



Price list: 206(2)/24 (ISOsimulate)

**Valid from: 01/9/2024**

Revision: 01 (6/8/2024)

E-Mail: sales@osb-connagtive.com

## ISOsimulate

### Product information and price list

#### Content

1. Purpose and description .....	2
2. Annual Subscription and tool unlock.....	7
3. Pricing and terms.....	7





## 1. Purpose and description

ISOsimulate is a Windows based GUI application suite designed to simulate ISOBUS server functionalities on a CAN network used mainly for developing and testing purposes. It is built on top of the ISOcores ISOBUS server-side protocol stack library.

### 1.1. Key features

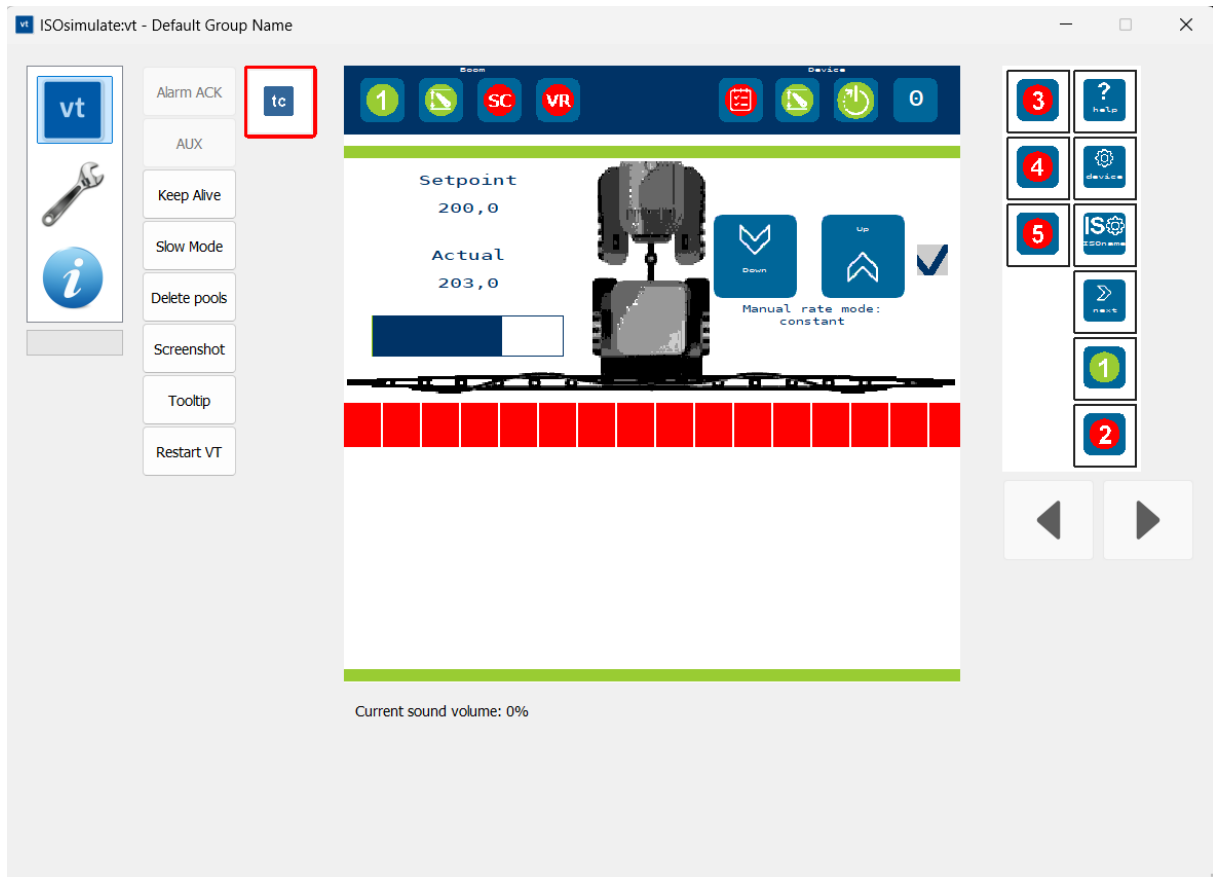
- **AEF Functionalities:** The simulators ISOsimulate:vt, ISOsimulate:tc, ISOsimulate:fs, ISOsimulate:isb, ISOsimulate:diag, ISOsimulate:tecu+gps, and ISOsimulate:aux cover the AEF Functionalities UT, TC, FS, ISB, INFO, TECU and AUX-O/AUX-N.
- **Connectivity:** ISOsimulate can be connected to a real ISOBUS bus setup (using a variety of USB to CAN adapters) or running purely virtual with even a simulated CAN network, resulting in development of customer applications completely independent of any real hardware (CAN, terminal, etc.)
- **Configurability:** Each simulator offers a settings tab where it is possible to change the simulation configuration and user settings. Depending on the server's possibilities and usage, it is possible to configure things such as language and units, bus number, function instance, version but also some context specific settings (like options, dimension parameters, etc.)
- **Intuitive Visual Interface:** The visual interface offers easy and fast simulation of appropriate and possible servers' behaviors.
- **Information printout:** Each simulator offers an Info tab where information, warnings and errors are printed. In that way, the user can keep track of important events in one place with timestamps.
- **Standard:** ISOsimulate is implemented according to ISO 11783: Each simulator is implemented according to the appropriate ISO 11783 standard, making it a reliable tool for development and testing purposes.
- **AEF Conformance Test:** We use the AEF Conformance Test to make sure our simulators will behave according to the CT test procedures.
- **Multi-Instance:** Many simulators can be executed multiple times simultaneously, with each instance configured using different settings. This approach allows users to conveniently run and test simulators under various conditions and distinct settings, providing the possibility to setup a multi-server environment (e.g. Primary VT + several Secondary VTs, TC + DL, multiple ISBs, etc.).

