



# 晶体管 TRANSISTOR 2N5401B

## 主要参数 MAIN CHARACTERISTICS

I <sub>c</sub>	-600mA
V <sub>CEO</sub>	-165V
P <sub>c</sub>	625mW

## 产品特性 FEATURES

硅外延	Epitaxial silicon
高开关速度	High switching speed
与 2N5551 互补	Complementary to 2N5551
RoHS 产品	RoHS product

## 用途 APPLICATIONS

高频开关电源	High frequency switch power supply
一般功率放大电路	Commonly power amplifier circuit
高频功率变换	High frequency power transform

## 封装形式 Package



1. Emitter 2. Base 3. Collector

TO-92

## 绝对最大额定值 ABSOLUTE RATINGS (T<sub>c</sub>=25°C)

项目 Parameter	符号 Symbol	数值 Value	单位 Unit
集电极—基极直流电压 Collector- Base Voltage ( I <sub>E</sub> =0 )	V <sub>CB0</sub>	-190	V
集电极—发射极直流电压 Collector- Emitter Voltage ( I <sub>B</sub> =0 )	V <sub>CEO</sub>	-165	V
发射极—基极直流电压 Emitter-Base Voltage ( I <sub>C</sub> =0 )	V <sub>EB0</sub>	-6.0	V
最大集电极直流电流 Collector Current ( DC )	I <sub>c</sub>	-600	mA
最大集电极耗散功率 Total Dissipation ( TO-92 )	P <sub>c</sub>	625	mW
最高结温 Junction Temperature	T <sub>j</sub>	150	°C
贮存温度 Storage Temperature	T <sub>stg</sub>	-55~+150	°C

