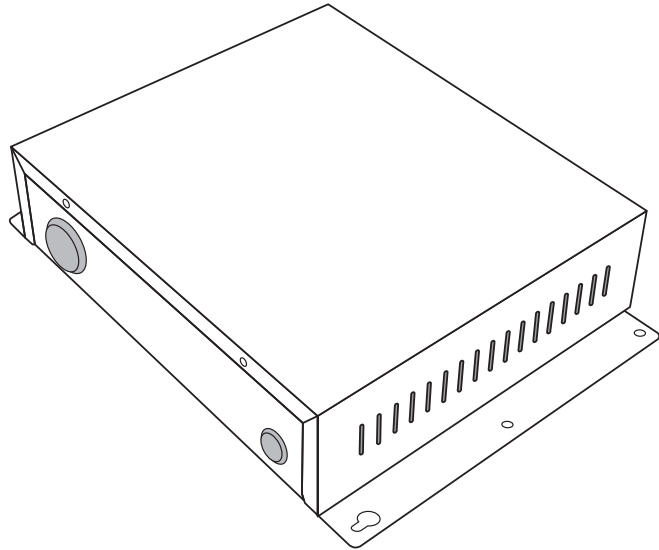


APPLICATION MANUAL

Tool for Network Convertor

网络转换器的工具

UTY-VLGX



KEEP THIS MANUAL FOR FUTURE REFERENCE

使用产品前请仔细阅读本使用说明书

请保留本说明书以供今后参考

Contents

1 OUTLINE

1-1. System Outline

1-2. Setting (Initial Setting) & Confirming Flow

2 SETTINGS

2-1. Installing the Tool for Network Converter

2-1-1. Operating Environment.....5

2-1-2. Installing the Tool for Network Converter.....5

2-1-3. Uninstall the Tool for Network Converter.....6

2-2. Connecting the PC^{*1} and Network Converter

3 SETTING THE PCB^{*2}

3-1. Installation Mode

3-2. Normal Mode

4 BASIC OPERATION

4-1. Starting the Tool for Network Converter.

4-2. Selecting the “Connection environment” between the Network Converter and the Tool for Network Converter.

4-3. Setting the “ID Number” of the Network Converter.

4-4. Switching the function of the Tool for Network Converter./end.

5 SETTING THE NETWORK CONVERTOR (INITIAL SETTING)

5-1. “Layout of Indoor & Outdoor Unit Address” data is made.

5-1-1. Delete all data of “Layout of Indoor & Outdoor Unit Address”..... 15

5-1-2. Delete any data of “Layout of Indoor & Outdoor Unit Address”. 15

5-1-3. Register the data of “Layout of Indoor & Outdoor Unit Address” in Network Converter. 16

5-1-4. Saving the file of the “Layout of Indoor & Outdoor Unit Address” data registered in the Network Converter in PC. 17

5-1-5. Opening the saved file data of the “Layout of Indoor & Outdoor Unit Address” in PC..... 18

5-1-6. Confirming the read in of the Layout of Indoor & Outdoor Unit Address” data registered in the Network Converter. 19

5-1-7. Saving the file of the data of the “Layout of Indoor & Outdoor Unit Address” read in from the Network Converter. 20

5-1-8. Printing the data of the “Layout of Indoor & Outdoor Unit Address” read in from the Network Converter. 21

5-2. Setting the communication mode between the Network Converter and BMS^{*3}.

5-2-1. Setting the “Mode 1 (Property of Sending Data to BMS)”..... 22

5-2-2. Setting the “Mode 2 (Condition of Sending Data to BMS)”..... 23

*1 PC : Personal Computer

*2 PCB : Printed Circuit Board

*3 BMS : Building Management System

- 5-2-3. Setting the “Mode 3 (Condition of Transmission start all NVs)”23
- 5-2-4. Setting the “Mode 4 (Condition of the Room temperature output)”23
- 5-2-5. Opening the data saved in PC to the Tool for Network Converter.24
- 5-2-6. Saving the setting data in PC.24
- 5-2-7. Opening the setting data in Network Converter.25
- 5-2-8. Register the setting data in Network Converter.26

5-3. Making the “XIF”^{*1} file.

- 5-3-1. Making the “XIF” file on the Tool for Network Converter. (In case of the Default value is changed).....27
- 5-3-2. Opening the saved “XIF” file in PC.28
- 5-3-3. Saving the “XIF” file made by the Tool for Network Converter in PC.....28

5-4. Confirming the product information of the Network Converter.

- 5-4-1. Confirming the load in the information of the “FROM Check Sum” in the Network Converter.29
- 5-4-2. Saving the information of the “FROM Check Sum” in the Network Converter in PC.30
- 5-4-3. Changing the “ID Number” of the Network Converter.31

6 DESCRIPTION OF THE MAIN SCREEN

-32

7 SERVICE PIN

-35

*1 XIF: External Interface File

Notice

Please print the "Application Manual" in "Manual" folder of the attached CD-ROM before start the setting operation work from now. Please prepare the "Installation Manual" attached that.

1. OUTLINE

- Connecting the Tool for Network Converter installed PC on the "Network Converter", setting or the setting contents can be confirmed.

The main functions are as follows.

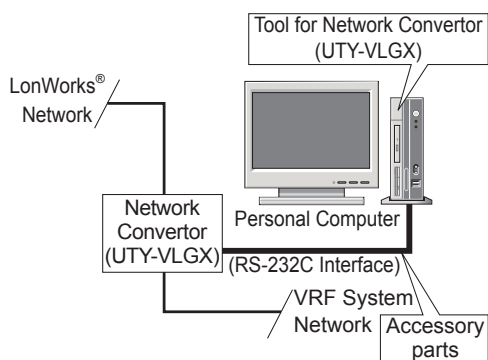
a) Setting (When Initial Setting)

- 1) "Indoor/Outdoor Unit Addresses"
- 2) "Configuration Properties"
- 3) "Making/Modifying the XIF"

b) Confirming

- 1) "Indoor/Outdoor Unit Addresses"
- 2) "Configuration Properties"
- 3) "FROM Check Sum of CPU (H8)"

1-1. System Outline



- The layout of the system is shown in Fig. Setting and confirming the Network Converter are performed using a PC. The RS-232C interface of the PC is used to connect the Tool for "Network Converter" to the PC.

Fig. System Outline

* LONWORKS® is registered trademark of Echelon Corporation in the United States and other countries.

1-2. Setting (Initial Setting) & Confirming Flow

- The Setting (Initial Setting) & confirming flow for the Network Converter is as follows. (Fig.)
- Following are the work item during on line operation. However, XIF making is also possible during off line operation.

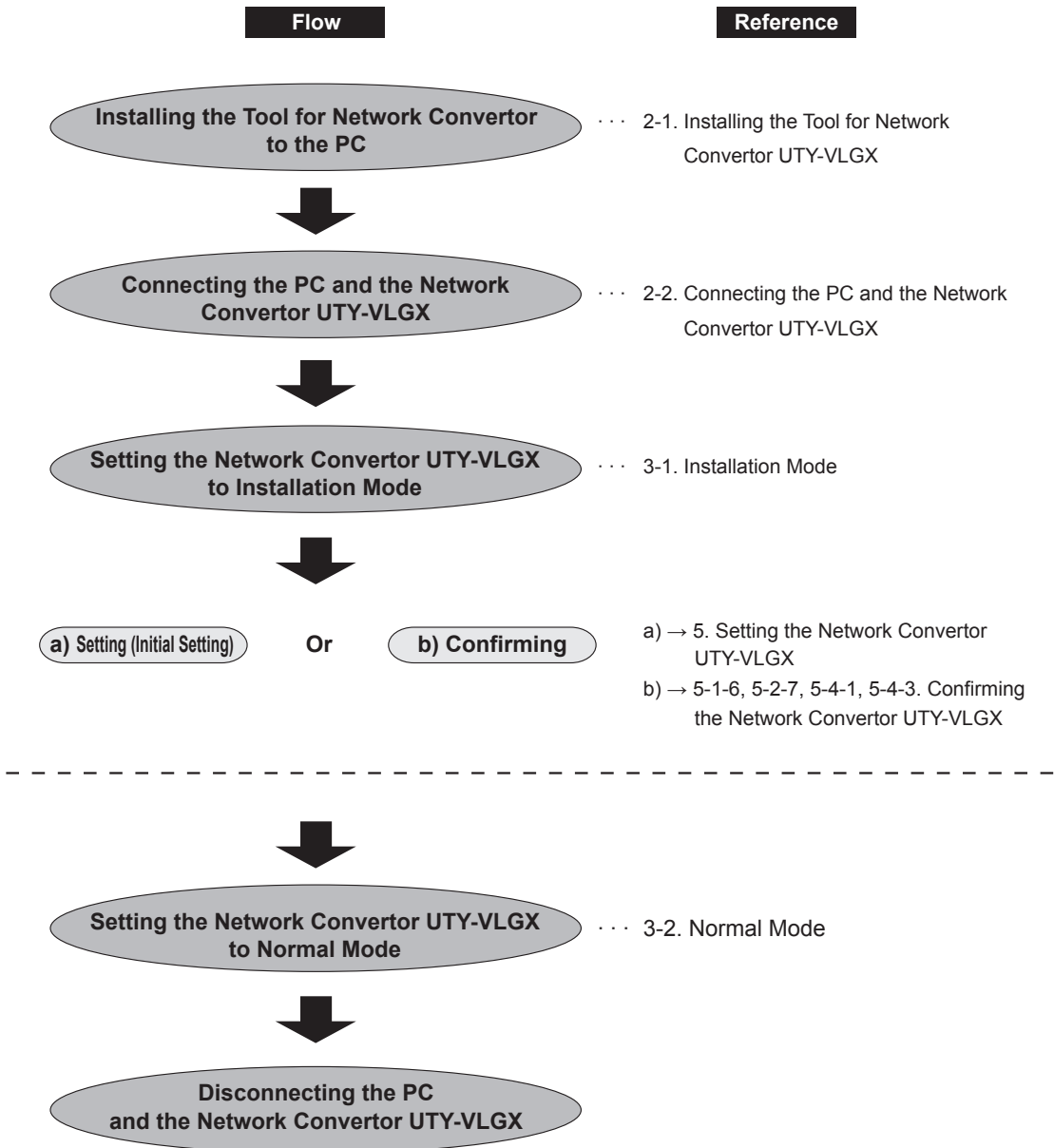


Fig. Setting (Initial Setting) & Confirming Flow

2.SETTINGS

- Install the application and connect the PC and Network Converter according to the following explanations.

2-1. Installing the Tool for Network Converter

- If not installing the Tool for Network Converter to a PC, install it according to the following explanation.

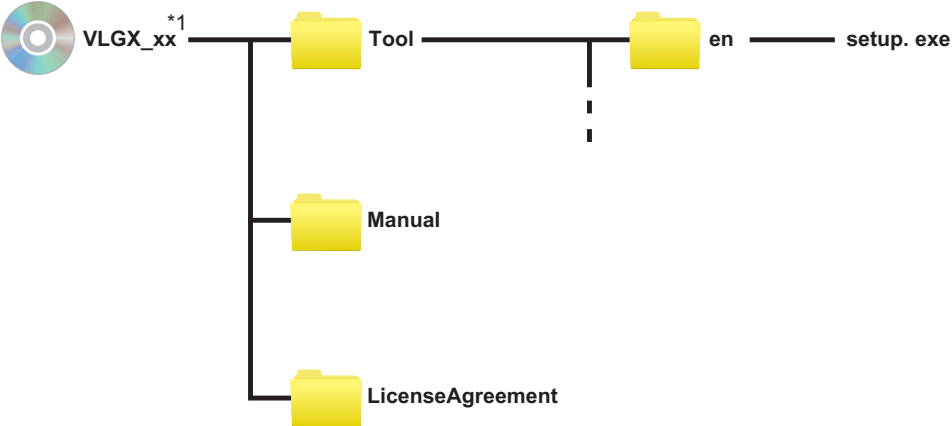
2-1-1. Operating Environment

- This program requires the following operating environment.

Personal Computer Specifications

	Tool for Network Converter (UTY-VLGX)
CPU	At compatible machine that runs Microsoft® Windows®
Memory	1GB (Vista), 128MB (XP) or more
Display	1024 x 768 dots or more, High color (16bit) or more
Interface	Serial(RS232C) port (x1) *Please be sure to use "COM1"
Operating System	Microsoft® Windows® XP Professional (English version/Chinese version) Service pack 3 or later Microsoft® Windows® Vista Home Premium (English version/Chinese version) Service pack 1 or later * 64-bit version of Windows® are not supported.
Required Hardware	CD-ROM drive
Required Software	Adobe® Reader 9.0 or later

CD-ROM Configuration (Accessory) : English version



*1. xx is arbitrary character.

2-1-2. Installing the Tool for Network Converter

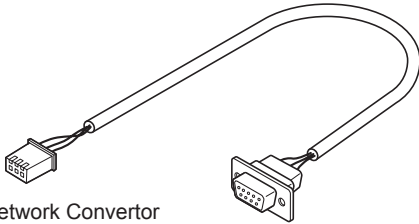
- Use the following procedure to install the Tool for Network Converter.
 - 1** Double-click the file "setup.exe".
 - ◆ Please follow the instructions on PC screen to install the Tool for Network Converter.

2-1-3. Uninstall the Tool for Network Converter

- Please follow the method of uninstall of each PC about the method of uninstall of Tool for Network Converter.

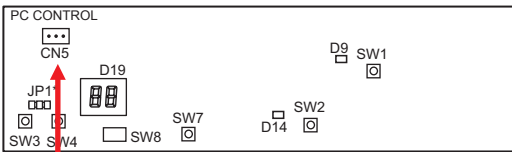
2-2. Connecting the PC and Network Converter

- Connect the PC to the Network Converter with the included cable*. Use the following procedure to connect the PC to the Network Converter.
* Cable: D-Sub 9-pin female connector - 3-pin female connector (Fig. 1). This cable is packed in the carton of the "Network Converter".



to Network Converter (3-pin connector) to PC (D-Sub 9-pin female connector)

Fig 1. Connector Cable



3

Fig 2. PCB Layout

Notice

Please start setting operation after putting the backup battery of the Network Converter into the state of "ON". (For detail, please refer to the Installation manual)

- 1** Turn off the power of both the PC and Network Converter.
- 2** Remove the cover of the Network Converter using a screwdriver. (Please refer to the Installation Manual)
- 3** Connect the 3-pin connector to the PC_CONTROL socket (CN5) on the PCB in the case. (Fig.2)
- 4** Connect the D-Sub 9-pin female connector to the 9-pin serial port (COM 1) of the PC.
- 5** Turn on the power of both the PC and Network Converter.

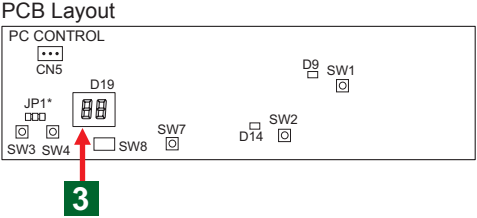
Notice

The serial port connected with Network Converter must use "COM 1".

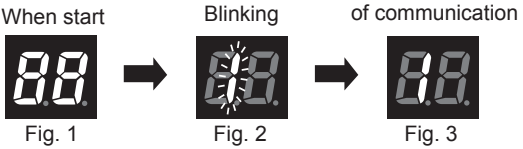
3.SETTING THE PCB

• When setting or confirming the Network Converter, the PCB must be set to the installation mode. (Fig.)

3-1. Installation Mode

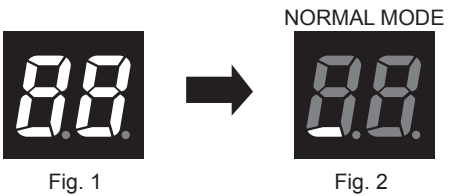


D19 LED



- Set the Network Converter to the “installation mode” according to the following procedure.
 - 1 Remove the cover of the Network Converter.
 - 2 Make sure that the power of the Network Converter is ON.
 - 3 Select the special mode by pressing and releasing SW7 (reset button) while holding down SW4 (set button) until special mode “1” (Blinking) is displayed. Please keep holding down SW4 (set button) a few seconds after releasing the SW7 (reset button). Fig. 2 (Lighting). It becomes Installation Mode.
 - 4 Press SW4 (SET button). “1” (Lighting) will appear as shown in Fig. 3.

3-2. Normal Mode



- For normal operation, the PCB must be set to the normal mode. Set the Network Converter to the normal mode according to the following procedure.
 - 1 Turn the power off and on or press SW7 (reset button) to exit from installation mode. Anyone of the code in D19 LED display.









Note
 When error occurs, “LED Display (D19)” on the PCB of the Network Converter will display the error code. Or, the content is displayed on the screen of PC.

D19 LED Display Code
 (1) Normal code

Normal code	Contents
	Normal mode
	Set state of “Tool for Network Converter”
	Address setting mode
	Under maintenance
	FB* and unit address allocation in-formation is registered with “Tool for Network Converter”

FB*: Functional Blocks

(2) Error code

Error code	Contents
	FB and unit address allocation information is not registered
	Main PCB error
	VRF Network error
D9 LED lit or blinking   D9 D9	Communication error (The Error of the Network interface Device on the VRF System side)
D14 LED lit or blinking   D14 D14	Communication error (The Error of the Network interface Device on the BMS side)*1
	When V series or S series is connected

*1. D14 is ON for 1 second, OFF for 1 second, and repeats. When D19 is in Normal mode, Commissioning is unset.

4. BASIC OPERATION

The basic operation of the Tool for Network Converter is described in the following explanations.

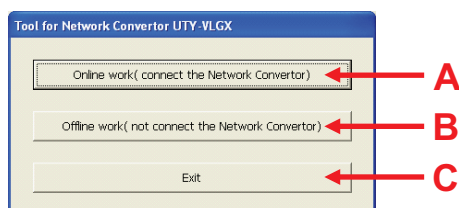
4-1. Starting the Tool for Network Converter.

- 1 On the taskbar, click [Start] → [Programs] → [Tool for UTY-VLGX] → [Tool for UTY-VLGX]
The screen shown in the PC.

- ◆ Start the Tool for Network Converter. Open the screen of “Connection environment” menu.

4-2. Selecting the “Connection environment” between the Network Converter and the Tool for Network Converter.

“Connection environment” manu



- Click the selected button of the “Connection environment” manu.

The items that can be selected are as follows.

- A. “Online work (connect the Network Converter)” :
Network Converter and Tool for Network Converter connect and perform the setting operation.
- B. “Offline work (not connect the Network Converter)” :
XIF file making is also possible during off line operation.
- C. “EXIT” : End the Tool for Network Converter.

Notice

Please check the following if error occurs when begin to communicate with Network Converter.

1. Is the cable connecting the Network Converter with PC disconnected?
2. Is the “COM 1” of the serial port of PC used?
3. Is there a power supply of Network Converter?
4. Is the Network Converter is set in “Installation Mode”?

Note

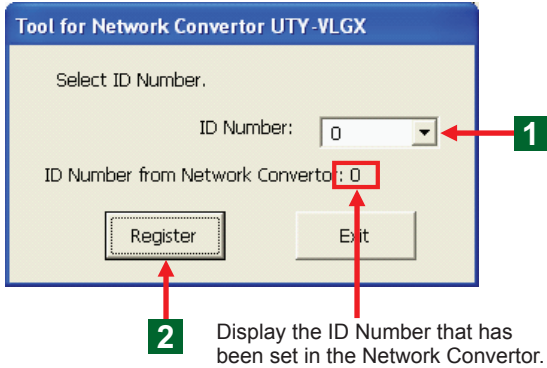
When error occurs, the “Error” message display will displayed on the screen of PC. The error is displayed on the “LED (D19)” of the Network Converter. Please refer to the “LED Display Code (D19)” of the “3-2 Normal Mode”. Please contact authorized service personnel.

