

2SD1367

Silicon NPN Epitaxial

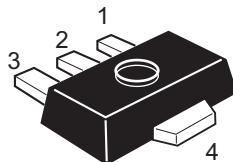
REJ03G0785-0200
 (Previous ADE-208-1147)
 Rev.2.00
 Aug.10.2005

Application

- Low frequency power amplifier
- Complementary pair with 2SB1001

Outline

RENESAS Package code: PLZZ0004CA-A
 (Package name: UPAK®)



1. Base
2. Collector
3. Emitter
4. Collector (Flange)

Note: Marking is "BC".

*UPAK is a trademark of Renesas Technology Corp.

Absolute Maximum Ratings

(Ta = 25°C)

Item	Symbol	Ratings	Unit
Collector to base voltage	V _{CBO}	20	V
Collector to emitter voltage	V _{CEO}	16	V
Emitter to base voltage	V _{EBO}	6	V
Collector current	I _C	2	A
Collector peak current	i _{C(peak)} ^{*1}	3	A
Collector power dissipation	P _C ^{*2}	1	W
Junction temperature	T _j	150	°C
Storage temperature	T _{stg}	-55 to +150	°C

Notes: 1. PW ≤ 10 ms, Duty cycle ≤ 20%.

2. Value on the alumina ceramic board (12.5 × 20 × 0.7 mm)

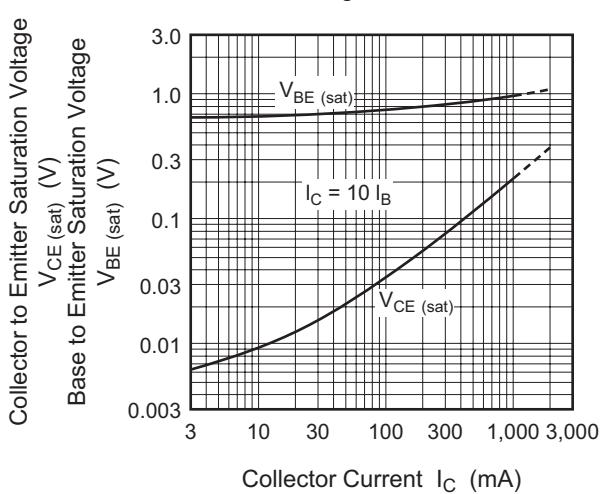
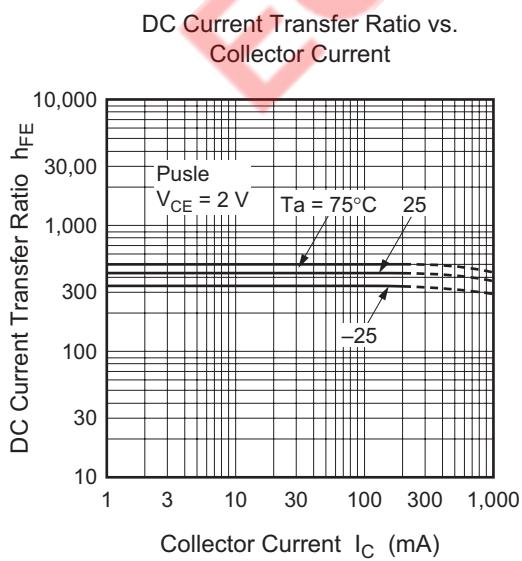
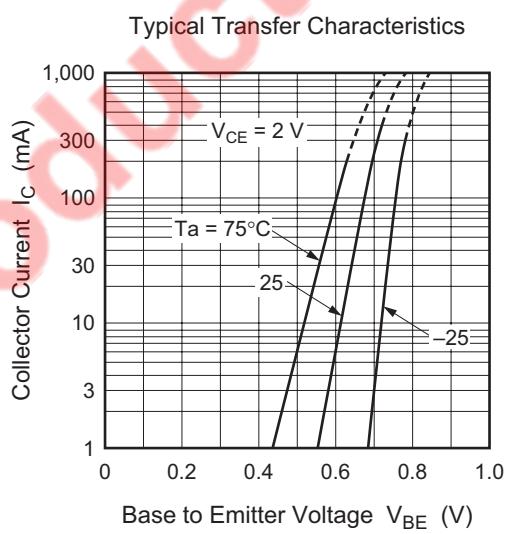
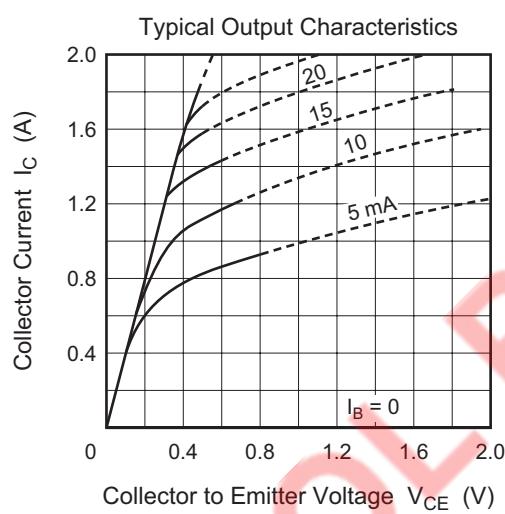
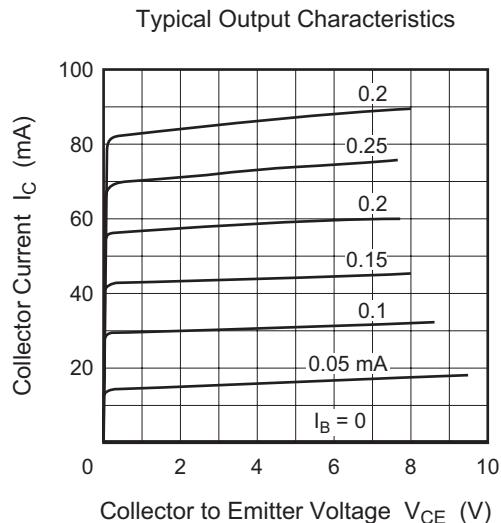
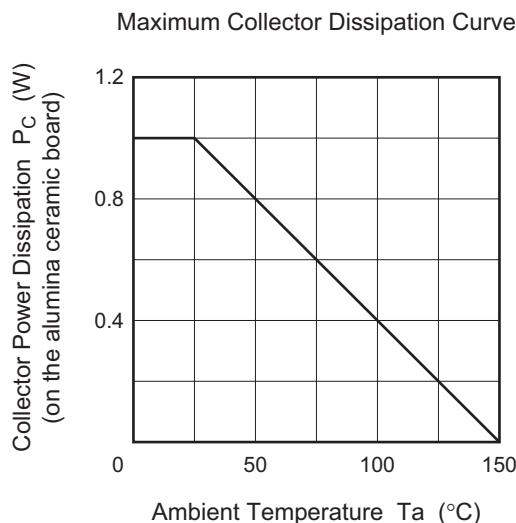
Electrical Characteristics

