

Plastic-Encapsulate Transistors

DUAL TRANSISTOR (PNP+PNP)

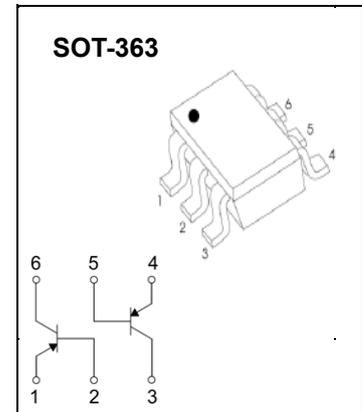
FEATURES

- Epitaxial Planar Die Construction
- Ideal for Low Power Amplification and Switching

MRKING:K2T

Maximum Ratings (Ta=25°C unless otherwise specified)

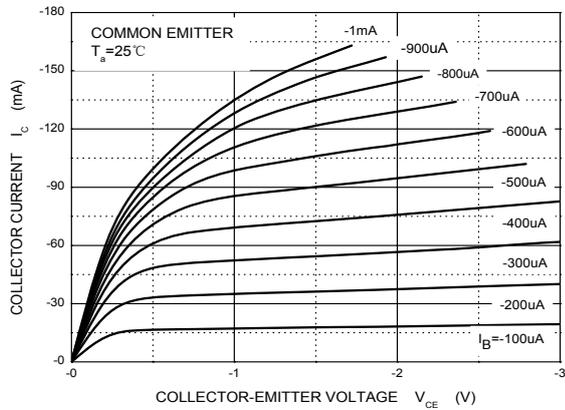
Symbol	Parameter	Value	Units
V _{CBO}	Collector-Base Voltage	-40	V
V _{CEO}	Collector-Emitter Voltage	-40	V
V _{EBO}	Emitter-Base Voltage	-5	V
I _C	Collector Current -Continuous	-0.6	A
P _C	Collector Power Dissipation	0.2	W
R _{θJA}	Thermal Resistance from Junction to Ambient	625	°C/W
T _J	Junction Temperature	150	°C
T _{stg}	Storage Temperature	-55 to +150	°C



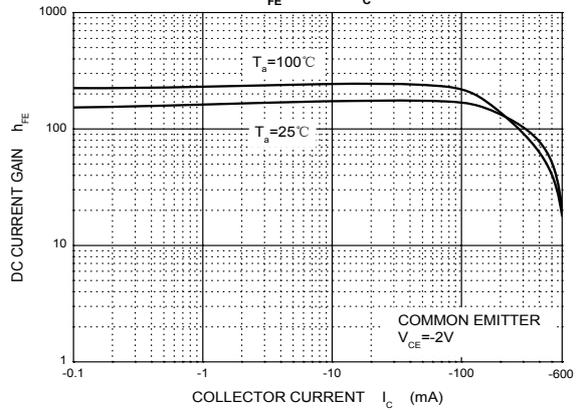
ELECTRICAL CHARACTERISTICS (Ta=25°C unless otherwise specified)

Parameter	Symbol	Test conditions	Min	Typ	Max	Unit
Collector-base breakdown voltage	V _{(BR)CBO}	I _C =-100μA, I _E =0	-40			V
Collector-emitter breakdown voltage	V _{(BR)CEO}	I _C = -1mA, I _B =0	-40			V
Emitter-base breakdown voltage	V _{(BR)EBO}	I _E =-100μA, I _C =0	-5			V
Collector cut-off current	I _{CBO}	V _{CB} =-50V, I _E =0			-0.1	μA
Collector cut-off current	I _{CEO}	V _{CE} =-35V, I _B =0			-0.5	μA
Emitter cut-off current	I _{EBO}	V _{EB} =-5V, I _C =0			-0.1	μA
DC current gain	h _{FE(1)}	V _{CE} =-1V, I _C = -0.1mA	30			
	h _{FE(2)}	V _{CE} =-1V, I _C = -1mA	60			
	h _{FE(3)}	V _{CE} =-1 V, I _C = -10mA	100			
	h _{FE(4)}	V _{CE} =-2 V, I _C = -150mA	100		300	
	h _{FE(5)}	V _{CE} =-2 V, I _C = -500mA	20			
Collector-emitter saturation voltage	V _{CE(sat)1}	I _C =-150 mA, I _B =-15mA			-0.4	V
	V _{CE(sat)2}	I _C =-500 mA, I _B =-50mA			-0.75	V
Base-emitter saturation voltage	V _{BE(sat)1}	I _C = -150 mA, I _B =-15mA	-0.75		-0.95	V
	V _{BE(sat)2}	I _C = -500 mA, I _B =-50mA			-1.3	V
Transition frequency	f _T	V _{CE} = -10V, I _C =-20mA, f = 100MHz	200			MHz
Output capacitance	C _{ob}	V _{CB} =-10V, I _E =0, f=1MHz			8.5	pF
Delay time	t _d	V _{CC} =-30V, V _{BE} =-2V, I _C =-150mA, I _{B1} =-15mA			15	nS
Rise time	t _r				20	nS
Storage time	t _s	V _{CC} =-30V, I _C =-150mA			225	nS
Fall time	t _f	B ₁ =- I _{B2} = -15mA			30	nS

