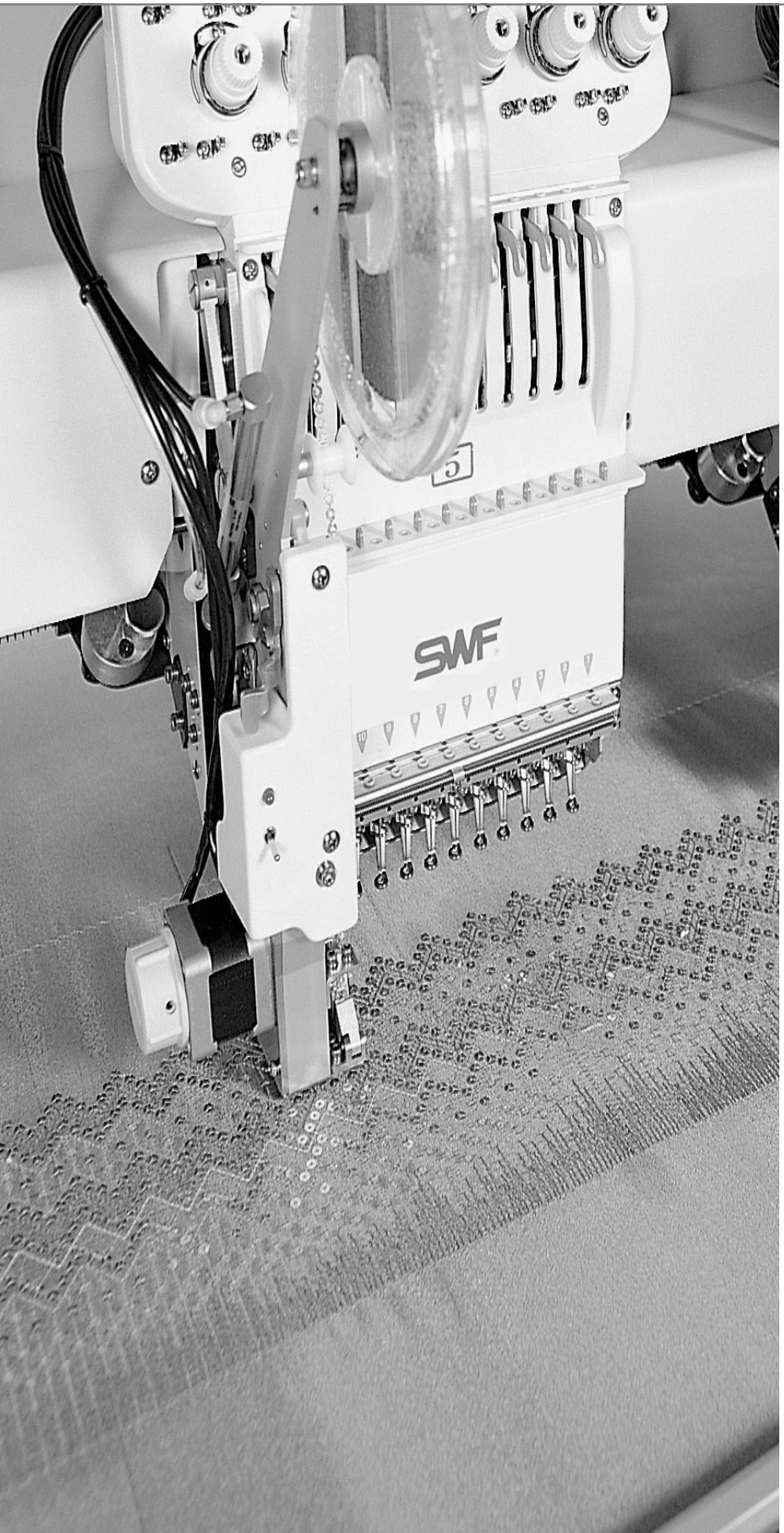
SWF®



MANUAL

SENS

(Sunstar Embroidery Network System)

Ver. 1.0

MEE-060714
SUNSTAR PRECISION CO., LTD.

1. THIS IS AN INSTRUCTION FOR SAFE USE OF SWF AUTOMATIC EMBROIDERY MACHINES. READ THOROUGHLY BEFORE USE.

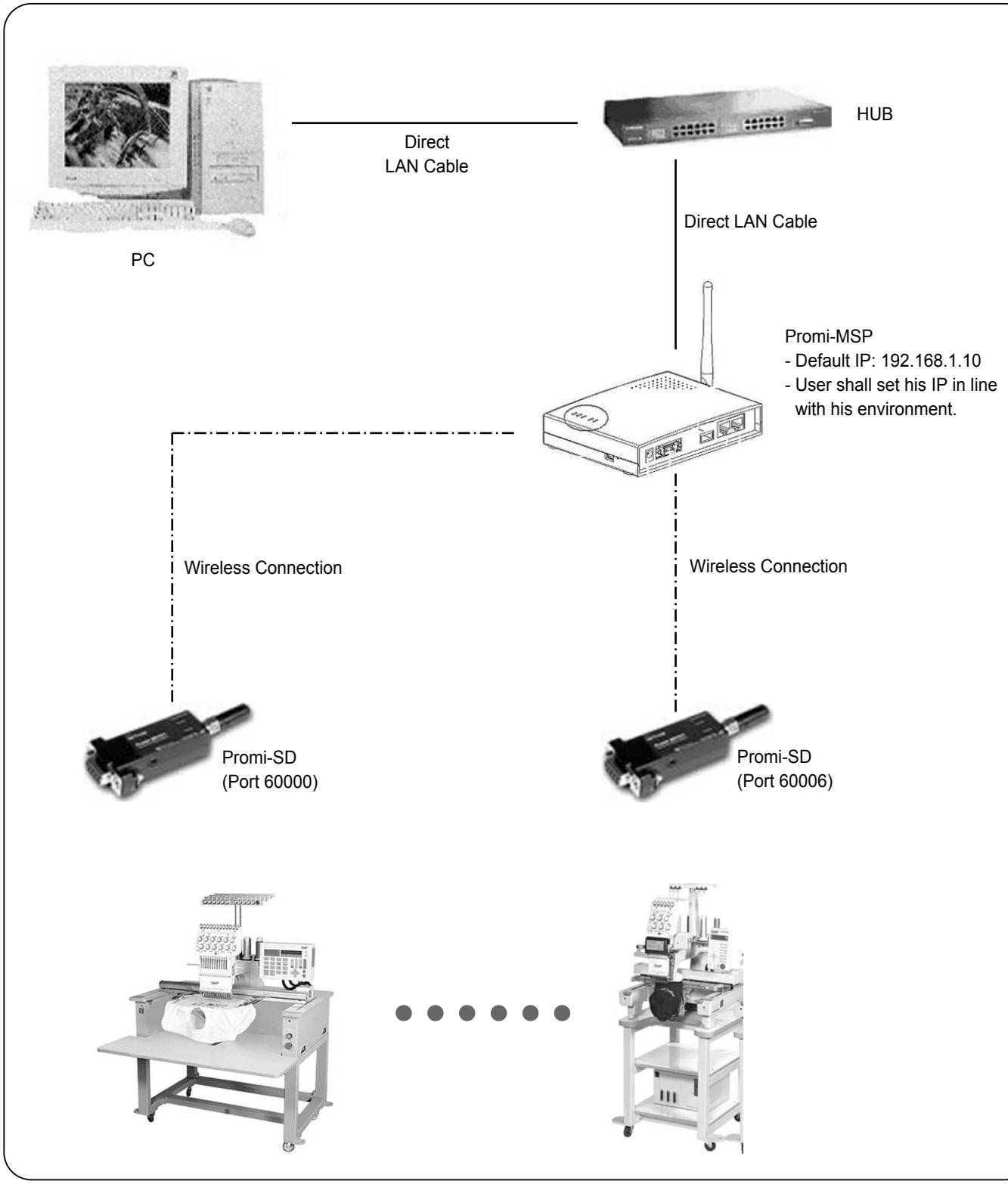
2. CONTENTS IN THIS INSTRUCTION MAY CHANGE, WITHOUT PRIOR NOTICE, FOR IMPROVEMENT OF MACHINE QUALITY AND THUS MAY NOT CORRESPOND TO THE MACHINE YOU PURCHASED. CONTACT YOUR SALES AGENT FOR INQUIRIES.

3. THIS IS DESIGNED AND MANUFACTURED AS AN INDUSTRIAL MACHINE. IT SHOULD NOT BE USED FOR OTHER THAN INDUSTRIAL PURPOSE.

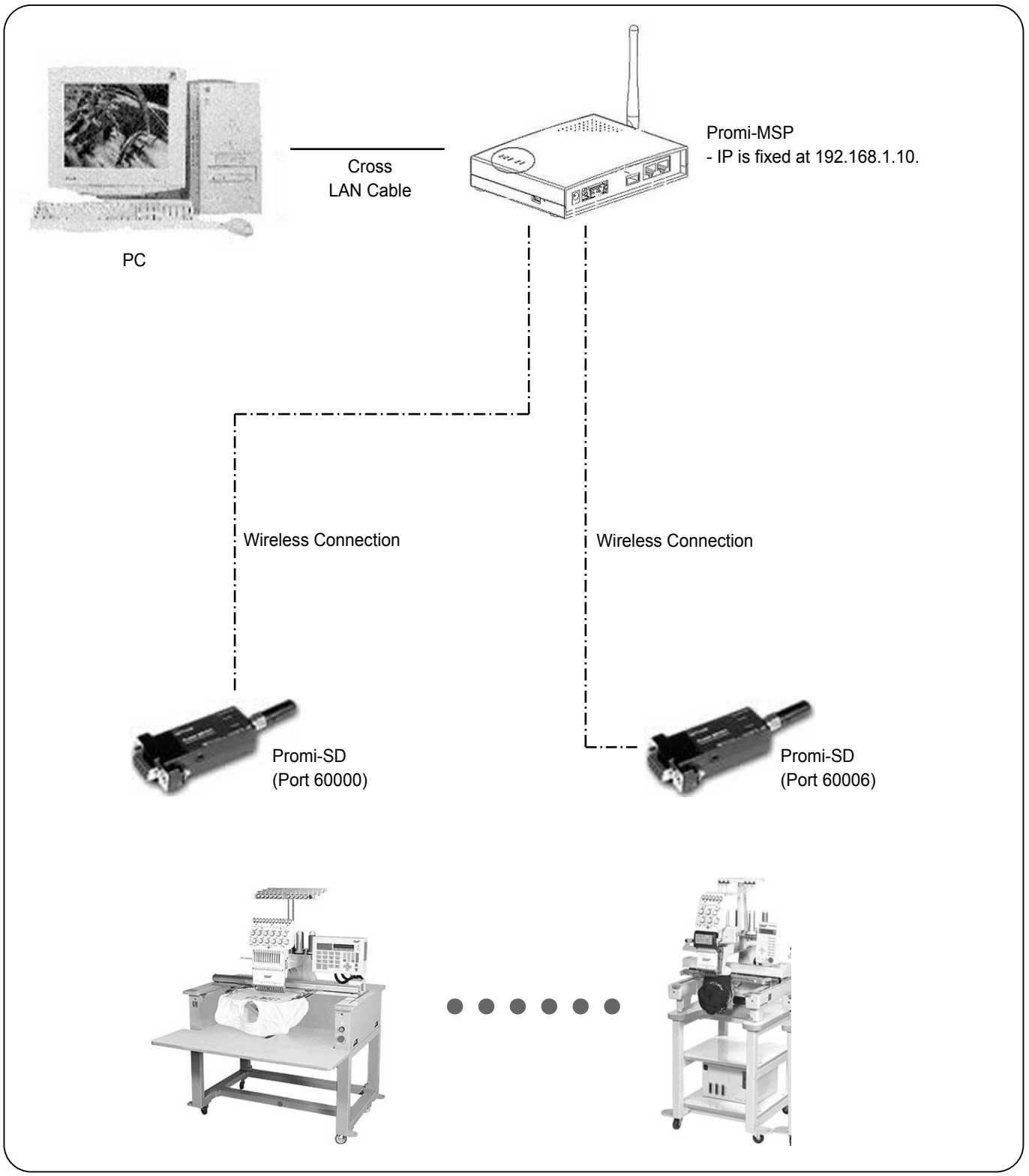
CONTENTS

1. Embroidery Machine Network Configuration

1.1 Connecting Promi-MSP to HUB (static IP used)



1.2 Direct Connection between Promi-MSP and PC



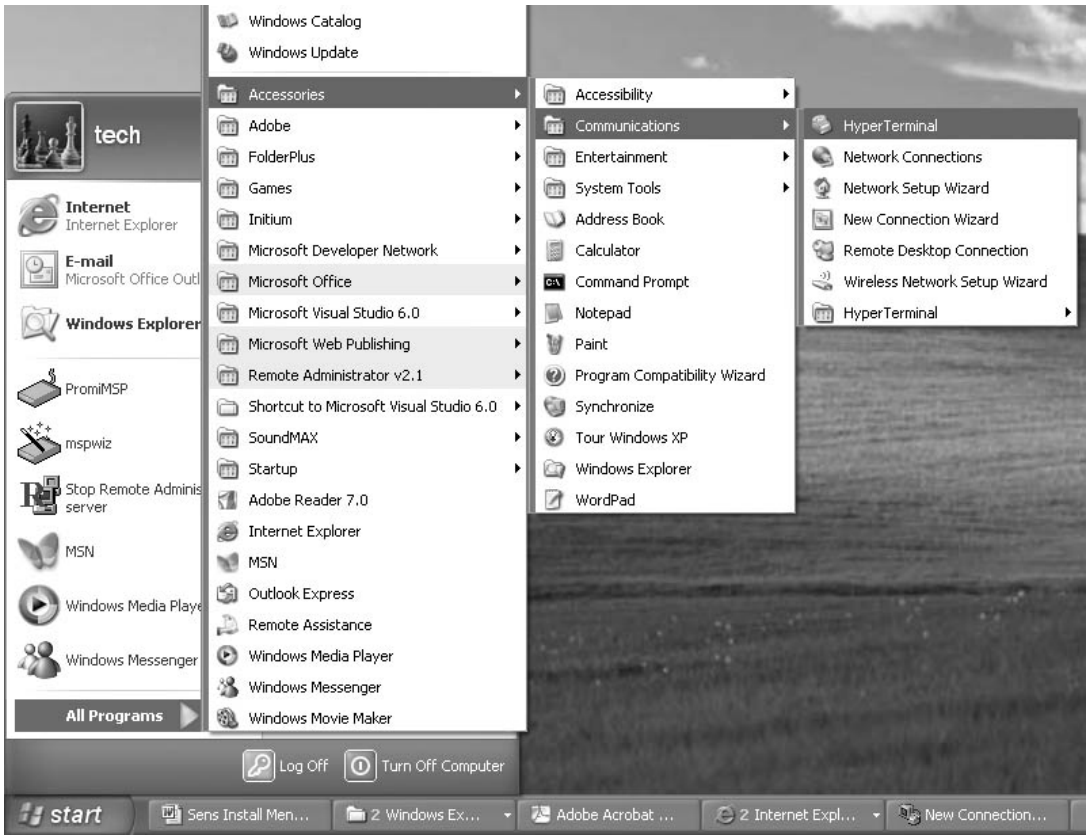
2. Installation and Setup of Promi-MSP

2.1 Setup

(1) Connect Promi-MSP to the power. If Status LED blinks fast and is turned on after the power supply is approved, it means that Promi-MSP is properly operating.

