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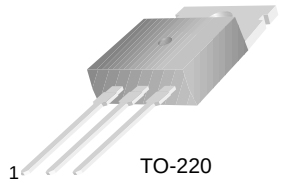
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KSA940

Vertical Deflection Output Power Amplifier

- Complement to KSC2073



TO-220

1.Base 2.Collector 3.Emitter

PNP Epitaxial Silicon Transistor

Absolute Maximum Ratings T_C=25°C unless otherwise noted

Symbol	Parameter	Ratings	Units
V_{CBO}	Collector-Base Voltage	- 150	V
V_{CEO}	Collector-Emitter Voltage	- 150	V
V_{EBO}	Emitter-Base Voltage	- 5	V
I_C	Collector Current	- 1.5	A
I_B	Base Current	- 0.5	A
P_C	Collector Dissipation (T_a=25°C)	1.5	W
P_C	Collector Dissipation (T_C=25°C)	25	W
T_J	Junction Temperature	150	°C
T_{STG}	Storage Temperature	- 55 ~ 150	°C

Electrical Characteristics T_C=25°C unless otherwise noted

Symbol	Parameter	Test Condition	Min.	Typ.	Max.	Units
I_{CBO}	Collector Cut-off Current	V_{CB} = - 120V, I_E = 0			- 10	μA
I_{EBO}	Emitter Cut-off Current	V_{EB} = - 5V, I_C = 0			- 10	μA
h_{FE}	DC Current Gain	V_{CE} = - 10V, I_C = - 500mA	40	75	140	
V_{CE} (sat)	Collector-Emitter Saturation Voltage	I_C = - 500mA, I_B = - 50mA			- 1.5	V
V_{BE}(on)	Base-Emitter ON Voltage	V_{CE} = - 10V, I_C = - 500mA	- 0.65	- 0.75	- 0.85	V
f_T	Current Gain Bandwidth Product	V_{CE} = - 10V, I_C = - 500mA		4		MHz
C_{ob}	Output Capacitance	V_{CB} = - 10V, I_E = 0 f = 1MHz		55		pF

