

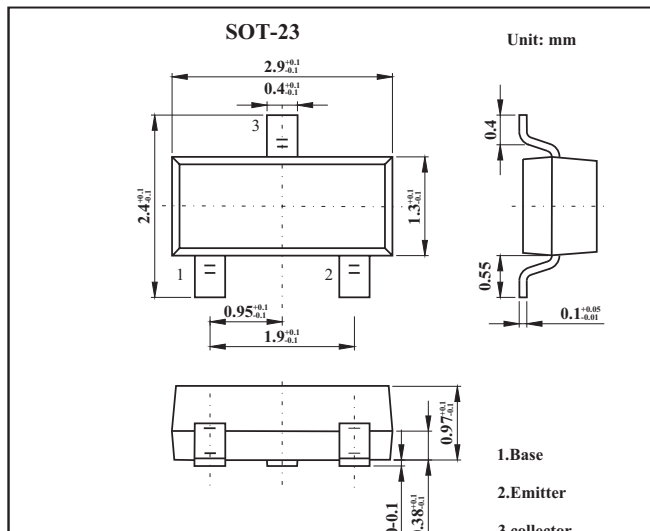
SOT-23 Plastic-Encapsulate Transistors

Features

- High Voltage Transistors
- NPN Silicon
- Power Dissipation of 350mW
- High Stability and High Reliability

MECHANICAL DATA

- Case style:SOT-23molded plastic
- Mounting position:any



MAXIMUM RATINGS AND CHARACTERISTICS

@ 25°C Ambient Temperature (unless otherwise noted)

Parameters	Symbol	Value	Unit
Collector-Base Voltage	V_{CBO}	400	V
Collector-Emitter Voltage	V_{CEO}	400	V
Emitter -Base Voltage	V_{EBO}	6	V
Collector Current-Continuous	I_C	200	mA
Collector Power Dissipation	P_C	350	mW
Junction Temperature	T_j	150	°C
Storage Temperature	T_{stg}	-55-+150	°C
Thermal resistance From junction to ambient	$R_{\theta JA}$	357	°C/W

Electrical Characteristics (Ratings at 25 °C ambient temperature unless otherwise specified).

Parameter	Symbols	Test Condition	Limits		Unit
			Min	Max	
Collector-base breakdown voltage	$V_{(BR)CBO}$	$I_C=100\mu A, I_E=0$	400		V
Collector-emitter breakdown voltage	$V_{(BR)CEO}$	$I_C=1mA, I_B=0$	400		V
Emitter-base breakdown voltage	$V_{(BR)EBO}$	$I_E=10\mu A, I_C=0$	6		V
Collector cut-off current	I_{CBO}	$V_{CB}=400V, I_E=0$		100	nA
Emitter cut-off current	I_{EBO}	$V_{EB}=4V, I_C=0$		100	nA
DC current gain	$h_{FE(1)*}$	$V_{CE}=10V, I_C=1mA$	40		
	$h_{FE(2)*}$	$V_{CE}=10V, I_C=10mA$	50		200
	$h_{FE(3)*}$	$V_{CE}=10V, I_C=50mA$	45		
	$h_{FE(4)*}$	$V_{CE}=10V, I_C=100mA$	40		
Collector-emitter saturation voltage	$V_{CE(sat)1*}$	$I_C=1mA, I_B=0.1mA$		0.40	V
Collector-emitter saturation voltage	$V_{CE(sat)2*}$	$I_C=10mA, I_B=1mA$		0.50	V
Collector-emitter saturation voltage	$V_{CE(sat)3*}$	$I_C=50mA, I_B=5mA$		0.75	V
Base -emitter saturation voltage	$V_{BE(sat)*}$	$I_C=10mA, I_B=1mA$		0.75	V
Collector output capacitance	C_{ob}	$V_{CB}=20V, I_E=0; f=1MHz$		7	pF
Emitter input capacitance	C_{ib}	$V_{EB}=0.5V, I_C=0; f=1MHz$		130	pF

*Pulse test: pulse width $\leq 300\mu s$, duty cycle $\leq 2.0\%$.



RATINGS AND CHARACTERISTIC CURVES

Typical characteristics

