BIXOLON

Software Manual

Net Configuration Tool

Ver. 4.25

http://www.bixolon.com

Table of Contents

Copyright

BIXOLON Co., Ltd. maintains ongoing efforts to enhance and upgrade the functions and quality of all our products.
In the following, product specifications and/or user manual content may be changed without prior notice.

Caution

Some semiconductor devices are easily damaged by static electricity. You should turn the printer “OFF”, before you connect or remove the cables on the rear side, in order to guard the printer against the static electricity. If the printer is damaged by the static electricity, you should turn the printer “OFF”.

1. About this manual

This Net Configuration Tool Manual explains how to install and configure the Net Configuration Tool on Windows OS on PC.

It is advisable to read the contents of this manual carefully before using “Net Configuration Tool” utility for the first time.

2. Supported Operating Systems

The following operating systems are supported:

Microsoft Windows 7 (32bit/64bit)
Microsoft Windows 8 (32bit/64bit)
Microsoft Windows 8.1 (32bit/64bit)
Microsoft Windows 10 (32bit/64bit)
Microsoft Windows Server 2008 (32bit/64bit)
Microsoft Windows Server 2008R2 (64bit)
Microsoft Windows Server 2012/2012R2 (64bit)
Microsoft Windows Server 2016 (64bit)
Microsoft Windows Server 2019 (64bit)

3. Supported Printers

"Net Configuration Tool" is available for the following BIXOLON printers.

SPP-R200II	SPP-R200III	SPP-R210	SPP-R220	SPP-R300
SPP-R310	SPP-R318	SPP-R400	SPP-R410	SPP-R418
SPP-L3000	SPP-L310	SPP-L410		
SRP-350plus	SRP-352plus	SRP-350II	SRP-350plusII	SRP-352plusII
SRP-350III	SRP-352III	SRP-350plusIII	SRP-352plusIII	SRP-330
SRP-330II	SRP-332II	SRP-380	SRP-382	SRP-383
SRP-F310	SRP-F312	SRP-F310II	SRP-F312II	SRP-F313II
SRP-S200	SRP-S300	SRP-S320	SRP-S3000	SRP-S3000_LABEL
SRP-Q300	SRP-Q302	SRP-QE300	SRP-QE302	SRP-Q200
SRP-275II	SRP-275III	SRP-770II	SRP-770III	SRP-E770III
SRP-E300	SRP-E302	SRP-B300	SRP-330III	SRP-332III
SRP-350V	SRP-350plusV	SRP-352V	SRP-352plusV	SRP-380II
SRP-382II	G30			
SLP-T400	SLP-T403	SLP-TX400	SLP-TX403	SLP-TX420
SLP-TX423	SLP-TX220	SLP-TX223	SLP-DX420	SLP-DX423
SLP-DX220	SLP-DX223	SLP-D220	SLP-D223	SLP-DL410
SLP-DL413				
XT5-40	XT5-43	XT5-46	XD5-40d	XD5-43d
XD5-40t	XD5-43t	XD3-40d	XD3-40t	XL5-40CT
XL5-43CT	XT3-40	XT3-43		
XM7-20	XM7-30	XM7-40		

The models below have a dedicated setting utility able to change network information. Use for that utility.
BGT-100P, BGT-102P, SRP-Q300H, SRP-Q302H, IFJ-BGT, SRP-S320Hi
(B-gate interface type)

4. Before Startup

The Net Configuration Tool can be found in the bundled CD and the latest version is available for download at our website (www.bixolon.com).

5. Installation & Uninstallation

5-1 Installation

1) Double-click Net Configuration Setup_Vx.x.x.exe.
   ※ Administrator privilege may be required to run the installation file.
2) Follow the instructions on the screen to complete the installation process.

5-2 Uninstallation

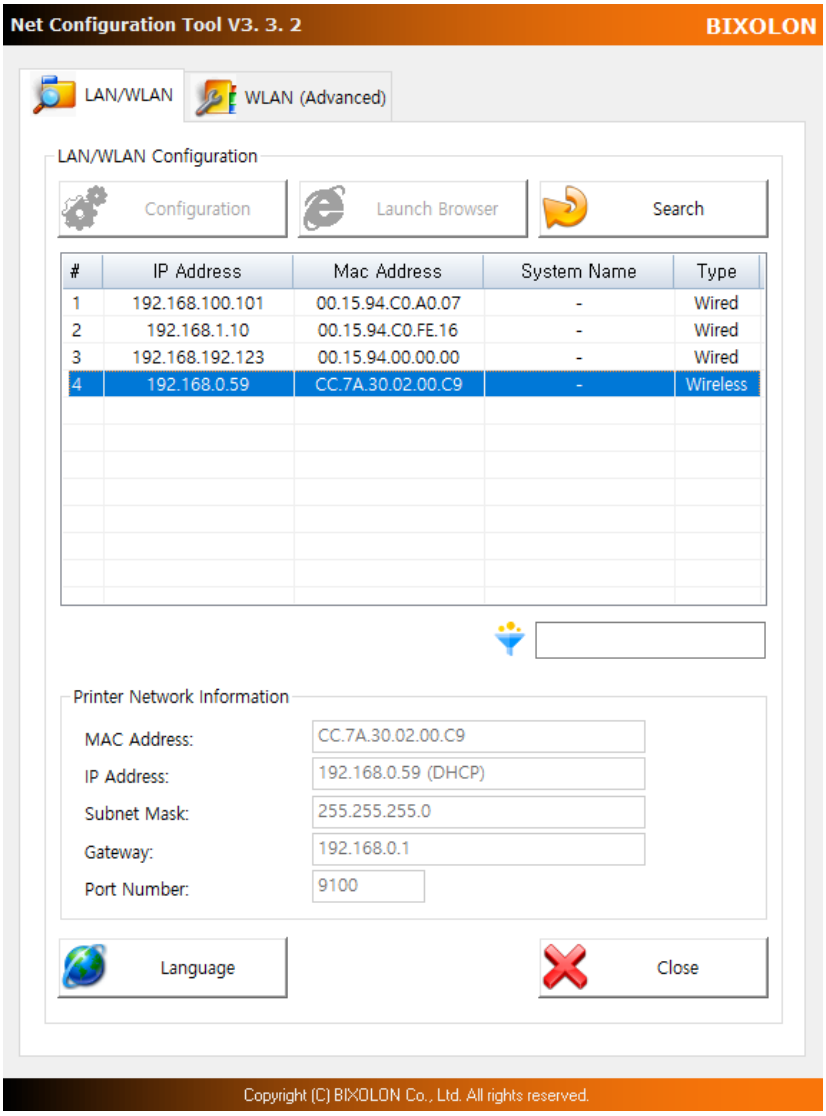
1) Open "Add or Remove Programs" or "Remove Programs" in the Control Panel.
   ※ XP or Server 2003: Control Panel – Add or Remove Programs
   ※ Vista or higher OS: Control Panel – Remove Programs
2) Select "Net Configuration Tool" and click the "Remove" button to uninstall the Net Configuration Tool on your PC.

6. Configuration

To configure the **LAN settings**, the Ethernet cable should be connected to the printer while the host (PC) and printer are connected to the same network. For configuring the **WLAN settings**, the host and printer should be connected to the same Wi-Fi Access Point or connected to each other using Wi-Fi Direct (P2P).