### 1.2. ISOsimulate tool suite modules

#### ISOsimulate:vt

is a GUI application representing a Virtual Terminal server on the ISOBUS network developed according to ISO 11783-6. It provides a graphical display of the connected Working Sets (VT-Clients) providing the capability to interact with them. Setup/Configuration of auxiliary controls (AUX-O/AUX-N) is also possible. Additionally there are a lot of convenient features that support application development and testing,

like artificially slowing down the VT (to test the Command/Response queue behaviour), changing dimensions (Data Mask, Working Set Designator/Soft Key), VT Version, all possible Options, etc.

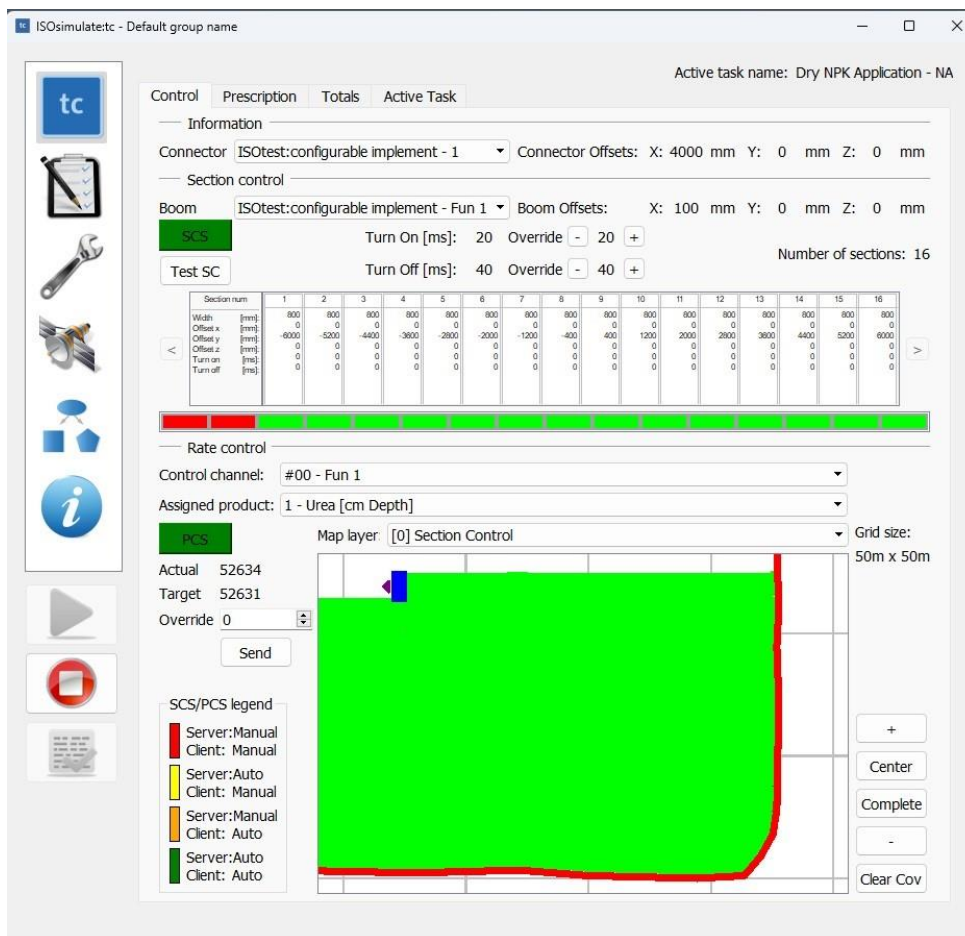


*ISOsimulate:vt screenshot of main screen*

### ISOsimulate:tc

is a GUI application representing a Task Controller server on the ISOBUS network developed according to ISO 11783-10. It provides a display of TC client's data and offers TC control of the farm activities carried out in the fields. Control is distributed among section control, rate control, task selection and manipulation. A map can be used to monitor the progress in the field, which includes tracking the tractor's position, overview of the selected field/prescription map and monitoring of the current coverage. Additionally ISOsimulate:tc displays prescription details defined in ISOXML (TASKDATA.XML), device's total values and detailed information about the active task.

It is also possible for ISOsimulate:tc to act as Data Logger (LOG) control function, logging the data displayed in the Totals section as well as other live Process Data.



ISOsimate:tc - Default group name

Active task name: Dry NPK Application - NA

Control Prescription Totals Active Task

Information

Connector: ISOTest:configurable implement - 1 Connector Offsets: X: 4000 mm Y: 0 mm Z: 0 mm

Section control

Boom: ISOTest:configurable implement - Fun 1 Boom Offsets: X: 100 mm Y: 0 mm Z: 0 mm

SCS Turn On [ms]: 20 Override - 20 +

Test SC Turn Off [ms]: 40 Override - 40 +

Number of sections: 16

Section num	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Width [mm]	800	800	800	800	800	800	800	800	800	800	800	800	800	800	800	800
Offset x [mm]	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Offset y [mm]	-6000	-5200	-4400	-3600	-2800	-2000	-1200	-400	400	1200	2000	2800	3600	4400	5200	6000
Offset z [mm]	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Turn on [ms]	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Turn off [ms]	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

Rate control

Control channel: #00 - Fun 1

Assigned product: 1 - Urea [cm Depth]

