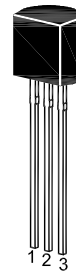


2SA1241

PNP Silicon Epitaxial Planar Transistor



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

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

Parameter	Symbol	Value	Unit
Collector Base Voltage	$-V_{CBO}$	35	V
Collector Emitter Voltage	$-V_{CEO}$	20	V
Emitter Base Voltage	$-V_{EBO}$	8	V
Collector Current	$-I_C$	5	A
Base Current	I_B	500	mA
Power Dissipation	P_{tot}	1	W
Junction Temperature	T_j	150	$^{\circ}\text{C}$
Storage Temperature Range	T_{stg}	- 55 to + 150	$^{\circ}\text{C}$

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

Parameter	Symbol	Min.	Typ.	Max.	Unit
DC Current Gain at $-V_{CE} = 2\text{ V}$, $-I_C = 500\text{ mA}$ at $-V_{CE} = 2\text{ V}$, $-I_C = 4\text{ A}$	Current Gain Group O Y h_{FE} h_{FE} h_{FE}	100 160 70	- - -	200 320 -	- - -
Collector Base Cutoff Current at $-V_{CB} = 35\text{ V}$	$-I_{CBO}$	-	-	100	nA
Emitter Base Cutoff Current at $-V_{EB} = 8\text{ V}$	$-I_{EBO}$	-	-	100	nA
Collector Emitter Breakdown Voltage at $-I_C = 10\text{ mA}$	$-V_{(BR)CEO}$	20	-	-	V
Emitter Base Breakdown Voltage at $-I_E = 1\text{ mA}$	$-V_{(BR)EBO}$	8	-	-	V
Collector Emitter Saturation Voltage at $-I_C = 3\text{ A}$, $-I_B = 75\text{ mA}$	$-V_{CE(sat)}$	-	-	0.5	V
Base Emitter Voltage at $-I_C = 4\text{ A}$, $-V_{CE} = 2\text{ V}$	$-V_{BE}$	-	-	1.5	V
Transition Frequency at $-V_{CE} = 2\text{ V}$, $-I_C = 0.5\text{ A}$	f_T	-	170	-	MHz
Collector Output Capacitance at $-V_{CB} = 10\text{ V}$, $f = 1\text{ MHz}$	C_{ob}	-	62	-	pF

