

PagePro VIP-204 SIP Based Paging Gateway

INTRODUCTION

The VIP-204 SIP Based Paging Gateway is designed for use with virtually all IP based telephone systems. The unit provides 8 SIP addressable groups and 4 analog I/Os. The VIP-204 can control thousands of IP speakers and/or analog speakers or provide interface to legacy paging systems.

SPECIFICATIONS

Access Methods

- SIP
- Valcom Multicast Page Group

Power Options

- 802.3af, Class 3 Compliant Power over Ethernet
- Optional External Power Supply (VIP-324)

Features

- 4 Analog Audio Inputs
- 4 Analog Audio Outputs
- 4 Programmable Form A Relay Closures
- 4 Programmable Contact Closure Inputs
- RJ-45 for Network Connection
- Provides Audio for Valcom Analog One-Way Self Amplified Speaker Assemblies or 25/70 Volt central amplifiers
- AUX Audio Input via RCA Jack
- Contact Closure or VOX Operation of Audio Input
- Optional Background Music, Music Mutes During a Page
- Output Control Contact Closure Provided During Paging Output



- 2.5mm Jack for optional DC Power (non-POE)
- LED Status Indicator
- Network Activity LEDs
- Optional Feedback Elimination/Page Repeat
- Programmable Night Ring

Dimensions/Weight

- 1 Standard 19" Rack Unit
- 1.75" H x 16.6" W x 9.5" D
(4.57 cm x 42.16 cm x 24.13 cm)
- Weight: 7.25 lbs. (3.28 kg)

Nominal Specifications

AUX Input Impedance:	8 to 600 Ohms
AUX Input Level:	-10dBm nominal
Output Impedance:	50 Ohms
Output Level:	- 10dBm nominal
Relay Current Rating:	1 Amp @ 24VDC

Nominal Power Requirements

Via rear panel barrel connector

Voltage:	24VDC
Current:	325mA

Via 802.3af PoE Ethernet Switch: Class 3

Environment

Temperature:	0 to +40° C
Humidity:	0 to 85% Non-Precipitating

Packing List

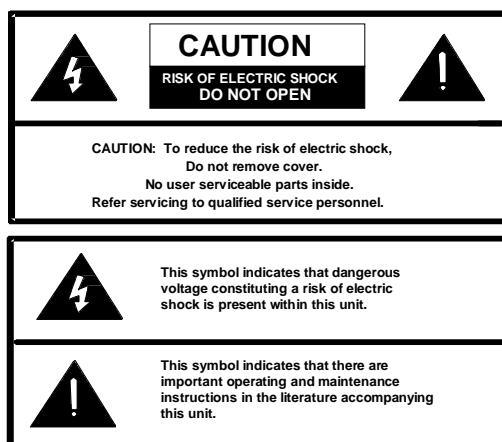
Qty	Item
1	VIP-204
5	RJ-45 Patch Cables
4	RJ-45 Terminal Blocks
4	Rubber Pads
2	Mounting Brackets
8	Mounting Bracket Screws
4	Rack Mount Screws
4	Wall Mount Screws
1	VIP Quick Start Guide
1	VSP Document
1	VIP Set Up CD

INSTALLATION

FCC Information

This equipment has been tested and found to comply with the limits for a Class A digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses and can radiate radio frequency energy and if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area may cause harmful interference in which case the user will be required to correct the interference at their own expense.

Precautionary Designations



Mounting

The VIP-204 SIP Based Paging Gateway is designed for rack, shelf, or wall mounting.

Rack: Attach the brackets to the four holes closest to the front on each side, and then mount the unit to a 19" rack.

Shelf: Provided with the VIP-204 SIP Based Paging Server are four rubber stick-on pads. Peel the pads from their carrier backing and place at the four corners of the bottom of the unit.

Wall: Using the brackets and wood screws provided, secure the VIP-204 SIP Based Paging Server to the wall.

Power Connections

The preferred method of powering a VIP-204 is via a power over Ethernet switch meeting the 802.3af specification.

If the rear panel barrel connector is used for power, the preferred power supply is a Valcom VIP-324.

Make all required signal connections before applying power to the unit.

Network Connection

The VIP-204 has one Category 5 RJ-45 network connector on the front panel.

