

INCHANGE SEMICONDUCTOR

isc Silicon PNP Darlington Power Transistor

BDX54A

DESCRIPTION

- Collector-Emitter Sustaining Voltage-
- : V_{CEO(sus)}= -60V(Min)
- High DC Current Gain
- : h_{FE}= 750(Min) @I_C= -3A
- Low Collector Saturation Voltage
- : V_{CE(sat)} = -2.0 V(Max) @ I_C = -3.0 A
- Complement to Type BDX53A
- Minimum Lot-to-Lot variations for robust device performance and reliable operation

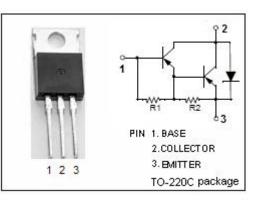
APPLICATIONS

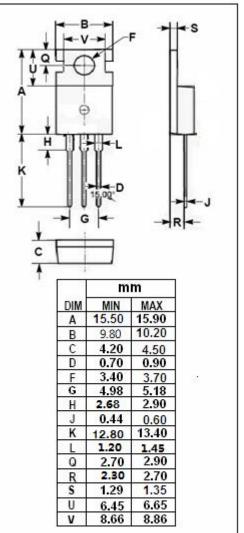
• Designed for general-purpose amplifier and low-speed switching applications.

ABSOLUTE MAXIMUM RATINGS(Ta=25℃) SYMBOL PARAMETER VALUE UNIT Vсво Collector-Base Voltage -60 V Collector-Emitter Voltage VCEO -60 V Emitter-Base Voltage V VEBO -5 lc **Collector Current-Continuous** -8 А Collector Current-Peak **I**CP -12 A **Base Current-Continuous** -0.2 A I_{B} Collector Power Dissipation P_{C} 60 W @ Tc=25°C ТJ Junction Temperature 150 °C Storage Temperature Range -65~150 °C Tstg

THERMAL CHARACTERISTICS

SYMBOL	PARAMETER	MAX	UNIT
R _{th j-c}	Thermal Resistance, Junction to Case	1.92	°C /W





isc website: www.iscsemi.com



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ELECTRICAL CHARACTERISTICS

$T_c=25^{\circ}C$ unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	МАХ	UNIT
V _{CEO(SUS)}	Collector-Emitter Breakdown Voltage	I _C = -50mA; I _B = 0	-60			V
V _{CE(sat)}	Collector-Emitter Saturation Voltage	I _C = -3A; I _B = -12mA			-2.0	V
V _{BE(sat)}	Base-Emitter Saturation Voltage	I _C = -3A; I _B = -12mA			-2.5	V
Ісво	Collector Cutoff Current	V _{CB} = -60V; I _E = 0			-0.2	mA
I _{CEO}	Collector Cutoff Current	V _{CE} = -30V; I _B = 0			-0.5	mA
Іево	Emitter Cutoff Current	V _{EB} = -5V; I _C = 0			-2	mA
h _{FE}	DC Current Gain	Ic= -3A ; Vce= -3V	750			

NOTICE:

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