



Application Example • 08/2016

Installation and Commissioning of PH / IS 2014 SP2

SIMATIC Process Historian / SIMATIC Information Server



<https://support.industry.siemens.com/cs/ww/en/view/106264271>

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1 Task

Objective

This document describes the steps necessary during installation and setup of Process Historian (PH) and Information Server (IS).

Furthermore, how to commission PH and IS is discussed as well as how to handle possible problems.

Main contents

The following main points are described in detail:

- Installation requirements
- Installation of Process Historian and Information Server
- Commissioning the systems after installation
- A few scenarios and instructions on what can be checked and done in situations of troubleshooting

Validity

The instruction was created with:

- WinCC V7.4
- Process Historian 2014 SP2
- Information Server 2014 SP2

1.1 General notes on the installation

After restoring the operating system, it is possible to install Process Historian and Information Server using the DVD "SIMATIC Process Historian 2014 / SIMATIC Information Server 2014 SP2".

Note

It is recommended to distribute the operating system, including PH/IS software and PH Runtime data, between different hard disks. For average and large data volumes, the database shall additionally be distributed between several hard disks.

- All WinCC computers should be installed with the same administrator user name and password.

Note

Please note the PH and IS installation information (see chapter "Links & Literature").

Basics and plant configurations are available in the document "Basics and Plant Configurations of PH / IS 2014 SP2" of this entry.

1 Task

1.1 General notes on the installation

Note

Process Historian 2014 SP2 and Information Server 2014 SP2 are released in WinCC, WinCC Professional, as well as in the PC 7 environment. For the installation requirements in the PC 7 environment, only the PC 7 documentation is valid.

WinCC single-user systems, server systems, as well as WinCC Professional single-user systems and server systems are referred to as WinCC below.

2 Installation of WinCC Servers

Note

The requirements for the installation of the operating system for a WinCC server or a single-user system must be fulfilled.

NOTICE

The computer SID is a unique security identifier. The Process Historian identifies the WinCC systems by means of their SID computer. Computers with the same computer SID and export data on the PH, cannot be uniquely identified by the PH. This may cause malfunction on the PH. If PCs are cloned, the computer SID is not automatically adapted.

2.1 Installation requirements

Please check whether the installation requirements listed in the “WinCC V7.4: General Information and Installation” manual have been met.

Additionally, please note the current information listed in the WinCC readme file.

The installation notes of the “PHReady” component must also be noted. These are available on DVD in directory path

“<DVD drive>:\IS_Install_and_Release-Notes\German\InstallNotesPRHIdeDE.pdf” in chapter 4.2.3 “Installing Process Historian Ready on a WinCC station”.

2.2 Introduction

WinCC servers and WinCC single-user systems are used for long-term storage of data by means of the Process Historian. For the communication between the WinCC station and the PH, the component “PH READY” is also installed as of WinCC V7.3 SE.

There are two options for additional installation:

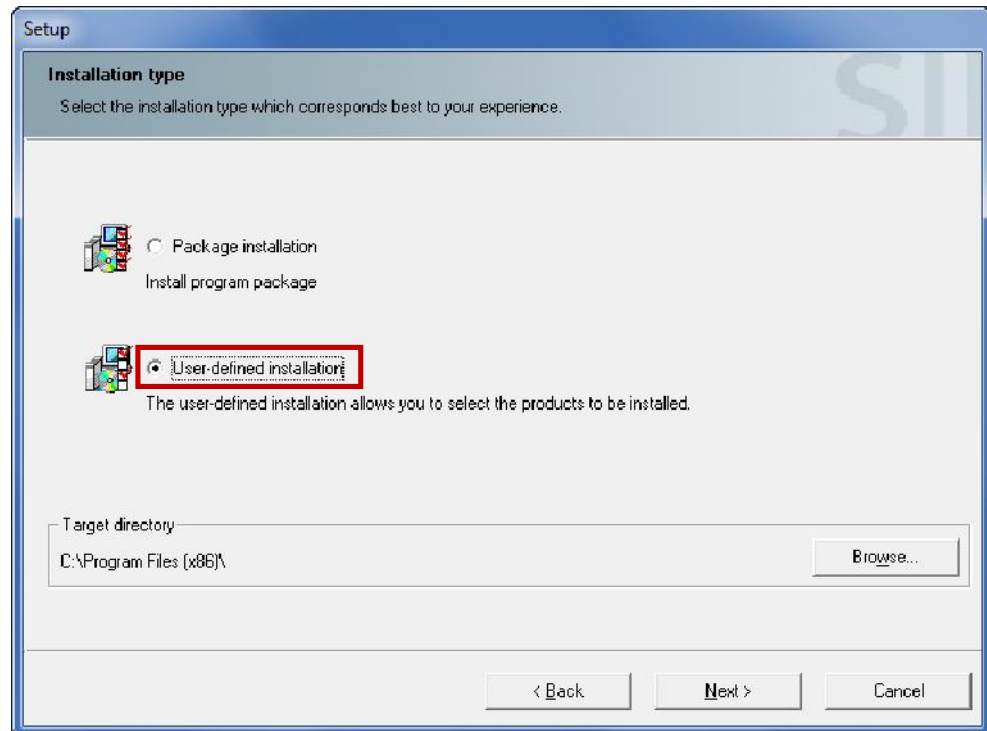
1. Installing the component “Process Historian Ready Component 2014 SP2” using the “WinCC V7.4” DVD.
2. Installing the component “Process Historian Ready Component 2014 SP2” using the “Process Historian and Information Server 2014 SP2” DVD.

After installing the PH Ready component on the WinCC system, the “CCCAPHServer Service” is installed via which the communication with the PH is handled.

2.3 Installing the “ProcessHistorian Ready” component

For manual installation of the “PHready” component, start the user-defined installation.

Figure 2-1

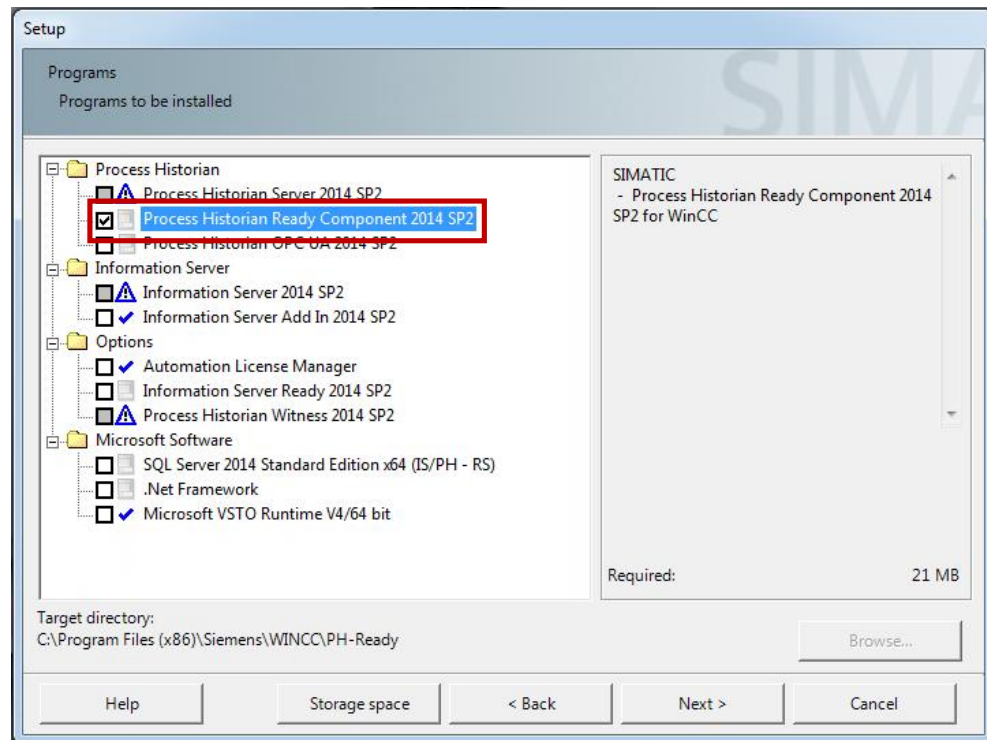


2 Installation of WinCC Servers

2.3 Installing the "ProcessHistorian Ready" component

In the "Program" dialog you choose the option "ProcessHistorian Ready Component 2014 SP2".

Figure 2-2



3 Installing the Process Historian

Note

The requirements for the installation of the PH must be fulfilled. The respective requirements can be found in the document "InstallNotesPRHIdedeDE.chm".

The Install Notes are available on the product DVD in the folder "<DVD drive>:\Install_and_Release-Notes\German".

Note

The requirements for the installation of the IS must be fulfilled. The respective requirements can be found in the document "InstallNotesInfoSystemINFSVPRHIdedeDE.chm".

The Install Notes are available on the product DVD in the folder "<DVD drive>:\Install_and_Release-Notes\German".

NOTICE

The computer SID is a unique security identifier. The Process Historian identifies the WinCC systems by means of their SID computer. Computers with the same computer SID and export data on the PH, cannot be uniquely identified by the PH. This may cause malfunction on the PH.

If PCs are cloned, the computer SID is not automatically adapted.

The PH/IS machine must also have a unique SID.

Process Historian and Information Server can be installed on the same or two separate computers. If PH and IS are installed on the same computer, both installation requirements and settings must be fulfilled.

3.1 Installation requirements for the PH

- The server used for the Process Historian can be a 64-bit Windows Server 2012 R2 as standard or Enterprise edition, as well as a 64-bit Windows Server 2008 R2 SP1 as standard or Enterprise edition.
- Process Historian requires the “Microsoft Message Queuing” services.
- Sufficient free storage space must be available on the PC for installing the Process Historian.
- DotNet Framework 4.5 will be installed during PH installation. The setup program checks the availability of DotNet Framework version 3.5. DotNet Framework 3.5 must be installed before PH and IS installation.

Note

Process Historian is a long-term archive. Depending on the alarm and tag load, as well as the time period to be saved, the hard disk space requirement may be high. It is recommended to provide for sufficiently large hard disks. Further information is available in document “106264271_Configurations_IS_PH_SP2.pdf”

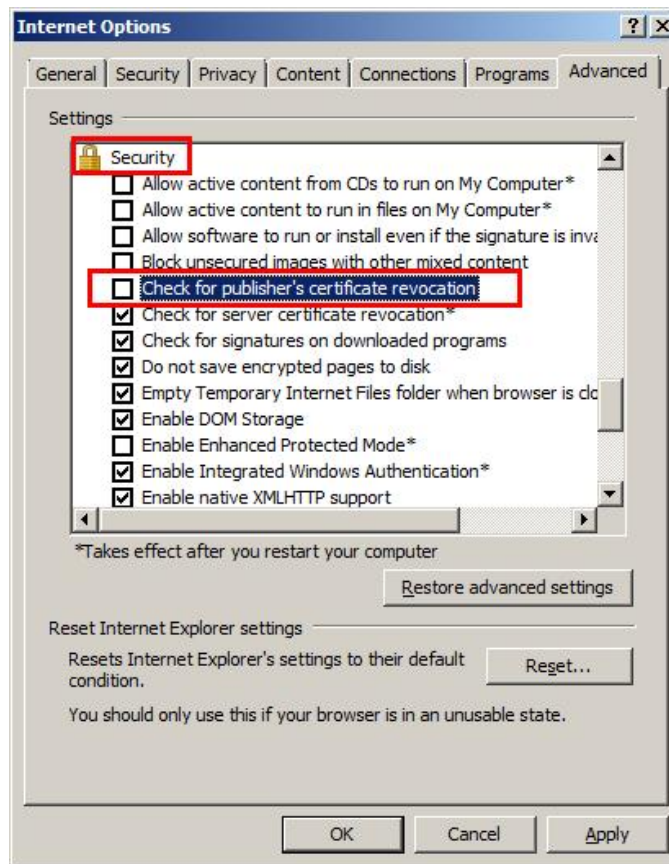
Note

In the Internet Explorer on the Process Historian you deactivate the option “Check for publisher’s certificate revocation” at “Internet Options > Advanced > Security”. If the option has been activated, there may be delays in opening the Process Historian Management Console as well as error messages.

3 Installing the Process Historian

3.1 Installation requirements for the PH

Figure 3-1



3.2 Installation of Microsoft Message Queuing

Process Historian uses the “Microsoft Message Queuing” service which is part of the operating system. However, MS Message Queuing is not included in the standard Windows installation and must be installed separately if required. The Windows installation CD is required to complete the installation.

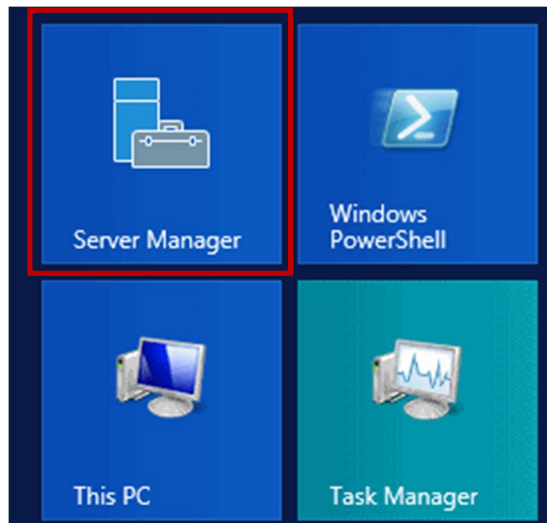
Note

In principle, Process Historian is designed for operation within a domain or workgroup. Please note that domain group policies and restrictions in the domains may prevent installation. In this case, remove the computer from the domain before installing Microsoft Message Queuing, Microsoft SQL Server 2005, and WinCC. Log on to the respective computer locally with administrator rights. Carry out the installation. Following successful installation, the WinCC computer can be registered in the domain again.

If the domain group policies and domain restrictions do not impair the installation, the computer must not be removed from the domain during installation. Note, however, that domain group policies and restrictions in the domain may also affect the operation. If these restrictions cannot be overcome, operate the WinCC computer in a work group. If necessary, contact the domain administrator.

Procedure for Windows Server 2012 R2

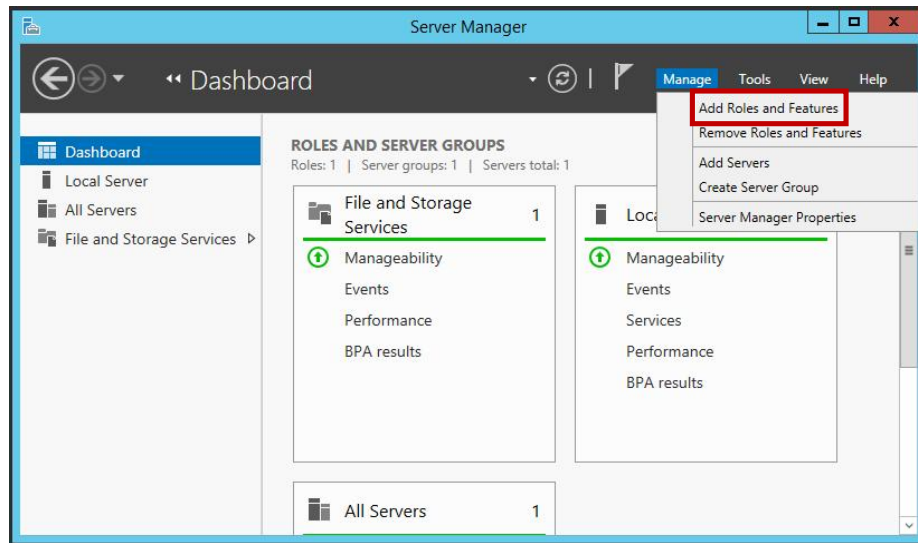
1. Start the Server Manager via “Start > Server Manager”
Figure 3-2



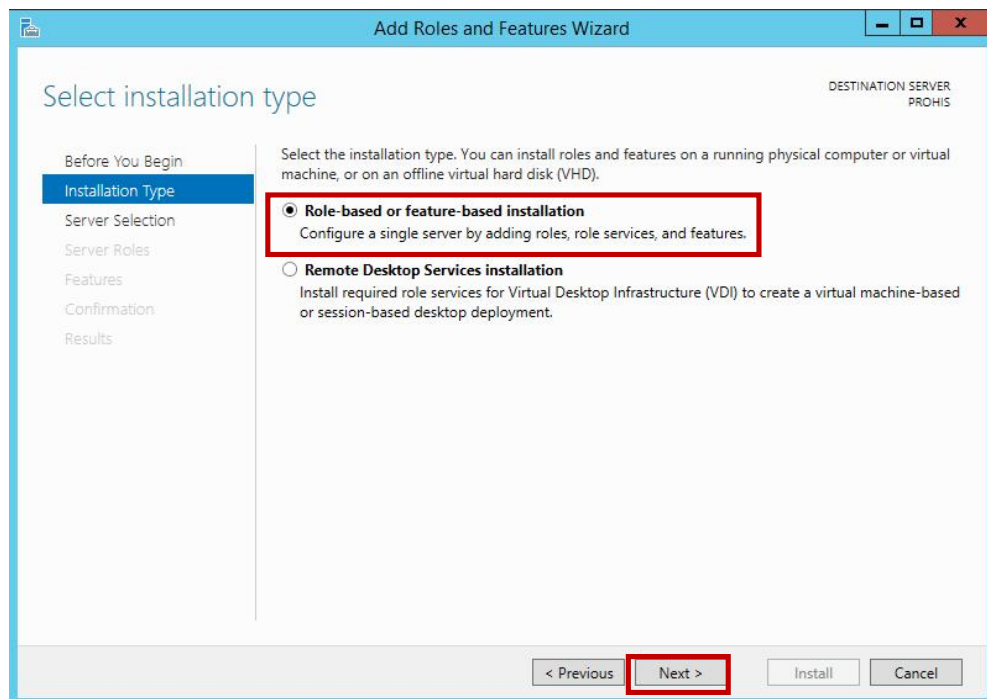
3 Installing the Process Historian

3.2 Installation of Microsoft Message Queuing

2. Click on “Manage > Add Roles and Features”
Figure 3-3



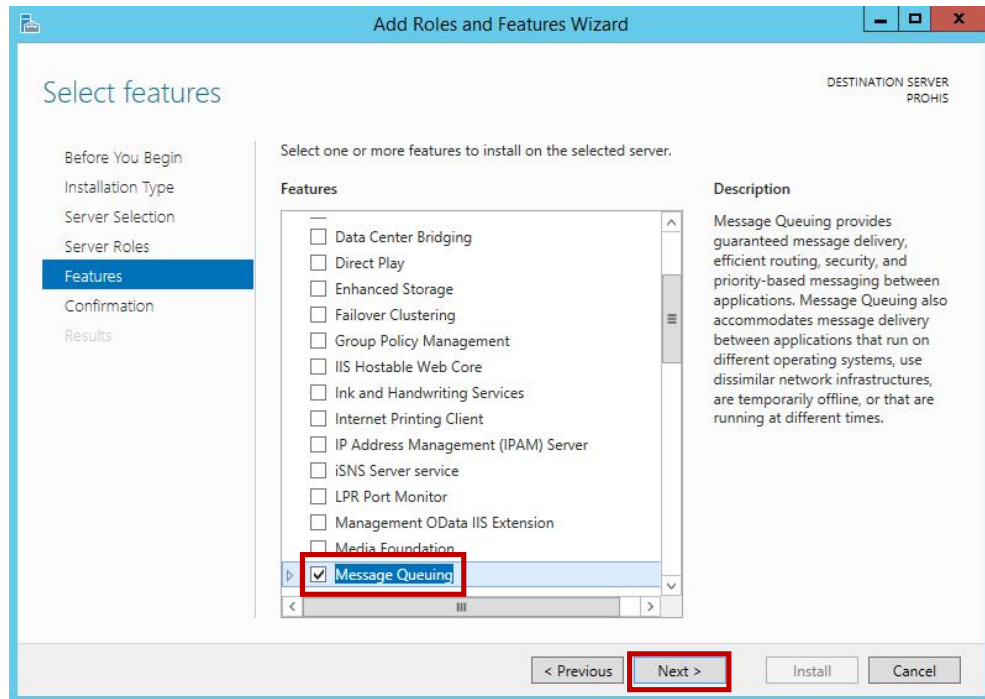
3. In “Installation Type”, you select the “Role-based or feature-based installation” option and click on “Next”
Figure 3-4



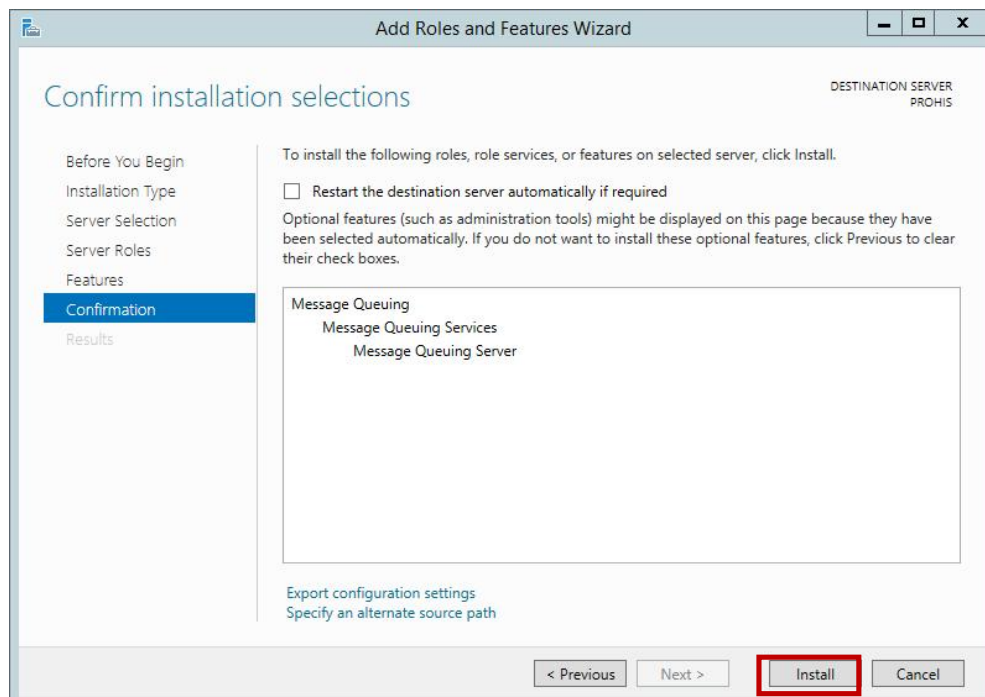
3 Installing the Process Historian

3.2 Installation of Microsoft Message Queuing

4. In “Features” you select the “Message Queuing” option and click on “Next”
Figure 3-5



5. Click on “Install” to install the Message Queuing Services
Figure 3-6



3 Installing the Process Historian

3.2 Installation of Microsoft Message Queuing

6. Then click on "Close"

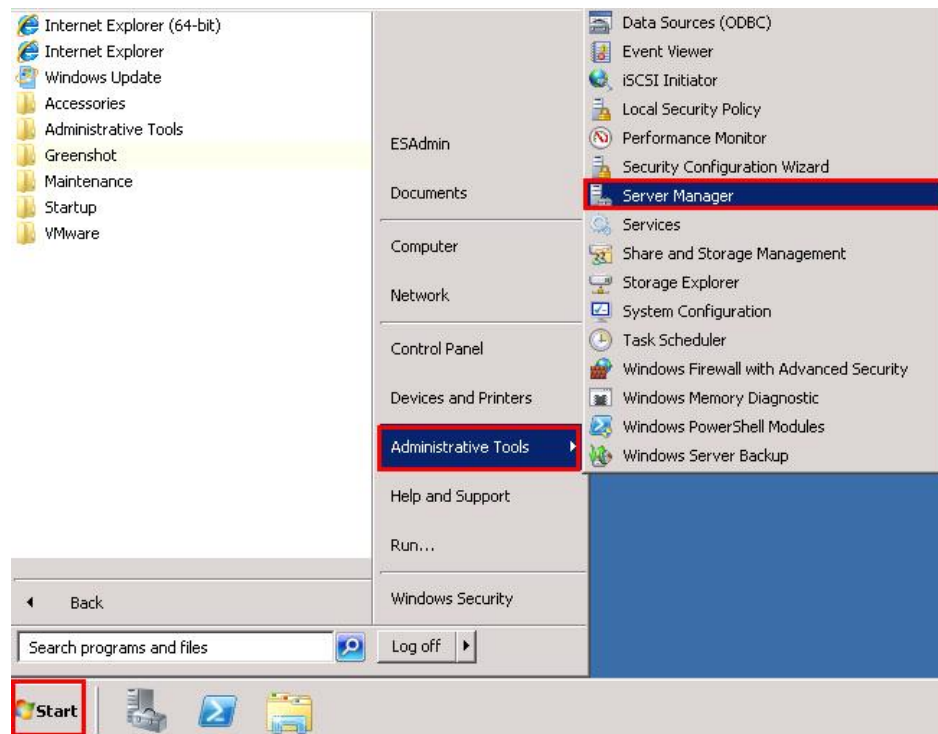
Result

The Message Queuing Services were installed

Procedure for Windows Server 2008 R2 SP1

1. Start the Server Manager via "Start > Administration Tools > Server Manager"

Figure 3-7

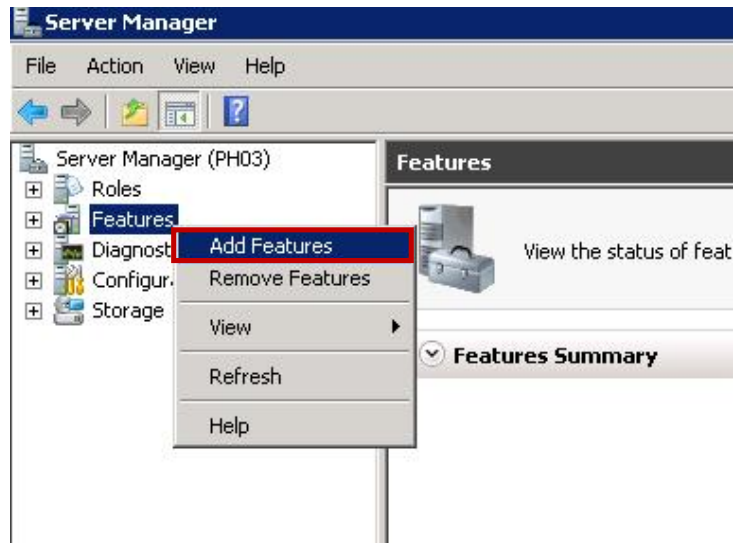


3 Installing the Process Historian

3.2 Installation of Microsoft Message Queuing

2. Right-click on "Features". Select the "Add Features" command in the context menu.

Figure 3-8

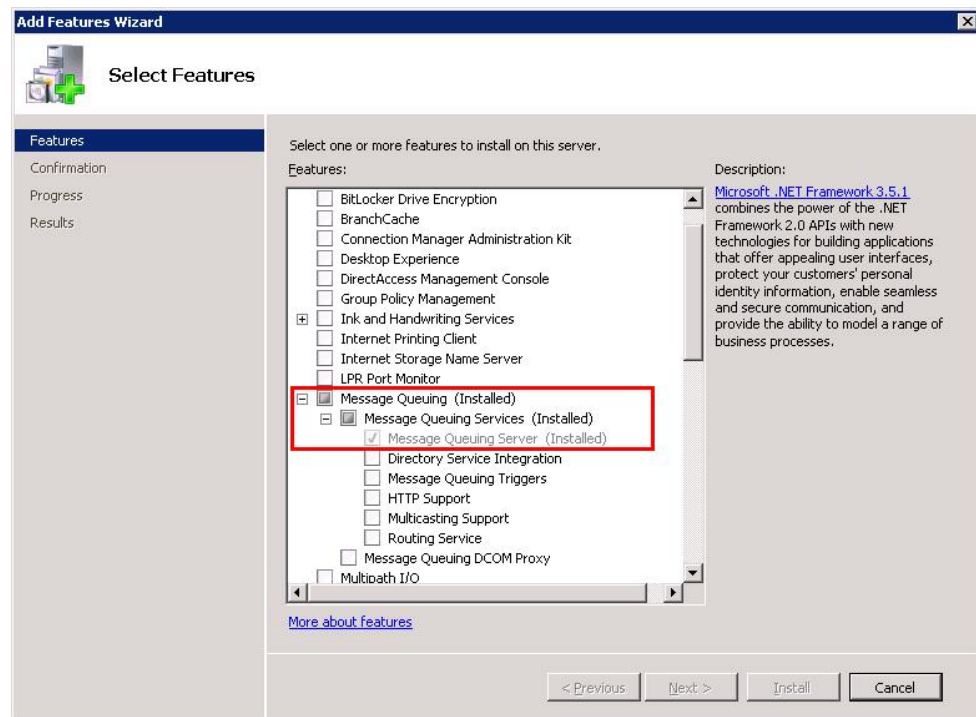


3 Installing the Process Historian

3.2 Installation of Microsoft Message Queuing

3. Activate the “Message Queuing” option, and below the “Message Queuing Services” and “Message Queuing Server” options as well.

Figure 3-9



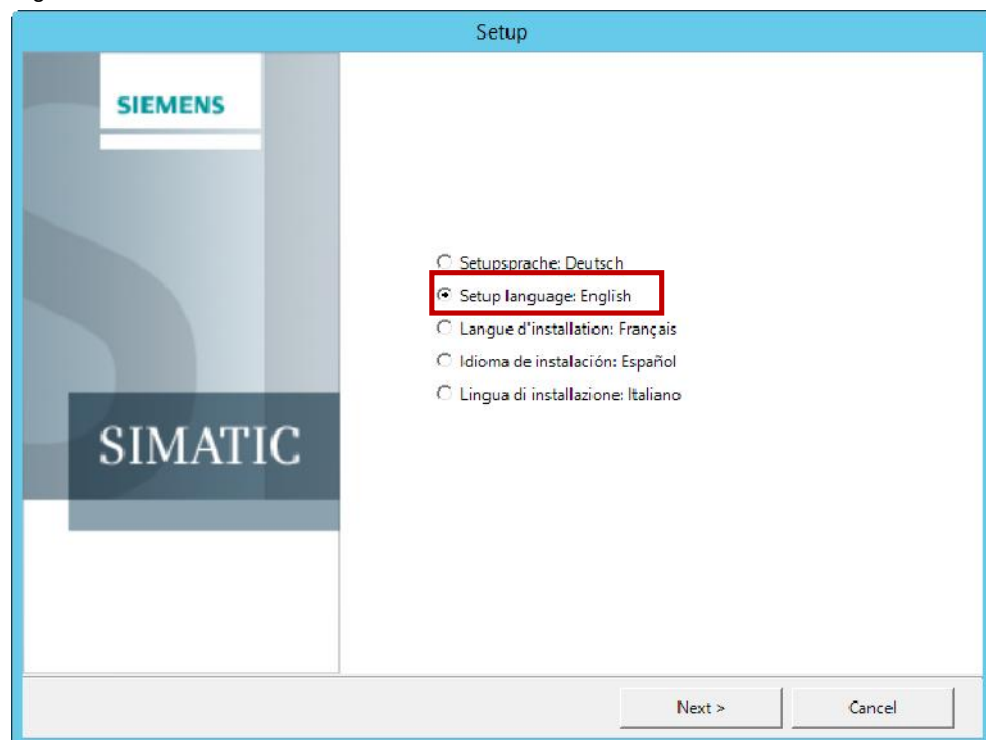
3.3 Installation of Process Historian

Note

The computer name of the PH must not be "HIST" or "HISTORIAN", since that has already been assigned to the SQL server instance. This would cause a conflict with the SQL server, and the database wizard might not work anymore.

1. Insert the installation CD and start the setup program for Process Historian and Information Server. The installation CD is started automatically if your system is configured accordingly.
2. Select the language for the installation and then click on the "Next" button.

Figure 3-10

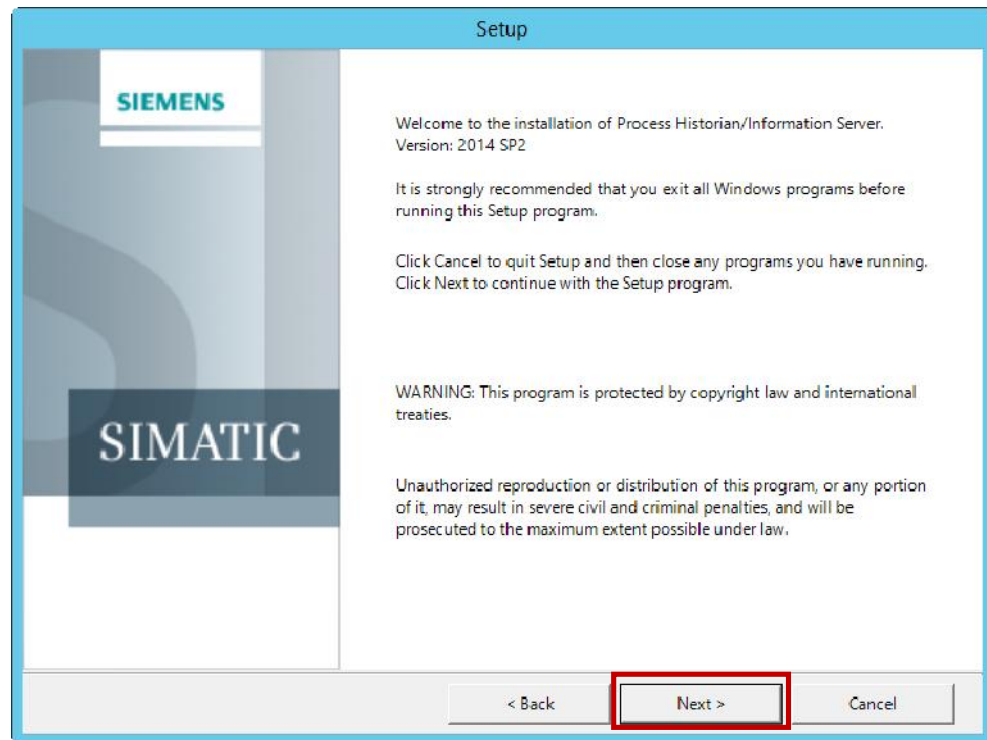


3 Installing the Process Historian

3.3 Installation of Process Historian

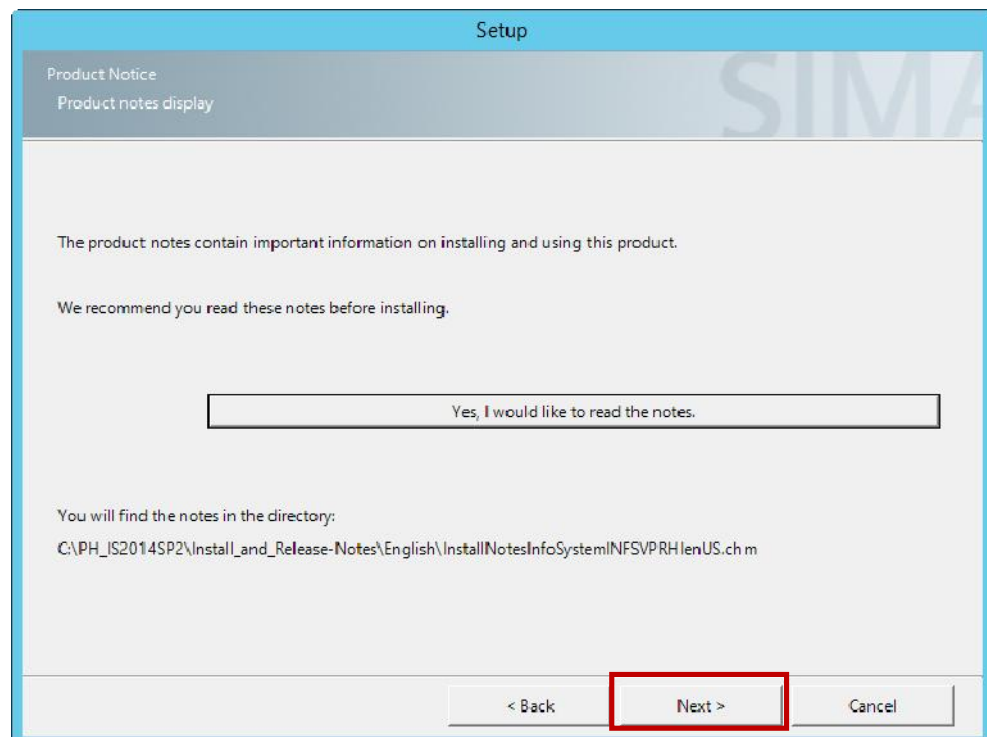
3. In the "Welcome" screen you click on the "Next" button.