Note

It is the “Connection environment” of the relation of 1 to 1, the Tool for Network Converter and the Network Converter. The trouble of the VRF system and BMS is not affected.

4-3. Setting the “ID Number” of the Network Converter.

“Select ID Number”



- When connect 1 BMS with 2 or more Network Convertors, “Tool for Network Converter (Application Software)” must be reactivated after the setting of the “Network Converter” of different “ID Number” ends, when two or more “Network Converter” is set up.
- Set the ID Number of the set up Network Converter.
- ◆ This screen opens automatically when the connection environment menu is selected.

Note

The default value of “ID Number” is set as 0. Please set Each different “ID Number” when you set up two or more Network Converter.

Note

The maximum number of Network Converter that can be connected with 1BMS is 4.
Please set each different “ID Number” from 0 to 3.

- 1 Click the [▼] button to select the setting “ID Number”.
- 2 Click “Register” button.

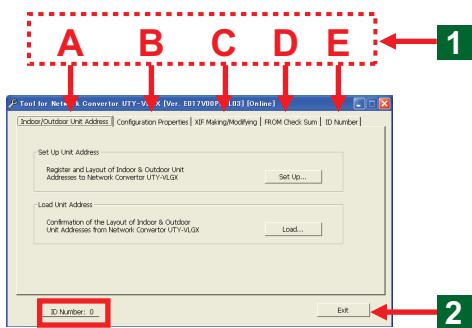
- Set the selected “ID Number” in the Network Converter.

Notice

If the “Exit” button is clicked, the Tool for Network Converter will end.

4-4. Switching the function of the Tool for Network Converter./end.

Function switching (Tab)
 "Indoor/Outdoor Unit Address"



Display the "ID Number" of Network Converter that is in setting.

- If the function switching tab is clicked, the function and the screen will switch.

1 Click the tab of the selected function.

The items that can be selected are as follows.

- A. "Indoor/Outdoor Unit Address" :
 Register the Address data in the Network Converter.
 → "Indoor/Outdoor Unit Address"
- B. "Configuration Properties" :
 Set the communication mode between the Network Converter and BMS
 → "Configuration Properties"
- C. "XIF Making/Modifying" :
 In order to binding on the Network Integration Tool, make the necessary XIF file.
 → "XIF Making/Modifying"
- D. "FROM Check Sum" :
 Display the "FROM Check Sum" and Software Version of the CPU used in the Network Converter.
 → "FROM Check Sum"
- E. "ID Number"
 Set "ID Number" on the Network Converter.
 → "ID Number"

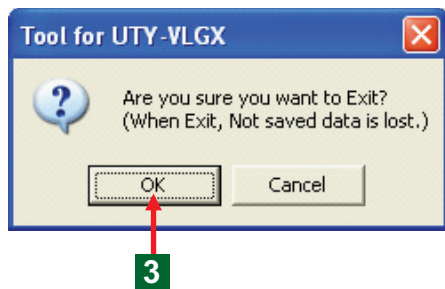
- End the Tool for Network Converter.

2 Click "EXIT" button.

- ◆ The screen of the end confirmation of "Are you sure you want to Exit? (When Exit, Not saved data is lost.) opens.

3 Click "OK" button.

- ◆ End the Tool for Network Converter.



Notice

Delete the made data information when end the application. Then end the operation after save the necessary setting file.

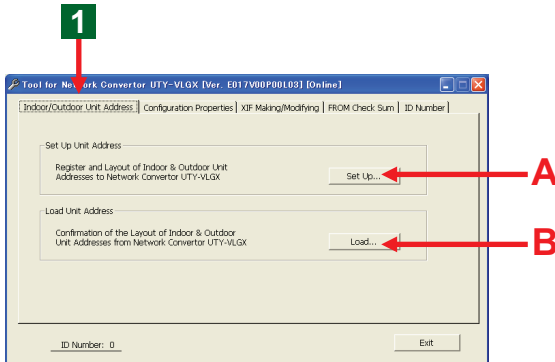
5. SETTING THE NETWORK CONVERTOR (INITIAL SETTING)

Each of the following operations to set (initial setting) the Network Convertor is explained.

- 1) "Layout of Indoor & Outdoor Unit Address"..... (required)
- 2) "Configuration Properties"..... (not required)
- 3) Making the "XIF" data.....(required)

5-1. "Layout of Indoor & Outdoor Unit Address" data is made.

"Indoor/Outdoor Unit Address"



- 1 Click the "Indoor/Outdoor Unit Address" tab.

- ◆ The screen of the "Indoor/Outdoor Unit Address" opens.

Note

The functions that can be selected are as follows.

- A. "Set Up Unit Address" :

Make the "Layout of Indoor & Outdoor Unit Address" data and register the Network Convertor. In addition, the file of the made setting information can be saved in PC. The saved PC data can be confirmed.

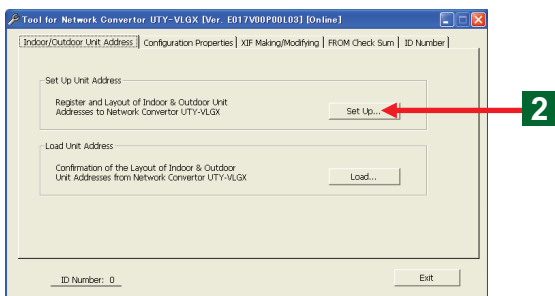
- B. "Load Unit Address" :

The read of the "Layout of Indoor & Outdoor Unit Address" data registered in the Network Convertor. The Tool for Network Convertor can be confirmed and the file can be saved.

- C. Printing :

The "Layout of Indoor & Outdoor Unit Address" data that "Loads" from the "Network Convertor" can be printed.

"Indoor/Outdoor Unit Address"



- Register the "Layout of Indoor & Outdoor Unit Address" data in the Network Convertor.

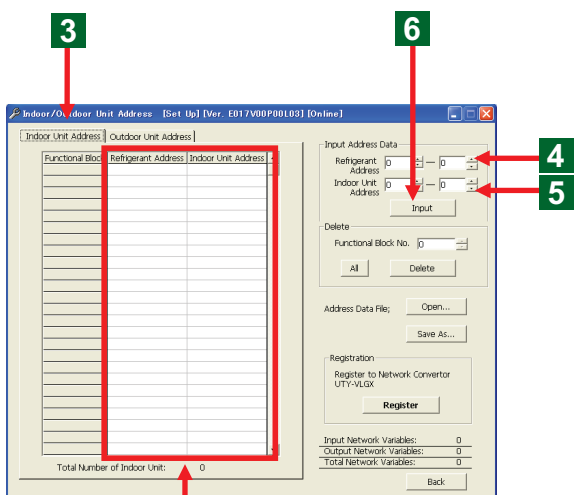
- 2 Click the button of the "Set Up".

- ◆ The screen of the "Set Up Unit Address" opens.

Note

In order to control the Indoor Unit and Outdoor Unit that exists in VRF system from BMS, the "Layout of Indoor & Outdoor Unit Address" is the related Address.

“Set Up Unit Address” (Indoor Unit)



Display section of Address that has been Layout

- Begin setting the “Set Up Unit Address”.
- First, set the “Refrigerant Address” and the “Indoor Unit Address”.
- 3** Click the tab of the “Indoor Unit Address” on the Address List Part.
- ◆ Switch the setting of the “Indoor Unit Address” on the Address List Part.
- Register the “Refrigerant Address” and the “Indoor Unit Address”.
- 4** Select the Address Number after click the “▲” “▼” button of the “Refrigerant Address”.
- 5** Select the Address Number after click the “▲” “▼” button of the “Indoor Unit Address”.
- 6** Click “Input” button.

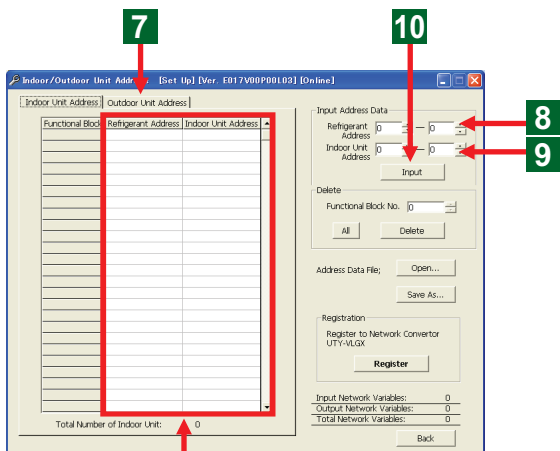
Notice

Please set the same “Refrigerant Address” of the “Indoor Unit” and the “Outdoor Unit”.

Note

The “FB No.” is automatically allocated to the “Refrigerant Address” and the “Indoor/Outdoor Unit Address” in this tool.

“Set Up Unit Address” (Outdoor Unit)



Display section of Address that has been Layout

- Continue to register the “Refrigerant Address” and the “Outdoor Unit Address”.
- 7** Click the tab of the “Outdoor Unit Address” on the display section of the Address that has been Layout.
- 8 9** Input the “Refrigerant Address” and the “Outdoor Unit Address”.
Please refer to the “Example : the input method of address” as follows.
- 10** Click “Input” button.
- ◆ The “FB No.” was automatically allocated to the “Registered” “Refrigerant Address” and “Outdoor Unit Address”.

Note

If input “Indoor/Outdoor Unit Address” The “FB No.” was automatically allocated as the following.
“Indoor Unit Address” is from 0 to 127.
“Outdoor Unit Address” is from 0 to 99.

Note

The “Refrigerant Address” can be input from 0 to 99. The “Indoor Unit Address” can be input from 0 to 63.
* Now, the maximum number that can be set up is 48.
The “Outdoor Unit Address” can be input from 0 to 3.
* The address of the present VRF system is from 0 to 2.

Note

The “Outdoor Unit Address” including the case of set up one outdoor unit must be set from 0. And then, please set it in the order of 1, 2. Don’t jump the order of the number. Please refer to the attachment of the “Outdoor Unit Address” on the left.

For example: The attaching method of the Outdoor

Outdoor Unit	No. of Address		
Master	0	-	-
Master + Slave1	0	1	-
Master + Slave1 + Slave2	0	1	2

For example : the input method of address

Notice:

Please prepare the material of the “Indoor/Outdoor Unit Address” and the “Refrigerant Address” registered in “VRF system” that can be understood at a glance before start inputting “Address”.
The setting method of the registered address is explained by using a case.

For example:

Register the following equipment address of the VRF system.

● **VRF system**

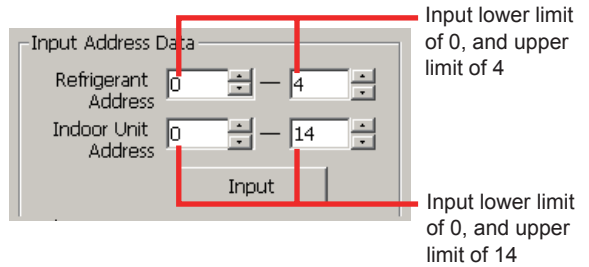
Refrigerant System: 6 Systems

Outdoor Unit: 17 Units

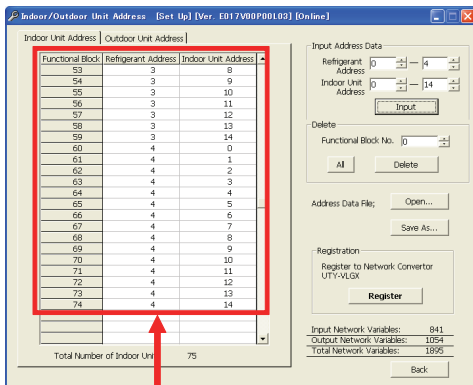
Indoor Unit: 83 Units

Refrigerant System	Indoor Unit	Outdoor Unit
0	15	3
1	15	3
2	15	3
3	15	3
4	15	3
5	8	2
Total 6	Total 83	Total 17

- Please input the “Outdoor Unit Address” according to the instructed input method of the “Indoor Unit Address” and the same knacks till now.
 - Two or more “Refrigerant Address” and “Indoor Unit Address” can be input in a batch.
- (1) Input the “Refrigerant Address” from 0 to 4, and the “Indoor Unit Address” from 0 to 14.



“Set Up Unit Address” (Indoor Unit) (Fig. 1)



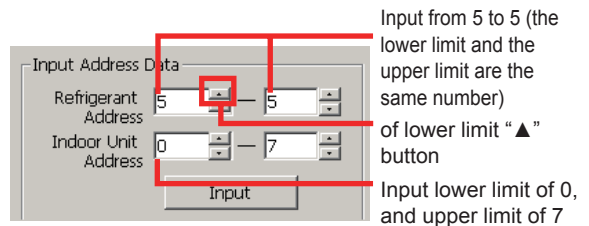
15 “Indoor Unit” each is set in the 0 to 4 system of the “Refrigerant Address”.

(2) Click “Input” button.

- ◆ 15 Indoor Unit each was set in the 0 to 4 system of the “Refrigerant Address”. Moreover, the “FB No” was automatically allocated. (Fig 1.)

- Register 5 of the “Refrigerant Address”. Register from 0 to 7 of the “Indoor Unit Address”.

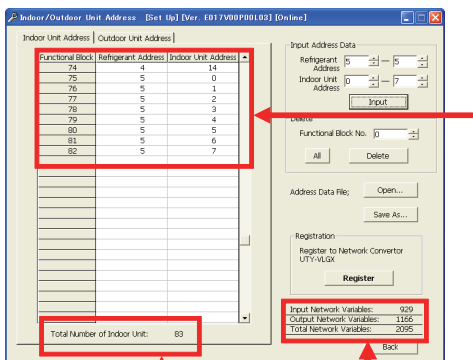
(1) Input 5 of the “Refrigerant Address”, and from 0 to 7 of the “Indoor Unit Address”.



(2) Click “Input” button.

- ◆ 8 “Indoor Unit” was set in the 5 system of “Refrigerant Address”. Moreover, the “FB No” is automatically allocated. (Fig. 2)

“Set Up Unit Address” (Indoor Unit) (Fig. 2)



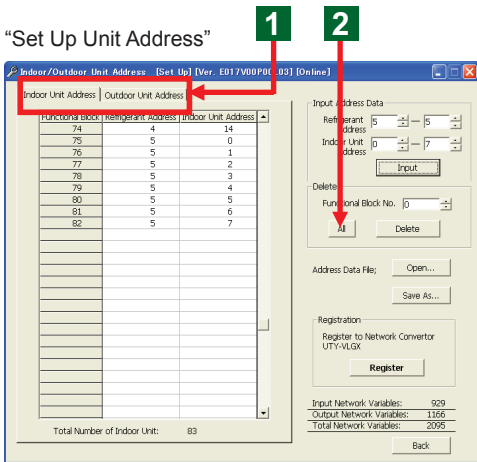
Note
When the lower limit and the upper limit are in the state of the same number, if click the “▲” button of the lower limit, the lower limit and the upper limit will switch at the same time. It is convenient when a single setting is input.

8 “Indoor Unit” is set in the 5 system of “Refrigerant Address”. And then, the input equipment address is displayed on the upper part of this window.

Note
The following information necessary for System Integration is automatically displayed.
A. “Indoor/Outdoor Unit” FB Display the total number of the unit.
B. The Network Variable Number that sent and received by the “Network Convertor” is displayed:
Input: Received total number of NV*.
Output: Sent total number of NV.
Total: Sum total of the input and Output.

* NV : Network Variable

5-1-1. Delete all data of “Layout of Indoor & Outdoor Unit Address”



- Delete all data of “Layout of Indoor & Outdoor Unit Address”.

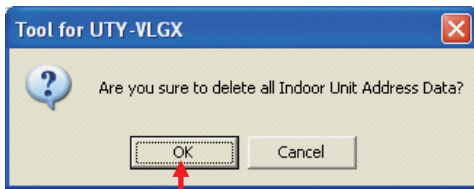
1 Click the tab of “Indoor Unit Address” or “Outdoor Unit Address” with the deleted Address.

2 Click the “All” button of the “Delete” section.

- ◆ Open the screen of “Are you sure to delete all Indoor Unit Address (Outdoor Unit Address) Data?.” for confirmation of deleting all data.

3 Click “OK” button.

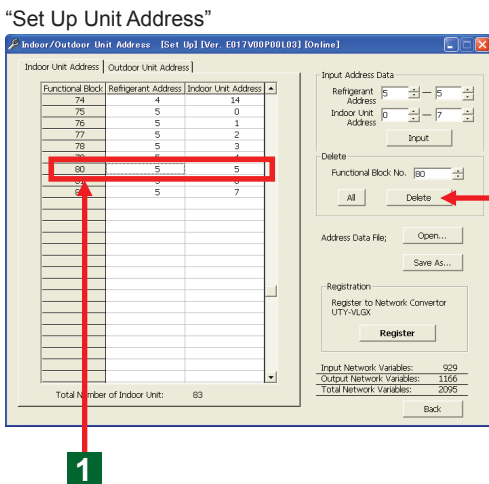
- ◆ The address content of the opened “Indoor Unit Address” or “Outdoor Unit Address” was deleted.



Note

If “All” button is clicked, all the address data will be deleted. It is not possible to regain. Please pay attention to it.

5-1-2. Delete any data of “Layout of Indoor & Outdoor Unit Address”.



- Delete any data of “Layout of Indoor & Outdoor Unit Address”.

[The selection method of the “FB No.” on the display of Address List]

1 Click the “FB” of the address list display.

- ◆ Select the line of the selected “FB” and “Indoor & Outdoor Unit Address”.

- ◆ The selected “FB No.” of the “Delete” section was displayed in window.

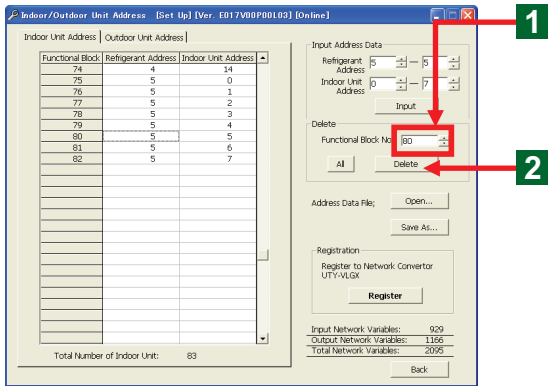
2 Click “Delete” button.

- ◆ The deleted “FB” and “Indoor & Outdoor Unit Address” disappear on the display.

Note

When any line is deleted, the Address of FB below the deleted line will move up automatically.

“Set Up Unit Address”



[The setting method of the deleted “FB No.” on the “Delete” part of the display]

1 Click “▲” “▼” button to select the “FB No.” in the “Delete” section.

2 Click “Delete” button.

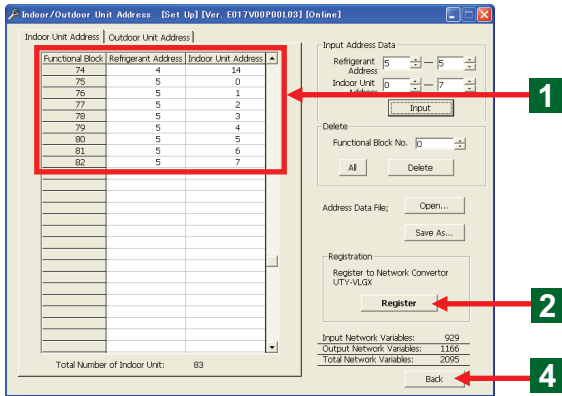
- ◆ The address list of the line of selected “FB” was deleted.

Note

In case of Address of any “FB” was deleted, the FB below the deleted one will move up automatically.

5-1-3. Register the data of “Layout of Indoor & Outdoor Unit Address” in Network Converter.

“Set Up Unit Address”



- Register the data of “Layout of Indoor & Outdoor Unit Address” in Network Converter.

