

SOT-23 BIPOLAR TRANSISTORS
TRANSISTOR(NPN)
FEATURES

- * Power dissipation
PCM : 0.25 W (Tamb=25°C)
- * Collector current
ICM : 0.1 A
- * Collector-base voltage
V(BR)CBO : 32 V
- * Operating and storage junction temperature range
TJ,Tstg: -55°C to +150°C

MECHANICAL DATA

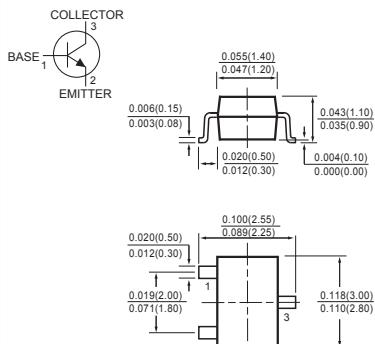
- * Case: Molded plastic
- * Epoxy: UL 94V-O rate flame retardant
- * Lead: MIL-STD-202E method 208C guaranteed
- * Mounting position: Any
- * Weight: 0.008 gram

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25°C ambient temperature unless otherwise specified.

Single phase, half wave, 60Hz, resistive or inductive load.

For capacitive load, derate current by 20%.



Dimensions in inches and (millimeters)

ELECTRICAL CHARACTERISTICS (@ TA = 25°C unless otherwise noted)

CHARACTERISTICS	SYMBOL	MIN	TYP	MAX	UNITS
Collector-base breakdown voltage (IC= 10µA, IE=0)	V(BR)CBO	32	-	-	V
Collector-emitter breakdown voltage (IC= 1mA, IB=0)	V(BR)CEO	32	-	-	V
Emitter-base breakdown voltage (IE= 10µA, IC=0)	V(BR)EBO	5	-	-	V
Collector cut-off current (VCE= 32V, IE=0)	ICBO	-	-	0.02	µA
Collector cut-off current (VEB= 4V, IC=0)	IEBO	-	-	0.02	µA
DC current gain (VCE= 5V, IC= 10µA)	hFE	40	-	-	-
DC current gain (VCE= 5V, IC= 2mA)		250	-	460	-
DC current gain (VCE= 5V, IC= 50mA)		100	-	-	-
Collector-emitter saturation voltage (IC= 10mA, IB= 0.25mA)	VCE(sat)	-	-	0.35	V
Collector-emitter saturation voltage (IC= 50mA, IB= 1.25mA)		-	-	0.55	V
Base-emitter saturation voltage (IC= 10mA, IB= 0.25mA)	VBE(sat)	-	-	0.85	V
Base-emitter saturation voltage (IC= 50mA, IB= 1.25mA)		-	-	1.05	V
Base-emitter voltage (VCE= 5V, IC= 2µA)	VBE	0.55	-	0.75	V
Transition frequency (VCE= 5V, IC= 10mA, f=100MHz)	f _T	100	-	-	MHz
Output capacitance (V _{CB} = 10V, IE= 0, f=1MHz)	C _{ob}	-	-	5	pF

Marking

AC

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