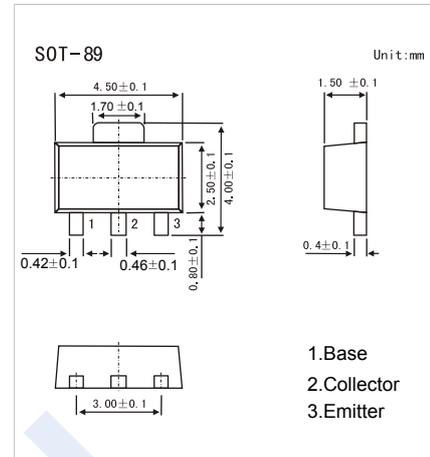


## NPN Transistors

## 2SC3443

## ■ Features

- High  $h_{FE}$  :  $h_{FE}=150$  to 800
- High collector current
- Low collector to emitter saturation voltage
- High collector dissipation  $P_c=500\text{mW}$
- Small package for mounting
- Complementary to 2SA1363

■ Absolute Maximum Ratings  $T_a = 25^\circ\text{C}$ 

Parameter	Symbol	Rating	Unit
Collector - Base Voltage	$V_{CB0}$	20	V
Collector - Emitter Voltage	$V_{CE0}$	16	
Emitter - Base Voltage	$V_{EB0}$	6	
Collector Current - Continuous	$I_C$	2	A
Peak Collector Current	$I_{CM}$	3	
Collector Power Dissipation	$P_C$	500	mW
Junction Temperature	$T_J$	150	$^\circ\text{C}$
Storage Temperature Range	$T_{stg}$	-55 to 150	

■ Electrical Characteristics  $T_a = 25^\circ\text{C}$ 

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Collector- base breakdown voltage	$V_{CB0}$	$I_C = 100\mu\text{A}$ , $I_E = 0$	20			V
Collector- emitter breakdown voltage	$V_{CE0}$	$I_C = 2\text{mA}$ , $R_{BE} = \infty$	16			
Emitter - base breakdown voltage	$V_{EB0}$	$I_E = 100\mu\text{A}$ , $I_C = 0$	6			
Collector-base cut-off current	$I_{CB0}$	$V_{CB} = 16\text{V}$ , $I_E = 0$			0.2	$\mu\text{A}$
Emitter cut-off current	$I_{EB0}$	$V_{EB} = 4\text{V}$ , $I_C = 0$			0.2	
Collector-emitter saturation voltage	$V_{CE(sat)}$	$I_C = 1\text{A}$ , $I_B = 500\text{mA}$		0.17	0.3	V
Base - emitter saturation voltage	$V_{BE(sat)}$	$I_C = 1\text{A}$ , $I_B = 500\text{mA}$			1.2	
DC current gain	$h_{FE}$	$V_{CE} = 4\text{V}$ , $I_C = 100\text{mA}$	150		800	
Collector output capacitance	$C_{ob}$	$V_{CB} = 10\text{V}$ , $I_E = 0$ , $f = 1\text{MHz}$		28		pF
Transition frequency	$f_T$	$V_{CE} = 2\text{V}$ , $I_C = 10\text{mA}$		80		MHz

