

First steps with your new INSEVIS-PLC

Congratulations to your INSEVIS- PLC !

Now you have got a product, what offers you more than the common S7- functions. This additional benefits are made accessible by the cost free INSEVIS-S7- library and the manuals offered at www.insevis.de. This information is provided to make you able to do the first connection with WinSPS-S7 V5 immediatly to see your PLC online.

Safety information

This information contains hints for the first communication with the INSEVIS-PLC and does not substitute a manual. Inform you before you go on programming and using this hardware about all safety instructions, about operation according to regulations, qualified personnel and maintenance.



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Step 1: Set up IP-address in WinSPS-S7 V5

The connection to WinSPS-S7 V5 is done by Ethernet TCP/IP. Thereby the PLC contains an own IP-address.

Step 1.1: Set up a connection PLC – WinSPS-S7 V5



INSEVIS- PLCs will be delivered with default **IP-address 192.168.80.50**.
Change this IP-address of the PLC, **before** you set up communication.

Essential equipment

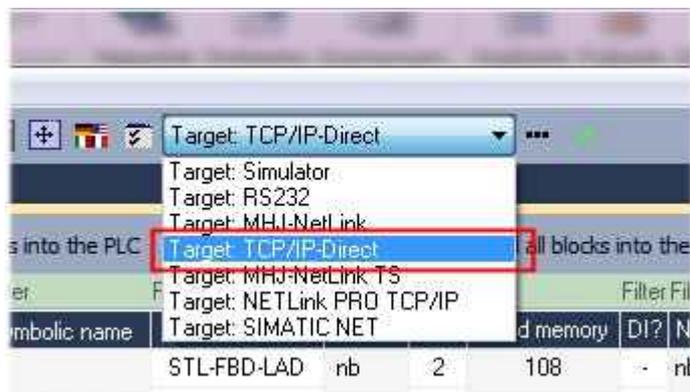
- WinSPS-S7 V5
- Power supply 24V DC (11 V ... 30V DC),
- Ethernet patch cable or crossover patch cable

Procedure

- connect PG with AG
- PLC power on
 - start WinSPS-S7 V5
 - open a solution and a project

Select the target

- Select the target "TCP/IP-direct" in the target list.
- If there are more than one network adapter in the pc, you have to select the menu item "Extras->Select network adapter". On the dialog you can select the adapter, which is connected to the plc.



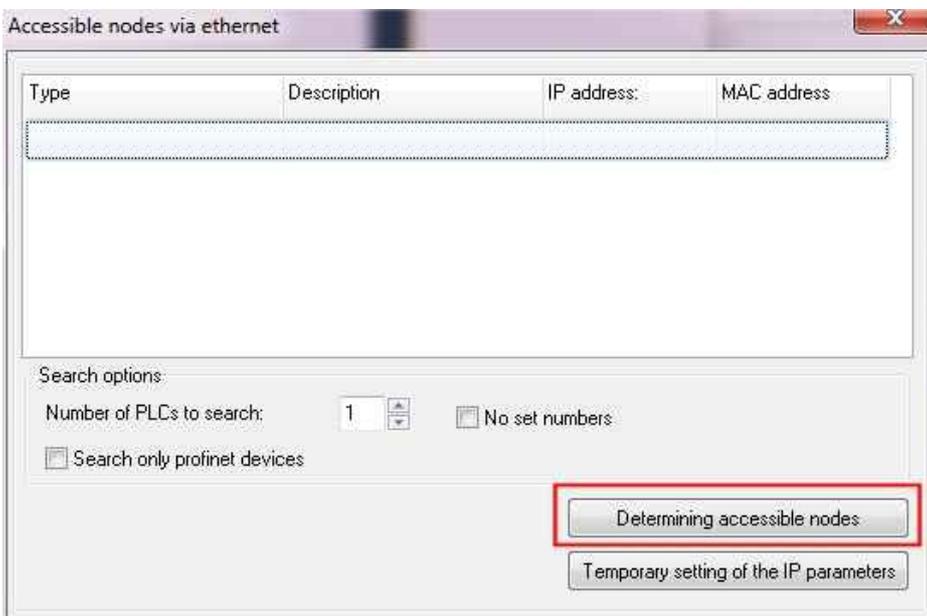
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Step 1.2: Choose the PLC in WinSPS-S7 V5

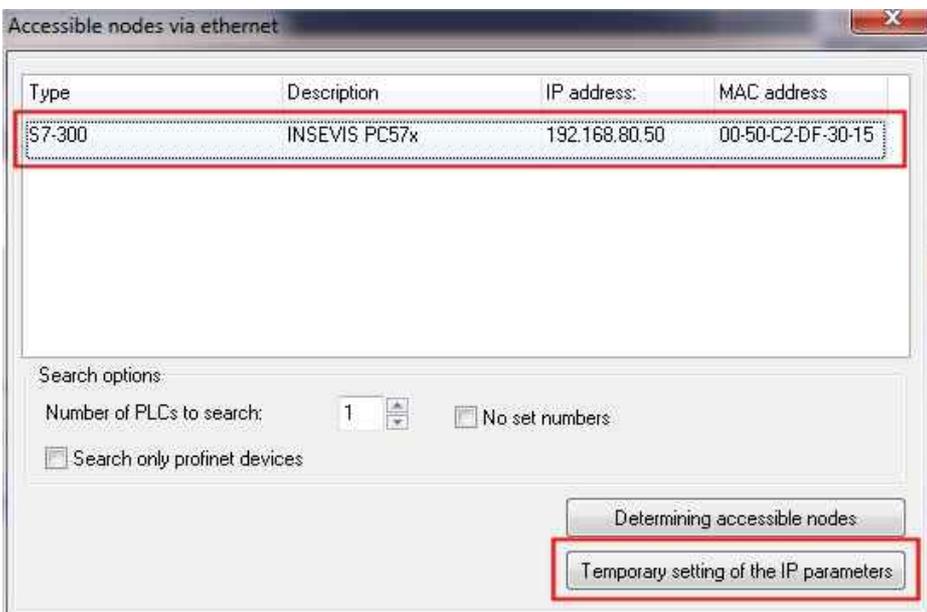
When the target "TCP/IP-Direct" is set, choose the menu item "Extras->Target properties of target 'TCP/IP-Direct'"
 → On the dialog "Ethernet data" push the button "Accessible nodes".



