



SEMI CONDUCTOR

2SA1015LT1

Shandong Yiguang Electronic Joint stock Co., Ltd

TECHNICAL DATA

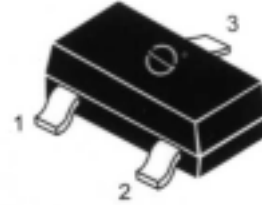
PNP EPITAXIAL SILICON TRANSISTOR

* Complement to 2SC1815

* Collector Current : $I_c=150\text{mA}$ **ABSOLUTE MAXIMUM RATINGS at $T_a=25$**

Characteristic	Symbol	Rating	Unit
Collector-Base Voltage	V_{cbo}	-60	V
Collector-Emitter Voltage	V_{ceo}	-50	V
Emitter-Base Voltage	V_{ebo}	-5	V
Collector Current	I_c	-150	mA
Collector Dissipation $T_a=25$ *	P_D	225	mW
Junction Temperature	T_j	150	
Storage Temperature	T_{stg}	-55-150	

Package:SOT-23



PIN:	1	2	3
STYLE			
NO.1	B	E	C

ELECTRICAL CHARACTERISTICS at $T_a=25$

Characteristic	Symbol	Min	Typ	Max	Unit	Test Conditions
Collector-Base Breakdown Voltage	BV_{cbo}	-60			V	$I_c = -100\mu\text{A}$ $I_e = 0$
Collector-Emitter Breakdown Voltage#	BV_{ceo}	-50			V	$I_c = -1\text{mA}$ $I_b = 0$
Emitter-Base Breakdown Voltage	BV_{ebo}	-5.0			V	$I_e = -100\mu\text{A}$ $I_c = 0$
Collector-Base Cutoff Current	I_{cbo}			-100	nA	$V_{cb} = -50\text{V}$ $I_e = 0$
Emitter-Base Cutoff Current	I_{ebo}			-100	nA	$V_{eb} = -3\text{V}$ $I_c = 0$
DC Current Gain	H_{fe}	70		700		$V_{ce} = -6\text{V}$ $I_c = -2\text{mA}$
Collector-Emitter Saturation Voltage	$V_{ce(sat)}$			-0.30	V	$I_c = -100\text{mA}$ $I_b = -10\text{mA}$

* Total Device Dissipation : $FR=1 \times 0.75 \times 0.062\text{in Board}$, Derate 25 .# Pulse Test : Pulse Width 300 μs , Duty cycle 2%

DEVICE MARKING:

2SA1015=M6



2SA1015

Fig.1 Grounded emitter propagation characteristics

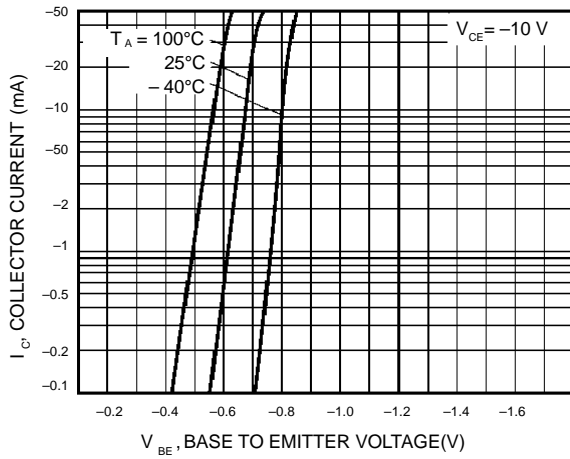


Fig.2 Grounded emitter output characteristics(I)

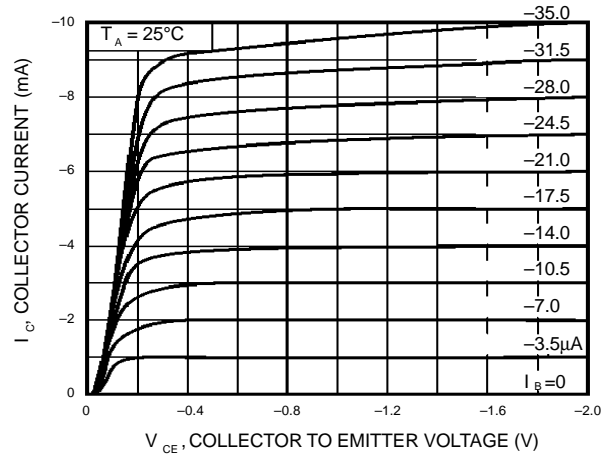


Fig.3 Grounded emitter output characteristics(II)

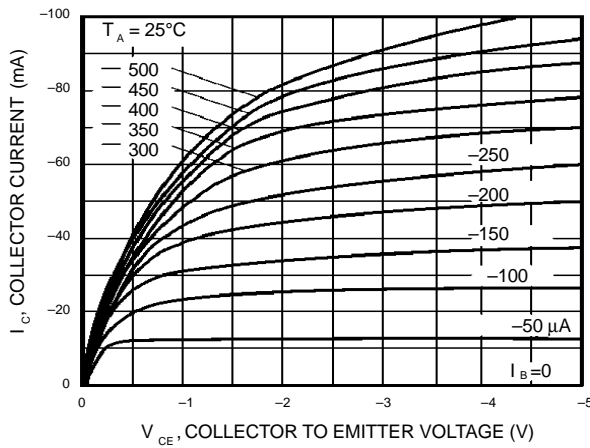


Fig.4 DC current gain vs. collector current (I)

