



HBC557

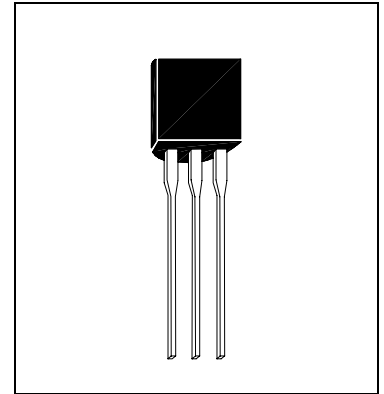
PNP EPITAXIAL PLANAR TRANSISTOR

Description

The HBC557 is designed for use in driver stage of audio amplifier applications.

Features

- High Breakdown Voltage: 45V
- High AC Current Gain: 75-800 at IC=2mA



Absolute Maximum Ratings

- Maximum Temperatures
 Storage Temperature -55 ~ +150 °C
 Junction Temperature +150 °C Maximum
- Maximum Power Dissipation
 Total Power Dissipation (Ta=25°C) 500 mW
- Maximum Voltages and Currents (Ta=25°C)
 VCBO Collector to Base Voltage -50 V
 VCEO Collector to Emitter Voltage -45 V
 VEBO Emitter to Base Voltage -5 V
 IC Collector Current -100 mA

Characteristics (Ta=25°C)

Symbol	Min.	Typ.	Max.	Unit	Test Conditions
BVCBO	-50	-	-	V	IC=-100uA
BVCEO	-45	-	-	V	IC=-1mA
BVEBO	-5	-	-	V	IE=-10uA
ICBO	-	-	-100	nA	VCB=-20V
IEBO	-	-	-1	uA	VEB=-5V
VBE(on)1	-600	-	-750	mV	IC=-2mA, VCE=-5V
VBE(on)2	-	-	-820	mV	IC=-10mA, VCE=-5V
*VCE(sat)1	-	-	-300	mV	IC=-10mA, IB=-1mA
*VCE(sat)2	-	-	-650	mV	IC=-100mA, IB=-10mA
*hFE	75	-	800		VCB=-5V, IC=-2mA
fT	-	300	-	MHz	VCE=-5V, IC=-10mA, f=100MHz
Cob	-	4.5	-	PF	VCB=-10V, IE=0, f=1MHz

