
CompassCDS is a scalable, readily configured, easy to use software solution for all of your gas chromatography instrument control, data collection and analysis needs. CompassCDS includes a wide variety of standard data processing functionality, as well as numerous plug-ins, that enhance your capabilities to generate outstanding results and deliver clear, concise reports.

With its unique capacity for customization, CompassCDS provides a powerful tool for a variety of analytical operations. Available in either a stand alone or server based environment, CompassCDS can easily grow with your requirements.

CompassCDS provides you with the results you need in the format you want.

GCs can be placed anywhere on a server network. Via a PC connected to the same server complete control and data acquisition is possible. A second PC/GC configuration on the same network is also possible. The number of GCs connected to one PC is virtually unlimited.

Direct connection of multiple GCs to one PC is the most straightforward and simple configuration especially when a standalone version is required or no network is available.
System Suitability Determination
System suitability software determines the quality of a chromatographic analysis, calculating parameters such as peak asymmetry and column efficiency. The software can compare the results generated from injected control samples to their expected concentrations. Limits put on these results can then be used to determine the best action to take to correct potential problems and ensure the integrity of data and results.

Column Tracker Function
Column Tracker, an integrated database, keeps track of the identity and usage for all system columns. Every time an injection is made, Column Tracker records the injection, no matter which instrument or which column is being used. This information is stored in the database, as well as with each data file, providing a completely documented usage and performance history for every GC column.

Multimode Print Manager
Print Manager allows users to conveniently export reports and chromatograms, in multiple formats to one or more network printers. CompassCDS can automatically convert chromatogram results to many different formats such as ASCII, PDF, Excel, or AIA, simplifying the ability to perform further calculations or modeling. Furthermore, it’s easy to interface with other systems like LIMS.

Configuration Manager
The configuration manager is a user friendly tool that organizes access levels and data storage locations defined in user profiles. This will keep administrative functions away from the day to day use of the software by laboratory technicians.

Experimental Deviation Compensation
In some cases instrument and system effects can cause experimental deviations. CompassCDS SmartTimeUpdate™ function can be used to automatically correct retention times and timed events on the same run where the chromatographic deviations occurred, without changing instrument parameters. This function is applicable with packed columns, multi-column systems, and manual and electronic gas control, as well as for use with verified methods.
The Plug-in Tool Kit

This series of software customization tools allows power users to develop customized calculation modules, which fully integrate with CompassCDS. Plug-ins, developed using standard computer languages, can be automatically called from CompassCDS, yet remain independent, eliminating the need for revalidating CompassCDS after installation. A large number of standard plug-ins are available that allow special reporting and other post analysis functions.

Some examples of application specific utilization of the CompassCDS Plug-ins include:

CompassCDS MatchCompare

CompassCDS MatchCompare software provides rapid visual and quantitative comparison of complex chromatograms. This unique plug-in is already widely used in the flavor and fragrance industry.

Simulated Distillation

The Simulated Distillation package provides automated boiling point distributions of a full range of petroleum products for applications that comply with ASTM, IP, DIN, and ISO standard test methods.

Detailed Hydrocarbon Analysis

The Detailed Hydrocarbon Analysis package reports in an automated way the physical properties of gasoline and similar products based on its individual components for applications that comply with Bruker developed methods and ASTM and IP and standard test methods.
Simply Powerful

CompassCDS provides a number of key features that make it the platform of choice for GC system operation, data processing and report generation. These key features include:

- **Single Screen Interface**
- **Flexible Data Handling and Report Generation**
- **Comprehensive Security Options**
- **Efficient Summary Reports**
- **System Suitability Determination**
- **Column Tracking Function**
- **Multimode Print Manager**
- **Experimental Deviation Compensation**
- **Customized Software Plug-Ins for Specific Applications**

### Single Screen Operation

CompassCDS’s single screen approach to building methods and sequences, as well as viewing and manipulating data, make it very easy to use and learn the software platform. With CompassCDS, all pre- and post run activities as well as instrument control and status monitoring are done from a single screen.

A single CompassCDS method contains several functions including: instrument control, data acquisition, display, processing, and reporting. Those functions are distributed into smaller, easier-to-use visual segments to avoid distracting users with too much on-screen information. Each method segment deals with a single aspect, such as integration, peak identification, calibration, or reporting.

### Flexible Data Handling and Report Generation

CompassCDS data handling and reporting is based on system and user defined variables for both peak and global information. Variables such as peak retention time and the identity of the operator are provided by the system and stored as part of the chromatographic data file.

In addition to the variables generated by the system, users can create their own, representing more advanced calculations or specific user inputs and outputs. Customized variables make data entry and results interpretation easier. They can be created in any language and allow data sets to be optimized and reported in formats specific to your laboratory.
Comprehensive Security Options

Data and results are critical to your laboratory’s operation. CompassCDS provides the security to ensure the integrity of your results, regardless of industry or laboratory size. CompassCDS has a full set of access control and audit trail features to identify and limit who may operate chromatographs and manipulate data.

CompassCDS tracks all changes to methods and results through audit trails embedded in these files and can even protect your data from Windows® Explorer® to prevent files from being accidentally removed or deleted.

Summary Reports

Summary reports use results from any number of chromatograms, taken in a single sequence or over the past months, and calculate averages and standard deviations. Summary reports can also plot trends in data, detecting and flagging changes in chromatographic systems before these changes can compromise operation.