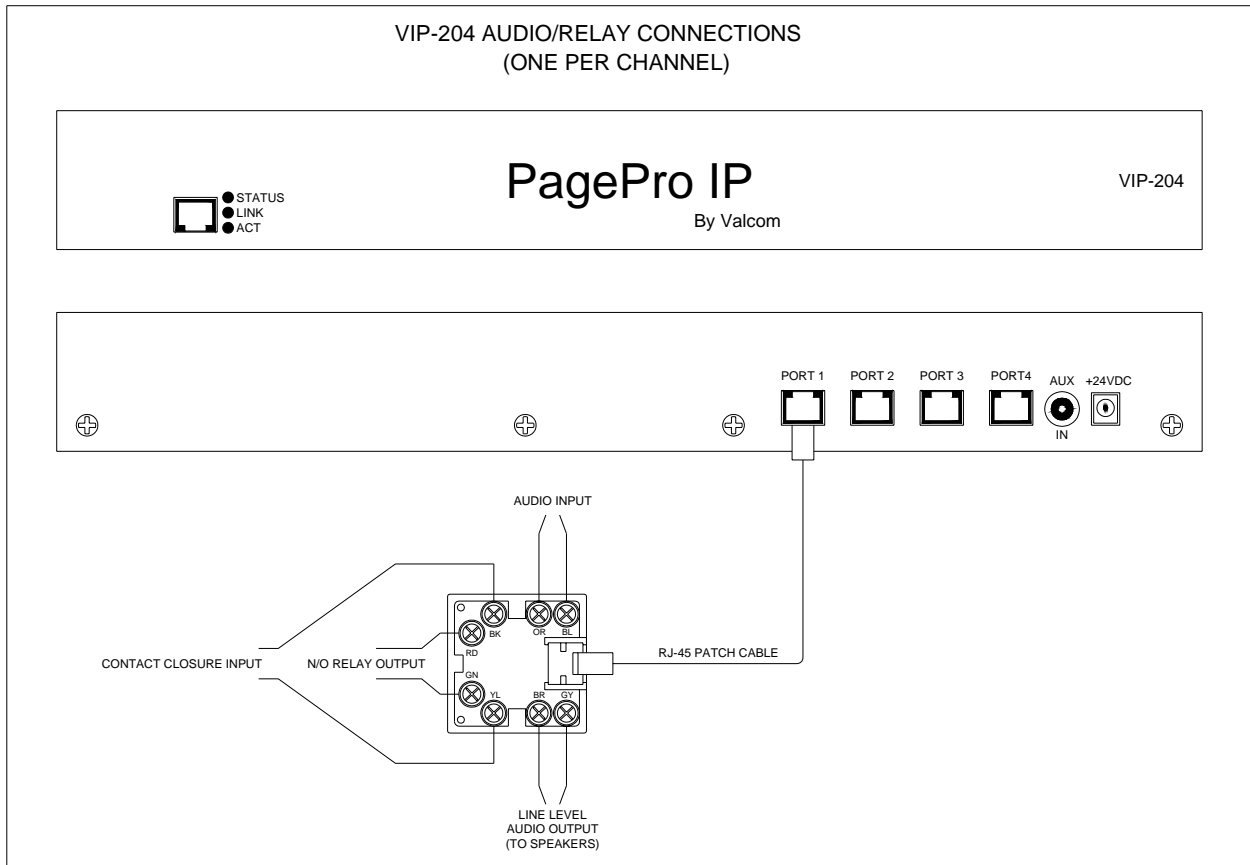
Use one of the supplied Category 5 patch cables to connect the VIP-204 to an Ethernet switch. If the Ethernet switch is 802.3af compliant the VIP-204 will draw power from it.

Signal Connections

The VIP-204 has 5 signal connectors on the rear panel:

- 1 RCA jack for AUX audio input
- 4 RJ-45 connectors for audio and relay connections for each networked channel.

VIP-204 AUDIO/RELAY CONNECTIONS
(ONE PER CHANNEL)



AUX Input: Local audio may be input via the rear panel RCA jack. Nominal input impedance is 600 Ohms. Connect any compatible audio source using an RCA patch cable. Audio supplied through the rear panel RCA jack broadcasts to all Audio Outs whenever they are idle. This is typically used for background music.