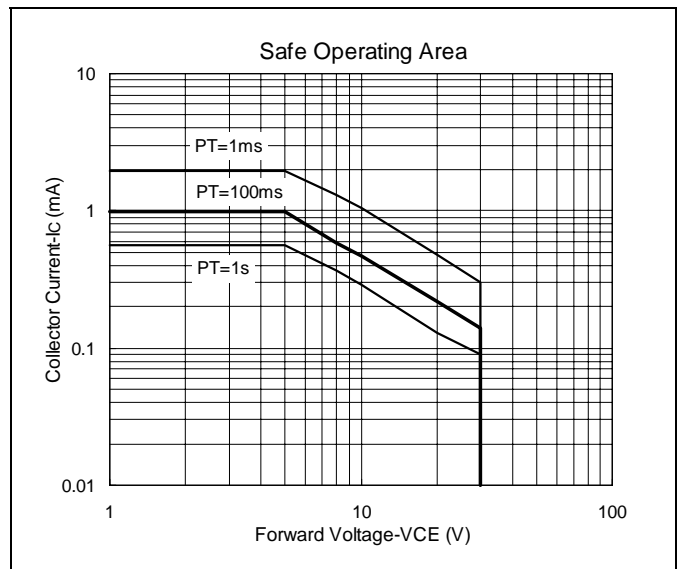
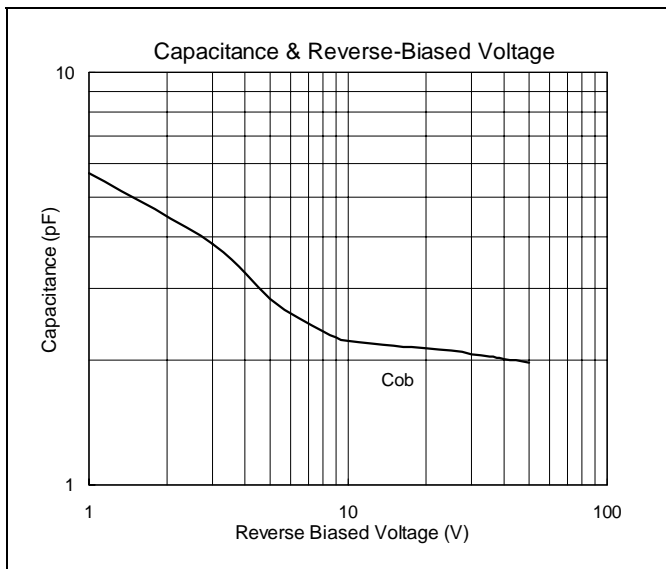
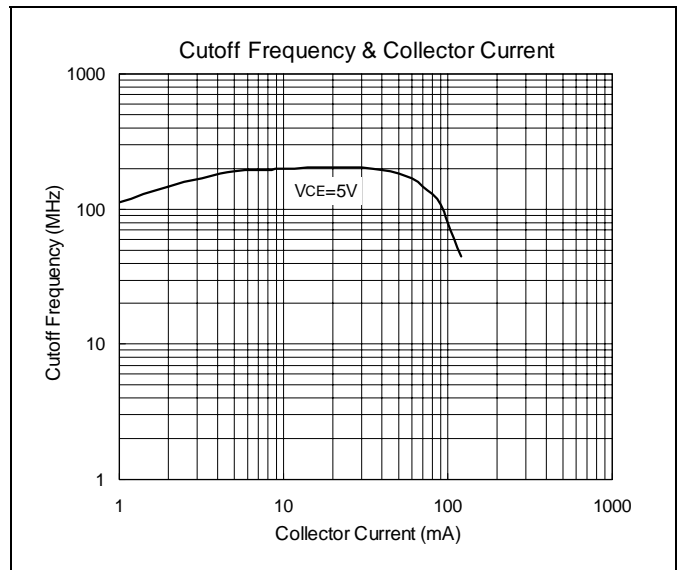
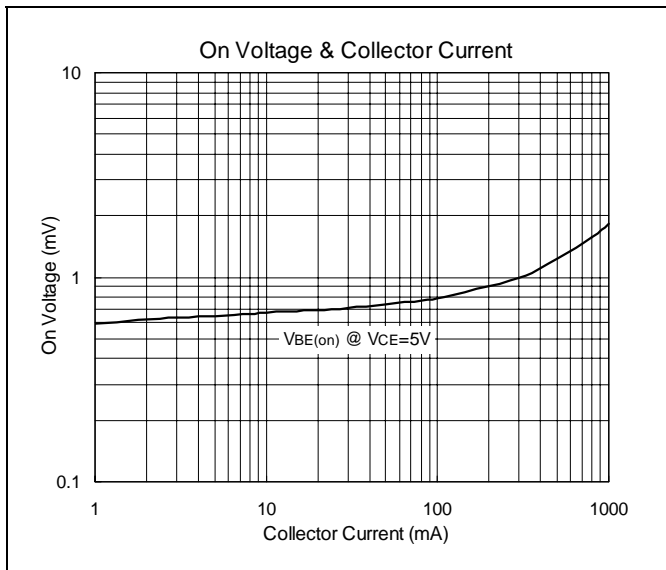
