

Silicon NPN Power Transistors

2SC2243

DESCRIPTION

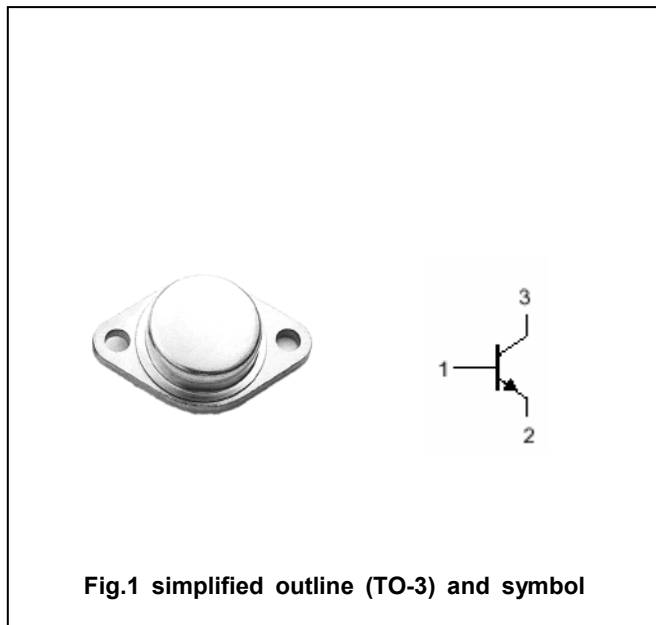
- With TO-3 package
- High voltage ,high speed

APPLICATIONS

- Power switching
- Power amplification
- power driver

PINNING (See Fig.2)

PIN	DESCRIPTION
1	Base
2	Emitter
3	Collector

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

SYMBOL	PARAMETER	CONDITIONS	VALUE	UNIT
V_{CBO}	Collector-base voltage	Open emitter	450	V
V_{CEO}	Collector-emitter voltage	Open base	400	V
V_{EBO}	Emitter-base voltage	Open collector	5	V
I_C	Collector current		5	A
I_{CM}	Collector current-peak		10	A
I_B	Base current		2	A
P_T	Total power dissipation	$T_{mb}=25^\circ\text{C}$	100	W
T_j	Junction temperature		200	$^\circ\text{C}$
T_{stg}	Storage temperature		-65~200	$^\circ\text{C}$

THERMAL CHARACTERISTICS

SYMBOL	PARAMETER	VALUE	UNIT
$R_{th\ j-mb}$	Thermal resistance from junction to mounting base	1.0	$^\circ\text{C}/\text{W}$

Silicon NPN Power Transistors

2SC2243

CHARACTERISTICS

T_j=25°C unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
V _{CEO(SUS)}	Collector-emitter sustaining voltage	I _C =0.1A ; L=25mH	400			V
V _{CEsat}	Collector-emitter saturation voltage	I _C =2A; I _B =0.4A			1.2	V
V _{BEsat}	Base-emitter saturation voltage	I _C =2A; I _B =0.4A			1.5	V
I _{CBO}	Collector cut-off current	V _{CB} =450V; I _E =0 T _C =125°C			1 4	mA
I _{CEO}	Collector cut-off current	V _{CE} =400V; I _B =0			5.0	mA
I _{EBO}	Emitter cut-off current	V _{EB} =5V; I _C =0			1.0	mA
h _{FE}	DC current gain	I _C =2A ; V _{CE} =5V	10			

Switching times

t _{on}	Turn-on time	I _C =2A ; I _{B1} =- I _{B2} =0.4A			1.0	μs
t _s	Storage time				2.0	μs
t _f	Fall time				1.0	μs

Silicon NPN Power Transistors

2SC2243

PACKAGE OUTLINE

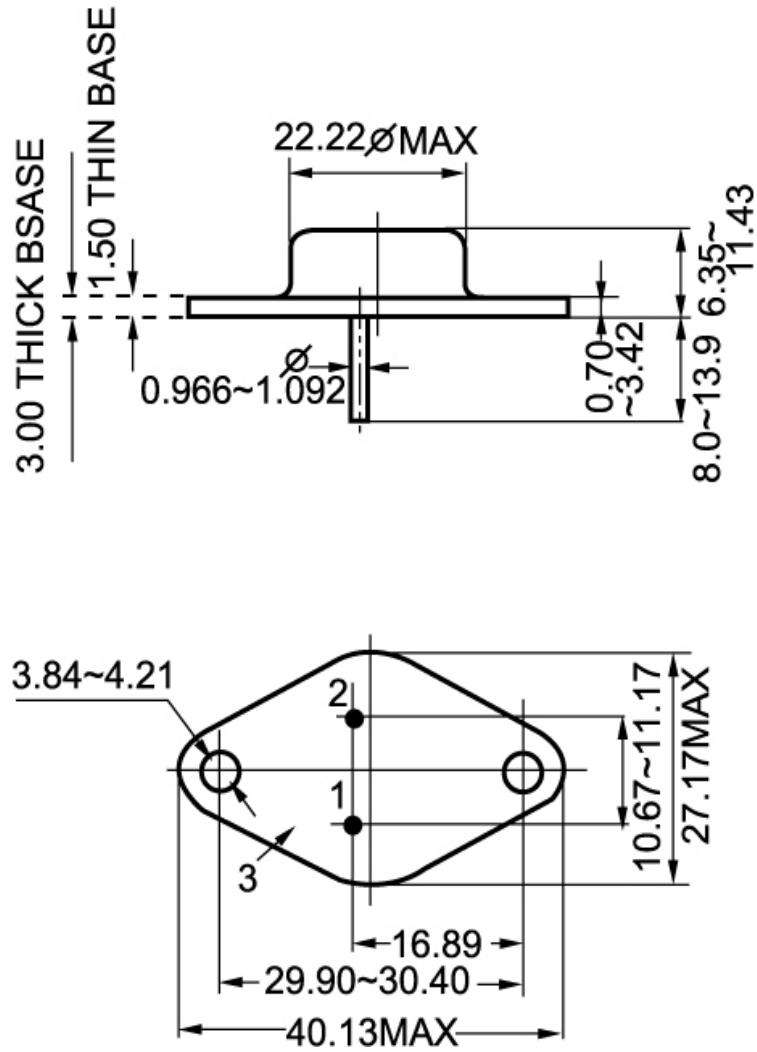


Fig.2 Outline dimensions