

**NF VALIDATION**  
**Validation of alternative analysis methods**  
**Application to the food industry**

Summary report  
according to the standard EN ISO 16140-2/A1 (2024)

Qualitative method

**VIDAS *Listeria monocytogenes* Xpress**  
**VIDAS LMX - Ref. 30123 - certificate # BIO 12/27-02/10**  
**for the detection of *Listeria monocytogenes* in human food**  
**products and in environmental samples**

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This report contains 92 pages, including 60 pages of appendices.  
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Version 0

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## Preamble

- Protocols of validation:

- EN ISO 16140-1 and EN ISO 16140-2/A1 (2024): Microbiology of the food chain — Method validation  
Part 1: Vocabulary.  
Part 2: Protocol for the validation of alternative (proprietary) methods against a reference method.
- AFNOR requirements regarding comparison and interlaboratory studies for implementation of the standard EN ISO 16140-2 (Version 12).

- Reference method:

- **EN ISO 11290-1 (July 2017):** Microbiology of the food chain - Horizontal method for the detection and enumeration of *Listeria monocytogenes* and of *Listeria spp*- Part 1: Detection method.

- Application scope:

- **All human food products** by a validation testing of a broad range of foods, including:
  - meat products,
  - dairy products,
  - seafood products,
  - vegetal products,
  - composite foods,
- **Environmental samples.**

- Certification body:

- **AFNOR Certification** (<https://nf-validation.afnor.org/>).

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Appendix 1: Protocols of the reference and of the alternative methods

Appendix 2: Artificial contaminations

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## Definitions

- **Method comparison study**

The method comparison study is the part of the validation process that is performed in the organizing laboratory. It consists of three parts namely the following :

- A comparative study of the results of the reference method to the results of the alternative method in (naturally and/or artificially) contaminated samples (so-called sensitivity study);
- A comparative study to determine the relative level of detection (RLOD) in artificially contaminated samples (so-called RLOD study);
- An inclusivity/exclusivity study of the alternative method.

- **Sensitivity study**

The sensitivity study aims to determine the difference in sensitivity between the reference and the alternative method.

The sensitivity is the ability of the reference method or alternative method to detect the analyte.

- **Relative level of detection study**

A comparative study is conducted to evaluate the level of detection (LOD) of the alternative method against the reference method. The evaluation is based on the calculation of the relative level of detection (RLOD).

The level of detection at 50% ( $LOD_{50}$ ) is the measured analyte concentration, obtained by a given measurement procedure, for which the probability of detection is 50%.

The relative level of detection level of detection at  $P = 0,50$  ( $LOD_{50}$ ) of the alternative method divided by the level of detection at  $P = 0,50$  ( $LOD_{50}$ ) of the reference method.

- **Inclusivity and exclusivity study**

The inclusivity study is a study involving pure target strains to be detected or enumerated by the alternative method.

The exclusivity study is a study involving pure non-target strains, which can be potentially cross-reactive, but are not expected to be detected or enumerated by the alternative method.

- **Interlaboratory study**

The interlaboratory study is a study performed by multiple laboratories testing identical samples at the same time, the results of which are used to estimate alternative-method performance parameters.

The aim of the interlaboratory study is to determine the difference in sensitivity between the reference and the alternative method when tested by different collaborators using identical samples (reproducibility conditions).

## 1. Introduction

The method VIDAS *LMX* for the detection of *Listeria monocytogenes* is validated under the attestation number BIO 12/27-02/10. The validation history of the method is the following:

| Study              | Date          | Standards   | Expert Laboratory                                  | Observation  |
|--------------------|---------------|---|--|--|
| Initial validation | Dec. 2009     | ISO 16140/A1:2011<br>ISO 11290-1/A1                                 | IPL Santé,<br>Environnement<br>durables Nord       | Validation for all foods (except raw milk cheeses) and environmental samples |
| Extension          | Feb. 2010     | ISO 16140/A1:2011<br>ISO 11290-1/A1                                 | Institut Scientifique<br>d'Hygiène et<br>d'Analyse | Extension for raw milk cheeses   |
| First renewal      | Nov. 2013     | ISO 16140/A1:2011<br>ISO 11290-1/A1                                 | Institut Scientifique<br>d'Hygiène et<br>d'Analyse | No additional tests  |
| Extension          | Sept. 2016    | NA  | NA   | Extension for the use of software 4.8  |
| Second renewal     | Jan. 2017     | ISO 16140-2<br>ISO 11290-1 (2017)<br>AFNOR requirements rev. 6      | Institut Scientifique<br>d'Hygiène et<br>d'Analyse | Additional tests to fulfill the requirements of the revised standards        |
| Extension          | 2018          | NA  | NA   | Extension for the use of software 4.10                                       |
| Extension          | Jul. 2019     | NA  | Assays performed by<br>bioMerieux                  | Modification of the conjugate  |
| Third renewal      | December 2021 | ISO 16140-2:2016<br>ISO 11290-1 (2017)<br>AFNOR requirements rev. 7 | Laboratory<br>MICROSEPT                            | No additional tests  |
| Fourth renewal     | December 2025 | ISO 16140-2/A1 (2024)<br>ISO 11290-1 (2017)                         | Laboratory<br>MICROSEPT                            | No additional tests  |

This document is a summary report concerning the VIDAS *LMX* method for the detection of *Listeria monocytogenes* without any supplementary tests. A reinterpretation of the data is nevertheless carried out in order to meet the requirements of amendment A1 of 2024 of the EN ISO 16140-2 standard.

## 2. Protocols of the methods

### 2.1. Alternative method

#### 2.1.1. Principle of the alternative method

The VIDAS *L. monocytogenes* Xpress (LMX) assay is an enzyme immunoassay intended for use on the automated VIDAS instrument (see Operator's Manual) to detect *Listeria monocytogenes* antigens using the ELFA method (Enzyme Linked Fluorescent Assay).

Each test is composed of two parts:

- the Solid Phase Receptacle (SPR), which serves as the solid phase as well as the pipetting device. The interior of the SPR is coated with anti-*L. monocytogenes* antibodies adsorbed on its surface.
- The strip, which contains all the ready-to-use reagents needed for the assay: washing buffer, anti-*Listeria monocytogenes* antibodies conjugated with biotin and substrate.

All the assay steps are performed automatically by the instrument. The reaction medium is cycled in and out of the SPR several times.

- Part of the enrichment broth is dispensed into the reagent strip. The antigens present bind to the anti-*L. monocytogenes* antibodies coated on the inside wall of the SPR.
- Unbound sample components are washed away.
- Antibodies conjugated with alkaline phosphatase are then cycled in and out of the SPR® and will bind to any *Listeria monocytogenes* antigens which are themselves bound to the antibodies on the SPR® wall.
- Further wash steps remove unbound conjugate.
- During the final detection step, the substrate (4-Methylumbelliferyl phosphate) is cycled in and out of the SPR. The conjugated enzyme catalyzes the hydrolysis of this substrate into a fluorescent product (4-Methylumbelliferyl phosphate) the fluorescence of which is measured at 450 nm.

When the assay is completed, the results are analyzed automatically by the instrument, and a test value is generated for each sample. This value is then compared to an internal reference and each result is interpreted (positive or negative):

Test value (TV) = sample RFV/standard RFV.

If TV < 0.05, Negative test

and

If TV ≥ 0.05, Positive test

### 2.1.2. Protocol of the alternative method

The general protocol for all human food products (meat products, dairy products [except raw milk cheeses], vegetables, seafood products, composite foods and environment samples consists in:

- enrichment of a 25 g sample in 225 ml LMX broth (1:10 dilution), supplemented with 500 µl of a selective mix, and incubated for 26-30 h at 37°C ± 1°C,
- followed by a VIDAS LMX test, tested from a 250 µl portion, after heating for 5 minutes at 95-100°C.

The specific protocol for raw milk cheeses consists in:

- enrichment of a 25 g sample portion in 225 ml LMX broth, supplemented with 500 µl of a selective mix,
- mix with a peristaltic blender,
- add 225 ml of LMX broth not supplemented,
- incubation for 20 -24 h at 37°C ± 1°C,
- followed by inoculation of 3 ml of LMX broth in 6 ml of LX broth, and incubated for 6-8 h at 37°C ± 1°C,
- followed by a VIDAS LMX test, tested from a 250 µl portion, after heating for 5 minutes at 95-100°C.

Notes:

- Each flask containing 225 ml of supplemented LMX broth must be pre-heated to 37°C ± 1°C (the flasks may be placed in an incubator the day before the tests).
- The freeze-dried selective factors must be reconstituted with 6 ml of distilled water and may be kept for up to 7 days at 2-8°C.
- It is important to shake the freeze-dried selective factors in the flask well before sampling.
- Protocol reference: 14226 C

Positive VIDAS LMX test results must be confirmed following one of the procedures below:

- Isolate the non-heated enrichment broth on an Ottaviani Agosti-type chromogenic agar, or a chromogenic agar that is part of a method certified NF VALIDATION.

Follow one of the 3 validated procedures below:

- The presence of typical *Listeria monocytogenes* colonies after isolation of the enrichment broth is sufficient to confirm the positive result.
- Identify between one and five typical colonies, using the tests described in the methods standardized by the CEN or ISO standard (including the purification step).
- On a Ottaviani and Agosti-type chromogenic agar, the confirmation of typical *Listeria monocytogenes* colonies using an API® strip can be performed without prior purification if the colony is sufficiently isolated.

Note: In the absence of characteristic colonies on a chromogenic plate with a positive VIDAS LMX test, another way of confirmation can be followed:

- General protocol : transfer 0.1 ml of unheated LMX broth to 6 ml of LX broth and incubate for 22-26h at 37°C, and then isolate on a chromogenic plate.
- Specific protocol :in addition to the previous transfer protocol, it is also possible to extend incubation time of the LMX broth to 24 hours before streaking on an chromogenic plate.

Assays were also conducted on samples tested during the accuracy test to evaluate the possibility to store the LMX broth for 72 hours at 2-8°C after incubation to verify that these storage conditions do not modify the result.

The diagram summarizing the method is shown in appendix 1.

### 2.1.3. Restriction

There is no restriction.

## 2.2. Reference method

Assays of the previous validations were performed according to the standard EN ISO 11290-1 / A1 (2005) "Horizontal method for the detection and enumeration of *Listeria monocytogenes* - Part 1: detection method." Following the revision of this standard, the modifications have no impact on the results obtained previously as well as on the performance of the alternative method.

Assays of the 2017 study were performed according to the standard EN ISO 11290-1 (2017) "Horizontal method for the detection and enumeration of *Listeria monocytogenes* and of *Listeria* spp- Part 1: detection method."

The analytical scheme is presented in appendix 1.

### 2.3. Study design

It is a unpaired study as the reference and the alternative methods used two different enrichment broths for the first step in the enrichment procedure, Fraser ½ broth and LMX broth, respectively.

### 2.4. Application scope

The scope of the method concerns a broad range of foods and environmental samples. In this document, categories are classified as below:

- ① Meat products,
- ② Dairy products,
- ③ Seafood products,
- ④ Vegetal products
- ⑤ Composite foods,
- ⑥ Environmental samples.

### 3. Method comparison study

The study was conducted on a variety of samples and strains representative of food products. This is not an exhaustive list of the various matrices included in the application scope. For any remark on the alternative method, you can contact AFNOR Certification by connecting to the Internet page <http://nf-validation.afnor.org/contact-2/>.

#### 3.1. Sensitivity study

##### 3.1.1. Protocols used for the study

The samples were analyzed by the reference and by the alternative method. For the alternative method, the minimum incubation time of the broth was applied.

All positive and discordant samples were confirmed using the following protocol:

- a) Using the tests described in the ISO 11290-1 method, after isolation of LMX broth on *Listeria monocytogenes* selective agar ( Ottaviani and Agosti Listeria agar),
- b) Isolation of LMX broth on *Listeria monocytogenes* chromogenic agar (chromID Ottaviani Agosti etc.). The typical appearance of *Listeria monocytogenes* on chromogenic plates is sufficient to validate a positive VIDAS LMX test.
- c) using an API *Listeria* gallery performed from a colony picked directly from the selective agar

Typical colonies on the O&A media were confirmed after purification by the tests described in the reference methods (biochemical confirmation and serology).

A storage of the enrichment broths for up to 72 hours at 5±3°C before performing the VIDAS LMX test and the confirmation steps was also tested.

##### 3.1.2. Number and nature of the samples

Three hundred and sixty one (361) samples from the initial validation study and the extension of 2010 were kept for the statistical analysis.

One hundred and thirty four (134) samples of the renewal study in 2017 were added-for the statistical analysis.

A total of 495 samples were thus analyzed.

The distribution of the samples is presented in table 1.

Table 1 : number and nature of the samples analyzed (PV: previous validation studies, I 17: ISHA 2017)

| Category                        | Type   | Year | Positive results | Negative results | Total      |
|---------------------------------|--|------|------------------|------------------|------------|
| <b>1 Meat products</b>          | m1 Raw products  | PV   | 9                | 11               | 20         |
|                                 |  | I 17 | 0                | 0                |            |
|                                 | m2 Ready-to-eat and processed meat products                  | PV   | 3                | 7                | 20         |
|                                 |  | I 17 | 7                | 3                |            |
|                                 | m3 Cured products  | PV   | 13               | 7                | 23         |
| I 17                            |  | 0    | 3                |                  |            |
| <b>Total</b>                    |  |      | <b>32</b>        | <b>31</b>        | <b>63</b>  |
| <b>2 Dairy products</b>         | d1 Raw and pasteurised milk and cheese with pasteurised milk | PV   | 12               | 6                | 22         |
|                                 |  | I 17 | 0                | 4                |            |
|                                 | d2 Goat and ewes pasteurised milk cheese                     | PV   | 9                | 13               | 23         |
|                                 |  | I 17 | 1                | 0                |            |
|                                 | d3 Raw milk cheese   | PV   | 26               | 28               | 60         |
| I 17                            |  | 4    | 2                |                  |            |
| <b>Total</b>                    |  |      | <b>52</b>        | <b>53</b>        | <b>105</b> |
| <b>3 Seafood products</b>       | s1 Fresh fish fillets and shellfishs                         | PV   | 13               | 3                | 23         |
|                                 |  | I 17 | 0                | 7                |            |
|                                 | s2 Smoked fish   | PV   | 8                | 20               | 30         |
|                                 |  | I 17 | 2                | 0                |            |
|                                 | s3 Processed products  | PV   | 5                | 7                | 20         |
| I 17                            |  | 5    | 3                |                  |            |
| <b>Total</b>                    |  |      | <b>33</b>        | <b>40</b>        | <b>73</b>  |
| <b>4 Vegetal products</b>       | v1 Raw vegetal products                                      | PV   | 6                | 12               | 22         |
|                                 |  | I 17 | 4                | 0                |            |
|                                 | v2 Ready-to-eat, ready-to-cook raw vegetal products,...      | PV   | 11               | 13               | 24         |
|                                 |  | I 17 | 0                | 0                |            |
|                                 | v3 Processed vegetal products                                | PV   | 7                | 11               | 21         |
| I 17                            |  | 3    | 0                |                  |            |
| <b>Total</b>                    |  |      | <b>31</b>        | <b>36</b>        | <b>67</b>  |
| <b>5 Composite foods</b>        | c1 Ready-to-eat foods  | PV   | 2                | 6                | 38         |
|                                 |  | I 17 | 18               | 12               |            |
|                                 | c2 Ready-to-reheat foods                                     | PV   | 12               | 9                | 43         |
|                                 |  | I 17 | 15               | 7                |            |
|                                 | c3 Pastries, egg products,...                                | PV   | 7                | 11               | 45         |
| I 17                            |  | 14   | 13               |                  |            |
| <b>Total</b>                    |  |      | <b>68</b>        | <b>58</b>        | <b>126</b> |
| <b>6 Environ-mental samples</b> | e1 Process water   | PV   | 6                | 10               | 20         |
|                                 |  | I 17 | 4                | 0                |            |
|                                 | e2 Surface samples   | PV   | 8                | 9                | 20         |
|                                 |  | I 17 | 2                | 1                |            |
|                                 | e3 Residu  | PV   | 10               | 11               | 21         |
| I 17                            |  | 0    | 0                |                  |            |
| <b>Total</b>                    |  |      | <b>30</b>        | <b>31</b>        | <b>61</b>  |
| <b>Total (all categories)</b>   |  |      | <b>246</b>       | <b>249</b>       | <b>495</b> |

### 3.1.3. Artificial contaminations of the samples

246 positives samples were analysed including 110 naturally contaminated samples.

For spiking, several strains were stressed using different treatments and the stress intensity was evaluated (logarithmic difference between enumeration on non selective agar and selective agar, cf. appendix 2).

For seedings, bacterial suspensions were calibrated and inoculated in the matrices. The samples so contaminated were stored at 2 – 8° for 48 to 72 hours (cf. appendix 2).

The proportion of naturally and artificially contaminated samples giving positive results is presented in table 2.

*Table 2 : proportion of naturally and artificially contaminated samples giving positive results with the protocol of confirmation giving the more positive results*

| Category              | Number and percentage of samples analyzed per contamination levels(CFU/25g) |                                |                                  |                                   |               |
|-----------------------|---|--------------------------------|----------------------------------|-----------------------------------|---------------|
|                       | Naturally contaminated  | ≤ 5 (spiking)<br>≤ 3 (seeding) | 5-10 (spiking)<br>3-10 (seeding) | >10                               | Total         |
| ①<br>Meat products    | 25  | 7                              | 0                                | 0                                 | 32            |
| ②<br>Dairy products   | 9   | 12                             | 28                               | 3 ( 1 type 1, 1 type 2, 1 type 3) | 52            |
| ③<br>Seafood products | 26  | 7                              | 0                                | 0                                 | 33            |
| ④<br>Vegetal products | 11  | 8                              | 9                                | 3 ( 1 type 1, 1 type 2, 1 type 3) | 31            |
| ⑤<br>Composite foods  | 22  | 44                             | 2                                | 0                                 | 68            |
| ⑥<br>Environ. sample  | 17  | 9                              | 1                                | 3 ( 1 type 1, 1 type 2, 1 type 3) | 30            |
| <b>Total</b>          | <b>110</b>  | <b>87</b>                      | <b>40</b>                        | <b>9</b>                          | <b>246</b>    |
| <b>%</b>              | <b>44.7%</b>  | <b>35.4%</b>                   | <b>16.3%</b>                     | <b>3.6%</b>                       | <b>100,0%</b> |

### 3.1.4. Results

Raw results are presented in appendix 3 by step of validation.

The following tables present the summary of the results by incubation times and protocols of confirmation.

Table 3 : results of the sensitivity study (PA: positive agreement, TNA:total negative agreement, TND: total negative deviation, PD: positive deviation)

| Category                                 | Type         | PA         | TNA        | TND       | PD        | N          |
|--|--------------|------------|------------|-----------|-----------|------------|
| ① Meat products                          | m1           | 6          | 11         | 0         | 3         | 20         |
|  | m2           | 9          | 10         | 1         | 0         | 20         |
|  | m3           | 11         | 10         | 2         | 0         | 23         |
|  | <b>Total</b> | <b>26</b>  | <b>31</b>  | <b>3</b>  | <b>3</b>  | <b>63</b>  |
| ② Dairy products                         | d1           | 10         | 10         | 2         | 0         | 22         |
|  | d2           | 10         | 13         | 0         | 0         | 23         |
|  | d3           | 23         | 30         | 3         | 4         | 60         |
|  | <b>Total</b> | <b>43</b>  | <b>53</b>  | <b>5</b>  | <b>4</b>  | <b>105</b> |
| ③ Seafood products                       | s1           | 12         | 10         | 1         | 0         | 23         |
|  | s2           | 9          | 20         | 1         | 0         | 30         |
|  | s3           | 10         | 10         | 0         | 0         | 20         |
|  | <b>Total</b> | <b>31</b>  | <b>40</b>  | <b>2</b>  | <b>0</b>  | <b>73</b>  |
| ④ Vegetal products                       | v1           | 8          | 12         | 0         | 2         | 22         |
|  | v2           | 7          | 13         | 0         | 4         | 24         |
|  | v3           | 8          | 11         | 1         | 1         | 21         |
|  | <b>Total</b> | <b>23</b>  | <b>36</b>  | <b>1</b>  | <b>7</b>  | <b>67</b>  |
| ⑤ Composite foods                        | c1           | 17         | 18         | 0         | 3         | 38         |
|  | c2           | 20         | 16         | 4         | 3         | 43         |
|  | c3           | 20         | 24         | 0         | 1         | 45         |
|  | <b>Total</b> | <b>57</b>  | <b>58</b>  | <b>4</b>  | <b>7</b>  | <b>126</b> |
| ⑥ Environmental samples                  | e1           | 9          | 10         | 1         | 0         | 20         |
|  | e2           | 8          | 10         | 0         | 2         | 20         |
|  | e3           | 8          | 11         | 2         | 0         | 21         |
|  | <b>Total</b> | <b>25</b>  | <b>31</b>  | <b>3</b>  | <b>2</b>  | <b>61</b>  |
| Protocol Raw milk cheese (dairy type d3) | <b>Total</b> | <b>23</b>  | <b>30</b>  | <b>3</b>  | <b>4</b>  | <b>60</b>  |
| <b>All categories</b>                    | <b>Total</b> | <b>205</b> | <b>249</b> | <b>18</b> | <b>23</b> | <b>495</b> |

### 3.1.5. Statistical interpretation

These results were used to calculate the sensitivity for the alternative method and the reference method and the relative sensitivity (cf. tables 4).

Table 4 : values in % of sensitivity for the two methods, relative trueness and false positive ratio for the alternative method (PA: positive agreement, NA: negative agreement, ND: negative deviation, PD: positive deviation, PP: presumptive positive before confirmation, SE<sub>alt</sub>: sensitivity for the alternative method, SE<sub>ref</sub>: sensitivity for the reference method, RT: relative trueness, FPR: false positive ratio for the alternative method, FNR: false negative ratio for the alternative method)

| Category                                 | Type  | PA         | PA <sub>FP(alt)</sub> | NA         | NA <sub>FN(alt)</sub> | PD        | ND        | ND <sub>FN(alt)</sub> | PD <sub>FP(alt)</sub> | TND       | TNA        | SE <sub>alt</sub> % | SE <sub>ref</sub> % | RT %        | FPR %      | FNR         |
|--|---|------------|-----------------------|------------|-----------------------|-----------|-----------|-----------------------|-----------------------|-----------|------------|---------------------|---------------------|-------------|------------|-------------|
| Meat products                            | a Raw products  | 6          | 0                     | 11         | 0                     | 3         | 0         | 0                     | 0                     | 0         | 11         | 100,0               | 66,7                | 85,0        | 0,0        | 0,00        |
|  | b Ready-to-eat and processed meat products                  | 9          | 0                     | 10         | 0                     | 0         | 1         | 0                     | 0                     | 1         | 10         | 90,0                | 100,0               | 95,0        | 0,0        | 0,00        |
|  | c Cured products  | 11         | 0                     | 10         | 0                     | 0         | 2         | 2                     | 0                     | 4         | 10         | 73,3                | 100,0               | 84,0        | 0,0        | 0,13        |
|  | <b>Total</b>  | <b>26</b>  | <b>0</b>              | <b>31</b>  | <b>0</b>              | <b>3</b>  | <b>3</b>  | <b>2</b>              | <b>0</b>              | <b>5</b>  | <b>31</b>  | <b>85,3</b>         | <b>91,2</b>         | <b>87,7</b> | <b>0,0</b> | <b>0,06</b> |
| Dairy products                           | a Raw and pasteurised milk and cheese with pasteurised milk | 10         | 0                     | 10         | 0                     | 0         | 2         | 1                     | 0                     | 3         | 10         | 76,9                | 100,0               | 87,0        | 0,0        | 0,08        |
|  | b Goat and ewes pasteurised milk cheese                     | 10         | 0                     | 13         | 0                     | 0         | 0         | 0                     | 0                     | 0         | 13         | 100,0               | 100,0               | 100,0       | 0,0        | 0,00        |
|  | c Raw milk cheese   | 23         | 0                     | 30         | 0                     | 4         | 3         | 2                     | 0                     | 5         | 30         | 84,4                | 87,5                | 85,5        | 0,0        | 0,06        |
|  | <b>Total</b>  | <b>43</b>  | <b>0</b>              | <b>53</b>  | <b>0</b>              | <b>4</b>  | <b>5</b>  | <b>3</b>              | <b>0</b>              | <b>8</b>  | <b>53</b>  | <b>85,5</b>         | <b>92,7</b>         | <b>88,9</b> | <b>0,0</b> | <b>0,05</b> |
| Seafood products                         | a Fresh fish fillets and shellfishes                        | 12         | 0                     | 10         | 0                     | 0         | 1         | 0                     | 0                     | 1         | 10         | 92,3                | 100,0               | 95,7        | 0,0        | 0,00        |
|  | b Smoked fish   | 9          | 0                     | 20         | 0                     | 0         | 1         | 0                     | 0                     | 1         | 20         | 90,0                | 100,0               | 96,7        | 0,0        | 0,00        |
|  | c Processed products  | 10         | 0                     | 10         | 0                     | 0         | 0         | 0                     | 0                     | 0         | 10         | 100,0               | 100,0               | 100,0       | 0,0        | 0,00        |
|  | <b>Total</b>  | <b>31</b>  | <b>0</b>              | <b>40</b>  | <b>0</b>              | <b>0</b>  | <b>2</b>  | <b>0</b>              | <b>0</b>              | <b>2</b>  | <b>40</b>  | <b>93,9</b>         | <b>100,0</b>        | <b>97,3</b> | <b>0,0</b> | <b>0,00</b> |
| Vegetal products                         | a Raw vegetal products                                      | 8          | 0                     | 12         | 0                     | 2         | 0         | 0                     | 0                     | 0         | 12         | 100,0               | 80,0                | 90,9        | 0,0        | 0,00        |
|  | b Ready-to-eat, ready-to-cook raw vegetal products,...      | 7          | 0                     | 13         | 0                     | 4         | 0         | 0                     | 0                     | 0         | 13         | 100,0               | 63,6                | 83,3        | 0,0        | 0,00        |
|  | c Processed vegetal products                                | 8          | 0                     | 11         | 0                     | 1         | 1         | 0                     | 0                     | 1         | 11         | 90,0                | 90,0                | 90,5        | 0,0        | 0,00        |
|  | <b>Total</b>  | <b>23</b>  | <b>0</b>              | <b>36</b>  | <b>0</b>              | <b>7</b>  | <b>1</b>  | <b>0</b>              | <b>0</b>              | <b>1</b>  | <b>36</b>  | <b>96,8</b>         | <b>77,4</b>         | <b>88,1</b> | <b>0,0</b> | <b>0,00</b> |
| Composite food                           | a Ready-to-eat foods  | 17         | 0                     | 18         | 0                     | 3         | 0         | 0                     | 0                     | 0         | 18         | 100,0               | 85,0                | 92,1        | 0,0        | 0,00        |
|  | b Ready-to-reheat foods                                     | 20         | 0                     | 16         | 0                     | 3         | 4         | 0                     | 0                     | 4         | 16         | 85,2                | 88,9                | 83,7        | 0,0        | 0,00        |
|  | c Pastries, egg products,...                                | 20         | 0                     | 24         | 0                     | 1         | 0         | 1                     | 0                     | 1         | 24         | 95,5                | 95,5                | 95,7        | 0,0        | 0,05        |
|  | <b>Total</b>  | <b>57</b>  | <b>0</b>              | <b>58</b>  | <b>0</b>              | <b>7</b>  | <b>4</b>  | <b>1</b>              | <b>0</b>              | <b>5</b>  | <b>58</b>  | <b>92,8</b>         | <b>89,9</b>         | <b>90,6</b> | <b>0,0</b> | <b>0,01</b> |
| Environmental samples                    | a Process water   | 9          | 0                     | 10         | 0                     | 0         | 1         | 0                     | 0                     | 1         | 10         | 90,0                | 100,0               | 95,0        | 0,0        | 0,00        |
|  | b Surface samples   | 8          | 0                     | 10         | 0                     | 2         | 0         | 0                     | 0                     | 0         | 10         | 100,0               | 80,0                | 90,0        | 0,0        | 0,00        |
|  | c Residu  | 8          | 0                     | 11         | 0                     | 0         | 2         | 0                     | 0                     | 2         | 11         | 80,0                | 100,0               | 90,5        | 0,0        | 0,00        |
|  | <b>Total</b>  | <b>25</b>  | <b>0</b>              | <b>31</b>  | <b>0</b>              | <b>2</b>  | <b>3</b>  | <b>0</b>              | <b>0</b>              | <b>3</b>  | <b>31</b>  | <b>90,0</b>         | <b>93,3</b>         | <b>91,8</b> | <b>0,0</b> | <b>0,00</b> |
| <b>Protocol raw milk cheese (type c)</b> |   | <b>23</b>  | <b>0</b>              | <b>30</b>  | <b>0</b>              | <b>4</b>  | <b>5</b>  | <b>3</b>              | <b>0</b>              | <b>8</b>  | <b>54</b>  | <b>77,1</b>         | <b>88,6</b>         | <b>81,5</b> | <b>0,0</b> | <b>0,09</b> |
| <b>All categories</b>                    |   | <b>205</b> | <b>0</b>              | <b>249</b> | <b>0</b>              | <b>23</b> | <b>18</b> | <b>6</b>              | <b>0</b>              | <b>24</b> | <b>249</b> | <b>90,5</b>         | <b>90,9</b>         | <b>90,6</b> | <b>0,0</b> | <b>0,02</b> |

Table 5 presents the summary of the results for all categories and all protocols:

*Table 5 : summary of the sensitivity study results for all the categories of the application scope*

| Parameter                                    | ISO 16140-2 formulas  | Results for all the categories | Results for the Protocol "Raw milk cheese" |
|--|---|--------------------------------|--|
| <b>Sensitivity of the alternative method</b> | $SE_{alt} = \frac{(PA + PD)}{(PA + TND + PD)} \times 100 \%$  | 90.5%                          | 77.1%                                      |
| <b>Sensitivity of the reference method</b>   | $SE_{ref} = \frac{(PA + TND)}{(PA + TND + PD)} \times 100 \%$ | 90.9%                          | 88.6%                                      |
| <b>Relative trueness</b>                     | $RT = \frac{(PA + TNA)}{N} \times 100 \%$                     | 90.6%                          | 81.8%                                      |
| <b>False positive ratio</b>                  | $FPR = \frac{PA_{FP(alt)} + PD_{FP(alt)}}{TNA} \times 100 \%$ | 0%                             | 0%   |
| <b>False negative ratio</b>                  | $FNR = \frac{NA_{FN(alt)} + ND_{FN(alt)}}{PA + TND + PD}$     | 0.02                           | 0.09                                       |

### 3.1.6. Analysis of discordant results

Discordant results are examined according to the standard ISO 16140-2/A1 (2024).

Table 6 presents the summary of the discordant results for all categories.

Table 6 : summary of discordant results for all the categories (PV: Previous Validation, I 17: ISHA 2017 TC: type of contamination (sp: spiking, se: seeding, LC: level of contamination)

| Category                     | Study | Type | N° Sample | Sample                           | Code | Strain              | TC | LC (CFU/ 25g) | Reference method: final result      | Alternative method |                    |               | Discordance |
|------------------------------|-------|------|-----------|----------------------------------|------|---------------------|----|---------------|-------------------------------------|--------------------|--------------------|---------------|-------------|
|                              |       |      |           |                                  |      |                     |    |               |                                     | Vidas test         | Confirmation       | Final results |             |
| <b>Meat products</b><br>①    | PV    | m1+  | B1        | Ground beef                      | /    | /                   | /  | /             | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | m1+  | B3        | Ground beef                      | /    | /                   | /  | /             | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | m1+  | J4        | Turkey escalope                  | /    | /                   | /  | /             | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | m2+  | C16       | Frozen beef balls                | /    | /                   | /  | /             | + <i>L.mono</i><br><i>L.innocua</i> | -                  | <i>L.innocua</i>   | -             | ND          |
|                              | PV    | m3+  | C8        | Dry sausage                      | /    | /                   | /  | /             | + <i>L.mono</i>                     | -                  | <i>L.mono</i>      | -             | ND          |
|                              | PV    | m3+  | D16       | Dry sausage                      | /    | /                   | /  | /             | + <i>L.mono</i>                     | -                  | <i>L.mono</i>      | -             | ND          |
| <b>Dairy products</b><br>②   | PV    | d1+  | N1        | Cow cheese (Rollot of picardie)  | L7   | <i>L. mono</i>      | sp | 3,4           | + <i>L.mono</i>                     | -                  | <i>L.mono</i>      | -             | ND          |
|                              | PV    | d1+  | Q15       | Raw milk                         | L62  | <i>L. mono</i>      | sp | 6,0           | + <i>L.mono</i>                     | -                  | no colony on plate | -             | ND          |
|                              | PV    | d3+  | V2        | Cow Organic Cheese (St Félicien) | /    | /                   | /  | /             | + <i>L.mono</i>                     | -                  | <i>L.mono</i>      | -             | ND          |
|                              | PV    | d3+  | U8        | Cow cheese                       | L32  | <i>L. mono 4b</i>   | sp | 1,2           | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | d3+  | R4        | Cow cheese (Mont dor)            | /    | <i>L. mono</i>      | /  | 0,1           | + <i>L.mono</i>                     | -                  | no colony on plate | -             | ND          |
|                              | PV    | d3+  | Y2        | Cow cheese (Saint Nectaire)      | L11  | <i>L. mono 1/2a</i> | sp | 3,2           | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | d3+  | W7        | Cow cheese (Reblochon)           | L40  | <i>L. mono 1/2a</i> | sp | 3,5           | + <i>L.mono</i>                     | -                  | <i>L.mono</i>      | -             | ND          |
|                              | PV    | d3+  | T12       | Cow cheese (Camembert)           | /    | <i>L. mono</i>      | /  | 5,0           | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | d3+  | W5        | Cow cheese                       | L40  | <i>L. mono 1/2a</i> | sp | 6,6           | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
| <b>Seafood products</b><br>③ | PV    | s1+  | A7        | Fish trio                        | /    | /                   | /  | /             | + <i>L.mono</i>                     | -                  | no colony on plate | -             | ND          |
|                              | PV    | s2+  | J7        | Smoked eels                      | /    | /                   | /  | /             | + <i>L.mono</i>                     | -                  | no colony on plate | -             | ND          |
| <b>Vegetal products</b><br>④ | PV    | v1+  | M5        | Raw cutted carrots               | /    | /                   | /  | /             | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | v1+  | J15       | Mix 3 peppers under vacuum       | L31  | <i>L. mono</i>      | sp | 4,3           | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | v2+  | D1        | Frozen fries                     | /    | /                   | /  | /             | - <i>L.grayi</i>                    | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | v2+  | I9        | Frozen fries                     | /    | /                   | /  | /             | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | v2+  | K5        | Traditional Frozen fries         | /    | /                   | /  | /             | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | v2+  | O15       | Frozen fries                     | /    | /                   | /  | /             | -                                   | +                  | <i>L.mono</i>      | +             | PD          |
|                              | PV    | v3+  | A6        | Saffron rice and vegetables      | /    | /                   | /  | /             | + <i>L.mono</i>                     | -                  | no colony on plate | -             | ND          |
|                              | PV    | v3+  | J21       | Cucumber vinaigrette             | L47  | <i>L. mono</i>      | sp | 17            | -                                   | +                  | <i>L.mono</i>      | +             | PD          |

| Category                   | Study | Type | N° Sample | Sample                                   | Code   | Strain             | TC              | LC (CFU/25g) | Reference method: final result      | Alternative method |   |               | Discordance |
|----------------------------|-------|------|-----------|--|--------|--------------------|-----------------|--------------|-------------------------------------|--------------------|---|---------------|-------------|
|                            |       |      |           |  |        |                    |                 |              |                                     | Vidas test         | Confirmation  | Final results |             |
| Composite foods<br>5       | PV    | c1+  | F7        | Smoked salmon, soft cheese, dill         | /      | /                  | /               | /            | -                                   | +                  | <i>L.mono</i>                                       | +             | PD          |
|                            | I 17  | c1+  | VC1       | Salad with pasta, tuna and vegetables    | L.4.26 | <i>L.mono</i> 1/2a | Se : 72h at 5°C | 1.0          | -                                   | +                  | <i>L.mono</i>                                       | +             | PD          |
|                            | I 17  | c1+  | VC27      | Sandwich with meat, tomato               | L.4.23 | <i>L.mono</i> 1/2a | Se : 72h at 5°C | 2.6          | -                                   | +                  | <i>L.mono</i>                                       | +             | PD          |
|                            | PV    | c2+  | C13       | Filet of hake, rice and vegetables       | /      | /                  | /               | /            | -                                   | +                  | <i>L.mono</i>                                       | +             | PD          |
|                            | PV    | c2+  | B5        | Chinese noodles and crunchy vegetables   | /      | /                  | /               | /            | + <i>L.mono</i>                     | -                  | no colony on plate (after LX broth: <i>L.mono</i> ) | -             | ND          |
|                            | I 17  | c2+  | VC 5      | Cooked pasta with cheese                 | L.4.18 | <i>L.mono</i> 1/2a | Se : 72h at 5°C | 3.6          | -                                   | +                  | <i>L.mono</i>                                       | +             | PD          |
|                            | I 17  | c2+  | VC 28     | Pizza                                    | L.4.23 | <i>L.mono</i> 1/2a | Se : 72h at 5°C | 2.6          | -                                   | +                  | <i>L.mono</i>                                       | +             | PD          |
|                            | I 17  | c2+  | VC 15     | Galette of black corn                    | L.4.47 | <i>L.mono</i> 4b   | Se : 72h at 5°C | 2.0          | + <i>L.mono</i>                     | -                  | -   | -             | ND          |
|                            | I 17  | c2+  | VC 17     | Vegetable gratin with pork               | L.4.47 | <i>L.mono</i> 4b   | Se : 72h at 5°C | 2.0          | + <i>L.mono</i>                     | -                  | -   | -             | ND          |
|                            | I 17  | c2+  | VC 19     | Chinese pasta with vegetables            | L.4.32 | <i>L.mono</i> 1/2b | Se : 72h at 5°C | 2.4          | + <i>L.mono</i>                     | -                  | -   | -             | ND          |
|                            | I 17  | C3+  | VC 61     | Hazelnut cake                            | L.4.29 | <i>L.mono</i> 1/2b | Se : 72h at 5°C | 1.8          | -                                   | +                  | <i>L.mono</i>                                       | +             | PD          |
| Environmental samples<br>6 | PV    | e1+  | O18       | Water rinsing                            | /      | /                  | /               | /            | + <i>L.mono</i><br><i>L.innocua</i> | -                  | <i>L.innocua</i>                                    | -             | ND          |
|                            | PV    | e2+  | B16       | Surface sample Workshop cutting table    | /      | /                  | /               | /            | -                                   | +                  | <i>L.mono</i>                                       | +             | PD          |
|                            | PV    | e2+  | M12       | Surface sample Slicer stand delicatessen |        |                    |                 | 0,6          | -                                   | +                  | <i>L.mono</i>                                       | +             | PD          |
|                            | PV    | e3+  | M10       | Meat products residue                    | /      | /                  | /               | /            | +                                   | -                  | no colony on plate                                  | -             | ND          |
|                            | PV    | e3+  | Q14       | Residues wast meat product               | L214   | <i>L. mono</i>     | sp              | 21           | +                                   | -                  | -   | -             | ND          |

➤ **Negative deviations:**

A positive result is obtained by the reference method whereas a negative result is obtained by the alternative method.

