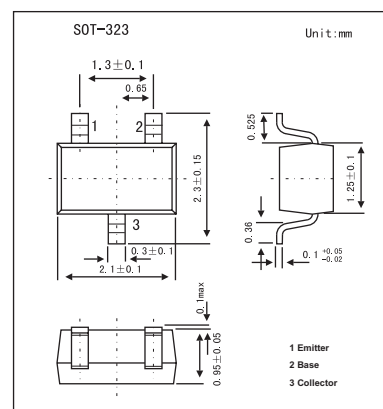


## Silicon PNP Epitaxial Planar Type

## 2SB1218

## ■ Features

- High forward current transfer ratio  $h_{FE}$ .

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

Parameter	Symbol	Rating	Unit
Collector-base voltage	$V_{CBO}$	-45	V
Collector-emitter voltage	$V_{CEO}$	-45	V
Emitter-base voltage	$V_{EBO}$	-7	V
Peak collector current	$I_{CP}$	-200	A
Collector current	$I_C$	-100	A
Collector power dissipation	$P_C$	150	mW
Junction temperature	$T_j$	150	$^\circ\text{C}$
Storage temperature	$T_{stg}$	-55 to +150	$^\circ\text{C}$

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

Parameter	Symbol	Testconditions	Min	Typ	Max	Unit
Collector-base voltage	$V_{CBO}$	$I_C = -10 \mu\text{A}$ , $I_E = 0$	-45			V
Collector-emitter voltage	$V_{CEO}$	$I_C = -2 \text{ mA}$ , $I_B = 0$	-45			V
Emitter-base voltage	$V_{EBO}$	$I_E = -10 \mu\text{A}$ , $I_C = 0$	-7			V
Collector-base cutoff current	$I_{CBO}$	$V_{CB} = -20 \text{ V}$ , $I_E = 0$			-0.1	$\mu\text{A}$
Collector-emitter cutoff current	$I_{CEO}$	$V_{CE} = -10 \text{ V}$ , $I_B = 0$			-100	$\mu\text{A}$
Forward current transfer ratio	$h_{FE}$	$V_{CE} = -10 \text{ V}$ , $I_C = -2 \text{ mA}$	160		460	
Collector-emitter saturation voltage	$V_{CE(sat)}$	$I_C = -100 \text{ mA}$ , $I_B = -10 \text{ mA}$		-0.3	-0.5	V
Transition frequency	$f_T$	$V_{CB} = -10 \text{ V}$ , $I_E = 1 \text{ mA}$ , $f = 200 \text{ MHz}$		80		MHz
Collector output capacitance	$C_{ob}$	$V_{CB} = -10 \text{ V}$ , $I_E = 0$ , $f = 1 \text{ MHz}$		2.7		pF

■  $h_{FE}$  Classification

Marking	BQ	BR	BS	B
Rank	Q	R	S	No-rank
$h_{FE}$	160~260	210~340	290~460	160~460