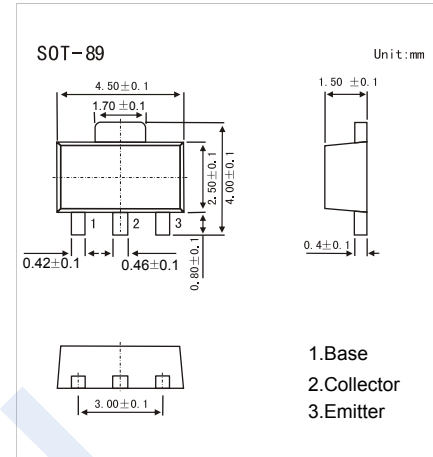


## PNP Transistors

### 2SB1119

#### ■ Features

- Very small size making it easy to provide high density, small-sized hybrid IC's.
- Complementary to 2SD1619



#### ■ Absolute Maximum Ratings Ta = 25°C

Parameter	Symbol	Rating	Unit
Collector - Base Voltage	V <sub>CBO</sub>	-25	V
Collector - Emitter Voltage	V <sub>CEO</sub>	-25	
Emitter - Base Voltage	V <sub>EBO</sub>	-5	
Collector Current - Continuous	I <sub>C</sub>	-1	A
Collector current -Pulse	I <sub>CP</sub>	-2	
Collector Power Dissipation (Note.1)	P <sub>C</sub>	0.5 1.3	W
Junction Temperature	T <sub>J</sub>	150	
Storage Temperature range	T <sub>stg</sub>	-55 to 150	

Note.1: Mounted on ceramic board (250mm<sup>2</sup> × 0.8mm)

#### ■ Electrical Characteristics Ta = 25°C

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Collector- base breakdown voltage	V <sub>CBO</sub>	I <sub>C</sub> = -100 μA, I <sub>E</sub> =0	-25			V
Collector- emitter breakdown voltage	V <sub>CEO</sub>	I <sub>C</sub> = -1 mA, R <sub>BE</sub> =∞	-25			
Emitter - base breakdown voltage	V <sub>EBO</sub>	I <sub>E</sub> = -100 μA, I <sub>C</sub> =0	-5			
Collector-base cut-off current	I <sub>CBO</sub>	V <sub>CB</sub> = -20V, I <sub>E</sub> =0			-0.1	μA
Emitter cut-off current	I <sub>EBO</sub>	V <sub>EB</sub> = -4V, I <sub>C</sub> =0			-0.1	
Collector-emitter saturation voltage	V <sub>CE(sat)</sub>	I <sub>C</sub> =-500 mA, I <sub>B</sub> =-50mA		-0.15	-0.7	V
Base - emitter saturation voltage	V <sub>BE(sat)</sub>	I <sub>C</sub> =-500 mA, I <sub>B</sub> =-50mA		-0.85	-1.2	
DC current gain	h <sub>FE</sub>	V <sub>CE</sub> = -2V, I <sub>C</sub> = -50 mA	100		560	
		V <sub>CE</sub> = -2V, I <sub>C</sub> = -1 A	40			
Collector output capacitance	C <sub>ob</sub>	V <sub>CB</sub> = -10V, I <sub>E</sub> = 0, f = 1MHz		25		pF
Transition frequency	f <sub>T</sub>	V <sub>CE</sub> = -10V, I <sub>C</sub> = -50mA		180		MHz

