

**isc Silicon PNP Power Transistor**

**2N5955**

**DESCRIPTION**

- Collector-Emitter Sustaining Voltage-  
:  $V_{CEO(SUS)} = -60V(\text{Min})$
- Low Collector Saturation Voltage-  
:  $V_{CE(sat)} = -1.0V(\text{Max.}) @ I_C = -2.5A$
- Complement to Type 2N6373

**APPLICATIONS**

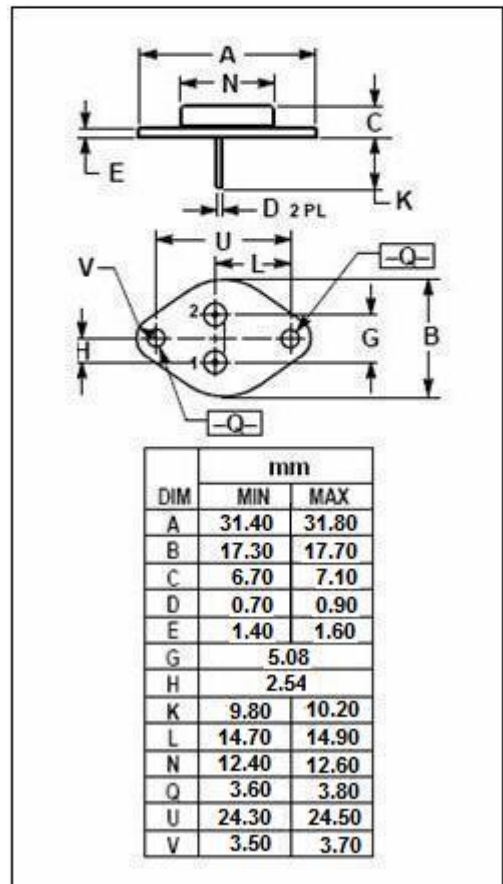
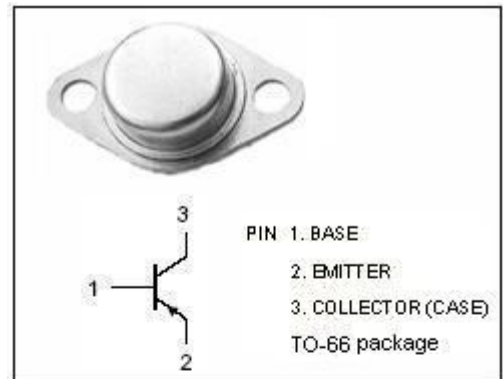
- Designed for general purpose amplifier and switching applications.

**ABSOLUTE MAXIMUM RATINGS( $T_a=25^\circ\text{C}$ )**

SYMBOL	PARAMETER	VALUE	UNIT
$V_{CBO}$	Collector-Base Voltage	-70	V
$V_{CEV}$	Collector-Emitter Voltage $V_{BE} = 1.5V$	-70	V
$V_{CEO}$	Collector-Emitter Voltage $R_{BE} = 100 \Omega$	-65	V
$V_{CEO}$	Collector-Emitter Voltage	-60	V
$V_{EBO}$	Emitter-Base Voltage	-5	V
$I_C$	Collector Current-Continuous	-6	A
$I_B$	Base Current-Continuous	-2	A
$P_C$	Collector Power Dissipation @ $T_C = 25^\circ\text{C}$	40	W
$T_J$	Junction Temperature	200	$^\circ\text{C}$
$T_{stg}$	Storage Temperature Range	-65~200	$^\circ\text{C}$

**THERMAL CHARACTERISTICS**

SYMBOL	PARAMETER	MAX	UNIT
$R_{th j-c}$	Thermal Resistance, Junction to Case	4.3	$^\circ\text{C/W}$



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## ELECTRICAL CHARACTERISTICS

 $T_C=25^\circ\text{C}$  unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
$V_{CEO(SUS)}$	Collector-Emitter Sustaining Voltage	$I_C = -100\text{mA}; I_B = 0$	-60			V
$V_{CER}$	Collector-Emitter Sustaining Voltage	$I_C = -100\text{mA}; R_{BE} = 100\ \Omega$	-65			V
$V_{CEV}$	Collector-Emitter Sustaining Voltage	$I_C = -100\text{mA}; V_{BE} = -1.5\text{V}$	-70			V
$V_{CE(sat)}$	Collector-Emitter Saturation Voltage	$I_C = -2.5\text{A}; I_B = -0.25\text{A}$			-1.0	V
$V_{BE(on)}$	Base-Emitter On Voltage	$I_C = -2.5\text{A}; V_{CE} = -4\text{V}$			-2.0	V
$I_{CEV}$	Collector Cutoff Current	$V_{CE} = -65\text{V}; V_{BE(off)} = -1.5\text{V}$ $V_{CE} = -65\text{V}; V_{BE(off)} = -1.5\text{V}; T_C = 150^\circ\text{C}$			-0.1 -2.0	mA
$I_{CEO}$	Collector Cutoff Current	$V_{CE} = -45\text{V}; I_B = 0$			-1.0	mA
$I_{CER}$	Collector Cutoff Current	$V_{CE} = -55\text{V}; R_{BE} = 100\ \Omega$			-0.1	mA
$I_{EBO}$	Emitter Cutoff Current	$V_{EB} = -5\text{V}; I_C = 0$			-0.1	mA
$h_{FE-1}$	DC Current Gain	$I_C = -2.5\text{A}; V_{CE} = -4\text{V}$	20		100	
$h_{FE-2}$	DC Current Gain	$I_C = -6\text{A}; V_{CE} = -4\text{V}$	5			
$f_T$	Current-Gain—Bandwidth Product	$I_C = -1.0\text{A}; V_{CE} = -4\text{V}; f_{test} = 1\text{MHz}$	4			MHz