

Plastic-Encapsulate Transistors

DUAL TRANSISTOR (PNP+PNP)

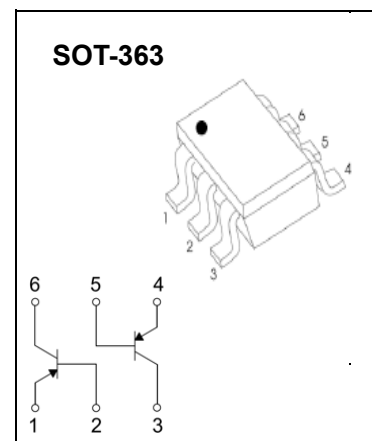
FEATURES

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

MRKING:K2T

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

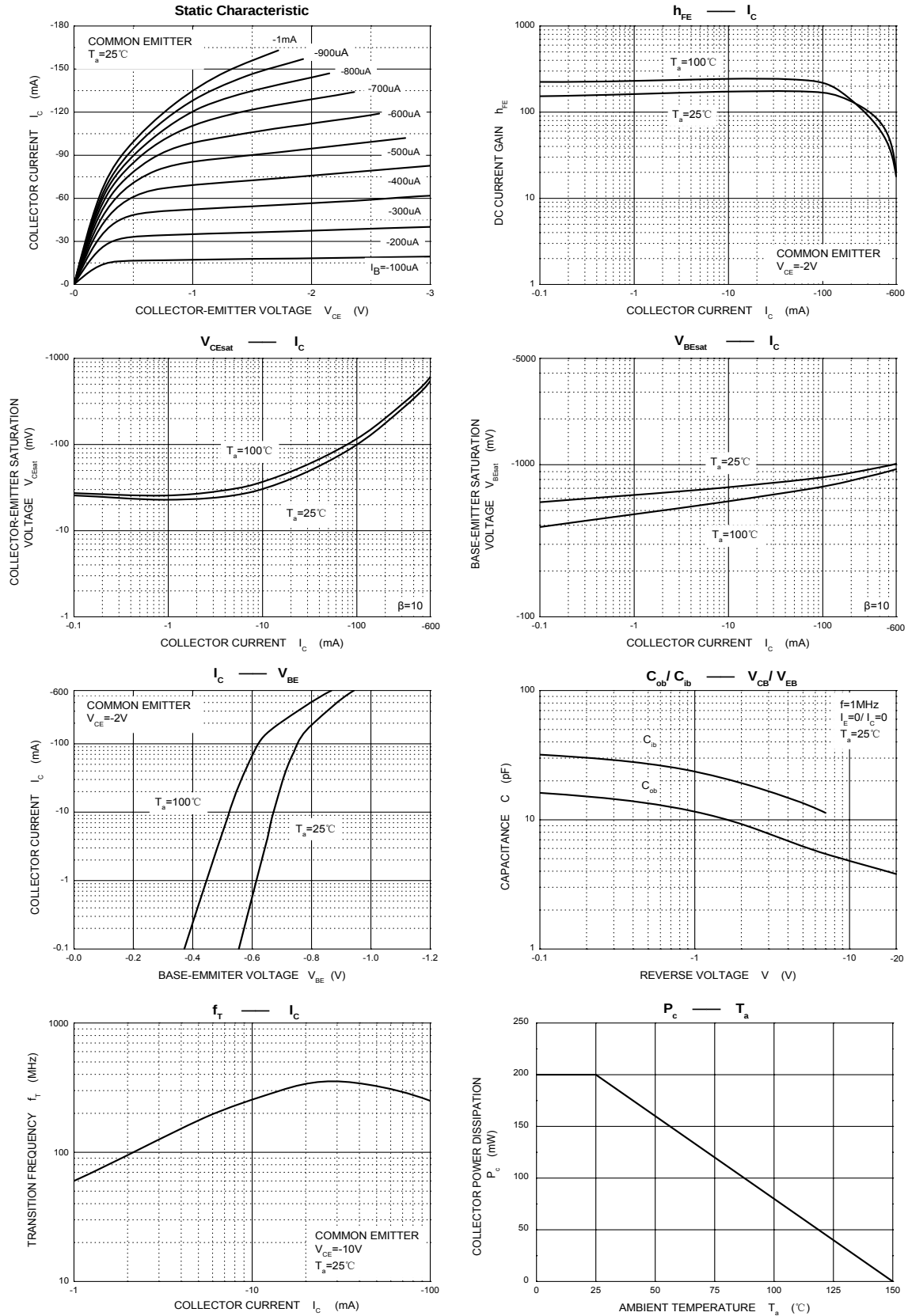
Symbol	Parameter	Value	Units
V_{CBO}	Collector-Base Voltage	-40	V
V_{CEO}	Collector-Emitter Voltage	-40	V
V_{EBO}	Emitter-Base Voltage	-5	V
I_C	Collector Current -Continuous	-0.6	A
P_C	Collector Power Dissipation	0.2	W
$R_{\theta JA}$	Thermal Resistance from Junction to Ambient	625	°C/W
T_J	Junction Temperature	150	°C
T_{stg}	Storage Temperature	-55 to +150	°C