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Typical Characteristics

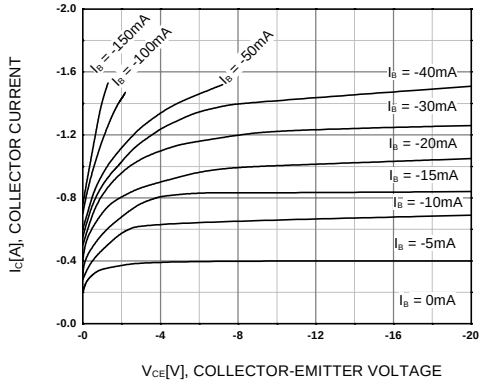


Figure 1. Static Characteristic

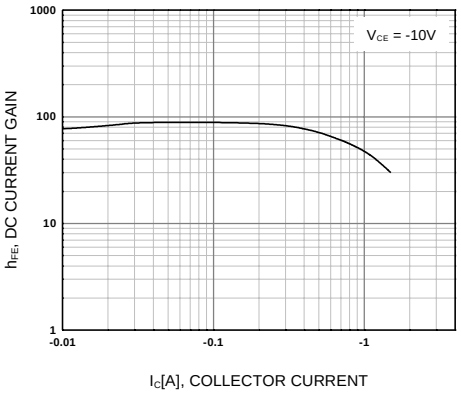


Figure 2. DC current Gain

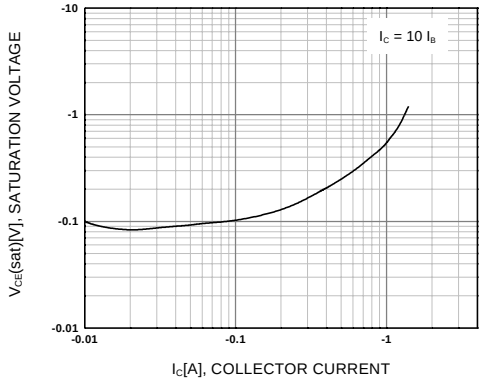


Figure 3. Collector-Emitter Saturation Voltage

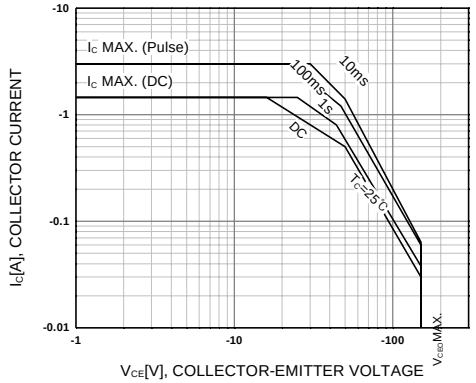


Figure 4. Safe Operating Area

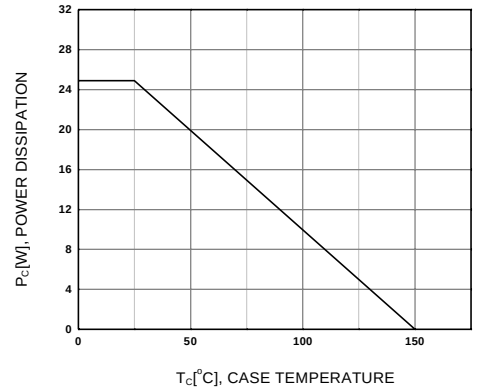
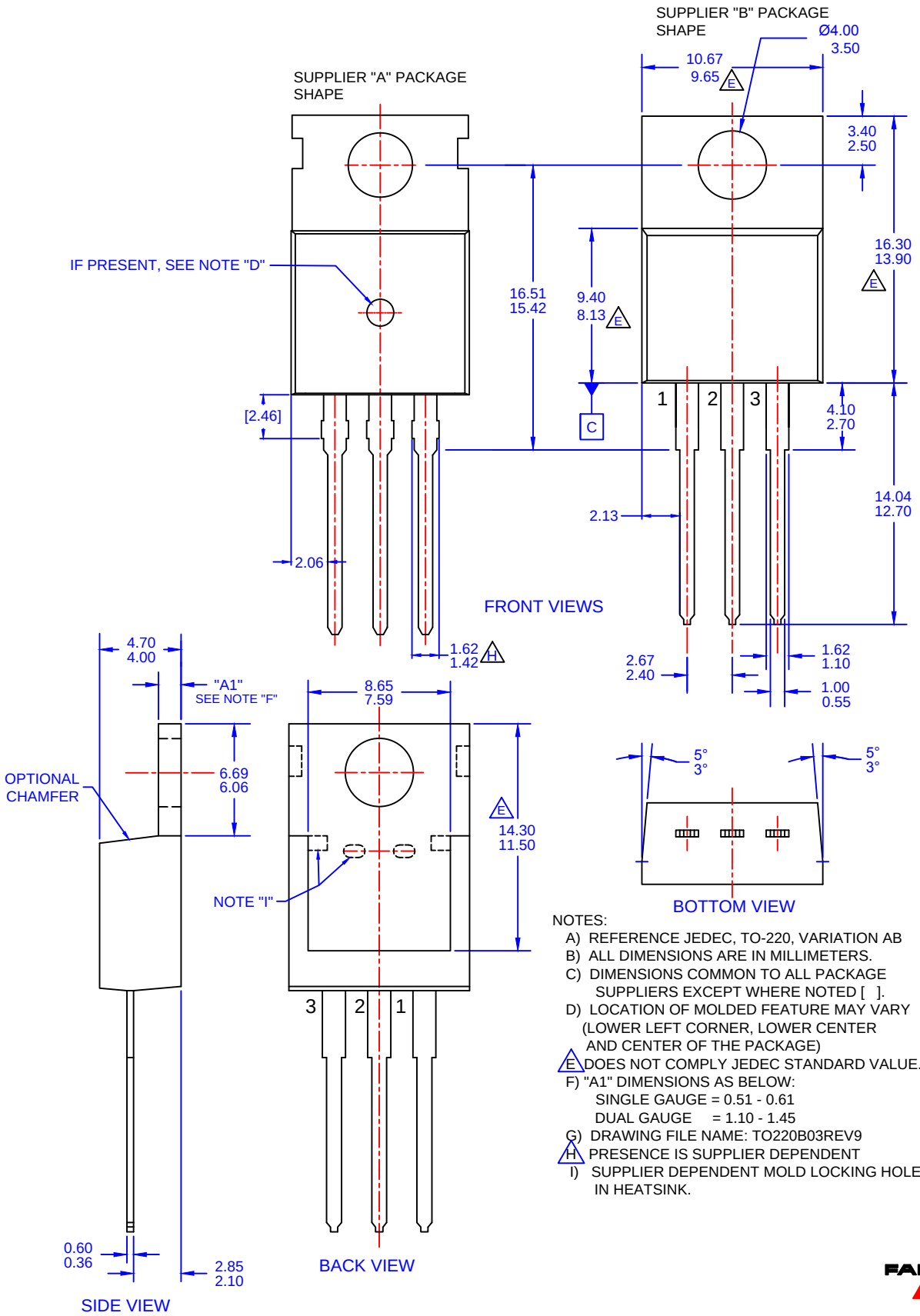


Figure 5. Power Derating

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NOTES:

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B) ALL DIMENSIONS ARE IN MILLIMETERS.
C) DIMENSIONS COMMON TO ALL PACKAGE SUPPLIERS EXCEPT WHERE NOTED [ ].
D) LOCATION OF MOLDED FEATURE MAY VARY (LOWER LEFT CORNER, LOWER CENTER AND CENTER OF THE PACKAGE)
E DOES NOT COMPLY JEDEC STANDARD VALUE.
F) "A1" DIMENSIONS AS BELOW:
SINGLE GAUGE = 0.51 - 0.61
DUAL GAUGE = 1.10 - 1.45
G) DRAWING FILE NAME: TO220B03REV9
H PRESENCE IS SUPPLIER DEPENDENT
I) SUPPLIER DEPENDENT MOLD LOCKING HOLES IN HEATSINK.

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