



ELECTRONICS, INC.  
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## NTE541

### Silicon High Voltage Plastic Rectifier Module for Industrial and Microwave Ovens

**Features:**

- Low Leakage
- Isolated Case
- Surge Overload Rating: 50A Peak
- Low Forward Voltage Drop

**Maximum Ratings and Electrical Characteristics:** ( $T_A = +25^\circ\text{C}$  unless otherwise specified.)

Maximum Peak Reverse Voltage ( $I_R = 0.5\mu\text{A}$ ), $V_{RRM}$ .....	12kV
Maximum Peak Working Reverse Voltage ( $I_R = 0.5\mu\text{A}$ ), $V_{RWM}$ .....	12kV
Maximum Non-Repetitive Peak Reverse Voltage ( $I_R = 0.5\mu\text{A}$ ), $V_{RSM}$ .....	13.2kV
Maximum Average Forward Current (50Hz, $T_A = +50^\circ\text{C}$ ), $I_O$ .....	1.0A
Peak Forward Surge Current (50Hz, 0.01S), $I_{FM(\text{Surge})}$ .....	50A
Maximum Reverse Breakdown Voltage ( $I_F = 1.0\text{A}$ ), $V_F$ .....	18V
Maximum DC Reverse Current (at Rated Blocking Voltage), $I_R$	
$T_A = +25^\circ\text{C}$ .....	5 $\mu\text{A}$
$T_A = +80^\circ\text{C}$ .....	50 $\mu\text{A}$
Maximum Junction Temperature, $T_J$ .....	+120 $^\circ\text{C}$
Storage Temperature Range, $T_{stg}$ .....	-40 $^\circ$ to +120 $^\circ\text{C}$

