

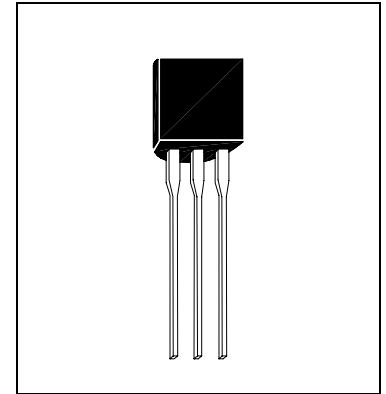


# H2N6426

NPN EPITAXIAL PLANAR TRANSISTOR

## Description

Darlington Transistor



## Absolute Maximum Ratings

- Maximum Temperatures  
 Storage Temperature ..... -55 ~ +150 °C  
 Junction Temperature ..... +150 °C Maximum
- Maximum Power Dissipation  
 Total Power Dissipation (Ta=25°C) ..... 625 mW
- Maximum Voltages and Currents (Ta=25°C)  
 BVCEO Collector to Emitter Voltage ..... 40 V  
 BVCBO Collector to Base Voltage ..... 40 V  
 BVEBO Emitter to Base Voltage ..... 12 V  
 IC Collector Current ..... 500 mA

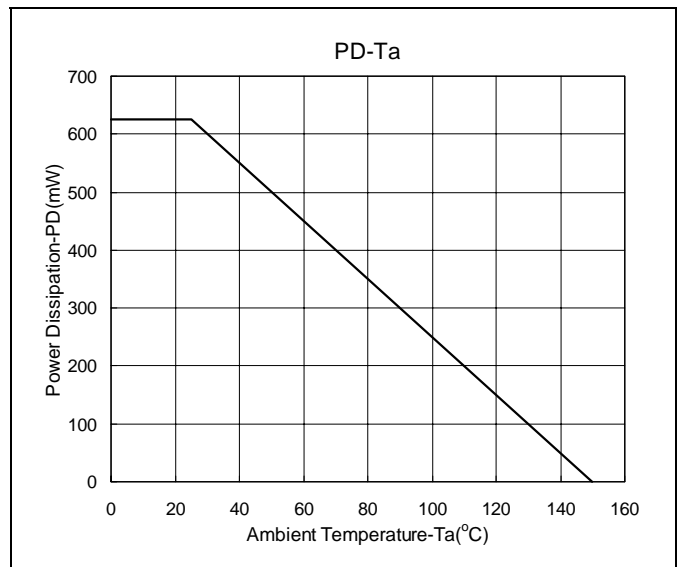
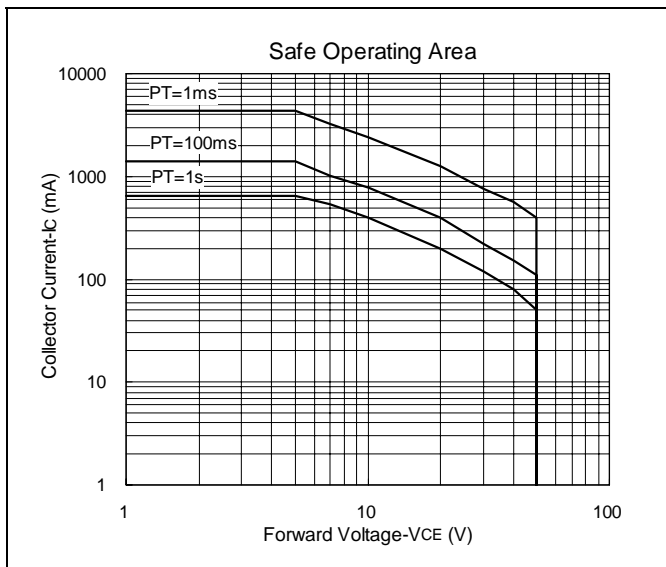
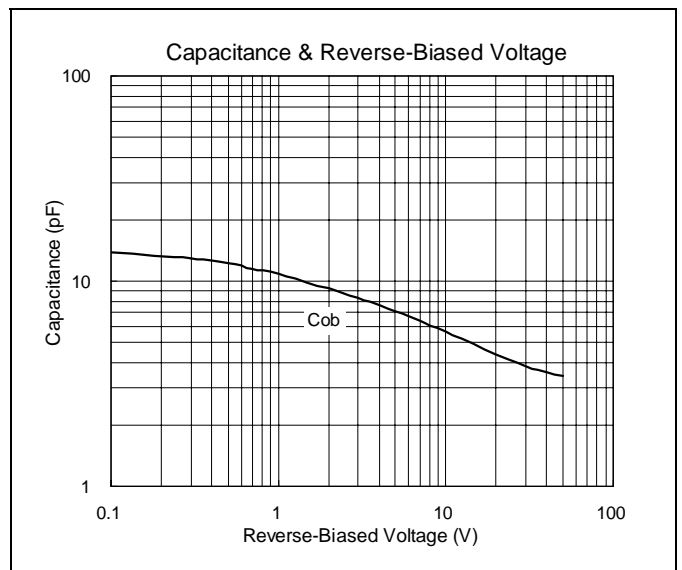
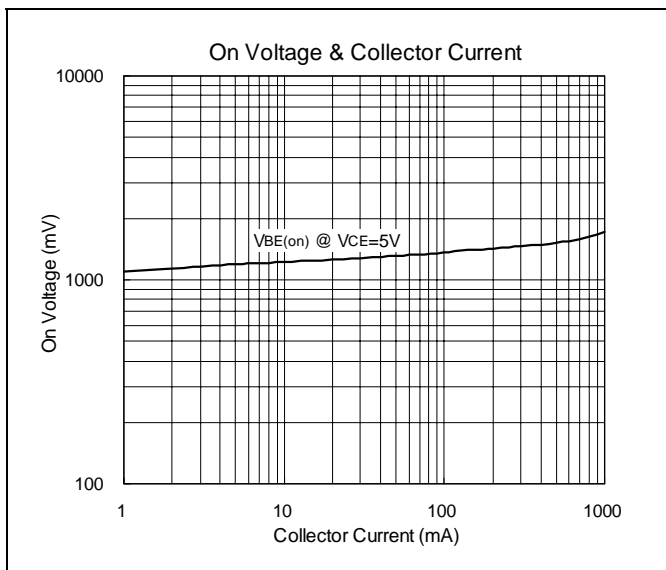
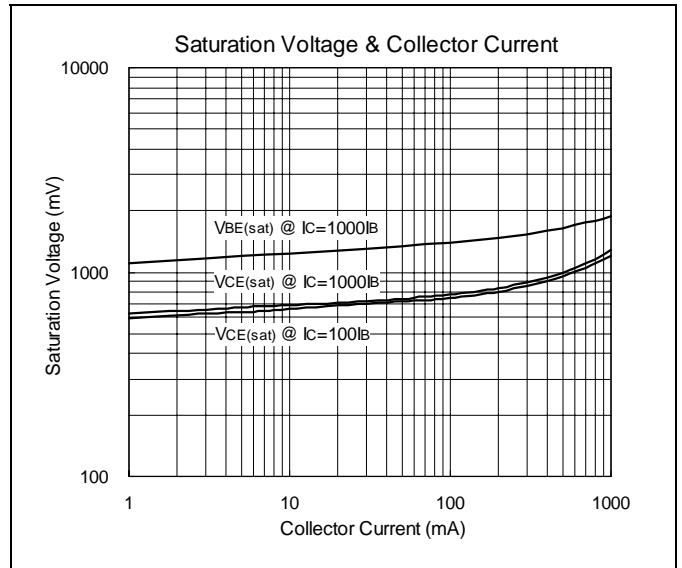
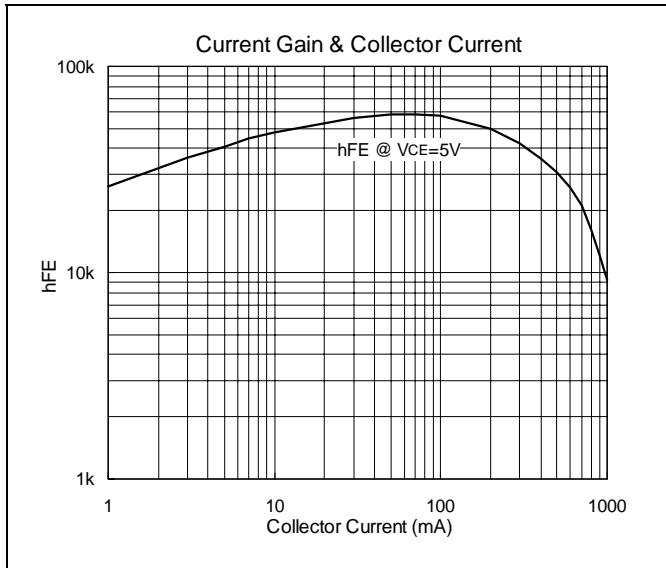
## Characteristics (Ta=25°C)