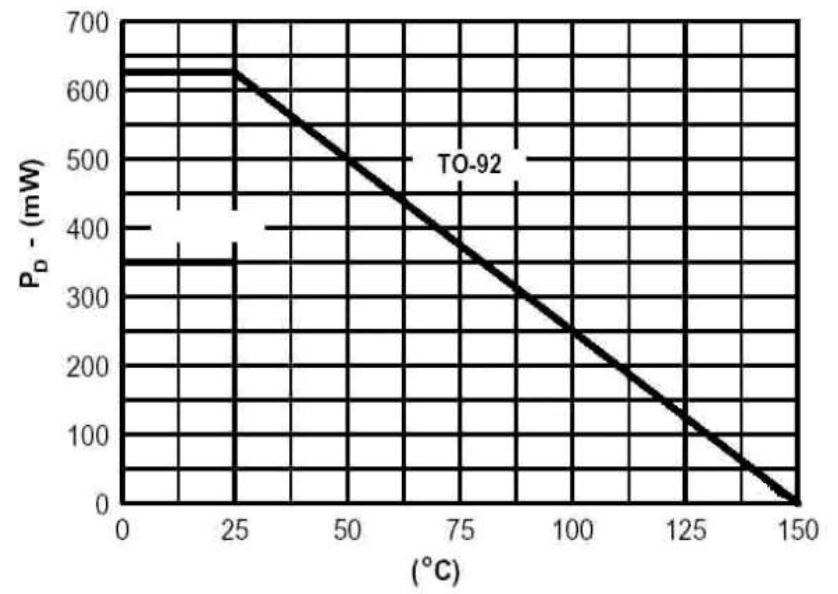
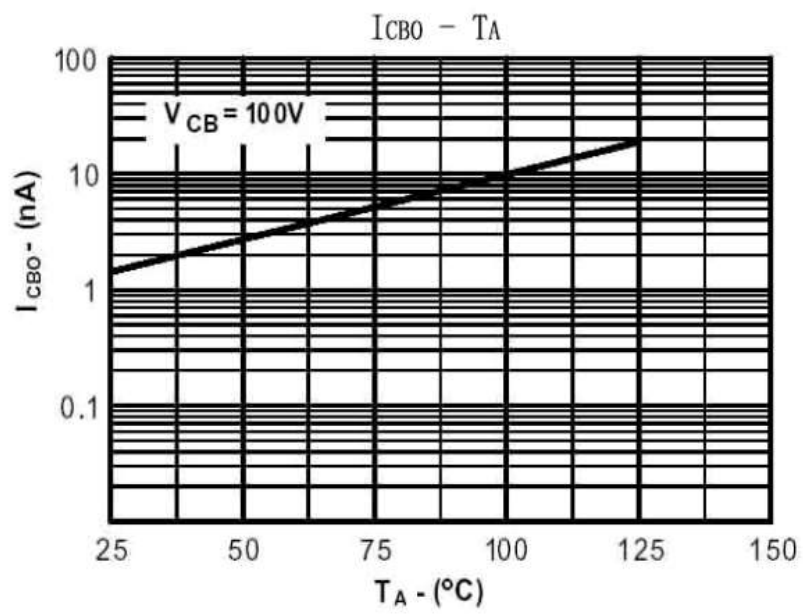
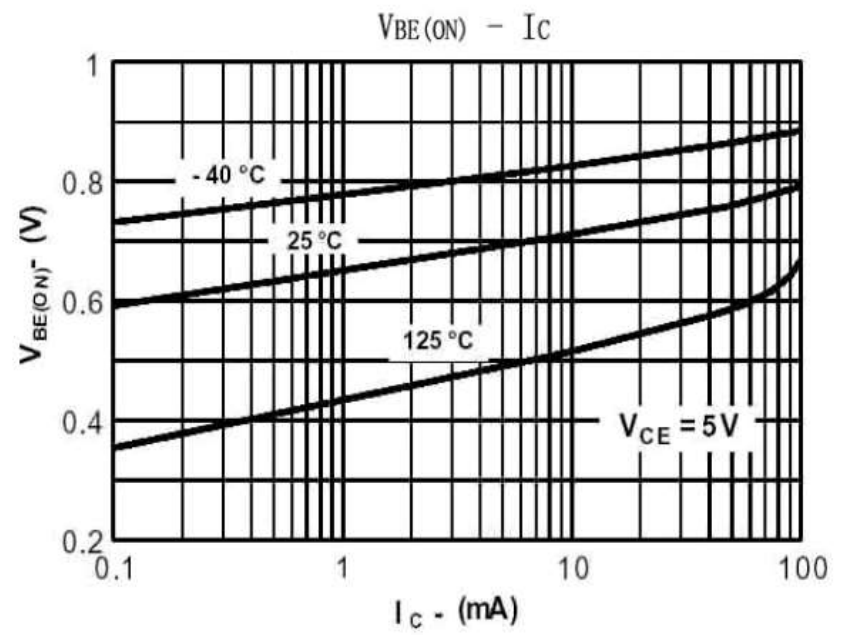
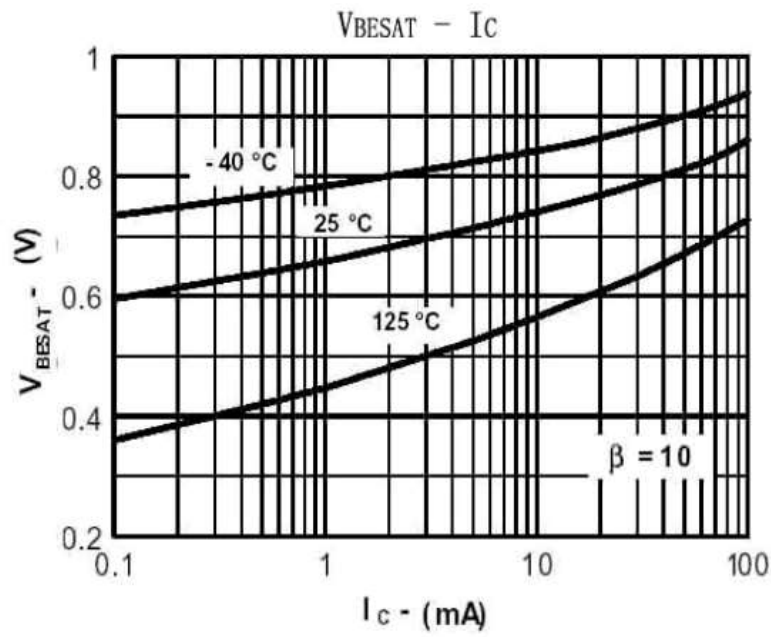
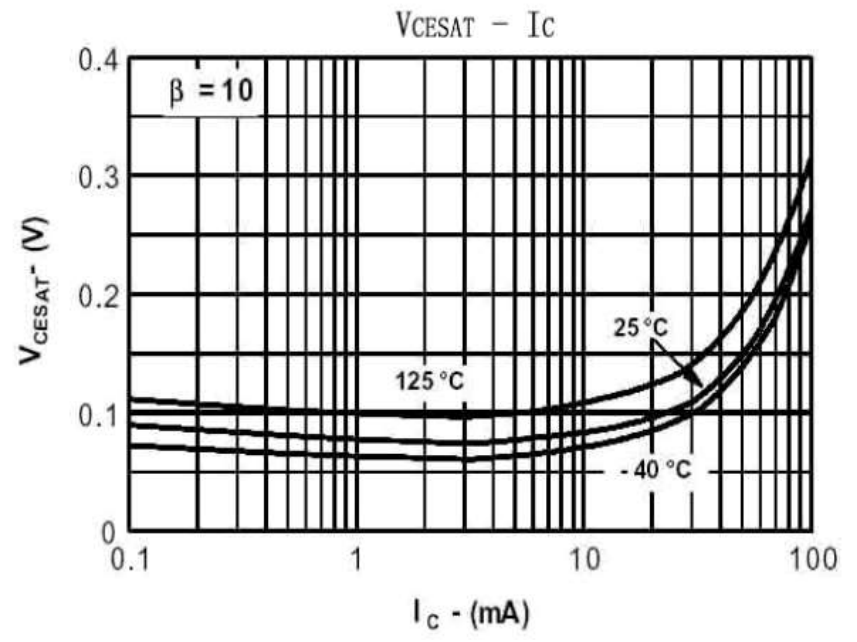
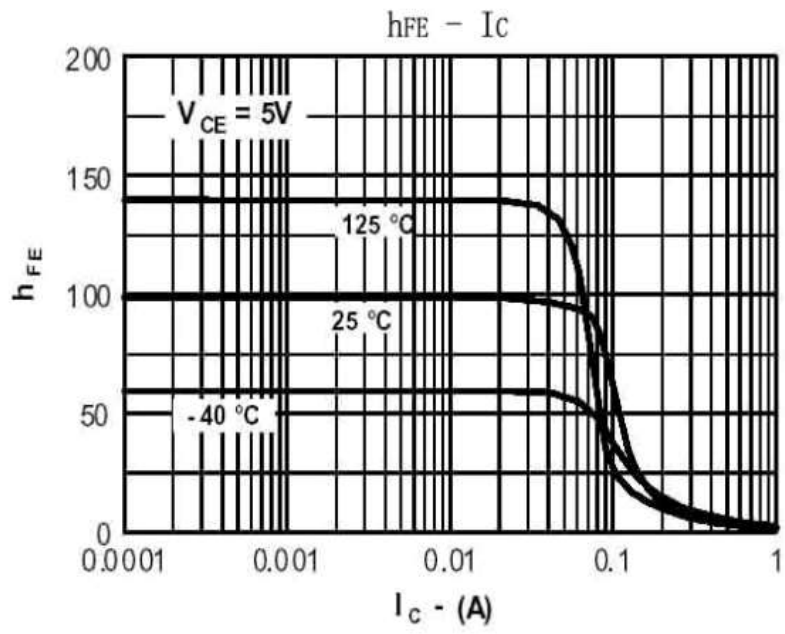
## 电特性 ELECTRICAL CHARACTERISTICS

