1. About this Document

This documents describes step-by-step procedure to be followed to install the Hotspot Controller at your location as quickly as possible and enjoy the wireless access to Internet and/or to your local network.

2. WISP Information Sheet

This attached document is an information sheet regarding your controller. The most important thing to note is the Wisp Admin login and password that is unique to your WISP. These login credentials will allow you to now access the Pronto OSS/BSS interface. To login to the OSS/BSS interface, you will need to do the following:

Step1: Open a browser and navigate to https://oss.prontonetworks.com

Step2: In the field labeled "Select an Environment," select in the pull-down menu "Standalone"

Step3: In the field labeled "WISP ID," enter your WISP ID Number located on the information sheet.

Step4: In the field labeled "Login ID," enter your login ID located on the information sheet. This login ID will be case sensitive.

Step5: In the field labeled "Password," enter your password located on the information sheet. This password will be case sensitive.
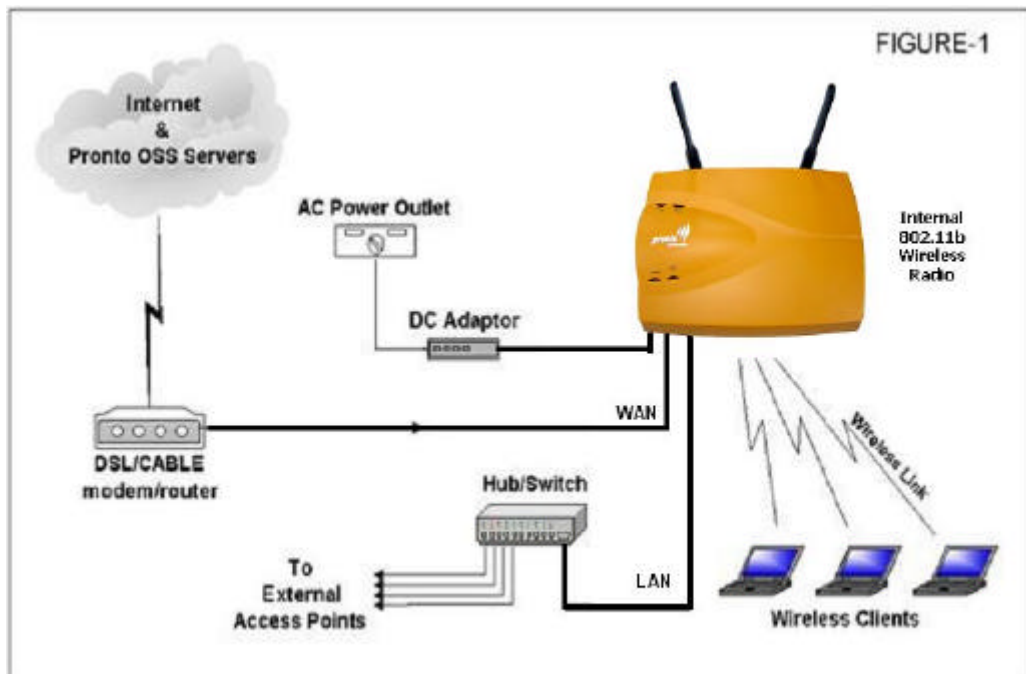
The WISP Information Sheet additionally includes information such as your WISP name, WISP ID number, location name, franchise name, controller MAC ID, Guest Accounts, SSID, walled garden sites, and configurations for the WAN and LAN ports. This information is specific for that controller and these configurations can be modified within the

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OSS/BSS interface. If you have any questions or concerns about reconfiguring the controller, please contact your Account Manager or you can access and download an OSS/BSS guide along with several step-by-step documents via the Wisp Information Website located at http://wispinfo.prontonetworks.com/. Please contact your account manager to request credentials to access this website.

3. Installation Procedure for Hotspot Controller

Follow these easy steps to install the Hotspot Controller.

Step1:   Unpack the Hotspot Controller from the box and look at the backside of the controller to know Power Socket, WAN port, and LAN port.

Step2:   Connect the WAN port of the Hotspot Controller to your DSL/Cable modem/router with a RJ-45 type CAT-5 Ethernet cable as shown in the diagram (figure-1) below:

Pronto Controller Setup Diagram

Step3:   Plug one end of the DC Adaptor into the slot provided at the rear of the Hotspot Controller and other end into an electrical outlet.

Step 4:   Turn ON the Power of your electrical outlet.

The Hotspot Controller will obtain the required configuration and start initialize by itself. This process will take approximately 3-5 minutes.

