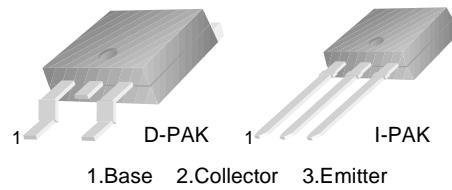


**General Purpose Amplifier Low Speed  
Switching Applications**

**D-PAK for Surface Mount Applications**

- Lead Formed for Surface Mount Applications (No Suffix)
- Straight Lead (I-PAK, " -I " Suffix)
- Electrically Similar to Popular KSE2955T
- DC Current Gain Specified to 10A
- High Current Gain - Bandwidth Product:  
 $f_T = 2\text{MHz (MIN)}, I_C = -500\text{mA}$



**PNP Epitaxial Silicon Transistor**

**Absolute Maximum Ratings**  $T_C=25^\circ\text{C}$  unless otherwise noted

Symbol	Parameter	Value	Units
$V_{CBO}$	Collector-Base Voltage	- 70	V
$V_{CEO}$	Collector-Emitter Voltage	- 60	V
$V_{EBO}$	Emitter-Base Voltage	- 5	V
$I_C$	Collector Current	- 10	A
$I_B$	Base Current	- 6	A
$P_C$	Collector Dissipation ( $T_C=25^\circ\text{C}$ )	20	W
	Collector Dissipation ( $T_a=25^\circ\text{C}$ )	1.75	W
$T_J$	Junction Temperature	150	$^\circ\text{C}$
$T_{STG}$	Storage Temperature	- 55 ~ 150	$^\circ\text{C}$

**Electrical Characteristics**  $T_C=25^\circ\text{C}$  unless otherwise noted

Symbol	Parameter	Test Condition	Min.	Max.	Units
$V_{CEO(\text{sus})}$	* Collector-Emitter Sustaining Voltage	$I_C = - 30\text{mA}, I_B = 0$	-60		V
$I_{CEO}$	Collector Cut-off Current	$V_{CE} = - 30\text{V}, I_E = 0$		- 50	$\mu\text{A}$
$I_{CBO}$	Collector Cut-off Current	$V_{CB} = - 70\text{V}, I_E = 0$		- 2	mA
$I_{EBO}$	Emitter Cut-off Current	$V_{EB} = - 5\text{V}, I_C = 0$		- 0.5	mA
$h_{FE}$	* DC Current Gain	$V_{CE} = - 4\text{V}, I_B = - 4\text{A}$ $V_{CE} = - 4\text{V}, I_C = - 10\text{A}$	20 5	100	
$V_{CE(\text{sat})}$	* Collector-Emitter Saturation Voltage	$I_C = - 4\text{A}, I_B = - 0.4\text{A}$ $I_C = - 10\text{A}, I_B = - 3.3\text{A}$		- 1.1 - 8	V
$V_{BE(\text{on})}$	* Base-Emitter On Voltage	$V_{CE} = - 4\text{V}, I_C = - 4\text{A}$		- 1.8	V
$f_T$	Current Gain Bandwidth Product	$V_{CE} = - 10\text{V}, I_C = - 500\text{mA}$	2		MHz

