

自主封測 品質把控 售後保障

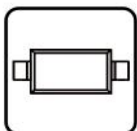
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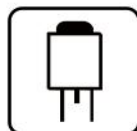
電源管理



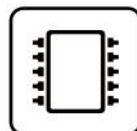
顯示驅動



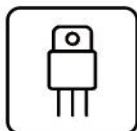
二三極管



LDO穩壓器



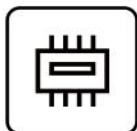
觸摸芯片



MOS管



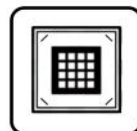
運算放大器



存儲芯片



MCU



串口通信

MMBT5551 G1-TD (0.42)

產品規格說明書

FEATURES:

- ※ Complementary to MMBT5401
- ※ Collector Current: $I_C=0.6A$
- ※ Ideal for Medium Power Amplification and Switching

MARKING:G1

MAXIMUM RATINGS ($T_a=25^{\circ}C$ unless otherwise noted)

Parameter	Symbol	Value	Unit
Collector-Base Voltage	VCBO	180	V
Collector-Emitter Voltage	VCEO	160	V
Emitter-Base Voltage	VEBO	6	V
Collector Current	I_C	600	mA
Collector Power Dissipation	PC	300	mW
Thermal Resistance From Junction To Ambient	$R_{\theta JA}$	416	$^{\circ}C/W$
Junction Temperature	T_j	150	$^{\circ}C$
Storage Temperature	Tstg	-55~+150	$^{\circ}C$

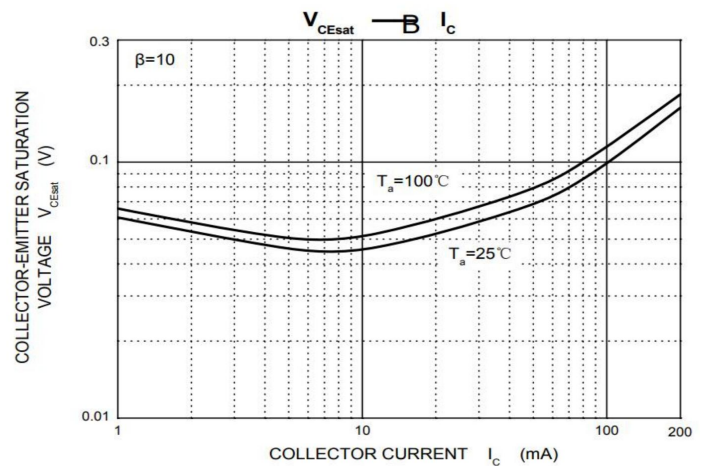
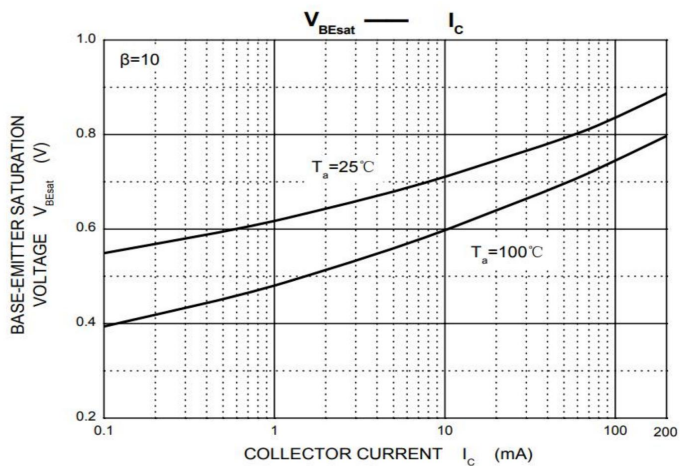
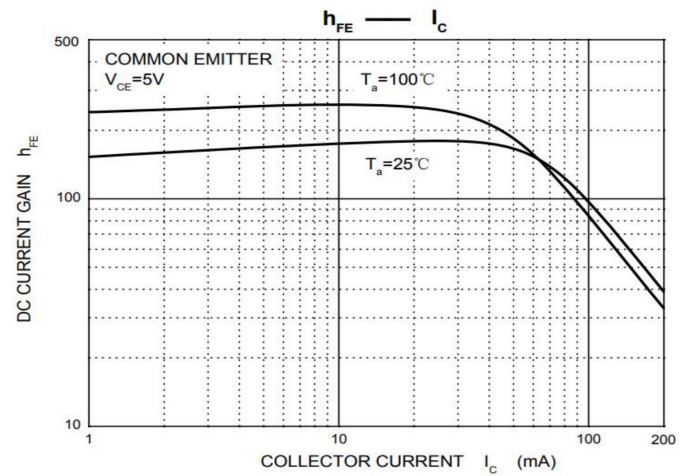
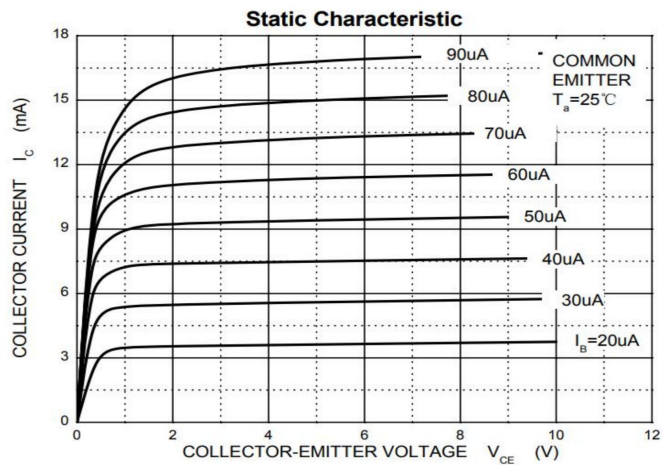
ELECTRICAL CHARACTERISTICS ($T_a=25^{\circ}C$ unless otherwise specified)