"Connected to the same network" means that the host and printer are connected to the same router or Wi-Fi Access Point.

To configure the **advanced settings of the printer's wireless network** (all configurable WLAN settings), the printer must be connected through a serial port cable or USB cable.



6-1 LAN/WLAN Basic Configuration

The **LAN/WLAN tab** allows you to search printers connected to the same LAN/WLAN network and configure the printer's network settings required to enable communication between the printer and host. You can also configure the printer's network settings using a web browser.

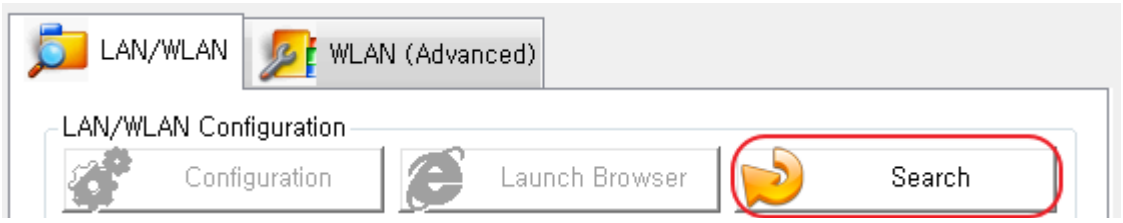
The following settings can be configured using the Net Configuration Tool. For WLAN, there are other settings beyond those listed below and the available WLAN settings may vary depending on the functions supported by the printer's WLAN module.

<table>
<tr><th>Settings</th><th>Description</th></tr>
<tr><td>IP Address Assignment Method</td><td>Assign IP address manually or automatically through DHCP. If the network does not support DHCP, you must assign the IP address manually.</td></tr>
<tr><td>IP Address
Subnet Mask
Gateway
Port Number</td><td>This information is required for LAN/WLAN communication and a unique IP address must be entered. The communication port is set to 9100 by default. You have to change the port number via reference below table to use another port.
<table>
<tr><th>Port Number</th><th>Description</th><th>TCP/UDP</th><th>Notes</th></tr>
<tr><td>9100, 6101, 9300</td><td>Printing</td><td>TCP</td><td>Used for printing</td></tr>
<tr><td>80</td><td>HTTP</td><td>TCP</td><td>Web page</td></tr>
<tr><td>3337, 9000</td><td>Device Management</td><td>UDP</td><td>Bixolon Device Discovery/Setting</td></tr>
</table></td></tr>
<tr><td>Inactivity Time</td><td>If there is no communication between the host and printer during the set period of time, the connection will be closed automatically. The value can be set between 0 and 3600 seconds (1 hour). If set to 0, this function is disabled.</td></tr>
<tr><td>System Name</td><td>A string that indicates the WLAN printer. A maximum of 64 characters can be entered.
※ This string does not display on certain printers.</td></tr>
</table>

6-1-1 Configuration of LAN/WLAN Settings Using the Configuration Button

1. Check to make sure the printer is switched on.

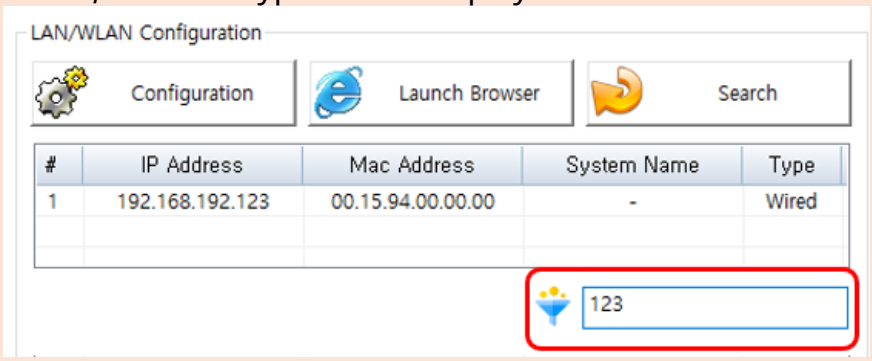
2. Click the Search button to search for printers on the network



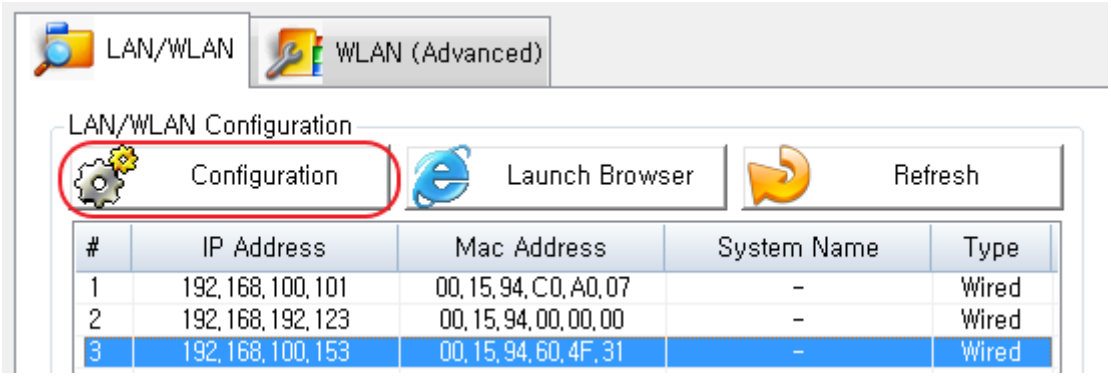
3. If the Security Alert message pops up, click either **"Unblock"** or **"Allow access"**.

4. From the search results, click the MAC address (Media Access Control Address) or IP address (Internet Protocol Address) of the printer you want to configure.

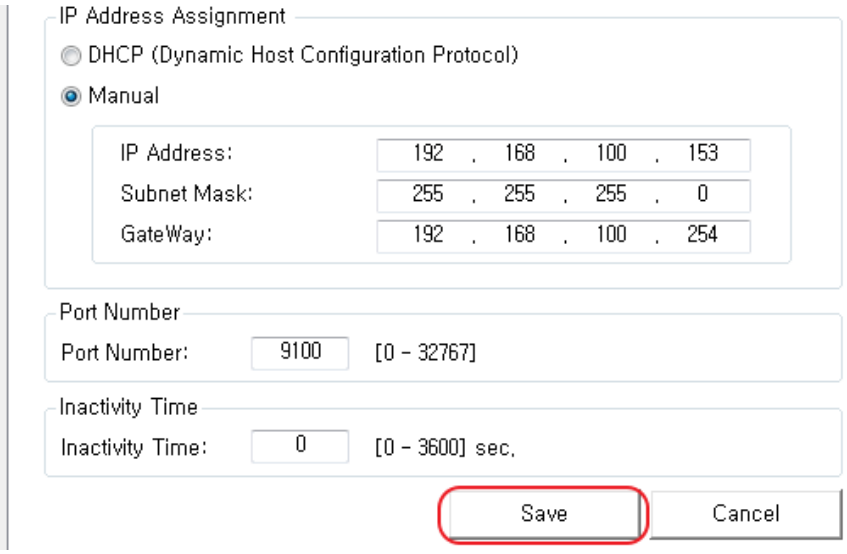
If you enter text in the red text box below, only items that contain the text you entered in IP Address, MAC Address, System Name, or Wired/Wireless Type will be displayed.