Figure 3-11



4. Read the Product notes and then click on "Next" again.

Figure 3-12



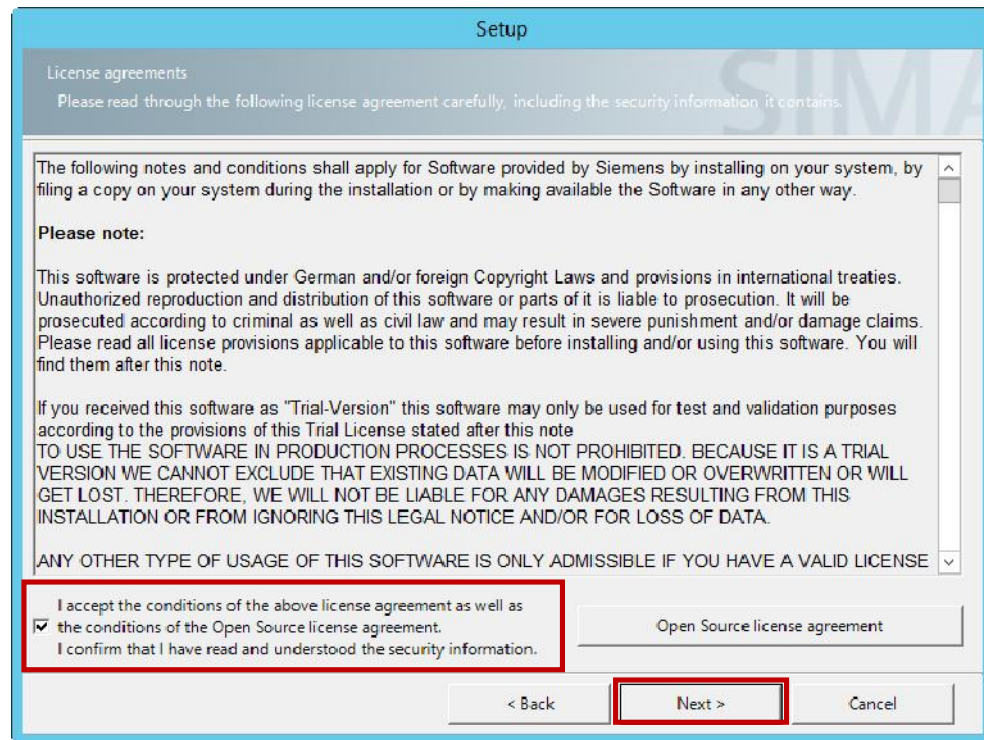
Read the Product Notice at
<DVD drive>\Install_and_Release-
Notes\English\InstallNotesInfoSystem\INFVPRHlenUS.chm

3 Installing the Process Historian

3.3 Installation of Process Historian

5. Accept the setup agreements. Click on the "Next" button.

Figure 3-13

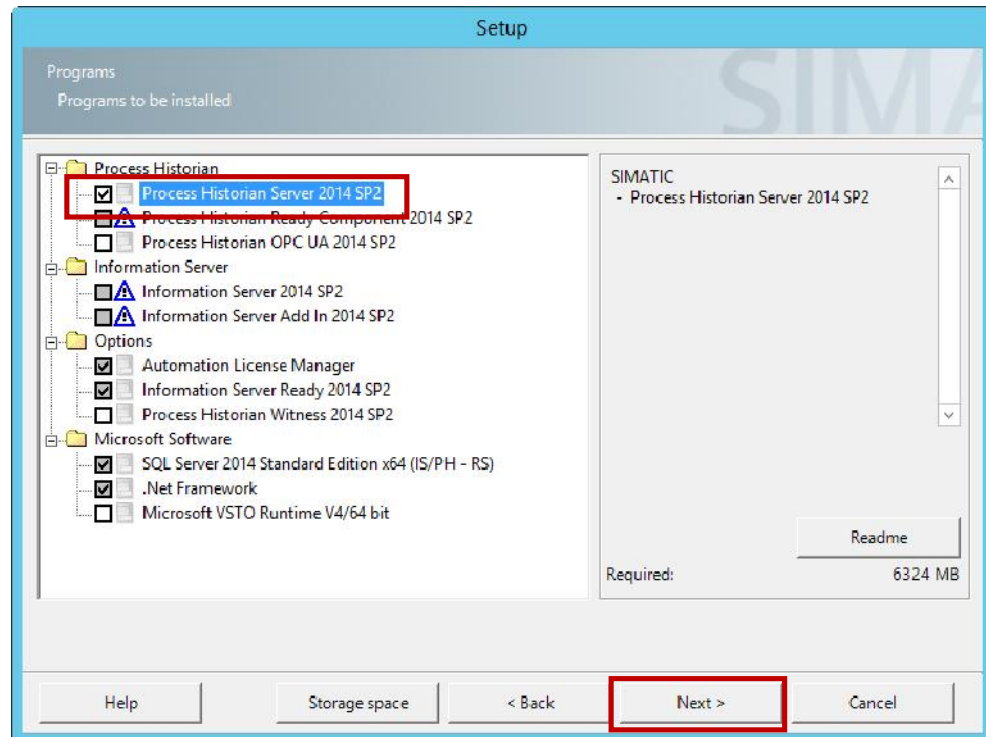


3 Installing the Process Historian

3.3 Installation of Process Historian

6. Select the program package “Process Historian 2014 SP2”. Then click on the “Next” button.

Figure 3-14

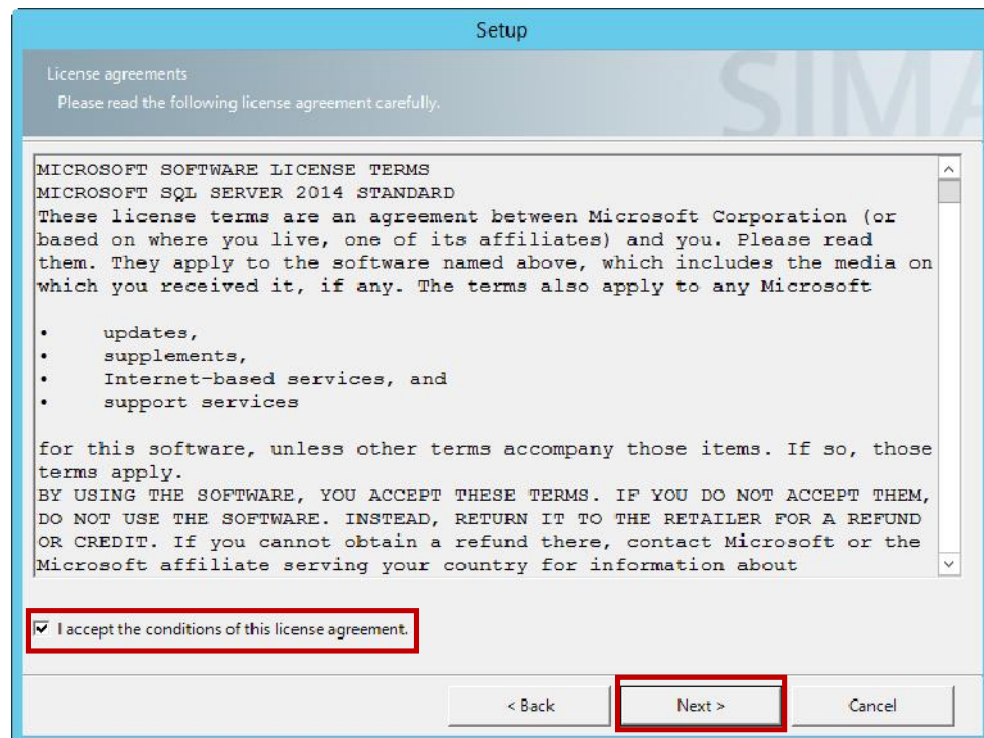


3 Installing the Process Historian

3.3 Installation of Process Historian

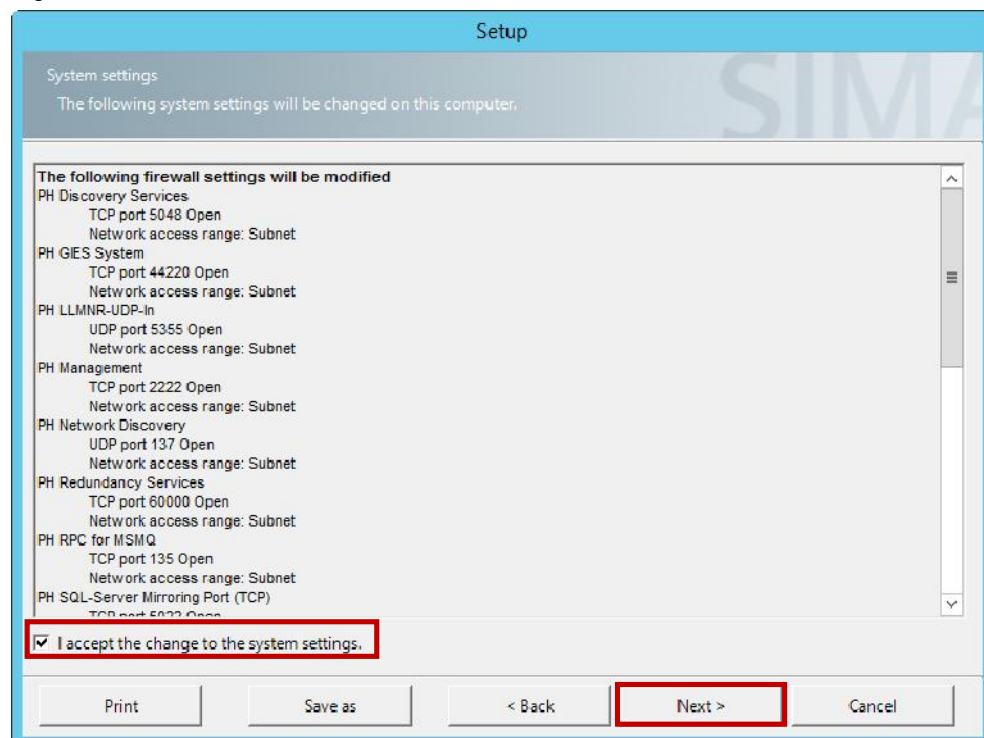
7. Accept the license agreements for the MS SQL Server 2014 and then click on "Next".

Figure 3-15



8. Accept the changes to the system Settings and click on the "Next" button.

Figure 3-16



3 Installing the Process Historian

3.3 Installation of Process Historian

9. Now click the “Install” button.

Figure 3-17

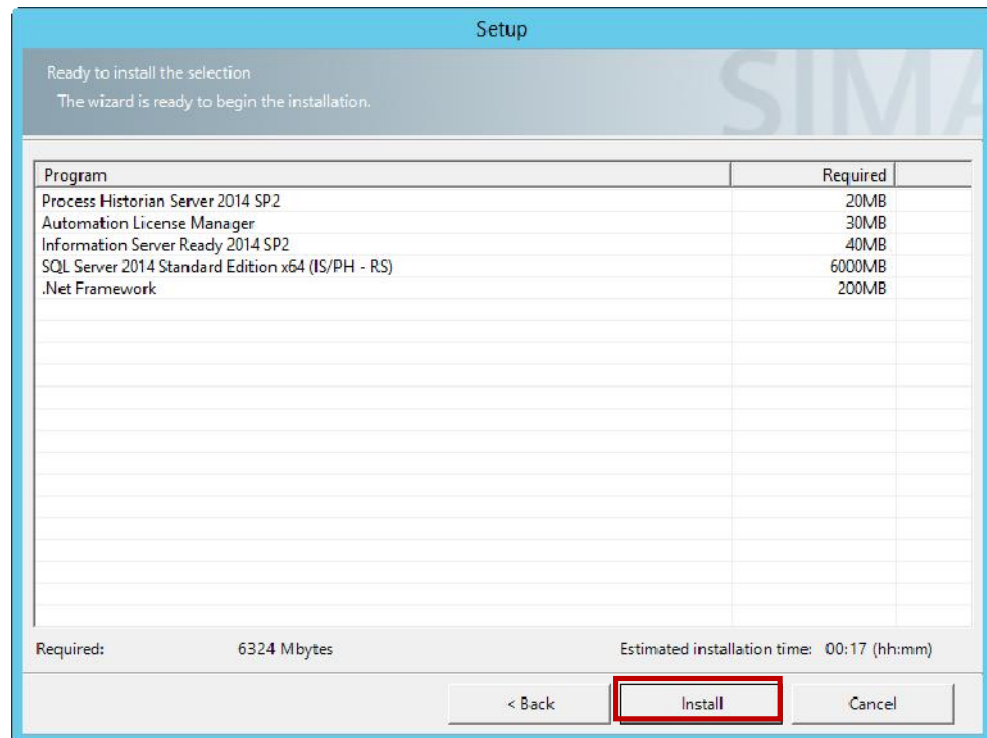
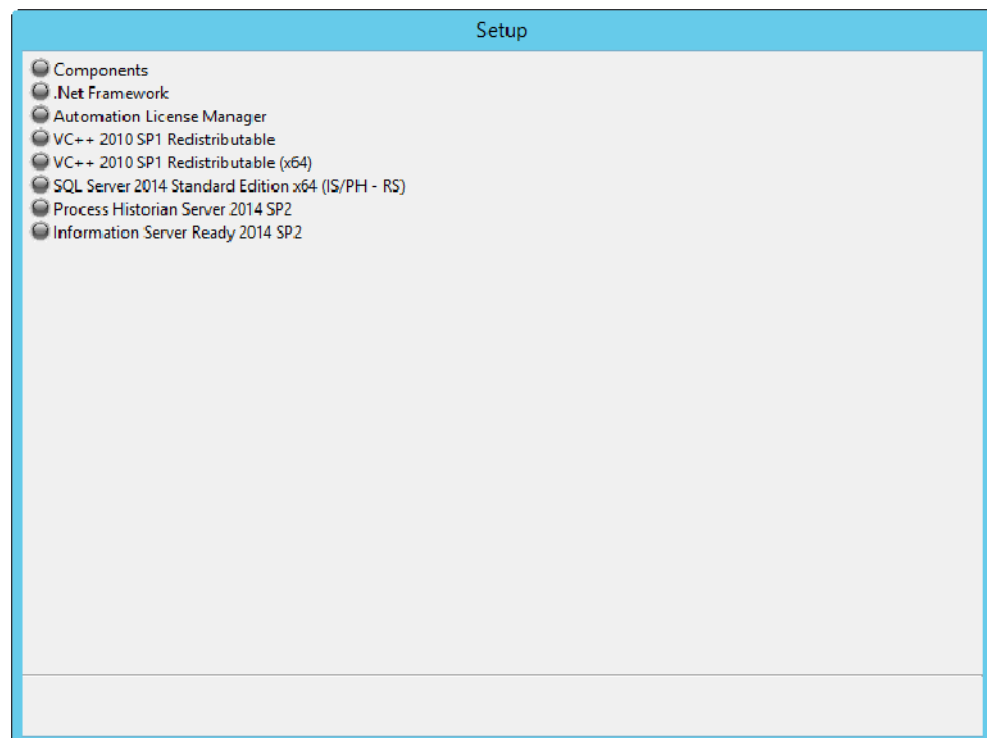


Figure 3-18

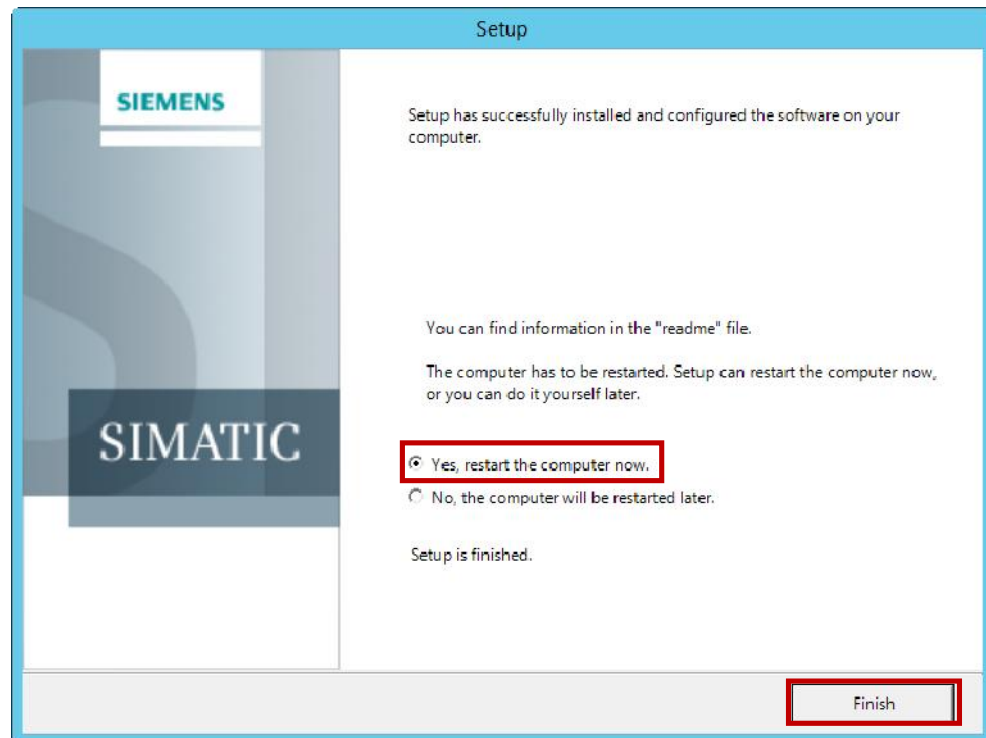


3 Installing the Process Historian

3.3 Installation of Process Historian

10. Click on the “Finish” button to complete installation and restart the computer.

Figure 3-19



Result

Die Process Historian software was installed.

Note

If you wish to install the PH and IS software on the same PC, select both program packages “Process Historian 2014 SP2” and “Information Server 2014 SP2”.

3.4 Configuration of the PH database

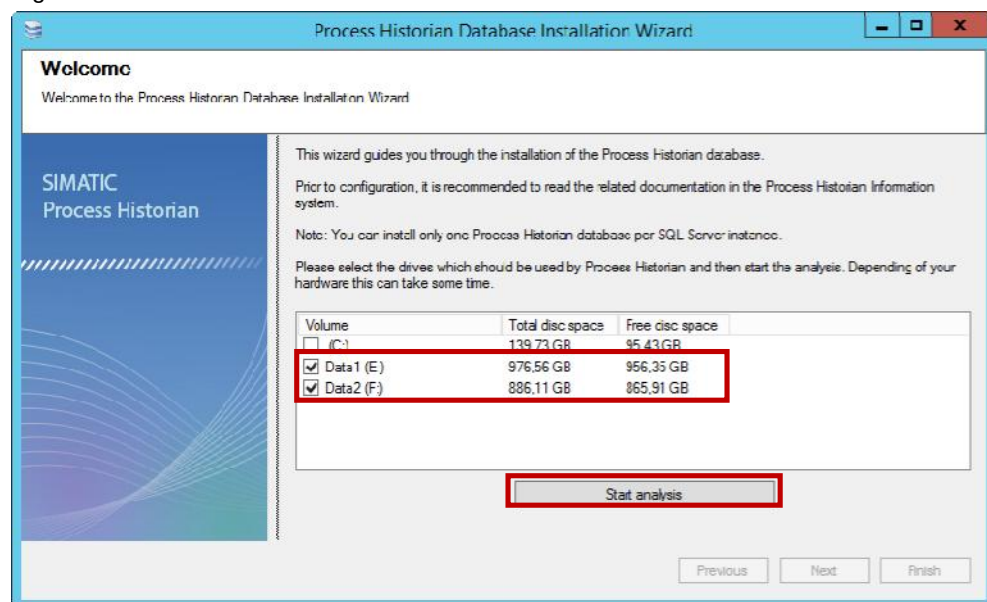
After the Process Historian has been installed and the system rebooted, the “Process Historian Database Installation Wizzard” starts automatically. This wizzard will help you create the database for the SIMATIC Process Historian.

Note

The Installation Wizard for creating the Process Historian database is used solely for creating and implementing the initial configuration of this database. After performing the setup, the Installation Wizard for the PH database is executed once. When calling the Installation Wizard again manually while choosing the same network path, the existing database will be deleted.

1. In the Welcome window, you can select the partitions/ hard drives for the PH database.
Then click on the “Start analysis” button.

Figure 3-20



Note

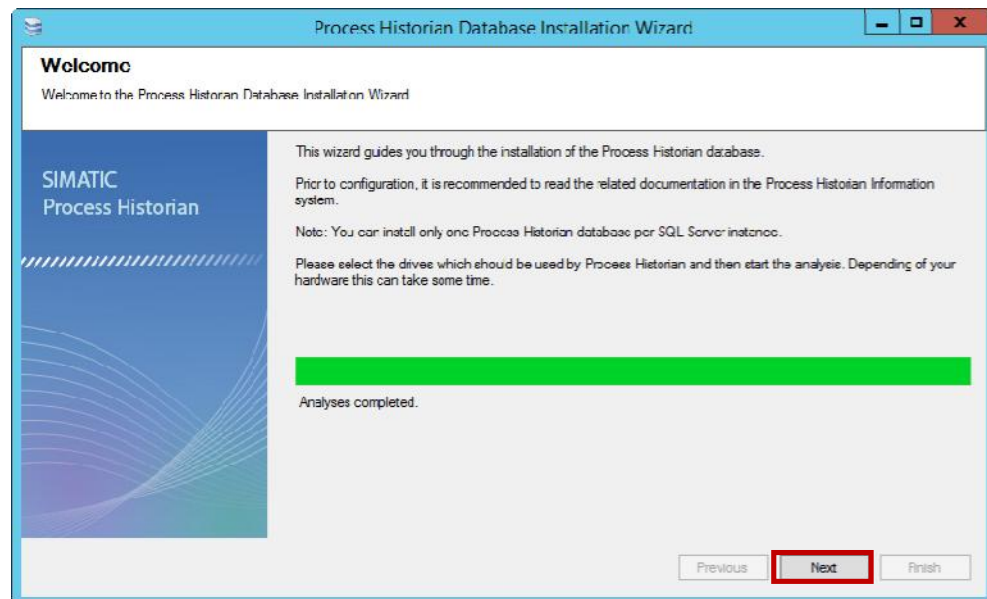
For Process Historian systems for average and large quantity frameworks, the tag and alarm load must be distributed between several hard disks since the access time to the hard disk is too high to write data to a hard disk. The distribution of the data to be written can be achieved with installation mode “Advanced”. As of approx. 3000 tags/s, the data should be distributed between several hard disks.

3 Installing the Process Historian

3.4 Configuration of the PH database

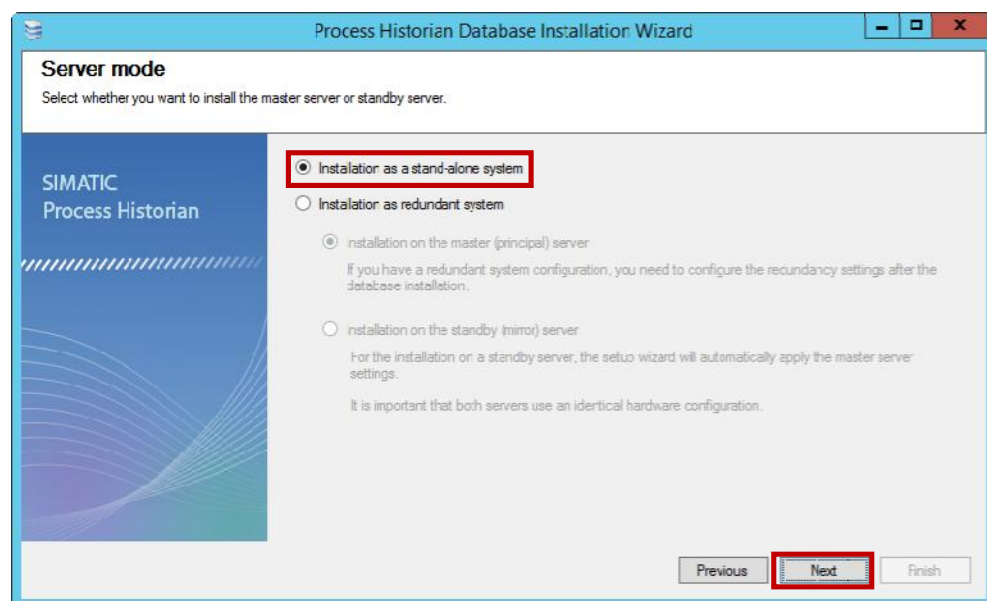
2. After the analysis has been completed, click on the "Next" button.

Figure 3-21



3. You can select single or redundant PH in the Server mode window. Then click the "Next" button.

Figure 3-22



3 Installing the Process Historian

3.4 Configuration of the PH database

4. The “Summary” window shows the analysis results in an overview. Default settings for the PH database are selected based on predicted values (tags/messages).
You receive a summary of the time period that can be stored with the current presettings (item 6).

You can edit these settings under 1-5.

Figure 3-23

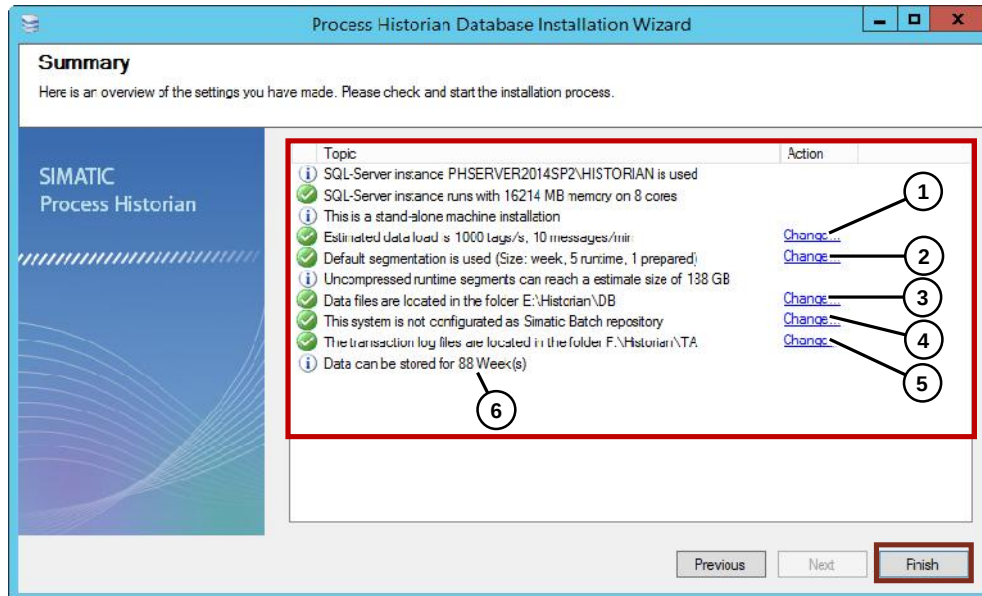


Table 3-1

No.	Description
1.	Expected tags and messages
2.	Segment settings
3.	Storage path for tags and messages
4.	Storage path for SIMATIC BATCH
5.	Storage path for PH transaction logfile
6.	Storage time

Click on “Finish” to create the database with the stated settings. Continue in chapter [3.4.2 Configuration completed](#)

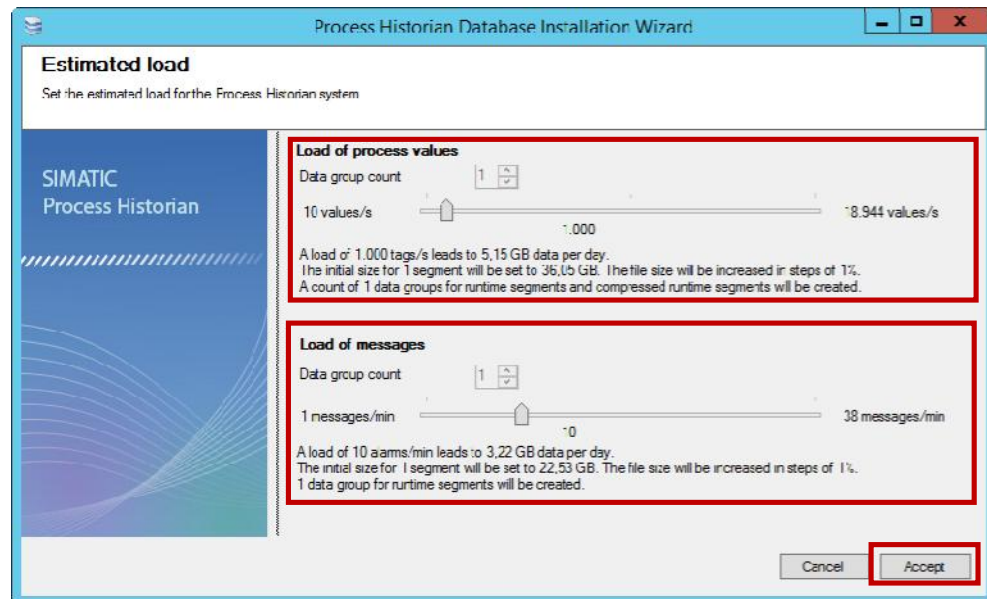
3.4.1 Adapting the configuration

To edit the settings, click on the corresponding “Change” button.

Estimated Load

Define the settings for the estimated “Tag Logging data load” and “Alarm Logging data load” and click on “Next”.

Figure 3-24



Note

When using a WinCC server in Runtime mode, you can use the internal tag “@TLGRT_AVERAGE_TAGS_PER_SECOND” to estimate how many tags per second are stored on the WinCC server on average.

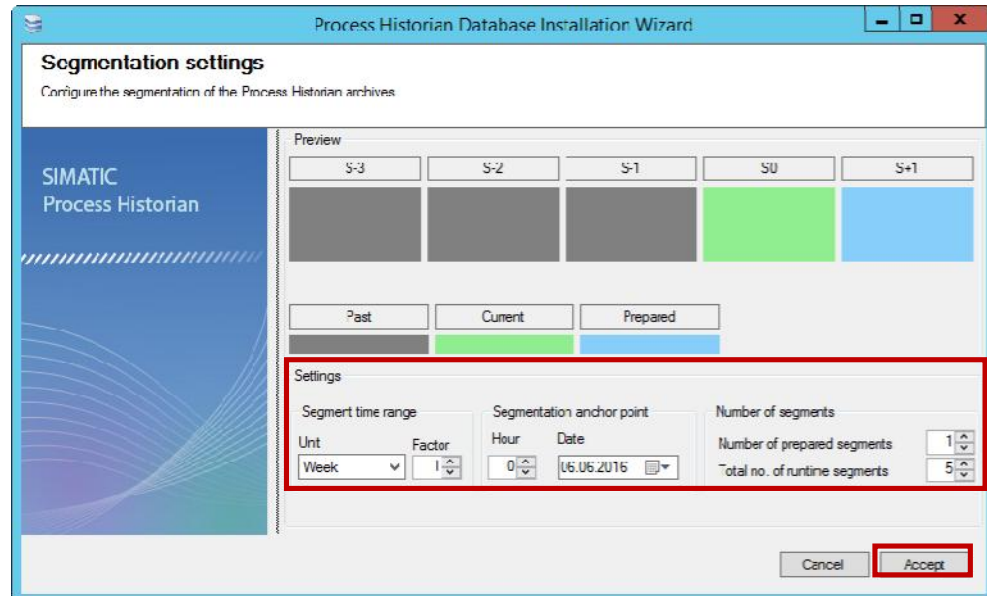
3 Installing the Process Historian

3.4 Configuration of the PH database

Segment settings

Configure the database segmentation here:

Figure 3-25



Note

Database segmentation

The total segment count and the prepared segment count can be configured with help of the following rule:

$$\text{Total segment count} = \text{Prepared segment count} * 2 + 2$$

For 1 prepared database segment, you can define a total runtime segment count of

$$1 * 2 + 2 = 4.$$

Three prepared week segments is the standard setting.

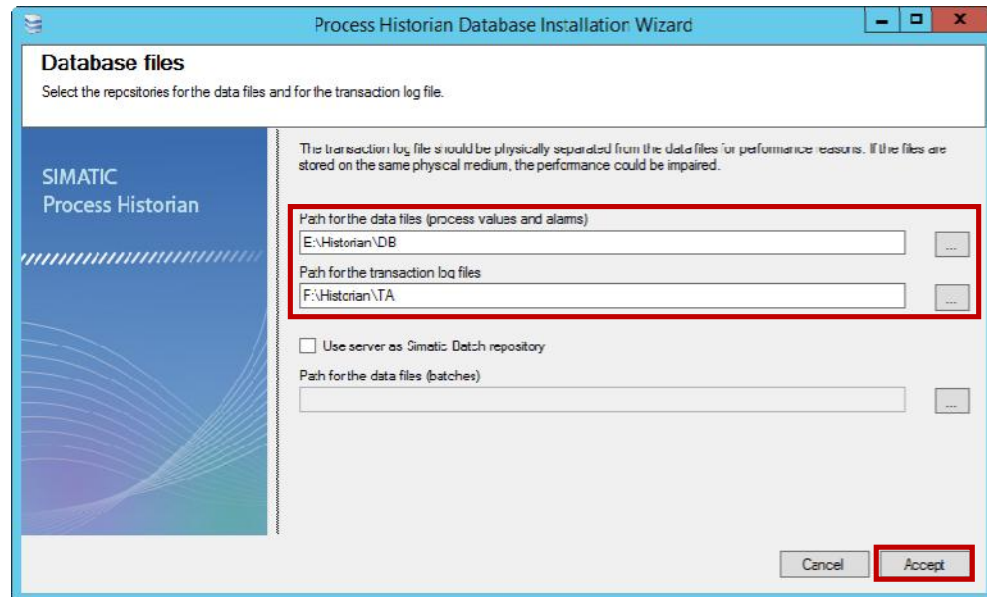
3 Installing the Process Historian

3.4 Configuration of the PH database

Database files

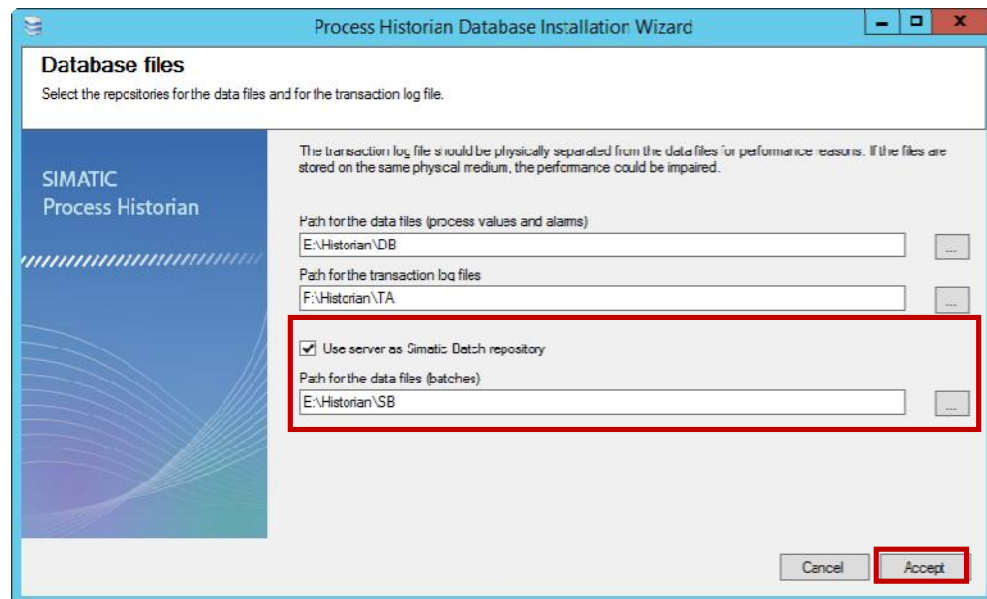
Here you can edit the storage path for data and the transaction logfile.

Figure 3-26



Here you can edit the storage path for the SIMATIC Batch data.

Figure 3-27



Then click the "Accept" button.

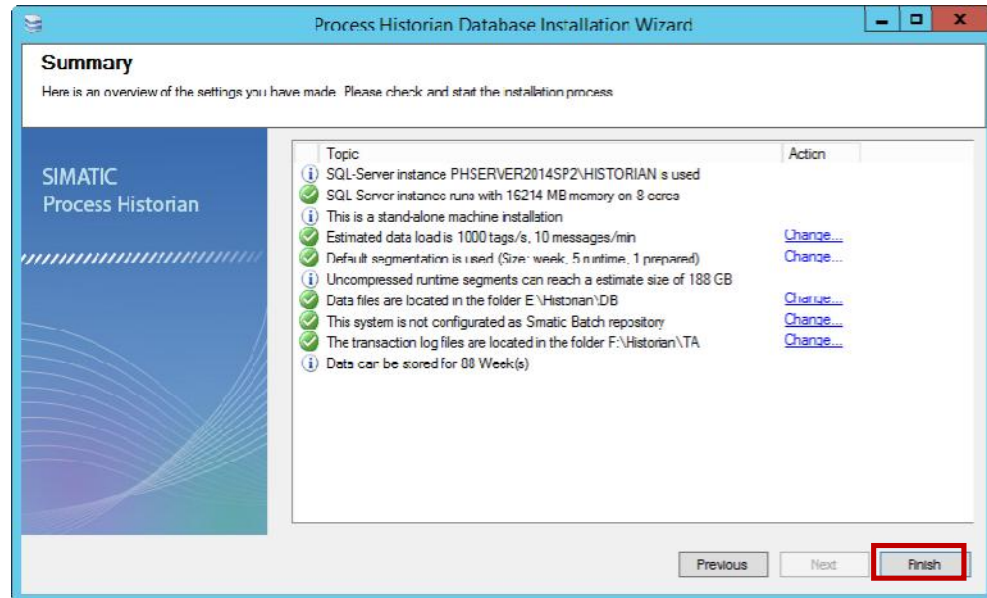
3 Installing the Process Historian

3.4 Configuration of the PH database

Change completed

Click on the “Finish” button to complete the configuration.

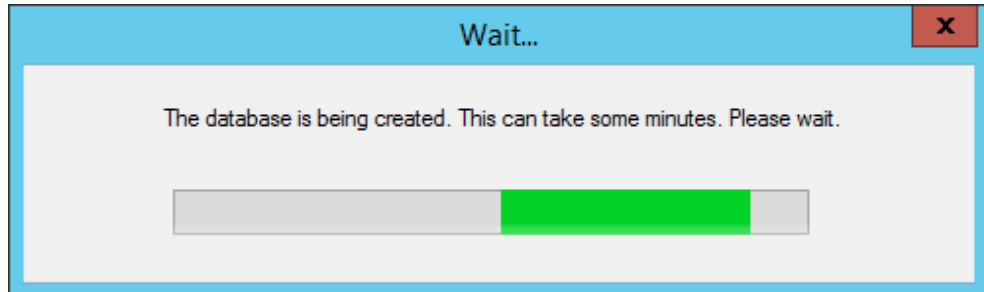
Figure 3-28



3.4.2 Configuration completed

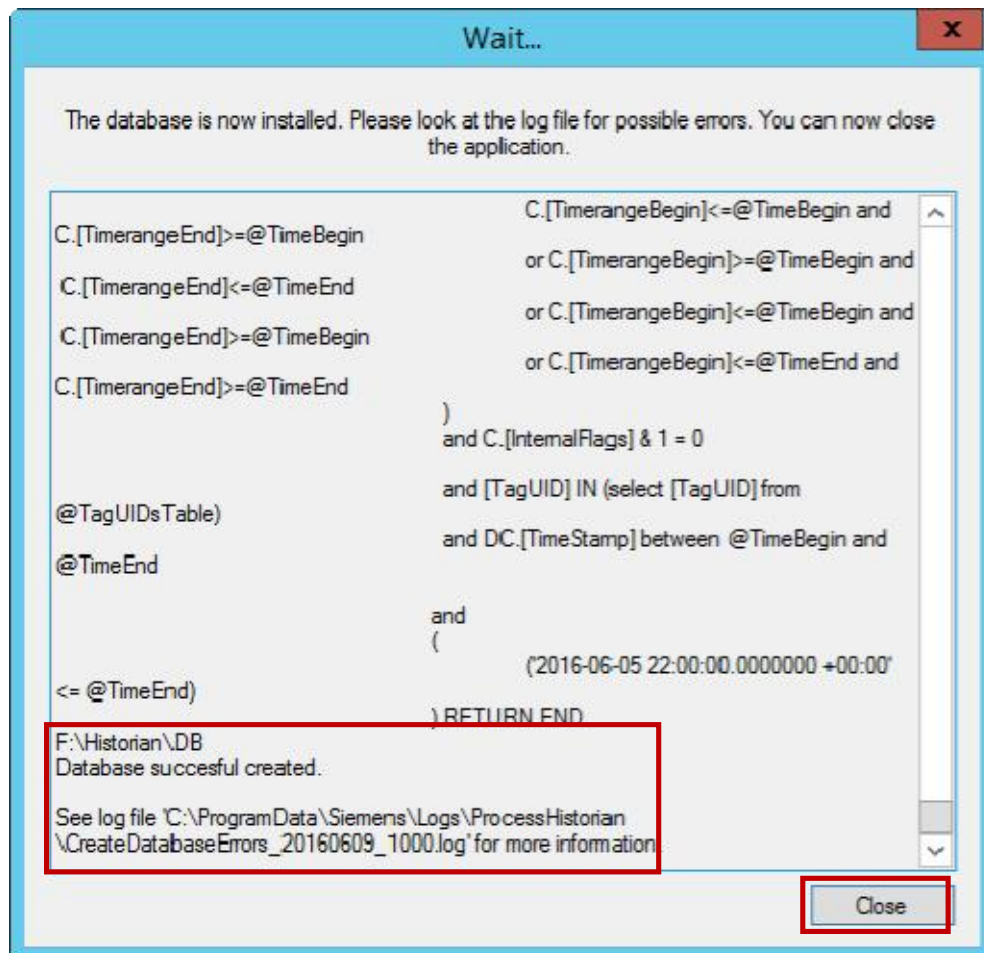
- The database “HistorianStorage DB” is now created with the settings from the Summary

Figure 3-29



- Then you receive a summary. Click on the “Close” button.

