SRA Lab

Prerequisites and Installation guide

Dear user,

Thank you for choosing this SRA Instruments product.

This manual contains all the necessary information for the correct use of your software. Should you need further information or if you encounter any problems, please contact our <u>After Sales Service</u>:

Hotline: +33 (0)4 78 44 22 09
E-mail : service@sra-instruments.com

SRA INSTRUMENTS ANALYTICAL SOLUTIONS	SRA Instruments 210 rue des Sources 69280 Marcy l'Etoile FRANCE	Tel : +33 (0)4 78 44 29 47 info@sra-instruments.com www.srainstruments.com

Table of contents

1. Introduction

SRA Lab is an "addon" software package for chromatography software. Dedicated to a control function, SRA Lab enables a CDS, in just a few clicks, to start analyses which can be imported from a LIMS.

The application supports as many instruments as the CDS can handle (4 for Agilent Chemstation or Agilent CDS Workstation) and as many as you want in Client/Server mode (OpenLab CDS).

The application is designed to complete the sample sequence with default parameters (which can be modified) and launch the sequence after its validation.

With its own sequence, SRA Lab offers the operator the possibility of modifying it even while it is in use, without the need to pause it.

Results are visible in the CDS or in SRA Lab and can be uploaded to a LIMS.

In Client/Server mode, any user can edit and modify a sequence, even while it is in use. The sequence will be updated on the AIC and the HMIs of clients connected to the sequence. Dialogue between clients and AICs takes place via a WCF service. This transmits and updates data between each client and service. On AICs, the SIC, the SRA Lab application dedicated to AICs, sends analysis requests to OpenLab's Shared Services.
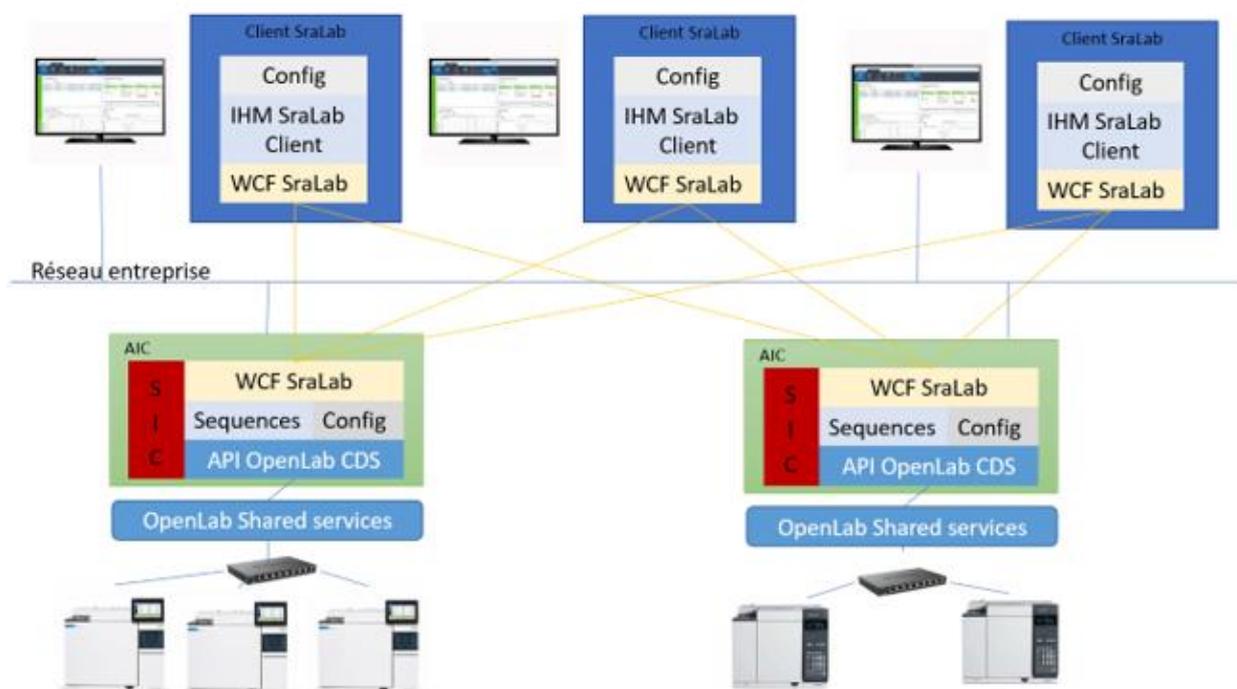
2. Prerequisites

2.1 Computer

OS	Processor speed		Memory	
	Minimum	Recommended	Minimum	Recommended
Windows 7/8.1/10/11	2 GHz (Core i3)	3 GHz (Core i5)	4 GB	8 GB

- For Windows 7, SP1 version only.
- For Windows 10, version 1903 and higher.