4. Understanding the Booting process

This section explains that how the Hotspot Controller is booting up when the Power is turned ON.

- First, the Hotspot Controller gets the Internet access on its WAN port either via your DSL, Cable or Local area network (LAN).

- Then, it contact Hotspot OSS/BSS backend system located at the Internet and download all other configurations specified for this particular Hotspot Controller.

- Based on the downloaded configurations, it initializes all its functionalities and transmits the wireless radio signal for wireless clients.

It is important to note that once your Hotspot controller connected to your DSL/CABLE modem (sometime a router device), then the IP address to WAN port of Hotspot Controller can be assigned by your Internet Service Provider (ISP) either by one of the following three methods:

DHCP Server located at your ISP:
This server automatically provides IP Address to WAN port every time when Hotspot Controller power ON. This IP Address may change every time when you restart the Hotspot Controller.

STATIC IP assigned to your location by your ISP:
This IP Address is permanent and specifically assigned to your location. During installation of DSL/Cable at your location, the ISP handover this IP address along with other parameters such as subnet mask, default gateway (default router), primary DNS and secondary DNS address.

PPPoE (Point-to-Point over Ethernet) type connection:

In this case, your ISP provides PPPoE username and password to you to receive Internet access via your DSL/Cable modem/router. For example, username as john@sbcglobal.net and password as J12345.

In general, the Hotspot Controller is pre-configured as per the information you provided in "Location_Information_Form" document when ordering Hotspot Controller for this particular location. In that case, the Hotspot Controller is pre-configured according to your DSL/Cable Internet connection type such as DHCP, STATIC IP or PPPoE and shipped to your location.

However, there might a case where the Hotspot Controller is pre-configured for DHCP type but your DSL/Cable Internet connection type is STATIC IP or PPPoE. Or else, the pre-configured STATIC IP/PPPoE settings inside the Hotspot Controller are not the same (not correct) as what your DSL/Cable Internet supporting at present. Please follow easy instructions shown below to learn how to change the Hotspot Controller pre-configured settings and make it work under your DSL/Cable Internet connection type.
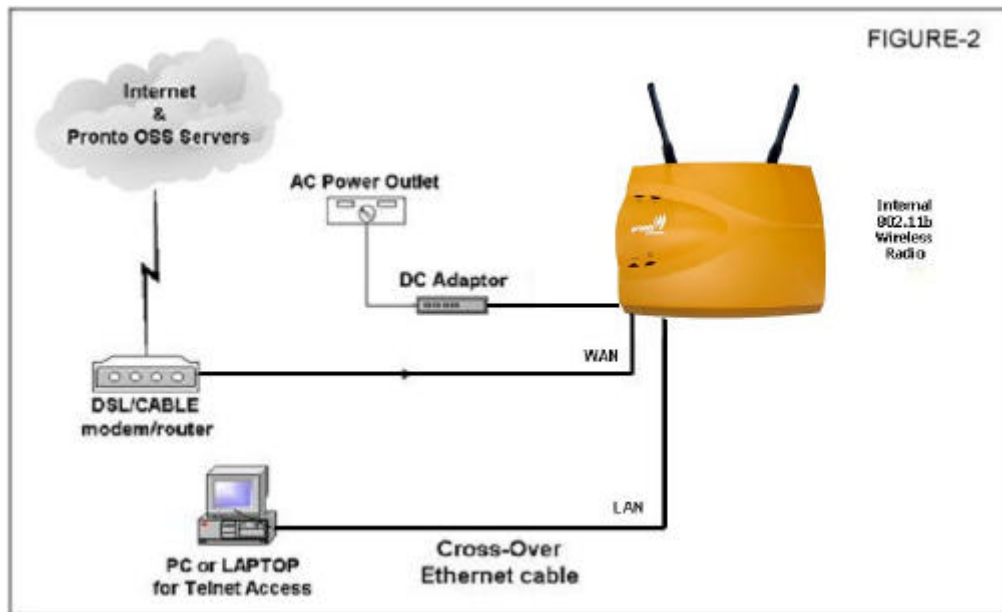
5. Switching to STATIC IP configuration:

Follow these steps to configure the Hotspot Controller to switch from DHCP, PPPoE or wrong STATIC IP settings to correct STATIC IP information.

Important Note:
- Before following the below steps, you need to reconfigure Hotspot Controller's existing settings in Pronto OSS server to include your STATIC IP information. When the Hotspot Controller comes up ONLINE, it will download this STATIC IP configuration from Pronto OSS server and initialize automatically without any manual configuration in future.
- If you do not have an Internet connection at this location to reconfigure Hotspot Controller in Pronto OSS, please contact Pronto WISP Support at 1-800-PRONTO-0. We will assist you.

