Agilent OpenLAB Chromatography Data System (CDS) for EZChrom Elite and OpenLAB ICM Users

Data Sheet

OpenLAB CDS EZChrom Edition is the next major revision of EZChrom Elite and OpenLAB ICM. Built on the new OpenLAB Shared Services architecture, OpenLAB CDS EZChrom Edition provides a number of new features that will make your work in the laboratory more efficient:

- More intuitive custom reporting with new OpenLAB Intelligent Reporting
- Faster and more flexible result review, reprocessing and reporting
- Better instrument utilization with remote access to any EZChrom -controlled instrument in your laboratory
- Better user management with user privileges and password protection - even on a standalone workstation
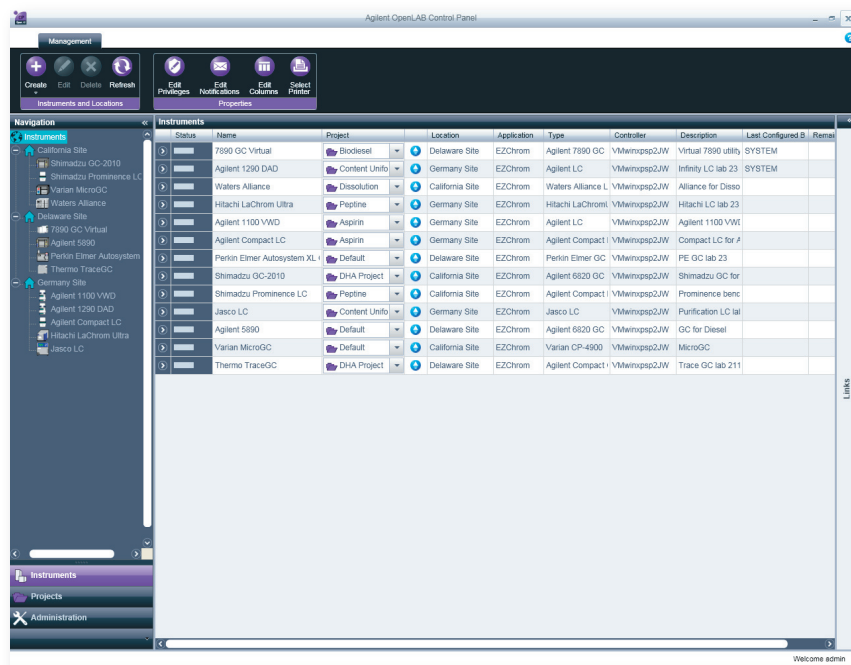

Figure 1. OpenLAB CDS Control Panel.

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New Architecture

The new Shared Services architecture brings together the first two of Agilent chromatography data systems ChemStation and ICM/EZChrom Elite in one platform. This allows these platforms to scale easily from a workstation, to simple networked workstations up to an enterprise system with hundreds of instruments. It also allows seemless integration into the Agilent OpenLAB ECM scientific data management system for data storage instead of file based storage. OpenLAB ECM is an enterprise data archival tool that can bring together more than just chromatography data and allows access and sharing of that information via the web across the enterprise.

The new OpenLAB Control Panel is at the core of managing the system. It centrally manages all instruments and users as well shows an overview of status or run information across the lab or enterprise. This makes it easy for a user with samples to select the best instrument to run them on. This lab-at-a-glance view can also be viewed remotely via the web, or even a smart phone so a user or manager can keep track of the lab's operation from anywhere.

Another reason to upgrade is the new architecture brings a new more modern communication protocol to the components of EZChrom Elite. Instead of communicating with the old Microsoft standard DCOM which can cause problems on busy networks, or not fit well with modern firewall settings, OpenLAB CDS uses a new Microsoft communication standard called Windows Communication Foundation. This new foundation uses standard TCP/IP for remote communication which is more rugged and better fits today's IT architecture. Using this standard also allows the system to take advantage of modern trends such as virtualization, so components of the system can either be normal PC hardware, or be Virtualized with software such as VMWare. This can make the system easier to deploy, easier to validate and use much less space and power than a system using physical components.

