

# PureLink

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## VIP-100 II



Video over IP

### User Manual

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## Contents

What is in the box.....	3
Transmitter kit      Receiver kit .....	3
.....	3
Features .....	3
Overview.....	4
Transmitter.....	4
IP Addressing methods .....	4
Manual (Static) IP Addressing .....	4
DHCP Addressing.....	5
Example: Many Transmitters to One Receiver Setup (Many to Point Distribution).....	6
Typical reference streaming rates.....	7
Remote Control.....	7
Troubleshooting – Point to Many .....	7
Specifications.....	8
Network Switch Requirements .....	9
Pure Assurance Tested Network Switches .....	9
GS108: 8 port unmanaged switch	
<a href="https://www.netgear.com/support/product/GS108?cid=wmt_netgear_organic">https://www.netgear.com/support/product/GS108?cid=wmt_netgear_organic</a> .....	9
JGS524E: 24 port unmanaged switch	
<a href="https://www.netgear.com/support/product/JGS524E.aspx?cid=wmt_netgear_organic">https://www.netgear.com/support/product/JGS524E.aspx?cid=wmt_netgear_organic</a> .....	9
Warranty .....	10

## What is in the box

### Transmitter kit

1x transmitter (VIP100 II TX)  
1x Power Adapter  
1x Infrared Receiver  
Mounting brackets

### Receiver kit

1x transmitter (VIP100 II RX)  
1x Power Adapter  
1x Infrared Emitter  
Mounting brackets  
Remote Control



HDMI Transmitter  
VIP100H II TX



HDMI Receiver  
VIP100H II RX



Remote control for VIP100 II RX

## Features

- Full HDMI 1.3
- HDCP 1.3
- PoE 802.3af for both transmitter and receiver
- 64 transmit channels
- Easy channel setup on transmitters with front panel buttons and LED display
- Easy channel selection on receivers with front panel buttons, IR remote control, and LED readout
- RS232 extensions
- IR extension (receiver to transmitter)

## Overview

The VIP100 II series allows point to point, point to many, many to point, and many to many configurations. You can operate the VIP100 II system easily with the supplied remote control or receiver front panel channel buttons.

## Transmitter

The transmitter provides the following functions:

- HDMI input : accepts HDMI 1.3 video/audio formats
- HDMI Loop out: provides local loop out of HDMI input
- RS232 [3 pin phoenix connector] : Bidirectional RS232 with selectable baud rates
  - 9600
  - 19200
  - 14400
  - 38400
  - 56000
  - 115000
- Infrared Out 1/8" jack: when the transmitter is linked to a receiver, the IR In of the receiver can send infrared commands to the transmitter, for example using a remote control near the linked receiver location to operate a source [e.g. Blu Ray player] at the transmitter location.

## IP Addressing methods

The VIP100 II provides two IP methods, static (manual), and DHCP. The factory default setting of the modules are static.

VIP100 II TX: factory default IP address: 192.168.1.11

VIP100 II RX: factory default IP address: 192.168.1.12

There may be applications where you want to use a network switch that either provides DHCP addressing where the switch assigns all devices an IP address, or manual addressing where you set the IP addresses of the devices.

The VIP100 II series provides three modes of IP addressing.

### Manual (Static) IP Addressing

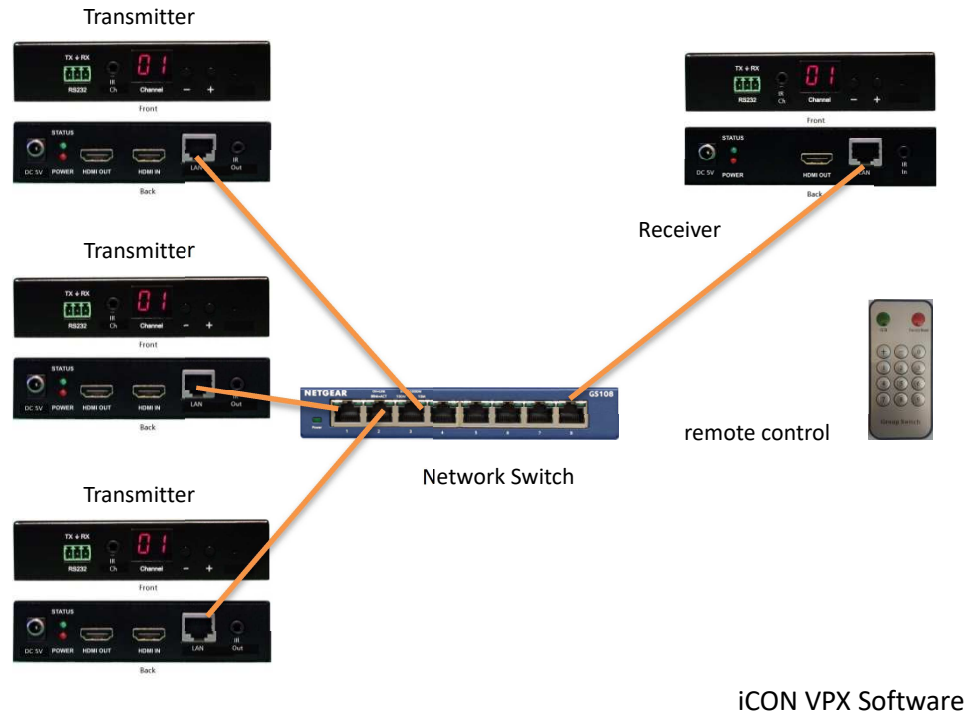
The VIP100 II device IP addresses can be configured manually (static). By connecting to a VIP100 II module with a computer that is set to the same IP family, you can then access their built in web page interface to change the devices to static IP address of IP mode if not already set. These settings are normally done prior to adding on to a network. Please see the ‘Setting Devices for Manual IP Addressing’ in this manual.

