



NTE15043 Integrated Circuit Head Amplifier Circuit for 2 Head VCR

Features:

- Built-in Peaking Amplifier Circuit
- Less Noise Voltage Referred to Input: $1\mu\text{V}_{\text{rms}}$

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

Supply Voltage, V_C	6V
Power Dissipation ($T_A = +70^\circ\text{C}$), P_D	130mW
Operating Ambient Temperature, T_{opr}	-20° to $+70^\circ\text{C}$
Storage Temperature Range, T_{stg}	-55° to $+150^\circ\text{C}$

Electrical Characteristics: ($T_A = +25^\circ\text{C}$, $V_{CC} = 5\text{V}$ unless otherwise specified)

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Circuit Current	I_1		10	—	24	mA
Channel I Gain	G_{3-9}	$f = 1\text{MHz}, 0.5\text{mV}_{\text{P-P}}$	52.5	—	62.5	dB
Channel II Gain	G_{5-9}	$f = 1\text{MHz}, 0.5\text{mV}_{\text{P-P}}$	52.5	—	62.5	dB
AGC Output Amplitude	v_{12}	$f = 4\text{MHz}, 0.3\text{mV}_{\text{P-P}}$	154	—	286	$\text{mV}_{\text{P-P}}$
AGC Control Sensitivity	Δv_{20}	$f = 4\text{MHz}, 0.3\text{mV}_{\text{P-P}}$	—	—	3	dB
PG Switch Changeover Sensitivity	S_8	$f = 1\text{MHz}, 0.5\text{mV}_{\text{P-P}}$	—	—	3.5	V
Noise Voltage Referred to Input (I)	V_{ni1}	1MHz BFP	—	—	1	μV_{rms}
Noise Voltage Referred to Input (II)	V_{ni2}	1MHz BFP	—	—	1	μV_{rms}

Note 1. Operating Supply Voltage Range: $V_{CC(\text{opr})} = 4.5$ to 5.5V

Pin Connection Diagram