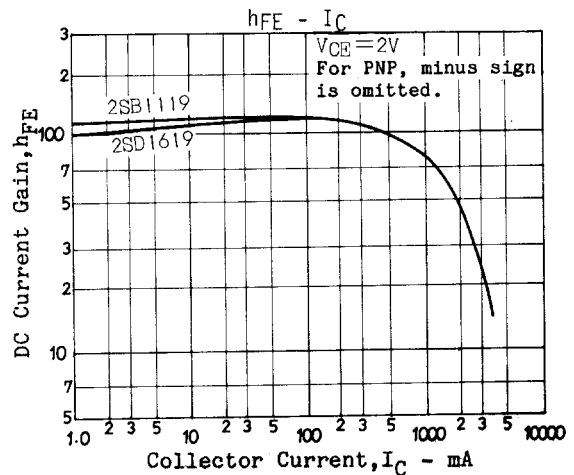
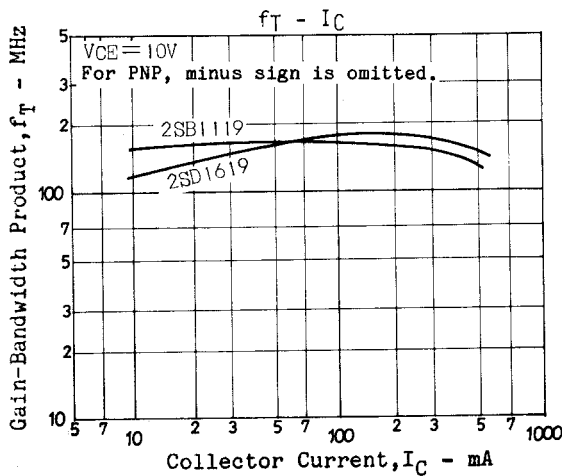
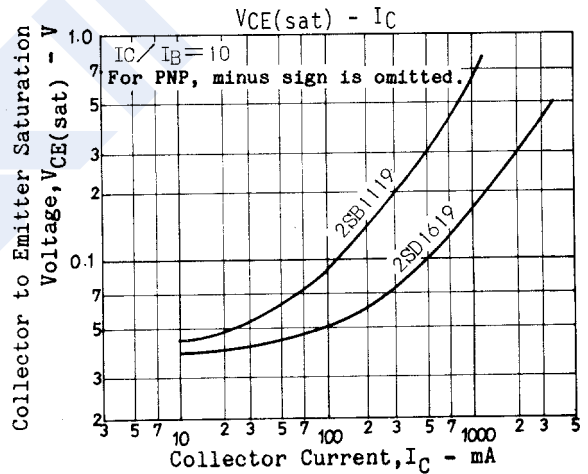
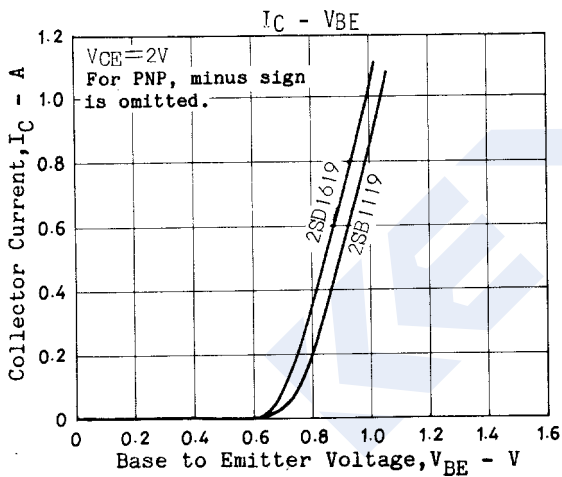
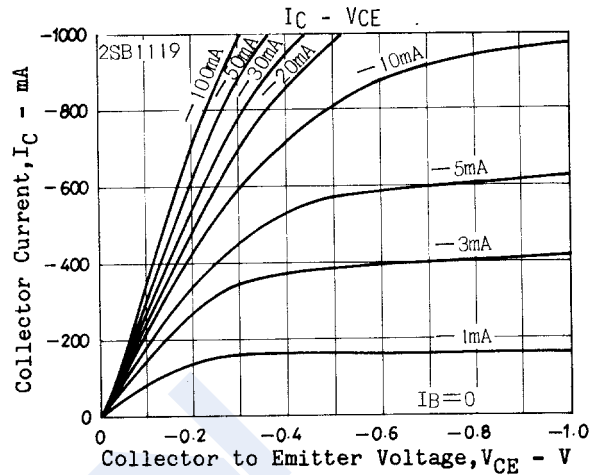
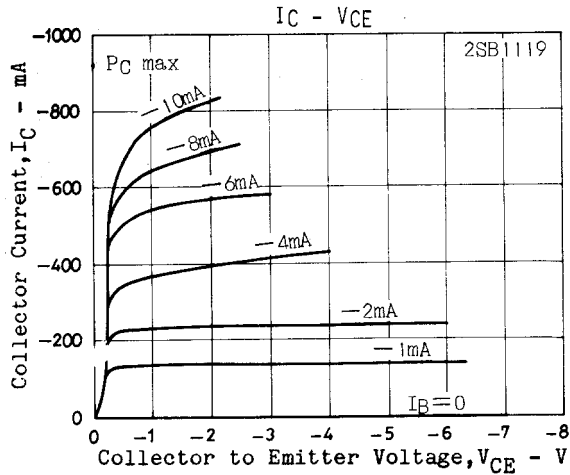
#### ■ Classification of h<sub>FE</sub>(1)

Type	2SB1119-R	2SB1119-S	2SB1119-T	2SB1119-U
Range	100-200	140-280	200-400	280-560
Marking	BB R*	BB S*	BB T*	BB U*

# PNP Transistors

## 2SB1119

■ Typical Characteristics



### PNP Transistors

### 2SB1119

■ Typical Characteristics