### **DHCP Addressing**

The VIP100 II device IP addresses can be configured to accept IP addresses using DHCP. Access the built in web page interface to change the devices to DHCP IP mode.

NOTE: Because transmitters create continuous streaming traffic of video on the network, it is recommended when possible to create your IP video network independent of your data network, or use a managed network switch. Use of gigabit switches with jumbo frame and IGMP support is required and will create the most appropriate scenario for both independent IP video networks, and cases where IP video systems are included within your data network.

## Example: Many Transmitters to One Receiver Setup (Many to Point Distribution)



Example Application – Many to One

*Many to point connection via CAT5e or better cable (CAT6a cable recommended)*

VIP100 II Transmitters and Receivers ship in Static IP mode, which allows them to discover each other with no configuration required. While it is possible to reconfigure the transmitter and receiver to DHCP IP mode, it may not be necessary to make these changes in a many to point configuration, unless you need them to be on a network with other devices, or a network that has a DHCP IP method already employed.

- Connect the transmitter to your network switch
- Connect your receivers to the network switch
- Connect your source to the input of your transmitter
- Connect a display to the output of each receiver
- If desired, connect your confidence monitor to the loop out of the transmitter
- Connect the power adapters for each unit, and apply power. The system will go through a normal boot up sequence that takes approximately ten seconds to display the image.

## Typical reference streaming rates

The VIP100 II transmitter stream rate is 15 Mbps.

## Remote Control

The remote control allows channel switching at the RX (decoder) receiver module, when coupled with an IR extension receiver.

## Troubleshooting – Point to Many

Receiver can't find Transmitter

- Receiver is not set to correct channel for transmitter
- Receiver or Transmitter are not connected via CAT cable or via network switch
- Power to transmitter is off
- Power to network switch is off

Transmitter reports no source (via OSD on Receiver lower left corner)

- Check source is active
- Ensure input cable is plugged in to correct port on transmitter (input vs loop out)
- Confirm cable passes signal and is not damaged
- Check power to transmitter is on

## Specifications

Subject to change without notice

<b>Performance</b>	
Protocol	H.264 encoder over TCP/IP
Support Video format	480i/480p/576i/576p/720p/1080i/1080p@60HZ
Support Audio format	LPCM, Audio sampling rate 48KHZ
Streaming Bit Rate	15Mbps
HDCP	Compliant
IR Frequency	38 -56 KHZ
RS232 Baud rate	Default 2400bps, total 8 kinds optional
<b>IP setting &amp;Group ID setting</b>	
Default IP	TX: 192.168.1.11 ; RX: 192.168.1.12
Group ID	Group 00 ~ group 63
Request for Switch/Router	Support IGMP, support DHCP
<b>Connectors on Transmitter</b>	
Input	1xHDMI Female port
Output	1x RJ45 output , 1x HDMI looping output
RS232	Phoenix RS232 port
IR	IR TX port (Support 38K-56KHz) IR Ext port (Support 38KHz)
<b>Connectors on Receiver</b>	
Input	1xRJ45 input
Output	1x HDMI Female port looping output
RS232	Phoenix RS232 port
IR	IR RX port (Support 38K-56KHz) IR Ext port (Support 38KHz)
<b>Environmental &amp; Power Requirements</b>	
Operating temperature	-5 to +35 °C ( +23 to +95°F )
Operating Humidity Range	5 to 90%RH (No Condensation)
Power supply	DC 5V 1A
Power consumption	Max 3 watt
<b>Physical</b>	
Dimension	TX: 119x79.5x28mm ; RX: 119x79.5x28mm
Net Weight	TX: 0.28KG ; RX:0.28KG

## Network Switch Requirements

While a Point to Point normally is configured with the transmitter and receiver directly connected to each other by CAT cable, it is possible to have point to point over a network switch. The requirements for a network switch are:

- IGMP
- JumboFrame

### Network Switch Recommendations

The VIP100 II modules can operate from 802.3af compliant PoE enabled network switches.

The VIP100 II devices do not require a managed switch to operate. When the VIP devices are specifically on their own independent network switch, an unmanaged switch is sufficient. A managed switch may provide value in an application where the VIP devices reside on a network with other devices that may be impeded due to network traffic created by the VIP video/audio/usb streams.