Figure 3-30



Note

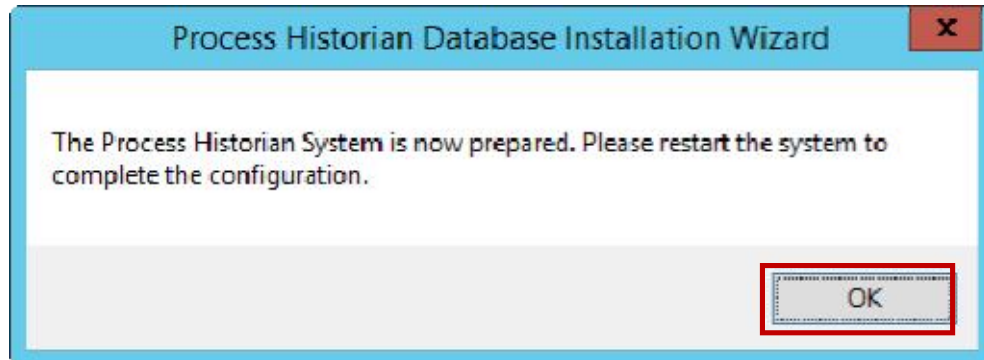
Check this dialog for possible errors. Use the scroll bar here. If you were taken to the Errors dialog, the “HistorianStorage” database was not created correctly. The Database Installation Wizard must be started manually in this case. The procedure is described in chapter “Troubleshooting”.

3 Installing the Process Historian

3.4 Configuration of the PH database

7. Click on "OK" to complete the installation process and to restart the system.

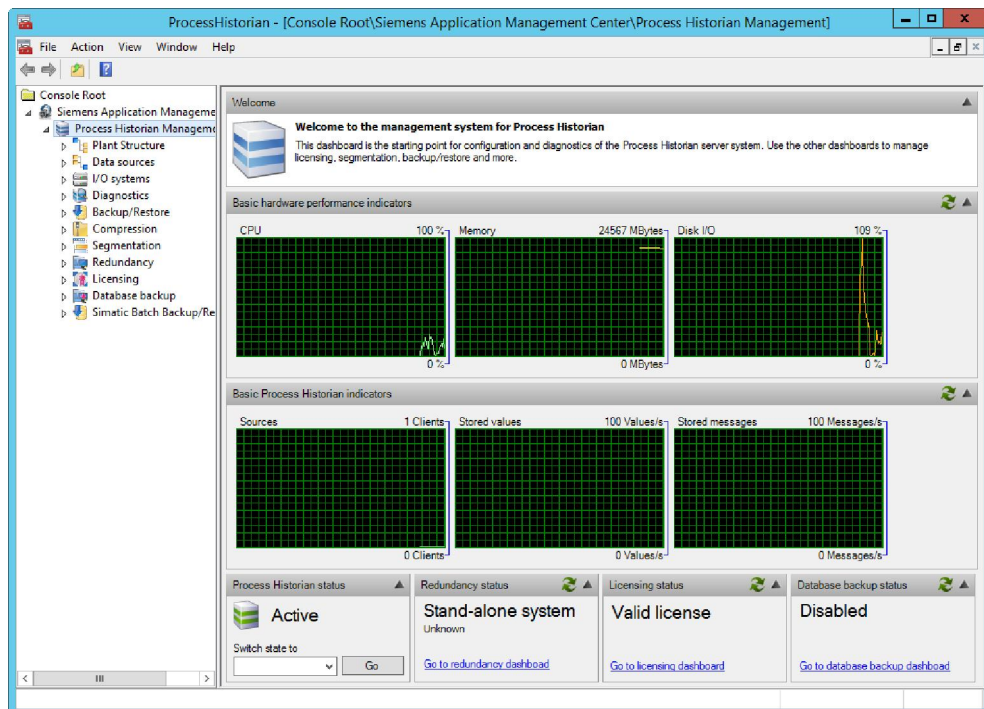
Figure 3-31



Result

Die PH database was created. After restart, the PM Management console was displayed without errors.

Figure 3-32



4 Installation of the Information Server

4.1 Installation requirements for the IS

The Information Server can be installed on different systems.

The following table lists the Microsoft operating systems and software components.

Table 4-1

Operating system	Configuration	Comments
Windows 7	Professional SP1 Enterprise SP1 Ultimate SP1	Standard installation 32-bit and 64-bit
Windows Server 2008	Standard SP2	32 bit
Windows Server 2008 R2	Standard SP1	64 bit
Windows Server 2012 R2	Standard	64 bit

- The Information Server requires the services “Internet Information Services” (IIS).
- DotNet Framework 4.0 will also be installed during PH installation. Since the setup program verifies the existence of the previous version 3.5, DotNet Framework 3.5 must have been installed prior to installing PH and IS.
- Visual Studio Tools for Office (VSTO Runtime) for MS Office AddIn
- Microsoft SQL Server 2014 SP1 32 bit/64 bit. When installing the Information Server, the SQL server is also automatically installed.
- Internet Explorer 11

4.2 Installing the Internet Information Server (IIS)

This following description refers to a 64-bit Windows server 2012 R2

Prerequisite

Logon as Administrator with password. ASP.NET 3.5 and DotNet Framework 3.5 preinstalled.

Note

For Windows Server 2012 R2, ASP.NET 3.5 and DotNet Framework 3.5 must be installed manually from the DVD at "Specify an alternate source path".

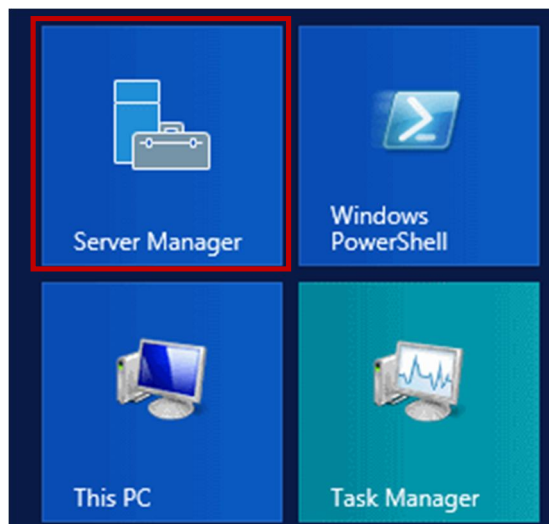
The components are available at <Drive>:\Sources\SxS

Alternatively, it may also be installed via internet connection without DVD.

Procedure

1. Select the "Start > Server Manager".

Figure 4-1

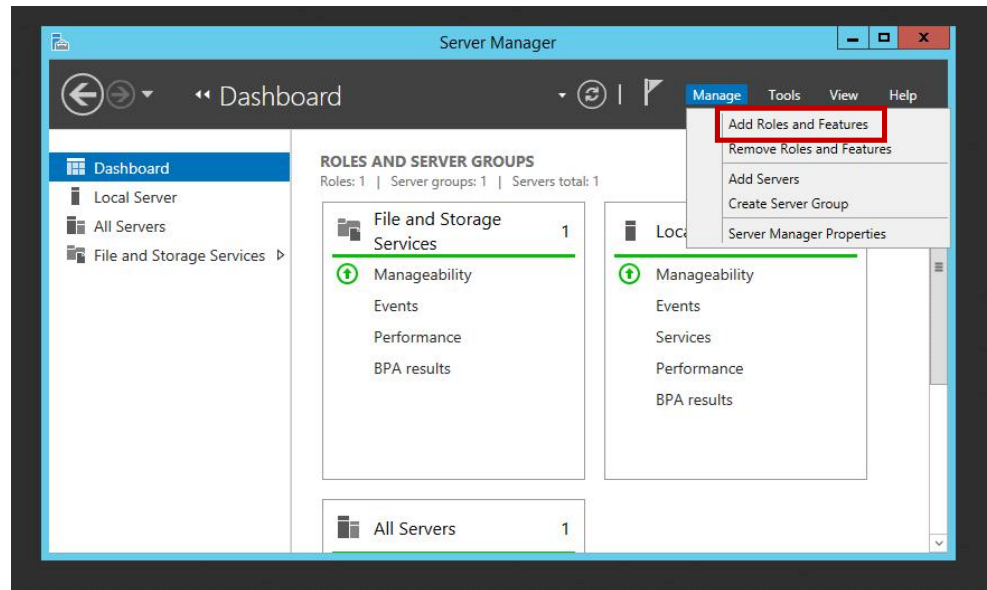


4 Installation of the Information Server

4.2 Installing the Internet Information Server (IIS)

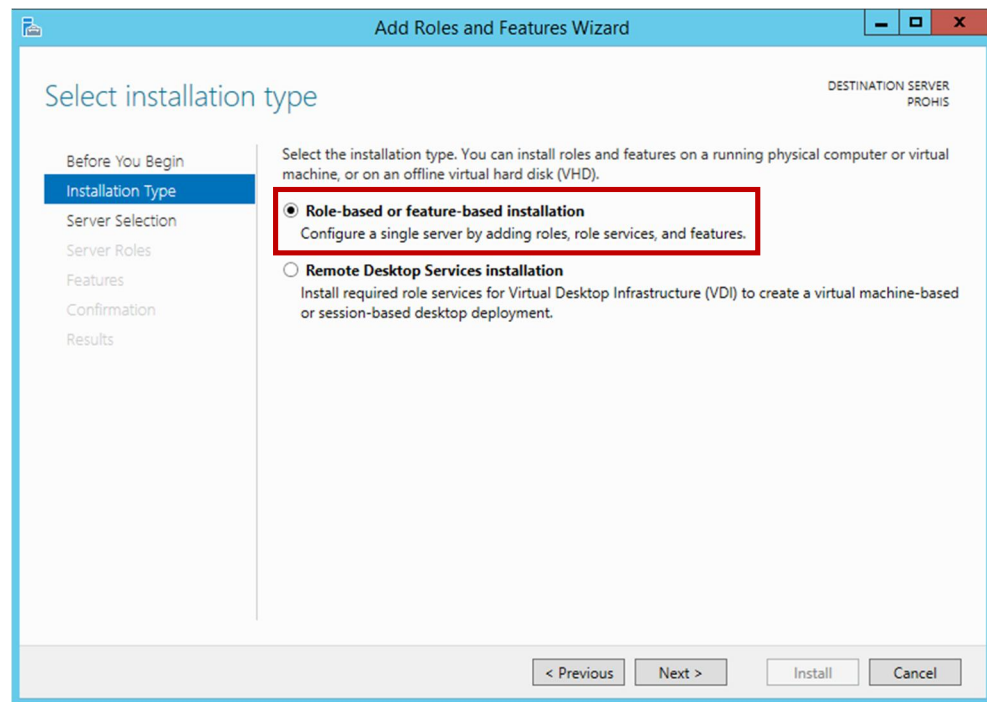
2. Use the left mouse button to click on “Manage” and select “Add Roles and Features”.

Figure 4-2



3. In the “Installation Type” dialog, you select the menu item “Role-based or feature-based installation”

Figure 4-3

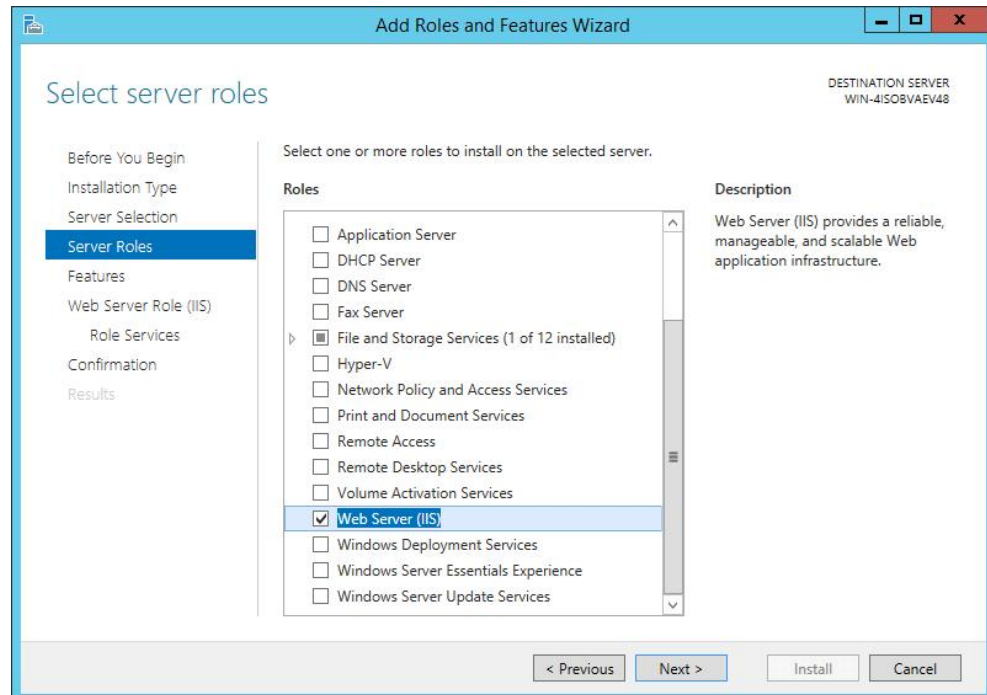


4 Installation of the Information Server

4.2 Installing the Internet Information Server (IIS)

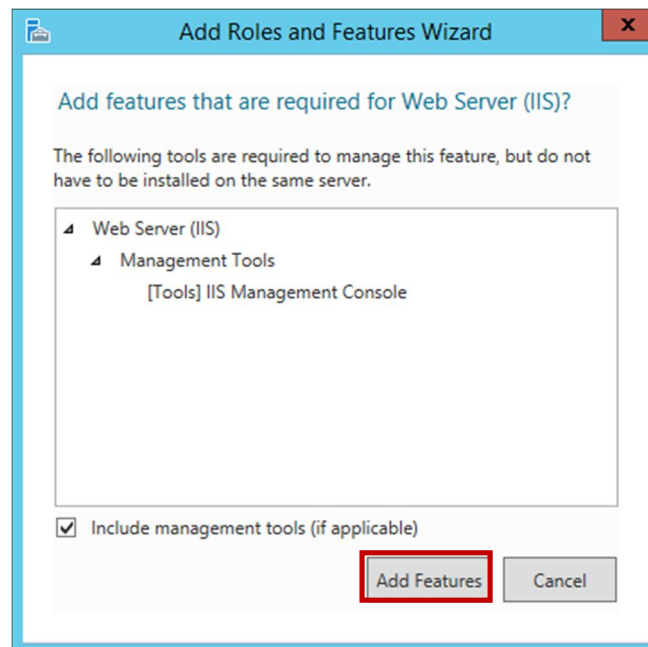
4. In the “Add Roles and Features Wizard” dialog you select the menu option “Server Roles” and activate the option “Web Server (IIS)”.

Figure 4-4



5. Acknowledge the “Add Roles and Features Wizard” window with “Add Features”

Figure 4-5

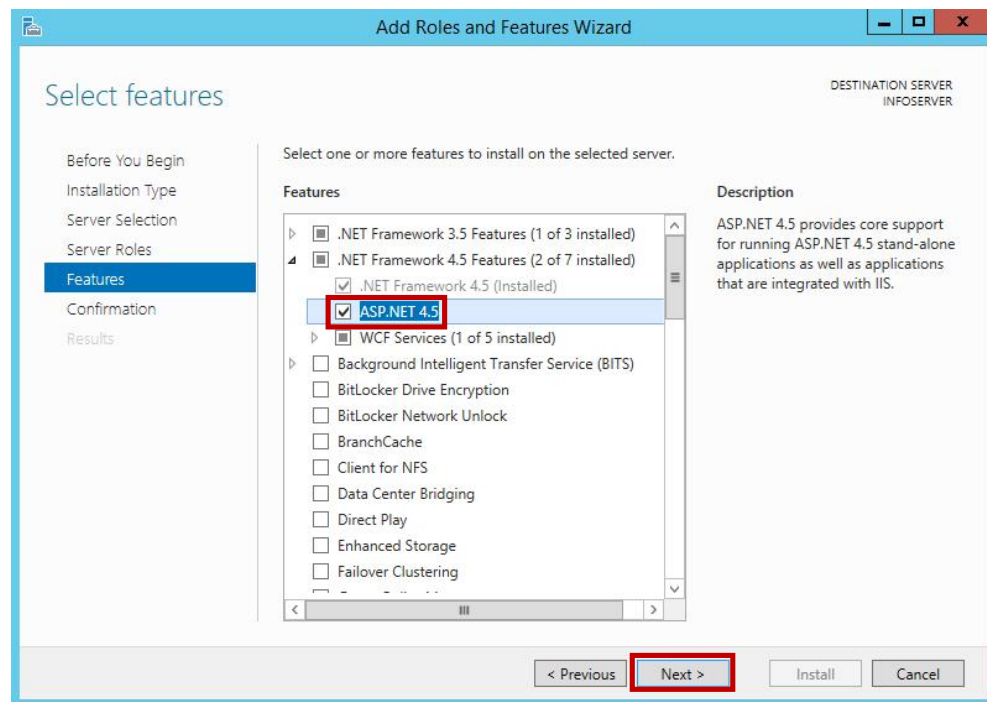


4 Installation of the Information Server

4.2 Installing the Internet Information Server (IIS)

6. Go to the “Features” dialog box and select menu item “ASP.NET 4.5” and click on the “Next” button.

Figure 4-6

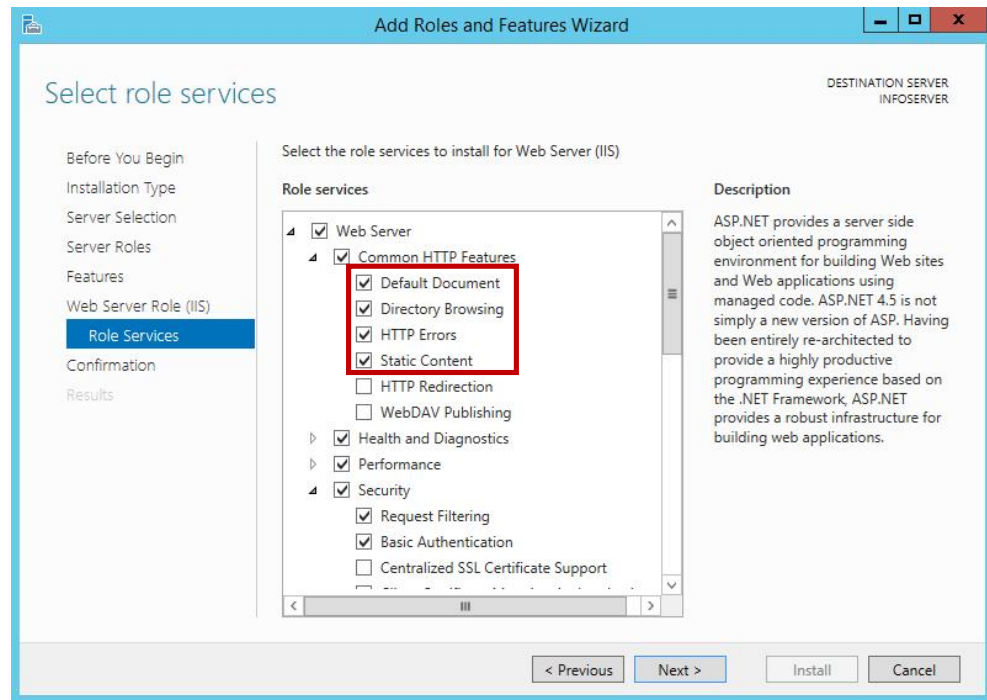


4 Installation of the Information Server

4.2 Installing the Internet Information Server (IIS)

7. In “Web Server(IIS) > Role Services > Common http Features” you verify or activate the options
 - Default Document
 - Directory Browsing
 - HTTP Errors
 - Static Content

Figure 4-7

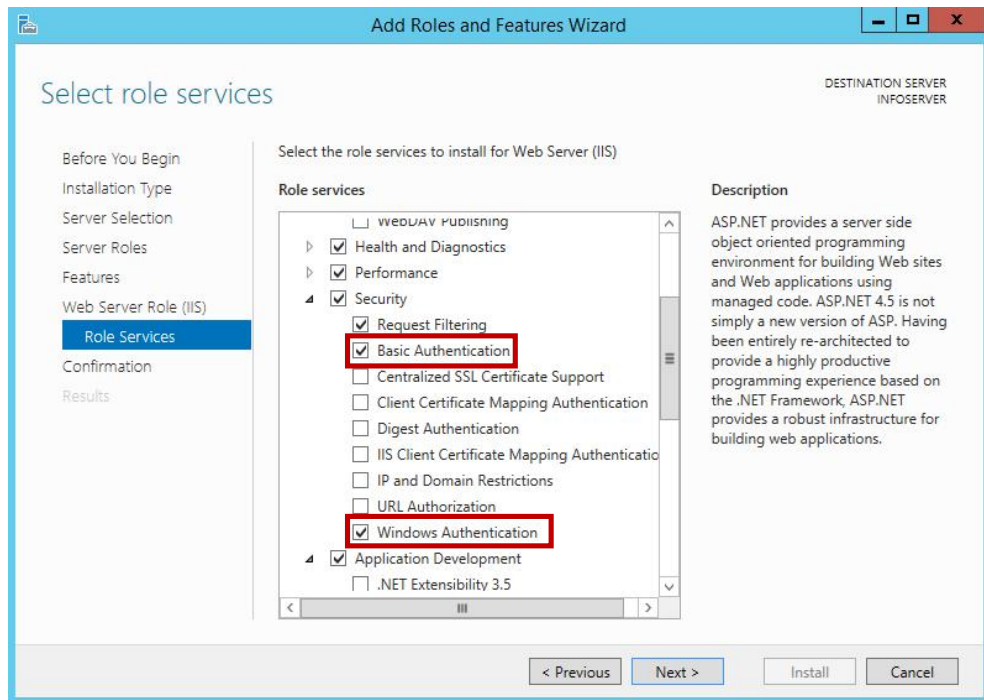


4 Installation of the Information Server

4.2 Installing the Internet Information Server (IIS)

8. Go to dialog “Web Server Role (IIS) > Role Service”. In “Web Server(IIS) > Role Services > Security” you activate the options
 - Basic Authentication
 - Windows Authentication

Figure 4-8

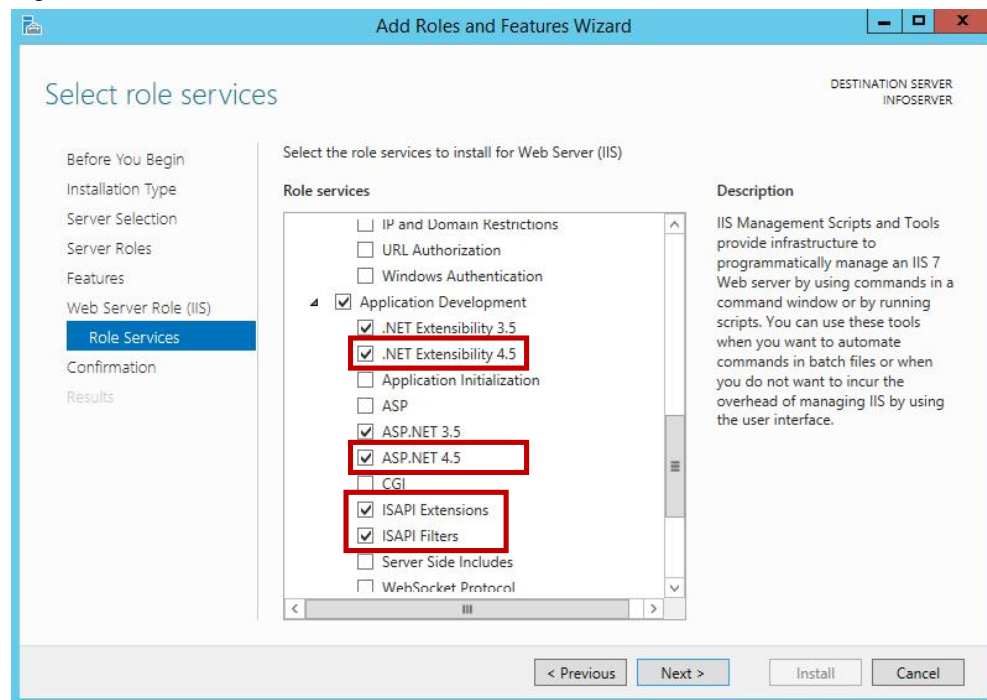


4 Installation of the Information Server

4.2 Installing the Internet Information Server (IIS)

9. In “Web Server(IIS) > Role Services > Application Development” you verify or activate the options
 - ASP.NET 4.5
 - .NET Extensibility 4.5
 - ISAPI Extensions
 - ISAPI Filters

Figure 4-9



10. Click on the “Next” button.
11. Click on the “Install” button.

Result

The Internet Information Service (IIS) is installed.

This following description refers to a 64-bit Windows server 2008 R2.

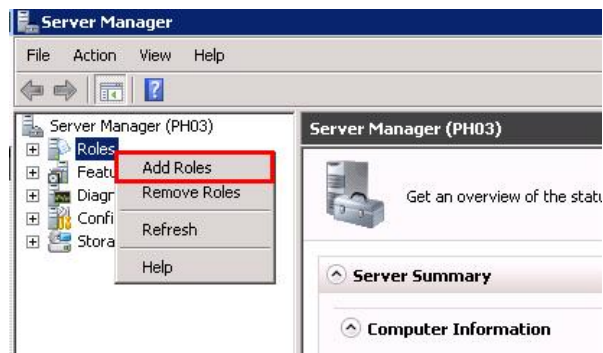
Prerequisite

Logon as Administrator.

Procedure

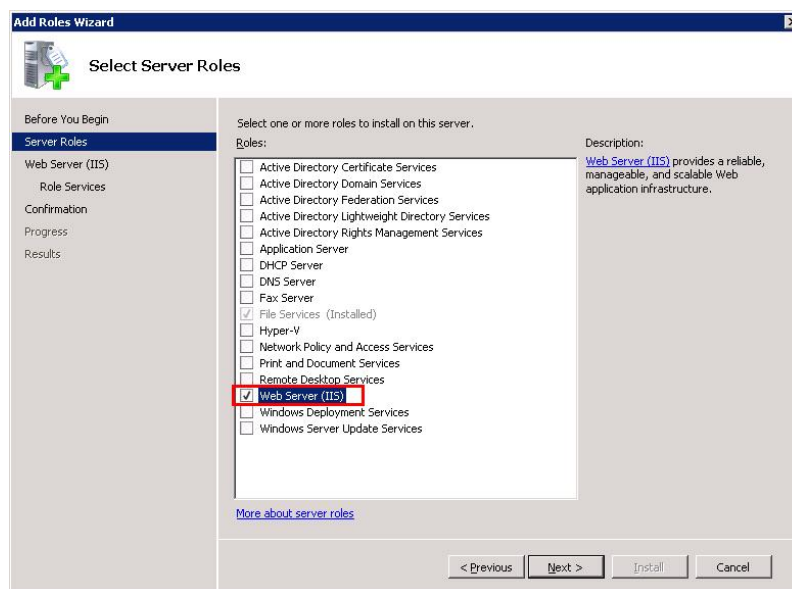
1. Select "Start > Administrative Tools > Server Manager".
2. Use the right mouse button to click on "Roles" and select "Add Roles" from the context menu.

Figure 4-10



3. In the "Add Roles Wizard" dialog you select the menu option "Server Roles" and activate the option "Web Server (IIS)".

Figure 4-11



Click on the "Next" button.

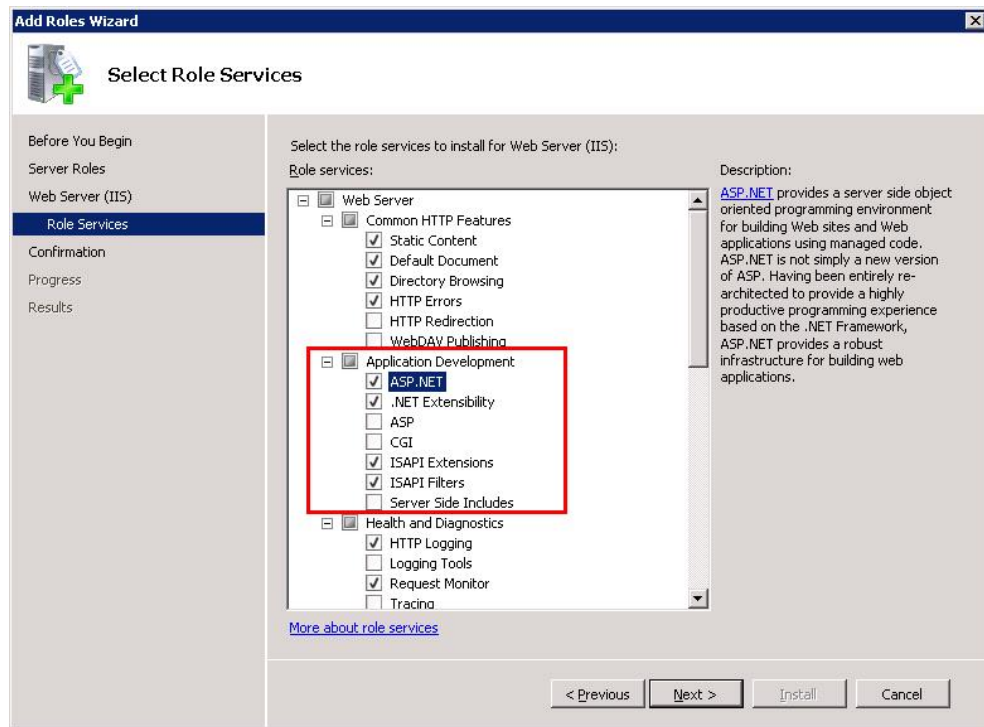
4. Select the menu item "Role Services".

4 Installation of the Information Server

4.2 Installing the Internet Information Server (IIS)

5. In “Web Server(IIS) > Role Services > Application Development” you activate the options
- .NET Extensibility
 - ASP.NET
 - ISAPI Extensions
 - ISAPI filters

Figure 4-12



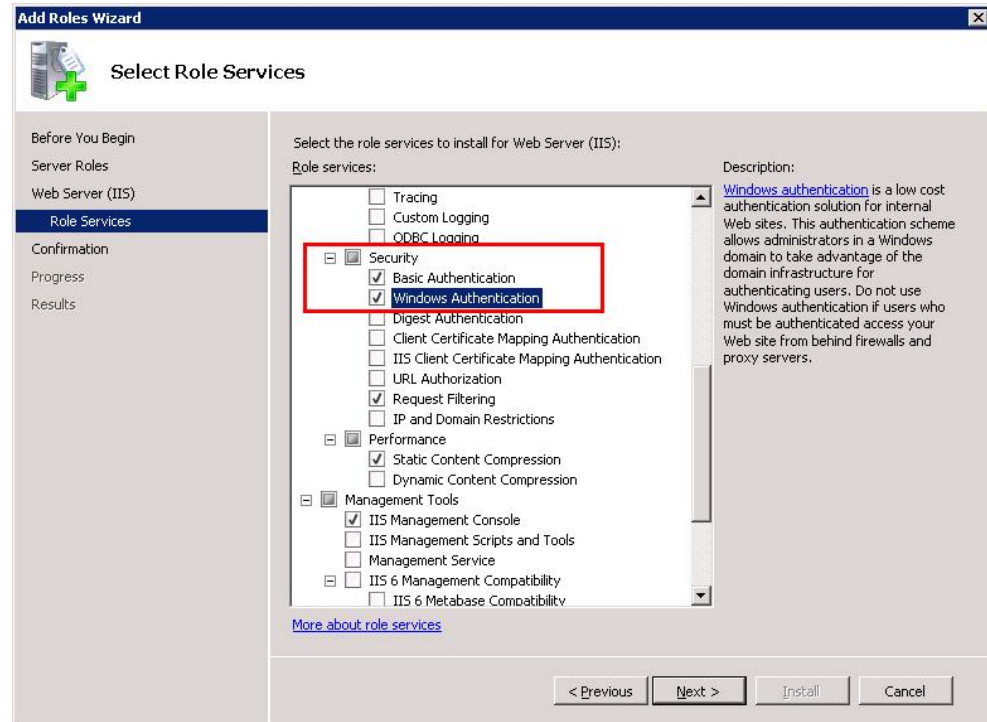
4 Installation of the Information Server

4.2 Installing the Internet Information Server (IIS)

6. In “Web Server(IIS) > Role Services > Security” you activate the options

- Basic Authentication
- Windows Authentication

Figure 4-13



7. Click on the “Next” button.

8. Click on the “Install” button.

Result

The Internet Information Service (IIS) is installed.

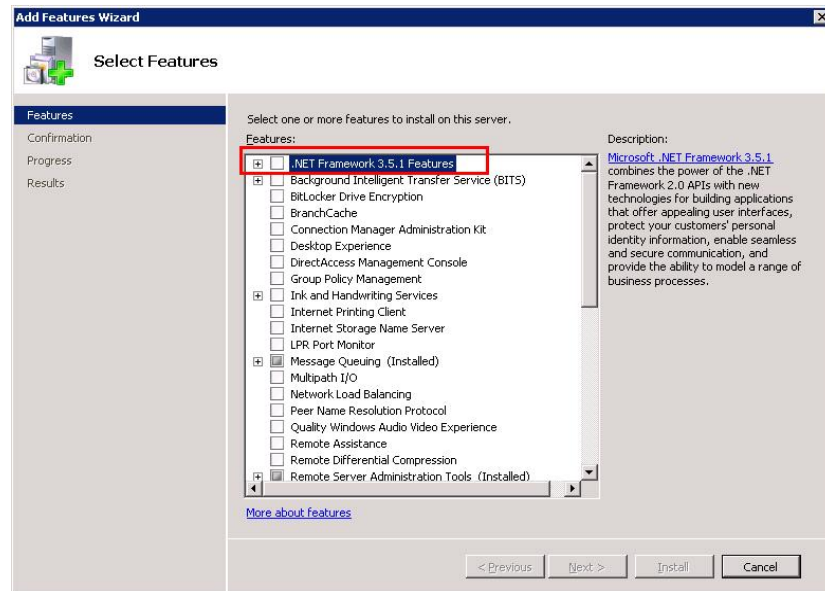
4 Installation of the Information Server

4.2 Installing the Internet Information Server (IIS)

Installation of DotNet Framework 3.5 for Windows Server 2008 R2 SP1

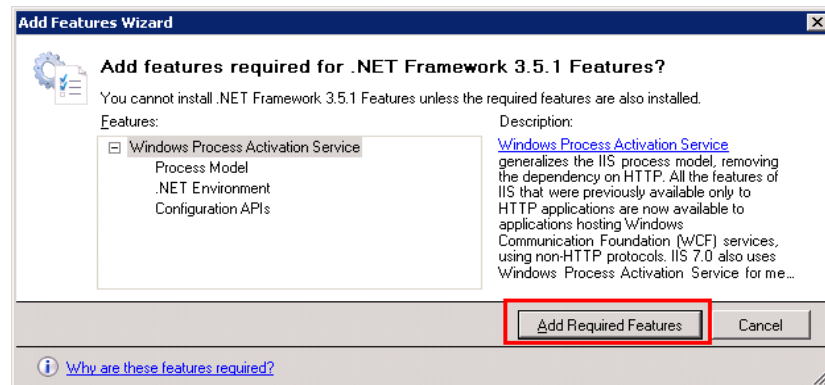
1. Select "Start > Administrative Tools > Server Manager".
2. Use the right mouse button to click on menu item "Features" and select the "Add Features" command in the context menu.
3. Activate the .Net Framework 3.5.1 option.

Figure 4-14



4. Click on the "Add Required Features" button:

Figure 4-15



5. Click on the "Next" button.
6. Click on the "Install" button.

Result

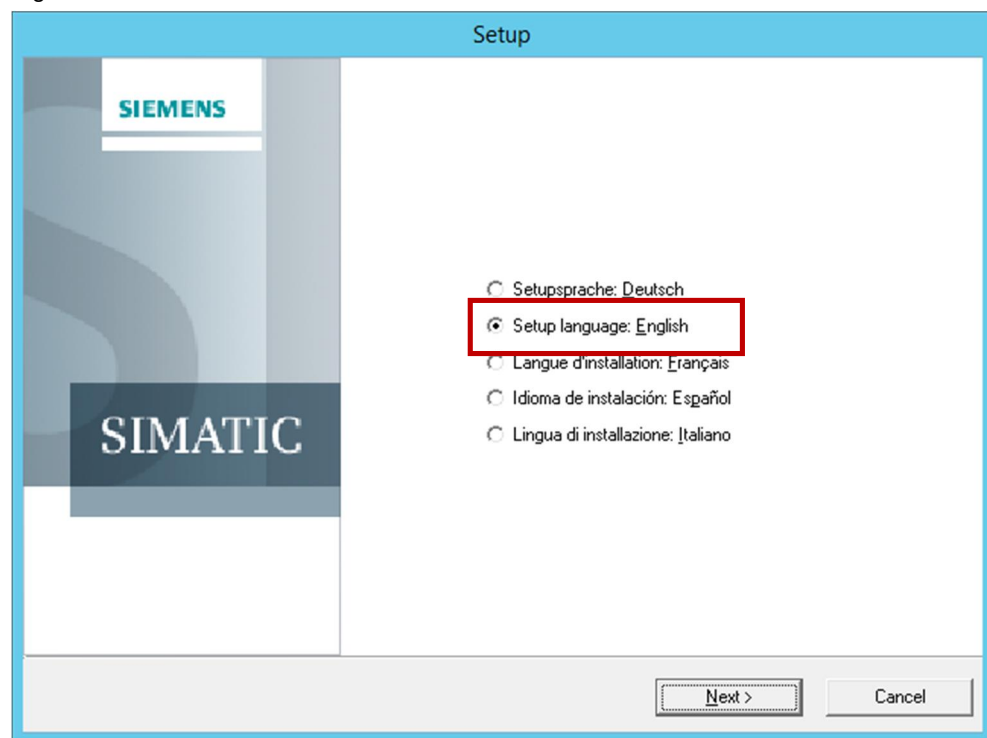
DotNetFramework 3.5.1 installed.

4.3 Installation of the Information Server

Note The computer name of the IS mustn't be "INFSERVER", since that name has already been assigned to the SQL server instance and a double-assignment might cause functional failure.

