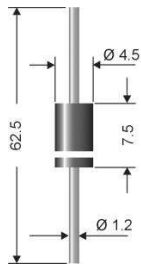


BY 3060



Axial lead diode

Standard silicon rectifier diodes

BY 3060

Forward Current: 3 A

Reverse Voltage: 600 to 600 V

Features

- Max. solder temperature: 260°C
- Plastic material has UL classification 94V-0

Mechanical Data

- Plastic case DO-201
- Weight approx.: 1 g
- Terminals: plated terminals solderable per MIL-STD-750
- Mounting position: any
- Standard packaging: 1700 pieces per ammo

1) Valid, if leads are kept at ambient temperature at a distance of 10 mm from case

2) $I_F = 3 \text{ A}$, $T_j = 25^\circ\text{C}$

3) $T_A = 25^\circ\text{C}$

Type	Repetitive peak reverse voltage	Surge peak reverse voltage	Max. reverse recovery time	Max. forward voltage
BY 3060	V_{RRM} V 600	V_{RSM} V 700	$I_F = - \text{A}$ $I_R = - \text{A}$ $I_{RR} = - \text{A}$ t_{rr} ns -	$V_F^{2)}$ 1,1

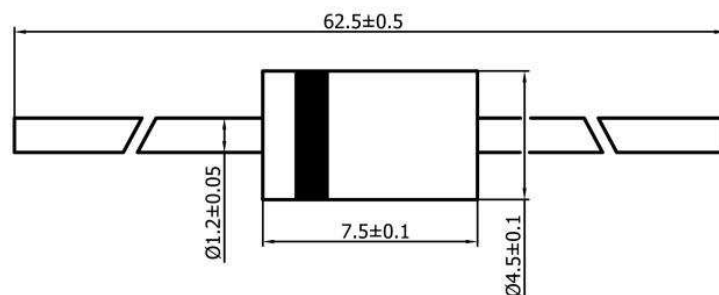
Absolute Maximum Ratings T_c = 25 °C, unless otherwise specified

Symbol	Conditions	Values	Units
I_{FAV}	Max. averaged fwd. current, R-load, $T_A = 50^\circ\text{C}$ ¹⁾	3	A
I_{FRM}	Repetitive peak forward current $f > 15 \text{ Hz}$ ¹⁾	50	A
I_{FSM}	Peak forward surge current 50 Hz half sinus-wave ³⁾	250	A
i^2t	Rating for fusing, $t < 10 \text{ ms}$ ³⁾	310	A ² s
R_{thA}	Max. thermal resistance junction to ambient ¹⁾	25	K/W
R_{thT}	Max. thermal resistance junction to terminals ¹⁾	-	K/W
T_j	Operating junction temperature	-50...+150	°C
T_s	Storage temperature	-50...+175	°C

Characteristics T_c = 25 °C, unless otherwise specified

Symbol	Conditions	Values	Units
I_R	Maximum leakage current, $T_j = 25^\circ\text{C}$; $V_R = V_{RRM}$	<10	µA
	$T_j = ^\circ\text{C}$; $V_R = V_{RRM}$		
C_j	Typical junction capacitance (at MHz and applied reverse voltage of V)	-	pF
Q_{rr}	Reverse recovery charge ($U_R = V$; $I_F = A$; $dI_F/dt = A/ms$)	-	µC
E_{RSM}	Non repetitive peak reverse avalanche energy ($I_R = \text{mA}$; $T_j = ^\circ\text{C}$; inductive load switched off)	-	mJ

Dimensions in mm



case: DO-201

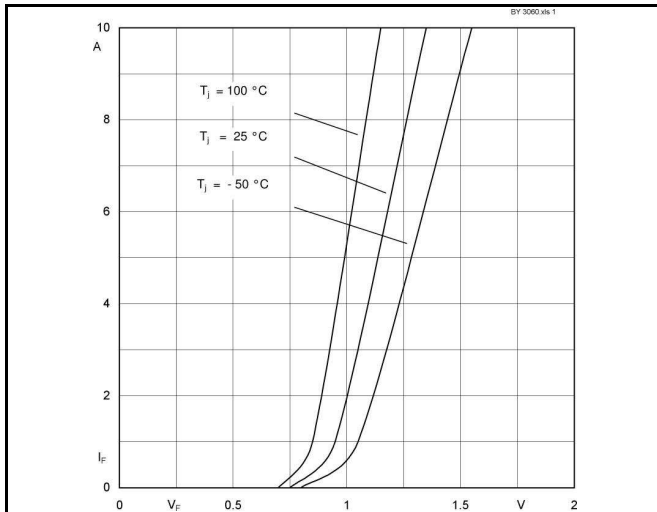


Fig. 1 Forward characteristic (typical values)

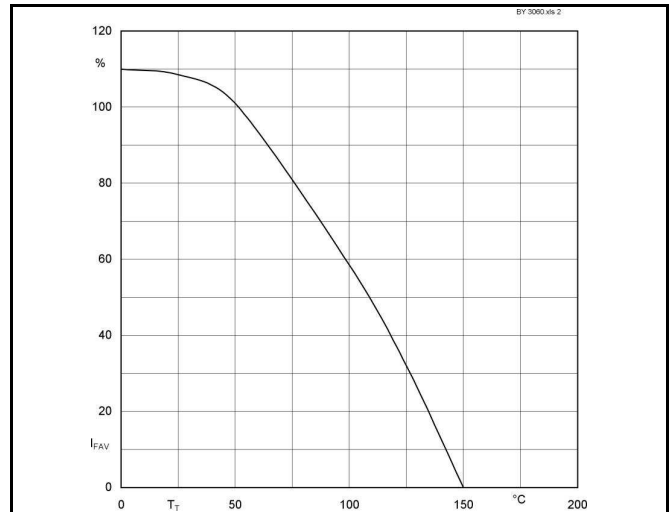


Fig. 2 Rated forward current vs. ambient temperature ¹⁾

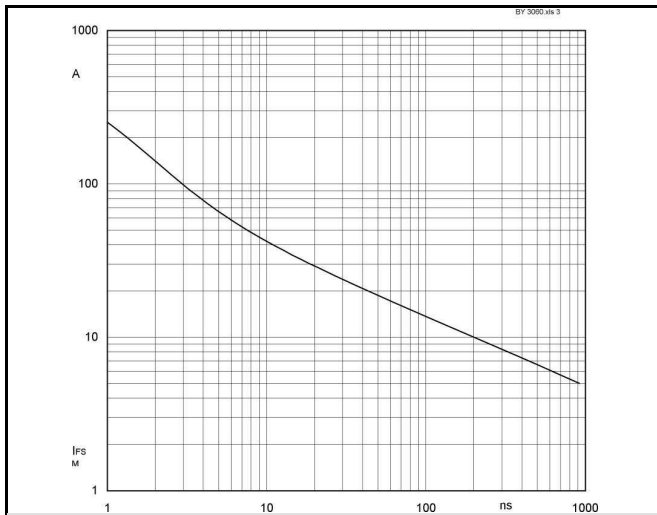


Fig. 3 I_{FSM} current versus number of cycles at 50 Hz