Eighteen negative deviations were observed (including ten for samples naturally contaminated):

- 10 negative deviations (d1+: Q15, d3+:R4, s1+:A7, s2+:J7, v3+: A6, c2+: VC15, c2+: VC17, c2+: VC19, e3+:M10, e3+:Q14): the protocol of the alternative method was applied and non typical colonies were observed. Due to the difference of sampling between the two methods, no cell of *L. monocytogenes* may have been taken in the sampling for the alternative method.
- 2 negative deviations (m2+: C16, e1+: O18): the protocol of the alternative method was applied and colonies of *Listeria* other than *L. monocytogenes* were observed but no typical colonies of *L.monocytognes*. Due to the difference of sampling between both methods, no cell of *L. monocytogenes* may have been taken in the sampling for the alternative method.
- 5 negative deviations (m3+:C8, m3+:D16, d1+: N1,d3+: V2, d3+: W7) are false negative results, highlighted by the confirmation protocol of the alternative method. It is probable that the enrichment did not allow to reach the threshold of the VIDAS LMX method.
- 1 negative deviation (c2+:B5) is a false negative result. The confirmation protocol of the alternative method was applied and non typical colonies were observed. However a second enrichment in LX broth followed by an isolation on selective agar media showed the presence of typical colonies confirmed as *L. monocytogenes*. It is probable that the enrichment did not allow to reach the threshold of the VIDAS LMX method.

➤ **Positive deviations:**

A positive result is obtained by the alternative method whereas a negative result is obtained by the reference method.

Twenty-three- positive deviations (m1+: B1, m1+: B3, m1+: J4, d3+: U8, d3+: Y2, d3+: T12, d3+: W5, v1+: M5, v1+: J15, v2+: D1, v2+: I9, v2+:K5, v2+: O15, v3+: J21, c1+: F7, c1+: VC1, c1+: VC27, c2+: C13, c2+: VC5, c2+: VC28,c3+: VC61, e2+: B16, e2+: M12) were observed. Due to the difference of sampling between the two methods, no cell of *L. monocytogenes* may have been present in the sampling of the reference method.

Table 7 show the differences between negative deviations and positive deviations and the acceptability limits for each category.

Table 7: acceptability limits

| Category                          | Type         | TND       | PD        | (TND-PD)  | Acceptability limit (AL)         | Observation                           |
|-----------------------------------|--------------|-----------|-----------|-----------|----------------------------------|---------------------------------------|
| <b>Meat products</b><br>①         | m1           | 0         | 3         | /         | /                                | (TND-PD) ≤ AL<br>for unpaired<br>data |
|                                   | m2           | 1         | 0         |           |                                  |                                       |
|                                   | m3           | 2         | 0         |           |                                  |                                       |
|                                   | <b>Total</b> | <b>3</b>  | <b>3</b>  | <b>0</b>  | <b>(TND – PD)<sub>AL=3</sub></b> |                                       |
| <b>Dairy products</b><br>②        | d1           | 2         | 0         | /         | /                                |                                       |
|                                   | d2           | 0         | 0         |           |                                  |                                       |
|                                   | d3           | 3         | 4         |           |                                  |                                       |
|                                   | <b>Total</b> | <b>5</b>  | <b>4</b>  | <b>1</b>  | <b>(TND – PD)<sub>AL=3</sub></b> |                                       |
| <b>Seafood products</b><br>③      | s1           | 1         | 0         | /         | /                                |                                       |
|                                   | s2           | 1         | 0         |           |                                  |                                       |
|                                   | s3           | 0         | 0         |           |                                  |                                       |
|                                   | <b>Total</b> | <b>2</b>  | <b>0</b>  | <b>2</b>  | <b>(TND – PD)<sub>AL=3</sub></b> |                                       |
| <b>Vegetal products</b><br>④      | v1           | 0         | 2         | /         | /                                |                                       |
|                                   | v2           | 0         | 4         |           |                                  |                                       |
|                                   | v3           | 1         | 1         |           |                                  |                                       |
|                                   | <b>Total</b> | <b>1</b>  | <b>7</b>  | <b>-6</b> | <b>(TND – PD)<sub>AL=3</sub></b> |                                       |
| <b>Composite foods</b><br>⑤       | c1           | 0         | 3         | /         | /                                |                                       |
|                                   | c2           | 4         | 3         |           |                                  |                                       |
|                                   | c3           | 0         | 1         |           |                                  |                                       |
|                                   | <b>Total</b> | <b>4</b>  | <b>7</b>  | <b>-3</b> | <b>(TND – PD)<sub>AL=4</sub></b> |                                       |
| <b>Environmental samples</b><br>⑥ | e1           | 1         | 0         | /         | /                                |                                       |
|                                   | e2           | 0         | 2         |           |                                  |                                       |
|                                   | e3           | 2         | 0         |           |                                  |                                       |
|                                   | <b>Total</b> | <b>3</b>  | <b>2</b>  | <b>1</b>  | <b>(TND – PD)<sub>AL=3</sub></b> |                                       |
| <b>All categories</b>             | <b>Total</b> | <b>18</b> | <b>23</b> | <b>-5</b> | <b>(TND – PD)<sub>AL=7</sub></b> |                                       |

The observed values are below to the acceptability limits for each category and for the combined categories.

The alternative method produces results comparable to the reference method.

### 3.1.7. Study of the storage of the broths

A stability study of the enriched broths stored at 5±3°C for 72 hours was performed on all positive and discordant samples. The broths were reanalyzed and confirmed after storage (results in appendix 3).

Table 8 presents the modifications observed after storage of the broths for 72 h at 5±3°C.

Table 8: Modifications between samples analysed before (T0) and after storage at 5±3°C for 72 hours (T72h) (PV: Previous Validation, TC: type of contamination).

| Category                     | Study | Type | N° Sample | Sample                          | Code     | Strain             | TC      | CFU/25g | Concordance MR / AM |      |
|------------------------------|-------|------|-----------|---------------------------------|----------|--------------------|---------|---------|---------------------|------|
|                              |       |      |           |                                 |          |                    |         |         | T0                  | T72h |
| <b>Meat products</b><br>①    | PV    | m3+  | D16       | Dry sausage                     | /        | /                  | /       | /       | ND                  | PA   |
|                              | PV    | m3+  | C7        | Merguez                         | /        | /                  | /       | /       | PA                  | ND   |
| <b>Dairy products</b><br>②   | PV    | d1+  | N1        | Cow cheese (Rollet of Picardie) | L7       | <i>L.mono</i>      | Spiking | 3,4     | ND                  | PA   |
|                              | PV    | d3+  | T12       | Cow cheese (Camembert)          | /        | <i>L.mono</i>      | /       | 5,0     | PD                  | NA   |
| <b>Seafood products</b><br>③ | PV    | s1+  | C2        | Shrimps                         | /        | /                  | /       | /       | PA                  | ND   |
| <b>Composite foods</b> ⑤     | I 17  | c2+- | VC28      | Pizza                           | LIS.4.23 | <i>L.mono 1/2a</i> | Seeding | 2.6     | PD                  | NA   |
|                              | I 17  | c2+  | VC12      | Couscous                        | LIS.4.10 | <i>L.mono 1/2a</i> | Seeding | 8.0     | PA                  | ND   |

Table 9 presents the differences between negative deviations and positive deviations and the acceptability limits for each category after storage of the broths for 72 h at 5±3°C.

Table 9: acceptability limits after conservation of the enriched broths

| Category                          | Type         | TND       | PD        | (TND-PD)  | Acceptability limit (AL)         | Observation   |
|-----------------------------------|--------------|-----------|-----------|-----------|----------------------------------|---|
| <b>Meat products</b><br>①         | m1           | 0         | 3         | /         | /                                | (TND-PD) ≤ AL and<br>(TND+PD) ≤ AL for<br>paired data |
|                                   | m2           | 1         | 0         |           |                                  |   |
|                                   | m3           | 2         | 0         |           |                                  |   |
|                                   | <b>Total</b> | <b>3</b>  | <b>3</b>  | <b>0</b>  | <b>(TND – PD)<sub>AL=3</sub></b> |   |
| <b>Dairy products</b><br>②        | d1           | 1         | 0         | /         | /                                |   |
|                                   | d2           | 0         | 0         |           |                                  |   |
|                                   | d3           | 3         | 3         |           |                                  |   |
|                                   | <b>Total</b> | <b>4</b>  | <b>3</b>  | <b>1</b>  | <b>(TND – PD)<sub>AL=3</sub></b> |   |
| <b>Seafood products</b><br>③      | s1           | 2         | 0         | /         | /                                |   |
|                                   | s2           | 1         | 0         |           |                                  |   |
|                                   | s3           | 0         | 0         |           |                                  |   |
|                                   | <b>Total</b> | <b>3</b>  | <b>0</b>  | <b>3</b>  | <b>(TND – PD)<sub>AL=3</sub></b> |   |
| <b>Vegetal products</b><br>④      | v1           | 0         | 2         | /         | /                                |   |
|                                   | v2           | 0         | 4         |           |                                  |   |
|                                   | v3           | 1         | 1         |           |                                  |   |
|                                   | <b>Total</b> | <b>1</b>  | <b>7</b>  | <b>-6</b> | <b>(TND – PD)<sub>AL=3</sub></b> |   |
| <b>Composite foods</b><br>⑤       | c1           | 0         | 3         | /         | /                                |   |
|                                   | c2           | 5         | 2         |           |                                  |   |
|                                   | c3           | 0         | 1         |           |                                  |   |
|                                   | <b>Total</b> | <b>5</b>  | <b>6</b>  | <b>-1</b> | <b>(TND – PD)<sub>AL=3</sub></b> |   |
| <b>Environmental samples</b><br>⑥ | e1           | 1         | 0         | /         | /                                |   |
|                                   | e2           | 0         | 2         |           |                                  |   |
|                                   | e3           | 2         | 0         |           |                                  |   |
|                                   | <b>Total</b> | <b>3</b>  | <b>2</b>  | <b>1</b>  | <b>(TND – PD)<sub>AL=3</sub></b> |   |
| <b>All categories</b>             | <b>Total</b> | <b>19</b> | <b>21</b> | <b>-2</b> | <b>(TND – PD)<sub>AL=6</sub></b> |   |

The observed values are below or equal to the acceptability limits for each category.

The alternative method produces results comparable to the reference method. It is possible to store the incubated LMX broth for 72 hours at 2-8°C before performing the VIDAS LMX assay and/or confirmation.

### 3.2. Relative level of detection study

#### 3.2.1. Matrices

Different “strain-matrix” couples were studied in parallel with the reference method and the VIDAS LMX method, for the studied categories.

A total viable count was performed on a portion of non-contaminated matrix to estimate the concentration of mesophilic aerobic flora. A detection of *Listeria monocytogenes* using the reference method was also performed to check the absence of the target analyte in the matrix.

Characteristics of the strain and of the matrix are shown in table 10.

Table 10 : « matrix – strain » couples of the relative level of detection

| Category                | Matrix                                 | Strain                          | Code     | Strain origin              | Study |
|-------------------------|--|---------------------------------|----------|----------------------------|-------|
| ① Meat products         | Rillettes                              | <i>L. monocytogenes</i><br>1/2b | /        | /                          | 2009  |
| ② Dairy products        | Raw milk                               | <i>L. monocytogenes</i><br>1/2b | /        | /                          | 2009  |
|                         | Raw milk cheese<br>(specific protocol) | <i>L. monocytogenes</i><br>1/2a | /        | /                          | 2010  |
| ③ Seafood products      | Smoked salmon                          | <i>L. monocytogenes</i><br>1/2a | /        | /                          | 2009  |
| ④ Vegetal products      | Grated red cabbage                     | <i>L. monocytogenes</i><br>4b   | /        | /                          | 2009  |
| ⑤ Composite foods       | Salad of pasta                         | <i>L. monocytogenes</i> 3a      | LIS.4.46 | Goat<br>cheese<br>sandwich | 2017  |
|                         | Mixed salad                            | <i>L. monocytogenes</i><br>1/2a | LIS.4.5  | Ham and<br>vegetables      | 2017  |
| ⑥ Environmental samples | Process water                          | <i>L. monocytogenes</i><br>1/2c | /        | /                          | 2009  |

### 3.2.2. Protocol of contamination

- **Protocol for categories 1, 2, 3, 4 and 6**

One negative control and several levels of contaminations (4 or 5) were tested.

Six replicates for each level of contamination were inoculated and analysed by the reference method and by the alternative method.

As the two methods have no common step, test portions of 25 g were prepared for each level of contamination and individually inoculated with a calibrated bacterial suspension. Several dilutions of a calibrated and low-concentrated suspension of *Listeria monocytogenes* were used to spike the samples before analysis.

- **Protocol for the category 5**

Three levels of contamination were prepared consisting of a negative control level, a low level, and a higher level. Only one strain of the target analyte is used to contaminate the low and the high level. The negative control level shall not produce positive results. Five replicates are tested for this level. The low level shall be the theoretical detection level, it has been contaminated at 0.7 - 1 CFU per test portion to obtain fractional recovery results. Twenty replicates are tested for this level.

The higher level shall be just above the theoretical detection level, it has been contaminated at 2 - 3 CFU per test portion. Five replicates are tested for this level.

Food products were contaminated using the seeding protocol. Bulk contaminations were performed on the matrices for the different levels of contamination, then the matrices were stored at 5±3°C for two days before analysis. Samples were then analyzed by the reference and the alternative method. For the alternative method, only the minimal incubation time of the broth of the alternative method was tested.

### 3.2.3. Results and calculation of the RLODs

Raw results are shown in appendix 4.

The RLODs calculations were performed according to the standard ISO 16140-2 : 2016 using the Excel spreadsheet available for download at <http://standards.iso.org/iso/16140>. Values of the RLODs are presented in table 11.

*Table 11 : RLODs values for the categories of the application scope (RLOD: the estimated relative level of detection value, RLODU: the upper limit of the 95% confidence interval for RLOD, RLODL: the lower limit of the 95% confidence interval for RLOD,  $b=\ln(\text{RLOD})$ : logarithm of the RLOD value,  $sd(b)$ : standard deviation of  $b$ , z-Test statistic: absolute value of the test statistic of the z-Test with the null hypothesis  $H_0: b=0$ , p-value: p-value of the z-Test)*

| Name               | AL         | RLOD         | RLODL        | RLODU        | $b=\ln(\text{RLOD})$ | $sd(b)$      | z-Test statistic | p-value      |
|--------------------|------------|--------------|--------------|--------------|----------------------|--------------|------------------|--------------|
| Rillettes          | 2.5        | <b>1.194</b> | 0.470        | 3.033        | 0.177                | 0.466        | 0.381            | 0.703        |
| Raw milk           | 2.5        | <b>0.735</b> | 0.312        | 1.735        | -0.307               | 0.429        | 0.716            | 1.526        |
| Raw milk cheese    | 2.5        | <b>0.760</b> | 0.256        | 2.261        | -0.274               | 0.545        | 0.503            | 1.385        |
| Smoked salmon      | 2.5        | <b>0.725</b> | 0.222        | 2.362        | -0.322               | 0.591        | 0.545            | 1.414        |
| Grated red cabbage | 2.5        | <b>1.520</b> | 0.504        | 4.583        | 0.419                | 0.552        | 0.759            | 0.448        |
| Mixed salad        | 2.5        | <b>0.272</b> | 0.071        | 1.038        | -1.303               | 0.670        | 1.945            | 1.948        |
| Salad of pasta     | 2.5        | <b>1.151</b> | 0.519        | 2.553        | 0.141                | 0.398        | 0.354            | 0.723        |
| Process water      | 2.5        | <b>0.665</b> | 0.293        | 1.510        | -0.407               | 0.410        | 0.994            | 1.680        |
| <b>Combined</b>    | <b>2.5</b> | <b>0.860</b> | <b>0.639</b> | <b>1.158</b> | <b>-0.151</b>        | <b>0.149</b> | <b>1.015</b>     | <b>1.690</b> |

The  $\text{LOD}_{50}$  calculations according to Wilrich & Wilrich POD-LOD calculation program - version 13, are given in Table 12.

*Table 12:  $\text{LOD}_{50\%}$  for the alternative and reference method*

| Matrix                  | Strain                       | $\text{LOD}_{50\%}$ (CFU/25g) alternative method | $\text{LOD}_{50\%}$ (CFU/25g) Reference method |
|-------------------------|------------------------------|--|--|
| Rillettes               | <i>L. monocytogenes</i> 1/2b | <b>0.903</b>                                     | 0.787  |
| Raw milk                | <i>L. monocytogenes</i> 1/2b | <b>0.387</b>                                     | 0.514  |
| Raw milk cheese         | <i>L. monocytogenes</i> 1/2a | <b>0.561</b>                                     | 0.683  |
| Smoked salmon           | <i>L. monocytogenes</i> 1/2a | <b>0.344</b>                                     | 0.441  |
| Grated red cabbage      | <i>L. monocytogenes</i> 4b   | <b>0.621</b>                                     | 0.474  |
| Mixed salad             | <i>L. monocytogenes</i> 3a   | <b>0.563</b>                                     | 1.351  |
| Salad of pasta          | <i>L. monocytogenes</i> 1/2a | <b>0.452</b>                                     | 0.396  |
| Process water           | <i>L. monocytogenes</i> 1/2c | <b>0.303</b>                                     | 0.468  |
| <b>Combined results</b> |                              | <b>0.494</b>                                     | <b>0.579</b>                                   |

#### 3.2.4. Interpretation and conclusion

The RLODs values are below the acceptability limits, meaning that, as stated in ISO 16140-2/A1 (2024), the maximum increase in LOD of the alternative versus the reference method is not considered as relevant in consideration of the fitness for purpose of the method.

In conclusion, alternative and reference methods show similar LODs values for the detection of *Listeria monocytogenes* in the categories tested.

### 3.3. Inclusivity and exclusivity study

#### 3.3.1. Test protocols

##### ➤ **Protocol for inclusivity**

A culture of each *Listeria monocytogenes* strain was prepared in a nutritive broth. A supplemented LMX broth was then inoculated with around 10 *Listeria monocytogenes* cells per 225 ml and incubated for 26 hours at 37°C before carrying out the VIDAS LMX test.

##### ➤ **Protocol for exclusivity**

The different negative strains were cultured at 37°C for 24 h and diluted in nutritive broth. Non-selective broths were inoculated to obtain levels of around  $10^5$  cells in 225 ml broth before carrying out the VIDAS LMX test.

In the event of results discordant with the expected results, a new assay must be performed with, in parallel, the reference method and the complete VIDAS LMX method.

#### 3.3.2. Results

The results are presented in appendix 5.

Sixty strains of *Listeria monocytogenes* were detected out of the 60 tested by the VIDAS LMX method. Note, however, that 2 of them (L15 and L176) required the addition of 25 ml of UHT milk in order to obtain a positive test. Analysis of the L124 strain in LMX broth gave a weakly positive result (TV=0.05). A new test with the addition of UHT milk gave a TV=0.2.

The study of 31 strains not belonging to the genus *Listeria* or non-*Listeria monocytogenes* showed cross-reactions with one strain of *Bacillus sphaericus* and two strains of *Staphylococcus* (*S. intermedius* and *S. aureus*) after enrichment in the non-selective enrichment broth.

For these 3 non-target strains, the test values (TV) were just above the threshold and the inoculation levels were high. Negative results were obtained after enrichment in the selective broth for the method.

#### 3.3.3. Conclusion

The selectivity of the method is satisfactory.

### 3.4. Practicability

#### 1. Storage conditions of the components (see package insert) – Expiration date of unopened products (see package insert)

The storage temperature of the VIDAS LMX kit is 2-8°C.

The kit expiration date is shown on the box label and on the various vials.

#### 2. Conditions of use after first use (see package insert)

The kit components should be stored at 2-8°C. If stored as recommended (pouch correctly resealed with desiccant after use, etc.), all the components will remain stable until the expiration date indicated on the label.

#### 3. Time-to-result

| Step   | Time required (Day)         | Time required (Day)     |
|--|-----------------------------|-------------------------|
|  | VIDAS LMX method            | EN ISO 11290-1 standard |
| Pre-enrichment   | D0                          | D0                      |
| Inoculation of Fraser  | /                           | D1                      |
| Inoculation of LX broth  | D1 (specific protocol only) | /                       |
| Streaking on selective media   | /                           | D1 & D2                 |
| Perform VIDAS LMX test   | D1                          | /                       |
| Plate reading  | /                           | D4                      |
| <b>Obtention of negative results</b><br>(if no characteristic colonies)                    | <b>D1</b>                   | <b>D4 to D5</b>         |
| Confirmation testing   | /                           | D2 to D5                |
| <b>Obtention of negative results</b><br>(after negative confirmation testing if necessary) | <b>D2</b>                   | <b>D5 to D11</b>        |

| Step   | Time required (Day) | Time required (Day)     |
|--|---------------------|-------------------------|
|  | VIDAS LMX method    | EN ISO 11290-1 standard |
| <b>Obtention of positive results</b><br>(confirmation of typical colonies)                       | <b>D2 to D8</b>     | <b>D8 to D11</b>        |
| - Confirmation by reference method tests (CAMP-test, haemolysis, etc.), including purification   | D4 to D8            | D4 to D7                |
| - Confirmation by reference method tests (CAMP-test, haemolysis, sugars (identification gallery) | D4                  | /                       |
| - Confirmation by plating on chromogenic medium  | D2                  | /                       |

#### 4. Steps common to the reference method

Confirmation testing (reference method tests including purification)

## 4. Interlaboratory study

### 4.1. Organization of the interlaboratory study

#### 4.1.1. Participating laboratories

The interlaboratory study was realized by the Expert Laboratory and by sixteen collaborators.

#### 4.1.2. Experimental parameters

- Matrix: pasteurized milk (25 ml)
- Strain: *Listeria monocytogenes* (dairy product origin).
- Number of samples per laboratory: 24 samples per method were prepared to represent 3 levels of contamination, with 8 samples per level for each method (48 samples per parcel).

#### 4.1.3. Control of the experimental parameters

##### 4.1.3.1. Samples preparation and spiking

The following table shows the contamination rates obtained and the estimated accuracies:

Table 13: contamination levels

| Level                        | Samples  | Targeted theoretical level (CFU/25 g) | Real level (CFU/25 g) |
|------------------------------|--|---------------------------------------|-----------------------|
| Level 0 (L <sub>0</sub> )    | 5-6-9-10-13-14-19-20<br>27-28-35-36-41-42-43-44  | 0                                     | 0                     |
| Low level (L <sub>1</sub> )  | 3-4-11-12-17-18-23-24<br>29-30-31-32-39-40-45-46 | 3                                     | 3,26                  |
| High level (L <sub>2</sub> ) | 1-2-7-8-15-16-21-22<br>25-26-33-34-37-38-47-48   | 30                                    | 22,2                  |

##### 4.1.3.2. Temperature and state of the samples

#### Analysis of temperature monitoring curves during transport

Temperatures registered by the temperature probes during shipment were stable and were between 0°C and 8°C for all the collaborators.

#### Receipt temperatures and receipt times

The measured temperatures are listed in the table below.

Table 14: temperature measurements

| Collaborator | Temperatures (°C)                |                                   | Comments                    |
|--------------|----------------------------------|-----------------------------------|-----------------------------|
|              | communicated by the collaborator | measured by the temperature probe |                             |
| A            | 3.1                              | 1.2                               |                             |
| B            | 4.5                              | 2.5                               |                             |
| C            | 3.3                              | 1.5                               |                             |
| D            | 4.2                              | 4.0                               |                             |
| E            | 2.7                              | 3.0                               |                             |
| F            | Not communicated                 | 2.5                               | Withdrawn                   |
| G            | Not communicated                 | 1.5                               |                             |
| H            | 2.6                              | 3.0                               |                             |
| I            | 6.0                              | 3.5                               |                             |
| J            | 4.1                              | 4.0                               | Receipt at D1, assays at D2 |
| K            | 6.1                              | 0.1                               |                             |
| L            | 4.8                              | -0.4                              |                             |
| M            | 1.4                              | 2.1                               |                             |
| N            | 3.9                              | 3.5                               |                             |
| O            | 7.0                              | /                                 | Receipt at D2               |
| P            | 6.0                              | 4.1                               | Receipt at D2               |

Fourteen of the 16 collaborators received their samples the day after they were sent.

## 4.2. Results

Twelve laboratories out of the 16 laboratories were finally retained for the study (exclusion of laboratories F, J, O and P).

### 4.2.1. Total viable counts

For the whole laboratories, the total viable counts at 30°C vary between 350 CFU/g and 20 000 CFU/g.

### 4.2.2. Expert Laboratory results

The results obtained by the Expert Laboratory are summarized in table 15 (raw results in appendix 6).

Table 15 : positive results obtained by Expert Laboratory by both methods

| Contamination level | Alternative method | Reference method |
|---------------------|--------------------|------------------|
| $L_0$               | 0/8                | 0/8              |
| $L_1$               | 7/8                | 8/8              |
| $L_2$               | 8/8                | 8/8              |

The results are consistent with those expected.

### 4.2.3. Collaborators results

The results are summarized in table 16. Raw results in appendix 6.

- Reference and alternative methods results

Table 16 : results for all laboratories

| Alternative method |               |               |                |                |                |                | Reference method |               |                |                |
|--------------------|---------------|---------------|----------------|----------------|----------------|----------------|------------------|---------------|----------------|----------------|
| Lab.               | $L_0$         |               | $L_1$          |                | $L_2$          |                | Lab.             | $L_0$         | $L_1$          | $L_2$          |
|                    | Before. Conf. | After. Conf.  | Before. Conf.  | After. Conf.   | Before. Conf.  | After. Conf.   |                  |               |                |                |
| A                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 8 / 8          | 8 / 8          | A                | 0 / 8         | 8 / 8          | 8 / 8          |
| B                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 8 / 8          | 8 / 8          | B                | 0 / 8         | 8 / 8          | 8 / 8          |
| C                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 8 / 8          | 8 / 8          | C                | 0 / 8         | 8 / 8          | 8 / 8          |
| D                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 8 / 8          | 8 / 8          | D                | 0 / 8         | 8 / 8          | 8 / 8          |
| E                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 8 / 8          | 8 / 8          | E                | 0 / 8         | 8 / 8          | 8 / 8          |
| G                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 8 / 8          | 8 / 8          | F                | 0 / 8         | 8 / 8          | 8 / 8          |
| H                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 4 / 8          | 4 / 8          | G                | 0 / 8         | 8 / 8          | 8 / 8          |
| I                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 8 / 8          | 8 / 8          | H                | 0 / 8         | 8 / 8          | 8 / 8          |
| K                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 7 / 8          | 7 / 8          | I                | 0 / 8         | 8 / 8          | 7 / 8          |
| L                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 8 / 8          | 8 / 8          | J                | 0 / 8         | 8 / 8          | 8 / 8          |
| M                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 8 / 8          | 8 / 8          | K                | 0 / 8         | 8 / 8          | 8 / 8          |
| N                  | 0 / 8         | 0 / 8         | 8 / 8          | 8 / 8          | 8 / 8          | 8 / 8          | L                | 0 / 8         | 8 / 8          | 8 / 8          |
| <b>Total</b>       | <b>0 / 96</b> | <b>0 / 96</b> | <b>96 / 96</b> | <b>96 / 96</b> | <b>91 / 96</b> | <b>91 / 96</b> | <b>Total</b>     | <b>0 / 96</b> | <b>96 / 96</b> | <b>95 / 96</b> |

For the level  $L_2$ , the laboratory H found 4 negative results with the alternative method VIDAS LMX. The isolation on the different agar plates were carried out a second time (reisolation of the LMX broth on Ottaviani & Agosti agar, incubation at 37°C then subculture on Ottaviani & Agosti agar) and confirmed the first result.

These samples were probably not contaminated by the Expert Laboratory. It's important to notice that these samples are the last 4 of the series of 8 samples contaminated at the high level ( $L_2$ ). Nevertheless, the results of this laboratory H were kept in the exploitation of the results following the request of the Technical Committee.

For the high level of contamination  $L_2$ , the laboratory K found one sample  $L_2$  with a negative result by the reference method and one sample with a negative result by the alternative method. None deviation on the instructions was reported by the laboratory K, the results was exploited.

### 4.2.4. Analysis of the results and collaborators selected for the statistical analysis

The results of 12 laboratories were considered.

## 4.2.5. Interpretation of the results and statistical analysis

### 4.2.5.1. Interpretation of the results

The interpretation of the results is shown in the table below.

Table 17 : tests results for both methods (PA: positive agreement, TNA: total negative agreement, TND: total negative deviation, PD: positive deviation)

| Level     | Alternative method (AM) | Reference method (RM) |           |            |
|-----------|-------------------------|-----------------------|-----------|------------|
|           |                         | RM+                   | RM-       | Total      |
| $L_0$     | AM+                     | PA= 0                 | PD= 0     | 0          |
|           | AM-                     | TND= 0                | TNA= 96   | 96         |
|           | <b>Total</b>            | <b>0</b>              | <b>96</b> | <b>96</b>  |
| $L_1$     | AM+                     | PA= 96                | PD= 0     | 96         |
|           | AM-                     | TND= 0                | TNA= 0    | 0          |
|           | <b>Total</b>            | <b>96</b>             | <b>0</b>  | <b>96</b>  |
| $L_2$     | AM+                     | PA= 90                | PD= 1     | 91         |
|           | AM-                     | TND= 5                | TNA= 0    | 5          |
|           | <b>Total</b>            | <b>95</b>             | <b>1</b>  | <b>96</b>  |
| $L_1+L_2$ | AM+                     | PA= 186               | PD= 1     | 187        |
|           | AM-                     | TND= 5                | TNA= 0    | 5          |
|           | <b>Total</b>            | <b>191</b>            | <b>1</b>  | <b>192</b> |

### 4.2.5.2. Specificity of the methods

The percentage specificity of the reference method and the alternative method is calculated using the data after confirmation, based on the results of level  $L_0$ .

- Specificity of the reference method:  $SP_{ref} = \left[ 1 - \left( \frac{P_0}{N_-} \right) \right] \times 100\% = 100.0\%$ ,

- Specificity of the alternative method:  $SP_{alt} = \left[ 1 - \left( \frac{CP_0}{N_-} \right) \right] \times 100\% = 100.0\%$ ,

where:

$N_-$  is the number of all  $L_0$  tests;

$P_0$  is the total number of false-positive results obtained with the blank samples before confirmation;

$CP_0$  is the total number of false-positive results obtained with blank samples.

### 4.2.5.3. Sensitivity of the two methods, relative trueness and false positive ratio of the alternative method

The sensitivity of the two methods, the relative trueness of the alternative method and the false positive ratio of the two methods are calculated. Results are presented in the table 18.