1 Confirm the data information of the “Layout of Indoor & Outdoor Unit Address”.

2 Click “Register” button.

- ◆ The screen of “Now, Registering Indoor Unit Address Data” displays that the Indoor Unit is in registration. (The screen will close automatically)

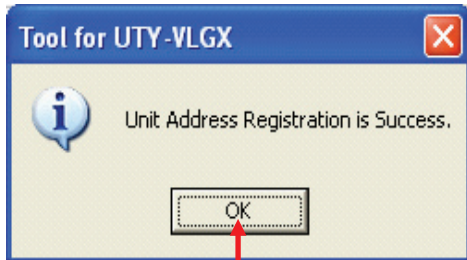
- ◆ Register the data information of the “Layout of Indoor & Outdoor Unit Address” in the Network Converter

- ◆ After “Register” is completed, the screen of the “Unit Address Registration is Success” opens.

3 Click “OK” button.

- ◆ The screen of the “Register” is completion closes.

- ◆ If it is “Success”, the D19 (LED) in the “Network Converter” will display “Ud”.



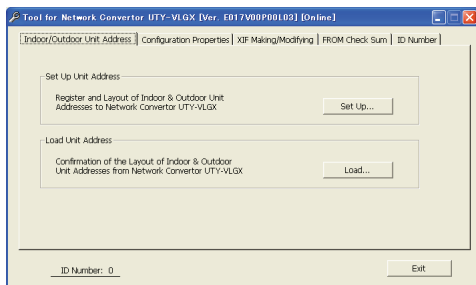
3

Note

“Register” the data information in the Network Converter becomes effective only in case of the “Connection environment” menu is in “Online work” state. In case of using on the “Offline work” state, after a necessary file is saved once, Please switch to “Online work” state by restarting the Tool for Network Converter. (For detail, please refer to 4-2)

Function switching (Tab)

“Indoor/Outdoor Unit Address” :



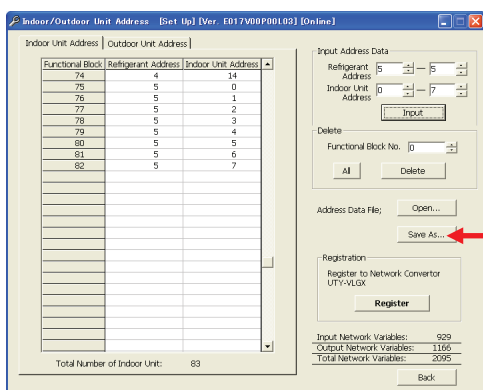
- After each operation ends, return to the function switching (Tab) screen.

4 Click “Back” button.

- ◆ The “Indoor/Outdoor Unit Address” screen opens.

5-1-4. Saving the file of the “Layout of Indoor & Outdoor Unit Address” data registered in the Network Converter in PC.

“Set Up Unit Address”



- Save the file of the made “Layout of Indoor & Outdoor Unit Address” data in PC.

1 Click “Save” button.

- ◆ The window of “Save” opens.

2 Select a file saving directory.

3 Fill in the “File name when saving it”.

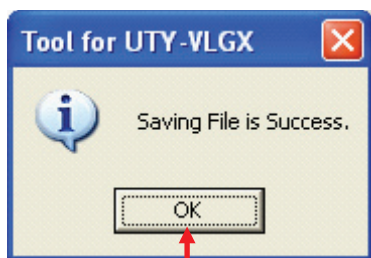
4 Click the “Save” button.

- ◆ Start saving.

- ◆ After the file saving is completed, the screen of “Saving File is Success” opens.

5 Click “OK” button.

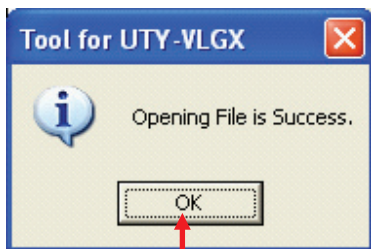
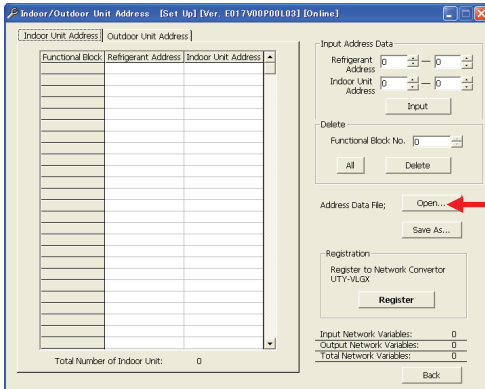
- ◆ That screen closes.



5

5-1-5. Opening the saved file data of the “Layout of Indoor & Outdoor Unit Address” in PC.

“Set Up Unit Address”

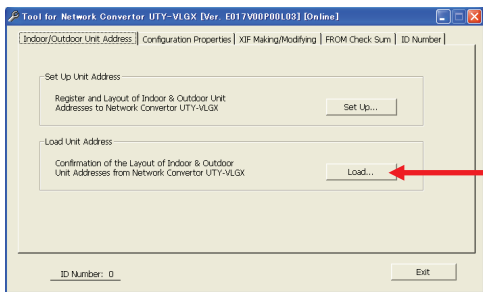


- Saved the “Layout of Indoor & Outdoor Unit Address” data from PC is confirmed or changed.

- 1** Click “Open” button.
 - ◆ The window of “Open” opens.
- 2** Open the directory that the file is saved.
- 3** Select the read in file.
- 4** Click the “Open” button.
 - ◆ Start opening
 - ◆ After the file reading in is completed, the screen of “Opening File is Success” opens.
- 5** Click “OK” button.
 - ◆ That screen closes.

5-1-6. Confirming the read in of the Layout of Indoor & Outdoor Unit Address” data registered in the Network Converter.

“Indoor/Outdoor Unit Address”



- Confirm the read in of the “Layout of Indoor & Outdoor Unit Address” data information registered in the Network Converter.

1 Click the “Load” button.

- ◆ The screen of the “Load Unit Address” opens. The previous data might be displayed sometimes. Please press the button of step [2] to display the new data.

2 Click “Load” button.

- ◆ Read in the “Layout of Indoor & Outdoor Unit Address” that has already been set the Network Converter.

- ◆ Use tab to switch the display of the read in “Indoor Unit Address” and “Outdoor Unit Address” in the display section.

- ◆ After “Load” is completed, the screen of the “Loading Unit Address is Success” opens.

3 Click “OK” button.

- ◆ That screen closes.

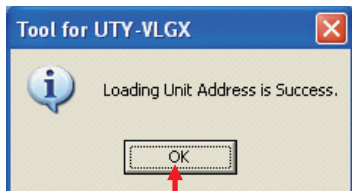
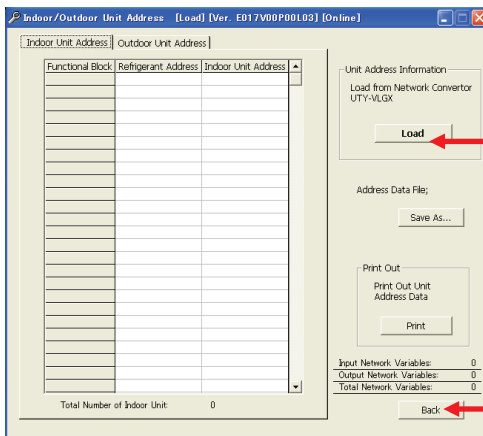
- Confirm the data information of the read in address. Please refer to 5-1-7 when that file of data is saved.

- Returns to the function menu after each operation ends.

4 Click “Back” button.

- ◆ The “Indoor/Outdoor Unit Address” screen opens.

“Load Unit Address”



3

Note

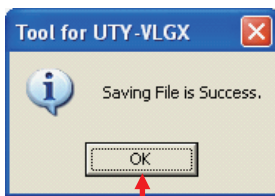
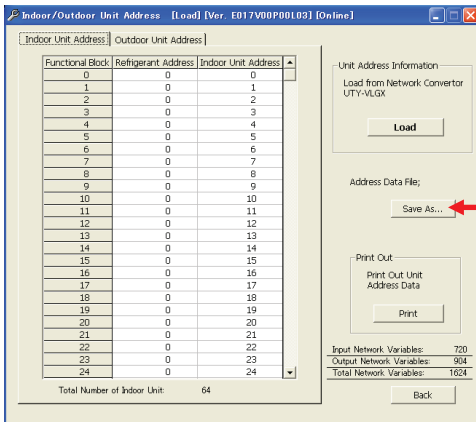
“Load” the data information from the Network Converter becomes effective only in case of the connection environment menu is in “Online work” state. In case of using on the “Offline work” state, after a necessary file is saved once, Please switch to “Online work” state by restarting the Tool for Network Converter. (For detail, please refer to 4-2)

Note

The data that displayed on the “Load” will not disappear even if the display of the “Indoor/Outdoor Unit Address” is returned with “Back” button. In addition, in case of the display of the “Load Unit Address” is open, please pay attention that the content of previous “Load” will be displayed, when “Load” is not made.

5-1-7. Saving the file of the data of the “Layout of Indoor & Outdoor Unit Address” read in from the Network Converter.

“Load Unit Address”

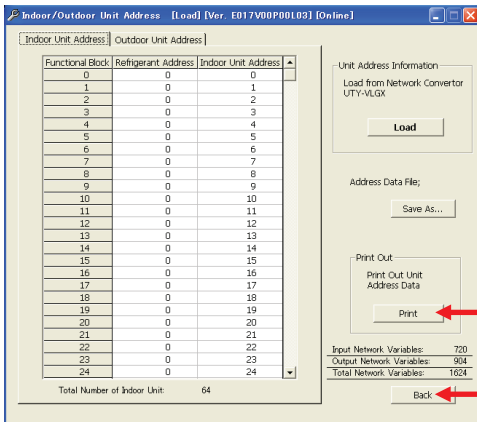


- Here, the file of the data information of “Layout of Indoor & Outdoor Unit Address” was saved in PC.

- 1** Click “Save” button.
 - ◆ The window of “Save with Name” opens.
- 2** Select a file saving address.
- 3** Fill in the “File name when saving it”.
- 4** Click the “Save” button.
 - ◆ Start saving
 - ◆ After the file saving is completed, the screen of “Saving File is Success” opens.
- 5** Click “OK” button.
 - ◆ That screen closes.

5-1-8. Printing the data of the “Layout of Indoor & Outdoor Unit Address” read in from the Network Converter.

“Load Unit Address”



- Print the “Layout of Indoor & Outdoor Unit Address” data information.

1 Click “Print” button.

- ◆ The window of “Print” opens.

Note

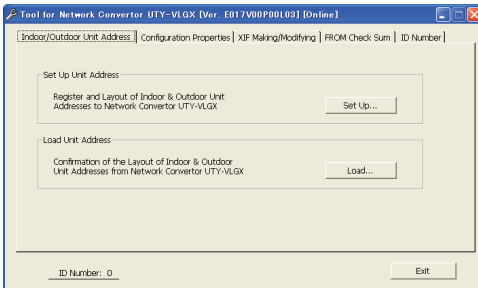
Please follow the operating manual of the printer connected with the PC for the detailed setting of the print.

- After each operation ends, return to the function switching (Tab) screen.

2 Click “Back” button.

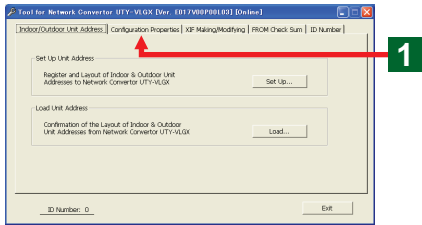
- ◆ The “Indoor/Outdoor Unit Address” screen opens.

“Indoor/Outdoor Unit Address”

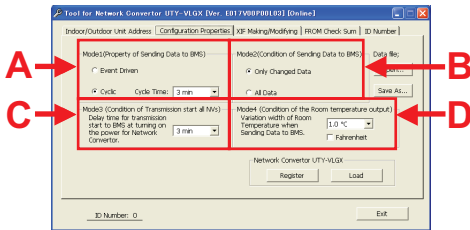


5-2. Setting the communication mode between the Network Converter and BMS.

Function switching (Tab)
"Indoor/Outdoor Unit Address"



"Configuration Properties"



- Switch to "Configuration Properties".
- 1 Click the "Configuration Properties" tab.

◆ The "Configuration Properties" screen opens.

Note

The default setting of "Configuration Properties" is as follows:

- "Mode 1 (Property of Sending Data to BMS)":
Cyclic, Cycle Time: 3 min.
- "Mode 2 (Condition of Sending Data to BMS)":
Only Changed Data
- "Mode 3 (Condition of Transmission start all NVs)":
3 min.
- "Mode 4 (Condition of the Room temperature output)":
1.0 °C Unit: Celsius

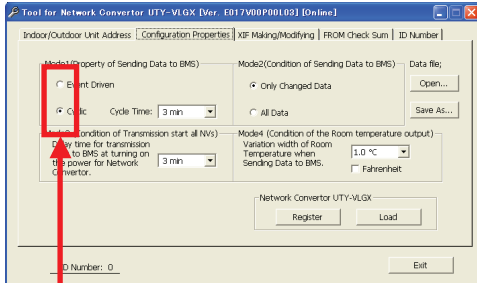
Note

Please set as follows if it is possible.

- "Mode 1 (Property of Sending Data to BMS)"
- "Mode 2 (Condition of Sending Data to BMS)"
- "Mode 3 (Condition of Transmission start all NVs)"
- "Mode 4 (Condition of the Room temperature output)"

5-2-1. Setting the "Mode 1 (Property of Sending Data to BMS)".

"Configuration Properties"



- Set the timing in which it begins to send the registered data information of the "Indoor/Outdoor Unit" from Network Converter to BMS.

Note

Please select as follows if it is possible.

"Event Driven" sends information uploading from the VRF system in real time to BMS.
"Cyclic" keeps the information uploading from the VRF system for certain time according to the set timing and then sends to BMS.

Note

In case of the "Cyclic" of sending information to BMS in a timing of certain time is set, it will be lack of real time property when "Cycle Time" is set at a long time. Moreover, the traffic amount of information will increase when setting at a short time.

- 1 Click the check box of the "Event Driven" or "Cyclic".

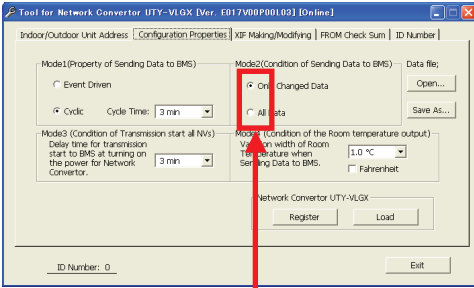
- When "Cyclic" is set, "Cycle Time" is set with "▼" button.

Note

The range of the "Cycle Time" can be set is from 2 min to 30 min. (the interval is 1min.)

5-2-2. Setting the “Mode 2 (Condition of Sending Data to BMS)”

“Configuration Properties”



- Set the condition of information sent from the Network Converter to BMS.

1 Click the check box of the “Only Changed Data” or “All Data”.

Note

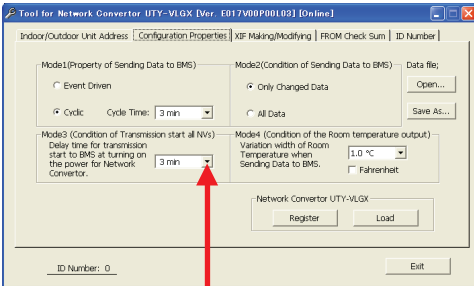
Please select as follows if it is possible. “Only Changed Data” only sends the changed information to BMS. “All Data” sends all data to BMS.

Note

It is possible to decrease the traffic amount of information sends to BMS compare with the “All Data” situation because only the changed information is selected, when the “Only Changed Data” is set.

5-2-3. Setting the “Mode 3 (Condition of Transmission start all NVs)”

“Configuration Properties”



- After the power supply of Network Converter is put into operation, set the beginning time for communication. Please make the settings suitable for the system.

1 The “Delay time for transmission start to BMS” is set by Click “▼” button.

Note

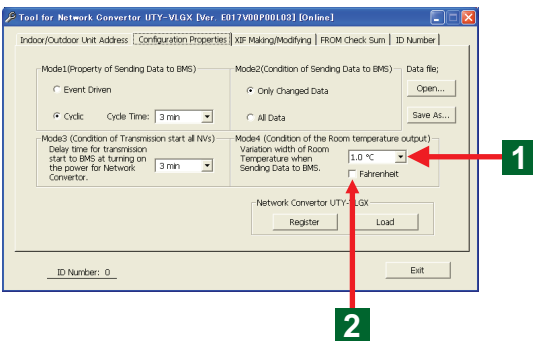
Because the equipment with different start up time exists together, the communication start is made stand by. Set the standby time and to avoid the trouble of communication.

Note

The range of the beginning time for sending information can be set from 1min. to 30 min. (the interval is 1 min.)

5-2-4. Setting the “Mode 4 (Condition of the Room temperature output)”

“Configuration Properties”



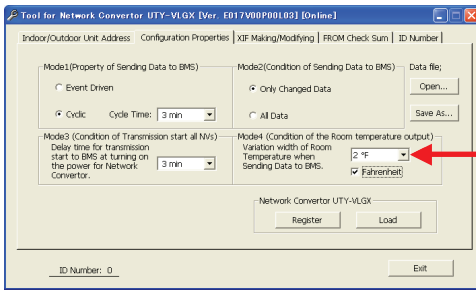
- In case of sending data information when the room temperature changes, set the minimum change range of the output room temperature data.

1 The “changing range of the room temperature” can be selected by Click “▼” button.

Note

The changing range of the sending room temperature data can be set at 0.5°C to 10.0°C (the interval is 0.5°C). Moreover, in case of it is displayed in Fahrenheit, the changing range can be set at 1°F to 20°F (the interval is 1°F). The traffic amount of information increases when the changing range is set small. Information can not be uploaded if the changing range is set big. The difference is generated in the operation condition of VRF system and the monitoring situation on the BMS side.

“Configuration Properties”



The temperature is displayed in Fahrenheit (°F).

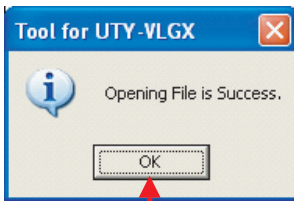
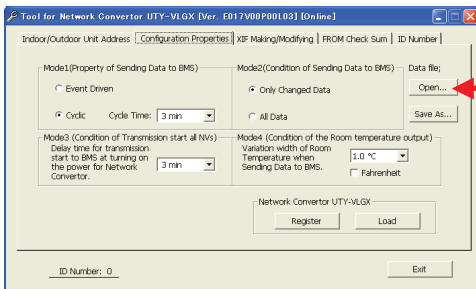
Note

The temperature unit can be switched from Centigrade (°C) to Fahrenheit (°F).

- In case of switching the temperature display from Centigrade (°C) to Fahrenheit (°F).
- 2 Click the check box of “Fahrenheit”.
 - ◆ The temperature display is switching from Centigrade (°C) to Fahrenheit (°F). If the check box is clicked again, it will return to display in Centigrade (°C).

5-2-5. Opening the data saved in PC to the Tool for Network Converter.

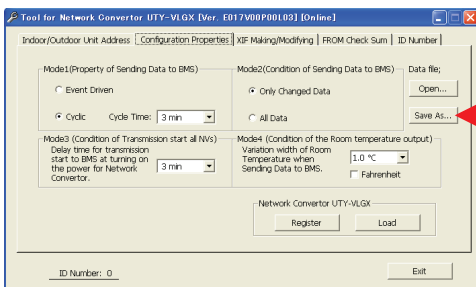
“Configuration Properties”



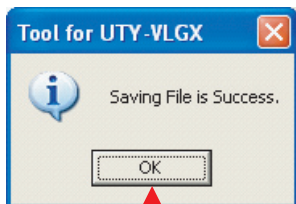
- Confirm the reading content of the set information saved in the file in PC.
- 1 Click “Open” button.
 - ◆ The window of “Open the file” opens.
 - 2 Open the directory that the file is saved.
 - 3 Select the read in file.
 - 4 Click the “Open” button.
 - ◆ Start opening.
 - ◆ After the file reading in is completed, the screen of “Opening File is Success” opens.
 - 5 Click “OK” button.
 - ◆ That screen closes.