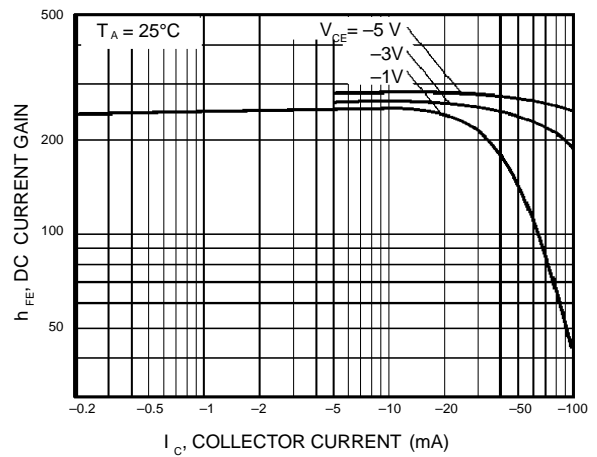


Fig.5 DC current gain vs. collector current (II)

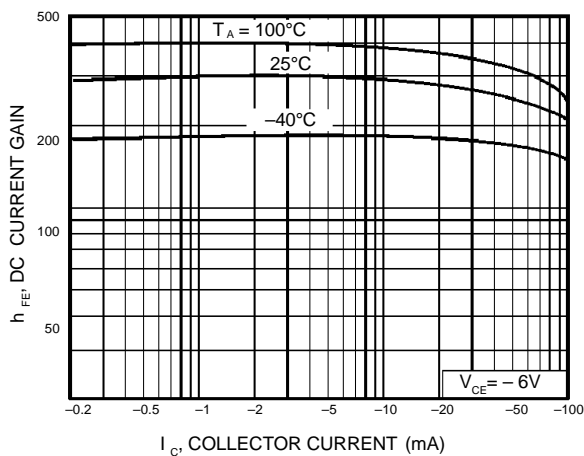
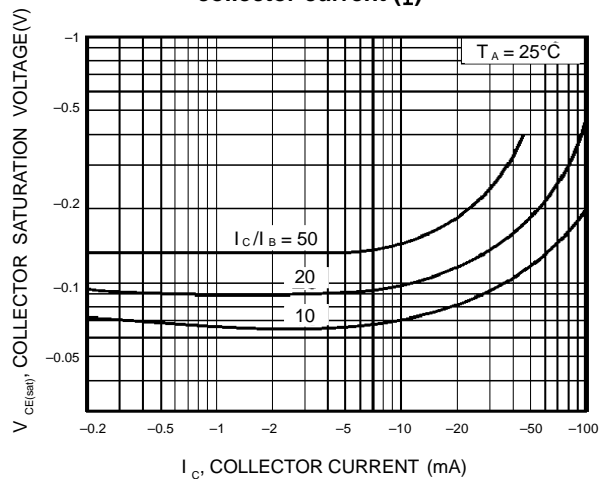


Fig.6 Collector-emitter saturation voltage vs. collector current (I)





2SA1015

Fig.7 Collector-emitter saturation voltage vs. collector current (I)

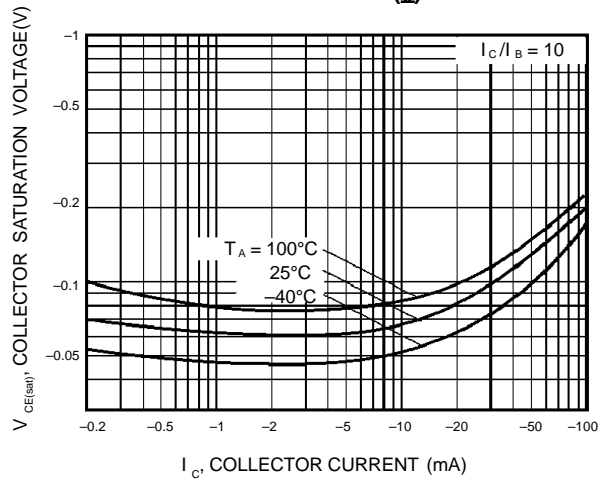


Fig.8 Gain bandwidth product vs. emitter current

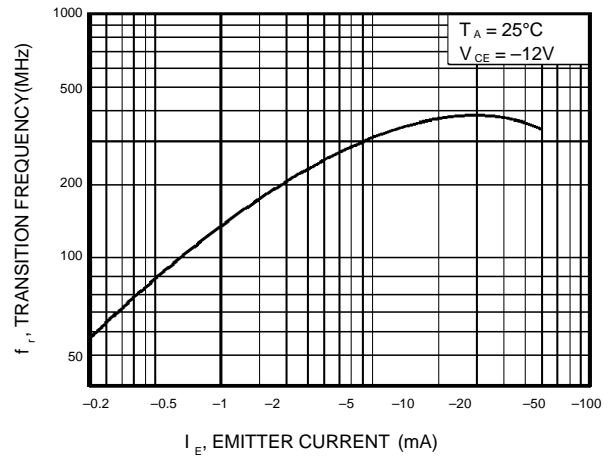


Fig.9 Collector output capacitance vs. collector-base voltage
Emitter input capacitance vs. emitter-base voltage