Step1:   Connect the WAN port of the Hotspot Controller to your DSL/Cable modem/router with a RJ-45 Ethernet cable.
Step2:   Connect your Laptop/PC directly to the LAN port of Hotspot Controller using RJ-45 "Cross-over" Ethernet cable as shown in the diagram (figure-2) below:

In case you don't have a cross-over cable, use normal RJ-45 Ethernet cable and a hub to connect to LAN port of Hotspot Controller as shown in the diagram (figure-3) below:

FIGURE-2

Step3:   Power ON the Hotspot Controller. Check the link activity on LAN port of Hotspot Controller to see your Laptop/PC has link. Note: Your Laptop/PC should be configured as DHCP client to obtain IP address from 192.168.4.0 range from Hotspot Controller.

Step4:   Verify your Laptop/PC received the IP address from the Hotspot Controller by running the command "ipconfig" from DOS command prompt.

Step5:   Telnet to the address 192.168.4.1 by running the command "telnet 192.168.4.1" from the DOS command prompt. Now, you will be presented with a login prompt from PCLI (Pronto Command Line Interface) mode.

Type the following commands as shown below in *Bold-Black* letters:

```
Pronto CLI: pcli 0.1-0

% WARNING: No environment

%       Factory password presets configured
        Please refer to documentation for login information

User Access Verification

Password: default

PCLI> enable

Password: default

PCLI#  configure terminal

config#  interface eth0

config-if#  ip address  x.x.x.x  y.y.y.y   # NOTE: Replace x.x.x.x with your
STATIC IP and y.y.y.y with Subnet Mask provided by your ISP

config-if# done

config#  default-router  z.z.z.z     # NOTE: Replace z.z.z.z with your Default
Gateway provided by your ISP

config# done

PCLI# reboot

% Do you really want to reboot the system (y/n): y
```

Step6:   Now, the Hotspot Controller will be rebooted and come into
           operational.

6. Switching to PPPoE configuration:

Follow these steps to configure the Hotspot Controller to switch from
DHCP, STATIC IP or wrong PPPoE settings to correct PPPoE information.

Important Note:
- Before following the below steps, you need to reconfigure Hotspot
  Controller's existing settings in Pronto OSS server to include your

PPPoE information. When the Hotspot Controller comes up ONLINE, then it will download all configurations from Pronto OSS server and boot by itself if the Hotspot Controller in future.

- If you do not have an Internet connection at this location to reconfigure Hotspot Controller in Pronto OSS, please contact Pronto WISP Support at 1-800-PRONTO-0. We will assist you.

Step1: to Step4: Follow the same Steps (Step1 to Step4) mentioned above in section 4 (Switching to STATIC IP configuration)

Step5: Telnet to the address 192.168.4.1 by running the command "telnet 192.168.4.1" from the DOS command prompt. Now, you will be presented with a login prompt from PCLI (Pronto Command Line Interface) mode. Type the following commands as shown below in *Bold-Black* letters:

Pronto CLI: pcli 0.1-0
% WARNING: No environment

%   Factory password presets configured
         Please refer to documentation for login information

User Access Verification

Password: *default*

PCLI> *enable*

Password: *default*

PCLI# *configure terminal*

config# *enable-pppoe userid passwd*   # NOTE: Replace the text **userid** with your PPPoE userid (for example: john@sbcglobal.net) and text **passwd** with PPPoE password provided by your ISP

config# *done*

PCLI# *reboot*

% Do you really want to reboot the system (y/n): *y*

The PHC will reboot on the configured IP address and come online.

Step6: Now, the Hotspot Controller will be rebooted and come into operation.

Federal Communication Commission Interference Statement

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one of the following measures:

- 	Reorient or relocate the receiving antenna.
- 	Increase the separation between the equipment and receiver.
- 	Connect the equipment into an outlet on a circuit different from that
   to which the receiver is connected.
- 	Consult the dealer or an experienced radio/TV technician for help.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

FCC Caution: Any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this equipment.

IMPORTANT NOTE:
FCC Radiation Exposure Statement:

   This equipment complies with FCC radiation exposure limits set forth for an
   uncontrolled environment. This equipment should be installed and operated with
   minimum distance 20cm between the radiator & your body.

This transmitter must not be co-located or operating in conjunction with any other antenna or transmitter.