

GENERAL PURPOSE APPLICATION.
SWITCHING APPLICATION.

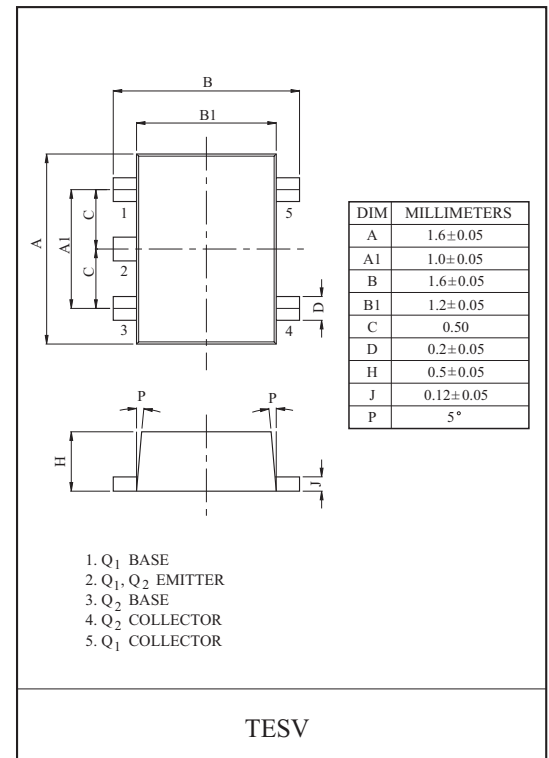
FEATURES

- A super-minimold package houses 2 transistor.
- Excellent temperature response between these 2 transistor.
- High pairing property in h_{FE} .
- The following characteristics are common for Q_1, Q_2 .

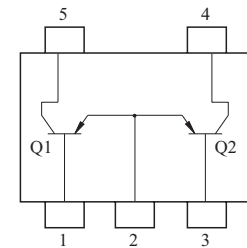
MAXIMUM RATING ($T_a=25^\circ\text{C}$)

CHARACTERISTIC	SYMBOL	RATING	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	-150	mA
Base Current	I_B	-30	mA
Collector Power Dissipation	P_C^*	200	mW
Junction Temperature	T_j	150	$^\circ\text{C}$
Storage Temperature Range	T_{stg}	-55 ~ 150	$^\circ\text{C}$

* Total Rating



EQUIVALENT CIRCUIT (TOP VIEW)

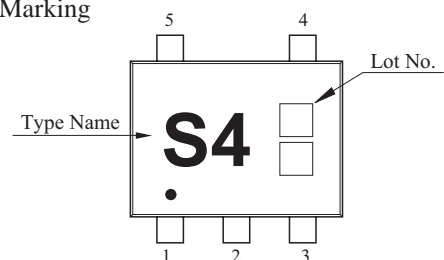


ELECTRICAL CHARACTERISTICS ($T_a=25^\circ\text{C}$)

