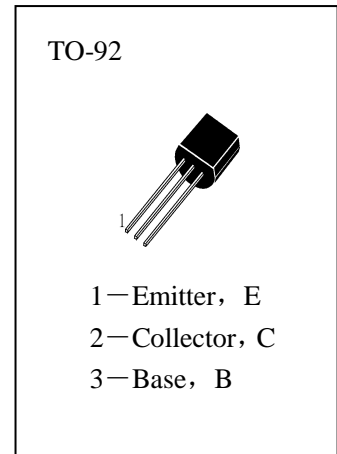


■ AUDIO FREQUENCY AMPLIFIER

HIGH FREQUENCY OSC

■ ABSOLUTE MAXIMUM RATINGS (T<sub>a</sub>=25°C)

T <sub>stg</sub>	Storage Temperature	-55~150°C
T <sub>j</sub>	Junction Temperature	150°C
P <sub>C</sub>	Collector Dissipation	400mW
V <sub>CB0</sub>	Collector-Base Voltage	60V
V <sub>CEO</sub>	Collector-Emitter Voltage	50V
V <sub>EBO</sub>	Emitter-Base Voltage	5V
I <sub>C</sub>	Collector Current	150mA



■ ELECTRICAL CHARACTERISTICS (T<sub>a</sub>=25°C)

Symbol	Characteristics	Min	Typ	Max	Unit	Test Conditions
I <sub>CBO</sub>	Collector Cut-off Current			100	nA	V <sub>CB</sub> =60V, I <sub>E</sub> =0
I <sub>EBO</sub>	Emitter Cut-off Current			100	nA	V <sub>EB</sub> =5V, I <sub>C</sub> =0
HFE(1)	DC Current Gain	70		700		V <sub>CE</sub> =6V, I <sub>C</sub> =2mA
HFE(2)		25				V <sub>CE</sub> =6V, I <sub>C</sub> =150mA
V <sub>CE(sat)</sub>	Collector- Emitter Saturation Voltage			250	mV	I <sub>C</sub> =100mA, I <sub>B</sub> =10mA
V <sub>BE(sat)</sub>	Base-Emitter Saturation Voltage			1.0	V	I <sub>C</sub> =100mA, I <sub>B</sub> =10mA
BV <sub>CB0</sub>	Collector-Base Breakdown Voltage	60			V	I <sub>C</sub> =100 μ A, I <sub>E</sub> =0
BV <sub>CEO</sub>	Collector-Emitter Breakdown Voltage	50			V	I <sub>C</sub> =1mA, I <sub>B</sub> =0
BV <sub>EBO</sub>	Emitter-Base Breakdown Voltage	5			V	I <sub>E</sub> =100 μ A, I <sub>C</sub> =0
f <sub>T</sub>	Current Gain-Bandwidth Product	80			MHz	V <sub>CE</sub> =10V, I <sub>C</sub> =1mA

