



NetVanta 2000 Series Technical Note

How to configure the NetVanta 2000 Series WAN / X1 Interface with PPPoE Connection



This document is applicable to NetVanta 2600 series, 2700 series, and 2800 series units.

Feature/Application:

Configuring the NetVanta 2000 Series WAN interface (X1 by default) with **PPPoE** settings (Other WAN configuration: DHCP, Static IP, PPTP or L2TP)

Procedure:

PPPoE mode: Use this mode if your ISP is using a PPPoE connection. To configure this mode:

1. Click the **Network > Interfaces** tab.
2. Click **Configure** for the WAN interface (X1 by default).

Network / Interfaces

Accept

Interface Settings

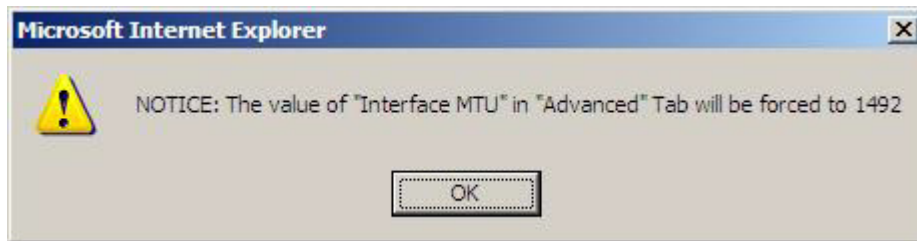
Name	Zone	IP Address	Subnet Mask	IP Assignment	Status	Comment	Configure
X0	LAN	192.168.168.168	255.255.255.0	Static	1000 Mbps full-duplex		
X1	WAN	0.0.0.0	255.255.255.0	Static	1000 Mbps full-duplex	Default WAN	
X2	WLAN	172.16.31.1	255.255.255.0	Static	No link		
X3	Unassigned	0.0.0.0	0.0.0.0	N/A	No link		
X4	Unassigned	0.0.0.0	0.0.0.0	N/A	No link		
X5	Unassigned	0.0.0.0	0.0.0.0	N/A	No link		
X6	Unassigned	0.0.0.0	0.0.0.0	N/A	No link		
X7	Unassigned	0.0.0.0	0.0.0.0	N/A	No link		
X8	Unassigned	0.0.0.0	0.0.0.0	N/A	No link		

Procedure:

3. Under IP assignment, choose **PPPoE** from the drop down menu.



The X1 Interface MTU will be forced to 1492.



The screenshot shows the configuration page for Interface 'X1'. At the top, there are three tabs: 'General', 'Advanced', and 'Protocol'. Below the tabs, the 'Interface 'X1' Settings' section is visible. It includes the following fields and options:

- Zone:** A dropdown menu set to 'WAN'.
- IP Assignment:** A dropdown menu set to 'PPPoE'.
- User Name:** An empty text input field.
- User Password:** An empty text input field.
- Comment:** A text input field containing 'Default WAN'.
- Service Name:** An empty text input field.
- Management:** A group of checkboxes: HTTP, HTTPS, Ping, SNMP, and SSH.
- User Login:** A group of checkboxes: HTTP and HTTPS.
- Add rule to enable redirect from HTTP to HTTPS.
- Obtain IP Address Automatically.
- Specify IP Address: A text input field containing '0.0.0.0'.

At the bottom of the form, there is a status bar showing 'Ready' and three buttons: 'OK', 'Cancel', and 'Help'.

4. Enter the **User name** and **User password** given by the ISP.

5. At the bottom of the page, you can choose **Obtain IP address automatically** if the ISP is leasing out IP addresses, or you can manually specify the IP address by choosing **Specify IP Address** and entering the IP Address given by the ISP.

6. Either check Obtain DNS server address automatically or manually specify it by choosing **Specify DNS servers**.

Protocol tab: displays the acquired IP address, subnet mask, gateway address, and DNS server addresses.

– Click the **Protocol** tab.

– View the settings for the acquired IP address, subnet mask, gateway address, and DNS server addresses.

- **Inactivity Disconnect**—Specify how long (in minutes) the NetVanta 2000 Series appliance waits before disconnecting from the Internet, and select the checkbox.
- **Strictly use LCP echo packets for server keep-alive**—This checkbox is enabled when the client recognizes that the server relies on Link Control Protocol (LCP) echo requests for keeping the PPPoE connection alive.
- **Disconnect the PPPoE client if the server does not send traffic for __ minutes**—Select this checkbox and enter the number of minutes to wait without traffic before the connection is ended. When enabled, the PPPoE client monitors traffic from the server on the tunnel and disconnects when no traffic is seen for the specified time period.

7. Click **OK** to update your configurations.

How to test the connectivity:

1. On the NetVanta 2000 Series the NetVanta 2000 Series unit, Click **System > Diagnostics**. Choose Ping in the “**Diagnostic utility**” drop down in the Sonic OS Standard and Enhanced firmware. (In 6.x firmware Click Tools > Diagnostics).
2. Ping your ISP’s **Default Gateway** or any IP that is pingable on the Internet (e.g. 4.2.2.2).
3. Also try to ping a website (eg: www.google.com) to ensure that the DNS resolution is working.

Troubleshooting

* Try doing power recycle of the NetVanta 2000 Series unit and the modem. After 30 seconds plug in back the power cable of the modem first and after getting solid lights on the modem plug in back the power cable of the NetVanta 2000 Series unit.