Table 18 : summary of the sensitivity study results for all the categories of the application scope

| Parameter                             | ISO 16140-2 formulas  | Results for all the categories |
|---------------------------------------|---|--------------------------------|
| Sensitivity of the alternative method | $SE_{alt} = \frac{(PA + PD)}{(PA + TND + PD)} \times 100 \%$  | 94.8%                          |
| Sensitivity of the reference method   | $SE_{ref} = \frac{(PA + TND)}{(PA + TND + PD)} \times 100 \%$ | 99%                            |
| Relative trueness                     | $RT = \frac{(PA + TNA)}{N} \times 100 \%$                     | 93.8%                          |
| False positive ratio                  | $FPR = \frac{PA_{FP(alt)} + PD_{FP(alt)}}{TNA} \times 100 \%$ | 0.0%                           |
| False negative ratio                  | $FNR = \frac{NA_{FN(alt)} + ND_{FN(alt)}}{PA + TND + PD}$     | 0.00                           |

#### 4.2.5.4. Determination of the acceptability limit and conclusion

The difference between (TND – PD) for the level where fractional recovery was obtained ( $L_2$ ) is calculated. The observed value found for (TND – PD) shall not be higher than the acceptability limit (AL). The AL is defined as  $[(TND - PD)_{max}]$  and calculated per level where fractional recovery was obtained as described below using the following three parameters:

$$-(p+)_{ref} = \frac{P_x}{N_x},$$

where

$P_x$  = number of samples with a positive result obtained with the reference method at level  $x$ , ( $L_1$  or  $L_2$ ) for all laboratories;

$N_x$  = number of samples tested at level  $x$  ( $L_1$  or  $L_2$ ) with the reference method by all laboratories.

$$-(p+)_{alt} = \frac{CP_x}{N_x},$$

where

$CP_x$  = number of samples with a confirmed positive result obtained with the alternative method at level  $x$  ( $L_1$  or  $L_2$ ) for all laboratories;

$N_x$  = number of samples tested at level  $x$  ( $L_1$  or  $L_2$ ) with the alternative method by all laboratories.

$$-(TND - PD)_{max} = \sqrt{3N_x \times ((p+)_{ref} + (p+)_{alt} - 2((p+)_{ref} \times (p+)_{alt}))},$$

where

$N_x$  = the total number of samples tested for level  $x$  ( $L_1$  or  $L_2$ ) by all laboratories.

The AL is not met when the observed value is higher than the AL. When the AL is not met, investigations should be made (e.g. root cause analysis) in order to provide an explanation of the observed results.

Based on the AL and the additional information, it is decided whether the alternative method is regarded as not fit for purpose. The reasons for acceptance of the alternative method in case the AL is not met shall be stated in the study report.

In this study, fractional positive results are observed at level  $L_2$  only. The different parameters obtained by the calculation are detailed in the table below:

*Table 19 : values obtained for the determination of the acceptability limit*

| Parameter  | Value |
|--|-------|
| <b><math>N_{L2}</math> : number of samples tested at level 2</b> | 96    |
| <b><math>(p+)_{ref}</math></b>                                   | 0.989 |
| <b><math>(p+)_{alt}</math></b>                                   | 0.948 |
| <b><math>(TND-PD)_{max}</math></b>                               | 4.22  |
| <b><math>(TND-PD)</math></b>                                     | 4     |

The value (ND-PD) is inferior to the AL, so the requirements of the standard ISO 16140-2/ A1 (2024) are fulfilled.

The performance of the alternative method and the reference method can be considered as equivalent.

#### 4.2.5.5. *Determination of the relative level of detection*

The RLOD was calculated using the EN ISO 16140-2:2016 Excel spreadsheet available at [http://standards.iso.org/iso/16140/-2/ed-1/en/RLOD\\_inter-lab-study\\_16140-2\\_AnnexF\\_ver1\\_28-06-2017.xls](http://standards.iso.org/iso/16140/-2/ed-1/en/RLOD_inter-lab-study_16140-2_AnnexF_ver1_28-06-2017.xls).

As there is limited experience with the interpretation of this approach, the results are used only for information. Results are shown in the table below :

*Table 20 : values obtained for the determination of the relative level of detection*

| Method      | LOD50%             | LOD95%             | RLOD               |
|-------------|--------------------|--------------------|--------------------|
| Reference   | 0.83 [0.63 ; 1.10] | 3.60 [2.71 ; 4.77] | 2.02 [1.48 – 2.77] |
| Alternative | 1.68 [1.31 ; 2.17] | 7.28 [5.65 ; 9.38] |                    |

## 5. General conclusion

- **Method comparison study**

The performances of the VIDAS LMX test are comparable to those of the standard ISO 11290-1:2017.

This study concerned 495 samples of six categories of products:

- Meat products
- Dairy products
- Seafood products
- Vegetal products
- Composite foods
- Environmental samples

Values obtained for the criteria of the sensitivity study are the following, depending on the incubation times and the protocol of confirmation:

- sensitivity of the alternative method : 90.5%
- sensitivity of the reference method : 90.9%
- relative trueness: 90.6%
- false positive ratio: 0%
- false negative ratio: 0.02

Some discordant results were observed. These discordances may be mostly linked to the sampling which is different between the two methods in an unpaired study.

The relative level of detection of the alternative method and the reference method was evaluated for all categories. The results are comparable between the two methods. It varies between 0.665 and 1.520 CFU in 25 g for the alternative method for all categories.

The specificity of the method is satisfactory.

The study of the practicability of the alternative method shows a simple and easy-to-use method and significant time savings compared to the reference method.

- **Interlaboratory study**

Concerning the interlaboratory study, the results obtained for the selected laboratories showed that the performance of the alternative method and the reference method can be considered as equivalent.

Le Lion d'Angers, December 18, 2026  
Guillaume MESNARD  
Method Validation Supervisor

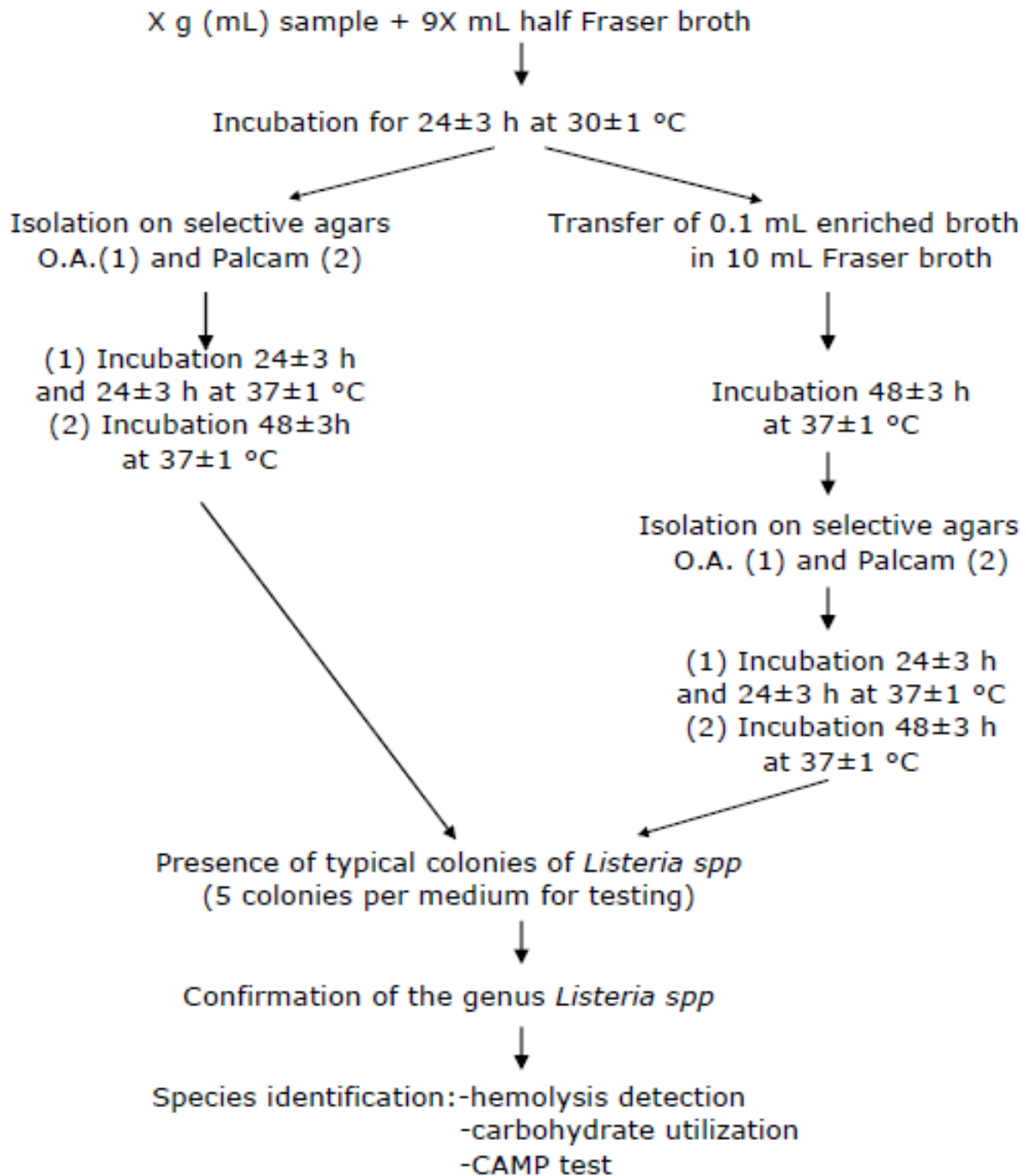


## **APPENDIX 1**

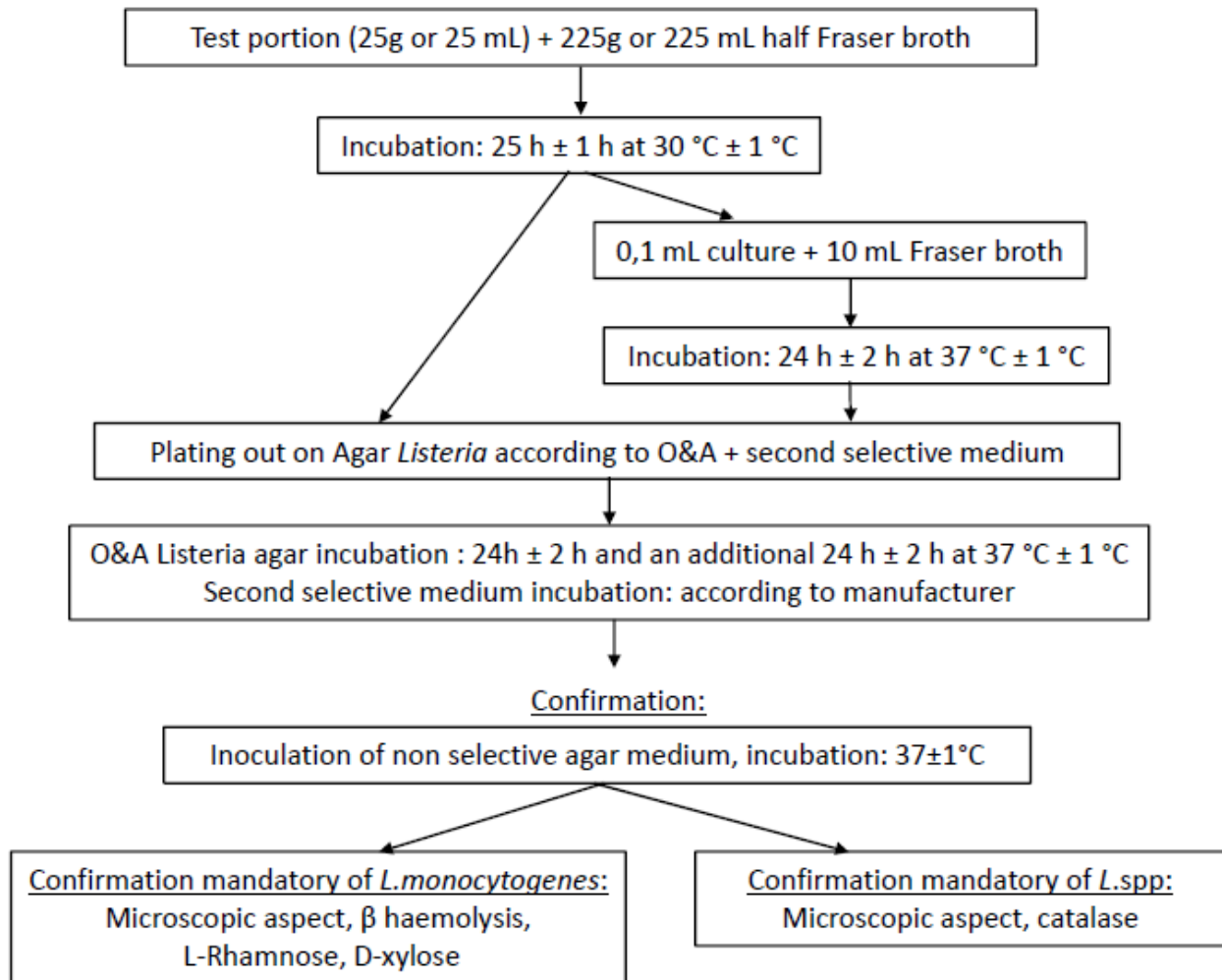
### **Protocols of the reference method**

### **and of the alternative method**

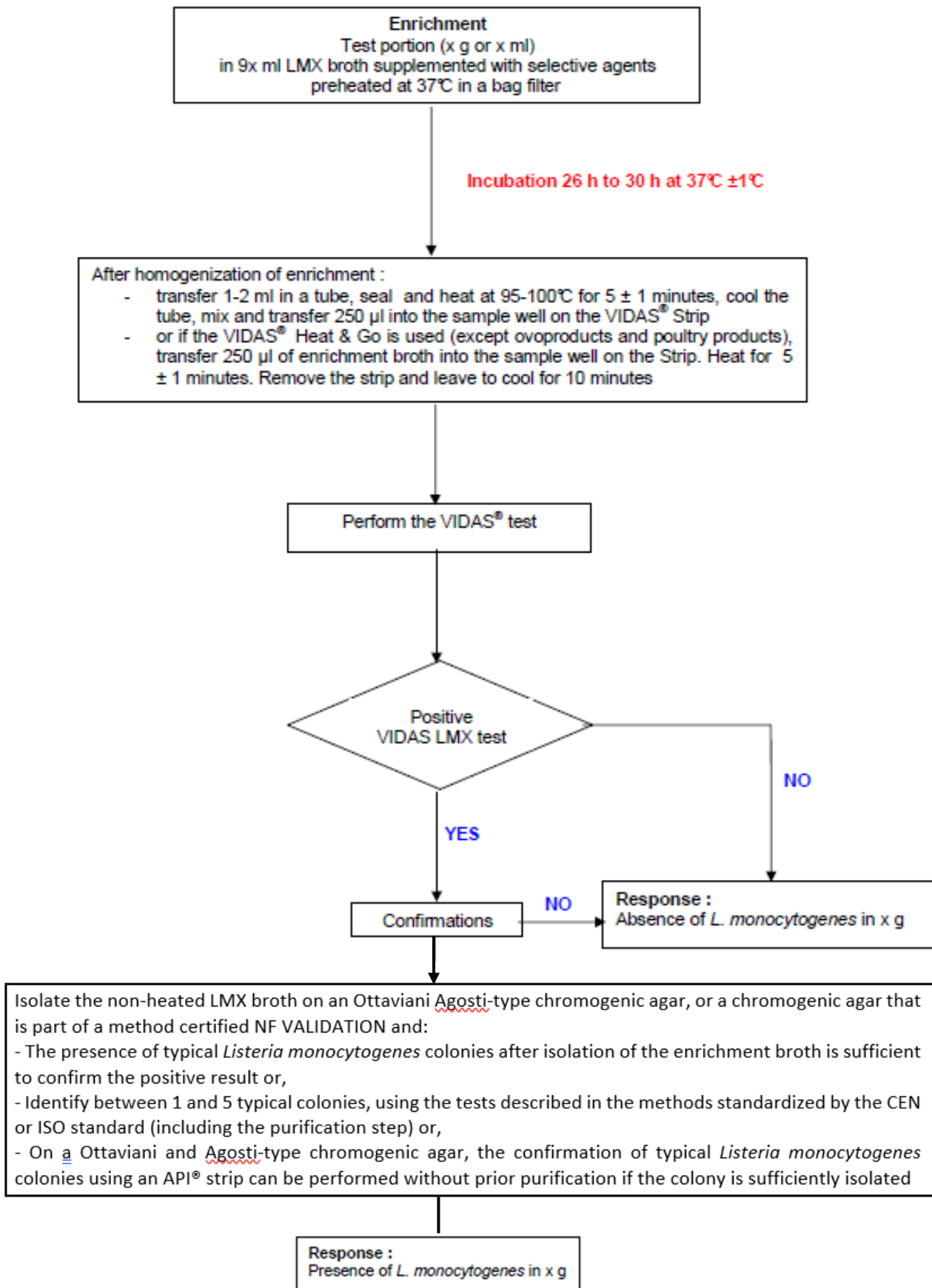
# EN ISO 11290-1/A1 : 2004



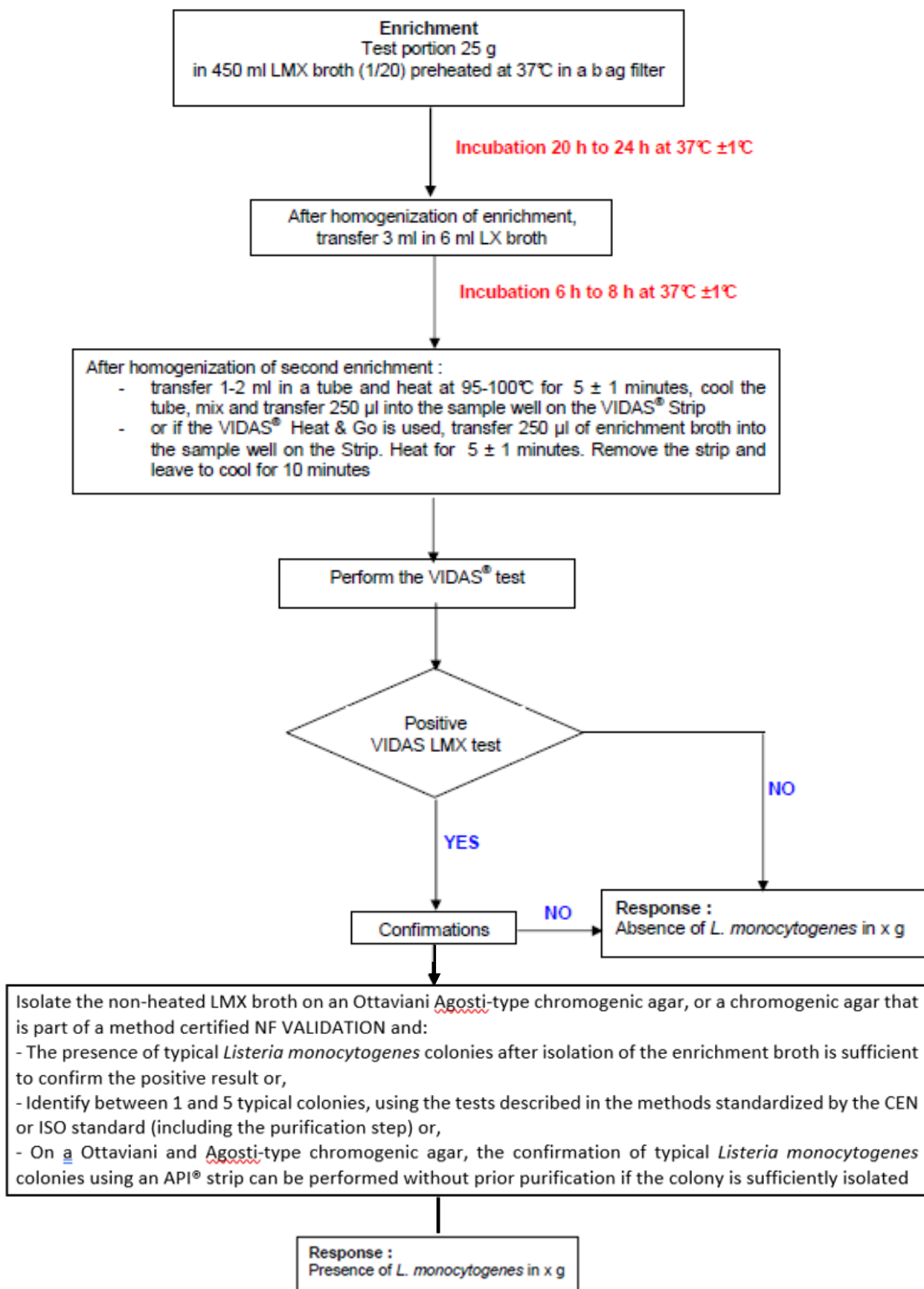
EN ISO 11290-1 / 2017



## VIDAS LMX : general protocol



## VIDAS LMX : specific protocol for raw milk cheeses



## **APPENDIX 2**

### **Artificial contaminations**

| Code | Sample                           | Category | Artificial contamination |                               |                   |   |            |         |
|------|----------------------------------|----------|--------------------------|-------------------------------|-------------------|---|------------|---------|
|      |                                  |          | Strain                   |                               |                   | Stress                                      |            |         |
|      |                                  |          | N°                       | Strain                        | Origin            | Type  | Evaluation | CFU/25g |
| G19  | New water                        | EN1      | L141                     | <i>Listeria monocytogenes</i> | Environment       | 30 minutes at 55°C then 30 minutes at -80°C | nd         | 8,1     |
| G20  | Frozen water                     | EN1      | L141                     | <i>Listeria monocytogenes</i> | Environment       | 30 minutes at 55°C then 30 minutes at -80°C | nd         | 16,2    |
| G21  | Surface delicatessen stand floor | EN2      | L141                     | <i>Listeria monocytogenes</i> | Environment       | 30 minutes at 55°C then 30 minutes at -80°C | nd         | 12,2    |
| I1   | Zucchini                         | PV3      | L29                      | <i>Listeria monocytogenes</i> | Potato            | 45 minutes at 55°C then 30 minutes at -80°C | >2,92      | 1,7     |
| I2   | Vegetable gardener               | PV3      | L29                      | <i>Listeria monocytogenes</i> | Potato            | 45 minutes at 55°C then 30 minutes at -80°C | >2,92      | 2,5     |
| I3   | Carrot puree                     | PV3      | L29                      | <i>Listeria monocytogenes</i> | Potato            | 45 minutes at 55°C then 30 minutes at -80°C | >2,92      | 2,1     |
| I4   | Plain grated carrots             | PV2      | L29                      | <i>Listeria monocytogenes</i> | Potato            | 45 minutes at 55°C then 30 minutes at -80°C | >2,92      | 3,3     |
| J14  | Frozen minced onions             | PV1      | L31                      | <i>Listeria monocytogenes</i> | Parsley           | 45 minutes at 55°C then 30 minutes at -80°C | 0,5        | 3,4     |
| J15  | Mix 3 peppers under vacuum       | PV2      | L31                      | <i>Listeria monocytogenes</i> | Parsley           | 45 minutes at 55°C then 30 minutes at -80°C | 0,5        | 4,3     |
| J16  | Plain grated carrots             | PV2      | L47                      | <i>Listeria monocytogenes</i> | Hash browns       | 45 minutes at 55°C then 30 minutes at -80°C | 3,4        | 27,2    |
| J17  | Raw vacuum-packed zucchini       | PV2      | L47                      | <i>Listeria monocytogenes</i> | Hash browns       | 45 minutes at 55°C then 30 minutes at -80°C | 3,4        | 13,6    |
| J18  | Carrots raw slices under vacuum  | PV2      | L47                      | <i>Listeria monocytogenes</i> | Hash browns       | 45 minutes at 55°C then 30 minutes at -80°C | 3,4        | 20,4    |
| J19  | Fresh vacuum-packed green beans  | PV2      | L31                      | <i>Listeria monocytogenes</i> | Parsley           | 45 minutes at 55°C then 30 minutes at -80°C | 0,5        | 6,8     |
| J20  | Seasoned carrots and cabbage     | PV3      | L31                      | <i>Listeria monocytogenes</i> | Parsley           | 45 minutes at 55°C then 30 minutes at -80°C | 0,5        | 5,1     |
| J21  | Cucumber vinaigrette             | PV3      | L47                      | <i>Listeria monocytogenes</i> | Hash browns       | 45 minutes at 55°C then 30 minutes at -80°C | 3,4        | 17,0    |
| L2   | Couscous vegetables              | PV3      | L58                      | <i>Listeria monocytogenes</i> | Salad             | 45 minutes at 55°C then 30 minutes at -80°C | 0,5        | 3,9     |
| L3   | Green beans with garlic          | PV3      | L58                      | <i>Listeria monocytogenes</i> | Salad             | 45 minutes at 55°C then 30 minutes at -80°C | 0,5        | 1,9     |
| L4   | Grated carrots                   | PV2      | L58                      | <i>Listeria monocytogenes</i> | Salad             | 45 minutes at 55°C then 30 minutes at -80°C | 0,5        | 4,9     |
| M1   | Mixed salad                      | PV2      | L125                     | <i>Listeria monocytogenes</i> | Fried vegetables  | 45 minutes at 55°C then 30 minutes at -80°C | 0,6        | 0,7     |
| M2   | Maches                           | PV2      | L125                     | <i>Listeria monocytogenes</i> | Fried vegetables  | 45 minutes at 55°C then 30 minutes at -80°C | 0,6        | 0,6     |
| M3   | Green beans                      | PV3      | L125                     | <i>Listeria monocytogenes</i> | Fried vegetables  | 45 minutes at 55°C then 30 minutes at -80°C | 0,6        | 0,3     |
| M4   | Red cabbage vinaigrette          | PV3      | L125                     | <i>Listeria monocytogenes</i> | Fried vegetables  | 45 minutes at 55°C then 30 minutes at -80°C | 0,6        | 0,4     |
| M12  | PS Meat stand slicer             | EN2      | L149                     | <i>Listeria monocytogenes</i> | Environment       | 45 minutes at 55°C then 30 minutes at -80°C | 0,5        | 0,6     |
| M13  | Surface dirty knife              | EN2      | L149                     | <i>Listeria monocytogenes</i> | Environment       | 45 minutes at 55°C then 30 minutes at -80°C | 0,5        | 0,9     |
| M14  | Water                            | EN1      | L149                     | <i>Listeria monocytogenes</i> | Environment       | 45 minutes at 55°C then 30 minutes at -80°C | 0,5        | 1,2     |
| M15  | Water                            | EN1      | L149                     | <i>Listeria monocytogenes</i> | Environment       | 45 minutes at 55°C then 30 minutes at -80°C | 0,5        | 1,5     |
| N1   | Rollot de picardie (pasteurized) | PL1      | L7                       | <i>Listeria monocytogenes</i> | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C | 0,6        | 3,4     |
| N2   | Epoisses (pasteurized)           | PL1      | L7                       | <i>Listeria monocytogenes</i> | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C | 0,6        | 6,8     |
| N3   | Raw milk                         | PL1      | L7                       | <i>Listeria monocytogenes</i> | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C | 0,6        | 8,5     |
| N4   | Raw milk                         | PL1      | L7                       | <i>Listeria monocytogenes</i> | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C | 0,6        | 5,1     |
| N5   | Cucumber vinaigrette             | PV3      | L119                     | <i>Listeria monocytogenes</i> | Spinach           | 30 minutes at 55°C then 30 minutes at -80°C | 1,4        | 8,8     |
| N6   | Mixed vegetables (4th range)     | PV2      | L119                     | <i>Listeria monocytogenes</i> | Spinach           | 30 minutes at 55°C then 30 minutes at -80°C | 1,4        | 13,2    |
| O1   | Carrots + celery                 | PV3      | L129                     | <i>Listeria monocytogenes</i> | Hash browns       | 30 minutes at 55°C then 30 minutes at -80°C | 0,8        | 6,4     |
| O2   | Spring vegetable casserole       | PV2      | L129                     | <i>Listeria monocytogenes</i> | Hash browns       | 30 minutes at 55°C then 30 minutes at -80°C | 0,8        | 4,8     |
| O3   | Iceberg lettuce                  | PV2      | L129                     | <i>Listeria monocytogenes</i> | Hash browns       | 30 minutes at 55°C then 30 minutes at -80°C | 0,8        | 9,6     |
| O4   | Oak leaves                       | PV2      | L129                     | <i>Listeria monocytogenes</i> | Hash browns       | 30 minutes at 55°C then 30 minutes at -80°C | 0,8        | 8,0     |
| O5   | Pasteurized "little goats"       | PL2      | L37                      | <i>Listeria monocytogenes</i> | Raw milk maroille | 30 minutes at 55°C then 30 minutes at -80°C | 0,5        | 7,2     |
| O7   | Pasteurized goat's cream         | PL2      | L37                      | <i>Listeria monocytogenes</i> | Raw milk maroille | 30 minutes at 55°C then 30 minutes at -80°C | 0,5        | 4,8     |
| O8   | Chaource                         | PL1      | L37                      | <i>Listeria monocytogenes</i> | Raw milk maroille | 30 minutes at 55°C then 30 minutes at -80°C | 0,5        | 9,6     |
| Q14  | Meat waste bin residue           | EN3      | L214                     | <i>Listeria monocytogenes</i> | Environment       | 35 minutes at 55°C then 30 minutes at -80°C | 2,9        | 21,0    |
| Q15  | Raw milk                         | PL1      | L62                      | <i>Listeria monocytogenes</i> | Reblochon         | 35 minutes at 55°C then 30 minutes at -80°C | 0,3        | 6,0     |
| Q16  | Raw milk                         | PL1      | L62                      | <i>Listeria monocytogenes</i> | Reblochon         | 35 minutes at 55°C then 30 minutes at -80°C | 0,3        | 7,5     |
| AI1  | fruity cantal                    | PL1      | L18                      | <i>Listeria monocytogenes</i> | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C | 0,3        | 5,2     |
| AI8  | Munster                          | PL1      | L18                      | <i>Listeria monocytogenes</i> | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C | 0,3        | 10,4    |

| Code | Sample                            | Category | Artificial contamination |                                    |                   |  |            |         |
|------|-----------------------------------|----------|--------------------------|------------------------------------|-------------------|--|------------|---------|
|      |                                   |          | Strain                   |                                    |                   | Stress   |            |         |
|      |                                   |          | N°                       | Strain                             | Origin            | Type   | Evaluation | CFU/25g |
| AG9  | raw milk                          | PL1      | L18                      | <i>Listeria monocytogenes</i>      | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,3        | 7,8     |
| AF2  | Little goat                       | PL2      | L7                       | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 35 minutes at 55°C then 30 minutes at -80°C                      | 1,2        | 1,4     |
| AF7  | Goat log                          | PL2      | L32                      | <i>Listeria monocytogenes</i> 4b   | Munster crust     | 35 minutes at 55°C then 30 minutes at -80°C                      | 1,0        | 6,3     |
| AF10 | Goat cheese                       | PL2      | L9                       | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 35 minutes at 55°C then 30 minutes at -80°C                      | 0,7        | 2,6     |
| AG2  | Blue cheese                       | PL2      | L11                      | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 35 minutes at 55°C then 30 minutes at -80°C                      | 0,6        | 5,2     |
| AG5  | Bresse Blue                       | PL2      | L37                      | <i>Listeria monocytogenes</i> 1/2b | Raw milk maroille | 35 minutes at 55°C then 30 minutes at -80°C                      | 0,4        | 10,4    |
| AH14 | Goat log                          | PL2      | L120                     | <i>L.monocytogenes</i>             | Munster           | Culture in NaCl10%, then 30 minutes at 55°C, 30 minutes at -80°C | 1,1        | 4,6     |
| H15  | Trou du cru (Cow cheese)          | PL1      | L120                     | <i>L.monocytogenes</i>             | Munster           | Culture in NaCl10%, then 30 minutes at 55°C, 30 minutes at -80°C | 1,1        | 6,8     |
| H16  | Maroilles                         | PL1      | L120                     | <i>L.monocytogenes</i>             | Munster           | Culture en NaCl10%, then 30 minutes at 55°C, 30 minutes at -80°C | 1,1        | 6,1     |
| A14  | Bresse Blue                       | PL2      | L40                      | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 30 minutes at 55°C, 30 minutes at -80°C                          | 1,4        | 6,4     |
| T1   | Reblochon raw milk                | FLC      | L123                     | <i>Listeria monocytogenes</i> 4b   | Mozzarella        | 45 minutes at 55°C then 30 minutes at -80°C                      | 1,0        | 0,7     |
| T2   | Brie de Meaux                     | FLC      | L123                     | <i>Listeria monocytogenes</i> 4b   | Mozzarella        | 45 minutes at 55°C then 30 minutes at -80°C                      | 1,0        | 0,6     |
| T3   | Crotin Chavignol raw milk         | FLC      | L123                     | <i>Listeria monocytogenes</i> 4b   | Mozzarella        | 45 minutes at 55°C then 30 minutes at -80°C                      | 1,0        | 1,1     |
| T4   | Raw milk Camembert                | FLC      | L123                     | <i>Listeria monocytogenes</i> 4b   | Mozzarella        | 45 minutes at 55°C then 30 minutes at -80°C                      | 1,0        | 0,9     |
| T5   | Raw milk goat                     | FLC      | L229                     | <i>Listeria monocytogenes</i> 4e   | Reblochon         | 45 minutes at 55°C then 30 minutes at -80°C                      | 0,5        | 0,2     |
| T6   | Small raw milk munster            | FLC      | L229                     | <i>Listeria monocytogenes</i> 4e   | Reblochon         | 45 minutes at 55°C then 30 minutes at -80°C                      | 0,5        | 0,1     |
| T7   | Small reblochon                   | FLC      | L229                     | <i>Listeria monocytogenes</i> 4e   | Reblochon         | 45 minutes at 55°C then 30 minutes at -80°C                      | 0,5        | 0,2     |
| T8   | Raw milk Camembert                | FLC      | L229                     | <i>Listeria monocytogenes</i> 4e   | Reblochon         | 45 minutes at 55°C then 30 minutes at -80°C                      | 0,5        | 0,2     |
| U1   | Caprifeuillé goat cheese raw milk | FLC      | L9                       | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 45 minutes at 55°C then 30 minutes at -80°C                      | >1,3       | 0,0     |
| U2   | Munster raw milk                  | FLC      | L9                       | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 45 minutes at 55°C then 30 minutes at -80°C                      | >1,3       | 0,1     |
| U3   | Mont d'or raw milk                | FLC      | L9                       | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 45 minutes at 55°C then 30 minutes at -80°C                      | >1,3       | 0,1     |
| U4   | Ossau Iraty farmer's raw milk     | FLC      | L32                      | <i>Listeria monocytogenes</i> 4b   | Munster crust     | 45 minutes at 55°C then 30 minutes at -80°C                      | 1,2        | 0,1     |
| U5   | raw milk goat cheese              | FLC      | L32                      | <i>Listeria monocytogenes</i> 4b   | Munster crust     | 45 minutes at 55°C then 30 minutes at -80°C                      | 1,2        | 0,1     |
| U6   | Beaufort raw milk                 | FLC      | L32                      | <i>Listeria monocytogenes</i> 4b   | Munster crust     | 45 minutes at 55°C then 30 minutes at -80°C                      | 1,2        | 0,1     |
| U7   | raw milk                          | FLC      | L9                       | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 45 minutes at 55°C then 30 minutes at -80°C                      | >1,3       | 0,1     |
| U8   | raw milk                          | FLC      | L32                      | <i>Listeria monocytogenes</i> 4b   | Munster crust     | 45 minutes at 55°C then 30 minutes at -80°C                      | 1,2        | 0,0     |
| W1   | Raw milk Camembert                | FLC      | L7                       | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,9        | 2,8     |
| W2   | Reblochon farmer's raw milk       | FLC      | L7                       | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,9        | 3,5     |
| W3   | Raw milk raclette                 | FLC      | L7                       | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,9        | 1,4     |
| W5   | Farmer cheese                     | FLC      | L40                      | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,7        | 6,6     |
| W6   | Ecume de Vimereux raw milk        | FLC      | L40                      | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,7        | 9,9     |
| W7   | Munster raw milk                  | FLC      | L40                      | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,7        | 16,5    |
| X1   | Camembertde Normandie             | FLC      | L37                      | <i>Listeria monocytogenes</i> 1/2b | Raw milk maroille | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,5        | 5,0     |
| X2   | Raw milk cheese                   | FLC      | L37                      | <i>Listeria monocytogenes</i> 1/2b | Raw milk maroille | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,5        | 8,0     |
| X3   | Raw milk morbier                  | FLC      | L37                      | <i>Listeria monocytogenes</i> 1/2b | Raw milk maroille | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,5        | 9,0     |
| X4   | raw milk goat cheese              | FLC      | L37                      | <i>Listeria monocytogenes</i> 1/2b | Raw milk maroille | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,5        | 7,0     |
| X5   | Raw milk Camembert                | FLC      | L63                      | <i>Listeria monocytogenes</i> 4e   | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,6        | 14,4    |
| X6   | raw milk goat cheese              | FLC      | L63                      | <i>Listeria monocytogenes</i> 4e   | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,6        | 18,0    |
| X7   | Small reblochon                   | FLC      | L63                      | <i>Listeria monocytogenes</i> 4e   | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,6        | 21,6    |
| X8   | Raw milk raclette                 | FLC      | L63                      | <i>Listeria monocytogenes</i> 4e   | Munster crust     | 30 minutes at 55°C then 30 minutes at -80°C                      | 0,6        | 25,2    |
| Y1   | raw milk                          | FLC      | L11                      | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 45 minutes at 55°C then 30 minutes at -80°C                      | 0,8        | 3,7     |
| Y2   | Brie de Meaux                     | FLC      | L11                      | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 45 minutes at 55°C then 30 minutes at -80°C                      | 0,8        | 3,2     |
| Y3   | Raw milk Camembert                | FLC      | L11                      | <i>Listeria monocytogenes</i> 1/2a | Munster crust     | 45 minutes at 55°C then 30 minutes at -80°C                      | 0,8        | 2,7     |
| Y5   | Raw milk cheese                   | FLC      | L51                      | <i>Listeria monocytogenes</i> 1/2b | Germain matured   | 45 minutes at 55°C then 30 minutes at -80°C                      | 0,6        | 7,4     |

