

Descriptions

- Switching application
- Interface circuit and driver circuit application

Features

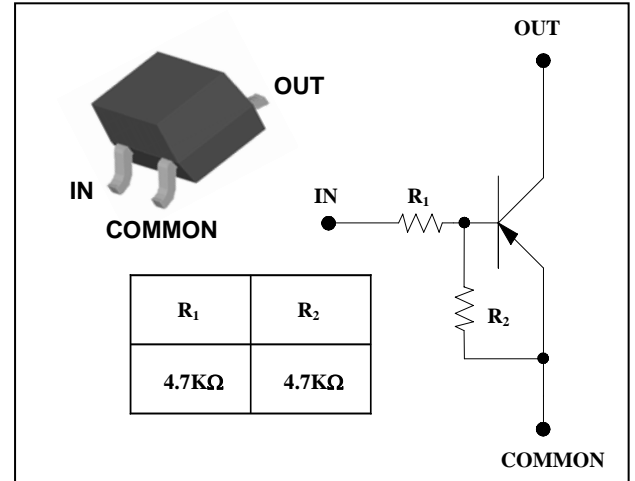
- With built-in bias resistors
- Simplify circuit design
- Reduce a quantity of parts and manufacturing process
- High packing density

Ordering Information

Type NO.	Marking	Package Code
SRA2201S	RA1  ① ②	SOT-23

①Device Code ②Year&Week Code

PIN Connection



Absolute Maximum Ratings

(Ta=25°C)

Characteristic	Symbol	Rating	Unit
Output voltage	V _O	-50	V
Input voltage	V _I	-20, 10	V
Output current	I _O	-100	mA
Power dissipation	P _D	200	mW
Junction temperature	T _J	150	°C
Storage temperature range	T _{stg}	-55 ~ 150	°C

Electrical Characteristics

(Ta=25°C)

Characteristic	Symbol	Test Condition	Min.	Typ.	Max.	Unit
Output cut-off current	I _{O(OFF)}	V _O =-50V, V _I =0	-	-	-500	nA
DC current gain	G _I	V _O =-5V, I _O =-10mA	30	55	-	-
Output voltage	V _{O(ON)}	I _O =-10mA, I _I =-0.5mA	-	-0.1	-0.3	V
Input voltage (ON)	V _{I(ON)}	V _O =-0.2V, I _O =-5mA	-	-1.5	-2.0	V
Input voltage (OFF)	V _{I(OFF)}	V _O =-5V, I _O =-0.1mA	-1.0	-1.2	-	V
Transition frequency	f _T *	V _O =-10V, I _O =-5mA, f=1MHz	-	200	-	MHz
Input current	I _I	V _I =-5V, I _O =0	-	-	-1.8	mA
Input resistor (Input to base)	R ₁	-	3.3	4.7	6.1	KΩ
Input resistor (Base to common)	R ₂	-	3.3	4.7	6.1	KΩ

