PHONIC

IAMP DSP SERIES

DSP Power Amplifiers

iAMP 3020 DSP

3000 Watt Digital Amplifier

iAMP 4020 DSP

4000 Watt Digital Amplifier



Features

- ▶ Rated Power per channel at 2Ω: 1500 Watts (iAMP3020DSP)
- ▶ Rated Power per channel at 2Ω : 2000 Watts (iAMP4020DSP)
- ▶ Combination XLR and 1/4" inputs
- ▶ Speakon output connectors
- ▶ Signal patch-thru 1/4" jacks on each channel
- ▶ Lightweight design
- ▶ Revolutionary class D topology
- ▶ Internal DSP offering onboard speaker management tools
- ▶ Up to 680 ms delay per channel
- ▶ 31-band graphic equalization on each channel
- ▶ Adjustable Crossover with 4th order HPF and LPF

- ▶ Rated Power per channel at 8Ω : 600 Watts (iAMP3020DSP)
- ▶ Rated Power per channel at 8Ω: 680 Watts (iAMP4020DSP)
- ▶ Variable-speed cooling fans for smooth operation
- Protection circuitry prevents damage from short circuit, overheating, subsonic noise, RF interference and output DC offset
- ▶ Detented front-panel level controls
- ▶ Front-panel LED indicators and LCD display
- ▶ High-responsive switching power supply
- ▶ 2RU-height and shortened back case

Description

Phonic iAMP DSP power amplfilers were designed to provide years of reliable use under the most rigorous of circumstances. The groundbreaking class D topology works with the sturdy yet low-weight construction to create an amplifier strong enough for permanent installations yet light enough for portable sound purposes. An internal DSP offers quality digital processing on all input signals, incorporating a crossover for flexible 2-way operation, adjustable delay for alignment of speakers, adjustable peak limiter for better protection of speakers and circuitry, and graphic equalizers for contouring of your signal. Advanced technology and extensive protection circuitry allow operation with greater efficiency into difficult loads and power conditions.

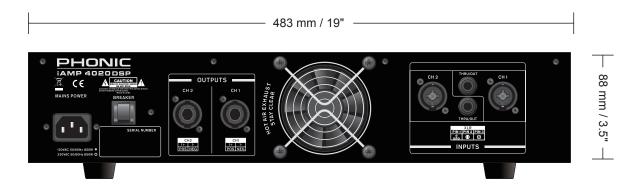
Digital Signal Processor

Phonic's iAMP DSP was designed to be incredibly effective, yet extremely easy to use. Three control buttons are available in total: Set/Enter, ◀ and ▶. Users are able to utilize the DSP's graphic equalizers, crossovers, variable delay and limiter. A number of presets are also available to streamline initial setup. The advanced DSP processor also protects against short circuit, overheating, subsonic noise, RF interference and output DC offset, as well as giving real-time updates on the system temperature.

DELAY MSEC.		Off 	Off 	6EQ311 20 Hz		0 98 CH 5
XOVER X FQ	_	ILPF I.B		Meter Volt		Оит 0.1
LIMIT THR	-	CH + 0	0 9B CH 5	Scene Save	E	SC

Information in this document is subject to change without notice.

DSP Power Amplifiers



Specifications

	iAMP 3020 DSP	iAMP 4020 DSP		
1KHz, 0.5% THD	Continuous Output Per Channel			
Output Power 8 ohms	600W	680W		
Output Power 4 ohms	1000W	1200W		
Output Power 2 ohms	1500W	2000W		
Input Sensitivity	0.775 volts +/- 3% for 1 kHz 4 ohm rated power, 0.68 volts +/- 3% for 1 kHz. 2 ohm rated power			
Input Connector	One Combo Jack (XLR+1/4" TRS) per channel			
Signal Through Out	One 1/4" phone jack per channel			
Frequency Response	10Hz – 50KHz			
Speaker Output	One Speakon connector per channel			
Digital Signal Processor	Crossover, Delay, Limiter, PEQ (all variable)			
GEQ	31-band, ±15 dB			
Crossover	HPF, LPF, 4-Types:	HPF, LPF, 4-Types: -12,-18,-24dB/oct		
Delay	0 ms to 680 ms			
Limiter	OdB to -50dB (Threshold)			
S/N Ratio (20 Hz – 20 KHz)	> 105dB A-Weighted			
THD @ 1 kHz (10% Rated Output)	Less than 0.1%			
Damping Factor (8 ohms)	>225:1 - 1 kHz at 8 ohms			
Slew Rate	> 12V/µs			
Input CMRR	> -76 dB @ 1 kHz			
Protection Circuitry	Multiple Protection designs against DC bias, thermal fault, load mismatch, etc.			
Power Consumption	1500W 2Ω LOAD STEREO	3000W 2Ω LOAD STEREO		
Dimensions (WxHxD)	482 x 89 x 260 mm (19" x 3.5" x 10.2")			
Weight	6.8 kg (14.9 lbs)	<10 kg		