PCS Map layer: [0] Section Control Grid size: 50m x 50m

Actual 52634  
Target 52631  
Override 0

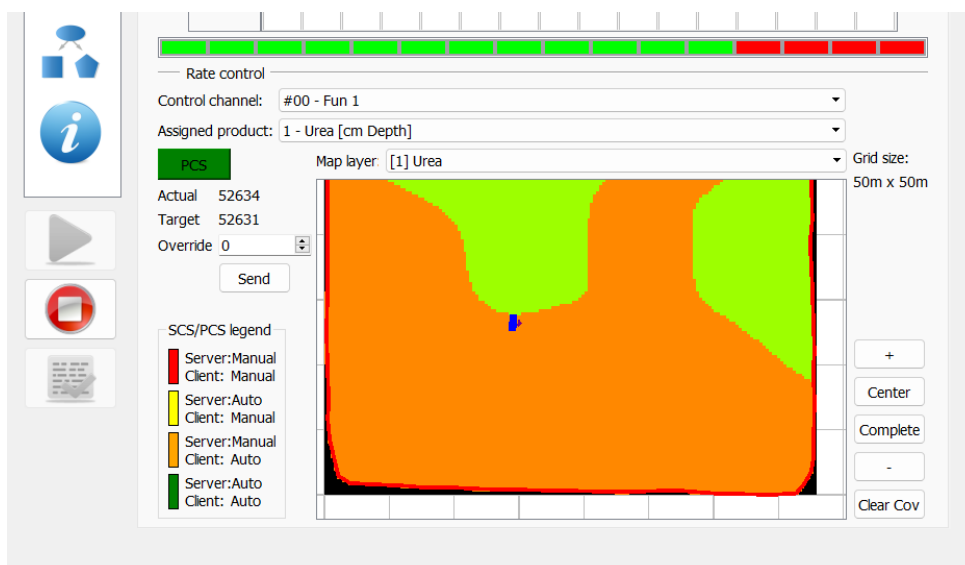
Send

SCS/PCS legend

- Server:Manual Client: Manual
- Server:Auto Client: Manual
- Server:Manual Client: Auto
- Server:Auto Client: Auto

+ Center Complete - Clear Cov

ISOsimate:tc screenshot of main screen with SC coverage map layer



Rate control

Control channel: #00 - Fun 1

Assigned product: 1 - Urea [cm Depth]

PCS Map layer: [1] Urea Grid size: 50m x 50m

Actual 52634  
Target 52631  
Override 0

Send

SCS/PCS legend

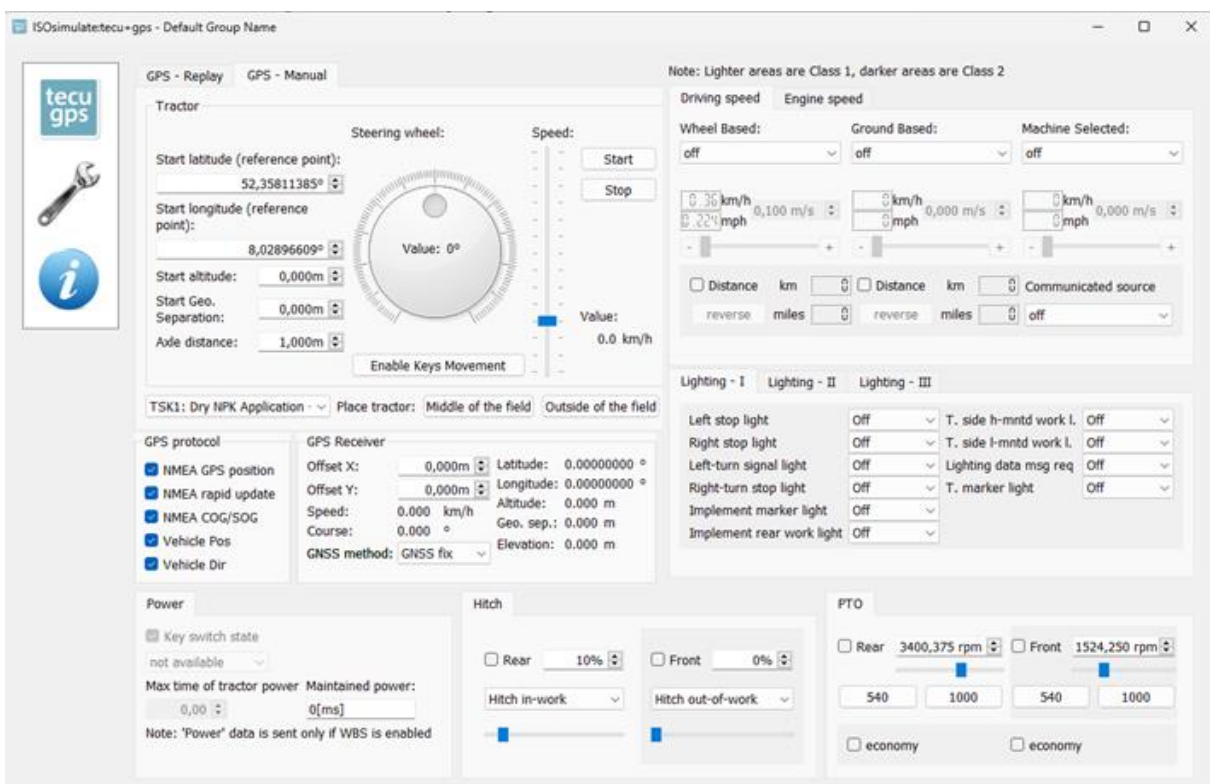
- Server:Manual Client: Manual
- Server:Auto Client: Manual
- Server:Manual Client: Auto
- Server:Auto Client: Auto

