



**COPADATA**  
do it your way

# zenon manual

## Licensing

v.7.50





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# 1. Welcome to COPA-DATA help

## GENERAL HELP

If you cannot find any information you require in this help chapter or can think of anything that you would like added, please send an email to [documentation@copadata.com](mailto:documentation@copadata.com) (<mailto:documentation@copadata.com>).

## PROJECT SUPPORT

You can receive support for any real project you may have from our Support Team, who you can contact via email at [support@copadata.com](mailto:support@copadata.com) (<mailto:support@copadata.com>).

## LICENSES AND MODULES

If you find that you need other modules or licenses, our staff will be happy to help you. Email [sales@copadata.com](mailto:sales@copadata.com) (<mailto:sales@copadata.com>).

# 2. Licensing

To be able to use zenon as an editor or Runtime, the product must be licensed. zenon runs in Demo Mode (on page 6) until it has been licensed.

# 3. License zenon

To license zenon:

1. Open Start -> All Programs -> COPA-DATA-> **Licensing**

Or:

In the zenon Editor, open File -> General configuration -> License product ...

Or:

In the **Startup Tool**, click on the **Tools** button, select **Licensing** then click on **Start**.

2. The dialog for entering license data opens.
3. Select **zenon Editor/Runtime**
4. Enter serial number and activation number

You find the data for this:

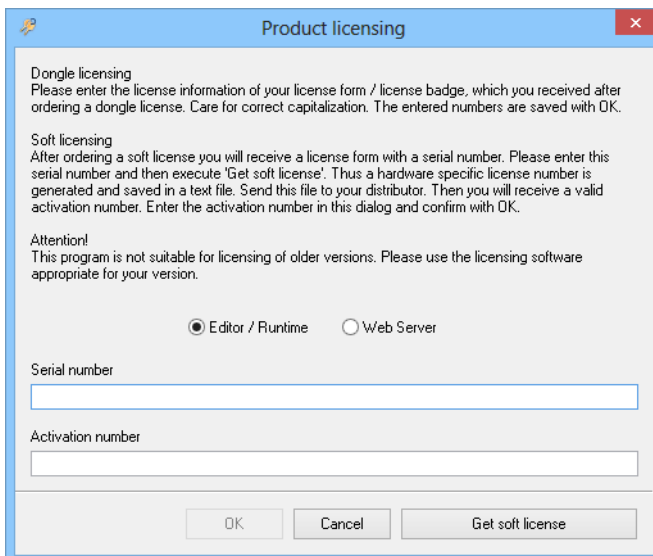
- on your license certificate
- On the license sticker
- in the license file **License.txt**

Path Windows 7/8: C:\Users\Public\Documents\zenon\_Projects\

**Note:** Pay attention to capital letters and small letters when entering the data!

5. After the Editor/Runtime is restarted, use zenon with the license entered

## LICENSING DIALOG



The image shows a 'Product licensing' dialog box with a blue title bar and a red close button. The dialog contains the following text:

**Dongle licensing**  
Please enter the license information of your license form / license badge, which you received after ordering a dongle license. Care for correct capitalization. The entered numbers are saved with OK.

**Soft licensing**  
After ordering a soft license you will receive a license form with a serial number. Please enter this serial number and then execute 'Get soft license'. Thus a hardware specific license number is generated and saved in a text file. Send this file to your distributor. Then you will receive a valid activation number. Enter the activation number in this dialog and confirm with OK.

**Attention!**  
This program is not suitable for licensing of older versions. Please use the licensing software appropriate for your version.

Below the text, there are two radio buttons: ☒ Editor / Runtime and ☐ Web Server.

There are two text input fields: 'Serial number' and 'Activation number'.

At the bottom, there are three buttons: 'OK', 'Cancel', and 'Get soft license'.

Parameters	Description
<b>Editor/Runtime</b>	Active: License is valid for the zenon Editor or the zenon Runtime.
<b>Web Server</b>	Active: License valid for zenon Web Server.
<b>Serial number</b>	License serial number. If there is already a license available, its serial number is displayed here. Enter the current serial number here.
<b>Activation number</b>	License activation number. If there is already a license available, its activation number is displayed here.
<b>OK</b>	Import data and start zenon with this license when it is next started.
<b>Cancel</b>	Discard entries and use zenon with the previous license or no license.
<b>Request soft license</b>	Opens the dialog to request a soft license.

## 4. Demo mode

If the editor is not licensed, it runs in demo mode. Runtime runs in demo mode if it is not licensed.

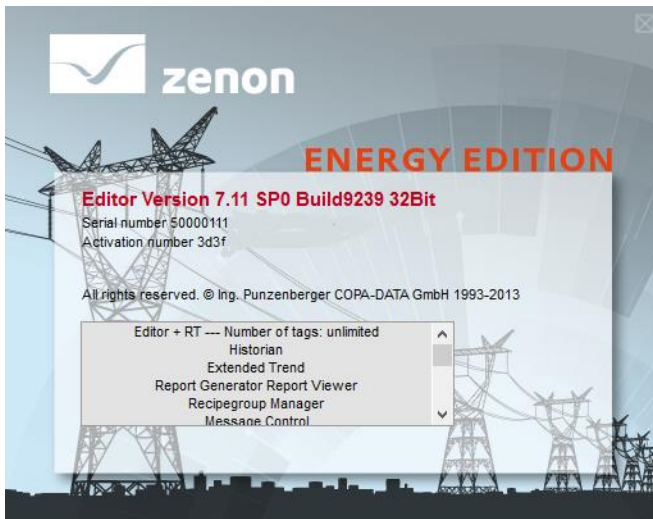
Demo mode	Conditions
<b>Editor:</b>	The Editor runs: <ul style="list-style-type: none"> <li>▶ the first 40 times it is started for 30 minutes</li> <li>▶ from the 41st to the 50th Start: 20 minutes</li> <li>▶ from the 51st Start at: 10 minutes</li> </ul>
<b>Runtime:</b>	A not-licensed Runtime runs for 30 days or 40 starts according to which comes first. From the 41st start or the 31st day on, Runtime only runs for 10 minutes.

The user is informed that it is running in demo mode when it starts.

**Note:** This behavior for unlicensed version is also applicable to the zenon Logic Workbench and Runtime.

## 5. Version information

You can see which license you are currently using and which modules are included in this when starting zenon in the start screen or after clicking on **Info on...** in the **Help** menu:



Parameters	Description
<b>Editor version</b>	Editor version number.
<b>Serial Number</b>	License serial number.
<b>Activation number</b>	License activation number.
<b>Expiration time (optional)</b>	Information on the expiration date of the license for limited licenses.
<b>Field with modules:</b>	Information on licensed module.

In menu **Help** the entry **Info about** opens a dialog box which offers information about the zenon version and the licensing.

## 6. Selecting the appropriate license size

The licenses for the Editor and the Runtime are calculated by adding up the necessary TAGs or IOs.

