

## isc Silicon NPN Power Transistor

### **DESCRIPTION**

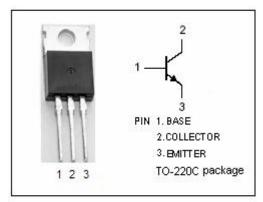
- Collector-Emitter Sustaining Voltage-
  - : V<sub>CEO(SUS)</sub>= 60V(Min.)
- · Collector-Emitter Saturation Voltage-
  - : V<sub>CE(sat)</sub>= 1.0V(Max.) @I<sub>C</sub>= 2.0A
- · Wide Area of Safe Operation
- Minimum Lot-to-Lot variations for robust device performance and reliable operation

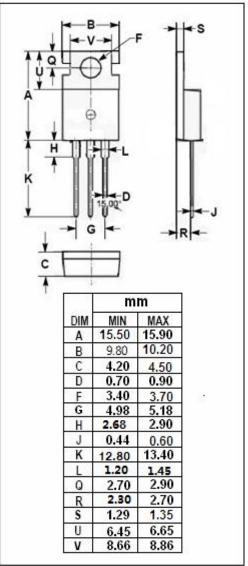
## **APPLICATIONS**

· Designed for AF power amplifier applications.

## ABSOLUTE MAXIMUM RATINGS(Ta=25℃)

SYMBOL	PARAMETER	VALUE	UNIT
V <sub>CBO</sub>	Collector-Base Voltage	60	V
V <sub>CEO</sub>	Collector-Emitter Voltage	60	V
V <sub>ЕВО</sub>	Emitter-Base Voltage	5	V
Ic	Collector Current-Continuous	4	Α
Ісм	Collector Current-Peak	6	А
lв	Base Current-Continuous	1	Α
Pc	Collector Power Dissipation @ T <sub>C</sub> =25 ℃		W
Тл	Junction Temperature	ire 150	
T <sub>stg</sub>	Storage Temperature Range -55~		$^{\circ}$







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2SD762

### **ELECTRICAL CHARACTERISTICS**

Tc=25℃ unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
V <sub>CEO(SUS)</sub>	Collector-Emitter Sustaining Voltage	I <sub>C</sub> = 50mA; L= 25mH	60			V
V <sub>CE</sub> (sat)	Collector-Emitter Saturation Voltage	I <sub>C</sub> = 2A; I <sub>B</sub> = 0.4A			1.0	V
$V_{\text{BE}(on)}$	Base-Emitter On Voltage	I <sub>C</sub> = 1A; V <sub>CE</sub> = 3V			1.2	V
І <sub>СВО</sub>	Collector Cutoff Current	V <sub>CB</sub> = 20V; I <sub>E</sub> = 0			30	μА
ІЕВО	Emitter Cutoff Current	V <sub>EB</sub> =5V; I <sub>C</sub> = 0			1	mA
h <sub>FE-1</sub>	DC Current Gain	I <sub>C</sub> = 0.1A; V <sub>CE</sub> = 3V	40			
h <sub>FE-2</sub>	DC Current Gain	I <sub>C</sub> = 1A; V <sub>CE</sub> = 3V	30	80	160	

## ♦ h<sub>FE-2</sub> Classifications

Q	Р	0
30-60	50-100	80-160

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2