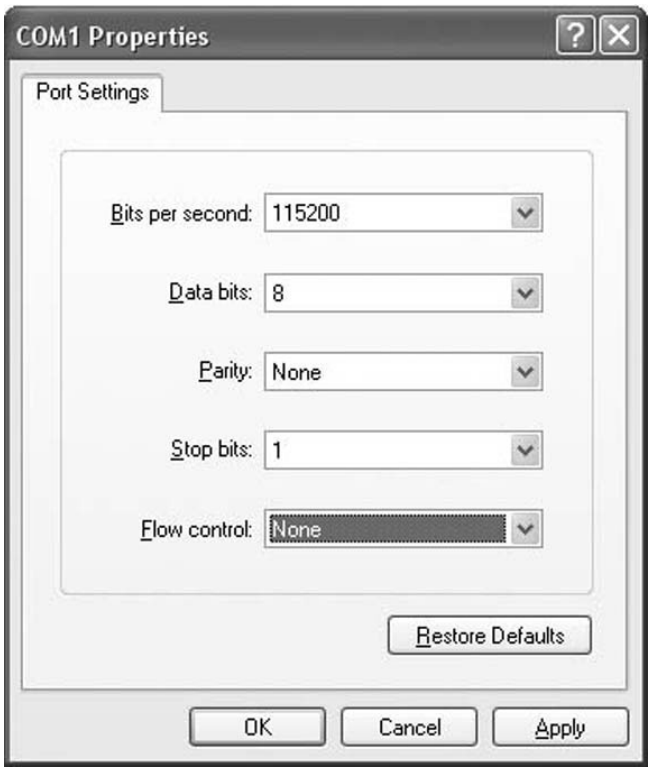
(2) As in the below figure, connect the serial cable to PC and Promi-MSP respectively.

(3) Execute HyperTerminal. On the start menu of Windows, click in the order of “All Programs → Accessories → Communications → HyperTerminal.”

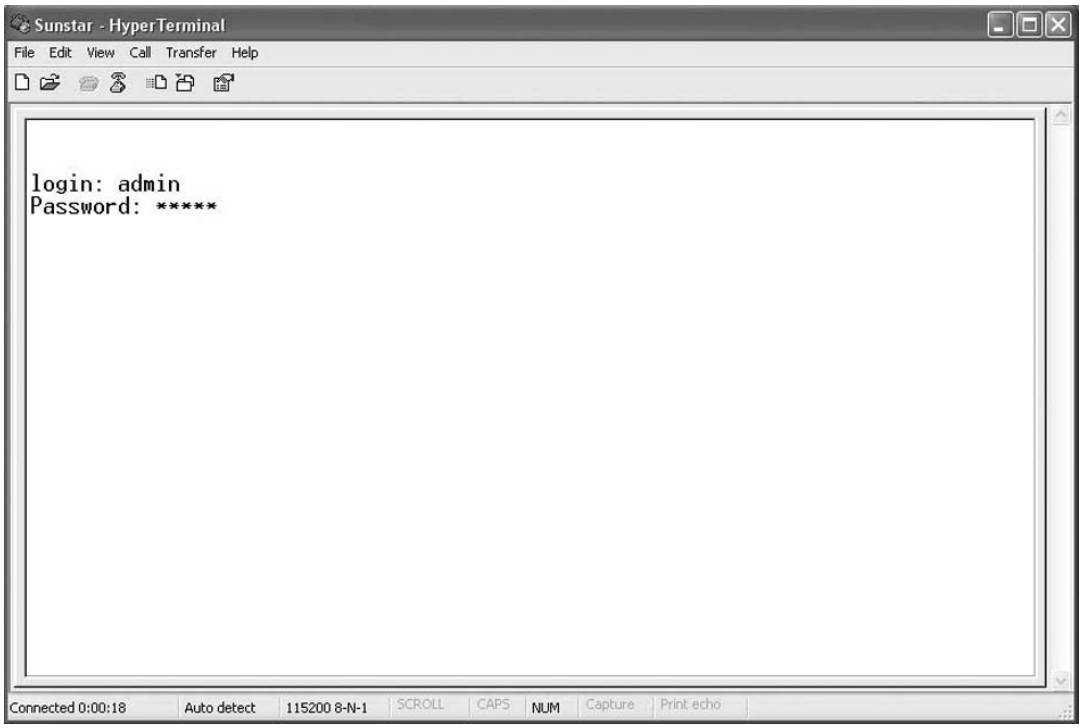


(4) After selecting HyperTerminal, set up COM port as in the below table.

Baud rate	115200
Data bit	8
Parity bit	None
Stop bit	1
Flow control	None

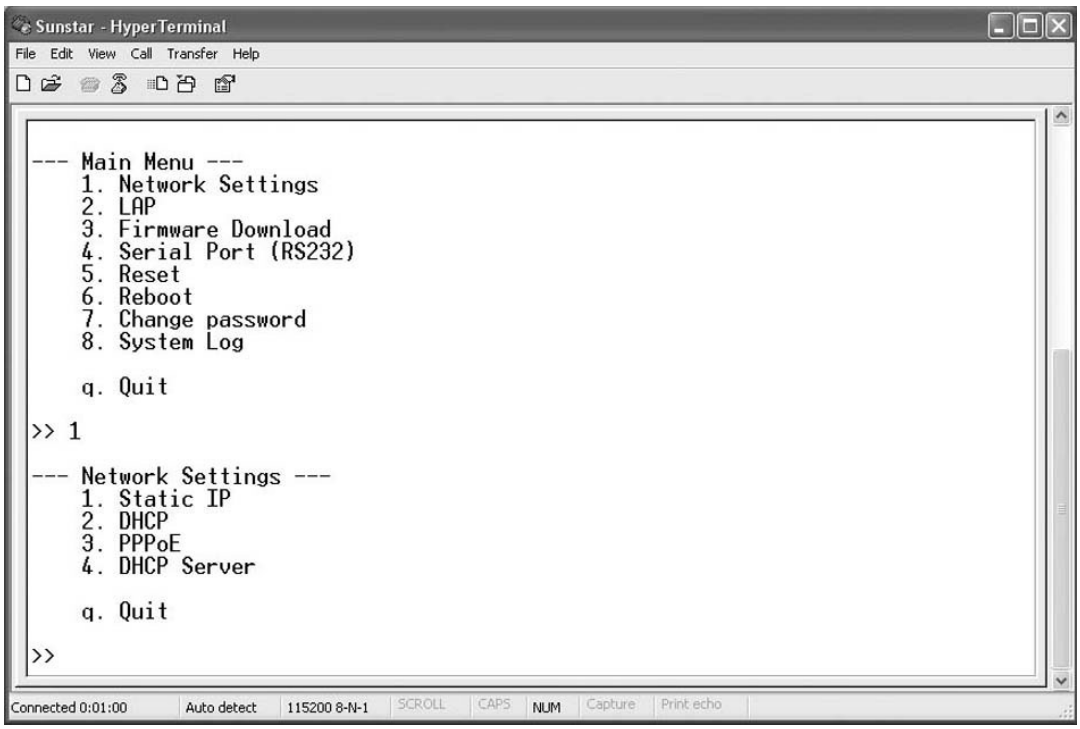


(5) Press [ENTER], and the login prompt appears as in the below figure. When a product is shipped out, the default login name and password are set at admin and 11111 respectively.



(6) The default IP address of Promi-MSP is 192.168.1.10.

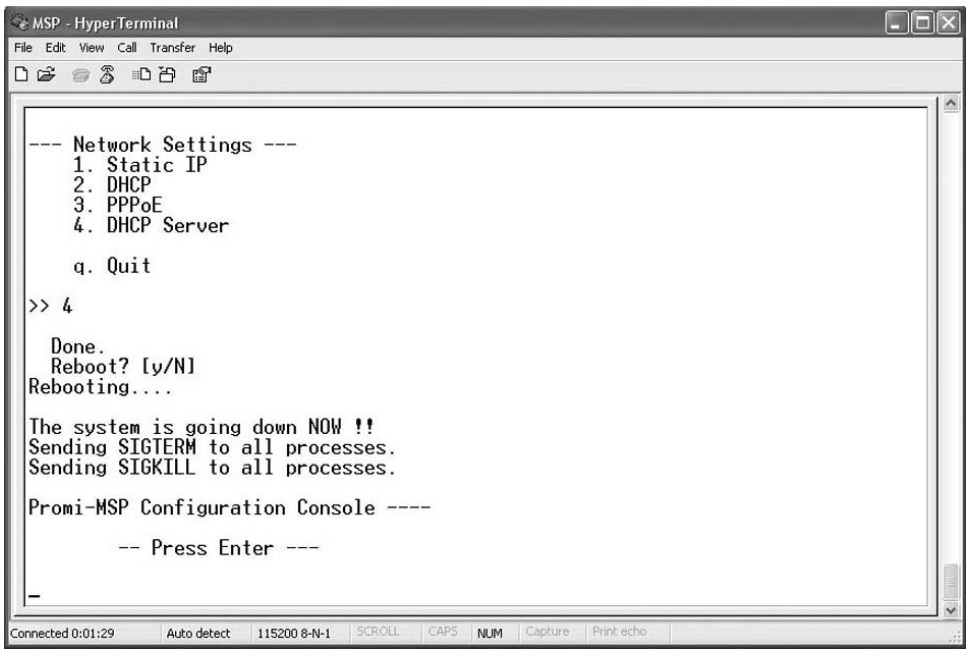
(7) For network setup, select "Network Settings" or the first item on the main menu.



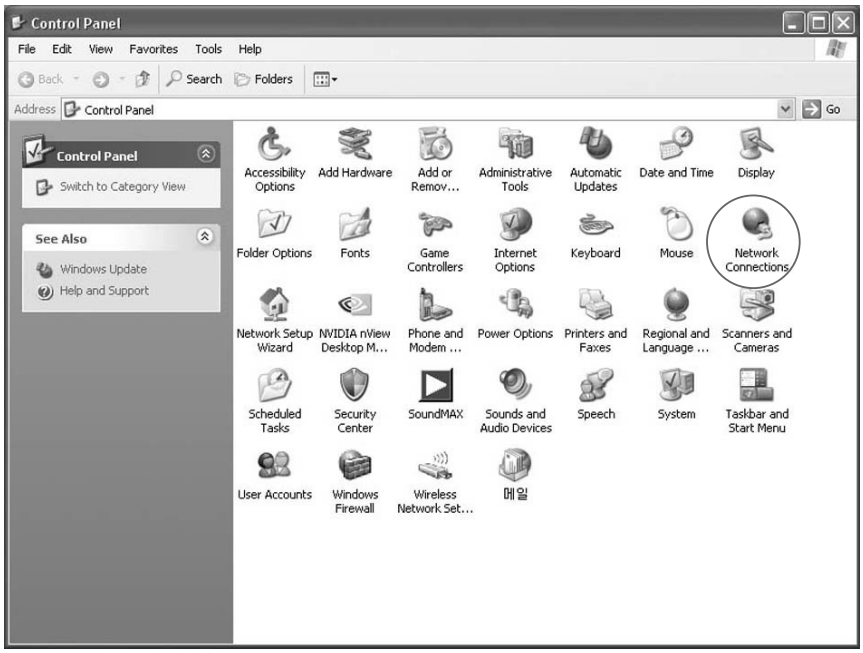
2.1.1 Direction Connection between Promi-MSP and PC

(1) Select "DHCP Server" under the network settings menu, and it will make Promi-MSP serve as DHCP Server, which allocates IP addresses. When directly connecting PC to Promi-MSP, PC shall be set to receive automatically allocated IP. Without any network setting changes on PC, just insert the LAN cable into PC.

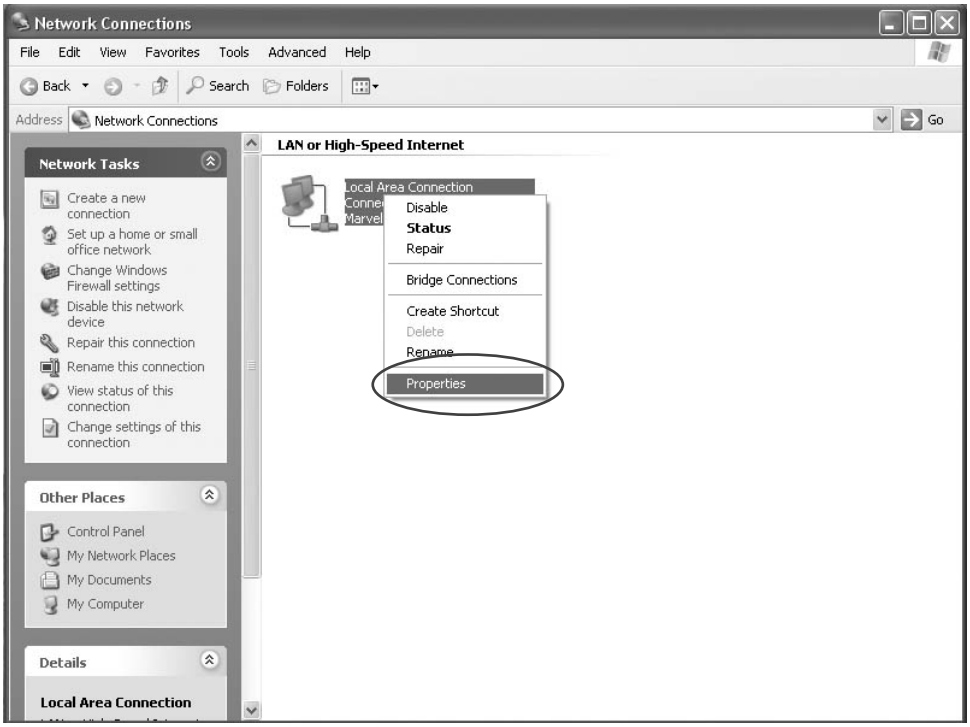
1) On the network settings screen as in the below figure, choose "4. DHCP Server." When the message appears asking "Reboot?", press "Y" to complete the MSP setting.



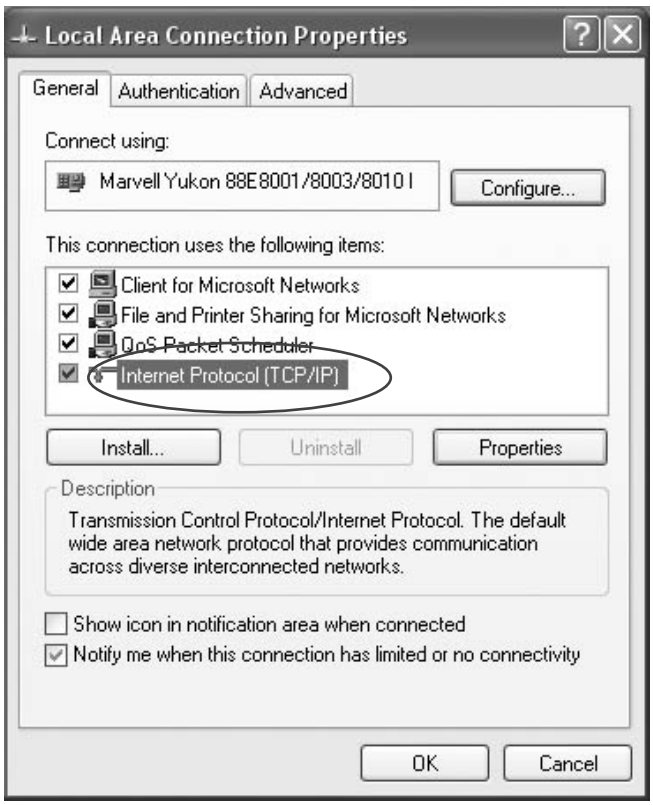
2) Select "Network Connections" on the PC control panel as below.



