



Shantou Huashan Electronic Devices Co.,Ltd.

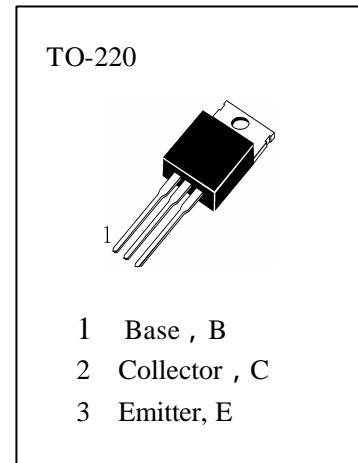
NPN SILICON TRANSISTOR

KSH13007

HIGH VOLTAGE SWITCH MODE APPLICATION

ABSOLUTE MAXIMUM RATINGS ($T_a=25^\circ C$)

T_{stg}	Storage Temperature.....	-55~150
T_j	Junction Temperature.....	150
P_C	Collector Dissipation ($T_c=25^\circ C$)	80W
V_{CBO}	Collector-Base Voltage.....	700V
V_{CEO}	Collector-Emitter Voltage.....	400V
V_{EBO}	Emitter-Base Voltage.....	9V
I_C	Collector Current (DC)	8A
I_C	Collector Current (Pulse)	16A
I_B	Base Current.....	4A



电参数 ($T_a=25^\circ C$)

Symbol	Characteristics	Min	Typ	Max	Unit	Test Conditions
BV_{CEO}	Collector-Emitter Sustaining Voltage	400			V	$I_C=10mA, I_B=0$
I_{EBO}	Emitter-Base Cutoff Current			1	mA	$V_{EB}=9V, I_C=0$
$HFE(1)$	DC Current Gain	10		40		$V_{CE}=5V, I_C=2A$
$HFE(2)$		5		30		$V_{CE}=5V, I_C=5A$
$V_{CE(sat1)}$	Collector- Emitter Saturation Voltage			1	V	$I_C=2A, I_B=400mA$
$V_{CE(sat2)}$				2	V	$I_C=5A, I_B=1A$
$V_{CE(sat3)}$				3	V	$I_C=8A, I_B=2A$
$V_{BE(sat1)}$	Base- Emitter Saturation Voltage			1.2	V	$I_C=2A, I_B=0.4A$
$V_{BE(sat2)}$				1.6	V	$I_C=5A, I_B=1A$
C_{ob}	Output Capacitance		110		pF	$V_{CB}=10V, f=0.1MHz$
f_T	Current Gain-Bandwidth Product	4				$V_{CE}=10V, I_C=500mA$
t_{on}	Turn On time			1.6	μs	$V_{CC}=125V, I_C=5A$ $I_{B1}=I_{B2}=1A$
t_{STG}	Storage Time			3	μs	
t_f	Fall Time			0.7	μs	

hFE Classification

H1

H2

H3

H4

H5

10—16

14—21

19—26

24—31

29—40