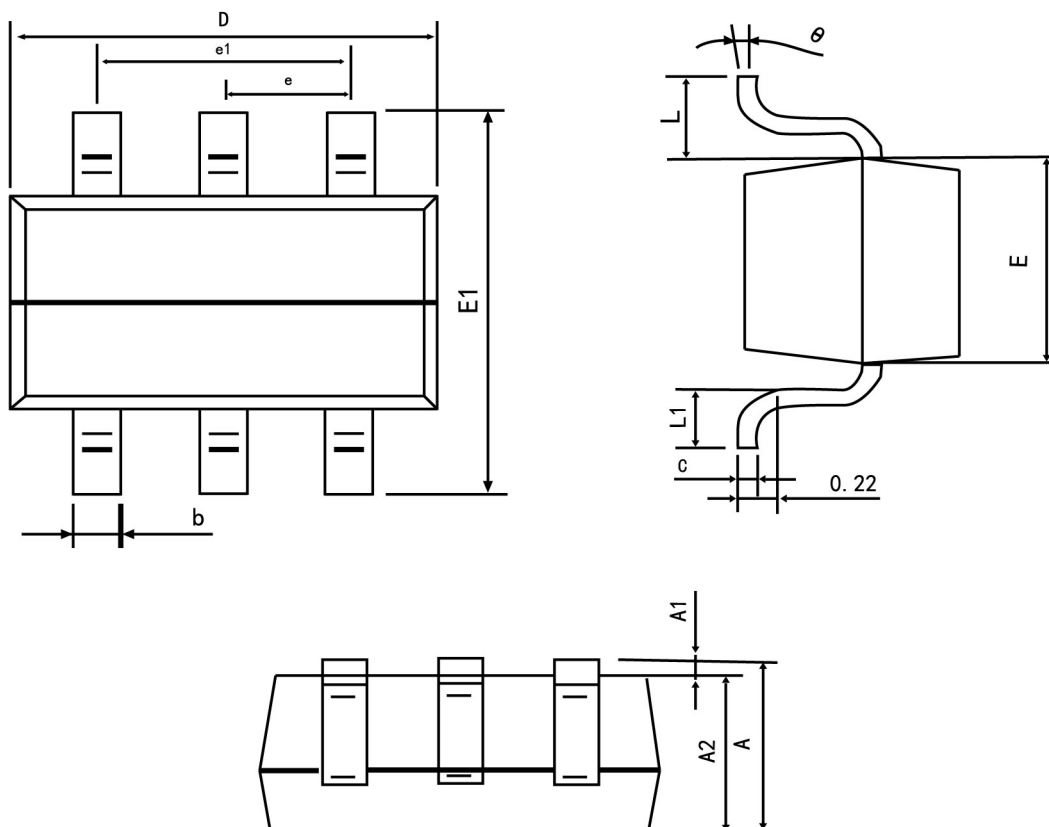
ELECTRICAL CHARACTERISTICS (Ta=25°C unless otherwise specified)

Parameter	Symbol	Test conditions	Min	Typ	Max	Unit
Collector-base breakdown voltage	$V_{(BR)CBO}$	$I_C = -100\mu A, I_E = 0$	-40			V
Collector-emitter breakdown voltage	$V_{(BR)CEO}$	$I_C = -1mA, I_B = 0$	-40			V
Emitter-base breakdown voltage	$V_{(BR)EBO}$	$I_E = -100\mu A, I_C = 0$	-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			
	$h_{FE(3)}$	$V_{CE} = -1V, I_C = -10mA$	100			
	$h_{FE(4)}$	$V_{CE} = -2V, I_C = -150mA$	100		300	
	$h_{FE(5)}$	$V_{CE} = -2V, I_C = -500mA$	20			
Collector-emitter saturation voltage	$V_{CE(sat)1}$	$I_C = -150mA, I_B = -15mA$			-0.4	V
	$V_{CE(sat)2}$	$I_C = -500mA, I_B = -50mA$			-0.75	V
Base-emitter saturation voltage	$V_{BE(sat)1}$	$I_C = -150mA, I_B = -15mA$	-0.75		-0.95	V
	$V_{BE(sat)2}$	$I_C = -500mA, I_B = -50mA$			-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	$B1 = -I_{B2} = -15mA$			30	nS

Typical Characteristics



SOT-363-Package Outline Dimensions



Symbol	Dimension in Millimeters	
	Min	Max
A	0.900	1.100
A1	0.000	0.100
A2	0.900	1.000
b	0.150	0.350
c	0.080	0.150
D	2.000	2.200
E	1.150	1.350
E1	2.150	2.450
e	0.650 TYP	
e1	1.200	1.400
L	0.525 REF	
L1	0.260	0.460
θ	0°	8°