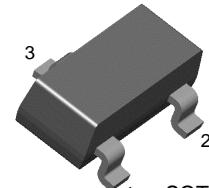


Low Frequency Amplifier

- 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	°C
T_{STG}	Storage Temperature	-55 ~ 150	°C

* Refer to KSD261 for graphs

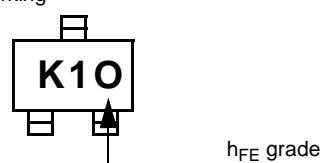
Electrical Characteristics $T_a=25^\circ\text{C}$ unless otherwise noted

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} h_{FE2}	DC Current Gain	$V_{CE}=1\text{V}$, $I_C=100\text{mA}$ $V_{CE}=6\text{V}$, $I_C=800\text{mA}$	100 40		320	
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

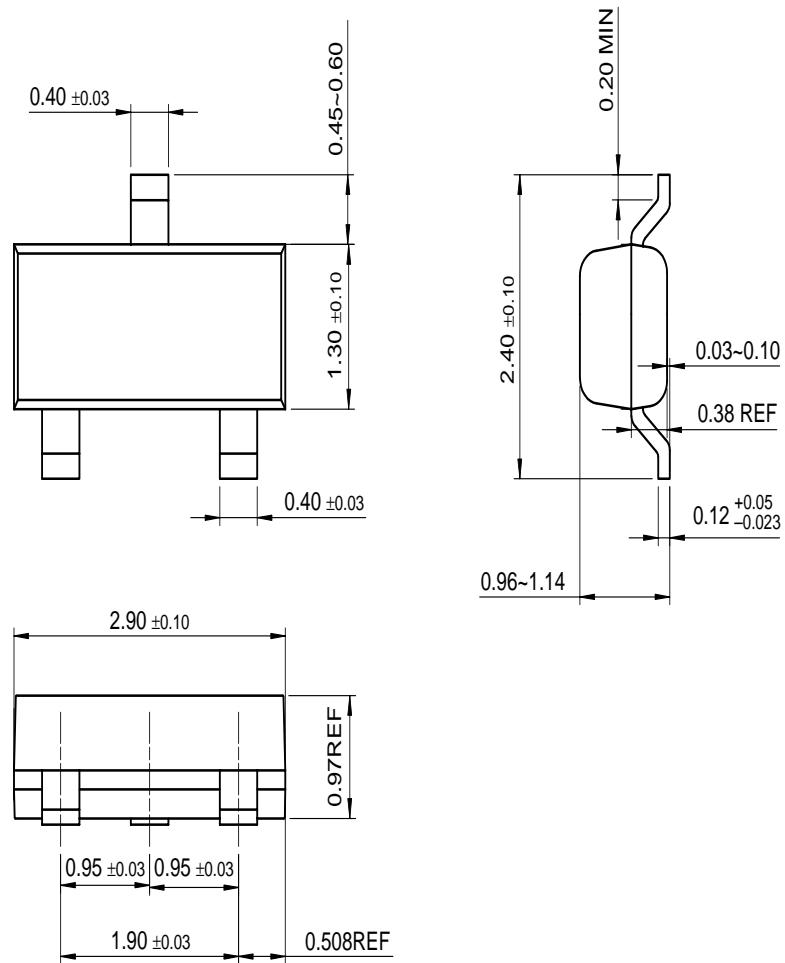
Classification	O	Y
h_{FE}	100 ~ 200	160 ~ 320

Marking



Package Dimensions

SOT-23



Dimensions in Millimeters

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