5-2-6. Saving the setting data in PC.

“Configuration Properties”



- Confirm the change or else of the read in data information of the Tool for Network Converter, and save the file in PC.
- 1 Click “Save” button.
 - ◆ The window of “Save with Name” opens.
 - 2 Select a file saving directory.
 - 3 Fill in the “File name when saving it”.



5

4 Click the "Save" button.

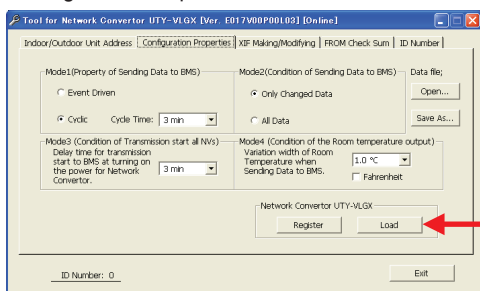
- ◆ Start saving.
- ◆ After the file saving is completed, the screen of "Saving File is Success" opens.

5 Click "OK" button.

- ◆ That screen closes.

5-2-7. Opening the setting data in Network Converter.

"Configuration Properties"



1

- Read the setting information in the Network Converter into the Tool for Network Converter, and confirm its content.

Note

Please save the file of the content displaying in the present display with "Save", for certain circumstance need it later before reading in the set information from the Network Converter with "Load" button.

1 Click "Load" button.

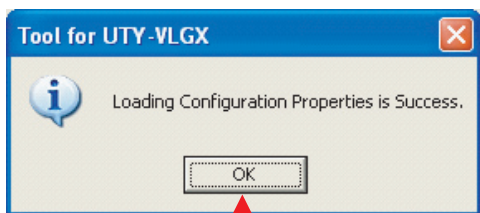
- ◆ The setting information read from Network Converter in the Tool for Network Converter is displayed on the screen.

- ◆ After "Load" is completed, the screen of the "Loading Configuration Properties is Success" opens.

2 Click "OK" button.

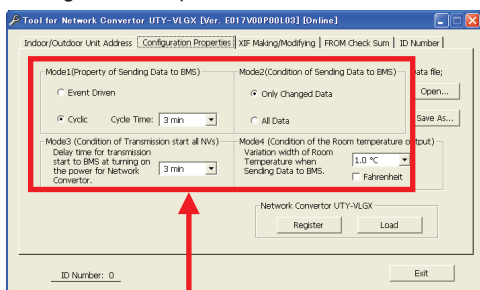
- ◆ That screen closes.

3 Change the displayed content of the setting information of the Network Converter.



2

"Configuration Properties"



3

Note

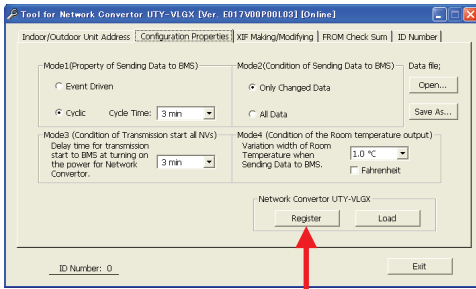
About the operation of changing the settings, please refer to from 5-2-1 to 5-2-4.

Note

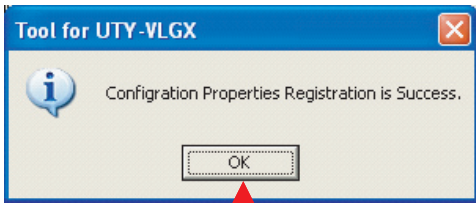
"Load" the data information from the Network Converter becomes effective only in case of the "Connection environment" menu is in "Online work" state. In case of using on the "Offline work" state, after a necessary file is saved once, Please switch to "Online work" state by restarting the Tool for Network Converter. (For detail, please refer to 4-2)

5-2-8. Register the setting data in Network Converter.

“Configuration Properties”



1



2

- Confirm the set (changed) data information, and register it in Network Converter.

1 Click “Register” button.

- ◆ The setting content is registered in the Network Converter, and the screen of the “Configuration Properties Registration is Success” opens.

2 Click “OK” button.

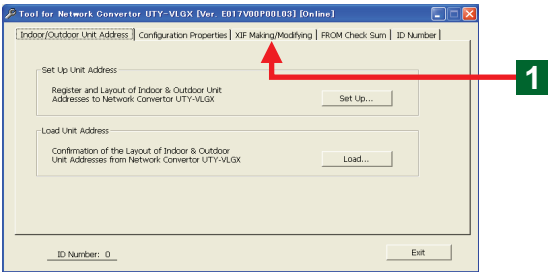
- ◆ The registration of the setting data ends.

Note

“Register” the data information in the Network Converter becomes effective only in case of the connection environment menu is in “Online work” state. In case of using on the “Offline work” state, after a necessary file is saved once, Please switch to “Online work” state by restarting the Tool for Network Converter. (For detail, please refer to 4-2)

5-3. Making the “XIF” file.

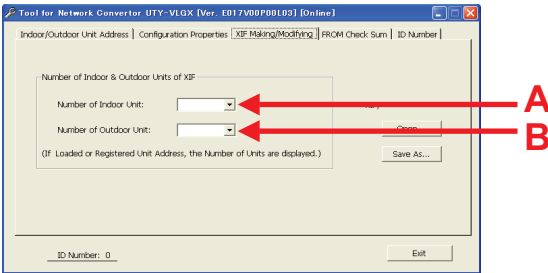
Function switching (Tab)
“Indoor/Outdoor Unit Address”



- In order to make Binding with the Network Integration Tool, the necessary “XIF” file is made.
- “ID Number” related information is included in the “XIF” file. The “ID Number” “Register” in the “Network Converter” must be in consistent with the ID Number” when the “XIF” file is made.

1 Click the tab of the “XIF Making/Modifying”.

“XIF Making/Modifying”



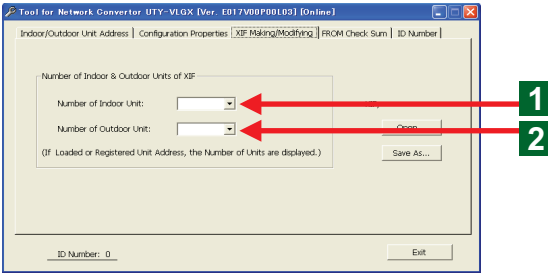
◆ The “XIF Making/Modifying” screen opens.

Note
The made item is as follows.
A. “Number of Indoor Unit”
B. “Number of Outdoor Unit”

Note
When 5-1-3 “Register” and 5-1-6 “Load” succeed, It is displayed as defaults based on the unit number information of the communicated “Indoor Unit” and “Outdoor Unit” with the Network Converter.

5-3-1. Making the “XIF” file on the Tool for Network Converter. (In case of the Default value is changed)

“XIF Making/Modifying”



- In order to make Binding, the necessary “XIF” file is made.

- 1** Set the number of the controlled indoor unit by clicking the [▼] button of the “Number of Indoor Unit”.
- 2** Set the number of the controlled outdoor unit by clicking the [▼] button of the “Number of Outdoor Unit”.

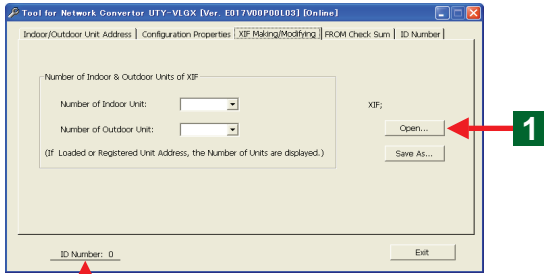
Note
the “Number of Indoor Unit” that can be controlled is from 1 to 128 (maximum is128).

Note
the “Number of Outdoor Unit” that can be controlled is from 1 to 100 (maximum is100).

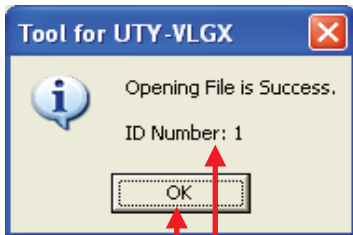
Note
“XIF” file is the data necessary for “Binding”. Please definitely input the same unit number with the number of the “Indoor/Outdoor Unit Address” registered in the Network Converter in 5-1.

5-3-2. Opening the saved “XIF” file in PC.

“XIF Making/Modifying”



The connecting “ID Number” of “Network Converter” is displayed.



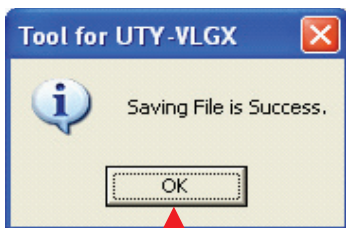
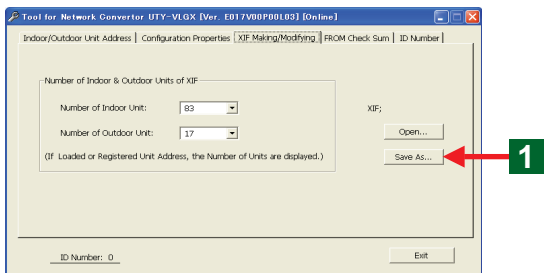
5 The read in “ID Number” of the “XIF” file is displayed.

- The “XIF” file saved in the PC is read in the Tool for Network Converter.

- 1 Click “Open” button.
 - ◆ The window of “Open the file” opens.
- 2 Open the directory that the file is saved.
- 3 Select the read in file.
- 4 Click the “Open” button.
 - ◆ Start opening.
 - ◆ After the file reading in is completed, the screen of “Opening File is Success” opens.
 - ◆ The read in ID Number” of the “XIF” file is displayed on the sub-display. The “Network Converter” that is different from the “ID Number” of Network Converter doesn’t operate.
- 5 Click “OK” button.
 - ◆ That screen closes.

5-3-3. Saving the “XIF” file made by the Tool for Network Converter in PC.

“XIF Making/Modifying”



5

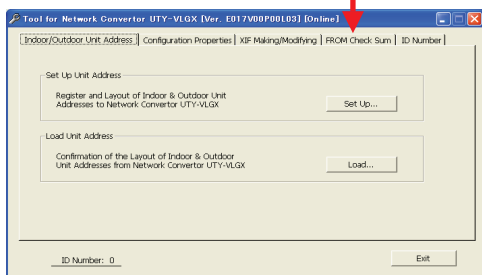
- Save the file of the “XIF” file made by the Tool for Network Converter in PC.

- 1 Click “Save” button.
 - ◆ The window of “Save with Name” opens.
- 2 Select a file saving address.
- 3 Fill in the “File name when saving it”.
- 4 Click the “Save” button.
 - ◆ Start saving.
 - ◆ After the file saving is completed, the screen of “Saving File is Success” opens.
- 5 Click “OK” button.
 - ◆ That screen closes.

5-4. Confirming the product information of the Network Converter.

Function switching (Tab)
 "Indoor/Outdoor Unit Address"

1



- Confirm the "FROM Check Sum" data information of the CPU mounted on the Network Converter and the software version information.

1 Click the tab of the "FROM Check Sum".

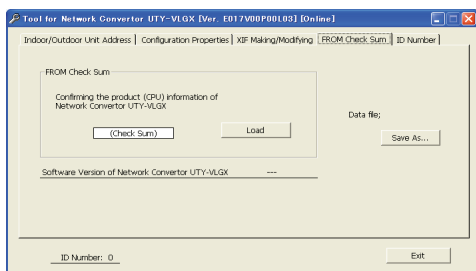
Note

Please confirm as follows if it is possible.

1. "Software Version of UTY-VLGX CPU"
2. CPU information

- ◆ The "FROM Check Sum" screen opens.

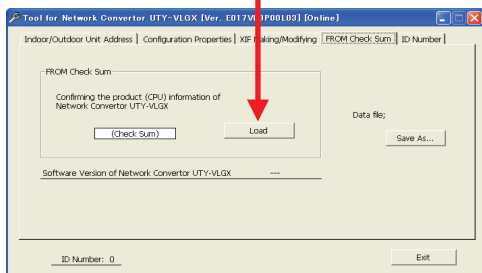
"FROM Check Sum"



5-4-1. Confirming the load in the information of the "FROM Check Sum" in the Network Converter.

"FROM Check Sum"

1

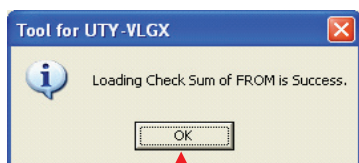


- Confirm the "FROM Check Sum" information of the Network Converter.

1 Click "Load" button.

- ◆ The numerical value of the "FROM Check Sum of CPU" is displayed in the display section.
- ◆ The "Software Version of UTY-VLGX CPU" is displayed on the lower part of the "FROM Check Sum".
- ◆ The screen of the "Loading Check Sum of FROM is Success" opens.

2 Click "OK" button.



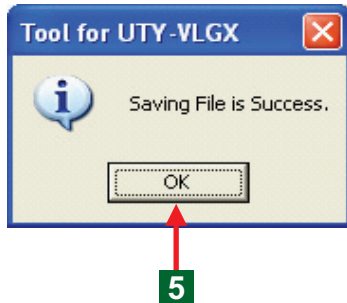
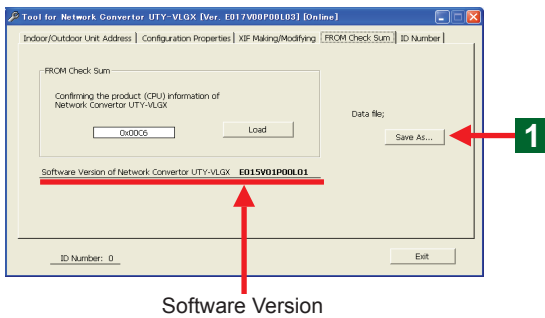
2

Note

"Load" the data information from the Network Converter becomes effective only in case of the "Connection environment" menu is in "Online work" state. Nothing can be made when in "Offline work" state. Please switch to "Online work" state by restarting the Tool for Network Converter. (For detail, please refer to 4-2)

5-4-2. Saving the information of the “FROM Check Sum” in the Network Convertor in PC.

“FROM Check Sum”



- Save the file of the data information of the “FROM Check Sum” read from the Network Convertor in PC.

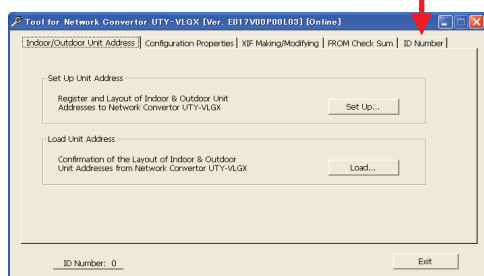
- 1** Click “Save” button.
 - ◆ The window of “Save with Name” opens.
- 2** Select a file saving address.
- 3** Fill in the “File name when saving it”.
- 4** Click the “Save” button.
 - ◆ Start saving.
 - ◆ After the file saving is completed, the screen of “Saving File is Success” opens.
- 5** Click “OK” button.
 - ◆ That screen closes.
 - ◆ Software Version of the “Network Convertor UTY-VLGX CPU” is indicated.

Note

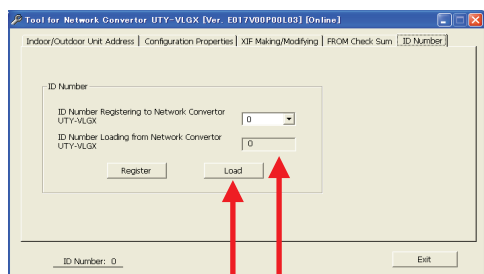
Please contact with authorized service personnel of this software version when the problem occurs on the Network Convertor.

5-4-3. Changing the “ID Number” of the Network Converter.

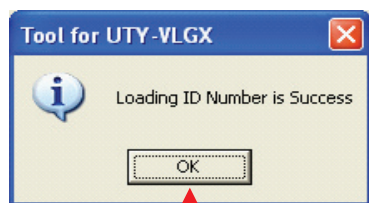
Function switching (Tab)
“Indoor/Outdoor Unit Address”



“ID Number”

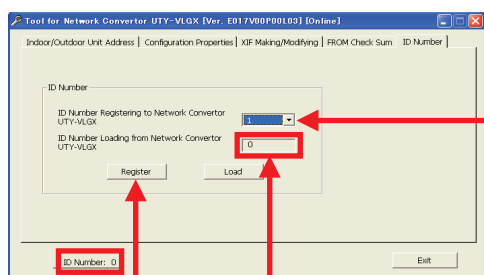


2 Display loaded “ID Number”.



3

“ID Number”



A

5

B



6

- Sets/changes the “ID Number”.

1 Click the tab of the “ID Number”.

Note

In “Register”, the setting information of the “ID Number” to the Network Converter is registered.
In “Load”, read in the information of the “ID Number” set in the Network Converter.

- In order to confirm the information of the “ID Number” set in the Network Converter, it is read in the Tool for Network Converter.

2 Click “Load” button.

- ◆ The Information of the “ID Number” is read in from the Network Converter. The content is displayed in the window of the “ID Number Loading from Network Converter”.

- ◆ After “Load” is completed, the screen of the “Loading ID Number is Success” opens.

3 Click “OK” button.

- ◆ That screen closes.

- In case of changing the “ID Number”.

4 Click the [▼] button to select the “ID Number” want to set.

- ◆ The selected “ID Number”. It is displayed in the window of the “ID Number Registering to Network Converter UTY-VLGX”.

5 Click “Register” button.

- ◆ The changed content is registered in the Network Converter, and the screen of the “ID Number Registration is Success” opens.

6 Click “OK” button.

- ◆ The screen closes. The registration of the changed data ends.

Note

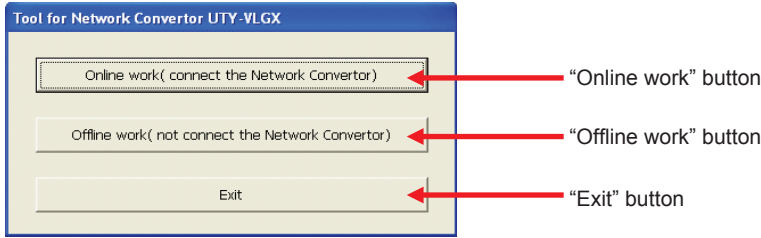
When the “ID Number” of “Network Converter” is changed, try to make and revise the “XIF” file again.

Note

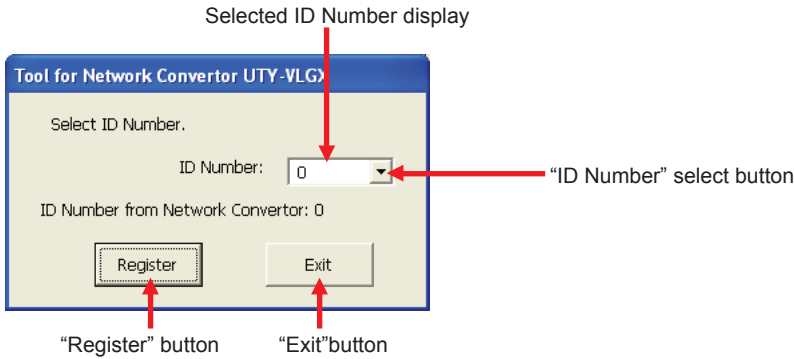
Online:
If the “ID Number” selected in Step [4] is “Registered”, the display of ID Number of [A] and [B] will be reflected.
Offline:
If the “ID Number” is selected in Step [4], the display of [A] will change at the same time. However, the display of [B] will not change.