### CALCULATION VIA TAGS

1 TAG equals 1 variable. For determining the license size, consider the total number of TAGs (= variables) of the following drivers:

- ▶ PLC drivers and bus drivers

Variables of the following drivers do not count:

- ▶ Internal driver
- ▶ system driver
- ▶ mathematics driver
- ▶ simulation driver

You can license TAGs for the Editor and the Runtime in the following gradation:

- ▶ 64 TAGs
- ▶ 128 TAGs
- ▶ 256 TAGs
- ▶ 512 TAGs
- ▶ 1,024 TAGs
- ▶ 2,048 TAGs
- ▶ 4,096 TAGs
- ▶ 8,192 TAGs
- ▶ 16,384 TAGs
- ▶ 65536 TAGs
- ▶ unlimited

A license upgrade to a higher number of TAGs is possible at any time.

## **CALCULATION VIA IOS**

License can also be based on I/Os. For determining the license size, consider the total number of I/Os of the following drivers:

- ▶ PLC drivers and bus drivers

Variables of the following drivers do not count:

- ▶ Internal driver
- ▶ system driver
- ▶ mathematics driver
- ▶ simulation driver



## CALCULATION

Data type	Valence
1 bit	1 I/Os
1 byte	8 I/Os
1 WORD	16 I/Os
1 DWORD	16 I/Os
1 float	16 I/Os
1 string (max. 64 characters)	16 I/Os

If you cannot find the desired data type in the list, it is because of the selected driver. Some drivers have a specific denotation of the data types. You will find more information in the driver documentation of the driver you use. You will find this either in the online help in the **Drivers** section, as a PDF file on our installation medium or on our website [www.copadata.com](http://www.copadata.com) (<http://www.copadata.com>) in the download section.



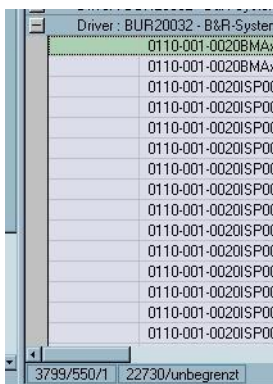
### Example

96 binary and 20 numerical values are to be visualized in zenon:

*Multiply the 20 numeric values with 16 and you receive 320 I/Os. Add these to the 96 binary values. As a result you get 416 I/Os, which now are the basis for the license size.*

## DISPLAY IN ZENON

In the status line of the detail view of the variables the following information can be found:



- ▶ How many I/Os are used currently.
- ▶ How many I/Os are licensed.

An example:

- ▶ 3799/550/1: 3799 entries exist, 550 are listed because of a filter, one entry is selected.
- ▶ For project 22730 an unlimited number of I/Os is licensed.

## NOTE FOR CLIENT LICENSE

You can use client licenses if:

- ▶ The start project is a standalone project or a client
- ▶ The start project uses a maximum of 64 TAGs when a license is required, if it is not a client
- ▶ All subprojects are clients

## 7. Types of licensing

You can license zenon in different ways:

- ▶ Soft licensing (on page 11): Requests a unique PC identification number when the editor or Runtime is started.  
Characteristics:
  - The license cannot be stolen.
  - The license is computer related.
  - Practical for notebooks.
- ▶ Dongle licensing (on page 12): Looks for a hardware dongle at a parallel port or USB port when the editor or Runtime is started.

Dongles are available as:

- Workplace dongle:
- Network dongle: A certain number of licenses are booked on a central dongle on the network, which can be used at the same time as concurrent-use licenses.

Notes for dongles:

- easy handling
- A license can be taken from one PC to another by simply moving the dongle.
- No problems due to hard disk failures



### Information

*If there is no license or all licenses are assigned in the network, then the editor or Runtime starts in demo mode (on page 6).*

## 7.1 Soft licensing

The soft license assigns a computer with a unique identification. In doing so, certain components of the computer are examined. This license always only works on a certain computer. If it is to be transferred to another computer or too many components on the licensed computer are changed, it must be reissued.

To obtain a software license:

1. In the File menu, select: General configuration -> License product.
2. The licensing dialog (on page 4) opens.
3. Enter the serial number.
4. Click on **Request soft license**.
5. The **product licensing** dialog opens.  
If this has not yet happened, enter the serial number.
6. Click on **License request for soft licensing**.
7. Enter your contact details.
8. click on **Next**.
9. There are two possibilities for sending these:
  - a) automatic
    - Click on the **Send to** button
    - Select the desired COPA-DATA organization
    - When clicking on **OK**, the license request is sent by your email program
    - via button **Print** you can print your copy or send it to a connected fax machine
  - a) manually
    - Click on the **Finish** button
    - The license request is saved as a text file
    - An information window informs you of the name and save location

- the file is automatically opened in the Text Editor
- send the email by email or fax to your sales partner

As soon as you have received your license data, reopen the licensing dialog and enter your activation number.

## 7.2 Dongle licensing

With dongle licensing, a dongle is connected directly to the computer for an individual workspace license or to a network computer for a network license. zenon uses two dongle systems:

- ▶ CodeMeter (on page 13)  
(included with setup)
- ▶ WibuKey (on page 34)  
(software included on installation medium)

Software necessary for the installation of CodeMeter licensing is also automatically installed during the installation of zenon.

### WIBUKEY

The additional WibuKey administration software is no longer automatically installed with the setup from zenon version 7.50.

This software is however supplied with zenon. If necessary, install the current version of the **WibuKey** software from your zenon installation medium:

- ▶ `\AdditionalSoftware\WIBU-SYSTEMS WibuKey`

**Note:** Users who already work with WibuKey continue to receive new licenses for their WibuKey dongles.

### CONFIGURATION

In general, no further settings need to be made for dongles used locally. The use of network dongles may mean that individual configuration is necessary. You can find these in the respective dongle software.

For details of this, see the chapters on the WibuKey (on page 34) and CodeMeter (on page 13).

### 7.2.1 CodeMeter

CodeMeter can be used at a single workplace or in a network. The CodeMeter USB stick must be active in a USB port on the local computer or as a server on a network computer. The dongle firmware must be at least version 1.16 or above.



#### Attention

*If the dongle is removed during operation, the editor closes. The editor then opens in demo mode until a valid license is recognized.*

To configure, start the **CodeMeter control center** administration application via: Windows Desktop -> Start -> All programs -> CodeMeter -> CodeMeter Control Center.

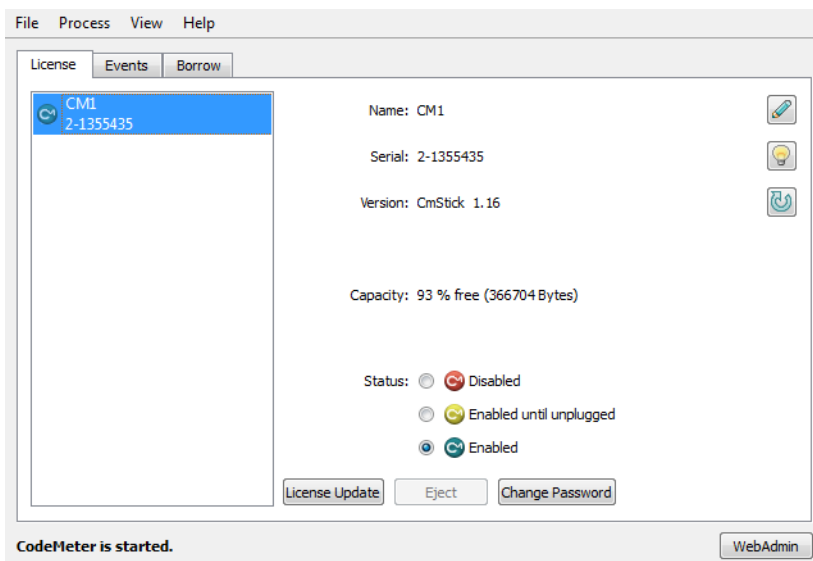
The CodeMeter control centre opens with 3 tabs:

**License** contains information on the dongles found.

**Events:** Displays the number of sticks connected, the license entries, the firm items found and all access to the CodeMeter Runtime server. To log the entries on a permanent basis, activate the **logging** entry in the file menu.

