

Silicon PNP Power Transistors

2SB1481

DESCRIPTION

- With TO-220F package
- Complement to type 2SD2241
- High DC current gain.
- Low saturation voltage.
- DARLINGTON

APPLICATIONS

- For power amplifier applications

PINNING

PIN	DESCRIPTION
1	Base
2	Collector
3	Emitter

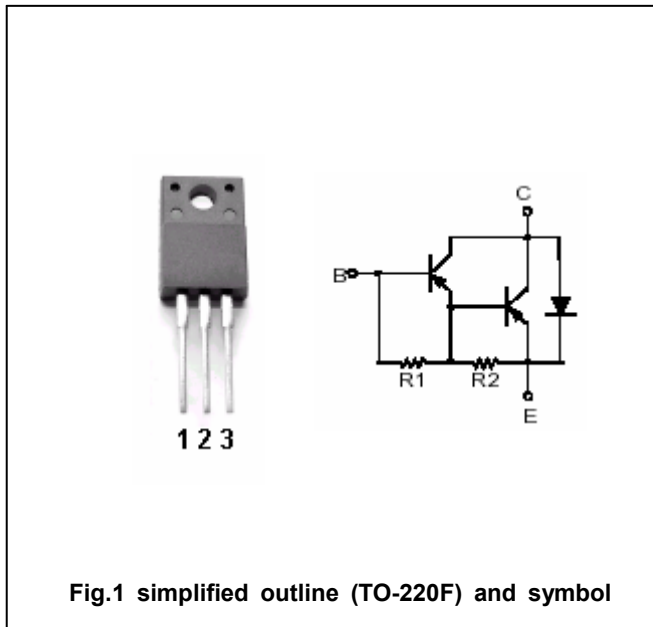


Fig.1 simplified outline (TO-220F) and symbol

Absolute maximum ratings (Ta=25°C)

SYMBOL	PARAMETER	CONDITIONS	VALUE	UNIT
V <sub>CBO</sub>	Collector-base voltage	Open emitter	-100	V
V <sub>CEO</sub>	Collector-emitter voltage	Open base	-100	V
V <sub>EBO</sub>	Emitter-base voltage	Open collector	-5	V
I <sub>C</sub>	Collector current		±4	A
I <sub>CM</sub>	Collector current-peak		±6	A
P <sub>C</sub>	Collector dissipation	T <sub>C</sub> =25°C	25	W
		T <sub>a</sub> =25°C	2	
T <sub>j</sub>	Junction temperature		150	°C
T <sub>stg</sub>	Storage temperature		-55~150	°C

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## 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	-100			V
V <sub>CEsat</sub>	Collector-emitter saturation voltage	I <sub>C</sub> =-3A ; I <sub>B</sub> =-6mA			-1.5	V
V <sub>BEsat</sub>	Base-emitter saturation voltage	I <sub>C</sub> =-3A ; I <sub>B</sub> =-6mA			-2.0	V
I <sub>CBO</sub>	Collector cut-off current	V <sub>CB</sub> =-100V; I <sub>E</sub> =0			-2	μA
I <sub>EBO</sub>	Emitter cut-off current	V <sub>EB</sub> =-5V; I <sub>C</sub> =0			-2.5	mA
h <sub>FE-1</sub>	DC current gain	I <sub>C</sub> =-1.5A ; V <sub>CE</sub> =-2V	2000			
h <sub>FE-2</sub>	DC current gain	I <sub>C</sub> =-3A ; V <sub>CE</sub> =-2V	1000			
V <sub>ECO</sub>	Diode forward voltage	I <sub>C</sub> =1A ; I <sub>B</sub> =0			2.0	V

t <sub>on</sub>	Turn-on time	I <sub>B1</sub> =-I <sub>B2</sub> =-6mA V <sub>CC</sub> =-30V; R <sub>L</sub> =10Ω		0.15		μs
t <sub>stg</sub>	Storage time			0.80		μs
t <sub>f</sub>	Fall time			0.40		μs