Parameter	Symbol	Test Condition	Min	Typ	Max	Unit
Collector-base breakdown voltage	$V_{(BR)CBO}$	$I_C = 100\mu A, I_E = 0$	180			V
Collector-emitter breakdown voltage	$V_{(BR)CEO}$	$I_C = 1mA, I_B = 0$	160			V
Emitter-base breakdown voltage	$V_{(BR)EBO}$	$I_E = 10\mu A, I_C = 0$	6			V
Collector cut-off current	I_{CBO}	$V_{CB} = 120V, I_E = 0$			50	nA
Emitter cut-off current	I_{EBO}	$V_{EB} = 4V, I_C = 0$			50	nA
DC current gain	hFE	$V_{CE} = 5V, I_C = 1mA$	80			
	hFE	$V_{CE} = 5V, I_C = 10mA$	100		250	
	hFE	$V_{CE} = 5V, I_C = 50mA$	50			
Collector-emitter saturation voltage	$V_{CE(sat)}$	$I_C = 10mA, I_B = 1mA$			0.15	V
		$I_C = 50mA, I_B = 5mA$			0.2	V
Base-emitter saturation voltage	$V_{BE(sat)}$	$I_C = 10mA, I_B = 1mA$			1	V
		$I_C = 50mA, I_B = 5mA$			1	V
Transition frequency	fT	$V_{CE} = 10V, I_C = 10mA$ $f = 100MHz$	100		300	MHz
Collector Current Capacitance	Cod	$V_{CB} = 10V, I_E = 0, f = 1MHz$			6	pF

