

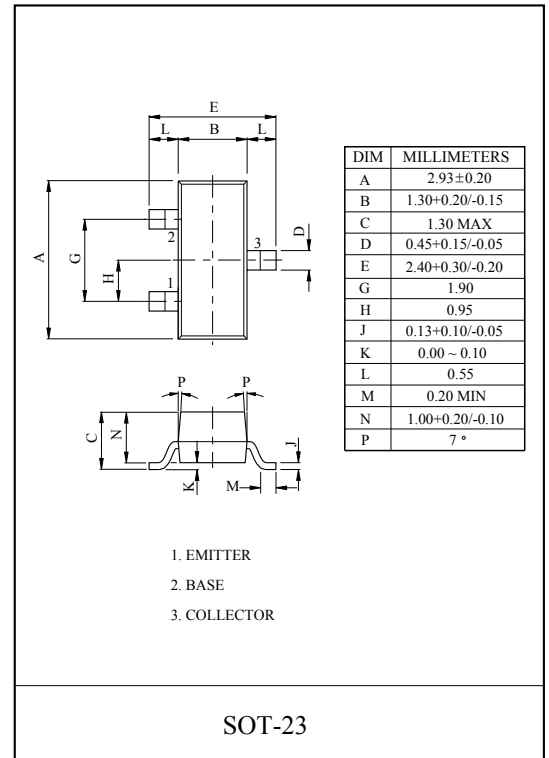
LOW FREQUENCY POWER AMPLIFIER APPLICATION.
POWER SWITCHING APPLICATION.

FEATURES

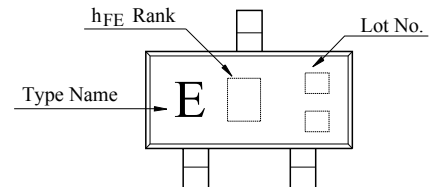
- High DC Current Gain : $h_{FE}=100 \sim 320$.
- Low Saturation Voltage
: $V_{CE(sat)}=0.4V(\text{Max.})$ ($I_C=500\text{mA}$, $I_B=20\text{mA}$).
- Suitable for Driver Stage of Small Motor.
- Complementary to KTA1298.
- Small Package.

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

CHARACTERISTIC	SYMBOL	RATING	UNIT
Collector-Base Voltage	V_{CBO}	35	V
Collector-Emitter Voltage	V_{CEO}	30	V
Emitter-Base Voltage	V_{EBO}	5	V
Collector Current	I_C	800	mA
Base Current	I_B	160	mA
Collector Power Dissipation	P_C	200	mW
Junction Temperature	T_j	150	$^\circ\text{C}$
Storage Temperature Range	T_{stg}	-55 ~ 150	$^\circ\text{C}$



Marking

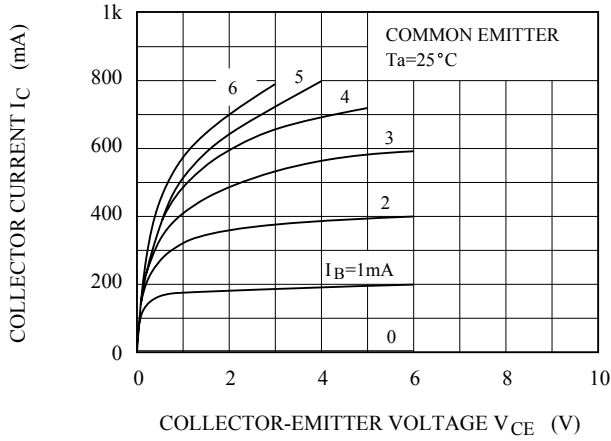


ELECTRICAL CHARACTERISTICS ($T_a=25^\circ\text{C}$)