2.2 Framework

To install SRA Lab, you need at least .Net Framework 4.8.

2.3 Firewall settings

Below is the list of ports used by SRA Lab. These ports are automatically authorized when the software is installed.
These ports must be open for SRA Lab software applications to communicate.

	Port	Protocole
TCP port used for "Client/Server" communication	8000	TCP

If this port is not available, the network administrator can use another TCP port open for input/output and configure it in the software configuration.

2.4 Protecting files

Access to LIMS sequence folders is required for reading, and the directory in which SRA Lab deposits results files for LIMS must be writable.

Finally, a shared folder must be created on the OpenLab CDS server (or other network location) to enable OpenLab CDS to file CSV reports at the end of each analysis.

3. Common installation

SRA Lab can be used for OpenLab CDS Workstation or in Client/Server mode with OpenLab CDS ECM XT.

SRA Lab installation begins by running setup.exe on client workstations and AICs (for a Client/Server installation).
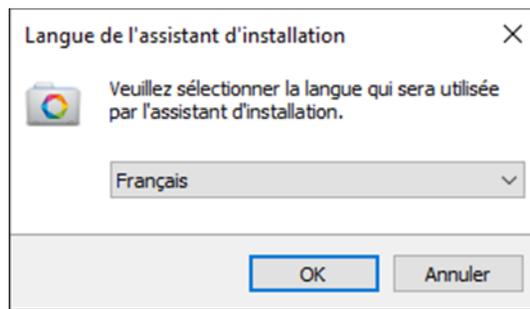
Select installation language
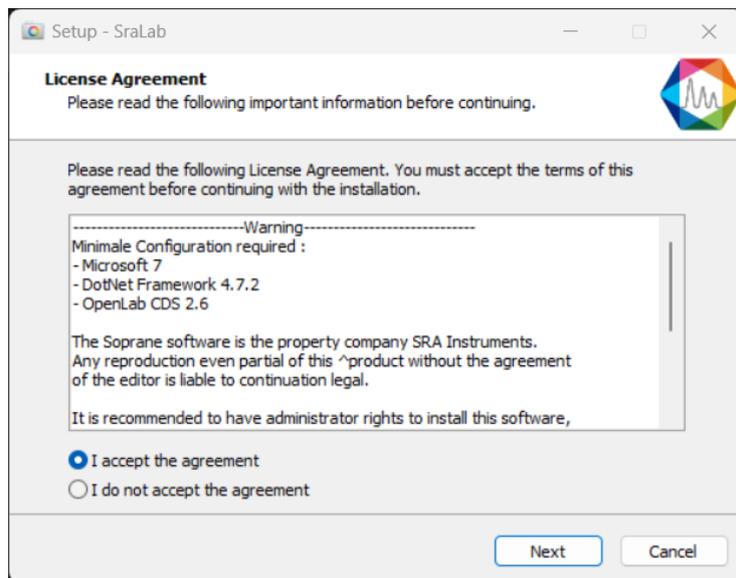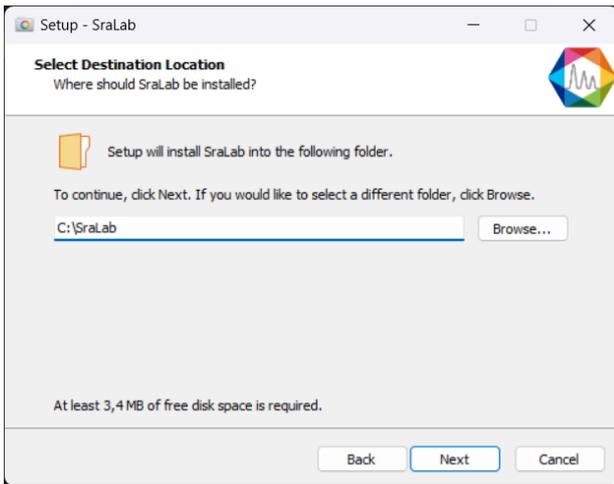
Keep default installation directory
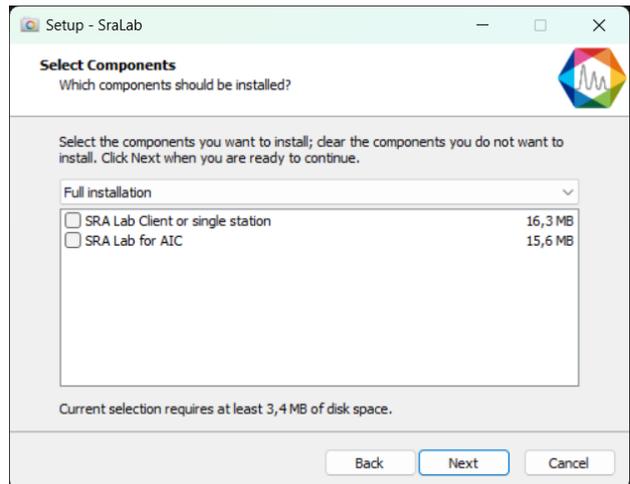
Select installation type
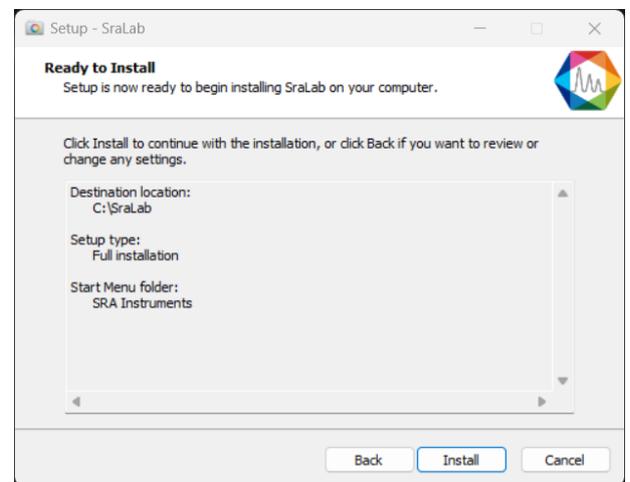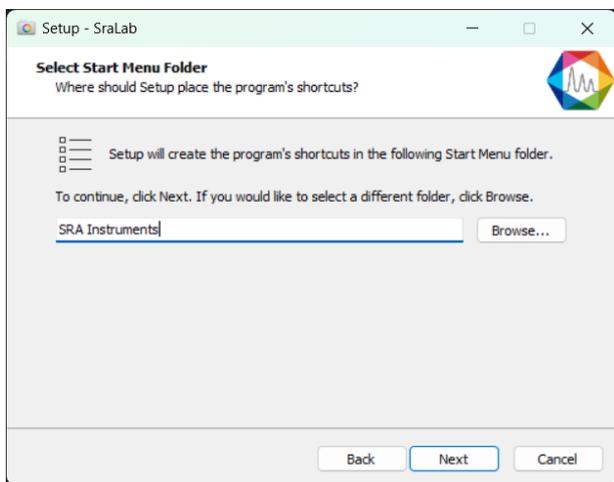
4. Workstation installation