Complex Reporting Made Easy with Intelligent Reporting

OpenLAB CDS Intelligent Reporting allows you to create state-of-the-art standard or custom reports in OpenLAB CDS. In the initial release it supports LC- and GC data. It comes with an easy-to-use Report Template Editor allowing you to create report templates using simple drag-and-drop and configuration operations. It comes with a number of pre-defined report templates that can be used as-is, or serve as a starting point for reports tailored to your specific needs.

Intelligent reports can include standard or advanced result calculations. Summary tables of the runs and can include chromatograms. One key new feature is the ability to add multiple chromatograms or spectra per page in the report. You can easily create reports for typical pharmaceutical and chemical applications such as system suitability, impurity profiling, BTU or content uniformity.

Intelligent Reporting is fully integrated into the OpenLAB CDS interface and allows you to create single injection reports, as well as, sequence summary reports using familiar workflows. No re-learning required.

Make Your Result Review More Efficient with Intelligent Reporting

Intelligent Reporting allows you to include limit checks, automatically flag outliers by pass/fail criteria, sort results to show the most relevant information at the top of a table and to include graphical visualization of results in e.g., trend charts. All of these make report review faster and more efficient.
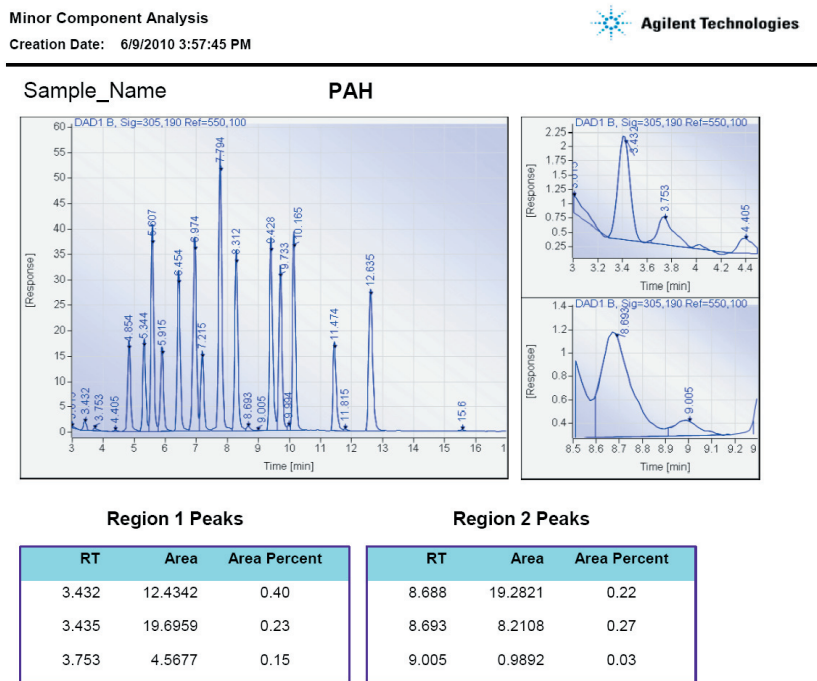
Figure 2. Intelligent Reporter lets you create state-of-the art reports using OpenLAB CDS.

Migration/Compatibility

All existing EZChrom Elite data, methods, sequences and report templates are compatible with OpenLAB CDS EZChrom Edition. If moving to the new Enhanced (RC.net) instrument driver from an older classic driver for the Agilent GC, instrument setpoints may need to be re-entered. Migrating your settings to OpenLAB CDS EZChrom Edition is easy with the included tool. This tool automatically moves existing instruments, user and project settings in to the new OpenLAB Control Panel where they can be used in the new CDS version.