## Artificial contaminations 2017

| Category              | Sample number | Sample                             | Code strain | Strain                             | Origin                         | Protocol of seeding | Inoculation level (CFU/25g) | Global result |
|-----------------------|---------------|------------------------------------|-------------|------------------------------------|--------------------------------|---------------------|-----------------------------|---------------|
| Meat products         | 1             | Beef bourguignon                   | LIS 4.26    | <i>Listeria monocytogenes 1/2a</i> | Ham                            | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 3             | Blanquette of veal                 | LIS 4.26    | <i>Listeria monocytogenes 1/2a</i> | Ham                            | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 5             | Osso bucco                         | LIS 4.26    | <i>Listeria monocytogenes 1/2a</i> | Ham                            | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 7             | Chicken wings                      | LIS 4.27    | <i>Listeria monocytogenes 1/2a</i> | Ground beef                    | 48h at 5±3 °C       | 2,6                         | +             |
|                       | 9             | Rabbit stew                        | LIS 4.27    | <i>Listeria monocytogenes 1/2a</i> | Ground beef                    | 48h at 5±3 °C       | 2,6                         | +             |
|                       | 11            | Roasted pig with caramel sauce     | LIS 4.27    | <i>Listeria monocytogenes 1/2a</i> | Ground beef                    | 48h at 5±3 °C       | 2,6                         | +             |
|                       | 13            | Blanquette of turkey               | LIS 4.27    | <i>Listeria monocytogenes 1/2a</i> | Ground beef                    | 48h at 5±3 °C       | 2,6                         | +             |
| Dairy products        | 15            | Pasteurized sheep cheese           | LIS 4.59    | <i>Listeria monocytogenes</i>      | Goat raw milk                  | 48h at 5±3 °C       | 2,4                         | +             |
|                       | 17            | Neuf châtel with raw milk          | LIS 4.59    | <i>Listeria monocytogenes</i>      | Goat raw milk                  | 48h at 5±3 °C       | 2,4                         | +             |
|                       | 19            | Camembert with raw milk            | LIS 4.59    | <i>Listeria monocytogenes</i>      | Goat raw milk                  | 48h at 5±3 °C       | 2,4                         | +             |
|                       | 21            | Coulommiers with raw milk          | LIS 4.59    | <i>Listeria monocytogenes</i>      | Goat raw milk                  | 48h at 5±3 °C       | 2,4                         | +             |
| Seafood products      | 23            | Smoked salmon                      | LIS 4.83    | <i>Listeria monocytogenes 1/2a</i> | Salmon tartare                 | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 25            | Smoked trout                       | LIS 4.15    | <i>Listeria monocytogenes 1/2a</i> | Salmon tartare                 | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 27            | Tarama with cod eggs               | LIS 4.15    | <i>Listeria monocytogenes 1/2a</i> | Salmon tartare                 | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 29            | Surimi                             | LIS 4.15    | <i>Listeria monocytogenes 1/2a</i> | Salmon tartare                 | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 31            | Atum rilette                       | LIS 4.83    | <i>Listeria monocytogenes</i>      | Fish with lemon sauce and rice | 48h at 5±3 °C       | 1,8                         | +             |
|                       | 33            | Salmon rilette                     | LIS 4.83    | <i>Listeria monocytogenes</i>      | Fish with lemon sauce and rice | 48h at 5±3 °C       | 1,8                         | +             |
|                       | 35            | Sardine rilette                    | LIS 4.83    | <i>Listeria monocytogenes</i>      | Fish with lemon sauce and rice | 48h at 5±3 °C       | 1,8                         | +             |
| Vegetal products      | 39            | Banana                             | LIS 4.10    | <i>Listeria monocytogenes 1/2a</i> | Salad                          | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 41            | Grape                              | LIS 4.10    | <i>Listeria monocytogenes 1/2a</i> | Salad                          | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 43            | Tomato                             | LIS 4.10    | <i>Listeria monocytogenes 1/2a</i> | Salad                          | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 45            | Plums red                          | LIS 4.10    | <i>Listeria monocytogenes 1/2a</i> | Salad                          | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 47            | Mixed vegetables                   | LIS 4.35    | <i>Listeria monocytogenes 1/2c</i> | Sandwich chef salad            | 48h at 5±3 °C       | 2,4                         | +             |
|                       | 49            | Peas                               | LIS 4.35    | <i>Listeria monocytogenes 1/2c</i> | Sandwich chef salad            | 48h at 5±3 °C       | 2,4                         | +             |
|                       | 51            | White beans                        | LIS 4.35    | <i>Listeria monocytogenes 1/2c</i> | Sandwich chef salad            | 48h at 5±3 °C       | 2,4                         | +             |
| RTE-RTRH              | 53            | Taboulet with chicken              | LIS 4.6     | <i>Listeria monocytogenes 1/2a</i> | Sandwich with ham and emmental | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 55            | strabourgeoise salad               | LIS 4.6     | <i>Listeria monocytogenes 1/2a</i> | Sandwich with ham and emmental | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 57            | Piémontaise with ham               | LIS 4.6     | <i>Listeria monocytogenes 1/2a</i> | Sandwich with ham and emmental | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 59            | Sandwich with salmon and chives    | LIS 4.6     | <i>Listeria monocytogenes 1/2a</i> | Sandwich with ham and emmental | 48h at 5±3 °C       | 2,6                         | +             |
|                       | 61            | Sandwich with ham and Emmental     | LIS 4.24    | <i>Listeria monocytogenes 1/2a</i> | Dairy meal                     | 48h at 5±3 °C       | 2,6                         | +             |
|                       | 63            | Sandwich with tuna and crudities   | LIS 4.24    | <i>Listeria monocytogenes 1/2a</i> | Dairy meal                     | 48h at 5±3 °C       | 2,6                         | +             |
|                       | 65            | Sandwich with ham and butter       | LIS 4.24    | <i>Listeria monocytogenes 1/2a</i> | Dairy meal                     | 48h at 5±3 °C       | 2,6                         | +             |
|                       | 67            | Sandwich with rosette and butter   | LIS 4.24    | <i>Listeria monocytogenes 1/2a</i> | Dairy meal                     | 48h at 5±3 °C       | 2,6                         | +             |
|                       | 69            | Raspberries tart                   | LIS 4.46    | <i>Listeria monocytogenes 3a</i>   | Goat cheese sandwich           | 48h at 5±3 °C       | 1,8                         | +             |
|                       | 71            | Mille feuille                      | LIS 4.7     | <i>Listeria monocytogenes 1/2a</i> | Ham and emmental sandwich      | 48h at 5±3 °C       | 2,8                         | +             |
|                       | 73            | Savarin with rhum and pastry cream | LIS 4.7     | <i>Listeria monocytogenes 1/2a</i> | Ham and emmental sandwich      | 48h at 5±3 °C       | 2,8                         | +             |
| Environmental samples | 75            | Processed water 1                  | LIS 4.2     | <i>Listeria monocytogenes</i>      | Environment                    | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 77            | Processed water 2                  | LIS 4.2     | <i>Listeria monocytogenes</i>      | Environment                    | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 79            | Processed water 3                  | LIS 4.2     | <i>Listeria monocytogenes</i>      | Environment                    | 48h at 5±3 °C       | 2,2                         | +             |
|                       | 81            | Processed water 4                  | LIS 4.2     | <i>Listeria monocytogenes</i>      | Environment                    | 48h at 5±3 °C       | 2,6                         | +             |
|                       | 83            | Surface sample 1                   | LIS 4.50    | <i>Listeria monocytogenes 4b</i>   | Surface control on salmon      | 48h at 5±3 °C       | 2,6                         | +             |
|                       | 85            | Surface sample 2                   | LIS 4.50    | <i>Listeria monocytogenes 4b</i>   | Surface control on salmon      | 48h at 5±3 °C       | 2,6                         | +             |

## **APPENDIX 3**

### **Sensitivity Raw results**

Key:

Neg. = Negative

Pos. = Positive

L. = Listeria

NA= Negative agreement

PA= Positive agreement

PD= Positive deviation

ND= Negative deviation

## Meat products

| Study | Category      | Type | Code | Matrices                        | Artificial contamination |       | ISO 11290-1                 |              | VIDAS LMX method |      |             |                |              | Comparison |
|-------|---------------|------|------|---------------------------------|--------------------------|-------|-----------------------------|--------------|------------------|------|-------------|----------------|--------------|------------|
|       |               |      |      |                                 | Type                     | Level | CONFIRMATION                | Final result | Detection        |      |             | Confirmation   | Final result |            |
|       |               |      |      |                                 |                          |       | Identification              |              | RFV              | VT   | Test result | Identification |              |            |
| 2009  | Meat products | 1-   | A14  | Steaks, chopped                 | No                       | /     | <i>L. welshimeri</i>        | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 1-   | A15  | Ground beef                     | No                       | /     | /                           | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 1-   | B2   | Ground beef                     | No                       | /     | <i>L. welshimeri</i>        | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 1-   | B7   | Steaks, chopped 15% fat         | No                       | /     | <i>L. welshimeri</i>        | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 1-   | B8   | Steaks, chopped 15% fat         | No                       | /     | <i>L. welshimeri</i>        | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 1-   | C5   | Frozen chopped steak            | No                       | /     | <i>L. welshimeri</i>        | Neg.         | 1                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 1-   | C20  | Traditional minced meat         | No                       | /     | /                           | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 1-   | D6   | Ground beef halal               | No                       | /     | /                           | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 1-   | D10  | Frozen Burgers                  | No                       | /     | /                           | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 1-   | F4   | Chicken breasts                 | No                       | /     | /                           | Neg.         | 7                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 1-   | J2   | Chicken fillets                 | No                       | /     | <i>L. welshimeri</i>        | Neg.         | 22               | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 2-   | A4   | Chicken marinated in Thai style | No                       | /     | <i>L. innocua</i>           | Neg.         | 2                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 2-   | A8   | Chicken with Cajun spices       | No                       | /     | /                           | Neg.         | 2                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 2-   | C2   | Chicken with mozzarella         | No                       | /     | /                           | Neg.         | 2                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 2-   | G1   | Mexican spicy pork chops        | No                       | /     | /                           | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 2-   | E5   | Black pudding                   | No                       | /     | /                           | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 2-   | H16  | Pie                             | No                       | /     | /                           | Neg.         | 7                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 2-   | H17  | Pate of head parsley            | No                       | /     | /                           | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Meat products | 2-   | 2    | Beef bourguignon                | No                       | /     | /                           | Neg.         | -1               | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Meat products | 2-   | 4    | Blanquette of veal              | No                       | /     | /                           | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Meat products | 2-   | 6    | Osso bucco                      | No                       | /     | /                           | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 3-   | B22  | Smoked bacon                    | No                       | /     | /                           | Neg.         | 2                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 3-   | E18  | chipolatas                      | No                       | /     | <i>L. welshimeri</i>        | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 3-   | F5   | Sausages with kebab             | No                       | /     | /                           | Neg.         | 57               | 0,01 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 3-   | F9   | Pork Sausages                   | No                       | /     | /                           | Neg.         | 17               | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 3-   | D19  | Rosette                         | No                       | /     | /                           | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 3-   | H15  | Smoked ham                      | No                       | /     | /                           | Neg.         | 6                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 3-   | H18  | Bacon                           | No                       | /     | /                           | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Meat products | 3-   | 52   | Ham                             | No                       | /     | /                           | Neg.         | 1                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Meat products | 3-   | 54   | Prime ham                       | No                       | /     | /                           | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Meat products | 3-   | 56   | Raw ham                         | No                       | /     | /                           | Neg.         | 2                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Meat products | 1+   | B1   | Ground beef                     | No                       | /     | /                           | Neg.         | 6 685            | 2,13 | +           | <i>L.mono</i>  | Pos.         | PD         |
| 2009  | Meat products | 1+   | B3   | Ground beef                     | No                       | /     | /                           | Neg.         | 10 137           | 3,24 | +           | <i>L.mono</i>  | Pos.         | PD         |
| 2009  | Meat products | 1+   | J4   | Turkey escalope                 | No                       | /     | /                           | Neg.         | 7 164            | 2,21 | +           | <i>L.mono</i>  | Pos.         | PD         |
| 2009  | Meat products | 1+   | A16  | Ground meat of horse            | No                       | /     | <i>L..mono</i>              | Pos.         | 10 206           | 3,26 | +           | <i>L.mono</i>  | Pos.         | PA         |
| 2009  | Meat products | 1+   | D20  | chicken thigh                   | No                       | /     | <i>L..mono L.welshimeri</i> | Pos.         | 9 852            | 3,14 | +           | <i>L.mono</i>  | Pos.         | PA         |
| 2009  | Meat products | 1+   | H5   | Frozen chopped steaks           | No                       | /     | <i>L..mono L.welshimeri</i> | Pos.         | 12 396           | 3,82 | +           | <i>L.mono</i>  | Pos.         | PA         |
| 2009  | Meat products | 1+   | J3   | Duck leg                        | No                       | /     | <i>L..mono</i>              | Pos.         | 8 085            | 2,49 | +           | <i>L.mono</i>  | Pos.         | PA         |

| Study | Category      | Type | Code | Matrices                       | Artificial contamination |       | ISO 11290-1                |              | VIDAS LMX method |      |                |  |              | Comparison           |
|-------|---------------|------|------|--------------------------------|--------------------------|-------|----------------------------|--------------|------------------|------|----------------|--|--------------|----------------------|
|       |               |      |      |                                | Type                     | Level | CONFIRMATION               | Final result | Detection        |      |                | Confirmation                                   | Final result |                      |
|       |               |      |      |                                |                          |       |                            |              | RFV              | VT   | Test result    | Identification                                 |              |                      |
|       |               |      |      |                                |                          |       | Identification             |              |                  |      | Identification |  |              |                      |
| 2009  | Meat products | 1+   | J5   | Duck leg                       | No                       | /     | <i>L.mono</i>              | Pos.         | 10 737           | 3,31 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 1+   | K11  | Steaks, chopped, pure beef     | No                       | /     | <i>L.mono L.innocua</i>    | Pos.         | 11 983           | 3,70 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 2+   | C16  | Frozen beef balls              | No                       | /     | <i>L.mono L.innocua</i>    | Pos.         | 113              | 0,03 | -              | <i>L.innocua</i><br><i>Isol. LX: L.innocua</i> | Neg.         | ND                   |
| 2009  | Meat products | 2+   | A18  | Thai Chicken                   | No                       | /     | <i>L.mono L.innocua</i>    | Pos.         | 6 405            | 2,04 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 2+   | J1   | Marinated chicken escalope     | No                       | /     | <i>L.mono</i>              | Pos.         | 11 077           | 3,42 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 1    | Beef bourguignon               | se                       | 2,2   | <i>L.mono</i>              | Pos.         | 10 912           | 2,77 | +              | <i>L.m</i>                                     | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 3    | Blanquette of veal             | se                       | 2,2   | <i>L.mono</i>              | Pos.         | 10 610           | 2,69 | +              | <i>L.m</i>                                     | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 5    | Osso bucco                     | se                       | 2,2   | <i>L.mono</i>              | Pos.         | 10 915           | 2,77 | +              | <i>L.m</i>                                     | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 7    | Chicken wings                  | se                       | 2,6   | <i>L.mono</i>              | Pos.         | 10 804           | 2,74 | +              | <i>L.m</i>                                     | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 9    | Rabbit stew                    | se                       | 2,6   | <i>L.mono</i>              | Pos.         | 10 824           | 2,75 | +              | <i>L.m</i>                                     | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 11   | Roasted pig with caramel sauce | se                       | 2,6   | <i>L.mono</i>              | Pos.         | 10 682           | 2,71 | +              | <i>L.m</i>                                     | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 13   | Blanquette of turkey           | se                       | 2,6   | <i>L.mono</i>              | Pos.         | 10 838           | 2,75 | +              | <i>L.m</i>                                     | Pos.         | PA                   |
| 2009  | Meat products | 3+   | B20  | merguez                        | No                       | /     | <i>L.mono L.welshimeri</i> | Pos.         | 9 345            | 2,98 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 3+   | B21  | chipolatas                     | No                       | /     | <i>L.mono L.welshimeri</i> | Pos.         | 10 543           | 3,37 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 3+   | C7   | merguez                        | No                       | /     | <i>L.mono L.innocua</i>    | Pos.         | 449              | 0,14 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 3+   | C9   | Smoked bacon                   | No                       | /     | <i>L.mono L.welshimeri</i> | Pos.         | 10 307           | 3,29 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 3+   | C19  | chipolatas                     | No                       | /     | <i>L.mono</i>              | Pos.         | 219              | 0,07 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 3+   | D14  | Smoked bacon                   | No                       | /     | <i>L.mono L.welshimeri</i> | Pos.         | 222              | 0,07 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 3+   | D15  | Smoked bacon                   | No                       | /     | <i>L.mono</i>              | Pos.         | 9 986            | 3,19 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 3+   | C8   | Dry sausage                    | No                       | /     | <i>L.mono</i>              | Pos.         | 5                | 0,00 | -              | <i>L.mono</i>                                  | Neg.         | ND                   |
| 2009  | Meat products | 3+   | D16  | Dry sausage                    | No                       | /     | <i>L.mono</i>              | Pos.         | 97               | 0,03 | -              | <i>L.mono</i><br><i>Isol. LX: L.mono</i>       | Neg.         | ND FN <sub>alt</sub> |
| 2009  | Meat products | 3+   | B19  | Bacon                          | No                       | /     | <i>L.mono L.welshimeri</i> | Pos.         | 2 791            | 0,89 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 3+   | C4   | White Ham                      | No                       | /     | <i>L.mono</i>              | Pos.         | 11 035           | 3,52 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 3+   | C17  | White Ham                      | No                       | /     | <i>L.mono</i>              | Pos.         | 10 874           | 3,47 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |
| 2009  | Meat products | 3+   | D2   | Ham pieces                     | No                       | /     | <i>L.mono L.welshimeri</i> | Pos.         | 1 327            | 0,42 | +              | <i>L.mono</i>                                  | Pos.         | PA                   |

## Meat products : storage for 72 hours at 2-8°C

| Study | Category      | Type | Code | Matrices                       | Artificial contamination |       | ISO 11290-1                                     |              | VIDAS LMX method |      |             |   |              | Comparison           |
|-------|---------------|------|------|--------------------------------|--------------------------|-------|---|--------------|------------------|------|-------------|---|--------------|----------------------|
|       |               |      |      |                                | Type                     | Level | CONFIRMATION                                    | Final result | Detection        |      |             | Confirmation                                    | Final result |                      |
|       |               |      |      |                                |                          |       | Identification                                  |              | RFV              | VT   | Test result | Identification                                  |              |                      |
| 2009  | Meat products | 1+   | B1   | Ground beef                    | No                       | /     | /   | Neg.         | 11 765           | 3,76 | +           | <i>L. monocytogenes</i>                         | Pos.         | PD                   |
| 2009  | Meat products | 1+   | B3   | Ground beef                    | No                       | /     | /   | Neg.         | 10 390           | 3,32 | +           | <i>L. monocytogenes</i>                         | Pos.         | PD                   |
| 2009  | Meat products | 1+   | J4   | Turkey escalope                | No                       | /     | /   | Neg.         | 8 850            | 2,73 | +           | <i>L. monocytogenes</i>                         | Pos.         | PD                   |
| 2009  | Meat products | 1+   | A16  | Ground meat of horse           | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 104           | 3,23 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 1+   | D20  | chicken thigh                  | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 3 391            | 1,06 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 1+   | H5   | Frozen chopped steaks          | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 10 605           | 3,27 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 1+   | J3   | Duck leg                       | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 854              | 0,26 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 1+   | J5   | Duck leg                       | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 522           | 3,24 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 1+   | K11  | Steaks, chopped, pure beef     | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i>    | Pos.         | 11 355           | 3,54 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 2+   | C16  | Frozen beef balls              | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i>    | Pos.         | 128              | 0,04 | -           | <i>L. innocua</i><br><i>Isol. LX: L.innocua</i> | Neg.         | ND                   |
| 2009  | Meat products | 2+   | A18  | Thai Chicken                   | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i>    | Pos.         | 11 409           | 3,64 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 2+   | J1   | Marinated chicken escalope     | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 9 837            | 3,03 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 1    | Beef bourguignon               | se                       | 2,2   | <i>L. monocytogenes</i>                         | Pos.         | 10 670           | 2,71 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 3    | Blanquette of veal             | se                       | 2,2   | <i>L. monocytogenes</i>                         | Pos.         | 10 784           | 2,74 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 5    | Osso bucco                     | se                       | 2,2   | <i>L. monocytogenes</i>                         | Pos.         | 11 083           | 2,82 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 7    | Chicken wings                  | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 663           | 2,71 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 9    | Rabbit stew                    | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 751           | 2,73 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 11   | Roasted pig with caramel sauce | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 675           | 2,71 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2017  | Meat products | 2+   | 13   | Blanquette of turkey           | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 195           | 2,59 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 3+   | B20  | merguez                        | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 9 940            | 3,17 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 3+   | B21  | chipolatas                     | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 10 114           | 3,23 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 3+   | C7   | merguez                        | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i>    | Pos.         | 1 666            | 0,53 | +           | <i>L. innocua</i><br><i>Isol. LX: L.innocua</i> | Neg.         | PA FP <sub>alt</sub> |
| 2009  | Meat products | 3+   | C9   | Smoked bacon                   | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 10 037           | 3,20 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 3+   | C19  | chipolatas                     | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 834           | 3,46 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 3+   | D14  | Smoked bacon                   | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 3 562            | 1,11 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 3+   | D15  | Smoked bacon                   | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 008           | 3,12 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |
| 2009  | Meat products | 3+   | C8   | Dry sausage                    | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 108              | 0,03 | -           | <i>L. monocytogenes</i>                         | Neg.         | ND FN <sub>alt</sub> |
| 2009  | Meat products | 3+   | D16  | Dry sausage                    | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 5 967            | 1,86 | +           | <i>L. monocytogenes</i>                         | Pos.         | PA                   |

| Study | Category      | Type | Code | Matrices   | Artificial contamination |       | ISO 11290-1                                     |              | VIDAS LMX method |      |             |   |              | Comparison |
|-------|---------------|------|------|------------|--------------------------|-------|---|--------------|------------------|------|-------------|---|--------------|------------|
|       |               |      |      |            | Type                     | Level | CONFIRMATION                                    | Final result | Detection        |      |             | Confirmation  | Final result |            |
|       |               |      |      |            |                          |       | Identification                                  |              | RFV              | VT   | Test result | Identification  |              |            |
| 2009  | Meat products | 3+   | B19  | Bacon      | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 9 206            | 2,94 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA         |
| 2009  | Meat products | 3+   | C4   | White Ham  | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 661           | 3,40 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA         |
| 2009  | Meat products | 3+   | C17  | White Ham  | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 265           | 3,28 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA         |
| 2009  | Meat products | 3+   | D2   | Ham pieces | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 2 821            | 0,88 | +           | <i>L. monocytogenes</i><br><i>Isol. LX: L.monocytogenes</i> | Pos.         | PA         |

## Dairy products

| Study | Category       | Type | Code | Matrices                          | Artificial contamination |       | ISO 11290-1      |              | VIDAS LMX method |      |             |                | Comparison |              |
|-------|----------------|------|------|-----------------------------------|--------------------------|-------|------------------|--------------|------------------|------|-------------|----------------|------------|--------------|
|       |                |      |      |                                   | Type                     | Level | CONFIRMATION     | Final result | Detection        |      |             | Confirmation   |            | Final result |
|       |                |      |      |                                   |                          |       | Identification   |              | RFV              | VT   | Test result | Identification |            |              |
| 2009  | Dairy products | 1-   | S1   | squeegee                          | No                       | /     | /                | Abs.         | 1                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 1-   | P8   | Pasteurized Couloumiers           | No                       | /     | /                | Abs.         | 4                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 1-   | AF26 | Young Cantal                      | No                       | /     | <i>L.innocua</i> | Abs.         | 4                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 1-   | AG21 | Ccow cheese (Rond du vinage)      | No                       | /     | /                | Abs.         | 7                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 1-   | N13  | Raw milk                          | No                       | /     | /                | Abs.         | 5                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 1-   | Q6   | Infant Milk Powder                | No                       | /     | /                | Abs.         | 7                | 0,00 | -           | /              | Abs.       | NA           |
| 2017  | Dairy products | 1-   | 8    | UHT milk                          | No                       | /     | /                | Abs.         | 1                | 0,00 | -           | /              | Abs.       | NA           |
| 2017  | Dairy products | 1-   | 10   | Emmental                          | No                       | /     | /                | Abs.         | 1                | 0,00 | -           | /              | Abs.       | NA           |
| 2017  | Dairy products | 1-   | 12   | Camembert                         | No                       | /     | /                | Abs.         | 2                | 0,00 | -           | /              | Abs.       | NA           |
| 2017  | Dairy products | 1-   | 14   | Pasteurized milk                  | No                       | /     | /                | Abs.         | 2                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | E9   | Petit Bethmale with goat cheese   | No                       | /     | /                | Abs.         | 10               | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | E10  | Goat cheese                       | No                       | /     | /                | Abs.         | 9                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | N10  | Goat cheese                       | No                       | /     | /                | Abs.         | 8                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | P5   | Goat cheese                       | No                       | /     | /                | Abs.         | 5                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | P6   | Goat cheese (Chabichou of poitou) | No                       | /     | /                | Abs.         | 6                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | P7   | Pasteurized goat's cheese         | No                       | /     | /                | Abs.         | 2                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | AB3  | Goat cheese                       | No                       | /     | /                | Abs.         | 2                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | AE1  | Ewe cheese (Ricotta)              | No                       | /     | /                | Abs.         | 2                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | AE4  | Goat cheese                       | No                       | /     | /                | Abs.         | 3                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | AB3  | Goat cheese                       | No                       | /     | /                | Abs.         | 2                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | AE1  | Ewe cheese (Ricotta)              | No                       | /     | /                | Abs.         | 2                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | AE4  | Goat cheese                       | No                       | /     | /                | Abs.         | 3                | 0,00 | -           | /              | Abs.       | NA           |
| 2009  | Dairy products | 2-   | AE5  | Ewe cheese (Ossau Iraty)          | No                       | /     | /                | Abs.         | 3                | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | T10  | Cow cheese from raw milk          | No                       | /     | /                | Abs.         | 122              | 0,03 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | T13  | Cow cheese from raw milk          | No                       | /     | /                | Abs.         | 3                | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | R14  | Cow cheese from raw milk          | No                       | /     | /                |              | 13               | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | R13  | Cow cheese (Cantal fruity)        | No                       | /     | /                | Abs.         | 5                | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | T9   | Cow cheese (Parmigiano)           | No                       | /     | /                | Abs.         | 4                | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | R12  | Raw milk cheese                   | No                       | /     | /                | Abs.         | 7                | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | V1   | Cow cheese (Camembert)            | sp                       | Mix   | /                | Abs.         | 4                | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | V3   | Cow cheese (Munster)              | sp                       | Mix   | /                | Abs.         | 2                | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | V4   | Cow cheese (Brie de Meaux)        | sp                       | Mix   | /                | Abs.         | 2                | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | U6   | Cow cheese (Beaufort)             | sp                       | 0,05  | /                | Abs.         | 6                | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | U2   | Cow cheese (Munster)              | sp                       | 0,06  | /                | Abs.         | 4                | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | T6   | Cow cheese (munster)              | sp                       | 0,1   | /                | Abs.         | 7                | 0,00 | -           | /              | Abs.       | NA           |
| 2010  | Dairy products | 3-   | T8   | Cow cheese (Camembert)            | sp                       | 0,2   | /                | Abs.         | 9                | 0,00 | -           | /              | Abs.       | NA           |

| Study | Category       | Type | Code | Matrices                       | Artificial contamination |       | ISO 11290-1             |              | VIDAS LMX method |      |             |   |              | Comparison           |
|-------|----------------|------|------|--------------------------------|--------------------------|-------|-------------------------|--------------|------------------|------|-------------|---|--------------|----------------------|
|       |                |      |      |                                | Type                     | Level | CONFIRMATION            | Final result | Detection        |      |             | Confirmation  | Final result |                      |
|       |                |      |      |                                |                          |       | Identification          |              | RFV              | VT   | Test result | Identification  |              |                      |
| 2010  | Dairy products | 3-   | T7   | Cow cheese (Small reblochon)   | sp                       | 0,2   | /                       | Abs.         | 5                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | T2   | Cow cheese (Brie de Meaux)     | sp                       | 0,55  | /                       | Abs.         | 5                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | T1   | Cow cheese (Reblochon)         | sp                       | 0,74  | /                       | Abs.         | 5                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | T4   | Cow cheese (Camembert)         | sp                       | 0,93  | /                       | Abs.         | 5                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | Y3   | Cow cheese (Camembert)         | sp                       | 2,7   | /                       | Abs.         | 4                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | W1   | Cow cheese (Camembert)         | sp                       | 2,76  | /                       | Abs.         | 7                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | W6   | Cow cheese (Ecume du Vimereux) | sp                       | 9,9   | /                       | Abs.         | 8                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | R3   | Ewe Cheese parsley             | No                       | /     | /                       | Abs.         | 23               | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | R8   | Ewe Cheese                     | No                       | /     | /                       | Abs.         | 6                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | U1   | Goat cheese                    | sp                       | 0,04  | /                       | Abs.         | 5                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | U5   | Goat cheese                    | sp                       | 0,07  | /                       | Abs.         | 6                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | U4   | Ewe Cheese (Ossau Iraty)       | sp                       | 0,08  | /                       | Abs.         | 4                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | T5   | Goat cheese                    | sp                       | 0,15  | /                       | Abs.         | 5                | 0,00 | -           | /   | Abs.         | NA                   |
| 2010  | Dairy products | 3-   | T3   | Goat cheese (Croton Chavignol) | sp                       | 1,1   | /                       | Abs.         | 11               | 0,00 | -           | /   | Abs.         | NA                   |
| 2017  | Dairy products | 3-   | 16   | Neuf ch tel with raw milk      | No                       | /     | /                       | A            | -1               | 0,00 | -           | /   | A            | NA                   |
| 2017  | Dairy products | 3-   | 18   | Camembert with raw milk        | No                       | /     | /                       | A            | 0                | 0,00 | -           | /   | A            | NA                   |
| 2010  | Dairy products | 3-   | R11  | Cow cheese (Epoisses)raw milk  | No                       | /     | /                       | Abs.         | 10               | 0,00 | -           | /   | Abs.         | NA                   |
| 2009  | Dairy products | 1+   | N1   | Cow cheese (Rollot of Picardy) | sp                       | 3,4   | <i>L. monocytogenes</i> | Pos.         | 44               | 0,01 | -           | <i>L. monocytogenes</i>                                     | Abs.         | ND FN <sub>ait</sub> |
| 2009  | Dairy products | 1+   | A11  | Cow cheese (Cantal)            | sp                       | 5,2   | <i>L. monocytogenes</i> | Pos.         | 6 064            | 1,54 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 1+   | AH16 | Cow cheese (Maroilles)         | sp                       | 6,1   | <i>L. monocytogenes</i> | Pos.         | 9 642            | 2,46 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 1+   | N2   | Cow cheese (Epoisses)          | sp                       | 6,8   | <i>L. monocytogenes</i> | Pos.         | 3 175            | 0,98 | +           | <i>L. monocytogenes</i><br><i>isol Lx: L. monocytogenes</i> | Pos.         | PA                   |
| 2009  | Dairy products | 1+   | AH15 | Cow cheese (Trou du cru)       | sp                       | 6,8   | <i>L. monocytogenes</i> | Pos.         | 9 258            | 2,36 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 1+   | O8   | Cow cheese (Chaource)          | sp                       | 9,6   | <i>L. monocytogenes</i> | Pos.         | 2 115            | 0,65 | +           | <i>L. monocytogenes</i><br><i>isol Lx: L. monocytogenes</i> | Pos.         | PA                   |
| 2009  | Dairy products | 1+   | A18  | Cow cheese (Munster)           | sp                       | 10,4  | <i>L. monocytogenes</i> | Pos.         | 789              | 0,20 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 1+   | N4   | Raw milk                       | sp                       | 5,1   | <i>L. monocytogenes</i> | Pos.         | 8 398            | 2,60 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 1+   | Q15  | Raw milk                       | sp                       | 6,0   | <i>L. monocytogenes</i> | Pos.         | 5                | 0,00 | -           | /   | Abs.         | ND                   |
| 2009  | Dairy products | 1+   | Q16  | Raw milk                       | sp                       | 7,5   | <i>L. monocytogenes</i> | Pos.         | 625              | 0,21 | +           | <i>L. monocytogenes</i><br><i>isol Lx: L. monocytogenes</i> | Pos.         | PA                   |
| 2009  | Dairy products | 1+   | AG9  | Raw milk                       | sp                       | 7,8   | <i>L. monocytogenes</i> | Pos.         | 3 011            | 0,74 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 1+   | N3   | Raw milk                       | sp                       | 8,5   | <i>L. monocytogenes</i> | Pos.         | 9 935            | 3,07 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 2+   | AF2  | Goat cheese                    | sp                       | 1,4   | <i>L. monocytogenes</i> | Pos.         | 11 618           | 3,09 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 2+   | AF10 | Goat cheese                    | sp                       | 2,6   | <i>L. monocytogenes</i> | Pos.         | 709              | 0,18 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 2+   | AH14 | Goat cheese                    | sp                       | 4,6   | <i>L. monocytogenes</i> | Pos.         | 9 578            | 2,44 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 2+   | O7   | Goat cheese                    | sp                       | 4,8   | <i>L. monocytogenes</i> | Pos.         | 10 405           | 3,22 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 2+   | AG2  | Blue cheese                    | sp                       | 5,2   | <i>L. monocytogenes</i> | Pos.         | 3 429            | 0,84 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 2+   | AF7  | Goat cheese                    | sp                       | 6,3   | <i>L. monocytogenes</i> | Pos.         | 8 695            | 2,31 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |
| 2009  | Dairy products | 2+   | A14  | Bleu de Bresse                 | sp                       | 6,4   | <i>L. monocytogenes</i> | Pos.         | 12 033           | 3,07 | +           | <i>L. monocytogenes</i>                                     | Pos.         | PA                   |