6. DESCRIPTION OF THE MAIN SCREEN

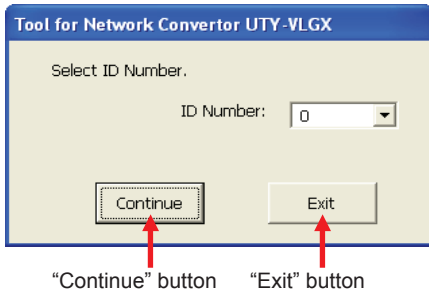
“Connection environment” menu screen



“ID Number” screen (Online)

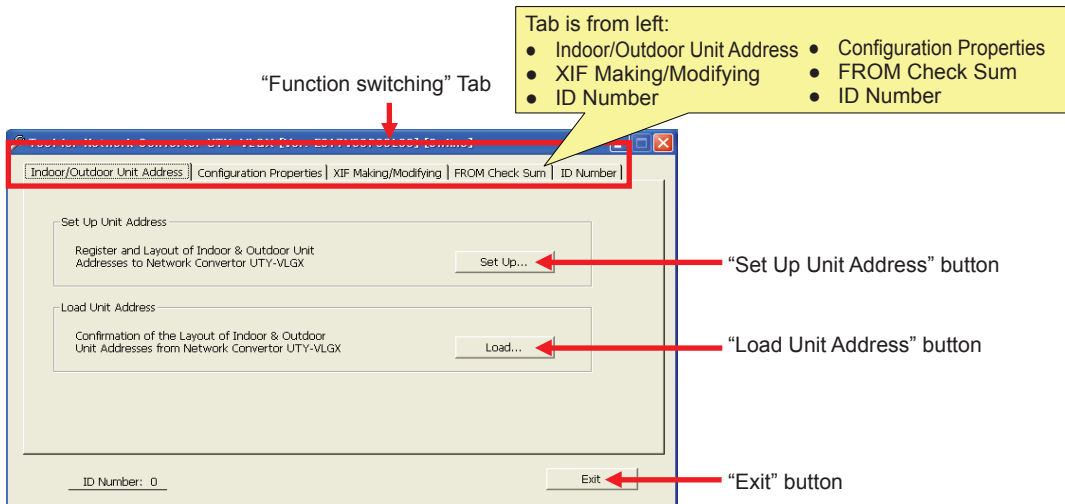


“ID Number” screen (Offline)



Function switching (Tab)

“Indoor/Outdoor Unit Address” screen



“Set Up Unit Address” screen

Display section of “Refrigerant Address”

Display section of “Indoor/Outdoor Unit Address”

“Indoor Unit Address” switching tab

“Outdoor Unit Address” switching tab

“Refrigerant Address” Range setting button

“Indoor Unit Address” Range setting button

“Input” button

“FB No.” select button

“Delete” button

“All” button

“Open” button

“Save” button

“Register” button

“Back” button

Display section of “FB No.” (Number is assigned automatically)

Display the total unit

Display the total NV

The screenshot shows a software window titled "Indoor/Outdoor Unit Address Set Up [Ver. E017 00P00L03] [Online]". It features a central table with columns for "Functional Block", "Refrigerant Address", and "Indoor Unit Address". To the right, there are several control panels: "Input Address Data" with range-setting buttons for Refrigerant and Indoor Unit addresses, an "Input" button, and a "Delete" section with a dropdown for "Functional Block No." and "All" and "Delete" buttons. Below that are "Address Data File" controls with "Open..." and "Save As..." buttons. A "Registration" section contains a "Register" button. At the bottom right, a summary box shows "Input Network Variables: 0", "Output Network Variables: 0", and "Total Network Variables: 0", with a "Back" button below it. A "Total Number of Indoor Unit" field at the bottom left shows the value "0".

“Load Unit Address” screen

Display section of “Refrigerant Address”

Display section of “Indoor/Outdoor Unit Address”

“Indoor Unit Address” switching tab

“Outdoor Unit Address” switching tab

“Load” button

“Save” button

“Print” button

“Back” button

The screenshot shows a software window titled "Indoor/Outdoor Unit Address Load [Ver. E017V0 0P00L03] [Online]". It features a central table with columns for "Functional Block", "Refrigerant Address", and "Indoor Unit Address". To the right, there are several control panels: "Unit Address Information" with a "Load" button, "Address Data File" controls with a "Save As..." button, and "Print Out" controls with a "Print" button. At the bottom right, a summary box shows "Input Network Variables: 0", "Output Network Variables: 0", and "Total Network Variables: 0", with a "Back" button below it. A "Total Number of Indoor Unit" field at the bottom left shows the value "0".

“Configuration Properties” screen

“Event Driven” Check box

“Cycle Time” setting button

“Only Changed Data” check box

“Open” button

“Save” button

“All Data” check box

“Condition of the Space temperature output” Setting button

“Load” button

“Exit” button

“Cyclic” Check box

“Condition of Transmission start all NVs” setting button

“Fahrenheit” check box

“Register” button

“XIF Making/Modifying” screen

“Number of Indoor Unit” setting button

“Open” button

“Save” button

“Exit” button

“Number of Outdoor Unit” setting button

“FROM Check Sum” screen

“Check Sum” display

“Load” button

“Save” button

“Exit” button

Displays “Software Version”

ID Number (Change)" screen

Selected "ID Number" display

"ID Number" selection button

Loaded "ID Number" display

"Exit" button

"Register" button "Load" button

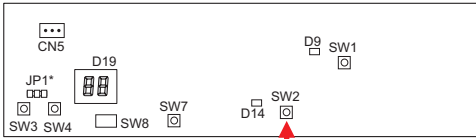
"ID Number" display of Network Converter

7. SERVICE PIN

When the Binding & Commissioning is done by Network Integration Tool, it is used to recognize the Network Converter.

If the Service Pin is pushed, the Neuron ID will be sent.

PCB Layout



This is Service Pin.
Neuron ID is sent upon pushing
BMS service switch (SW2)

目录

1. 概述

1-1. 系统概述

1-2. 设置（初始设置）及确认流程

2. 设置

2-1. 安装网络转换器的工具

2-1-1. 操作环境.....5

2-1-2. 安装网络转换器的工具.....5

2-1-3. 卸载网络转换器的工具.....6

2-2. 连接 PC^{*1} 和网络转换器

3. 设置 PCB^{*2}

3-1. 安装模式

3-2. 正常模式

4. 基本操作

4-1. 启动网络转换器工具

4-2. 选择网络转换器和网络转换器的工具之间“连接环境”。

4-3. 设置网络转换器的“标识号”。

4-4. 切换网络转换器的工具的功能。/ 结束。

5. 设置网络转换器（初始设置）

5-1. 制作“室内机和室外机地址的布局”数据。

5-1-1. 删除“室内机和室外机地址的布局”的所有数据.....15

5-1-2. 删除“室内机和室外机地址的布局”的任一数据。.....15

5-1-3. 在网络转换器上注册“室内机和室外机地址的布局”数据。.....16

5-1-4. 在 PC 中保存在网络转换器中注册的“室内机和室外机地址的布局”数据的文件。.....17

5-1-5. 打开读取保存在 PC 中的“室内机和室外机地址的布局”的文件数据。....18

5-1-6. 确认注册在网络转换器中的“室内机和室外机地址的布局”数据的读入。..... 19

5-1-7. 保存从网络转换器中读入的“室内机和室外机地址的布局”的数据的文件。...20

5-1-8. 打印从网络转换器中读入的“室内机和室外机地址的布局”的数据。.....21

5-2. 在网络转换器与 BMS^{*3} 之间设置通信模式。

5-2-1. 设置“模式 1（发送数据至 BMS 的属性）”。.....22

5-2-2. 设置“模式 2（发送数据至 BMS 的条件）”。.....23

5-2-3. 设置“模式 3（传输开始所有网络变量的条件）”。.....23

5-2-4. 设置“模式 4（室温输出的条件）”。....23

5-2-5. 打开保存在 PC 中的用于网络转换器的工具的数据。.....24

*1. PC ; Personal Computer. 个人计算机

*2. PCB ; Printed Circuit Board. 印刷电路板

*3. BMS ; Building Management System. 建筑管理系统

- 5-2-6. 保存设置在 PC 中的数据。24
- 5-2-7. 打开在网络转换器中的设置数据。25
- 5-2-8. 在网络转换器中注册设置数据。26
- 5-3. 制作“XIF”^{*1}文件。**
- 5-3-1. 在网络转换器的工具上制作“XIF”文件。(在默认数值改变的情况下).....27
- 5-3-2. 打开保存 PC 中的“XIF”文件。28
- 5-3-3. 在 PC 中保存用网络转换器的工具制作的“XIF”文件。28
- 5-4. 确认网络转换器的产品信息。**
- 5-4-1. 确认在网络转换器中加载的“闪存校验和”的信息。29
- 5-4-2. 在 PC 的网络转换器中保存“闪存校验和”的信息。30
- 5-4-3. 变更网络转换器的“标识号”。31

6. 主画面说明

-32

7. 服务引脚

-35

*1 XIF: External Interface File. 外部接口文件。

注意

现在, 在开始设置作业之前请先打印在所附 CD-ROM 的“说明书”文件夹中的“应用说明书”。请准备附属在该文件中的“安装说明书”。

1. 概述

- 将安装有网络转换器的工具的 PC 连接在“网络转换器”上, 可以确认设置或设置内容。

主要功能如下:

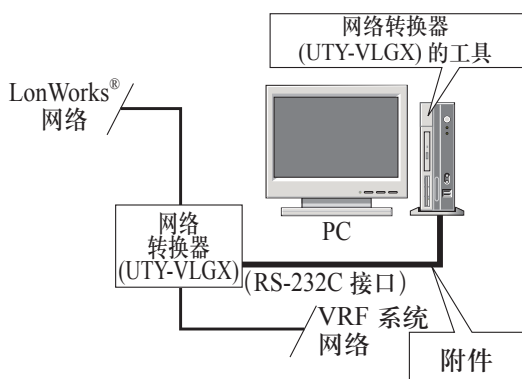
a) 设置 (初始设置时)

- 1) “室内机 / 室外机地址”
- 2) “配置属性”
- 3) “制作 / 修改 XIF 文件”

b) 确认

- 1) “室内机 / 室外机地址”
- 2) “配置属性”
- 3) “CPU 的闪存校验和 (H8)”

1-1. 系统概述



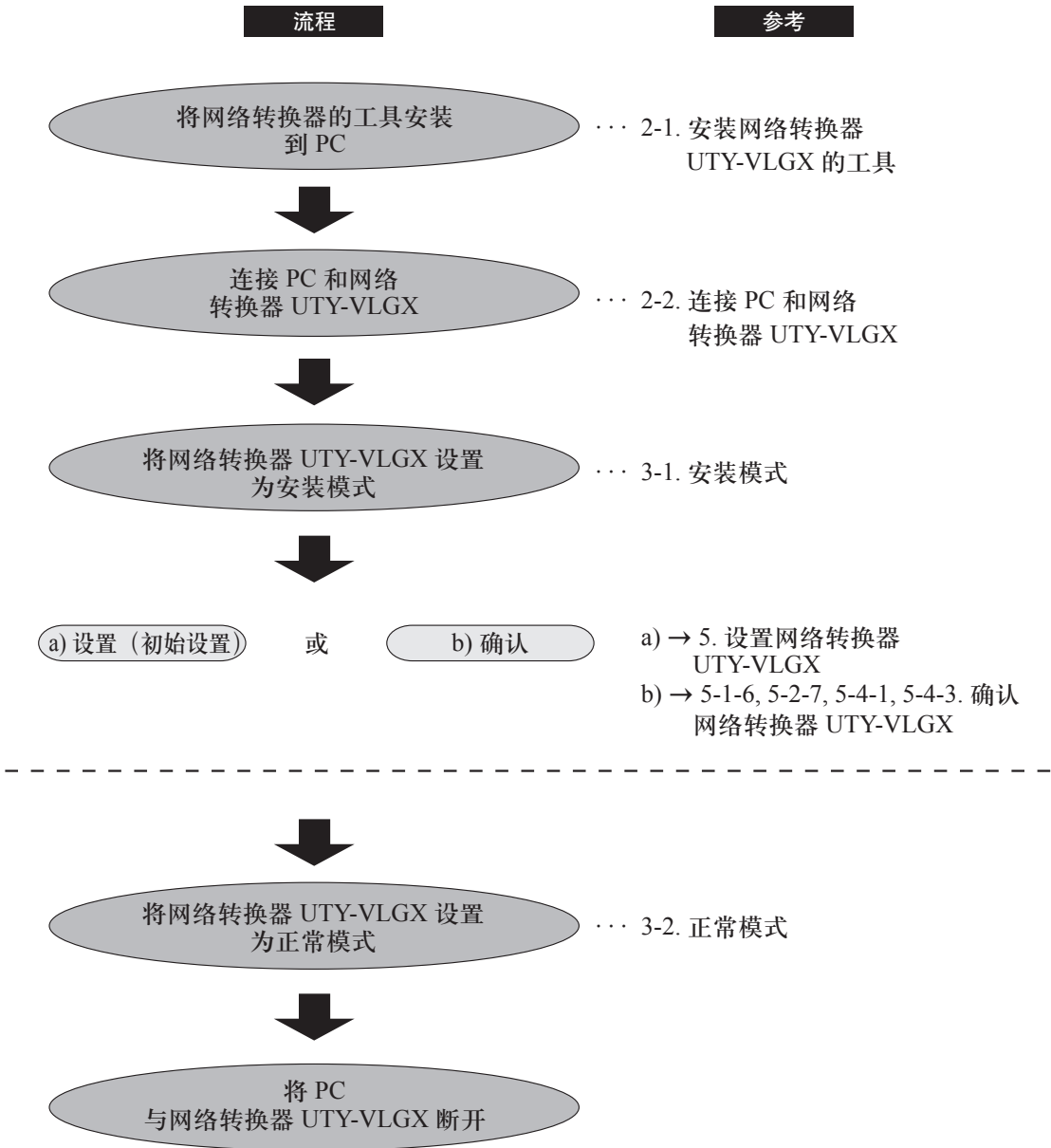
- 该系统的布局如图所示。使用 PC 来进行该网络转换器的设置及确认。PC 的 RS-232C 接口用于将“网络转换器”的工具连接于 PC。

图：系统概述

* LONWORKS® 是 Echelon 公司在美国和其他国家注册的商标。

1-2. 设置（初始设置）及确认流程

- 网络转换器的设置（初始设置）及确认流程如下：(图)
- 以下是联机操作期间的工作项目。而且，在脱机操作期间也可以制作 XIF 文件。



图：设置（初始设置）及确认流程

2. 设置

- 安装应用程序并根据如下说明连接 PC 与网络转换器。

2-1. 安装网络转换器的工具

- 如果 PC 上没有安装网络转换器的工具，请根据如下说明进行安装。

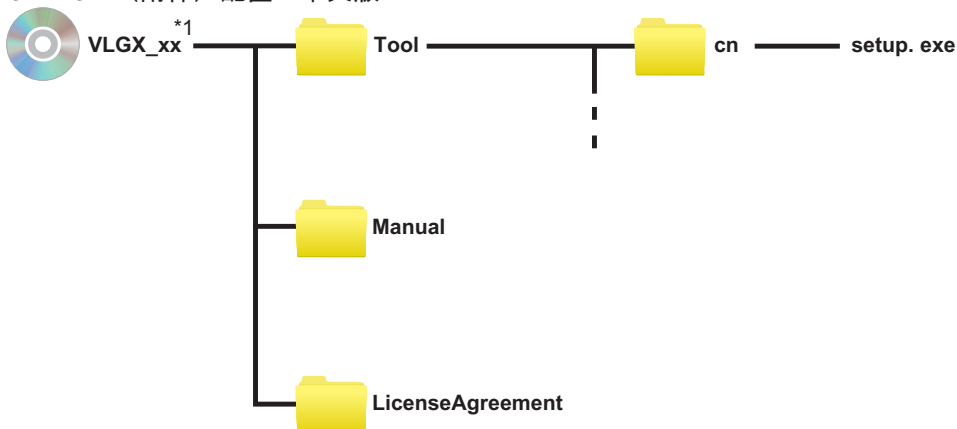
2-1-1. 操作环境

- 本程序需要如下的操作环境。

PC 的规格

	网络转换器 (UTY-VLGX) 的工具
CPU	在运行 Microsoft® Windows® 的兼容机上
内存	1GB (Vista), 128MB (XP) 或更大
显示器	1024 x 768 点或更高, 高色彩 (16bit) 或更高
接口	串行 (RS232C) 端口 (x1) * 请确保使用 “COM1”。
操作系统	Microsoft® Windows® XP 专业版 (英文版 / 中文版) Service pack 3 或更新 Microsoft® Windows® Vista 家庭高级版 (英文版 / 中文版) Service pack 1 或更新 * 不支持 Windows® 64-bit 版本。
所需硬件	光盘驱动器
所需软件	Adobe® Reader 9.0 或更新

CD-ROM (附件) 配置 : 中文版



*1. xx 为任意字符。

2-1-2. 安装网络转换器的工具

- 按照下列步骤安装网络转换器的工具。

1 双击 “setup.exe” 文件。

- ◆ 请根据 PC 画面指示安装网络转换器的工具。

2-1-3. 卸载网络转换器的工具

- 关于网络转换器的工具的卸载方法，请遵循各 PC 的卸载方法进行。

2-2. 连接 PC 和网络转换器

- 用包含的电缆连接 PC 和网络转换器*。按照下列步骤将 PC 与网络转换器连接。
* 电缆：D-Sub 9- 针插孔连接器 - 3- 针插孔连接器（图 1）。此电缆被包装在“网络转换器”的盒子中。

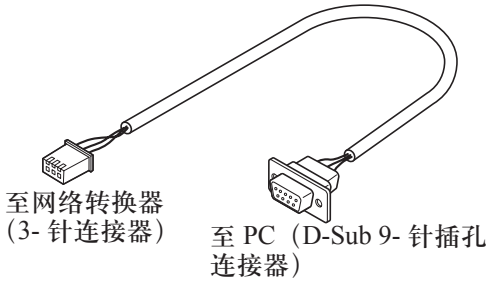


图 1：连接器电缆

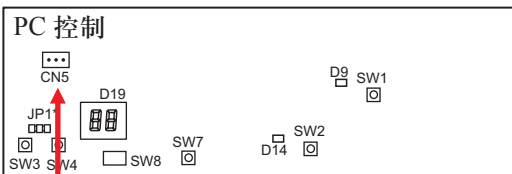


图 2：PCB 布局

注意

请在将网络转换器的备用电池设置为“ON”状态后，再开始设置操作。（详情请参照安装说明书）

- 关掉 PC 和网络转换器的电源。
- 用螺丝刀卸下网络转换器的盖子。（请参照安装说明书）
- 将 3- 针连接器连接于盒子中 PCB 上的 PC_ 控制插座 (CN5)。（图 2）
- 将 D-Sub 9- 针插孔连接器连接于 PC 的 9- 针串行端口 (COM 1) 上。
- 打开 PC 和网络转换器的电源。

注意

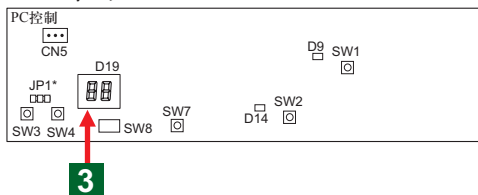
与网络转换器连接的串行端口必须是“COM1”。

3. 设置 PCB

- 当设置或确认网络转换器时，必须将 PCB 设置为安装模式。(图)

