

HIGH CURRENT APPLICATION.

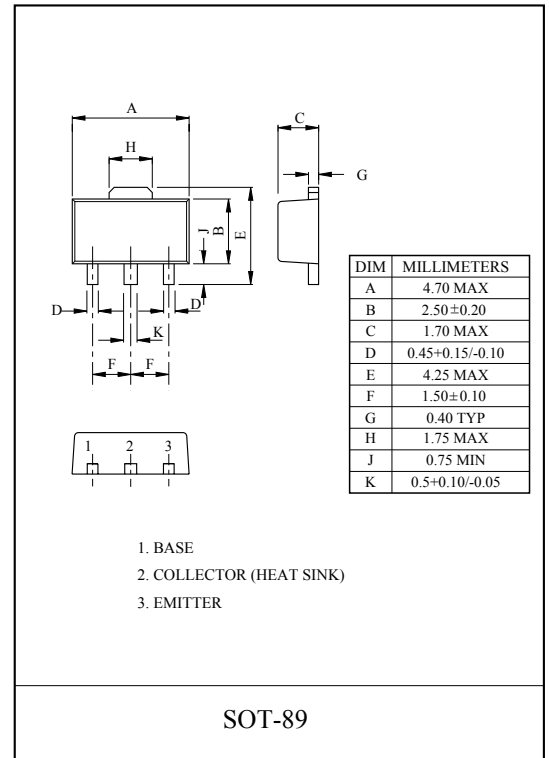
FEATURES

- High Voltage : $V_{CEO} = -120V$.
- High Transition Frequency : $f_T = 120MHz(Typ.)$.
- 1W(Mounted on Ceramic Substrate).
- Small Flat Package.
- Complementary to KTC4373.

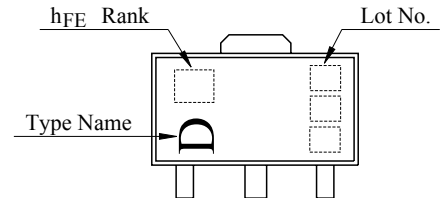
MAXIMUM RATING (Ta=25°C)

CHARACTERISTIC	SYMBOL	RATING	UNIT
Collector-Base Voltage	V_{CBO}	-120	V
Collector-Emitter Voltage	V_{CEO}	-120	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	500	mW
	P_C^*	1	W
Junction Temperature	T_j	150	°C
Storage Temperature Range	T_{stg}	-55 ~ 150	°C

P_C^* : KTA1661 mounted on ceramic substrate (250mm²x0.8t)



Marking



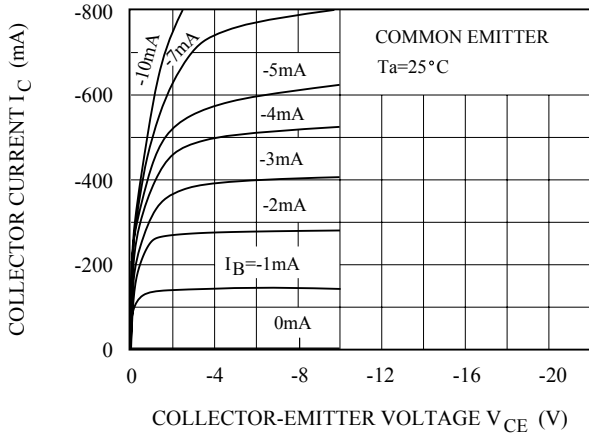
ELECTRICAL CHARACTERISTICS (Ta=25°C)

CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Collector Cut-off Current	I_{CBO}	$V_{CB} = -120V, I_E = 0$	-	-	-100	nA
Emitter Cut-off Current	I_{EBO}	$V_{EB} = 5V, I_C = 0$	-	-	-100	nA
Collector-Emitter Breakdown Voltage	$V_{(BR)CEO}$	$I_C = -10mA, I_B = 0$	-120	-	-	V
Emitter-Base Breakdown Voltage	$V_{(BR)EBO}$	$I_E = -1mA, I_C = 0$	-5.0	-	-	V
DC Current Gain	h_{FE} (Note)	$V_{CE} = -5V, I_C = -100mA$	80	-	240	
Collector-Emitter Saturation Voltage	$V_{CE(sat)}$	$I_C = -500mA, I_B = -50mA$	-	-	-1.0	V
Base-Emitter Voltage	V_{BE}	$V_{CE} = -5V, I_C = -500mA$	-	-	-1.0	V
Transition Frequency	f_T	$V_{CE} = -5V, I_C = -100mA$	-	120	-	MHz
Collector Output Capacitance	C_{ob}	$V_{CB} = -10V, I_E = 0, f = 1MHz$	-	-	30	pF

