



Micro Commercial Components
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FCX591

PNP Power Transistor

Features

- Part Marking Detail: P1
- Complementary Type: FCX491
- Capable of 1.0W of Power Dissipation
- Collector-current 2.0A

Electrical Characteristics @ 25°C Unless Otherwise Specified

Symbol	Parameter	Min	Max	Units
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OFF CHARACTERISTICS

$V_{(BR)CBO}$	Collector-Base Breakdown Voltage ($I_C=100\mu A$, $I_E=0$)	80		Vdc
$V_{(BR)CEO}$	Collector-Emitter Breakdown Voltage* ($I_C=10mA$, $I_B=0^*$)	60		Vdc
$V_{(BR)EBO}$	Emitter-Base Breakdown Voltage ($I_E=100\mu A$, $I_C=0$)	5.0		Vdc
I_{CBO}	Collector Cut-Off Current ($V_{CB}=60Vdc$)		100	nAdc
I_{CES}	Collector-Emitter Cut-Off Current ($V_{CES}=60Vdc$)		100	nAdc
I_{EBO}	Emitter Cut-Off Current ($V_{EB}=4.0V$, $I_C=0$)		100	nAdc

ON CHARACTERISTICS

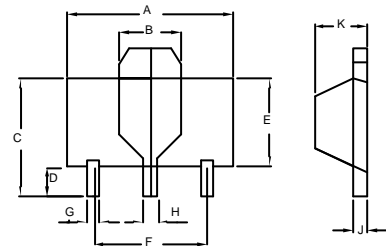
h_{FE}	Static Forward Current Transfer Ratio ($I_C=1.0mA$, $V_{CE}=5.0Vdc^*$) ($I_C=500mA$, $V_{CE}=5.0Vdc^*$) ($I_C=1.0mA$, $V_{CE}=5.0Vdc^*$) ($I_C=2.0mA$, $V_{CE}=5.0Vdc^*$)	100 100 80 15	300	
$V_{CE(sat)}$	Collector-Emitter Saturation Voltage ($I_C=500mA$, $I_B=50mA dc^*$) ($I_C=1.0A$, $I_B=100mA dc^*$)		0.3 0.6	Vdc
$V_{BE(sat)}$	Base-Emitter Saturation Voltage ($I_C=1.0A$, $I_B=100mA dc^*$)		1.2	Vdc
$V_{BE(on)}$	Base-Emitter Turn-on Voltage ($I_C=1.0A$, $V_{CE}=5.0Vdc^*$)		1.0	Vdc

SMALL-SIGNAL CHARACTERISTICS

f_T	Transition Frequency ($I_C=50mA$, $V_{CE}=10Vdc$, $f=100MHz$)	150		MHz
C_{bbo}	Output Capacitance ($V_{CB}=10Vdc$, $f=1.0MHz$)		10	pF

* Measured under pulsed conditions. Pulse width=300us. Duty cycle< 2% For typical Characteristics graphs see FMMT591 datasheet

SOT-89



DIM	DIMENSIONS				NOTES
	INCHES		MM		
	MIN	MAX	MIN	MAX	
A	.173	.181	4.39	4.60	
B	.063	.071	1.60	1.80	
C	.154	.165	3.91	4.19	
D	.031	.039	0.80	1.00	
E	.092	.100	2.34	2.54	
F	.118	-----	3.00	-----	TYP
G	.013	.019	0.33	0.48	
H	.015	.021	0.38	0.53	
J	.015	.016	0.38	0.41	
K	.055	.063	1.40	1.60	