5. Click either Configuration button or double-click the item you want to configure.



6. Configure the network settings of the printer and click the Save button.



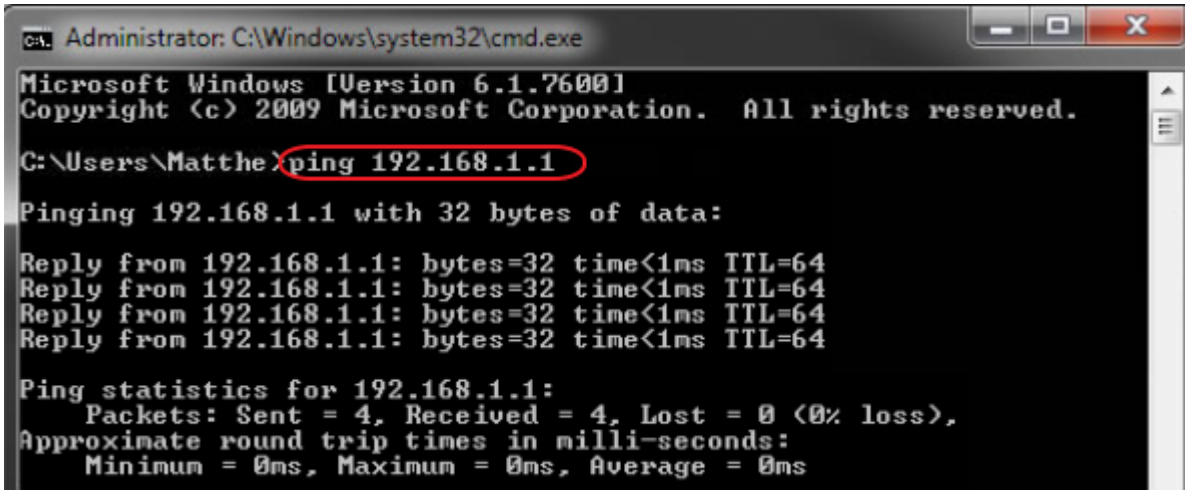
<Network Settings on the Net Configuration Tool>

If DHCP server is not supported, you have to assign IP address manually. Contact your network administrator for the assignable IP address.

When the network settings are configured, it will automatically search for printers connected to the network.

7. Use a ping test to check the connection with the printer.

Ping test command: ping <printer's IP address>



6-1-2 Configuration of LAN/WLAN Settings Using the Launch Browser Button

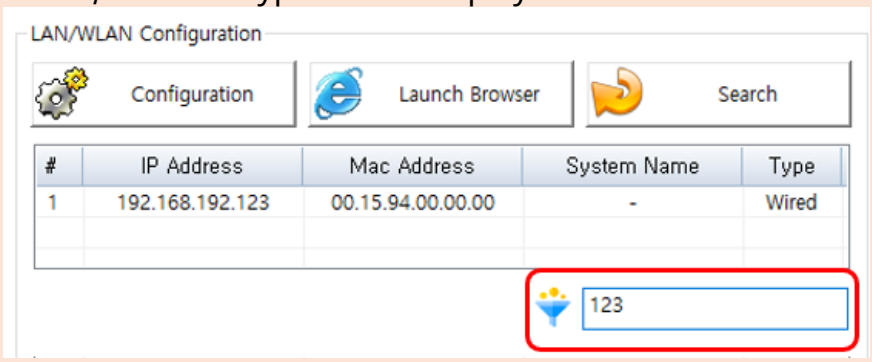
1. Check to make sure the printer is switched on.

2. Click the Search button to search for printers on the network

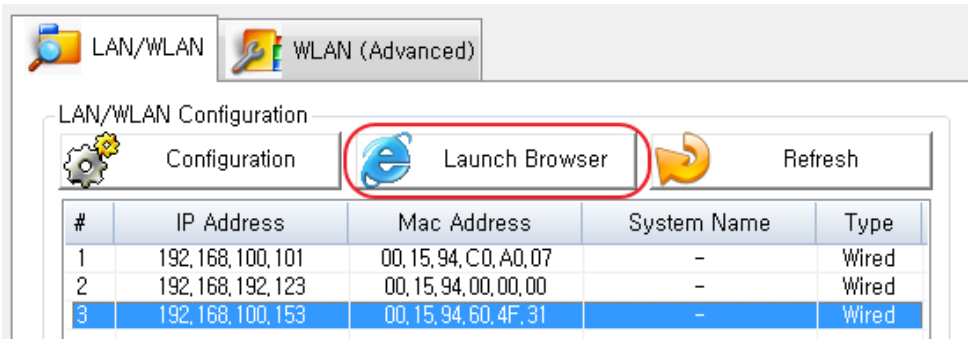
3. If the Security Alert message pops up, click either **"Unblock"** or **"Allow access"**.

4. From the search results, click the MAC address (Media Access Control Address) or IP address (Internet Protocol Address) of the printer you want to configure.

If you enter text in the red text box below, only items that contain the text you entered in IP Address, MAC Address, System Name, or Wired/Wireless Type will be displayed.



5. Click the Launch Brower button.

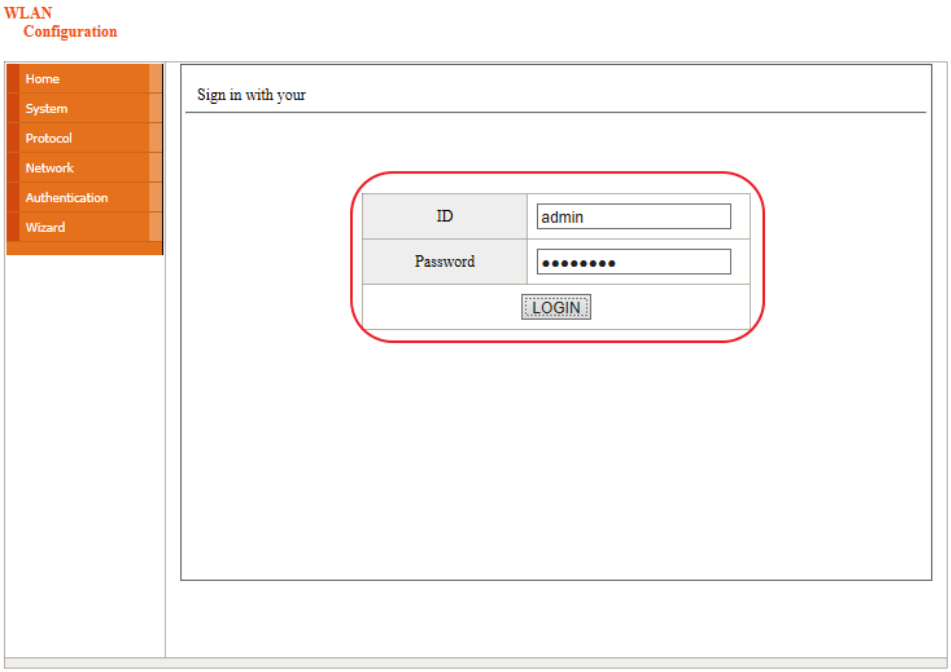


If the printer failed to get an IP address from DHCP Server, or invalid IP address was assigned by users, you cannot access the web page for network configuration from the printer.

