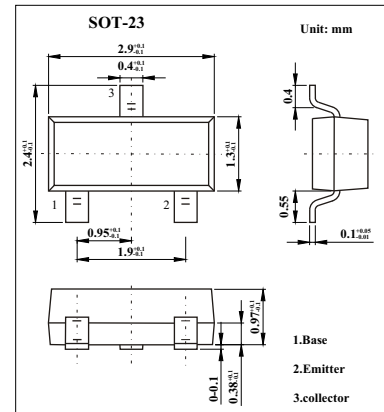


NPN Silicon Transistor

KST9018

Features

High current gain bandwidth product.
power dissipation.(PC=200mW)



Absolute Maximum Ratings Ta = 25

Parameter	Symbol	Rating	Unit
Collector to Base Voltage	V_{CBO}	30	V
Collector to Emitter Voltage	V_{CEO}	15	V
Emitter to Base Voltage	V_{EBO}	5	V
Collector Current to Continuous	I_C	50	mA
Collector Power Dissipation	P_C	200	mW
Junction Temperature	T_j	150	
Storage Temperature	T_{stg}	-55 to 150	

Electrical Characteristics Ta = 25

Parameter	Symbol	Testconditions	Min	Typ	Max	Unit
Collector to base breakdown voltage	$V_{(BR)CBO}$	$I_C = 100 \mu A, I_E = 0$	30			V
Collector to emitter breakdown voltage	$V_{(BR)CEO}$	$I_C = 1mA, I_B = 0$	15			V
Emitter to base breakdown voltage	$V_{(BR)EBO}$	$I_E = 100 \mu A, I_C = 0$	5			V
Collector cut to off current	I_{CBO}	$V_{CB} = 12V, I_E = 0$			0.05	μA
Emitter cut to off current	I_{EBO}	$V_{EB} = 3V, I_C = 0$			0.1	μA
DC current gain	h_{FE}	$V_{CE} = 5V, I_C = 1mA$	70		190	
Collector to emitter saturation voltage	$V_{CE(sat)}$	$I_C = 10mA, I_B = 1mA$			0.5	V
Base to emitter saturation voltage	$V_{BE(sat)}$	$I_C = 10mA, I_B = 1mA$			1.4	V
Transition frequency	f_T	$V_{CE} = 5V, I_C = 5mA, f = 400MHz$	600			MHz

Marking

Marking	J8
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