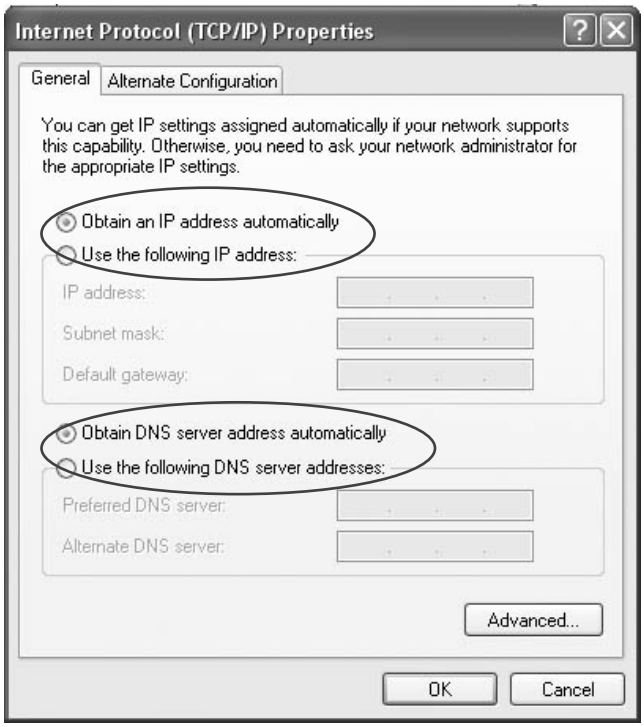
3) Select the Local Area Connection (MSP and connected LAN device) icon and press the right-side mouse button. When a pop-up menu appears, select "Properties."



4) On the Local Area Connection Properties box, select Internet Protocol(TCP/IP).



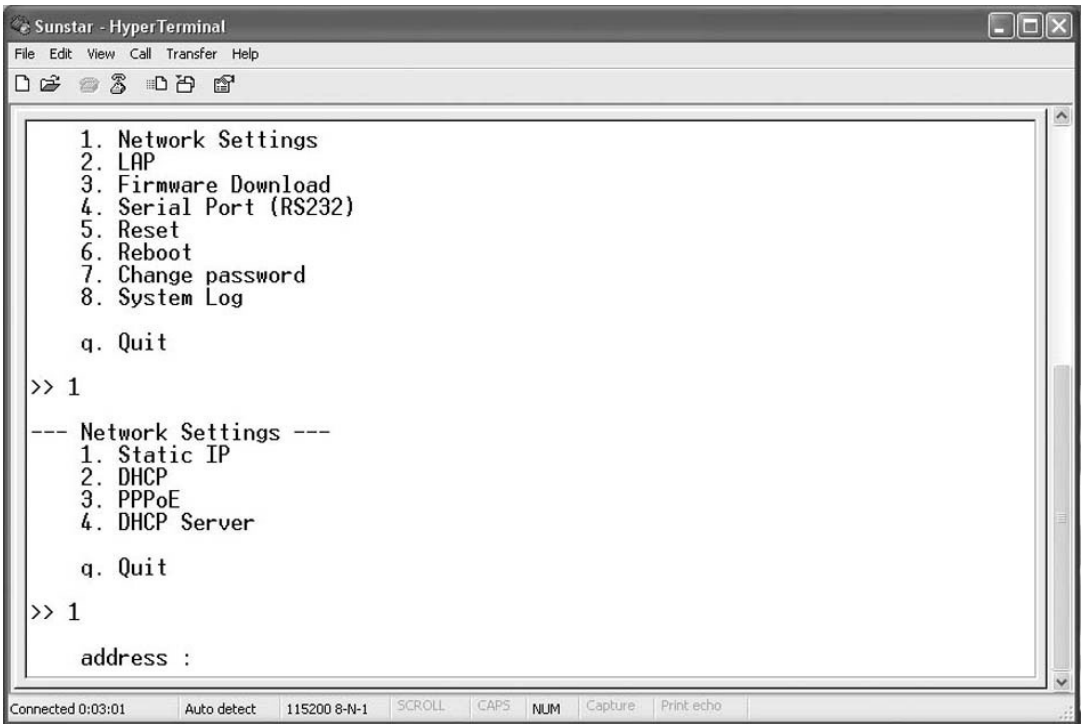
5) As in the Internet Protocol(TCP/IP) Properties dialog box below, choose "Obtain an IP address automatically" and "Obtain DNS Server address automatically" respectively. It completes the PC setup.



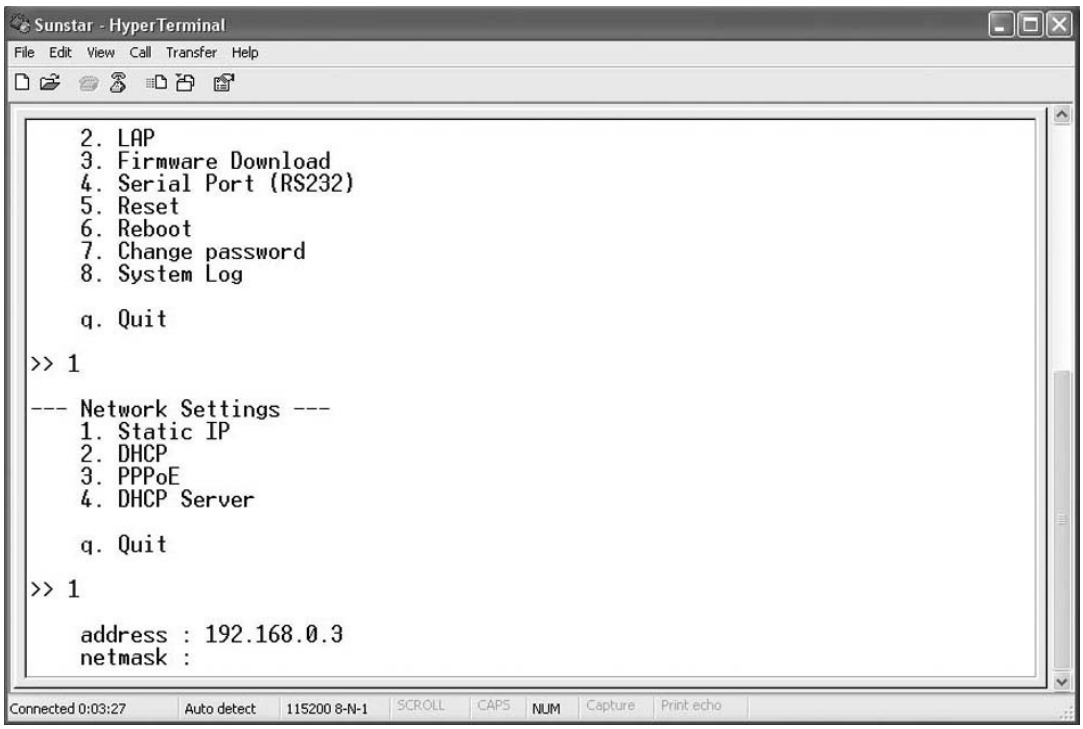
(2) The network setting is completed.

2.1.2 Connecting Promi-MSP to HUB (using static IP)

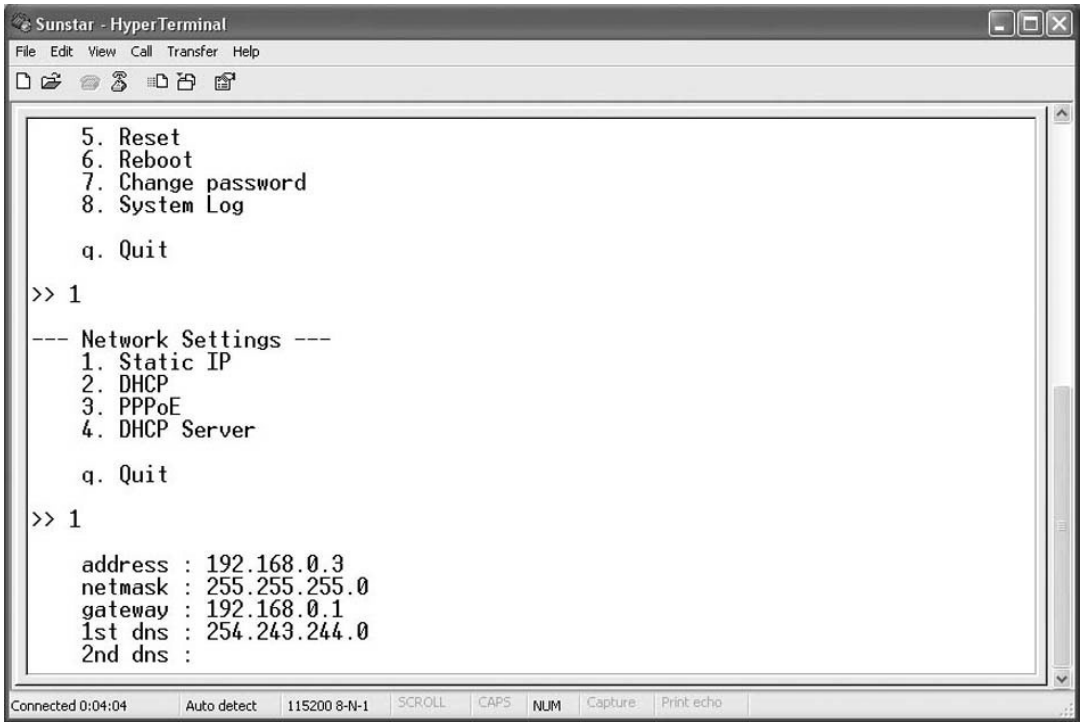
(1) Choose "1. Network Settings" and then "1. Static IP." Ask the network administrator for the currently used network information such as address, netmask, gateway and DNS. In case of DNS, at least one entry is required.



Ex1) Enter IP address. (IP address can be different depending on the user environment)

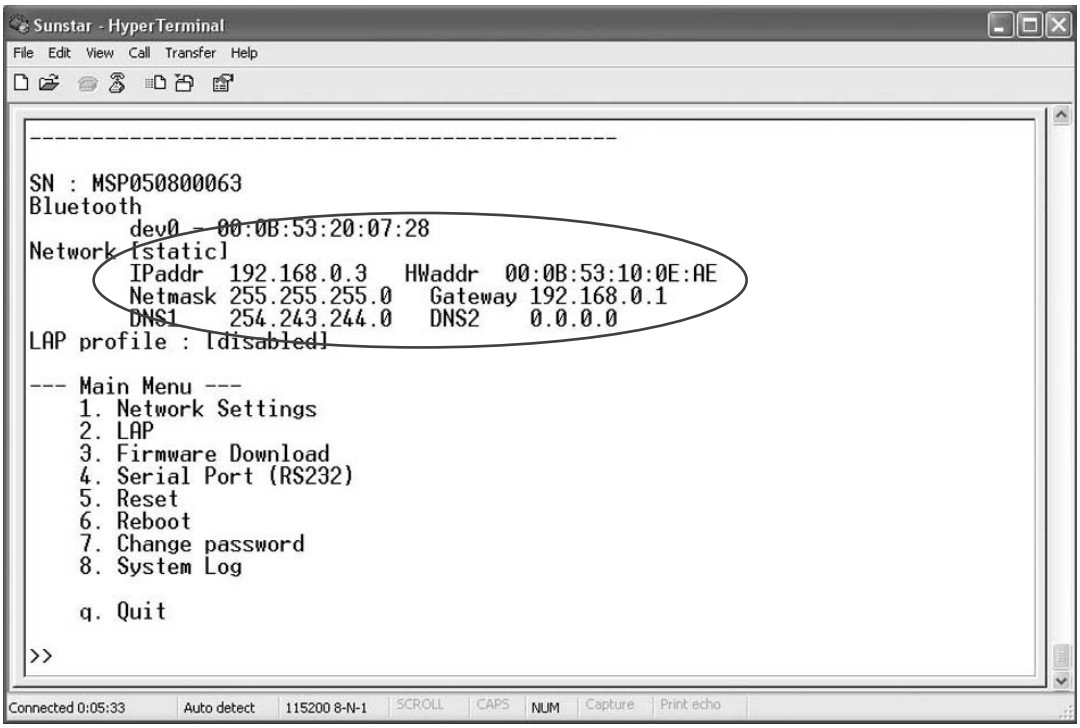


Ex2) Enter netmask, gateway, and DSN respectively.



(2) When "Reboot?" is asked, press "Y" for starting a computer again. The network setting will be applied after rebooting.

(3) Log in and check whether the settings are proper.



(4) The network setting is completed.

2.2 Connecting LAN Cable

1) When Promi-MSP is connected to HUB, insert the direct LAN cable into the external LAN port(EXT).
   ※ The LAN cable which is packed with Promi-MSP, is cross LAN cable. When Promi-MSP needs to be connected to HUB, the cable shall not be used. Direct LAN cable shall be purchased for connection.

2) When Promi-MSP is directly connected to the LAN card within PC, use the enclosed cross LAN cable for connection.

<Fig. 1> LAN cable connection

3. Setup of Promi-SD

3.1 Registration of Promi-SD and Promi-MSP

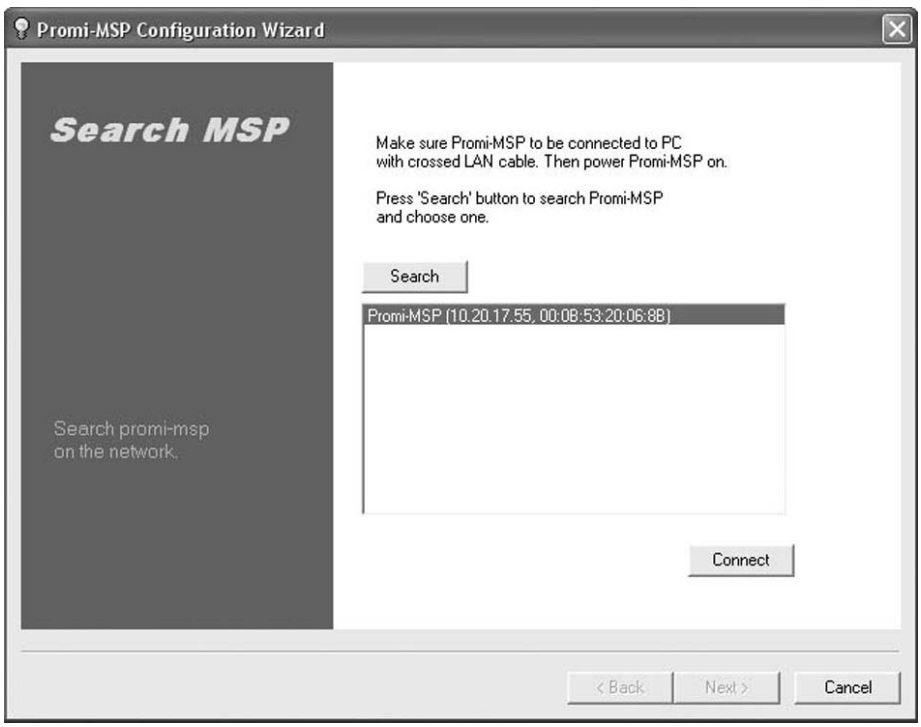
1) Install mspwiz.exe, which is saved in CD, on PC.

2) Turn on Promi-MSP and insert the LAN cable into Promi-MSP.
(For direct connection to HUB, use Direct LAN cable. For direct connection to PC, use Cross LAN.)

