Micro Commercial Components

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2SC2411-P
2SC2411-Q
2SC2411-R

NPN Silicon Epitaxial Transistors

Features

- High $I_{C.}$ ICMax.= 0.5 A
- Low $V_{CE(sat)}$.Optimal for low voltage operation.
- Case Material: Molded Plastic. UL Flammability Classification Rating 94V-0 and MSL Rating 1

Maximum Ratings @ T_a = 25℃(unless otherwise noted)

Symbol	Parameter	Value	Unit
I_C	Collector Current	0.5	A
P_D	Collector Power Dissipation	0.2	W
T_J	Junction Temperature	150	℃
T_{STG}	Storage Temperature Range	-55 to +150	℃

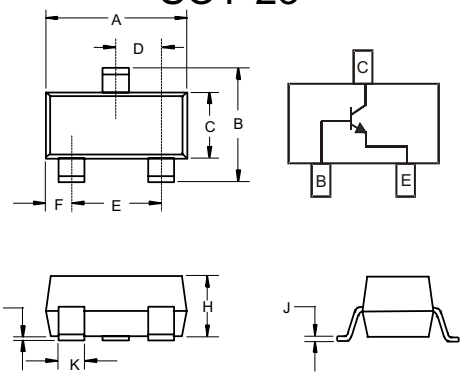
Electrical Characteristics @ 25°C Unless Otherwise Specified

Symbol	Parameter	Min	TYPE	Max	Units
OFF CHARACTERISTICS					
$V_{(BR)CEO}$	Collector-Emitter Breakdown Voltage (I_C=1mAdc,I_B=0)	32			V
$V_{(BR)CBO}$	Collector-Base Breakdown Voltage (I_C=100uAdc,I_E=0)	40			V
$V_{(BR)EBO}$	Collector-Base Breakdown Voltage (I_E=100uAdc,I_C=0)	5.0			V
I_{CBO}	Collector-Base Cutoff Current (V_{CB}=20Vdc, I_E=0)			1	μAdc
I_{EBO}	Emitter-Base Cutoff Current (V_{EB}=4.0Vdc, I_C=0)			1	uAdc
ON CHARACTERISTICS					
H_{FE}	DC Current Gain (I_C=100mAdc, V_{CE}=3.0Vdc)	82		390	
$V_{CE(sat)}$	Collector-Emitter Saturation Voltage (I_C=500mAdc, I_B=50mAdc)			0.4	Vdc
F_T	Transition Frequency (V_{CE}=5Vdc,Ic=20mAdc,f=100MHZ)		250		MHZ
C_{ob}	(V_{CB}=10Vdc,I_E=0,f=1MHZ)		6.0		pF

CLASSIFICATION OF h_{FE}

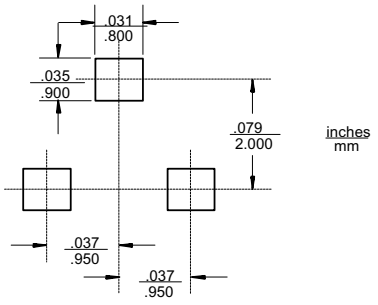
Rank	P	Q	R
Range	82-180	120-270	180-390
Marking	CP	CQ	CR

SOT-23



DIMENSIONS					
	INCHES		MM		
DIM	MIN	MAX	MIN	MAX	NOTE
A	.110	.120	2.80	3.04	
B	.083	.098	2.10	2.64	
C	.047	.055	1.20	1.40	
D	.035	.041	.89	1.03	
E	.070	.081	1.78	2.05	
F	.018	.024	.45	.60	
G	.0005	.0039	.013	.100	
H	.035	.044	.89	1.12	
J	.003	.007	.085	.180	
K	.015	.020	.37	.51	

Suggested Solder Pad Layout



2SC2411 Typical characteristics

● Electrical characteristic curves

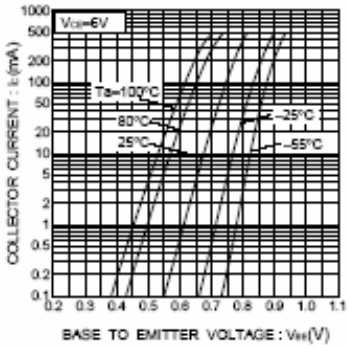


Fig.1 Grounded emitter propagation characteristics

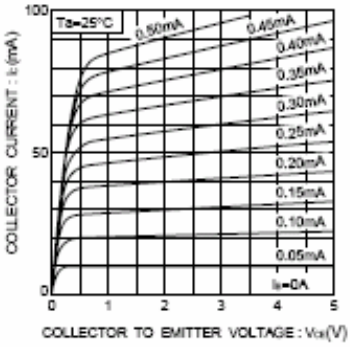


Fig.2 Grounded emitter output characteristics(I)

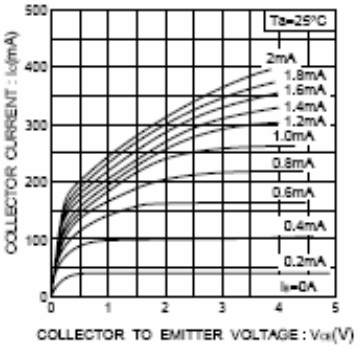


Fig.3 Grounded emitter output characteristics(II)

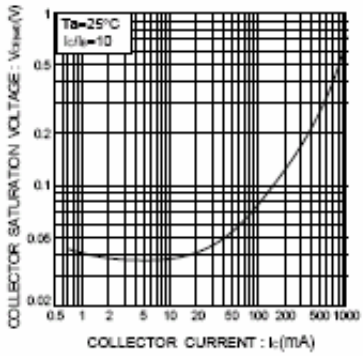


Fig.4 Collector-emitter saturation voltage vs. collector current

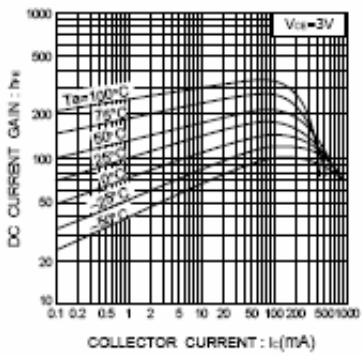


Fig.5 DC current gain vs. collector current

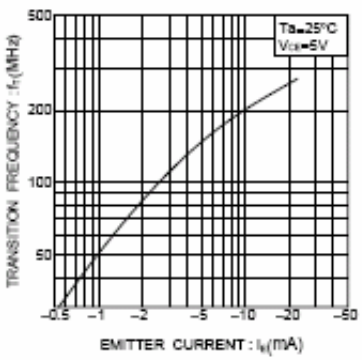


Fig. 6 Gain bandwidth product vs. emitter current

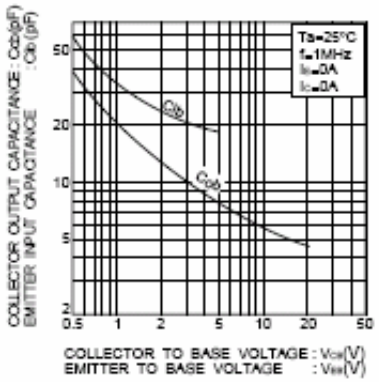


Fig.7 Collector output capacitance vs. collector-base voltage
Emitter input capacitance vs. emitter-base voltage

Ordering Information

Device	Packing
(Part Number)-TP	Tape&Reel;3Kpcs/Reel