

### isc Silicon PNP Power Transistor

### 2SA656

#### DESCRIPTION

- Collector-Emitter Breakdown Voltage-
- : V<sub>(BR)CEO</sub>= -110V(Min.) • Complement to Type 2SC519
- Minimum Lot-to-Lot variations for robust device performance and reliable operation

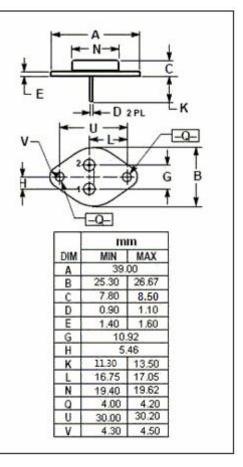
#### **APPLICATIONS**

- Power amplifier applications.
- Power switching applications.
- DC-DC converter applications.
- Regulator applications.

# PIN 1. BASE 1 2 2 PIN 1. BASE 2. BMITTER 3. COLLECTOR (CASE) TO-3 package

### ABSOLUTE MAXIMUM RATINGS(Ta=25°C)

SYMBOL	PARAMETER	VALUE	UNIT
V <sub>CBO</sub>	Collector-Base Voltage	-130	V
V <sub>CEO</sub>	Collector-Emitter Voltage	-110	V
V <sub>EBO</sub>	Emitter-Base Voltage -5		V
Ι <sub>C</sub>	Collector Current-Continuous	-7	A
IB	Base Current	-2	А
Pc	Collector Power Dissipation @Tc=25°C	50	W
Tj	Junction Temperature	150	°C
T <sub>stg</sub>	Storage Temperature	-65~150	°C



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#### **ELECTRICAL CHARACTERISTICS**

#### Tj=25℃ unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
V <sub>(BR)CEO</sub>	Collector-Emitter Breakdown Voltage	I <sub>C</sub> = -50mA; I <sub>B</sub> = 0	-110			V
V <sub>CE(sat)</sub>	Collector-Emitter Saturation Voltage	I <sub>C</sub> = -5Α; I <sub>B</sub> = -1Α			-2.0	V
V <sub>BE(sat)</sub>	Base-Emitter Saturation Voltage	I <sub>C</sub> = -5Α; I <sub>B</sub> = -1Α			-2.5	V
I <sub>СВО</sub>	Collector Cutoff Current	V <sub>CB</sub> = -130V; I <sub>E</sub> = 0			-0.1	mA
I <sub>EBO</sub>	Emitter Cutoff Current	V <sub>EB</sub> = -5V; I <sub>C</sub> = 0			-5	mA
h <sub>FE-1</sub>	DC Current Gain	I <sub>C</sub> = -1A; V <sub>CE</sub> = -5V	30		300	
h <sub>FE-2</sub>	DC Current Gain	I <sub>C</sub> = -5A; V <sub>CE</sub> = -5V	15			
Сов	Collector Output Capacitance	I <sub>E</sub> = 0; V <sub>CB</sub> = -10V; f= 1МНz		150		pF
f⊤	Current-Gain—Bandwidth Product	I <sub>C</sub> = -1A; V <sub>CE</sub> = -10V		5		MHz

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