Symbol	Min.	Typ.	Max.	Unit	Test Conditions
BVCEO	40	-	-	V	IC=10mA, IB=0
BVCBO	40	-	-	V	IC=100uA, IE=0
BVEBO	12	-	-	V	IE=10uA, IC=0
ICEO	-	-	1.0	uA	VEB=25V, IB=0
ICBO	-	-	50	nA	VCB=30V, IE=0
IEBO	-	-	50	nA	VEB=10V, IC=0
*VCE(sat)1	-	0.71	1.2	V	IC=50mA, IB=0.5mA
*VCE(sat)2	-	0.9	1.5	V	IC=500mA, IB=0.5mA
*VBE(sat)	-	1.52	2.0	V	IC=500mA, IB=0.5mA
VBE(on)	-	1.24	1.75	V	VCE=5V, IC=50mA
*hFE1	20	-	200	K	VCE=5V, IC=10mA
*hFE2	30	-	300	K	VCE=5V, IC=100mA
*hFE3	20	-	200	K	VCE=5V, IC=500mA
Cob	-	5.4	7.0	pF	VCB=10V, f=1MHz

\*Pulse Test : Pulse Width ≤380us, Duty Cycle≤2%



### Characteristics Curve





### TO-92 Dimension

3-Lead TO-92 Plastic Package  
HSMC Package Code : A

**Marking :**

HSMC Logo → □ □ □ □ ← Product Series  
 Part Number → □ □ □ □ □ □  
 Date Code → □ □ □ □ □ □ ← Rank  
 Laser Mark

HSMC Logo  
 Product Series  
 Part Number → □ □ □ □ □ □  
 Ink Mark

Style : Pin 1. Emitter 2. Base 3. Collector

\*:Typical

DIM	Inches		Millimeters		DIM	Inches		Millimeters	
	Min.	Max.	Min.	Max.		Min.	Max.	Min.	Max.
A	0.1704	0.1902	4.33	4.83	G	0.0142	0.0220	0.36	0.56
B	0.1704	0.1902	4.33	4.83	H	-	*0.1000	-	*2.54
C	0.5000	-	12.70	-	I	-	*0.0500	-	*1.27
D	0.0142	0.0220	0.36	0.56	α1	-	*5°	-	*5°
E	-	*0.0500	-	*1.27	α2	-	*2°	-	*2°
F	0.1323	0.1480	3.36	3.76	α3	-	*2°	-	*2°

**Notes :** 1.Dimension and tolerance based on our Spec. dated Apr. 25,1996.  
 2.Controlling dimension : millimeters.  
 3.Maximum lead thickness includes lead finish thickness, and minimum lead thickness is the minimum thickness of base material.  
 4.If there is any question with packing specification or packing method, please contact your local HSMC sales office.

**Material :**

- Lead : 42 Alloy ; solder plating
- Mold Compound : Epoxy resin family, flammability solid burning class:UL94V-0

**Important Notice:**

- All rights are reserved. Reproduction in whole or in part is prohibited without the prior written approval of HSMC.
- HSMC reserves the right to make changes to its products without notice.
- **HSMC semiconductor products are not warranted to be suitable for use in Life-Support Applications, or systems.**
- HSMC assumes no liability for any consequence of customer product design, infringement of patents, or application assistance.

**Head Office And Factory :**

- **Head Office** (Hi-Sincerity Microelectronics Corp.) : 10F.,No. 61, Sec. 2, Chung-Shan N. Rd. Taipei Taiwan R.O.C.  
 Tel : 886-2-25212056 Fax : 886-2-25632712, 25368454
- **Factory 1** : No. 38, Kuang Fu S. Rd., Fu-Kou Hsin-Chu Industrial Park Hsin-Chu Taiwan. R.O.C  
 Tel : 886-3-5983621~5 Fax : 886-3-5982931
- **Factory 2** : No. 17-1, Ta-Tung Rd., Fu-Kou Hsin-Chu Industrial Park Hsin-Chu Taiwan. R.O.C  
 Tel : 886-3-5977061 Fax : 886-3-5979220