

/ Descriptions

TO-126F NPN Silicon NPN transistor in a TO-126F Plastic Package.

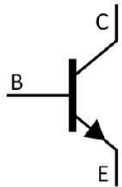
/ Features

BD436
Complementary pair with BD436.

/ Applications

Medium power linear and switching applications.

/ Equivalent Circuit



/ Pinning



PIN1 Emitter PIN 2 Collector PIN 3 Base

/ h_{FE} Classifications & Marking

See Marking Instructions

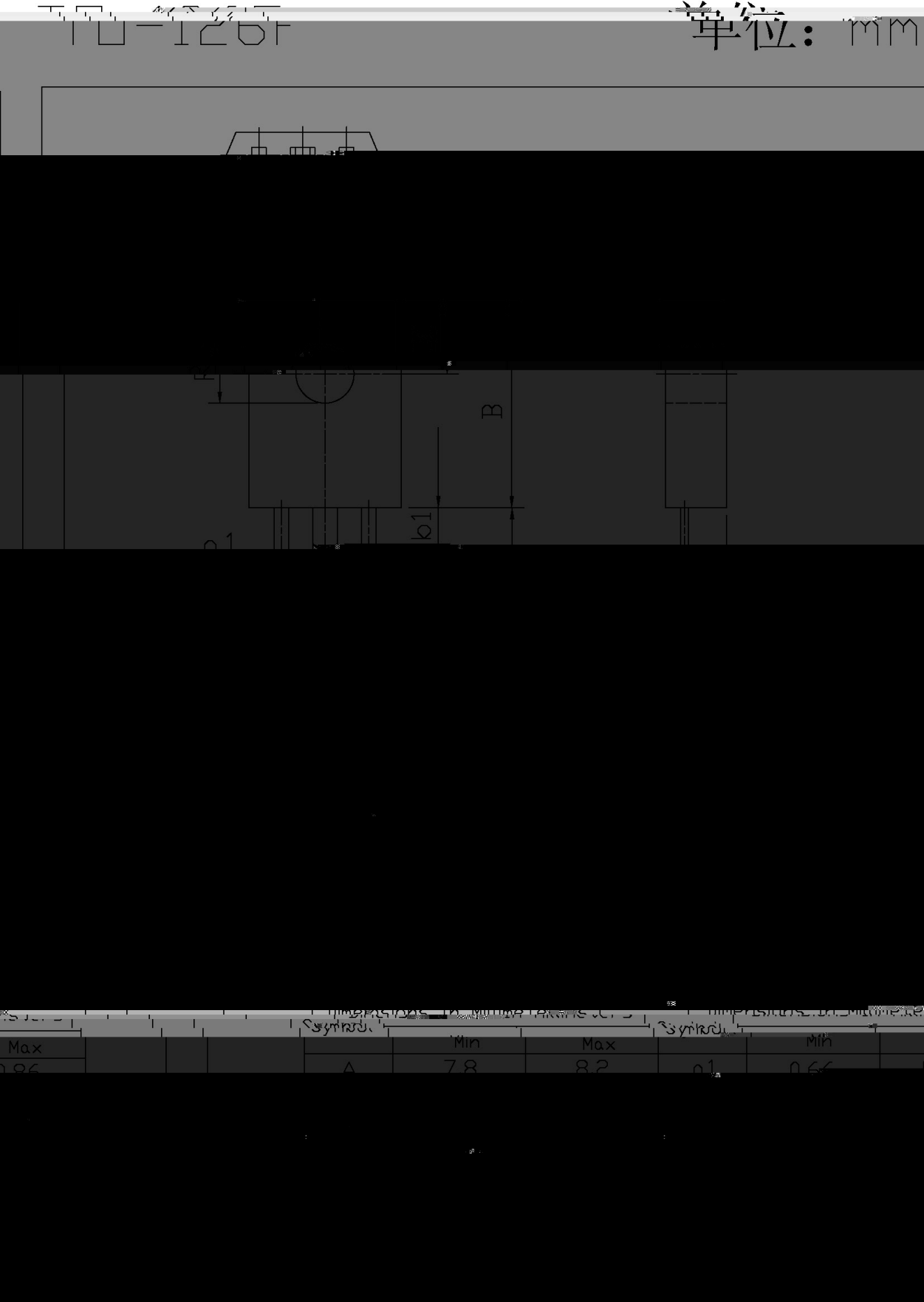
Parameter	Symbol	Rating	Unit
Collector to Base Voltage	V_{CBO}	32	V
Collector to Emitter Voltage	V_{CEO}	32	V
Emitter to Base Voltage	V_{EBO}	5.0	V
Collector Current - Continuous	I_C	4.0	A
Collector Current – Continuous(Pulse)	I_{CP}	7.0	A
Base Current - Continuous	I_B	1.0	A
Collector Power Dissipation	P_C	1.25	W
Collector Power Dissipation	$P_C(T_c=25^\circ\text{C})$	36	W
Junction Temperature	T_j	150	
Storage Temperature Range	T_{stg}	-55 150	