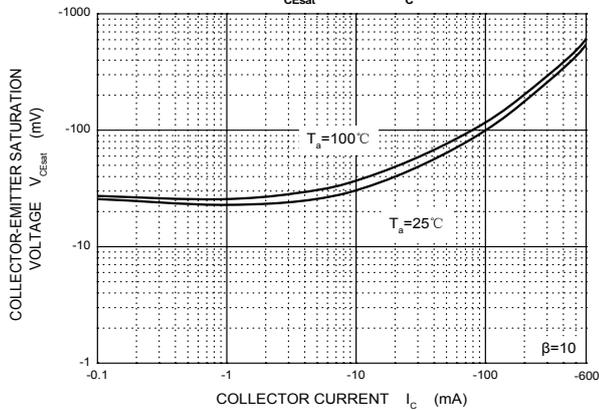
Static Characteristic



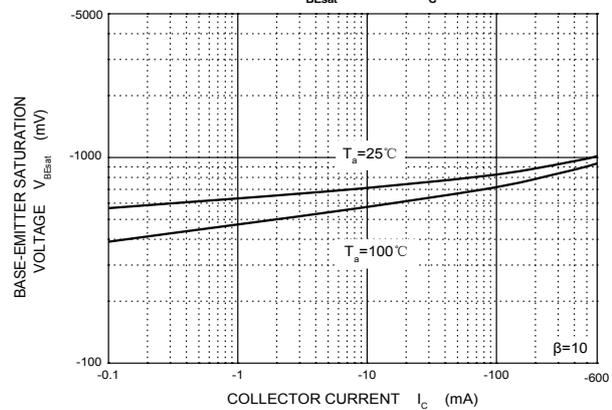
$h_{FE} - I_c$



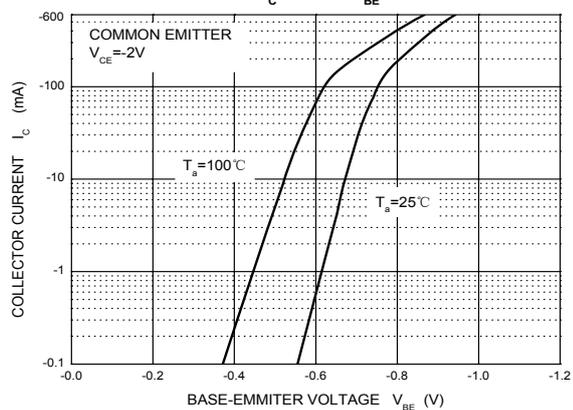
$V_{CEsat} - I_c$



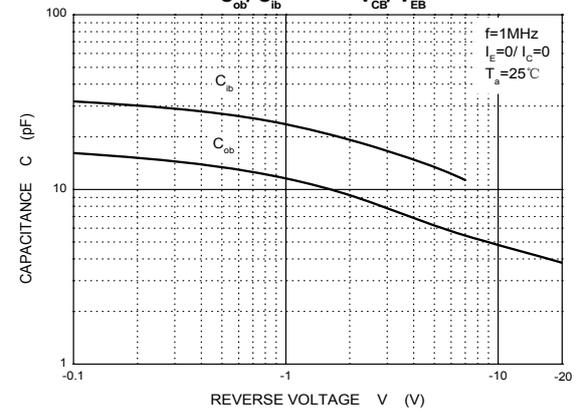
$V_{BEsat} - I_c$



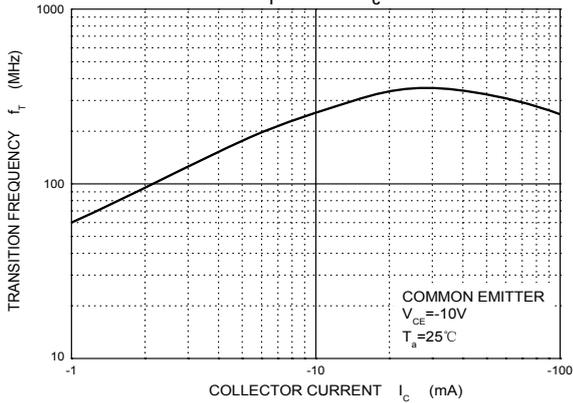
$I_c - V_{BE}$



$C_{ob}/C_{ib} - V_{CB}/V_{EB}$



$f_T - I_c$



$P_c - T_a$