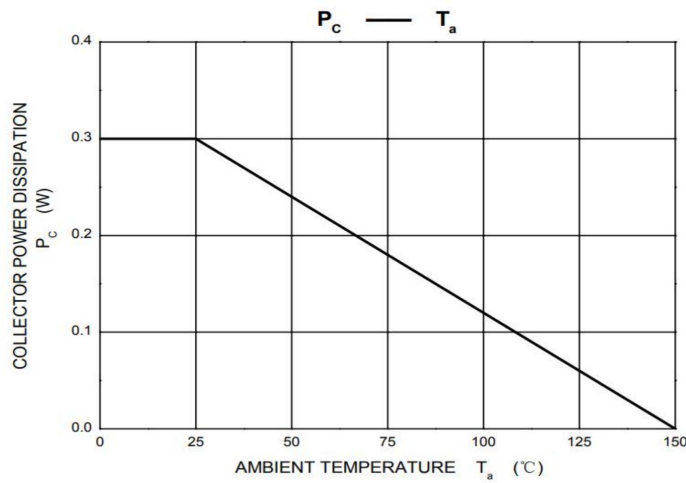
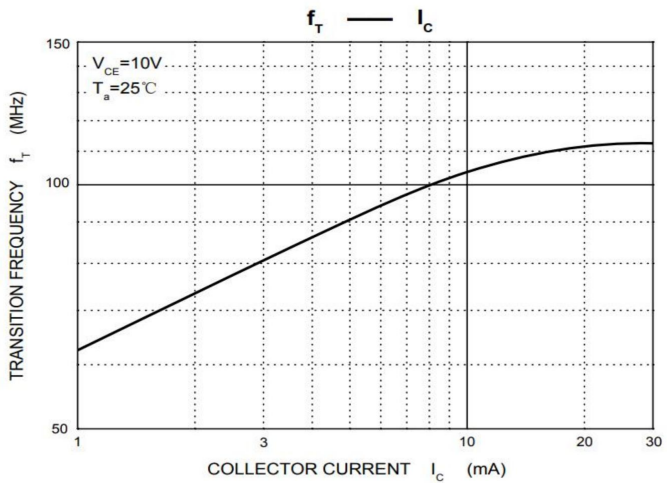
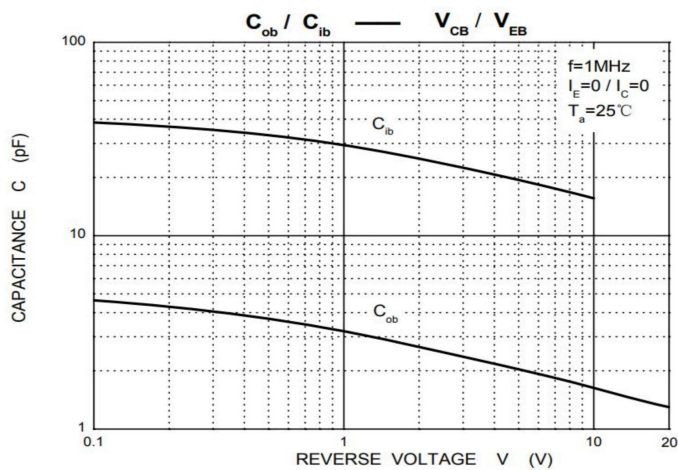
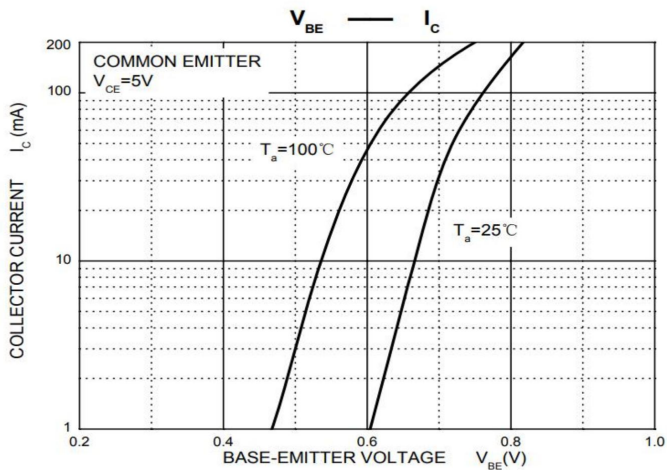
CLASSIFICATION OF hFE