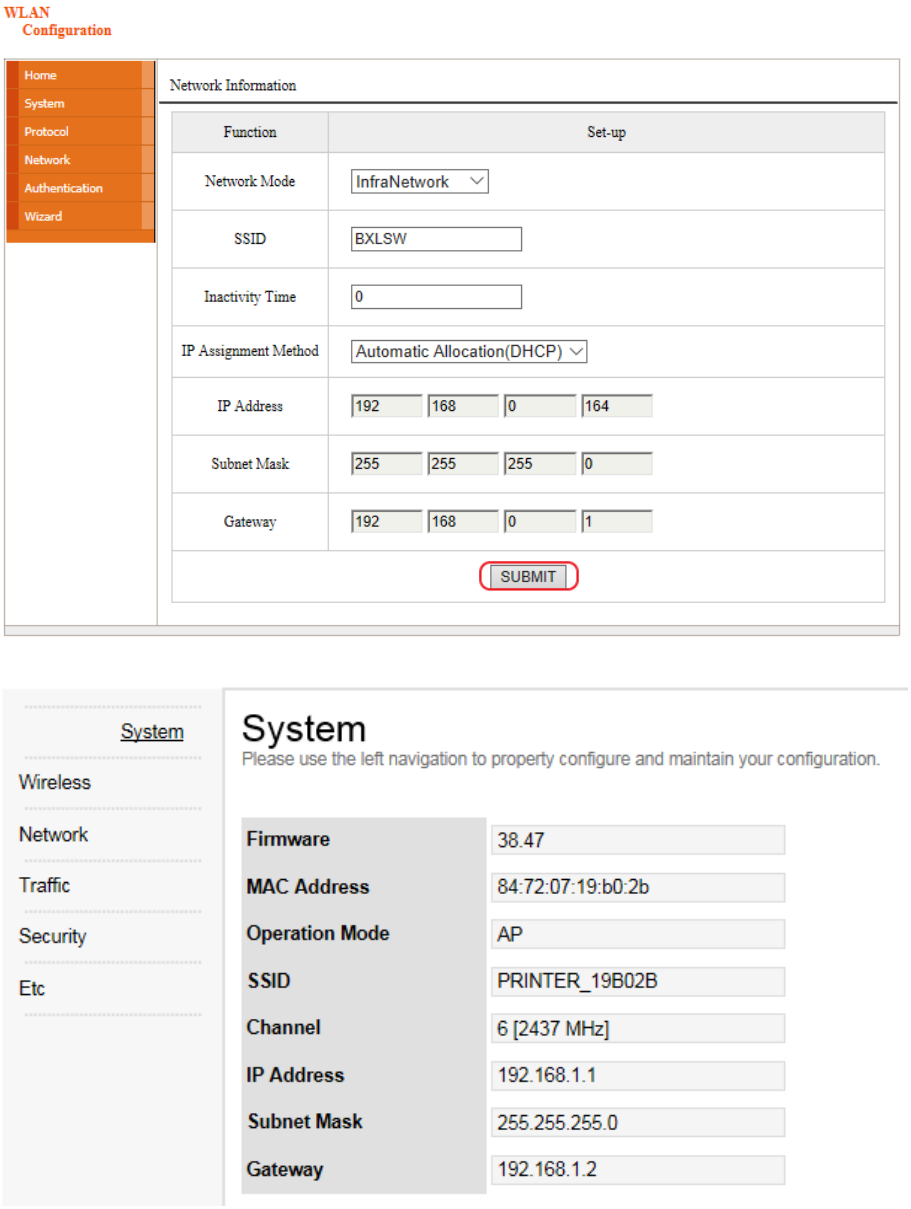
6. Check and configure the LAN/WLAN network settings of the printer on the web browser.

The network settings may vary depending on the LAN/WLAN communication and the printer's WLAN communication module.

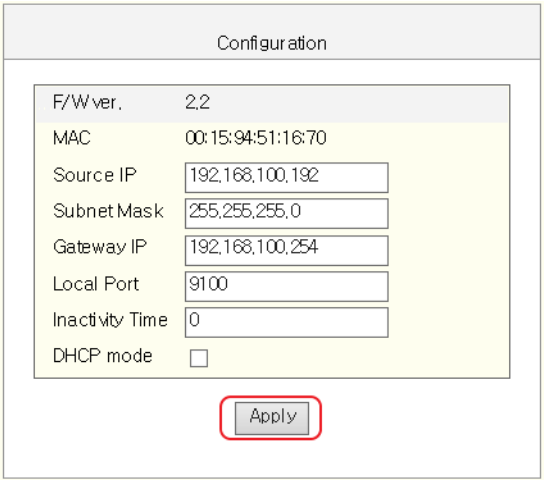
7. You may have to login to change the WLAN settings on the web browser.
   Login using the ID and password. The default ID and passwords are as follows:
   - User ID: “admin”
   - Password: “password”



8. Click either Apply or Submit to save the changes.



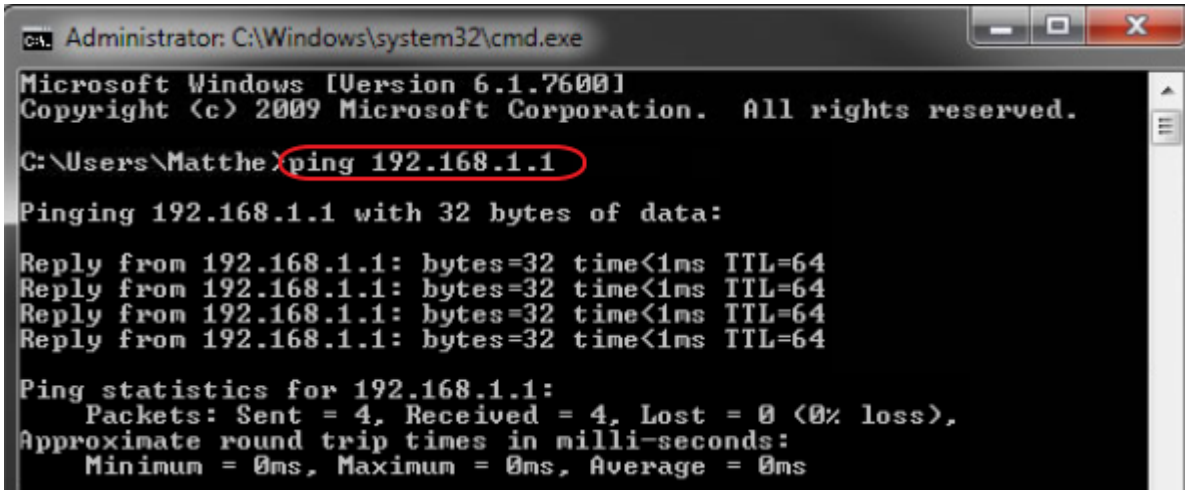
<Configurable WLAN Settings on Web Browser>



