BYM11-50 - BYM11-1000

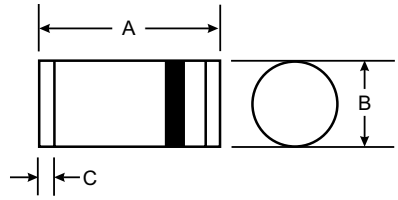
SURFACE MOUNT GLASS PASSIVATED JUNCTION RECTIFIER DIODES

VOLTAGE RANGE: 50 - 1000V
CURRENT: 1.0 A



Features

- Superectifier structure for high reliability condition
- Patented glass-plastic encapsulation technique Ideal for automated placement
- Fast switching for high efficiency
- Low leakage current
- High forward surge capability



LL41/ DO-213AB		
Dim	**Min**	**Max**
A	4.80	5.20
B	2.40	2.60
C	0.55 Nominal	
All Dimensions in mm		

Mechanical Data

- Case: LL41(DO-213AB), Plastic
- Terminals: Solderable per MIL-STD-202, Method 208
- Polarity: Cathode band
- Mounting Position: Any
- Approx Weight: 0.25 grams

RoHS COMPLIANT

Maximum Ratings and Electrical Characteristics

T_A = 25°C unless otherwise specified

Single phase, half wave, 60Hz, resistive or inductive load. For capacitive load, derate current by 20%.

Characteristic	Symbol	BYM 11-50	BYM 11-100	BYM 11-200	BYM 11-400	BYM 11-600	BYM 11-800	BYM 11-1000	Unit
Maximum repetitive peak reverse voltage	V_{RRM}	50	100	200	400	600	800	1000	V
Maximum RMS voltage	V_{RMS}	35	70	140	280	420	560	700	V
Maximum DC blocking voltage	V_{DC}	50	100	200	400	600	800	1000	V
Maximum average forward rectified current at T_T = 55 °C	$I_{F(AV)}$	1.0							A
Peak forward surge current 8.3 ms single half sine-wave superimposed on rated load	I_{FSM}	30							A
Maximum full load reverse current, full cycle average at T_A = 55 °C	$I_{R(AV)}$	50							µA
Operating junction and storage temperature range	T_J, T_{STG}	- 65 to + 175							°C
Maximum instantaneous forward voltage at 1.0 A	V_F	1.3							V
Maximum DC reverse current at rated DC blocking voltage T_A= 25 °C T_A= 125 °C	I_R	5.0 50							µA
Maximum reverse recovery time at I_F = 0.5 A, I_R = 1.0 A, I_{rr} = 0.25 A	$_{rr}t$	150				250	500		ns
Typical junction capacitance at 4.0 V, 1 MHz	C_J	15							pF

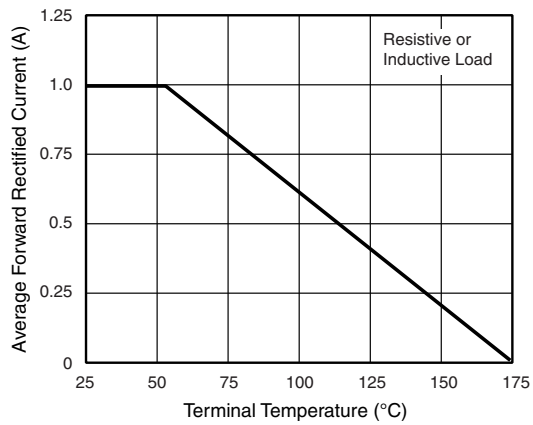


Figure 1. Forward Current Derating Curve

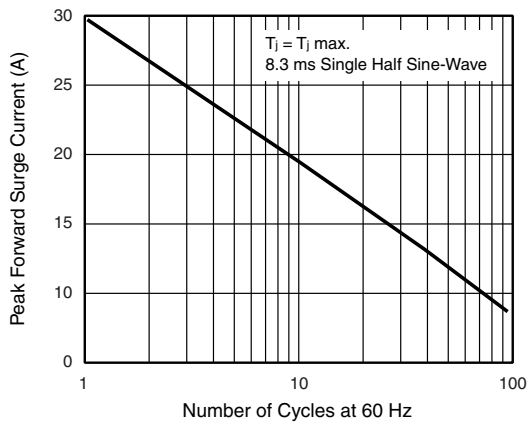


Figure 2. Maximum Non-Repetitive Peak Forward Surge Current

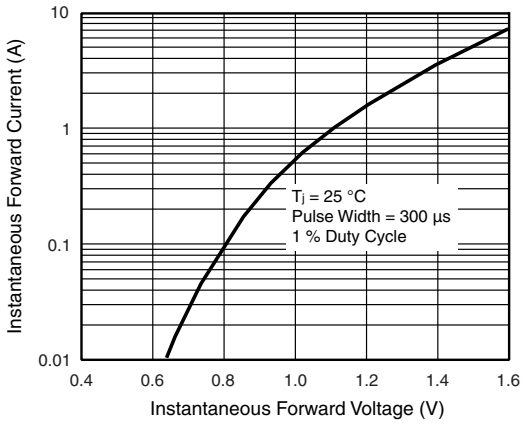


Figure 3. Typical Instantaneous Forward Characteristics

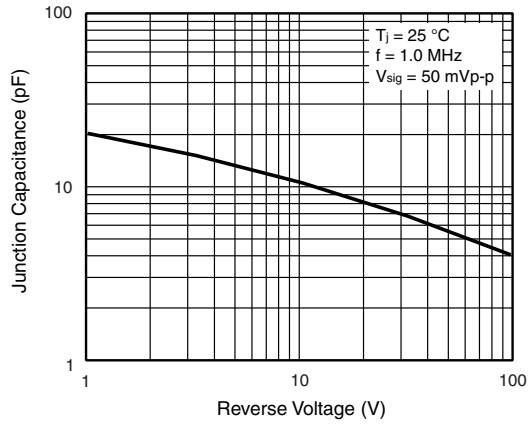


Figure 5. Typical Junction Capacitance

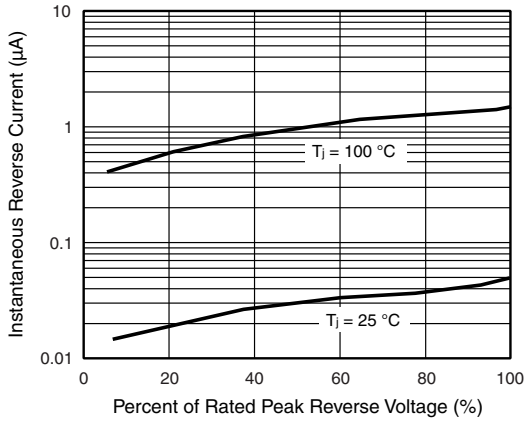


Figure 4. Typical Reverse Characteristics

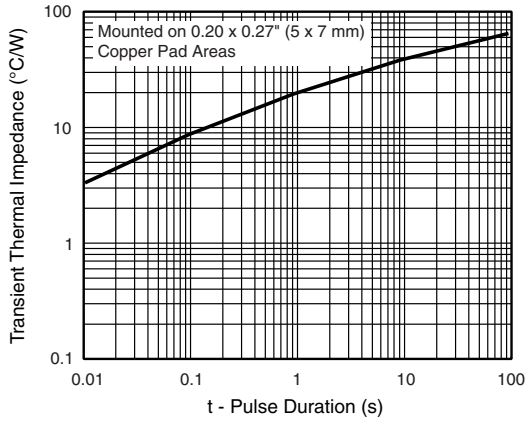


Figure 6. Typical Transient Thermal Impedance