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PACKAGE OUTLINE

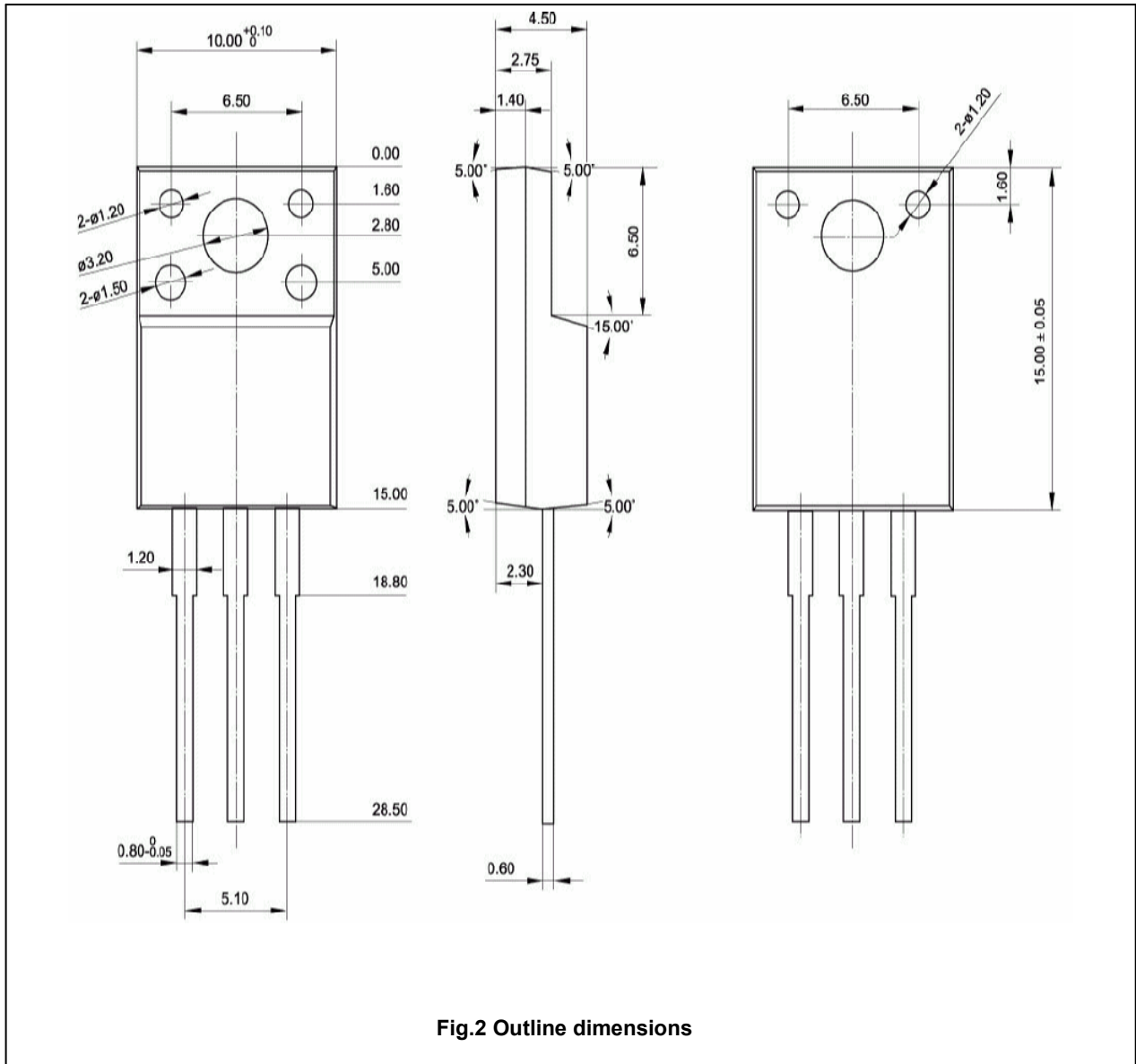


Fig.2 Outline dimensions