## CERALIM, France

CERALIM is an independent laboratory (member of the Network Lab France) specializes in providing microbiological analysis for industry, collective and commercial restoration, sectors of health and environment. CERALIM is accredited by COFRAC under No. 1.1546 according to ISO 17025 for microbiology of food and water.

Work with : 2 easySpiral®



Up to three times less of platting and dilutions thanks to the Spiral® method

# Interview with Mr Frédéric JAFFRENNOU, Microbiologist Director of the CERALIM:

# Why did you feel the need in an automatic plater?

"Between 1992 and 2000, CERALIM was the partner of the Institut Pasteur de Lille (SERMHA) in the Centre region. As the SERMHA was equipped with an automatic spiral plater for their food analysis and the Spiral<sup>®</sup> method had been validated for total coliforms and flora, our CERALIM laboratory has also been equipped in a spiral plater. In the market of the Spiral<sup>®</sup> method, there are three major players. For many years we had a competitor's model, which engendered a significant cost for consumables and maintenance difficulties. So we decided to move to a plater that automatically cleans and disinfects itself, the only consumable item being the beakers. The Interscience easySpiral<sup>®</sup> proved much faster and easier to use than the others."

## How did easySpiral<sup>®</sup> change your work?

"We use it in the context of the normalization of surface plating for the enumeration of lactic acid bacteria and *Pseudomonas spp*, but also for internal method of enumeration of yeasts and *Enterobacteria*. If, for each parameter, we had to plate by hand, we would lose a lot of time, especially for our end-of-life samples, which are loaded with mesophilic aerobic bacteria and lactic acid bacteria for which we would have to dilute up to 10-6.

Moreover, the new FBTD (Federation of Business Trade and Distribution) criteria systematically require us to make the total flora report on lactic acid bacteria for the analysis of products at the end of the deadline consumption. For this type of report, easySpiral<sup>®</sup> is a really valuable asset for us because it allows us to have two homogeneous methods between the analysis of mesophilic aerobic bacteria and lactic acid bacteria and get ratios close to 1. The customer is very pleased with the coherent result.

Both the easySpiral<sup>®</sup> units we have used daily. At the beginning, we had to put in place a disinfection protocol adapted to our needs; besides the disinfection, cleaning and degreasing are fundamental points for us. We analyse meat food matrices rich in collagen and fat which clog the tubing and filter. For this, we allow the enzyClear<sup>®</sup> to incubate overnight, allowing the enzyme to destroy residue and prevent the deposition of biofilm. The Spiral<sup>®</sup> method is also a more respectful approach for the environment which allows us to generate less waste and to make savings on Petri dishes. With only two Petri dishes and two dilutions, we obtain a result as accurate as the standard diluting plating with which we would need more than six Petri dishes. For certain matrices, we can divide by three the number Petri dishes we use.

If we remove our easySpiral® from laboratory, our technicians will not appreciate! "

### How do you see the evolution of the Spiral® method and standardization?

# interscience

"I note that this method is still not generalised in laboratories, but some of my microbiologist colleagues are still reluctant about its development. The positive points are that the evolution of the hygiene standards have enabled us to develop the ISO-7218 standard, with the replacement of the spiral standard NFV08-100 and with the recognition of its use for the inoculated media in surface plating. It seems possible to validate this method quite easily in the context of the evolution of the method "NFV08-054: Enumeration of Enterobacteriaceae", bearing in mind that the difference between the VRBG medium (*Enterobacteriaceae*) and VRBL (*Coliforms*) is based only on the "sugar" used. This method would be highly relevant but also very efficient in the field of water microbiology especially for the enumeration of viable bacteria at 22°C and 36°C."

### Why did you choose Interscience?

"Interscience is a company that develops, which has a real commitment to R & D and to improving its products, supporting customers and not just for sale. Relations with the After-Sales Service have always been very productive.

We have tried to understand together, to make internal tests compared to the difficulties and we have always managed to find solutions. Machines on loan are always sent quickly when required. We are part of a group of laboratories, Network Lab France (RFL), in which we are strong promoters of this brand and of the easySpiral<sup>®</sup>. We speak highly of the easySpiral<sup>®</sup> with new participating laboratories, and advise them on the operational and disinfection protocols. We maintain a very good relationship and cooperation with Interscience. We have also participated during an exchange with an overseas Interscience customer."

### ANALYSIS PROTOCOL

Type of sample: any type of matrix with mostly animal products
Number of analysis per day: 80-150 samples
Dilution mode: manual mode
Bacteria: Total flora, Lactic Acid Bacteria, *Escherichia coli, Coliformes, Pseudomonas*Medium: preparation with media preparator and an automatic homogenization, Petri dishes poured and left to dry in a controlled environment, and conservation in cold room
Number of Petri dishes plated per day: 150-600
Way of counting colonies: manual mode