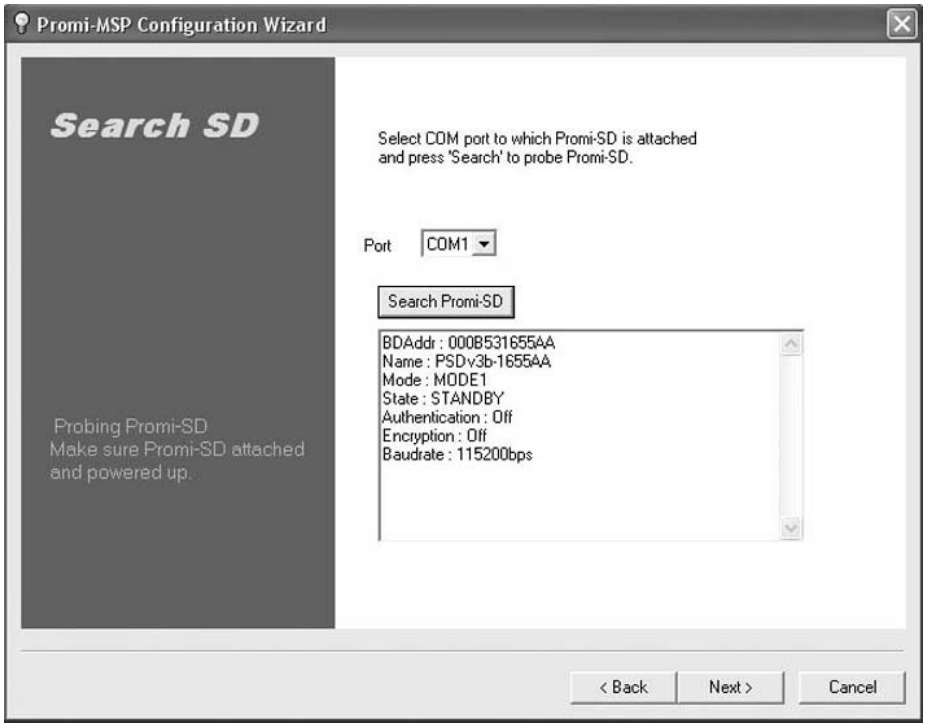
3) Check whether Status LED and EXT LED of Promi-MSP are on.

4) Connect Promi-SD to the PC's serial port, and supply power to Promi-SD.

5) Execute mspwiz.exe and press "Search" button. Then as in the below figure, Promi-MSP is searched. Select the set Promi-MSP and press "Next."



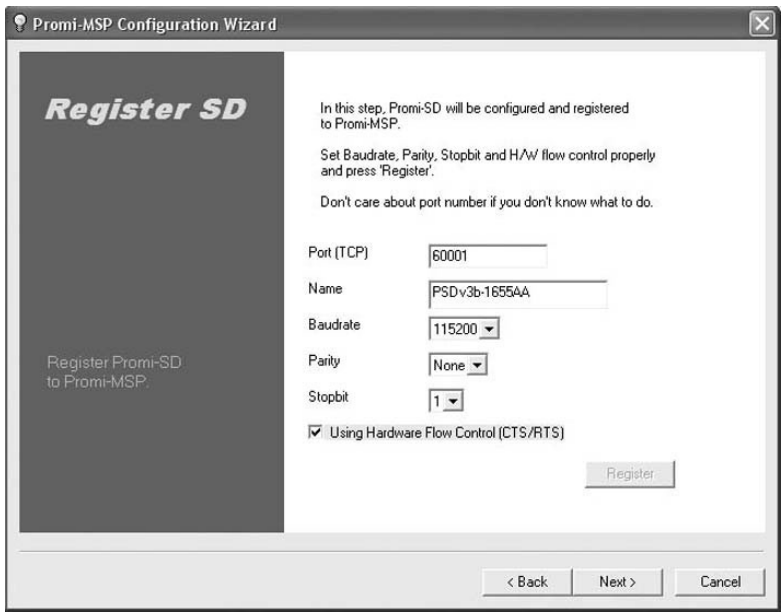
6) Select the serial port to which Promi-SD is connected, and press "Promi-SD Search".
Moments later, Promi-SD information searched appears as in the figure.



If the search result does not appear, check whether Promi-SD's power is on. Then, press "Reset" button on the side to initialize Promi-SD. Press "Promi-MSP Search" button again for the second trial (check the red LED).

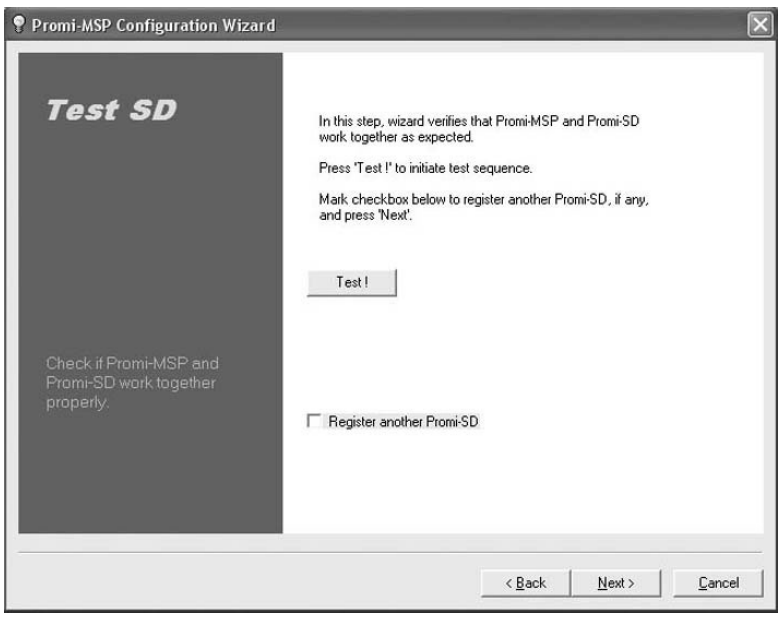
When Promi-SD is found, press "Next" to move forward.

7) Set Promi-SD and register the module to Promi-MSP.
Set Port (an Arbitrary value between 60000 and 65000), name (An Arbitrary character), communication speed (Baudrate) and Parity, stop bit (Stopbit), and flow control (CTS/RTS) and then press "Register" button.



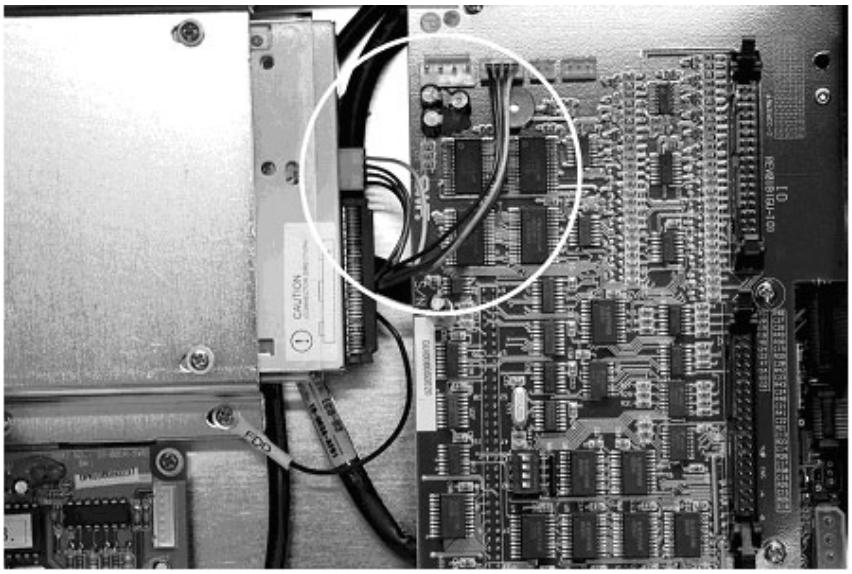
If the setup is made as above, the communication with Promi-SD is conducted through the #60001 TCP port.
Promi-SD is set as Mode 1, 115200-8N1-HW.
Press "Next" to move to the next step.

8) Check whether communication is properly conducted under the registered setting.
Test the communication status by pressing the "Test Start" button. When the test is successfully completed, the dialog box saying "Communication is properly operating" appears.



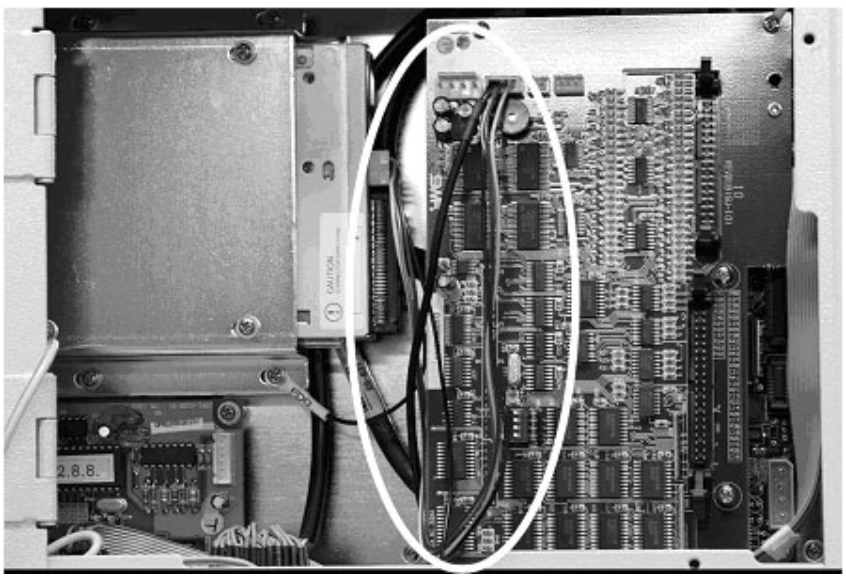
If there are more Promi-SDs to register, check "Register another Promi-SD" at the bottom of the dialog box and then press "Next". It brings the user to the 6th step of Search Promi-SD. Connect the new Promi-SD to the serial port for registration, and repeat the same process again from #6. Press "Next" to complete all settings.
(※ Make sure that the duplicated port number is not acceptable.)

3.2 Wireless module installation



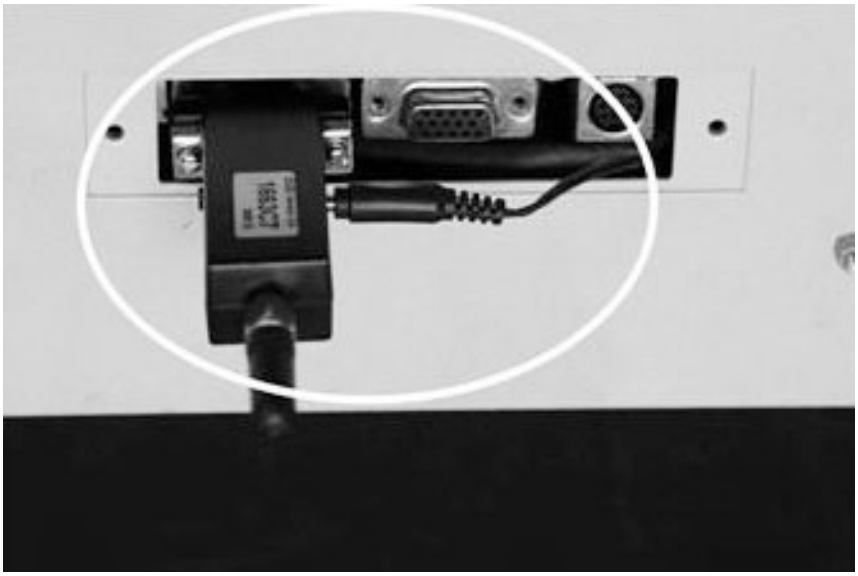
<Fig. 1>

1) Open the back side cover of OP Box.
2) Disconnect "IO to FDD Power Cable" [Refer to Fig. 1]



<Fig. 2>

3) Connect Power cable including SENS Package. [Refer to Fig. 2]



<Fig. 3>

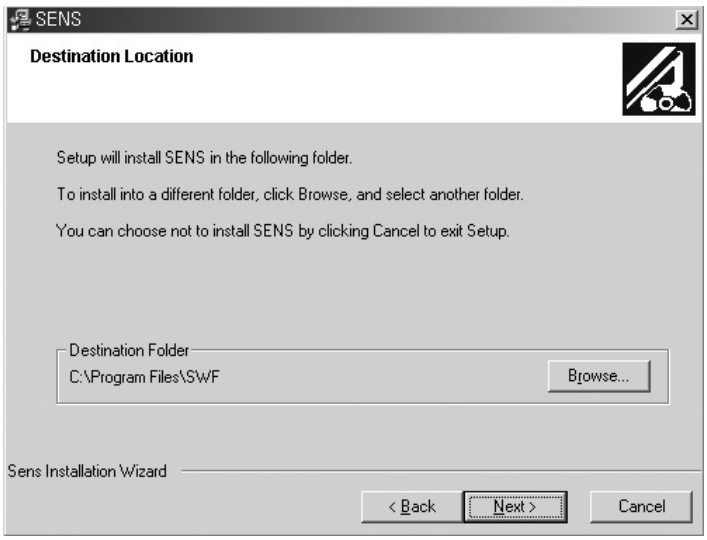
4) Connect the module at the port of OP Box' s bottom side after open the port cover. [Refer to Fig. 3] At that time, you must fix the screws of module.
5) Connect power cable' s DC jack at the module.
6) Verify that the power switch of module is located in "ON".

4. Installation and functional description of SENS

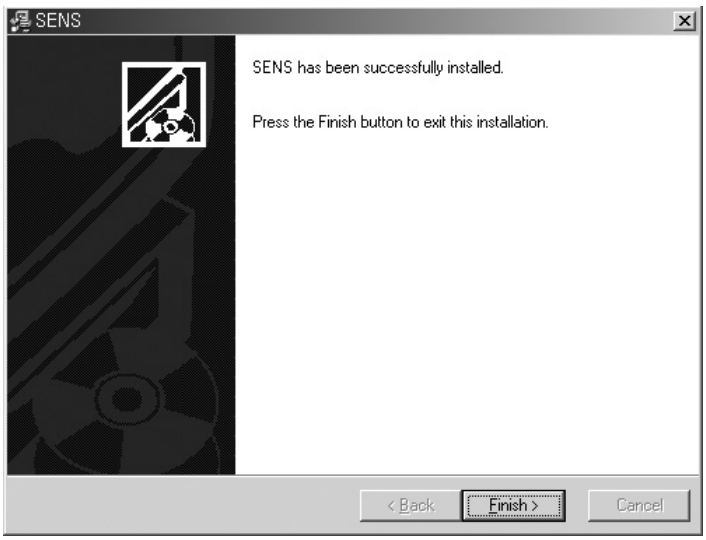
4.1 Installaton of SENS

1) Run Setup.exe from the enclosed CD.

2) In the below figure, you can select the folder in which SENS will be installed.
The default folder is C:\Program Files\SWF.
To install into a different folder, click Browse, and select another folder.