For a workstation installation, SRA Lab must be installed on the OpenLab CDS workstation as soon as the latter is installed and configured.

The "workstation" installation follows the standard installation above. Select "SRA Lab Client or Workstation" mode and keep the default choices.

Note: SRA Lab cannot be used with OpenLab CDS Workstation Plus.

5. Client/Server installation

In Client/Server mode, the AICs used by SRA Lab must use the Windows SIC (**S**RA Lab **I**nstrument **C**ontroller) service for communication between SRA Lab client workstations and OpenLab CDS services (Shared Services) from the AIC.

On client workstations, the SRA Lab application is installed by selecting the "SRA Lab Client or Workstation" option. On AICs used by SRA Lab, choose the "SRA Lab for AIC" option when installing SRA Lab.

Note:
OpenLab CDS must be installed and configured **before** installing SRA Lab.

5.1 SIC service

For AICs, installation is a two-stage process. The first one has already been carried out previously. The second is to install SRA Lab's SIC service.

The SIC is a Windows service designed to communicate with all SRA Lab clients and OpenLab CDS *Shared Services* on AICs used by SRA Lab. Once OpenLab CDS is installed and configured, and SRA Lab is also installed, go to the SRA Lab directory (on AICs using SRA Lab) and double-click on SRA.SIC.Configuration.exe :

- Set the OpenLab CDS login to be used by the AIC

- Set the SRA Lab TCP port used for dialog between SRA Lab clients and the AIC's SIC service. The default port is 8000. Make sure the network administrator does not block this port on the firewall.

