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MAXIMUM RATINGS

Rating	Symbol	Value	Unit
Collector-Emitter Voltage	V _{CEO}	45	Vdc
Collector-Base Voltage	V _{CBO}	60	Vdc
Emitter-Base Voltage	V _{EBO}	4.0	Vdc
Total Device Dissipation @ T _A = 25°C Derate above 25°C	P _D	350 2.81	mW mW/C
Total Device Dissipation @ T _A = 60°C	P _D	210	mW
Operating and Storage Junction Temperature Range	T _J , T _{Stg}	-55 to +135	°C

THERMAL CHARACTERISTICS

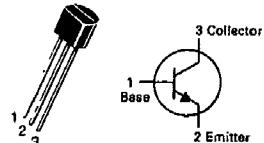
Characteristic	Symbol	Max	Unit
Thermal Resistance, Junction to Ambient	R _{JA}	357	°C/W

ELECTRICAL CHARACTERISTICS (T_A = 25°C unless otherwise noted.)

Characteristic	Symbol	Min	Max	Unit
OFF CHARACTERISTICS				
Collector-Emitter Breakdown Voltage (I _C = 1.0 mAdc, I _E = 0)	V _{(BR)CEO}	45	—	Vdc
Collector-Base Breakdown Voltage (I _C = 10 μAdc, I _E = 0)	V _{(BR)CBO}	60	—	Vdc
Emitter-Base Breakdown Voltage (I _E = 10 μAdc, I _C = 0)	V _{(BR)EBO}	4.0	—	Vdc
Collector Cutoff Current (V _{CB} = 35 Vdc, I _E = 0)	I _{CBO}	—	0.5	μAdc
ON CHARACTERISTICS				
DC Current Gain (I _C = 30 mAdc, V _{CE} = 10 Vdc)	h _{FE}	20	—	—
Collector-Emitter Saturation Voltage (I _C = 30 mAdc, I _B = 3.0 mAdc)	V _{CE(sat)}	—	0.6	Vdc
SMALL-SIGNAL CHARACTERISTICS				
Common-Emitter Reverse Transfer Capacitance (V _{CB} = 10 Vdc, I _C = 0, f = 100 kHz)	C _{re}	—	0.65	pF
Output Admittance (I _C = 10 mAdc, V _{CE} = 10 Vdc, f = 45 MHz)	Y _{oe}	—	0.10	mmhos
Output Voltage (V _{in(RMS)} = 12 mV, f = 45 MHz)	V _{out}	1.0	—	Vdc

MPS6544

TO-92 (TO-226AA)



AMPLIFIER TRANSISTOR

NPN SILICON

Refer to MPSH20 for graphs.

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Quality Semi-Conductors