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## NTE1817 Integrated Circuit Module, AF PO, 20W, Dual Power Supply

### **Features:**

- Muting Circuit to Cut Off Pop Noise

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

Maximum Supply Voltage, $V_{CC\max}$ .....	$\pm 34.5\text{V}$
Junction Temperature, $T_J$ .....	$+150^\circ\text{C}$
Operating Case Temperature, $T_C$ .....	$+125^\circ\text{C}$
Storage Temperature Range, $T_{stg}$ .....	$-30^\circ \text{ to } +125^\circ\text{C}$
Thermal Resistance, Junction-to-Case, $R_{thJC}$ .....	$2.6^\circ\text{C/W}$
Available Time for Load Shorted ( $V_{CC} = \pm 23\text{V}$ , $R_L = 8\Omega$ , $f = 50\text{Hz}$ , $P_O = 20\text{W}$ ), $t_s$ .....	2sec

### **Recommended Operating Conditions:** ( $T_A = +25^\circ\text{C}$ unless otherwise specified)

Recommended Supply Voltage, $V_{CC}$ .....	$\pm 23\text{V}$
Load Resistance, $R_L$ .....	$8\Omega$

### **Electrical Characteristics:** ( $T_A = +25^\circ\text{C}$ , $V_{CC} = \pm 23\text{V}$ , $R_L = 8\Omega$ (Non-Inductive Load), $R_g = 600\Omega$ , $V_G = 40\text{dB}$ unless otherwise specified)

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Quiescent Current	$I_{CC0}$	$V_{CC} = \pm 28\text{V}$	20	40	100	mA
Output Power	$P_O$	THD = 0.4%, $f = 20\text{Hz}$ to $20\text{kHz}$	20	—	—	W
		$V_{CC} = \pm 20\text{V}$ , THD = 1%, $R_L = 4\Omega$ , $f = 1\text{kHz}$	20	—	—	W
Total Harmonic Distortion	THD	$P_O = 1\text{W}$ , $f = 1\text{kHz}$	—	—	0.3	%
Frequency Response	$f_L, f_H$	$P_O = 1\text{W}$ , $-3\text{dB}$	20 to 50k			Hz
Input Resistance	$r_i$	$P_O = 1\text{W}$ , $f = 1\text{kHz}$	—	55	—	k $\Omega$
Output Noise Voltage	$V_{NO}$	$V_{CC} = \pm 28\text{V}$ , $R_g = 10\text{k}\Omega$	—	—	1.2	mV <sub>ms</sub>
Middle-Point Voltage	$V_N$	$V_{CC} = \pm 28\text{V}$	-70	0	+70	mV

Note 1. For power supply at the time of test, use a constant-voltage power supply unless otherwise specified.

**Pin Connection Diagram**  
(Front View)

18	Input 2
17	NFB 2
16	GND
15	I Bias 2
14	Power GND 2
13	Output 2
12	Bootstrap
11	(+) V <sub>CC</sub>
10	Output 1
9	Power GND 1
8	Mute t Cap
7	Mute Adjust
6	Muting
5	I Bias 1
4	Feedback
3	GND 1
2	NFB 2
1	Input 2