3-1. 安装模式

PCB 布局



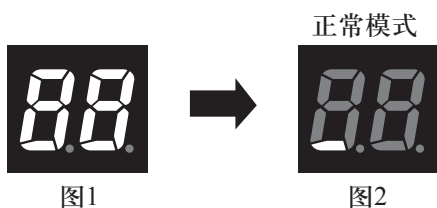
D19 LED



- 按照下列步骤将网络转换器设置为“安装模式”。

- 1 卸下网络转换器的盖子。
- 2 确保网络转换器的电源已接通。
- 3 在保持按下 SW4 (设置按钮) 的同时，通过按下并松开 SW7 (重设按钮) 来选择特殊模式，直至显示特殊模式“1” (闪烁)。请在松开 SW7 (重设按钮) 之后继续按住 SW4 (设置按钮) 数秒钟。图 2 : (照明)。将变为安装模式。
- 4 按下 SW4 (设置按钮)。如图 3 中所示，在显示器上将出现“1” (照明)。

3-2. 正常模式



- 对于正常操作，PCB 必须设置为正常模式。按照下列步骤将网络转换器设置为正常模式。

- 1 关闭并打开电源或按下 SW7 (重设按钮) 从安装模式中退出。D19 LED 显示器中的任何一个代码。

D19 LED 显示器代码

(1) 正常模式





正常代码	内容
	正常模式
	设置“网络转换器的工具”的状态
	地址设置模式
	维修中
	利用“网络转换器的工具”注册FB*和机组地址分配信息

FB*:功能区域

注

当出现错误时，在网络转换器的 PCB 上的“LED 显示器 (D19)”将显示错误代码。或者，该内容将显示在 PC 的屏幕上。

(2)错误代码

错误代码	内容
	没有注册FB和机组地址分配信息
	主PCB错误
	VRF网络错误
D9 LED 点亮 或闪烁 □ □□ D9 D9	通信错误（VRF系统侧的网络接口装置的错误）
D14 LED 点亮 或闪烁 □ □□ D14 D14	通信错误（BMS侧的网络接口装置的错误）*1
	当连接了V系列或S系列

*1. D14点亮1秒钟，熄灭1秒钟，并重复进行。D19处于正常模式时，试运行处于未设定状态。

4. 基本操作

下列说明描述了网络转换器的基本操作。

4-1. 启动网络转换器工具

- 1 在任务栏上单击 [开始] → [所有程序] → [Tool for UTY-VLGX] → [网络转换器 Tool for UTY-VLGX] 在 PC 上显示的画面。

◆ 启动网络转换器的工具。打开“连接环境”菜单的画面。

4-2. 选择网络转换器和网络转换器的工具之间“连接环境”。

“连接环境”菜单



- 单击“连接环境”菜单中选择的按钮。

可以选择的项目如下：

- A. “联机工作（连接网络转换器）”：连接网络转换器，并且网络转换器的工具连接转换器并执行设置操作。
- B. “脱机工作（不连接网络转换器）”：在脱机操作期间也可以制作 XIF 文件。
- C. “退出”：结束网络转换器的工具。

注意

在开始与网络转换器通信时，如果出现错误，请查看以下内容：

1. 连接网络转换器与 PC 的电缆是否断开？
2. 是否使用了 PC 的串行端口“COM1”？
3. 是否提供有网络转换器的电源？
4. 网络转换器是否被设置在“安装模式”？

注

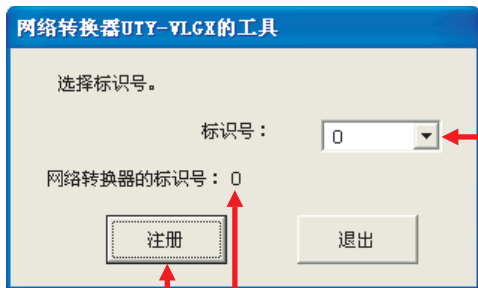
当出现错误时，在 PC 屏幕上将显示“Error”信息。该错误将显示在网络转换器的“LED (D19)”上。请参照“3-2 正常模式”的“LED 显示模式(D19)”。请与授权的服务人员联系。

注

这是网络转换器的工具与网络转换器 1 对 1 的“连接环境”。VRF 系统和 BMS 的故障不受影响。

4-3. 设置网络转换器的“标识号”。

“选择标识号”



2 显示已经在网络转换器中设置的标识号。

- 当 1 个 BMS 与多个网络转换器连接时，在完成一次具有不同的“标识号”的“网络转换器”的设置之后，必须重启“网络转换器的工具（应用软件）”。
- 设定设置网络转换器的标识号。
- ◆ 当选择连接环境菜单时，此画面将自动打开。

注

“标识号”的默认值被设置为 0。当设置两个或以上的网络转换器时，请设置各自不同的“标识号”。

注

最多可以有 4 台网络转换器同 1 个 BMS 连接。
请从 0 至 3 设置各自不同的“标识号”。

- 1** 单击 [▼] 按钮来选择设置“标识号”。
- 2** 单击“注册”按钮。

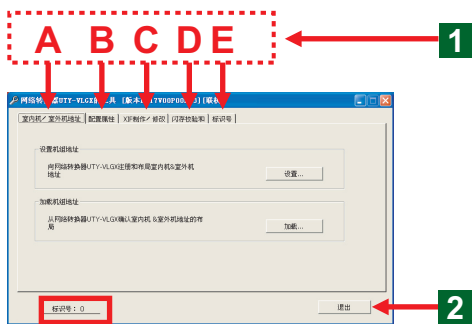
- 在网络转换器中设置选择的“标识号”。

注意

如果单击“退出”按钮，网络转换器的工具将结束。

4-4. 切换网络转换器的工具的功能。 / 结束。

功能切换（选项）
“室内机 / 室外机组地址”



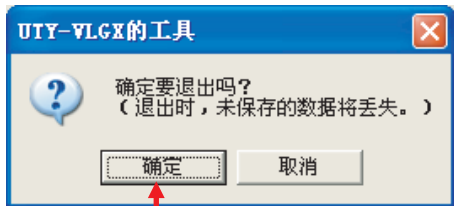
显示设置中的网络转换器的“标识号”。

- 如果单击功能切换选项，将切换功能和显示画面。

1 单击选择的功能选项。

可以选择的项目如下：

- A. “室内机 / 室外机地址”：
在网络转换器中注册地址数据。
→ “室内机 / 室外机地址”
- B. “配置属性”：
在网络转换器和 BMS 之间设置通信模式
→ “配置属性”
- C. “XIF 制作 / 修改”：
为了联结网络集成工具，要制作必需的 XIF 文件。
→ “XIF 制作 / 修改”
- D. “闪存校验和”：
显示“闪存校验和”和在网络转换器中使用的 CPU 的软件版本。
→ “闪存校验和”
- E. “标识号”
在网络转换器上设置“标识号”。
→ “标识号”



- 结束网络转换器的工具。

2 单击“退出”按钮。

- ◆ 结束确认画面“你确认要退出吗？”（退出时，未保存的数据将丢失。）打开。

3 单击“确定”按钮。

- ◆ 结束网络转换器的工具。

注意

当结束应用程序时，将删除制作的数据信息。然后，在保存必要的设置文件后结束操作。

5. 设置网络转换器（初始设置）

对设置网络转换器（初始设置）的下列各项操作均作了说明。

- 1) “室内机和室外机地址的布局”(必要项)
- 2) “配置属性”(非必要项)
- 3) 制作“XIF”数据 (必要项)

5-1. 制作“室内机和室外机地址的布局”数据。

“室内机 / 室外机地址”



1 单击“室内机 / 室外机地址”选项。

◆ “室内机 / 室外机地址”的画面打开。

注

可以选择的功能如下：

A. “设置机组地址”：

制作“室内机和室外机地址的布局”数据并注册网络转换器。此外，制作的设置信息文件可以保存在 PC 中。保存的 PC 数据可以被确认。

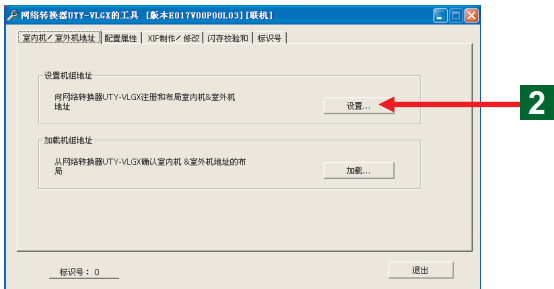
B. “加载机组地址”：

读取注册在网络转换器中的“室内机和室外机地址的布局”数据。可以确认网络转换器的工具及保存文件。

C. 打印：

可以打印从“网络转换器”中“加载”的“室内机和室外机地址的布局”数据。

“室内机 / 室外机地址”



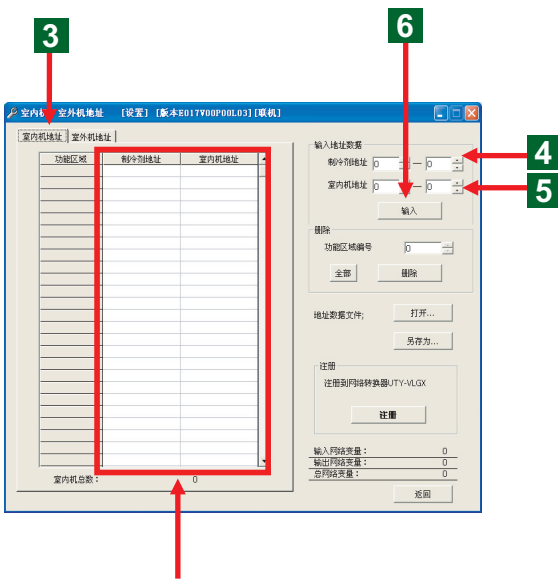
2 单击“设置”按钮。

◆ “设置机组地址”的画面打开。

注

为了控制 BMS 中的 VRF 系统的室内机和室外机，“室内机和室外机地址的布局”为关联地址。

“设置机组地址”（室内机）



布局后的地址的显示部分

- 开始设置“设置机组地址”。
- 首先,设置“制冷剂地址”和“室内机地址”。
- 3** 单击地址列表部分的“室内机地址”的选项。
 - ◆ 切换地址列表部分的“室内机地址”的设置。
- 注册“制冷剂地址”和“室内机地址”。
- 4** 单击“制冷剂地址”的“▲”“▼”按钮,选择地址号码。
- 5** 单击“室内机地址”的“▲”“▼”按钮,选择地址号码。
- 6** 单击“输入”按钮。

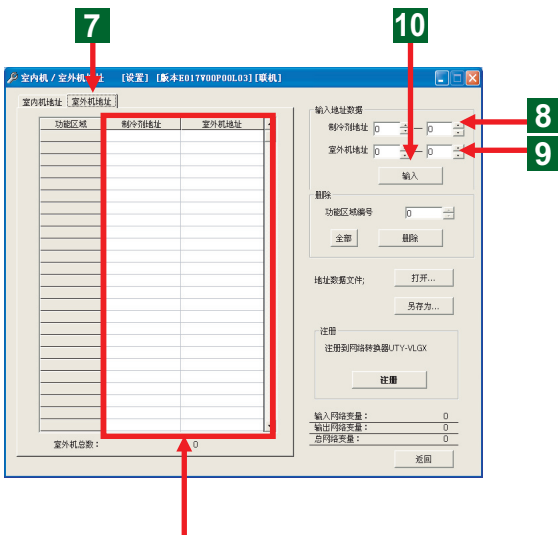
注意

请将“室内机”和“室外机”设置成相同的“制冷剂地址”。

注

在本工具中,“FB 编号”将自动地分配给“制冷剂地址”和“室内机/室外机地址”。

“设置机组地址”（室外机）



布局后的地址的显示部分

- 继续注册“制冷剂地址”和“室外机地址”。
- 7** 单击布局后的地址显示部分上的“室外机地址”的选项。
- 8 9** 输入“制冷剂地址”和“室外机地址”。请参照如下的“例子：地址的输入方法”。
- 10** 单击“输入”按钮。

◆ “FB 编号”被自动分配到“已注册的”制冷剂地址”和“室外机地址”。

注

如果输入“室内机/室外机地址”,“FB 编号”将自动地按照如下方式分配:
 “室内机地址”从 0 到 127。
 “室外机地址”从 0 到 99。

注

“制冷剂地址”可以输入从 0 到 99。“室内机地址”可以输入从 0 到 63。
 * 现在,可以设置的最大数值是 48。
 “室外机地址”可以输入从 0 到 3。
 * 目前的 VRF 系统的地址是从 0 到 2。

例如：室外机的附加方法

室外机	地址号		
主	0	-	-
主 + 从 1	0	1	-
主 + 从 1 + 从 2	0	1	2

注

设置“室外机地址”时(包括设置一台室外机),必须从 0 开始设置。然后,请按照 1、2 的顺序设置。请勿跳过数字的顺序。请参照左侧的“室外机地址”的附加方法。

例如：地址的输入方法

注意：

请准备在“VRF 系统”中注册的“室内机/室外机地址”和“制冷剂地址”的材料，这些材料在开始输入“地址”前一瞥即可理解。

注册地址的设置方法通过一个例子来进行说明。

例如：

注册 VRF 系统的如下设备地址。

● VRF 系统

制冷剂系统：6 个系统

室外机：17 台机组

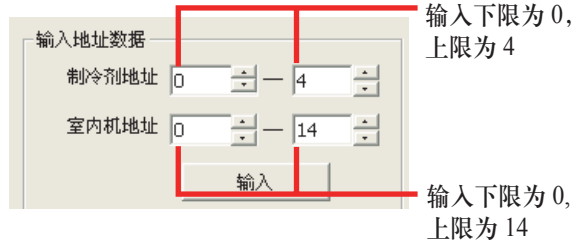
室内机：83 台机组

制冷剂系统	室内机	室外机
0	15	3
1	15	3
2	15	3
3	15	3
4	15	3
5	8	2
总计 6 个	总计 83 台	总计 17 台

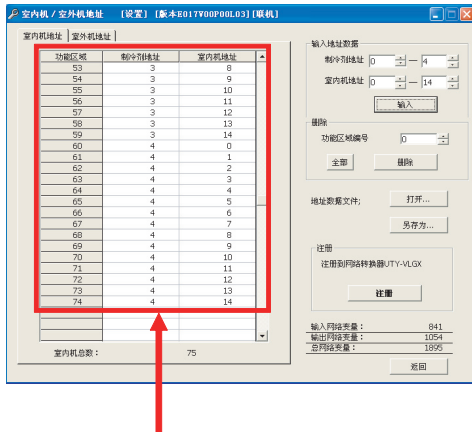
- 请根据指示的“室内机地址”的输入方法和同样的技巧输入“室外机地址”。

- 两个或以上“制冷剂地址”和“室内机地址”可以成批输入。

(1) 从 0 到 4 输入“制冷剂地址”，从 0 到 14 输入“室内机地址”。

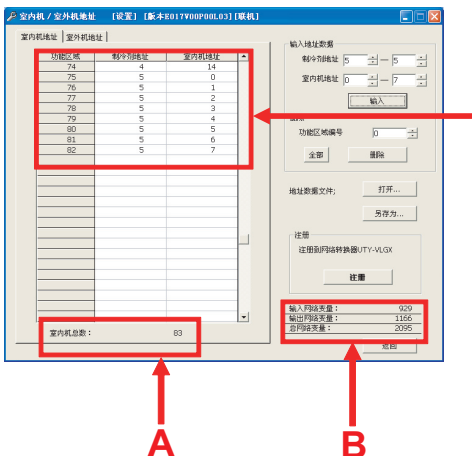


“设置机组地址”（室内机）（图 1）



在“制冷剂地址”的 0 至 4 系统中，每个系统设置 15 台室内机。

“设置机组地址”（室内机）（图 2）

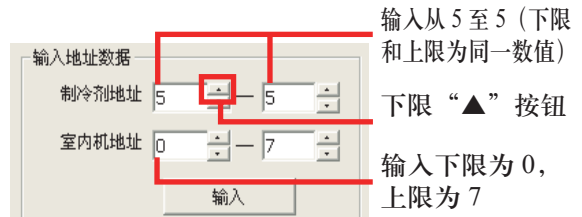


(2) 单击“输入”按钮。

- ◆ 在“制冷剂地址”的 0 至 4 系统中，每个系统设置 15 台室内机。而且，“FB 编号”将自动进行分配。（图 1）

- 注册“制冷剂地址”为 5。从 0 到 7 注册“室内机地址”。

(1) 将“制冷剂地址”输入为 5，并且将“室内机地址”输入为 0 至 7。



(2) 单击“输入”按钮。

- ◆ 在“制冷剂地址”的 5 系统中设置了 8 台“室内机”。而且，“FB 编号”将自动进行分配。（图 2）

注

当上限和下限为同一数值时，如果单击下限的“▲”按钮，将同时切换上限和下限。当输入单个设置值时很方便。

在“制冷剂地址”的 5 系统中设置了 8 台“室内机”。然后，输入设备的地址将显示在本窗口的上部。

注

将自动显示对系统集成必要的下列信息。

A. “室内机/室外机”的 FB（功能区域）显示机组的总数量。

B. 显示“网络转换器”发送和接收的网络变量的数量：

输入：接收的网络变量 * 的总数量。

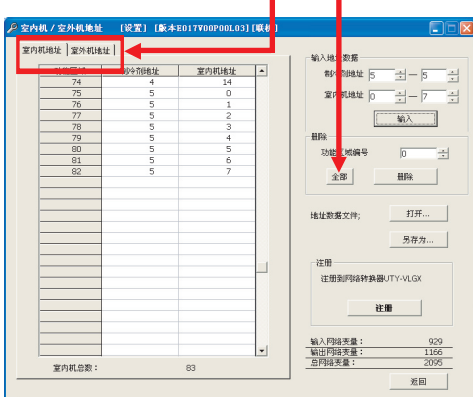
输出：发送的网络变量 * 的总数量。

总计：输入和输出数量总计。

*NV：网络变量

5-1-1. 删除“室内机和室外机地址的布局”的所有数据

“设置机组地址”



- 删除“室内机和室外机地址的布局”的所有数据。

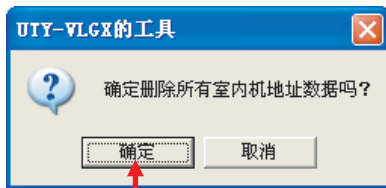
1 单击带有删除的地址的“室内机地址”或“室外机地址”的选项。

2 单击“删除”部分的“全部”按钮。

- ◆ 打开用于确认删除所有数据的“确定删除所有室内机地址（室外机地址）数据吗？”的画面。

3 单击“确定”按钮。

- ◆ 打开的“室内机地址”或“室外机地址”的地址内容被删除。



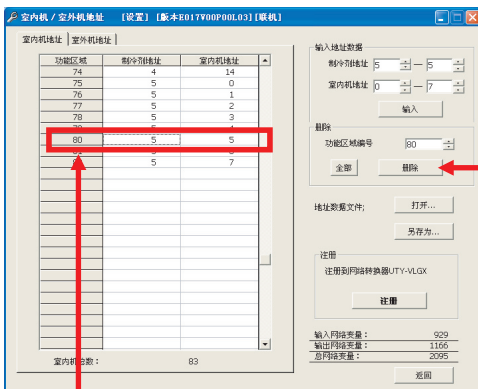
3

注

如果单击“全部”按钮，将删除所有地址数据。删除数据不能恢复。操作时请注意。

5-1-2. 删除“室内机和室外机地址的布局”的任一数据。

“设置机组地址”



1

- 删除“室内机和室外机地址的布局”的任一数据。

[选择地址列表画面上的“FB编号”的方法]