**Allocation:** Configures the allocation of licenses.

### LICENSE



Parameters	Description
<b>License</b>	Lists all active CodeMeter sticks
<b>Name</b>	Individual name of the stick selected; can be assigned with the button on the right.
<b>Serial no._</b>	Serial number of the stick selected.
<b>Version</b>	Firmware version of the selected stick.
<b>Status</b>	Status of the selected CodeMeter stick.
Deactivated	The stick connected is deactivated and cannot be used by any application.
Activates when connected	The Stick is activated so long as it is connected; it is automatically deactivated after it is removed from the PC.
Activated	The stick is fully activated and remains activated after it is removed.  Recommended status: Ensures that unauthorized persons do not have access to licenses and personal data (such as CmPasswordManager) if the stick is lost.
<b>License updating</b>	Starts the assistant to add, amend and delete licenses.
<b>Eject</b>	Allows the stick to be ejected.
<b>Change password</b>	Enables the password to be changed.
<b>CodeMeter has been started/stopped</b>	Information on whether the CodeMeter service is running. Can be changed in the <b>Action</b> menu.
<b>WebAdmin</b>	Starts the web browser with the administration user interface for network dongles Port 22350 must be open for this, for details, see the chapter on network administration (on page 15).

## Update certified time

You can update the certified time saved in the dongle via the CodeMeter time server. To do this, you need an active Internet connection.

To update the time:

1. Start the CodeMeter WebAdmin
2. Check your network settings (on page 21):
  - a) Are the proxy settings correct in CodeMeter Webadmin?

- b) Is your access data up-to-date?
3. Go to the Contents -> CmStick menu
4. Click on the **Update** button.
5. You are notified that all sticks have been updated with this.
6. Click on **OK**.
7. You receive information on the update carried out. In the event of an error message (on page 28), you primarily check your access data.



## Network administration

For network administration, start the WebAdmin user interface by clicking on the **WebAdmin** button in the CodeMeter control center. Detailed information on the individual settings can be found in the CodeMeter WebAdmin help pages. You get to this via the **Help** button in WebAdmin. The most important options and instructions are also in this document:

- ▶ CodeMeter stick administration (on page 16)
- ▶ License administration (on page 17)
- ▶ Saving license data (on page 17)
- ▶ Network settings (on page 21)
- ▶ Proxy settings (on page 21)



### Attention

*CodeMeter WebAdmin uses port 22350. Note:*

- ▶ If a firewall other than that integrated into the Windows operating system is used, this port must be enabled.
- ▶ If the port is changed, the WebAdmin surface cannot be started, because the port is part of the address, for example:  
`http://localhost:22350/Content.html?BoxSerial=2-1355435`

In this case, use appropriate freeware tools or standard Windows tools to determine which port is currently being used and enter this address into the address line of the browsers instead of 22350. Then change the port back to 22350 in WebAdmin.

## CodeMeter sticks

WebAdmin starts in **Contents/CmStick** view.

Here, you select the desired dongle in a drop-down list and can see its data and status as configured in the **control center** (on page 13).





Parameters	Description
<b>CmStick</b>	Drop-down list of recognized sticks.
<b>Name</b>	Shows the name given in the control center (on page 13).
<b>Hardware</b>	Hardware version of the stick.
<b>First drive</b>	Drive information for the stick, drive sizes are only given for sticks with flash memory.
<b>Status</b>	Activation status as defined in the control center (on page 13).
<b>Certified time</b> (on page 14)	<p>The certified time saved on the stick. is updated using the <b>update</b> button.</p> <p>Note: to update using the CodeMeter Timeserver, you require an active internet connection. Ensure that the network settings (on page 21) are correct, in particular in relation to current access data.</p>
<b>Box time</b>	Internal time saved on the stick.
<b>System time</b>	Local time on the CodeMeter Runtime server.
<b>Free memory</b>	Free memory available on the stick. To defragment the memory, click on the <b>Defragment</b> button.

## Licenses

You administer your licenses in the **Licenses** tab in the **Contents** menu.

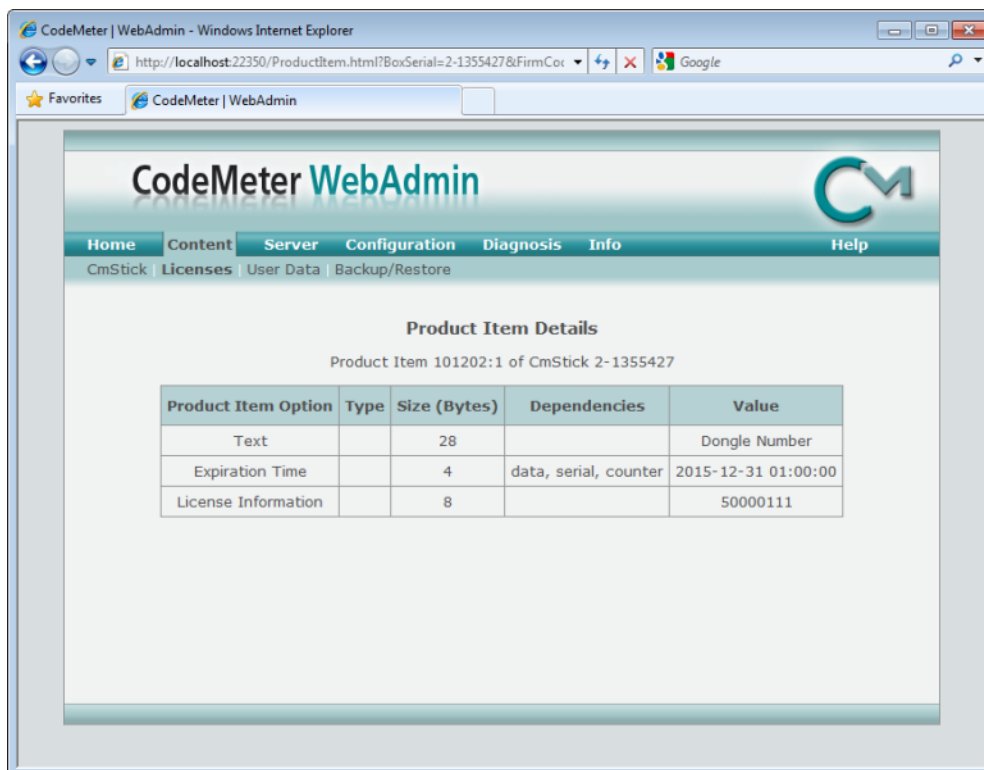
- Select the desired dongle from the drop-down list.

- You can find information on the licenses of these dongles below the **Ing. Punzenberger COPA-DATA GmbH** subheading.