Rank	L	H
Range	100-200	200-300

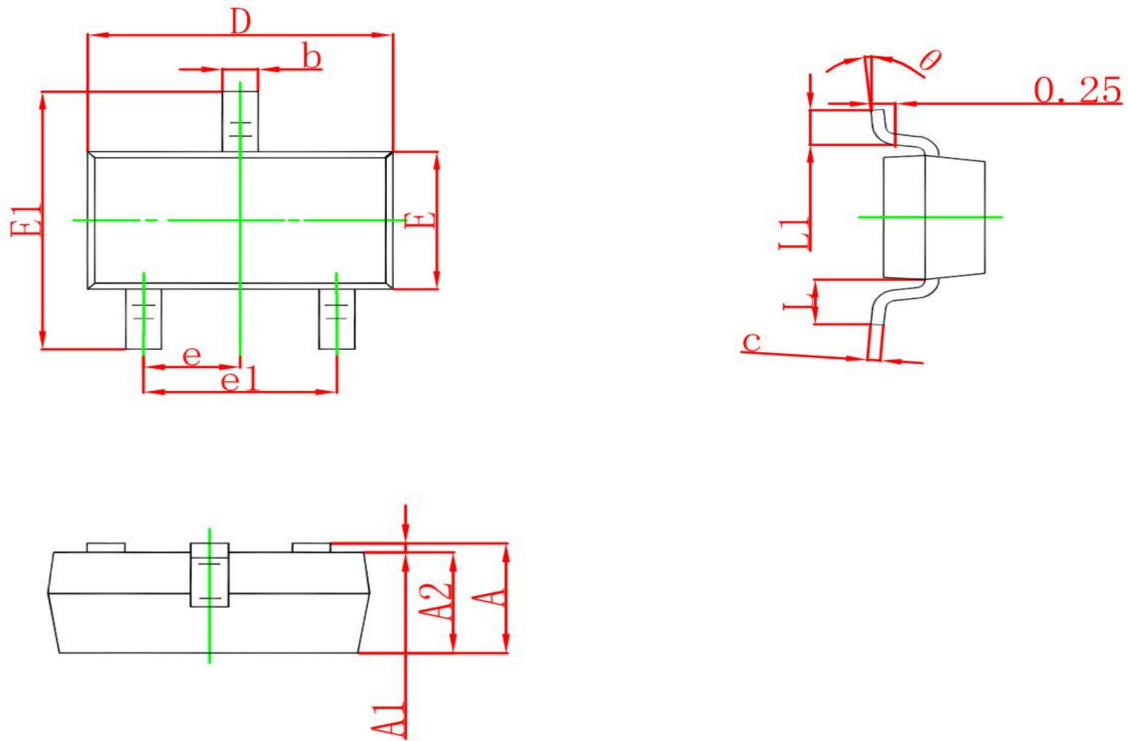
Typical Electrical and Thermal Characteristics



Typical Electrical and Thermal Characteristics



SOT-23 Package Outline Dimesions



Symbol	Dimensions In Millimeters		Dimensions In Inches	
	Min.	Max.	Min.	Max.
A	0.900	1.150	0.035	0.045
A1	0.000	0.100	0.000	0.004
A2	0.900	1.050	0.035	0.041
b	0.300	0.500	0.012	0.020
c	0.080	0.150	0.003	0.006
D	2.800	3.000	0.110	0.118
E	1.200	1.400	0.047	0.055
E1	2.250	2.550	0.089	0.100
e	0.950 TYP		0.037 TYP	
e1	1.800	2.000	0.071	0.079
L	0.550 REF		0.022 REF	
L1	0.300	0.500	0.012	0.020
θ	0°	8°	0°	8°