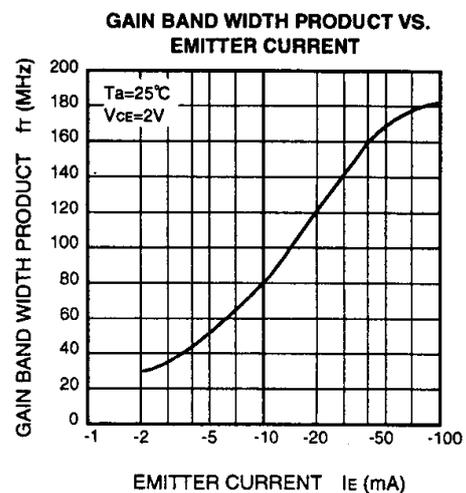
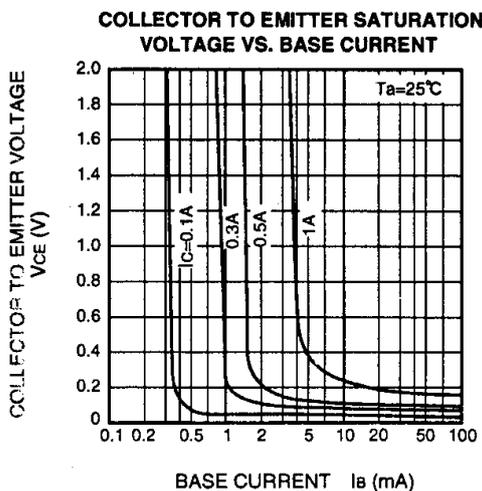
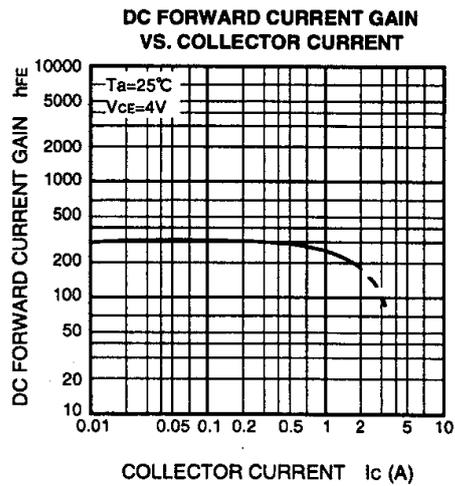
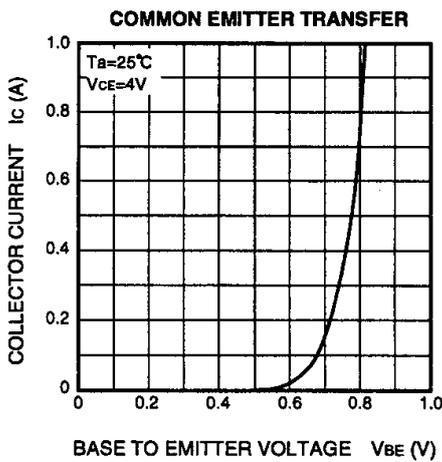
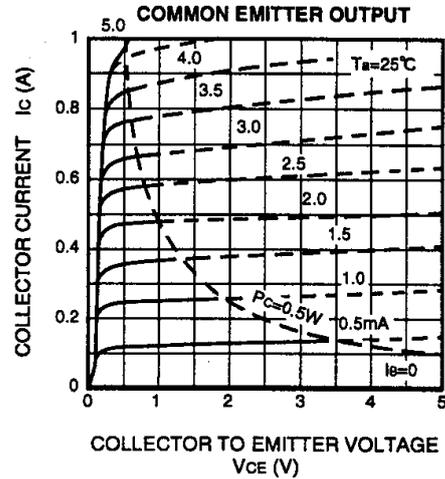
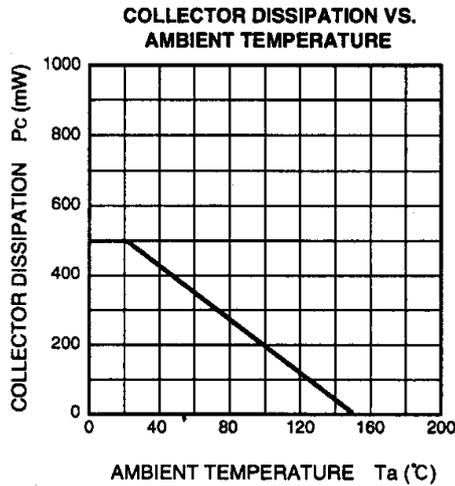
■ Classification of  $h_{FE}$ 

Type	2SC3443-E	2SC3443-F	2SC3443-G
Range	150-300	250-500	400-800
Marking	BE	BF	BG

### NPN Transistors

### 2SC3443

■ Typical Characteristics



## NPN Transistors

## 2SC3443

## ■ Typical Characteristics

