

Electrical Characteristics

 V_{CC} =+25V, $-V_{EE}$ =-25V, $T_{AMBIENT}$ =25°C, R_{L} =8 Ω , A_{V} =20 (26 dB), f_{o} =1 kHz, unless otherwise specified.

Parameter	Conditions	Typical	Tested Limits	Units
Supply Current	P _{OUT} =0W	70	100	mA
Output Power ⁽¹⁾	THD=1%	25		W
THD ⁽¹⁾	P _{OUT} =20W, f _o =1 kHz	0.015		%
	P _{OUT} =20W, f _o =20 kHz	0.05	0.4	%
	P_{OUT} =20W, R_L =4 Ω , f_o =1 kHz	0.022		%
	P_{OUT} =20W, R_L =4 Ω , f_0 =20 kHz	0.07	0.6	%
Offset Voltage		±1	±15	mV
Input Bias Current		±0.2	±2	μΑ
Input Offset Current		0	±0.5	μΑ
Gain-Bandwidth Product	f _o =20 kHz	5.5		MHz
Open Loop Gain	DC	90		dB
PSRR	V _{CC} , 1 kHz, 1 Vrms	95	52	dB
	V _{EE} , 1 kHz, 1 Vrms	83	52	dB
Max Slew Rate	20W, 8Ω, 70 kHz BW	8		V/µs
Current Limit	V _{OUT} = V _{SUPPLY} −10V	4	3	А
Equivalent Input Noise Voltage	R _S =600Ω, CCIR	3		μVrms

(1) Assumes the use of a heat sink having a thermal resistance of 1°C/W and no insulator with an ambient temperature of 25°C. Because the output limiting circuitry has a negative temperature coefficient, the maximum output power delivered to \dot{a} 4 Ω load may be slightly reduced when the tab temperature exceeds 55°C.

Typical Applications For Single Supply Operation

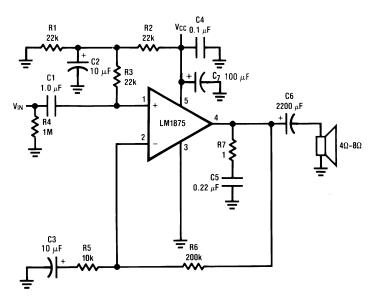


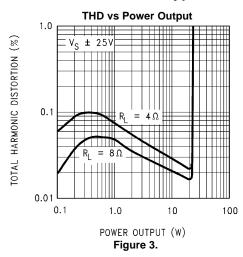
Figure 2.

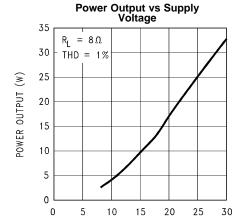
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Product Folder Links: LM1875



Typical Performance Characteristics





SUPPLY VOLTAGE (±V)

Figure 5.

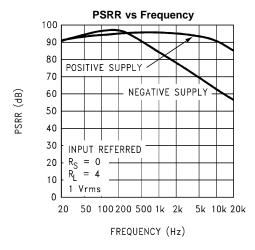


Figure 7.

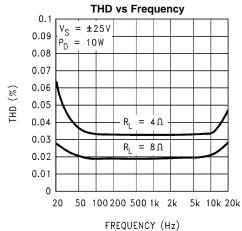
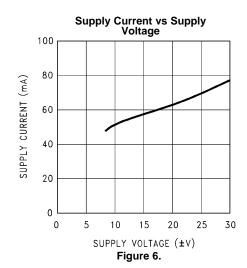
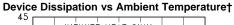
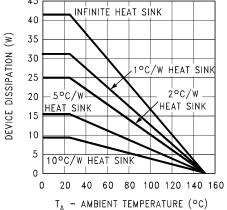


Figure 4.







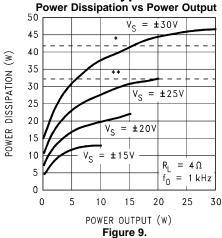
 ϕ INTERFACE = 1°C/W. See Application Hints.

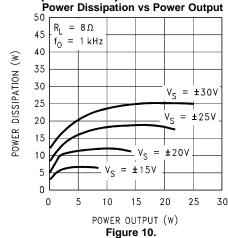
Figure 8.

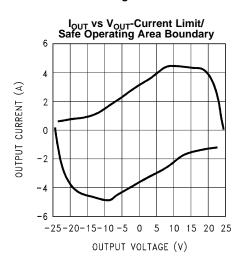
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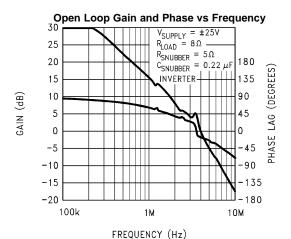


Typical Performance Characteristics (continued)



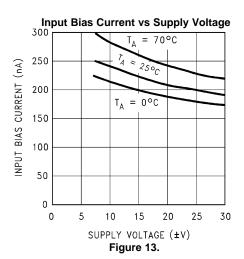






Thermal shutdown with infinite heat sink
Thermal shutdown with 1°C/W heat sink
Figure 12.

Figure 11.



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