1. Insert the installation CD and start the setup program for Process Historian and Information Server. The installation CD is started automatically if your system is configured accordingly.
2. Select the language for the installation and then click on the "Next" button.

Figure 4-16



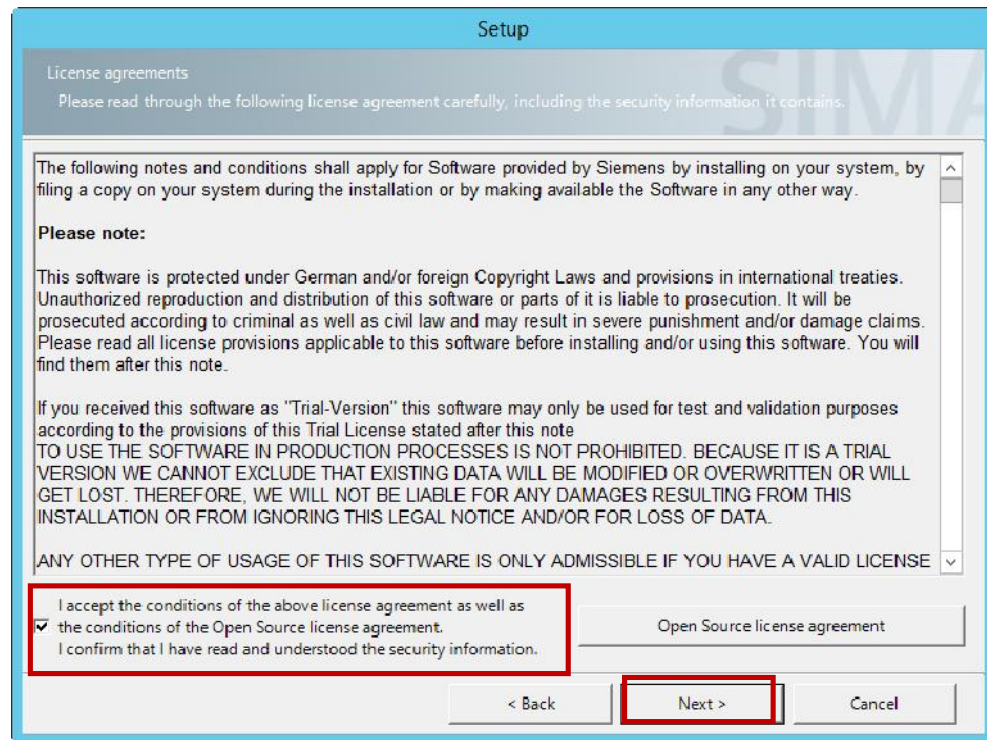
3. In the "Welcome" screen you click on the "Next" button.
4. Read the Product notes and then click on "Next" again.

4 Installation of the Information Server

4.3 Installation of the Information Server

5. Accept the setup agreements. Click on the "Next" button.

Figure 4-17

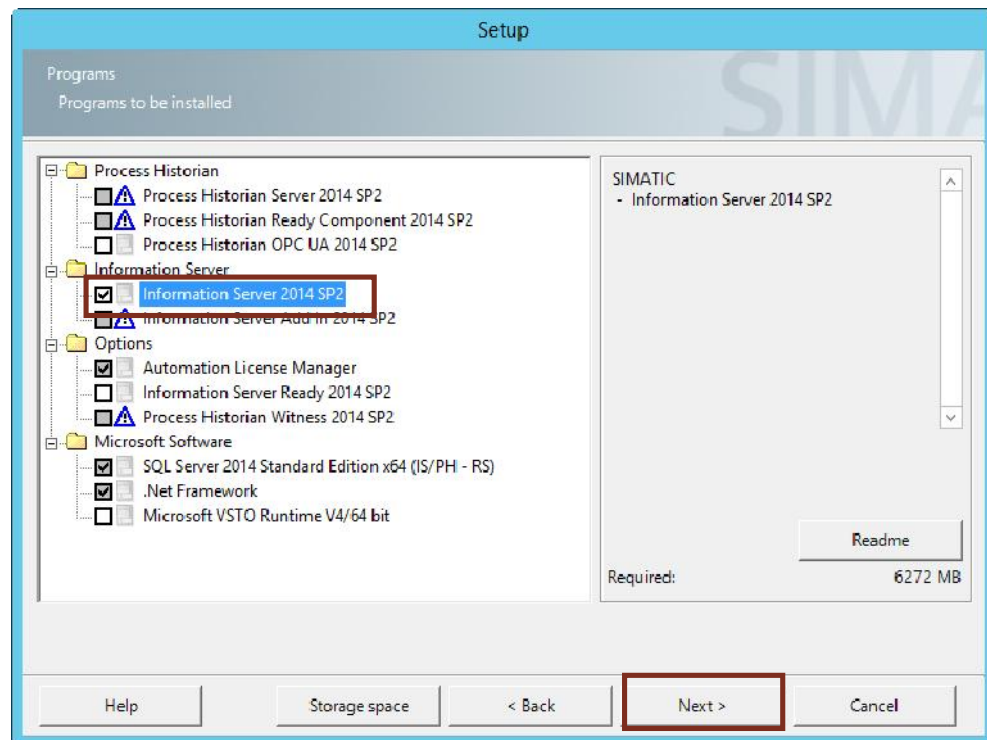


4 Installation of the Information Server

4.3 Installation of the Information Server

6. Select the program package “Information Server 2014 SP2”. Then click on the “Next” button.

Figure 4-18

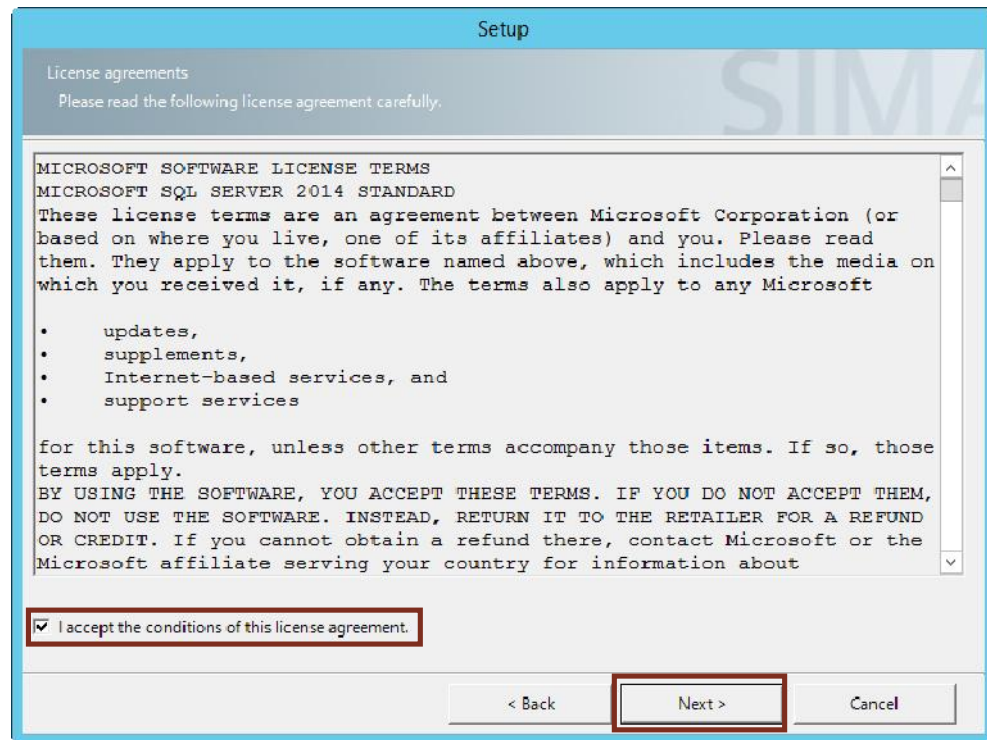


4 Installation of the Information Server

4.3 Installation of the Information Server

1. Accept the SQL license. Click on the "Next" button.

Figure 4-19

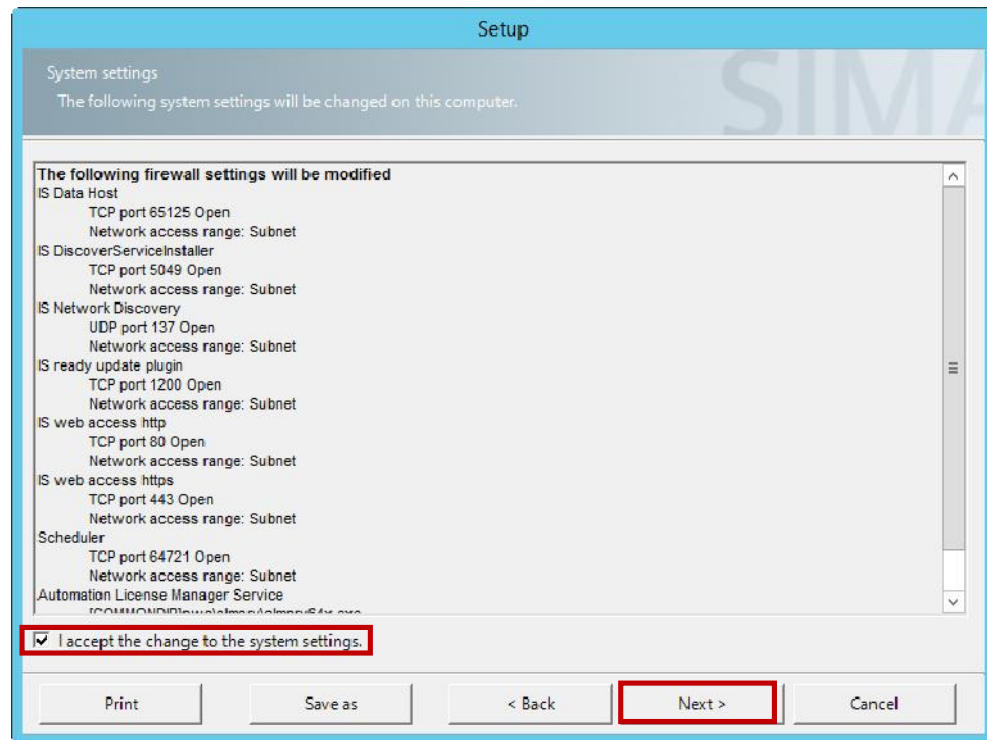


4 Installation of the Information Server

4.3 Installation of the Information Server

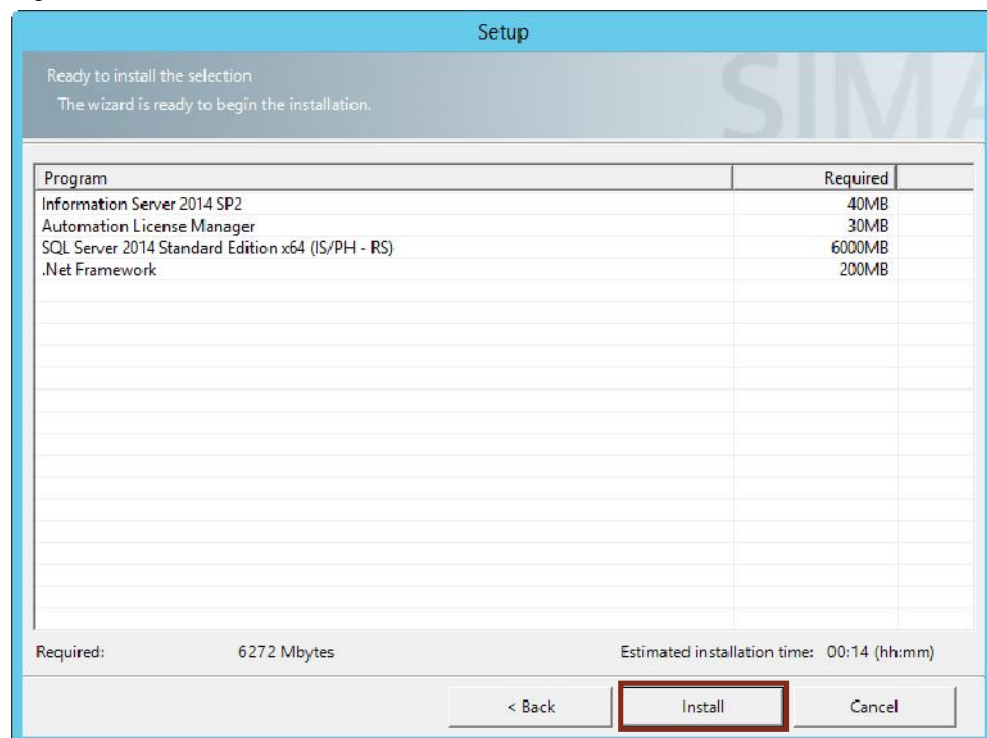
2. Accept the setup modifications. Click on the “Next” button.

Figure 4-20



3. Click on the “Install” button to start the installation.

Figure 4-21

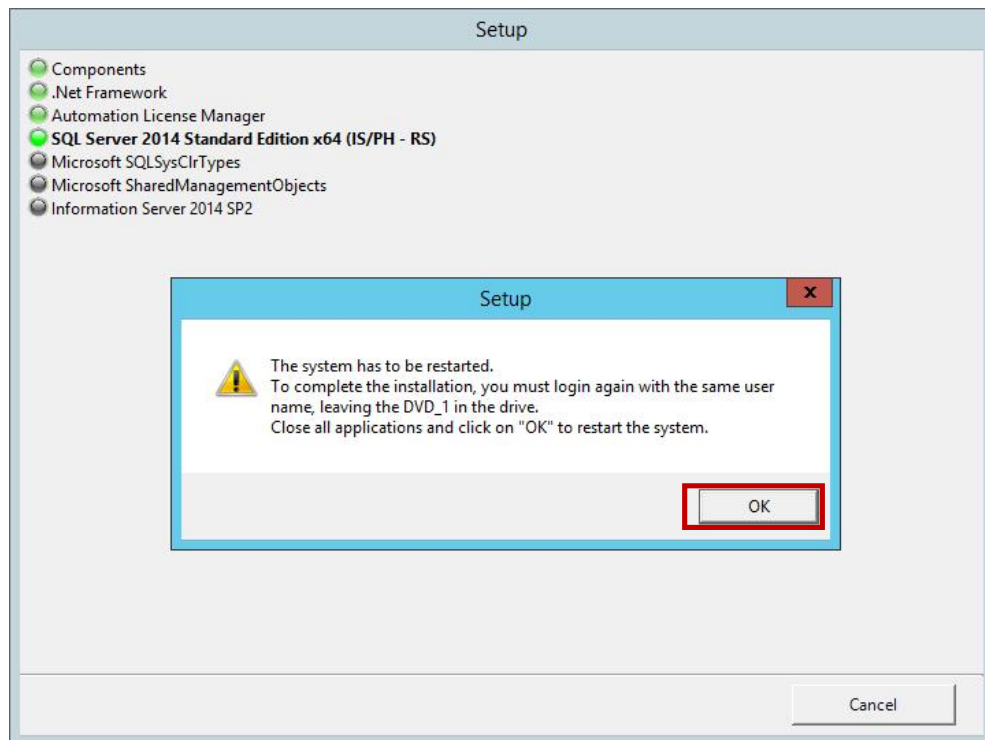


4 Installation of the Information Server

4.3 Installation of the Information Server

4. Click on the "OK" button for a reboot. The installation is continued automatically afterwards.

Figure 4-22

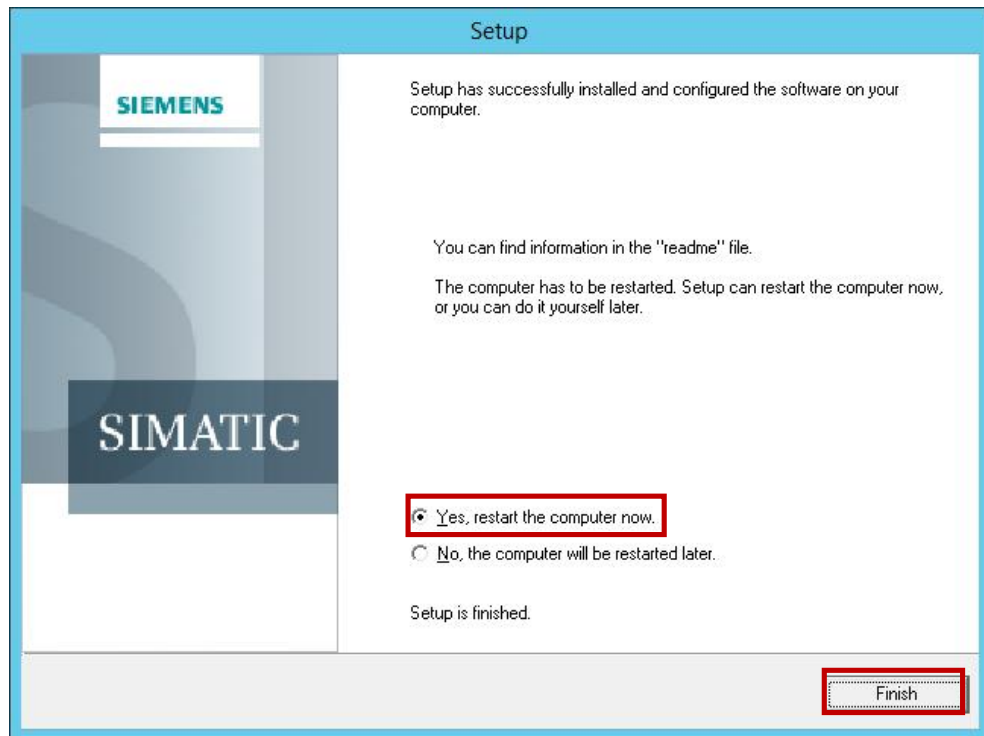


4 Installation of the Information Server

4.3 Installation of the Information Server

5. Click on "Finish" to complete the installation process and to restart the system.

Figure 4-23



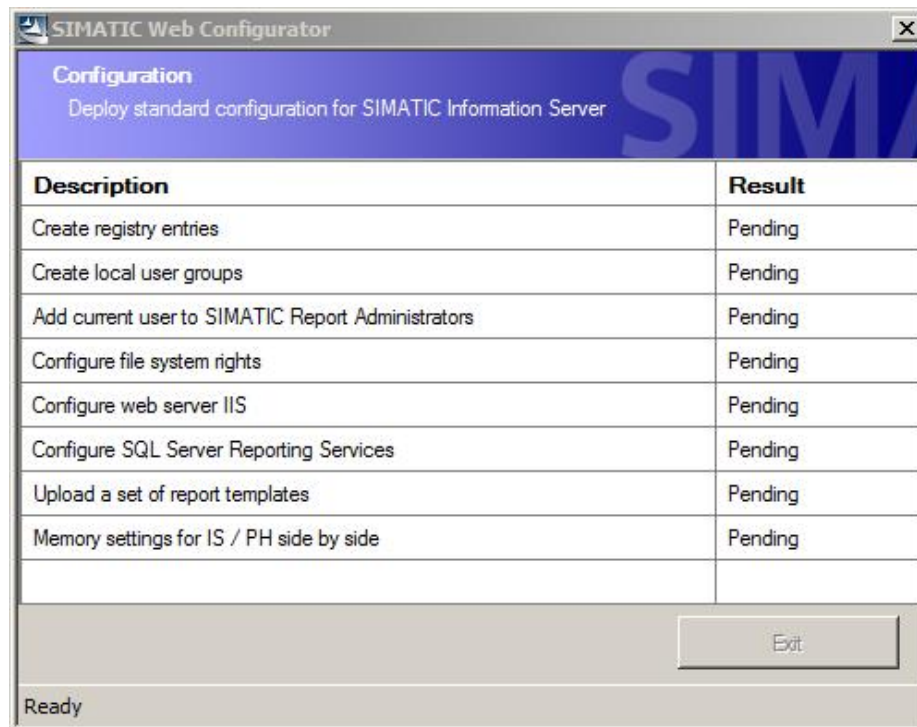
Result

The Information Server has been installed.

4.4 Configuration of the IS web page

The Configuration Manager is automatically started and run at the first restart after the installation of the Information Server. During the automatically performed configuration, a dialog is displayed in which you specify how the Information Server shall be started. You can specify whether the Information Server is called as a new website or as a virtual directory. The Configuration Manager then makes all necessary settings for the operation of the Information Server. You need to restart the PC once the installation of the Configuration Manager is complete.

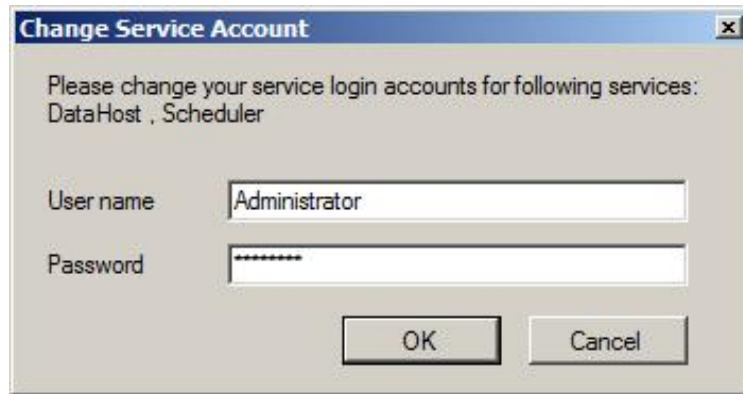
Figure 4-24



4.4 Configuration of the IS web page

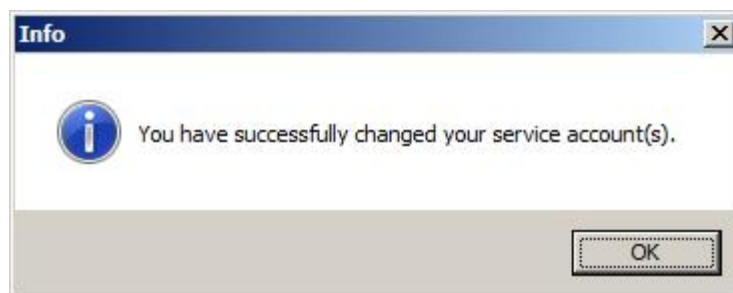
6. Enter the user name and password for DataHost Scheduler. Use the user name and the password of the administrator who installed the IS. Click on the "OK" button:

Figure 4-25



7. Click on the "OK" button:

Figure 4-26

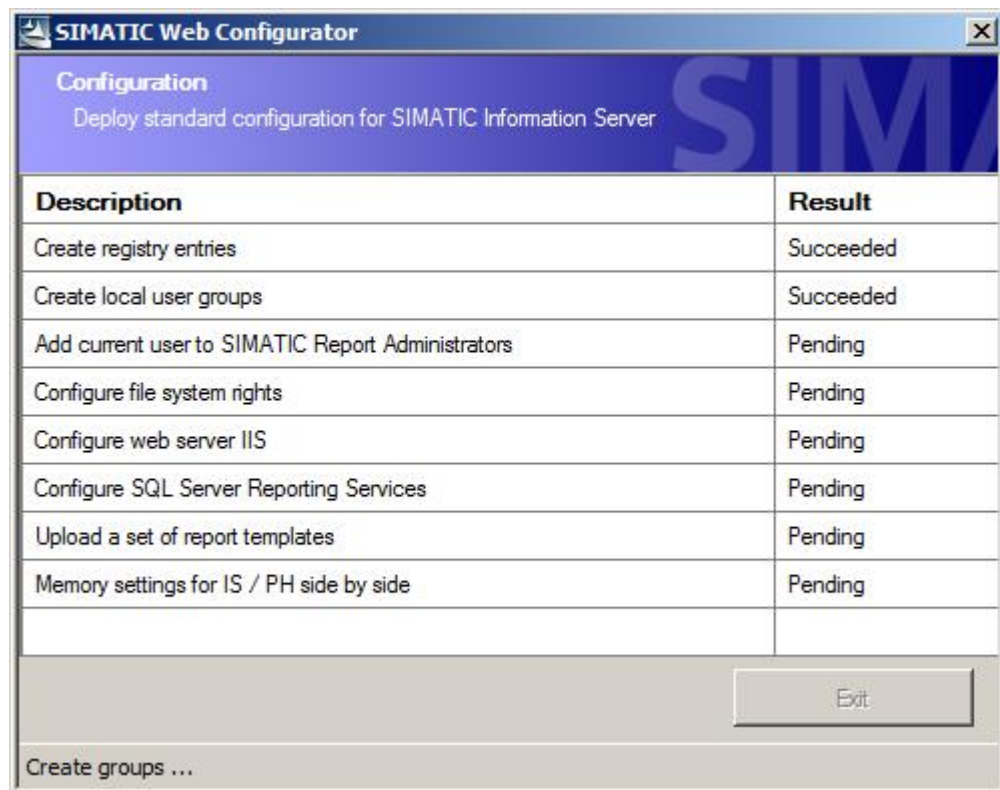


4 Installation of the Information Server

4.4 Configuration of the IS web page

1. The IS Web Configurator starts with the configuration of the IS.

Figure 4-27

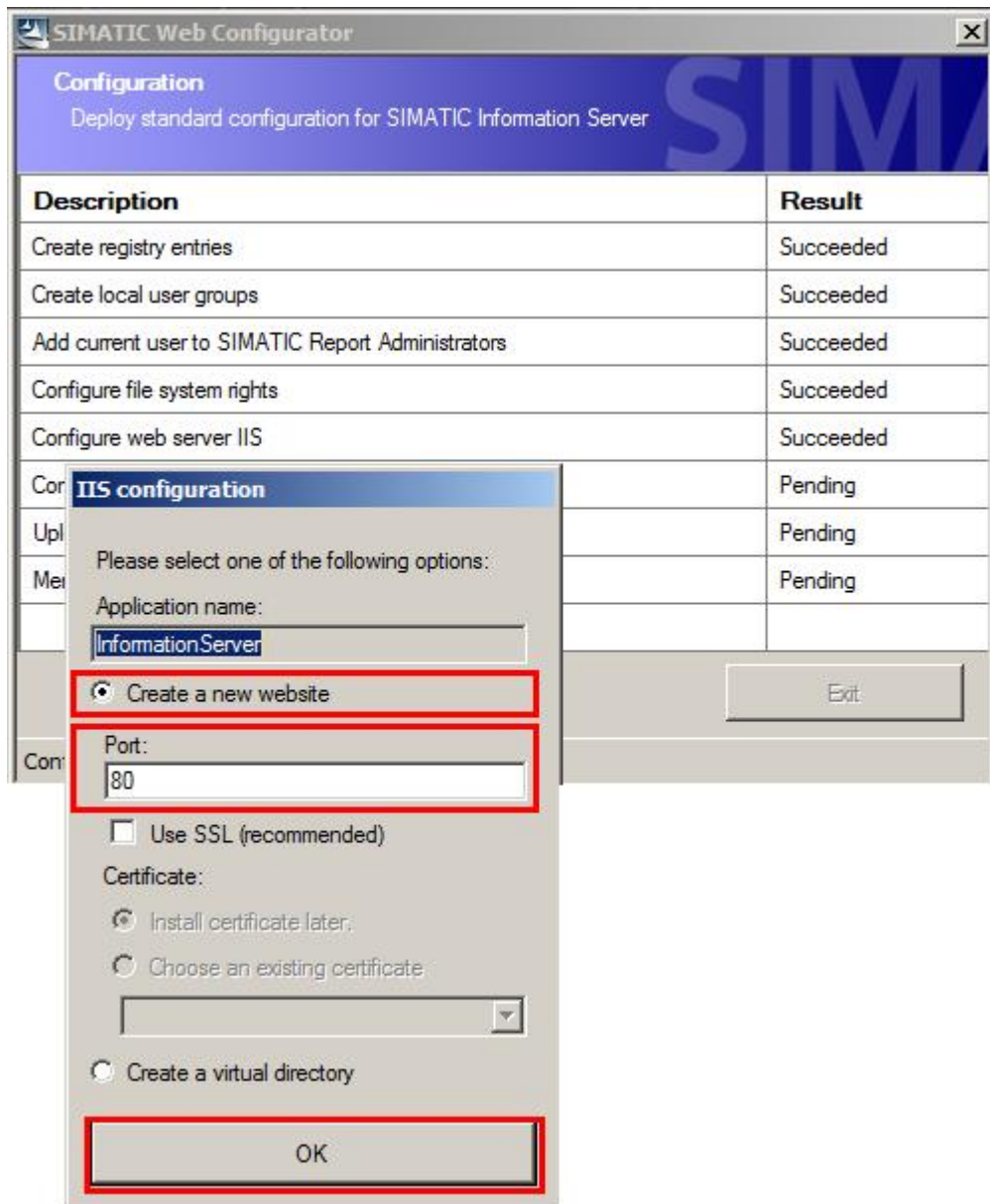


4 Installation of the Information Server

4.4 Configuration of the IS web page

2. In the step IIS configuration "Create a new website", you select port 80 and click on the "OK" button.

Figure 4-28

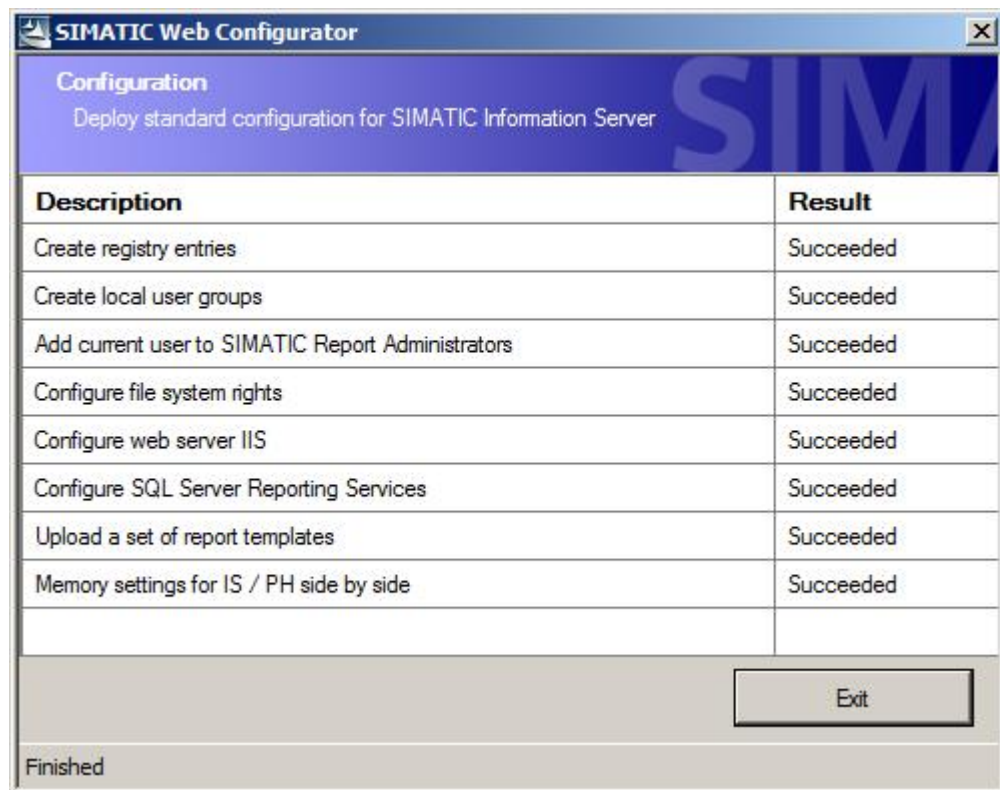


4 Installation of the Information Server

4.4 Configuration of the IS web page

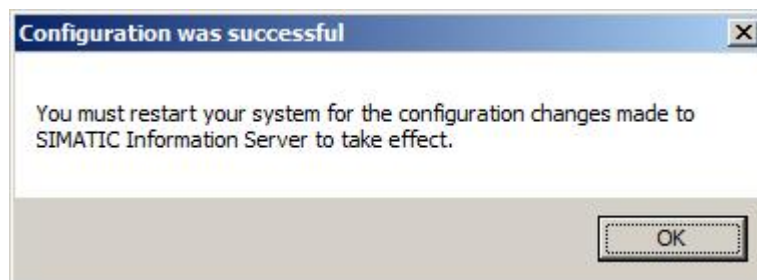
3. Wait until all points have been marked as "Succeeded".

Figure 4-29



4. Click on the "OK" button and then restart the computer.

Figure 4-30



4 Installation of the Information Server

4.4 Configuration of the IS web page

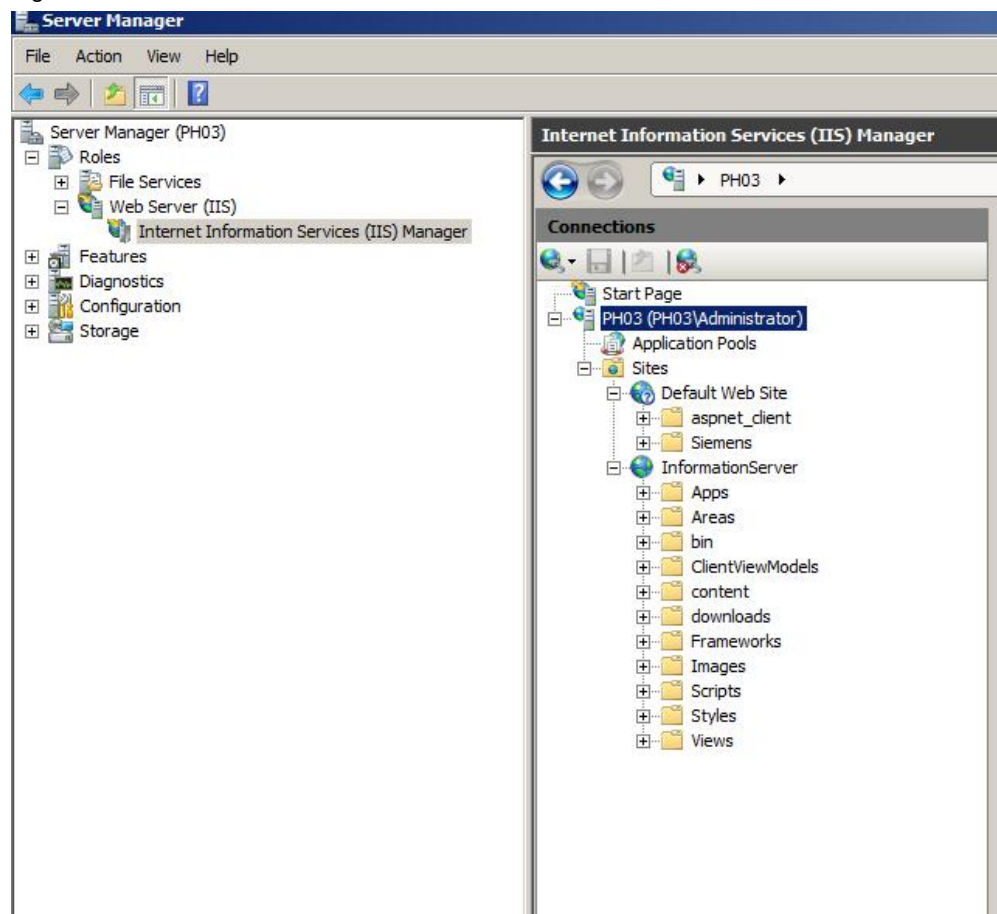
Result

Information Server website created.

Note

In the dialog you check whether all actions have been performed successfully. If not, the web page was has not been generated correctly, and you need to restart the Configuration Wizard. The procedure is described in chapter "Troubleshooting".

Figure 4-31



4.5 Settings for the IS in Internet Explorer 11

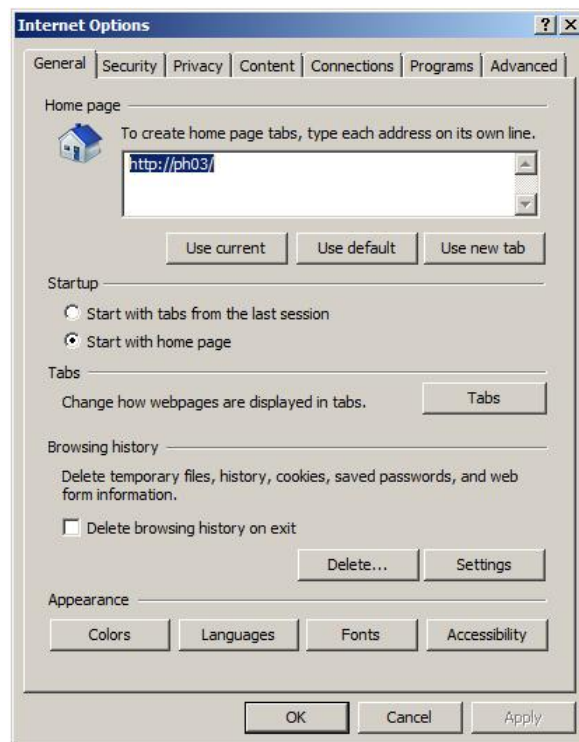
Note

For the Information Server and the web-based Information Server client, Internet Explorer 11 is a system requirement.

Procedure

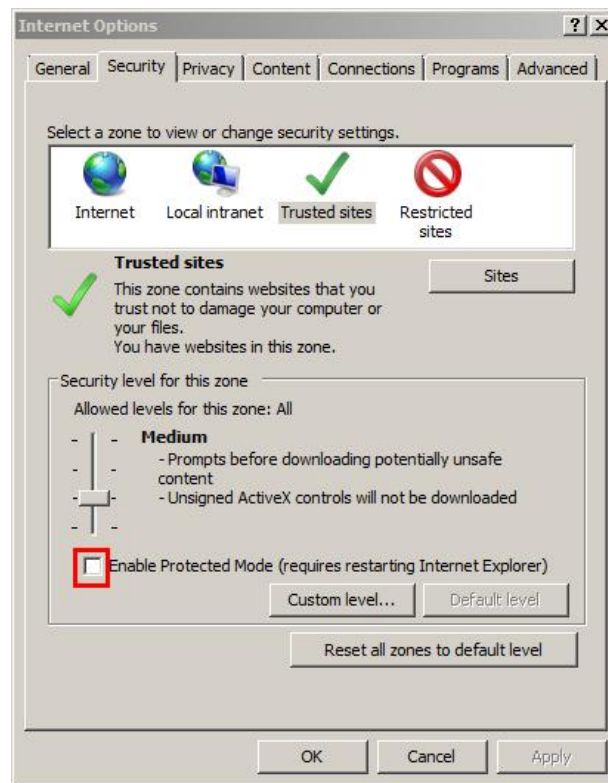
1. Open MS Internet Explorer 11 as Administrator. Use the right mouse-button to click on the Internet Explorer icon and select "Run as Administrator".
2. Select "Tools > Internet Options".
3. In the "General" tab you enter the homepage "http://<computer name>". (setting, if the web application of the IS has **not** been created as a virtual directory).

