



## STEP 4: VITALSBRIDGE-DEVICE COMMUNICATION GUIDE

VITALSBRIDGE 300 200 AND 100

## Overview:

- If connecting to a PC the connection options are:
  - USB (RS-232)
  - Bluetooth
  - Ethernet (VB 200 and VB300 Only)
  - Wifi (VB200 and VB300 Only)  
\*Note: The Wifi connection option *cannot* be used for initial set-up. Please select a different connection method the first time.
- If connecting to an Android device the connection options are:
  - Bluetooth

Please select the connection method that best suits your needs.

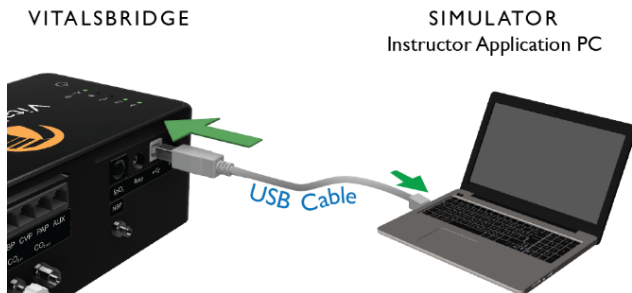
**Note:** only *one* connection is needed. The directions for set-up of each method can be found below.

## Establishing the VitalsBridge-Device Connection

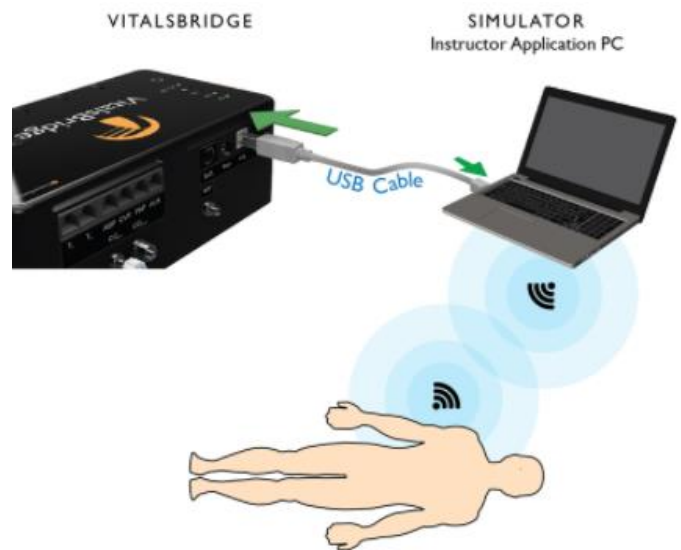
### USB (RS-232)

With the supplied USB cable, connect the VitalsBridge to the Windows-based computer. Windows will automatically install the appropriate drivers for RS-232 communication over USB. It may take a minute or two for the appropriate drivers to be installed. Consider restarting the computer prior to running the VitalsBridge Connector application.

**Note:** USB communication is unavailable on the VitalsBridge Connector for mobile devices.



“Standardized Patient Setup”



“Running the VitalsBridge using a Serial Cable With a patient simulator”

### Bluetooth

Video Link: <https://tinyurl.com/VBBluetoothinstruction>

To communicate with the VitalsBridge over Bluetooth, the VitalsBridge must first be paired with the Windows-based computer or Android mobile device that has the VitalsBridge Connector application. Refer to your computer or mobile device's instructions on how to pair. The VitalsBridge will provide a 6-digit pin, which may need to be confirmed/acknowledged during the pairing process. If this is the case, simply select "confirm" when the appropriate screen appears (the number shown has no significant meaning associated with the VitalsBridge and does not need to be compared to another number). Once paired, the VitalsBridge will be available for connection in the VitalsBridge Connector Application.

**Note:** When first connecting, the name of the device will be a randomly generated name followed by a random string of characters or numbers. The "name" of your VitalsBridge will be unique but may be something like, "Uter-FBB3," "Todd-03E0," or "Wendell-1411." (This can be changed as explained on page 25.)