+ Center Complete - Clear Cov

ISOsimate:tc screenshot of VRC application map layer

## ISOsimulate:tecu+gps

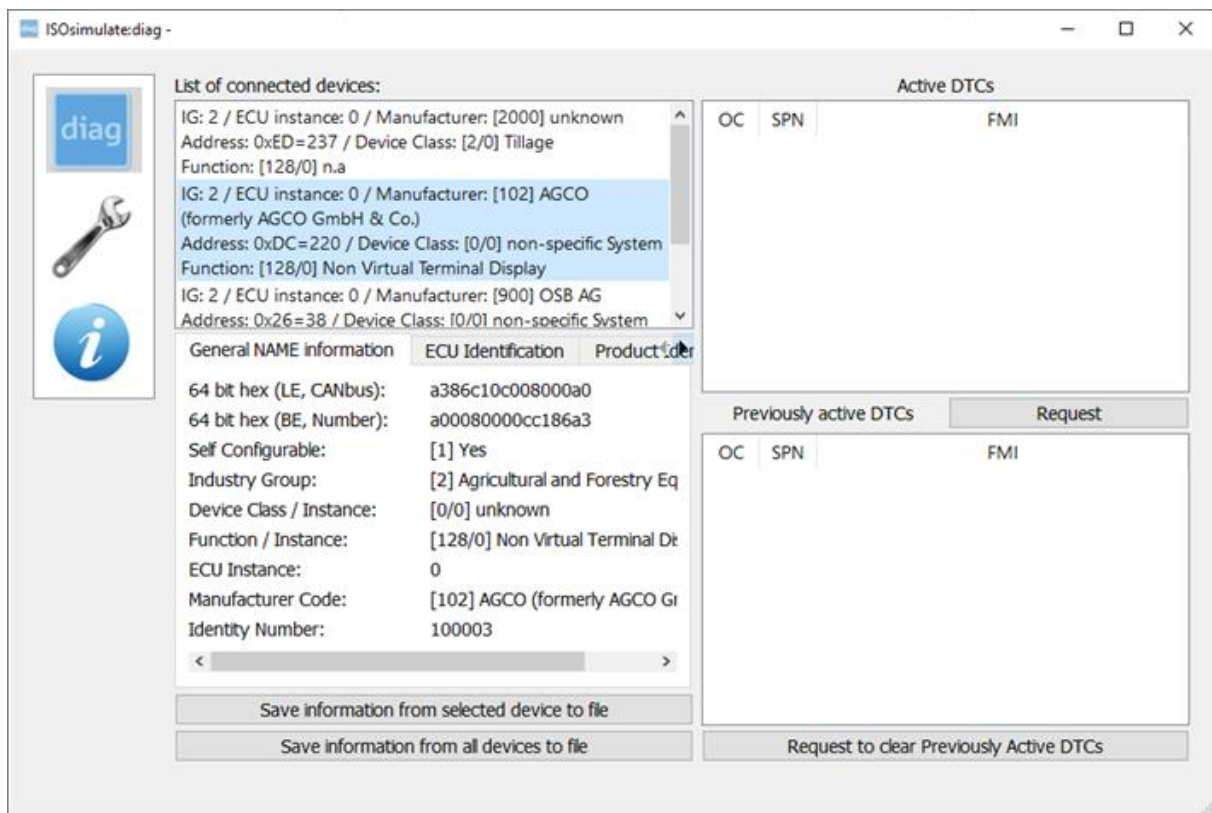
is a GUI application representing a Tractor ECU (TECU) server on the ISOBUS network developed according to ISO 11783-7/9. Typically TECUs gather information from the tractor bus or directly connected sensors, while with ISOsimulate:tecu+gps all the provided values can be simulated in connection with the built-in GNSS simulation, like using Ground Based Speed based on the GNSS position. GNSS signal simulation can be manually controlled or replayed from a GPX recording. Additionally it supports using ISOXML as input, to e.g. place the tractor into a given field when starting to simulate work on a field.