Input / Output Connections: Access to the audio input, contact closure input, audio output and relay output for each of the four channels is provided through the four RJ-45 jacks on the rear panel of the VIP-204. Four patch cables and four Telco-style terminal block connectors are included for ease of installation. The following chart shows the pin assignments for the four input/output connections.

Pins	Telco Connector Wire Color	Signal
1,2	Blue & Orange	Audio Input
3,6	Black & Yellow	Contact Closure Input
4,5	Red & Green	N.O. Relay Closure Output
7,8	Brown & Grey	Audio Output

Audio Input: This connection provides input from external line level audio devices, such as PBX page ports. Programmable options in the VIP-204 allow control of the input via voice activation (VOX) or Contact Closure. If programmed to use VOX, the input will remain active while audio is present on the input. If programmed to use Contact Closure, the connection will accept input based on the state of the Contact Closure Input (pins 3 and 6). Any given VIP-204 channel cannot receive audio on their Audio Input and broadcast audio on Audio Output simultaneously.

Contact Closure Input: This connection is used to control the Audio Input on pins 1 and 2. When the VIP-204 is programmed to use Contact Closure control for audio input, the state of this input controls whether the Audio Input connection will accept input. The VIP-204 can be programmed to recognize normally open or normally closed activation closures.

N.O. Relay Closure Output: The Normally Open Relay Closure Output connection can be programmed on the VIP-204 to close the contacts in response to paging events. The relay will return to the open state when the event ends.

Audio Output: Typically connects to Self Amplified Speakers or into an amplifier. Audio feeds connected to the AUX Input mute on any active Audio Output.

Status Indicator Lights

The VIP-204 Network Interface has 3 status indication lights:

STATUS: Flashes during normal operation and solid during system startup.

LINK: Indicates a 100 Mbit Ethernet connection when illuminated. A non-illuminated LINK LED indicates a 10 Mbit connection or no network connection.

ACT: Indicator flashes to indicate network activity.

Operation

Provides paging from SIP connection or from another Valcom VIP unit. Interface to customer telephone system can be via SIP registration, FXO port (with VIP-811), or FXS port (with VIP-821). Unit can also be accessed from a VIP-801 connected to a page port or a Valcom page control.

Setup

Information specific to your application will need to be programmed into the VIP-204. The PC used for programming should be connected to the same subnet as the VIP-204.

Setup will be done using the IP Solutions Setup Tool. The IP Solutions Setup Tool is included on the CD ROM enclosed with the VIP-204.

TECHNICAL ASSISTANCE

Assistance in troubleshooting is available from the factory. Call (540) 563-2000 and press 1 for Technical Support or via email at support@valcom.com.

Valcom equipment is not field repairable. Valcom, Inc. maintains service facilities in Roanoke, VA. Should repairs be necessary, attach a tag to the unit clearly stating your company name, address, phone number, contact person and the nature of the problem. Send the unit to:

VALCOM LIMITED WARRANTY

Valcom, Inc. warrants its products to be free from defects in materials and workmanship under conditions of normal use and service for a period of one year from the date of shipment. The obligation under this warranty shall be limited to the replacement, repair or refund of any such defective device within the warranty period, provided that:

1. inspection by Valcom, Inc. indicates the validity of the claim;
2. the defect is not the result of damage, misuse, or negligence after the original shipment;
3. the product has not been altered in any way or repaired by others and that factory sealed units are unopened (a service charge plus parts and labor will be applied to units defaced or physically damaged);
4. freight charges for the return of products to Valcom are prepaid;
5. all units 'out of warranty' are subject to a service charge. The service charge will cover minor repairs (major repairs will be subject to additional charges for parts and labor).

This warranty is in lieu of and excludes all other warranties, expressed or implied and in no event shall Valcom, Inc. be liable for any anticipated profits, consequential damages, loss of time or other losses incurred by the buyer in connection with the purchase, operation, or use of the product.

This warranty specifically excludes damage incurred in shipment. In the event a product is received in damaged condition, the carrier should be notified immediately. Claims for such damage should be filed with the carrier involved in accordance with the F.O.B. point.