

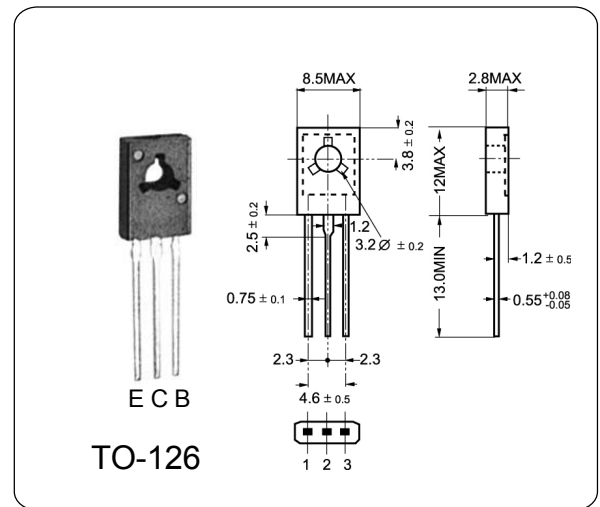
**PNP SILICON TRANSISTOR**
**BD140-16**
**DESCRIPTION**

The BD140-16 is silicon epitaxial planar PNP transistors in Jedec TO-126 plastic package, designed for audio amplifiers and drivers utilizing complementary or quasi complementary circuits.

The complementary NPN types are the BD139-16

**ABSOLUTE MAXIMUM RATINGS ( Ta = 25 °C)**

Parameter	Symbol	Value	Unit
Collector-Base Voltage	$V_{CBO}$	-80	V
Collector-Emitter Voltage	$V_{CEO}$	-80	V
Emitter-Base Voltage	$V_{EBO}$	-5.0	V
Collector Current	$I_C$	-1.5	A
Base Current	$I_B$	-0.5	A
Total Dissipation at	$P_{tot}$	12.5	W
Max. Operating Junction Temperature	$T_j$	150	°C
Storage Temperature	$T_{stg}$	-55~150	°C


**ELECTRICAL CHARACTERISTICS ( Ta = 25 °C)**

Parameter	Symbol	Test Conditions	Min.	Typ.	Max.	Unit
Collector Cut-off Current	$I_{CBO}$	$V_{CB} = -80V, I_E = 0$	—	—	-10	μA
Emitter Cut-off Current	$I_{EBO}$	$V_{EB} = -5.0V, I_C = 0$	—	—	-10	μA
Collector-Emitter Sustaining Voltage	$V_{CEO}$	$I_C = -1.0mA, I_B = 0$	-80	—	—	V
DC Current Gain	$h_{FE}$	$V_{CE} = -2.0V, I_C = -0.15A$	100	—	250	
		$V_{CE} = -2.0V, I_C = -0.5A$	100	—	—	
Collector-Emitter Saturation Voltage	$V_{CE(sat)}$	$I_C = -0.5A, I_B = -0.05A$	—	—	-0.5	V
Base-Emitter Voltage	$V_{BE}$	$I_C = -0.5A, V_{CE} = -2.0V$	—	—	-1.0	V
Transition Frequency	$f_T$	$V_{CE} = -5.0V, I_C = -50mA$	80	—	—	MHz