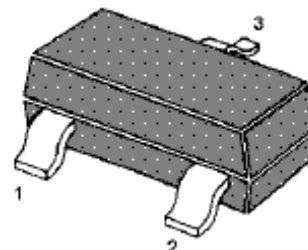


**Kingtronics**®**MMBT9018**NPN Silicon Epitaxial Planar  
Transistors

For AM/FM amplifier and local oscillator of  
FM/VHF tuner applications



1.Base 2.Emitter 3.Collector  
SOT-23 Plastic Package

**Absolute Maximum Ratings (Ta = 25°C)**

PARAMETER	SYMBOL	VALUE	UNIT
Collector Base Voltage	$V_{CB0}$	30	V
Collector Emitter Voltage	$V_{CEO}$	15	V
Emitter Base Voltage	$V_{EBO}$	5	V
Collector Current	$I_c$	50	mA
Power Dissipation	$P_{tot}$	200	mW
Junction Temperature	$T_j$	150	°C
Storage Temperature Range	$T_{stg}$	- 55 to + 150	°C

**Characteristics at Ta = 25°C**

PARAMETER	SYMBOL	MIN.	TYP.	MAX.	UNIT
DC Current Gain at $V_{CE} = 5\text{ V}$ , $I_c = 1\text{ mA}$	Current Gain Group G H	72 97	-	108 190	-
Collector Base Cutoff Current at $V_{CB} = 12\text{ V}$	$I_{CBO}$	-	-	50	nA
Collector Base Breakdown Voltage at $I_c = 100\text{ }\mu\text{A}$	$V_{(BR)CB0}$	30	-	-	V
Collector Emitter Breakdown Voltage at $I_c = 1\text{ mA}$	$V_{(BR)CEO}$	15	-	-	V
Emitter Base Breakdown Voltage at $I_E = 100\text{ }\mu\text{A}$	$V_{(BR)EBO}$	5	-	-	V
Collector Emitter Saturation Voltage at $I_c = 10\text{ mA}$ , $I_B = 1\text{ mA}$	$V_{CE(sat)}$	-	-	0.5	V
Collector Base Capacitance at $V_{CB} = 10\text{ V}$ , $f = 1\text{ MHz}$	$C_{ob}$	-	1.3	1.7	pF
Gain Bandwidth Product at $V_{CE} = 5\text{ V}$ , $I_c = 5\text{ mA}$	$f_T$	700	1100	-	MHz

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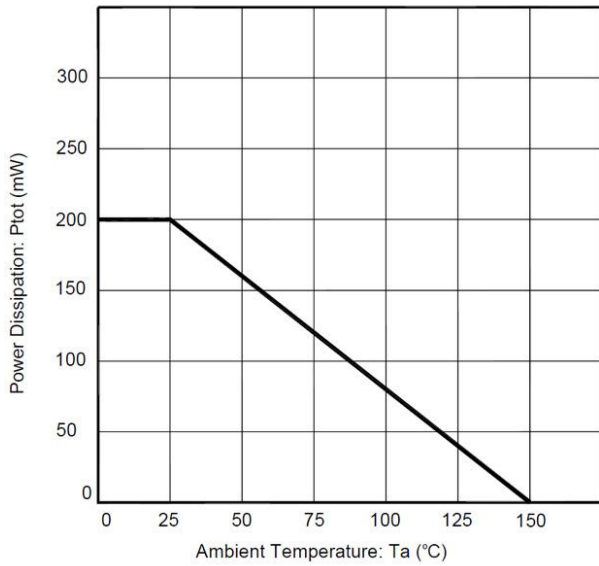
# Kingtronics®

# MMBT9018

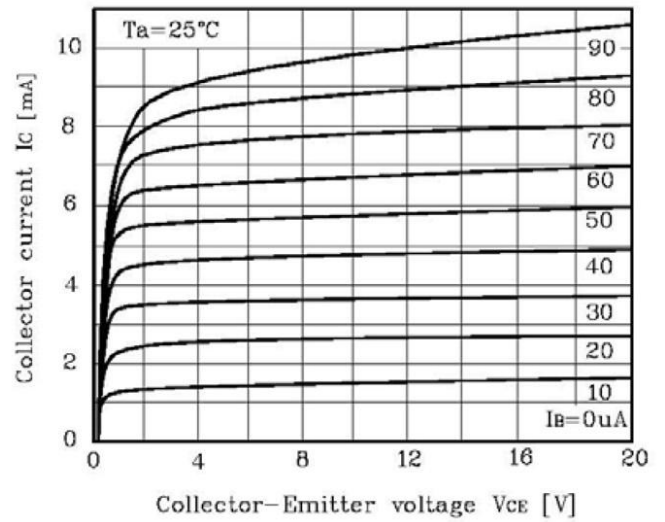
NPN Silicon Epitaxial Planar Transistors

## RATINGS AND CHARACTERISTIC CURVES MMBT9018

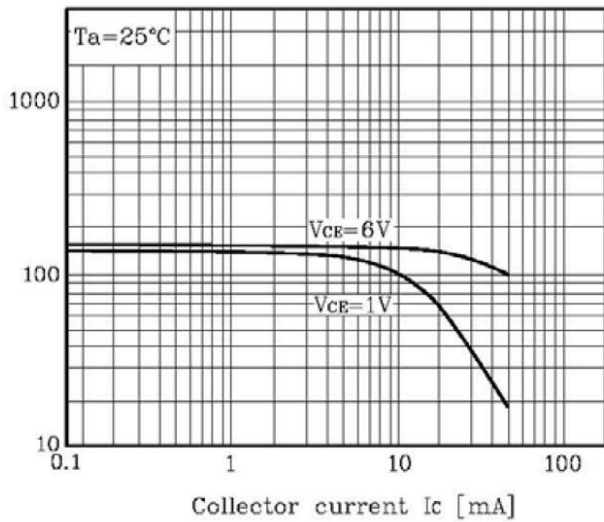
Pc-Ta



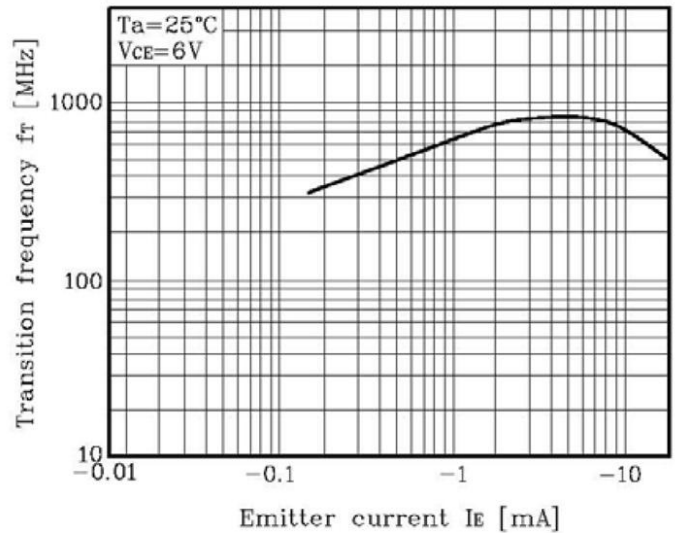
Ic - Vce



hFE - Ic



fT - IE



Note: Specifications are subject to change without notice.

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