- Copy the OpenLab CDS connection string. The default string is net.tcp://**OPENLABSERVERNAME**:6577/Agilent/OpenLAB. In the example below, the server name is olsrv.
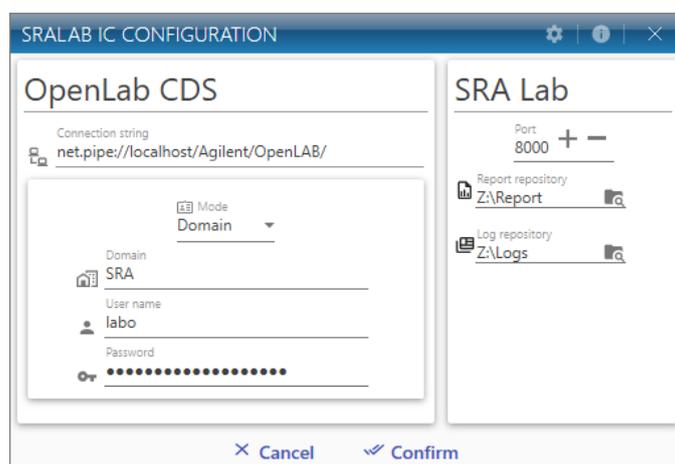
- Close the configuration utility.

- Install the Windows service SRA.SIC.ServiceSRA Lab.exe as follows:

  o Open a command interpreter window in administrator mode.
  o Enter the following commands:
    ▪ cd\ <ENTER>
    ▪ cd c:\windows\Microsoft.Net\Framework\v4.0.30319 <ENTER>
    ▪ installutil.exe c:\SRA Lab\service\sra.sic.serviceSRA Lab.exe <ENTER>
  o Display the Windows Services Manager
  o Move the scrollbar to the SRA.SIC.ServiceSRA Lab service and click on it.
  o Click on "Start". The SIC service should be started.
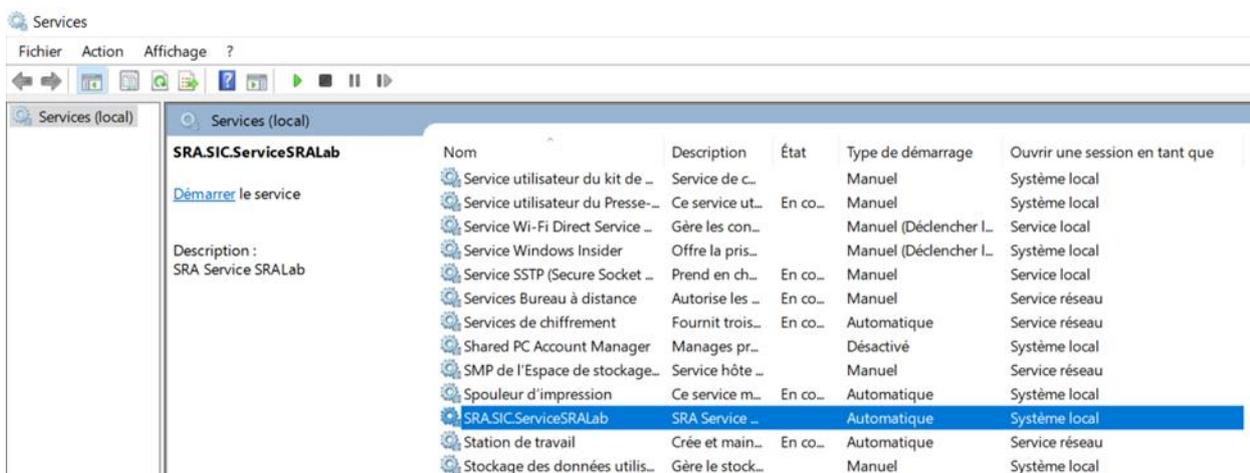
5.2 SRA Lab Client

Prerequisite: OpenLab CDS must be installed and configured before installing SRA Lab.

Run the SRA Lab setup program, select "SRA Lab Client or Single-User" installation, then keep the default choices.

When configuring the software on client workstations, SRA Lab must be configured to communicate with AICs. You will need to list all the AICs that will be configured to use the SIC service and indicate which TCP port will be used. By default, port 8000 is proposed.

