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## NTE1362 Integrated Circuit Audio Power Amp, 5.5W

### **Features:**

- Low Number of External Components (4)
- Power Output: 5.5W Typ.
- Voltage Gain: 54dB Typ.

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

Supply Voltage, $V_{CC}$ .....	18V
Peak Supply Voltage ( $t \leq 0.2\text{sec}$ ), $V_{cc(\text{peak})}$ .....	40V <sub>p-o</sub>
Circuit Current, $I_{CC}$ .....	4.5A
Power Dissipation (with infinite heatsink), $P_D$ .....	31W
Junction Temperature, $T_c$ .....	+150°C
Derating (with infinite heatsink, $T_A \geq 25^\circ\text{C}$ ), $K_\theta$ .....	250mW/°C
Operating Temperature, $T_{opr}$ .....	-20° to +75°C
Storage Temperature Range, $T_{stg}$ .....	-40° to +150°C

### **Electrical Characteristics:** ( $T_A = +25^\circ\text{C}$ , $V_{CC} = 13.2\text{V}$ , $R_L = 4\Omega$ unless otherwise specified)

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Quiescent Circuit Current	$I_{CCQ}$	Quiescent	-	45	100	mA
Voltage Gain	$G_V$	$P_O = 1\text{W}$ , $f = 1\text{kHz}$	50	53.5	55	dB
Total Harmonic Distortion	THD		-	0.4	1.5	%
Maximum Output Power	$P_{Omax}$	$f = 1\text{kHz}$ , THD = 10%	4.8	5.5	-	W
Output Noise Level	$N_O$	$BW = 20\text{Hz}$ to $20\text{kHz}$ , $R_g = 10\text{k}\Omega$	-	1	2.5	$\text{mV}_{\text{rms}}$
Input Resistance	$R_{IN}$	$P_O = 1\text{W}$ , $f = 1\text{kHz}$	20	45	-	$\text{k}\Omega$

### Pin Connection Diagram

