

**/ Descriptions**

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

**/ Features**

$\beta$ ,  $h_{FE}$   
Low saturation voltage, excellent  $h_{FE}$  linearity and high  $h_{FE}$ .

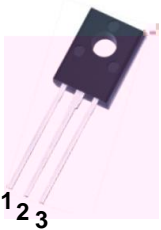
**/ Applications**

3  
Output stage of 3 watts audio amplifier, voltage regulator, DC-DC converter and relay driver.

**/ Equivalent Circuit**



**/ Pinning**



PIN1 Emitter          PIN 2 Collector          PIN 3 Base

**/  $h_{FE}$  Classifications & Marking**

$h_{FE}$ Classifications Symbol	R	Q	P	E
$h_{FE}$ Range	60 120	100 200	160 320	200 400

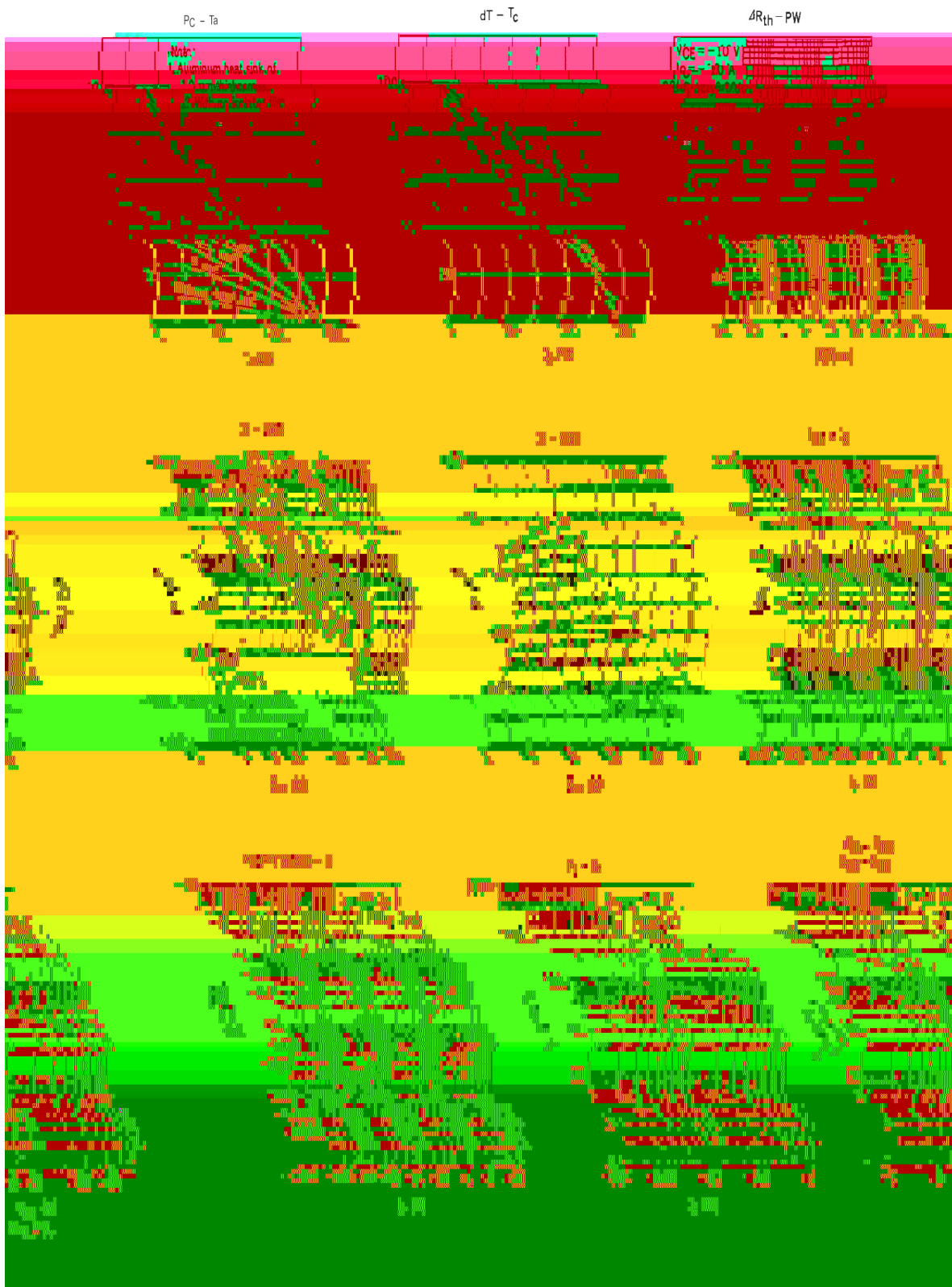
**/ Absolute Maximum Ratings(Ta=25 )**

Parameter	Symbol	Rating	Unit
Collector to Base Voltage	$V_{CBO}$	-40	V
Collector to Emitter Voltage	$V_{CEO}$	-30	V
Emitter to Base Voltage	$V_{EBO}$	-5.0	V
Collector Current - Continuous	$I_C$	-3.0	A
Peak Collector Current – Continuous	$I_{CP}$	-7.0	A
Collector Power Dissipation	$P_C$	1.0	W
	$P_C(T_C=25 )$	10	W
Junction Temperature	$T_j$	150	
Storage Temperature Range	$T_{stg}$	-55 150	