< Configurable LAN Settings on Web Browser>

9. Use a ping test to check the connection with the printer.

Ping test command: ping <printer's IP address>

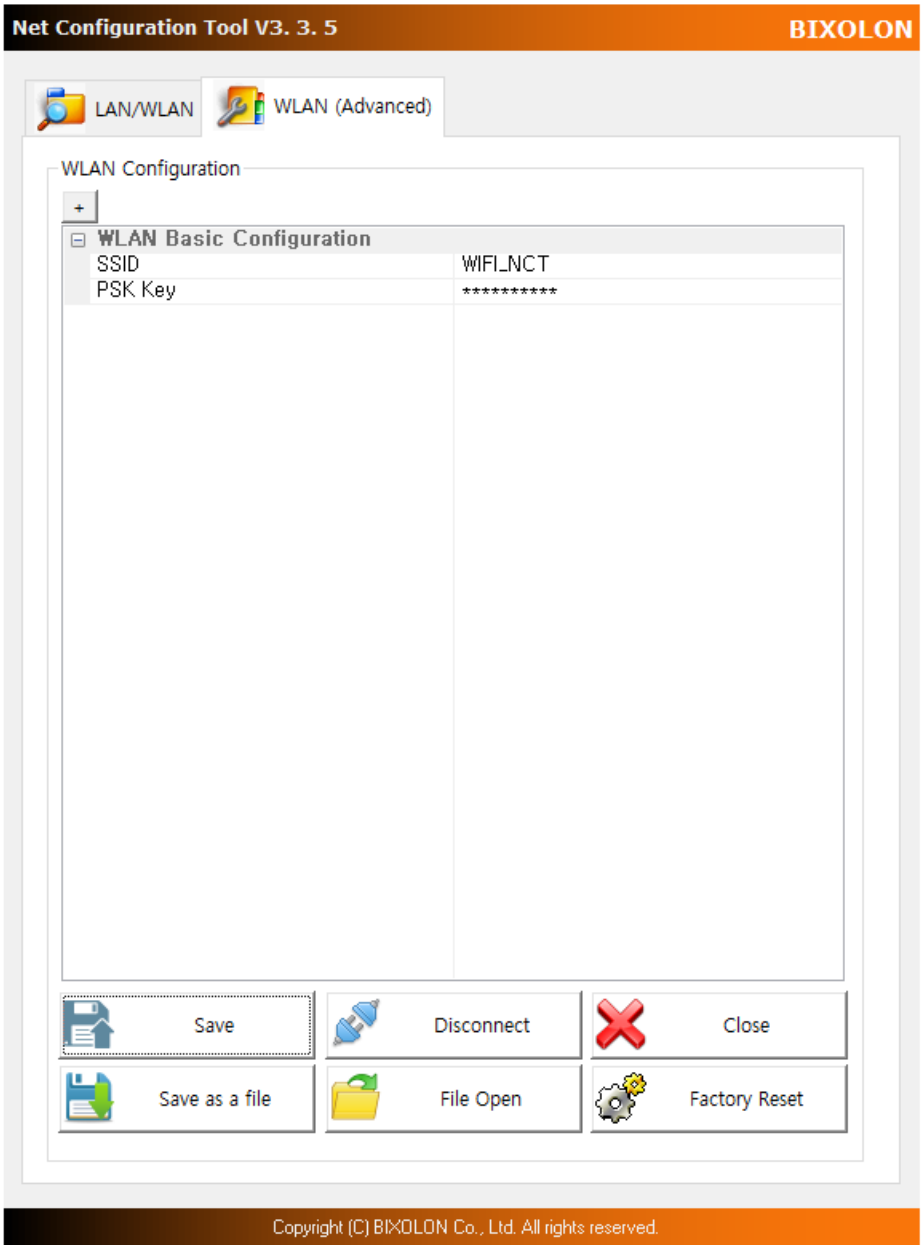


6-2 WLAN Advanced Configuration

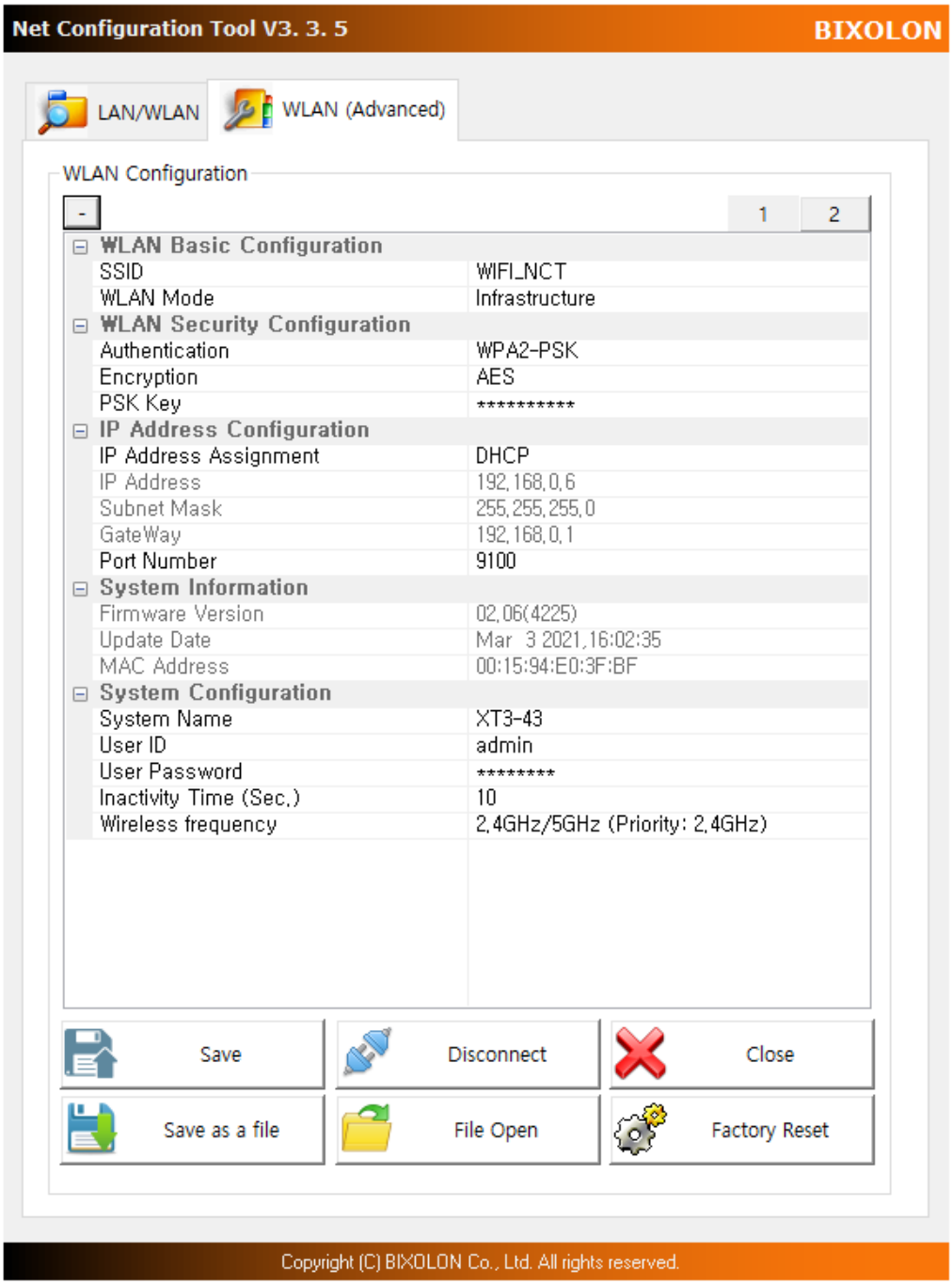
The WLAN (Advanced) tab allows you to configure the printer's WLAN settings by connecting to the printer with a cable (serial or USB).

