

# Wireless Distribution System (WDS) Configuration on the CVR100W VPN Router

## Objective

The Wireless Distribution System (WDS) allows you to connect multiple access points without the need of wires. This capability is beneficial to manage multiple roaming clients and wireless networks. To establish such a system, all WDS devices need to be set to the same WDS configuration. The limitation of WDS is that it only uses Static Wired Equivalent Privacy (WEP) which is a non-traditional way to keep data safe. This means that WDS does not support Wi-Fi Protected Access (WPA) or other dynamic key assignment technology that are more current and more secure. To configure WDS, all access points must use same radio channel in order to communicate with each other. This article explains how to configure WDS on the CVR100W VPN Router.

## Applicable Device

- CVR100W

## Software Version

- 1.0.1.19

## WDS Configuration

Step 1. Log in to the web configuration utility and choose **Wireless > WDS**. The *WDS* page opens:

WDS

WDS MAC Address: D8:24:BD:79:4D:63

Allow wireless signal to be repeated by a repeater

Auto  Manual

Remote Access Point's MAC Address:

Show Site Survey

MAC 1  (Hint: 00:11:22:33:44:55 or 001122334455)

MAC 2

MAC 3

**Note:** The WDS MAC Address field indicates the MAC Address of the CVR100W.

Step 2. Check the **Allow wireless signal to be repeated by a repeater** check box to enable

WDS to act as a repeater. In this mode, the access point acts as an intermediary between two access points and extends the cell range. In repeater mode, the access point does not have a wired connection to the LAN. If it is left unchecked, the repeat will not occur.

Step 3. Click the desired radio button to choose the remote access detection method. The available options are:

- Auto — The CVR100W automatically detects remote access points.
- Manual — Choose the desired MAC address of the device that repeats the signal from the available networks.

**Time Saver:** If you click Auto, skip to Step 8.

Step 4. If Manual is clicked, click **Show Site Survey** to view all networks available.

- Network Name (SSID) — This field indicates the name of the network available.
- Channel — This field indicates the channel used by the network.
- Security — This field indicates the security method used by the network.
- Signal — This field indicates the available signal strength of the network.
- MAC Address — This field indicates the MAC address of the router on which the network is available.

Available Networks Table					
	Network Name (SSID)	Channel	Security	Signal	MAC Address
<input type="checkbox"/>	WFSU-Guest	1	Disabled	46%	XXXXXXXXXX
<input checked="" type="checkbox"/>	WFSU	1	WEP	41%	XXXXXXXXXX
<input checked="" type="checkbox"/>	WFSU-Guest	1	Disabled	19%	XXXXXXXXXX
<input type="checkbox"/>	WFSU-Secure	1	WPA2-Enterprise	19%	XXXXXXXXXX
<input type="checkbox"/>	WFSU-Secure	1	WPA2-Enterprise	76%	XXXXXXXXXX
<input type="checkbox"/>	WFSU-Secure	1	WPA2-Enterprise	50%	XXXXXXXXXX
<input checked="" type="checkbox"/>	WFSU-Secure	4	Disabled	42%	XXXXXXXXXX

(Hint: 00:11:22:33:44:55 or 001122334455)

MAC 1

MAC 2

MAC 3

Step 5. (Optional) To see more available networks which have not appeared previously, click **Refresh** to update the Available Networks Table.

**Note:** MAC addresses for the desired networks can also be entered in the MAC 1 to 3 fields.

Step 6. Check the check boxes of the desired networks to be repeated from the Available Networks Table. Up to three networks can be chosen.

Step 7. Click **Connect** to add the MAC addresses of the chosen networks to the MAC address fields.

Step 8. Click **Save** to save the changes.