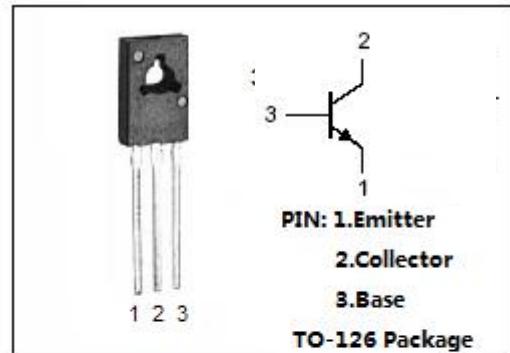


## isc Silicon NPN Power Transistor

## ISC184

### DESCRIPTION

- High Collector Current-  $I_C = 4A$
- Good Linearity of  $h_{FE}$
- Minimum Lot-to-Lot variations for robust device performance and reliable operation

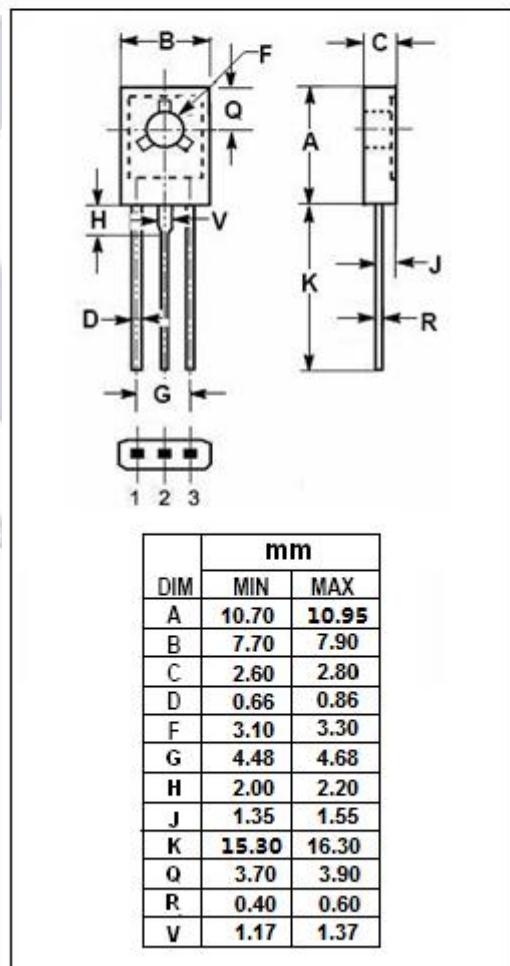


### APPLICATIONS

- Suited for the output stage of audio amplifier, voltage regulator, DC-DC converter and relay driver.

### ABSOLUTE MAXIMUM RATINGS( $T_a=25^\circ C$ )

SYMBOL	PARAMETER	VALUE	UNIT
$V_{CBO}$	Collector-Base Voltage	80	V
$V_{CEO}$	Collector-Emitter Voltage	80	V
$V_{EBO}$	Emitter-Base Voltage	5	V
$I_C$	Collector Current-Continuous	4	A
$P_c$	Collector Power Dissipation @ $T_c=25^\circ C$	40	W
$T_J$	Junction Temperature	-65~150	°C
$T_{stg}$	Storage Temperature Range	-65~150	°C



**isc Silicon NPN Power Transistor****ISC184****ELECTRICAL CHARACTERISTICS** $T_c=25^\circ\text{C}$  unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
$V_{CE(\text{sat})-1}$	Collector-Emitter Saturation Voltage	$I_C = 1.5 \text{ A}; I_B = 0.15 \text{ A}$			0.6	V
$V_{BE(\text{sat})-2}$	Collector-Emitter Saturation Voltage	$I_C = 4 \text{ A}; I_B = 1 \text{ A}$			1.4	V
$V_{BE(\text{on})}$	Base-Emitter On Voltage	$I_C = 1.5 \text{ A}; V_{CE} = 2 \text{ V}$			1.2	V
$I_{CBO}$	Collector Cutoff Current	$V_{CB} = 80 \text{ V}; I_E = 0$			0.1	mA
$I_{EBO}$	Emitter Cutoff Current	$V_{EB} = 5 \text{ V}; I_C = 0$			1.0	mA
$h_{FE-1}$	DC Current Gain	$I_C = 1.5 \text{ A}; V_{CE} = 2 \text{ V}$	20		80	
$h_{FE-2}$	DC Current Gain	$I_C = 4 \text{ A}; V_{CE} = 2 \text{ V}$	7			