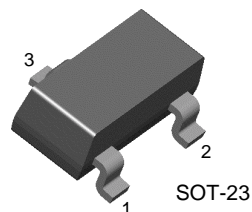


KSC3265

KSC3265

Low Frequency Amplifier

- Complement to KSA1298



1. Base 2. Emitter 3. Collector

NPN Epitaxial Silicon Transistor

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

Symbol	Parameter	Value	Units
V_{CBO}	Collector-Base Voltage	30	V
V_{CEO}	Collector-Emitter Voltage	25	V
V_{EBO}	Emitter-Base Voltage	5	V
I_C	Collector Current	800	mA
I_B	Base Current	160	mA
P_C	Collector Power Dissipation	200	mW
T_J	Junction Temperature	150	$^\circ\text{C}$
T_{STG}	Storage Temperature	-55 ~ 150	$^\circ\text{C}$

* Refer to KSD261 for graphs

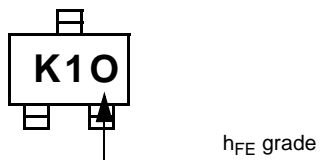
Electrical Characteristics $T_a=25^\circ\text{C}$ unless otherwise noted

Symbol	Parameter	Test Condition	Min.	Typ.	Max.	Units
BV_{CEO}	Collector-Emitter Breakdown Voltage	$I_C=10\text{mA}, I_B=0$	25			V
BV_{EBO}	Emitter-Base Breakdown Voltage	$I_E=1\text{mA}, I_C=0$	5			V
I_{CBO}	Collector Cut-off Current	$V_{CB}=30\text{V}, I_E=0$			100	nA
I_{EBO}	Emitter Cut-off Current	$V_{EB}=5\text{V}, I_C=0$			100	nA
h_{FE1}	DC Current Gain	$V_{CE}=1\text{V}, I_C=100\text{mA}$	100		320	
h_{FE2}		$V_{CE}=6\text{V}, I_C=800\text{mA}$	40			
$V_{CE(sat)}$	Collector-Emitter Saturation Voltage	$I_C=500\text{mA}, I_B=20\text{mA}$			0.4	V
$V_{BE(on)}$	Base-Emitter On Voltage	$V_{CE}=1\text{V}, I_C=10\text{mA}$	0.5		0.8	V
f_T	Current Gain Bandwidth Product	$V_{CE}=5\text{V}, I_C=10\text{mA}$		120		MHz
C_{ob}	Output Capacitance	$V_{CB}=10\text{V}, I_E=0, f=1\text{MHz}$		13		pF

h_{FE} Classification

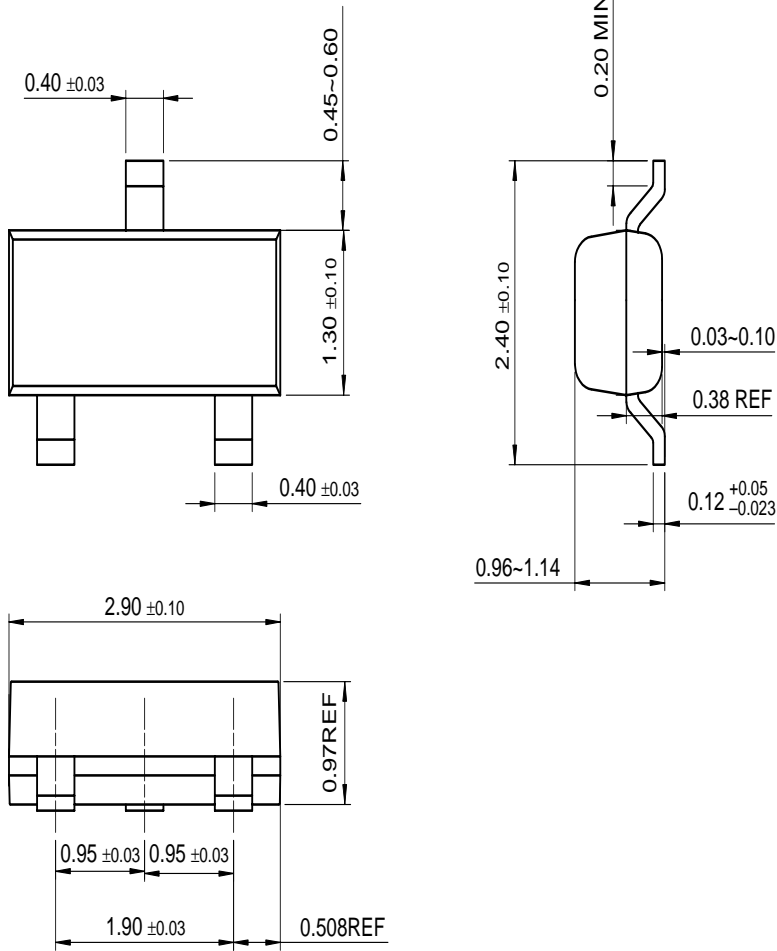
Classification	O	Y
h_{FE}	100 ~ 200	160 ~ 320

Marking



Package Dimensions

SOT-23



Dimensions in Millimeters

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- A critical component is any component of a life support device or system whose failure to perform can be reasonably expected to cause the failure of the life support device or system, or to affect its safety or effectiveness.

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No Identification Needed	Full Production	This datasheet contains final specifications. Fairchild Semiconductor reserves the right to make changes at any time without notice in order to improve design.
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