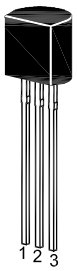
ST 2SC2784

NPN Silicon Epitaxial Planar Transistor

Audio frequency low noise amplifier.

The transistor is subdivided into four groups, P, F, E and U according to its DC current gain.

On special request, these transistors can be manufactured in different pin configurations.



1. Emitter 2. Collector 3. Base
TO-92 Plastic Package

Absolute Maximum Ratings (T_a = 25 °C)

Parameter	Symbol	Value	Unit
Collector Base Voltage	V_{CBO}	120	V
Collector Emitter Voltage	V_{CEO}	120	V
Emitter Base Voltage	V_{EBO}	5	V
Collector Current	I_C	50	mA
Base Current	I_B	10	mA
Power Dissipation	P_{tot}	300	mW
Junction Temperature	T_j	150	°C
Storage Temperature Range	T_{stg}	- 55 to + 150	°C

Characteristics at T_a = 25 °C

Parameter			Symbol	Min.	Typ.	Max.	Unit
DC Current Gain							
at V_{CE} = 6 V, I_C = 1 mA	Current Gain Group	P	h_{FE}	200	-	400	-
		F	h_{FE}	300	-	600	-
		E	h_{FE}	400	-	800	-
		U	h_{FE}	600	-	1200	-
at V_{CE} = 6 V, I_C = 0.1 mA			h_{FE}	150	580	-	-
Collector Base Cutoff Current at V_{CB} = 120 V			I_{CBO}	-	-	0.05	µA
Collector Emitter Cutoff Current at V_{CE} = 100 V			I_{CEO}	-	-	1	µA
Emitter Base Cutoff Current at V_{EB} = 5 V			I_{EBO}	-	-	0.05	µA
Collector Emitter Saturation Voltage at I_C = 10 mA, I_B = 1 mA			$V_{CE(sat)}$	-	0.07	0.3	V
Base Emitter Voltage at V_{CE} = 6 V, I_C = 1 mA			V_{BE}	0.55	0.59	0.65	V
Gain Bandwidth Product at V_{CE} = 6 V, I_E = 1 mA			f_T	50	110	-	MHz
Output Capacitance at V_{CB} = 30 V, f = 1 MHz			C_{ob}	-	1.6	2.5	pF