

Silicon NPN Power Transistors

2SC1819M

DESCRIPTION

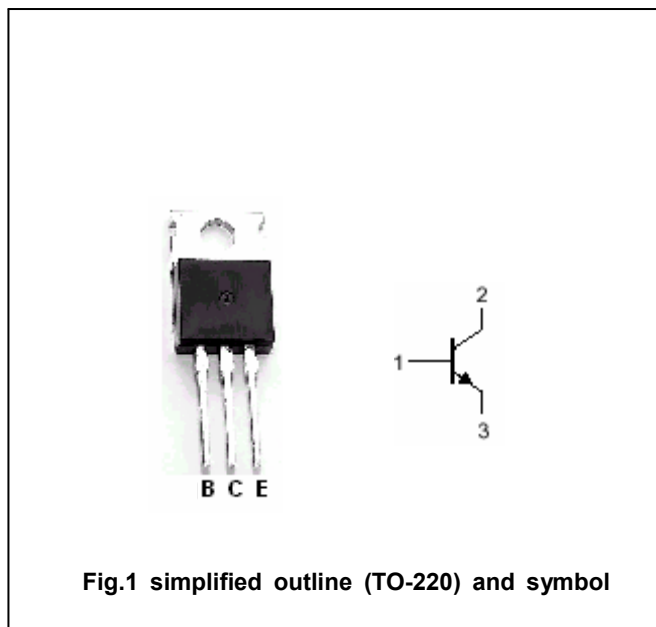
- With TO-220 package
- High V_{CEO}
- Large P_C

APPLICATIONS

- For use in line-operated color TV chroma output circuits.

PINNING

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

Absolute maximum ratings ($T_a=25^\circ\text{C}$)

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	7	V
I_C	Collector current		0.1	A
I_{CM}	Collector current-peak		0.2	A
P_C	Collector power dissipation	$T_C=25^\circ\text{C}$	15	W
T_j	Junction temperature		150	$^\circ\text{C}$
T_{stg}	Storage temperature		-55~150	$^\circ\text{C}$

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CHARACTERISTICS

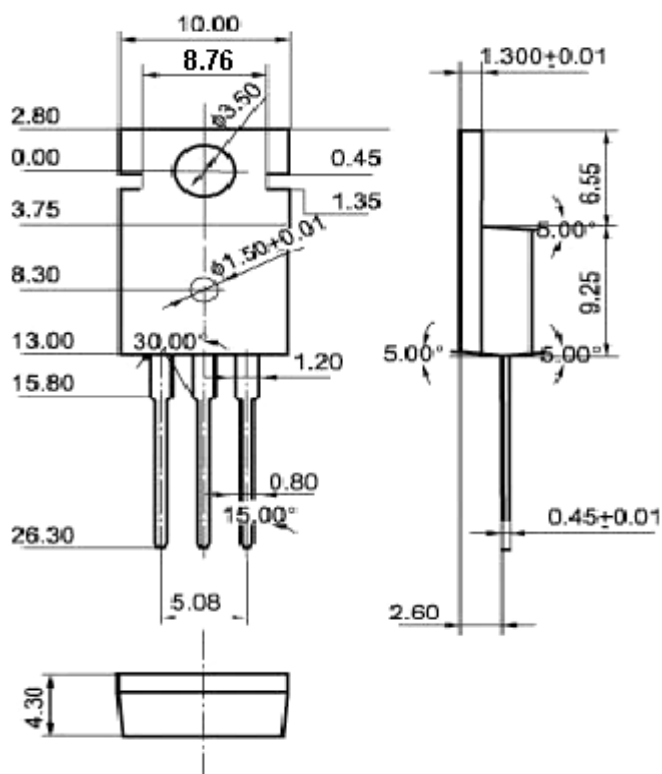
Tj=25°C unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
$V_{(BR)CBO}$	Collector-base breakdown voltage	$I_C=100\mu A ; I_E=0$	300			V
$V_{(BR)CEO}$	Collector-emitter breakdown voltage	$I_C=100A ; I_B=0$	300			V
$V_{(BR)EBO}$	Emitter-base breakdown voltage	$I_E=100\mu A ; I_C=0$	7			V
V_{CEsat}	Collector-emitter saturation voltage	$I_C=50mA ; I_B=5mA$			1.5	V
V_{BE}	Base-emitter on voltage	$I_C=30mA ; V_{CE}=10V$			1.2	V
h_{FE-1}	DC current gain	$I_C=5mA ; V_{CE}=50V$	50		250	
h_{FE-2}	DC current gain	$I_C=30mA ; V_{CE}=10V$	30			
C_{OB}	Output capacitance	$I_E=0 ; V_{CB}=30V ; f=1MHz$			5	pF
f_T	Transition frequency	$I_C=20mA ; V_{CE}=30V$	70			MHz

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PACKAGE OUTLINE

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