Figure 4-32



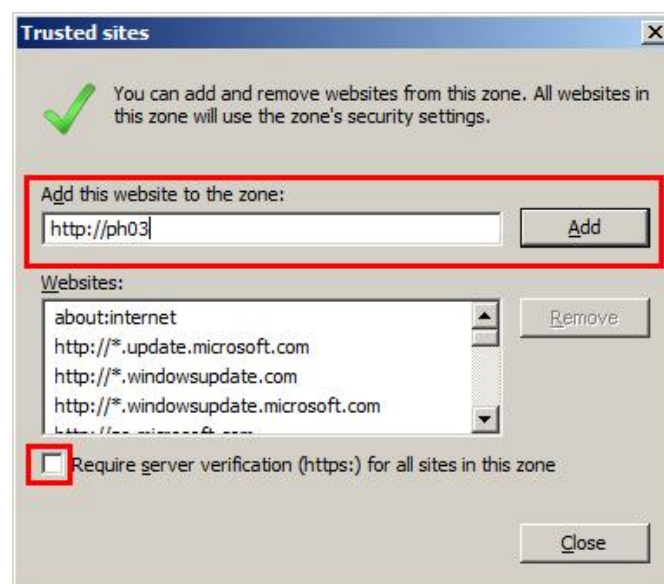
4. Select the "Security" tab.

Figure 4-33



5. "Enable Protected Mode" option must not be active.
6. Click on "Trusted sites".
7. Click on the "Sites" button.
8. Use the "Add" button to add the `http://<computer name>` website to the trusted sites.

Figure 4-34

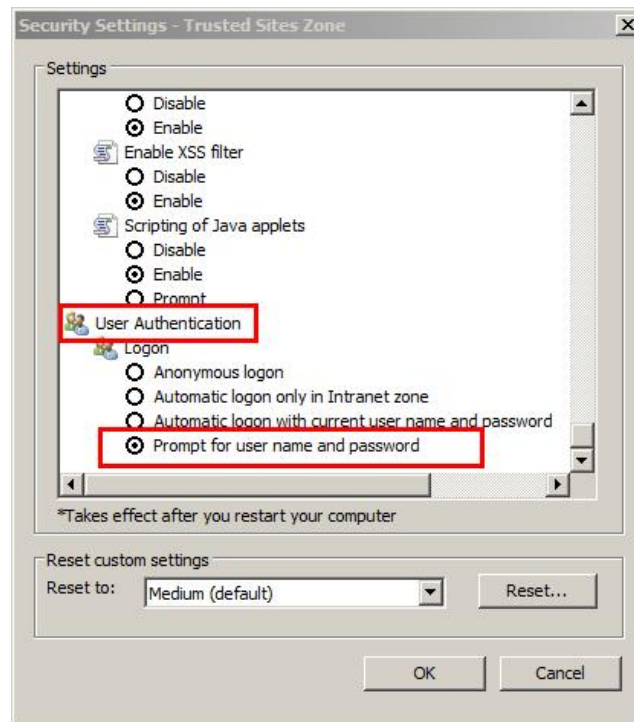


4 Installation of the Information Server

4.5 Settings for the IS in Internet Explorer 11

9. In the “Security” tab you click on “Custom level”. Activate the “Automatic logon with current user name and password” option for the trusted sites.

Figure 4-35

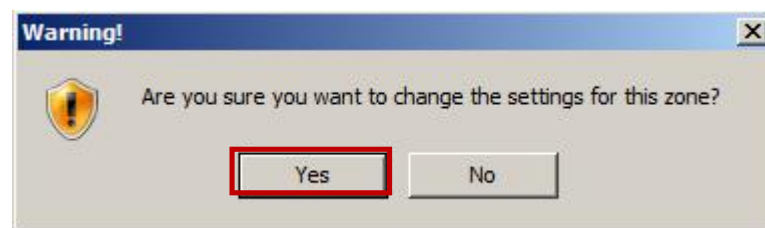


Note

The first commissioning, the “Automatic logon with current user name and password” setting is necessary.

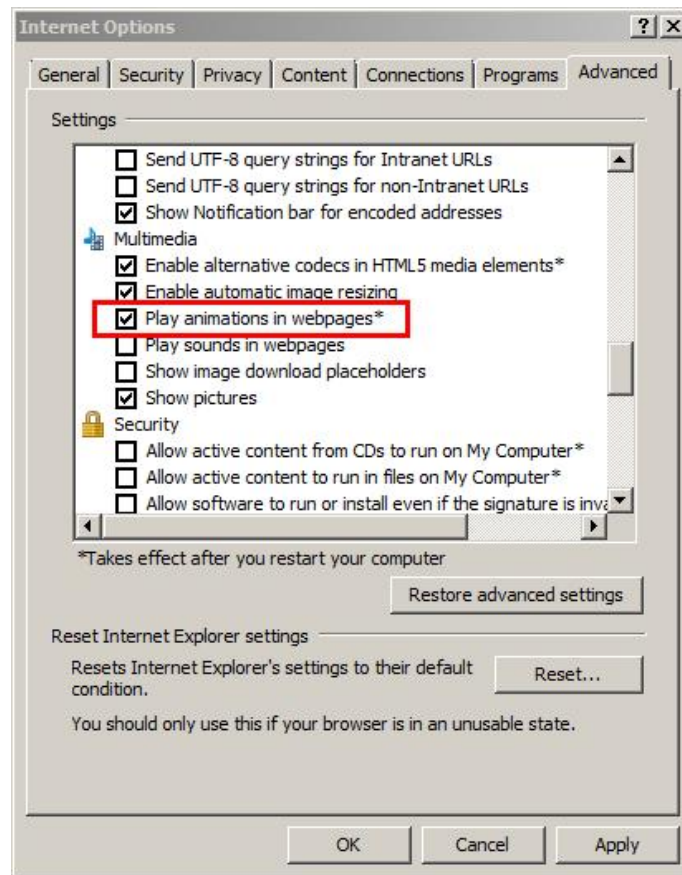
10. Then click on the “OK” button.
11. Click on the “Yes” button.

Figure 4-36



12. Select the “Advanced” tab, and activate the option “Multimedia” and option “Play animations in webpages” below.

Figure 4-37

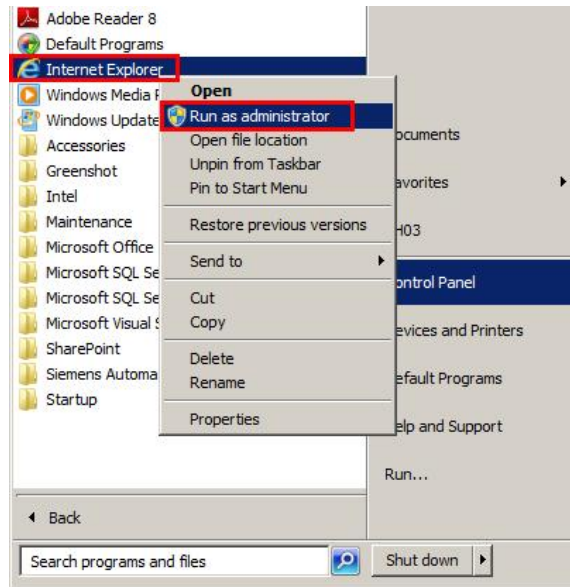


13. Click on the “Apply” button.
14. Click on the “OK” button.

4.5.1 Internet Explorer 11 Information Server Installation

1. Open the Internet Explorer as Administrator.

Figure 4-38



2. Enter http://localhost as URL.

Figure 4-39

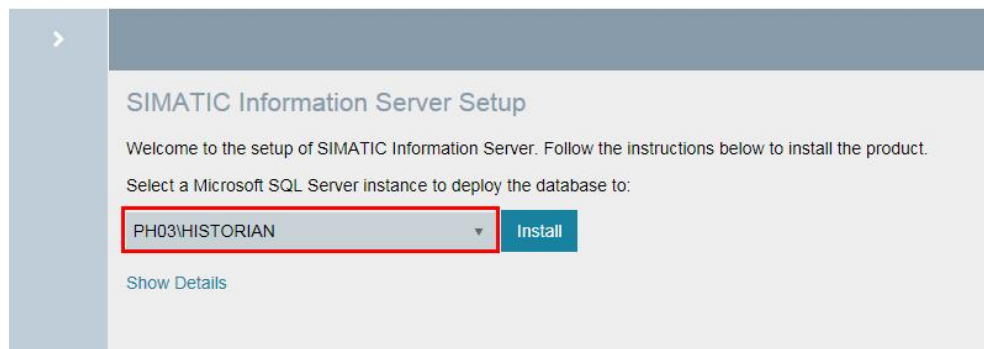


3. Select the IS <computer\SQL server instance>.

Figure 4-40



SIEMENS SIMATIC Information Server

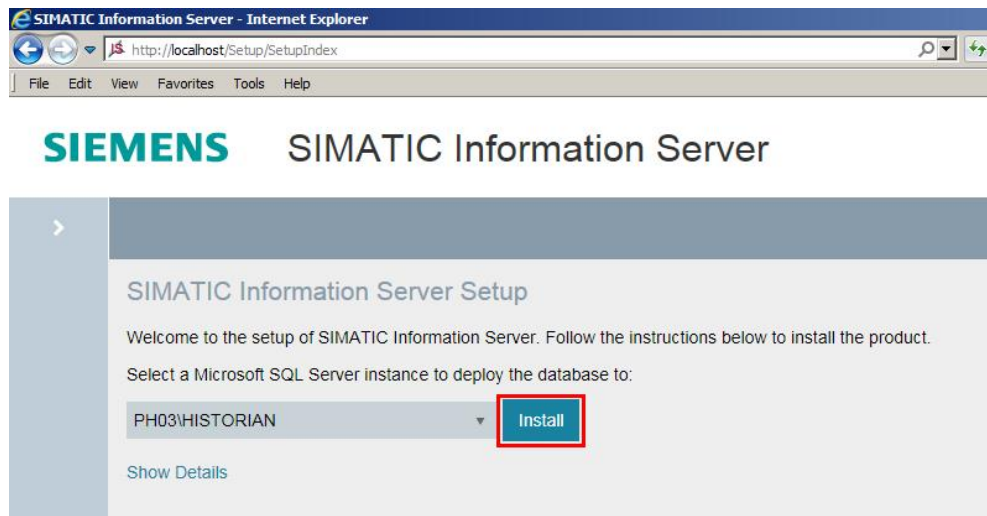


4 Installation of the Information Server

4.5 Settings for the IS in Internet Explorer 11

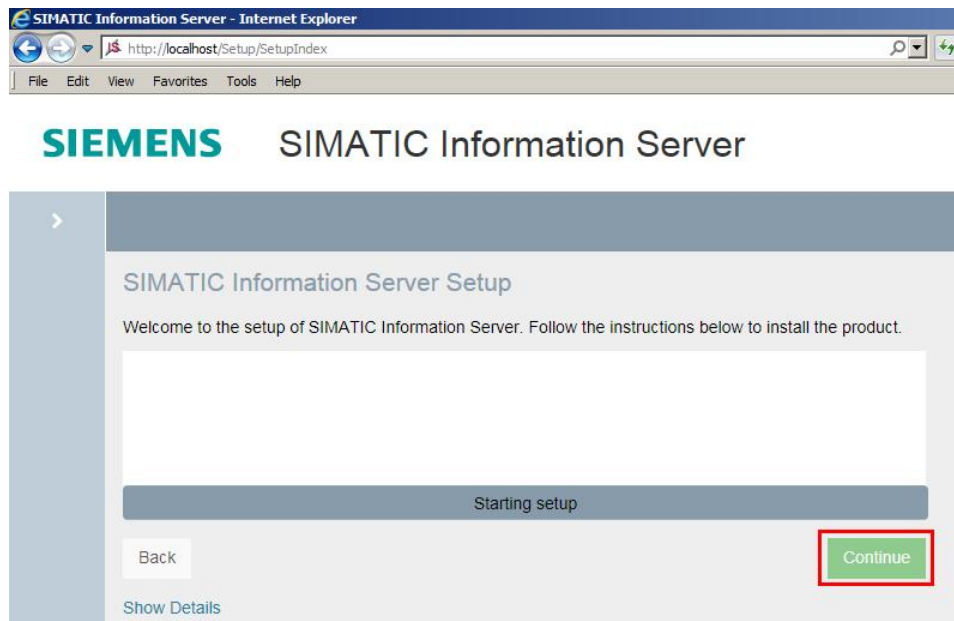
4. The Internet Explorer IS setup is started. Click on the “Install” button.

Figure 4-41



5. Click on the “Continue” button.

Figure 4-42



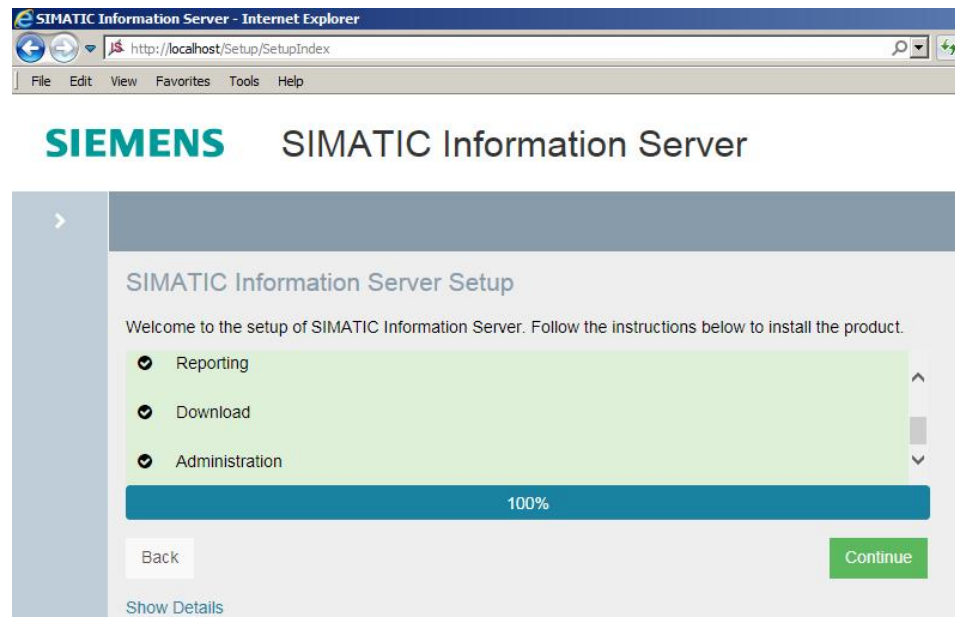
4 Installation of the Information Server

4.5 Settings for the IS in Internet Explorer 11

Result

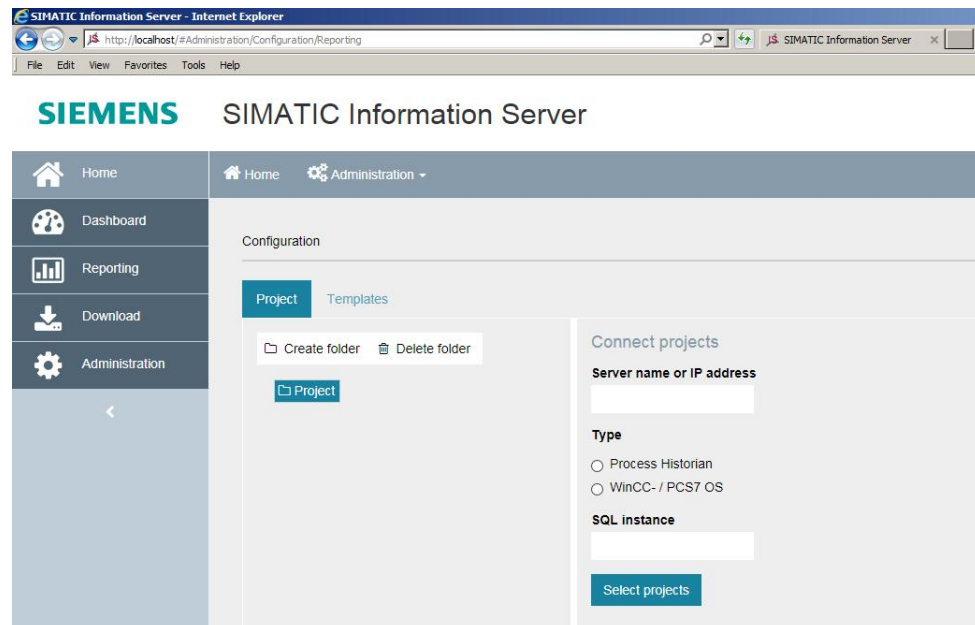
The setup was successfully terminated.

Figure 4-43



Click on the “Continue” button. The IS is now ready for adding a data source. Click on the “Administration> Reporting” button.

Figure 4-44

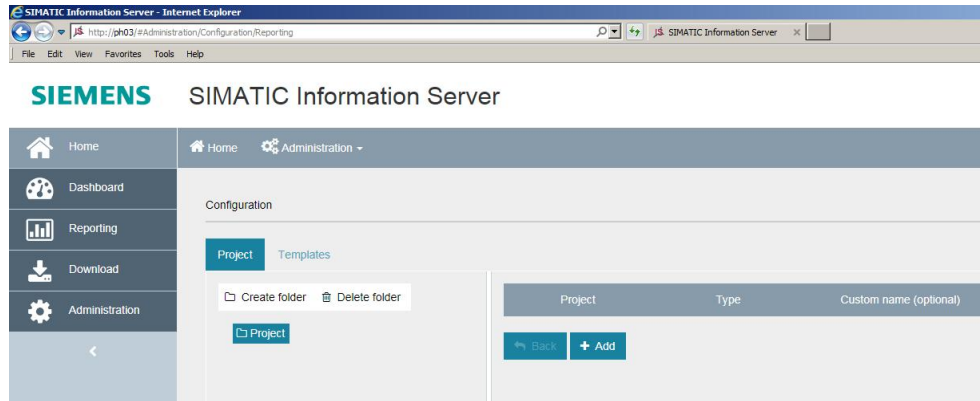


4 Installation of the Information Server

4.5 Settings for the IS in Internet Explorer 11

To connect a Process Historian project with the Information Server, the Process Historian must have received data from a WinCC system. Otherwise, the list of projects will be empty.

Figure 4-45



4.6 Installing an MS Office IS client

Prerequisite

A suitable Microsoft Office version of Word, Power Point and /or Excel must be installed.

Information Server 2014 supports the following Office versions:

Table 4-2

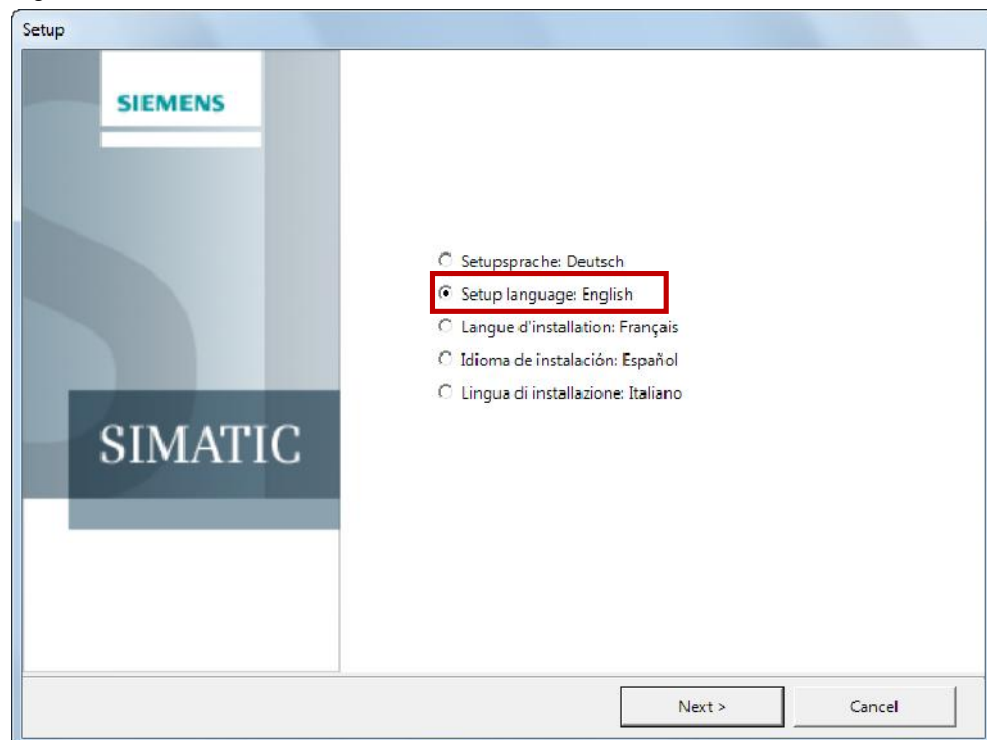
Product	Comments
Microsoft Office 2007 SP2	32 bit
Microsoft Office 2010 SP1	32 bit
Microsoft Office 2013	32 bit

VSTO (Visual Studio Tools for Office) must be installed. This can be found on the DVD of PH / IS

Procedure, installation using the PH and IS DVD

6. Insert the Process Historian and Information Server DVD.
7. Start the setup program.
8. Click on the "Next" button.

Figure 4-46

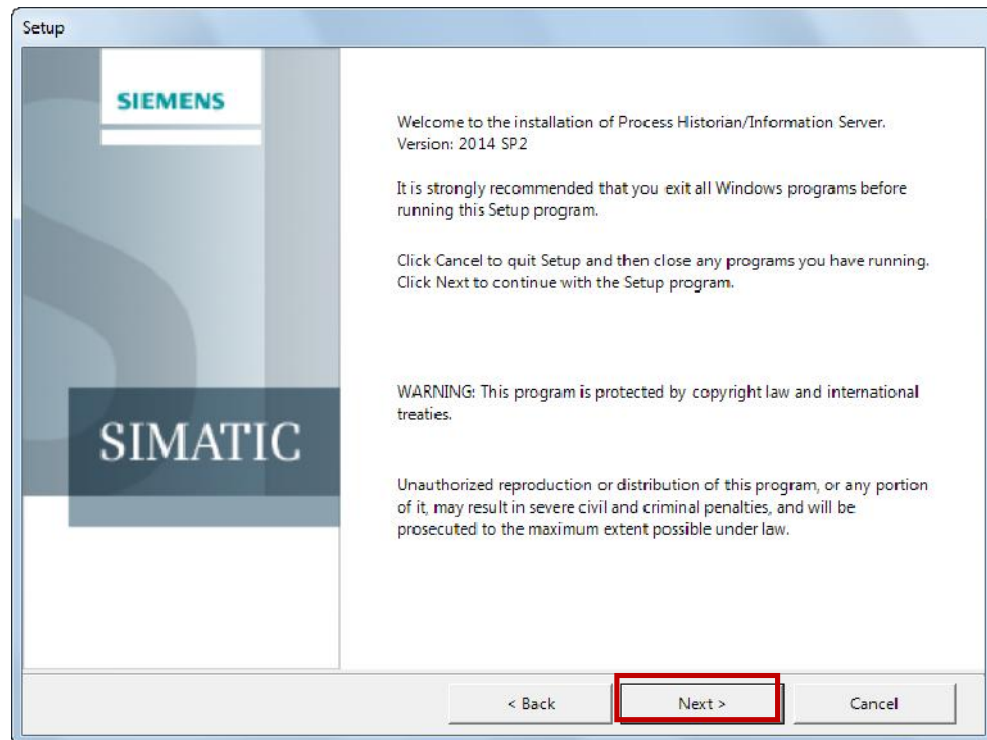


4 Installation of the Information Server

4.6 Installing an MS Office IS client

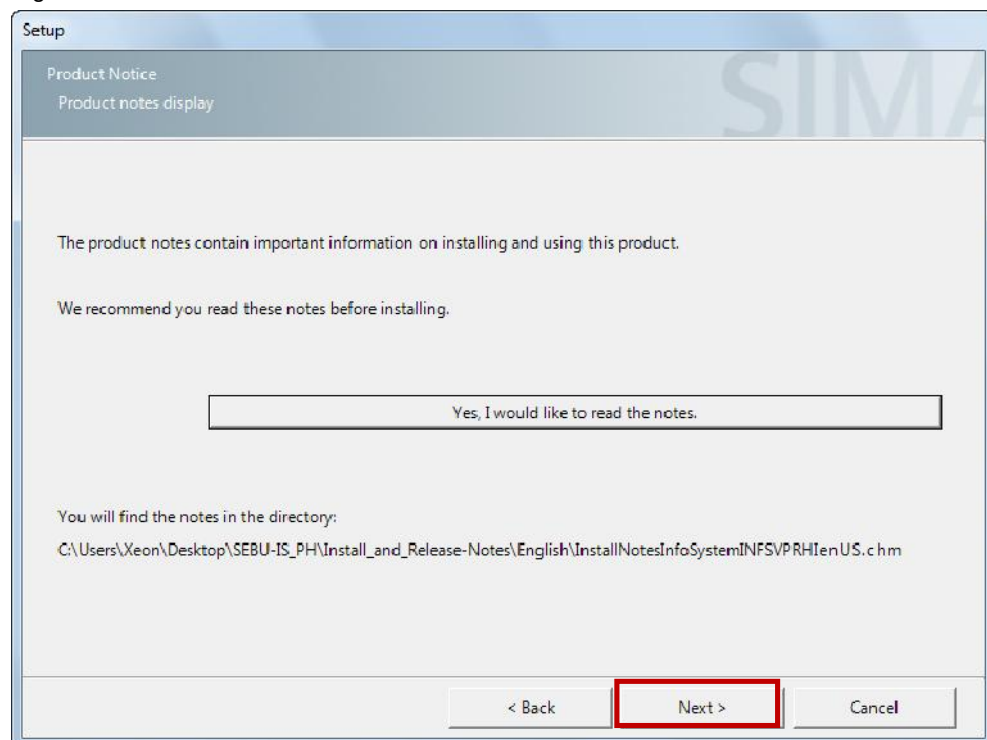
9. Click on the “Next” button.

Figure 4-47



10. Click on the “Next” button.

Figure 4-48

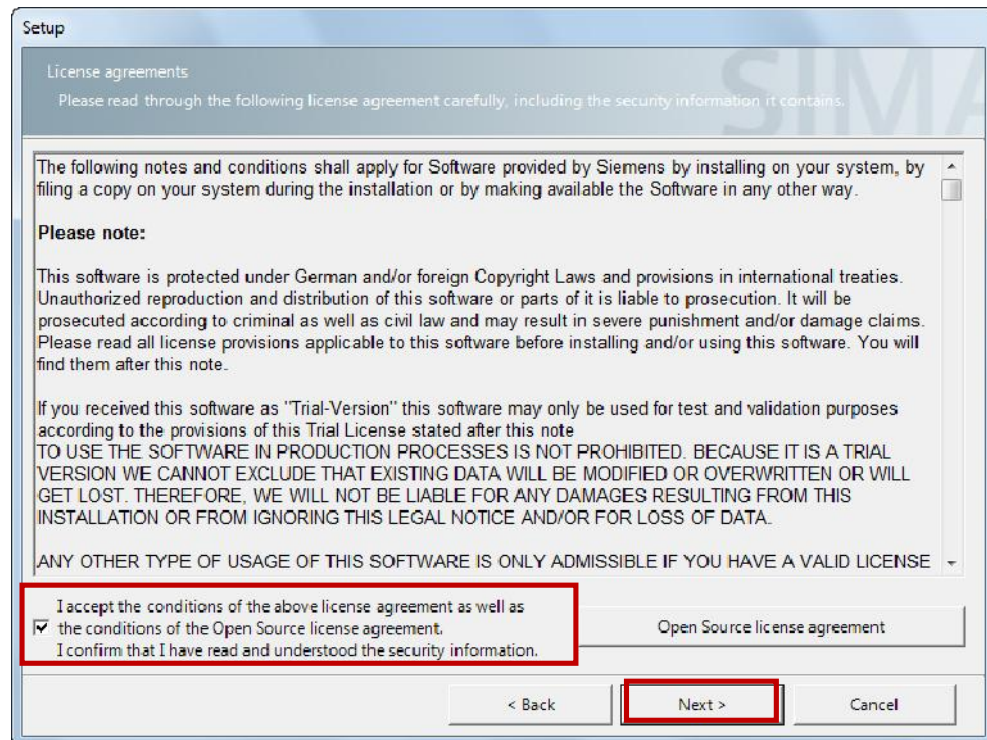


4 Installation of the Information Server

4.6 Installing an MS Office IS client

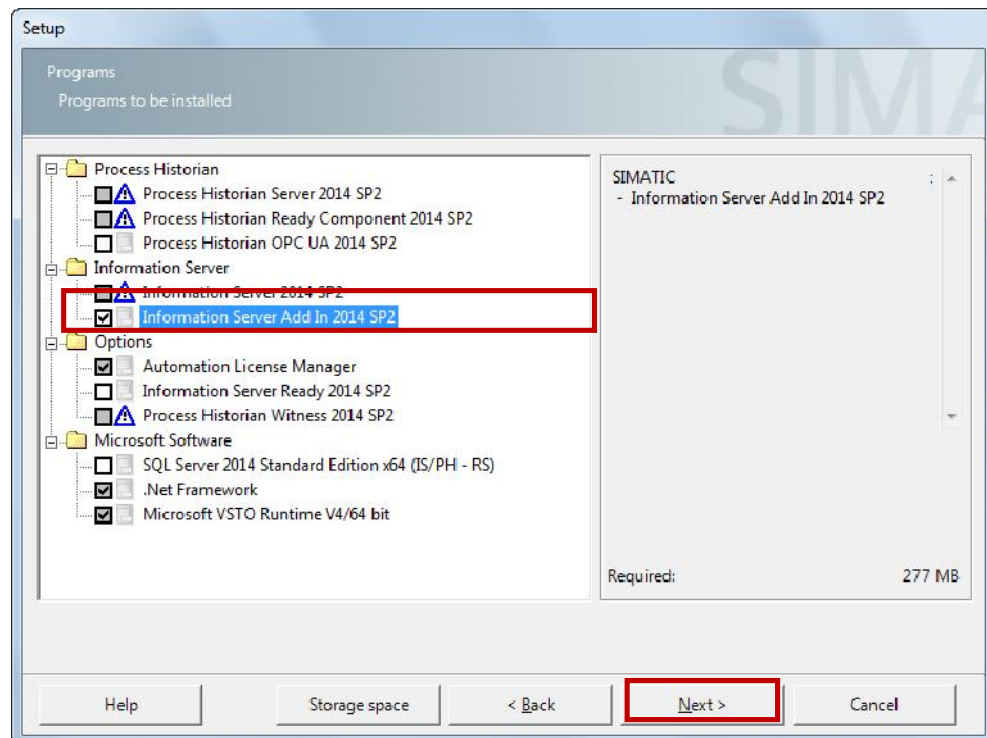
11. Accept the License agreements and click on the “Next” button.

Figure 4-49



12. In “Information Server” you select “Information Server Add In 2014” and click on the “Next” button.

Figure 4-50

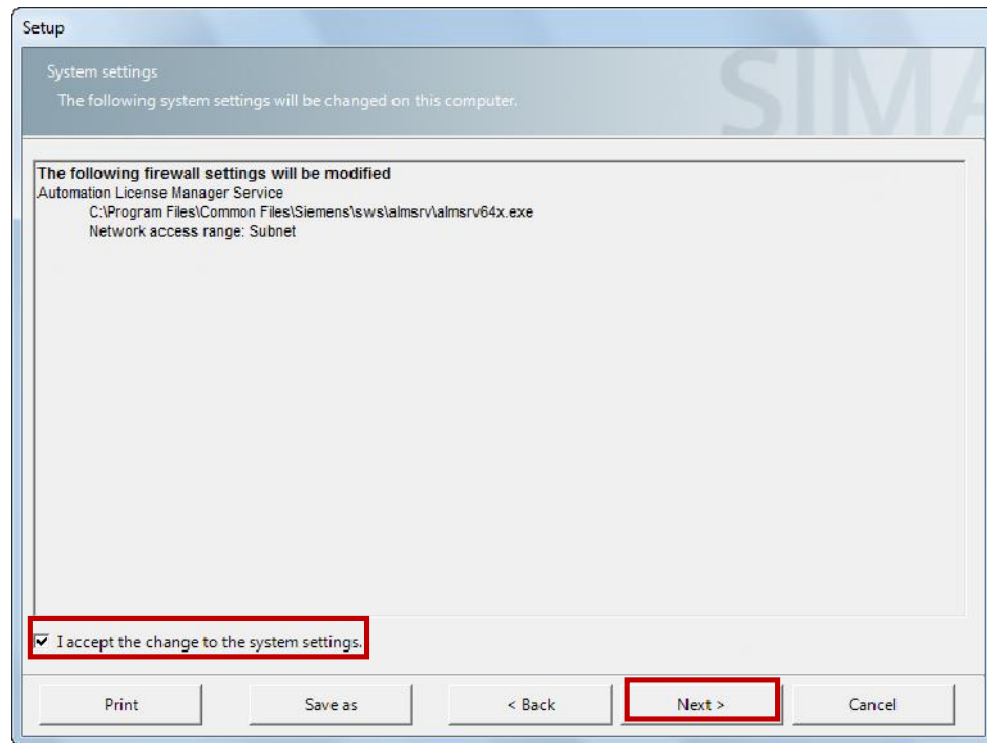


4 Installation of the Information Server

4.6 Installing an MS Office IS client

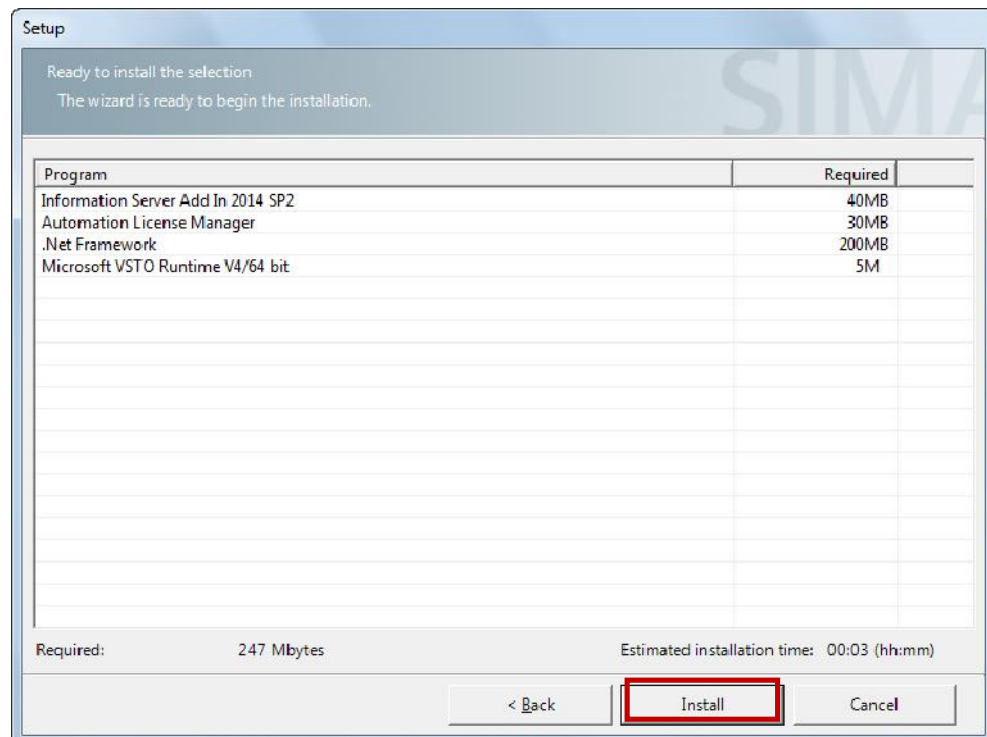
13. Accept the system modification and click on the “Next” button.

Figure 4-51



14. Click on the “Install” button.

Figure 4-52

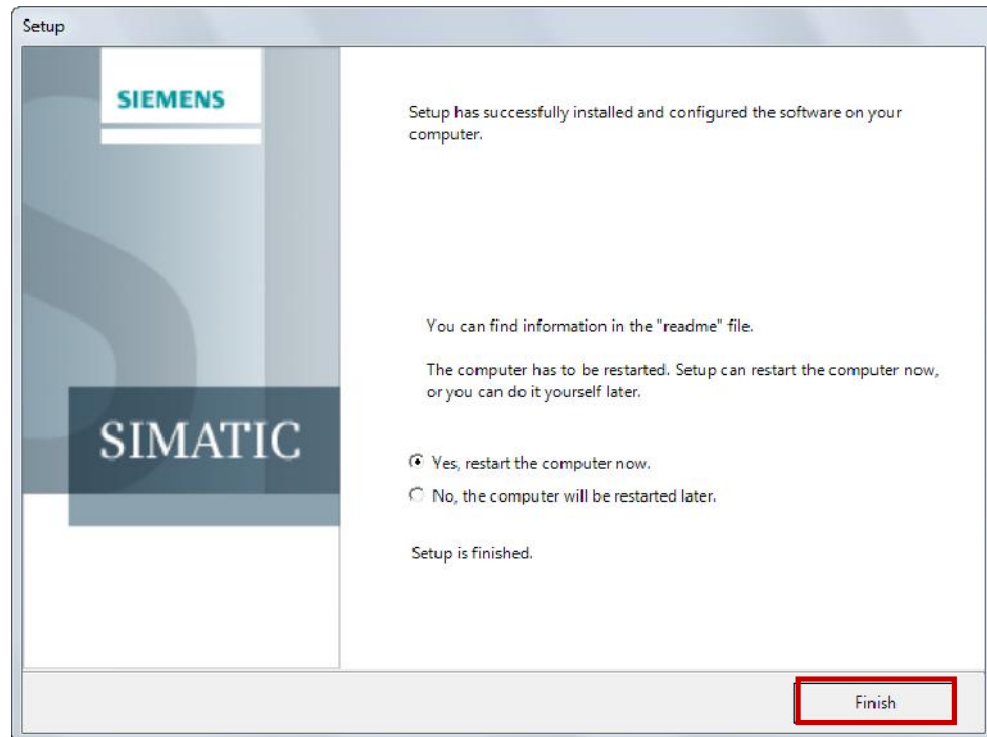


15. Click on the “Finish” button to complete the installation process.

4 Installation of the Information Server

4.6 Installing an MS Office IS client

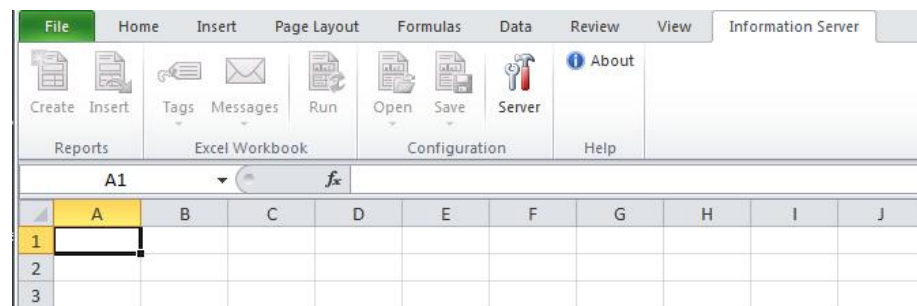
Figure 4-53



Result

The Information Server menu is available, for example, in MS Excel.