→ The dialog "Accessible nodes via ethernet" appears. There you can push the button "Determining accessible nodes".



→ After a few seconds e.g. the **INSEVIS PC57x** will appearing inside the list.
 Please mark this item and push the button "Temporary setting of the IP parameters".



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Step 1.3: Change the IP-address

Change IP-address

→ Please enter the IP data of the PLC on the dialog "IP parameter". After that push the button "Write parameters".

IP parameter

IP address: 192 168 1 199

Net mask: 255 255 255 0

Gateway: 0 0 0 0

Write parameters Cancel

After that, the IP data will be written into the PLC. Then a new search will be triggered. In the example, the PLC with the new IP data will be found.

Accessible nodes via ethernet

Type	Description	IP address:	MAC address
S7-300	INSEVIS PC57x	192.168.1.199	00-50-C2-DF-30-15

The button "Confirm" closes the dialog and the IP data from the selected PLC is preset.

Ethernet properties

IP-Address: 192 168 1 199 Accessible nodes

Advanced Settings

Network interface PC:
Realtek RTL8168D/8111D-Familie-PCI-E-Gigabit-Ethernet-NIC (NDIS 6.20)

192.168.1.107

OK Cancel Help

This dialog can also be closed with the button "OK".

Now you have access to the PLC via Ethernet. You can execute protocols like module state, monitoring etc..

Hints:

On the first deliveries to new customers is running a S7 program and a visualization, where the IP address can be set up manually by using the touch panel.

If your firewall prevents online connection → Reconfigure (all) your firewall(s) to allow this connection.

IP address of your PC and of the PLC must be in a common net (in this sample: 192.168.1.xxx)

→ Check the IP address of your PC with the cmd-command "ipconfig" and verify the net with those of your PLC.

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Additional info 1: Import the INSEVIS- OB, SFB and SFC into WinSPS-S7 V5

In the manuals (chapter „System functions“) all OBs, SFBs and SFCs are listed, what are compatible to STEP®7 from Siemens and are integrated in the INSEVIS- firmware as well as all additional blocks of INSEVIS. Every INSEVIS- block is described exactly in the regarding chapters of INSEVIS manuals.



All additional INSEVIS- blocks are available as **S7-Library** in the internet at www.insevis.de/de/service for free download. It will be offered always the newest library with the most functions, what needs the regarding firmware in the PLC. (e.g. Insevis_S7-library_from_2_0_19.zip - works from firmware 2.0.19 and higher). Use the following steps to install the INSEVIS system blocks.

Installation of the INSEVIS-S7-library in WinSPS-S7 V5 (V5.030 or newer):

1. Start WinSPS-S7 V5 and open a solution and a project.
2. Select the menu item “Extras->Other->Enable program functions”.
3. On the dialog which appears, enter the key-word “INSEVIS” and confirm.
4. Please following the instructions on the screen.
5. After that, close and restart WinSPS-S7 V5.
6. Now you can use the SFCs and SFBs in your PLC program.

Important note: If you install a service pack of WinSPS-S7 you must do this steps again.

Additional info 2: Use of the configuration software „ConfigStage“

With this tool you configure the INSEVIS-CPU, the communication settings, the addresses and value areas of the onboard- and decentral INSEVIS- periphery as well as the parameterization of CAN-slaves (drives, peripheries, etc.). This configuration will be downloaded into the INSEVIS-PLC by Ethernet. Other configurations are done in the WinSPS-S7 V5, like e.g. Profibus and will be downloaded from this tool into the PLC.



Hint: The CPU configuration can be made either in WinSPS-S7 V5 or in the ConfigStage. The download of the WinSPS-S7 V5 overwrites all SDBs completely. Please do config Profibus and CPU **FIRST** and download it into the PLC. Than configure all the other configurations (Ethernet, RS232/485, Modbus, CAN and (de-)central periphery and alternatively the CPU) with the ConfigStage and download it **LATER**. This download does overwrite only the configured SDBs and keeps the Profibus configuration.

Additional info 3: Visualization with the visualization software „VisuStage“

The first S7-Panel-PLCs to new customers will be delivered with a S7-program and a visualization, what contain a selection of visualization features of “VisuStage”.

This visualization is described in the manual and is available for free download at www.insevis.de/en/service.

The S7-program contains a SFC to change IP- address by the operator. So you also can change your IP-address of the INSEVIS Panel-PLC **WITHOUT** WinSPS-S7 V5 (Menue → Set).

INSEVIS works on a permanent improvement, in the service too. So we have a request to you:

Help us to become better day by day and give a short feedback, from your first experiences with INSEVIS. Send it to info@insevis.de or call directly at: +49 (0) 9131-691-440. We are looking forward to your contact.

- Did our information for the first steps satisfied you demands?
- Did you missed something (If yes, what?)
- Would you recommend a improvement to us (If yes, what?)

Thank you very much!

You INSEVIS- Team from Erlangen/Germany