■ h<sub>FE</sub> Classification

O	Y	GR	BL
70—140	120—240	200—400	350—700

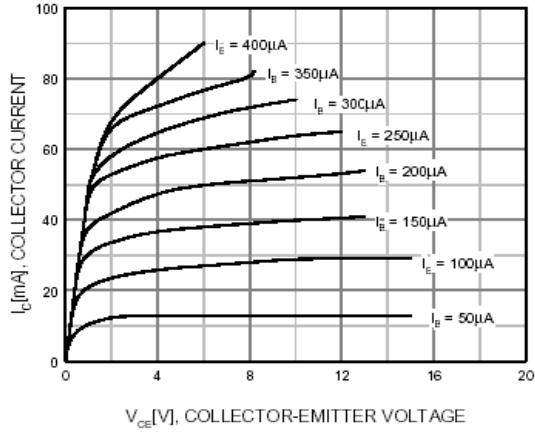


Figure 1. Static Characteristic

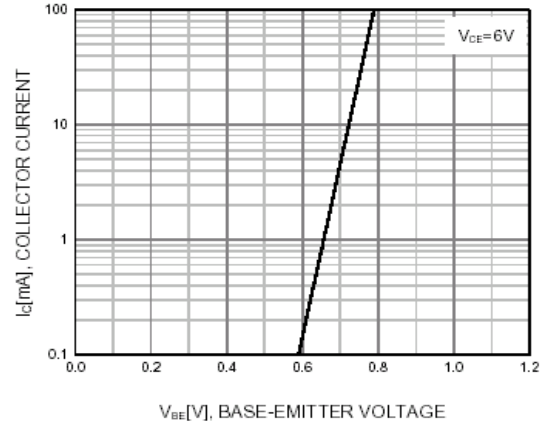


Figure 2. Transfer Characteristic

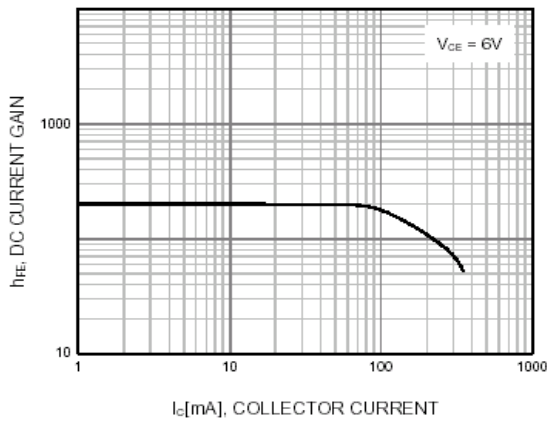


Figure 3. DC current Gain

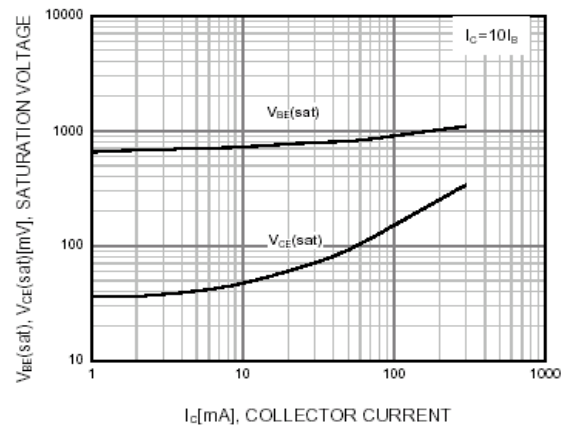


Figure 4. Base-Emitter Saturation Voltage  
Collector-Emitter Saturation Voltage

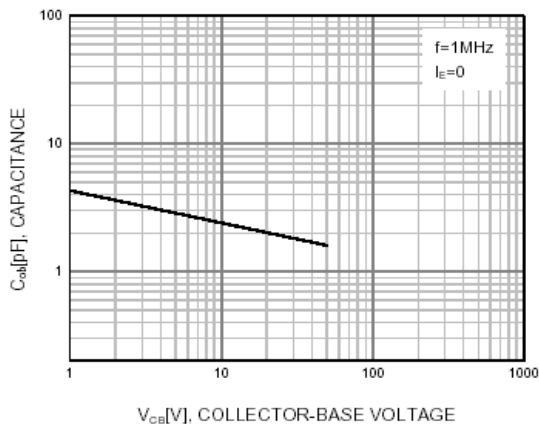


Figure 5. Output Capacitance

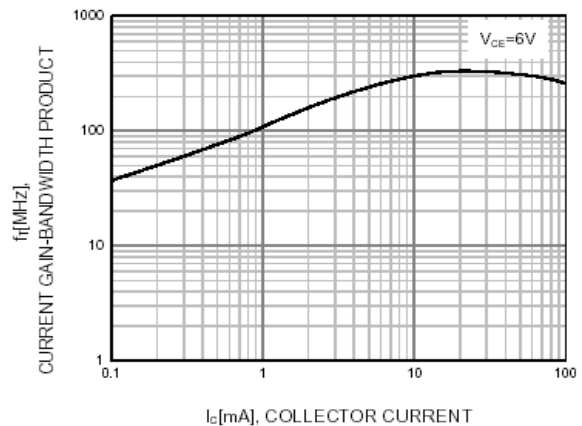


Figure 6. Current Gain Bandwidth Product