

Silicon NPN Power Transistors

2SC2690 2SC2690A

DESCRIPTION

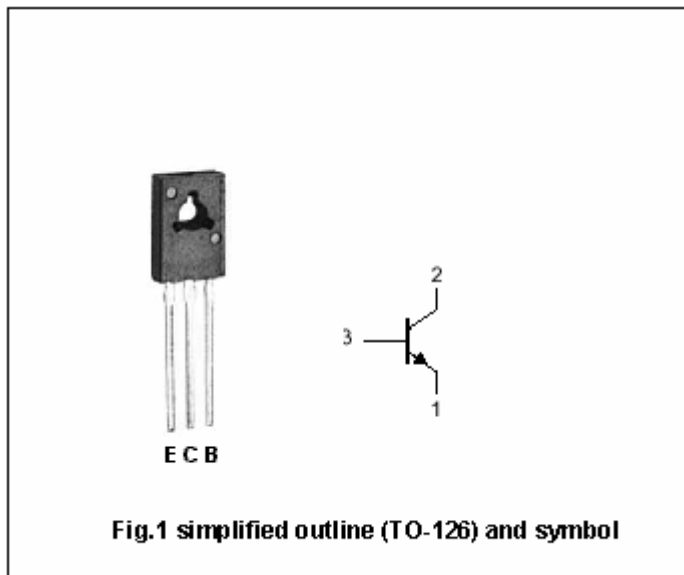
- With TO-126 package
- Complement to type 2SA1220/1220A

APPLICATIONS

- For use in audio and radio frequency power amplifiers

PINNING

PIN	DESCRIPTION
1	Emitter
2	Collector;connected to mounting base
3	Base



Absolute maximum ratings(Ta=25°C)

SYMBOL	PARAMETER	CONDITIONS	VALUE	UNIT
V _{CB0}	Collector-base voltage	2SC2690	120	V
		2SC2690A	160	
V _{CEO}	Collector-emitter voltage	2SC2690	120	V
		2SC2690A	160	V
V _{EBO}	Emitter-base voltage	Open collector	5	V
I _C	Collector current		1.2	A
I _{CM}	Collector current-Peak		2.5	A
I _B	Base current		0.3	A
P _D	Total power dissipation	T _a =25°C	1.2	W
		T _C =25°C	20	
T _j	Junction temperature		150	°C
T _{stg}	Storage temperature		-55°C+150	°C

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CHARACTERISTICS

T_j=25°C unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
V _{CEsat}	Collector-emitter saturation voltage	I _C =1A; I _B =0.2A			0.7	V
V _{BEsat}	Base-emitter saturation voltage	I _C =1A; I _B =0.2A			1.3	V
I _{CBO}	Collector cut-off current	V _{CB} =120V; I _E =0			1	μA
I _{EBO}	Emitter cut-off current	V _{EB} =3V; I _C =0			1	μA
h _{FE-1}	DC current gain	I _C =5mA; V _{CE} =5V	35			
h _{FE-2}	DC current gain	I _C =0.3A; V _{CE} =5V	60		320	
C _{ob}	Output capacitance	I _E =0; V _{CB} =10V f=1MHz		19		pF
f _T	Transition frequency	I _C =0.2A; V _{CE} =5V		155		MHz

◆ h_{FE-2} Classifications

R	Q	P
60-120	100-200	160-320

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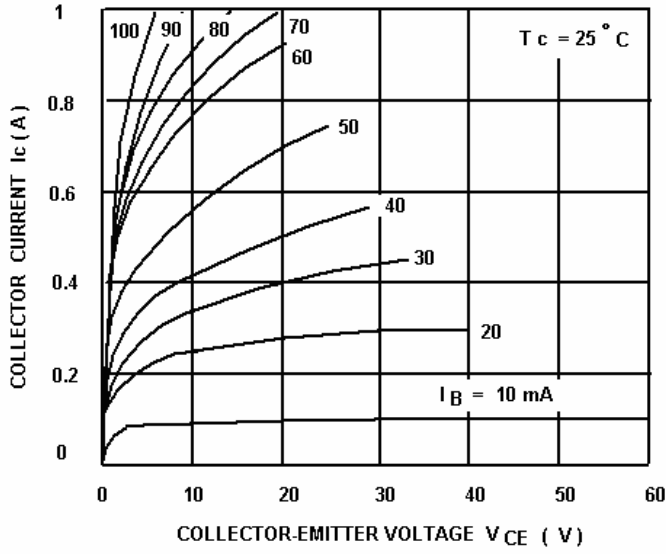


Fig.3 Static Characteristic

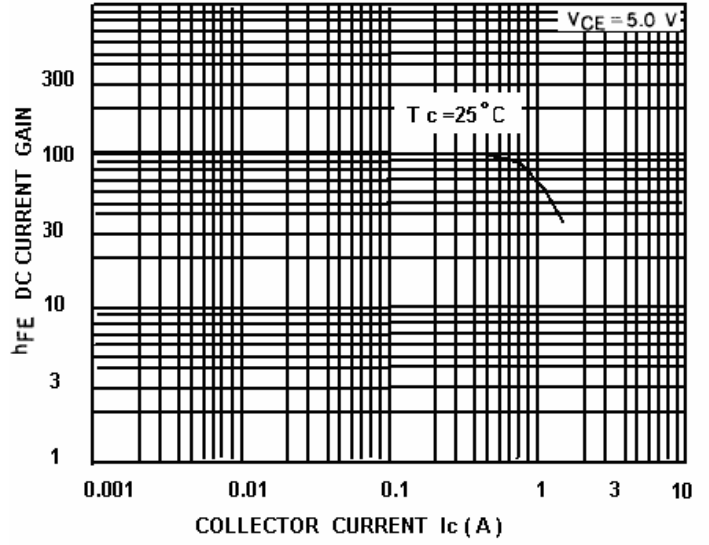


Fig.4 DC current Gain

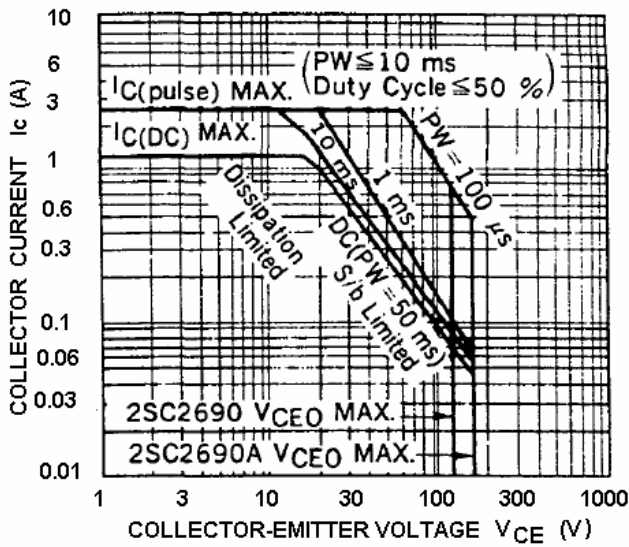


Fig.5 Safe Operating Area