



Uncompromising Performance, Unequaled Versatility

PN/PNX102 series line arrays use advanced technology and application-driven engineering to bring vertical arrays closer to the ultimate reference point (reality) in demanding environments. Fully integrated electroacoustic systems with all elements optimized deliver superior fidelity and coverage. Wherever the venue is appropriate for a high-powered vertical array, a RHAON empowered PN102/LAR, self-powered PN102/LA or externally powered PNX102/LA line array is the logical choice for demanding designers, operators and audiences.

RHAON, the Renkus-Heinz Audio Operations Network, is the first technology to extend the power, adaptability and pristine audio performance of digital networks all the way to the loudspeaker -- and to the listener in front of that loudspeaker. RHAON places total control and supervision on your computer at your fingertips, no matter how far away you are from the loudspeaker.

Applications

- Virtually any application where outstanding sonic performance is required and sound level and coverage needs cannot be satisfied with a conventional horizontal loudspeaker array.
- Portable "touring" sound systems for both small and large concert venues, corporate AV events, etc.
- Sound reinforcement systems in large Houses of Worship, Performing Arts Centers, Sports Arenas, Theaters and other similar venues.



PN-1/PN-1R PowerNet Amplifiers

The PN-1, the heart of the PN102/LA performance and the muscle behind it, is a new kind of intelligent electronics system. It combines Class A/B amplification with comprehensive signal processing into a single lightweight unit. Protection, crossovers and parametric EQ are integrated into the signal path.

RHAON The RHAON Empowered PN-1R adds onboard DSP and CobraNet capabilities. It has dual analog inputs, dual CobraNet inputs and an AES3id serial input. The onboard DSP is easily configured using RHAON software; it includes eight bands of parametric EQ, high and low shelving filters, input level control and up to 20 msec of delay. Critical operating parameters such as signal clipping, amplifier output voltage and current, and temperature are continually monitored with automatic alert functions.

Line Array Systems

PNX102LA

Non-Powered

PN102LA

Powered

PN102LAR

RHAON Empowered

Line Array Systems

PASSIVE • POWERED • NETWORKED
MAXIMUM CONTROL • MAXIMUM CHOICE



- **Heavy Duty Flying Hardware**
Safely flies columns of up to 12 units, provides a wide range of aiming angles.
- **Easy Rigging - Designed to Travel**
Assemble easily, are light in weight (the self-powered PN102/LA and PN102/LAR weigh under 85 Lbs).
- **Flexible Input Configurations**
Choose passive inputs, or go self-powered with either the PN-1 or PN-1R RHAON Empowered amplifier.
- **RHAON Renkus-Heinz Audio Operations Network**
All self-powered PN102/LA R loudspeakers are provided with RHAON for flexible digital signal distribution, loudspeaker management and control.
- **Exclusive Isophasic Plane Wave Generator**
Provides constant beamwidth/directivity down to 300 Hz.
- **Unique Acoustic Diffractor Baffle**
Eliminates mid-frequency narrowing, provides consistent horizontal coverage.
- **Dual 1" Mylar HF Drivers and Dual 10" Woofers**
Provide smooth, low distortion performance from 60 Hz to 18 kHz.

TECHNICAL INFORMATION

Sensitivity:
PN102LA & PN102LAR: 1.4 V for rated power output
PNX102LA: 100 dB (1W/1m)

Max SPL:
PN102LA & PN102LAR: H; 135 dB peak
 L; 132 dB peak

PNX102LA: H; 136 dB peak
 L; 136 dB peak

Dispersion: 150° Horiz.; Vertical disp. determined by array design
Freq. Response: 60 Hz to 18 kHz

MID/HF Drivers: Two 1" SSD1803-8 compression drivers;
 8 Ohms, 50 W RMS, 100 W Pgm each

LF Drivers: Two 10" model SSL10-7 woofers;
 8 Ohms, 200 W RMS; 400 W Pgm each

Crossover: 1.0 kHz

Power:
PN102LA & PN102LAR: 115 V AC or 230 V AC, 50/60 Hz
PNX102LA: Lows – 800 Watts Pgm at 16 Ohms
 Highs – 200 Watts Pgm @ 16 Ohms

Enclosure: Multi-ply hardwood, perforated metal grille

Connectors: **PNX102LA:** Neutrik 4-pin, screw terminals
Finish: Black, white or custom paint
 Natural (unfinished)
 Weather resistant

Hardware Options: RHANG102LA Flybar
 102DOLLY Dolly
 COVER102 Padded cover (4 units)
 PN Weather Resistant Kit

Dimensions: 12" H x 23 3/4" W x 16" D
 (30.5 cm x 60.3 cm x 40.6 cm)

Weight:
PN102LA & PN102LAR: 82 Lbs. (37.2 Kg) net
PNX102LA: 72 Lbs (32.7 Kg) net

PN-1 AMPLIFIER

Power Rating: 300 W RMS @ 8 Ohms
Freq. Response: +0.0, -5 dB, 20 Hz to 20 kHz
THD Distortion: < 0.02% typical
Hum & Noise: <100 dB (A weighted)
Damping: >100
Input: 10K Ohm balanced differential
Sensitivity: 1.0 V for RPO
CMR 74 dB
Controls: Gain (screwdriver adjustable)

Connectors

Input: Looping XLR; female in, male out (pin 1 chassis, pin 2 +, pin 3 -)

Power: EC Power connector

Power: 90-136 VAC or 180-260 VAC 50/60Hz.
 4 A @ 120 V, 2 A @ 240 V
 Idle current: 300 mA @ 120 V;
 150 mA @ 240 V
 Max inrush current: 10 A

PN-1R RHAON EMPOWERED AMPLIFIER

The PN-1R amplifier is identical to the PN-1 except for the addition of the RHAON Network Interface; additional capabilities include:

Inputs: **CobraNet;** dual RJ45 connectors; accept
 CAT 5 copper cable

Analog; Phoenix connectors

Digital Format: 16 or 24 bit PCM; 48 or 96 kHz sample rate; selectable
 Network Latency
Protection: Soft & Peak Limiting, Excursion Control &
 Thermal Regulation

For additional details on the RHAON Audio Operations Network, refer to
www.renkus-heinz.com/Rhaon/Index.html.

Note: All analog inputs and outputs comply with AES Standard 48-2005 on interconnecting, grounding and shielding.

DIMENSIONAL INFORMATION