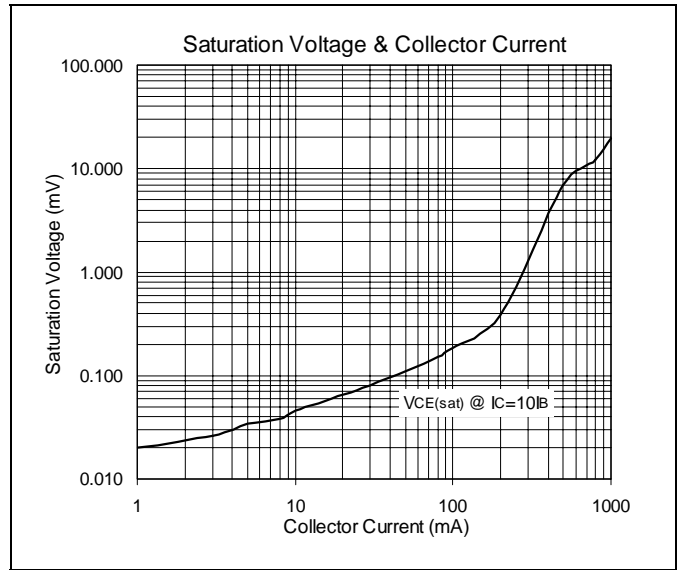
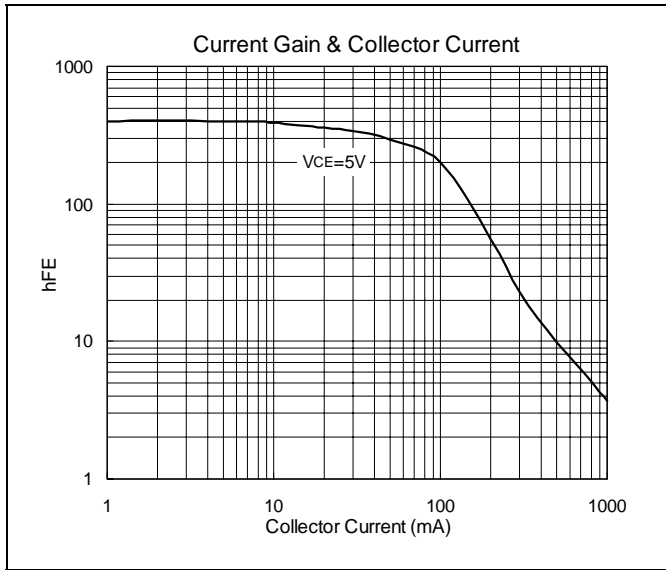
*Pulse Test : Pulse Width ≤380us, Duty Cycle≤2%

