

BCW31

NPN EPITAXIAL SILICON TRANSISTOR

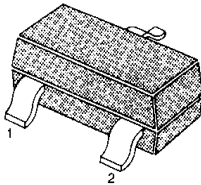
GENERAL PURPOSE TRANSISTOR

ABSOLUTE MAXIMUM RATINGS (T_A=25 °C)

Characteristic	Symbol	Rating	Unit
Collector-Base Voltage	V _{CBO}	30	V
Collector-Emitter Voltage	V _{CEO}	20	V
Emitter-Base Voltage	V _{EBO}	5	V
Collector Current	I _C	100	mA
Collector Dissipation	P _C	350	mW
Storage Temperature	T _{STG}	150	°C

• Refer to KST5088 for graphs

SOT-23

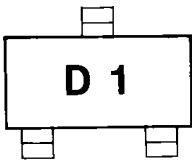


1. Base 2. Emitter 3. Collector

ELECTRICAL CHARACTERISTICS (T_A=25 °C)

Characteristic	Symbol	Test Conditions	Min	Typ	Max	Unit
Collector-Base Breakdown Voltage	BV _{CBO}	I _C =10 μA, I _E =0	30			V
Collector-Emitter Breakdown Voltage	BV _{CEO}	I _C =2mA, I _B =0	20			V
Emitter-Base Breakdown Voltage	BV _{EBO}	I _E =10 μA, I _C =0	5			V
DC Current Gain	h _{FE}	V _{CE} =5V, I _C =2mA	110		220	
Collector-Emitter Saturation Voltage	V _{CE} (sat)	I _C =10mA, I _B =0.5mA			0.25	V
Base-Emitter On Voltage	V _{BE} (on)	V _{CE} =5V, I _C =2mA	0.55		0.7	V
Output Capacitance	C _{OB}	V _{CB} =10V, I _E =0 f=1MHz			4	pF
Noise Figures	NF	V _{CE} =5V, I _C =0.2mA R _G =2kΩ, f=1KHz			10	dB

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