Enhanced Workflows

The last main area of improvement is around workflow. OpenLAB CDS EZChrom Edition smooths the workflow of reviewing data by creating a result set or a result package with the data once it is run. The result set is a more intuitive way to review and reprocess data after acquisition. Simply by opening the result set, all methods, reports and templates and all injections are automatically loaded for easy review. The result set can also be turned into a full result package with a setting that can put a working copy of the method, the data, a .pdf of all reports, and all report templates into the package for easy archival. At any time in the future the package can be
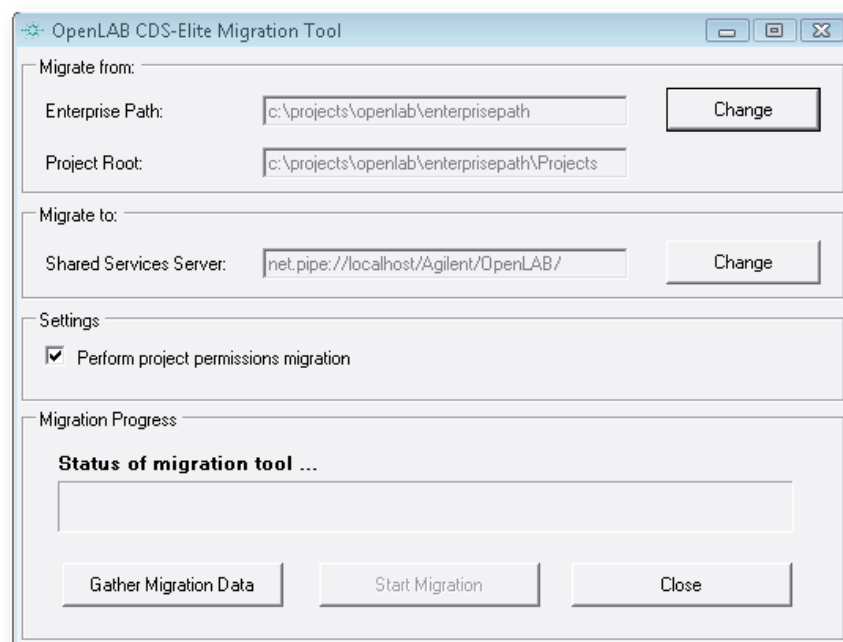

Figure 3. *OpenLAB CDS EZChrom Edition migration tool.*

brought back and all necessary files are ready to recreate the original data and results. This result package also allows a new Master Method workflow where the acquisition method can be protected from changes by users while still giving them the necessary permissions to make changes to the working method needed to review and reprocess data.
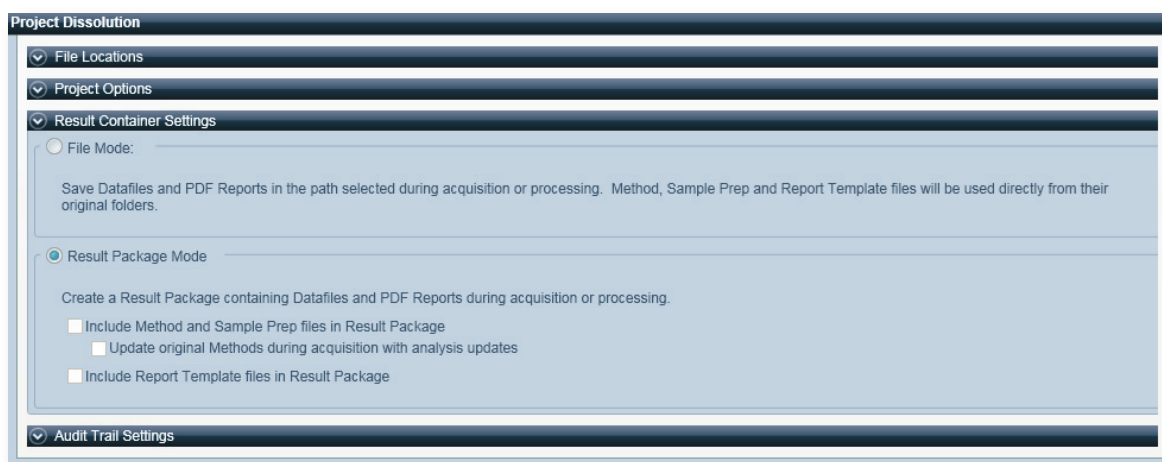

Figure 4. *Result package settings.*

Summary

All of these changes are brought into the system without disrupting the original EZChrom Elite workflow. Existing functionality is brought forward while the new features are added as optional choices in the new system. All existing methods, sequences, reports, and data are also fully compatible. There is also a tool to migrate existing enterprise settings such as instruments, users and permission easily into the new OpenLAB Control panel making the upgrade as seamless and non-disruptive as possible. For more information and many other new feature details, visit the web at www.agilent.com/chem/openlabcds where you can order a demo DVD or contact your local account manager.

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