> WLAN setting for printers with a Wi-Fi dongle can only be configured by Web Browser. Mobile printers support **either serial or USB connection**, or **both of them**. Using the wired connection, network information can be also configured.

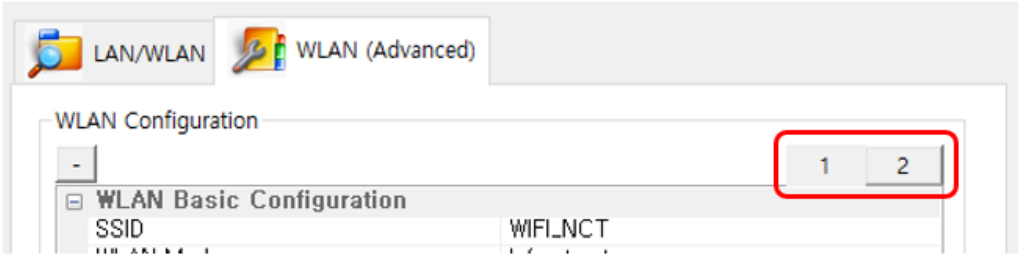
The first screen is designed to be easy to use in a common Wi-Fi environment.



Also, if you click the [+] button at the top, you can enter the detailed setting screen as shown below. And click the [-] button again to return to the simple configuration.



The following WLAN settings can be configured. Tab 1 includes the settings frequently configured while Tab 2 includes the rest of the settings.



WLAN Basic Configuration	Description
SSID (Service Set Identifier)	A unique identifier that is included in all data header sent via WLAN. A maximum of 32 characters can be entered.
WLAN Mode	Choose one of the following WLAN connection methods: - Infrastructure - Ad-Hoc - Wi-Fi Direct - Soft AP (Access Point) ※ Certain models do not support Wi-Fi Direct and Soft AP.
Ad-Hoc Channel	Choose between 1 and 14.
Wi-Fi Direct Channel	Choose 1, 6 or 11.
Wi-Fi Direct PIN Code	Enter 4 or 8 digit number.

WLAN Security Configuration	Description
Authentication	Choose one of the following authentication methods: - Open System - Shared Key - WPA-PSK - WPA2-PSK - WPA-EAP - WPA2-EAP
Encryption	Choose one of the following encryption methods: - None - WEP-64 - WEP-128 - TKIP - AES - AES + TKIP
WEP-64 Key	Enter 5-letter key or 10-digit hexadecimal number. ※ Only characters that can be entered on the ASCII code table are allowed.
WEP-128 Key	Enter 13-letter key or 26-digit hexadecimal number. ※ Only characters that can be entered on the ASCII code table are allowed.
PSK Key	Enter at least 8-letter key. ※ Only characters that can be entered on the ASCII code table are allowed. A maximum of 63 characters can be entered.

EAP Mode	Choose one of the following EAP Modes: - EAP-PEAP - EAP-TTLS - EAP-TLS - EAP-LEAP - EAP-FAST
EAP ID	Enter a maximum of 32 characters for EAP ID.
EAP Password	Enter a maximum of 32 characters for EAP password.

IP Address Configuration	Description
IP Address Assignment	Assign the IP address manually or automatically through DHCP. If the network does not support DHCP, you have to assign IP address manually.
IP Address Subnet mask Gateway Port Number	This information is required for LAN/WLAN communication and unique IP address must be entered. The communication port is set to 9100 by default. You have to change the port number via reference below table to use another port.

Port Number	Description	TCP/UDP	Notes
9100, 6101, 9300	Printing	TCP	Used for printing
80	HTTP	TCP	Web page
3337, 9000	Device Management	UDP	Bixolon Device Discovery/Setting

System Configuration	Description
System Name	This string indicates the WLAN printer. A maximum of 64 characters can be entered. ※ This string may not be shown in certain printers.
User ID User Password	User ID and Password are used to access a printer from a web browser. A maximum of 32 characters can be entered.
Inactivity Time	If there is no communication between the host and printer during the set period of time, the connection will be closed automatically. The value can be set between 0 and 3600 seconds (1 hour) by a unit of second. If set to 0, this function is disabled.
Wireless Frequency	

2.4GHz	2.4GHz is used for frequency.
5.0GHz	5.0GHz is used for frequency.
2.4GHz/5.0GHz (Priority: 2.4GHz)	Both 2.4GHz/5.0GHz are used. (2.4GHz has a higher priority.)
2.4GHz/5.0GHz (Priority: 5.0GHz)	Both 2.4GHz/5.0GHz are used. (5.0GHz has a higher priority.)

※ You may not be able to choose frequency in certain printers.

Protocol	Description
HTTPS	HTTPS (Hypertext Transfer Protocol over Secure Socket Layer) is a security enhanced version of HTTP. You can configure WLAN settings using the HTTPS protocol on a web browser. ※ This may not be supported by certain printers.
TELNET	Using the TELNET protocol, you can configure WLAN settings by TELNET interaction. ※ This may not be supported by certain printers.
FTP	Using the FTP protocol, you can configure WLAN settings by editing the file related to WLAN information. ※ This may not be supported by certain printers.
SNMP	MIB-2 (management information base-2) information can be read and written. ※ This may not be supported by certain printers.

SNMP	Description
SNMP Community Name (Read)	This string indicates the name for trap reading.
SNMP Community Name (Write)	This string indicates the name for trap writing.
SNMP Trap Community	This string indicates the name for trap community.
SNMP Trap IP Address	This string indicates IP address for trap Server.

Certificate Upload	Description
Certificate Type	Select the type of certificate to download to the printer. - CA (Certificate Authority) - Client Key - Client PEM
Certificate File	Start downloading by selecting the type of certificate to download to the printer.

Certificate Name	Description
CA	A string representing the name of each downloaded certificate. Each certificate name is a file name used to download the certificate.
Client Key	
Client PEM	

6-2-1 Basic Configuration

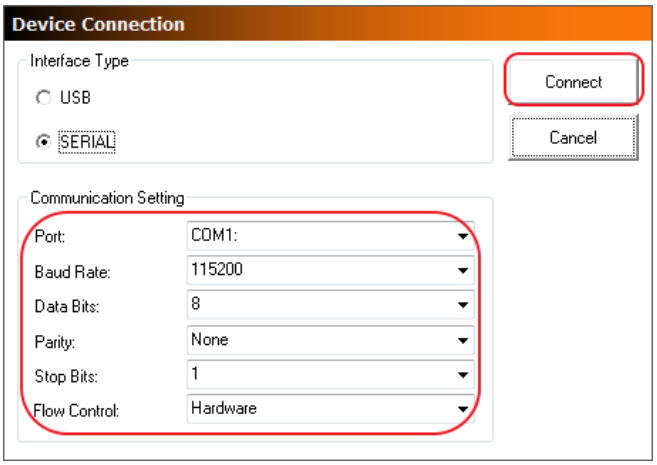
1. Check to make sure the printer is switched on. Connect the host to the printer using a serial or USB cable.