\* Pulse Test: PW≤300ms, Duty Cycle≤2%

## Typical Characteristics

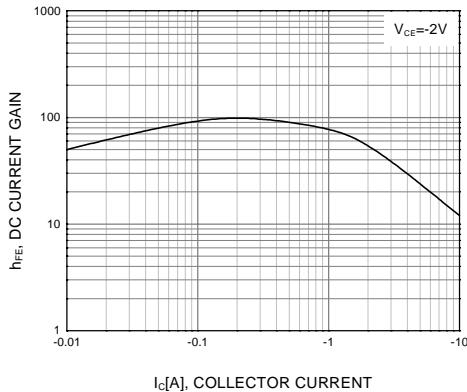


Figure 1. DC current Gain

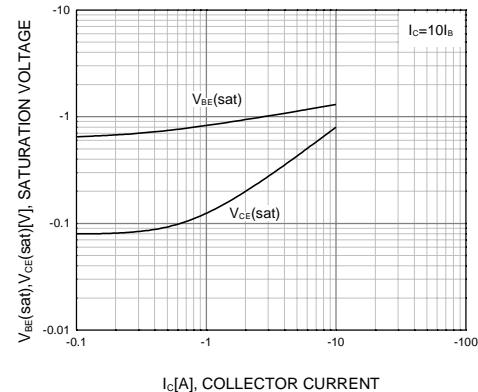


Figure 2. Base-Emitter Saturation Voltage  
Collector-Emitter Saturation Voltage

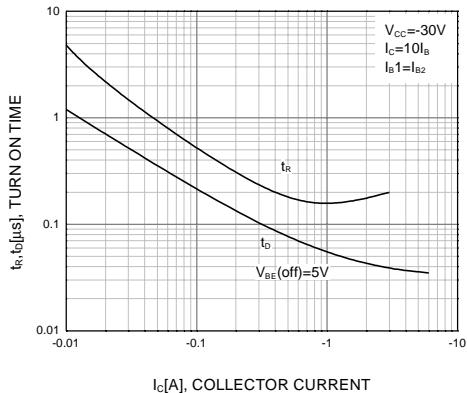


Figure 3. Turn On Time

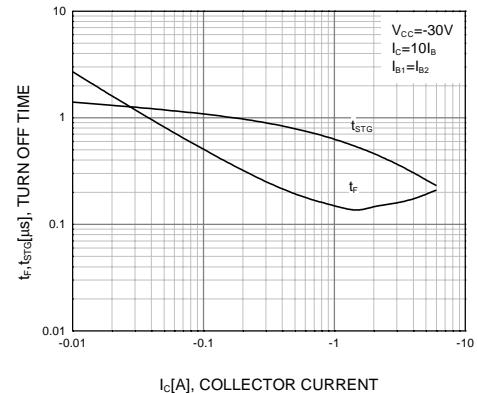


Figure 4. Turn Off Time

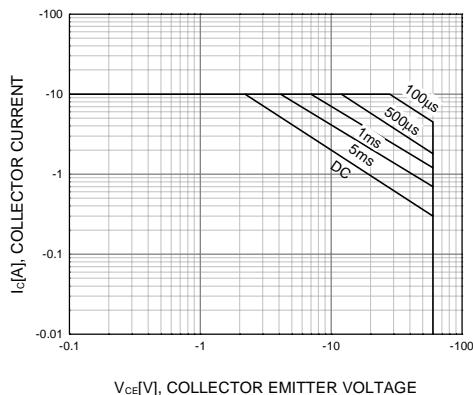


Figure 5. Safe Operating Area

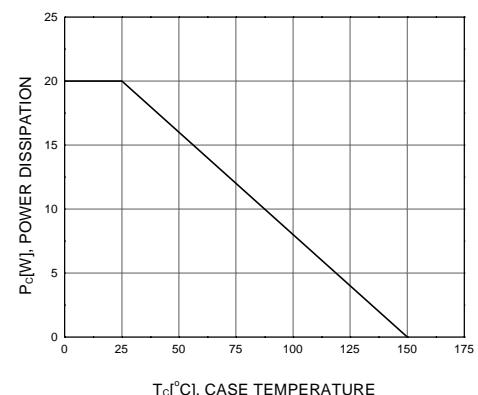
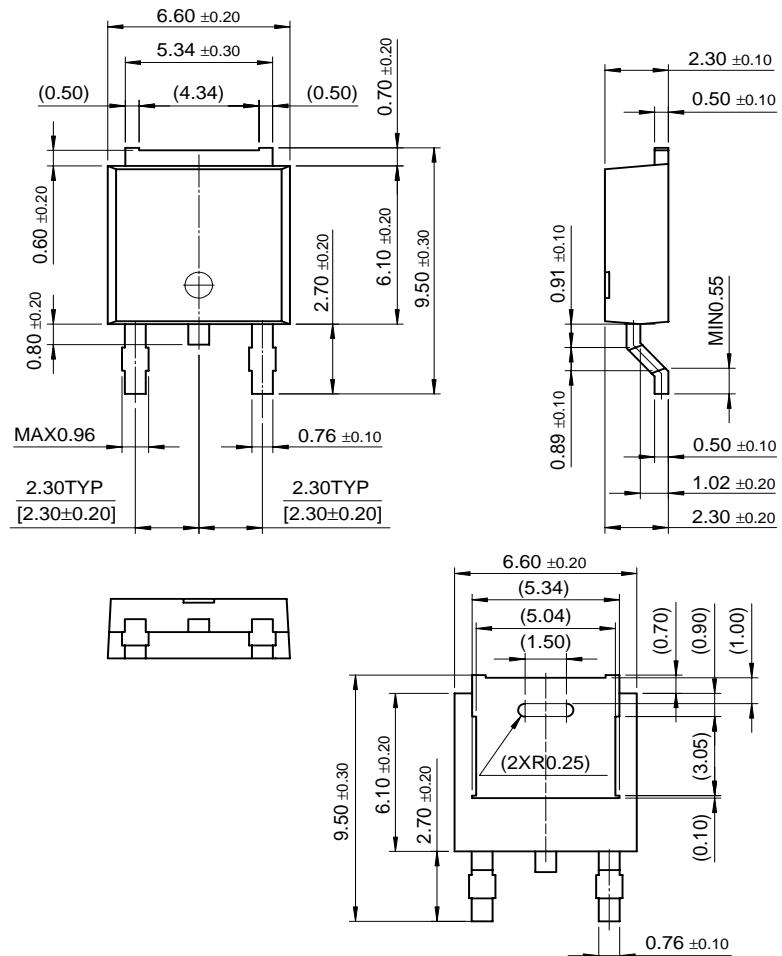


