

SOT-89 Plastic-Encapsulate Transistors

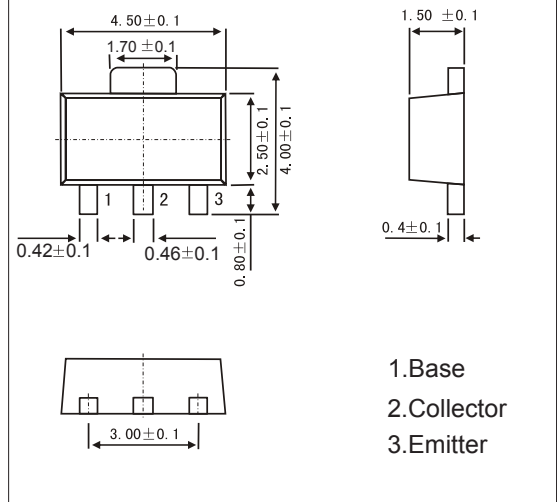
Features

- Small Flat Package
- Audio Muting Application
- High Emitter-Base Voltage
- NPN Transistors

MECHANICAL DATA

- Case style: SOT-89 molded plastic
- Mounting position: any

SOT-89



MAXIMUM RATINGS AND CHARACTERISTICS

@ 25°C Ambient Temperature (unless otherwise noted)

Parameter	Symbol	Rating	Unit
Collector - Base Voltage	V _{CB0}	25	V
Collector - Emitter Voltage	V _{CEO}	20	
Emitter - Base Voltage	V _{EB0}	12	
Collector Current - Continuous	I _C	300	mA
Collector Power Dissipation	P _C	500	mW
Thermal Resistance From Junction To Ambient	R _{θJA}	250	°C/W
Junction Temperature	T _J	150	°C
Storage Temperature Range	T _{stg}	-55 to 150	

PACKAGE INFORMATION

Device	Package	Shipping
KTD1302	SOT-89	1000/Tape&Reel

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Collector- base breakdown voltage	V _{CB0}	I _C = 100 μA, I _E = 0	25			V
Collector- emitter breakdown voltage	V _{CEO}	I _C = 1 mA, I _B = 0	20			
Emitter - base breakdown voltage	V _{EB0}	I _E = 100 μA, I _C = 0	12			
Collector-base cut-off current	I _{CB0}	V _{CB} = 25 V, I _E = 0			0.1	μA
Emitter cut-off current	I _{EB0}	V _{EB} = 12V, I _C =0			0.1	
Collector-emitter saturation voltage	V _{CE(sat)}	I _C =100 mA, I _B =10mA			0.25	V
Base - emitter saturation voltage	V _{BE(sat)}	I _C =100 mA, I _B =10mA			1	
DC current gain	h _{FE}	V _{CE} = 2V, I _C = 4mA (FOR)	200		800	
		V _{CE} = 2V, I _C = 4mA (REV)	20			
Collector output capacitance	C _{ob}	V _{CB} = 10V, I _E = 0, f=1MHz		10		pF
Transition frequency	f _T	V _{CE} = 10V, I _C = 1mA, f=100MHz		60		MHz

Marking

Marking	1302
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