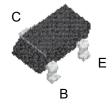
FSB6726

FSB6726



SuperSOT[™]-3

PNP General Purpose Amplifier

This device is designed for general purpose medium power amplifiers and switches requiring collector currents to 1.0 A. Sourced from Process 77.

Absolute Maximum Ratings* TA = 25°C unless otherwise noted

Symbol	Parameter	FSB660/FSB660A	Units
V _{CEO}	Collector-Emitter Voltage	30	V
V _{CBO}	Collector-Base Voltage	40	V
V _{EBO}	Emitter-Base Voltage	5	V
Ic	Collector Current - Continuous	1.5	А
T _{J,} T _{stg}	Operating and Storage Junction Temperature Range	-55 to +150	°C

*These ratings are limiting values above which the serviceability of any semiconductor device may be impaired.

NOTES:

1) These ratings are based on a maximum junction temperature of 150°C.

2) These are steady state limits. The factory should be consulted on applications involving pulsed or low duty cycle operations.

Thermal Characteristics T_{A = 25°C unless otherwise noted}

Symbol	Characteristic	Мах	Units
		FSB6726	
PD	Total Device Dissipation	500	mW
$R_{\theta JA}$	Thermal Resistance, Junction to Ambient	250	°C/W

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(continued)

Electrical Characteristics

Electrical Characteristics T _A		$T_A = 25^{\circ}C$ unless otherwise noted				
Symbol	Parameter		Test Conditions	Min	Max	Units

OFF CHARACTERISTICS

BV _{CEO}	Collector-Emitter Breakdown Voltage	I _C = 10 mA	30		V
BV _{CBO}	Collector-Base Breakdown Voltage	I _C = 100 μA	40		V
BV _{EBO}	Emitter-Base Breakdown Voltage	I _E = 100 μA	5		V
I _{CBO}	Collector Cutoff Current	V _{CB} = 40 V		100	nA
I _{EBO}	Emitter Cutoff Current	V _{EB} = 5V		100	nA

ON CHARACTERISTICS*

h _{FE}		I _C = 100 mA, V _{CE} = 1 V I _C = 1 A, V _{CE} = 1V	60 50	250	-
V _{CE(sat)}	Collector-Emitter Saturation Voltage	I _C = 1 A, I _B = 100 mA		500	mV
V _{BE(on)}	Base-Emitter On Voltage	I _C = 1 A, V _{CE} = 1 V		1.2	V

SMALL SIGNAL CHARACTERISTICS

C _{cb}	Collector-Base Capacitance	V _{CB} = 10 V, f = 1MHz		30	pF
hfe	Small Signal Current Gain	I _C = 50 mA,V _{CE} = 10V, f=20MHz	2.5	25	-

*Pulse Test: Pulse Width $\leq 300~\mu\text{s},$ Duty Cycle $\leq 2.0\%$

FSB6726

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PRODUCT STATUS DEFINITIONS

Definition of Terms

Product Status	Definition
Formative or In Design	This datasheet contains the design specifications for product development. Specifications may change in any manner without notice.
First Production	This datasheet contains preliminary data, and supplementary data will be published at a later date. Fairchild Semiconductor reserves the right to make changes at any time without notice in order to improve design.
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	Formative or In Design First Production Full Production