

Agilent CrossLab Start Up Services

Agilent InfinityLab Online LC Solutions

Introduction Checklist

Thank you for purchasing an instrument from **Agilent Technologies**. CrossLab Start Up is focused on helping customers shorten the time it takes to start realizing the full value of their instrument investment. Installation, Introduction and First Run Assist are service engagements to get your new instrument and lab productive. Success starts here.

The CrossLab Start Up Introduction is delivered after the installation and introduces the operation, ownership, maintenance and troubleshooting of the new system.

This Checklist guides you through the key aspects of owning and operating your instrument. A signed copy of this checklist is provided for your records.

The CrossLab Start Up First Run Assist is an optional customer driven activity performed under the guidance of the Agilent engineer and reinforces operational understanding. After the first result is reviewed, the service engineer recommends next steps in the path to success and optimum results.

Introduction

Customer Information

Introduction is intended to give operators a basic overview of the operation and maintenance of new instruments and software systems and is not designed to be a substitute for a full operator-training course.

Further training, advice, and consultation can be found at <https://www.agilent.com/en/training-events>.

The following are **NOT** included in Introduction service (**unless explicitly ordered**):

- Training on basic PC operation, peripherals, and/or operating systems
- Training of groups larger than five people
- Customized method/application development or method optimization.
- Method transfer from other instrumentation
- Comprehensive training
- Troubleshooting and Maintenance training
- Macro programming, customized reports, databases, etc.
- Fundamentals/theory of instrument techniques
- First Run Assist – used to demonstrate the system workflow.
- **InfinityLab LC Series User Documentation**

The InfinityLab LC Series User Documentation contains the introductory information, which will be used as a guide during introduction. It is available on the USB stick delivered with the system or on the Web at <https://lc.help.agilent.com>.



Customer Responsibilities

e-Introduction, or other virtual introduction tutorial/eLearning, is recommended for all participating end users.

The manuals/media delivered with the system will be used as a guide during Introduction.

- Please make sure that they are available.
- Please follow along to confirm that applicable checklist tasks are executed during Introduction.

Important Customer Web Links

- To access Agilent training and education, visit <https://www.agilent.com/chem/training> to learn about training options, which include online, classroom and onsite delivery. A training specialist can work directly with you to help determine your best options.
- To access the **Agilent Resource Center** web page, visit <https://www.agilent.com/en-us/agilentresources>.

The following information topics are available:

- Sample Prep and Containment
 - Chemical Standards
 - Analysis
 - Service and Support
 - Application Workflows
- The **Agilent Community** is an excellent place to get answers, collaborate with others about applications and Agilent products, and find in-depth documents and videos relevant to Agilent technologies. Visit <https://community.agilent.com/welcome>.
 - Videos about specific preparation requirements for your instrument can be found by searching the **Agilent YouTube** channel at <https://www.youtube.com/user/agilent>.
 - **Need to place a service call?**
<https://www.agilent.com/en/promotions/flexible-repair-options>
 - To access Agilent SubscribeNet, visit <https://agilent.subscribenet.com>. SubscribeNet is an online software and license delivery, update, and management service that provides you easy access to the latest versions of your software and licenses.

Service Engineer's Responsibilities

- Provide a printed copy of the checklist to the customer to look at during Introduction.
- Discuss Introduction topics and agree upon focus areas with customer.
- Only complete and print out sections that relate to the system that has been installed.
- Complete empty fields with the relevant information.
- Complete the relevant checkboxes in the checklist using a "X" or tick mark ✓.
- Check "**Section not applicable**" check boxes to indicate services/tasks not delivered, as appropriate.
- Complete the **Service Review** section together with the customer.
- Complete the fields for page numbers at the foot of each selected page.
- Add relevant page numbers to selected pages and complete the total number of pages field in the Service Verification section.
- Complete Signature Page and attach Signature Page to Service Order.