Parameters	Description
Product Code	Numerical value for the product. Clicking on the number leads to the details.
Name	<b>Ing. Punzenberger COPA-DATA GmbH</b>
Usage units	If applicable, display of usage units remaining.
Expiration date	If applicable, the expiration date is shown. zenon switches to demo mode (on page 6) after this point in time.
Activation date	If applicable, the activation date is shown. zenon switches to demo mode (on page 6) before than.
Number of licenses	Total number of licenses

- Click on the number in the **Product Code** column for details.



Parameters	Description
Dongle number	Must correspond with the number of the active dongle.

## TIME LIMITS

A dongle can also have a time limit:

- Expiration date

- Time period for use

## EXPIRATION DATE

The dongle is equipped with an expiration date.

In the **Licenses** tab in the **Contents** menu, the expiration date is given in the expiration date column with the date and time in UTC format.

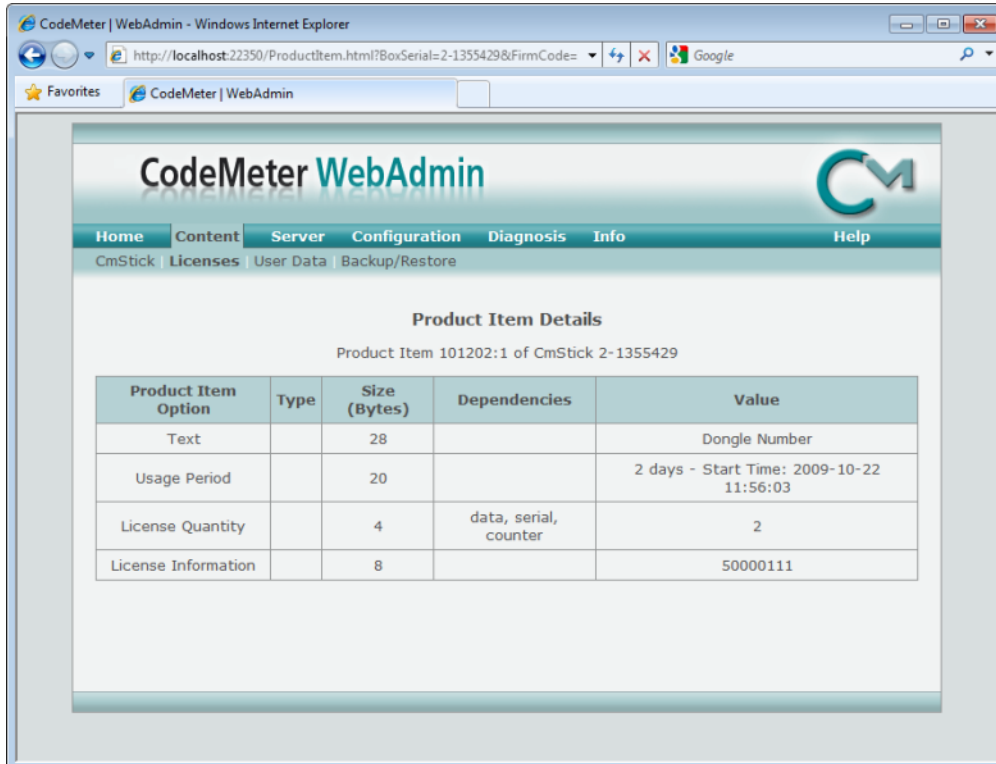


## TIME PERIOD FOR USE

The dongle is equipped with a specified usage period. This starts from the first time that zenon Editor or Runtime is used. To check the time limit:

- Navigate to the **Licenses** tab in the **Contents** menu
- Click in the entry under **Ing. Punzenberger COPA-DATA GmbH** on the digit in the Product Code column
- The **Product Item Details** window opens

- You can see the licensed period and the start date in UTC format in the **Usage period** line.



The screenshot shows the CodeMeter WebAdmin interface in a Windows Internet Explorer browser. The address bar displays the URL: `http://localhost:22350/ProductItem.html?BoxSerial=2-1355429&FirmCode=`. The page title is "CodeMeter WebAdmin". The navigation menu includes: Home, Content, Server, Configuration, Diagnosis, Info, and Help. Below the menu, there are links for CmStick, Licenses, User Data, and Backup/Restore. The main content area is titled "Product Item Details" and shows "Product Item 101202:1 of CmStick 2-1355429". A table displays the following data:

Product Item Option	Type	Size (Bytes)	Dependencies	Value
Text		28		Dongle Number
Usage Period		20		2 days - Start Time: 2009-10-22 11:56:03
License Quantity		4	data, serial, counter	2
License Information		8		50000111

## Network and Proxy

For faultless communication with a Network dongle and the start of WebAdmin, correct network settings are a requirement.



The screenshot shows the CodeMeter WebAdmin Network configuration page. The navigation menu includes: Home, Content, Server, Configuration, Diagnosis, Info, and Help. Below the menu, there are links for Network, Proxy, Access Control, Certified Time, WebAdmin, Backup, and Borrowing. The main content area is titled "Network" and contains the following configuration options:

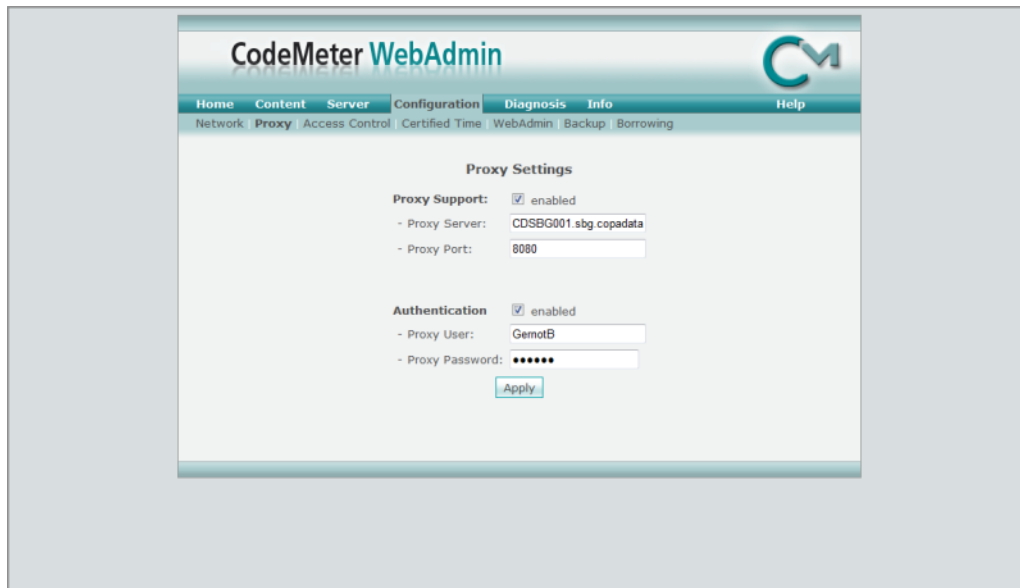
- Bind Address \*: All (Default) (dropdown menu)
- Network Port \*: 22350 (text input)
- UDP Waiting Time \*: 1000 ms (text input)
- Run Network Server: ☐
- Server Search List: (text area)
- Buttons: add, remove, up, down, Apply, Default

