

RT1P430X SERIES

〈Transistor〉

Transistor With Resistor
For Switching Application
Silicon PNP Epitaxial Type

DESCRIPTION

RT1P430X is a one chip transistor with built-in bias resistor, NPN type is RT1N430X.

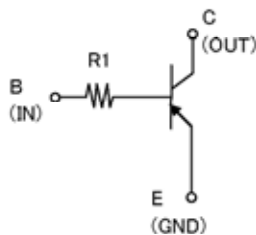
FEATURE

- Built-in bias resistor ($R1=4.7k\Omega$).

APPLICATION

Inverted circuit, switching circuit, interface circuit, driver circuit.

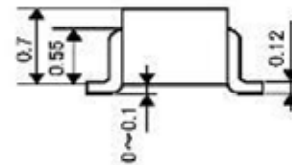
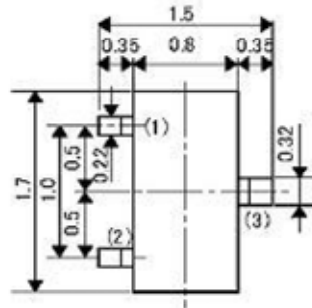
Equivalent circuit



OUTLINE DRAWING

UNIT : mm

RT1P430U



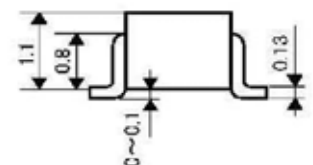
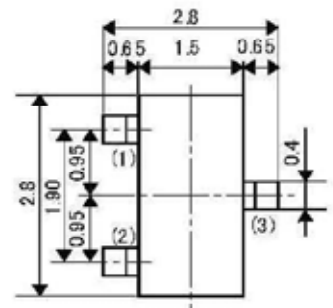
JEITA: —

JEDEC: —

Terminal Connector

- ①: Base
- ②: Emitter
- ③: Collector

RT1P430C



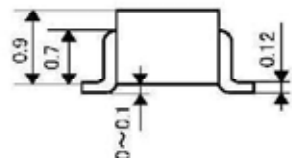
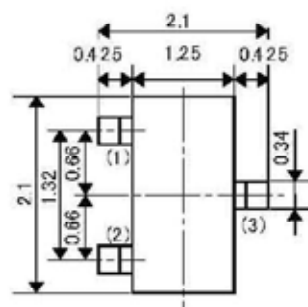
JEITA: SC-59

JEDEC: Similar to TO-236

Terminal Connector

- ①: Base
- ②: Emitter
- ③: Collector

RT1P430M



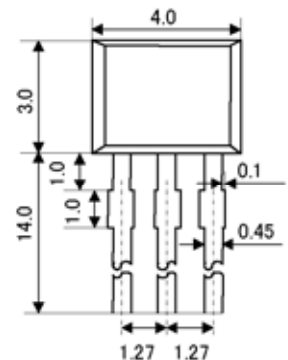
JEITA: SC-70

JEDEC: —

Terminal Connector

- ①: Base
- ②: Emitter
- ③: Collector

RT1P430S



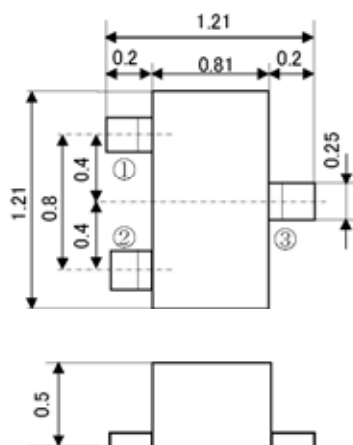
JEITA: —

JEDEC: —

Terminal Connector

- ①: Emitter
- ②: Collector
- ③: Base

RT1P430T2



JEITA, JEDEC: —

ISAHAYA: T-USM

Terminal Connector

- ①: Base
- ②: Emitter
- ③: Collector

RT1P430X SERIES

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MAXIMUM RATING (Ta=25°C)