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Collector-Emitter Sustaining Voltage	V_{CEO}	$I_C=100\text{mA}$ $I_B=0$	32			V
Collector Cut-Off Current	I_{CBO}	$V_{CB}=32\text{V}$ $I_E=0$			100	μA
Collector Cut-Off Current	I_{CEO}	$V_{CE}=32\text{V}$ $I_B=0$			100	μA
Emitter Cut-Off Current	I_{EBO}	$V_{EB}=5.0\text{V}$ $I_C=0$			1.0	mA
DC Current Gain	$h_{FE(1)}$	$V_{CE}=1.0\text{V}$ $I_C=500\text{mA}$	85	140		
	$h_{FE(2)}$	$V_{CE}=1.0\text{V}$ $I_C=2.0\text{A}$	50			
	$h_{FE(3)}$	$V_{CE}=5.0\text{V}$ $I_C=10\text{mA}$	40	130		

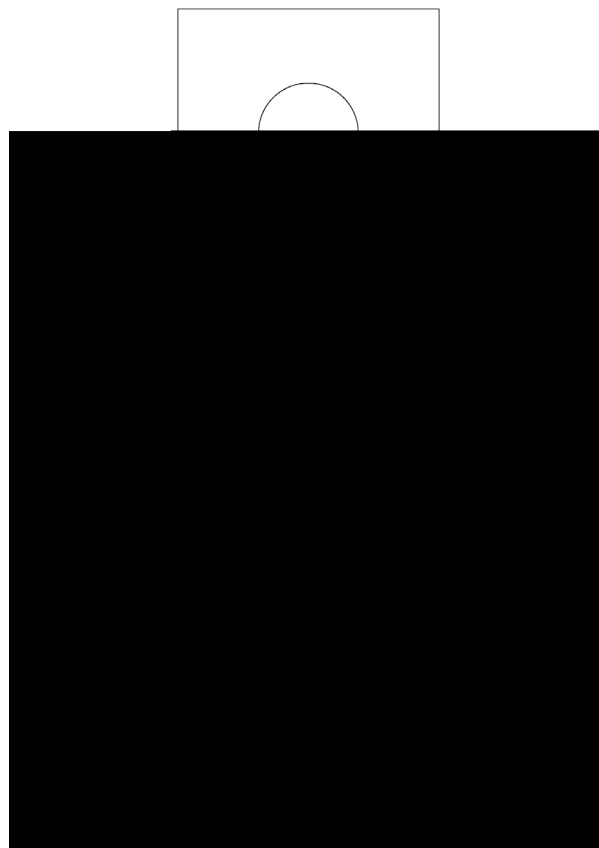
Collector to Emitter Saturation Voltage

V

/ Package Dimensions



/ Marking Instructions



BR

BD435

Note:

BR: Company Code

BD435: Product Type.

****: Lot No. Code, code change with Lot No.

() / Temperature Profile for Dip Soldering(Pb-Free)



Note:

- 1

25 150

60 90sec;
- 2

255±5

5±0.5sec;
- 3

2 10

/sec.
- 1.Preheating:25~150

, Time:60~90sec.
- 2.Peak Temp.:255±5

, Duration:5±0.5sec.
3. Cooling Speed: 2~10

/sec.

/ Resistance to Soldering Heat Test Conditions

270±5 10±1 sec. Temp.:270±5 Time:10±1 sec

/ Packaging SPEC.

/ BULK

Package Type	Units					Dimension (unit mm ³)		
	Units/Tube /	Tubes/Inner Box /	Units/Inner Box /	Inner Boxes/Outer Box /	Units/Outer Box /	Tube	Inner Box	Outer Box
TO-126/F	500	6	3,000	5	15,000	135×190	237×172×102	560×245×195

/ TUBE

Package Type	Units	Dimension	(unit mm ³)
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