

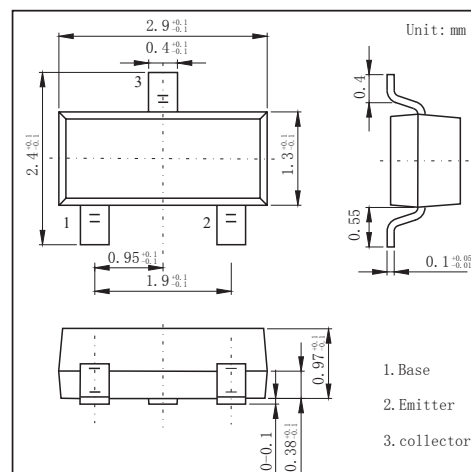
SOT-23 Plastic-Encapsulate Transistors

FEATURES

- Darlington connection for a high Hfe
- High input impedance
- General purpose amplifiers
- TRANSISTOR NPN

MECHANICAL DATA

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



MAXIMUM RATINGS AND CHARACTERISTICS

@ 25°C Ambient Temperature (unless otherwise noted)

Parameter	Symbol	Value	Units
Collector-Base Voltage	V_{CBO}	40	V
Collector-Emitter Voltage	V_{CEO}	32	V
Emitter-Base Voltage	V_{EBO}	12	V
Collector Current -Continuous	I_C	300	mA
Collector Dissipation	P_C	200	mW
Junction and Storage Temperature	T_J, T_{stg}	-55 to +150	°C

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Collector-base breakdown voltage	$V_{(BR)CBO}$	$I_C=100\mu A, I_E=0$	40			V
Collector-emitter breakdown voltage	$V_{(BR)CEO}$	$I_C=10mA, I_B=0$	32			V
Emitter-base breakdown voltage	$V_{(BR)EBO}$	$I_E=100\mu A, I_C=0$	12			V
Collector cut-off current	I_{CBO}	$V_{CB}=30V, I_E=0$				μA
Emitter cut-off current	I_{EBO}	$V_{EB}=12V, I_C=0$			0.1	μA
DC current gain	h_{FE}	$V_{CE}=3V, I_C=100mA=100mA$	5000			
Collector-emitter saturation voltage	$V_{CE(sat)}$	$I_C=200mA, I_B=0.2mA$			1.4	V
Output capacitance	C_{ob}	$V_{CB}=10V, I_E=0, f=1MHz$		2.5		pF
Transition frequency	f_T	$V_{CE}=5V, I_C=10mA, f=100MHz$		220		MHz

RATINGS AND CHARACTERISTIC CURVES