Figure 6. Power Derating

## Package Dimensions

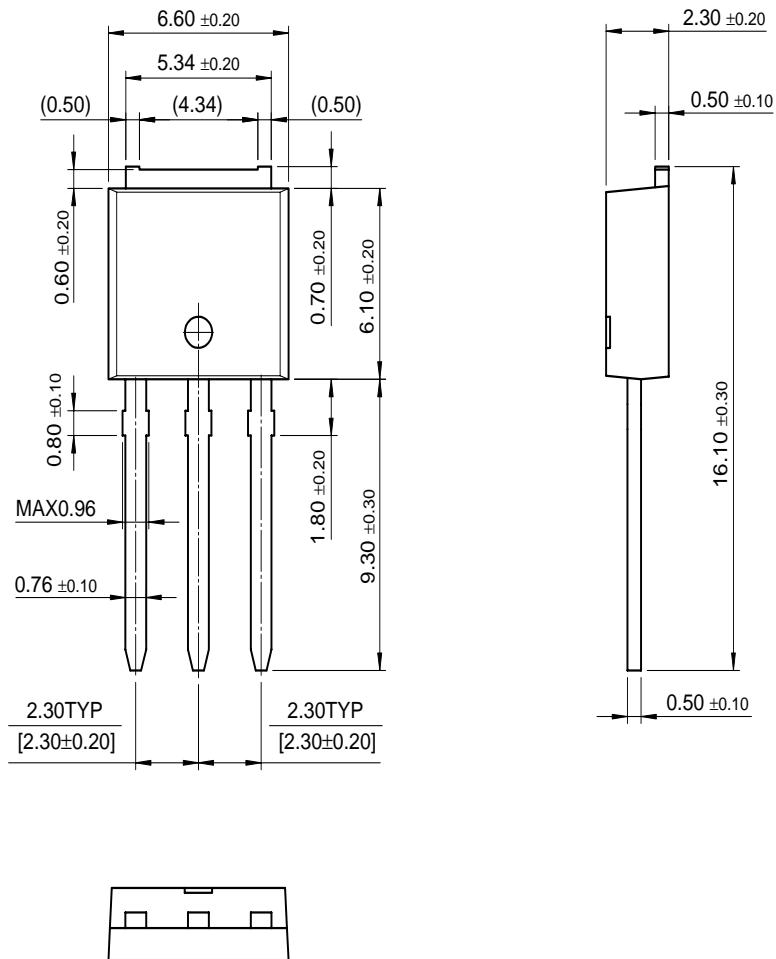
## D-PAK



Dimensions in Millimeters

## Package Dimensions (Continued)

### I-PAK



Dimensions in Millimeters

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CoolFET™	FASTr™	MicroFET™	PowerTrench®	SuperSOT™-6
CROSSVOLT™	FRFET™	MicroPak™	QFET™	SuperSOT™-8
DOME™	GlobalOptoisolator™	MICROWIRE™	QS™	SyncFET™
EcoSPARK™	GTO™	MSX™	QT Optoelectronics™	TinyLogic™
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EnSigna™	I <sup>2</sup> C™	OCX™	RapidConfigure™	UHC™
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