1 单击地址列表画面的“FB”。

- ◆ 选择选定的“FB”和“室内机和室外机地址”的行。

- ◆ 选择的“删除”部分的“FB”显示在窗口中。

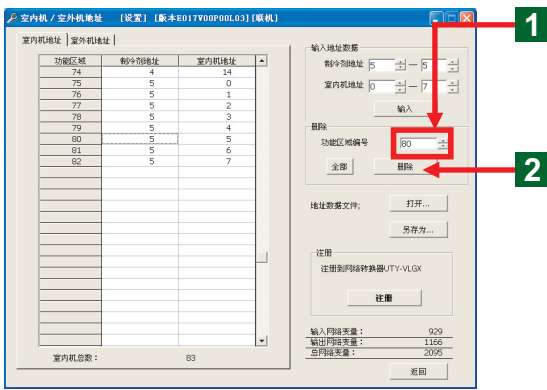
2 单击“删除”按钮。

- ◆ 删除的“FB”和“室内机和室外机地址”在画面中消失。

注

当任一行为被删除后，在删除行以下的FB将自动上移。

“设置机组地址”



[设置画面的“删除”部分的删除的“FB编号”的方法]

1 在“删除”部分,单击“▲”“▼”来选择“FB编号”。

2 单击“删除”按钮。

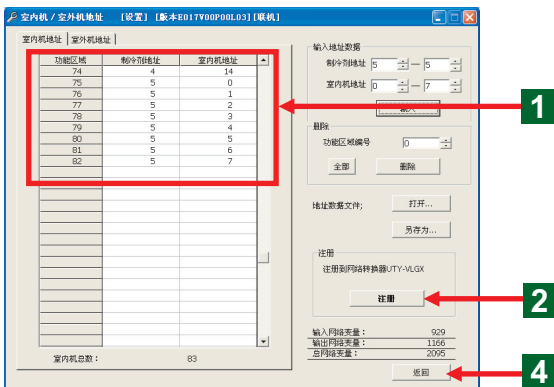
◆ 选择的“FB”行的地址列表被删除。

注

当任一“FB”的地址被删除之后,在删除的FB下面的FB编号将自动上移。

5-1-3. 在网络转换器上注册“室内机和室外机地址的布局”数据。

“设置机组地址”



● 在网络转换器上注册“室内机和室外机地址的布局”数据。

1 确认“室内机和室外机地址的布局”的数据信息。

2 单击“注册”按钮。

◆ 室内机正在注册时,将显示“现在,注册室内机地址数据”的画面。(该画面将自动关闭)

◆ 在网络转换器上注册“室内机和室外机地址的布局”数据信息。

◆ 在“注册”完成后,“机组地址注册成功”的画面将打开。

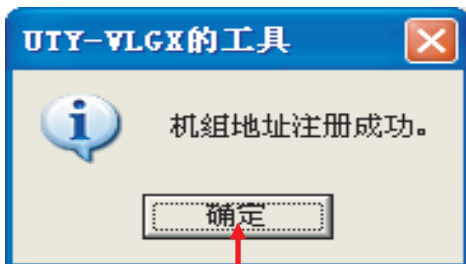
3 单击“确定”按钮。

◆ “注册”完成的画面关闭。

◆ 如果“成功”,“网络转换器”中的D19 LED将显示“Ud”。

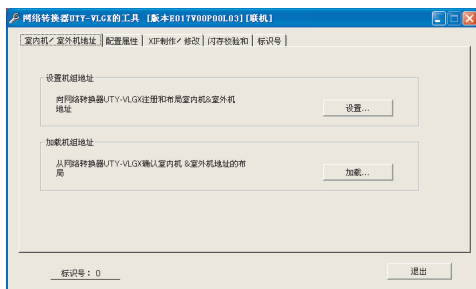
注

只有在“连接环境”菜单处于“联机工作”状态时,在“网络转换器”中“注册”的数据信息才有效。当处于“脱机工作”状态时,在对必要的文件进行保存之后,请重启网络转换器并切换至“联机工作”状态。(详情请参照4-2)



3

功能切换（选项） “室内机/室外机地址”：



5-1-4. 在 PC 中保存在网络转换器中注册的“室内机和室外机地址的布局”数据的文件。

“设置机组地址”



- 在每次操作结束之后，返回到功能切换（选项）画面。

4 单击“返回”按钮。

- ◆ “室内机/室外机地址”画面打开。

- 在 PC 中保存制作的“室内机和室外机地址的布局”数据的文件。

1 单击“保存”按钮。

- ◆ “另存为”窗口打开。

2 选择文件保存路径。

3 填上“保存时的文件名称”。

4 单击“保存”按钮。

- ◆ 开始保存。

- ◆ 在保存结束之后，“文件保存成功”的画面打开。

5 单击“确定”按钮。

- ◆ 该画面关闭。

5-1-5. 打开读取保存在 PC 中的“室内机和室外机地址的布局”的文件数据。

“设置机组地址”



- 确认或变更 PC 保存的“室内机和室外机地址的布局”数据。

- 1 单击“打开”按钮。
 - ◆ “打开”窗口打开。
- 2 打开该文件的保存路径。
- 3 选择该读入文件。
- 4 单击“打开”按钮。

- ◆ 开始打开。
- ◆ 在读入该文件完成之后，“文件打开成功”的画面打开。

- 5 单击“确定”按钮。

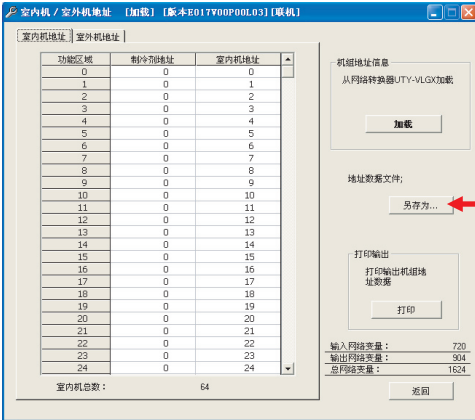
- ◆ 该画面关闭。



5

5-1-7. 保存从网络转换器中读入的“室内机和室外机地址的布局”的数据的文件。

“加载机组地址”



- 在此，“室内机和室外机地址的布局”的数据信息的文件被保存在 PC 中。

1 单击“保存”按钮。

- ◆ “命名并保存”窗口打开。

2 选择文件保存路径。

3 填上“保存时的文件名称”。

4 单击“保存”按钮。

- ◆ 开始保存。

- ◆ 在保存结束之后，“文件保存成功”的画面打开。

5 单击“确定”按钮。

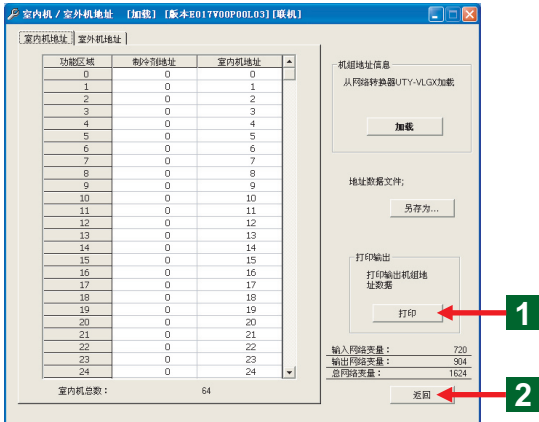
- ◆ 该画面关闭。



5

5-1-8. 打印从网络转换器中读入的“室内机和室外机地址的布局”的数据。

“加载机组地址”



- 打印“室内机和室外机地址的布局”数据信息。

1 单击“打印”按钮。

- ◆ “打印”窗口打开。

注

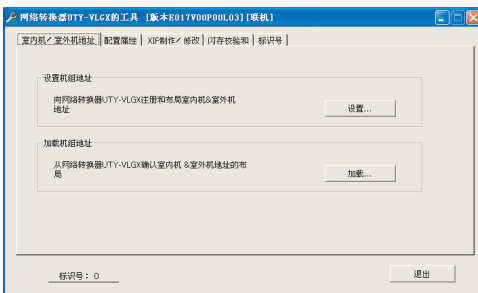
对于打印的详细设置，请遵循与 PC 连接的打印机的操作说明书。

- 在每次操作结束之后，返回到功能切换（选项）画面。

2 单击“返回”按钮。

- ◆ “室内机 / 室外机地址”画面打开。

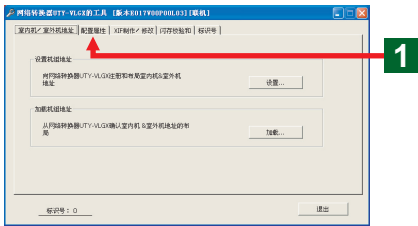
“室内机 / 室外机地址”



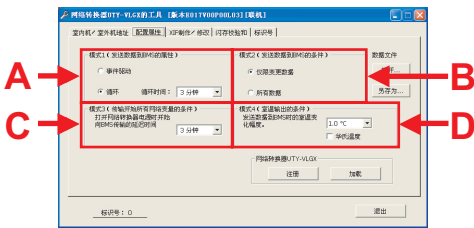
5-2. 在网络转换器与 BMS 之间设置通信模式。

功能切换（选项）

“室内机 / 室外机地址”



“配置属性”



- 切换至“配置属性”。

1 单击“配置属性”选项。

- ◆ “配置属性”画面打开。

注

“配置属性”的默认设置如下：

- “模式 1（发送数据至 BMS 的属性）”
循环，循环时间：3 分钟
- “模式 2（发送数据至 BMS 的条件）”：
仅限变更数据
- “模式 3（传输开始所有网络变量的条件）”
3 分钟
- “模式 4（室温输出的条件）”：
1.0°C 单位：摄氏温度

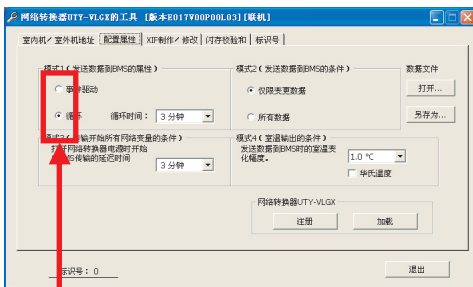
注

如果可能，请按如下方式设置：

- A. “模式 1（发送数据至 BMS 的属性）”
- B. “模式 2（发送数据至 BMS 的条件）”
- C. “模式 3（传输开始所有网络变量的条件）”
- D. “模式 4（室温输出的条件）”

5-2-1. 设置“模式 1（发送数据至 BMS 的属性）”。

“配置属性”



- 设置开始从网络转换器向 BMS 发送“室内机 / 室外机”的注册数据信息的定时。

注

如果可能，请按如下方式选择：

- “事件驱动”向 BMS 实时发送从 VRF 系统上传的信息。
- “循环”根据设置的定时将从 VRF 系统上传的信息保留一段时间，然后发送到 BMS。

注

在设置一定的定时时间，利用“循环”向 BMS 发送信息的情况下，当“循环时间”被设置为一个较长时间时，将没有实时属性。而且，当设置为一个较短的时间时，信息的传输量将增加。

1 单击“事件驱动”或“循环”复选框。

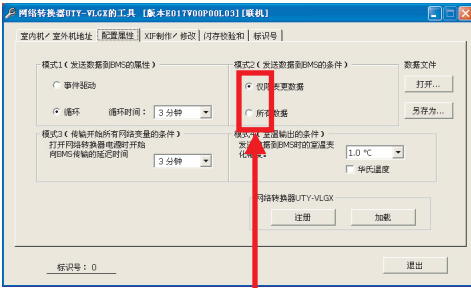
- 当设置“循环”时，用“▼”按钮设置“循环时间”。

注

可设置的“循环时间”范围为从 2 分钟到 30 分钟。（间隔为 1 分钟。）

5-2-2. 设置“模式 2（发送数据至 BMS 的条件）”。

“配置属性”



- 设置从网络转换器向 BMS 发送信息的条件。

1 单击“仅限变更数据”或“所有数据”复选框。

注

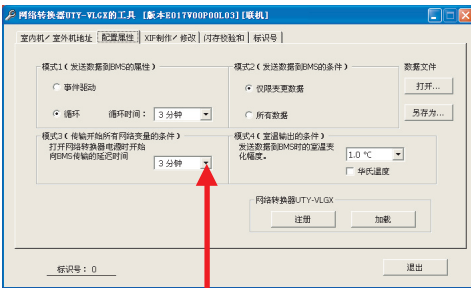
如果可能，请按如下方式选择：
“仅限变更数据”只向 BMS 发送变更的信息。
“所有数据”向 BMS 发送所有数据。

注

当设置为“仅限变更数据”时，因为只选择变更的信息，与“所有数据”的情况相比，可以降低向 BMS 发送的信息传输量。

5-2-3. 设置“模式 3（传输开始所有网络变量的条件）”。

“配置属性”



- 在网络转换器接通电源后，设置通信的开始时间。请确保设定值适合于该系统。

1 单击“▼”按钮设置“开始向 BMS 传输的延迟时间”。

注

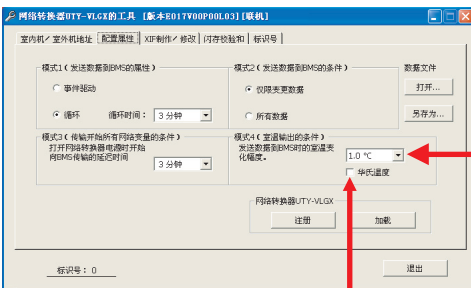
因为具有不同起动时间的设备混在了一起，通信开始被设置为待机。
设置待机时间以避免通信故障。

注

发送信息的开始时间的范围可以设置为从 1 分钟到 30 分钟。（间隔为 1 分钟。）

5-2-4. 设置“模式 4（室温输出的条件）”。

“配置属性”



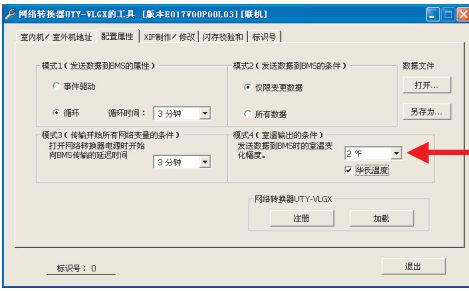
- 在室温改变的情况下发送数据信息，设置输出室温数据的最小变化范围。

1 通过单击“▼”按钮，可以选择“室温的变化范围”。

注

发送室温数据的变化范围可以设置为 0.5°C 到 10.0°C（间隔为 0.5°C）。而且，在以华氏温度显示的情况下，变化范围可以设置为 1°F 到 20°F（间隔为 1°F）。当设置的变化范围小时，信息的传输量增加。如果设置的变化范围大，信息不能被上传。VRF 系统的操作条件和 BMS 侧的监视状况存在差异。

“配置属性”



温度以华氏温度 (°F) 显示。

注

温度单位可以从摄氏温度 (°C) 切换至华氏温度 (°F)。

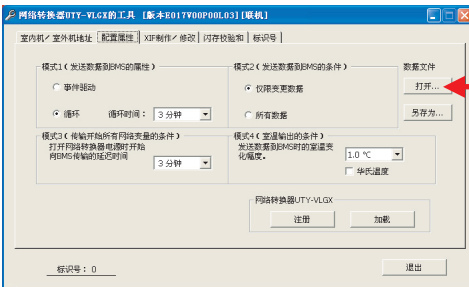
- 在将温度显示从摄氏温度 (°C) 切换至华氏温度 (°F) 的情况下。

2 单击“华氏温度”复选框。

- ◆ 温度显示从摄氏温度 (°C) 切换至华氏温度 (°F)。如果再次单击复选框，将返回至以摄氏温度 (°C) 显示。

5-2-5. 打开保存在 PC 中的用于网络转换器的工具的数据。

“配置属性”



- 确认读取的保存在 PC 的文件中的设置信息的内容。

1 单击“打开”按钮。

- ◆ “打开文件”窗口打开。

2 打开该文件的保存路径。

3 选择该读入文件。

4 单击“打开”按钮。

- ◆ 开始打开。

- ◆ 在读入该文件完成之后，“文件打开成功”的画面打开。

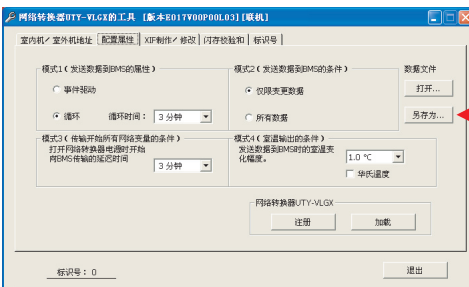
5 单击“确定”按钮。

- ◆ 该画面关闭。



5-2-6. 保存设置在 PC 中的数据。

“配置属性”



- 确认网络转换器读入的数据信息的变更或其他，并在 PC 中保存该文件。

1 单击“保存”按钮。

- ◆ “命名并保存”窗口打开。

2 选择一个文件保存路径。

3 填上“保存时的文件名称”。



5

4 单击“保存”按钮。

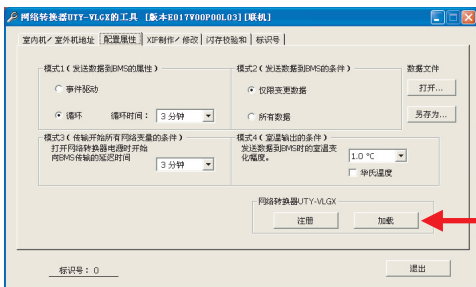
- ◆ 开始保存。
- ◆ 在保存结束之后，“文件保存成功”的画面打开。

5 单击“确定”按钮。

- ◆ 该画面关闭。

5-2-7. 打开在网络转换器中的设置数据。

“配置属性”



1

- 将网络转换器中的设置信息读入网络转换器的工具，并确认其内容。

注

在用“加载”按钮从网络转换器读入设置信息之前，请用“保存”按钮保存当前显示内容的文件，留待以后某些情况下使用。

1 单击“加载”按钮。

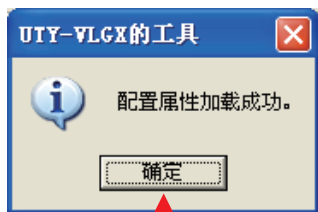
- ◆ 从网络转换器读入网络转换器的工具的设置信息将显示在屏幕上。

- ◆ 在“加载”完成之后，“配置属性加载成功”的画面打开。

2 单击“确定”按钮。

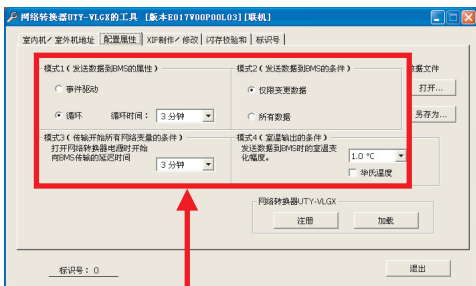
- ◆ 该画面关闭。

3 改变网络转换器的设置信息的显示内容。



2

“配置属性”



3

注

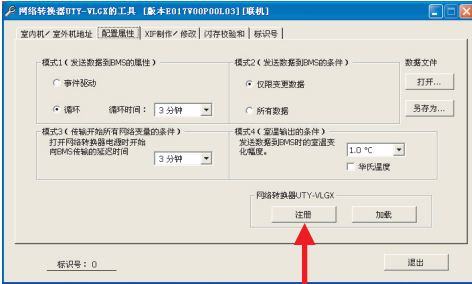
有关改变设置的操作，请参照 5-2-1 至 5-2-4。

注

只有在“连接环境”菜单处于“联机工作”状态时，从网络转换器中“加载”的数据信息才有效。当处于“脱机工作”状态时，在对必要的文件进行保存之后，请重启网络转换器并切换至“联机工作”状态。（详情请参照 4-2）

5-2-8. 在网络转换器中注册设置数据。

“配置属性”



