



# HB857

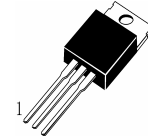
## APPLICATIONS

LOW FREQUENCY POWER AMPLIFIER

### ABSOLUTE MAXIMUM RATINGS ( $T_a=25$ )

$T_{stg}$ —Storage Temperature.....	-55~150
$T_j$ —Junction Temperature.....	150
$P_C$ —Collector Dissipation ( $T_c=25$ ) .....	40W
$V_{CBO}$ —Collector-Base Voltage.....	-70V
$V_{CEO}$ —Collector-Emitter Voltage.....	-50V
$V_{EBO}$ —Emitter-Base Voltage.....	-5V
$I_C$ —Collector Current ( DC ) .....	-4A

TO-220



- 1 Base , B
- 2 Collector , C
- 3 Emitter, E

### ELECTRICAL CHARACTERISTICS ( $T_a=25$ )

Symbol	Characteristics	Min	Typ	Max	Unit	Test Conditions
BVCBO	Collector-Base Breakdown Voltage	-70			V	$I_C=-10 \mu A, I_E=0$
BVCEO	Collector-Emitter Breakdown Voltage	-50			V	$I_C=-50mA, I_B=0$
BVEBO	Emitter-Base Breakdown Voltage	-5			V	$I_E=-10 \mu A, I_C=0$
$I_{CBO}$	Collector Cut-off Current			-1	$\mu A$	$V_{CB}=-50V, I_E=0$
$H_{FE}(1)$	DC Current Gain	60		320		$V_{CE}=-4V, I_C=-1A$
$H_{FE}(2)$	DC Current Gain	35				$V_{CE}=-4V, I_C=-0.1A$
$V_{CE(sat)}$	Collector- Emitter Saturation Voltage			-1	V	$I_C=-2A, I_B=-0.2A$
$V_{BE(on)}$	Base-Emitter On Voltage			-1	V	$V_{CE}=-4V, I_C=-1A$
$f_t$	Current Gain-Bandwidth Product		15		MHz	$V_{CE}=-4V, I_C=-0.5A,$

### $h_{FE}$ Classification

B	C	D
60—120	100—200	160—320