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# NTE1820
# Integrated Circuit
# Module, Dual AF PO, 30W/Ch, Dual Power Supply

**Features:**
- Contains Emitter Follower Circuit for Upgrading
- Case Temperature +125°C is Guaranteed, Thereby Enabling Great Reduction of Heat Sink
- By Attaching Muting Circuit Externally, Pop Noise at Power ON/OFF can be Rejected

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

Maximum Supply Voltage, $V_{CC}$max . . . . . ±43V
Thermal Resistance, Junction–to–Case, $R_{thJC}$ . . . . . 2.2°C/W
Maximum Junction Temperature, $T_J$ . . . . . +150°C
Operating Case Temperature, $T_C$ . . . . . +125°C
Storage Temperature Range, $T_{stg}$ . . . . . –30° to +125°C
Available Time for Load Shorted ($V_{CC}$ = ±27.5V, $R_L$ = 8Ω, $P_O$ = 30W, f = 50Hz), $t_s$ . . . . . 2sec

**Recommended Operating Conditions:** ($T_A$ = +25°C unless othrwise specified)

Recommended Supply Voltage, $V_{CC}$ . . . . . ±27.5V
Load Resistance, $R_L$ . . . . . 8Ω

**Operating Characteristics:** ($T_A$ = +25°C, $V_{CC}$ = ±27.5V, $R_L$ = 8Ω, $R_g$ = 600Ω, VG = 40dB unless otherwise specified)

| Parameter | Symbol | Test Conditions | Min | Typ | Max | Unit |
|---|---|---|---|---|---|---|
| Quiescent Current | $I_{CCO}$ | $V_{CC}$ = ±34V | 35 | 70 | 120 | mA |
| Output Power | $P_{O(1)}$ | THD = 0.02%, f = 20Hz to 20kHz | 30 | – | – | W |
| | $P_{O(2)}$ | $V_{CC}$ = ±23V, THD = 0.08%, $R_L$ = 4Ω, f = 1kHz | 30 | – | – | W |
| Total Harmonic Distortion | THD | $P_O$ = 1W, f = 20Hz to 20kHz | – | – | 0.02 | % |
| Frequency Response | $f_L$, $f_H$ | $P_O$ = 1W | 10 to 100k | | – | Hz |
| Input Resistance | $r_i$ | $P_O$ = 1W | – | 90k | – | Ω |
| Output Noise Voltage | $V_{NO}$ | $V_{CC}$ = ±34V | – | – | 1.2 | $mV_{rms}$ |
| Midpoint Voltage | $V_N$ | $V_{CC}$ = ±34V | –70 | – | +70 | mV |