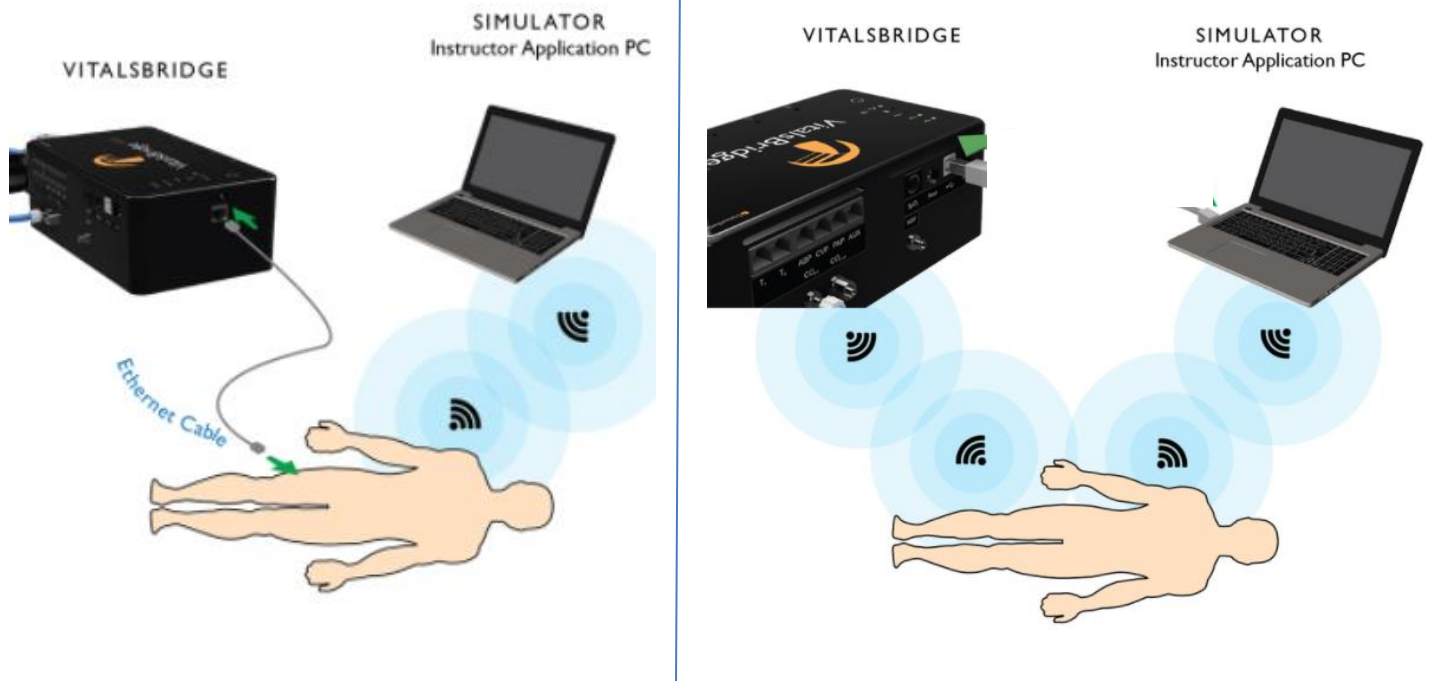
**Note:** You may have difficulties with your Bluetooth connection if it is 1) selected that the VitalsBridge be "forgotten" from by the device connected to and then 2) asked to be re-paired to that same device. To avoid this problem, if it is desired that the VitalsBridge not be connected with a device for a short time, turn off Bluetooth on the device, turn off the VitalsBridge, connect the VitalsBridge to a different device, or connect your device to another Bluetooth device rather than "forgetting" the VitalsBridge.

### Ethernet/Wifi

The VitalsBridge may be connected to a router by an Ethernet cable or by Wifi (2.4 GHz 8.02.11b/g/n). The VitalsBridge Connector software can run on a PC that is on the same network as the VitalsBridge and patient simulator (if applicable).

## VitalsBridge Communication Guide

For details about connecting via these methods, see below.



### Ethernet

When connecting the VitalsBridge to a patient simulator using an Ethernet cable, ensure the cable is functional and is securely connected between the Ethernet ports of the VitalsBridge and the manikin.

**Note:** It is now possible for the VitalsBridge to be directly connected to a Windows PC that controls a patient simulator with an Ethernet cable. The VitalsBridge is assigned one of the link-local addresses in the range 169.254.1.1 - 169.254.254.254. Some additional network configuration may be necessary for this to work.

### Wifi

Wifi communication for the VitalsBridge is possible *only* after it has been configured using the VitalsBridge Connector software. Wifi configuration is completed with a Bluetooth or USB connection to the VitalsBridge. Wifi communication *cannot* be used during the initial set-up.

### Wifi SSID and Password

Video Link: <https://tinyurl.com/VBwifiinstruction>

**Note:** Before completing the process outlined below, you *must* have already 1) downloaded the VitalsBridge Connector Software, 2) successfully established a connection between your PC and the VitalsBridge via USB or Bluetooth, and 3) connected the VitalsBridge to the connector software (for additional information on how to download the software see “VitalsBridge Connector Software Installation Guide”) (for addition information on how to connect the VitalsBridge to the connector software see either of the “Using the VitalsBridge...” instruction guides).

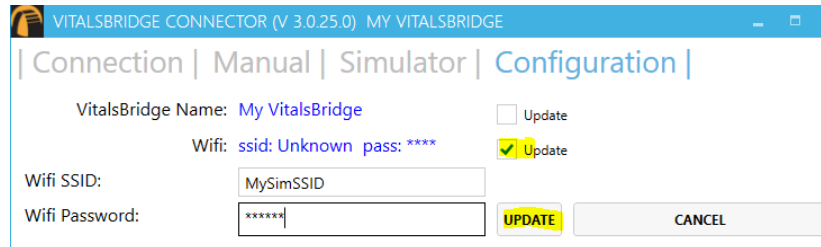
On VitalsBridge model 200 and 300 units, the Wifi SSID and Password may be set for the VitalsBridge in the Configuration tab of the VitalsBridge Connector Software. This will allow for a connection via Wifi.

## VitalsBridge Communication Guide

**Note:** In order to configure the VitalsBridge Wifi, ensure that you are connected via USB or Bluetooth.

Wifi may be set-up to connect via an access point (i.e.: a router within a manakin) or via a typical wireless router.

1. Check the Update checkbox adjacent to the Wifi field.
2. Enter the name of the SSID and password of the wireless router or access point (note that both the SSID and password fields ARE case-sensitive).



**Note:** If the VitalsBridge has just been reconfigured to connect to Wifi, the indicator light will *not* turn on until you have first exited out of the VitalsBridge connection software. The VitalsBridge will then connect to the router and you will be able to connect your PC to the VitalsBridge over Wifi when the VitalsBridge connection software is next opened.

## Windows Network Settings

Discovery of the VitalsBridge instrumentation uses the UDP network protocol on port 14998, while TCP/IP communication occurs over port 14997. When running for the first time, please ensure you allow application access through the Windows Firewall on both the public and private profiles.

## Support

For technical assistance, contact VitalsBridge customer support:

- [support@vitalsbridge.com](mailto:support@vitalsbridge.com)
- 1-435-200-3402
- 1-801-484-3820