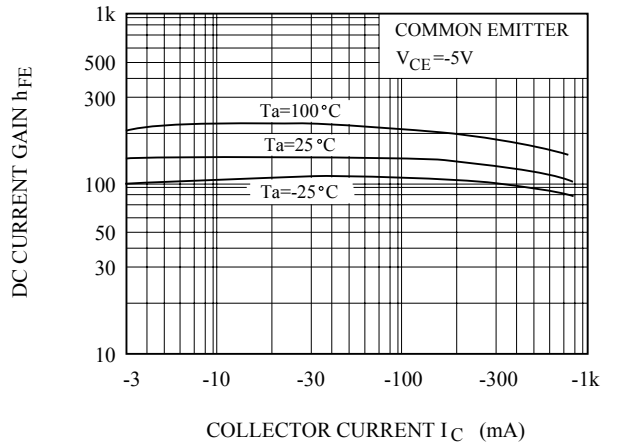
Note : h_{FE} Classification O:80 ~ 160, Y:120 ~ 240

KTA1661

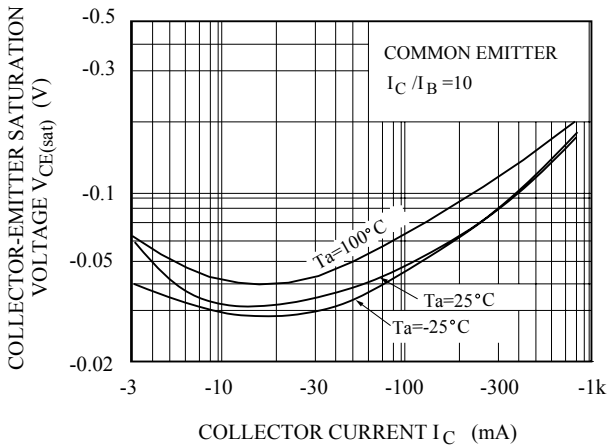
$I_C - V_{CE}$



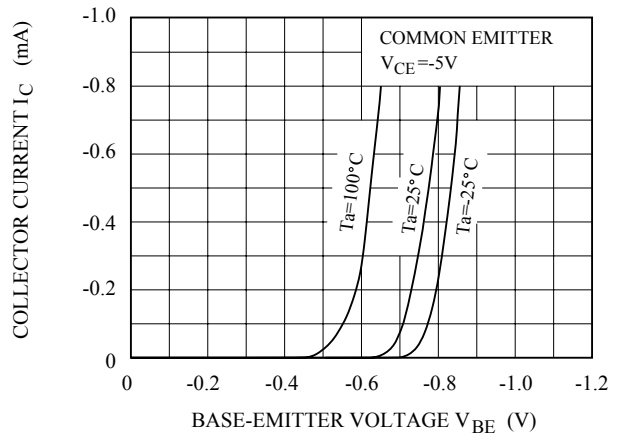
$h_{FE} - I_C$



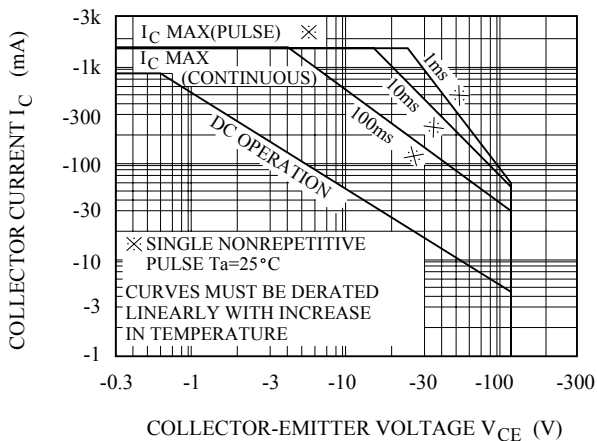
$V_{CE(sat)} - I_C$



$I_C - V_{BE}$



SAFE OPERATING AREA



$P_c - T_a$

