

# 2SC3936G

## Silicon NPN epitaxial planar type

For high-frequency amplification

### ■ Features

- Optimum for RF amplification, oscillation, mixing, and IF of FM/AM radios
- S-Mini type package, allowing downsizing of the equipment and automatic insertion through the tape packing

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

Parameter	Symbol	Rating	Unit
Collector-base voltage (Emitter open)	$V_{CBO}$	30	V
Collector-emitter voltage (Base open)	$V_{CEO}$	20	V
Emitter-base voltage (Collector open)	$V_{EBO}$	5	V
Collector current	$I_C$	30	mA
Collector power dissipation	$P_C$	150	mW
Junction temperature	$T_j$	150	$^\circ\text{C}$
Storage temperature	$T_{stg}$	-55 to +150	$^\circ\text{C}$

### ■ Package

- Code  
SMini3-F2
- Marking Symbol: K
- Pin Name
  1. Base
  2. Emitter
  3. Collector

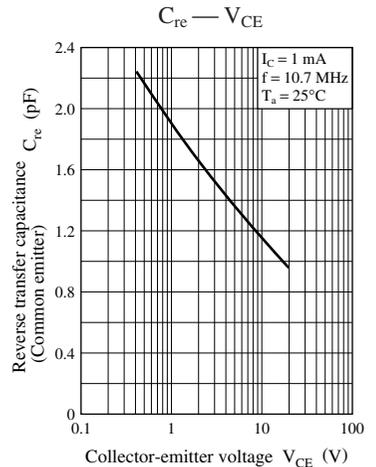
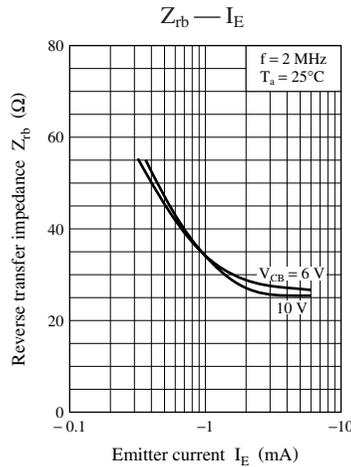
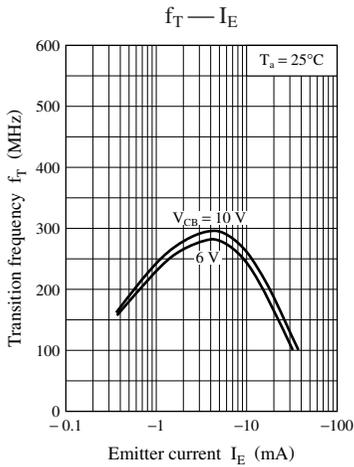
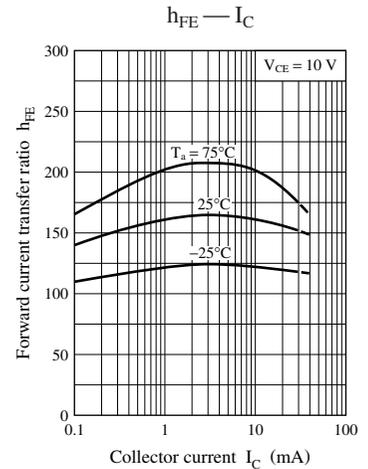
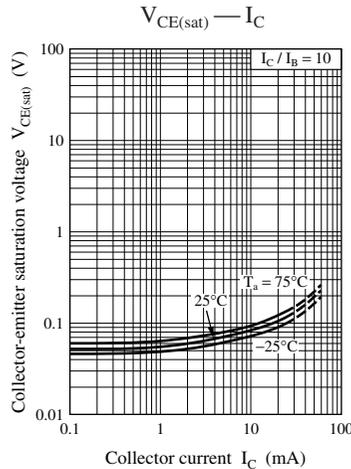
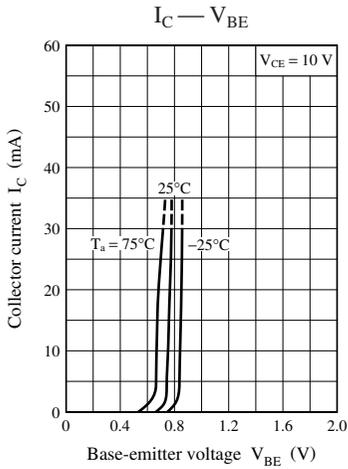
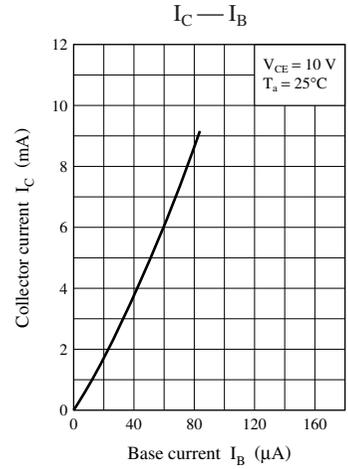
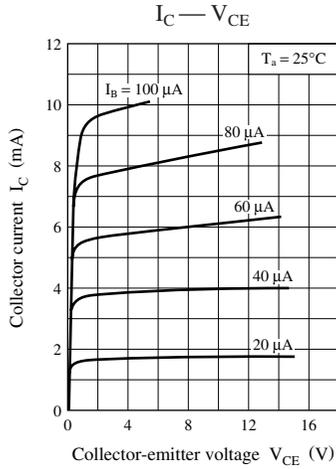
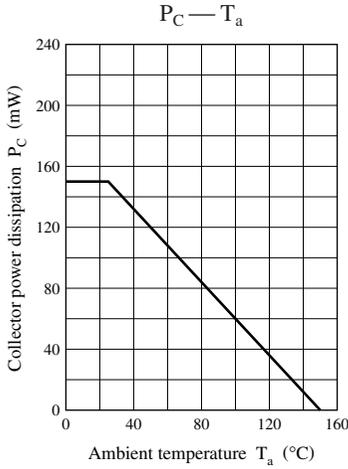
### ■ Electrical Characteristics $T_a = 25^\circ\text{C} \pm 3^\circ\text{C}$