*ISOsimulate:tecu+gps screenshot of main screen*

## ISOsimulate:diag

is a GUI application representing a Diagnostics Service Tool on the ISOBUS network developed according to ISO 11783-12. It uses the information provided by the Control Functions of all ECUs connected to the ISOBUS network, enabling the operator and/or service technician to complete network diagnostics and identify which device has failed or is operating in a faulty state. Device information can be exported to a text file, allowing it to be stored for future reference and diagnostics.



*ISOsimulate:diag screenshot of main screen*

### ISOsimulate:fs

is a GUI application representing a File Server on the ISOBUS network developed according to 11783-13. It provides storage for files and uses the ISOBUS defined set of commands for handling of and access to files and directories. Display of volumes which are configured in the volume list is offered, so the user can browse through the contents of each volume.

### ISOsimulate:isb

is a GUI application representing an ISOBUS Shortcut Button (ISB) server on the ISOBUS network. An ISB server transmits the All Implements Stop Operations Switch State message implemented according to ISO 11783-7. This feature is used to make ISB clients turn off all desired implement functions and inform the operator that the Working Set has stopped these operations.

### ISOsimulate:aux

is a console application representing an Auxiliary Controls client on the ISOBUS network developed according to ISO 11783-6 as a VT-Client. All available auxiliary functions types are supported and values (analog values, pressed/released state, etc.) can be input using the VT-Client's user interface on VT. In order to visualize it, ISOsimulate:vt or any other AUX-N capable VT can be used. ISOsimulate:vt must be configured as Primary VT (function instance 0), as auxiliary objects are only usable there.

## 2. Annual Subscription

All our tools are designed for use on Windows computers. The software and new versions can be downloaded from our customer download platform and installed on multiple computers. To unlock the software, one of our USB dongles is required. It contains the license for the tools you have subscribed to. New license codes will be sent to you by email and you can install them on the dongle yourself.

Annual subscriptions are automatically renewed and become subject to payment unless we receive a cancellation 30 days before the end of the annual subscription. You will be notified of the availability of updates by email.

Your annual subscription includes access to our product support and new versions of the tools. We guarantee to keep the tools up-to-date in line with the further development of the ISOBUS standard.



*OSB license dongle to unlock ISOBUS development tools*

## 3. Pricing and terms

<b>Item</b>	<b>Description</b>	<b>Price</b>
2060800	ISOsimulate:all (full terminal simulation for all ISOBUS server apps.)	2'400.00 €
2061100	ISOsimulate:vt/tc/tecu+gps (simulates UT/TC server, tractor, GNSS)	2'150.00 €
2060200	ISOsimulate:vt (simulates UT server only)	1'150.00 €
2060101	USB dongle hardware, including shipping inside EU	50.00 €
2060102	USB dongle hardware, including shipping outside EU	100.00 €

*All prices excl. VAT*

- All tool licenses are annual subscriptions and have to be paid annually for continued usage. You agree to this annual license agreement by purchasing.
- Notice of cancellation: The tool license will be renewed every year automatically and a new license code will be sent out via email and an invoice will be issued if you do not send a notice to [sales@osb-connagative.com](mailto:sales@osb-connagative.com) at latest 30 days before the expiration of the one-year license.
- We reserve the right to make future license and usage fee price adjustments.
- Offers are subject to change and non-binding.
- Our [General Terms and Conditions](#) apply.

Request your quote at: [sales@osb-connagative.com](mailto:sales@osb-connagative.com)