

Silicon NPN Power Transistors

2SC1894

DESCRIPTION

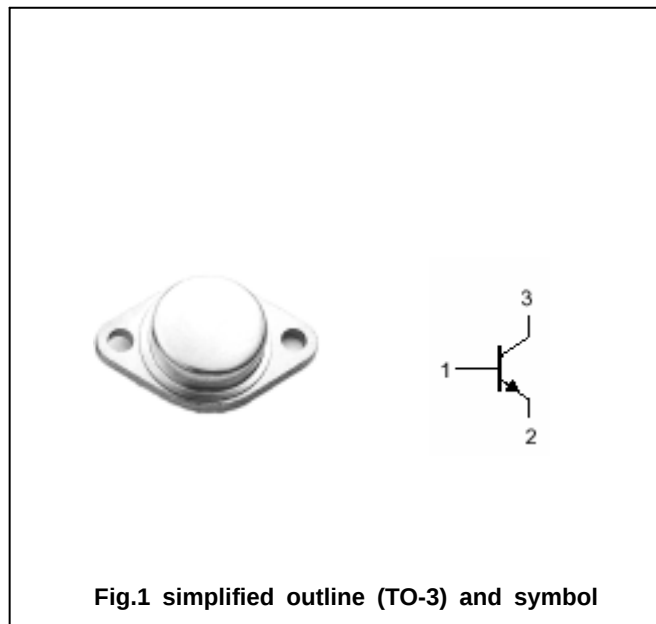
- With TO-3 package
- High breakdown voltage
- Low collector saturation voltage

APPLICATIONS

- For color TV horizontal output applications

PINNING(see Fig.2)

PIN	DESCRIPTION
1	Base
2	Emitter
3	Collector

Absolute maximum ratings($T_a =$)

SYMBOL	PARAMETER	CONDITIONS	VALUE	UNIT
V_{CBO}	Collector-base voltage	Open emitter	1500	V
V_{CEO}	Collector-emitter voltage	Open base	600	V
V_{EBO}	Emitter-base voltage	Open collector	5	V
I_C	Collector current		5	A
P_C	Collector power dissipation	$T_C = 25$	50	W
T_j	Junction temperature		150	
T_{stg}	Storage temperature		-55~150	

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CHARACTERISTICS

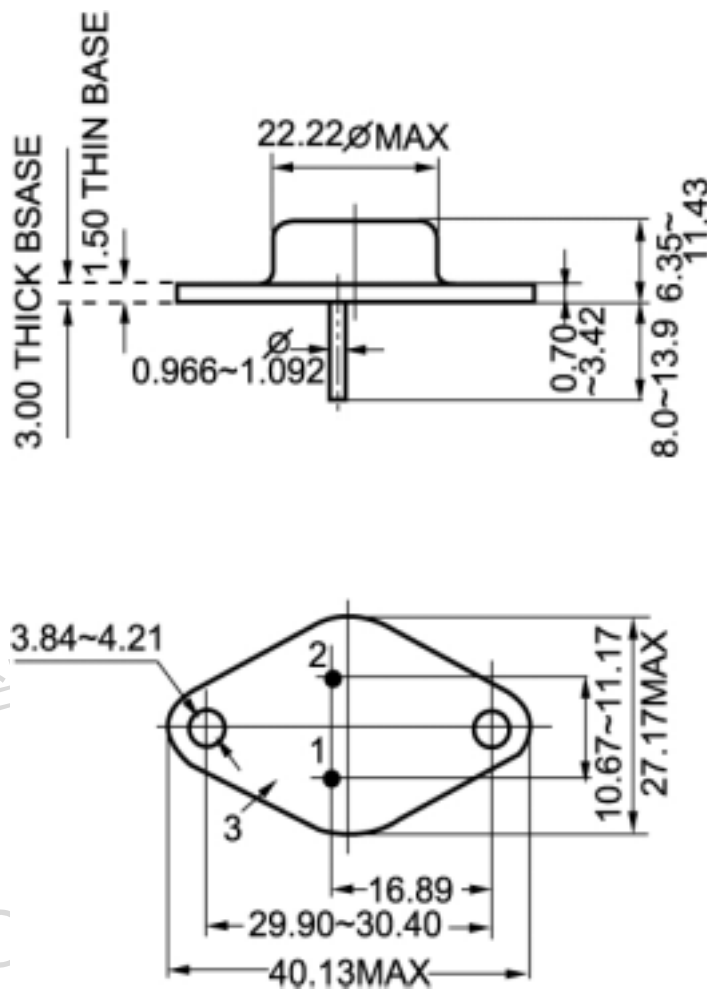
Tj=25 unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
$V_{CEO(SUS)}$	Collector-emitter sustaining voltage	$I_C=0.1A ; I_B=0$	600			V
$V_{(BR)EBO}$	Emitter-base breakdown voltage	$I_E=1mA ; I_C=0$	5			V
V_{CESat}	Collector-emitter saturation voltage	$I_C=4A ; I_B=0.8A$			5.0	V
V_{BESat}	Base-emitter saturation voltage	$I_C=4A ; I_B=0.8A$			1.5	V
I_{CBO}	Collector cut-off current	$V_{CB}=750V ; I_E=0$			50	μA
I_{EBO}	Emitter cut-off current	$V_{EB}=5V ; I_C=0$			50	μA
h_{FE}	DC current gain	$I_C=1A ; V_{CE}=5V$	10		40	
f_T	Transition frequency	$I_C=0.1A ; V_{CE}=10V$		3		MHz
C_{OB}	Collector output capacitance	$I_E=0 ; V_{CB}=10V ; f=1MHz$		155		pF

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PACKAGE OUTLINE

Fig.2 outline dimensions (unindicated tolerance: $\pm 0.1\text{mm}$)