Figure 4-54



Procedure, installation using Information Server

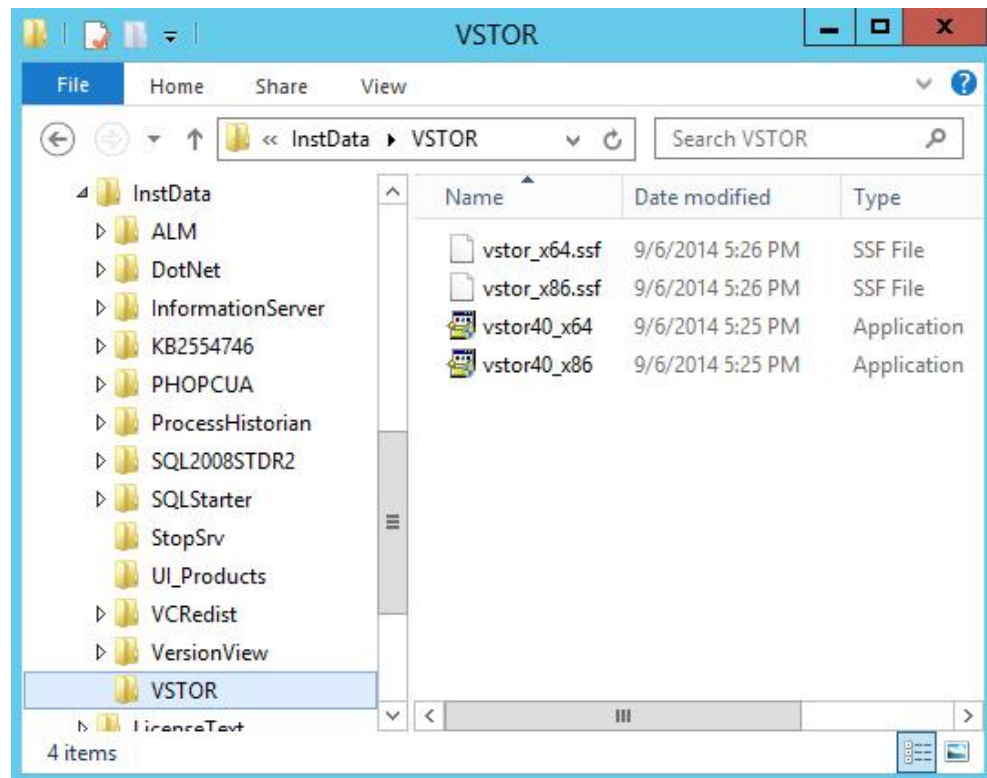
1. Installation of MS Office.
2. Installation of VSTO from the PH and IS DVD.

Two installation variants are available:

- vstor40_x86.exe -> for 32-bit operating system
- vstor40_x64.exe -> for 64-bit operating system

The setup program is available in the folder "<DVD 2/2>:\InstData\VSTOR" on the "PH and IS" DVD.

Figure 4-55

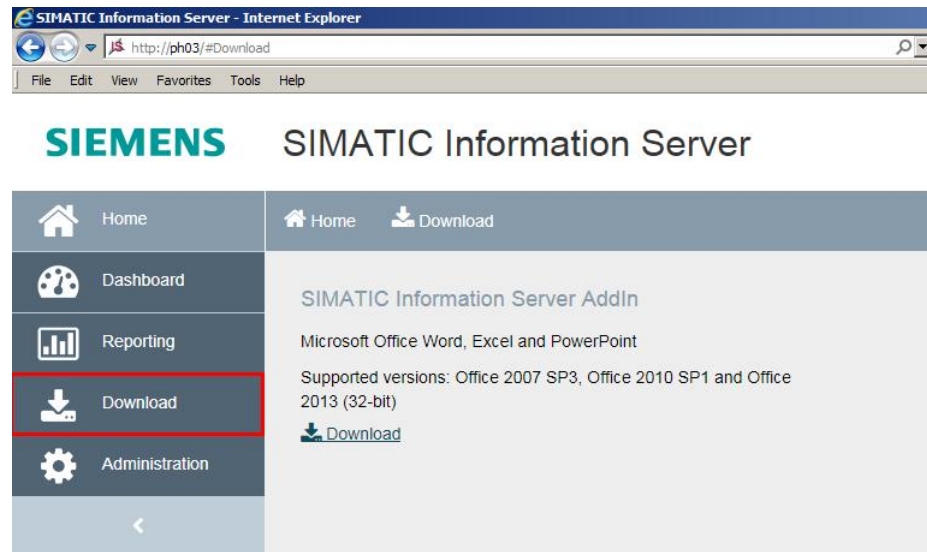


3. Start the installation with a double click on the file and follow the installation instructions.
4. Installation of the MS Office AddIn using Information Server
5. In the IS you open the "Download" menu. Click on the "Download" link.

4 Installation of the Information Server

4.6 Installing an MS Office IS client

Figure 4-56

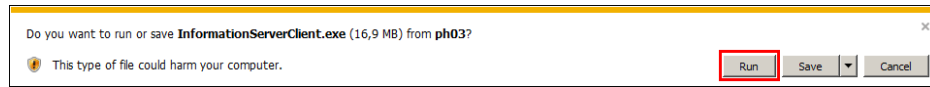


4 Installation of the Information Server

4.6 Installing an MS Office IS client

- Click on the "Run" button and follow the installation instructions.

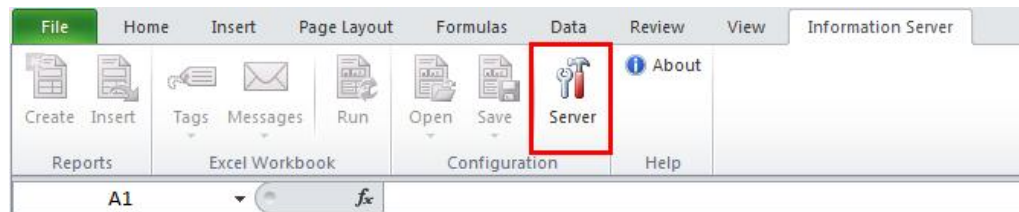
Figure 4-57



Testing the Office AddIn

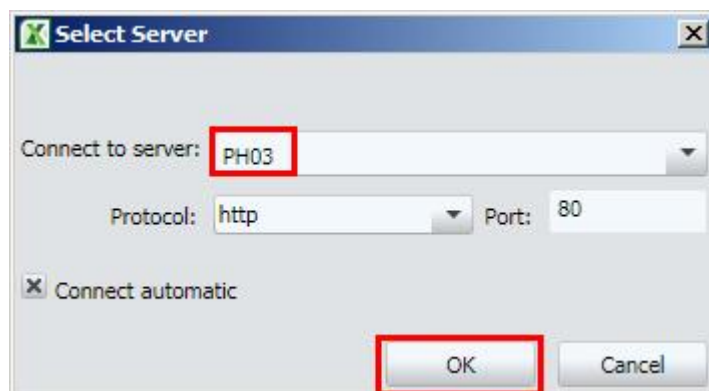
- Open Microsoft Excel.
- Click the "Information Server > Server" menu.

Figure 4-58



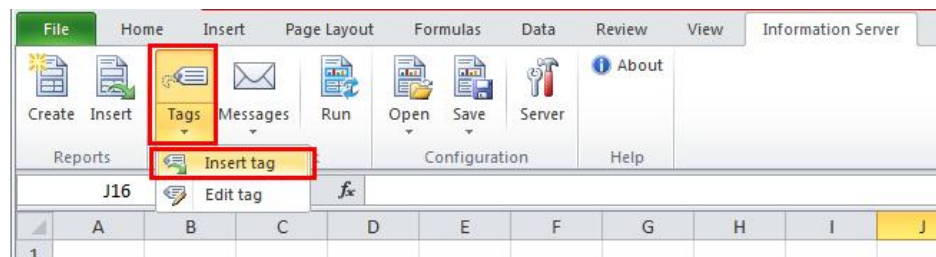
- Enter the computer name of the Information Server and click on OK.

Figure 4-59



- Select the menu path "Tags > Insert tag"

Figure 4-60

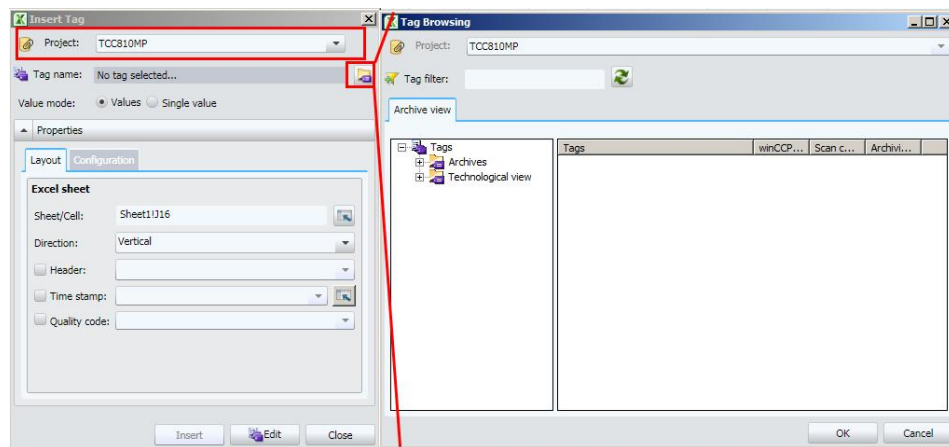


4 Installation of the Information Server

4.6 Installing an MS Office IS client

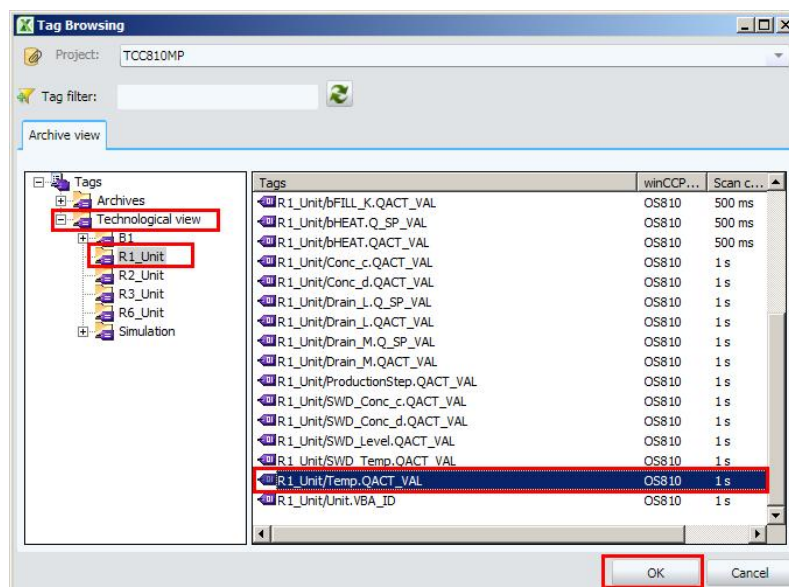
5. Select your project and open the “Tag Browsing” dialog.

Figure 4-61



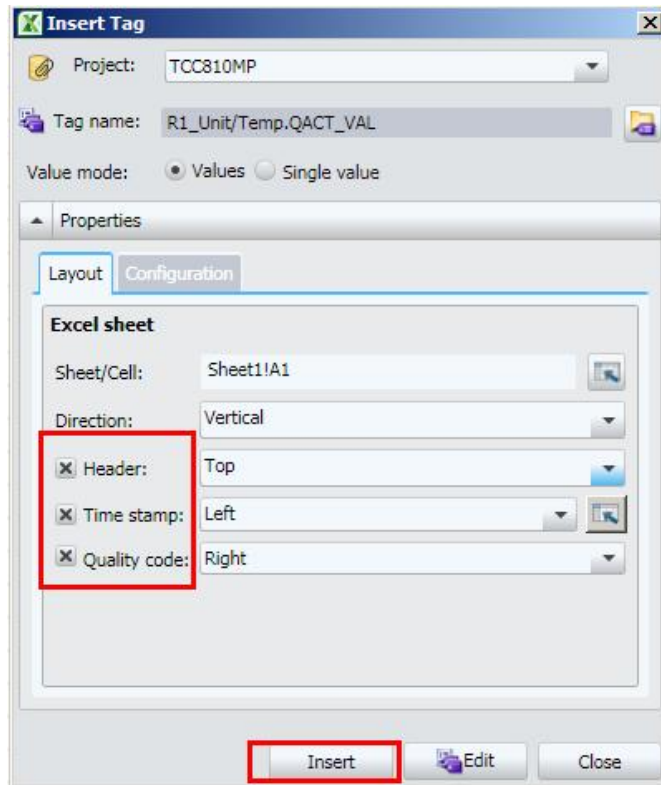
6. Select a tag and click on the “OK” button.

Figure 4-62



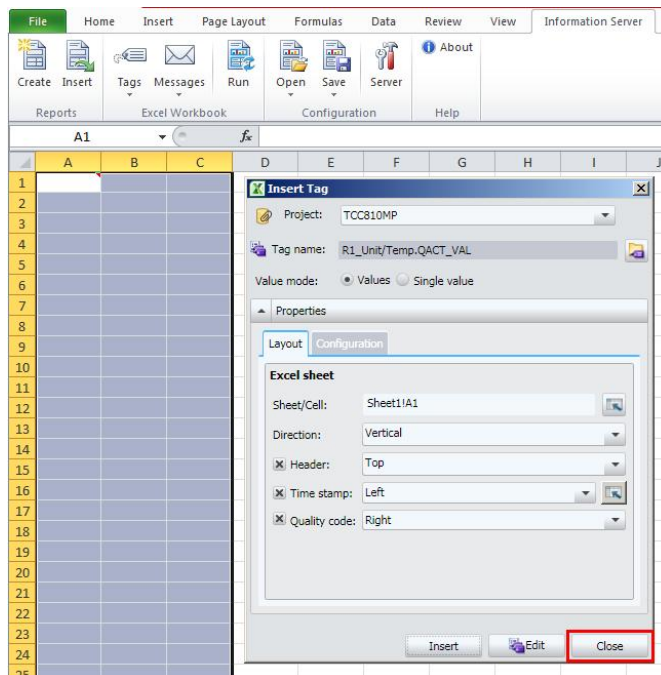
7. Select "Header", "Time stamp" and "Quality code" and click on die "Insert" button.

Figure 4-63



8. Click on the "Close" button.

Figure 4-64

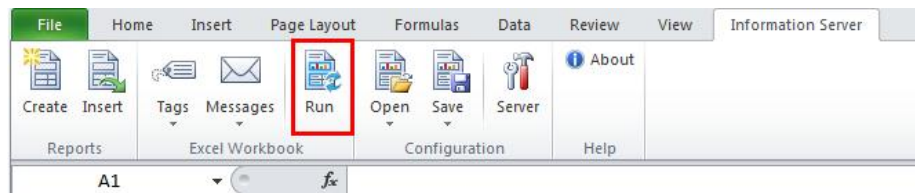


4 Installation of the Information Server

4.6 Installing an MS Office IS client

9. Click the “Run” menu.

Figure 4-65



Result

PH values are red into Excel cells.

Figure 4-66

A screenshot of an Excel spreadsheet. The ribbon at the top shows the 'Run' button highlighted. The spreadsheet has a table with the following data:

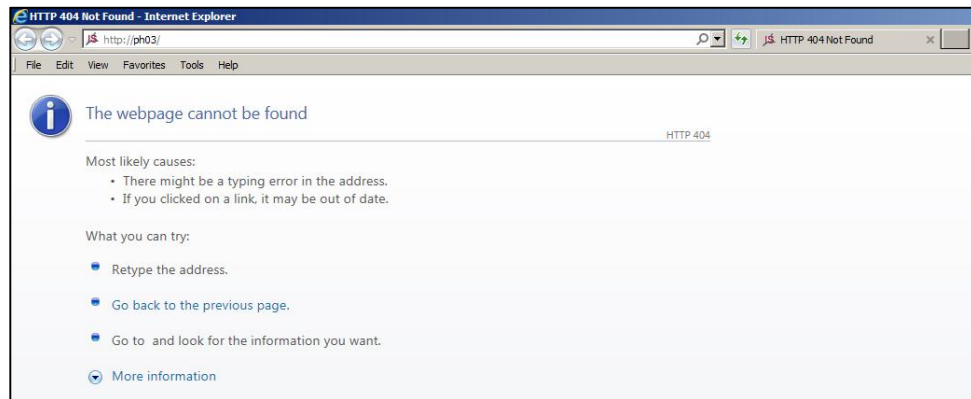
	A	B	C	D	E	F	G	H
1	Time	Value	Quality					
2	Di, 05 Mai 2015 11:40:31,227	16,16	128,0					
3	Di, 05 Mai 2015 11:40:32,227	16,17	128,0					
4	Di, 05 Mai 2015 11:40:33,227	16,20	128,0					
5	Di, 05 Mai 2015 11:40:34,227	16,19	128,0					
6	Di, 05 Mai 2015 11:40:35,227	16,21	128,0					
7	Di, 05 Mai 2015 11:40:36,227	16,34	128,0					
8	Di, 05 Mai 2015 11:40:37,227	16,23	128,0					
9	Di, 05 Mai 2015 11:40:38,227	16,38	128,0					
10	Di, 05 Mai 2015 11:40:39,227	16,39	128,0					
11	Di, 05 Mai 2015 11:40:40,227	16,32	128,0					
12	Di, 05 Mai 2015 11:40:41,227	16,35	128,0					
13	Di, 05 Mai 2015 11:40:42,227	16,28	128,0					
14	Di, 05 Mai 2015 11:40:43,227	16,37	128,0					
15	Di, 05 Mai 2015 11:40:44,227	16,43	128,0					
16	Di, 05 Mai 2015 11:40:45,227	16,36	128,0					
17	Di, 05 Mai 2015 11:40:46,227	16,41	128,0					

4.7 Check the internet settings of the IS server

Scenario

PH and IS installed. The WinCC server stores data on the PH computer. However, if you connect the IE IS client to the IS, it is not possible to create protocols (reports).

Figure 4-67



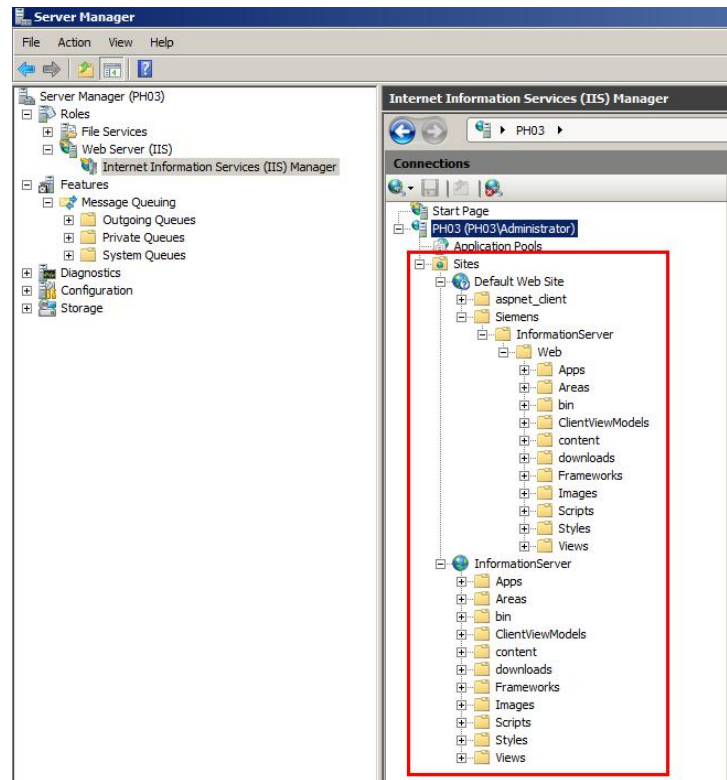
Recommended system verification and measures

1. Check whether the website for the Information Server has been generated. Open the Server Manager and navigate to "Roles > Web Server (IIS) > Internet Information Service (IIS) Manager" and check whether the Information Server website exists.
2. If the website doesn't exist, run the IS Configuration Wizard manually to create the website.

4 Installation of the Information Server

4.7 Check the internet settings of the IS server

Figure 4-68

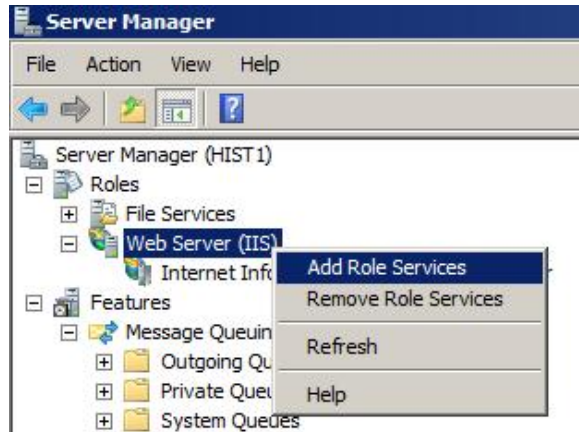


4 Installation of the Information Server

4.7 Check the internet settings of the IS server

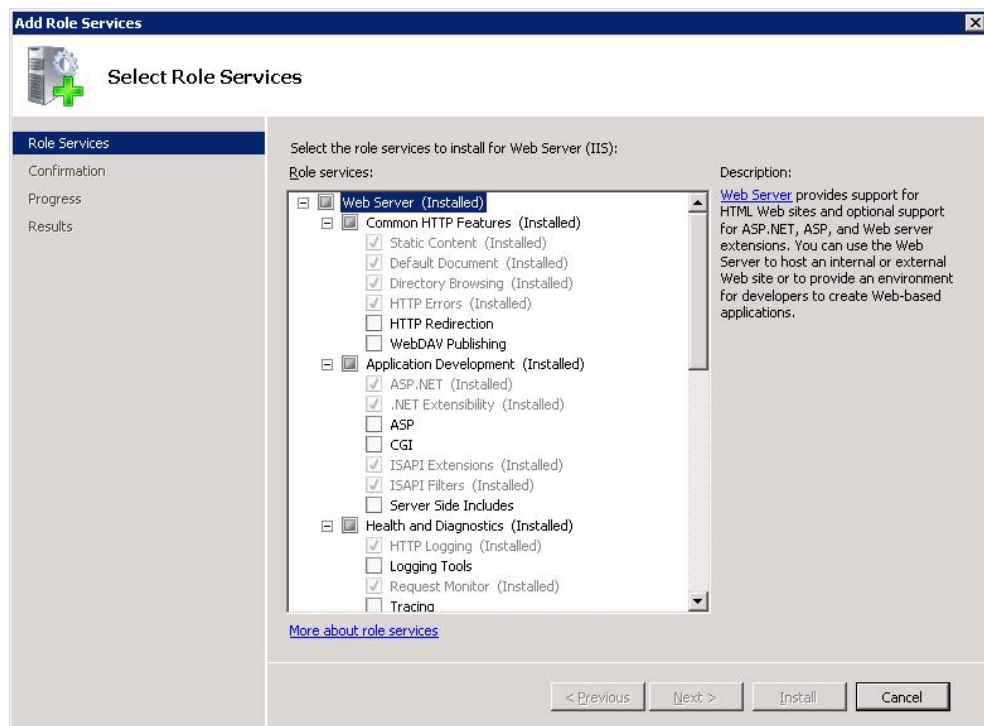
3. Check the IIS settings. Open the Server Manager and navigate to “Roles > Web Server (IIS)”, right-click to open the context menu and select “Add Role Services”.

Figure 4-69



4. Compare the Settings with the following screenshots.

Figure 4-70



4 Installation of the Information Server

4.7 Check the internet settings of the IS server

Figure 4-71

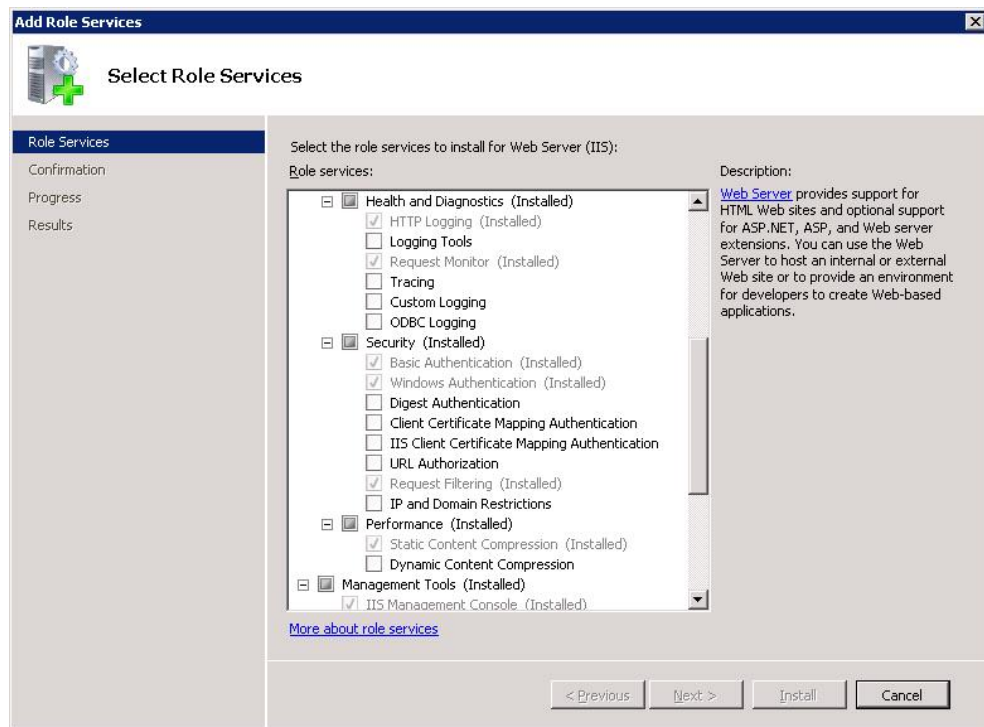
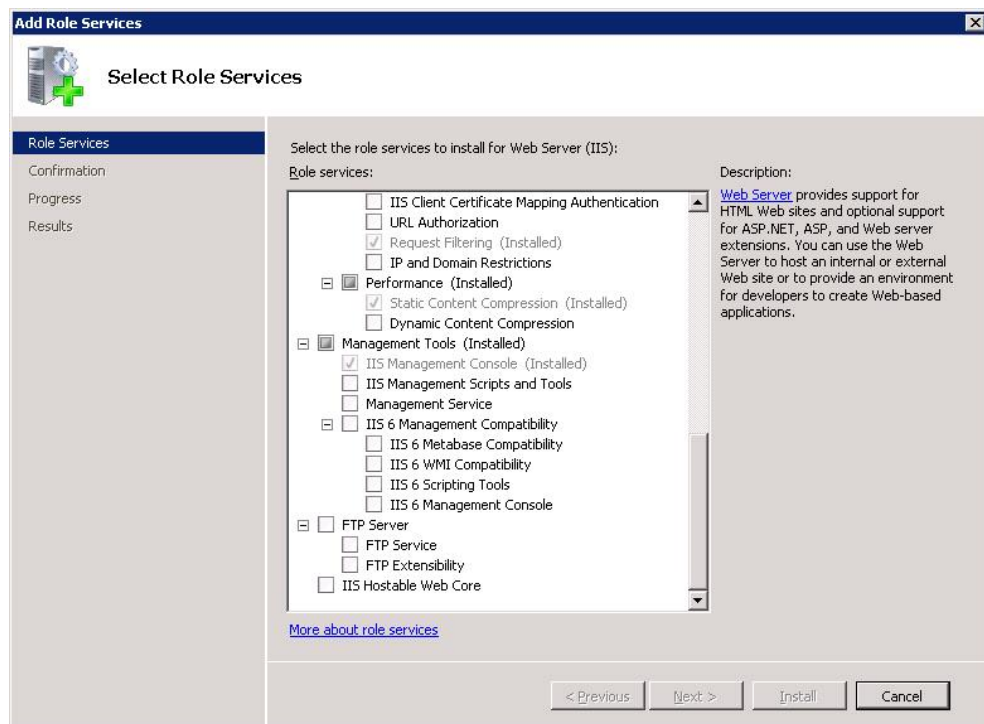


Figure 4-72



5. The IS Configuration Wizard generates two websites. Check which website is active and use the correct URL.

5 Commissioning

This chapter discusses how to commission the Process Historian (PH) and Information Server (IS).

5.1 First commissioning sequence

When commissioning for the first time, the PH should be started prior to the WinCC servers. The PH must also be in operating mode “Active” before starting WinCC Runtime. If the PH is started after the WinCC server, it might be possible that the WinCC server does not stack the message queues correctly.

5.2 Redundant WinCC server

When using redundant WinCC servers, the WinCC servers must not be started simultaneously at the first commissioning. First the master server must be started, and then, some minutes later, the standby server. When starting the WinCC systems simultaneously, the PH might not recognize the systems as a redundant WinCC system.

When using redundant WinCC servers, only the master server sends data to the PH. The standby server also creates message queues to the PH, however, it does not send data.

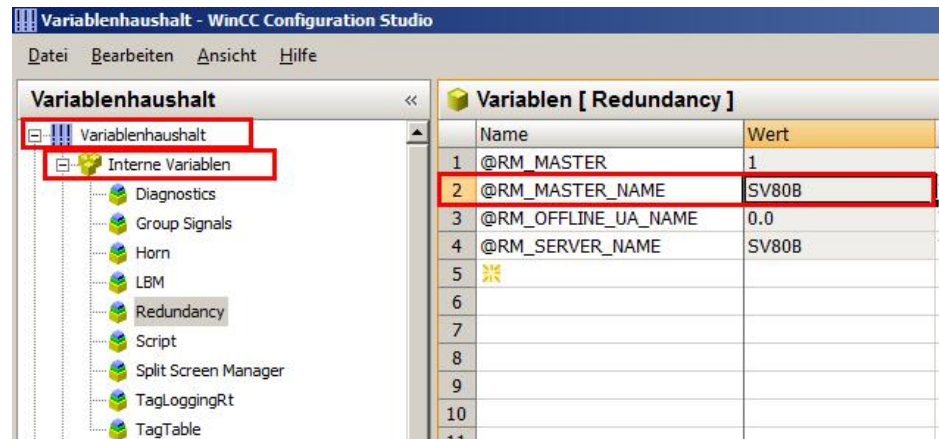
After first commissioning, the master server only sends data to the PH after the Store And Forward Buffer has been updated. After the first commissioning, the master also sends data if the S&F buffer has not been synchronized.

If the master of a redundant WinCC server does not send any data after the first commissioning, the Store and Forward Buffer needs to be checked.

Instruction

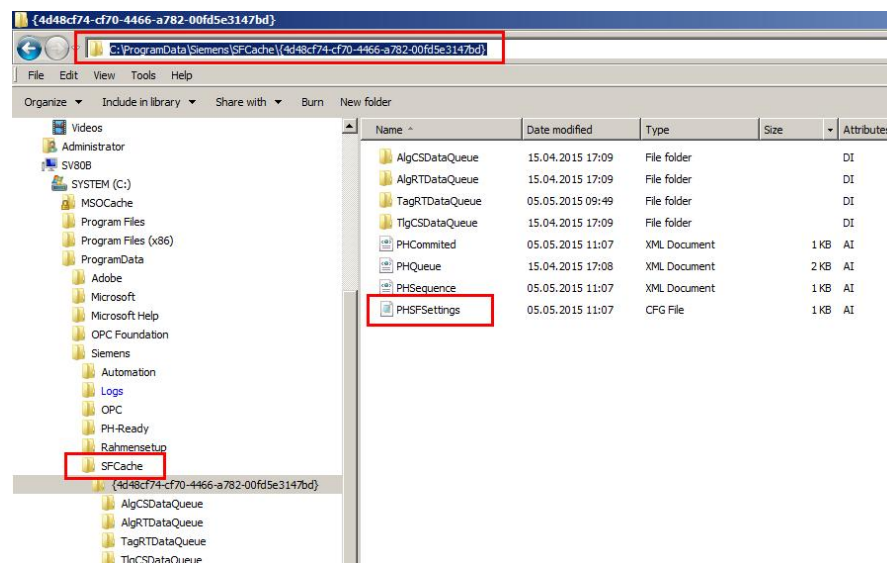
1. Determine the current WinCC Master. The redundancy status can be checked using the WinCC Tag Management, for example.

Figure 5-1



2. Open the PHSFSettings file on the Master server. The file is located at "C:\ProgramData\Siemens\SFCache"

Figure 5-2

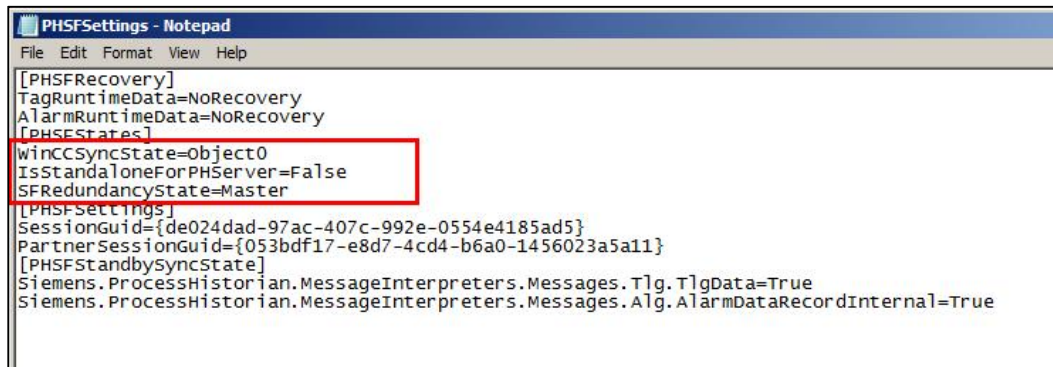


5 Commissioning

5.2 Redundant WinCC server

3. Determine the synchronization status.

Figure 5-3



```
PHSFSettings - Notepad
File Edit Format View Help

[PHSFRecovery]
TagRuntimeData=NoRecovery
AlarmRuntimeData=NoRecovery
[PHSFStates]
WinCCSyncState=Object0
IsStandaloneForPHServer=False
SRedundancyState=Master
[PHSFSettings]
SessionGuid={de024dad-97ac-407c-992e-0554e4185ad5}
PartnerSessionGuid={053bdf17-e8d7-4cd4-b6a0-1456023a5a11}
[PHSFStandbySyncState]
Siemens.ProcessHistorian.MessageInterpreters.Messages.Tlg.TlgData=True
Siemens.ProcessHistorian.MessageInterpreters.Messages.Alg.AlarmDataRecordInternal=True
```

If WinCCSyncState = Error, the WinCC Master does not send data to the PH after first commissioning.

5.3 Process Historian

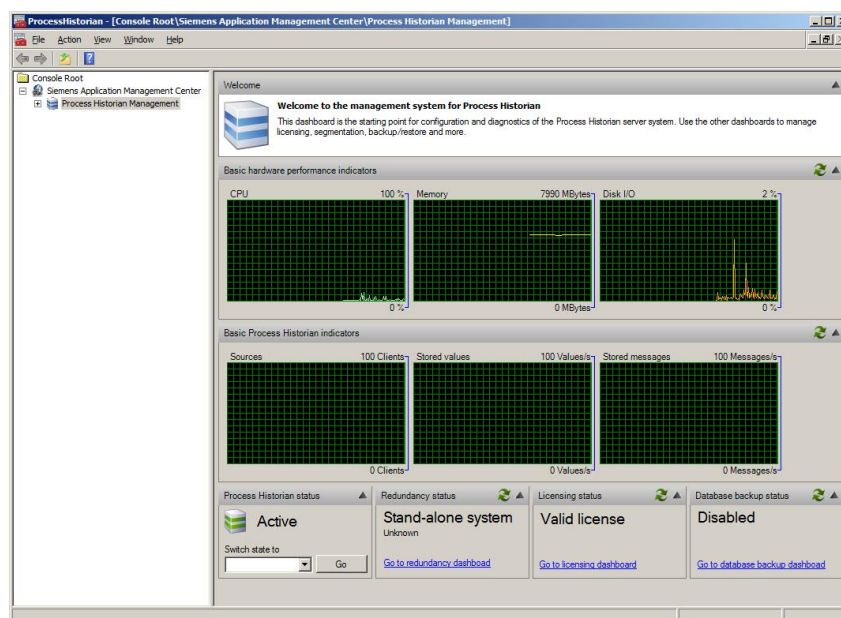
Requirements

- The Process Historian must be installed.
- The Installation Wizard was used for creating the “HistorianStorage” database.
- The PH database segmentation was defined.
- The following licenses must be available:
 - Server license for the Process Historian
 If the license is not available, the PH does not go into “Active” mode after computer start.
- The necessary PH services are active.
 - SIMATIC Process Historian service
 - Process Historian Maintenance service
 - Process Historian Discovery service
- PH activated.
- PH Ready (CCCAPHServer Service) is installed on the WinCC server and has been started.
- The WinCC project was downloaded onto the destination server.

Procedure

1. Open the Process Historian Management Console on the PH/IS system. And click on the “Process Historian Management” node.

Figure 5-4

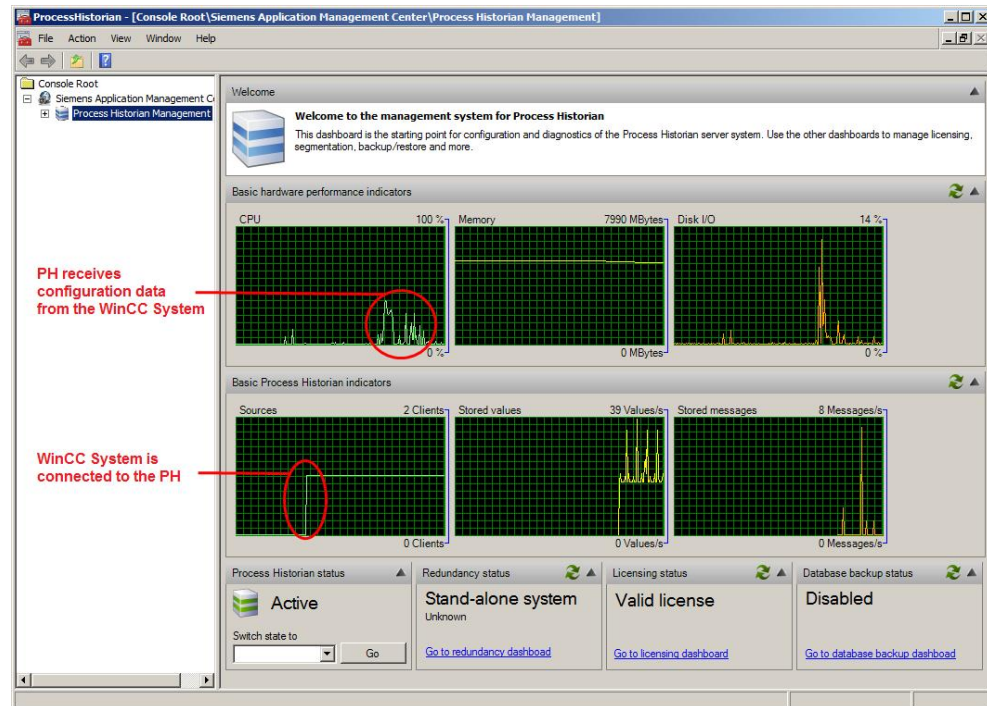


No physical source is connected and no tags and alarm messages are stored. A source can be any WinCC system with data stored on it. The PH receives the configuration data from any configured Runtime WinCC system.

