

For LabSolutions™ LCMS

LC/MS/MS Method Package for Residual Pesticides Ver. 3

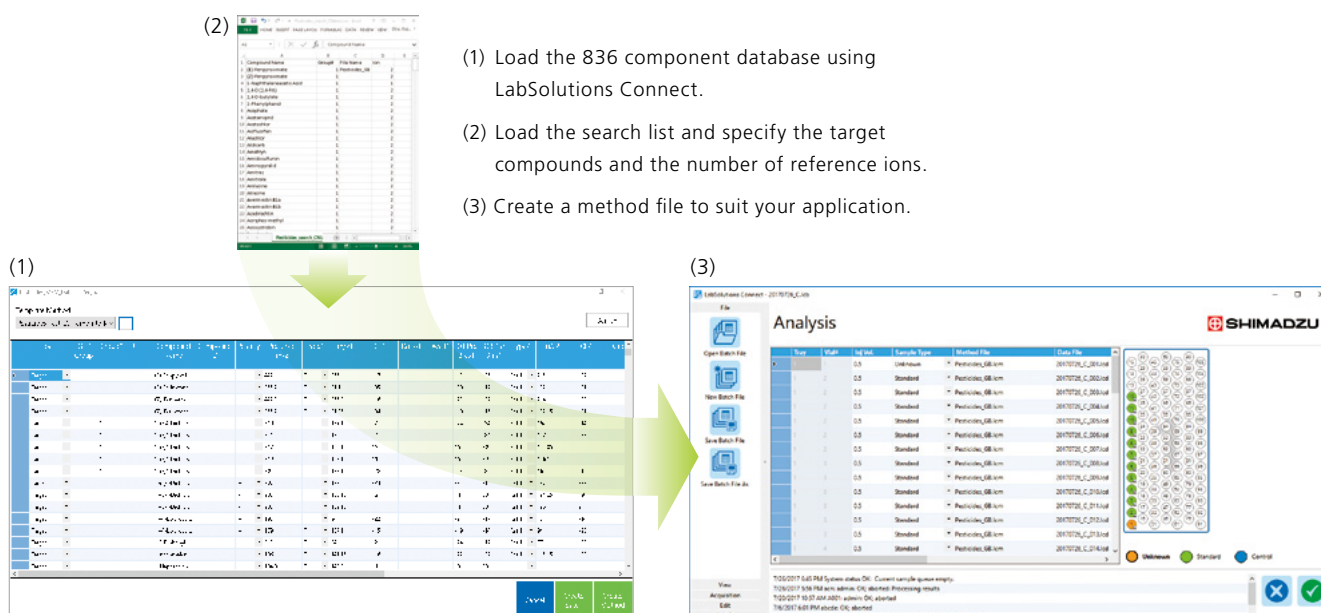
- Database compatible with LabSolutions Connect™, a tool that automates MRM tuning and optimization
- Encompasses the components listed in the Japanese Multiresidue Method for Agricultural Chemicals by LC/MS.
- Compatible with the components subject to the Chinese GB standards
- Compatible with the components subject to (EC) Directive No. 396/2005
- Contains 6557 MRM transitions for 836 components.
- Pretreatment program for improving the peak shape of polar pesticides
- Easy data analysis with LabSolutions Insight™, a powerful data mining and analytics program



Create Methods Easily from the Database

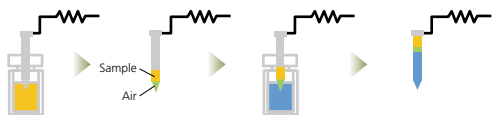
The MRM information in this method package is controlled by LabSolutions Connect (option). With LabSolutions Connect, you can call up the information needed from the database by loading a text file, and then easily create an analysis method. In addition, this method package contains text files (search lists) of components subject to the regulations, enabling the easy creation of an analysis method file for these components.

The database and search lists can be customized for use in conjunction with components to be analyzed by the user.



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Improve the Shape of Peaks for Polar Compounds via Co-Injection

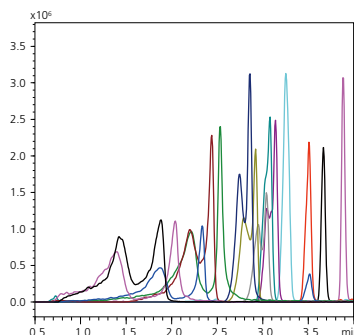


Co-Injection of Water Using the Pretreatment Function

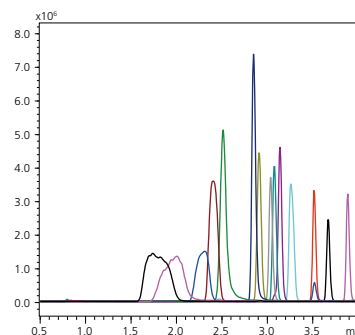
Samples pretreated with the QuEChERS method are extracted with 100 % acetonitrile. Accordingly, the shape of peaks for polar compounds with short retention times is prone to deformation depending on the analytical conditions (figure at right (1)).

A pretreatment program for co-injection is incorporated into the high-speed simultaneous analysis methods for 508 and 646 residual pesticides. Reducing peak shape deformation is possible by co-injecting water with the sample (figure at right (2)).

(1) No co-injection



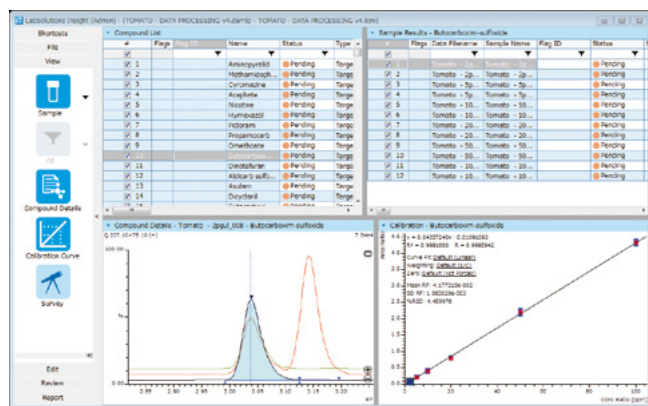
(2) Co-injection with water (0.5 μL of the sample and 10 μL of water injected alternately for four cycles)



MRM Chromatograms for Pesticides Added to a Tomato Extract (Sample injection volume: 2 μL)

Note: The co-injection mode is supported by the SIL-40 series and the SIL-30AC.

Smooth Analysis of Multiple Analytes with LabSolutions Insight



When analyzing data for multiple components and analytes, everything from batch analysis to the creation of reports can be performed by LabSolutions Insight.

LabSolutions Insight is a software program equipped with quantitative analysis and screening functions. In the analysis window, information is displayed for each target compound and set of measurement data, and both quantitative values and area values can be listed. This allows the user to select the easiest display method for checking the data in accordance with the workflow. In addition, by using the flagging function, only the results exceeding specified standard values are displayed, improving the analytical throughput of multiple components and analytes subject to the regulations.

Remarks and Precautions

LabSolutions LCMS Ver. 5.109 or later, LabSolutions Connect Ver. 2.1 or later and LabSolutions Insight Ver. 3.8SP1 or later are required.

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