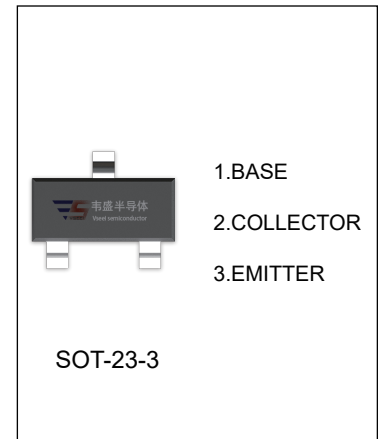


BCW61 TRANSISTOR (PNP)

FEATURES

- Low current
- Low voltage
- General Purpose Transistor



MAXIMUM RATINGS ($T_a=25^{\circ}\text{C}$ unless otherwise noted)

Symbol	Parameter	Value	Unit
V_{CB0}	Collector-Base Voltage	-32	V
V_{CE0}	Collector-Emitter Voltage	-32	V
V_{EB0}	Emitter-Base Voltage	-5	V
I_C	Collector Current	-100	mA
P_C	Collector Power Dissipation	250	mW
$R_{\theta JA}$	Thermal Resistance From Junction To Ambient	500	$^{\circ}\text{C}/\text{W}$
T_J, T_{stg}	Operation Junction and Storage Temperature Range	-55~+150	$^{\circ}\text{C}$

Parameter	Symbol	Test conditions	Min	Typ	Max	Unit	
Collector-base breakdown voltage	$V_{(BR)CBO}$	$I_C=-10\mu A, I_E=0$	-32			V	
Collector-emitter breakdown voltage	$V_{(BR)CEO}$	$I_C=-1mA, I_B=0$	-32			V	
Emitter-base breakdown voltage	$V_{(BR)EBO}$	$I_E=-10\mu A, I_C=0$	-5			V	
Collector cut-off current	I_{CBO}	$V_{CB}=-32V, I_E=0$			-0.02	μA	
Emitter cut-off current	I_{EBO}	$V_{EB}=-4V, I_C=0$			-0.02	μA	
DC current gain	$h_{FE(1)}$	$V_{CE}=-5V, I_C=-10\mu A$	BCW61B	30			
			BCW61C	40			
			BCW61D	100			
	$h_{FE(2)}$	$V_{CE}=-5V, I_C=-2mA$	BCW61A	120		220	
			BCW61B	180		310	
			BCW61C	250		460	
			BCW61D	380		630	
	$h_{FE(3)}$	$V_{CE}=-1V, I_C=-50mA$	BCW61A	60			
			BCW61B	80			
			BCW61C	100			
			BCW61D	110			
	Collector-emitter saturation voltage	$V_{CE(sat)}$	$I_C=-10mA, I_B=-0.25mA$	-60		-250	mV
$I_C=-50mA, I_B=-1.25mA$			-120		-550	mV	
Base-emitter saturation voltage	$V_{BE(sat)}$	$I_C=-10mA, I_B=-0.25mA$	-0.6		-0.85	V	
		$I_C=-50mA, I_B=-1.25mA$	-0.68		-1.05	V	
Base-emitter voltage	V_{BE}	$V_{CE}=-5V, I_C=-2mA$	-0.6		-0.75	V	
Transition frequency	f_T	$V_{CE}=-5V, I_C=-10mA, f=100MHz$	100			MHz	
Collector output capacitance	C_{ob}	$V_{CB}=-10V, I_E=0, f=1MHz$		4.5		pF	
Emitter input capacitance	C_{ib}	$V_{EB}=-0.5V, I_C=0, f=1MHz$		11		pF	