

## 1 Purpose

This document describes the differences between the new software version **MagIC Net 2.3** and its predecessor **MagIC Net 2.2**.

## 2 New features

### New instruments

- 2.850.9110 IC Amperometric Detector
- 3 model versions of the 896 Professional IC Detector:
  - 2.896.0010 Professional Detector - Conductometry (contains the 2.850.9010 detector module)
  - 2.896.0020 Professional Detector - Amperometry (contains the 2.850.9110 detector module)
  - 2.896.0030 Professional Detector - Conductometry & Amperometry (contains the 2.850.9010 and 2.850.9110 detector modules).
- 2.919.0020 IC Autosampler plus with one removable rack for more than 50 samples with a vessel volume of up to 11 mL.

### New instrument firmware

- New firmware version 5.850.0109 for Professional IC.
- New firmware version 5.863.0022 for the 863 Compact Autosampler.

### Program part Configuration

- A new configuration table permits the management of intelligent and non-intelligent measuring cells of the 2.850.9110 IC Amperometric Detector. The data of the cell, of the working and reference electrodes and of any spacer which may be present can be entered. GLP monitoring can be defined for the amperometric measuring cells.

### Program part Method

- Measuring mode **DC** of the amperometric detector, for measurements at constant potential. Automatic measuring range adjustment is possible.
- Measuring mode **PAD** of the amperometric detector, for measurements with several potentials.
- Measuring mode **flexIPAD** of the amperometric detector, for measurements with flexible potential steps (levels, ramps). Integration takes place by means of a defined measuring time.

- Measuring mode **CV** of the amperometric detector, for the measurement of cyclovoltammograms.
- Current or charge can be output with all measuring modes (except CV) of the amperometric detector.

#### **Program part Database**

- Cyclovoltammograms can now also be overlaid in the dialog **Overlay of curves**.
- If the option **Scaling: Relative** is selected for the display of chromatograms, then they will always be displayed at the same relative height, even if their baselines lie at different absolute Y values.
- The current content of the graphic display can be exported as a vector graphic (\*.eps).

## **3 Improvements**

#### **Program part Configuration**

- A new feature is that the **Settings according to 21 CFR 11** can now be set by means of a single check box; an Audit Trail entry is also generated when the check box is activated and deactivated. The elements affected by this setting become inactive.
- The name of the **Optimize automatically** button was changed to **Adjust automatically** in the detector settings of the **887 Professional UV/VIS Detector**. The necessary conditions under which the settings are permitted to be changed were described in the Online Help for this dialog.

#### **Program part Method**

- If one linked a separation column for which an approach time was defined in the configuration with a pump, the approach time was indeed applied, but it was not automatically activated.
- The measured values of the channels **Current** and **Charge** of the amperometric detector can now be output with the help of the **891 Analog Out**.
- The table of the calibration points was extended to include the following columns: **Dilution, Sample amount**.

#### **Program part Database**

- A new color scheme makes it easier to distinguish between the curves in the dialog **Overlay of curves**. The standard colors can be modified.
- In the dialog **Overlay of curves**, the table was extended to include the following columns: **Volume, Dilution, Sample amount**.

## **4 Fixed bugs and problems**

#### **General**

- The entry of illegal characters in numerical fields led to an exception error in a few cases.

- An error message without text was displayed when an overflow error occurred in the conductivity detector. The message 036-535 is now displayed instead.

### Program part Workplace

- In rare cases, gradient profiles were not executed correctly (this error was rectified in MagIC Net 2.2 Patch 1).
- In the case of high pressure gradients with more than 2 pumps, the gradient profile was not executed correctly in rare cases.
- In the case of high pressure gradients with pump A without approach time and pump B with approach time, only the flow of pump A was reset to 0 in the Watch Window after "Stop Hardware" was pressed.
- If, in the time program command **Wait for IC Net**, the **max. waiting time** was specified in seconds, then MagIC Net interpreted it in minutes.
- The Round() function supplied incorrect results under certain conditions:

Formula	Result	
<b>Round( 1000 * 10 / 50 )/1000</b>	<b>0.00</b>	wrong
<b>(Round( 1000 * 10 / 50 )/1000)</b>	<b>0.20</b>	right

### Program part Configuration

- A non-required **Edit** function group appeared with the access rights in the user administration.

### Program part Method

- The column heater of the 881 Compact IC heated to maximum temperature after a new temperature value was set which was below the current temperature of the column heater (this error was rectified in MagIC Net 2.2 Patch 1).
- If standards were not added to the standard table in ascending order of concentration, then their sequence changed when the method was saved and then reopened.
- If a Dosino was removed from a method which still contained Dosino commands in the time program, then an exception error occurred with the method was saved.
- In the event of the parallel operation of 2 methods which use the same 800 Dosino, it sometimes happened that the determination at the second workplace was not started after the release of the devices in the first workplace.
- Under certain circumstances, the concentrations were deleted during the editing of the standard table, which led to an exception error.
- The correct method version was not displayed in the Audit Trail after a method was shifted into a different method group.

### Program part Database

- If one opened one or several determinations in the Detailed overview and deactivated all the determinations there, this led to an exception error.
- When editing an export template with the data type **\*.csv (Comma Separated)** or **\*.txt (Measuring point list)**, the format options would be reset to default values in certain cases.

### **Program part Manual control**

- If the comma (,) was set as the decimal separator in the Windows country settings, then errors could arise when numbers were entered in the manual control.
- If a gradient pump with 100% A was started in the manual control and then switched afterward to 100% B, the pressure display was no longer updated.

## **5 Compliance**

The current software version does not contain any modifications that affect conformity of **MagIC Net** regarding 21 CFR Part 11 and GAMP.

**Herisau, 30 June 2011**

---



Dr. J. Kleimann  
Vice President, Head of R&D



U. Kürsteiner  
Head of Quality Management