

Silicon PNP Power Transistors

2SB861

www.DataSheet4U.com

DESCRIPTION

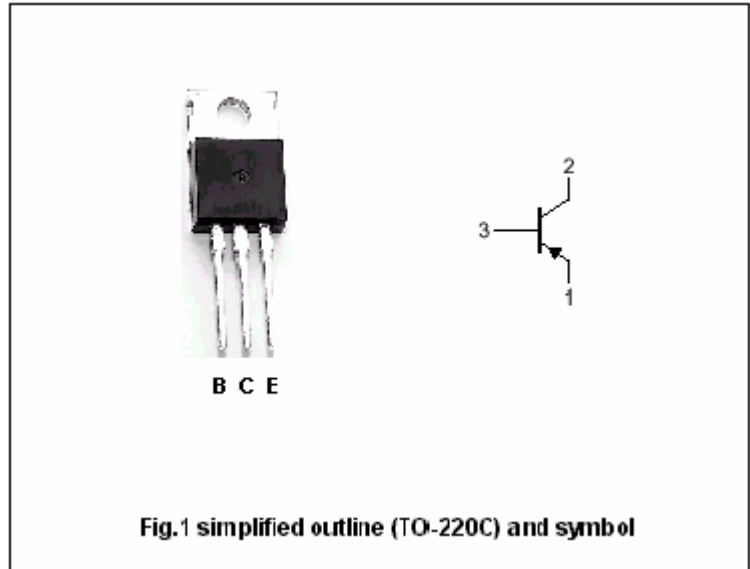
- With TO-220C package
- Complement to type 2SD1138

APPLICATIONS

- Low frequency power amplifier color TV vertical deflection output

PINNING

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

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

SYMBOL	PARAMETER	CONDITIONS	VALUE	UNIT
V_{CBO}	Collector-base voltage	Open emitter	-200	V
V_{CEO}	Collector-emitter voltage	Open base	-150	V
V_{EBO}	Emitter-base voltage	Open collector	-6	V
I_C	Collector current		-2	A
I_{CP}	Collector current-Peak		-5	A
P_C	Collector power dissipation	$T_a=25^\circ\text{C}$	1.8	W
		$T_C=25^\circ\text{C}$	30	
T_j	Junction temperature		150	$^\circ\text{C}$
T_{stg}	Storage temperature		-45~150	$^\circ\text{C}$

Silicon PNP Power Transistors

2SB861

www.DataSheet4U.com

CHARACTERISTICS

T_j=25°C unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
V _{(BR)CEO}	Collector-emitter breakdown voltage	I _C =-50mA; R _{BE} =∞	-150			V
V _{(BR)EBO}	Emitter-base breakdown voltage	I _E =-5mA; I _C =0	-6			V
V _{CEsat}	Collector-emitter saturation voltage	I _C =-0.5 A; I _B =-50m A			-3.0	V
V _{BE}	Base-emitter voltage	I _C =-50mA ; V _{CE} =-4V			-1.0	V
I _{CBO}	Collector cut-off current	V _{CB} =-120V; I _E =0			-1	μA
h _{FE-1}	DC current gain	I _C =-50mA ; V _{CE} =-4V	60		200	
h _{FE-2}	DC current gain	I _C =-0.5A ; V _{CE} =-10V	60			
C _{OB}	Output capacitance	I _E =0 ; V _{CB} =-100V, f=1MHz		30		pF

◆ h_{FE-1} classifications

B	C
60-120	100-200

Silicon PNP Power Transistors

2SB861

www.DataSheet4U.com

PACKAGE OUTLINE

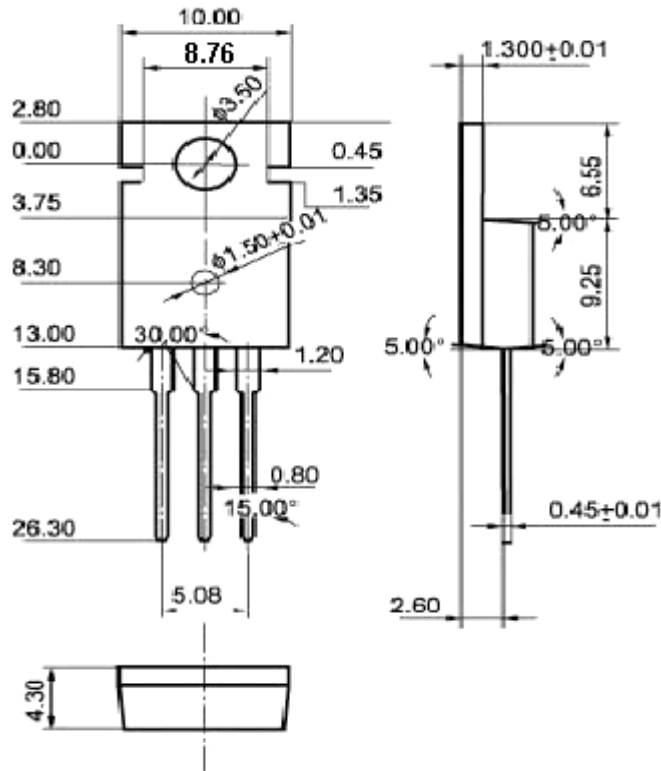


Fig.2 Outline dimensions (unindicated tolerance:±0.10 mm)

