

2SA1747

Silicon PNP Epitaxial Planar Type

For high-frequency amplification
Complementary pair with 2SC4561

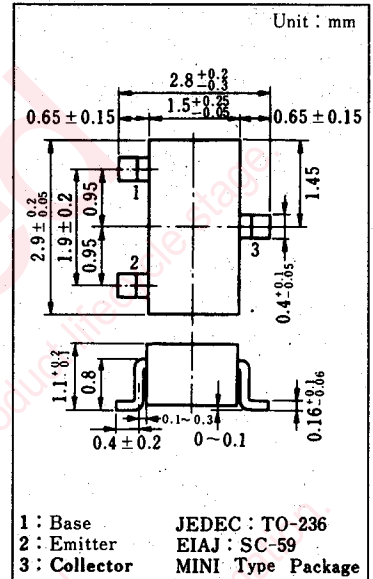
■ Features

- High transition frequency f_T
- Large collector output capacitance C_{ob}
- As it is a MINI type package, downsizing of equipment and automatic insertion by radial taping are possible.

■ Absolute Maximum Ratings ($T_a=25^\circ\text{C}$)

Item	Symbol	Value	Unit
Collector-Base Voltage	V_{CBO}	-50	V
Collector-Emitter Voltage	V_{CEO}	-50	V
Emitter-Base Voltage	V_{EBO}	-5	V
Collector Current	I_C	-50	mA
Collector Power Dissipation	P_C	200	mW
Junction Temperature	T_j	150	$^\circ\text{C}$
Storage Temperature	T_{stg}	-55~+150	$^\circ\text{C}$

■ Package Dimensions



■ Electrical Characteristics ($T_a=25^\circ\text{C}$)

Item	Symbol	Condition	min.	typ.	max.	Unit
Collector-Base Voltage	V_{CBO}	$I_C=-10\mu\text{A}, I_E=0$	-50			V
Collector-Emitter Voltage	V_{CEO}	$I_C=-1\text{mA}, I_B=0$	-50			V
Emitter-Base Voltage	V_{EBO}	$I_E=-10\mu\text{A}, I_C=0$	-5			V
Collector Cutoff Current	I_{CBO}	$V_{CB}=-10\text{V}, I_E=0$			-0.1	μA
	I_{CEO}	$V_{CE}=-10\text{V}, I_B=0$			-100	μA
DC Current Gain	h_{FE}^*	$V_{CE}=-10\text{V}, I_C=-2\text{mA}$	200		500	
Collector-Emitter Saturation Voltage	$V_{CE(sat)}$	$I_C=-10\text{mA}, I_B=-1\text{mA}$		-0.1	-0.3	V
Transition Frequency	f_T	$V_{CB}=-10\text{V}, I_E=2\text{mA}, f=200\text{MHz}$		250		MHz
Collector Output Capacitance	C_{ob}	$V_{CB}=-10\text{V}, I_E=0, f=1\text{MHz}$		1.5		pF

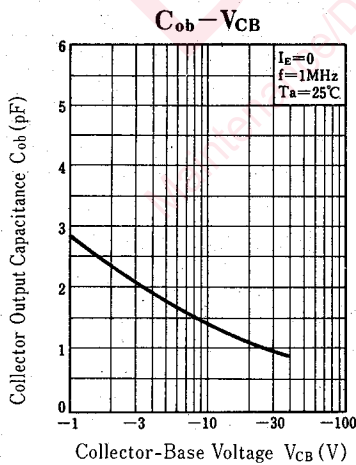
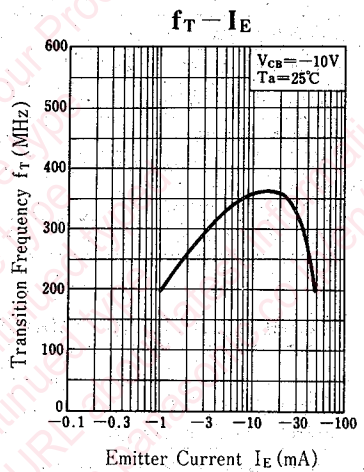
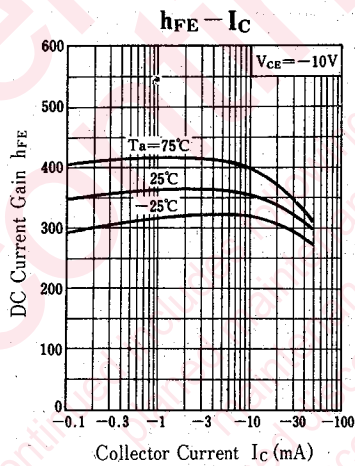
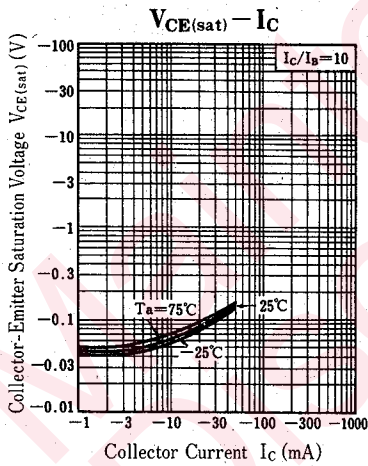
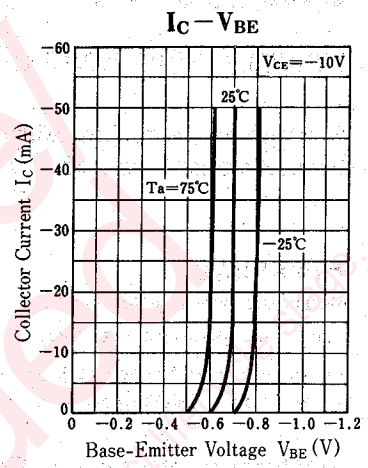
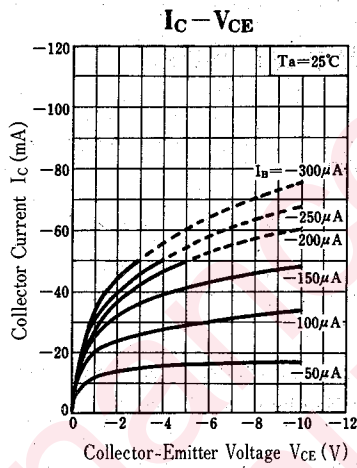
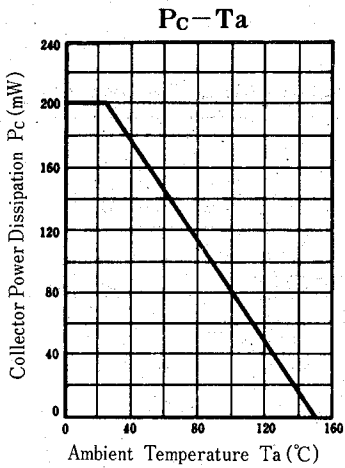
* h_{FE} Ranking

Rank	Q	R
h_{FE}	200~400	250~500
Marking Symbol	ALQ	ALR

■ Type Name Marking (Example)

Type No. h_{FE} Classification





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