(\*) Changes only take effect after restarting CodeMeter

Parameters	Description
Network address	<p>Select an IP address to which the CodeMeter Runtime server should connect.</p> <p><b>Standard:</b> All .</p> <p>The connection is made to the first CodeMeter Runtime server found.</p> <p>The choice of a defined address is primarily necessary if the computer is functioning as a network license server and has several network cards.</p>
Network port	<p>Port for CodeMeter communication in the network.</p> <p><b>Standard:</b> 22350</p> <p>The value can be adjusted individually. In this case, it must be ensured that all CodeMeter Runtime servers use the same port.</p> <p><b>Recommendation:</b> do not change port.</p>
UDP response time	<p>Maximum response time within which a UDP request must be answered.</p> <p><b>Standard:</b> 1000 milliseconds.</p>
Start as server	<p><b>Active:</b> The computer becomes a CodeMeter network server and makes all its licenses available in the network.</p>
Server search list	<p>Here, specific CodeMeter network servers can be defined by entering computer names or IP addresses. Then only the servers defined in the list are searched for. This way, requests from clients are directed to a defined CodeMeter Network server.</p> <p><b>Note:</b> If a CodeMeter Server is in a different subnetwork, use the IP address for the search list.</p> <p>This search list should only be used if the CM stick cannot be found in the network.</p>

## PROXY SETTINGS

For access to CodeMeter services in the internet, such as time server, enter the applicable access data for your company here.



### Attention

*CodeMeter notes this access data. If you regularly change your access password, you must also change this in the CodeMeter WebAdmin proxy settings!*

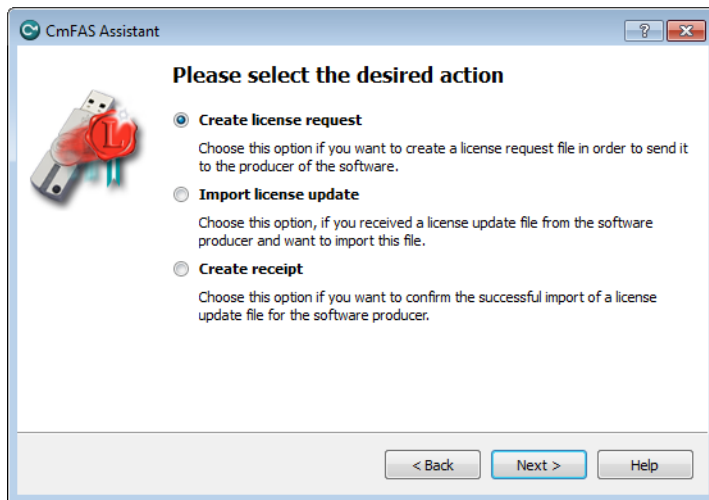
## Request license

To request or update licenses for CodeMeter, select the **Update license** button in the **Licenses** tab in the CodeMeter control center (on page 13). The license update assistant starts:



Decide if you are:

- ▶ requesting a license
- ▶ entering a license update
- ▶ wish to create a receipt for COPA-DATA



## LICENSE REQUEST

With license requests, you can:

- ▶ extend an existing COPA-DATA license
- ▶ create a new COPA-DATA license



- ▶ To add another COPA-DATA license:
  - Select **Ing. Punzenberger COPA-DATA GmbH**
- ▶ To create a new COPA-DATA license:
  - enter the CodeMeter FirmCode that you received from COPA-DATA.



- ▶ Select a save location for your license request.

## Adapt license

You can adapt the scope of your license concerning extent and runtime at any time. To do this:

1. order the desired change at COPA-DATA
2. You will receive a \*.WibuCmRaU file for your dongle.
3. install it:
  - a) either via double click on the file
  - b) or by dragging the file ion the **CodeMeter control center**
4. You will receive a message about successfully updating your license.

If you receive error message (on page 28) **229**, the license on the dongle is already up to date

If it is necessary for your license request to create a .WibuCmRaC file or to install the .WibuCmRaU file with the update manually, follow the instructions in chapter **Update license manually** (on page 25).

## Request or update license

To update your license manually:

1. create a .WibuCmRaC file
2. send the file to COPA-DATA
3. you will get an updated .WibuCmRaU file
4. copy this to the dongle

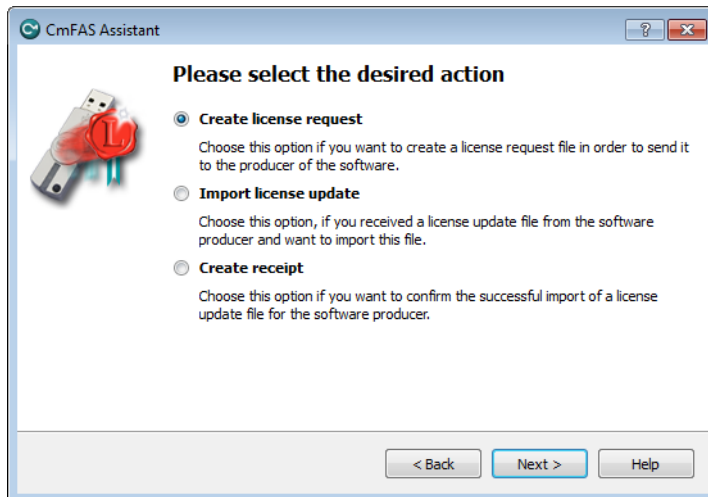
## CREATE WIBUCMRAC FILE

1. Make sure that the CodeMeter dongle is connected to your PC.
2. open the CodeMeter control center, e.g. via Start -> Programs -> CodeMeter -> CodeMeter Control Center
3. on tab **License** click button **Update License**
4. The license update assistant starts

5. click on **Next**

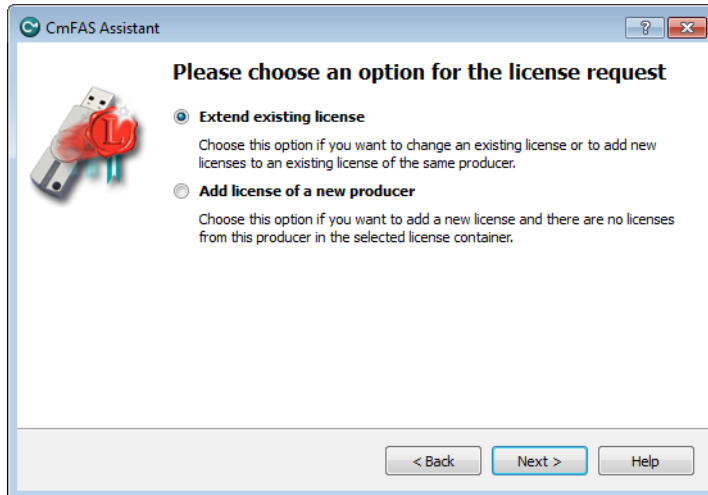


6. select **Create license** and click **Next**.



7. select **Enhance existing license**

8. click on **Next**



9. in the following dialog click **Next** again
10. select the desired location for the appropriated .WibuCmRaC file
11. click on **Apply**
12. the .WibuCmRaC file is created
13. send the file to sales@copadata.com

## INSTALL WIBUCMRAU FILE

You will receive an updated \*.WibuCmRaU file from COPA-DATA.

