

AUDIO FREQUENCY POWER AMPLIFIER
LOW SPEED SWITCHING

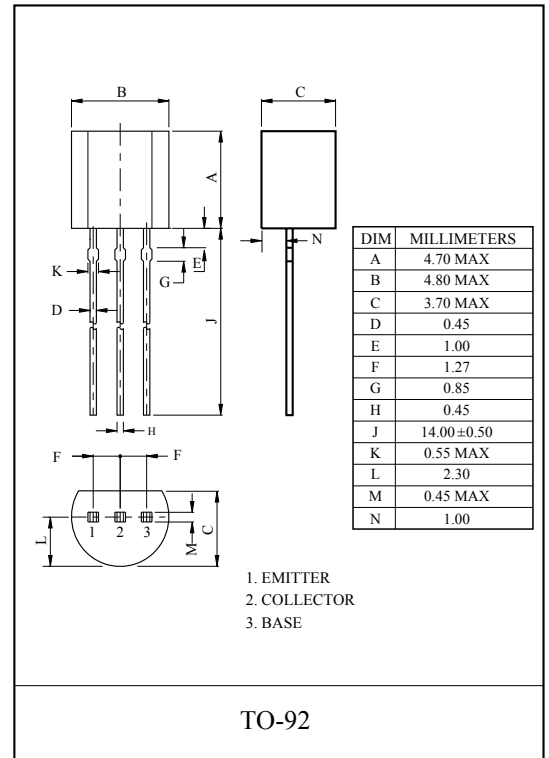
FEATURES

- Complementary to KTB1772.

MAXIMUM RATING (Ta=25°C)

CHARACTERISTIC		SYMBOL	RATING	UNIT
Collector-Base Voltage		V_{CBO}	40	V
Collector-Emitter Voltage		V_{CEO}	30	V
Emitter-Base Voltage		V_{EBO}	5	V
Collector Current	DC	I_C	3	A
	Pulse (Note)	I_{CP}	7	
Base Current (DC)		I_B	0.6	A
Collector Power Dissipation		P_C	625	mW
Junction Temperature		T_j	150	°C
Storage Temperature Range		T_{stg}	-55 ~ 150	°C

Note : Pulse Width \leq 10mS, Duty Cycle \leq 50%.



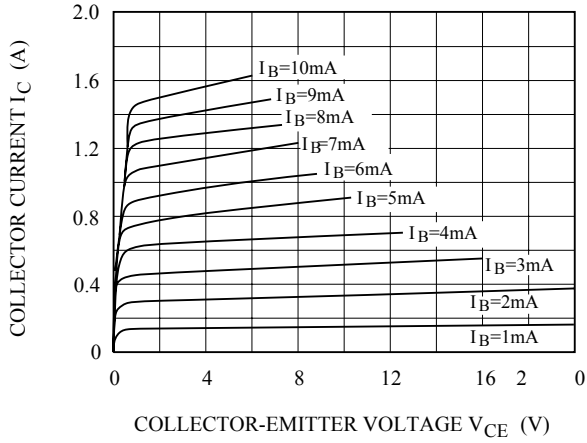
ELECTRICAL CHARACTERISTICS (Ta=25°C)

CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Collector Cut-off Current	I_{CBO}	$V_{CB}=30V, I_E=0$	-	-	1	μA
Emitter-Cut-off Current	I_{EBO}	$V_{EB}=3V, I_C=0$	-	-	1	μA
DC Current Gain *	$h_{FE}(1)$	$V_{CE}=2V, I_C=20mA$	30	150	-	
	$h_{FE}(2)$ (Note)	$V_{CE}=2V, I_C=1A$	100	160	400	
Collector-Emitter Saturation Voltage *	$V_{CE(sat)}$	$I_C=2A, I_B=0.2A$	-	0.3	0.5	V
Base-Emitter Saturation Voltage *	$V_{BE(sat)}$	$I_C=2V, I_B=0.2A$	-	1.0	2.0	V
Current Gain Bandwidth Product	f_T	$V_{CE}=5V, I_C=0.1A$	-	90	-	MHz
Collector Output Capacitance	C_{ob}	$V_{CB}=10V, I_E=0, f=1MHz$	-	45	-	pF