User Introduction

General Introduction

- Ensure that all user manuals, documentation, tools, etc. provided by or relevant to the system were installed during installation and before starting Introduction. These are excellent reference tools for the customer – both during the Introduction, and after the Installation and Introduction has been completed.
- Show where to find resources available (e.g. manuals, guides, Online Help, and videos) on the instrument system.
- Note:** Indicate what may be loaded onto other PCs not directly interfaced with the instrument.
- Provide customer with **overview of their system** and its components, including hardware, Software configuration, PC configuration, and, if purchased, peripheral products such as Sampler, Barcode Reader, etc.
- Identify associated instrument and PC hardware connections (e.g. power, gases, communications, keyboard, mouse, display connections, and printer and LAN interface connections).
- Demonstrate how to use manuals, including the Online Help. If available, explain benefits of using HTML to search across multiple manuals/guides.
- If available, show list of videos available on basic instrument and software how-to tasks.

Instrument Start-Up and Overview (guide customer to perform)

- Explain how to start up and close down the instruments/modules in the correct order.
- Give overview of the instrument and modes of operation (e.g. Status and Menus).
- Explain where to find the status indicators and what they mean.

System Information

Instrument System Name and ID	
Instrument System Site and Location	

Module List

Module identification: The module identifier (e.g. G3167A) can be found on the lower right side of the module front cover.

The information in this document applies to Infinity II and Infinity III modules.

Module	Instrument Description
G3167A	1260 Online Sample Manager
G3167B	1290 Bio Online Sample Manager
G1170A	1290 Valve Drive and External Valve Head

Introduction for Instrument Usage

G3167A Online Sample Manager and G3167B Bio Online Sample Manager

Section NOT Applicable

- Explain the operating principle of the Online Sample Manager, as well as its key features and specifications. Introduce the main parts of the flow path, injection cycle, and components of the Online Sample Manager, like Needle Assembly, Needle Seat, Sample Loop, and Rotor Seal.
- Show the available method and control settings for the Online Sample Manager in the Chromatography Data System (CDS). Explain how to set up method parameters such as Injection Volume, Needle Wash Options, and Auxiliary settings.
- Show how to switch between Feed and Flow-Through Injection. Explain that the Feed settings are defaults and how to change them in the CDS.
- Explain the details of the Feed and Flow-Through Injection settings in the CDS Method Advanced parameters tab.
- Explain the solvent assignment options in the CDS Method Injection Path Cleaning tab.
- Show the use and configuration of the Sample Hotel and drawer system. Show how to install and remove drawers, and explain which sample containers and vessels can be used with each type of drawer.
- Explain the Online Sample Manager configuration, such as Sample Loop, and Needle Seat.
- Explain the Multiwash function, solvent assignment for the ports and solvent compatibility.
- Show where the Sample Loop flex cartridges, the Needle Assembly, and Seat Assemblies can be configured in the CDS.
- Show the details of the leak and waste concept. Show routing of waste tubing and location of the Leak Sensor.
- Explain the Service & Diagnostics features in Lab Advisor: Injector steps, Auto Referencing, Parking, Maintenance Position, and Leak Tests.
- Explain how to use the following Instrument Control features in Lab Advisor: Clear Error, Sampler Reset, Drawer Configuration, and Park Position.
- Explain the regular maintenance of Needle Assembly, Needle Seat Assembly, and Rotor Seal.
- Explain the parameters in the CDS, such as Assign Wellplates, Reset Injector, Mainpass/Bypass, Prime Solvents, Auto-clean, and Control.
- Explain the Wellplate orientation in the CDS.
- Explain the Sample Entry Management Interface features in the CDS (if applicable).

G3167A Online Sample Manager and G3167B Bio Online Sample Manager with Sample Thermostat

Section NOT Applicable

- Explain the basic operating principle of the Sample Thermostat as well as its key features and specifications.
- Show the available method and control settings for the Sample Thermostat in the CDS.
- Explain that the Sample Thermostat uses isobutane (R600a) as refrigerant, which is environmentally friendly but flammable. Thus, special considerations should be taken into account during the operation of this device (no open fire or source of ignition, adequate room size with sufficient air ventilation capacity).
- Explain the importance of having a separate condensate drainage concept and show how to correctly route the corresponding condensate tubing.
- Explain the importance of regular maintenance and cleaning of the Sample Thermostat, with special focus on the ventilation outlets, the condensate tubing, and waste containers.
- Explain how and when to use the Sample Thermostat Function Test diagnostic feature in Lab Advisor.

