

DESCRIPTION 2SC2369 is designed for High frequency Low Noise Amplifier.

FEATURES

- NF 1.5 dB TYP. @ f=1.0 GHz
- MAG 14 dB TYP. @ f=1.0 GHz

ABSOLUTE MAXIMUM RATINGS

Maximum Temperatures

Storage Temperature -65 to +150 °C

Junction Temperature +150 °C Maximum

Maximum Power Dissipation (Ta=25 °C)

Total Power Dissipation 250 mW

Maximum Voltages and Current (Ta=25 °C)

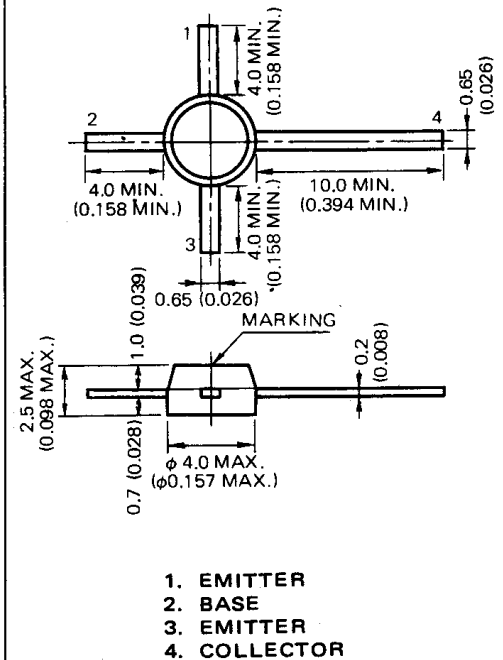
V_{CBO} Collector to Base Voltage 25 V

V_{CEO} Collector to Emitter Voltage 12 V

V_{EBO} Emitter to Base Voltage 3.0 V

I_C Collector Current 70 mA

PACKAGE DIMENSIONS
in millimeters (inches)



ELECTRICAL CHARACTERISTICS (Ta=25 °C)

SYMBOL	CHARACTERISTIC	MIN.	TYP.	MAX.	UNIT	TEST CONDITIONS
h_{FE}	DC Current Gain	40		200		$V_{CE}=10\text{ V}, I_C=20\text{ mA}$
f_T	Gain Bandwidth Product		4.5		GHz	$V_{CE}=10\text{ V}, I_E=20\text{ mA}$
C_{ob}	Output Capacitance		0.75	1.0	pF	$V_{CB}=10\text{ V}, I_E=0, f=1.0\text{ MHz}$
$ S_{21e} ^2$	Insertion Power Gain	9	11		dB	$V_{CE}=10\text{ V}, I_C=20\text{ mA}, f=1.0\text{ GHz}$
NF	Noise Figure		1.5	3.0	dB	$V_{CE}=10\text{ V}, I_C=5\text{ mA}, f=1.0\text{ GHz}$
MAG	Maximum Available Gain		14		dB	$V_{CE}=10\text{ V}, I_C=20\text{ mA}, f=1.0\text{ GHz}$
I _{CBO}	Collector Cutoff Current			0.1	μA	$V_{CB}=15\text{ V}, I_E=0$
I _{EBO}	Emitter Cutoff Current			0.1	μA	$V_{EB}=2.0\text{ V}, I_C=0$