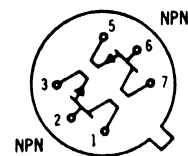


2N2903 (SILICON)
2N2903A

Dual NPN silicon transistors designed for differential amplifier applications.



Case 654-04
TO-78



PINS 4 AND 8 OMITTED

Pin Connections, Bottom View
All Leads Electrically Isolated from Case

MAXIMUM RATINGS (each side)

Rating	Symbol	Value	Unit
Collector-Emitter Voltage	V_{CEO}	30	Vdc
Collector-Base Voltage	V_{CB}	60	Vdc
Emitter-Base Voltage	V_{EB}	7.0	Vdc
Collector Current	I_C	50	mAdc
Operating and Storage Junction Temperature Range	T_J, T_{stg}	-65 to -200	°C
Power Dissipation @ $T_A = 25^\circ\text{C}$ Derate above 25°C	P_D	One Side	200 mW
		Both Sides	300 mW
Power Dissipation @ $T_C = 25^\circ\text{C}$ $T_C = 100^\circ\text{C}$ Derate above 25°C	P_D	One Side	1.14 mW/°C
		Both Sides	1.71 mW/°C
		Both Sides	3.43 mW/°C

ELECTRICAL CHARACTERISTICS (each side) ($T_A = 25^\circ\text{C}$ unless otherwise noted)

Characteristic	Symbol	Min	Max	Unit
OFF CHARACTERISTICS				
Collector-Emitter Sustaining Voltage ⁽¹⁾ ($I_C = 10\text{ mAdc}, I_B = 0$)	$BV_{CEO(sus)}$	30	-	Vdc
Collector-Base Breakdown Voltage ($I_C = 10\text{ }\mu\text{Adc}, I_E = 0$)	BV_{CBO}	60	-	Vdc
Emitter-Base Breakdown Voltage ($I_E = 0.1\text{ }\mu\text{Adc}, I_C = 0$)	BV_{EBO}	7.0	-	Vdc
Collector Cutoff Current ($V_{CB} = 50\text{ Vdc}, I_E = 0$) ($V_{CB} = 50\text{ Vdc}, I_E = 0, T_A = 150^\circ\text{C}$)	I_{CBO}	-	0.01 15	μAdc
Emitter Cutoff Current ($V_{BE} = 5.0\text{ Vdc}, I_C = 0$)	I_{EBO}	-	0.01	μAdc

(1) Pulse Test: Pulse Width $\leq 300\text{ }\mu\text{s}$, Duty Cycle $\leq 2.0\%$.