   If another device or application is using the port the printer is going to use, connection may fail. Therefore, make sure they use other ports temporarily.

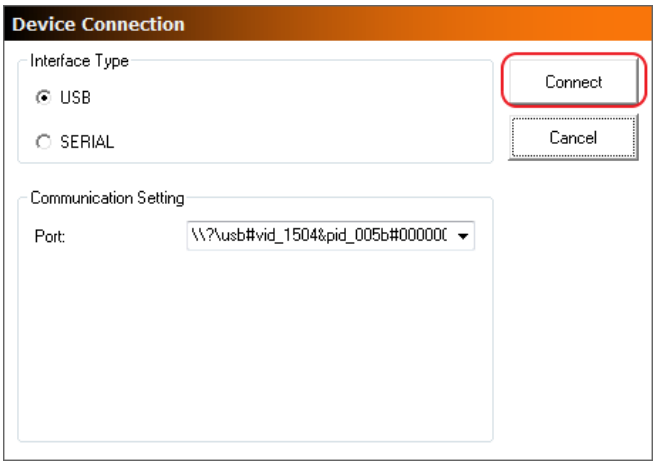
2. Click the Connect button in the WLAN (Advanced) tab.

3. Choose the Interface Type on the Device Connection window and click the Connect button.

   When using a serial cable, check the serial communication settings on the printer and change them to the settings as shown in the image. It takes up to 15 seconds to receive WLAN settings on the printer.



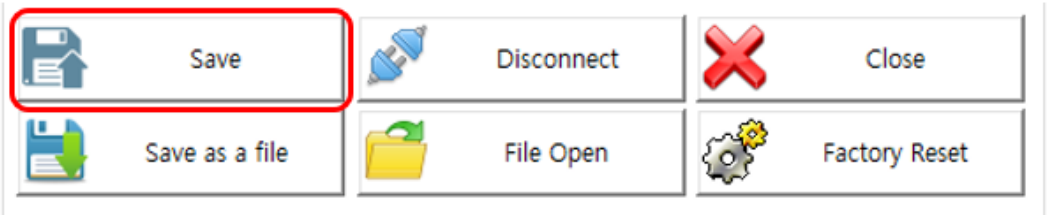
<Serial Interface>



<USB Interface>

4. Check the WLAN settings imported from the printer and make necessary changes according to your operating environment.

5. Click the Save button to apply the WLAN settings. The message will show up on the screen when the WLAN settings are changed successfully.

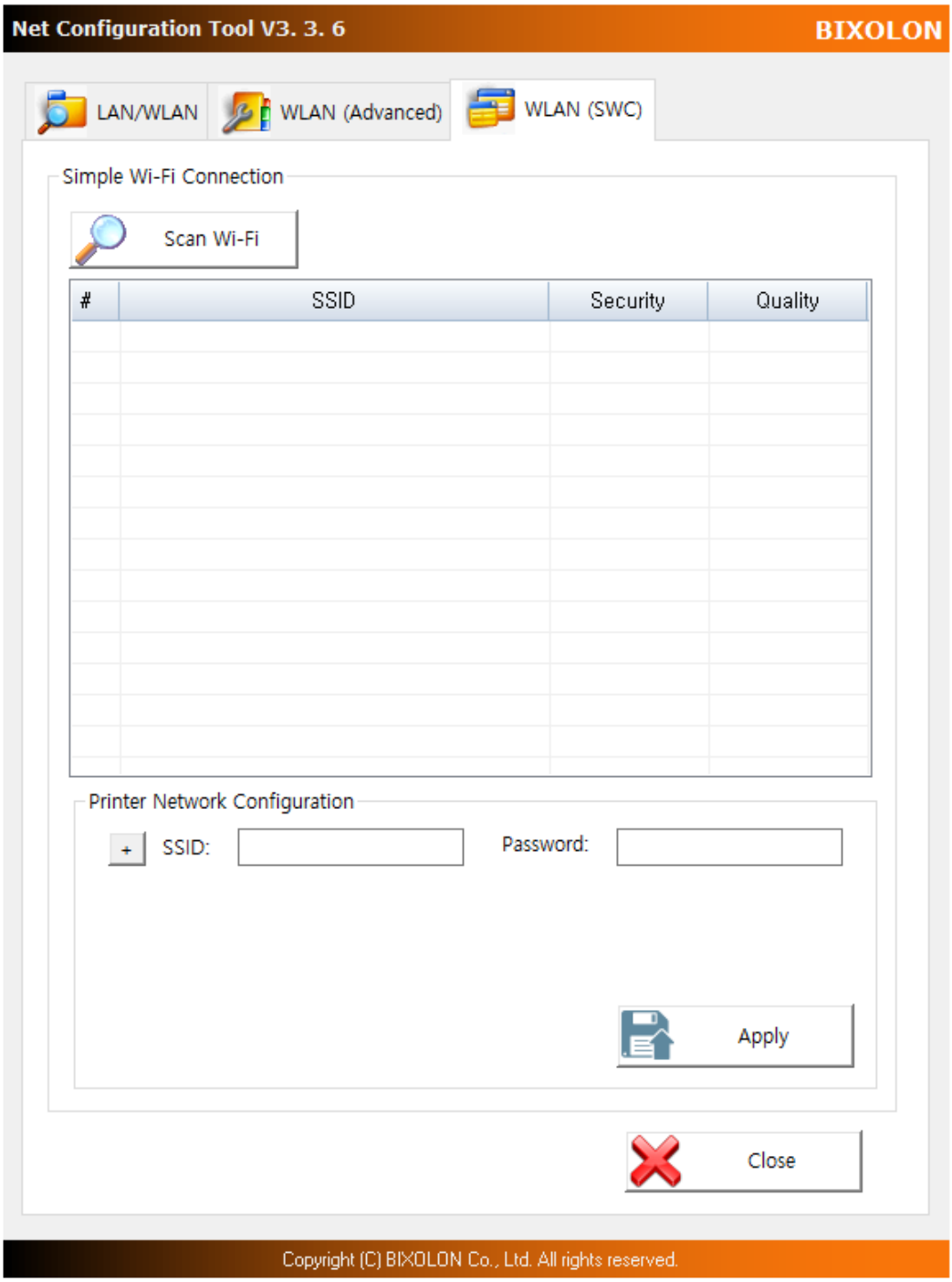


6. Reboot the printer.

6-3 Simple Wi-Fi Connect Configuration

The WLAN (SWC) tab provides a function to connect to the printer set in Simple Wi-Fi Connect (SWC) mode, receive information about the APs around the printer, and set the selected AP information to the printer.

> To use the Simple Wi-Fi Connect feature, the printer must support the SWC feature and the host (typically a PC) must also support WLAN.