* : Characteristic of transistor only

Electrical Characteristic Curves

Fig. 1 $P_c - T_a$

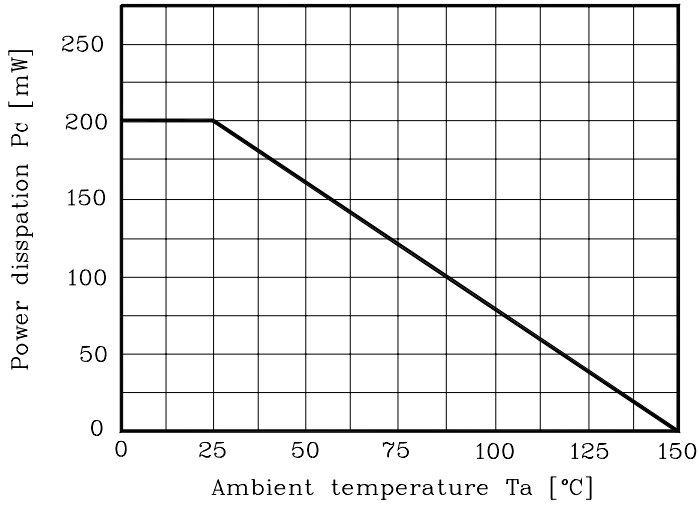


Fig. 2 $I_o - V_{I(ON)}$

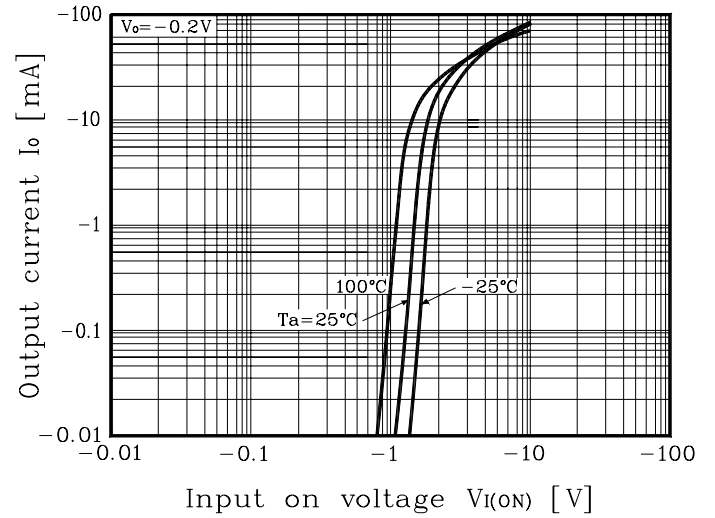


Fig. 3 $I_o - V_{I(OFF)}$

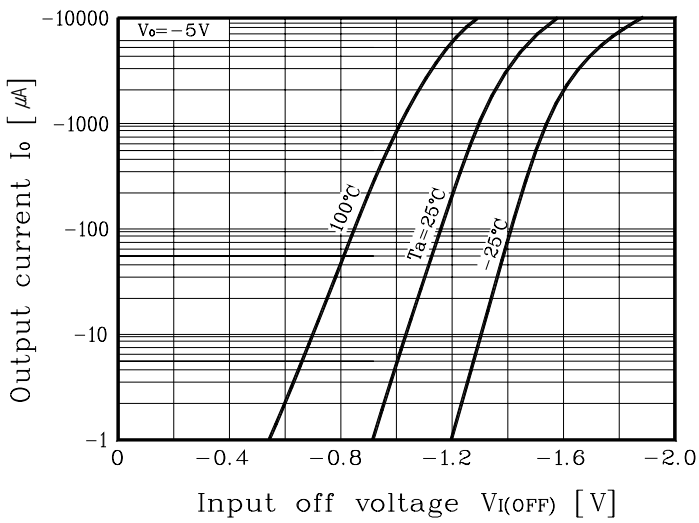
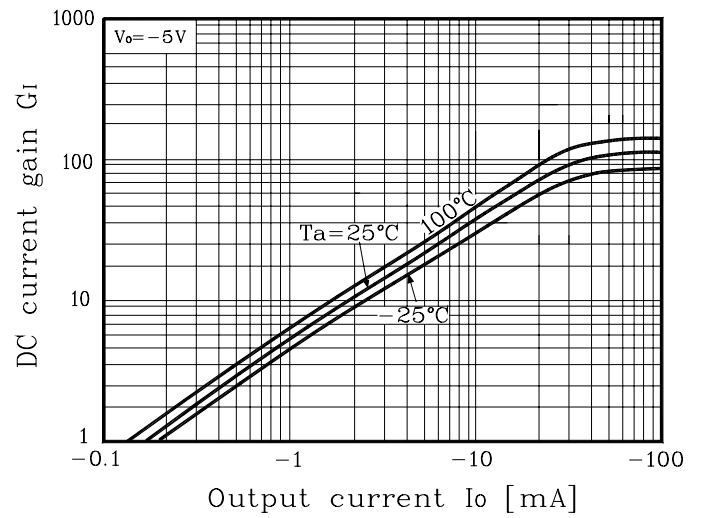
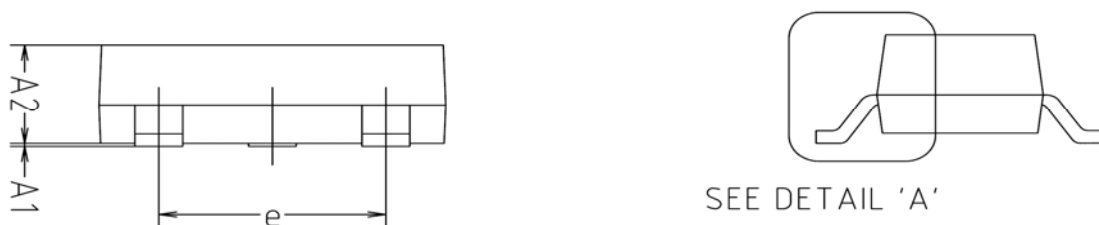
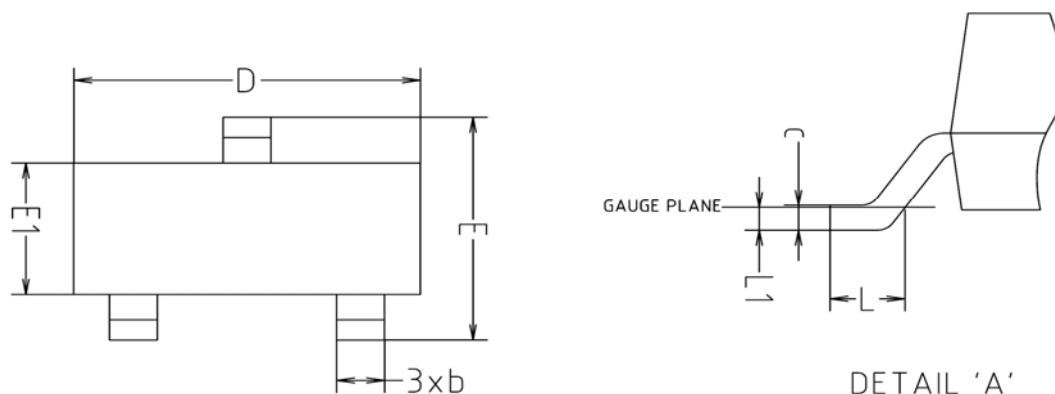


Fig. 4 $G_I - I_o$

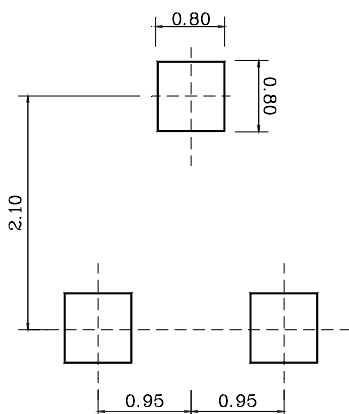


Outline Dimension



SYMBOL	MILLIMETERS			NOTE
	MINIMUM	NOMINAL	MAXIMUM	
A1	0.00	-	0.10	
A2	0.82	-	1.02	
b	0.39	0.42	0.45	
c	0.09	0.12	0.15	
D	2.80	2.90	3.00	
E	2.20	2.40	2.60	
E1	1.20	1.30	1.40	
e	1.90BSC			
L	0.20	-	-	
L1	0.12BSC			

※Recommend PCB solder land [Unit: mm]



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