Install the file via double click on the file on the dongle.

Alternative:

1. open the CodeMeter control center
2. select install license update
3. follow the instructions of the installation wizard

## Troubleshooting

Error	Solution
<b>zenon only runs in demo mode.</b>	<p>Check</p> <ul style="list-style-type: none"> <li>▶ your licenses</li> <li>▶ The connection to the network dongle</li> <li>▶ if the license information (SERIAL7= and ACTIVATIONKEY7=) was correctly entered in zenon6.ini. Note any possible blank spaces behind the serial number (SERIAL7=) or the activation key (ACTIVATIONKEY7=). Path for zenon6.ini: Windows /7/8: %ProgramData%\COPA-DATA\System</li> </ul>
<b>Dongle is not found.</b>	<ul style="list-style-type: none"> <li>▶ Check the network settings (on page 21).</li> <li>▶ If the stick is in another domain, add it to the server list (on page 21).</li> <li>▶ Increase the UDP response time (on page 21).</li> <li>▶ If it is a virtual machine, then configure the stick as <b>removable media</b> (on page 29). <i>Attention:</i> Configuration as removable media can - depending on the computer configuration - also lead to a computer no longer booting.</li> <li>▶ Configure the stick as HID (on page 30).</li> </ul>
<b>Error 410</b> (with SD cards)	<p>The connection to the SD card is unstable.</p> <p>Use an external card reader.</p>
<b>Certified time cannot be updated.</b>	<p>Please check:</p> <ul style="list-style-type: none"> <li>▶ Proxy settings (on page 21), especially access data and Password</li> <li>▶ List of time server under Settings -&gt; time server for example: cmtime.codemeter.com, cmtime.codemeter.de, cmtime.codemeter.fr, cmtime.codemeter.us</li> </ul>
<p>Error message at updating the license:</p> <p><b>Error at updating the CmSticks x-xxxxxxx: This update can no longer be read in. The content of the CmStick has a newer version, error229.</b></p>	<p>The update for this license has already been written to the dongle. The dongle is up-to-date.</p>

<p>Windows operating system shows the message:</p> <p><b>Low Memory</b></p>	<p>The dongle is identified as local memory. In some cases, this can lead to the operating system giving the message "Insufficient memory".</p> <p>This message can be ignored.</p> <p>Alternatively, the dongle can also be configured as removable media. For details on configuration, see the <b>Configure dongle as removable media or HID device</b> (on page 29) section.</p> <p><b>Attention:</b> Configuration as removable media can - depending on the computer configuration - also lead to a computer no longer booting.</p>
<p>Windows operating system no longer shows symbol for the Recycle Bin.</p>	<p>This may happen if the dongle is identified as a fixed local network.</p> <p>Alternatively, the dongle can also be configured as removable media. For details on configuration, see the <b>Configure dongle as removable media or HID device</b> (on page 29) section.</p> <p><b>Attention:</b> Configuration as removable media can - depending on the computer configuration - also lead to a computer no longer booting.</p>

### Configure dongle as HID, mass-storage device or removable media

The dongle is integrated into the system as an HID device by default. This configuration is recommended. The dongle can also be configured as a local mass-storage device or removable media.

## CONFIGURATIONS

Configured as:	Description	Limitations
<b>HID device</b>	<p>The dongle:</p> <ul style="list-style-type: none"> <li>▶ Is not displayed in the list of available drives</li> <li>▶ Is not allocated a drive letter.</li> </ul>	Only available for CodeMeter dongles without memory.
<b>Local mass-storage device</b>	<p>The dongle is displayed and managed as a local drive.</p> <p>For configuration, see the <b>Configure dongle as an HID device or mass-storage device</b> (on page 30) section.</p>	<p>Can lead to:</p> <ul style="list-style-type: none"> <li>▶ The operating system reporting too little memory for the dongle</li> <li>▶ the icon for the Windows Recycle Bin no longer being displayed</li> <li>▶ the dongle not being found in virtual machines</li> </ul>
<b>Removable media</b>	<p>The dongle is displayed and managed as removable media.</p> <p>For details about configuration see the <b>Configure dongle as removable media</b> chapter.</p>	<p><i>With configuration as removable media:</i></p> <ul style="list-style-type: none"> <li>▶ The booting of the computer can be prevented for with computers that can boot from a USB drive</li> <li>▶ The dongle appears as a drive in the task bar and can be removed (ejected) at any time</li> </ul>

### Configure dongle as an HID device or mass-storage device

CodeMeter supports, from version 5.0, the **Human Interface Device (HID)** device class of USB standards. CodeMeter dongles can therefore log onto the system as an HID (human interface device) instead of a mass storage device. Special USB host drivers do not need to be installed for configuration, because the functionality is provided by the operating system. The dongle is thus not shown in the list of available drives and is not allocated a drive letter. HID support is available for all CodeMeter dongles without memory.

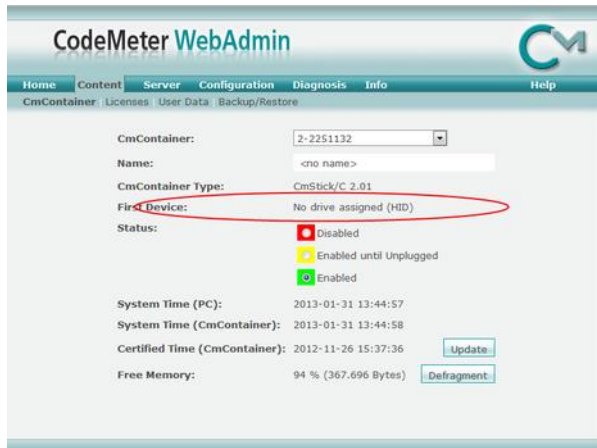
#### Requirements:

- ▶ CodeMeter container with the identification "2-xxxxxxx" or "3-xxxxxxx".
- ▶ CodeMeter firmware 2.02 or higher.
- ▶ CodeMeter Runtime 5.0 or higher. Should the version of CodeMeter that you have installed be less, you can download the current CodeMeter Runtime from Wibu Systems ([www.wibu.com](http://www.wibu.com) (<http://www.wibu.com/support-downloads.html>)).