项目 Parameter	测试条件 Tests conditions	最小值 (min)	典型值 (typ)	最大值 (max)	单位 Unit
$V(BR)_{CBO}$	$I_C = -10\mu A, I_E = 0$	-190	-	-	V
$V(BR)_{CEO}$	$I_C = -1.0mA, I_B = 0$	-165	-	-	V
$V(BR)_{EBO}$	$I_E = -10\mu A, I_C = 0$	-6.0	-	-	V
$I_{CBO}$	$V_{CB} = -120V, I_E = 0$	-	-	-50	nA
$I_{EBO}$	$V_{BE} = -5V, I_C = 0$	-	-	-50	nA
$h_{FE} (1)$	$V_{CE} = -5V, I_C = -10mA$	100	-	300	-
$h_{FE} (2)$	$V_{CE} = -5V, I_C = -50mA$	80	-	-	-
$V_{CE(sat)}$	$I_C = -10mA, I_B = -1.0mA$	-	-	-0.2	V
$V_{CE(sat)}$	$I_C = -50mA, I_B = -5.0mA$	-	-	-0.5	V
$V_{BE(sat)}$	$I_C = -10mA, I_B = -1.0mA$	-	-	-1	V
$f_T$	$V_{CE} = -10V, I_C = -10mA$	50	80	-	MHz

