

Installation Guide for smart-chart

Table of Contents

System Requirements	2
Installation Information.....	2
License Activation	3
How to activate the license?	3
How to transfer the license?	3
Silent Installation.....	4
Using a Microsoft® SQL Server	4
Microsoft® SQL server requirements	4
Connect an empty or existing SQL server database to smart-chart	5
Migration tool for smart-chart databases	5

System Requirements

Operating system: Windows® 10 1607 or later

Hardware: i5 2.5 GHz; i9 recommended, or equivalent (x86 & x64 architecture only)

Memory: 8 GB RAM, 32 GB recommended

Free hard-disk capacity: 4 GB during installation

Monitor resolution: 1920 x 1080 pixel; 4K recommended

Interface: Free USB-port

Installation Information

- **Administrator rights**
During installation full administrator rights are necessary.
- **Older smart-chart version installed**
smart-chart install program will automatically remove older versions of smart-chart being installed on the computer.
- **Software installation**
Download the zip-file, save it on your hard drive into a new folder and **extract** the complete archive. In the extracted folder, right mouse click on the file “install.exe” and select the option “Run as administrator”. Follow the setup instructions on the screen.
- **Default directory**
When using “Complete Installation” smart-chart is automatically installed in C:\Program Files (x86)\BYKWARE\smart-chart.
- **Instrument driver installation**
During installation you are asked to connect the instrument with the computer. In case the instrument driver is not installed automatically, please perform the following steps:
 - Close smart-chart and disconnect the instrument and browse to the installation directory \BykWare\smart-chart\Tools\.
 - Run the file \USBDriver\CDMXXXXX.exe as “Administrator”.
 - Run the file \USBBulkDriver\dpchooser.exe as “Administrator”.
 - Connect the instrument and start smart-chart again.

License Activation

After download the software can be used for 30 days free trial. Thereafter, the user needs to decide and register for the required software package. The standard delivery includes two licenses for the selected software package.

Instrument	Software package
BYK-mac i	smart-lab or smart-process (incl. smart-inline)
wave-scan	smart-process
cloud-runner	smart-process
haze-gard i	smart-lab
micro-gloss	smart-lab or smart-process for micro-gloss
spectro2guide	smart-lab or smart-process for spectro2guide
spectro2profiler	smart-lab or smart-process
PELT	smart-process for multi-layer thickness

How to activate the license?

- Before activating the license, make sure to have a reliable internet connection.
- Start smart-chart and click on "About/License" in the upper left corner of the screen.
- The license window opens and shows the license agreement.
- Connect the instrument with the computer and click on the "License" tab.
- Two license fields appear: one for smart-lab and one for smart-process. Select the desired software by clicking on the appropriate "Validate License" button.
- In case a license is available the button "Import Online License" appears. Click on this button, fill in the registration form and click on "Register".
- The activation of the license is shown in the upper "License Information" field.

How to transfer the license?

If smart-chart needs to be transferred to another computer, the license needs to be returned from the actual computer and activated on the new computer.

- Before returning the license, make sure to have a reliable internet connection.
- Start smart-chart and click on "About/License" in the upper left corner of the screen.
- The license window opens and shows the license agreement.
- Find the respective software license in the upper "License Information" field and click on the "Return License" button.
- A confirmation is shown that the license was successfully returned.

Note: In case your computer has no internet connection, a file for an offline request can be created. This file needs to be sent to your BYK-Gardner representative to create an offline license for this specific Installation. The license can be imported in smart-chart by using the "Import Offline License" function in the "About/License" menu.

Silent Installation

Using a software deployment tool, smart-chart can be installed silently.

Therefore, following prerequisites have to be installed:

- BYK USB-driver: [\Tools\USBBulkDriver](#)
- FTDI USB-driver: [\Tools\USBDriver](#)

The installation package is located in the subfolder `\smart_chart` of the installation package. The silent installation can be started with the command: `smsetup.exe /s`
When using smart-chart with μ PELT, PELT-Manager needs to be installed. The installation package is located in the subfolder `\Pelt` and can be installed with the command: `setup.exe /S`

Using a Microsoft® SQL Server

Two databases are used by smart-chart. In the so called `bykmaindb` all organizer and standards are stored. The measurements can be stored in separate measurement databases. As default local SQL server compact databases are used. These databases can be also hosted on a Microsoft SQL server what is highly recommended for multiple user access and an easier backup possibility for your local IT department.

Microsoft® SQL server requirements

- Microsoft® SQL Server 2008 or higher
- User rights:
 - `db_datareader`
 - `db_datawriter`
 - `db_ddladmin`
- Authentication
 - Trusted connection: This means, your windows credentials (user name and password) will be send to the SQL server as login parameters. This option can be used if they are registered on the server.
 - Standard security: If this option is activated, the user has to fill in the “User name” and “Password” within the database registered name and password. It can be common for all smart-chart users.
- Please ensure a performant connection to the SQL server otherwise the application can be slowed down during database access.

Connect an empty or existing SQL server database to smart-chart

Please make sure you are matching the requirements above when you want to create an empty database.

The databases can be connected in the configuration menu of smart-chart.

The bykmaindb can be connected at:

configuration/Standard Database/SQL Server connection

A measurement database can be connected at:

configuration/Measurement Database/SQL Server connection

Migration tool for smart-chart databases

If you want to migrate an existing database to an SQL server please follow these steps:

- 1) Create an empty SQL server database matching the requirements above.
- 2) Start the migration tool located in the installation directory:
`\BykWare\smart-chart\Tools\MigrationTool\MigrationTool.exe`
- 3) Link the source database.
- 4) Connect the empty SQL server database.
- 5) Start migration.
- 6) After the migration finished the SQL server database can be linked in smart-chart.