| Study | Category       | Type | Code | Matrices                            | Artificial contamination |       | ISO 11290-1                               |              | VIDAS LMX method |      |             |                         |              | Comparison           |
|-------|----------------|------|------|-------------------------------------|--------------------------|-------|---|--------------|------------------|------|-------------|-------------------------|--------------|----------------------|
|       |                |      |      |                                     | Type                     | Level | CONFIRMATION                              | Final result | Detection        |      |             | Confirmation            | Final result |                      |
|       |                |      |      |                                     |                          |       | Identification                            |              | RFV              | VT   | Test result | Identification          |              |                      |
| 2009  | Dairy products | 2+   | O5   | Goat cheese                         | sp                       | 7,2   | <i>L. monocytogenes</i>                   | Pos.         | 11 570           | 3,58 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2009  | Dairy products | 2+   | AG5  | Blue cheese (bleu de Bresse)        | sp                       | 10,4  | <i>L. monocytogenes</i>                   | Pos.         | 10 609           | 2,61 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2017  | Dairy products | 2+   | 15   | Pasteurized sheep cheese            | se                       | 2,4   | <i>L. monocytogenes</i>                   | Pos.         | 10 748           | 2,73 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | V2   | Cow Organic Cheese (St Félicien)    | No                       | /     | <i>L. monocytogenes</i>                   | Pos.         | 30               | 0,00 | -           | <i>L. monocytogenes</i> | Pos.         | ND FN <sub>ait</sub> |
| 2010  | Dairy products | 3+   | X6   | Raw milk cow cheese                 | No                       | /     | <i>L. monocytogenes</i>                   | Pos.         | 10 845           | 3,00 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | T11  | Raw milk cow cheese                 | No                       | /     | <i>L. monocytogenes</i>                   | Pos.         | 10 546           | 2,91 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | U3   | Raw milk cow cheese                 | No                       | /     | <i>L. monocytogenes</i>                   | Pos.         | 10 416           | 2,88 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | X1   | Raw milk cow cheese                 | No                       | /     | <i>L. monocytogenes</i>                   | Pos.         | 10 488           | 2,90 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | X5   | Raw milk cow cheese                 | No                       | /     | <i>L. monocytogenes</i> <i>L. innocua</i> | Pos.         | 10 558           | 2,92 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | R1   | Cow cheese (Reblochon)              | No                       | /     | <i>L. monocytogenes</i>                   | Pos.         | 11 305           | 3,12 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | R10  | Ewe cheese parsley                  | No                       | /     | <i>L. monocytogenes</i>                   | Pos.         | 3 860            | 1,06 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | W3   | Ewe cheese parsley                  | No                       | /     | <i>L. monocytogenes</i>                   | Pos.         | 313              | 0,08 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | U8   | Cow cheese                          | sp                       | 0,0   | /   | Abs.         | 10 325           | 2,91 | +           | <i>L. monocytogenes</i> | Pos.         | PD                   |
| 2010  | Dairy products | 3+   | R4   | Cow cheese (Mont dor)               | sp                       | 0,1   | <i>L. monocytogenes</i>                   | Pos.         | 5                | 0,00 | -           | /                       | Abs.         | ND                   |
| 2010  | Dairy products | 3+   | U7   | Cow cheese                          | sp                       | 0,1   | <i>L. monocytogenes</i> <i>L. innocua</i> | Pos.         | 10 765           | 3,04 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | R2   | Cow cheese (Raclette)               | sp                       | 1,4   | <i>L. monocytogenes</i>                   | Pos.         | 318              | 0,10 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | X3   | Goat cheese (Sainte Maure)          | sp                       | 2,1   | <i>L. monocytogenes</i>                   | Pos.         | 2 268            | 0,73 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | X4   | Cow cheese (Brie de Meaux)          | sp                       | 3,2   | <i>L. monocytogenes</i>                   | Pos.         | 1 362            | 0,40 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | Y2   | Cow cheese (Saint Nectaire)         | sp                       | 3,2   | /   | Abs.         | 5 321            | 1,50 | +           | <i>L. monocytogenes</i> | Pos.         | PD                   |
| 2010  | Dairy products | 3+   | W7   | Cow cheese (Reblochon)              | sp                       | 3,5   | <i>L. monocytogenes</i>                   | Pos.         | 33               | 0,01 | -           | <i>L. monocytogenes</i> | Pos.         | ND FN <sub>ait</sub> |
| 2010  | Dairy products | 3+   | Y1   | Cow cheese                          | sp                       | 3,7   | <i>L. monocytogenes</i>                   | Pos.         | 10 481           | 3,14 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | T12  | Cow cheese (Camembert)              | sp                       | 5,0   | /   | Abs.         | 189              | 0,06 | +           | <i>L. monocytogenes</i> | Pos.         | PD                   |
| 2010  | Dairy products | 3+   | W5   | Cow cheese                          | sp                       | 6,6   | /   | Abs.         | 7 941            | 2,56 | +           | <i>L. monocytogenes</i> | Pos.         | PD                   |
| 2010  | Dairy products | 3+   | X8   | Goat cheese                         | sp                       | 7,0   | <i>L. monocytogenes</i>                   | Pos.         | 10 659           | 3,44 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | Y5   | Cow cheese                          | sp                       | 7,4   | <i>L. monocytogenes</i>                   | Pos.         | 2 085            | 0,62 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | X2   | Cow cheese                          | sp                       | 8,0   | <i>L. monocytogenes</i>                   | Pos.         | 10 365           | 3,34 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | W2   | Cow cheese (Raclette) with raw milk | sp                       | 8,8   | <i>L. monocytogenes</i>                   | Pos.         | 3 056            | 0,91 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | R5   | Cow cheese (Morbier)                | sp                       | 9,0   | <i>L. monocytogenes</i>                   | Pos.         | 10 484           | 3,38 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | X7   | Goat cheese                         | sp                       | 13,2  | <i>L. monocytogenes</i>                   | Pos.         | 10 237           | 3,30 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2017  | Dairy products | 3+   | 17   | Neuf châtel with raw milk           | se                       | 2,4   | <i>L. monocytogenes</i>                   | Pos.         | 10 454           | 2,66 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2017  | Dairy products | 3+   | 19   | Camembert with raw milk             | se                       | 2,4   | <i>L. monocytogenes</i>                   | Pos.         | 10 481           | 2,66 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2017  | Dairy products | 3+   | 21   | Coulommiers with raw milk           | se                       | 2,4   | <i>L. monocytogenes</i>                   | Pos.         | 10 672           | 2,71 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2017  | Dairy products | 3+   | 23   | St Nectaire with raw milk           | se                       | 2,4   | <i>L. monocytogenes</i>                   | Pos.         | 10 578           | 2,86 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |

## Dairy products : storage for 72 hours at 2-8°C

| Study | Category       | Type | Code | Matrices                         | Artificial contamination |       | ISO 11290-1                                  |              | VIDAS LMX method |      |             |  | Comparison |                      |
|-------|----------------|------|------|----------------------------------|--------------------------|-------|--|--------------|------------------|------|-------------|--|------------|----------------------|
|       |                |      |      |                                  | Type                     | Level | CONFIRMATION                                 | Final result | Detection        |      |             | Confirmation   |            | Final result         |
|       |                |      |      |                                  |                          |       | Identification                               |              | RFV              | VT   | Test result | Identification   |            |                      |
| 2009  | Dairy products | 1+   | N1   | Cow cheese (Rollot of Picardy)   | sp                       | 3,4   | <i>L. monocytogenes</i>                      | Pos.         | 181              | 0,05 | +           | <i>L. monocytogenes</i><br><i>Isol. LX: L. monocytogenes</i> | Pos.       | PA                   |
| 2009  | Dairy products | 1+   | A11  | Cow cheese (Cantal)              | sp                       | 5,2   | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2009  | Dairy products | 1+   | AH16 | Cow cheese (Maroilles)           | sp                       | 6,1   | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2009  | Dairy products | 1+   | N2   | Cow cheese (Epoisses)            | sp                       | 6,8   | <i>L. monocytogenes</i>                      | Pos.         | 11 754           | 3,64 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2009  | Dairy products | 1+   | AH15 | Cow cheese (Trou du cru)         | sp                       | 6,8   | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2009  | Dairy products | 1+   | O8   | Cow cheese (Chaource)            | sp                       | 9,6   | <i>L. monocytogenes</i>                      | Pos.         | 9 765            | 3,02 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2009  | Dairy products | 1+   | A18  | Cow cheese (Munster)             | sp                       | 10,4  | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2009  | Dairy products | 1+   | N4   | Raw milk                         | sp                       | 5,1   | <i>L. monocytogenes</i>                      | Pos.         | 10 153           | 3,14 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2009  | Dairy products | 1+   | Q15  | Raw milk                         | sp                       | 6,0   | <i>L. monocytogenes</i>                      | Pos.         | 3                | 0    | -           | /  | Neg.       | ND                   |
| 2009  | Dairy products | 1+   | Q16  | Raw milk                         | sp                       | 7,5   | <i>L. monocytogenes</i>                      | Pos.         | 9571             | 3,33 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2009  | Dairy products | 1+   | AG9  | Raw milk                         | sp                       | 7,8   | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2009  | Dairy products | 1+   | N3   | Raw milk                         | sp                       | 8,5   | <i>L. monocytogenes</i>                      | Pos.         | 9 975            | 3,08 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2009  | Dairy products | 2+   | AF2  | Goat cheese                      | sp                       | 1,4   | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2009  | Dairy products | 2+   | AF10 | Goat cheese                      | sp                       | 2,6   | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2009  | Dairy products | 2+   | AH14 | Goat cheese                      | sp                       | 4,6   | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2009  | Dairy products | 2+   | O7   | Goat cheese                      | sp                       | 4,8   | <i>L. monocytogenes</i>                      | Pos.         | 10 018           | 3,10 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2009  | Dairy products | 2+   | AG2  | Blue cheese                      | sp                       | 5,2   | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2009  | Dairy products | 2+   | AF7  | Goat cheese                      | sp                       | 6,3   | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2009  | Dairy products | 2+   | A14  | Bleu de Bresse                   | sp                       | 6,4   | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2009  | Dairy products | 2+   | O5   | Goat cheese                      | sp                       | 7,2   | <i>L. monocytogenes</i>                      | Pos.         | 11 462           | 3,54 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2009  | Dairy products | 2+   | AG5  | Blue cheese (bleu de Bresse)     | sp                       | 10,4  | <i>L. monocytogenes</i>                      | Pos.         |                  |      |             |  |            |                      |
| 2017  | Dairy products | 2+   | 15   | Pasteurized sheep cheese         | se                       | 2,4   | <i>L. monocytogenes</i>                      | Pos.         | 11 056           | 2,81 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2010  | Dairy products | 3+   | V2   | Cow Organic Cheese (St Félicien) | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 80               | 0,02 | -           | <i>L. monocytogenes</i>                                      | Neg.       | ND FN <sub>ait</sub> |
| 2010  | Dairy products | 3+   | X6   | Raw milk cow cheese              | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 10 498           | 2,90 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2010  | Dairy products | 3+   | T11  | Raw milk cow cheese              | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 10 648           | 2,94 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2010  | Dairy products | 3+   | U3   | Raw milk cow cheese              | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 10 292           | 2,84 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2010  | Dairy products | 3+   | X1   | Raw milk cow cheese              | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 10 400           | 2,87 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2010  | Dairy products | 3+   | X5   | Raw milk cow cheese              | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | Pos.         | 10 395           | 2,87 | +           | <i>L. monocytogenes</i><br><i>L. innocua</i>                 | Pos.       | PA                   |
| 2010  | Dairy products | 3+   | R1   | Cow cheese (Reblochon)           | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 11 224           | 3,10 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2010  | Dairy products | 3+   | R10  | Ewe cheese parsley               | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 11 506           | 3,18 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2010  | Dairy products | 3+   | W3   | Ewe cheese parsley               | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 3 456            | 0,97 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2010  | Dairy products | 3+   | U8   | Cow cheese                       | sp                       | 0,0   | /  | Neg.         | 11 861           | 3,34 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PD                   |
| 2010  | Dairy products | 3+   | R4   | Cow cheese (Mont dor)            | sp                       | 0,1   | <i>L. monocytogenes</i>                      | Pos.         | 7                | 0,00 | -           | /  | Neg.       | ND                   |
| 2010  | Dairy products | 3+   | U7   | Cow cheese                       | sp                       | 0,1   | <i>L. monocytogenes</i><br><i>L. innocua</i> | Pos.         | 11 235           | 3,17 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |
| 2010  | Dairy products | 3+   | R2   | Cow cheese (Raclette)            | sp                       | 1,4   | <i>L. monocytogenes</i>                      | Pos.         | 440              | 0,14 | +           | <i>L. monocytogenes</i>                                      | Pos.       | PA                   |

| Study | Category       | Type | Code | Matrices                            | Artificial contamination |       | ISO 11290-1             |              | VIDAS LMX method |      |             |                         |              | Comparison           |
|-------|----------------|------|------|-------------------------------------|--------------------------|-------|-------------------------|--------------|------------------|------|-------------|-------------------------|--------------|----------------------|
|       |                |      |      |                                     | Type                     | Level | CONFIRMATION            | Final result | Detection        |      |             | Confirmation            | Final result |                      |
|       |                |      |      |                                     |                          |       | Identification          |              | RFV              | VT   | Test result | Identification          |              |                      |
| 2010  | Dairy products | 3+   | X3   | Goat cheese (Sainte Maure)          | sp                       | 2,1   | <i>L. monocytogenes</i> | Pos.         | 2 919            | 0,94 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | X4   | Cow cheese (Brie de Meaux)          | sp                       | 3,2   | <i>L. monocytogenes</i> | Pos.         | 1 148            | 0,33 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | Y2   | Cow cheese (Saint Nectaire)         | sp                       | 3,2   | /                       | Neg.         | 6 225            | 1,75 | +           | <i>L. monocytogenes</i> | Pos.         | PD                   |
| 2010  | Dairy products | 3+   | W7   | Cow cheese (Reblochon)              | sp                       | 3,5   | <i>L. monocytogenes</i> | Pos.         | 38               | 0,01 | -           | <i>L. monocytogenes</i> | Pos.         | ND FN <sub>ait</sub> |
| 2010  | Dairy products | 3+   | Y1   | Cow cheese                          | sp                       | 3,7   | <i>L. monocytogenes</i> | Pos.         | 11 317           | 3,28 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | T12  | Cow cheese (Camembert)              | sp                       | 5,0   | /                       | Neg.         | 129              | 0,03 | -           | <i>L. monocytogenes</i> | Neg.         | PA                   |
| 2010  | Dairy products | 3+   | W5   | Cow cheese                          | sp                       | 6,6   | /                       | Neg.         | 8 900            | 2,87 | +           | <i>L. monocytogenes</i> | Pos.         | PD                   |
| 2010  | Dairy products | 3+   | X8   | Goat cheese                         | sp                       | 7,0   | <i>L. monocytogenes</i> | Pos.         | 11 538           | 3,35 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | Y5   | Cow cheese                          | sp                       | 7,4   | <i>L. monocytogenes</i> | Pos.         | 2 151            | 0,62 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | X2   | Cow cheese                          | sp                       | 8,0   | <i>L. monocytogenes</i> | Pos.         | 11 207           | 3,25 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | W2   | Cow cheese (Raclette) with raw milk | sp                       | 8,8   | <i>L. monocytogenes</i> | Pos.         | 2 948            | 0,85 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | R5   | Cow cheese (Morbier)                | sp                       | 9,0   | <i>L. monocytogenes</i> | Pos.         | 11 357           | 3,29 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2010  | Dairy products | 3+   | X7   | Goat cheese                         | sp                       | 13,2  | <i>L. monocytogenes</i> | Pos.         | 10 874           | 3,51 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2017  | Dairy products | 3+   | 17   | Neuf ch tel with raw milk           | se                       | 2,4   | <i>L. monocytogenes</i> | Pos.         | 10 146           | 2,58 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2017  | Dairy products | 3+   | 19   | Camembert with raw milk             | se                       | 2,4   | <i>L. monocytogenes</i> | Pos.         | 10 134           | 2,57 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2017  | Dairy products | 3+   | 21   | Coulommiers with raw milk           | se                       | 2,4   | <i>L. monocytogenes</i> | Pos.         | 10 654           | 2,71 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |
| 2017  | Dairy products | 3+   | 23   | St Nectaire with raw milk           | se                       | 2,4   | <i>L. monocytogenes</i> | Pos.         | 10 778           | 2,81 | +           | <i>L. monocytogenes</i> | Pos.         | PA                   |

## Seafood products

| Study | Category         | Type | Code | Matrices                     | Artificial contamination |       | ISO 11290-1       |              | VIDAS LMX method |      |             |                |              | Comparison |
|-------|------------------|------|------|------------------------------|--------------------------|-------|-------------------|--------------|------------------|------|-------------|----------------|--------------|------------|
|       |                  |      |      |                              | Type                     | Level | CONFIRMATION      | Final result | Detection        |      |             | Confirmation   | Final result |            |
|       |                  |      |      |                              |                          |       | Identification    |              | RFV              | VT   | Test result | Identification |              |            |
| 2009  | Seafood products | 1-   | D9   | shrimps                      | No                       | /     | /                 | Neg.         | 2                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 1-   | H14  | shrimps                      | No                       | /     | /                 | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 1-   | E4   | Seafood                      | No                       | /     | /                 | Neg.         | 32               | 0,01 | -           | /              | Neg.         | NA         |
| 2017  | Seafood products | 1-   | 20   | Salmon fillet                | /                        | /     | /                 | Neg.         | -2               | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Seafood products | 1-   | 22   | Hake fillet                  | /                        | /     | /                 | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Seafood products | 1-   | 24   | Tuna fillet                  | /                        | /     | /                 | Neg.         | 1                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Seafood products | 1-   | 26   | Cod fillet                   | /                        | /     | /                 | Neg.         | 1                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Seafood products | 1-   | 28   | Trout fillet                 | /                        | /     | /                 | Neg.         | 2                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Seafood products | 1-   | 30   | Haddock fillet               | /                        | /     | /                 | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Seafood products | 1-   | 32   | Monlfish fillet              | /                        | /     | /                 | Neg.         | 0                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | E2   | Pieces of smoked salmon      | No                       | /     | /                 | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | E14  | Smoked Atlantic Salmon       | No                       | /     | /                 | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | E16  | Pieces of smoked salmon      | No                       | /     | /                 | Neg.         | 6                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | E17  | Smoked Atlantic Salmon       | No                       | /     | /                 | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | F3   | Pieces of smoked salmon      | No                       | /     | /                 | Neg.         | 6                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | F14  | smoked haddock               | No                       | /     | /                 | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | G5   | Smoked salmon Scotland       | No                       | /     | /                 | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | G6   | Smoked trout                 | No                       | /     | /                 | Neg.         | 8                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | G8   | Mini slices of smoked salmon | No                       | /     | /                 | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | G12  | Smoked Halibut               | No                       | /     | /                 | Neg.         | 7                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | I6   | Trout smoked calvados-basil  | No                       | /     | <i>L. innocua</i> | Neg.         | 6                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | I7   | Trout smoked in beech wood   | No                       | /     | <i>L. innocua</i> | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | J6   | Pickled smoked herring       | No                       | /     | /                 | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | J8   | Smoked salmon Norway         | No                       | /     | /                 | Neg.         | 2                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | J9   | Pieces of smoked salmon      | No                       | /     | /                 | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | J10  | Smoked salmon Norway         | No                       | /     | /                 | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | L13  | Smoked Salmon Atlantic       | No                       | /     | /                 | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | L14  | Tartar Smoked salmon         | No                       | /     | <i>L. innocua</i> | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | L15  | Herring fillets              | No                       | /     | /                 | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 2-   | L16  | Smoked salmon Norway         | No                       | /     | /                 | Neg.         | 6                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Seafood products | 3-   | F10  | Fish Paupiettes              | No                       | /     | /                 | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |

| Study | Category         | Type | Code | Matrices                      | Artificial contamination |       | ISO 11290-1                        |              | VIDAS LMX method |      |             |                                  |              | Comparison |
|-------|------------------|------|------|-------------------------------|--------------------------|-------|------------------------------------|--------------|------------------|------|-------------|----------------------------------|--------------|------------|
|       |                  |      |      |                               | Type                     | Level | CONFIRMATION                       | Final result | Detection        |      |             | Confirmation                     | Final result |            |
|       |                  |      |      |                               |                          |       | Identification                     |              | RFV              | VT   | Test result | Identification                   |              |            |
| 2009  | Seafood products | 3-   | C6   | Frozen cooked mussels         | No                       | /     | /                                  | Neg.         | 5                | 0,00 | -           | /                                | Neg.         | NA         |
| 2009  | Seafood products | 3-   | E6   | Basket of Scallops            | No                       | /     | /                                  | Neg.         | 3                | 0,00 | -           | /                                | Neg.         | NA         |
| 2009  | Seafood products | 3-   | F1   | Salmon Paupiettes             | No                       | /     | /                                  | Neg.         | 5                | 0,00 | -           | /                                | Neg.         | NA         |
| 2009  | Seafood products | 3-   | F2   | Salmon Paupiettes             | No                       | /     | /                                  | Neg.         | 6                | 0,00 | -           | /                                | Neg.         | NA         |
| 2009  | Seafood products | 3-   | F15  | Salad Crab                    | No                       | /     | /                                  | Neg.         | 4                | 0,00 | -           | /                                | Neg.         | NA         |
| 2009  | Seafood products | 3-   | F16  | Salad Crab                    | No                       | /     | /                                  | Neg.         | 3                | 0,00 | -           | /                                | Neg.         | NA         |
| 2017  | Seafood products | 3-   | 34   | Tarama with cod eggs          | /                        | /     | /                                  | Neg.         | -2               | 0,00 | -           | /                                | Neg.         | NA         |
| 2017  | Seafood products | 3-   | 36   | Surimi                        | /                        | /     | /                                  | Neg.         | 1                | 0,00 | -           | /                                | Neg.         | NA         |
| 2017  | Seafood products | 3-   | 52   | Salmon rilette                | /                        | /     | /                                  | Neg.         | 3                | 0,00 | -           | /                                | Neg.         | NA         |
| 2009  | Seafood products | 1+   | A7   | Fish trio                     | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 2                | 0,00 | -           | /                                | Neg.         | ND         |
| 2009  | Seafood products | 1+   | A17  | Pangasus fillets              | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 10 421           | 3,33 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 1+   | B9   | Fish Duo                      | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 10 009           | 3,19 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 1+   | B10  | Seafood                       | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 10 533           | 3,36 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 1+   | C1   | shrimps                       | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 614              | 0,19 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 1+   | C12  | shrimps                       | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 5 011            | 1,60 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 1+   | G9   | Saithe fillet                 | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 11 467           | 3,58 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 1+   | H8   | Pangasus fillets              | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 10 135           | 3,13 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 1+   | H9   | Pangasus fillets              | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 10 193           | 3,14 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 1+   | H10  | Fillets of whiting            | No                       | /     | <i>L. monocytogenes L. innocua</i> | Pos.         | 10 313           | 3,18 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 1+   | H11  | shrimps                       | No                       | /     | <i>L. monocytogenes L. innocua</i> | Pos.         | 10 605           | 3,27 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 1+   | H12  | shrimps                       | No                       | /     | <i>L. monocytogenes L. innocua</i> | Pos.         | 10 536           | 3,25 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 1+   | H13  | shrimps                       | No                       | /     | <i>L. monocytogenes L. innocua</i> | Pos.         | 9 746            | 3,00 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 2+   | J7   | Smoked eels                   | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 7                | 0,00 | -           | /                                | Neg.         | ND         |
| 2009  | Seafood products | 2+   | A19  | Mini slices of smoked trout   | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 10 643           | 3,40 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 2+   | G11  | Smoked Salmon Atlantic        | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 11 143           | 3,48 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 2+   | I5   | Smoked Atlantic Salmon        | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 11 440           | 3,53 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 2+   | I8   | Smoked Salmon Atlantic        | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 6 738            | 2,08 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 2+   | AB2  | Organic SmokedSalmon          | No                       | /     | <i>L.monocytogenes</i>             | Pos.         | 10 385           | 2,59 | +           | <i>L.monocytogenes</i>           | Pos.         | PA         |
| 2009  | Seafood products | 2+   | AB6  | kippers                       | No                       | /     | <i>L.monocytogenes L.innocua</i>   | Pos.         | 10 217           | 2,55 | +           | <i>L.monocytogenes L.innocua</i> | Pos.         | PA         |
| 2009  | Seafood products | 2+   | AF21 | Smoked salmon                 | No                       | /     | <i>L.monocytogenes</i>             | Pos.         | 9 787            | 2,60 | +           | <i>L.monocytogenes</i>           | Pos.         | PA         |
| 2017  | Seafood products | 2+   | 23   | Smoked salmon                 | se                       | 2,2   | <i>L. monocytogenes</i>            | Pos.         | 10 539           | 2,68 | +           | <i>L.monocytogenes</i>           | Pos.         | PA         |
| 2017  | Seafood products | 2+   | 25   | Smoked trout                  | se                       | 2,2   | <i>L. monocytogenes</i>            | Pos.         | 10 629           | 2,70 | +           | <i>L.monocytogenes</i>           | Pos.         | PA         |
| 2009  | Seafood products | 3+   | F8   | Smoked salmon roll and celery | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 11 136           | 3,48 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 3+   | E15  | Breaded fish                  | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 11 306           | 3,53 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |
| 2009  | Seafood products | 3+   | G4   | Fish marinated in basil       | No                       | /     | <i>L. monocytogenes</i>            | Pos.         | 494              | 0,15 | +           | <i>L. monocytogenes</i>          | Pos.         | PA         |

| Study | Category         | Type | Code | Matrices             | Artificial contamination |       | ISO 11290-1                               |              | VIDAS LMX method |      |             |                         |              | Comparison |
|-------|------------------|------|------|----------------------|--------------------------|-------|---|--------------|------------------|------|-------------|-------------------------|--------------|------------|
|       |                  |      |      |                      | Type                     | Level | CONFIRMATION                              | Final result | Detection        |      |             | Confirmation            | Final result |            |
|       |                  |      |      |                      |                          |       | Identification                            |              | RFV              | VT   | Test result | Identification          |              |            |
| 2009  | Seafood products | 3+   | H6   | Cuttlefish rust      | No                       | /     | <i>L. monocytogenes</i> <i>L. innocua</i> | Pos.         | 10 122           | 3,12 | +           | <i>L. monocytogenes</i> | Pos.         | PA         |
| 2009  | Seafood products | 3+   | H7   | Cuttlefish rust      | No                       | /     | <i>L. monocytogenes</i> <i>L. innocua</i> | Pos.         | 10 038           | 3,10 | +           | <i>L. monocytogenes</i> | Pos.         | PA         |
| 2017  | Seafood products | 3+   | 27   | Tarama with cod eggs | se                       | 2,2   | <i>L. monocytogenes</i>                   | Pos.         | 7 888            | 2,00 | +           | <i>L. monocytogenes</i> | Pos.         | PA         |
| 2017  | Seafood products | 3+   | 29   | Surimi               | se                       | 2,2   | <i>L. monocytogenes</i>                   | Pos.         | 10 605           | 2,69 | +           | <i>L. monocytogenes</i> | Pos.         | PA         |
| 2017  | Seafood products | 3+   | 31   | Atum rilette         | se                       | 1,8   | <i>L. monocytogenes</i>                   | Pos.         | 3 051            | 0,77 | +           | <i>L. monocytogenes</i> | Pos.         | PA         |
| 2017  | Seafood products | 3+   | 33   | Salmon rilette       | se                       | 1,8   | <i>L. monocytogenes</i>                   | Pos.         | 10 516           | 2,67 | +           | <i>L. monocytogenes</i> | Pos.         | PA         |
| 2017  | Seafood products | 3+   | 35   | Sardine rilette      | se                       | 1,8   | <i>L. monocytogenes</i>                   | Pos.         | 10 658           | 2,71 | +           | <i>L. monocytogenes</i> | Pos.         | PA         |

## Seafood products : storage for 72 hours at 2-8°C

| Study | Category         | Type | Code | Matrices                      | Artificial contamination |       | ISO 11290-1                                  |              | VIDAS LMX method |      |             |                         | Comparison |              |
|-------|------------------|------|------|-------------------------------|--------------------------|-------|--|--------------|------------------|------|-------------|-------------------------|------------|--------------|
|       |                  |      |      |                               | Type                     | Level | CONFIRMATION                                 | Final result | Detection        |      |             | Confirmation            |            | Final result |
|       |                  |      |      |                               |                          |       | Identification                               |              | RFV              | VT   | Test result | Identification          |            |              |
| 2009  | Seafood products | 1+   | A7   | Fish trio                     | No                       | /     | <i>L. monocytogenes</i>                      | +            | 4                | 0,00 | -           | /                       | Neg.       | ND           |
| 2009  | Seafood products | 1+   | A17  | Pangasus fillets              | No                       | /     | <i>L. monocytogenes</i>                      | +            | 10 356           | 3,31 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 1+   | B9   | Fish Duo                      | No                       | /     | <i>L. monocytogenes</i>                      | +            | 9 976            | 3,18 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 1+   | B10  | Seafood                       | No                       | /     | <i>L. monocytogenes</i>                      | +            | 11 577           | 3,70 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 1+   | C1   | shrimps                       | No                       | /     | <i>L. monocytogenes</i>                      | +            | 10 874           | 3,47 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 1+   | C12  | shrimps                       | No                       | /     | <i>L. monocytogenes</i>                      | +            | 99               | 0,03 | -           |                         | Neg.       | ND           |
| 2009  | Seafood products | 1+   | G9   | Saithe fillet                 | No                       | /     | <i>L. monocytogenes</i>                      | +            | 11 988           | 3,93 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 1+   | H8   | Pangasus fillets              | No                       | /     | <i>L. monocytogenes</i>                      | +            | 10 518           | 3,24 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 1+   | H9   | Pangasus fillets              | No                       | /     | <i>L. monocytogenes</i>                      | +            | 10 644           | 3,28 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 1+   | H10  | Fillets of whiting            | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | +            | 10 603           | 3,27 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 1+   | H11  | shrimps                       | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | +            | 11 702           | 3,61 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 1+   | H12  | shrimps                       | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | +            | 9 103            | 2,81 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 1+   | H13  | shrimps                       | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | +            | 9 264            | 2,86 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 2+   | J7   | Smoked eels                   | No                       | /     | <i>L. monocytogenes</i>                      | +            | 5                | 0,00 | -           | /                       | Neg.       | ND           |
| 2009  | Seafood products | 2+   | A19  | Mini slices of smoked trout   | No                       | /     | <i>L. monocytogenes</i>                      | +            | 10 509           | 3,35 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 2+   | G11  | Smoked Salmon Atlantic        | No                       | /     | <i>L. monocytogenes</i>                      | +            | 11 365           | 3,73 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 2+   | I5   | Smoked Atlantic Salmon        | No                       | /     | <i>L. monocytogenes</i>                      | +            | 11 411           | 3,52 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 2+   | I8   | Smoked Salmon Atlantic        | No                       | /     | <i>L. monocytogenes</i>                      | +            | 11 623           | 3,58 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 2+   | AB2  | Organic Smoked Salmon         | No                       | /     | <i>L. monocytogenes</i>                      | +            |                  |      |             |                         |            |              |
| 2009  | Seafood products | 2+   | AB6  | kippers                       | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | +            |                  |      |             |                         |            |              |
| 2009  | Seafood products | 2+   | AF21 | Smoked salmon                 | No                       | /     | <i>L. monocytogenes</i>                      | +            |                  |      |             |                         |            |              |
| 2017  | Seafood products | 2+   | 23   | Smoked salmon                 | se                       | 2,2   | <i>L. monocytogenes</i>                      | +            | 10 338           | 2,63 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Seafood products | 2+   | 25   | Smoked trout                  | se                       | 2,2   | <i>L. monocytogenes</i>                      | +            | 10 276           | 2,61 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 3+   | F8   | Smoked salmon roll and celery | No                       | /     | <i>L. monocytogenes</i>                      | +            | 10 295           | 3,21 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 3+   | E15  | Breaded fish                  | No                       | /     | <i>L. monocytogenes</i>                      | +            | 10 202           | 3,19 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 3+   | G4   | Fish marinated in basil       | No                       | /     | <i>L. monocytogenes</i>                      | +            | 4 785            | 1,57 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 3+   | H6   | Cuttlefish rust               | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | +            | 10 903           | 3,36 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Seafood products | 3+   | H7   | Cuttlefish rust               | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | +            | 10 368           | 3,20 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Seafood products | 3+   | 27   | Tarama with cod eggs          | se                       | 2,2   | <i>L. monocytogenes</i>                      | +            | 10 138           | 2,57 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Seafood products | 3+   | 29   | Surimi                        | se                       | 2,2   | <i>L. monocytogenes</i>                      | +            | 8 218            | 2,09 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Seafood products | 3+   | 31   | Atum rilette                  | se                       | 1,8   | <i>L. monocytogenes</i>                      | +            | 10 333           | 2,62 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Seafood products | 3+   | 33   | Salmon rilette                | se                       | 1,8   | <i>L. monocytogenes</i>                      | +            | 10 558           | 2,68 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Seafood products | 3+   | 35   | Sardine rilette               | se                       | 1,8   | <i>L. monocytogenes</i>                      | +            | 10 715           | 2,72 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |

