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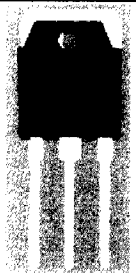
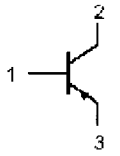
Silicon PNP Power Transistor

2SA1185

DESCRIPTION

- Collector-Emitter Breakdown Voltage-
  : $V_{(BR)CEO}$= -50V(Min.)
- Low Collector-Emitter Saturation Voltage-
  : $V_{CE(sat)}$= -0.8V(Max.)@ I_C= -7A
- Good Linearity of h_{FE}
- Large Collector Current





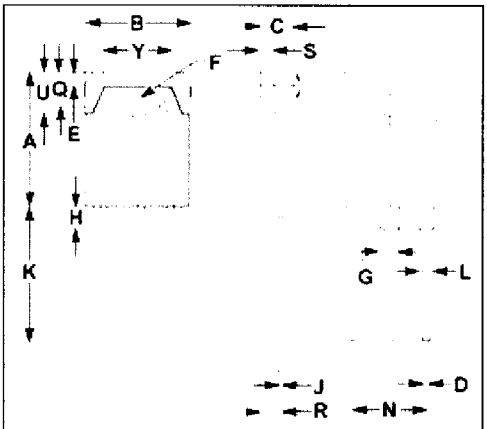
PIN: 1.Base
2.Collector
3.Emitter
TO-3PN Package

APPLICATIONS

- Designed for high power audio frequency amplifier applications

ABSOLUTE MAXIMUM RATINGS(T_a=25℃)

SYMBOL	PARAMETER	VALUE	UNIT
V_{CBO}	Collector-Base Voltage	-50	V
V_{CEO}	Collector-Emitter Voltage	-50	V
V_{EBO}	Emitter-Base Voltage	-5	V
I_C	Collector Current-Continuous	-7	A
I_{CM}	Collector Current-Peak	-15	A
I_{BM}	Base Current-Peak	-5	A
P_C	Collector Power Dissipation @ T_C=25℃	60	W
	Collector Power Dissipation @ T_a=25℃	2.5	
T_J	Junction Temperature	150	℃
T_{stg}	Storage Temperature Range	-55~150	℃



DIM	mm MIN	MAX
A	19.60	20.30
B	15.50	15.70
C	4.70	4.90
D	0.90	1.10
E	1.90	2.10
F	3.40	3.60
G	2.90	3.20
H	3.20	3.40
J	0.595	0.605
K	19.80	20.70
L	1.90	2.20
N	10.89	10.91
Q	4.90	5.10
R	3.35	3.45
S	1.995	2.100
U	5.90	6.20
Y	9.90	10.10

ELECTRICAL CHARACTERISTICS

T_C=25℃ unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
$V_{(BR)CEO}$	Collector-Emitter Breakdown Voltage	I_C= -10mA ; I_B= 0	-50			V
$V_{CE(sat)}$	Collector-Emitter Saturation Voltage	I_C= -7A; I_B= -0.7A			-0.8	V
$V_{BE(on)}$	Base-Emitter On Voltage	I_C= -7A; V_{CE}= -5V			-1.5	V
I_{CBO}	Collector Cutoff Current	V_{CB}= -50V; I_E= 0			-1	mA
I_{EBO}	Emitter Cutoff Current	V_{EB}= -5V; I_C= 0			-2	mA
h_{FE-1}	DC Current Gain	I_C= -1A; V_{CE}= -5V	60		320	
h_{FE-2}	DC Current Gain	I_C= -7A; V_{CE}= -5V	20			
C_{OB}	Collector Output Capacitance	I_E= 0; V_{CB}= -10V; f= 1MHz		250		pF
f_T	Current-Gain—Bandwidth Product	I_C= -0.5A; V_{CE}= -5V		100		MHz

◆ **h_{FE-1} Classifications**

Q	P	O
60-120	100-200	160-320