## HID TO MASS STORAGE DEVICE

To switch the USB communication from human interface device (HID) to mass storage device:

1. Check, in **CodeMeter WebAdmin**, the status in the **Content (CmContainer)** tab.
2. No drive is assigned.



3. Call up the CodeMeter command line interface **cmu**: Start -> Program Files -> CodeMeter -> Tools -> CodeMeter Command Prompt.
4. Enter the following commands in the command line interface that has been called up:
5. The current status is displayed in the following output from the command line interface:

**C:\Users\fs>cmu32 /s [box mask-serial number] --set-config-disk MsdCommunication**

**cmu32 - CodeMeter Universal Support Tool.**

**Version 5.00 of 2013-Jan-30 (Build 1039) for Win32**

**Copyright (C) 2007-2013 by WIBU-SYSTEMS AG. All rights reserved.**

**- CmStick/C with Serial Number 2-2251132 and version 2.01**

**Version: 2.01**

**Flash Size: no real flash available**

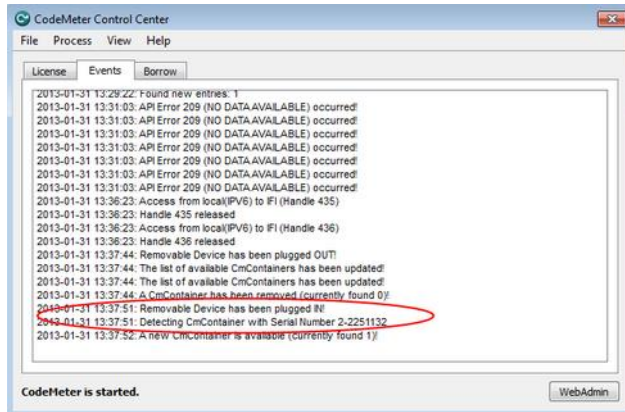
**Virtual Drive: No drive assigned (HID)**

**Communication: Human Interface Device (HID)**

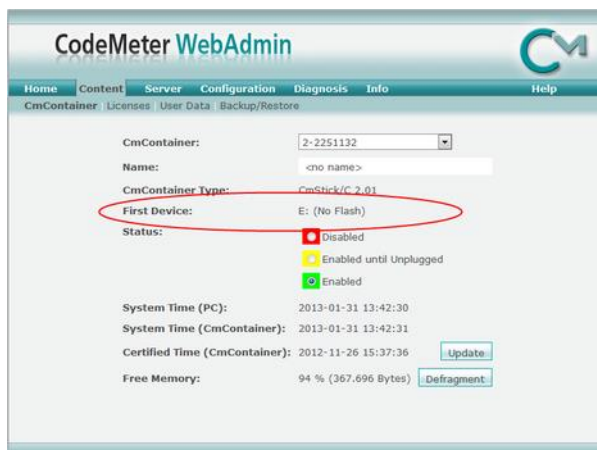
**Please replug your CmDongle to apply the changes.**

6. Remove the dongle from the computer.
7. Reconnect the dongle to the computer.

8. In the **CodeMeter Control Center**, the switch to MSD is shown in the **Events** tab.



9. Check the drive in **CodeMeter WebAdmin**, in the **Content/CmContainer** tab. A drive is entered but there is no flash memory.



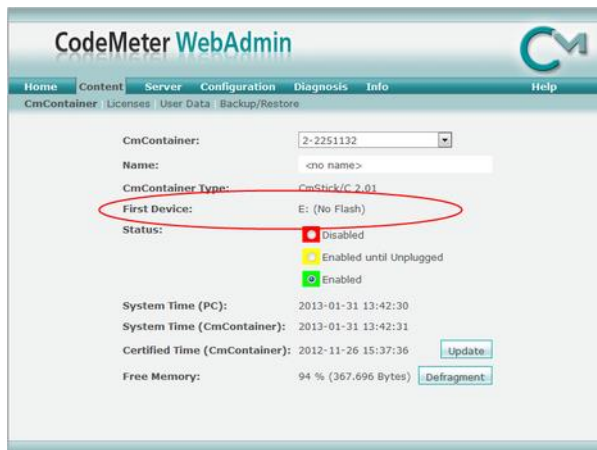
## MASS STORAGE DEVICE TO HID

To switch USB communication from mass storage device to human interface device:

1. Check, in **CodeMeter WebAdmin**, the status in the **Content (CmContainer)** tab.



2. A drive is assigned but there is no flash memory.



3. Call up the CodeMeter command line interface **cmu**: Start -> Program Files -> CodeMeter -> Tools -> CodeMeter Command Prompt.

4. Enter the following commands in the command line interface that has been called up:

**cmu32 /s [Boxenmaske-Seriennummer] --set-config-disk HidCommunication**

5. The current status is displayed in the following output from the command line interface:

**cmu32 - CodeMeter Universal Support Tool.**

**Version 5.00 of 2013-Jan-30 (Build 1039) for Win32**

**Copyright (C) 2007-2013 by WIBU-SYSTEMS AG. All rights reserved.**

**- CmStick/C with Serial Number 2-2251132 and version 2.01**

**Version: 2.01**

**Flash Size: no real flash available**

**Virtual Drive: E:**

**Configuration: LocalDisk with ActivePartition**

**File System: FAT32**

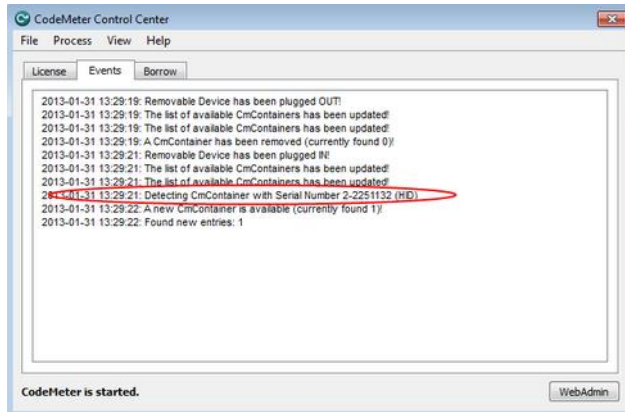
**Communication: Mass Storage Device**

**Boot-Code: Int18 Boot Code**

**Mdfa: 0x539**

6. Remove the dongle from the computer.
7. Reconnect the dongle to the computer.

8. In the **CodeMeter Control Center**, the switch to HID is shown in the **Events** tab.



9. Check the drive in **CodeMeter WebAdmin**, in the **Content/CmContainer** tab. Nothing should be entered.



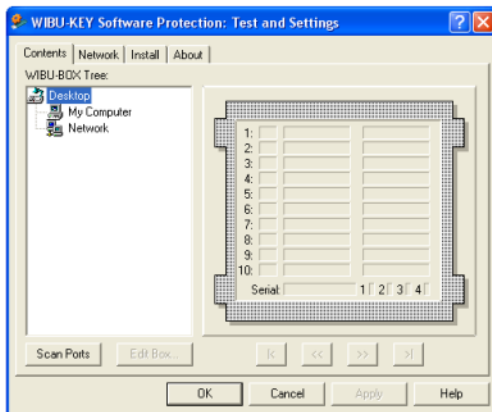
## 7.2.2 WibuKey

WibuKey can be used at a single workplace or in a network. The dongle must be active in a USB port or parallel port on the local computer or as a server on a network computer.

To check the settings of the stick:

1. Install the WibuKey administration software from the installation medium.  
Save location:  
\\AdditionalSoftware\\WIBU-SYSTEMS WibuKey  
Use this software for licensing with the network dongle.
2. Open the **Control Panel**.

3. Open the **WibuKey** system control element.
4. Select the stick to be tested on the local computer or on the network.  
To list server Wibu boxes in the network, click on the **Read in** button.
5. Check if the number in the last column of the second row is identical with the starting number of the stick.



You can read more about the operation of the stick in the **network dongle** (on page 35) chapter.

## Network dongle

To use a WibuKey in the network as a dongle, the server and client must be configured accordingly:

- ▶ Server configuration (on page 36)
- ▶ Client configuration (on page 36)



### Attention

WibuKey uses port 22347. This port is fixed and cannot be changed. Note:

- ▶ If a firewall other than that integrated into the Windows operating system is used, this port must be enabled if you wish to use the WibuKey as a network dongle.