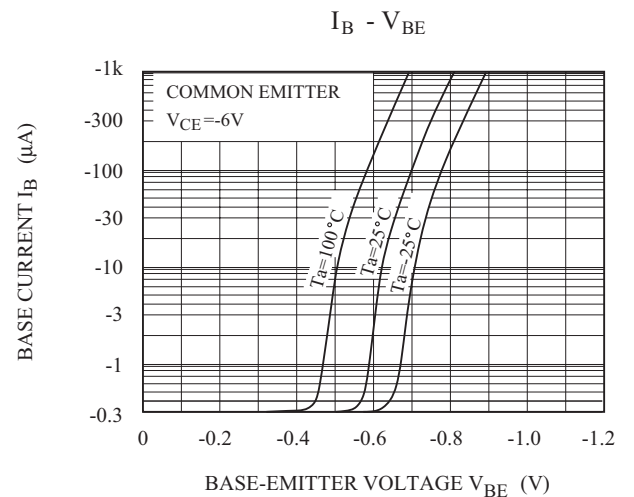
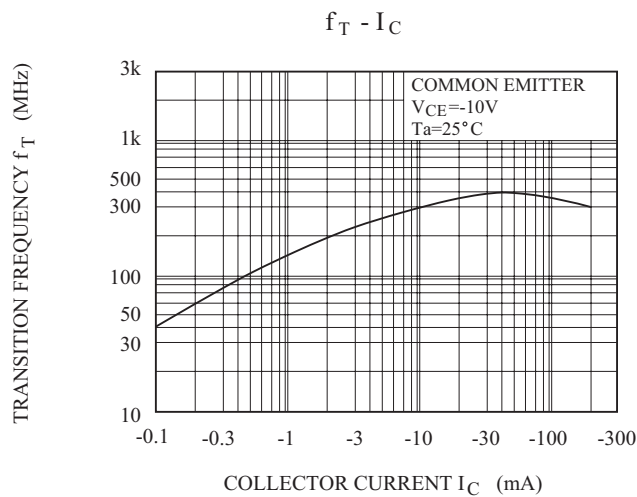
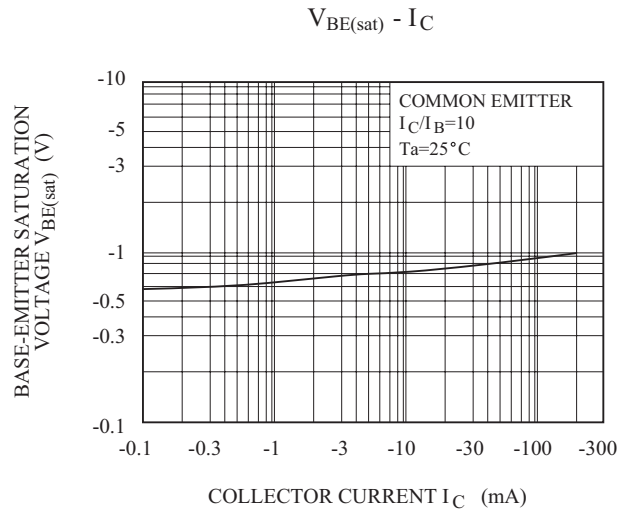
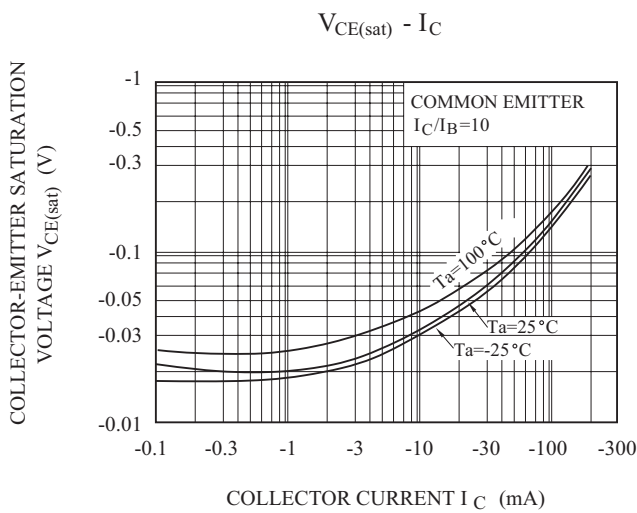
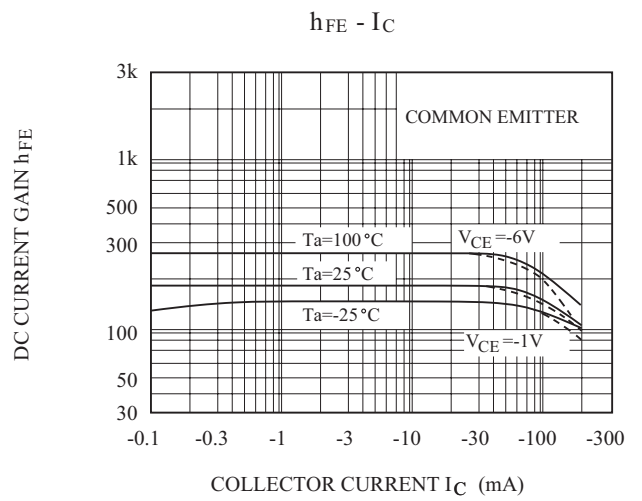
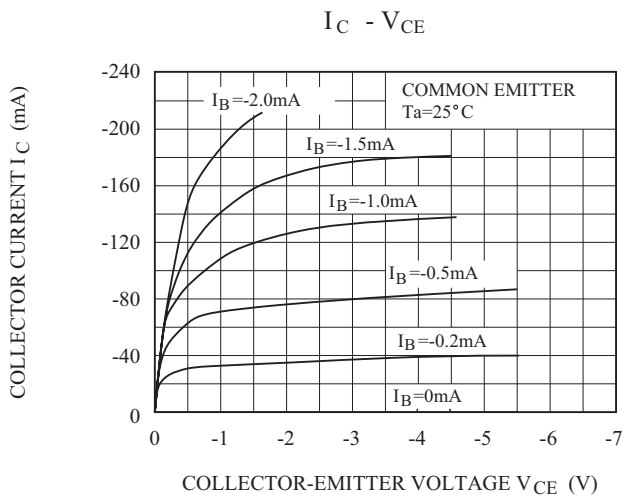
CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT.
Collector Cut-off Current	I_{CBO}	$V_{CB}=-50\text{V}, I_E=0$	-	-	-0.1	μA
Emitter Cut-off Current	I_{EBO}	$V_{EB}=-5\text{V}, I_C=0$	-	-	-0.1	μA
DC Current Gain	h_{FE} (Note)	$V_{CE}=-6\text{V}, I_C=-2\text{mA}$	120	-	400	
Collector-Emitter Saturation Voltage	$V_{CE(sat)}$	$I_C=-100\text{mA}, I_B=-10\text{mA}$	-	-0.1	-0.30	V
Transition Frequency	f_T	$V_{CE}=-10\text{V}, I_C=-1\text{mA}$	80	-	-	MHz
Collector Output Capacitance	C_{ob}	$V_{CB}=-10\text{V}, I_E=0, f=1\text{MHz}$	-	4	7	pF
Noise Figure	NF	$V_{CE}=-6\text{V}, I_C=-0.1\text{mA}, f=1\text{kHz}, R_g=10\text{k}\Omega$	-	1.0	10	dB

Note : h_{FE} Classification Y(4):120 ~ 240, GR(6):200 ~ 400

Marking



KTA501E



KTA501E

