

**Silicon NPN Power Transistors**

**2SC1929**

**DESCRIPTION**

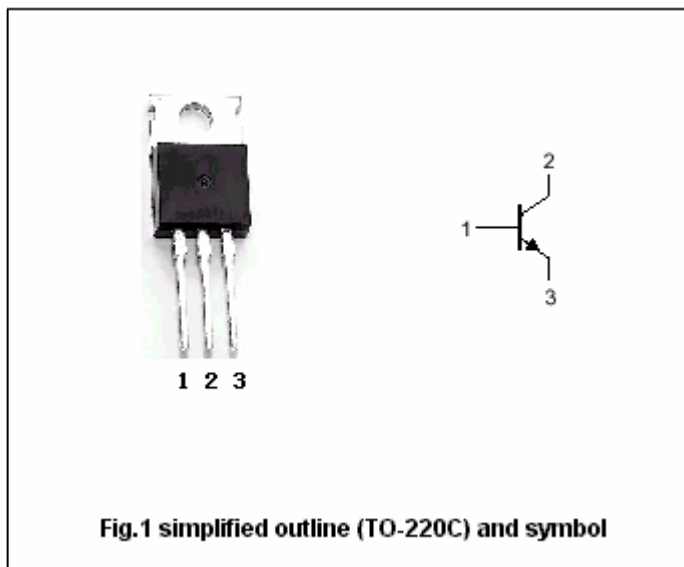
- With TO-220C package
- High  $V_{CEO}$
- Large  $P_C$

**APPLICATIONS**

- AF output for direct main operation TV

**PINNING**

PIN	DESCRIPTION
1	Base
2	Collector;connected to mounting base
3	Emitter



**Fig.1 simplified outline (TO-220C) and symbol**

**Absolute maximum ratings (Tc=25°C)**

SYMBOL	PARAMETER	CONDITIONS	VALUE	UNIT
$V_{CBO}$	Collector-base voltage	Open emitter	300	V
$V_{CEO}$	Collector-emitter voltage	Open base	300	V
$V_{EBO}$	Emitter-base voltage	Open collector	6	V
$I_C$	Collector current		0.4	A
$I_{CM}$	Collector current-Peak		1	A
$P_C$	Total power dissipation	$T_C=25^\circ C$	25	W
$T_j$	Junction temperature		150	°C
$T_{stg}$	Storage temperature		-55~150	°C

## Silicon NPN Power Transistors

## 2SC1929

## CHARACTERISTICS

T<sub>j</sub>=25°C unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
V <sub>(BR)CEO</sub>	Collector-emitter breakdown voltage	I <sub>C</sub> =10mA ; I <sub>B</sub> =0	300			V
V <sub>(BR)EBO</sub>	Emitter-base breakdown voltage	I <sub>E</sub> =5mA ; I <sub>C</sub> =0	6			V
V <sub>CEsat</sub>	Collector-emitter saturation voltage	I <sub>C</sub> =500mA ; I <sub>B</sub> =50mA			2.0	V
V <sub>BEsat</sub>	Base-emitter on voltage	I <sub>C</sub> =0.1A ; V <sub>CE</sub> =5V			1.5	V
I <sub>CBO</sub>	Collector cut-off current	V <sub>CB</sub> =300V ; I <sub>E</sub> =0			10	μA
h <sub>FE-1</sub>	DC current gain	I <sub>C</sub> =0.1A ; V <sub>CE</sub> =5V	35		330	
h <sub>FE-2</sub>	DC current gain	I <sub>C</sub> =0.3A ; V <sub>CE</sub> =5V	30			
f <sub>T</sub>	Transition frequency	I <sub>C</sub> =0.1A ; V <sub>CE</sub> =5V		80		MHz

