



ELECTRONICS, INC.  
 44 FARRAND STREET  
 BLOOMFIELD, NJ 07003  
 (973) 748-5089  
<http://www.nteinc.com>



## NTE2679 Silicon NPN Transistor Power, High Voltage w/Built-In Damper Diode TO-220Full Pack

**Features:**

- High Breakdown Voltage:  $V_{CBO} = 1500V$  Min
- Wide Area of Safe Operation
- Built-In Damper Diode

**Applications:**

- Horizontal Deflection Output for TV or CRT Monitor

**Absolute Maximum Ratings:** ( $T_A = +25^\circ C$  unless otherwise specified)

Collector-Base Voltage, $V_{CBO}$ .....	1500V
Collector-Emitter Voltage, $V_{CEO}$ .....	1500V
Emitter-Base Voltage, $V_{EBO}$ .....	5V
Collector Current, $I_C$	
Continuous .....	6A
Peak .....	9A
Continuous Base Current, $I_B$ .....	3A
Collector Power Dissipation, $P_C$	
$T_A = +25^\circ C$ .....	2W
$T_C = +25^\circ C$ .....	30W
Operating Junction Temperature, $T_J$ .....	$+150^\circ C$
Storage Temperature Range, $T_{stg}$ .....	$-55^\circ$ to $+150^\circ C$

**Electrical Characteristics:** ( $T_C = +25^\circ C$  unless otherwise specified)

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Emitter-Base Breakdown Voltage	$V_{(BR)EBO}$	$I_E = 500mA, I_C = 0$	5	-	-	V
Collector-Emitter Saturation Voltage	$V_{CE(sat)}$	$I_C = 3A, I_B = 750mA$	-	-	2.5	V
Base-Emitter Saturation Voltage	$V_{BE(sat)}$	$I_C = 3A, I_B = 750mA$	-	-	1.5	V
Collector Cutoff Current	$I_{CBO}$	$V_{CB} = 1000V, I_E = 0$	-	-	50	$\mu A$
		$V_{CB} = 1500V, I_E = 0$	-	-	1.0	mA
DC Current Gain	$h_{FE}$	$I_C = 3A, V_{CE} = 5V$	5	-	12	
Collector-Emitter Diode Forward Voltage	$V_{ECF}$	$I_F = 3A$	-	-	2.0	V
Current Gain Bandwidth Product	$f_T$	$I_C = 100mA, V_{CE} = 10V, f = 0.5MHz$	-	3	-	MHz
Storage Time	$t_{stg}$	Resistive Load	-	-	5.0	$\mu s$
Fall Time	$t_f$	$I_C = 3A, I_{B1} = 750mA, I_{B2} = -1.5A$	-	-	0.5	$\mu s$