Silicon PNP Power Transistors

2SB861

www.DataSheet4U.com

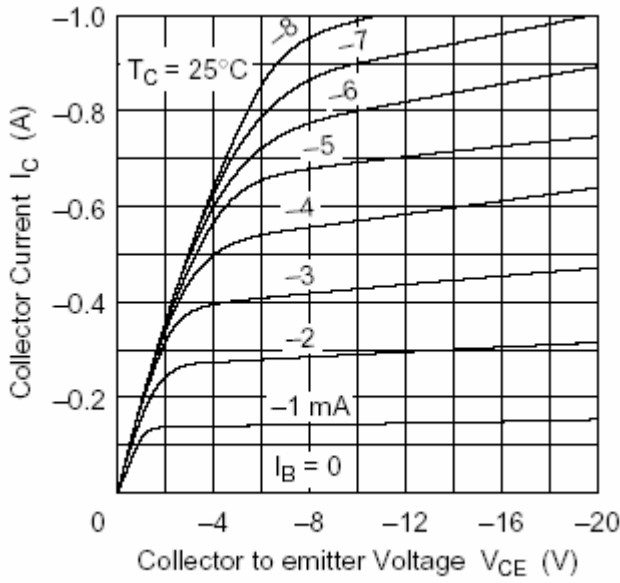


Fig.3 Static Characteristic

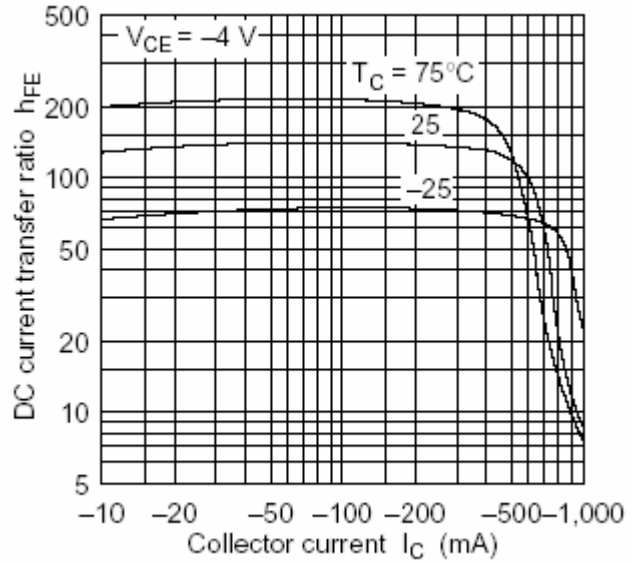


Fig.4 DC current Gain

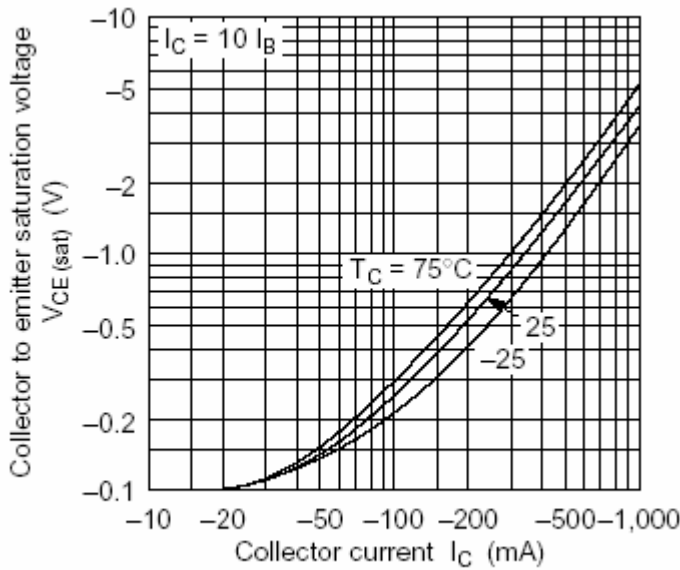


Fig.5 Collector-Emitter Saturation Voltage

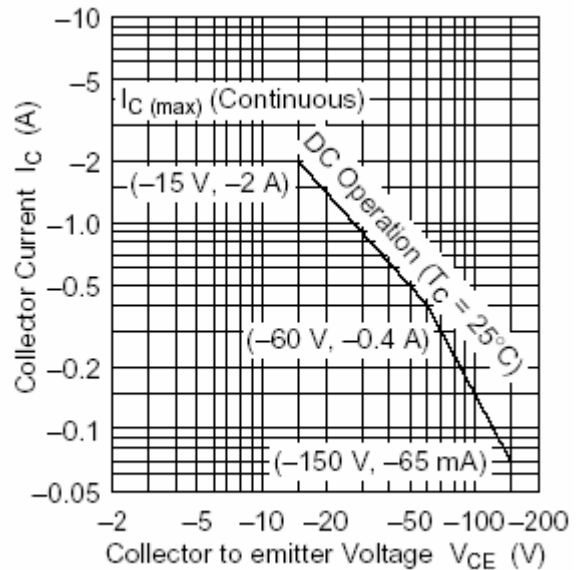


Fig.6 Safe Operating Area