

Silicon PNP Power Transistors

2SB1291

DESCRIPTION

- With TO-220C package
- Low saturation voltage
- Complement to type 2SD1720
- Excellent DC current gain characteristics
- Wide area of safe operation

APPLICATIONS

- For use in low frequency power amplifier applications, power drivers and DC-DC converters

PINNING

PIN	DESCRIPTION
1	Emitter
2	Collector
3	Base

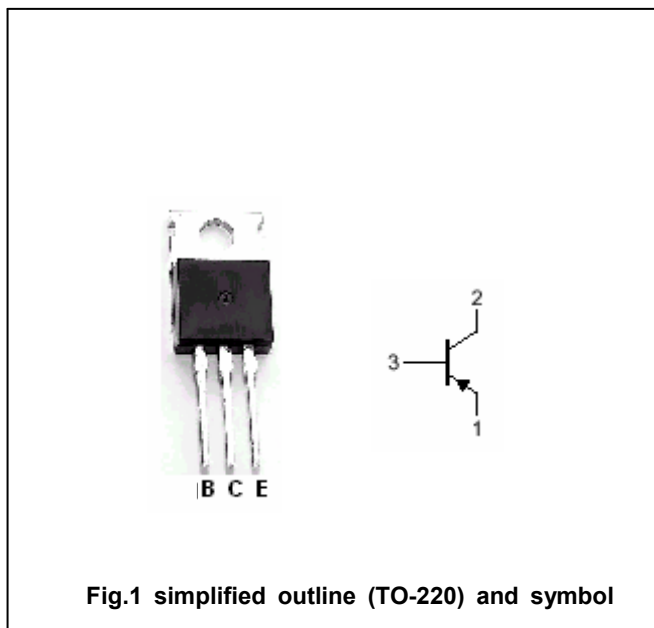


Fig.1 simplified outline (TO-220) and symbol

Absolute maximum ratings(Ta=25°C)

SYMBOL	PARAMETER	CONDITIONS	VALUE	UNIT
V _{CBO}	Collector-base voltage	Open emitter	-60	V
V _{CEO}	Collector-emitter voltage	Open base	-60	V
V _{EBO}	Emitter-base voltage	Open collector	-5	V
I _C	Collector current (DC)		-5	A
I _{CM}	Collector current-Peak		-10	A
P _C	Collector power dissipation	T _C =25°C	40	W
		T _a =25°C	2	
T _j	Junction temperature		150	°C
T _{stg}	Storage temperature		-55~150	°C

Silicon PNP Power Transistors

2SB1291

CHARACTERISTICS

T_j=25°C unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
V _{(BR)CEO}	Collector-emitter breakdown voltage	I _C =-1mA, I _B =0	-60			V
V _{(BR)CBO}	Collector-base breakdown voltage	I _C =-50μA, I _E =0	-60			V
V _{(BR)EBO}	Emitter-base breakdown voltage	I _E =-50μA, I _C =0	-5			V
V _{CEsat}	Collector-emitter saturation voltage	I _C =-3A; I _B =-0.3A			-1.5	V
V _{BEsat}	Base-emitter saturation voltage	I _C =-3A; I _B =-0.3A			-1.5	V
I _{CBO}	Collector cut-off current	V _{CB} =-60V; I _E =0			-10	μA
I _{EBO}	Emitter cut-off current	V _{EB} =-4V; I _C =0			-10	μA
h _{FE}	DC current gain	I _C =-1A; V _{CE} =-5V	100		320	
f _T	Transition frequency	I _C =-0.5A; V _{CE} =-5V		12		MHz
C _{ob}	Output capacitance	I _E =0; V _{CB} =-10V, f=1MHz		150		pF

◆ h_{FE} Classifications

E	F
100-200	160-320

Silicon PNP Power Transistors

2SB1291

PACKAGE OUTLINE

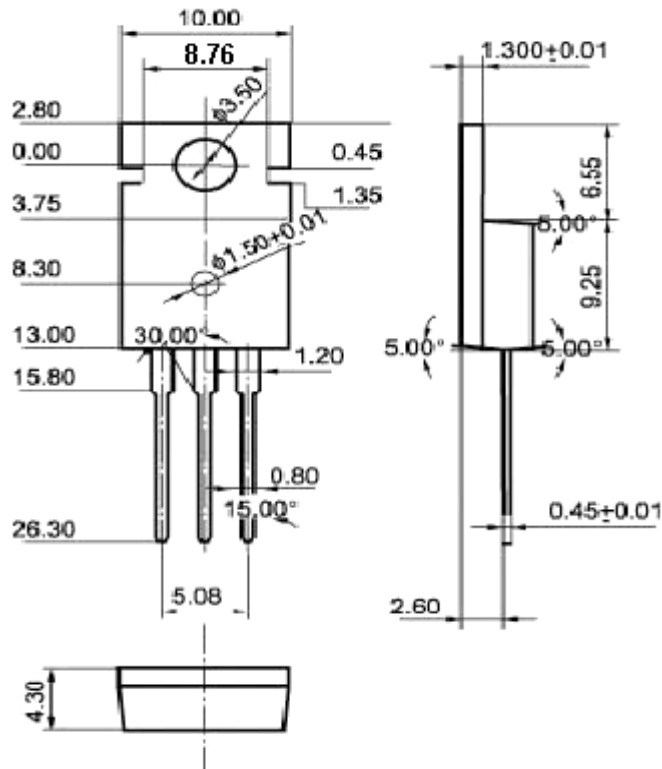


Fig.2 Outline dimensions (unindicated tolerance: ± 0.10 mm)