G1170A Valve Drive

Section NOT Applicable

- Explain the purpose and operating principle of the External Sampling Valve, as well as its key features and specifications.
- Explain the capillary plumbing connections between the Online Sample Manager and External Sampling Valve.
- Explain the External Sampling Valve ports assignment.
- Explain how to swap connections for the checkout procedure and run the checkout sample.

External Devices

Section NOT Applicable

- Explain how to connect capillaries to the customer's sample delivery device. Assist customer in establishing these connections (if applicable).
- Explain details of connection through remote interface (ERI/APG) between Online LC System and customer's sample delivery device. Assist customer in establishing these connections (if applicable).
- Review sample delivery device connectivity options in Online LC Monitoring Software. Assist customer to configure this option (if applicable).

Parts Finder

- Section NOT Applicable**
- Show how to access Parts Finder and demonstrate how to use it.

Hardware Maintenance and Diagnostics

- Explain steps required to capture problems/error messages to send to Agilent Technical Support.
- Show where to access the Troubleshooting and Maintenance Manual.
- Discuss when to perform normal user maintenance. Refer to the timetable in the Troubleshooting and Maintenance manual.
- Explain how to download and update any necessary customer-installable firmware.
- Explain available Service & Diagnostics in Lab Advisor.
- Explain the availability and importance of the Preventive Maintenance Service (PM).

Software Introduction

General Introduction – Preparation

- Ensure that all user manuals, documentation, tools, etc. provided by or relevant to the system were installed during installation and before starting Introduction. These are excellent reference tools for the customer – both during the Introduction, and after the Installation and Introduction has been completed.
- Note:** Indicate what may be loaded onto other PCs not directly interfaced with the instrument.
- Provide the customer with an **overview of their system**, what software they have installed and indicate the parts of the system that Introduction will be provided on.
- Identify associated PC hardware and connections, including power connections, keyboard, mouse, and display connections, and printer and LAN interface connections.
- Describe where to find the resources available (e.g. software manuals, user guides, online help, software support, release notes) for the software/applications.
- Demonstrate how to use the online and offline help.

System Information

- See installation checklist (provide signature date). _____
- Check this box if an instrument configuration report is attached instead of completing the table.

Software Product Numbers	Revision	License Number
1.		
2.		
3.		
4.		
5.		
6.		
7.		
8.		
9.		
10.		

Software Startup

- Explain configuration, dependencies, and interactions of installed software components.
- Explain how to log on and how to change passwords (if applicable).

Introduction for Main Software

Licenses

Inform the customer about the licenses, supporting the following:

- One User Interface (UI) Client
- One CDS Adapter for all Online LC Systems configured/defined based on OL CDS License structure
- One Shared Services package
- Single active/running Experiment at one time

as part of G2954AA for the Online LC Monitoring SW core product component and G2955AA for additional UI Clients, if purchased. Help the customer with the license activation if needed.

Inform the customer about the licenses for Open Platform Communications Unified Architecture (OPC UA) or Application Programming Interface (API) and related services, if product G2958AA or G2956AA is purchased. Help the customer with the corresponding license activation if needed. For details, see *Application Programming Interface Reference Guide (D0020920)*.

Inform the customer about the Plus Edition License (Compliance Tool), if product G2957AA is purchased. Help the customer with the license activation if needed.

Installation Location

- Show the location of the Online LC Monitoring Software on the desktop and in the start menu.
- Show the location of the Online LC Monitoring Software installation using the file explorer.
("C:\Program files\Agilent Technologies\Online Monitoring" by default)

Online LC Monitoring Software Structure

- Launch the Online LC Monitoring Software.
- Explain the overall structure of the software.
- Explain the Navigation Pane.
- Explain the Ribbon Tab in general.
- Explain where to find the Online Help for the Online LC Monitoring Software.

Configuration

- Launch the Online LC Monitoring Software.
- Open the **Configuration** Tab in the Navigation Pane.
- Explain the **Configuration** Navigation Pane.
- Explain the specifics of the Ribbon Tab.
- Show how to configure a new Online Monitoring System.
 - Connect CDS to show available analytical instruments appropriate for the Online Monitoring.
 - Create, configure, and save a new Online Monitoring System.
- Explain the difference in configuration of an Online LC System without/with available communication options with different types of external Sample Delivery Devices through Enhanced Remote Interface (ERI) on the hardware level, if applicable.
- Inform about availability of Application Programming Interface (API) option for communication with external Sample Delivery Devices on the software level, if installed. Refer to the corresponding Application Programming Interface Reference Guide (D0020920), if applicable.
 - If License G2958AA OPC UA API is applicable, demonstrate the options in File Menu where OPC UA Server can be configured for data subscription model.
 - If license G2957AA Plus Ed. is applicable, demonstrate the accessibility path to Compliance relevant data through the option in File Menu.
- Show how to edit an existing Online Monitoring System.
- Show how to hide/unhide an existing Online Monitoring System.