## Vegetal products

| Study | Category         | Type | Code | Matrices                         | Artificial contamination |       | ISO 11290-1                                  |              | VIDAS LMX method |      |             |                         | Comparison |              |
|-------|------------------|------|------|----------------------------------|--------------------------|-------|--|--------------|------------------|------|-------------|-------------------------|------------|--------------|
|       |                  |      |      |                                  | Type                     | Level | CONFIRMATION                                 | Final result | Detection        |      |             | Confirmation            |            | Final result |
|       |                  |      |      |                                  |                          |       | Identification                               |              | RFV              | VT   | Test result | Identification          |            |              |
| 2009  | Vegetal products | 1-   | E1   | Potatoes                         | No                       | /     | /  | Neg.         | 3                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1-   | I10  | Frozen spinach branch            | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1-   | J12  | Frozen Broccoli                  | No                       | /     | /  | Neg.         | 6                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1-   | K8   | Frozen peas                      | No                       | /     | <i>L. innocua</i>                            | Neg.         | 8                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1-   | O14  | Potatoes                         | No                       | /     | /  | Neg.         | 3                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1-   | G13  | leeks                            | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1-   | J13  | Fresh green beans                | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1-   | K3   | Vacuum raw courgettes            | No                       | /     | /  | Neg.         | 5                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1-   | M3   | Green beans                      | sp                       | 0,3   | /  | Neg.         | 5                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1-   | I1   | courgettes                       | sp                       | 1,7   | /  | Neg.         | 5                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1-   | J14  | Frozen sliced onions             | sp                       | 3,4   | /  | Neg.         | 7                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1-   | J18  | Carrots, uncooked                | sp                       | 20,4  | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | A3   | Browned potatoes                 | No                       | /     | /  | Neg.         | 3                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | E13  | Frozen fries                     | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | F18  | Frozen fries                     | No                       | /     | /  | Neg.         | 6                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | J11  | Browned frozen potatoes          | No                       | /     | /  | Neg.         | 6                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | K4   | Frozen fries                     | No                       | /     | /  | Neg.         | 5                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | K10  | Frozen fries                     | No                       | /     | /  | Neg.         | 6                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | B15  | Grated carrots                   | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | L8   | Mixed salad                      | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | M2   | maches                           | sp                       | 0,6   | /  | Neg.         | 6                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | M1   | Mixed salad                      | sp                       | 0,7   | /  | Neg.         | 11               | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | I4   | Carrots                          | sp                       | 1,7   | /  | Neg.         | 3                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | L4   | Grated carrots                   | sp                       | 4,9   | /  | Neg.         | 5                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 2-   | J16  | Carrots                          | sp                       | 27,2  | /  | Neg.         | 5                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 3-   | F11  | Rice and vegetables from the sun | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 3-   | F17  | Vegetable gardener               | No                       | /     | /  | Neg.         | 11               | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 3-   | A5   | Rice 3 Colors and Veggie Mash    | No                       | /     | <i>L. innocua</i>                            | Neg.         | 3                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 3-   | B4   | Chickpea Salad                   | No                       | /     | /  | Neg.         | 6                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 3-   | E7   | Grated carrots                   | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 3-   | E8   | Red beets                        | No                       | /     | /  | Neg.         | 5                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 3-   | L6   | Pates 2 colors                   | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 3-   | L7   | Wild Rice and Sun Vegetables     | No                       | /     | /  | Neg.         | 3                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 3-   | M4   | Red cabbage vinaigrette          | sp                       | 0,4   | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 3-   | I3   | Carrot puree                     | sp                       | 2,1   | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 3-   | I2   | Vegetable gardener               | sp                       | 2,5   | /  | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Vegetal products | 1+   | K9   | Frozen chopped spinach           | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | Pos.         | 10 502           | 3,24 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 1+   | O16  | Frozen chopped spinach           | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | Pos.         | 11 725           | 3,63 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |

| Study | Category         | Type | Code | Matrices                       | Artificial contamination |       | ISO 11290-1             |              | VIDAS LMX method |      |             |                         | Comparison |              |
|-------|------------------|------|------|--------------------------------|--------------------------|-------|-------------------------|--------------|------------------|------|-------------|-------------------------|------------|--------------|
|       |                  |      |      |                                | Type                     | Level | CONFIRMATION            | Final result | Detection        |      |             | Confirmation            |            | Final result |
|       |                  |      |      |                                |                          |       | Identification          |              | RFV              | VT   | Test result | Identification          |            |              |
| 2009  | Vegetal products | 1+   | M5   | Raw cutted carrots             | No                       | /     | /                       | Neg.         | 6 425            | 1,98 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 1+   | J15  | Mix 3 peppers under vacuum     | sp                       | 4,3   | /                       | Neg.         | 10 873           | 3,35 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 1+   | J19  | Fresh green beans under vacuum | sp                       | 6,8   | <i>L. monocytogenes</i> | Pos.         | 10 958           | 3,38 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 1+   | J17  | Raw courgettes under vacuum    | sp                       | 13,6  | <i>L. monocytogenes</i> | Pos.         | 9 150            | 2,82 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 1+   | 39   | Banana                         | se                       | 2,2   | <i>L. monocytogenes</i> | Pos.         | 10 660           | 2,71 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 1+   | 41   | Grape                          | se                       | 2,2   | <i>L. monocytogenes</i> | Pos.         | 10 715           | 2,72 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 1+   | 43   | Tomato                         | se                       | 2,2   | <i>L. monocytogenes</i> | Pos.         | 10 832           | 2,75 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 1+   | 45   | Plums red                      | se                       | 2,2   | <i>L. monocytogenes</i> | Pos.         | 10 699           | 2,72 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | D1   | Frozen fries                   | No                       | /     | <i>L. grayi</i>         | Neg.         | 10 207           | 3,26 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 2+   | I9   | Frozen fries                   | No                       | /     | /                       | Neg.         | 10 922           | 3,37 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 2+   | K5   | Traditional Frozen fries       | No                       | /     | /                       | Neg.         | 1 034            | 0,31 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 2+   | O15  | Frozen fries                   | No                       | /     | <i>L. seeligeri</i>     | Neg.         | 10 858           | 3,36 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 2+   | A1   | Frozen fries                   | No                       | /     | <i>L. monocytogenes</i> | Pos.         | 10 848           | 3,46 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | A2   | Frozen traditional fries       | No                       | /     | <i>L. monocytogenes</i> | Pos.         | 1 397            | 0,44 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | C18  | Frozen fries                   | No                       | /     | <i>L. monocytogenes</i> | Pos.         | 10 933           | 3,49 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | O2   | Spring vegetable poppy         | sp                       | 4,8   | <i>L. monocytogenes</i> | Pos.         | 9 965            | 3,08 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | O4   | Salad (Oak leaves)             | sp                       | 8,0   | <i>L. monocytogenes</i> | Pos.         | 10 483           | 3,24 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | O3   | Iceberg lettuce                | sp                       | 9,6   | <i>L. monocytogenes</i> | Pos.         | 10 188           | 3,15 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | N6   | Mixture raw vegetables         | sp                       | 13,2  | <i>L. monocytogenes</i> | Pos.         | 11 860           | 3,67 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | A6   | Saffron Rice and Vegetables    | No                       | /     | <i>L. monocytogenes</i> | Pos.         | 4                | 0,00 | -           | /                       | Neg.       | ND           |
| 2009  | Vegetal products | 3+   | L3   | Green Beans with Garlic        | sp                       | 1,9   | <i>L. monocytogenes</i> | Pos.         | 11 852           | 3,70 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | L2   | Couscous vegetables            | sp                       | 3,9   | <i>L. monocytogenes</i> | Pos.         | 11 459           | 3,57 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | J20  | Carrots and cabbage            | sp                       | 5,1   | <i>L. monocytogenes</i> | Pos.         | 11 353           | 3,56 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | O1   | Carrots + celery               | sp                       | 6,4   | <i>L. monocytogenes</i> | Pos.         | 11 214           | 3,47 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | N5   | Cucumber vinaigrette           | sp                       | 8,8   | <i>L. monocytogenes</i> | Pos.         | 2 381            | 0,73 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | J21  | Cucumber vinaigrette           | sp                       | 17,0  | /                       | Neg.         | 787              | 0,24 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2017  | Vegetal products | 3+   | 47   | Mixed vegetables               | se                       | 2,4   | <i>L. monocytogenes</i> | Pos.         | 10 749           | 2,73 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 3+   | 49   | Peas                           | se                       | 2,4   | <i>L. monocytogenes</i> | Pos.         | 10 532           | 2,67 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 3+   | 51   | White beans                    | se                       | 2,4   | <i>L. monocytogenes</i> | Pos.         | 10 578           | 2,69 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |

## Vegetal products : storage for 72 hours at 2-8°C

| Study | Category         | Type | Code | Matrices                       | Artificial contamination |       | ISO 11290-1                                  |              | VIDAS LMX method |      |             |                         | Comparison |              |
|-------|------------------|------|------|--------------------------------|--------------------------|-------|--|--------------|------------------|------|-------------|-------------------------|------------|--------------|
|       |                  |      |      |                                | Type                     | Level | CONFIRMATION                                 | Final result | Detection        |      |             | Confirmation            |            | Final result |
|       |                  |      |      |                                |                          |       | Identification                               |              | RFV              | VT   | Test result | Identification          |            |              |
| 2009  | Vegetal products | 1+   | K9   | Frozen chopped spinach         | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | Pos.         | 9 858            | 3,07 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 1+   | O16  | Frozen chopped spinach         | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | Pos.         | 11 190           | 3,46 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 1+   | M5   | Raw cutted carrots             | No                       | /     | /  | Neg.         | 10 080           | 3,12 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 1+   | J15  | Mix 3 peppers under vacuum     | sp                       | 4,3   | /  | Neg.         | 10 402           | 3,21 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 1+   | J19  | Fresh green beans under vacuum | sp                       | 6,8   | <i>L. monocytogenes</i>                      | Pos.         | 10 251           | 3,16 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 1+   | J17  | Raw courgettes under vacuum    | sp                       | 13,6  | <i>L. monocytogenes</i>                      | Pos.         | 10 773           | 3,32 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 1+   | 39   | Banana                         | se                       | 2,2   | <i>L. monocytogenes</i>                      | Pos.         | 9 594            | 2,44 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 1+   | 41   | Grape                          | se                       | 2,2   | <i>L. monocytogenes</i>                      | Pos.         | 10 144           | 2,58 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 1+   | 43   | Tomato                         | se                       | 2,2   | <i>L. monocytogenes</i>                      | Pos.         | 10 638           | 2,70 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 1+   | 45   | Plums red                      | se                       | 2,2   | <i>L. monocytogenes</i>                      | Pos.         | 10 159           | 2,58 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | D1   | Frozen fries                   | No                       | /     | <i>L. grayi</i>                              | Neg.         | 10 482           | 3,27 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 2+   | I9   | Frozen fries                   | No                       | /     | /  | Neg.         | 8 866            | 2,73 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 2+   | K5   | Traditional Frozen fries       | No                       | /     | /  | Neg.         | 10 787           | 3,36 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 2+   | O15  | Frozen fries                   | No                       | /     | <i>L. seeligeri</i>                          | Neg.         | 9 794            | 3,03 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Vegetal products | 2+   | A1   | Frozen fries                   | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 10 178           | 3,25 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | A2   | Frozen traditional fries       | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 11 703           | 3,74 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | C18  | Frozen fries                   | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 11 213           | 3,58 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | O2   | Spring vegetable poppy         | sp                       | 4,8   | <i>L. monocytogenes</i>                      | Pos.         | 10291            | 3,18 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | O4   | Salad (Oak leaves)             | sp                       | 8,0   | <i>L. monocytogenes</i>                      | Pos.         | 10685            | 3,3  | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | O3   | Iceberg lettuce                | sp                       | 9,6   | <i>L. monocytogenes</i>                      | Pos.         | 10612            | 3,28 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 2+   | N6   | Mixture raw vegetables         | sp                       | 13,2  | <i>L. monocytogenes</i>                      | Pos.         | 10 125           | 3,13 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | A6   | Saffron Rice and Vegetables    | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 4                | 0,00 | -           | /                       | Neg.       | ND           |
| 2009  | Vegetal products | 3+   | L3   | Green Beans with Garlic        | sp                       | 1,9   | <i>L. monocytogenes</i>                      | Pos.         | 10 169           | 3,17 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | L2   | Couscous vegetables            | sp                       | 3,9   | <i>L. monocytogenes</i>                      | Pos.         | 10 016           | 3,12 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | J20  | Carrots and cabbage            | sp                       | 5,1   | <i>L. monocytogenes</i>                      | Pos.         | 10 281           | 3,17 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | O1   | Carrots + celery               | sp                       | 6,4   | <i>L. monocytogenes</i>                      | Pos.         | 10526            | 3,25 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | N5   | Cucumber vinaigrette           | sp                       | 8,8   | <i>L. monocytogenes</i>                      | Pos.         | 10099            | 3,12 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Vegetal products | 3+   | J21  | Cucumber vinaigrette           | sp                       | 17,0  | /  | Neg.         | 10 010           | 3,09 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2017  | Vegetal products | 3+   | 47   | Mixed vegetables               | se                       | 2,4   | <i>L. monocytogenes</i>                      | Pos.         | 10 650           | 2,70 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 3+   | 49   | Peas                           | se                       | 2,4   | <i>L. monocytogenes</i>                      | Pos.         | 10 601           | 2,69 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Vegetal products | 3+   | 51   | White beans                    | se                       | 2,4   | <i>L. monocytogenes</i>                      | Pos.         | 10 619           | 2,70 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |

## Composite foods

| Study | Category       | Type | Code  | Matrices                          | Artificial contamination |       | ISO 11290-1          |              | VIDAS LMX method |      |             |                |              | Comparison |
|-------|----------------|------|-------|-----------------------------------|--------------------------|-------|----------------------|--------------|------------------|------|-------------|----------------|--------------|------------|
|       |                |      |       |                                   | Type                     | Level | CONFIRMATION         | Final result | Detection        |      |             | Confirmation   | Final result |            |
|       |                |      |       |                                   |                          |       | Identification       |              | RFV              | VT   | Test result | Identification |              |            |
| 2009  | Composite food | 1-   | A12   | Chicken tabouleh                  | No                       | /     | /                    | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 1-   | D7    | Sandwich kebab                    | No                       | /     | /                    | Neg.         | 9                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 1-   | D8    | Provençal chicken sandwich        | No                       | /     | /                    | Neg.         | 6                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 1-   | E3    | Spicy pita salad                  | No                       | /     | /                    | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 1-   | G3    | Smoked salmon, salad, mozzarella  | No                       | /     | /                    | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 1-   | G2    | Shrimp Pasta Salad                | No                       | /     | /                    | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | VC 6  | Pig snout with vinaigrette        | se                       | 3.6   | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | VC 37 | Sandwich with ham and butter      | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | VC 45 | Mixed vegetables (macédoine)      | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | VC 46 | Semolina salad with vegetables    | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | VC 40 | Tuna rilette                      | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | VC 43 | Grated carrots                    | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | VC 38 | Sandwich with Coppa and Emmental  | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | VC 47 | Beef panini cheese flavored       | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | 38    | Taboulet with chicken             | No                       | /     | /                    | Neg.         | 0                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | 40    | strabourgeoise salad              | No                       | /     | /                    | Neg.         | 0                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | 42    | Piémontaise with ham              | No                       | /     | /                    | Neg.         | 2                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 1-   | 44    | Sandwich with salmon and chives   | No                       | /     | /                    | Neg.         | 0                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 2-   | F6    | Small Vegetables Stuffed          | No                       | /     | <i>L. innocua</i>    | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 2-   | G10   | Stuffed zucchini                  | No                       | /     | /                    | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 2-   | C21   | Pizza goat bacon                  | No                       | /     | <i>L. welshimeri</i> | Neg.         | 80               | 0,02 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 2-   | C11   | Smoked fish                       | No                       | /     | /                    | Neg.         | 5                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 2-   | F12   | Salmon pizza                      | No                       | /     | /                    | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 2-   | G7    | Salmon pizza                      | No                       | /     | /                    | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 2-   | A9    | Penne and its little vegetables   | No                       | /     | /                    | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 2-   | C3    | Penne tomato basil and broccoli   | No                       | /     | /                    | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 2-   | F13   | Pizza with Goat cheese            | No                       | /     | /                    | Neg.         | 4                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 2-   | VC 30 | Pie with spinach and goat cheese  | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 2-   | VC 36 | Fusilli carbonara                 | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 2-   | VC 44 | Pie with tomatoes and goat cheese | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 2-   | VC 3  | Pizza: ham, cheese and mushrooms  | se                       | 2.2   | /                    | Neg.         | /                | 0,03 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 2-   | VC 29 | Cannelloni bolognese              | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 2-   | VC 63 | Tortilla potatoes, eggs, bacon    | No                       | /     | /                    | Neg.         | /                | 0,00 | -           | /              | Neg.         | NA         |
| 2017  | Composite food | 2-   | 48    | Pizza with ham and cheese         | No                       | /     | /                    | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 3-   | B14   | Pineapple cake                    | No                       | /     | /                    | Neg.         | 3                | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 3-   | C22   | Merveilleux                       | No                       | /     | /                    | Neg.         | 12               | 0,00 | -           | /              | Neg.         | NA         |
| 2009  | Composite food | 3-   | Q3    | Tropézienne pie                   | No                       | /     | /                    | Neg.         | 7                | 0,00 | -           | /              | Neg.         | NA         |

| Study | Category       | Type | Code  | Matrices  | Artificial contamination |       | ISO 11290-1             |              | VIDAS LMX method |      |             |                         | Comparison |              |
|-------|----------------|------|-------|---|--------------------------|-------|-------------------------|--------------|------------------|------|-------------|-------------------------|------------|--------------|
|       |                |      |       |   | Type                     | Level | CONFIRMATION            | Final result | Detection        |      |             | Confirmation            |            | Final result |
|       |                |      |       |   |                          |       | Identification          |              | RFV              | VT   | Test result | Identification          |            |              |
| 2009  | Composite food | 3-   | Q4    | Cup duo profiteroles                              | No                       | /     | /                       | Neg.         | 4                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Composite food | 3-   | Q5    | Versillais  | No                       | /     | /                       | Neg.         | 7                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Composite food | 3-   | AB4   | Chocolate mousse cake                             | No                       | /     | /                       | Neg.         | 0                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Composite food | 3-   | AB13  | Strawberry tart                                   | No                       | /     | /                       | Neg.         | 1                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Composite food | 3-   | AE2   | Tart with custard                                 | No                       | /     | /                       | Neg.         | 2                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Composite food | 3-   | AF27  | Raspberry pie                                     | No                       | /     | /                       | Neg.         | 3                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Composite food | 3-   | AF29  | Chocolate cake                                    | No                       | /     | /                       | Neg.         | 9                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Composite food | 3-   | AG20  | Saint Honoré                                      | No                       | /     | /                       | Neg.         | 5                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 31 | Frut salad  | No                       | /     | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 32 | Custard tart                                      | No                       | /     | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 33 | Strawberry pie                                    | No                       | /     | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 34 | Paris Brest                                       | No                       | /     | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 35 | Bread with custard                                | No                       | /     | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 41 | Tresse provencale                                 | No                       | /     | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 42 | Pancake   | No                       | /     | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 48 | Eclair au café                                    | No                       | /     | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 49 | Cream doughnut                                    | se                       | 1,2   | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 50 | Patte d'ours                                      | se                       | 1,2   | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 51 | Apple pie 2                                       | se                       | 1,2   | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 56 | Lemon tourt                                       | se                       | 1.4   | /                       | Neg.         | /                | 0,02 | -           | /                       | Neg.       | NA           |
| 2017  | Composite food | 3-   | VC 60 | Vermicelli with beef, rice, vegetables            | se                       | 1.4   | /                       | Neg.         | /                | 0,00 | -           | /                       | Neg.       | NA           |
| 2009  | Composite food | 1+   | F7    | Smoked salmon, soft cheese, dill                  | No                       | /     | <i>L. welshimeri</i>    | Neg.         | 10 287           | 3,21 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Composite food | 1+   | A10   | Shrimp Pasta Salad                                | No                       | /     | <i>L. monocytogenes</i> | Pos.         | 942              | 0,30 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | VC 1  | Salad with pasta, tuna and vegetables             | se                       | 2.8   | /                       | Neg.         | /                | 2.45 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2017  | Composite food | 1+   | VC 27 | Sandwich with meat, tomato                        | se                       | 2.6   | /                       | Neg.         | /                | 0.16 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2017  | Composite food | 1+   | VC 2  | Sandwich with salmon                              | se                       | 2.8   | <i>L. monocytogenes</i> | Pos.         | /                | 2.67 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | VC 7  | Salad of semolina with vegetables and chicken     | se                       | 3.6   | <i>L. monocytogenes</i> | Pos.         | /                | 3.28 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | VC 20 | Piemontoise salad                                 | se                       | 2.4   | <i>L. monocytogenes</i> | Pos.         | /                | 2.20 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | VC 21 | Tabbouleh with chicken and chive                  | se                       | 1.6   | <i>L. monocytogenes</i> | Pos.         | /                | 3.21 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | VC 23 | Sandwich with emmental                            | se                       | 1.6   | <i>L. monocytogenes</i> | Pos.         | /                | 3.23 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | VC 24 | Sandwich with chicken and mayonnaise              | se                       | 1.6   | <i>L. monocytogenes</i> | Pos.         | /                | 3.19 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | VC 25 | Sandwich with surimi, salad and cucumber          | se                       | 2.6   | <i>L. monocytogenes</i> | Pos.         | /                | 3.22 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | VC 26 | Sandwich with tuna, raw vegetables and moyonnaise | se                       | 2.6   | <i>L. monocytogenes</i> | Pos.         | /                | 3.13 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | 53    | Taboulet with chicken                             | se                       | 2,2   | <i>L. monocytogenes</i> | Pos.         | 9 882            | 2,51 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | 55    | strabourgeoise salad                              | se                       | 2,2   | <i>L. monocytogenes</i> | Pos.         | 10 749           | 2,73 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | 57    | Piémontaise with ham                              | se                       | 2,2   | <i>L. monocytogenes</i> | Pos.         | 10 542           | 2,68 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | 59    | Sandwich with salmon and chives                   | se                       | 2,6   | <i>L. monocytogenes</i> | Pos.         | 10 600           | 2,69 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | 61    | Sandwich with ham and Emmental                    | se                       | 2,6   | <i>L. monocytogenes</i> | Pos.         | 10 420           | 2,65 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | 63    | Sandwich with tuna and crudities                  | se                       | 2,6   | <i>L. monocytogenes</i> | Pos.         | 10 678           | 2,71 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 1+   | 65    | Sandwich with ham and butter                      | se                       | 2,6   | <i>L. monocytogenes</i> | Pos.         | 10 160           | 2,58 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |

| Study | Category       | Type | Code  | Matrices                                      | Artificial contamination |       | ISO 11290-1                                     |              | VIDAS LMX method |      |             |                                  |              | Comparison           |
|-------|----------------|------|-------|---|--------------------------|-------|---|--------------|------------------|------|-------------|----------------------------------|--------------|----------------------|
|       |                |      |       |   | Type                     | Level | CONFIRMATION                                    | Final result | Detection        |      |             | Confirmation                     | Final result |                      |
|       |                |      |       |   |                          |       | Identification                                  |              | RFV              | VT   | Test result | Identification                   |              |                      |
| 2017  | Composite food | 1+   | 67    | Sandwich with rosette and butter              | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 802           | 2,74 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 2+   | A20   | Pizza Emmental Ham                            | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 1 036            | 0,33 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 2+   | B6    | Chicken Paella                                | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 435           | 3,33 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 2+   | C14   | Pizza Ham mushrooms                           | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 4 491            | 1,43 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 2+   | C15   | Pizza ham cheese                              | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 6 285            | 2,00 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 2+   | D12   | Pizza Ham mushrooms                           | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 7 950            | 2,54 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 2+   | H4    | Pizza with 3 cheeses                          | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 5 176            | 1,59 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 2+   | J23   | Pizza with Goat cheese                        | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 1 212            | 0,37 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 2+   | C13   | Filet of hake, rice and vegetables            | No                       | /     | /   | Neg.         | 408              | 0,13 | +           | <i>L. monocytogenes</i>          | Pos.         | PD                   |
| 2009  | Composite food | 2+   | A11   | Paella seafood                                | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 036           | 3,20 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 2+   | A13   | Crispy snail                                  | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 407           | 3,32 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 2+   | B5    | Chinese noodles and crunchy vegetables        | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 2                | 0,00 | -           | <i>Isol Lx: L. monocytogenes</i> | Neg.         | ND FN <sub>ait</sub> |
| 2009  | Composite food | 2+   | D13   | Goat cheese Pizza                             | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 1 481            | 0,47 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2017  | Composite food | 2+   | VC 5  | Cooked pasta with cheese                      | se                       | 2,6   | /   | Neg.         | /                | 3,40 | +           | <i>L. monocytogenes</i>          | Pos.         | PD                   |
| 2017  | Composite food | 2+   | VC 28 | Pizza   | se                       | 2,6   | /   | Neg.         | /                | 0,05 | +           | <i>L. monocytogenes</i>          | Pos.         | PD                   |
| 2017  | Composite food | 2+   | VC 15 | Galette of black corn                         | se                       | 2     | <i>L. monocytogenes</i>                         | Pos.         | /                | 0,04 | -           | /                                | Neg.         | ND                   |
| 2017  | Composite food | 2+   | VC 17 | Vegetable gratin with pork                    | se                       | 2     | <i>L. monocytogenes</i>                         | Pos.         | /                | 0,00 | -           | /                                | Neg.         | ND                   |
| 2017  | Composite food | 2+   | VC 19 | Chinese pasta with vegetables                 | se                       | 2,4   | <i>L. monocytogenes</i>                         | Pos.         | /                | 0,00 | -           | /                                | Neg.         | ND                   |
| 2017  | Composite food | 2+   | VC 8  | Quiche lorraine                               | se                       | 3,6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3,34 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2017  | Composite food | 2+   | VC 9  | Pie with tuna, tomato and sweet pepper        | se                       | 3,8   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3,31 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2017  | Composite food | 2+   | VC 10 | Bœuf bourguignon                              | se                       | 3,8   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3,29 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2017  | Composite food | 2+   | VC 11 | Croissant with ham                            | se                       | 8,0   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3,27 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2017  | Composite food | 2+   | VC 12 | Couscous                                      | se                       | 8,0   | <i>L. monocytogenes</i>                         | Pos.         | /                | 0,10 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2017  | Composite food | 2+   | VC 16 | Tortilla of bacon                             | se                       | 2     | <i>L. monocytogenes</i>                         | Pos.         | /                | 3,44 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2017  | Composite food | 2+   | VC 18 | Lasagna of chicken                            | se                       | 2,4   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3,42 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2017  | Composite food | 2+   | VC 22 | Shepherd's pie                                | se                       | 1,6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3,24 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2017  | Composite food | 2+   | VC 39 | Spaghetti with bolognaise and parmesan cheese | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | /                | 2,98 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2017  | Composite food | 2+   | VC 53 | Curry noodles salad                           | se                       | 0     | <i>L. monocytogenes</i>                         | Pos.         | /                | 3,08 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 3+   | C24   | Chou chantilly                                | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 138           | 3,24 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 3+   | H1    | Cup duo profiteroles                          | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 685           | 3,29 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 3+   | H2    | Stawberry duo cup                             | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 693           | 3,30 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 3+   | H3    | Profiteroles chantilly                        | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 11 011           | 3,40 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |
| 2009  | Composite food | 3+   | K1    | Strawberry duo cup                            | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 9 717            | 3,00 | +           | <i>L. monocytogenes</i>          | Pos.         | PA                   |

| Study | Category       | Type | Code  | Matrices                          | Artificial contamination |       | ISO 11290-1             |              | VIDAS LMX method |      |             |   | Comparison |              |
|-------|----------------|------|-------|-----------------------------------|--------------------------|-------|-------------------------|--------------|------------------|------|-------------|---|------------|--------------|
|       |                |      |       |                                   | Type                     | Level | CONFIRMATION            | Final result | Detection        |      |             | Confirmation  |            | Final result |
|       |                |      |       |                                   |                          |       | Identification          |              | RFV              | VT   | Test result | Identification  |            |              |
| 2009  | Composite food | 3+   | K2    | Chou chantilly                    | No                       | /     | <i>L. monocytogenes</i> | Pos.         | 9 771            | 3,01 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2009  | Composite food | 3+   | M6    | Chou chantilly                    | No                       | /     | <i>L. monocytogenes</i> | Pos.         | 9 109            | 2,82 | +           | <i>L. monocytogenes</i><br><i>Isol Lx: L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 61 | Hazelnut cake                     | se                       | 1,8   | /                       | Neg.         | /                | 0,11 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PD           |
| 2017  | Composite food | 3+   | VC 4  | Pie with peach and pear           | se                       | 1,4   | <i>L. monocytogenes</i> | Pos.         | /                | 3,00 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 13 | Chocolate cake                    | se                       | 1,6   | <i>L. monocytogenes</i> | Pos.         | /                | 3,24 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 14 | Apple pie 1                       | se                       | 1,6   | <i>L. monocytogenes</i> | Pos.         | /                | 3,01 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 52 | Strawberry pie                    | se                       | 0     | <i>L. monocytogenes</i> | Pos.         | /                | 2,62 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 54 | Clafoutis                         | se                       | 0     | <i>L. monocytogenes</i> | Pos.         | /                | 3,07 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 55 | Egg cream 1                       | se                       | 1,4   | <i>L. monocytogenes</i> | Pos.         | /                | 2,85 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 57 | Custard                           | se                       | 1,4   | <i>L. monocytogenes</i> | Pos.         | /                | 2,88 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 58 | Tiramisu                          | se                       | 2,2   | <i>L. monocytogenes</i> | Pos.         | /                | 0,42 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 59 | Egg cream 2                       | se                       | 2,2   | <i>L. monocytogenes</i> | Pos.         | /                | 1,40 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 62 | Chocolate and hazelnut cake       | se                       | 1,8   | <i>L. monocytogenes</i> | Pos.         | /                | 2,31 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | 69    | Raspberries tart                  | se                       | 1,8   | <i>L. monocytogenes</i> | Pos.         | 10872            | 2,76 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | 71    | Mille feuille                     | se                       | 2,8   | <i>L. monocytogenes</i> | Pos.         | 10793            | 2,74 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |
| 2017  | Composite food | 3+   | 73    | Savarin with rum and pastry cream | se                       | 2,8   | <i>L. monocytogenes</i> | Pos.         | 9238             | 2,35 | +           | <i>L. monocytogenes</i>                                     | Pos.       | PA           |