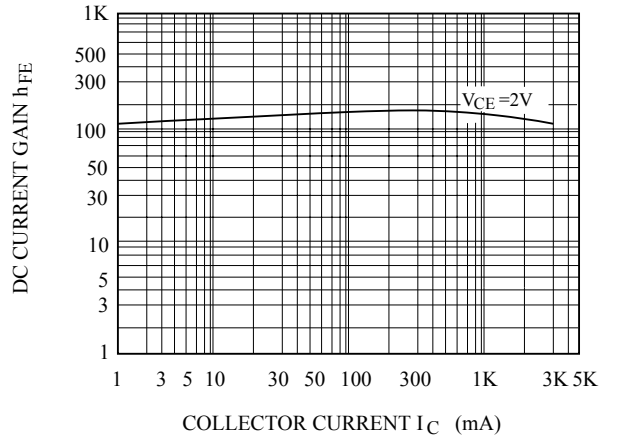
* Pulse Test : Pulse Width \leq 350 μ S, Duty Cycle \leq 2% Pulsed

Note: $h_{FE}(2)$ Classification O:100~200, Y:160~320, GR:200~400

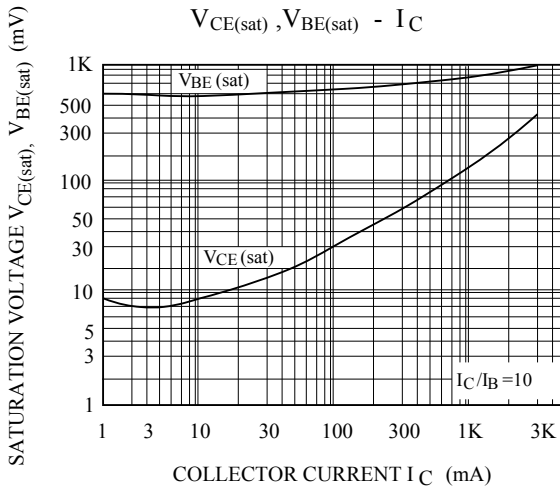
$I_C - V_{CE}$



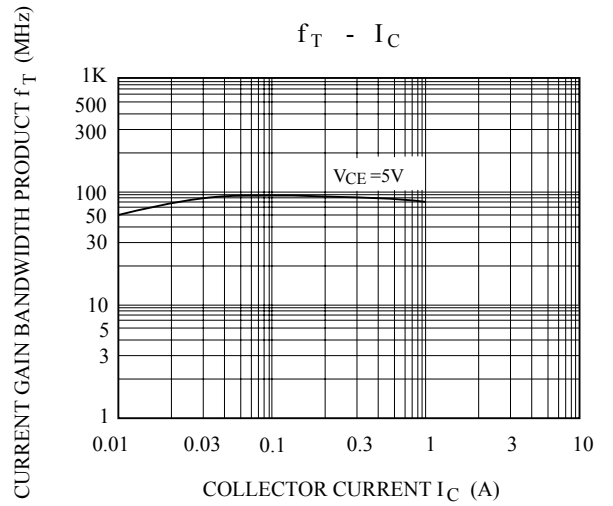
$h_{FE} - I_C$



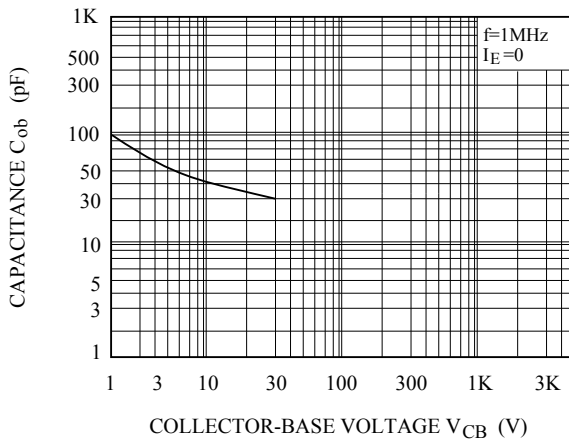
$V_{CE(sat)}, V_{BE(sat)} - I_C$



$f_T - I_C$



$C_{ob} - V_{CB}$



$P_C - T_a$