To obtain the list of AICs, go to the OpenLab CDS Control Panel and click on the "Administration" tab. Please note that the "Instruments Controller" list can only be accessed by an administrator account.
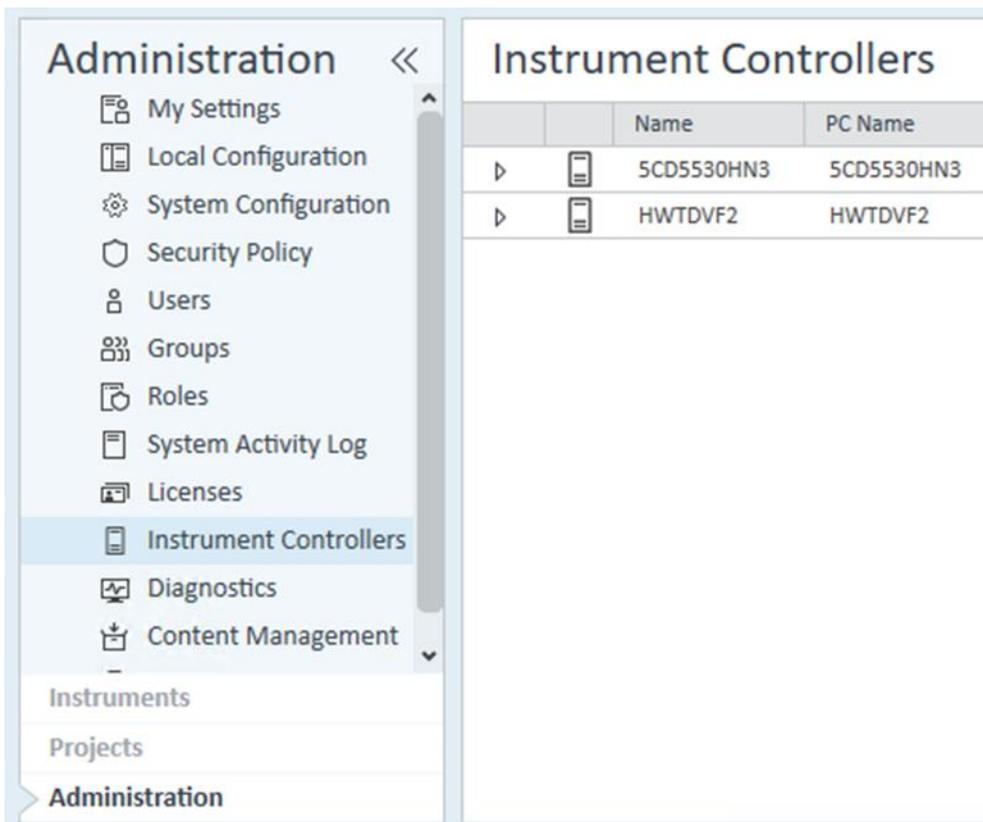
5.3 Report template

Once SRA Lab has been installed and configured, the "prochem.rdl" report template should be placed in the "Report Templates" folder of each instrument using SRA Lab. Drag and drop the prochem.rdl file into the "Report Template" folder on the OpenLab CDS DataStore web page.

To display this page:

- Open a web browser and enter the following address: https://OpenLabCDSServerName/DataStore/Page/ ; validate to display the page.
- A login window appears (see below), where you can enter your login. Once validated, the DataStore web page is displayed.
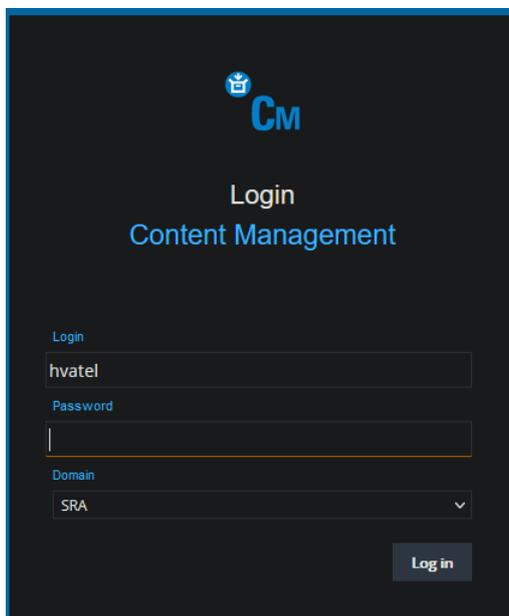
The screenshot below shows DataStore.

In our example below, the "Content" folder is the one that contains the instruments using SRA Lab. Click on "Control", then for each instrument, click on the instrument name, then on "Report Templates". Drag and drop the prochem.rdl file into this folder. This must be done for each instrument using SRA Lab.