◆ h<sub>FE-1</sub> Classifications

S	R	Q	P
35-70	60-120	100-200	165-330

Silicon NPN Power Transistors

2SC1929

PACKAGE OUTLINE

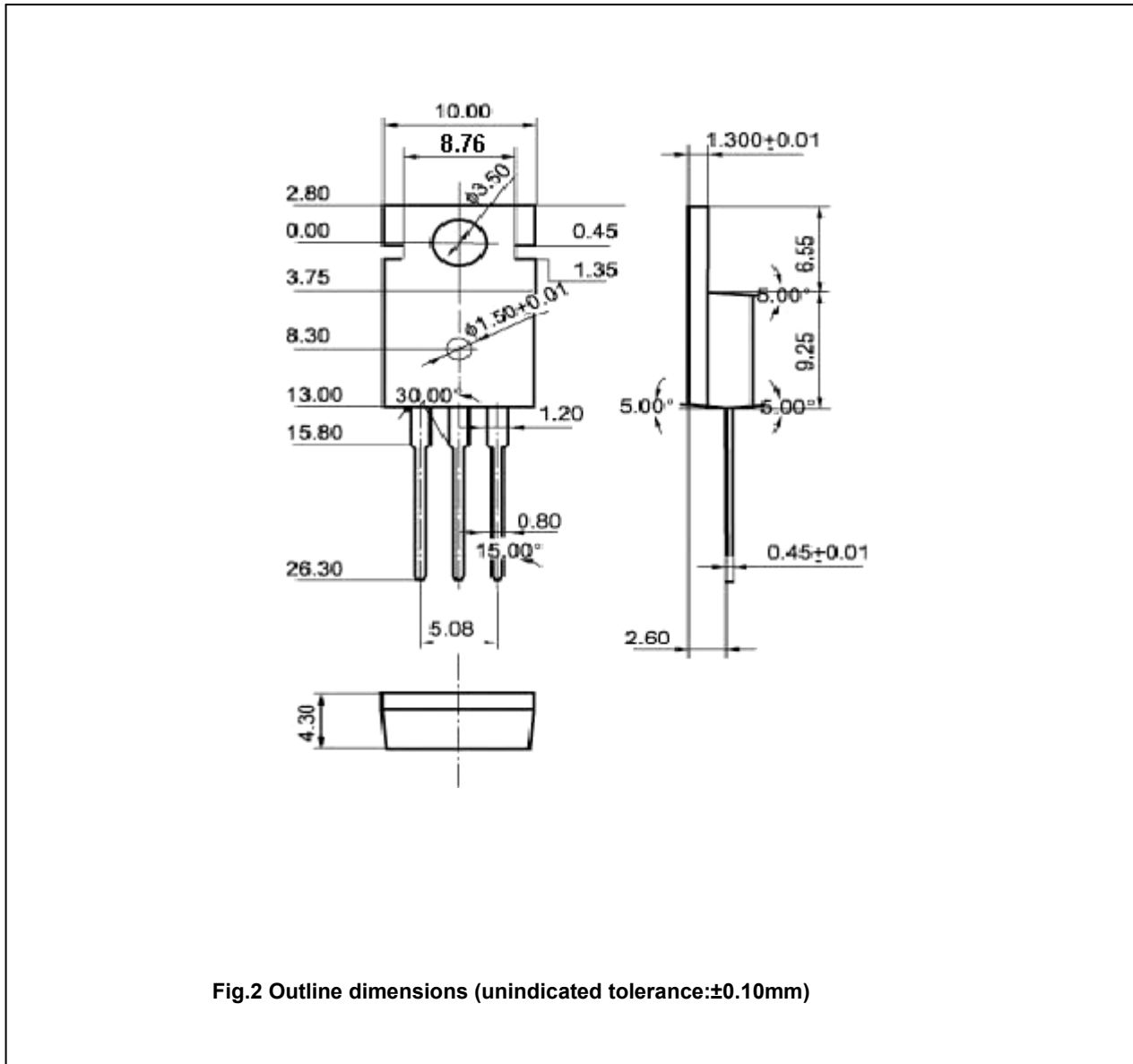


Fig.2 Outline dimensions (unindicated tolerance:±0.10mm)