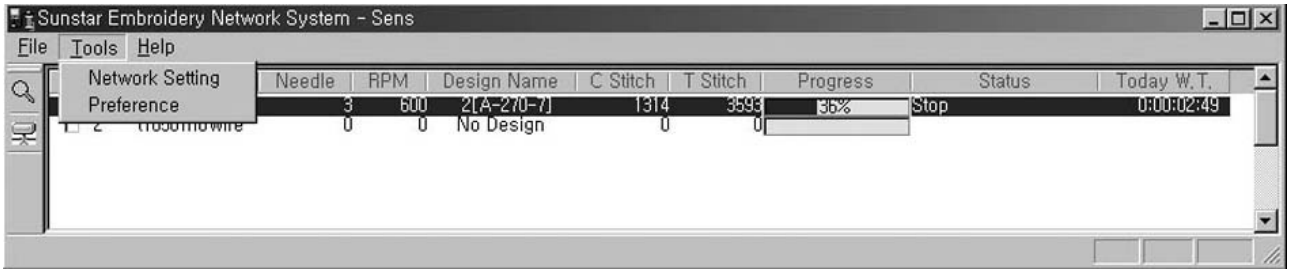
<Dialog box for folder selection>



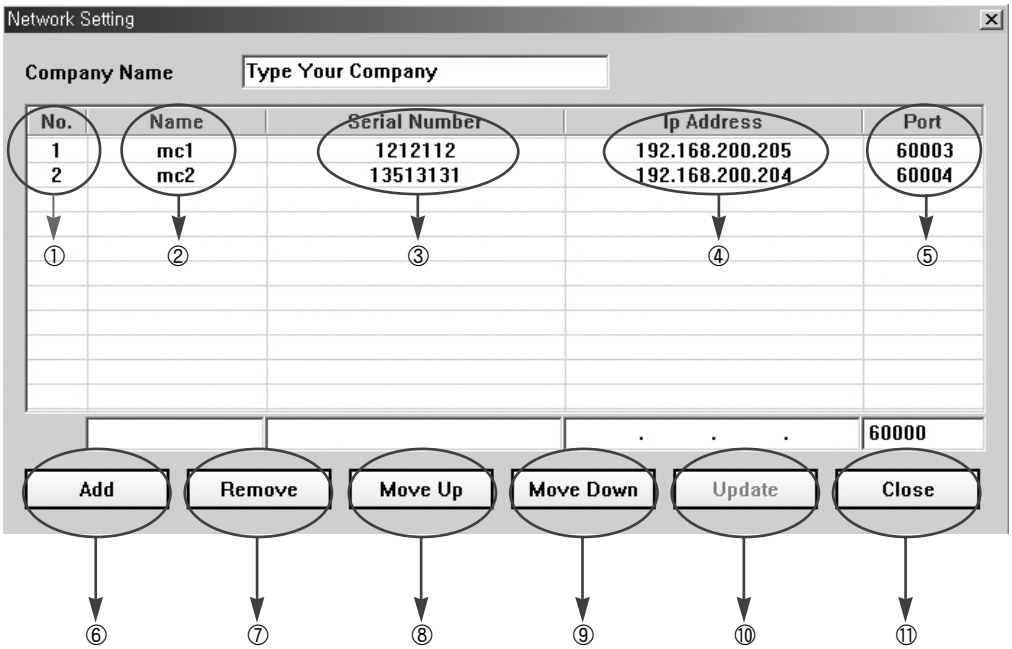
3) After installation, you may back up the old version in embroidery machine, replace the version for SENS.
(Refer to the embroidery machine user manual.)

4.2 Registration of embroidery machines.

1) Setup menu of SENS



(1) **Network Setting** : This is the menu for registering an embroidery machine to the SENS program.



① **No.** : Machine number

② **Name** : Management name of each machine

③ **Serial Name** : Serial number of each machine

④ **IP Address** : IP Address of a Promi-MSP

⑤ **Port** : Port number allocated to a Promi-SD (The port number should be between 60000 and 65000)
The port number shall be same to the port number set in Promi-SD. The port number of Promi-SD should be different from each other.

⑥ **Add** : Register a new embroidery machine.

⑦ **Remove** : Delete a registered embroidery machine from the list.

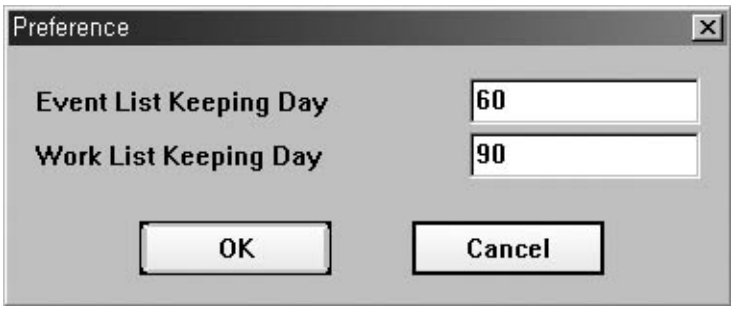
⑧ **Move Up** : Move the registration number of the selected embroidery machine upward.

⑨ **Move Down** : Move the registration number of the selected embroidery machine downward.

⑩ **Update** : Change the Setting value of the registered embroidery machine.

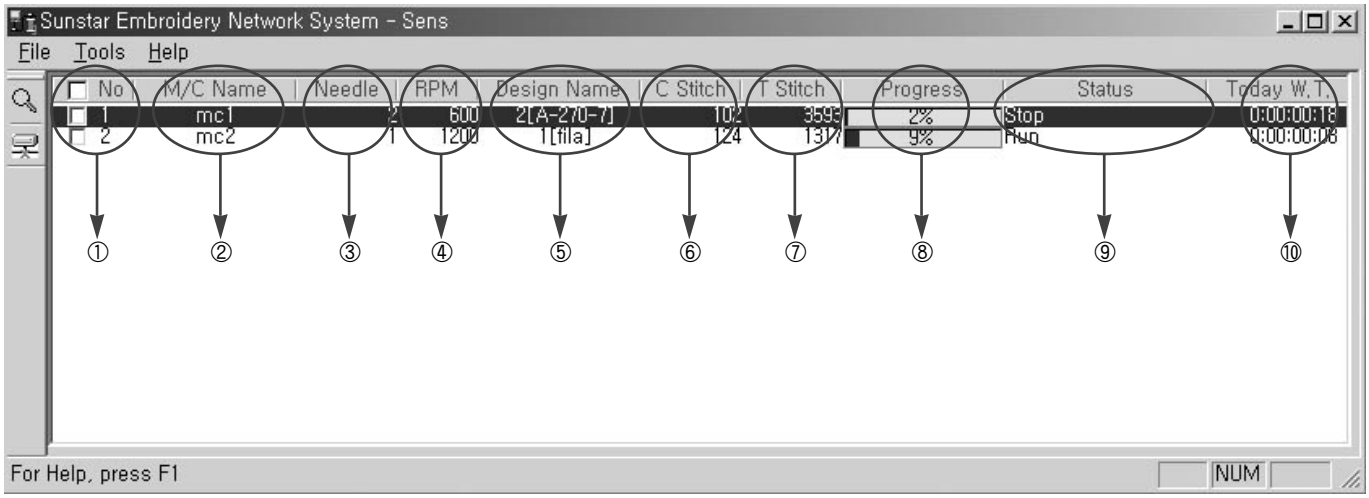
⑪ **Close** : Close the registration window.

(2) **Preference** : Set the retention period of work history.



4.3 Functional description of SENS

1) Basic Machine Information Summary – It shows the basic information of each embroidery machine.



① **No.** : Number of each machine

② **M/C Name** : Management name of each machine

③ **Needle** : Number of current needle bar at each machine

④ **RPM** : RPM of each machine

⑤ **Design Name** : Design name of each machine

⑥ **C Stitch** : Number of current stitches

⑦ **T Stitch** : Total number of stitches of a design

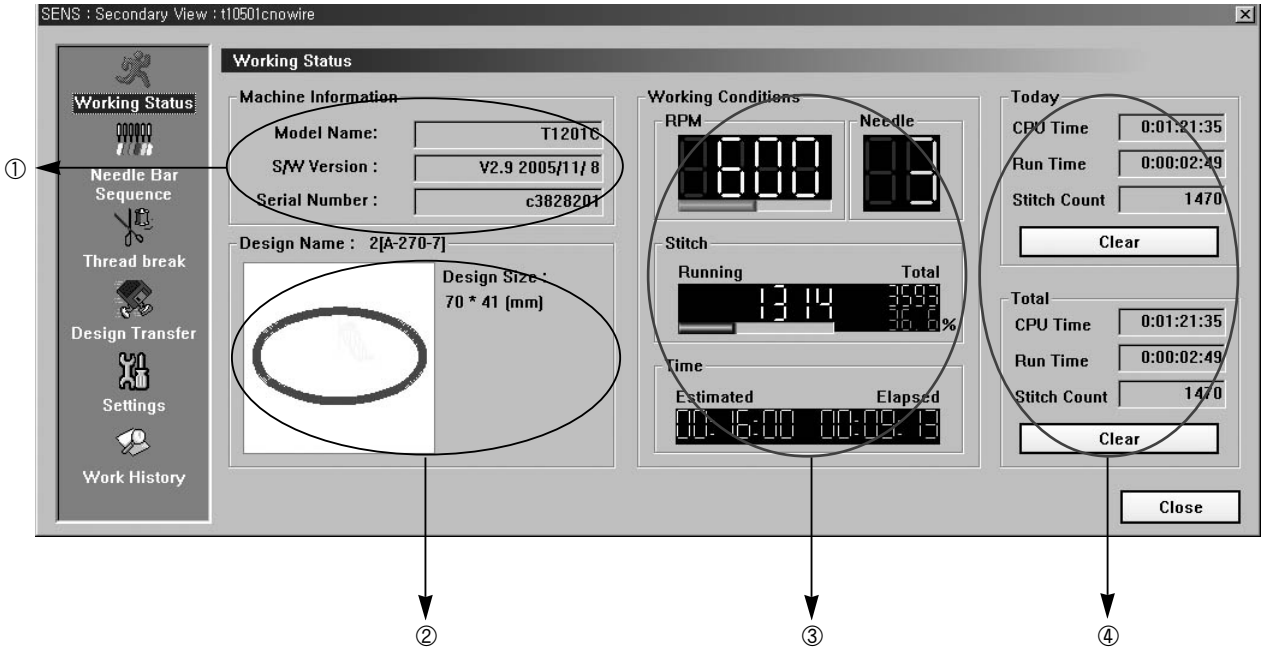
⑧ **Progress** : Current work progress at each machine

⑨ **Status** : Status of each machine

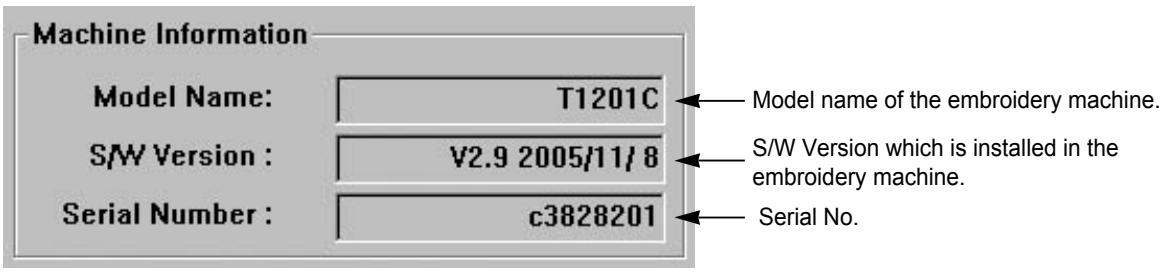
⑩ **Today W.T.** : Total work hours of each machine so far

2) Detailed Info Screen

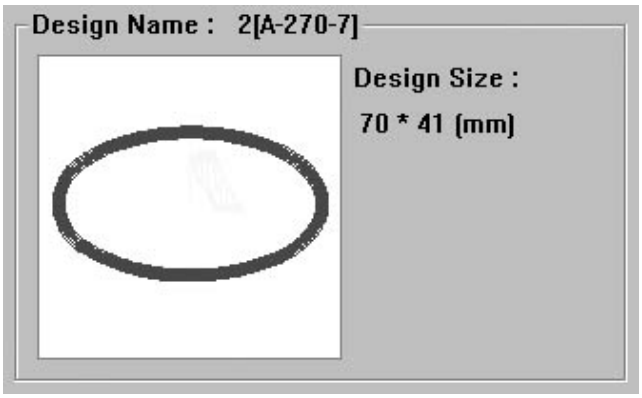
(1) Working Status – It displays the current work status.



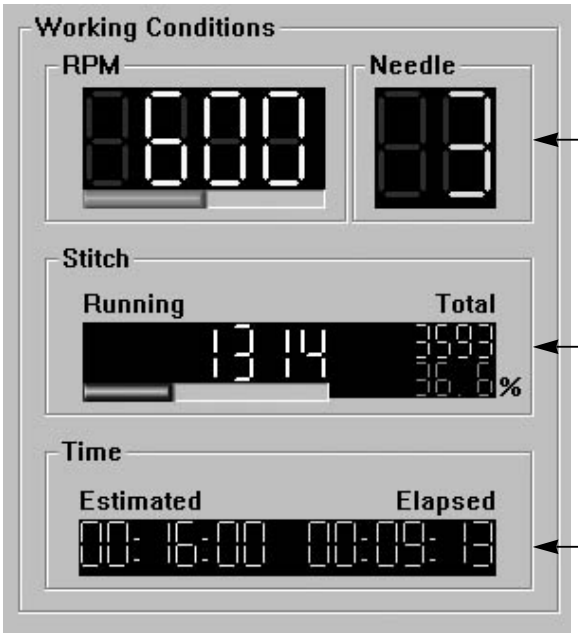
① Machine Information



② Design View: It displays the progress of the current embroidery work.



