

# Cable Internet Setup on the RV016, RV042, RV042G, and RV082 VPN Routers

## Objective

Most cable Internet Service Providers (ISP) use a Media Access Control (MAC) Authentication to establish Internet connections for end-users. A MAC address is assigned a unique 48-bit (6-byte) integer that is attached to an Ethernet NIC for each computer. To set up your RV router to a Cable ISP, you have to perform the MAC Clone procedure which enables the router to copy the MAC address of the PC that is registered with the ISP.

This article explains how to properly establish an Internet connection with your ISP on the RV016, RV042, RV042G, and RV082 VPN Routers.

## Applicable Devices

- RV016
- RV042
- RV042G
- RV082

## Software Version

- v4.2.1.02

## Cable Internet Setup

First, a WAN connection must be established. The following steps will guide you through the setup of the WAN connection.

**Note:** Use a computer that can go online when connected to the modem when you follow the steps below.

Step 1. Log in to the Router configuration utility and choose **Setup > Network**. The *Network* page opens:

## Network

Host Name :  (Required by some ISPs)

Domain Name :  (Required by some ISPs)

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### IP Mode

Mode	WAN	LAN
<input type="radio"/> IPv4 Only	IPv4	IPv4
<input checked="" type="radio"/> Dual-Stack IP	IPv4 and IPv6	IPv4 and IPv6

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IPv4

### LAN Setting

MAC Address : 64:9E:F3:88:C6:88



Device IP Address :

Subnet Mask :

Multiple Subnet :  Enable

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### WAN Setting

Interface	Connection Type	Configuration
WAN1	Static IP	
WAN2	Static IP	

Step 2. Click the **Edit** icon of the WAN interface that is used in the WAN Setting area. The *Edit WAN Connection* page opens:

## Network

### Edit WAN Connection

Interface : WAN1

WAN Connection Type :

Use the Following DNS Server Address

DNS Server (Required) 1 :

2 :

MTU :  Auto  Manual  bytes

Step 3. Choose **Obtain an IP automatically** in the WAN Connection drop-down list. The router automatically uses the IP address assigned by the ISP.

Step 4. (Optional) If you would like to enter the desired DNS Server, check **Use the Following DNS Server Address** check box.

Step 5. Enter the desired address for the DNS Server, in the DNS Server field.

Step 6. From the MTU drop-down list, choose the method of configuration for the Maximum Transmit Unit (MTU) size. MTU is the size of the largest amount of data that can be sent in a single packet over the Internet. The user may wish to change the MTU because the ISP requires a different MTU size.

- Auto — Choose this option to automatically set the MTU to its default size (recommended).

**Note:** For DHCP and Static IP connection types, the default MTU size is 1500 bytes, whereas for PPPoE connection type, the default MTU size is 1492 bytes.

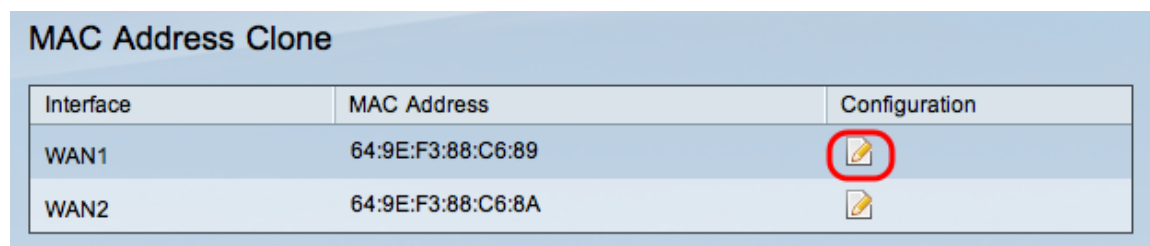
- Manual — Choose this option if your ISP requires a change in your MTU size. Enter the size of the MTU in bytes.



Step 7. Click **Save**.

## MAC Address Clone

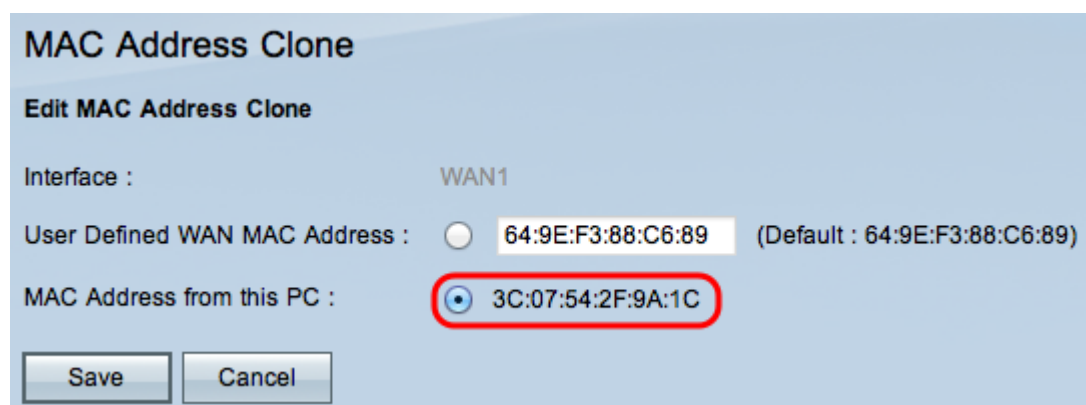
The final procedure in this setup is the MAC Clone, which will ensure the Internet connectivity. The following steps explain how to clone the MAC address of the PC that is registered with the ISP.

Step 1. Log in to the Router configuration utility and choose **Setup > Mac Address Clone**. The *Mac Address Clone* page opens:



Interface	MAC Address	Configuration
WAN1	64:9E:F3:88:C6:89	
WAN2	64:9E:F3:88:C6:8A	

Step 2. Click the **Edit** icon of the WAN interface that is used. The *Edit Mac Address Clone* page opens:



**MAC Address Clone**

**Edit MAC Address Clone**

Interface : WAN1

User Defined WAN MAC Address :  64:9E:F3:88:C6:89 (Default : 64:9E:F3:88:C6:89)

MAC Address from this PC :  3C:07:54:2F:9A:1C

Step 3. Click **MAC Address from this PC** to clone the MAC address that is connected to the Internet.

Step 4. Click **Save**.