μA741E

ELECTRICAL CHARACTERISTICS: $V_S = \pm 15$ V, $T_A = 25°C$ unless otherwise specified.

CHARACTERISTICS (see definitions)		CONDITIONS		MIN	TYP	MAX	UNITS
Input Offset Voltage		$R_S \leq 50\Omega$			0.8	3.0	mV
Average Input Offset Voltage Drift						15	μV/°C
Input Offset Current					3.0	30	nA
Average Input Offset Current Drift						0.5	nA/°C
Input Bias Current					30	80	nA
Power Supply Rejection Ratio		V_S = +10, −20; V_S = +20, −10V, $R_S = 50\Omega$			15	50	μV/V
Output Short Circuit Current				10	25	40	mA
Power Dissipation		$V_S = \pm 20$V			80	150	mW
Input Impedance		$V_S = \pm 20$V		1.0	6.0		MΩ
Large Signal Voltage Gain		$V_S = \pm 20$V, $R_L = 2k\Omega$, $V_{OUT} = \pm 15$V		50			V/mV
Transient Response	Rise Time				0.25	0.8	μs
(Unity Gain)	Overshoot				6.0	20	%
Bandwidth (Note 4)				.437	1.5		MHz
Slew Rate (Unity Gain)		$V_{IN} = \pm 10$V		0.3	0.7		V/μs
The following specifications apply for $0°C \leq T_A \leq 70°C$							
Input Offset Voltage						4.0	mV
Input Offset Current						70	nA
Input Bias Current						210	nA
Common Mode Rejection Ratio		$V_S = \pm 20$V, $V_{IN} = \pm 15$V, $R_S = 50\Omega$		80	95		dB
Adjustment For Input Offset Voltage		$V_S = \pm 20$V		10			mV
Output Short Circuit Current				10		40	mA
Power Dissipation		$V_S = \pm 20$V				150	mW
Input Impedance		$V_S = \pm 20$V		0.5			MΩ
Output Voltage Swing		$V_S = \pm 20$V,	$R_L = 10k\Omega$	±16			V
			$R_L = 2k\Omega$	±15			V
Large Signal Voltage Gain		$V_S = \pm 20$V, $R_L = 2k\Omega$, $V_{OUT} = \pm 15$V		32			V/mV
		$V_S = \pm 5$V, $R_L = 2k\Omega$, $V_{OUT} = \pm 2$ V		10			V/mV

EQUIVALENT CIRCUIT