③ Working Condition

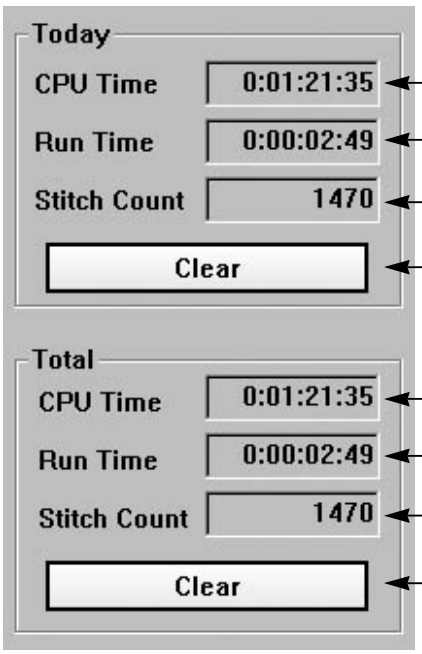


Current embroidery RPM and the position of needle bar

Total number of stitches and work progress rate

Estimated and elapsed time

④ Working Time



Total machine operation time today

Today's actual run time

Total number of stitches today

Reset the today's work hours

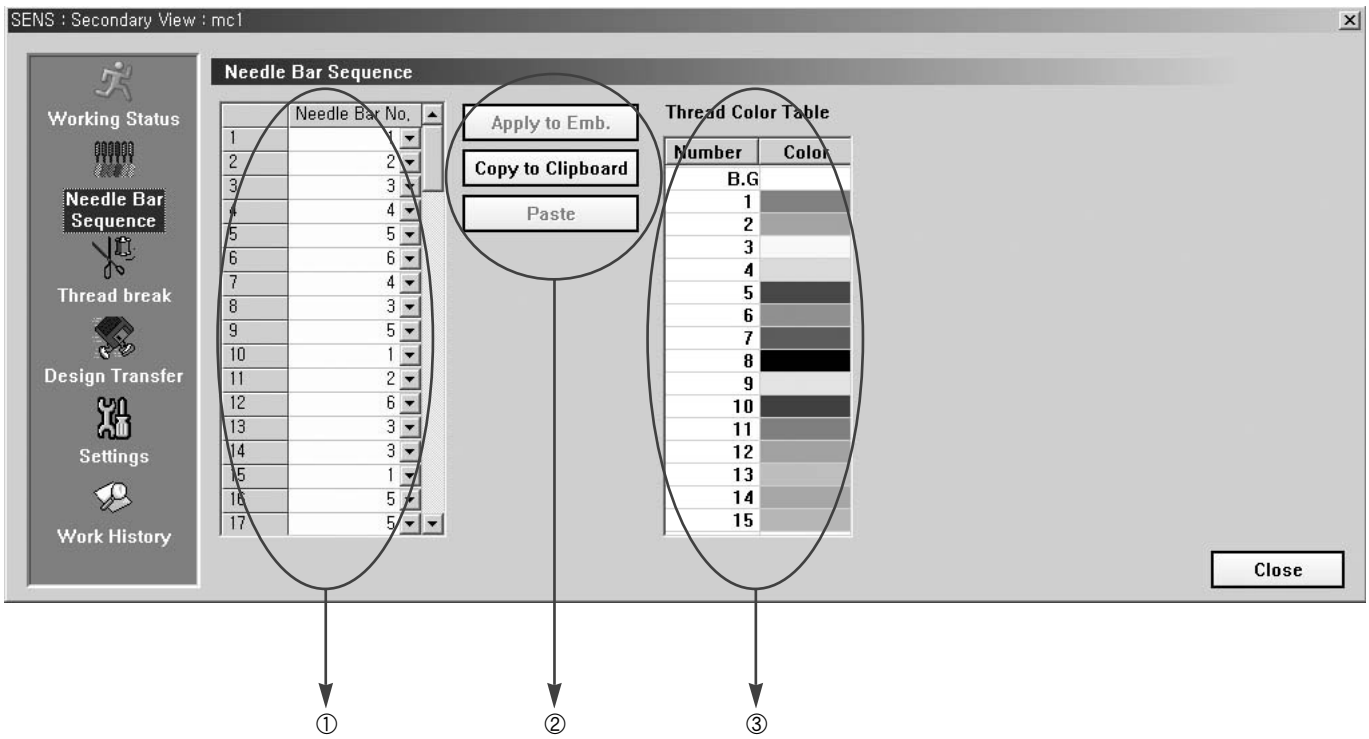
Machine operation hours so far

Actual run time so far

Total number of stitches so far

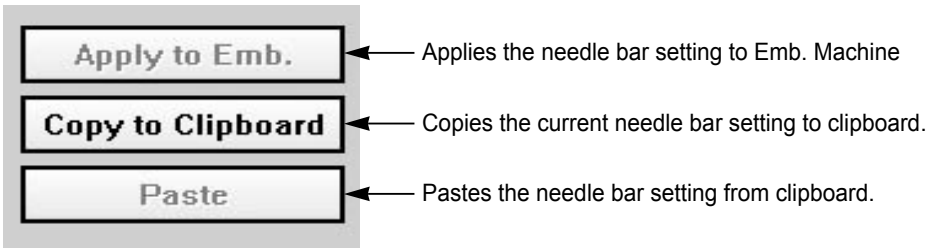
Reset the work hours

(2) Needle Bar Sequence



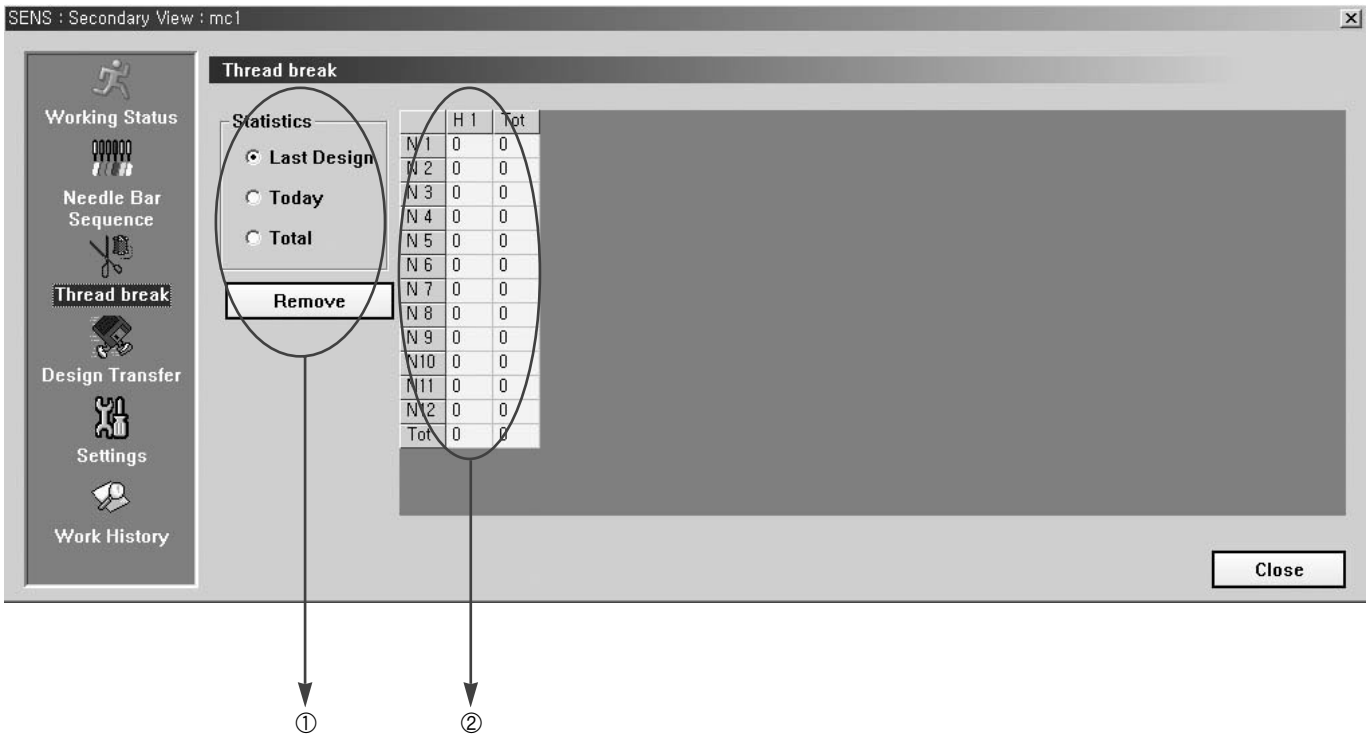
① **Needle Bar No.** : It sets needle bar number

② **Setup Buttons**

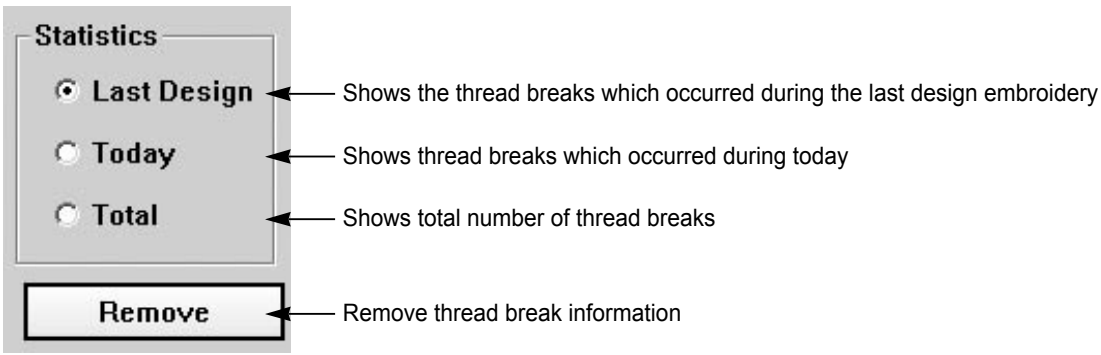


③ **Thread Color Table** : Thread color table.

(3) Thread Break

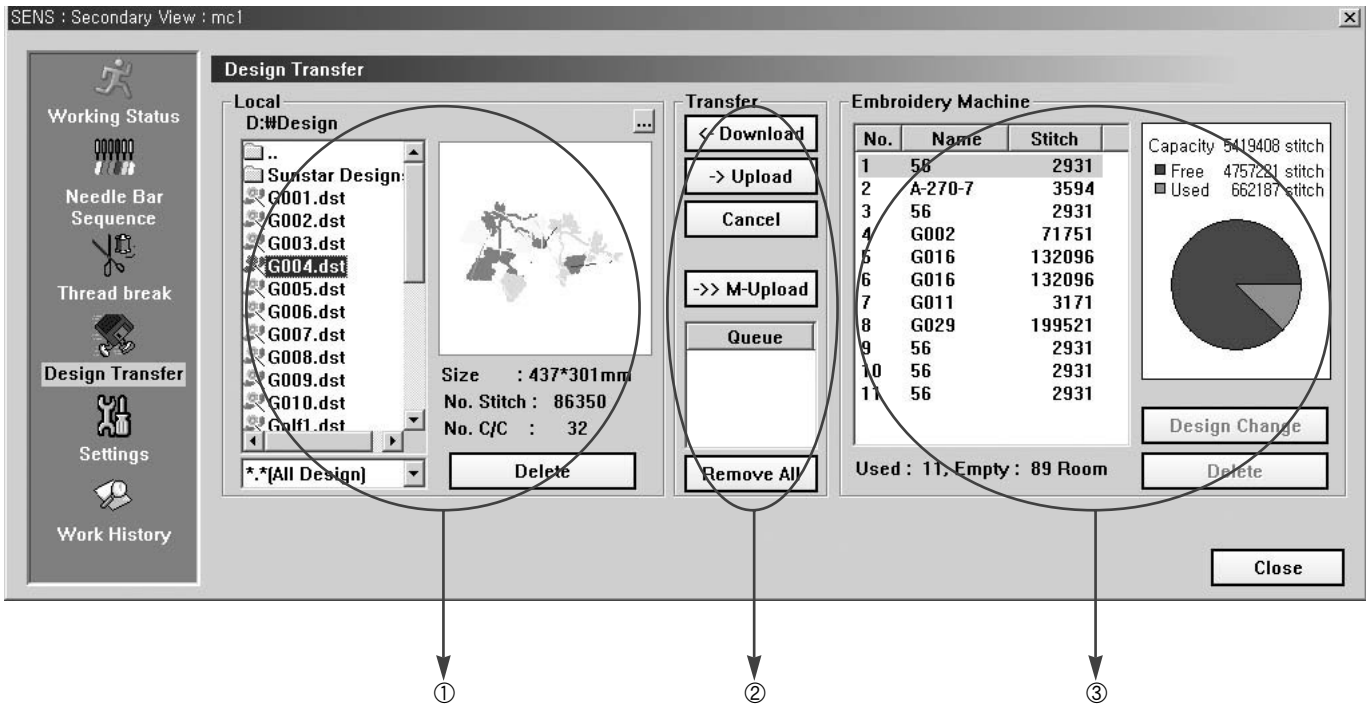


① **Statistics**

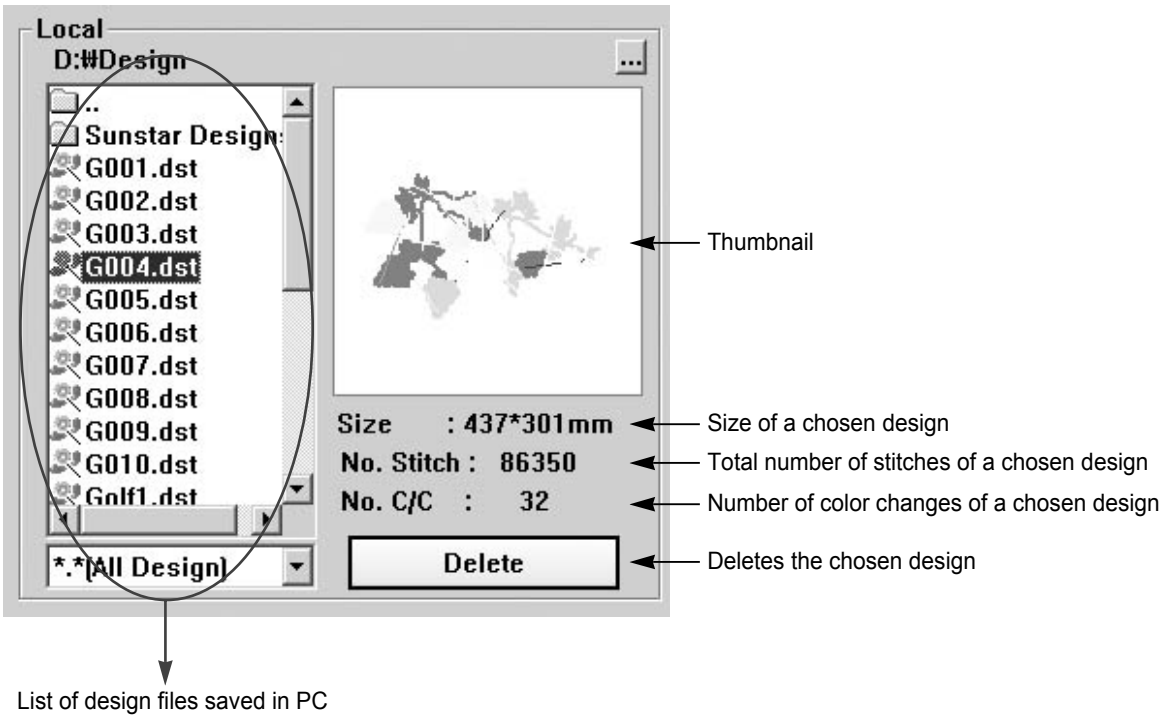


② **Thread Breaks info window** : It shows the thread breaks information by head and needle bar, respectively.