Classification of hFE

Rank	A	B	C	Normal
Range	125-260	240-500	420-800	75-260

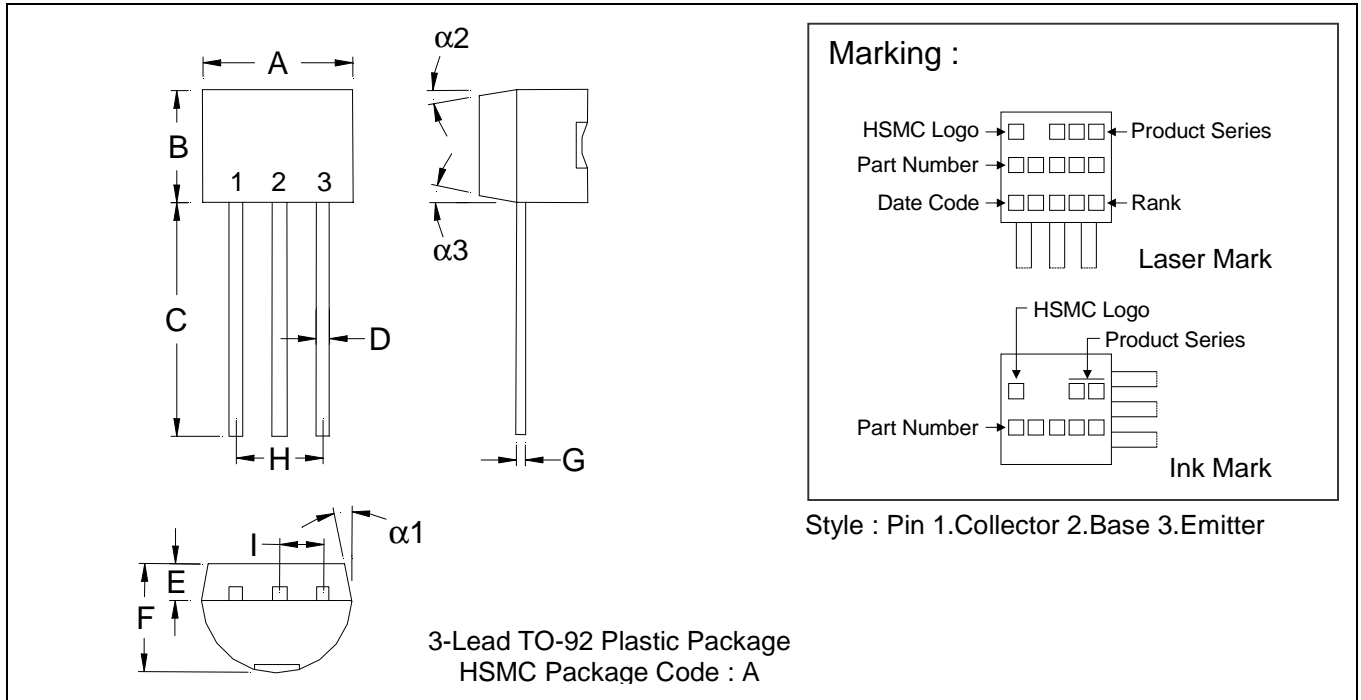


Characteristics Curve





TO-92 Dimension



*:Typical

DIM	Inches		Millimeters		DIM	Inches		Millimeters	
	Min.	Max.	Min.	Max.		Min.	Max.	Min.	Max.
A	0.1704	0.1902	4.33	4.83	G	0.0142	0.0220	0.36	0.56
B	0.1704	0.1902	4.33	4.83	H	-	*0.1000	-	*2.54
C	0.5000	-	12.70	-	I	-	*0.0500	-	*1.27
D	0.0142	0.0220	0.36	0.56	α1	-	*5°	-	*5°
E	-	*0.0500	-	*1.27	α2	-	*2°	-	*2°
F	0.1323	0.1480	3.36	3.76	α3	-	*2°	-	*2°

Notes : 1.Dimension and tolerance based on our Spec. dated Apr. 25,1996.
 2.Controlling dimension : millimeters.
 3.Maximum lead thickness includes lead finish thickness, and minimum lead thickness is the minimum thickness of base material.
 4.If there is any question with packing specification or packing method, please contact your local HSMC sales office.

Material :

- Lead : 42 Alloy ; solder plating
- Mold Compound : Epoxy resin family, flammability solid burning class:UL94V-0

Important Notice:

- All rights are reserved. Reproduction in whole or in part is prohibited without the prior written approval of HSMC.
- HSMC reserves the right to make changes to its products without notice.
- **HSMC semiconductor products are not warranted to be suitable for use in Life-Support Applications, or systems.**
- HSMC assumes no liability for any consequence of customer product design, infringement of patents, or application assistance.

Head Office And Factory :

- **Head Office** (Hi-Sincerity Microelectronics Corp.) : 10F.,No. 61, Sec. 2, Chung-Shan N. Rd. Taipei Taiwan R.O.C.
 Tel : 886-2-25212056 Fax : 886-2-25632712, 25368454
- **Factory 1** : No. 38, Kuang Fu S. Rd., Fu-Kou Hsin-Chu Industrial Park Hsin-Chu Taiwan. R.O.C
 Tel : 886-3-5983621~5 Fax : 886-3-5982931
- **Factory 2** : No. 17-1, Ta-Tung Rd., Fu-Kou Hsin-Chu Industrial Park Hsin-Chu Taiwan. R.O.C
 Tel : 886-3-5977061 Fax : 886-3-5979220