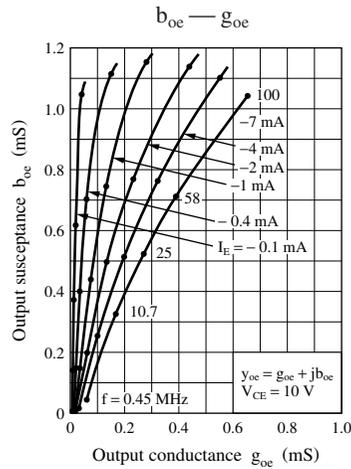
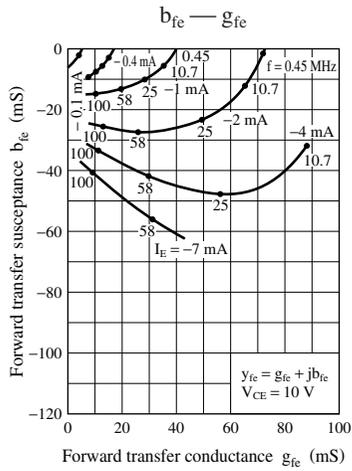
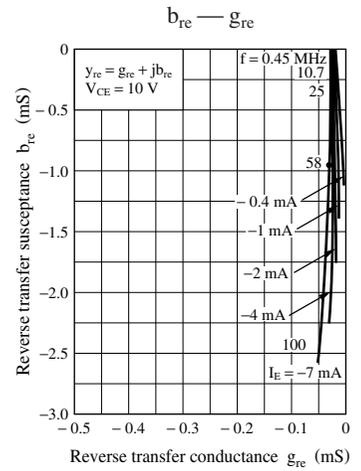
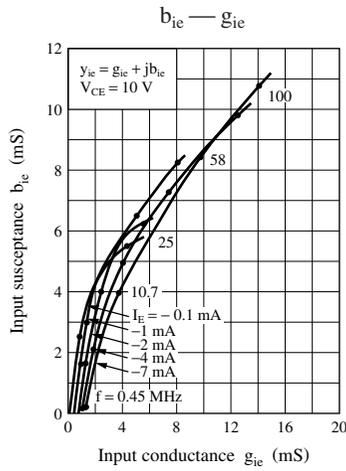
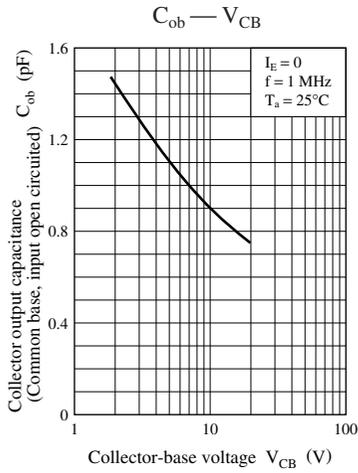
Parameter	Symbol	Conditions	Min	Typ	Max	Unit
Collector-base voltage (Emitter open)	$V_{CBO}$	$I_C = 10 \mu\text{A}$ , $I_E = 0$	30			V
Collector-emitter voltage (Base open)	$V_{CEO}$	$I_C = 2 \text{ mA}$ , $I_B = 0$	20			V
Emitter-base voltage (Collector open)	$V_{EBO}$	$I_E = 10 \mu\text{A}$ , $I_C = 0$	5			V
Forward current transfer ratio *	$h_{FE}$	$V_{CE} = 10 \text{ V}$ , $I_C = 1 \text{ mA}$	70		250	—
Transition frequency	$f_T$	$V_{CB} = 10 \text{ V}$ , $I_E = -1 \text{ mA}$ , $f = 200 \text{ MHz}$	150	230		MHz
Reverse transfer capacitance (Common emitter)	$C_{re}$	$V_{CB} = 10 \text{ V}$ , $I_E = -1 \text{ mA}$ , $f = 10.7 \text{ MHz}$		1.3		pF