## Configuring the server

The WibuKey server has to run on the dongle server. The WibuKey server can be configured either as an application (e.g. started via Autostart) or as a service.

On installing the WibuKey software the options

### 32 Bit WkNet/WkLAN network server

#### Install as NT service with Autostart

have to be activated, so that the WibuKey server is installed as a service (recommended).



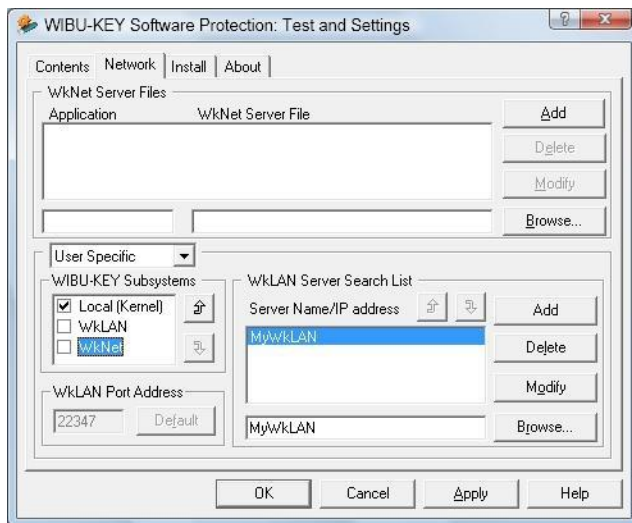
In order to start the WibuKey server as an application, a link to the file `WkSvW32.exe` has to be created in the Windows Autostart.

The file can be found in the `C:\Programme\WIBUKEY\Server\` folder after installation.

## Configuring a client

Some network settings for the client have to be entered in the Control Panel. Under WibuKey subsystems, you can select the type of network access you use. The licensing of zenon uses the **WkLan** subsystem.

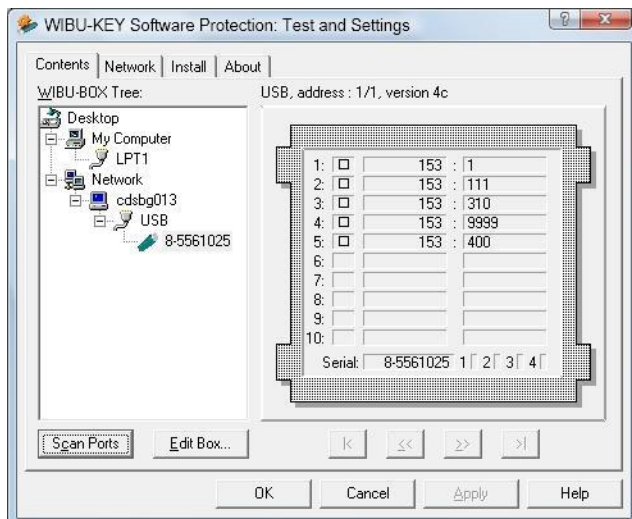
Under Server Name/IP address either the server name or its IP address or a mask for the IP address is entered. With Browse the list is filled with all found dongle servers.



The entries are processed in the sequence of the list and also can be combined.

If the first entry is a certain server, it is checked, if the dongle server service runs on that PC and if a dongle is plugged in (faster!). If no dongle is found here and the next entry is a filter mask, all PCs in the network going with that filter mask are tried out.

On the **Contents** page, the server(s) where the dongles were found should then be listed:



## 8. Command line parameter for licensing tool

The licensing tool can be controlled with the following flags as parameters:

Passing over a parameter is done by putting a ``\`` or a ``-`` before the parameter:

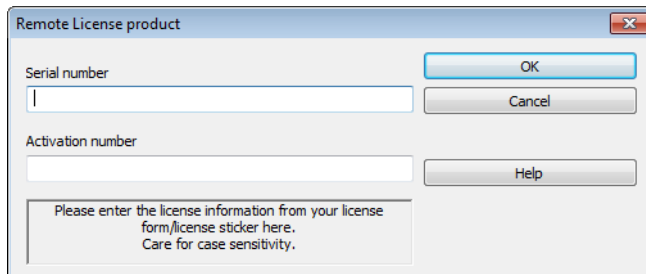
for example: `/silent` or `-silent`

Parameters	Description
<b>request</b>	forces the program to omit the first dialog and go straight to the dialog for requesting the activation key (it does not matter if the flag <code>/silent</code> or <code>-silent</code> is also used)
<b>sernum:&lt;num&gt;</b>	forces the program to use the <code>serial number</code> which is passed with <code>&lt;num&gt;</code> for licensing instead of reading the number from the <code>zenon6.ini</code> file.
<b>actkey:&lt;key&gt;</b>	forces the program to use the <code>activation key</code> which is passed with <code>&lt;key&gt;</code> for licensing instead of reading the key from the <code>zenOn6.ini</code> file.
<b>silent</b>	forces the program to not show a dialog. The file <code>License.txt</code> is still created.
<b>mailto:&lt;addr&gt;</b>	works only in connection with the flag <code>silent</code> and forces the program to send the license request to the specified address <code>&lt;addr&gt;</code> via e-mail.

## 9. Remote licensing

To allocate a license to a computer via remote connection:

1. in the context menu of the project select Remote Transport -> Change password and display licensing
2. start the Remote Transport
3. as soon as the connection is established, the licensing of the remote computer is displayed



The dialog box titled "Remote License product" contains two input fields: "Serial number" and "Activation number". Below these fields is a text box with the instruction: "Please enter the license information from your license form/license sticker here. Care for case sensitivity." To the right of the input fields are three buttons: "OK", "Cancel", and "Help".

4. enter the serial number and the activation number of your license form
5. confirm the input by clicking OK

## 10. Characteristics of the Server Client operation

Licensing of modules in the server client operation has the following characteristics:

### HISTORIAN

The following cases are distinguished:

- ▶ Server and client licensed: Archives can be opened and edited at the client
- ▶ Server licensed and client not licensed: Archives can be opened but not edited at the client
- ▶ Client not licensed and started as standalone: Archive window can be opened; the individual archives cannot be opened

### AUTOMATIC LINE COLORING

The following cases are distinguished:

- ▶ Server licensed and client not licensed: ALC functionality is available unrestrictedly
- ▶ Client not licensed and started as standalone: ALC functionality is not available



#### Information

*If the Server is licensed for the Energy Edition, ALC is also licensed.*

### BATCH CONTROL

The client gets the license from the server and does not need its own license. If the server does not have a license of its own, the client cannot use the module.

### LOAD MANAGEMENT

The following cases are distinguished:

- ▶ Server licensed and client not licensed: **Load Management**EMS functionality is available without restriction
- ▶ Client not licensed and started as standalone: **Load Management**EMS functionality is not available

## MESSAGE CONTROL

The client gets the license from the server and does not need its own license. If the server does not have a license of its own, the client cannot use the module.

# 11. Everywhere Server by zenon

**Everywhere Server** gets the license of the Runtime. The license for Everywhere Server is issued by Runtime. The **Everywhere Server** can not be used, If the Runtime does not have a corresponding license.

For this reason, it may happen that the Runtime is running, but the **Everywhere Server** can not be started because of missing license rights. In this case, please use the licensing tool (on page 4) in order to receive a corresponding license.