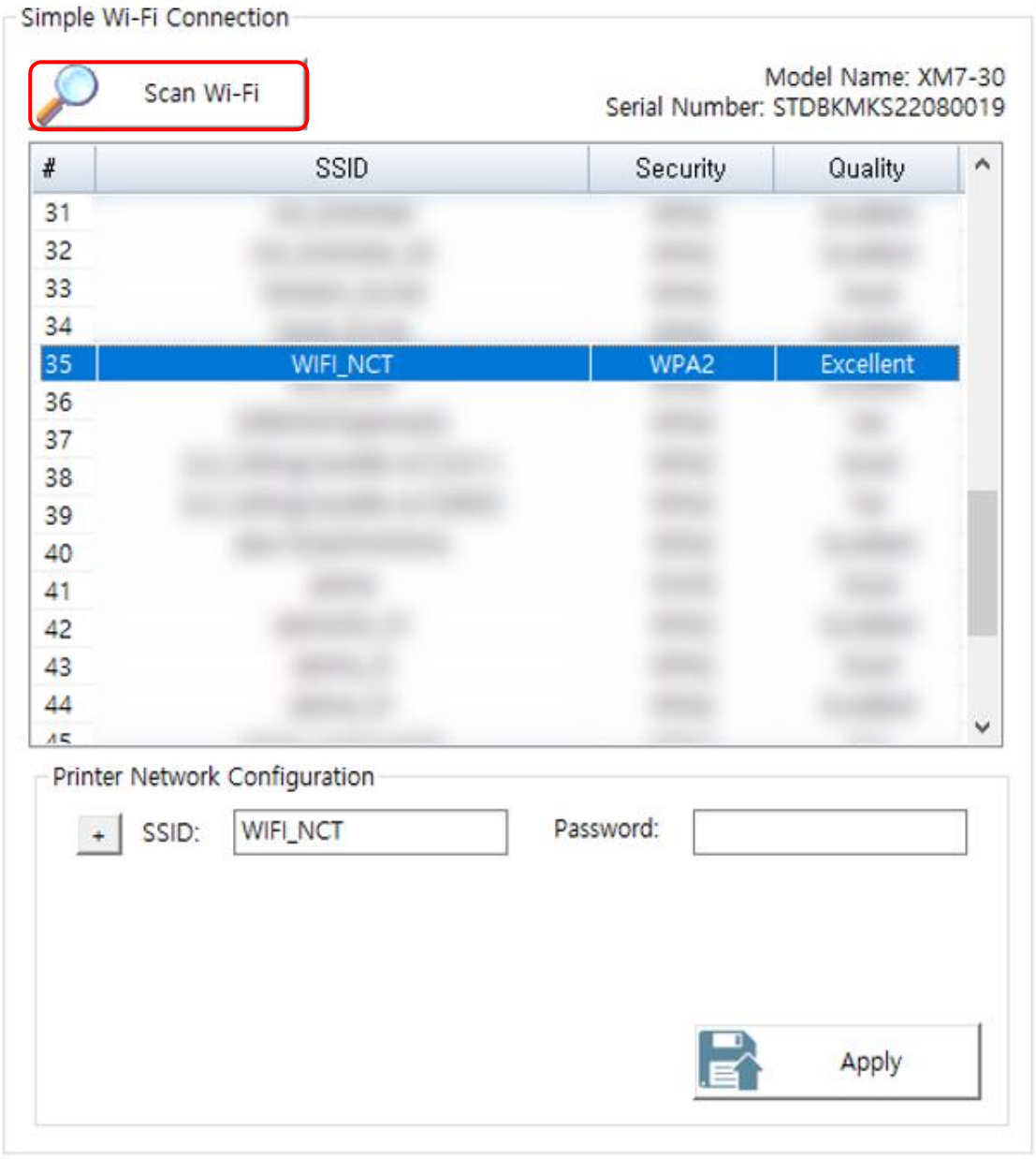


6-3-1 Configuration of wireless network information using SWC

1. Set the printer to SWC mode.
2. Click the Scan Wi-Fi button.

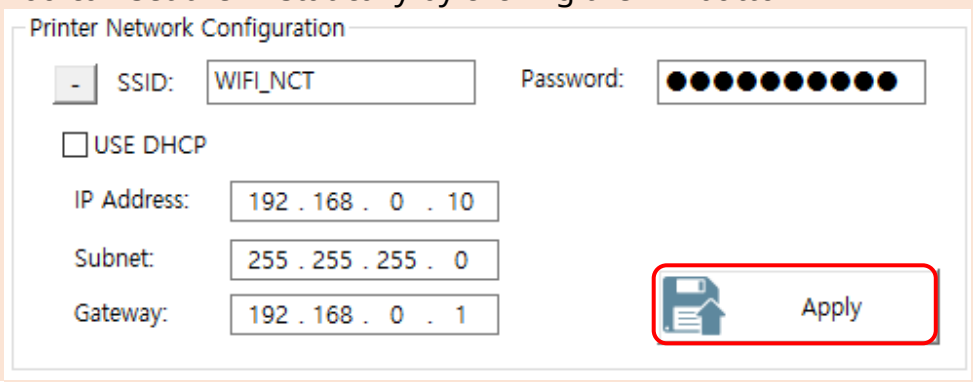
> When you click the Scan Wi-Fi button, the host attempts to connect to the printer's wireless network, and the host's Internet may be disconnected at this time.

3. When the list of AP information around the printer appears, select the desired AP.



4. Enter your Wi-Fi password and click the Apply button.

You can set the IP statically by clicking the + button



5. Wait for the configuration to be applied to the printer. The application time may vary depending on the network environment.

Revision history

Rev.	Date	Description
4.00	2017-01-15	New
4.01	2017-08-07	New document style applied. Information for the supported Printer models added.
4.02	2017-11-22	Information for the supported Printer models updated.
4.03	2017-11-24	Screen shot images are changed.
4.04	2018-01-04	Information for the supported Printer models added. Information about network setting using web browser added.
4.05	2018-03-12	Information for the supported Printer models added. Screen shot image is changed.
4.06	2018-05-16	Information for the supported Printer models modified.
4.07	2018-08-28	Information for the supported Printer models modified. Some description moved into “note” tables.
4.08	2019-01-18	Information for the supported Printer models modified. Information about factory reset and certificate name added.
4.09	2019-03-04	Information for the supported Printer models modified.
4.10	2019-06-21	Information for the supported Printer models modified.
4.11	2019-10-30	Information for the supported Printer models modified.
4.12	2019-11-28	Information for the supported Printer models modified.
4.13	2020-03-10	Information for the supported Printer models modified. Adding port information.
4.14	2020-09-17	Information for the supported OS modified Information for the supported Printer models Modified. (SRP-S320)
4.15	2020-11-10	Information for the supported Printer models Modified. (SRP-S3000, SRP-S3000_LABEL)
4.16	2021-02-26	Information for the supported Printer models Modified. (SRP-B300, SRP-S200)
4.17	2021-06-17	Screen shot images are changed. Added Note about filtering function.
4.18	2021-08-17	Information for the supported Printer models Modified. (XT3-40, XT3-43)
4.19	2022-01-03	Wireless LAN setup guide updated.
4.20	2022-04-22	Information for the supported Printer models Modified. (XM7-30) Add Simple Wireless LAN Configuration.
4.21	2022-05-25	Information for the supported Printer models Modified. (SRP-330III, SRP-332III)
4.22	2022-06-03	Information for the supported Printer models Modified. (SRP-350V, SRP-350plusV Series)
4.23	2022-07-21	Information for the supported Printer models Modified. (SRP-380II, SRP-382II)
4.24	2022-12-29	Added how to use Simple Wi-Fi Connect.
4.25	2023-03-13	Information for the supported Printer models Modified. (G30)