When using a redundant WinCC system, both physical devices serve as source system, and the archive configuration data is transferred by both devices. In the case of a redundant WinCC server, the Runtime data is only sent to the PH by the current master.

2. Open the WinCC Explorer on the WinCC server and start the loaded WinCC project.

Figure 5-5



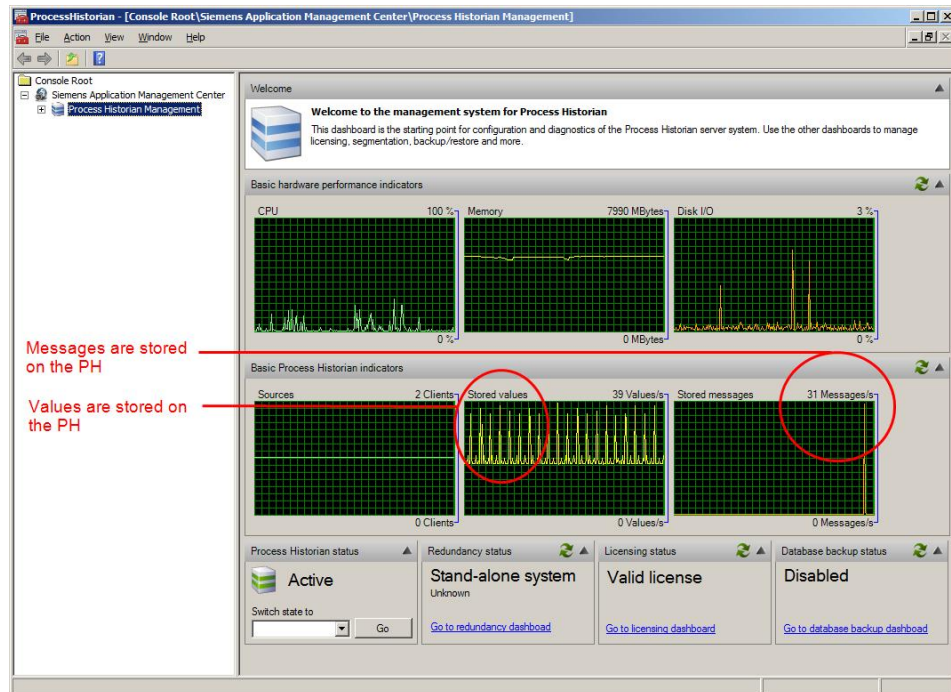
The WinCC server sends the configuration data to the PH. It is apparent that a source device (WinCC server) is connected at the PH.

5 Commissioning

5.3 Process Historian

3. Start WinCC Runtime.
After starting Runtime, long-term relevant archive tags and WinCC messages are stored on the PH.

Figure 5-6



5.4 Information Server

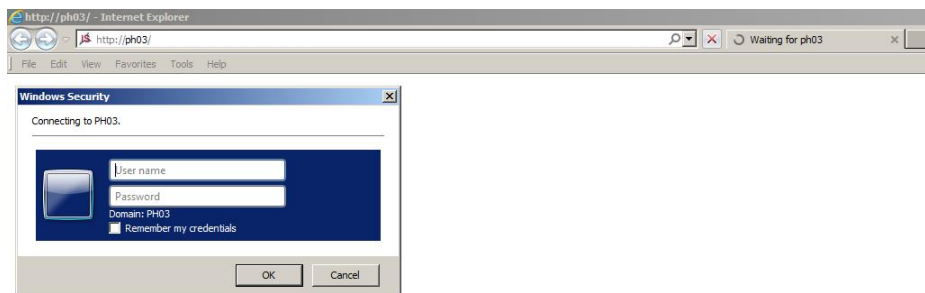
Requirements

- The Process Historian must be active.
- The Information Server must be installed.
- The configuration Manager has created a website.
- The Internet Explorer settings have been done.
- The following licenses must be available:
 - License for the Information Server
 - Client access license for the Information Server

Procedure

1. Open the Internet Explorer. Enter `http://<computer name>`, to create a connection with the IS.

Figure 5-7

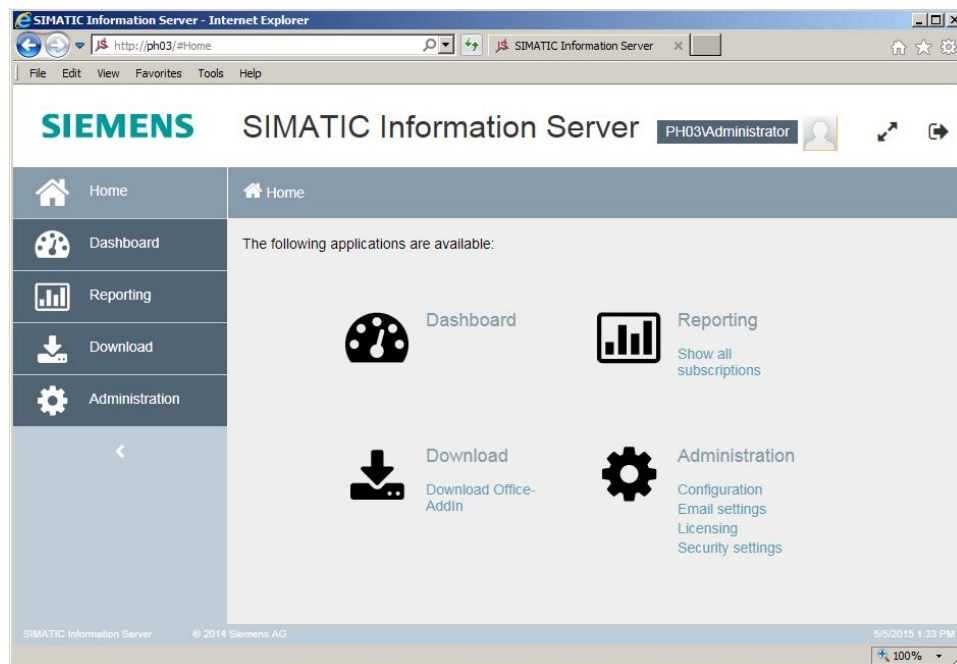


5 Commissioning

5.4 Information Server

2. Enter the User name and Password specified during the installation procedure.

Figure 5-8



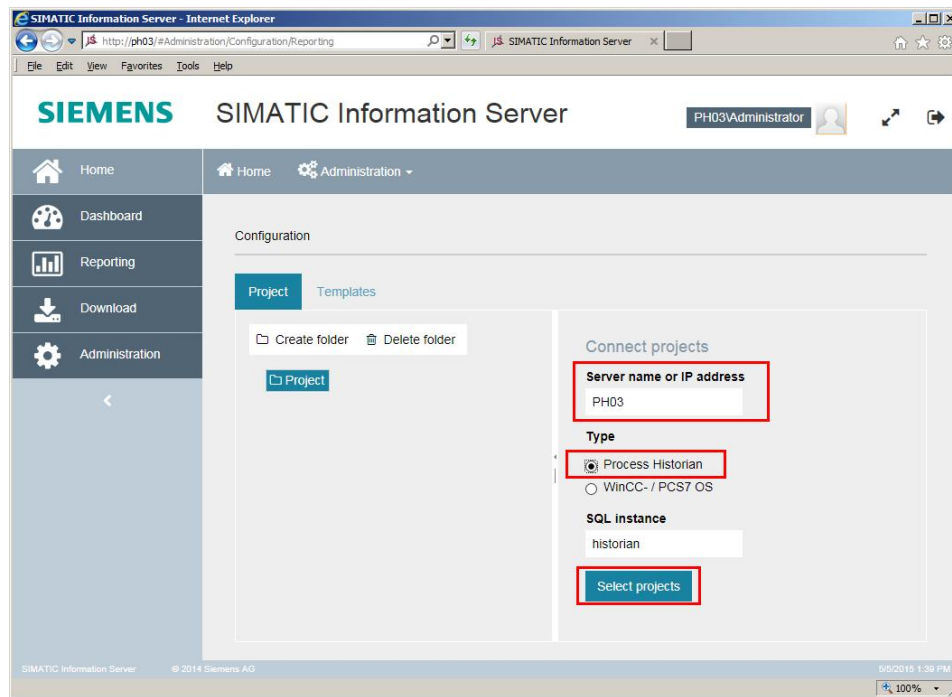
3. Click on menu item "Administration".
4. Click on menu item "Configuration".
5. Click on menu item "Reporting".
6. Click on menu item "Project".

5 Commissioning

5.4 Information Server

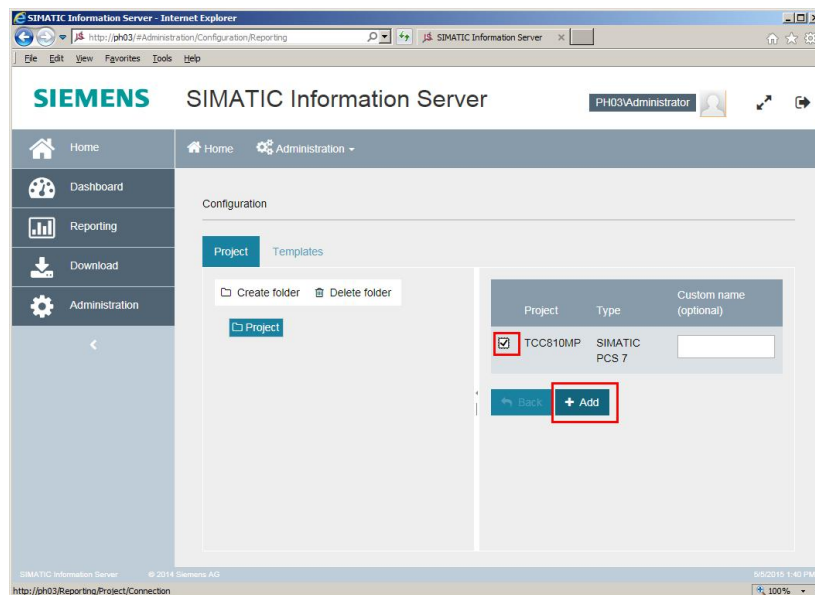
7. Enter the PH computer name into the “Server name or IP address” field. Select the “Process Historian” radio button. Click on the “Select projects” button.

Figure 5-9



8. Mark your project and click on the “Add” button.

Figure 5-10

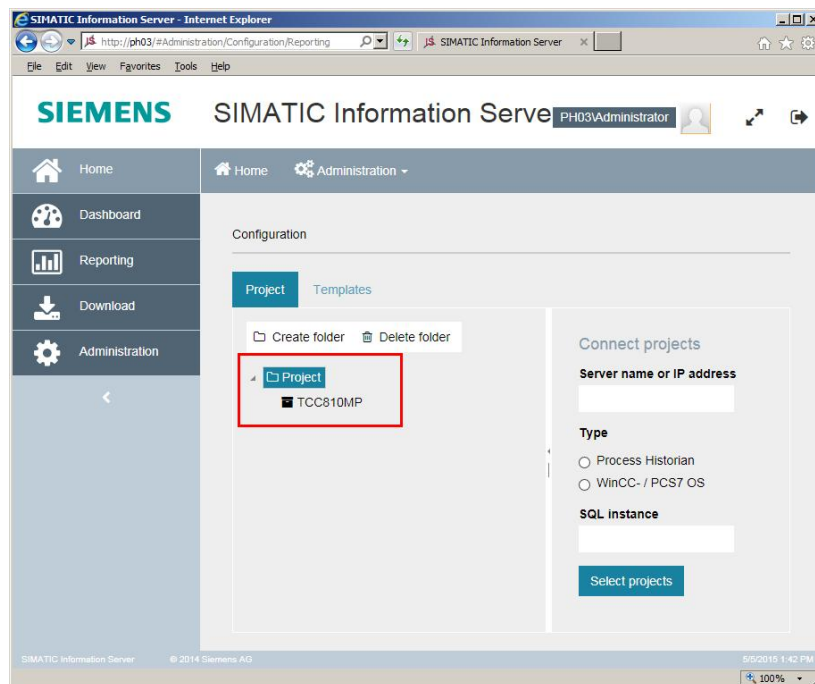


5 Commissioning

5.4 Information Server

You have connected a PH data source with the IS.

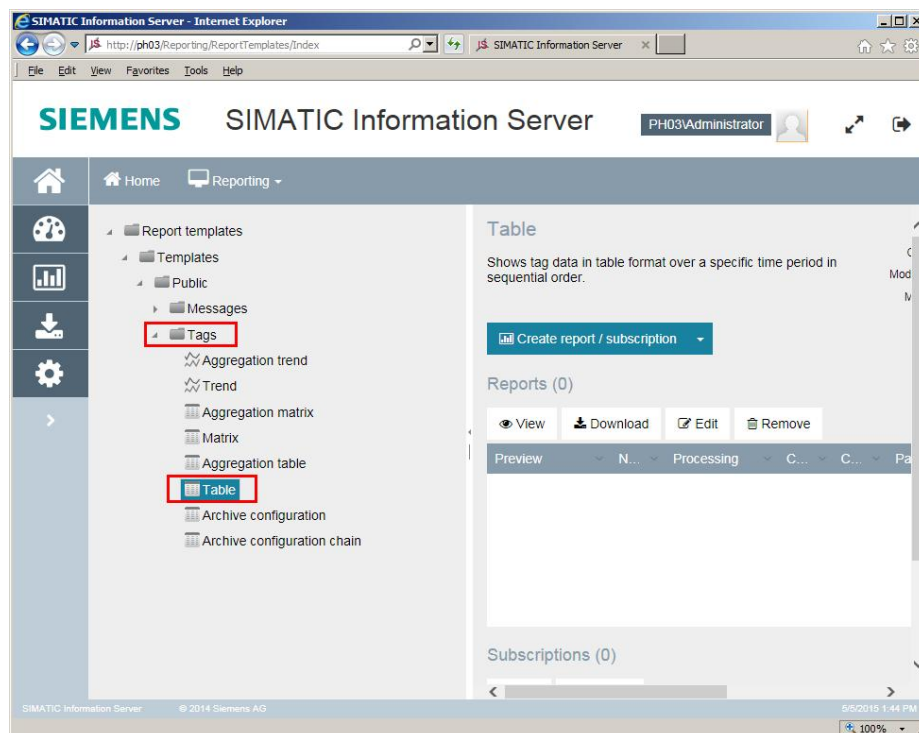
Figure 5-11



9. Go to the “Reporting” dialog.

10. Use a standard report template to access data stored in the PH. In the “Tags” folder you click on the “Table” template.

Figure 5-12

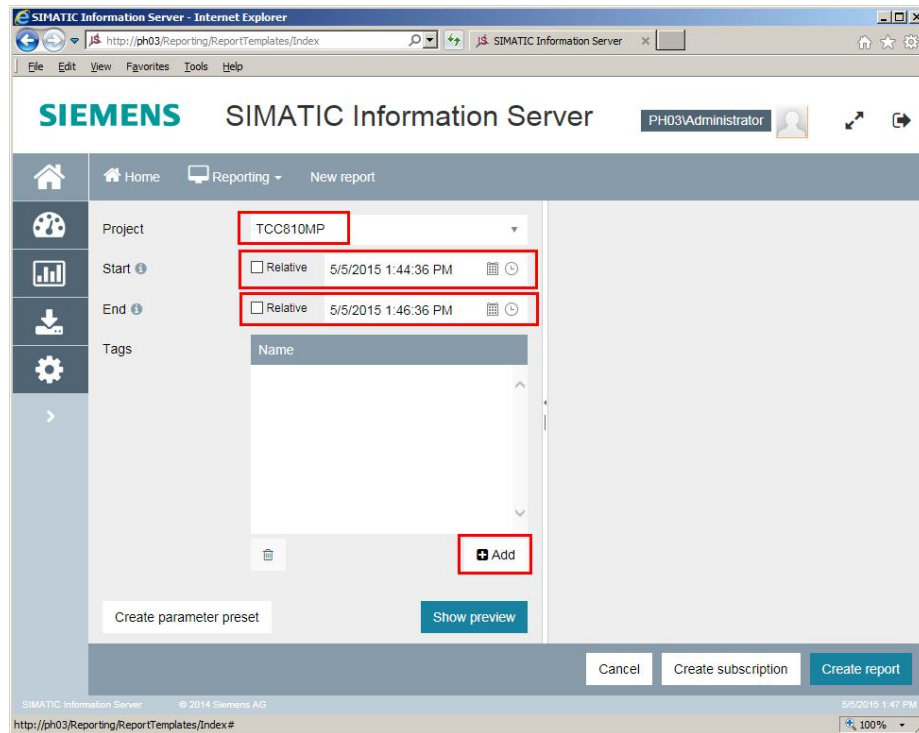


5 Commissioning

5.4 Information Server

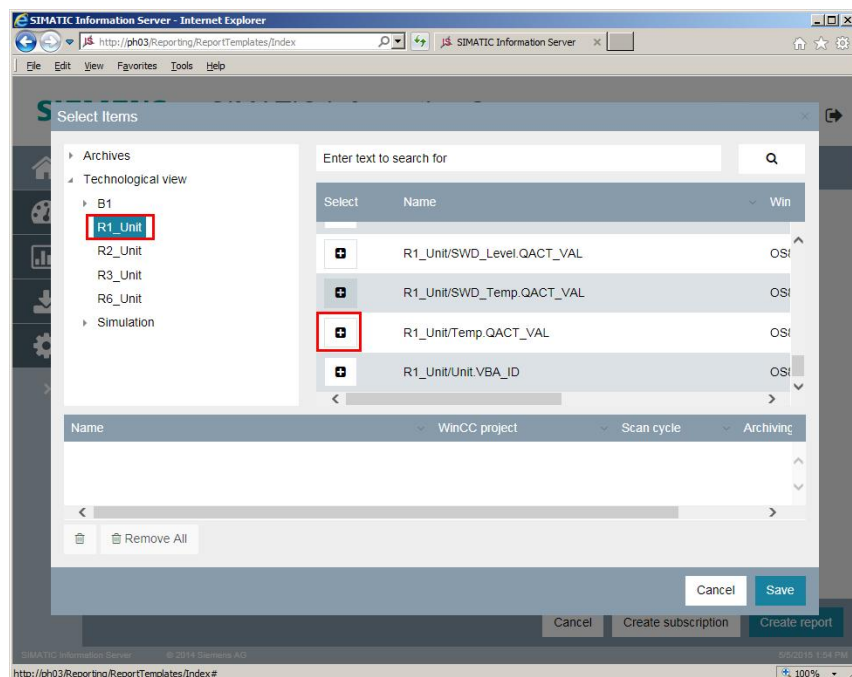
11. Click on the “Create report / subscription” button
12. Enter a project, as well as the start and end time, and then click on the “Add” button to select a tag.

Figure 5-13



13. Select a tag you wish to see in the report via the “+” button.

Figure 5-14

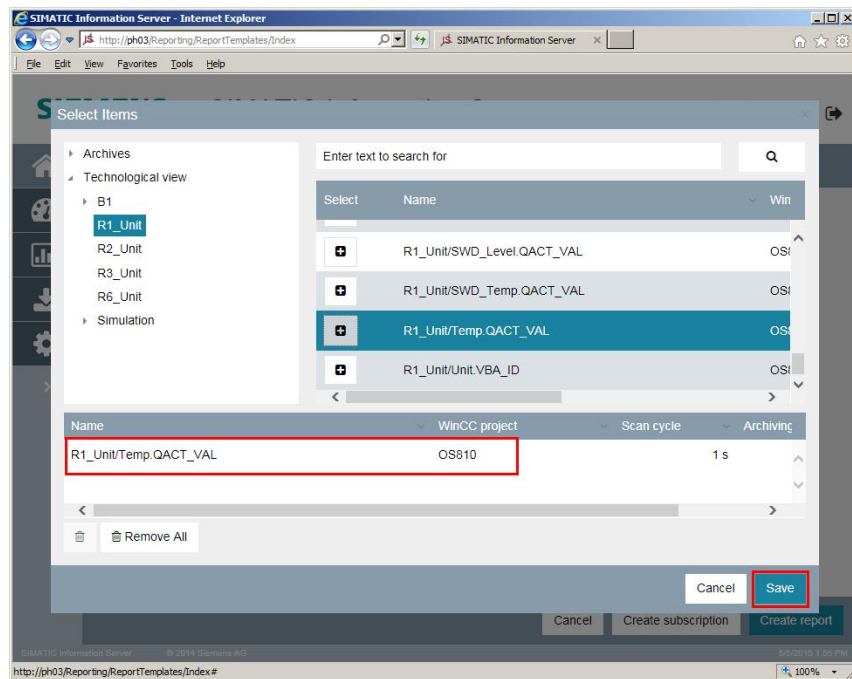


14. Click on the “Save” button.

5 Commissioning

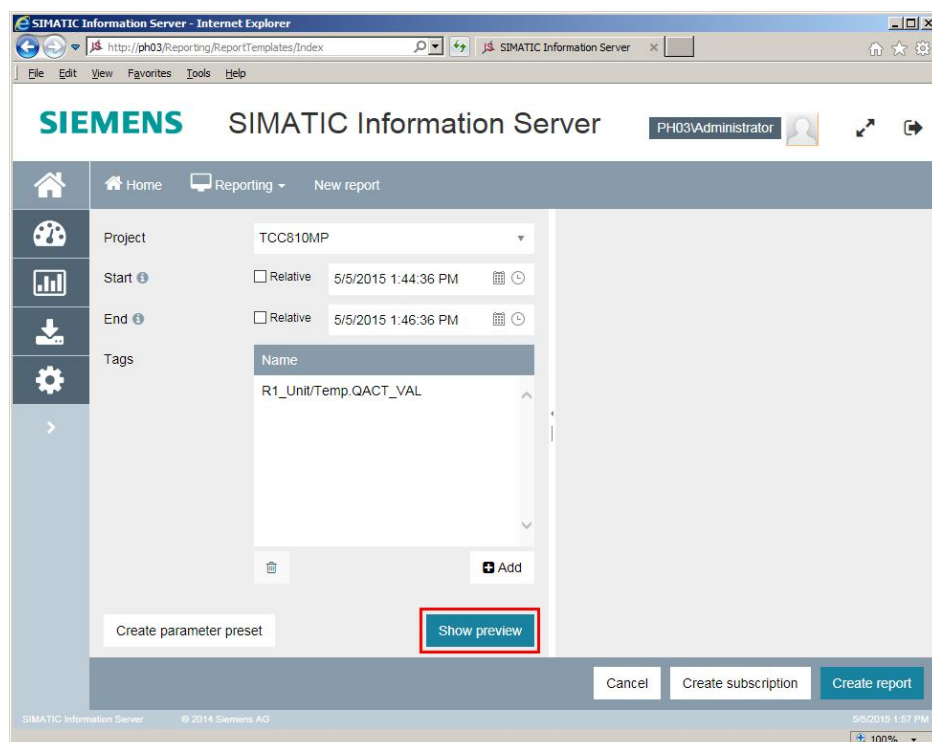
5.4 Information Server

Figure 5-15



15. Click on the “Show preview” button.

Figure 5-16



5 Commissioning

5.4 Information Server

Result

The report is displayed as preview.

Figure 5-17

The screenshot shows the SIMATIC Information Server web interface in Internet Explorer. The browser address bar shows the URL: <http://ph03.Reporting/ReportTemplates/Index>. The page title is "SIMATIC Information Server" and the user is logged in as "PH03\Administrator".

The interface includes a sidebar with navigation icons for Home, Reporting, and New report. The main content area shows the project "TCC810MP" and the report configuration. The "Start" and "End" times are set to "Relative" and "5/5/2015 1:44:36 PM" and "5/5/2015 1:46:36 PM" respectively. The "Tags" section shows a list of tags, with "R1_Unit/Temp_GACT_VAL" selected.

The report preview shows a table with the following columns: Tag name, Timestamp, and Value. The table contains 20 rows of data, all for the tag "R1_Unit/Temp_GACT_VAL". The values range from approximately 12.8196 to 12.8198.

Tag name	Timestamp	Value
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:36.227	12.81961782095
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:37.227	12.819712720444
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:38.227	12.819761565038
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:39.227	12.819829624662
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:40.227	12.8197236287231
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:41.227	12.819757586198
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:42.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:43.227	12.819757586198
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:44.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:45.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:46.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:47.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:48.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:49.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:50.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:51.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:52.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:53.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:54.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:55.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:56.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:57.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:58.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:44:59.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:45:00.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:45:01.227	12.819761638779
SystemVariable1_UnitTemp_GACT_VAL	5/5/2015 13:45:02.227	12.819761638779

The interface also includes buttons for "Create parameter preset", "Show preview", "Cancel", "Create subscription", and "Create report". The status bar at the bottom shows the date and time: "5/5/2015 1:50 PM".

6 Troubleshooting

In this chapter, various scenarios are used for describing the options for verification and the procedure in the respective situations. Advanced computer knowledge is assumed here, so it is not necessary to perform every single mouse-click.

6.1 Manual call of the Installation Wizard for the PH database

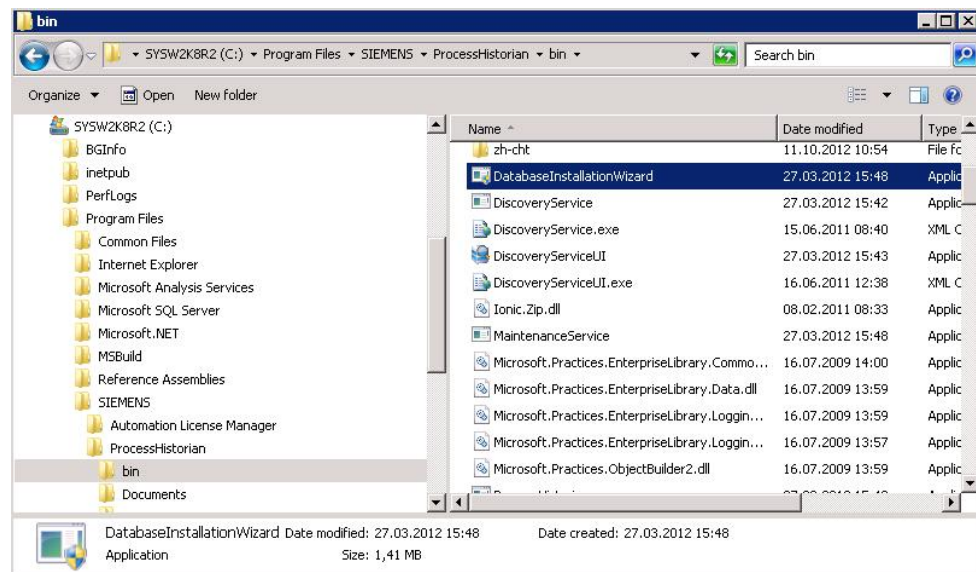
If errors occurred when creating the “HistorianStorage” database, the Database Installation Wizard can also be started manually. If a HistorianStorage database has already been “attached” at the SQL server, it will be deleted when executing the installation wizard again. All data will be lost!

Note

If an existing HistorianStorage database should not be deleted when running the Installation Wizard again, the existing HistorianStorage database must previously “detached” from the SQL server. The new HistorianStorage DB must be created in a different directory.

After installing the PH, the Database Installation Wizard is available via the following directory path: “C:\Program Files\SIEMENS\ProcessHistorian\bin\DatabaseInstallationWizard.exe”.

Figure 6-1



The Installation Wizard can be started with a double click.

6.2 Manually calling the ConfigurationManager wizard for the IS

NOTICE

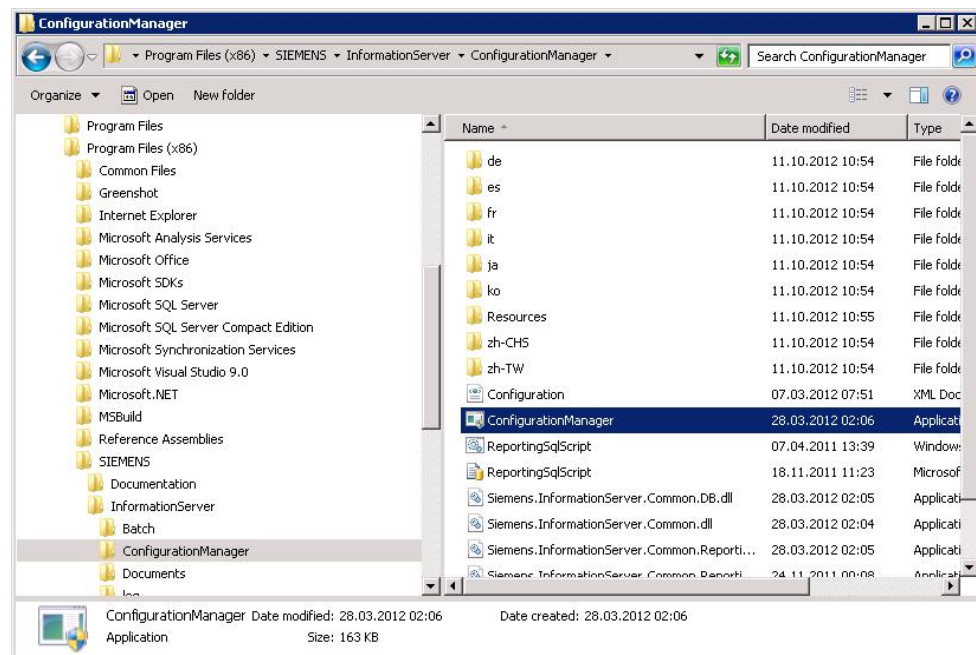
If the IS Configuration Wizard has already run successfully, then for a second time it must only be run as of IS 2014 SP1.

Running the ConfigurationManager wizard is necessary, for example, to set the website to a “virtual directory”.

The ConfigurationManager wizard is used for creating the websites for the Information Server. If the ConfigurationManager wizard has not been run successfully after installing the IS, the wizard can be started afterwards. The “ConfigurationManager.exe” file can be executed with a double-click and the website is generated new. The Configuration Manager is available at the following directory path.

“C:\Program Files (X86)\SIEMENS\InformationServer\ConfigurationManager”.

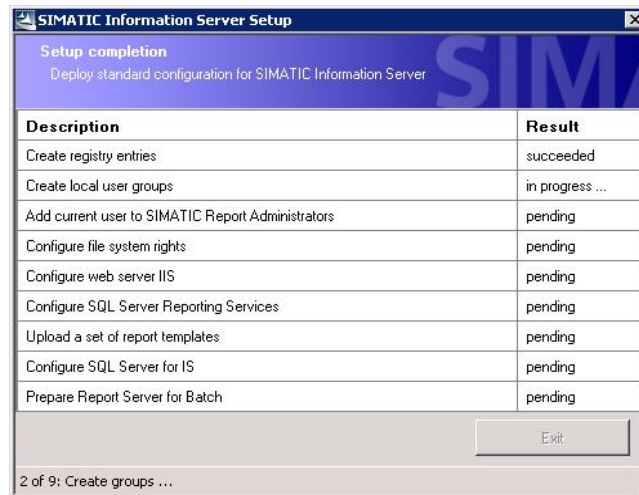
Figure 6-2



Procedure

1. Start the ConfigurationManager wizard with a double click on the following file: "C:\Program Files (x86)\SIEMENS\InformationServer\ConfigurationManager\ConfigurationManager.exe". The wizard starts generating the IS website without any further queries.

Figure 6-3



2. Prompt the query for restarting the system with "No".

Figure 6-4



3. Before you restart the PH/IS system, you need to shut down the PH via the PH Management Console.
4. Then restart the system.

Note

When running the ConfigurationManager wizard again, manual settings changes are reset to default.

6.3 Verifying the WinCC installation for PH Ready

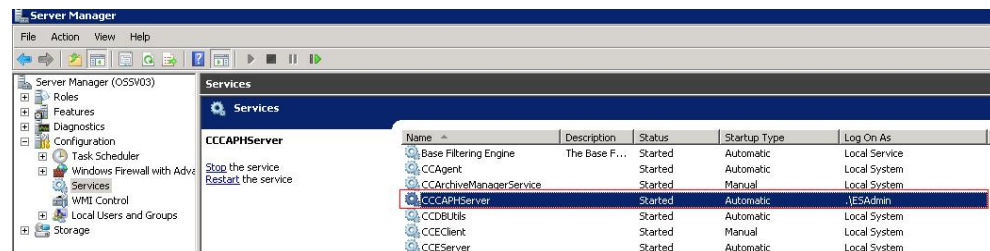
Scenario

The WinCC server is configured for long-term storage of relevant archive tags on the PH computer. The WinCC server is in Runtime mode. The PH is also in Runtime mode, but no tags and alarms are stored on the PH.

Recommended system verification and measures

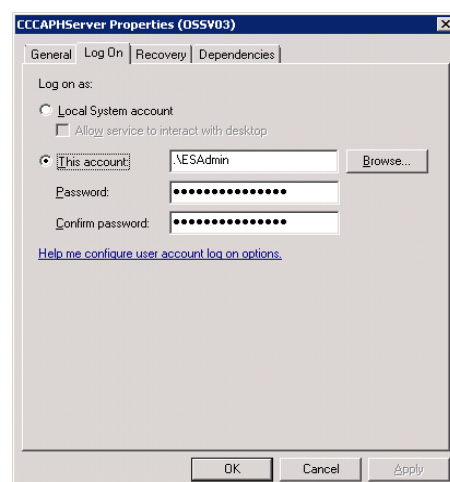
1. Ping the PH computer with the PH computer name from the WinCC server. The response to the ping must come within few ms. If the ping isn't successful, solve the network issue.
2. Ping the WinCC computer with the WinCC computer name from the PH. The response to the ping must come within few ms. If the ping isn't successful, solve the network issue.
3. Ping the PH computer with the PH computer name from the PH. The response to the ping must come within few ms. If the ping isn't successful, solve the network issue.
4. In the event of network problems, check whether the "hosts" file is used and all entered IP addresses and their computer names match. The "hosts" file is available in directory "C:\Windows\System32\drivers\etc".
5. Check if service "CCCAPHServer Service" has been started on the WinCC server.

Figure 6-5



6. Service "CCCAPHServer Service" must run/have been started with the same name and password as the Process Historian computer.

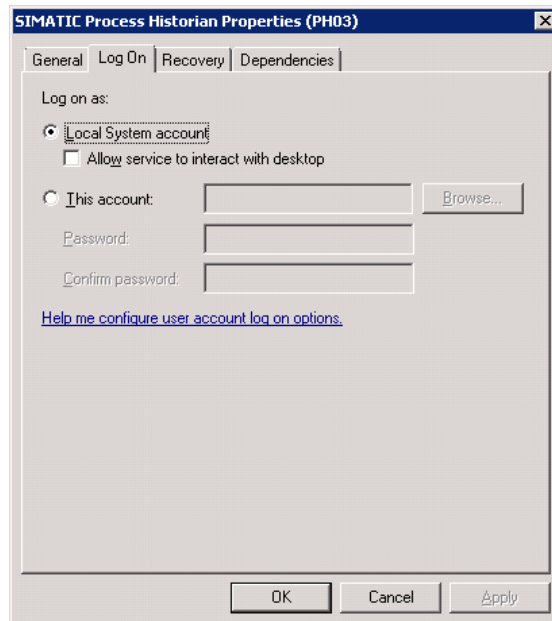
Figure 6-6



6.3 Verifying the WinCC installation for PH Ready

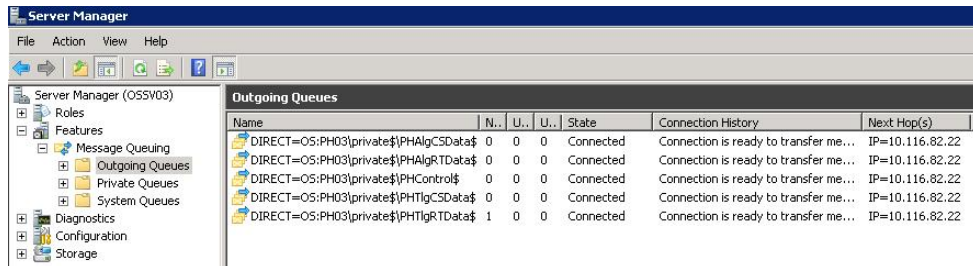
7. Because the “SIMATIC Process Historian” service is started on the PH via the local system account.

Figure 6-7



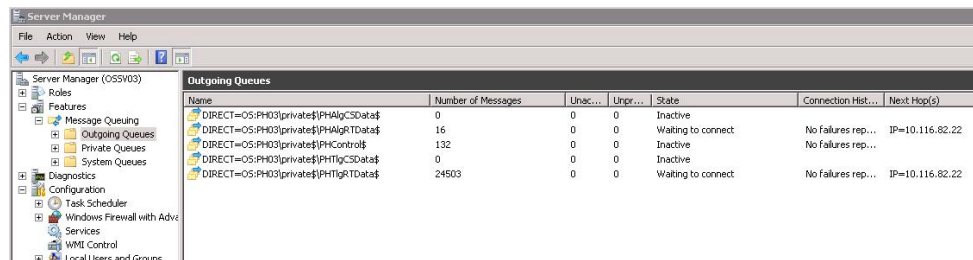
8. Check the outgoing message queues on the WinCC server. The message queues must be created and indicated as “Connected” as in Figure 6-8.

Figure 6-8



9. If the message queues cannot connect, this can be identified in “Server Manager > Features > Message Queues” via the “Waiting to connect” status.

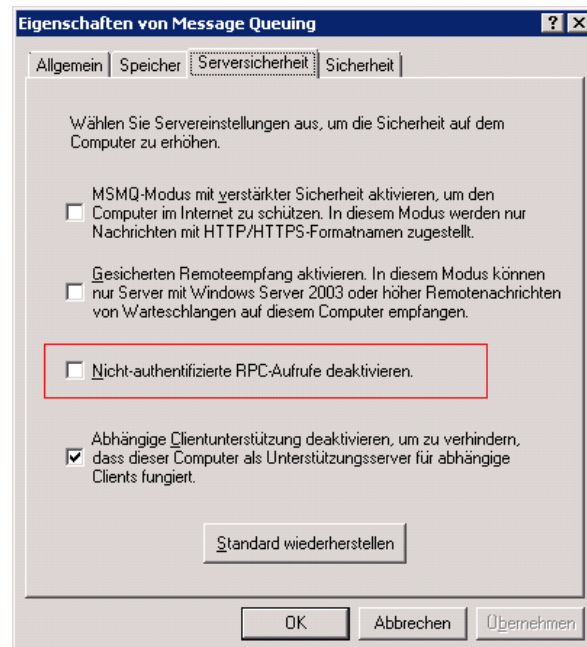
Figure 6-9



Possible cause

Unauthenticated RPC calls are disabled on the PH and need to be activated first. This setting can be made via the Server Manager in “Server Manager > Features > Message Queues > Properties > Server Security”.