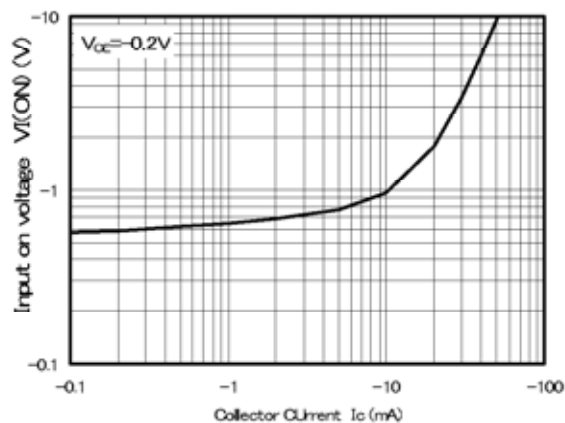
SYMBOL	PARAMETER	RATING					UNIT
		RT1P430T2	RT1P430U	RT1P430M	RT1P430C	RT1P430S	
V _{CBO}	Collector to Base voltage	-50					V
V _{EBO}	Emitter to Base voltage	-6					V
V _{CEO}	Collector to Emitter voltage	-50					V
I _C	Collector current	-100					mA
I _{CM}	Peak Collector current	-200					mA
P _C	Collector dissipation(Ta=25°C)	125(※)	150	200		450	mW
T _j	Junction temperature	+125	+150				°C
T _{stg}	Storage temperature	-55~+125		-55~+150			°C

ELECTRICAL CHARACTERISTICS (Ta=25°C) (※) package mounted on 9mm × 19mm × 1mm glass-epoxy substrate.

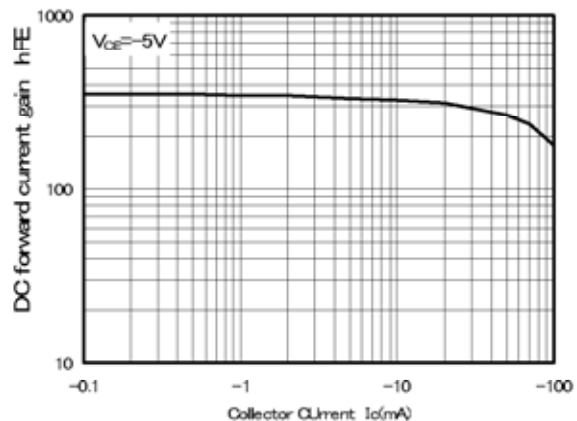
SYMBOL	PARAMETER	TEST CONDITION	LIMIT			UNIT
			MIN	TYP	MAX	
$V_{(BR)CEO}$	C to E break down voltage	$I_C = -100 \mu A$, $R_{BE} = \infty$	-50			V
I_{CBO}	Collector cut off current	$V_{CB} = -50V$, $I_E = 0$			-0.1	μA
h_{FE}	DC forward current gain	$V_{CE} = -5V$, $I_C = -1mA$	100			—
$V_{CE(sat)}$	C to E saturation voltage	$I_C = -10mA$, $I_B = -0.5mA$			-0.3	V
R_1	Input resistance		3.3	4.7	6.1	k Ω
f_T	Gain band width product	$V_{CE} = -6V$, $I_E = 10mA$		150		MHz

TYPICAL CHARACTERISTICS

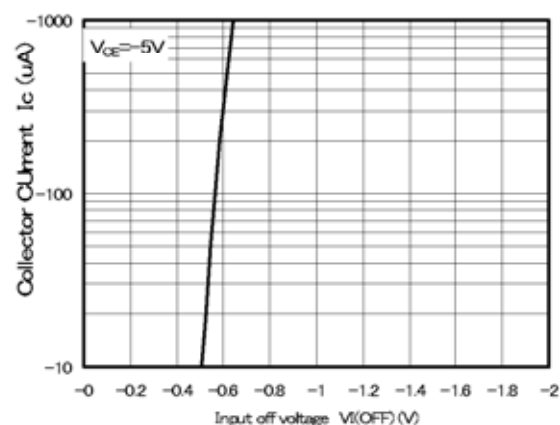
Input on voltage-Collector Current



DC forward current gain-Collector Current



Collector Current-Input off voltage





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