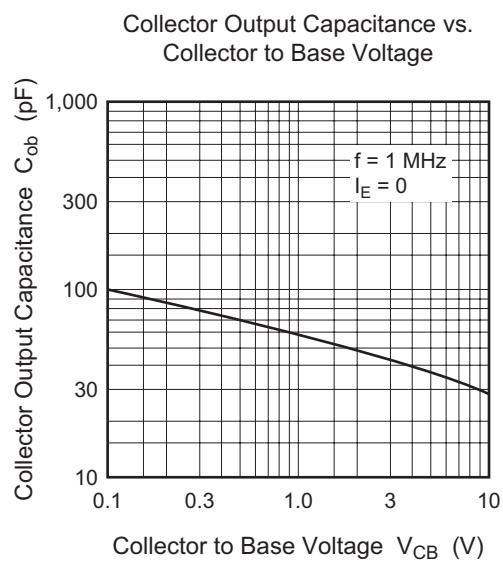
(Ta = 25°C)

Item	Symbol	Min	Typ	Max	Unit	Test conditions
Collector to base breakdown voltage	V _{(BR)CBO}	20	—	—	V	I _C = 10 µA, I _E = 0
Collector to emitter breakdown voltage	V _{(BR)CEO}	16	—	—	V	I _C = 1 mA, R _{BE} = ∞
Emitter to base breakdown voltage	V _{(BR)EBO}	6	—	—	V	I _E = 10 µA, I _C = 0
Collector cutoff current	I _{CBO}	—	—	0.1	µA	V _{CB} = 16 V, I _E = 0
Emitter cutoff current	I _{EBO}	—	—	0.1	µA	V _{EB} = 5 V, I _C = 0
DC current transfer ratio	h _{FE}	250	—	500		V _{CE} = 2 V, I _C = 0.1 A, Pulse
Collector to emitter saturation voltage	V _{CE(sat)}	—	0.15	0.3	V	I _C = 1 A, I _B = 0.1 A, Pulse
Base to emitter saturation voltage	V _{BE(sat)}	—	0.9	1.2	V	I _C = 1 A, I _B = 0.1 A, Pulse
Gain bandwidth product	f _T	—	100	—	MHz	V _{CE} = 2 V, I _C = 10 mA
Collector output capacitance	C _{ob}	—	20	—	pF	V _{CB} = 10 V, I _E = 0, f = 1 MHz

EOL Product

Main Characteristics





EOL Product

Package Dimensions

JEITA Package Code	RENESAS Code	Package Name	MASS[Typ.]	Unit: mm
SC-62	PLZZ0004CA-A	UPAK / UPAKV	0.050g	

Ordering Information

Part Name	Quantity	Shipping Container
2SD1367BCTR-E	1000	φ 178 mm Reel, 12 mm Emboss Taping

Note: For some grades, production may be terminated. Please contact the Renesas sales office to check the state of production before ordering the product.

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