

Micro Commercial Components
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2N5323

Features

- 10 Watts Power Dissipation.
- Metal can case.
- Lead Free Finish/RoHS Compliant (Note 1) ("P" Suffix designates RoHS Compliant. See ordering information)

Maximum Ratings

Symbol	Rating	Rating	Unit
V_{CEO}	Collector-Emitter Voltage	50	V
V_{CBO}	Collector-Base Voltage	75	V
V_{EBO}	Emitter-Base Voltage	5.0	V
I_C	Collector Current, Continuous	2.0	A
I_B	Base Current	1.0	A
T_J	Operating Junction Temperature	-55 to +150	°C
T_{STG}	Storage Temperature	-55 to +150	°C

Thermal Characteristics

Symbol	Rating	Max	Unit
P_D	Total Device Dissipation Derate above 25°C	10 0.057	W mW/°C
R_{JC}	Thermal Resistance, Junction to Case	17.5	°C/W

Electrical Characteristics @ 25°C Unless Otherwise Specified

Symbol	Parameter	Min	Max	Units
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OFF CHARACTERISTICS

$V_{(BR)CEO}$	Collector-Emitter Breakdown Voltage ($I_C=100\text{mA}_\text{dc}$, $I_B=0$)	50	---	Vdc
I_{CEX}	Collector Cutoff Current ($V_{CE}=75\text{Vdc}$, $V_{EB(\text{off})}=1.5\text{Vdc}$) ($V_{CE}=45\text{Vdc}$, $V_{EB(\text{off})}=1.5\text{Vdc}$, $T_C=150^\circ\text{C}$)	---	0.1 5.0	mA_dc
I_{EBO}	Emitter Cutoff Current ($V_{EB}=5.0\text{Vdc}$, $I_C=0$)	---	0.1	mA_dc

ON CHARACTERISTICS

h_{FE}	DC Current Gain ⁽¹⁾ ($V_{CE}=4.0\text{Vdc}$, $I_C=500\text{mA}_\text{dc}$)	40	250	---
$V_{CE(\text{sat})}$	Collector-Emitter Saturation Voltage ⁽¹⁾ ($I_C=500\text{mA}_\text{dc}$, $I_B=50\text{mA}_\text{dc}$)	---	1.2	Vdc
$V_{BE(\text{on})}$	Base-Emitter On Voltage ($I_C=500\text{mA}_\text{dc}$, $V_{CE}=4.0\text{Vdc}$)	---	1.4	Vdc

SMALL-SIGNAL CHARACTERISTICS

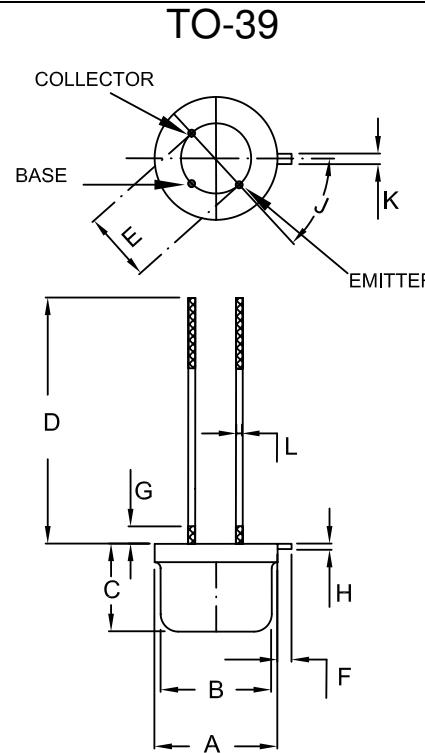
h_{fe}	Small-signal current gain ($V_{CE}=4.0\text{Vdc}$, $I_C=50\text{mA}_\text{dc}$, $f=10\text{MHz}$)	5.0	---	---
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SWITCHING CHARACTERISTICS

t_{on}	Turn-On Time ($V_{CC}=30\text{Vdc}$, $I_C=500\text{mA}_\text{dc}$, $I_{B1}=50\text{mA}_\text{dc}$)	---	100	ns
t_{off}	Turn-Off Time ($V_{CC}=30\text{Vdc}$, $I_C=500\text{mA}_\text{dc}$, $I_{B1}=I_{B2}=50\text{mA}_\text{dc}$)	---	1000	ns

Notes: 1. High Temperature Solder Exemption Applied, see EU Directive Annex 7.

PNP Silicon Switching Transistor



DIMENSIONS

DIM	INCHES		MM		NOTE
	MIN	MAX	MIN	MAX	
A	.335	.370	8.509	9.40	Φ
B	.305	.335	7.747	8.509	Φ
C	.240	.260	6.096	6.604	
D	.50	.75	12.7	19.05	
E	200		5.08		Φ TYP
F	.029	.045	7.366	11.43	
G	-----	.050	-----	1.27	
H	.009	.031	0.229	7.874	
J	44°	46°	44°	46°	
K	.028	.034	0.711	0.864	
L	.016	.021	0.406	0.533	

TM

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Ordering Information :

Device	Packing
Part Number-BP	Bulk; 50 pcs/Box

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