

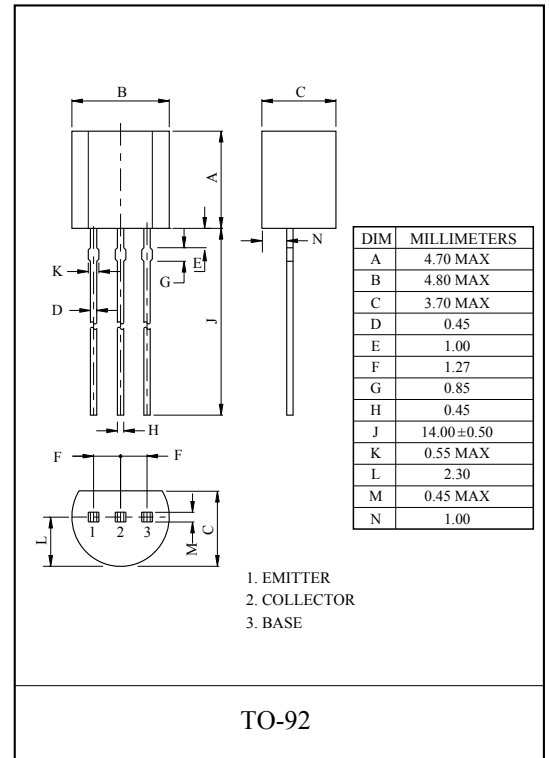
HIGH CURRENT TRANSISTORS.

### FEATURES

- Complementary to BC638.

### MAXIMUM RATING (Ta=25°C)

CHARACTERISTIC	SYMBOL	RATING	UNIT
Collector-Base Voltage	$V_{CBO}$	60	V
Collector-Emitter Voltage	$V_{CEO}$	60	V
Emitter-Base Voltage	$V_{EBO}$	5	V
Collector Current	$I_C$	500	mA
Collector Power Dissipation	$P_C$	625	mW
Junction Temperature	$T_j$	150	°C
Storage Temperature	$T_{stg}$	-55 ~ 150	°C



### ELECTRICAL CHARACTERISTICS (Ta=25°C)

CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Collector Cut-off Current	$I_{CBO}$	$V_{CB}=30V, I_E=0$	-	-	100	nA
Collector-Emitter Breakdown Voltage *	$V_{(BR)CEO}$	$I_C=10mA, I_B=0$	60	-	-	V
Collector-Base Breakdown Voltage	$V_{(BR)CBO}$	$I_C=100\mu A, I_E=0$	60	-	-	V
Emitter-Base Breakdown Voltage	$V_{(BR)EBO}$	$I_E=10\mu A, I_C=0$	5.0	-	-	V
DC Current Gain	$h_{FE}$	$V_{CE}=2V, I_C=150mA$	40	-	160	
Collector-Emitter Saturation Voltage	$V_{CE(sat)}$	$I_C=500mA, I_B=50mA$	-	-	0.5	V
Base-Emitter Voltage	$V_{BE}$	$V_{CE}=2V, I_C=500mA$	-	-	1.0	V
Transition Frequency	$f_T$	$V_{CE}=2V, I_C=50mA, f=100MHz$	-	200	-	MHz
Input Capacitance	$C_{ib}$	$V_{EB}=0.5V, I_C=0, f=1MHz$	-	50	-	pF
Collector Output Capacitance	$C_{ob}$	$V_{CB}=10V, I_E=0, f=1MHz$	-	7.0	-	pF

\* Pulse Test : Pulse Width ≤ 300μS, Duty Cycle 2.0%