**/ Electrical Characteristics(Ta=25 )**

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Collector Cut-Off Current	$I_{CBO}$	$V_{CB}=-30V$ $I_E=0$			-1.0	$\mu A$
Emitter Cut-Off Current	$I_{EBO}$	$V_{EB}=-3.0V$ $I_C=0$			-1.0	$\mu A$
DC Current Gain	$h_{FE(1)}$	$V_{CE}=-2.0V$ $I_C=-1.0A$	60	160	400	
	$h_{FE(2)}$	$V_{CE}=-2.0V$ $I_C=-20mA$	30	220		
Collector to Emitter Saturation Voltage	$V_{CE(sat)}$	$I_C=-2.0A$ $I_B=-0.2A$		-0.3	-0.5	V
Base to Emitter Saturation Voltage	$V_{BE(sat)}$	$I_C=-2.0A$ $I_B=-0.2A$		-1.0	-2.0	V
Transition Frequency	$f_T$	$V_{CE}=-5.0V$ $I_C=-0.1A$		80		MHz
Output Capacitance	$C_{ob}$	$V_{CB}=-10V$ $I_E=0$ $f=1.0MHz$		55		pF

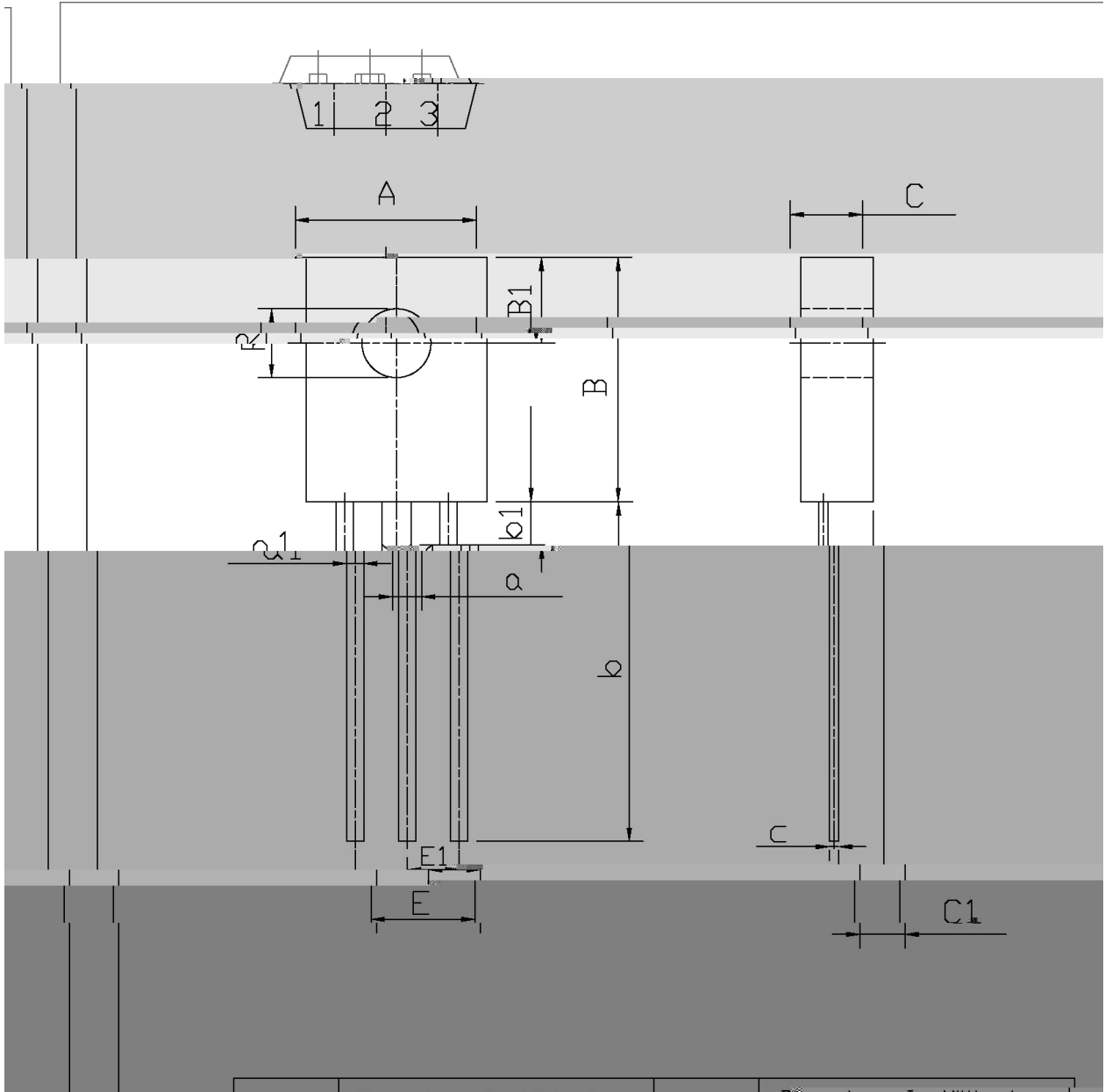
/ Electrical Characteristic Curve



/ Package Dimensions

2SB772

单位: mm



Symbol	Min	Max	Symbol	Min
A	7.8	8.2	a1	0.65
B	10.9	11.0	E	1.0

/ Marking Instructions



BR

B772

R:  $h_{FE}$

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Note:

BR: Company Code

B772: Product Type.

R:  $h_{FE}$  Classifications Symbol

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

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



1	25	150	60	90sec;	Note:
2	255±5		5±0.5sec;	1.Preheating:25~150 , Time:60~90sec.	1.Preheating:25~150 , Time:60~90sec.
3		2	10 /sec.	2.Peak Temp.:255±5 , Duration:5±0.5sec.	2.Peak Temp.:255±5 , Duration:5±0.5sec.
				3. Cooling Speed: 2~10 /sec.	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