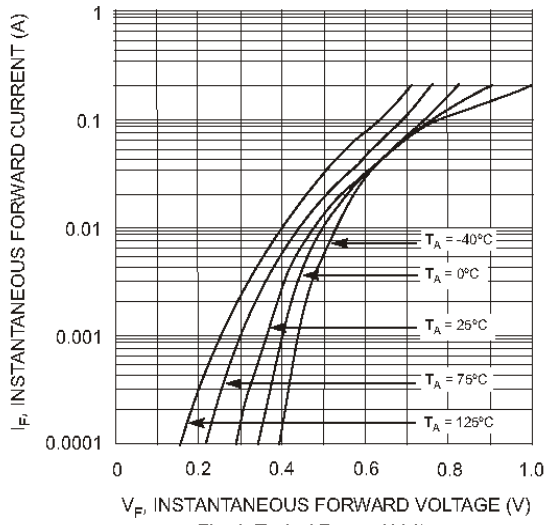


Fig. 1 Typical Forward Voltage

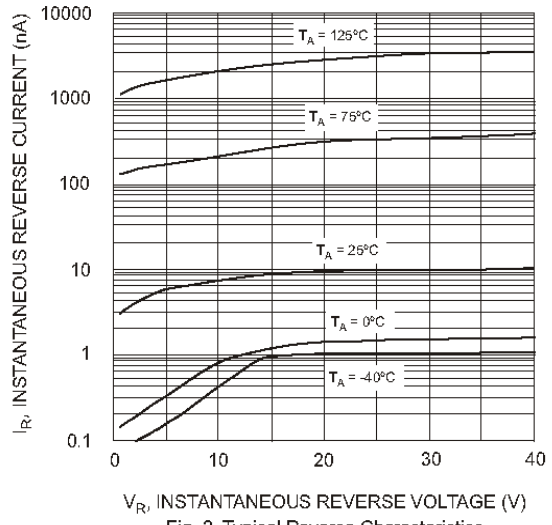


Fig. 2 Typical Reverse Characteristics

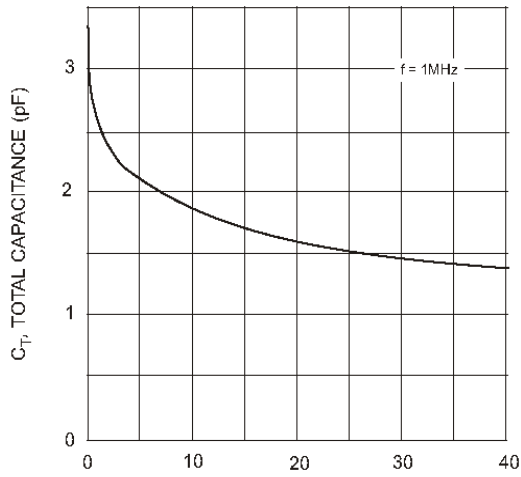


Fig. 3 Typical Capacitance

