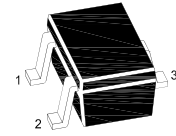


MMBTA14W

NPN Silicon Epitaxial Planar Transistors

for general purpose applications, darlington transistor.



1.Base 2.Emitter 3.Collector
SOT-323 Plastic Package

Absolute Maximum Ratings ($T_a = 25^\circ\text{C}$)

Parameter	Symbol	Value	Unit
Collector Emitter Voltage	V_{CES}	30	V
Collector Base Voltage	V_{CBO}	30	V
Emitter Base Voltage	V_{EBO}	10	V
Collector Current	I_C	500	mA
Power Dissipation	P_{tot}	200	mW
Junction Temperature	T_j	150	$^\circ\text{C}$
Storage Temperature Range	T_{Stg}	-55 to +150	$^\circ\text{C}$

Characteristics at $T_{amb} = 25^\circ\text{C}$

Parameter	Symbol	Min.	Max.	Unit
DC Current Gain at $V_{CE} = 5\text{ V}$, $I_C = 10\text{ mA}$ at $V_{CE} = 5\text{ V}$, $I_C = 100\text{ mA}$	h_{FE} h_{FE}	10000 20000	- -	- -
Collector Emitter Breakdown Voltage at $I_C = 100\text{ }\mu\text{A}$	$V_{(BR)CES}$	30	-	V
Collector Cutoff Current at $V_{CB} = 30\text{ V}$	I_{CBO}	-	100	nA
Emitter Cutoff Current at $V_{EB} = 10\text{ V}$	I_{EBO}	-	100	nA
Collector Emitter Saturation Voltage at $I_C = 100\text{ mA}$, $I_B = 0.1\text{ mA}$	$V_{CE(sat)}$	-	1.5	V
Base Emitter On Voltage at $I_C = 100\text{ mA}$, $V_{CE} = 5\text{ V}$	$V_{BE(on)}$	-	2	V
Current Gain Bandwidth Product at $V_{CE} = 5\text{ V}$, $I_C = 10\text{ mA}$, $f = 100\text{ MHz}$	f_T	125	-	MHz