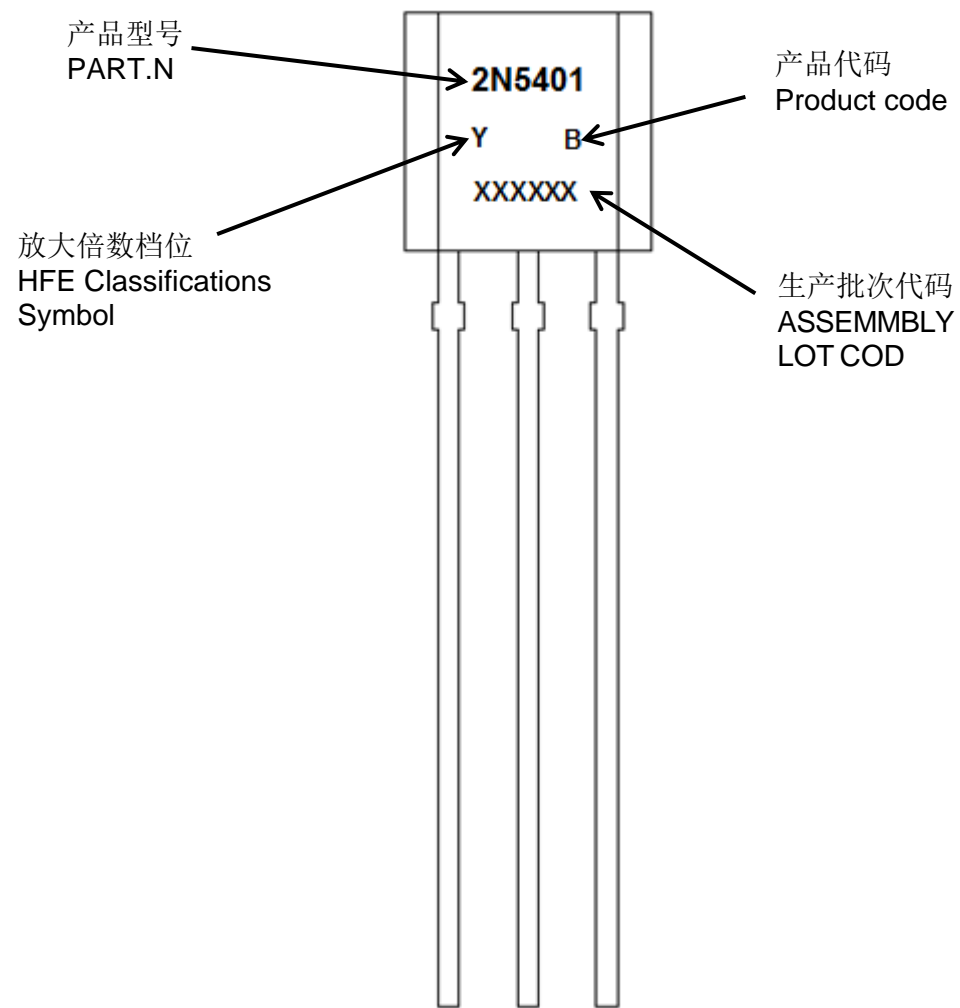
### 放大倍数 $h_{FE}$ Classifications

$h_{FE}$ Classifications Symbol	Y1	Y2
$h_{FE}$ Range	100-200	200-300

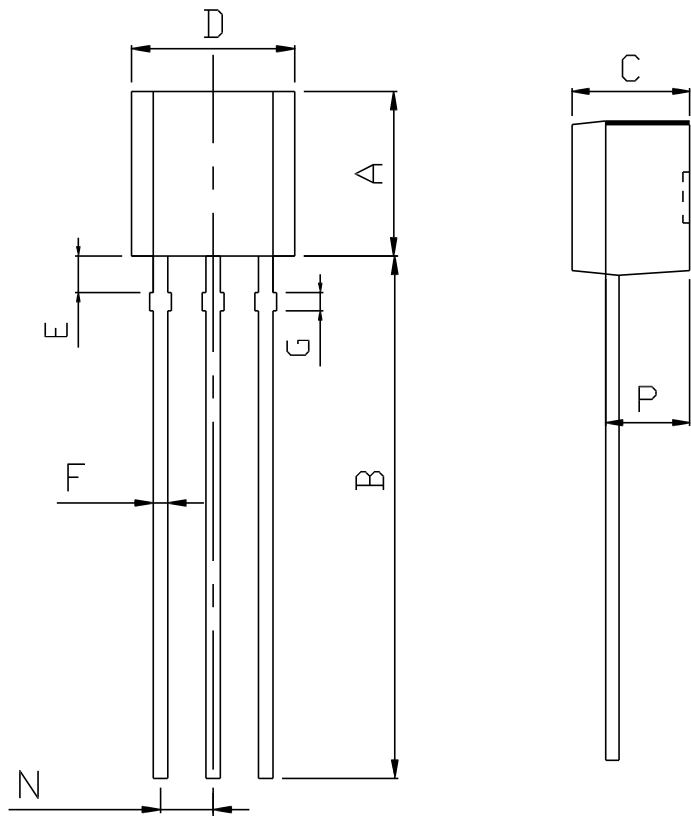
典型特性曲线 Electrical Characteristics



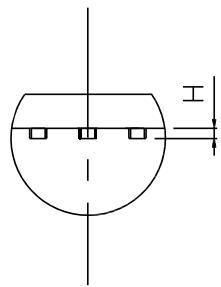
印记 Marking:



外形尺寸: Package Dimension



DIM	MILLIMETERS
A	4.55+0.20
B	14.50±0.30
C	3.54±0.20
D	4.56±0.20
E	1.30±0.20
F	0.46±0.20
G	0.50±0.10
H	0.32±0.10
N	1.30±0.20
P	2.52±0.20



(Units: mm)