

Silicon NPN Power Transistors

2SC4764

DESCRIPTION

- With TO-3P(H)IS package
- High speed
- High voltage
- Low saturation voltage
- Built-in damper type

APPLICATIONS

- Horizontal deflection output for medium resolution display

PINNING

PIN	DESCRIPTION
1	Base
2	Collector
3	Emitter

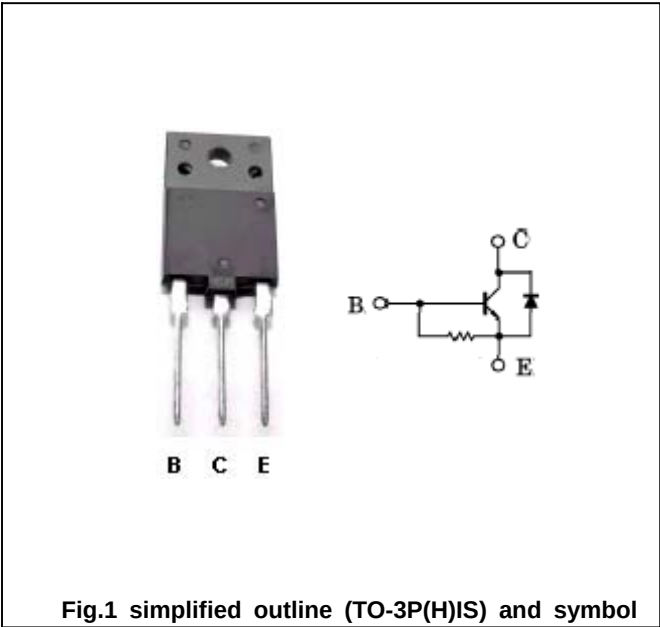


Fig.1 simplified outline (TO-3P(H)IS) and symbol

Absolute maximum ratings(Ta=25°C)

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		±6	A
I _{CM}	Collector current-Peak		±12	A
I _B	Base current		3	A
P _C	Total power dissipation	T _C =25°C	50	W
T _j	Junction temperature		150	°C
T _{stg}	Storage temperature		-55~150	°C

Silicon NPN Power Transistors

2SC4764

CHARACTERISTICS

T_j=25°C unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
V _{EBO}	Emitter-base breakdown voltage	I _E =300mA ; I _C =0	5			V
V _{CEsat}	Collector-emitter saturation voltage	I _C =4A; I _B =0.8A			5	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} =1500V; I _E =0			1	mA
I _{EBO}	Emitter cut-off current	V _{EB} =5V; I _C =0	83		250	mA
h _{FE-1}	DC current gain	I _C =1A ; V _{CE} =5V	8	12		
h _{FE-2}	DC current gain	I _C =4A ; V _{CE} =5V	5		9	
C _{ob}	Collector output capacitance	I _E =0 ; V _{CB} =10V, f=1MHz		170		pF
V _F	Forward voltage(damper diode)	I _F =4A		1.2	1.8	V
f _T	Transition frequency	I _E =0.1A ; V _{CE} =10V	1	3		MHz

Switching times (inductive load)

t _s	Storage time	I _{CP} =4A; I _{B1(end)} =0.8A f _H =31.5kHz		3.2	5.0	μs
t _f	Fall time			0.2	0.5	μs

Silicon NPN Power Transistors

2SC4764

PACKAGE OUTLINE

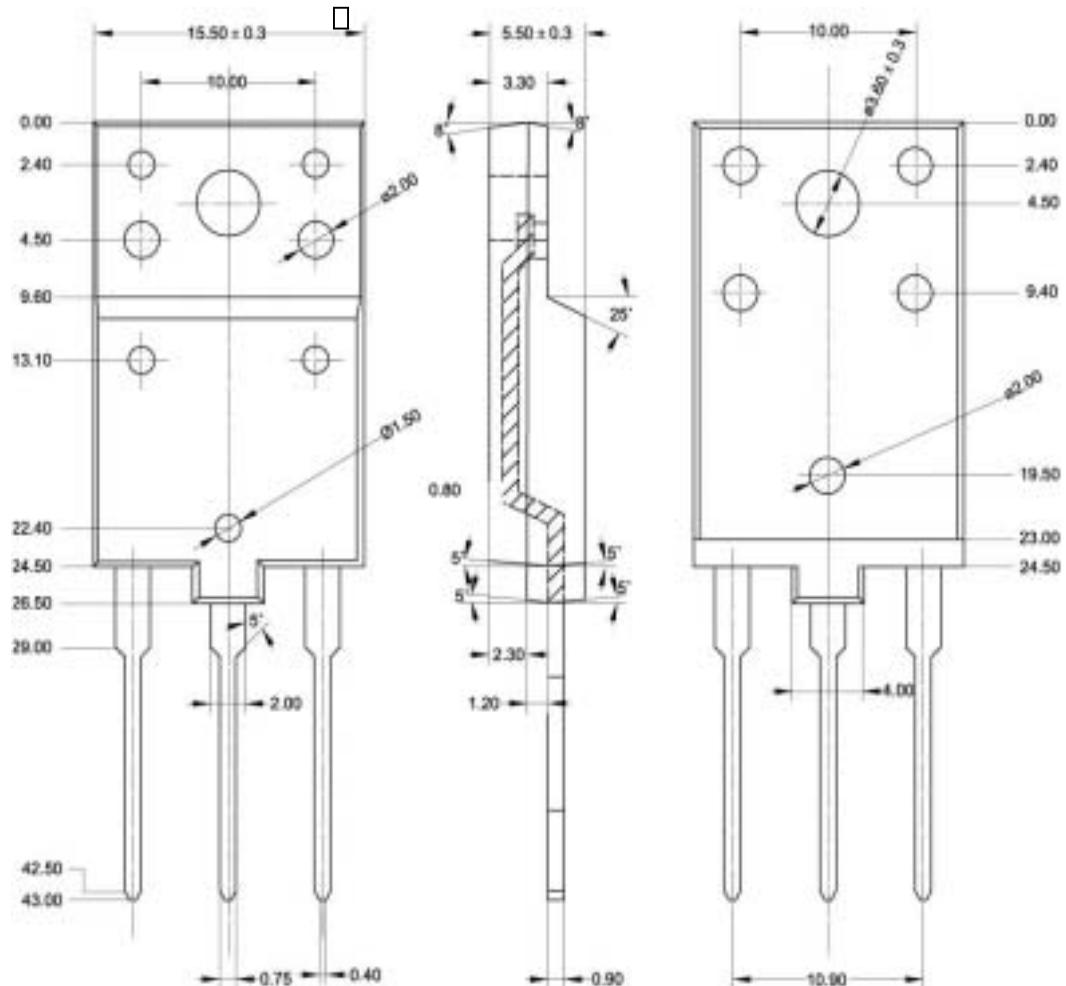


Fig.2 Outline dimensions (unindicated tolerance: ± 0.20 mm)