## Composite foods : storage for 72 hours at 2-8°C

| Study | Category       | Type | Code  | Matrices  | Artificial contamination |       | ISO 11290-1                                     |              | VIDAS LMX method |      |             |                                      |              | Comparison |
|-------|----------------|------|-------|---|--------------------------|-------|---|--------------|------------------|------|-------------|--------------------------------------|--------------|------------|
|       |                |      |       |   | Type                     | Level | CONFIRMATION                                    | Final result | Detection        |      |             | Confirmation                         | Final result |            |
|       |                |      |       |   |                          |       | Identification                                  |              | RFV              | VT   | Test result | Identification                       |              |            |
| 2009  | Composite food | 1+   | F7    | Smoked salmon, soft cheese, dill                  | No                       | /     | <i>L. welshimeri</i>                            | Neg.         | 10 109           | 3,16 | +           | <i>L. monocytogenes</i>              | Pos.         | PD         |
| 2009  | Composite food | 1+   | A10   | Shrimp Pasta Salad                                | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 5 772            | 1,84 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2017  | Composite food | 1+   | VC 1  | Salad with pasta, tuna and vegetables             | se                       | 2.8   | /   | Neg.         | /                | 2.61 | +           | +                                    | Pos.         | PD         |
| 2017  | Composite food | 1+   | VC 27 | Sandwich with meat, tomato                        | se                       | 2.6   | /   | Neg.         | /                | 0,14 | +           | +                                    | Pos.         | PD         |
| 2017  | Composite food | 1+   | VC 2  | Sandwich with salmon                              | se                       | 2.8   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.31 | +           | +                                    | Pos.         | PA         |
| 2017  | Composite food | 1+   | VC 7  | Salad of semolina with vegetables and chicken     | se                       | 3.6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.30 | +           | +                                    | Pos.         | PA         |
| 2017  | Composite food | 1+   | VC 20 | Piemontoise salad                                 | se                       | 2.4   | <i>L. monocytogenes</i>                         | Pos.         | /                | 2.22 | +           | +                                    | Pos.         | PA         |
| 2017  | Composite food | 1+   | VC 21 | Tabbouleh with chicken and chive                  | se                       | 1.6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 2.83 | +           | +                                    | Pos.         | PA         |
| 2017  | Composite food | 1+   | VC 23 | Sandwich with emmental                            | se                       | 1.6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.05 | +           | +                                    | Pos.         | PA         |
| 2017  | Composite food | 1+   | VC 24 | Sandwich with chicken and mayonnaise              | se                       | 1.6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.05 | +           | +                                    | Pos.         | PA         |
| 2017  | Composite food | 1+   | VC 25 | Sandwich with surimi, salad and cucumber          | se                       | 2.6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 2.43 | +           | +                                    | Pos.         | PA         |
| 2017  | Composite food | 1+   | VC 26 | Sandwich with tuna, raw vegetables and moyonnaise | se                       | 2.6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.13 | +           | +                                    | Pos.         | PA         |
| 2017  | Composite food | 1+   | 53    | Taboulet with chicken                             | se                       | 2,2   | <i>L. monocytogenes</i>                         | Pos.         | 10 718           | 2,72 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2017  | Composite food | 1+   | 55    | strabourgeoise salad                              | se                       | 2,2   | <i>L. monocytogenes</i>                         | Pos.         | 9 565            | 2,43 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2017  | Composite food | 1+   | 57    | Piémontaise with ham                              | se                       | 2,2   | <i>L. monocytogenes</i>                         | Pos.         | 10 863           | 2,76 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2017  | Composite food | 1+   | 59    | Sandwich with salmon and chives                   | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 958           | 2,78 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2017  | Composite food | 1+   | 61    | Sandwich with ham and Emmental                    | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 924           | 2,77 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2017  | Composite food | 1+   | 63    | Sandwich with tuna and crudities                  | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 11 028           | 2,80 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2017  | Composite food | 1+   | 65    | Sandwich with ham and butter                      | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 778           | 2,74 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2017  | Composite food | 1+   | 67    | Sandwich with rosette and butter                  | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 672           | 2,71 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2009  | Composite food | 2+   | A20   | Pizza Emmental Ham                                | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 2 537            | 0,81 | +           | -<br><i>Isol Lx: L.monocytogenes</i> | Pos.         | PA         |
| 2009  | Composite food | 2+   | B6    | Chicken Paella                                    | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 11 918           | 3,81 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2009  | Composite food | 2+   | C14   | Pizza Ham mushrooms                               | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 8 568            | 2,73 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2009  | Composite food | 2+   | C15   | Pizza ham cheese                                  | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 8 098            | 2,58 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |
| 2009  | Composite food | 2+   | D12   | Pizza Ham mushrooms                               | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 11 659           | 3,64 | +           | <i>L. monocytogenes</i>              | Pos.         | PA         |

| Study | Category       | Type | Code  | Matrices                                      | Artificial contamination |       | ISO 11290-1                                     |              | VIDAS LMX method |      |             |                         | Comparison |              |
|-------|----------------|------|-------|---|--------------------------|-------|---|--------------|------------------|------|-------------|-------------------------|------------|--------------|
|       |                |      |       |   | Type                     | Level | CONFIRMATION                                    | Final result | Detection        |      |             | Confirmation            |            | Final result |
|       |                |      |       |   |                          |       | Identification                                  |              | RFV              | VT   | Test result | Identification          |            |              |
| 2009  | Composite food | 2+   | H4    | Pizza with 3 cheeses                          | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 4070             | 1,25 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Composite food | 2+   | J23   | Pizza with Goat cheese                        | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 1645             | 0,5  | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Composite food | 2+   | C13   | Filet of hake, rice and vegetables            | No                       | /     | /   | Neg.         | 6 143            | 1,96 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Composite food | 2+   | A11   | Paella seafood                                | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 248           | 3,27 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Composite food | 2+   | A13   | Crispy snail                                  | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 9 638            | 3,08 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Composite food | 2+   | B5    | Chinese noodles and crunchy vegetables        | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 3                | 0,00 | -           | /                       | Neg.       | ND           |
| 2009  | Composite food | 2+   | D13   | Goat cheese Pizza                             | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 4 270            | 1,33 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 2+   | VC 5  | Cooked pasta with cheese                      | se                       | 2.6   | /   | Neg.         | /                | 3.31 | +           | +                       | Pos.       | PD           |
| 2017  | Composite food | 2+   | VC 28 | Pizza   | se                       | 2.6   | /   | Neg.         | /                | 0,04 | -           | +                       | Neg. (FN)  | NA           |
| 2017  | Composite food | 2+   | VC 15 | Galette of black corn                         | se                       | 2     | <i>L. monocytogenes</i>                         | Pos.         | /                | 0.00 | -           | -                       | Neg.       | ND           |
| 2017  | Composite food | 2+   | VC 17 | Vegetable gratin with pork                    | se                       | 2     | <i>L. monocytogenes</i>                         | Pos.         | /                | 0.01 | -           | -                       | Neg.       | ND           |
| 2017  | Composite food | 2+   | VC 19 | Chinese pasta with vegetables                 | se                       | 2.4   | <i>L. monocytogenes</i>                         | Pos.         | /                | 0.00 | -           | -                       | Neg.       | ND           |
| 2017  | Composite food | 2+   | VC 8  | Quiche lorraine                               | se                       | 3.6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.35 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 2+   | VC 9  | Pie with tuna, tomato and sweet pepper        | se                       | 3.8   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.32 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 2+   | VC 10 | Bœuf bourguignon                              | se                       | 3.8   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.35 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 2+   | VC 11 | Croissant with ham                            | se                       | 8.0   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.23 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 2+   | VC 12 | Couscous                                      | se                       | 8.0   | <i>L. monocytogenes</i>                         | Pos.         | /                | 0,01 | -           | +                       | Neg. (FN)  | ND           |
| 2017  | Composite food | 2+   | VC 16 | Tortilla of bacon                             | se                       | 2     | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.06 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 2+   | VC 18 | Lasagna of chicken                            | se                       | 2.4   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.19 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 2+   | VC 22 | Shepherd's pie                                | se                       | 1.6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.15 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 2+   | VC 39 | Spaghetti with bolognaise and parmesan cheese | /                        | /     | <i>L. monocytogenes</i>                         | Pos.         | /                | 2,99 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 2+   | VC 53 | Curry noodles salad                           | se                       | 0     | <i>L. monocytogenes</i>                         | Pos.         | /                | 2.59 | +           | +                       | Pos.       | PA           |
| 2009  | Composite food | 3+   | C24   | Chou chantilly                                | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10683            | 3,41 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Composite food | 3+   | H1    | Cup duo profiteroles                          | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 9896             | 3,05 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Composite food | 3+   | H2    | Strawberry duo cup                            | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 9982             | 3,08 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Composite food | 3+   | H3    | Profiteroles chantilly                        | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10112            | 3,12 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Composite food | 3+   | K1    | Strawberry duo cup                            | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10387            | 3,24 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Composite food | 3+   | K2    | Chou chantilly                                | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10333            | 3,22 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Composite food | 3+   | M6    | Chou chantilly                                | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 9989             | 3,09 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 61 | Hazelnut cake                                 | se                       | 1.8   | /   | Neg.         | /                | 1.45 | +           | +                       | Pos.       | PD           |
| 2017  | Composite food | 3+   | VC 4  | Pie with peach and pear                       | se                       | 1.4   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.38 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 13 | Chocolate cake                                | se                       | 1.6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.22 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 14 | Apple pie 1                                   | se                       | 1.6   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.16 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 52 | Strawberry pie                                | se                       | 0     | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.07 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 54 | Clafoutis                                     | se                       | 0     | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.06 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 55 | Egg cream 1                                   | se                       | 1.4   | <i>L. monocytogenes</i>                         | Pos.         | /                | 2.94 | +           | +                       | Pos.       | PA           |
| 2017  | Composite food | 3+   | VC 57 | Custard                                       | se                       | 1.4   | <i>L. monocytogenes</i>                         | Pos.         | /                | 3.01 | +           | +                       | Pos.       | PA           |

| Study | Category       | Type | Code  | Matrices                           | Artificial contamination |       | ISO 11290-1             |              | VIDAS LMX method |      |             |                         |              | Comparison |
|-------|----------------|------|-------|------------------------------------|--------------------------|-------|-------------------------|--------------|------------------|------|-------------|-------------------------|--------------|------------|
|       |                |      |       |                                    | Type                     | Level | CONFIRMATION            | Final result | Detection        |      |             | Confirmation            | Final result |            |
|       |                |      |       |                                    |                          |       | Identification          |              | RFV              | VT   | Test result | Identification          |              |            |
| 2017  | Composite food | 3+   | VC 58 | Tiramisu                           | se                       | 2,2   | <i>L. monocytogenes</i> | Pos.         | /                | 2,08 | +           | +                       | Pos.         | PA         |
| 2017  | Composite food | 3+   | VC 59 | Egg cream 2                        | se                       | 2,2   | <i>L. monocytogenes</i> | Pos.         | /                | 2,51 | +           | +                       | Pos.         | PA         |
| 2017  | Composite food | 3+   | VC 62 | Chocolate and hazelnut cake        | se                       | 1,8   | <i>L. monocytogenes</i> | Pos.         | /                | 3,02 | +           | +                       | Pos.         | PA         |
| 2017  | Composite food | 3+   | 69    | Raspberries tart                   | se                       | 1,8   | <i>L. monocytogenes</i> | Pos.         | 10704            | 2,72 | +           | <i>L. monocytogenes</i> | Pos.         | PA         |
| 2017  | Composite food | 3+   | 71    | Mille feuille                      | se                       | 2,8   | <i>L. monocytogenes</i> | Pos.         | 10643            | 2,70 | +           | <i>L. monocytogenes</i> | Pos.         | PA         |
| 2017  | Composite food | 3+   | 73    | Savarin with rhum and pastry cream | se                       | 2,8   | <i>L. monocytogenes</i> | Pos.         | 10563            | 2,68 | +           | <i>L. monocytogenes</i> | Pos.         | PA         |

## Environmental samples

| Study | Category              | Type | Code | Matrices   | Artificial contamination |       | ISO 11290-1                                  |              | VIDAS LMX method |      |             |  |              | Comparison |
|-------|-----------------------|------|------|--|--------------------------|-------|--|--------------|------------------|------|-------------|--|--------------|------------|
|       |                       |      |      |  | Type                     | Level | CONFIRMATION                                 | Final result | Detection        |      |             | Confirmation                                       | Final result |            |
|       |                       |      |      |  |                          |       | Identification                               |              | RFV              | VT   | Test result | Identification                                     |              |            |
| 2009  | Environmental samples | 1-   | B17  | Residual water dirty tray                          | No                       | /     | /  | Neg.         | 35               | 0,01 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 1-   | K7   | Dirty stagnant dirty water                         | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 1-   | M14  | Water  | sp                       | 1,2   | /  | Neg.         | 5                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 1-   | AH1  | Process water                                      | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 1-   | AH2  | Washing water                                      | No                       | /     | /  | Neg.         | 3                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 1-   | AH3  | Frozen water                                       | No                       | /     | /  | Neg.         | 5                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 1-   | AH4  | Water rinsing vegetables                           | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 1-   | AH5  | Water rinsing vegetables                           | No                       | /     | /  | Neg.         | 3                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 1-   | AH6  | Water rinsing booth fish                           | No                       | /     | /  | Neg.         | 3                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 1-   | AH8  | Process water                                      | No                       | /     | /  | Neg.         | 3                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 2-   | B12  | PS White fish cutting table                        | No                       | /     | /  | Neg.         | 24               | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 2-   | E19  | PS cutting board before washing                    | No                       | /     | /  | Neg.         | 18               | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 2-   | E20  | PS table inox workshop                             | No                       | /     | /  | Neg.         | 19               | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 2-   | G18  | PS cutting table                                   | No                       | /     | /  | Neg.         | 19               | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 2-   | I11  | PS Thread fish                                     | No                       | /     | <i>L. innocua</i>                            | Neg.         | 7                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 2-   | I12  | PS salmon tray                                     | No                       | /     | /  | Neg.         | 31               | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 2-   | M11  | PS slicer before washing                           | No                       | /     | /  | Neg.         | 14               | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 2-   | O13  | PS gray bin before washing                         | No                       | /     | /  | Neg.         | 10               | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 2-   | Q10  | PS inox table inox workshop preparation fishmonger | No                       | /     | /  | Neg.         | 8                | 0,00 | -           | /  | Neg.         | NA         |
| 2017  | Environmental samples | 2-   | 50   | Surface sample 1                                   | No                       | /     | /  | Neg.         | 3                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 3-   | B13  | Residues hachoir workshop butchery                 | No                       | /     | /  | Neg.         | 2                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 3-   | B18  | Slicer residues                                    | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 3-   | D3   | Residues production line 1                         | No                       | /     | /  | Neg.         | 4                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 3-   | D4   | Residues stand delicatessen                        | No                       | /     | <i>L. innocua</i>                            | Neg.         | 3                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 3-   | D18  | Residues stand                                     | No                       | /     | /  | Neg.         | 8                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 3-   | E11  | Residue threader                                   | No                       | /     | /  | Neg.         | 5                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 3-   | E12  | Sink waste   | No                       | /     | /  | Neg.         | 3                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 3-   | G17  | White fish workshop residues                       | No                       | /     | /  | Neg.         | 8                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 3-   | K6   | Vegetable residues manufacturing line              | No                       | /     | /  | Neg.         | 6                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 3-   | M9   | Residues workshop fishmonger                       | No                       | /     | /  | Neg.         | 7                | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 3-   | Q7   | Residues hachoir workshop butchery                 | No                       | /     | /  | Neg.         | 24               | 0,00 | -           | /  | Neg.         | NA         |
| 2009  | Environmental samples | 1+   | O18  | Water rinsing                                      | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | Pos.         | 3                | 0,00 | -           | <i>L. innocua</i><br><i>L. innocua</i>             | Neg.         | ND         |
| 2009  | Environmental samples | 1+   | N14  | Water rinsing vegetables                           | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 10 922           | 3,38 | +           | <i>L. monocytogenes</i><br><i>L. monocytogenes</i> | Pos.         | PA         |
| 2009  | Environmental samples | 1+   | AH7  | Water rinsing cup tray                             | No                       | /     | <i>L.monocytogenes</i>                       | Pos.         | 10893            | 3,79 | +           | <i>L.monocytogenes</i>                             | Pos.         | PA         |

| Study | Category              | Type     | Code | Matrices                                 | Artificial contamination |       | ISO 11290-1                                     |              | VIDAS LMX method |      |                |  |              | Comparison |
|-------|-----------------------|----------|------|--|--------------------------|-------|---|--------------|------------------|------|----------------|--|--------------|------------|
|       |                       |          |      |  | Type                     | Level | Final result                                    | Detection    |                  |      | Final result   |  |              |            |
|       |                       |          |      |  |                          |       |   | CONFIRMATION | RFV              | VT   |                | Test result  | Confirmation |            |
|       |                       |          |      |  |                          |       | Identification                                  |              |                  |      | Identification |  |              |            |
| 2009  | Environmental samples | 1+       | M15  | Water                                    | sp                       | 1,5   | <i>L. monocytogenes</i>                         | Pos.         | 11 417           | 3,53 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 1+       | G19  | New Water                                | sp                       | 8,1   | <i>L. monocytogenes</i>                         | Pos.         | 9 015            | 2,81 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 1+       | G20  | Frozen water                             | sp                       | 16,2  | <i>L. monocytogenes</i>                         | Pos.         | 9 228            | 2,88 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2017  | Environmental samples | 1+       | 75   | Processed water 1                        | se                       | 2,2   | <i>L. monocytogenes</i>                         | Pos.         | 9 987            | 2,54 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2017  | Environmental samples | 1+       | 77   | Processed water 2                        | se                       | 2,2   | <i>L. monocytogenes</i>                         | Pos.         | 10 265           | 2,61 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2017  | Environmental samples | 1+       | 79   | Processed water 3                        | se                       | 2,2   | <i>L. monocytogenes</i>                         | Pos.         | 8 796            | 2,24 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2017  | Environmental samples | 1+       | 81   | Processed water 4                        | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 854           | 2,76 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 2+       | B16  | PS Workshop cutting table                | No                       | /     | /   | Neg.         | 10 826           | 3,46 | +              | <i>L. monocytogenes</i>                            | Pos.         | PD         |
| 2009  | Environmental samples | 2+       | B11  | PS Fish white fish                       | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 355           | 3,31 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 2+       | D17  | PS slicer before washing                 | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 392           | 3,32 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 2+       | O17  | PS slicer before washing                 | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 748           | 3,32 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 2+       | Q11  | PS threading machine before washing      | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 400           | 3,62 | +              | <i>L. monocytogenes</i><br><i>L. monocytogenes</i> | Pos.         | PA         |
| 2009  | Environmental samples | 2+       | M12  | PS Slicer stand delicatessen             | sp                       | 0,58  | /   | Neg.         | 329              | 0,10 | +              | <i>L. monocytogenes</i><br><i>L. monocytogenes</i> | Pos.         | PD         |
| 2009  | Environmental samples | 2+       | M13  | PS Dirty knife delicatessen              | sp                       | 0,87  | <i>L. monocytogenes</i>                         | Pos.         | 1 625            | 0,50 | +              | <i>L. monocytogenes</i><br><i>L. monocytogenes</i> | Pos.         | PA         |
| 2009  | Environmental samples | 2+       | G21  | PS floor stand delicatessen              | sp                       | 12,2  | <i>L. monocytogenes</i>                         | Pos.         | 9 534            | 2,98 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2017  | Environmental samples | 2+       | 83   | Surface sample 1                         | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 623           | 2,70 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2017  | Environmental samples | 2+       | 85   | Surface sample 2                         | se                       | 2,6   | <i>L. monocytogenes</i>                         | Pos.         | 10 478           | 2,66 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 3+       | M10  | Meat products                            | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 3                | 0,00 | -              | /  | Neg.         | ND         |
| 2009  | Environmental samples | 3+       | C23  | Production workshop residues             | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 8 596            | 2,74 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 3+       | D5   | Residues dirty red tray                  | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 5 273            | 1,68 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 3+       | J22  | Chicken Skin                             | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 9 792            | 3,02 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 3+       | K12  | Residues stand sandwich                  | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 437              | 0,13 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 3+<br>3+ | Q8   | Residues workshop delicatessen           | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 6 777            | 2,35 | +              | <i>L. monocytogenes</i><br><i>L. monocytogenes</i> | Pos.         | PA         |
| 2009  | Environmental samples | 3+<br>3+ | Q9   | Residues workshop preparation fishmonger | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 10 305           | 3,58 | +              | <i>L. monocytogenes</i><br><i>L. monocytogenes</i> | Pos.         | PA         |
| 2009  | Environmental samples | 3+       | AH9  | Residue workshop fishmonger              | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 1210             | 0,42 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 3+       | AC13 | Meat juice                               | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 11 063           | 2,76 | +              | <i>L. monocytogenes</i>                            | Pos.         | PA         |
| 2009  | Environmental samples | 3+       | Q14  | Residues tray waste deli meats           | sp                       | 21,0  | <i>L. monocytogenes</i>                         | Pos.         | 4                | 0,00 | -              | /  | Neg.         | ND         |

## Environmental samples : storage for 72 hours at 2-8°C

| Study | Category              | Typ | Code | Matrices                            | Artificial contamination |       | ISO 11290-1                                  |              | VIDAS LMX method |      |             |                         | Comparison |              |
|-------|-----------------------|-----|------|-------------------------------------|--------------------------|-------|--|--------------|------------------|------|-------------|-------------------------|------------|--------------|
|       |                       |     |      |                                     | Type                     | Level | CONFIRMATION                                 | Final result | Detection        |      |             | Confirmation            |            | Final result |
|       |                       |     |      |                                     |                          |       | Identification                               |              | RFV              | VT   | Test result | Identification          |            |              |
| 2009  | Environmental samples | 1+  | O18  | Water rinsing                       | No                       | /     | <i>L. monocytogenes</i><br><i>L. innocua</i> | Pos.         | 8                | 0,00 | -           | <i>L. innocua</i>       | Neg.       | ND           |
| 2009  | Environmental samples | 1+  | N14  | Water rinsing vegetables            | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 11 839           | 3,66 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 1+  | M15  | Water                               | sp                       | 1,5   | <i>L. monocytogenes</i>                      | Pos.         | 10 431           | 3,23 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 1+  | G19  | New Water                           | sp                       | 8,1   | <i>L. monocytogenes</i>                      | Pos.         | 11 349           | 3,72 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 1+  | G20  | Frozen water                        | sp                       | 16,2  | <i>L. monocytogenes</i>                      | Pos.         | 11 530           | 3,78 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Environmental samples | 1+  | 75   | Processed water 1                   | se                       | 2,2   | <i>L. monocytogenes</i>                      | Pos.         | 10 718           | 2,72 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Environmental samples | 1+  | 77   | Processed water 2                   | se                       | 2,2   | <i>L. monocytogenes</i>                      | Pos.         | 9 565            | 2,43 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Environmental samples | 1+  | 79   | Processed water 3                   | se                       | 2,2   | <i>L. monocytogenes</i>                      | Pos.         | 10 863           | 2,76 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Environmental samples | 1+  | 81   | Processed water 4                   | se                       | 2,6   | <i>L. monocytogenes</i>                      | Pos.         | 10 958           | 2,78 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 2+  | B16  | PS Workshop cutting table           | No                       | /     | /  | -            | 10 466           | 3,34 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Environmental samples | 2+  | B11  | PS Fish white fish                  | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 10 529           | 3,36 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 2+  | D17  | PS slicer before washing            | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 10 308           | 1,22 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 2+  | O17  | PS slicer before washing            | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 10 185           | 3,15 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 2+  | Q11  | PS threading machine before washing | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 9 681            | 3,37 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 2+  | M12  | PS Slicer stand delicatessen        | sp                       | 0,6   | /  | -            | 1 361            | 0,42 | +           | <i>L. monocytogenes</i> | Pos.       | PD           |
| 2009  | Environmental samples | 2+  | M13  | PS Dirty knife delicatessen         | sp                       | 0,9   | <i>L. monocytogenes</i>                      | Pos.         | 10 440           | 3,23 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 2+  | G21  | PS floor stand delicatessen         | sp                       | 12,2  | <i>L. monocytogenes</i>                      | Pos.         | 10 127           | 3,32 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Environmental samples | 2+  | 83   | Surface sample 1                    | se                       | 2,6   | <i>L. monocytogenes</i>                      | Pos.         | 10 924           | 2,77 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2017  | Environmental samples | 2+  | 85   | Surface sample 2                    | se                       | 2,6   | <i>L. monocytogenes</i>                      | Pos.         | 11 028           | 2,80 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 3+  | M10  | Meat products                       | No                       | /     | <i>L. monocytogenes</i>                      | Pos.         | 5                | 0,00 | -           | /                       | Neg.       | ND           |

| Study | Category              | Typ | Code | Matrices                                 | Artificial contamination |       | ISO 11290-1                                     |              | VIDAS LMX method |      |             |                         | Comparison |              |
|-------|-----------------------|-----|------|--|--------------------------|-------|---|--------------|------------------|------|-------------|-------------------------|------------|--------------|
|       |                       |     |      |  | Type                     | Level | CONFIRMATION                                    | Final result | Detection        |      |             | Confirmation            |            | Final result |
|       |                       |     |      |  |                          |       | Identification                                  |              | RFV              | VT   | Test result | Identification          |            |              |
| 2009  | Environmental samples | 3+  | C23  | Production workshop residues             | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 10 653           | 3,40 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 3+  | D5   | Residues dirty red tray                  | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 11 734           | 3,66 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 3+  | J22  | Chicken Skin                             | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 1 773            | 0,54 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 3+  | K12  | Residues stand sandwich                  | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 11 503           | 3,59 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 3+  | Q8   | Residues workshop delicatessen           | No                       | /     | <i>L. monocytogenes</i><br><i>L. welshimeri</i> | Pos.         | 9 388            | 3,26 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 3+  | Q9   | Residues workshop preparation fishmonger | No                       | /     | <i>L. monocytogenes</i>                         | Pos.         | 9 430            | 3,28 | +           | <i>L. monocytogenes</i> | Pos.       | PA           |
| 2009  | Environmental samples | 3+  | Q14  | Residues tray waste deli meats           | sp                       | 21,0  | <i>L. monocytogenes</i>                         | Pos.         | 3                | 0,00 | -           | /                       | Neg.       | ND           |



## **APPENDIX 4 :**

### **RLOD raw results**

Bacterial load :

L = light

M = medium

H = high

Distribution of flora :

A = pure culture of characteristic colonies

B = majority of characteristic colonies

C = minority of characteristic colonies

D = rare characteristic colonies in mixture

E = absence of characteristic colonies

## Meat products : Rillettes

Spiked with *Listeria monocytogenes* 1/2 b (L49)

Total flora : 1.5 10<sup>4</sup> CFU/g

| Level | CFU/25g | EN ISO 11290-1 |     |        |     |         | Alternative method |           |      |             |               |      |        |            |
|-------|---------|----------------|-----|--------|-----|---------|--------------------|-----------|------|-------------|---------------|------|--------|------------|
|       |         | Half-Fraser    |     | Fraser |     | Results | Conclusion         | VIDAS LMX |      |             | Confirmations |      | Result | Conclusion |
|       |         | PAL            | OAA | PAL    | OAA |         |                    | RFV       | TV   | Test result | OAA           | RLM  |        |            |
| 1     | 0,00    | ∅              | -LE | -LE    | -LE | -       | 0/6                | 5         | 0,00 | -           | /             | /    | -      | 0/6        |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |                    | 4         | 0,00 | -           | /             | /    | -      |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |                    | 4         | 0,00 | -           | /             | /    | -      |            |
|       |         | ∅              | ∅   | -LE    | ∅   | -       |                    | 4         | 0,00 | -           | /             | /    | -      |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |                    | 5         | 0,00 | -           | /             | /    | -      |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |                    | 4         | 0,00 | -           | /             | /    | -      |            |
| 2     | 0,79    | +MA            | +MA | +HA    | +MA | +       | 3/6                | 4         | 0,00 | -           | /             | /    | -      | 1/6        |
|       |         | -ME            | -LE | -ME    | -ME | -       |                    | 3         | 0,00 | -           | /             | /    | -      |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |                    | 885       | 0,30 | +           | +HC*          | +HB* | +      |            |
|       |         | +MA            | +MA | +HA    | +MA | +       |                    | 4         | 0,00 | -           | /             | /    | -      |            |
|       |         | ∅              | ∅   | -LE    | -LE | -       |                    | 4         | 0,00 | -           | /             | /    | -      |            |
|       |         | +LA            | +MA | +MA    | +MA | +       |                    | 6         | 0,00 | -           | /             | /    | -      |            |
| 3     | 1,34    | +MA            | +MA | +HA    | +MA | +       | 5/6                | 4         | 0,00 | -           | /             | /    | -      | 4/6        |
|       |         | ∅              | ∅   | -LE    | -LE | -       |                    | 9974      | 3,47 | +           | +HA           | +MA  | +      |            |
|       |         | +MA            | +MA | +HA    | +MA | +       |                    | 6         | 0,00 | -           | /             | /    | -      |            |
|       |         | +MA            | +MA | +MA    | +MA | +       |                    | 10164     | 3,53 | +           | +HA           | +MA  | +      |            |
|       |         | +MA            | +MA | +MA    | +MA | +       |                    | 11196     | 3,89 | +           | +MA           | +MA  | +      |            |
|       |         | +MA            | +MA | +HA    | +MA | +       |                    | 10585     | 3,68 | +           | +HA           | +MA  | +      |            |
| 4     | 3,16    | +MA            | +MA | +HA    | +MA | +       | 5/6                | 10206     | 3,55 | +           | +MA           | +HA  | +      | 6/6        |
|       |         | ∅              | ∅   | -LE    | -LE | -       |                    | 10275     | 3,57 | +           | +HA           | +HA  | +      |            |
|       |         | +MA            | +MA | +MA    | +MA | +       |                    | 10470     | 3,64 | +           | +MA           | +MA  | +      |            |
|       |         | +MA            | +LA | +MA    | +MA | +       |                    | 10622     | 3,69 | +           | +MA           | +HA  | +      |            |
|       |         | +MA            | +MA | +MA    | +MA | +       |                    | 10839     | 3,77 | +           | +HA           | +MA  | +      |            |
|       |         | +LA            | +LA | +HA    | +MA | +       |                    | 11079     | 3,85 | +           | +HA           | +HA  | +      |            |
| 5     | 4,55    | +MB            | +MB | +HB    | +MB | +       | 6/6                | 11124     | 3,54 | +           | +MA           | +MA  | +      | 6/6        |
|       |         | +MB            | +MB | +MB    | +MB | +       |                    | 8818      | 2,80 | +           | +MB           | +LB  | +      |            |
|       |         | +MB            | +MB | +HB    | +MB | +       |                    | 10067     | 3,20 | +           | +MA           | +MA  | +      |            |
|       |         | +HB            | +MB | +HB    | +MB | +       |                    | 10032     | 3,19 | +           | +MA           | +MA  | +      |            |
|       |         | +MA            | +MA | +HA    | +MA | +       |                    | 10380     | 3,30 | +           | +MA           | +MA  | +      |            |
|       |         | +MB            | +MB | +HB    | +MB | +       |                    | 8795      | 2,80 | +           | +MB           | +LB  | +      |            |

## Dairy products : Raw milk

Spiked with *Listeria monocytogenes* 1/2 a (L37)

Total flora : 6.0 10<sup>4</sup> CFU/g

| Level | CFU/25g | EN ISO 11290-1 |     |        |     |         |            | Alternative method |      |               |               |     |        |            |
|-------|---------|----------------|-----|--------|-----|---------|------------|--------------------|------|---------------|---------------|-----|--------|------------|
|       |         | Half-Fraser    |     | Fraser |     | Results | Conclusion | VIDAS LMX          |      |               | Confirmations |     | Result | Conclusion |
|       |         | PAL            | OAA | PAL    | OAA |         |            | RFV                | VT   | Résultat test | OAA           | RLM |        |            |
| 1     | 0,00    | ∅              | ∅   | ∅      | -LE | -       | 0/6        | 3                  | 0,00 | -             | /             | /   | -      | 0/6        |
|       |         | ∅              | ∅   | -LE    | -LE | -       |            | 3                  | 0,00 | -             | /             | /   | -      |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |            | 4                  | 0,00 | -             | /             | /   | -      |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |            | 5                  | 0,00 | -             | /             | /   | -      |            |
|       |         | ∅              | ∅   | -LE    | ∅   | -       |            | 2                  | 0,00 | -             | /             | /   | -      |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |            | 3                  | 0,00 | -             | /             | /   | -      |            |
| 2     | 0,44    | +LA            | +LA | +MA    | +MA | +       | 3/6        | 469                | 0,14 | +             | -ME           | -LE | -      | 4/6 (1FP)  |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |            | 9941               | 3,16 | +             | +MB           | +HB | +      |            |
|       |         | ∅              | ∅   | -LE    | ∅   | -       |            | 10060              | 3,20 | +             | +MB           | +HB | +      |            |
|       |         | +LA            | +LA | +MA    | +MA | +       |            | 10333              | 3,29 | +             | +MA           | +HB | +      |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |            | 10525              | 3,35 | +             | +MB           | +MB | +      |            |
|       |         | +LA            | +LA | +MA    | +MA | +       |            | 0                  | 0,00 | -             | /             | /   | -      |            |
| 3     | 0,87    | +LA            | +LA | +LB    | +MB | +       | 4/6        | 10420              | 3,31 | +             | +MB           | +HB | -      | 5/6        |
|       |         | +LA            | +LA | +MB    | +MB | +       |            | 4                  | 0,00 | -             | /             | /   | -      |            |
|       |         | +LA            | +LA | +MA    | +MB | +       |            | 10407              | 3,31 | +             | +MB           | +HB | +      |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |            | 10750              | 3,42 | +             | +MB           | +HB | +      |            |
|       |         | ∅              | ∅   | -LE    | -LE | -       |            | 11297              | 3,59 | +             | +MA           | +HB | +      |            |
|       |         | +LA            | +LA | +MA    | +MB | +       |            | 11277              | 3,59 | +             | +MB           | +MB | +      |            |
| 4     | 1,48    | +LA            | +LA | +MA    | +MB | +       | 5/6        | 10148              | 3,23 | +             | +MB           | +HB | +      | 5/6        |
|       |         | +LA            | +LA | +MA    | +MB | +       |            | 10095              | 3,21 | +             | +HB           | +HB | +      |            |
|       |         | +LA            | +MA | +MA    | +MB | +       |            | 10228              | 3,25 | +             | +MB           | +HB | +      |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -       |            | 4                  | 0,00 | -             | /             | /   | -      |            |
|       |         | +LA            | +LA | +MB    | +MB | +       |            | 10388              | 3,30 | +             | +MB           | +HB | +      |            |
|       |         | +LA            | +MA | +MA    | +MB | +       |            | 10514              | 3,34 | +             | +MB           | +HB | +      |            |
| 5     | 3,49    | +LA            | +MA | +MB    | +MB | +       | 6/6        | 9700               | 3,09 | +             | +MA           | +MB | +      | 6/6        |
|       |         | +LA            | +MA | +MB    | +MB | +       |            | 9944               | 3,16 | +             | +MB           | +HB | +      |            |
|       |         | +LA            | +LA | +MB    | +MB | +       |            | 9983               | 3,18 | +             | +MB           | +HB | +      |            |
|       |         | +MA            | +MA | +HB    | +MB | +       |            | 10290              | 3,27 | +             | +MB           | +HB | +      |            |
|       |         | +MA            | +MA | +MB    | +MB | +       |            | 10376              | 3,30 | +             | +MA           | +MB | +      |            |
|       |         | +LA            | +MA | +MB    | +MB | +       |            | 10450              | 3,32 | +             | +MB           | +HB | +      |            |

## Dairy products : Raw milk cheese

Spiked with *Listeria monocytogenes* 1/2 a (L37)

Total flora : \*3.0 10<sup>8</sup> CFU/g \*\*7.6 10<sup>7</sup> CFU/g

| Level | CFU/25g | EN ISO 11290-1 |     |        |     |         | Alternative method |           |      |             |               |     |        |            |
|-------|---------|----------------|-----|--------|-----|---------|--------------------|-----------|------|-------------|---------------|-----|--------|------------|
|       |         | Half-Fraser    |     | Fraser |     | Results | Conclusion         | VIDAS LMX |      |             | Confirmations |     | Result | Conclusion |
|       |         | PAL            | OAA | PAL    | OAA |         |                    | RFV       | VT   | Test result | OAA           | RLM |        |            |
| 1*    | 0,00    | ME             | -LE | -LE    | -LE | -       | 0/6                | 6         | 0,00 | -           | -ME           | -LE | -      | 0/6        |
|       |         | -LE            | -LE | Ø      | Ø   | -       |                    | 135       | 0,04 | -           | -ME           | -LE | -      |            |
|       |         | -LE            | -LE | -LE    | -ME | -       |                    | 4         | 0,00 | -           | -ME           | -LE | -      |            |
|       |         | -ME            | Ø   | Ø      | Ø   | -       |                    | 6         | 0,00 | -           | -ME           | -LE | -      |            |
|       |         | -ME            | Ø   | Ø      | Ø   | -       |                    | 5         | 0,00 | -           | -ME           | -LE | -      |            |
|       |         | -ME            | Ø   | Ø      | Ø   | -       |                    | 5         | 0,00 | -           | -ME           | -ME | -      |            |
| 2*    | 0,25    | Ø              | Ø   | Ø      | Ø   | -       | 1/6                | 10880     | 3,16 | +           | +MA           | +MA | +      | 1/6        |
|       |         | -LE            | -LE | Ø      | Ø   | -       |                    | 111       | 0,03 | -           | -LE           | Ø   | -      |            |
|       |         | +MA            | +MA | +MA    | +MA | +       |                    | -2        | 0,00 | -           | -ME           | -LE | -      |            |
|       |         | -LE            | Ø   | Ø      | Ø   | -       |                    | 2         | 0,00 | -           | -ME           | -LE | -      |            |
|       |         | -ME            | Ø   | Ø      | Ø   | -       |                    | 2         | 0,00 | -           | -LE           | -LE | -      |            |
|       |         | ME             | -LE | Ø      | Ø   | -       |                    | 3         | 0,00 | -           | -ME           | -ME | -      |            |
| 3*    | 0,50    | -LE            | Ø   | Ø      | -LE | -       | 2/6                | 10229     | 2,97 | +           | +MB           | +MB | +      | 2/6        |
|       |         | -LE            | Ø   | Ø      | Ø   | -       |                    | 3         | 0,00 | -           | -LE           | -LE | -      |            |
|       |         | -LE            | Ø   | Ø      | Ø   | -       |                    | 3         | 0,00 | -           | -LE           | -LE | -      |            |
|       |         | +MA            | +MA | +MA    | +MA | +       |                    | 11506     | 3,34 | +           | +MA           | +MA | +      |            |
|       |         | +LA            | +LA | +MA    | +MA | +       |                    | 2         | 0,00 | -           | -LE           | -LE | -      |            |
|       |         | -ME            | Ø   | Ø      | Ø   | -       |                    | 1         | 0,00 | -           | -ME           | -ME | -      |            |
| 4*    | 0,91    | +MA            | +MA | +MA    | +MA | +       | 4/6                | 6         | 0,00 | -           | -ME           | -ME | -      | 5/6        |
|       |         | +MB            | +MA | +MA    | +MA | +       |                    | 8198      | 2,38 | +           | +MA           | +MA | +      |            |
|       |         | -ME            | Ø   | Ø      | Ø   | -       |                    | 11058     | 3,21 | +           | +HA           | +MA | +      |            |
|       |         | +MB            | +MA | +MA    | +MA | +       |                    | 11417     | 3,31 | +           | +MA           | +MA | +      |            |
|       |         | -LE            | Ø   | Ø      | Ø   | -       |                    | 11859     | 3,44 | +           | +MB           | +MB | +      |            |
|       |         | +MB            | +MB | +MA    | +MA | +       |                    | 12245     | 3,55 | +           | +MA           | +MA | +      |            |
| 5**   | 4,47    | +MA            | +MA | +MA    | +MA | +       | 6/6                | 10354     | 3,00 | +           | +MA           | +MA | +      | 6/6        |
|       |         | +MA            | +MA | +MA    | +MA | +       |                    | 10705     | 3,10 | +           | +MA           | +MA | +      |            |
|       |         | +MA            | +MA | +HA    | +MA | +       |                    | 10555     | 3,02 | +           | +HA           | +HA | +      |            |
|       |         | +MA            | +MA | +HA    | +MA | +       |                    | 10788     | 3,13 | +           | +MA           | +HA | +      |            |
|       |         | +MA            | +MA | +HA    | +MA | +       |                    | 11875     | 3,44 | +           | +MA           | +HA | +      |            |
|       |         | +MA            | +MA | +HA    | +MA | +       |                    | 11008     | 3,19 | +           | +HA           | +HA | +      |            |