Note) 1. Measuring methods are based on JAPANESE INDUSTRIAL STANDARD JIS C 7030 measuring methods for transistors.

2. \*: Rank classification

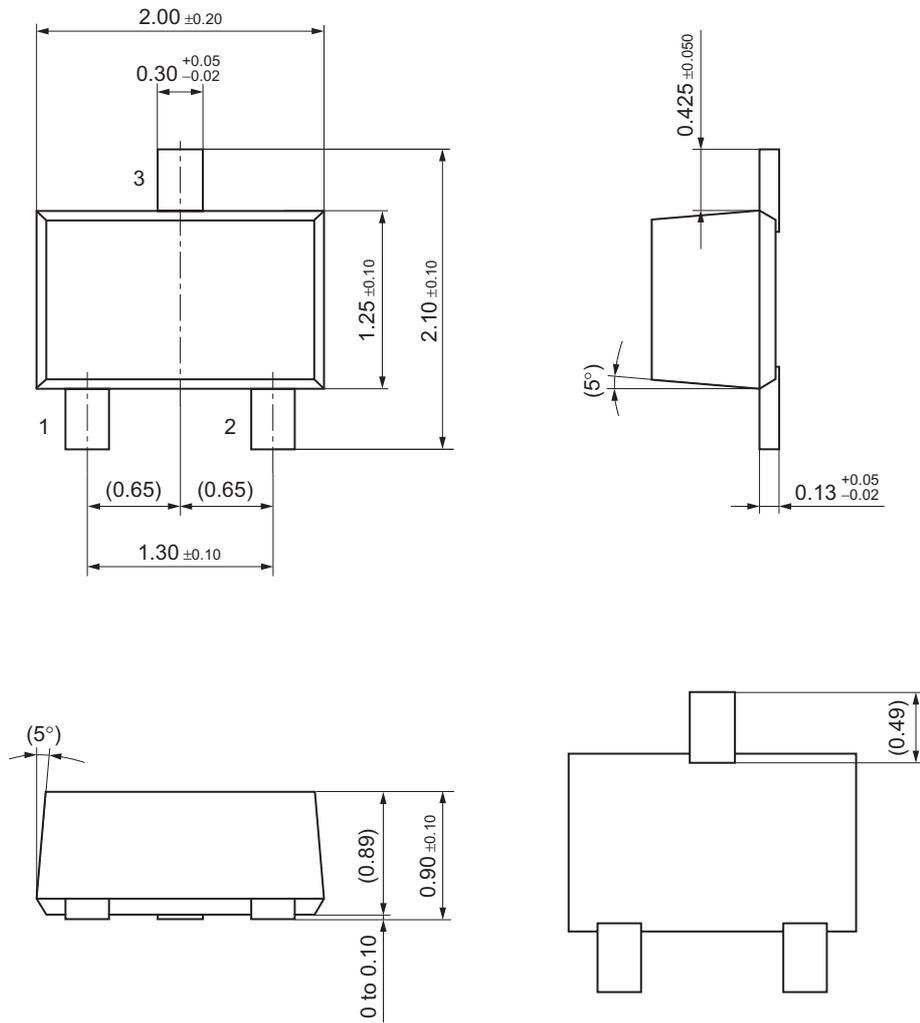
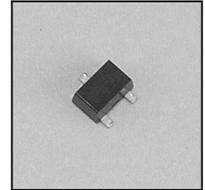
Rank	B	C
$h_{FE}$	70 to 160	110 to 250





SMini3-F2

Unit: mm



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