

Technical Specifications ICEpower1000ASP

Audio Specifications

Symbol	Parameter	Conditions	Min	Typ	Max	Unit
THD+N	THD+N in 4 \square (AES17 measurement filter)	$f = 1\text{kHz}, P_o = 1\text{W}$	-	0.007	0.015	%
THD+N	Maximum THD+N in 4 \square (AES17 filter)	$10\text{Hz} < f < 20\text{kHz}$ $100\text{mW} < P_o < 1000\text{W}$	-	0.2	0.3	%
V_{NO}	Output referenced idle noise	A-weighted $10\text{Hz} < f < 20\text{kHz}$	65	80	115	\square V
D	Dynamic range	A-weighted	115	119	120	dB
A_v	Nominal Voltage Gain	$f = 1\text{kHz}$	26.7	27.2	27.7	dB
f	Frequency response	20Hz - 20kHz, All loads	-	± 0.5	± 1	dB
f_u	Upper bandwidth limit (-3dB)	$R_L = 8\square$ $R_L = 4\square$	-	38 31	-	kHz
f_l	Lower bandwidth limit (-3dB)	$R_L = 8\square$ $R_L = 4\square$	-	5.3 5.3	-	Hz
Z_o	Abs. output impedance	$f = 1\text{kHz}$	-	5	10	$m\square$
D_f	Damping factor	$f = 100\text{Hz}, R_L = 8\square$	-	2000		
Z_L	Load impedance range		2	4	\square	\square
IMD	Intermodulation (CCIF)	$f = 14\text{kHz}, 15\text{kHz}, P_o = 10\text{W}$	-	0.002	-	%
TIM	Transient intermodulation (TIM)	$f_1 = 3.15\text{kHz}$ square, $f_2 = 15\text{kHz}, P_o = 10\text{W}$	-	0.003	-	%

Power Specifications

Symbol	Parameter	Conditions	Min	Typ	Max	Unit
P_o	Max output power @ 0.1%THD+N, 1kHz (AES17 filter)	$R_L = 4\square$ $R_L = 8\square$	-	1100 600	-	W
V_{p1}	Nominal DC voltage 1	Off-line input within range	-	120	-	V
V_{p2}	Nominal DC voltage 2	Off-line input within range	-	80	-	V
Vcc	Positive analog supply	Off-line input within range	-	12.8	-	V
Vss	Negative analog supply	Off-line input within range	-	-12.8	-	V
t_{Pmax}	Time of maximum rated output power	1000W out. No preheating.	-	15	-	s
P_{FTC}	FTC rated output power 0-3kHz	4 \square , No external heatsink	-	150	-	W
Pq	Quiescent power dissipation	$P_o = 0\text{W}$	-	15.8	-	W
Pstby	Stand-by power dissipation	Amplifier disabled	-	4.1	-	W
\square	Power Efficiency	$P_o = 1000\text{W}, 4\square$ $P_o = 500\text{W}, 8\square$ 230V mains	-	79 82	-	%

