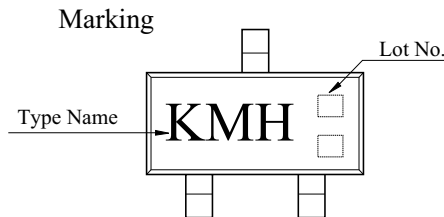
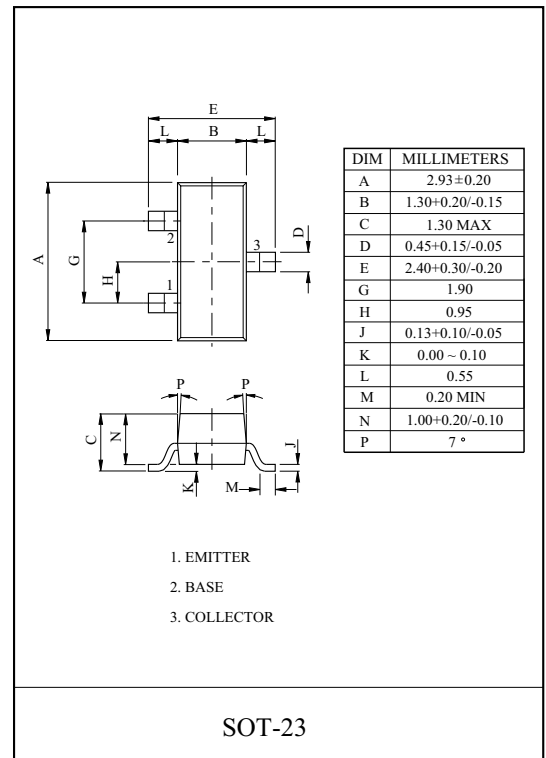


HIGH VOLTAGE APPLICATION.

MAXIMUM RATING (Ta=25 °C)

CHARACTERISTIC	SYMBOL	RATING	UNIT
Collector-Base Voltage	$V_{CBO}$	-120	V
Collector-Emitter Voltage	$V_{CEO}$	-100	V
Emitter-Base Voltage	$V_{EBO}$	-5	V
Collector Current	DC	$I_C$	-1
	Pulse *	$I_{CP}$	-2
Base Current	$I_B$	-200	mA
Collector Power Dissipation	$P_C$	150	mW
Junction Temperature	$T_j$	150	°C
Storage Temperature Range	$T_{stg}$	-55 ~ 150	°C

\* Pulse Width = 300  $\mu$ s, Duty Cycle  $\leq$ 2%.



ELECTRICAL CHARACTERISTICS (Ta=25 °C)

CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Collector-Base Breakdown Voltage	$V_{(BR)CBO}$	$I_C = -100 \mu A$	-120	-	-	V
Collector-Emitter Breakdown Voltage	$V_{(BR)CEO}$	$I_C = -10 mA$	-100	-	-	V
Emitter-Base Breakdown Voltage	$V_{(BR)EBO}$	$I_E = -100 \mu A$	-5	-	-	V
Collector Cut-Off Current	$I_{CBO}$	$V_{CB} = -100V$	-	-	-100	nA
Emitter Cut-Off Current	$I_{EBO}$	$V_{EB} = -4V$	-	-	-100	nA
Collector-Emitter Cut-Off Current	$I_{CES}$	$V_{CES} = -100V$	-	-	-100	nA
Collector-Emitter Saturation Voltage **	$V_{CE(sat)}(1)$	$I_C = -250 mA, I_B = -25 mA$	-	-	-0.2	V
	$V_{CE(sat)}(2)$	$I_C = -500 mA, I_B = -50 mA$	-	-	-0.3	V
Base-Emitter Saturation Voltage **	$V_{BE(sat)}$	$I_C = -500 mA, I_B = -50 mA$	-	-	-1.1	V
Base-Emitter Voltag	$V_{BE}$	$V_{CE} = -5V, I_C = -1 mA$	-	-	-1.0	V
DC Current Gain **	$h_{FE}(1)$	$V_{CE} = -5V, I_C = -1 mA$	100	-	-	
	$h_{FE}(2)$	$V_{CE} = -5V, I_C = -250 mA$	100	-	-	
	$h_{FE}(3)$	$V_{CE} = -5V, I_C = -500 mA$	100	-	300	
	$h_{FE}(4)$	$V_{CE} = -5V, I_C = -1 A$	50	-	-	
Transition Frequency	$f_T$	$V_{CE} = -10V, I_C = -50 mA, f = 100 MHz$	50	-	-	MHz
Collector Output Capacitance	$C_{ob}$	$V_{CB} = -10V, f = 1 MHz$	-	-	5	pF

\*\* Pulse Width = 300  $\mu$ s, Duty Cycle  $\leq$ 2%.

# KTA1520S

