

## Project experience of Laboratory Management with LABWORKS LIMS for ChemService- Italy.

### Customer Profile

Since 1992, ChemService has been one of the most advanced Italian companies in the field of analytical services. It is active both at a national and an international level, and offers highly qualified services in the fields of chemical, chemical-physical, microbiological, ecotoxicological analysis and of genetic analysis.

ChemService offers analysis of samples, setting-up and validation of new analytical methods, regulatory advice, preparation of recorded dossiers, assistance in *problem solving*. With an operational structure modelled on the needs of the market and able to answer in real time the requests of the customers, ChemService is the ideal competitive partner to national and multinational chemical and pharmaceutical industries, large-scale retail trade and food production, public administrations and consortiums and direct or indirect analytical services and the rules that regulate them.



*Dr. Alberto Villanti General Manager  
with Ph.D. Lucia Chiappetta  
ChemService Laboratories Manager*

### Fields of action

ChemService supplies analysis and services in 5 different fields:

- The ECOLOGY DEPARTMENT supplies analysis, controls and technical-regulatory assistance to industries, local authorities, decontamination consortiums, municipal companies, communal administrations, etc. for:
  - different types of ground water
  - air and work environments
  - emissions in the atmosphere
  - noise and microclimate
- The FOOD DIVISION carries out chemical and microbiological controls, and also sensorial analysis, on *food and beverage* products, depending on the current legislation. In this field, ChemService offers technical-regulatory assistance, drawing up of products specifications, assistance for the creation of private-branded products, drawing up of Handbooks and Self-control Plans in conformity with the Legislative Decree 155/97 (HACCP), Drawing up of Handbooks for food production in accordance with the **CE Reg. 178/2002** (Traceability), Audit for suppliers, Training courses for companies about hygiene and good practices of production.
- The GLP ANALYTICAL STUDIES DIVISION performs chemical-physical studies on chemical, technical and formulated products and setting-up and validation of new analytical methods.
- The ECOTOXICOLOGY DIVISION, performs, in GLP, short and long-term environmental toxicity tests on water and terrestrial organisms, and biodegradability tests on chemical substances, detergents included (**CE Regulations 648/2004**).
- The DOSSIER DIVISION offers services of assembly of chemical-physical, toxicological and eco-toxicological studies, risk assessment, relevant to chemical substances, for the preparation of recorded dossiers of this products to the Relevant Authorities **in Italy and in the other European and non-European countries** (e.g. Ministry for Health, EPA).



*Ph.D. Stefano Garofani Studies  
Division Manager with Ph.D.  
Fausta Giuffrè Food Division  
Manager*

## Certifications

- ✓ SINAL crediting, in accordance with the UNI CEI EN **ISO/IEC 17025** rule
- ✓ Certification of the **Ministry for Health** for the realization in **GLP** of many types of samples according to the Legislative Decree 120 and of the MD of 5/08/1999, in adoption of the **instructions 88/320/EEC, 1999/11/EC and 1999/12/EC**

- ✓ Entry in the Regional Register of Laboratories authorised to perform the analysis for the self-control of food industries (E.R.R.L. 21/07/03) and in the List of the Laboratories recognised for the analysis of water (Regional Law 62/85).

## LABWORKS LIMS Experience

In ChemService, all the activities of the laboratory are managed by LABWORKS LIMS from Perkinelmer.

By this software all samples, once arrived, are classified and labelled with a unique number called "SampleID". In addition to the "SampleID" a series of information are associated with the samples; these are useful for sample identification and for its traceability during and after the analytical survey. The most common data accompanying the sample are: the customer, the analysis in progress, the analytical methods to be used, the specific and/or law limits, the time of delivery of results, the legislative references joined to each analysis.

By the Labworks software, we succeeded in subdividing orders in the various activity sectors (Ecology, Environment, Studies, Eco-toxicology) and in this way we had the possibility to reserve the access to the various functions with specific functions.



*Tiziana Fogagnolo LIMS Super User  
with Luca Piatti PerkinElmer  
Project Manager during the  
implementation of the Labworks  
LIMS in the ChemService  
laboratories*

By this way of registering and labelling the samples we developed a worksheet, precious instrument for the operators of the laboratory, which allowed the optimisation of the time elapsed between the arrival of the sample and the beginning of the analysis. The analysts, consulting the information reported on the worksheet or on the software display concerning the sample, can verify in real time the specification limits of each analysis, the analytical method, the legislative reference, the operating procedures of the laboratory (SOP), the notes joined at the arrival of the sample and a possible safety sheet (MSDS) of the sample. In the same display of the LIMS, analysts can input notes relevant to the execution of each single test, enclose files or documents that contribute to enrich the analytical heritage of any test performed in the laboratory.

Other important elements of the Labworks LIMS are the "Cross References". This efficacious research system, which can be personalized by the user without the use of programming, allows the building, according to the needs, of research criteria to extract from the database any kind of information: series of results, printings, traceability of the documentation, highly reducing the waiting for any interrogation of the system.

Labworks LIMS has also a validation form to protect the quality of the analytical result. Validation, structured in more levels, allows a crossed check of the results on the part of any sector manager to achieve a final validation on the part of the Laboratory Manager. All the information contained in the worksheet, on the labels and in the Labworks are then reproduced in the Test Report. We evaluated carefully the Test Report, as a matter of fact this is the synthesis of the analytical qualitative process of the laboratory, and primary need of all our Customers.

Guided by the requests of our Customers belonging to different sectors of the market ranging from Food to Environment, from the Study and development of methods to Ecotoxicology, we prepared different certified methods aiming at supplying data in a clear structured way, in accordance with the Qualitative, Regulatory rules and rules of Certification relevant to the product sector of the final Customer. Another step has been recently made in editing Test Reports also in electronic format and simultaneously reducing the waiting of the Customer.

"The implementation of the LABWORKS LIMS in our laboratories marked an important turning point in the rationalization of the productive processes and in the technological innovation of our company."

-- Mrs. Lucia Chiappetta

**ChemService s.r.l.**

Via F.lli Beltrami, 15 - 20026 Novate Milanese (MI) Italy  
tel. ++39 02 356 996.1 fax ++39 02 382 014 46 <http://www.chemservice.it>