Figure 6-10

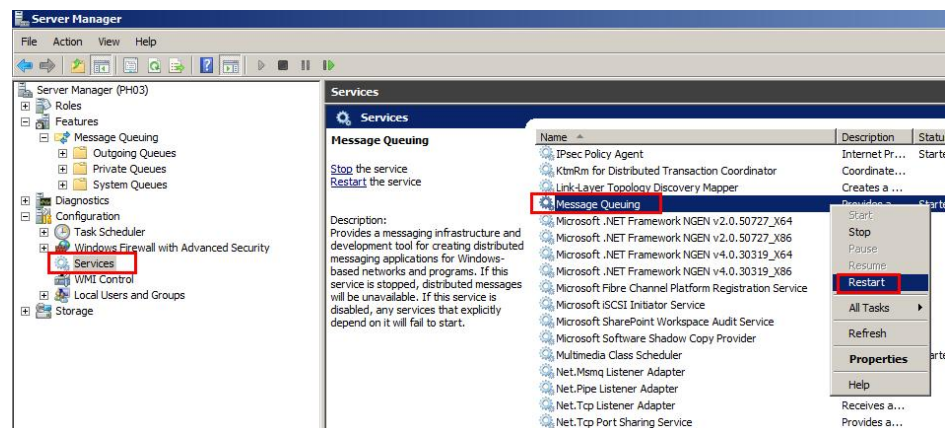


The checkbox “Disable un-authenticated RPC calls” must not be activated.

Note

If the message queues on the WinCC system have the status “Waiting to connect”, restarting the Message Queuing service on the PH may help.

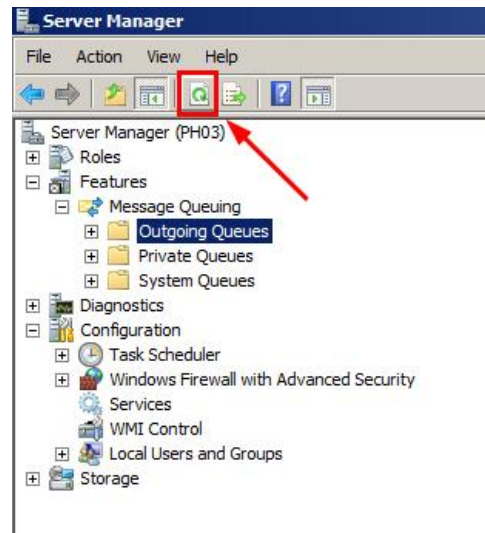
Figure 6-11



Note

The status of the message queues in the Server Manager is not refreshed cyclically. To view the status changes, the “Refresh” button must be used.

Figure 6-12



Check if the “ProcessHistorian.cfg” file was generated and the PH computer name noted correctly.

The engineering system generates a “ProcessHistorian.cfg” file for each OS project which stores data on the PH. This file is placed in every OS and it contains the PH computer name and the names of the used MS message queues. The “ProcessHistorian.cfg” file is located in the root directory of the OS project.

If the “ProcessHistorian.cfg” file is not generated, check the PCS 7 project regarding the PH configuration and compile the OS.

6.4 Checking the PH installation

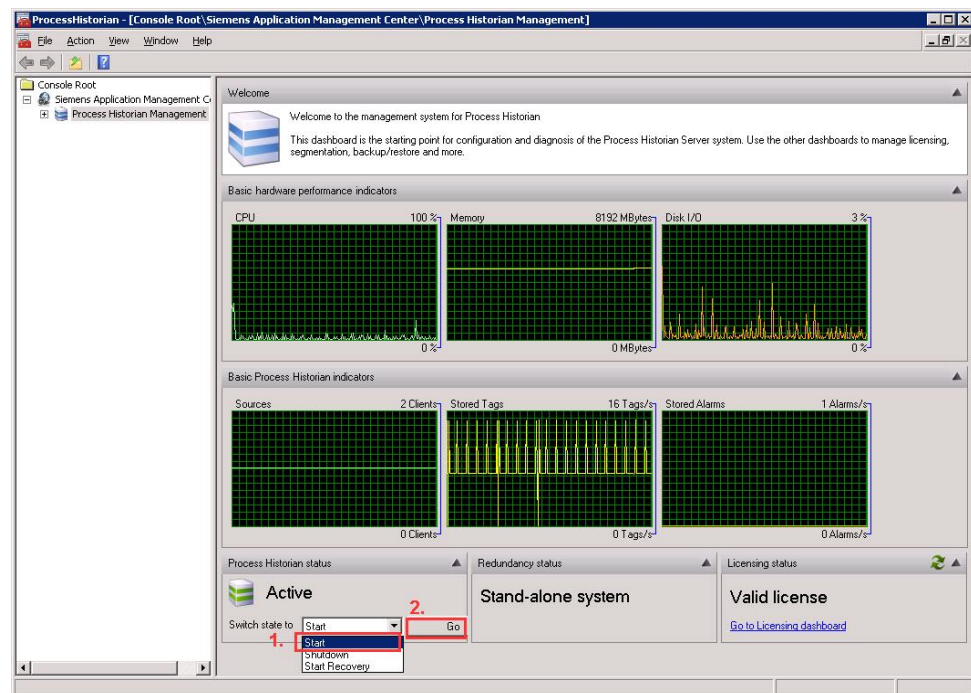
Scenario

The WinCC server is configured for long-term storage of relevant archive tags on the PH computer. The WinCC server is in Runtime mode. The PH is also in Runtime mode. The PH Ready configuration on the WinCC server was checked, however, no tags and alarm messages are stored on the PH.

Recommended system verification and measures

1. Ping the WinCC server with the WinCC server name from the PH and vice versa. The response to the ping must come within few ms. If the ping isn't successful, solve the network issue.
2. Check if the PH status has been set to "active". If the PH status is not "active", switch it to "active" with help of the PH Management Console. Select "Start" and then click on "Go".

Figure 6-13

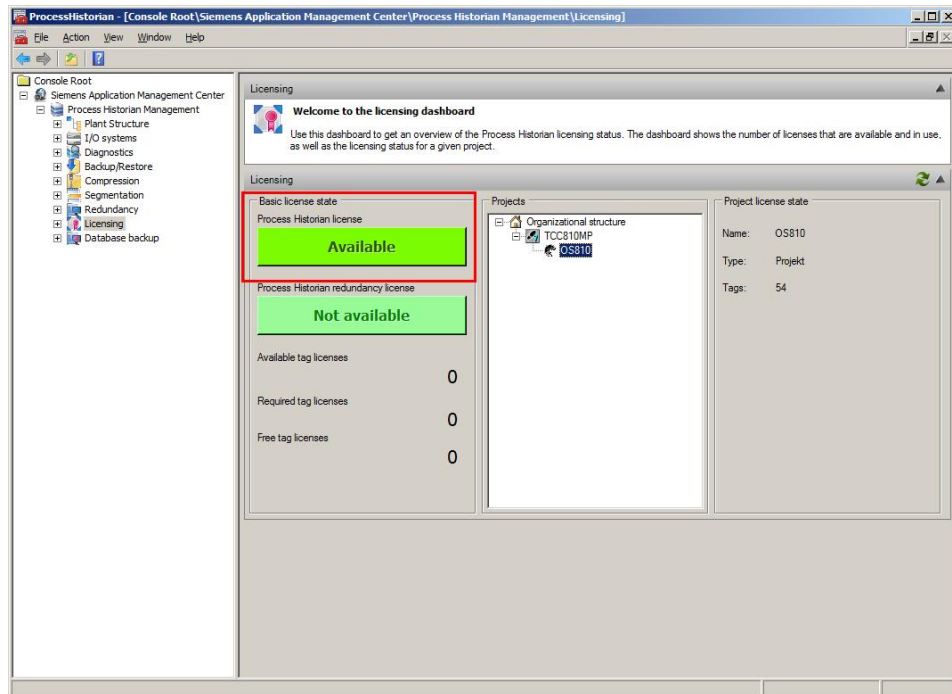


6 Troubleshooting

6.4 Checking the PH installation

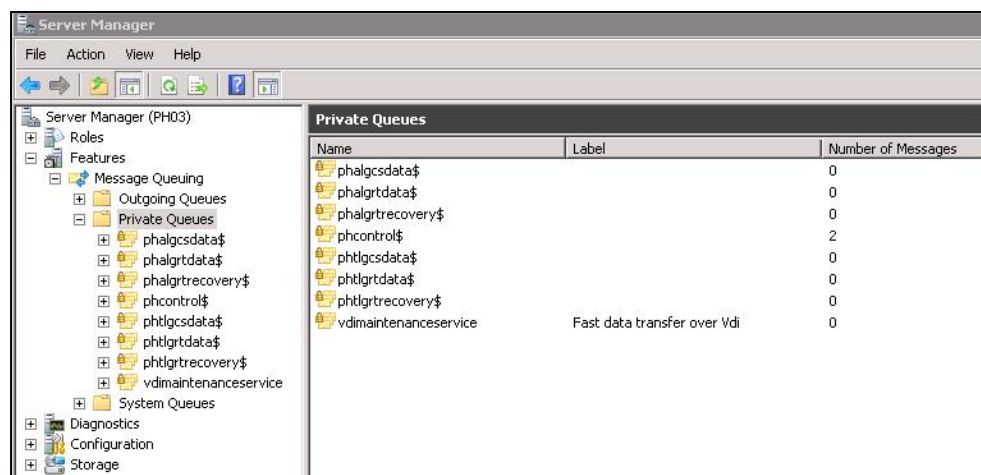
3. Use the Automation License Manager and the PH MMC to check if all necessary licenses are available. Without a valid license, the PH is not working.

Figure 6-14



4. Check the PH MMC menu “Diagnostics” for displayed PH errors and solve the any problems.
5. Check if message queues are generated on the PH. Open the Server Manager and navigate to “Features > Message Queuing > Private Queues”.

Figure 6-15

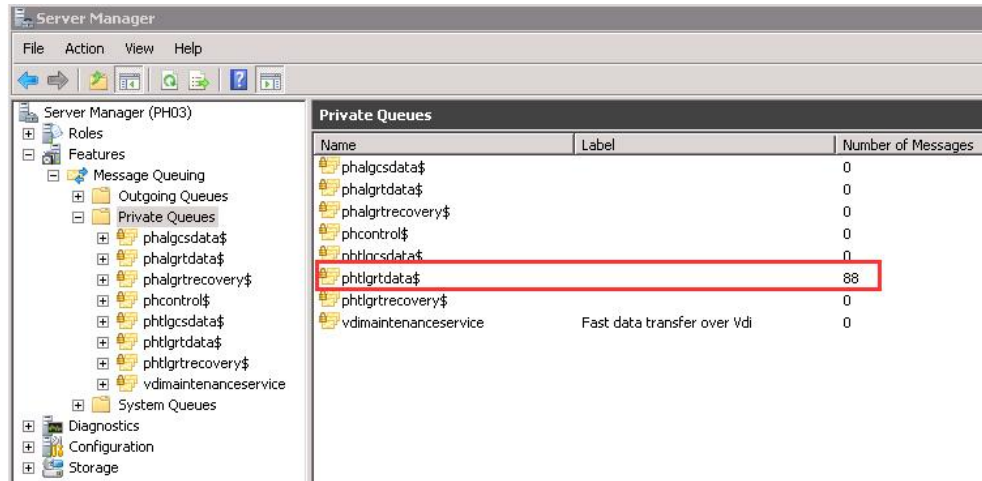


Example

If message queues for tags and messages were generated on the PH computer, yet the data cannot be written to the PH database, the number of messages in the message queue increases. For tags, for example, message queue “phtlgrtdata”.

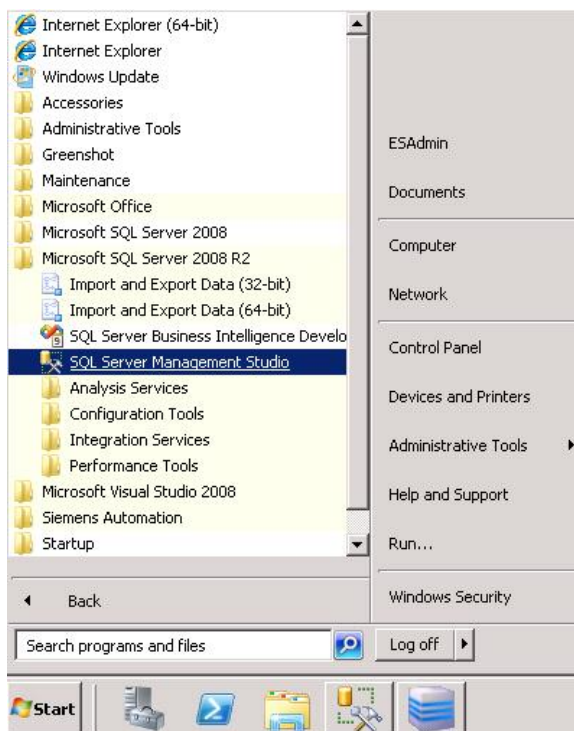
In this case, the PH must be activated.

Figure 6-16



1. Check if the “HistorianStorage” database was created. Open SQL Server Management Studio via “Start > All Programs > Microsoft SQL Server 2008 R2 > SQL Server Management Studio”.

Figure 6-17



6 Troubleshooting

6.4 Checking the PH installation

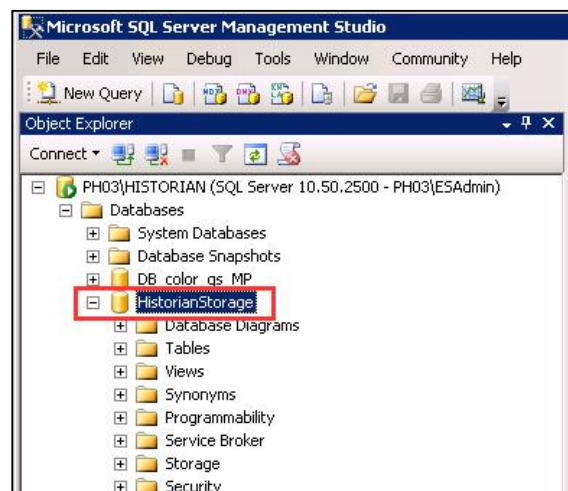
2. Create a connection with the SQL server instance "<computer name>\HISTORIAN".

Figure 6-18



3. Check if database "HistorianStorage" exists. If the database does not exist, start the "Database Installation Wizard".

Figure 6-19

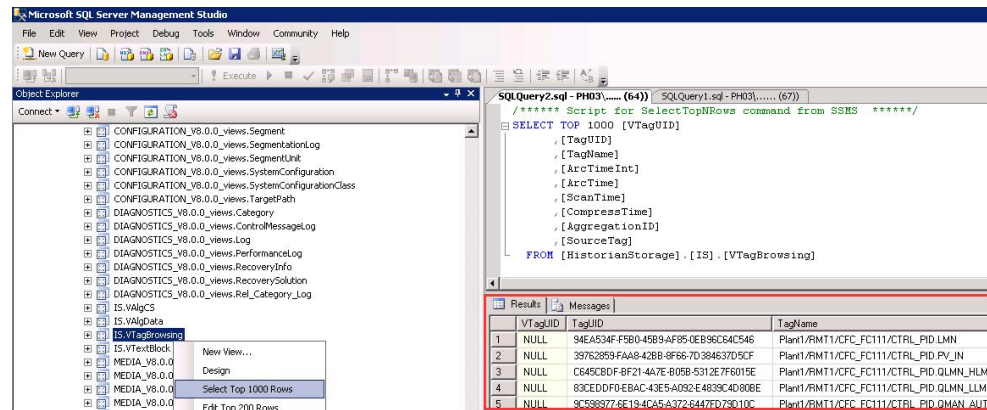


6 Troubleshooting

6.4 Checking the PH installation

4. Check if the PH has already received configuration data from the WinCC server. Use SQL Server MMS to navigate to the "HistorianStorage > Views > IS.VTagBrowsing" view, and select "Select Top 1000 Rows" from the context menu.

Figure 6-20



If you then receive data results, the PH has received the configuration data of the WinCC server.

If you do not receive any results after this SQL query, yet the PH seems run properly, do check the WinCC server. Then restart the PH. If possible restart the WinCC server and check again if the PH now receives configuration data from the WinCC system.

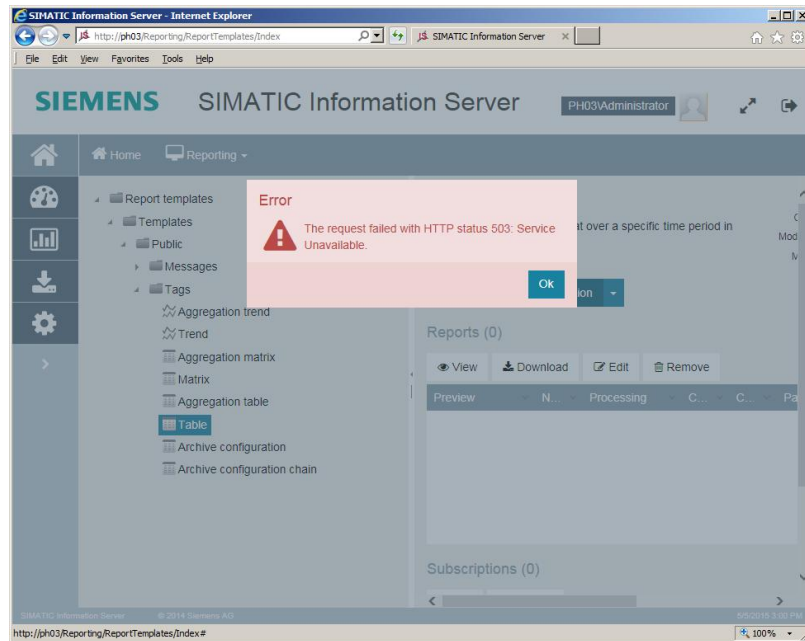
5. If this is a redundant WinCC system, check whether Store and Forward buffer have been synchronized on the WinCC servers.

6.5 Checking the MS reporting services

Scenario

PH and IS installed. The WinCC server stores data on the PH. If you connect the IE IS client to the IS, it is not possible to create protocols (reports).

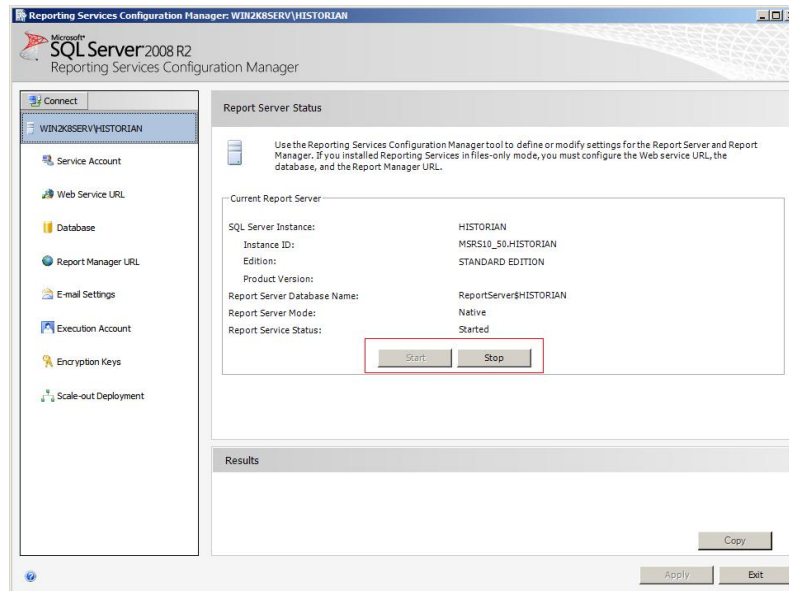
Figure 6-21



Recommended system verification and measures

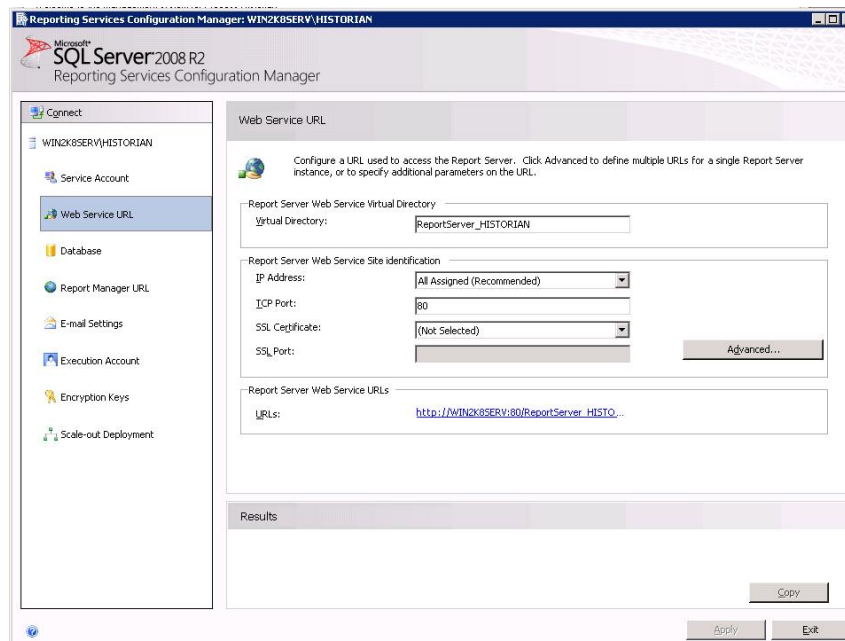
1. Check if the IS Report Server has been started. If it is possible to operate the “Stop” button, the Report Server has been started.

Figure 6-22



2. Check the settings of Web Service URL.

Figure 6-23

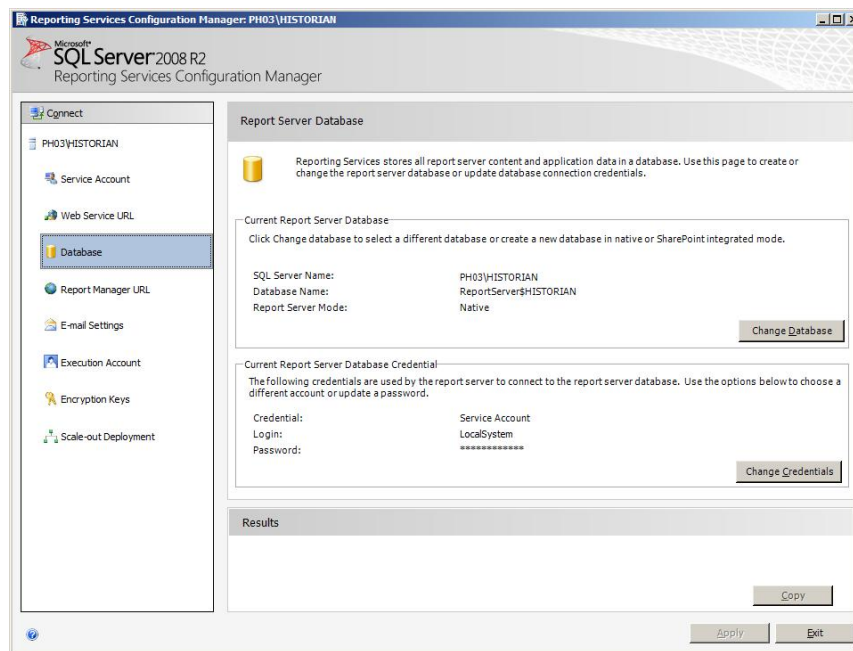


6 Troubleshooting

6.5 Checking the MS reporting services

3. Check the Report Server Database settings.

Figure 6-24

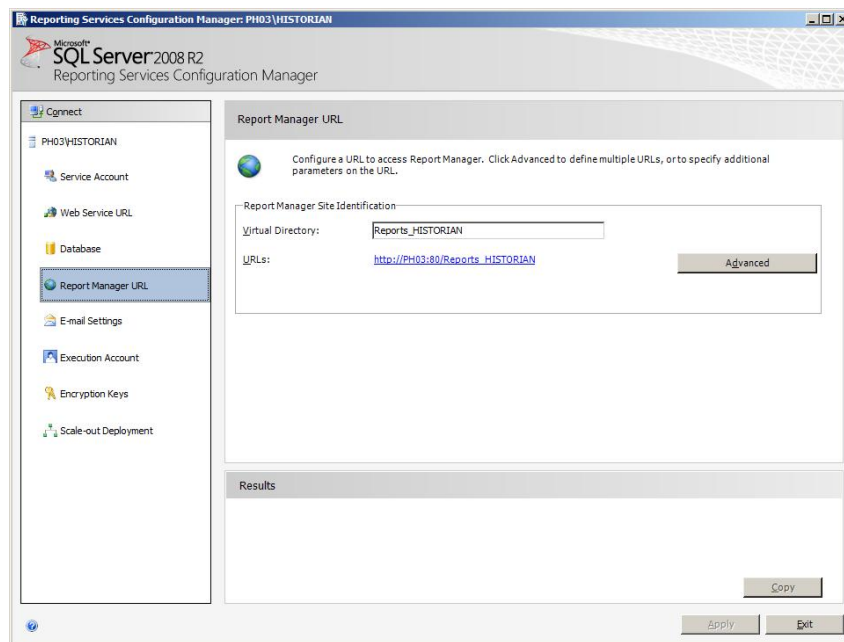


6 Troubleshooting

6.5 Checking the MS reporting services

4. Check the Report Manager URL.

Figure 6-25



6.6 Log files

The following log files are available for diagnosing PH, IS and PH Ready. Some of these log files are available in the "ProgramData" directory. This directory path must be displayed in the Windows Explorer.

Process Historian

C:\ProgramData\Siemens\Logs\ProcessHistorianUI.diagnostic.log

C:\ProgramData\Siemens\Logs\Processhistorian.diagnostic.log

C:\ProgramData\Siemens\Logs\MaintenanceServer.diagnostic.log

C:\ProgramData\Siemens\Logs\DiscoveryService.diagnostic.log

Information Server

The IS log files are available on the IS in directory

C:\ProgramData\Siemens\Automation\Logfiles

C:\Program Files (x86)\SIEMENS\InformationServer\log

PH-Ready on the WinCC server

The PH Ready log files are located on the WinCC server in directory

C:\ProgramData\Siemens\Logs\ProcessHistorian.

PH SQL server

C:\Programs\Microsoft SQL Server\MSSQL10_50.HISTORIAN\MSSQL\Log

IS SQL server

C:\Programs\Microsoft SQL Server\MSSQL10_50.INFSERVER\MSSQL\Log

6.7 Manual call of the Installation Wizard for the PH database

The Database Installation Wizard can be accessed via the following directory path:

C:\Program Files\SIEMENS\ProcessHistorian\bin\DatabaseInstallationWizard.exe

The Installation Wizard can be started with a double click.

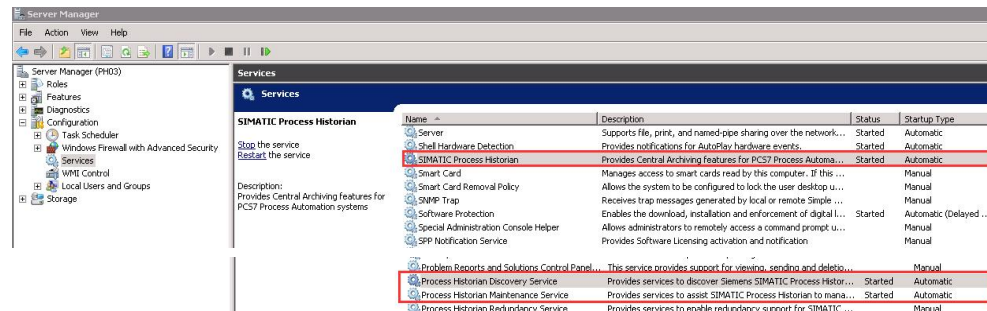
Note

If you rerun the Installation Wizard and the HistorianStorage database is attached at the SQL server, or when using the same storage path as the existing database, the existing database will be deleted and all data is lost.

Procedure

1. Stop the Process Historian services such as the SIMATIC Process Historian, Process Historian Discovery service, and Process Historian Maintenance service.

Figure 6-26



2. Use the right mouse button to click on the respective icon in the application list of the "Process Historian Discovers UI". In the context menu you select "Close".

Figure 6-27

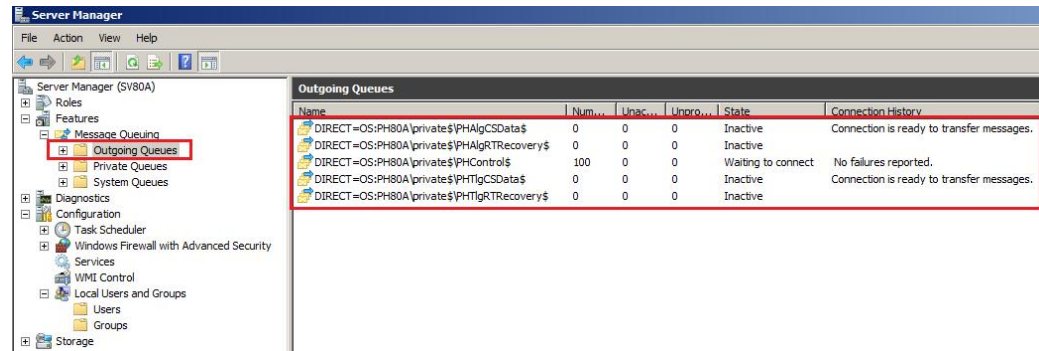


3. Double click on "C:\Program Files\SIEMENS\ProcessHistorian\bin\DatabaseInstallationWizard.exe".
4. Follow the instructions in chapter "Configuration of the PH database".

6.8 Starting the PHControl Message Queue

In rare cases, the PHControl Message Queue may be in the “Waiting to connect” state after starting WinCC Runtime or restarting the Process Historian.

Figure 6-28

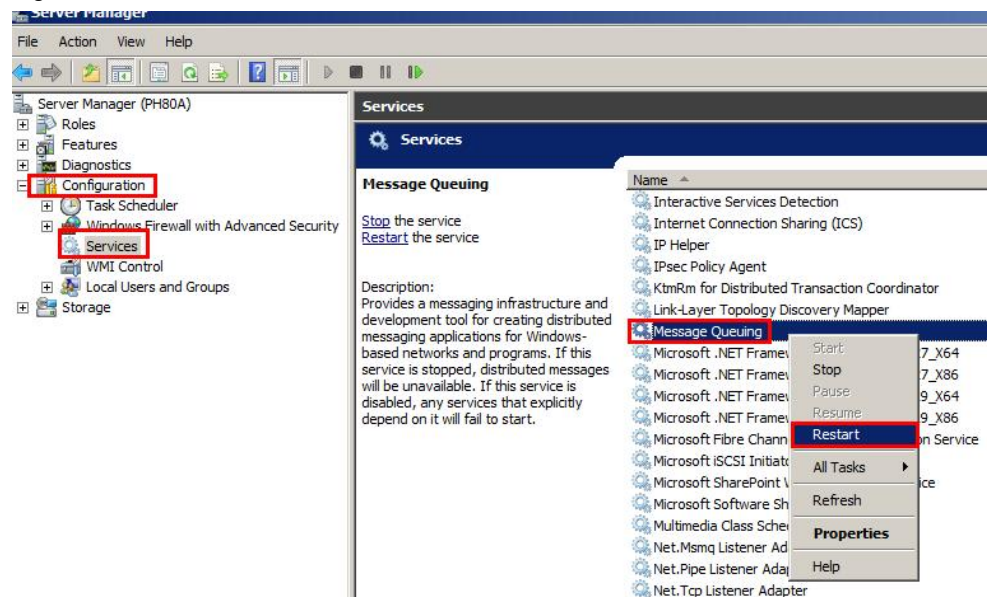


In this case, the Message Queuing Service must be restarted on the Process Historian.

Procedure

1. Start the Server Manager.
2. Navigate to the “Configuration\Services\Message Queuing” service
3. Open the context menu for the “Message Queuing” service and execute the “Restart” function.

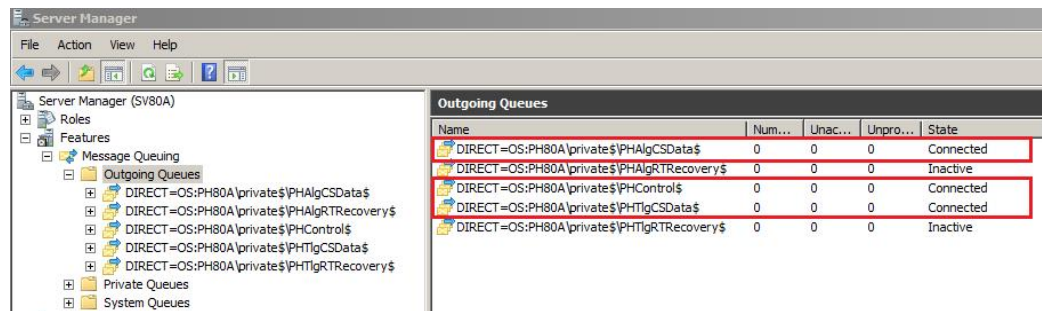
Figure 6-29



Result

After restart, the PHControl Message Queue is connected.

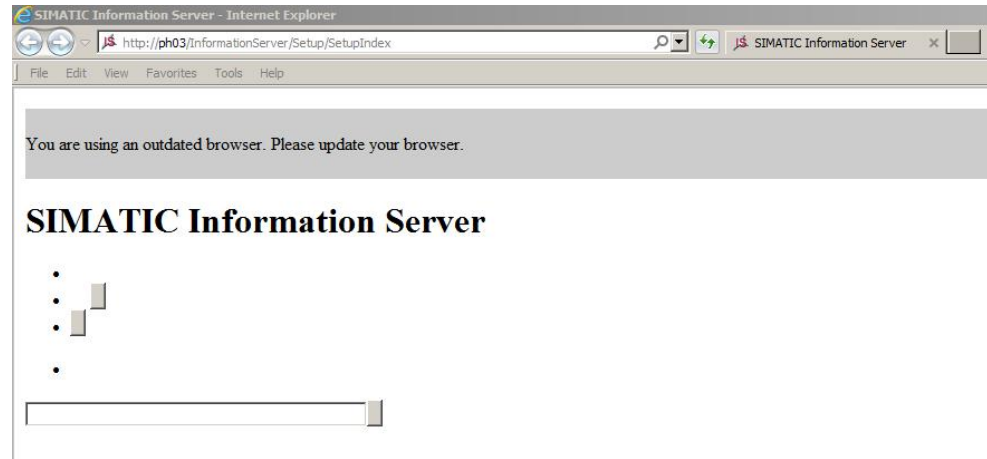
Figure 6-30



Name	Num...	Unac...	Unpro...	State
DIRECT=OS:PH80A\private\$\PHAlgCSDat\$	0	0	0	Connected
DIRECT=OS:PH80A\private\$\PHAlgRTRecovery\$	0	0	0	Inactive
DIRECT=OS:PH80A\private\$\PHControl\$	0	0	0	Connected
DIRECT=OS:PH80A\private\$\PHTlgCSDat\$	0	0	0	Connected
DIRECT=OS:PH80A\private\$\PHTlgRTRecovery\$	0	0	0	Inactive

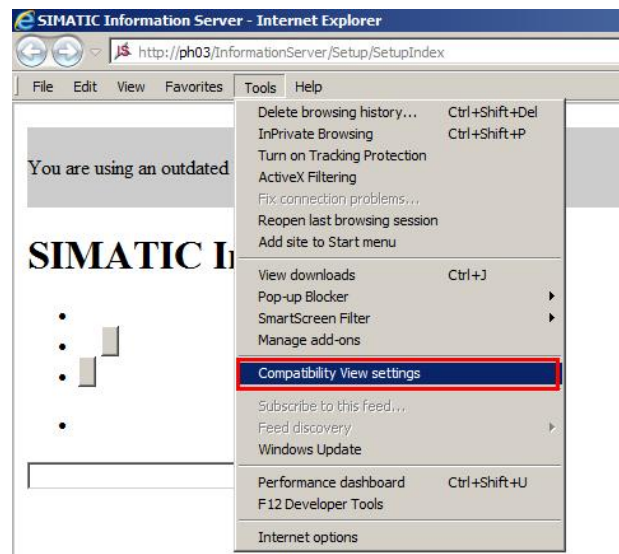
6.9 IS client message - “You are using an outdated browser. Please update your browser”

Figure 6-31



This message is caused by wrong “Compatibility view settings”.

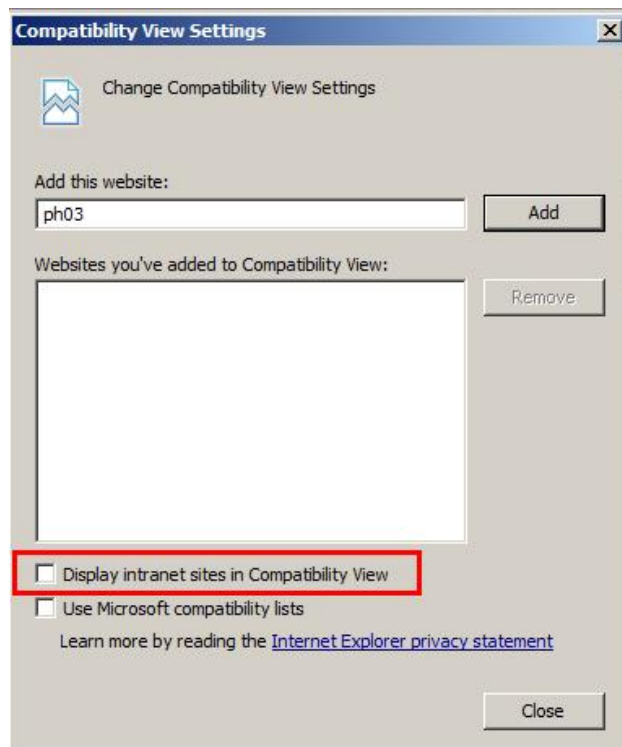
Figure 6-32



6.9 IS client message - "You are using an outdated browser. Please update your browser"

Remove the setting "Display intranet sites in Compatibility View"

Figure 6-33



7 Links & Literature

Table 7-1

	Topic
\1\	Siemens Industry Online Support https://support.industry.siemens.com
\2\	Download page of the entry https://support.industry.siemens.com/cs/ww/en/view/106264271
\3\	Creating a Process Historian based on an existing PH database https://support.industry.siemens.com/cs/ww/en/view/106264271
\4\	SIMATIC Information Server 2014 SP2 https://support.industry.siemens.com/cs/ww/en/view/109738439
\5\	SIMATIC Process Historian 2014 SP2 https://support.industry.siemens.com/cs/ww/en/view/109738440/81907907211
\6\	OPC UA Information model for SIMATIC Process Historian 2014 SP1 https://support.industry.siemens.com/cs/ww/en/view/109475340

8 History

Table 8-1

Version	Date	Modifications
V1.0	08/2015	First edition
V1.1	08/2016	Updated to SP2