Unit: mm

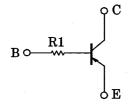
TOSHIBA Transistor Silicon PNP Epitaxial Type (PCT Process)

RN2510,RN2511

Switching, Inverter Circuit, Interface Circuit And Driver Circuit Applications

- Including twodevices in SMV (super mini type with 5 leads)
- With built-in bias resistors
- Simplify circuit design
- Reduce a quantity of parts and manufacturing process
- Complementary to RN1510, RN1511

Equivalent Circuit

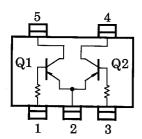


Maximum Ratings (Ta = 25°C)

Characteristic	Symbol	Rating	Unit
Collector-base voltage	V _{CBO}	-50	V
Collector-emitter voltage	V _{CEO}	-50	V
Emitter-base voltage	V _{EBO}	-5	٧
Collector current	IC	-100	mA
Collector power dissipation	P _C *	300	mW
Junction temperature	Tj	150	°C
Storage temperature range	T _{stg}	-55~150	°C

^{*:} Total rating

Equivalent Circuit (Top View)



1. BASE 1 (B1) 2. EMITTER (E) 3. BASE 2 (B2) 4. COLLECTOR 1 (C1)

JEDEC —

EIAJ —

TOSHIBA 2-3L1A

Weight: 0.014g

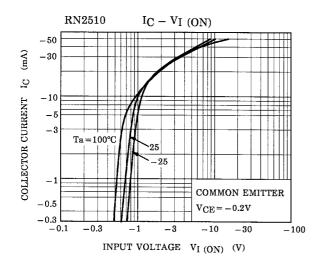


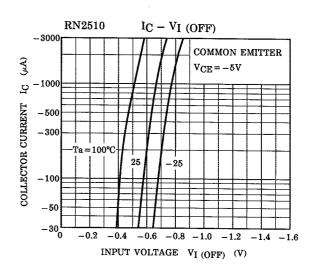
Electrical Characteristics (Ta = 25°C)

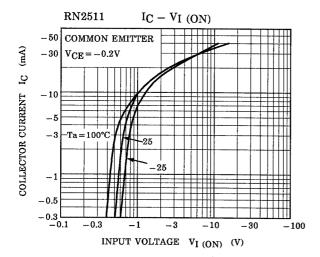
Characteristic		Symbol	Test Circuit	Test Condition	Min	Тур.	Max	Unit
Collector cut-off current		I _{CBO}	_	$V_{CB} = -50V$, $I_E = 0$	_	_	-100	nA
Emitter cut-off current		I _{EBO}	_	V _{EB} = -5V, I _C = 0	_	_	-100	nA
DC current gain		h _{FE}	_	V _{CE} = −5V, I _C = −1mA	120	_	400	_
Collector-emitter saturation voltage		V _{CE} (sat)	_	I _C = -5mA, I _B = -0.25mA	_	-0.1	-0.3	V
Translation frequency		f _T	_	$V_{CE} = -10V, I_{C} = -5mA$	_	250	_	MHz
Collector output capacitance		C _{ob}	_	V _{CB} = −10V, I _E = 0, f = 1MHz	_	3	6	pF
Input resistor	RN2510	- R1	_		3.29	4.7	6.11	kΩ
	RN2511			_	7	10	13	K12

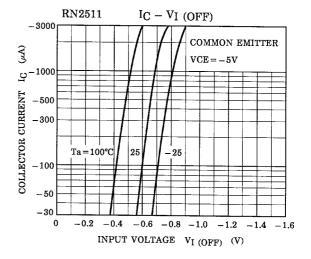
2

(Q1, Q2 Common)

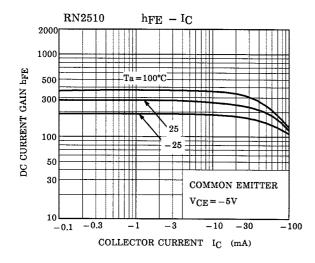


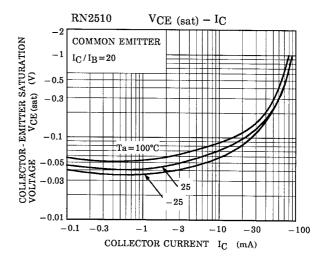


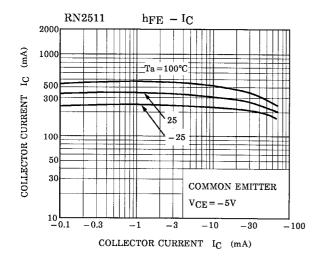


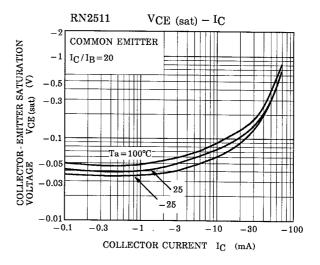


(Q1, Q2 Common)









4

Type Name	Marking	
RN2510	Type Name Y K	
RN2511	Type Name Y M	

2001-06-07

5

RESTRICTIONS ON PRODUCT USE

000707EAA

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