### Pure Assurance Tested Network Switches

*Subject to change without notice. Please check our website for current updated listing.*

#### PureLink

##### VIP-NET 1G and 10G managed switches

[http://main.purelinkav.com/main/index.php?dispatch=news.view&news\\_id=210](http://main.purelinkav.com/main/index.php?dispatch=news.view&news_id=210)

#### Netgear

##### GS108: 8 port unmanaged switch

[https://www.netgear.com/support/product/GS108?cid=wmt\\_netgear\\_organic](https://www.netgear.com/support/product/GS108?cid=wmt_netgear_organic)

##### JGS524E: 24 port unmanaged switch

[https://www.netgear.com/support/product/JGS524E.aspx?cid=wmt\\_netgear\\_organic](https://www.netgear.com/support/product/JGS524E.aspx?cid=wmt_netgear_organic)

The VIP lines of PureStream IP Video products can be found at the purelinkav.com website

[http://main.purelinkav.com/main/index.php?dispatch=products.view&product\\_id=223](http://main.purelinkav.com/main/index.php?dispatch=products.view&product_id=223)



## Warranty

### PureLink Five (5) Year Limited Warranty for PureStream™ Branded Products Only

Dtrovision, LLC. (hereinafter “PureLink”) warrants its HDTools and PureStream™ branded products (hereinafter “Product”) purchased directly from PureLink or Dealer shall be free from defects in workmanship and materials, under normal use and service, for a period of five (5) years on parts and five (5) years on labor. Any repaired or replaced equipment related to Product shall be covered only under the remaining portion of the warranty. This warranty has no relationship to and exists independently of any warranty offered by Dealer. This warranty is a limited warranty and gives you specific legal rights. You may also have other rights which vary from state to state.

#### TERMS & CONDITIONS

PureLink shall repair or replace the Product if it develops a material fault during the period of warranty, on condition that i) the Product has only been subject to normal use in a domestic or commercial environment in a manner consistent with its specification and functionality, ii) the Product has been cared for reasonably and only subjected to reasonable wear and tear, iii) the defect has not been caused by willful or negligent abuse or neglect, or any accident or improper installation procedure, iv) the serial number of the Product has not been altered or removed. This warranty only applies to the original purchaser, and shall be the exclusive remedy to the original purchaser. PureLink shall not be liable for any damages whatsoever caused by Product or the failure of Product to perform, including incidental or consequential damages. PureLink shall not be liable for any claim made by a third party or made by the purchaser for a third party. Except as expressly set forth in this warranty, PureLink makes no other warranties, expressed or implied, including any implied warranties of merchantability and fitness for a particular purpose. PureLink expressly disclaims all warranties not satisfied in this limited warranty. Any implied warranties that may be imposed by law are limited to the terms of this limited warranty. This warranty statement supersedes all previous warranties.

#### WARRANTY RETURNS/REPAIRS/EXCHANGES

No merchandise may be returned without prior authorization from PureLink, and a Return Materials Authorization (RMA) number. Failure to comply with these conditions will result in rejection of the returned merchandise. Any warranty service on Products must be arranged through Dealer. Authorized returns must be shipped freight prepaid and fully insured to PureLink, Fair Lawn, NJ USA, with the RMA number clearly marked on the outside of all shipping boxes and containers. PureLink reserves the right at its sole discretion to refuse any shipments arriving freight collect or without an RMA number. Any authorized returned merchandise must be accompanied by a note describing the reason for return, along with contact information including name, phone number, return mailing and shipping addresses, e-mail address, and RMA number. On any products returned and accepted with an RMA number, return freight charges following repair of items under warranty shall be paid by PureLink, shipping by the standard ground carrier of its choice.



#### ADVANCE WARRANTY REPLACEMENTS

PureLink's advance replacement service offers a Replacement Unit upon request - free of charge for eligible products purchased less than one (1) year of the warranty claim. Products purchased more than one (1) year prior to the warranty claim do not qualify for advance replacement services. Advance replacement requests must be validated by a member of PureLink's Technical Support Team. Replacement units may be new or refurbished and are subject to availability. PureLink is responsible for shipping the Replacement Unit to your designated location by standard ground service. All other shipping methods will be the responsibility of the Dealer. Original Unit Return – the Original Unit must be returned within thirty (30) calendar days of the return authorization date. Failure to return the Original Unit within this period will be subject to a minimum 15% re-stocking fee. Dealer is solely responsible for the shipping of the Original Unit to PureLink.

#### TO MAKE A WARRANTY CLAIM

To make a warranty claim, promptly notify PureLink within the warranty periods described above by calling PureLink's Technical Support Department at 1-201-488-3232. PureLink, in its sole discretion, will determine what action, if any, is required under this warranty. Most problems can be corrected over the phone through close cooperation between Customer and a PureLink technician. To better enable PureLink to address a warranty claim, please have the Product's serial and model numbers. If PureLink, in its sole discretion, determines that an on-site visit or other remedial action is necessary, PureLink may send a representative to Customer's site.

#### CUSTOMER SERVICE

Technical support inquiries can be submitted electronically through the PureLink website at [www.purelinkav.com](http://www.purelinkav.com). For immediate assistance please contact PureLink's Customer Care Team at +1 (201) 488-3232.