1



2

- 确认设置（变更的）数据信息，并在网络转换器中注册。

1 单击“注册”按钮。

- ◆ 在网络转换器中注册设置内容，并且打开“配置属性注册成功”的画面。

2 单击“确定”按钮。

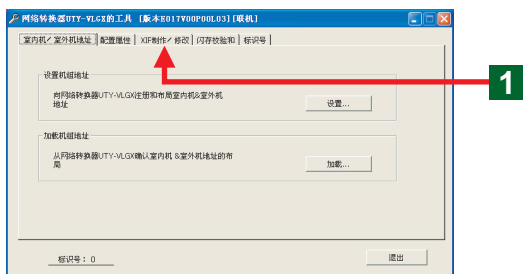
- ◆ 设置数据的注册结束。

注

只有在“连接环境”菜单处于“联机工作”状态时，在“网络转换器”中“注册”的数据信息才有效。当处于“脱机工作”状态时，在对必要的文件进行保存之后，请重启网络转换器并切换至“联机工作”状态。（详情请参照 4-2）

5-3. 制作“XIF”文件。

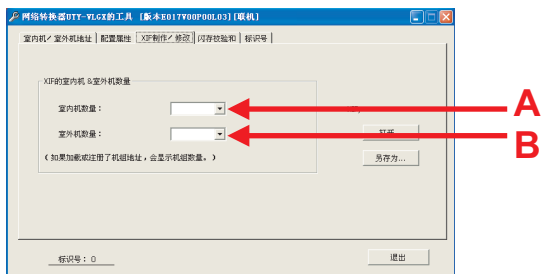
功能切换（选项） “室内机 / 室外机地址”



- 为了联结网络集成工具，要制作必要的“XIF”文件。
- “标识号”相关的信息包含在“XIF”文件中。在制作“XIF”文件时，在“网络转换器”中的“标识号”必须与“XIF”文件中的“标识号”一致。

1 单击“XIF制作/修改”的选项。

“XIF制作/修改”



◆ “XIF制作/修改”画面打开。

注

制作项目如下：

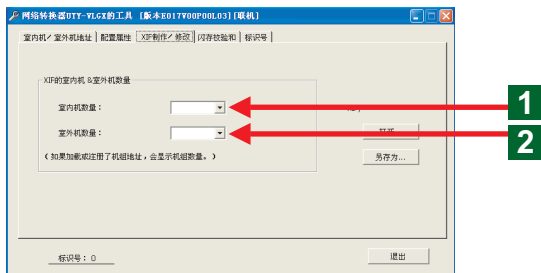
- A. “室内机数量”
- B. “室外机数量”

注

当 5-1-3 “注册”和 5-1-6 “加载”成功之后，基于通信的“室内机”和“室外机”与网络转换器的机组数量信息，它将作为默认显示。

5-3-1. 在网络转换器的工具上制作“XIF”文件。（在默认数值改变的情况下）

“XIF制作/修改”



- 为了进行联结，制作了必要的“XIF”文件。

1 通过单击“室内机数量”的[▼]按钮设置控制的室内机的数量。

2 通过单击“室外机数量”的[▼]按钮设置控制的室外机的数量。

注

“室内机的数量”可以控制为从 1 台至 128 台（最多 128 台）。

注

“室外机的数量”可以控制为从 1 台至 100 台（最多 100 台）。

注

“XIF”文件是进行“联结”的必要数据。请确保输入与网络转换器 5-1 中注册的“室内机 / 室外机地址”的数量相同的机组数量。

5-3-2. 打开保存 PC 中的“XIF”文件。

“XIF 制作 / 修改”



显示“网络转换器”的连接“标识号”。



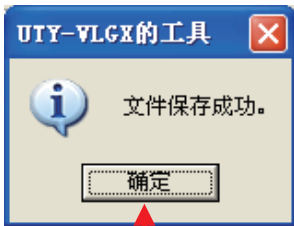
显示“XIF”文件的“标识号”读数。

- 保存在 PC 中的“XIF”文件被读入至网络转换器的工具。

- 1 单击“打开”按钮。
 - ◆ “打开文件”窗口打开。
- 2 打开该文件的保存路径。
- 3 选择该读入文件。
- 4 单击“打开”按钮。
 - ◆ 开始打开。
 - ◆ 在读入该文件完成之后，“文件打开成功”的画面打开。
 - ◆ 读入的“XIF”文件的“标识号”将显示在子画面中。与网络转换器的“标识号”不同的“网络转换器”将不运行。
- 5 单击“确定”按钮。
 - ◆ 该画面关闭。

5-3-3. 在 PC 中保存用网络转换器的工具制作的“XIF”文件。

“XIF 制作 / 修改”



5

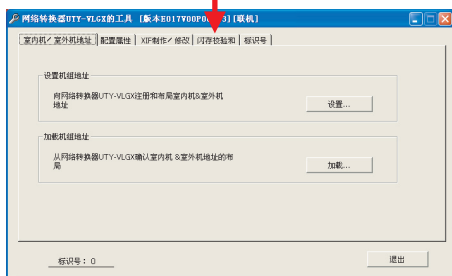
- 在 PC 中保存利用网络转换器制作的“XIF”文件。

- 1 单击“保存”按钮。
 - ◆ “命名并保存”窗口打开。
- 2 选择文件保存路径。
- 3 填上“保存时的文件名称”。
- 4 单击“保存”按钮。
 - ◆ 开始保存。
 - ◆ 在保存结束之后，“文件保存成功”的画面打开。
- 5 单击“确定”按钮。
 - ◆ 该画面关闭。

5-4. 确认网络转换器的产品信息。

功能切换（选项）
“室内机 / 室外机地址”

1



- 确认安装在网络转换器上的 CPU 的“闪存校验和”数据信息和软件版本信息。

1 单击“闪存校验和”的选项。

注

如果可能，请按如下方式确认：

1. “UTY-VLGX CPU 的软件版本”
2. CPU 信息

- ◆ “闪存校验和”画面打开。

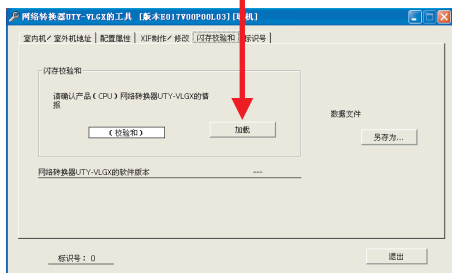
“闪存校验和”



5-4-1. 确认在网络转换器中加载的“闪存校验和”的信息。

“闪存校验和”

1



- 确认网络转换器的“闪存校验和”信息。

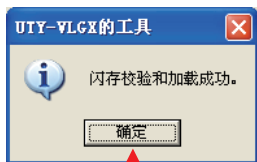
1 单击“加载”按钮。

- ◆ “CPU 的闪存校验和”的数值将显示在显示部分。
- ◆ “UTY-VLGX CPU 的软件版本”将显示在“闪存校验和”的下部。
- ◆ “闪存校验和加载成功”的画面打开。

2 单击“确定”按钮。

注

只有在“连接环境”菜单处于“联机工作”状态时，从网络转换器中“加载”的数据信息才有效。当处于“脱机工作”状态时，不能进行任何操作。请通过重启网络转换器的工具来切换至“联机工作”状态。（详情请参照 4-2）



2

5-4-2. 在 PC 的网络转换器中保存“闪存校验和”的信息。

“闪存校验和”



软件版本



- 在 PC 中保存网络转换器的“闪存校验和”的数据信息的文件。

1 单击“保存”按钮。

- ◆ “命名并保存”窗口打开。

2 选择文件保存路径。

3 填上“保存时的文件名称”。

4 单击“保存”按钮。

- ◆ 开始保存。

- ◆ 在保存结束之后，“文件保存成功”的画面打开。

5 单击“确定”按钮。

- ◆ 该画面关闭。

- ◆ 指示了“网络转换器 UTY-VLGX CPU”的软件版本。

注

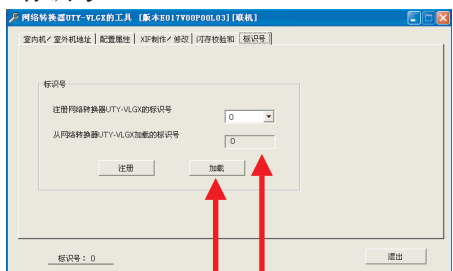
当网络转换器出现问题时，请与本软件版本的授权服务人员联系。

5-4-3. 变更网络转换器的“标识号”。

功能切换（选项）
“室内机 / 室外机地址”



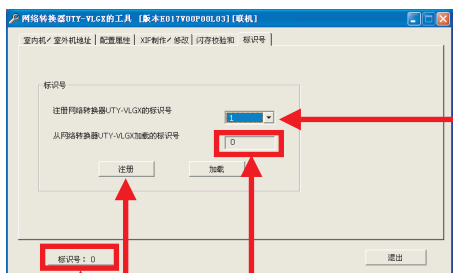
“标识号”



显示加载的
“标识号”。



“标识号”



A

B



- 设置 / 变更“标识号”。

1 单击“标识号”的选项。

注

在“注册”时，将注册网络转换器的“标识号”的设置信息。
在“加载”时，读入在网络转换器中设置的“标识号”信息。

- 为了确认设置在网络转换器中的“标识号”的信息，将其读入网络转换器的工具。

2 单击“加载”按钮。

- ◆ “标识号”的信息从网络转换器中读入。该内容将显示在“从网络转换器加载的标识号”的窗口中。

- ◆ 在“加载”完成之后，“标识号加载成功”的画面打开。

3 单击“确定”按钮。

- ◆ 该画面关闭。

- 在变更“标识号”的情况下。

4 单击 [▼] 按钮来选择想要设置的“标识号”。

- ◆ 选择的“标识号”。将显示在“注册在网络转换器 UTY-VLGX 中的标识号”的窗口中。

5 单击“注册”按钮。

- ◆ 在网络转换器中注册变更的内容，并且打开“标识号注册成功”的画面。

6 单击“确定”按钮。

- ◆ 该画面关闭。变更数据的注册结束。

注

当“网络转换器”的“标识号”变更以后，试着重新制作和修改“XIF”文件。

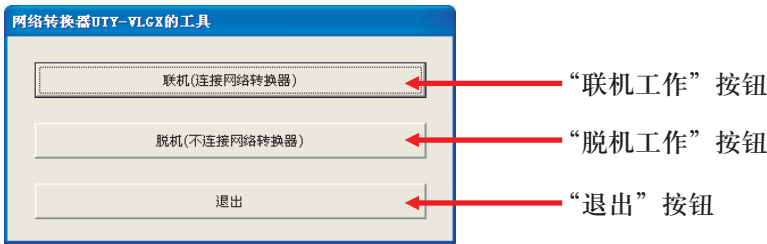
注

联机：
如果注册在步骤 [4] 选择的“标识号”，将反映 [A] 和 [B] 的标识号的显示。

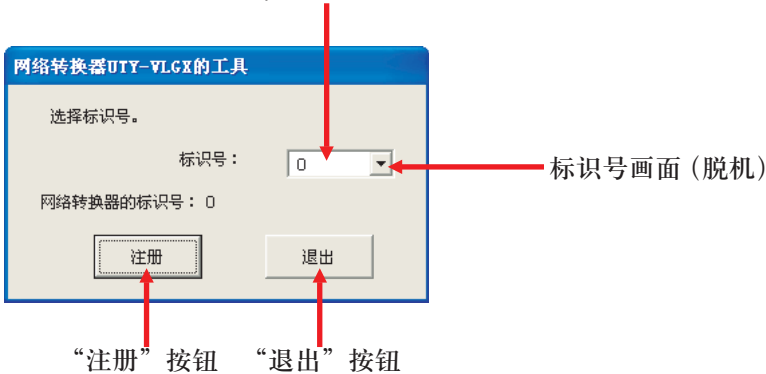
脱机：
如果在步骤 [4] 选择“标识号”，则同时 [A] 的显示也将发生改变。
但是，[B] 的显示不会改变。

6.主画面说明

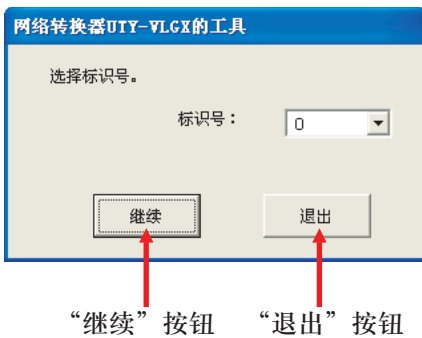
“连接环境” 菜单画面



“标识号” 画面（联机） 选择的标识号显示



“标识号” 画面（脱机）

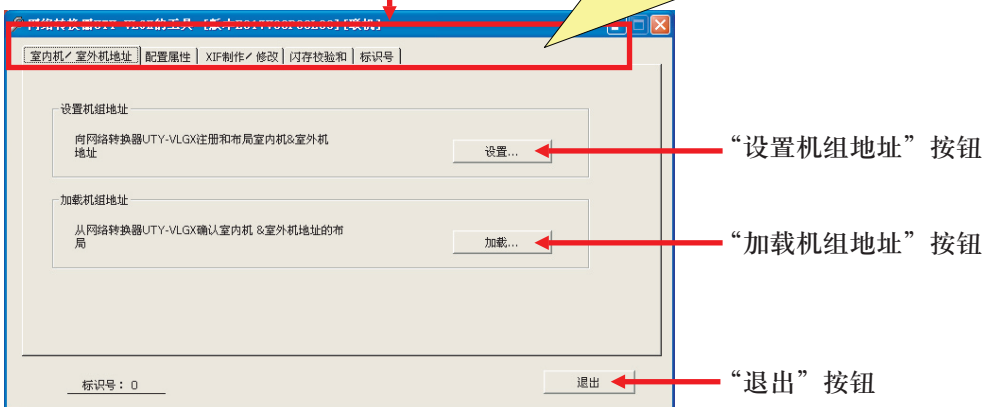


功能切换（选项）

“室内机/室外机地址” 画面

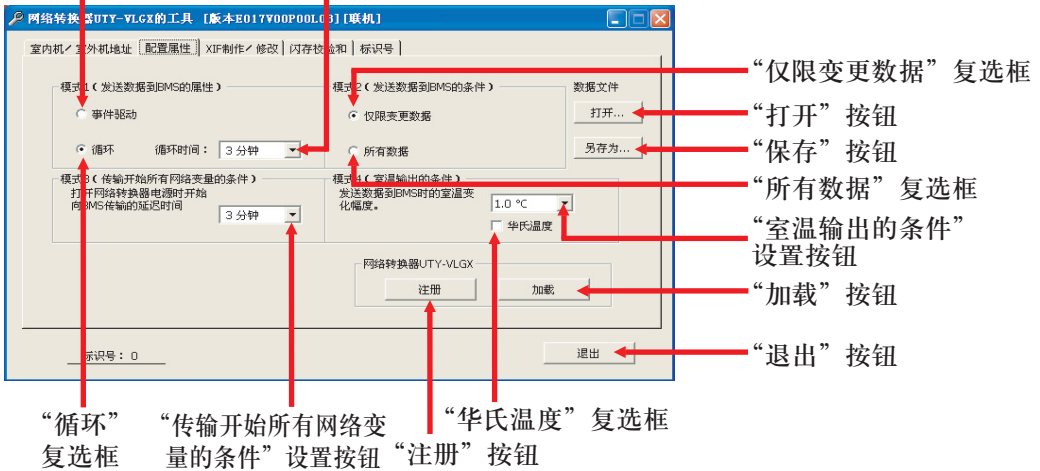
“功能切换” 选项

- 选项从左边开始：
- 室内机 / 室外机地址
 - 配置属性
 - XIF 制作 / 修改
 - 闪存校验和
 - 标识号
 - 标识号



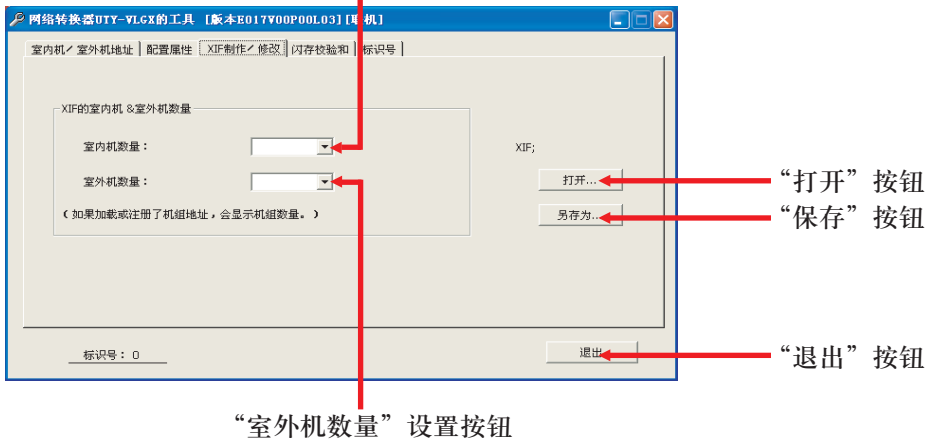
“配置属性”画面

“事件驱动”复选框 “循环时间”设置按钮



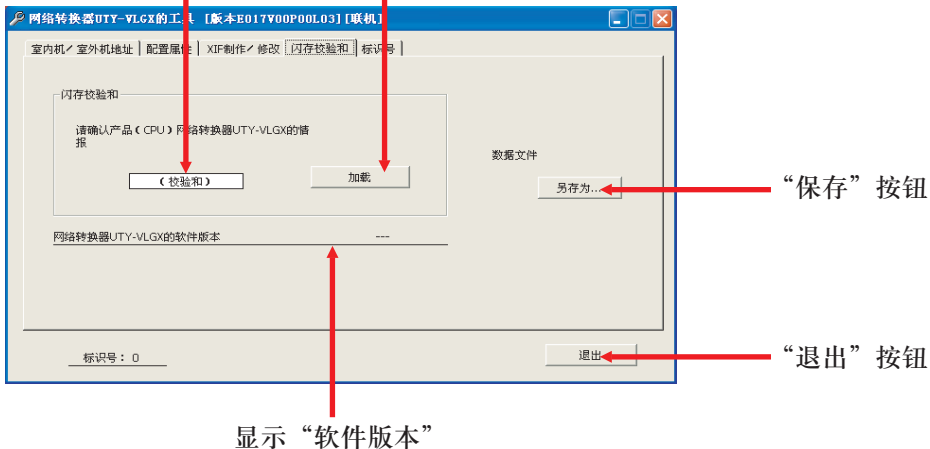
“XIF制作/修改”画面

“室内机数量”设置按钮



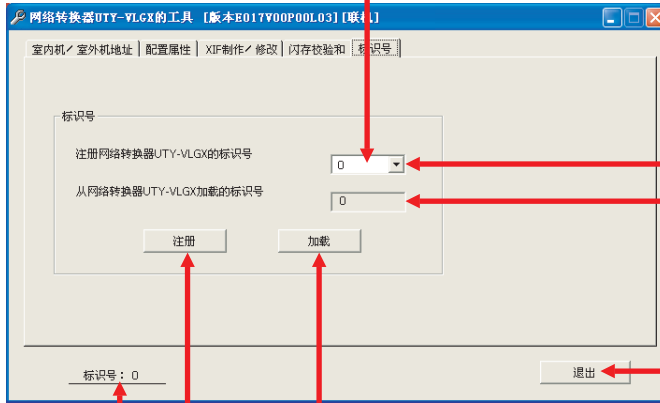
“闪存校验和”画面

“校验和”显示 “加载”按钮



“标识号（变更）”画面

选择的“标识号”显示



“标识号”选择按钮

加载的“标识号”显示

“退出”按钮

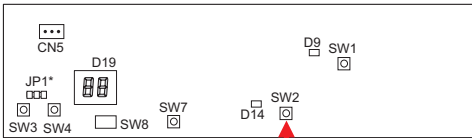
“注册”按钮 “加载”按钮

显示网络转换器的“标识号”

7. 服务引脚

当利用网络集成工具进行联结及调试时，用它来识别网络转换器。
如果推动服务引脚，将发送神经元编号。

程序控制块布局



这是服务引脚。
神经元编号被发送至推动
BMS 控制器 (SW2)