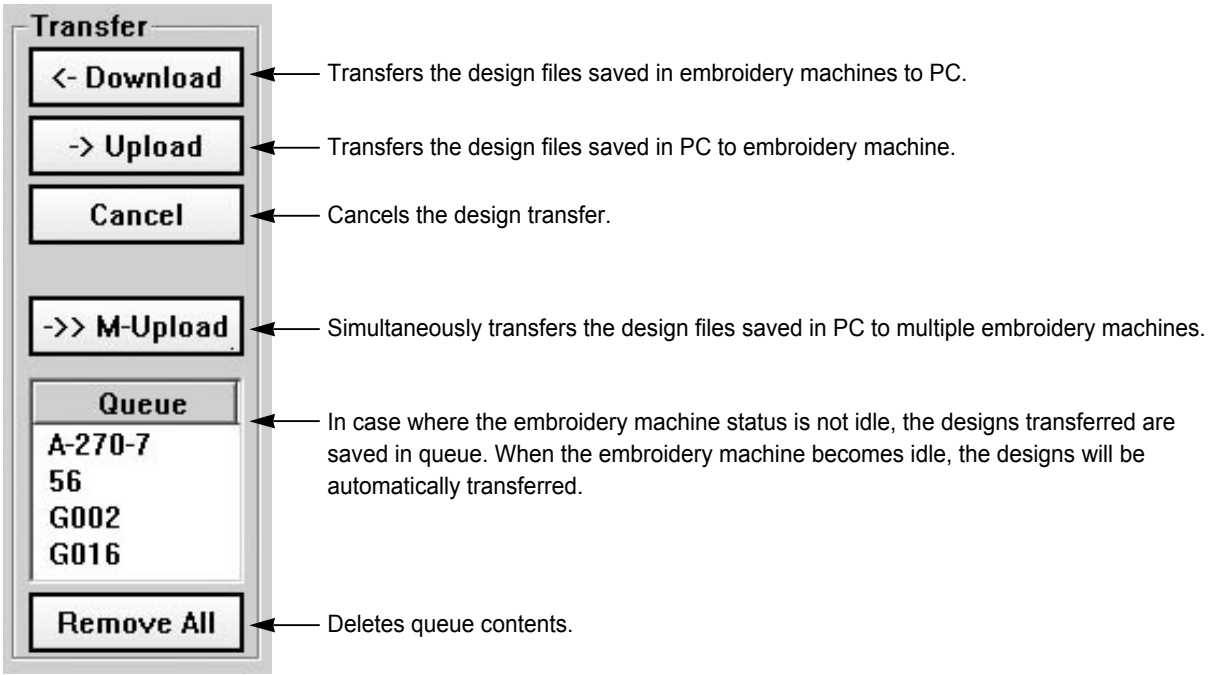
(4) Design Transfer



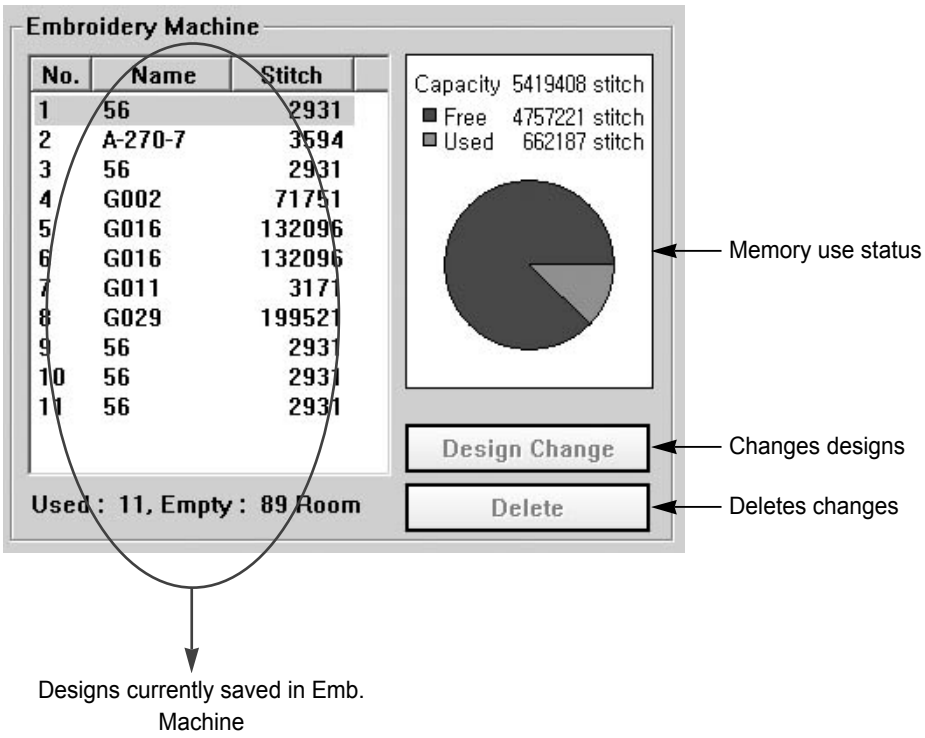
① **Local** : It shows the design files saved in PC



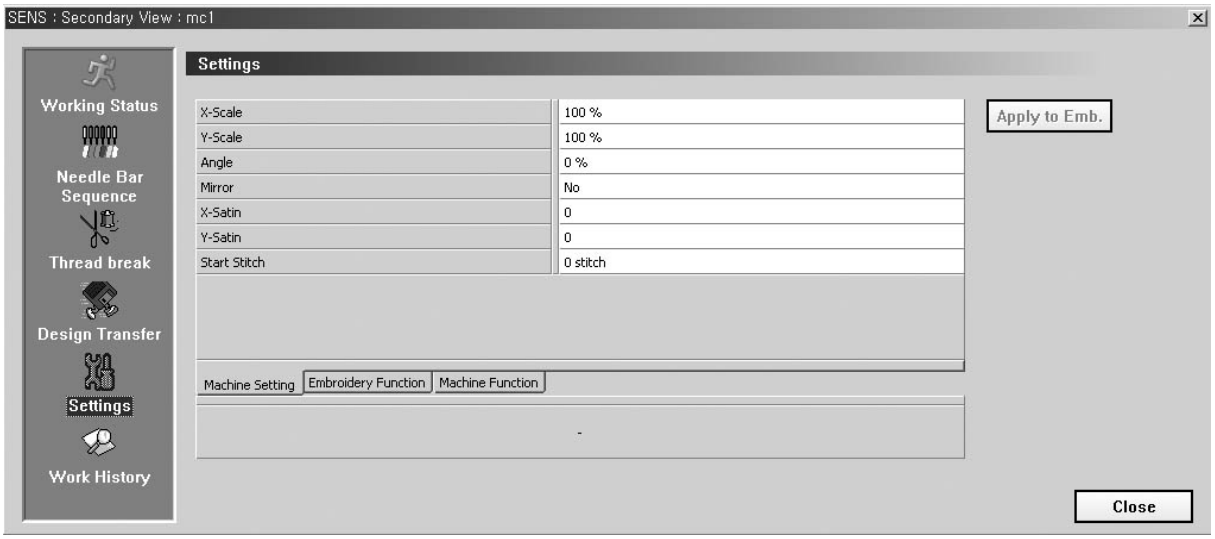
② Transfer

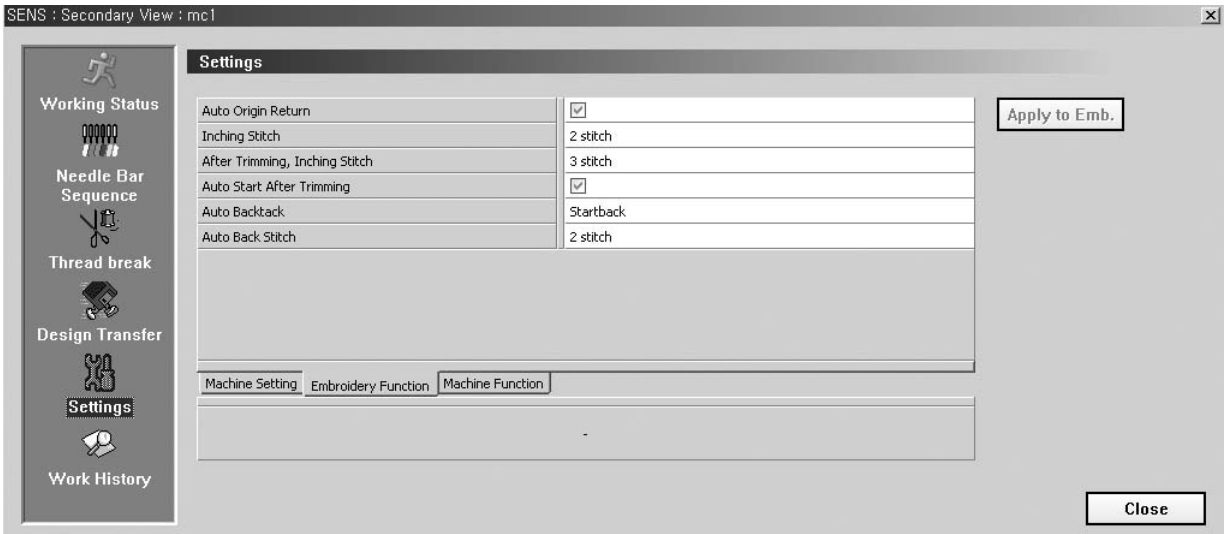


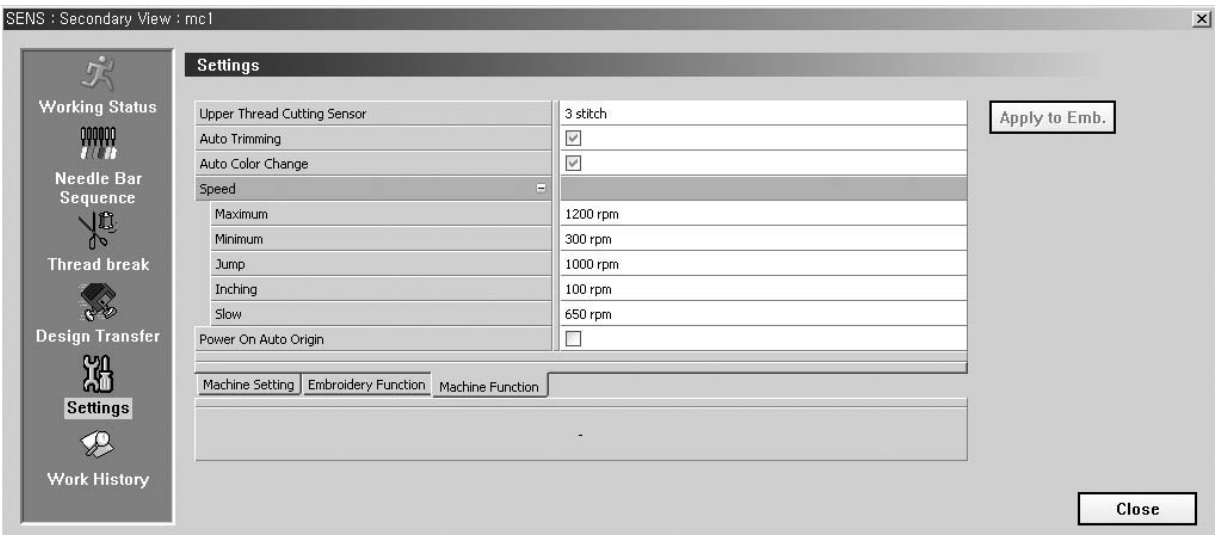
③ Embroidery Machine



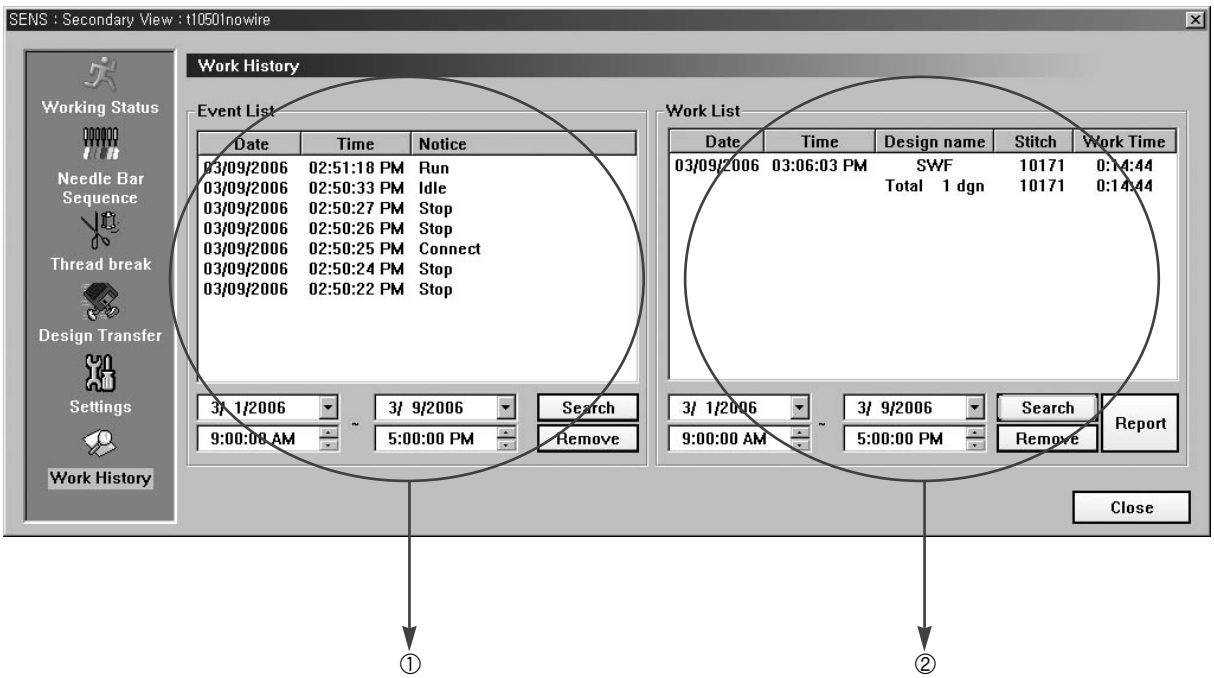
(5) **Settings** : It changes the set values of embroidery machine (Refer to the embroidery machine manual)
After the set values are changed, "Apply to Emb." shall be pressed to apply the changed value to the embroidery machine.