Experiment Setup

- Launch the Online LC Monitoring Software.
- Open the **Experiment Setup** Tab in the Navigation Pane.
- Explain the specifics of the Ribbon Tab
- Explain the **Experiment Setup** Navigation Pane.
 - Filter existing Experiment Setups.
 - Explain the **Directory** and **List View**.
 - Show how to hide/unhide existing Experiment Setups.
- Explain the Experiment Setup workspace.
 - Explain the **Overview** Area.
 - Explain the **Progress Tabs**.
- Show how to create a new **Experiment Setup**.
 - Select the Online Monitoring System.
 - In the **Analytical Instrument** workspace of the step **System**, explain:
 - Definition of **Methods Sets**.
 - How to add methods available to the Analytical Instruments to define one or more **Methods Sets** suitable for the experiment.
 - In the **Notification Settings** workspace of the step **System**, explain:
 - How to configure external notifications via **Email**.
 - How to configure external notifications via **ERI**.
 - In the **Conditioning** workspace of the step **System**, explain:
 - Experiment-specific parameters for the **Start**, **Finish**, and **Sleep/WakeUp** functions.
 - Different types of events on which Notifications are distributed via **Email** or **ERI** according to the configuration in the **Notifications Settings**.
 - In the **Samples** workspace of the step **Samples**, explain:
 - How to add a **Sample** Injection.
 - Options for **Direct Injection** Settings.
 - Options for **Diluted to Vial** Settings.
 - Options for **Pure to Vial** Settings.
 - In the **Controls** workspace of the step **Samples**, explain:
 - How to add a **Controls** Injection.
 - Options for **Blank Sample** Settings. Focus on the **measure periodically** check box.
 - Options for **QC Sample** Settings. Focus on the **measure periodically** check box.
 - Options for **Recalibration** Settings.
 - In the **Schedule** workspace of the step **Schedule**, explain:

- Difference between **Rule based** and **Time based** scheduling.
- How to change defined **Rule based** system conditions.
- How to add a **Time based** sampling event to the schedule and explain respective time conditions.
- In the **Preview** workspace of the step **Schedule**, explain:
 - How the **Preview** can be used to identify time conflicts.
- In the **Compound Limits** workspace on the step **Limits**, explain:
 - How to define Lower limit and Upper limit for a compound.
 - How to define **Notifications** distributed via **Email** or **ERI** according to the configuration for **Notification Settings** in step **System**, in the events of a defined **Compound Limits** exceeding.
- In the **Notification Settings** workspace of the step **Limits**, show:
 - How to get an overview of the selected **Notifications** for the exceeding of defined **Compound Limits**.
- Show how to edit an existing **Experiment Setup**.
 - Explain the characteristics of the **Edit** mode.
- Show how to **Export** an existing **Experiment Setup**.
 - Explain the characteristics of the **Export** function.
- Show how to **Import** an existing **Experiment Setup**.
 - Explain the characteristics of the **Import** function.

