THERMAL DATA

$R_{thj\text{-}case}$	Thermal Resistance Junction-case	Max	1.76	°C/W

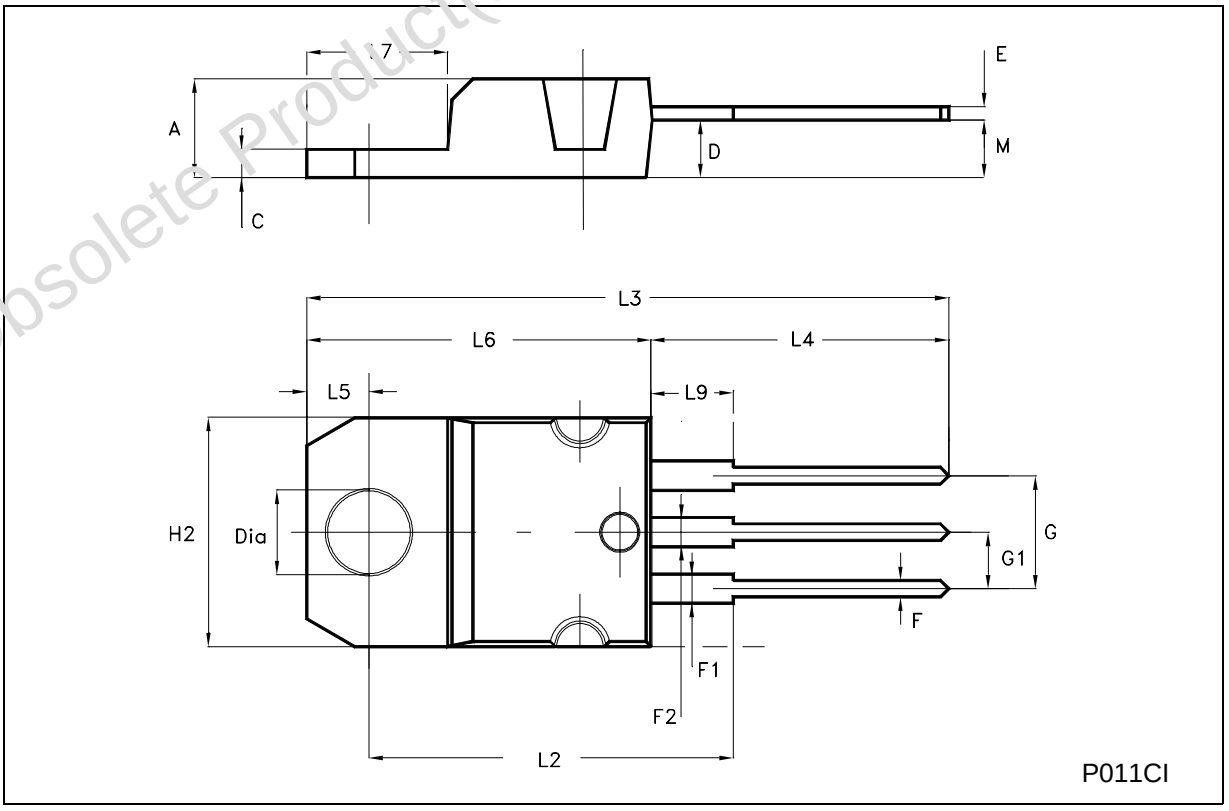
ELECTRICAL CHARACTERISTICS (T_{case} = 25 °C unless otherwise specified)

Symbol	Parameter	Test Conditions	Min.	Typ.	Max.	Unit
I_{CER}	Collector Cut-off Current (R_{BE} = 50Ω)	V_{CE} = 240V T_c = 125°C			3	mA
I_{CEX}	Collector Cut-off Current (V_{BE} = -1.5V)	V_{CE} = 240V T_c = 125°C			1	mA
I_{EBO}	Emitter Cut-off Current (I_C = 0)	V_{EB} = 5 V			1	mA
$V_{CEO(sus)}$*	Collector-Emitter Sustaining Voltage (I_B = 0)	I_C = 0.2 A L = 25mH	120			V
V_{EBO}	Emitter-Base Voltage (I_C = 0)	I_E = 50mA	7		30	V
$V_{CE(sat)}$*	Collector-Emitter Saturation Voltage	I_C = 4A I_B = 0.4A I_C = 8A I_B = 0.8A			0.7 1.5	V V
$V_{BE(sat)}$*	Base-Emitter Saturation Voltage	I_C = 8A I_B = 0.8A			2	V
	RESISTIVE LOAD					
t_{on}	Turn-on Time	V_{CC} = 90V I_C = 8A		0.4	0.8	ms
t_s	Storage Time	V_{BE} = - 6V I_{B1} = 0.8A		0.5	1.2	µs
t_f	Fall Time	R_{BB} = 3.75Ω		0.12	0.25	µs
	INDUCTIVE LOAD					
t_s	Storage time	V_{CC} = 90V I_C = 8A		0.6		µs
t_f	Fall Time	I_{B1} = 0.8A V_{BE} = - 5V L_B = 1µH		0.04		µs
t_s	Storage Time	V_{CC} = 90V I_C = 8 A			2	µs
t_f	Fall Time	I_{B1} = 0.8A V_{BE} = - 5V L_B = 1µH T_c = 125°C			0.15	µs

* Pulsed: Pulse duration = 300µs, duty cycle = 2 %

TO-220 MECHANICAL DATA

DIM.	mm			inch		
	MIN.	TYP.	MAX.	MIN.	TYP.	MAX.
A	4.40		4.60	0.173		0.181
C	1.23		1.32	0.048		0.052
D	2.40		2.72	0.094		0.107
E	0.49		0.70	0.019		0.027
F	0.61		0.88	0.024		0.034
F1	1.14		1.70	0.044		0.067
F2	1.14		1.70	0.044		0.067
G	4.95		5.15	0.194		0.202
G1	2.40		2.70	0.094		0.106
H2	10.00		10.40	0.394		0.409
L2		16.40			0.645	
L4	13.00		14.00	0.511		0.551
L5	2.65		2.95	0.104		0.116
L6	15.25		15.75	0.600		0.620
L7	6.20		6.60	0.244		0.260
L9	3.50		3.93	0.137		0.154
M		2.60			0.102	
DIA.	3.75		3.85	0.147		0.151



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