

FJAF6810A

High Voltage Color Display Horizontal Deflection Output

- High Collector-Base Breakdown Voltage : BV_{CBO} = 1550V
- High Switching Speed : t_F(typ.) =0.1μs
- For Color Monitor



NPN Triple Diffused Planar Silicon Transistor

Absolute Maximum Ratings T_C=25°C unless otherwise noted

Symbol	Parameter	Rating	Units
V _{CBO}	Collector-Base Voltage	1550	V
V _{CEO}	Collector-Emitter Voltage	750	V
V _{EBO}	Emitter-Base Voltage	6	V
I _C	Collector Current (DC)	10	Α
I _{CP} *	Collector Current (Pulse)	20	Α
P _C	Collector Dissipation	60	W
TJ	Junction Temperature	150	°C
T _{STG}	Storage Temperature	-55 ~ 150	°C

^{*} Pulse Test: Pulse Width=5ms, Duty Cycle ≤ 10%

Electrical Characteristics T_C=25°C unless otherwise noted

Symbol	Parameter	Test Conditions	Min	Тур	Max	Units
I _{CES}	Collector Cut-off Current	V _{CB} =1400V, R _{BE} =0			1	mA
I _{CBO}	Collector Cut-off Current	V _{CB} =800V, I _E =0			10	μΑ
I _{EBO}	Emitter Cut-off Current	V _{EB} =4V, I _C =0			1	mA
BV _{EBO}	Base-Emitter Breakdown Voltage	I _E =500μA, I _C =0	6			V
h _{FE1}	DC Current Gain	V _{CE} =5V, I _C =1A	10			
h_{FE2}		V_{CE} =5V, I_{C} =6A	5		8	
V _{CE} (sat)	Collector-Emitter Saturation Voltage	I _C =6A, I _B =1.5A			3	V
V _{BE} (sat)	Base-Emitter Saturation Voltage	I _C =6A, I _B =1.5A			1.5	V
t _{STG} *	Storage Time	V_{CC} =200V, I_{C} =6A, R_{L} =33 Ω			3	μS
t _F *	Fall Time	I _{B1} =1.2A, I _{B2} = - 2.4A			0.2	μS

^{*} Pulse Test: PW=20μs, duty Cycle=1% Pulsed

Thermal Characteristics $T_C=25$ °C unless otherwise noted

Symbol	Parameter	Тур	Max	Units
$R_{\theta jC}$	Thermal Resistance, Junction to Case		2.08	°C/W

Typical Characteristics

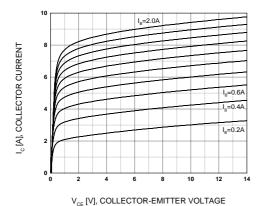


Figure 1. Static Characteristic

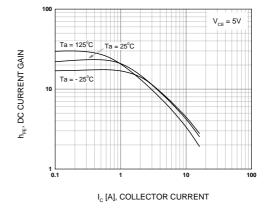


Figure 2. DC current Gain

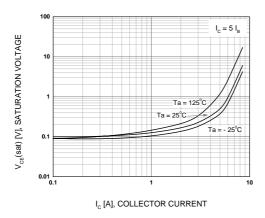


Figure 3. Collector-Emitter Saturation Voltage

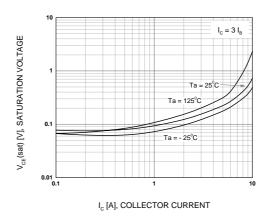


Figure 4. Collector-Emitter Saturation Voltage

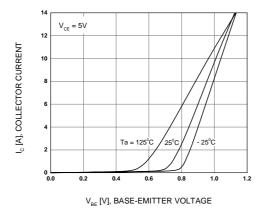


Figure 5. Base-Emitter On Voltage

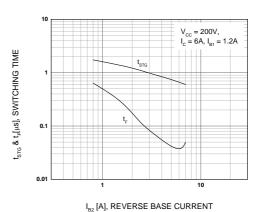


Figure 6. Resistive Load Switching Time

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Typical Characteristics (Continued)

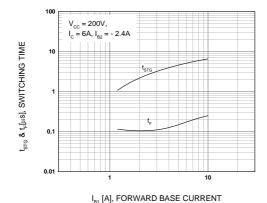


Figure 7. Resistive Load Switching Time

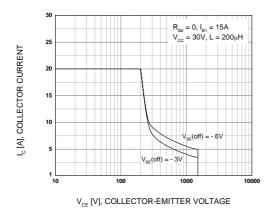


Figure 9. Reverse Bias Safe Operating Area

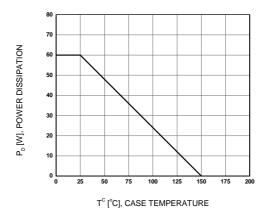


Figure 11. Power Derating

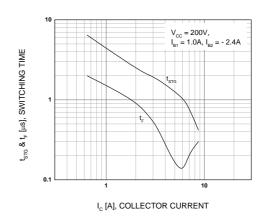


Figure 8. Resistive Load Switching Time

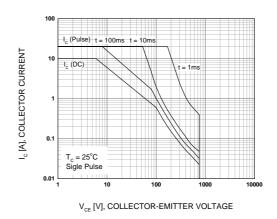
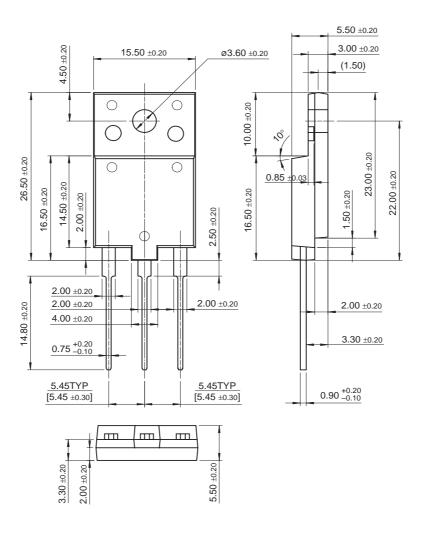


Figure 10. Forward Bias Safe Operating Area

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Package Dimensions

TO-3PF



Dimensions in Millimeters

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