Experiment Run

- Launch the Online LC Monitoring Software.
- Open the **Experiment Run** Tab in the Navigation Pane.
- Explain the specifics of the Ribbon Tab.
- Explain the **Experiment Run** Navigation Pane.
 - Filter existing Experiments.
 - Explain the **Directory** and **List View**.
 - Show how to hide/unhide existing Experiments.
- Explain the **Experiment Run** workspace.
 - Explain the **Overview** Area.
 - Explain the **Progress Tabs**.
- Explain how to create a new **Experiment**.
 - Select an existing **Experiment Setup**.
 - In the **System Preparation** workspace of the step **Preparation** explain:
 - How to enter vial positions for defined Control Samples.
 - How to enter positions for samples measured by the Experiment.
 - How to enter vial positions using the graphical interface.
- Show how and when to start the **Experiment Run**.
- Show how to monitor the **Experiment Run** in the step **Execution**.
 - In the **Status** workspace of the step **Execution**, explain:
 - How to interpret the progress of the **Experiment**.
- Explain how to modify action settings during the execution of **Experiment Run**.
 - Use the **Schedule** table on the step **Execution** and explain:
 - That modification of actions is only possible if not carried out yet.
 - Which action settings can be changed.
 - How the windows **Experiment Info**, **Activity Log**, **Modify Settings**, and **Method Sets** help to change or monitor information during the run of the **Experiment**.
- Show the visualization of the **Results**.
 - Explain the different review option in the **Results** window:
 - The **Trending Plot** window to review the response of one or more compounds over the experiment time.
 - The **Samples** window to review the list of measured samples.
 - The **Results** windows to review the Results table.
 - The **Chromatograms** window to review the signals.

- Show how to open existing **Experiments** for review.
- Show how to **Export** an existing **Experiment**.
 - Explain the characteristics of the **Export** function.
- Show how to **Import** an existing **Experiment**.
 - Explain the characteristics of the **Import** function.

Experiment Comparison

- Launch the Online LC Monitoring Software.
- Open the **Experiment Comparison** Tab in the Navigation Pane.
- Explain the **Experiment Comparison** Navigation Pane and how to select **Experiment Results** for comparison.
- Explain the **Compound Trending Comparison** workspace.
- Explain how to adjust parameters for comparison: **Time Units**, **Number of Graphs** for comparison in rows and columns, **Results Units** and **Compounds**.

Reporting

- Launch the Online LC Monitoring Software.
- Open the **Home** Ribbon tab and explain:
 - Report Options**.
 - How to create a **Report** as PDF.
- Open the created report and explain the contained information.

Software Maintenance and Diagnostics

- Discuss appropriate software maintenance procedures with the customer.
- Describe the importance of data back-up and computer image backup.
- Discuss the importance of regular backups for support situations.
- Discuss using Microsoft Backup and Restore as an option.
- Discuss the safe storage of the software media, licenses etc. provided with the system.
- Show how to register on Agilent SubscribeNet to download and order the latest software revision.
- Discuss software updates and compatibility instituted by local IT department.
- Discuss the importance of disabling power management options and utilities that run automatically.
- Power Options: Put the computer to sleep = **Never**.
- Determine any Windows Firewall requirements with the customer IT department. Ensure that Windows Firewall is **Turned on** and the "Notify me when Windows Firewall blocks a new program" = **Checked**.
- Windows Update: Check for updates but let me choose whether to download and install them.
- Show how to access virtual instructional tools or software, like e-Introduction.

First Run Assist (Customer driven, assisted by Service Engineer)

Section NOT Applicable

First Run Assist is a supervised first run of the instrument system performed by the customer.

- The purpose is to provide the customer the opportunity to perform and demonstrate understanding and competency in the critical steps when setting up a method and making a first run.
 - It is not intended to create optimized end state results, like chromatograms or spectra, but to provide the first step for running an analysis.
- Ask the customer to configure and run the Online LC System for checkout experiment themselves using the Online LC Monitoring Software. Observe and, if necessary, assist the customer to do so.
- Ask the customer to evaluate the checkout experiment results using the Online LC Monitoring Software. Observe and, if necessary, assist the customer to do so.
- Review and discuss the results of the checkout experiment repeated by the customer.

NOTE

Section is mandatory, corresponding service is included in solution product bundle as a default option.

Service Review

- Attach available reports/printouts to this documentation.
- Complete the Service Engineer Comments section below, if applicable.
- Explain how to log an instrument service call and what support services are available.
- If not covered during the Installation, explain the Agilent Warranty policy.
- Perform a review of Agilent's website and web links listed in "Important Customer Web Links".
- Discuss with the customer their training needs and present additional training options available through Agilent training and education and custom on-site consulting.
- Complete Signature Page and attach Signature Page to Service Order.

Signature Page

Service Engineer Comments (optional)

If there are any specific points you wish to note as part of performing the installation or other items of interest for the customer, please write in this box.

Service Verification

Service Request Number:	Date of Service Completion:
Service Engineer Name:	Customer Name:
Service Engineer Signature:	Customer Signature:
Total number of pages in this document:	