



ELECTRONICS, INC.

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## NTE5309 thru NTE5311 Single Phase Bridge Rectifier 4 Amp

**Features:**

- Diffused Junction
- Low Forward Voltage Drop
- High Current Capability
- High Reliability
- High Surge Current Capability
- Ideal For Printed Circuit Boards

**Maximum Ratings and Electrical Characteristics:** ( $T_A = +25^\circ\text{C}$  unless otherwise specified. Single Phase, Half Wave, 60Hz, Resistive or Inductive Load. For Capacitive Load, Derate Current by 20%)

Peak Repetitive Reverse Voltage, $V_{RRM}$	
NTE5309 .....	200V
NTE5310 .....	600V
NTE5311 .....	1000V
Working Peak Reverse Voltage, $V_{RWM}$	
NTE5309 .....	200V
NTE5310 .....	600V
NTE5311 .....	1000V
DC Blocking Voltage, $V_R$	
NTE5309 .....	200V
NTE5310 .....	600V
NTE5311 .....	1000V
RMS Reverse Voltage, $V_{R(RMS)}$	
NTE5309 .....	140V
NTE5310 .....	420V
NTE5311 .....	700V
Average Rectified Output Current ( $T_C = +75^\circ\text{C}$ ), $I_O$	4A
Non-Repetitive Peak Forward Surge Current, $I_{FSM}$	
(8.3ms Single Half Sine-Wave Superimposed on Rated Load)	150A
Forward Voltage Drop (Per Bridge Element, $I_F = 2A$ ), $V_{FM}$	1.1V
Peak Reverse Current (at Rated DC Blocking Voltage per Element), $I_R$	
$T_C = +25^\circ\text{C}$ .....	10 $\mu$ A
$T_C = +100^\circ\text{C}$ .....	1mA
Rating for Fusing ( $t < 8.3\text{ms}$ , Note 1), $I^2t$	166A <sup>2</sup> s
Typical Thermal Resistance, Junction-to-Case (Note 2), $R_{thJC}$	19K/W
Operating Junction Temperature Range, $T_J$	-65° to +125°C
Storage Temperature Range, $T_{stg}$	-65° to +125°C