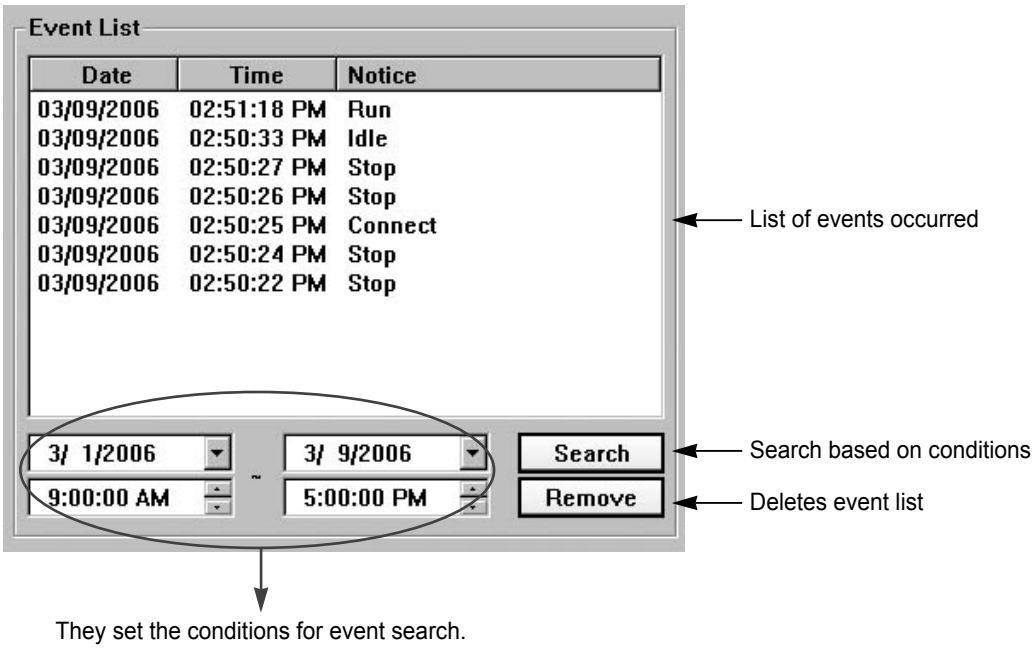




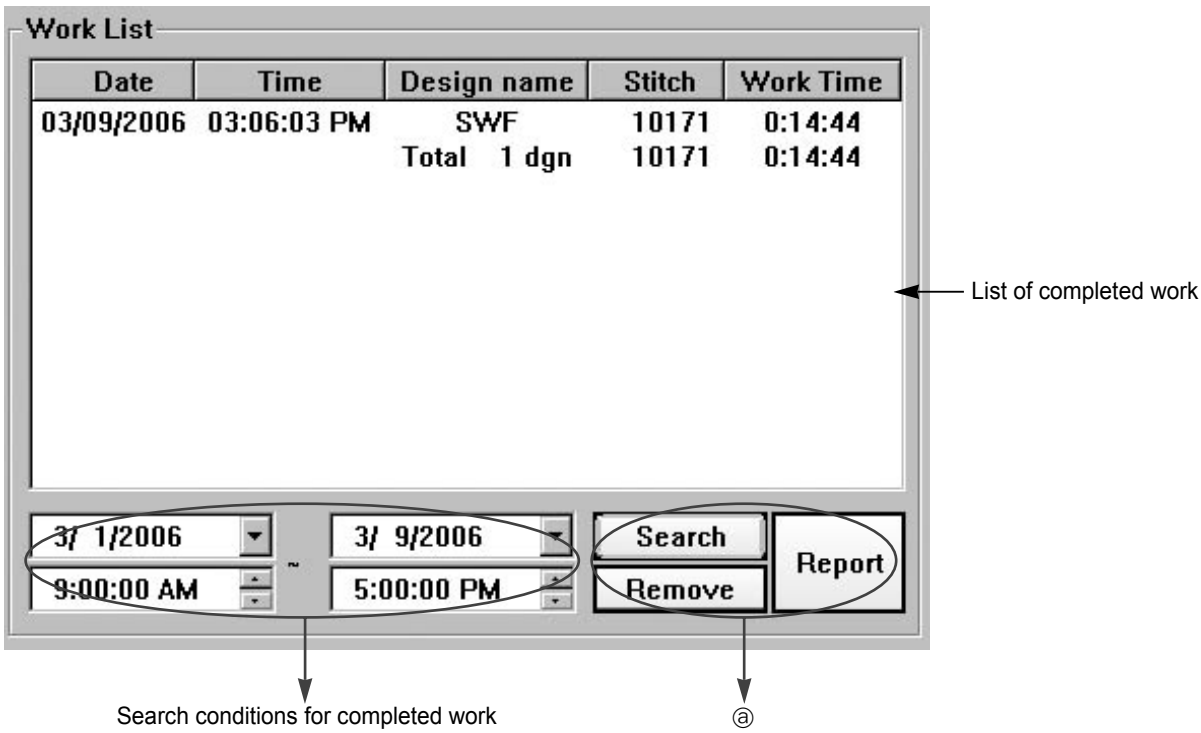
(6) Work History



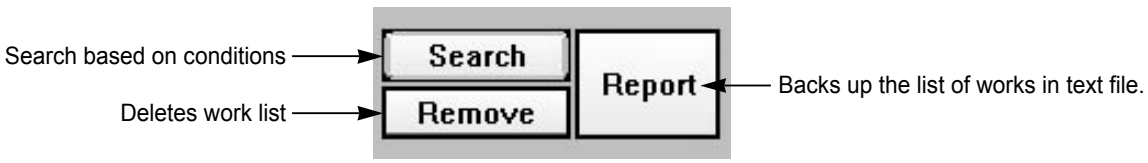
① **Event List** : It searches and inquires events occurred.

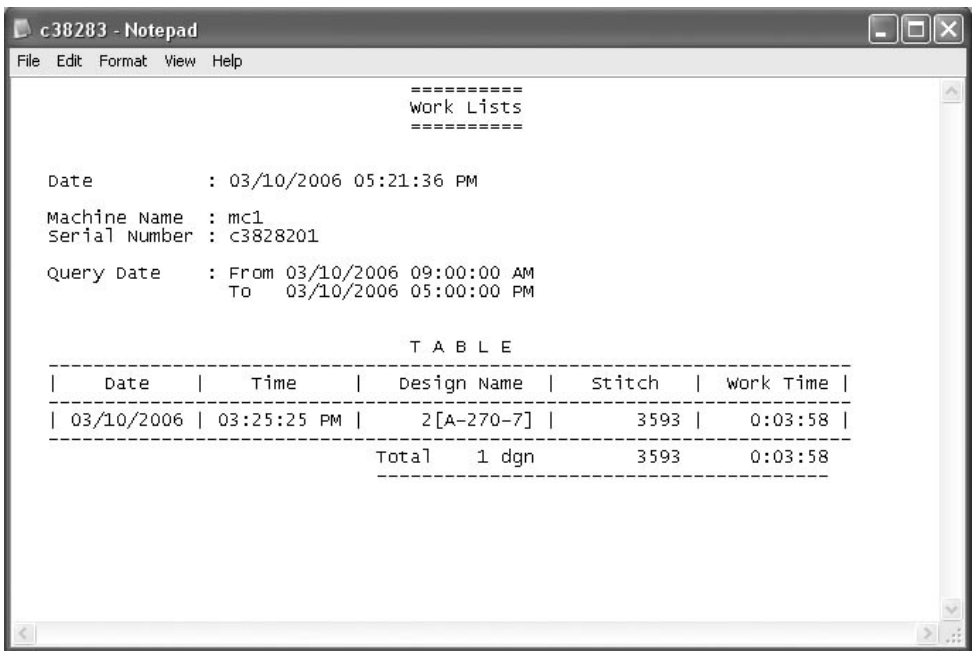


② **Work List** : It searches and inquires the completed embroidery works.



ⓐ Work Search Button



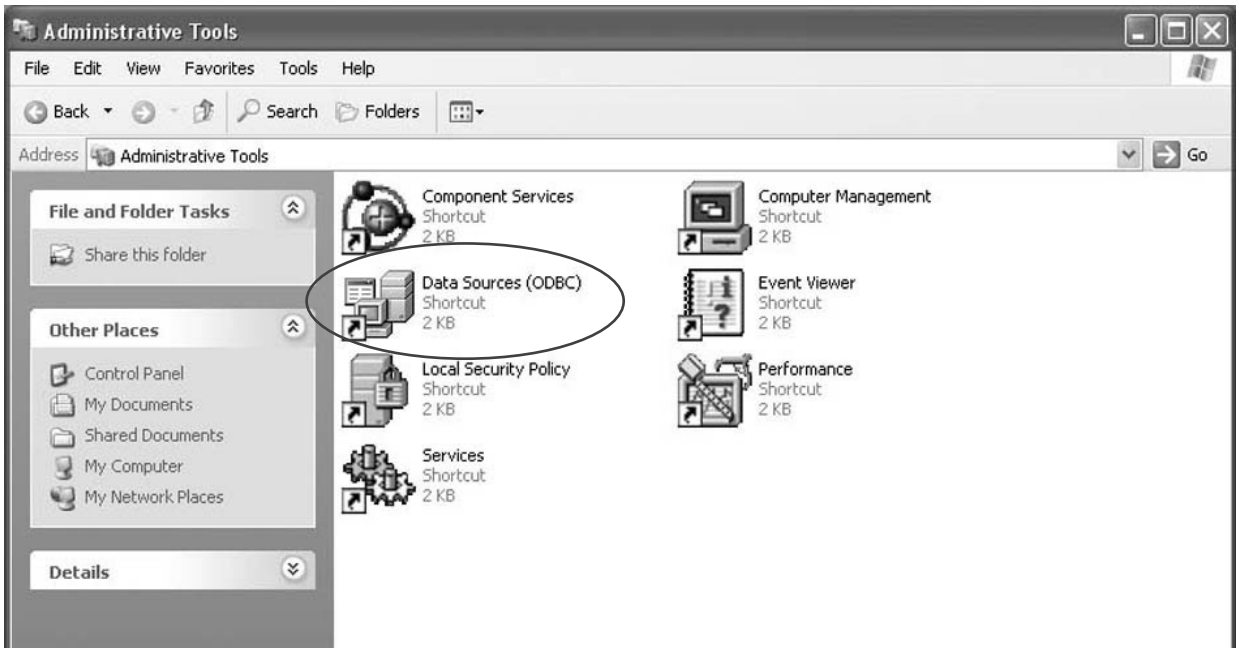


<Text-form Report>

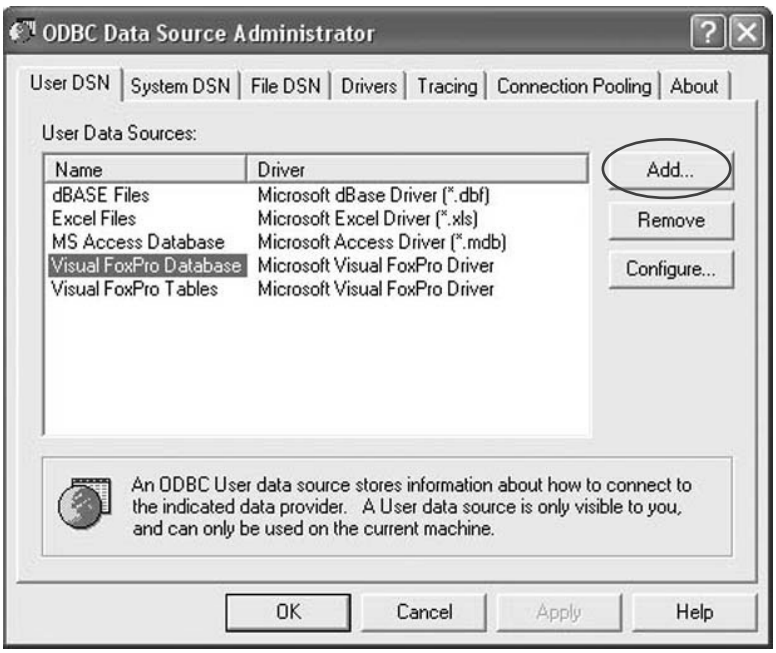
Appendix A. How to set-up database

After installation of SENS with installation wizard if SENS could not run normally, you may set up database(ODBC) by manual.

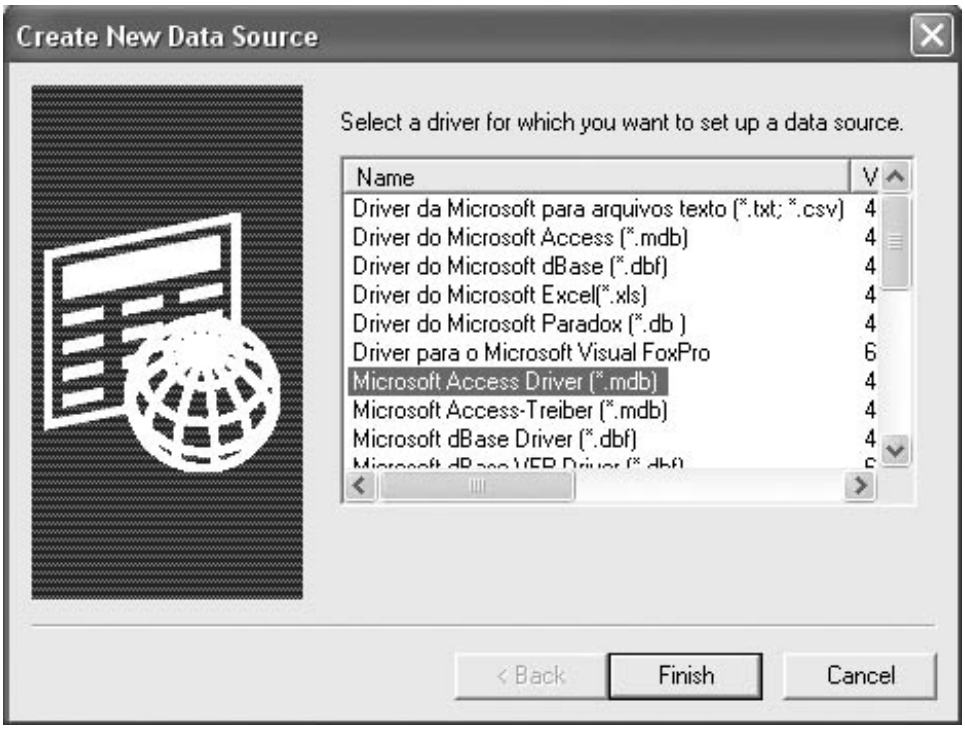
(1) On the Windows' control panel, go to Administrative Tools and then Data Sources(ODBC).



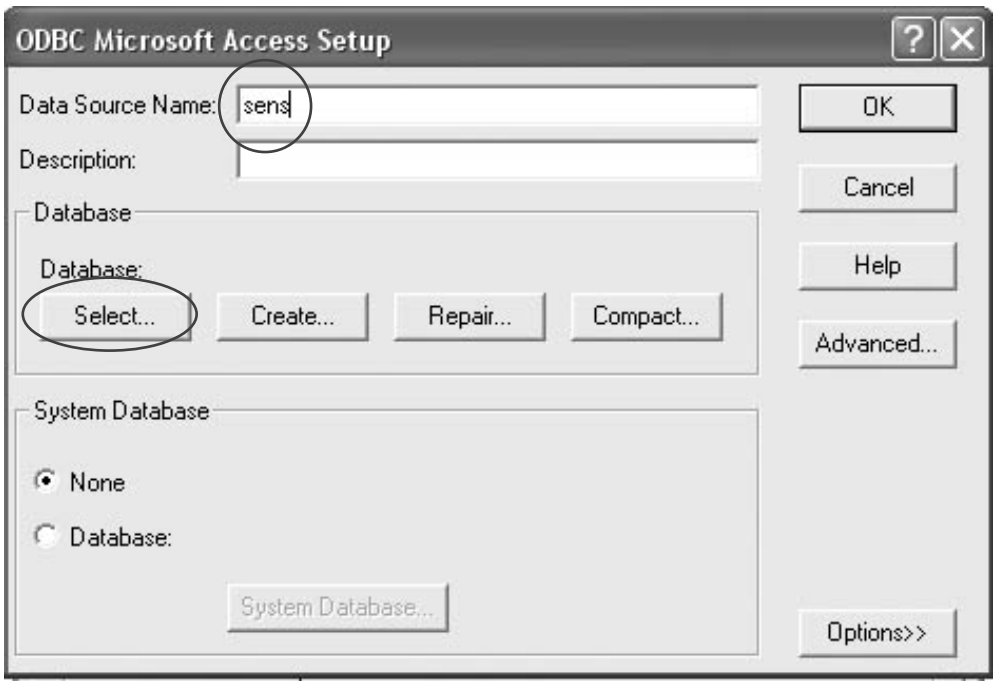
(2) If you can not find ***SENS*** in the list Box of **user data sources**, press **"Add"** and go to step (3) Otherwise please contact system administrator.



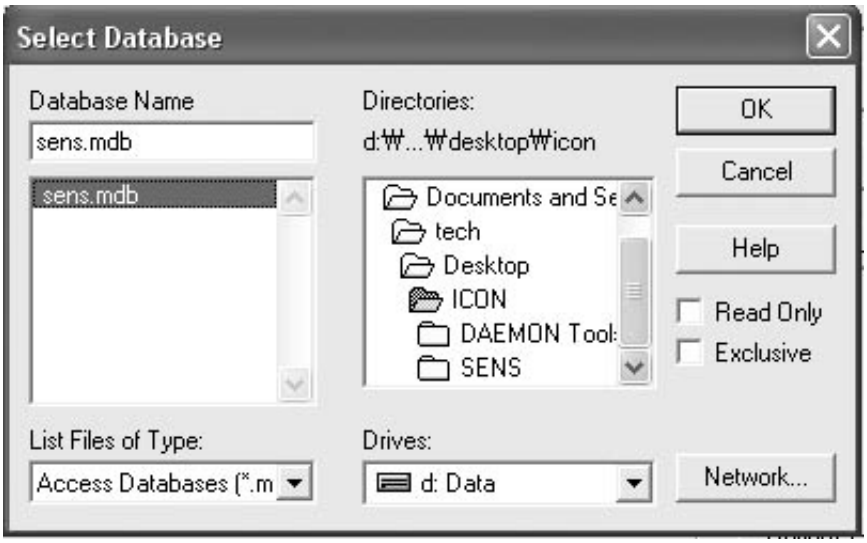
(3) Select “Microsoft Access Driver(*.mdb)”.



(4) Enter SENS in the Data Source Name field, and press "Select".



(5) Find the sens.mdb file and press "OK".



(6) When the OK button is pressed, the database setup process will be completed.