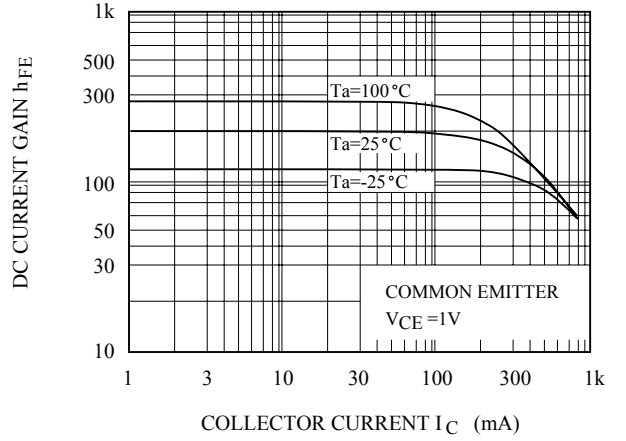
CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Collector Cut-off Current	I_{CBO}	$V_{CB}=30\text{V}$, $I_E=0$	-	-	100	nA
Emitter Cut-off Current	I_{EBO}	$V_{EB}=5\text{V}$, $I_C=0$	-	-	100	nA
Collector-Emitter Breakdown Voltage	$V_{(BR)CEO}$	$V_{EB}=10\text{mA}$, $I_B=0$	30	-	-	V
Emitter-Base Breakdown Voltage	$V_{(BR)EBO}$	$I_E=1\text{mA}$, $I_C=0$	5	-	-	V
DC Current Gain	$h_{FE(1)}$ (Note)	$V_{CE}=1\text{V}$, $I_C=100\text{mA}$	100	-	320	
	$h_{FE(2)}$	$V_{CE}=1\text{V}$, $I_C=800\text{mA}$	40	-	-	
Collector-Emitter Saturation Voltage	$V_{CE(sat)}$	$I_C=500\text{mA}$, $I_B=20\text{mA}$	-	-	0.5	V
Base-Emitter Voltage	V_{BE}	$V_{CE}=1\text{V}$, $I_C=10\text{mA}$	0.5	-	0.8	V
Transition Frequency	f_T	$V_{CE}=5\text{V}$, $I_C=10\text{mA}$, $f=100\text{MHz}$	-	120	-	MHz
Collector Output Capacitance	C_{ob}	$V_{CB}=10\text{V}$, $I_E=0$, $f=1\text{MHz}$	-	13	-	pF

Note : $h_{FE(1)}$ Classification O:100 ~ 200, Y:160 ~ 320

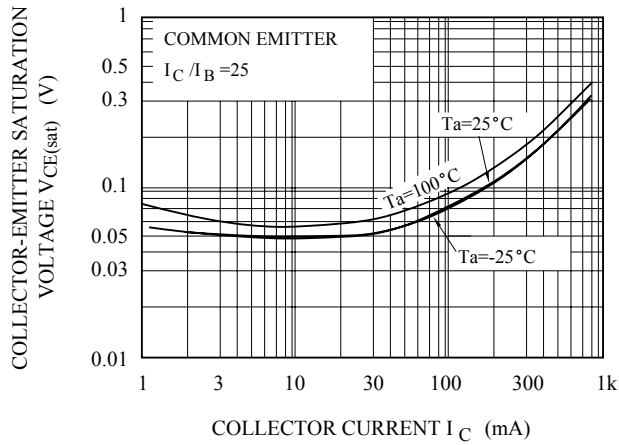
$I_C - V_{CE}$



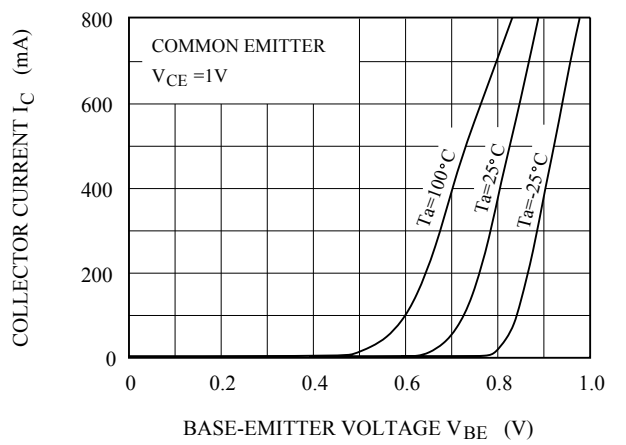
$h_{FE} - I_C$



$V_{CE(sat)} - I_C$



$I_C - V_{BE}$



$P_C - T_a$

