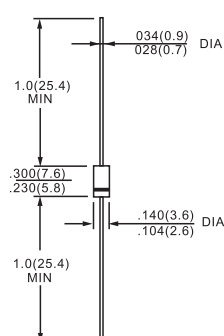


FEATURES

- High efficiency
- Low power losses
- Very low switching losses
- Low reverse current
- High surge capability



MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

ABSOLUTE RATINGS (limiting values)

Symbol	Parameter	Value	Unit
I_{FRM}	Repetitive Peak Forward Current	$t_p \leq 20\mu s$	A
$I_F (AV)$	Average Forward Current *	$T_a = 75^\circ C$ $\delta = 0.5$	A
I_{FSM}	Surge non Repetitive Forward Current	$t_p = 10ms$ Sinusoidal	A
P_{tot}	Power Dissipation *	$T_a = 55^\circ C$	W
T_{stg} T_j	Storage and Junction Temperature Range	- 55 to + 150 - 55 to + 150	$^\circ C$
T_L	Maximum Lead Temperature for Soldering during 10s at 4mm from Case	230	$^\circ C$

Symbol	Parameter	BYT 11-			Unit
		600	800	1000	
V_{RRM}	Repetitive Peak Reverse Voltage	600	800	1000	V

ELECTRICAL CHARACTERISTICS

STATIC CHARACTERISTICS

Symbol	Test Conditions	Min.	Typ.	Max.	Unit
I_R	$T_j = 25^\circ C$ $V_R = V_{RRM}$			20	μA
V_F	$T_j = 25^\circ C$ $I_F = 1A$			1.3	V

RECOVERY CHARACTERISTICS

Symbol	Test Conditions	Min.	Typ.	Max.	Unit
t_{rr}	$T_j = 25^\circ C$ $I_F = 0.5A$ $I_R = 1A$ $I_{rr} = 0.25A$			100	ns

RATINGS AND CHARACTERISTIC CURVES

BYT11-600 THRU BYT11-1000

Figure 1. Maximum average power dissipation versus average forward current.

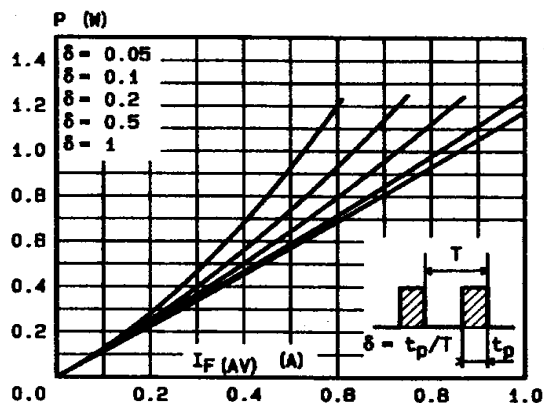


Figure 2. Average forward current versus ambient temperature.

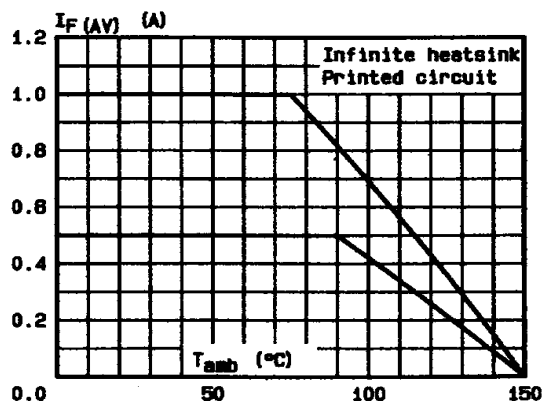


Figure 3. Thermal resistance versus lead length.

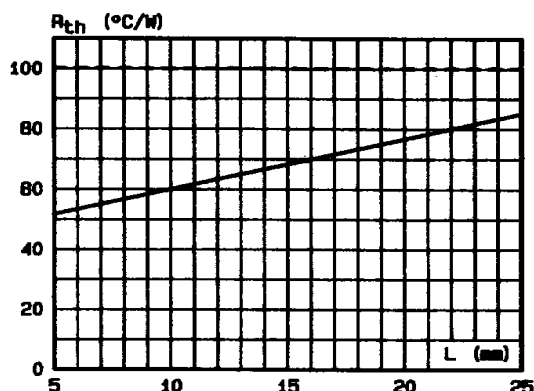


Figure 4. Transient thermal impedance junction-ambient for mounting n°2 versus pulse duration (L = 10 mm).

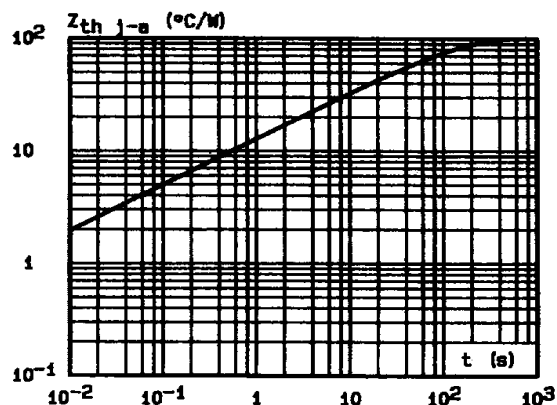


Figure 5. Peak forward current versus peak forward voltage drop (maximum values).