## Seafood products : Smoked salmon

Spiked with *Listeria monocytogenes* 1/2 a (L5)

Total flora : 1.5 10<sup>7</sup> CFU/g

| Level | CFU/25g | EN ISO 11290-1 |     |        |     |         |            | Alternative method |      |             |               |     |        |            |
|-------|---------|----------------|-----|--------|-----|---------|------------|--------------------|------|-------------|---------------|-----|--------|------------|
|       |         | Half-Fraser    |     | Fraser |     | Results | Conclusion | VIDAS LMX          |      |             | Confirmations |     | Result | Conclusion |
|       |         | PAL            | OAA | PAL    | OAA |         |            | RFV                | VT   | Test result | OAA           | RLM |        |            |
| 1     | 0,00    | ∅              | -LE | -LE    | -LE | -       | 0/6        | 12                 | 0,00 | -           | /             | /   | -      | 0/6        |
|       |         | -LE            | -LE | -LE    | ∅   | -       |            | 30                 | 0,00 | -           | /             | /   | -      |            |
|       |         | -LE            | -LE | -LE    | -LE | -       |            | 12                 | 0,00 | -           | /             | /   | -      |            |
|       |         | -LE            | -LE | -ME    | -ME | -       |            | 11                 | 0,00 | -           | /             | /   | -      |            |
|       |         | -LE            | -LE | ∅      | ∅   | -       |            | 10                 | 0,00 | -           | /             | /   | -      |            |
|       |         | -LE            | -LE | -ME    | -ME | -       |            | 13                 | 0,00 | -           | /             | /   | -      |            |
| 2     | 0,25    | ∅              | ∅   | -LE    | -LE | -       | 2/6        | 5                  | 0,00 | +           | /             | /   | -      | 2/6        |
|       |         | +LA            | +LA | +MA    | +MA | +       |            | 8129               | 2,83 | +           | +MA           | +MA | +      |            |
|       |         | ∅              | ∅   | ∅      | -ME | -       |            | 5                  | 0,00 | -           | /             | /   | -      |            |
|       |         | ∅              | ∅   | -LE    | -LE | -       |            | 5                  | 0,00 | -           | /             | /   | -      |            |
|       |         | +LA            | +LA | +MA    | +MA | +       |            | 12062              | 4,19 | -           | +MA           | +HA | +      |            |
|       |         | ∅              | ∅   | -LE    | -LE | -       |            | 4                  | 0,00 | -           | /             | /   | -      |            |
| 3     | 0,88    | ∅              | ∅   | ∅      | -ME | -       | 4/6        | 5                  | 0,00 | -           | /             | /   | -      | 5/6        |
|       |         | +LA            | +LA | +MA    | +MA | +       |            | 11519              | 4,01 | +           | +HA           | +HA | +      |            |
|       |         | -LE            | ∅   | -ME    | -LE | -       |            | 1116               | 0,38 | +           | +MB           | +MA | +      |            |
|       |         | +LA            | +LA | +MA    | +MA | +       |            | 12258              | 4,26 | +           | +MA           | +HA | +      |            |
|       |         | +LA            | +LA | +MA    | +MA | +       |            | 12023              | 4,18 | +           | +HB           | +HB | +      |            |
|       |         | +LA            | +LA | +MA    | +MA | +       |            | 12261              | 4,26 | +           | +MA           | +HA | +      |            |
| 4     | 2,00    | +MA            | +MA | +MA    | +MA | +       | 6/6        | 11022              | 3,83 | +           | +MA           | +MA | +      | 6/6        |
|       |         | +MA            | +MA | +MA    | +MA | +       |            | 7345               | 2,55 | +           | +MA           | +MA | +      |            |
|       |         | +LA            | +LA | +MA    | +MA | +       |            | 10711              | 3,72 | +           | +MA           | +HA | +      |            |
|       |         | +MA            | +MA | +MA    | +MA | +       |            | 7172               | 2,49 | +           | +MA           | +MA | +      |            |
|       |         | +MA            | +MA | +MA    | +MA | +       |            | 11745              | 4,08 | +           | +MA           | +MA | +      |            |
|       |         | +LA            | +LA | +MA    | +MA | +       |            | 9137               | 3,18 | +           | +MA           | +MA | +      |            |

## Vegetal products : grated red cabbage

Spiked with *Listeria monocytogenes* 4 b (L58)

Total flora : 6.3 10<sup>8</sup> CFU/g

| Level | CFU/25g | EN ISO 11290-1 |     |        |     |                 |            | Alternative method |      |        |     |                 |            |     |
|-------|---------|----------------|-----|--------|-----|-----------------|------------|--------------------|------|--------|-----|-----------------|------------|-----|
|       |         | Half-Fraser    |     | Fraser |     | Half-Fraser PAL | Fraser OAA | Half-Fraser        |      | Fraser |     | Half-Fraser OAA | Fraser PAL |     |
|       |         | PAL            | OAA | PAL    | OAA |                 |            | PAL                | OAA  | PAL    | OAA |                 |            |     |
| 1     | 0,00    | ∅              | ∅   | ∅      | ∅   | -               | 0/6        | 4                  | 0,00 | -      | /   | /               | -          | 0/6 |
|       |         | ∅              | ∅   | ∅      | -LE | -               |            | 2                  | 0,00 | -      | /   | /               | -          |     |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 2                  | 0,00 | -      | /   | /               | -          |     |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 2                  | 0,00 | -      | /   | /               | -          |     |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 2                  | 0,00 | -      | /   | /               | -          |     |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 4                  | 0,00 | -      | /   | /               | -          |     |
| 2     | 0,30    | ∅              | ∅   | ∅      | ∅   | -               | 1/6        | 4                  | 0,00 | -      | /   | /               | -          | 1/6 |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 3                  | 0,00 | -      | /   | /               | -          |     |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 3                  | 0,00 | -      | /   | /               | -          |     |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 10826              | 3,10 | +      | +MA | +MA             | +          |     |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 5                  | 0,00 | -      | /   | /               | -          |     |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 3                  | 0,00 | -      | /   | /               | -          |     |
| 3     | 0,39    | ∅              | -LE | -LE    | -LE | -               | 3/6        | 2                  | 0,00 | -      | /   | /               | -          | 2/6 |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 2051               | 0,58 | +      | +LA | +LA             | +          |     |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 10340              | 2,96 | +      | +MA | +MA             | +          |     |
|       |         | ∅              | ∅   | ∅      | -LE | -               |            | 2                  | 0,00 | -      | /   | /               | -          |     |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 2                  | 0,00 | -      | /   | /               | -          |     |
|       |         | +LA            | +LA | +MA    | +LA | +               |            | 3                  | 0,00 | -      | /   | /               | -          |     |
| 4     | 0,90    | +LA            | +LA | +MA    | +MA | +               | 4/6        | 3                  | 0,00 | -      | /   | /               | -          | 3/6 |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 2                  | 0,00 | -      | /   | /               | -          |     |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 9680               | 2,77 | +      | +MA | +HA             | +          |     |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 5                  | 0,00 | -      | /   | /               | -          |     |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 9577               | 2,74 | +      | +MA | +HA             | +          |     |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 10231              | 2,93 | +      | +MA | +HA             | +          |     |
| 5     | 1,54    | +LA            | +LA | +MA    | +LA | +               | 6/6        | 10784              | 3,08 | +      | +MA | +MA             | +          | 6/6 |
|       |         | +MA            | +MA | +HA    | +MA | +               |            | 10208              | 2,92 | +      | +MA | +MA             | +          |     |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 10954              | 3,13 | +      | +MA | +HA             | +          |     |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 11078              | 3,17 | +      | +MA | +HA             | +          |     |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 11429              | 3,27 | +      | +MA | +HA             | +          |     |
|       |         | +LA            | +MA | +MA    | +MA | +               |            | 11570              | 3,31 | +      | +MA | +MA             | +          |     |

## Environmental samples : process water

Spiked with *Listeria monocytogenes* ½ c(L28)

Total flora : 5.0 10<sup>5</sup> CFU/g

| Level | CFU/25g | EN ISO 11290-1 |     |        |     |                 |            | Alternative method |      |        |     |     |                 |            |
|-------|---------|----------------|-----|--------|-----|-----------------|------------|--------------------|------|--------|-----|-----|-----------------|------------|
|       |         | Half-Fraser    |     | Fraser |     | Half-Fraser PAL | Fraser OAA | Half-Fraser        |      | Fraser |     |     | Half-Fraser OAA | Fraser PAL |
|       |         | PAL            | OAA | PAL    | OAA |                 |            | PAL                | OAA  | PAL    | OAA | PAL |                 |            |
| 1     | 0,00    | ∅              | ∅   | ∅      | ∅   | -               | 0/6        | 3                  | 0,00 | -      | /   | /   | -               | 0/6        |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 3                  | 0,00 | -      | /   | /   | -               |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 3                  | 0,00 | -      | /   | /   | -               |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 4                  | 0,00 | -      | /   | /   | -               |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 4                  | 0,00 | -      | /   | /   | -               |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 4                  | 0,00 | -      | /   | /   | -               |            |
|       | 0,21    | ∅              | ∅   | ∅      | ∅   | -               | 1/6        | 4                  | 0,00 | -      | /   | /   | -               | 3/6        |
|       |         | ∅              | -LE | ∅      | ∅   | -               |            | 11224              | 3,57 | +      | +MA | +MA | +               |            |
|       |         | ∅              | ∅   | -ME    | -LE | -               |            | 3                  | 0,00 | -      | /   | /   | -               |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 5                  | 0,00 | -      | /   | /   | -               |            |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 11222              | 3,57 | +      | +MA | +MA | +               |            |
|       |         | ∅              | ∅   | -LE    | -LE | -               |            | 11359              | 3,67 | +      | +MA | +MA | +               |            |
| 2     | 0,34    | ∅              | ∅   | -LE    | ∅   | -               | 3/6        | 10295              | 3,58 | +      | +MA | +MA | +               | 4/6        |
|       |         | ∅              | ∅   | -LE    | ∅   | -               |            | 4                  | 0,00 | -      | /   | /   | -               |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 10160              | 3,53 | +      | +MA | +MA | +               |            |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 10893              | 3,79 | +      | +MA | +MA | +               |            |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 10463              | 3,64 | +      | +MA | +MA | +               |            |
|       |         | +LA            | +LA | +HA    | +MA | +               |            | 6                  | 0,00 | -      | /   | /   | -               |            |
| 4     | 0,83    | +MA            | +LA | +HA    | +MA | +               | 5/6        | 4                  | 0,00 | -      | /   | /   | -               | 4/6        |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 10948              | 3,81 | +      | +MA | +MA | +               |            |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 5                  | 0,00 | -      | /   | /   | -               |            |
|       |         | +LA            | +LA | +MA    | +MA | +               |            | 11515              | 4,00 | +      | +MA | +MA | +               |            |
|       |         | +MA            | +MA | +MA    | +MA | +               |            | 11256              | 3,91 | +      | +MA | +MA | +               |            |
|       |         | +MA            | +LA | +HA    | +MA | +               |            | 11052              | 3,84 | +      | +MA | +MA | +               |            |
| 5     | 1,96    | +MA            | +MA | +MA    | +MA | +               | 5/6        | 8983               | 3,12 | +      | +MA | +MA | +               | 6/6        |
|       |         | +MA            | +LA | +MA    | +MA | +               |            | 9189               | 3,19 | +      | +HA | +MA | +               |            |
|       |         | +MA            | +MA | +HA    | +MA | +               |            | 9305               | 3,23 | +      | +MA | +HA | +               |            |
|       |         | ∅              | ∅   | ∅      | ∅   | -               |            | 9685               | 3,37 | +      | +MA | +MA | +               |            |
|       |         | +MA            | +LA | +MA    | +MA | +               |            | 9869               | 3,43 | +      | +MA | +MA | +               |            |
|       |         | +MA            | +MA | +MA    | +MA | +               |            | 9924               | 3,45 | +      | +MA | +MA | +               |            |
| Level | CFU/25g | EN ISO 11290-1 |     |        |     |                 |            | Alternative method |      |        |     |     |                 |            |
|       |         | Half-Fraser    |     | Fraser |     | Half-Fraser PAL | Fraser OAA | Half-Fraser        |      | Fraser |     |     | Half-Fraser OAA | Fraser PAL |
|       |         | PAL            | OAA | PAL    | OAA |                 |            | PAL                | OAA  | PAL    | OAA | PAL |                 |            |
| 6     | 2,35    | +MA            | +LA | +HB    | +MB | +               | 6/6        | 9975               | 3,17 | +      | +MA | +MA | +               | 6/6        |
|       |         | +MB            | +MB | +MB    | +MB | +               |            | 9949               | 3,16 | +      | +MA | +MA | +               |            |
|       |         | +MB            | +MB | +MB    | +MB | +               |            | 10203              | 3,25 | +      | +MA | +MA | +               |            |
|       |         | +MA            | +MA | +MB    | +MB | +               |            | 10291              | 3,27 | +      | +MA | +MA | +               |            |
|       |         | +MA            | +LA | +MB    | +MB | +               |            | 10562              | 3,36 | +      | +MA | +MA | +               |            |
|       |         | +MB            | +MB | +HB    | +MA | +               |            | 10511              | 3,34 | +      | +MA | +MA | +               |            |

## RLOD: composite foods (2017 study)

### Raw results

#### Caption :

ST : sample type  
SN : sample number  
# : sample identity  
∅ : level determined by 3 to 5 enumerations  
sp : spiking  
se : seeding  
nc : naturally contaminated  
cm: contamination by mixture  
+ / Pos : positive result  
- / Neg : negative result  
/ : test not realized  
∅ : absence of colonies  
PA : positive agreement  
NA : negative agreement  
PD : positive deviation  
ND : negative deviation  
FN : false negative result  
FP : false positive result  
PP: presumed positive result before confirmation  
A : absence  
P : presence  
0 / 1 / 2 / 3 / 4 : level of typical flora, from absence to high  
∅ / L / M / H : level of annex flora, from absence to high  
h+/h-: oresence or absence of halo  
I : result after re-isolation  
(XXX) : number of typical colonies

Total flora : 3.0 10<sup>4</sup> CFU/g

| Category        | #   | Sample      | Contamination |       |                  | RM: NF EN ISO 11290-1 |        |        |        |                   |                 | AM: Vidas LMX |         |                |                            | Number of positive results per method |                 |
|-----------------|-----|-------------|---------------|-------|------------------|-----------------------|--------|--------|--------|-------------------|-----------------|---------------|---------|----------------|----------------------------|---------------------------------------|-----------------|
|                 |     |             | Strain        | Type  | Level (CFU/25 g) | Half Fraser           |        | Fraser |        | Confir-<br>mation | Final<br>result | Vidas LMX     |         | Conf. 1<br>O&A | Conf. 2<br>after<br>purif. |                                       | Final<br>result |
|                 |     |             |               |       |                  | O&A                   | PALCAM | O&A    | PALCAM |                   |                 | VT            | Result  |                |                            |                                       |                 |
| Composite foods | T01 | Mixed salad | /             | /     | /                | 0;M                   | 0;M    | /      | /      | /                 | A               | 0.00          | -       | 0;M            | /                          | A                                     | RM: 0/5         |
|                 | T02 |             |               |       |                  | 0;M                   | 0;M    | /      | /      | /                 | A               | 0.00          | -       | 0;M            | /                          | A                                     |                 |
|                 | T03 |             |               |       |                  | 0;M                   | 0;M    | /      | /      | /                 | A               | 0.00          | -       | 0;L            | /                          | A                                     |                 |
|                 | T04 |             |               |       |                  | 0;M                   | 0;L    | /      | /      | /                 | A               | 0.00          | -       | 0;Ø            | /                          | A                                     |                 |
|                 | T05 |             |               |       |                  | 0;M                   | 0;M    | /      | /      | /                 | A               | 0.00          | -       | 0;M            | /                          | A                                     |                 |
|                 | M1  |             | LIS.4.5       | se    | 0.5              | 0;L                   | 0;L    | 0;M    | 0;H    | A                 | A               | 3.35          | +       | 3h+;Ø          | /                          | P                                     | RM: 3/20        |
|                 | M2  |             |               |       |                  | 0;L                   | 0;L    | 0;M    | 0;H    | A                 | A               | 0.00          | -       | 0;L            | /                          | A                                     |                 |
|                 | M3  |             |               |       |                  | 0;L                   | 0;L    | 0;M    | 0;H    | A                 | A               | 0.00          | -       | 0;L            | /                          | A                                     |                 |
|                 | M4  |             |               |       |                  | 0;Ø                   | 0;L    | 0;M    | 0;H    | A                 | A               | 0.01          | +       | 1h+;L          | /                          | P                                     |                 |
|                 | M5  |             |               |       |                  | 0;Ø                   | 0;L    | 0;M    | 0;H    | A                 | A               | 0.00          | -       | 0;L            | /                          | A                                     |                 |
|                 | M6  |             |               |       |                  | 0;Ø                   | 0;L    | 0;M    | 0;H    | A                 | A               | 0.00          | -       | 0;L            | /                          | A                                     |                 |
|                 | M7  |             |               |       |                  | 0;L                   | 0;L    | 0;M    | 0;M    | A                 | A               | 0.07          | +       | 1h+;L          | /                          | P                                     |                 |
|                 | M8  |             |               |       |                  | 0;L                   | 0;L    | 0;M    | 0;H    | A                 | A               | 0.00          | -       | 0;L            | /                          | A                                     |                 |
|                 | M9  |             |               |       |                  | 0;L                   | 0;L    | 0;M    | 0;M    | A                 | A               | 0.00          | -       | 0;L            | /                          | A                                     |                 |
|                 | M10 |             |               |       |                  | 0;Ø                   | 0;L    | 0;M    | 0;H    | A                 | A               | 0.00          | -       | 0;L            | /                          | A                                     |                 |
|                 | M11 |             |               |       | 2h+;Ø            | 2;Ø                   | 2h+;Ø  | 3;M    | P      | P                 | 0.00            | -             | 0;Ø     | /              | A                          | AM: 9/20                              |                 |
|                 | M12 |             |               |       | 2h+;Ø            | 2;Ø                   | 2h+;Ø  | 3;L    | P      | P                 | 0.00            | -             | 0;Ø     | /              | A                          |                                       |                 |
|                 | M13 |             |               |       | 0;L              | 0;L                   | 0;M    | 0;H    | A      | A                 | 3.15            | +             | 2h+;Ø   | /              | P                          |                                       |                 |
|                 | M14 |             |               |       | 0;L              | 0;L                   | 0;L    | 0;H    | A      | A                 | 0.00            | -             | 0;L     | /              | A                          |                                       |                 |
|                 | M15 |             |               |       | 0;L              | 0;L                   | 0;M    | 0;H    | A      | A                 | 0.06            | +             | 1h+;Ø   | /              | P                          |                                       |                 |
|                 | M16 | 2h+;Ø       |               |       | 2;L              | 2h+;Ø                 | 3;M    | P      | P      | 0.00              | -               | 0;M           | /       | A              |                            |                                       |                 |
|                 | M17 | 0;Ø         |               |       | 0;L              | 0;H                   | 0;H    | A      | A      | 0.00              | -               | 0;L           | /       | A              |                            |                                       |                 |
|                 | M18 | 0;L         |               |       | 0;L              | 0;M                   | 0;H    | A      | A      | 3.05              | +               | 2h+;Ø         | /       | P              |                            |                                       |                 |
|                 | M19 | 0;L         |               |       | 0;L              | 0;M                   | 0;H    | A      | A      | 3.25              | +               | 2h+;Ø         | /       | P              |                            |                                       |                 |
|                 | M20 | 0;Ø         |               |       | 0;L              | 0;M                   | 0;H    | A      | A      | 3.16              | +               | 2h+;Ø         | /       | P              |                            |                                       |                 |
| FR1             | 3.6 | 1h+;Ø       | 1;L           | 3h+;Ø | 3M               | P                     | P      | 1.84   | +      | 2h+;Ø             | /               | P             | RM: 5/5 |                |                            |                                       |                 |
| FR2             |     | 1h+;Ø       | 1;L           | 3h+;Ø | 3M               | P                     | P      | 0.07   | +      | 1h+;Ø             | /               | P             |         |                |                            |                                       |                 |
| FR3             |     | 1h+;Ø       | 1;L           | 3h+;Ø | 3M               | P                     | P      | 1.36   | +      | 2h+;Ø             | /               | P             |         |                |                            |                                       |                 |
| FR4             |     | 1h+;Ø       | 1;L           | 3h+;Ø | 3M               | P                     | P      | 1.31   | +      | 1h+;Ø             | /               | P             |         |                |                            |                                       |                 |
| FR5             |     | 1h+;Ø       | 1;L           | 3h+;Ø | 3M               | P                     | P      | 2.57   | +      | 2h+;Ø             | /               | P             |         | AM: 5/5        |                            |                                       |                 |

Total flora : 3.0 10<sup>4</sup> CFU/g

| Category        | #    | Sample         | Contamination |      |                  | RM: NF EN ISO 11290-1 |        |        |        |              |              | AM: Vidas LMX |         |                |                |                |   | Number of positive results per method |              |
|-----------------|------|----------------|---------------|------|------------------|-----------------------|--------|--------|--------|--------------|--------------|---------------|---------|----------------|----------------|----------------|---|---------------------------------------|--------------|
|                 |      |                | Strain        | Type | Level (CFU/25 g) | Half Fraser           |        | Fraser |        | Confirmation | Final result | Vidas LMX     |         | Confirmation 1 |                | Confirmation 2 |   |                                       | Final result |
|                 |      |                |               |      |                  | O&A                   | Palcam | O&A    | Palcam |              |              | VT            | Results | O&A            | ChromID L.mono | Identification |   |                                       |              |
| Composite foods | O1   | Salad of pasta | /             | /    | /                | 0h+L                  | 0h-L   | 0h+H   | 0h-L   | /            | A            | 0,00          | A       | 0L∅            | 0L∅            | /              | A | RM : 0/5                              |              |
|                 | O2   |                |               |      |                  | 0h+L                  | 0h-L   | 0h+H   | 0h-L   | /            | A            | 0,00          | A       | 0L∅            | 0L∅            | /              | A |                                       |              |
|                 | O3   |                |               |      |                  | 0h+L                  | 0h-L   | 0h+H   | 0h-L   | /            | A            | 0,00          | A       | 0∅             | 0∅             | /              | A |                                       |              |
|                 | O4   |                |               |      |                  | 0h+L                  | 0h-L   | 0h+H   | 0h-L   | /            | A            | 0,00          | A       | 0L∅            | 0L∅            | /              | A |                                       |              |
|                 | O5   |                |               |      |                  | 0h+L                  | 0h-L   | 0h+H   | 0h-L   | /            | A            | 0,00          | A       | 0∅             | 0L∅            | /              | A |                                       |              |
|                 | f1   |                | LIS.4.46      | se   | 0,8              | 2h+L                  | 2h-L   | 3h+H   | 3h-H   | L.m          | P            | 2,68          | P       | 3h+∅           | 4L             | L.m            | P | RM : 15/20                            |              |
|                 | f2   |                |               |      |                  | 3h+L                  | 3h-L   | 3h+L   | 3h-L   | L.m          | P            | 2,72          | P       | 3h+∅           | 3∅             | L.m            | P |                                       |              |
|                 | f3   |                |               |      |                  | 1h+H                  | 1h-M   | 3h+L   | 3h-M   | L.m          | P            | 0             | A       | 0L∅            | 0L∅            | /              | A |                                       |              |
|                 | f4   |                |               |      |                  | 3h+L                  | 3h-H   | 3h+L   | 3h-H   | L.m          | P            | 2,72          | P       | 4h+L           | 4∅             | L.m            | P |                                       |              |
|                 | f5   |                |               |      |                  | 2h+L                  | 2h-L   | 4h+L   | 4h-L   | L.m          | P            | 2,70          | P       | 4h+L           | 3L             | L.m            | P |                                       |              |
|                 | f6   |                |               |      |                  | 3h+M                  | 3h-M   | 3h+L   | 3h-M   | L.m          | P            | 2,69          | P       | 3h+L           | 3∅             | L.m            | P |                                       |              |
|                 | f7   |                |               |      |                  | 3h+L                  | 3h-L   | 4h+L   | 3h-L   | L.m          | P            | 2,76          | P       | 3h+L           | 3L             | L.m            | P |                                       |              |
|                 | f8   |                |               |      |                  | 0h+L                  | 0h-L   | 0h+M   | 0h-L   | /            | A            | 2,71          | P       | 4h+L           | 4L             | L.m            | P |                                       |              |
|                 | f9   |                |               |      |                  | 2h+L                  | 3h-L   | 3h+L   | 3h-M   | L.m          | P            | 0             | A       | 0L∅            | 0L∅            | /              | A |                                       |              |
|                 | f10  |                |               |      |                  | 0h+M                  | 0h-H   | 0h+M   | 0h-L   | /            | A            | 0             | A       | 0L∅            | 0L∅            | /              | A |                                       |              |
|                 | f11  |                |               |      |                  | 0h+L                  | 0h-L   | 0h+M   | 0h-L   | /            | A            | 2,60          | P       | 4h+L           | 4L             | L.m            | P |                                       |              |
|                 | f12  |                |               |      |                  | 2h+L                  | 1h-L   | 4h+L   | 3h-M   | L.m          | P            | 2,76          | P       | 3h+L           | 3L             | L.m            | P |                                       |              |
|                 | f13  |                |               |      |                  | 0h+L                  | 0h-L   | 0h+M   | 0h-L   | /            | A            | 2,66          | P       | 4h+L           | 4L             | L.m            | P |                                       |              |
|                 | f14  |                |               |      |                  | 3h+L                  | 3h-L   | 4h+L   | 3h-M   | L.m          | P            | 0             | A       | 0L∅            | 0L∅            | /              | A |                                       |              |
|                 | f15  |                |               |      |                  | 3h+L                  | 2h-L   | 3h+L   | 3h-M   | L.m          | P            | 0             | A       | 0L∅            | 0L∅            | /              | A |                                       |              |
|                 | f16  |                |               |      |                  | 3h+L                  | 2h-L   | 4h+L   | 3h-L   | L.m          | P            | 2,66          | P       | 3h+∅           | 4∅             | L.m            | P |                                       |              |
|                 | f17  |                |               |      |                  | 2h+L                  | 1h-L   | 4h+L   | 3h-L   | L.m          | P            | 2,66          | P       | 3h+∅           | 4∅             | L.m            | P |                                       |              |
|                 | f18  |                |               |      |                  | 0h+M                  | 0h-L   | 0h+M   | 0h-L   | /            | A            | 0             | A       | 0L∅            | 0L∅            | /              | A |                                       |              |
|                 | f19  |                |               |      |                  | 3h+L                  | 2h-L   | 3h+L   | 3h-L   | L.m          | P            | 2,66          | P       | 4h+L           | 4L             | L.m            | P |                                       |              |
|                 | f20  |                |               |      |                  | 2h+L                  | 2h-M   | 4h+L   | 3h-H   | L.m          | P            | 2,70          | P       | 3h+∅           | 3∅             | L.m            | P |                                       |              |
|                 | F1   |                | 3             | 3h+L | 3h-H             | 3h+L                  | 3h-H   | L.m    | P      | 2,72         | P            | 4h+L          | 4L      | L.m            | P              | RM 5/5         |   |                                       |              |
|                 | F2   |                |               | 2h+L | 3h-L             | 2h+L                  | 2h-L   | L.m    | P      | 2,74         | P            | 4h+M          | 4L      | L.m            | P              |                |   |                                       |              |
|                 | F3   |                |               | 1h+M | 3h-M             | 3h+L                  | 3h-M   | L.m    | P      | 2,69         | P            | 4h+L          | 4L      | L.m            | P              |                |   |                                       |              |
| F4              | 3h+L | 3h-L           |               | 3h+L | 2h-L             | L.m                   | P      | 2,77   | P      | 4h+L         | 4L           | L.m           | P       |                |                |                |   |                                       |              |
| F5              | 3h+L | 3h-M           |               | 4h+L | 3h-L             | L.m                   | P      | 2,71   | P      | 4h+∅         | 4∅           | L.m           | P       |                |                |                |   |                                       |              |

## **APPENDIX 5**

### **Inclusivity and exclusivity**

## Inclusivity study

| Reference  | Strain                                    | Origin               | inoculation level<br>CFU/225ml<br>LMX broth | RFV        | TV          | Test result | Isolation  |            | inoculation level<br>CFU/225ml<br>LMX broth<br>+ 25ml UHT<br>milk | RFVF         | TV          | Test result |
|------------|---|----------------------|---|------------|-------------|-------------|------------|------------|---|--------------|-------------|-------------|
|            |   |                      |   |            |             |             | OAA        | RLM        |   |              |             |             |
| L4         | <i>Listeria monocytogenes</i> 1/2a        | ATCC 35152           | 14,8  | 10265      | 2,94        | +           | +MA        | +HA        | 14,8  | 10220        | 2,92        | +           |
| L5         | <i>Listeria monocytogenes</i> 1/2a        | Smoked salmon bacon  | 3,8   | 4978       | 1,54        | +           | +MA        | +HA        | 3,8   | 11532        | 3,57        | +           |
| L6         | <i>Listeria monocytogenes</i> 1/2a        | Pizza                | 5,2   | 586        | 0,18        | +           | +LA        | +LA        |   |              |             |             |
| L7         | <i>Listeria monocytogenes</i> 1/2a        | Munster crust        | 4   | 797        | 0,24        | +           | +MA        | +MA        |   |              |             |             |
| L9         | <i>Listeria monocytogenes</i> 1/2a        | Munster crust        | 6,3   | 9151       | 2,82        | +           | +MA        | +LA        |   |              |             |             |
| L10        | <i>Listeria monocytogenes</i> 1/2a        | Rillettes            | 4   | 276        | 0,08        | +           | +MA        | +MA        | 4   | 11393        | 3,52        | +           |
| L11        | <i>Listeria monocytogenes</i> 1/2a        | Munster crust        | 5   | 8615       | 2,66        | +           | +MA        | +MA        |   |              |             |             |
| L12        | <i>Listeria monocytogenes</i> 1/2a        | Smoked salmon        | 6,5   | 1273       | 0,39        | +           | +LA        | +LA        |   |              |             |             |
| L13        | <i>Listeria monocytogenes</i> 1/2b        | Pig ear              | 3,7   | 207        | 0,06        | +           | +MA        | +MA        | 3,7   | 11516        | 3,56        | +           |
| L14        | <i>Listeria monocytogenes</i> 1/2c        | Chopped steak        | 6,2   | 596        | 0,18        | +           | +LA        | +LA        |   |              |             |             |
| <b>L15</b> | <b><i>Listeria monocytogenes</i> 1/2c</b> | <b>Beef MP</b>       | <b>4,7</b>                                  | <b>109</b> | <b>0,03</b> | <b>-</b>    | <b>+MA</b> | <b>+MA</b> | <b>4,7</b>  | <b>11720</b> | <b>3,62</b> | <b>+</b>    |
| L16        | <i>Listeria monocytogenes</i> 1/2c        | Minced meat          | 1   | 454        | 0,14        | +           | +LA        | +LA        |   |              |             |             |
| L17        | <i>Listeria monocytogenes</i> 1/2c        | Chest                | 4,7   | 374        | 0,11        | +           | +LA        | +LA        |   |              |             |             |
| L18        | <i>Listeria monocytogenes</i> 1/2c        | Munster crust        | 4,5   | 467        | 0,14        | +           | +LA        | +LA        |   |              |             |             |
| L20        | <i>Listeria monocytogenes</i> 1/2         | Smoked salmon pieces | 4,4   | 11186      | 3,89        | +           | +MA        | +MA        | 4,4   | 10390        | 3,61        | +           |
| L25        | <i>Listeria monocytogenes</i> 1/2         | Hen                  | 19,5  | 3528       | 1,10        | +           | +LA        | +MA        |   |              |             |             |
| L28        | <i>Listeria monocytogenes</i> 1/2c        | Surface sponge       | 4,3   | 10225      | 3,16        | +           | +MA        | +HA        | 4,3   | 10101        | 3,12        | +           |
| L32        | <i>Listeria monocytogenes</i> 4b          | Munster              | 19,5  | 10757      | 3,36        | +           | +MA        | +MA        |   |              |             |             |
| L33        | <i>Listeria monocytogenes</i> 4b          | ATCC 19115           | 16,5  | 10701      | 3,34        | +           | +MA        | +MA        |   |              |             |             |
| L37        | <i>Listeria monocytogenes</i> 1/2b        | Raw milk maroille    | 15  | 11679      | 3,64        | +           | +MA        | +MA        |   |              |             |             |
| L39        | <i>Listeria monocytogenes</i>             | Ham dry sausage      | 17,2  | 12106      | 3,78        | +           | +MA        | +MA        |   |              |             |             |

| Reference | Strain                             | Origin                      | inoculation level<br>CFU/225ml<br>LMX broth | RFV   | TV   | Test result | Isolation |     | inoculation level<br>CFU/225ml<br>LMX broth + 25ml UHT milk | RFVF  | TV    | Test result |
|-----------|------------------------------------|-----------------------------|---|-------|------|-------------|-----------|-----|---|-------|-------|-------------|
|           |                                    |                             |   |       |      |             | OAA       | RLM |   |       |       |             |
| L40       | <i>Listeria monocytogenes</i> 1/2a | Munster farmer              | 18,7  | 1432  | 0,44 | +           | +MA       | +MA |   |       |       |             |
| L42       | <i>Listeria monocytogenes</i> 1/2a | Chicken breast              | 18  | 10268 | 3,20 | +           | +MA       | +MA |   |       |       |             |
| L43       | <i>Listeria monocytogenes</i> 1/2a | Chopped steak               | 15  | 4700  | 1,46 | +           | +MA       | +MA |   |       |       |             |
| L44       | <i>Listeria monocytogenes</i> 1/2a | Sausage                     | 4,6   | 10362 | 3,20 | +           | +HA       | +HA | 4,6   | 10267 | 3,17  | +           |
| L45       | <i>Listeria monocytogenes</i> 1/2a | Rabbit and hazelnut terrine | 15  | 9008  | 2,81 | +           | +MA       | +MA |   |       |       |             |
| L47       | <i>Listeria monocytogenes</i> 1/2a | Hash browns                 | 6,8   | 10581 | 3,27 | +           | +MA       | +MA | 6,8   | 10359 | 3,2   | +           |
| L48       | <i>Listeria monocytogenes</i> 1/2b | Pork tongue                 | 5,9   | 11083 | 3,46 | +           | +LA       | +LA |   |       |       |             |
| L49       | <i>Listeria monocytogenes</i> 1/2b | Poultry liver cream         | 6,6   | 10308 | 3,22 | +           | +MA       | +HA |   |       |       |             |
| L51       | <i>Listeria monocytogenes</i> 1/2b | Germain matured             | 6,4   | 10947 | 3,41 | +           | +MA       | +MA |   |       |       |             |
| L52       | <i>Listeria monocytogenes</i> ½ b  | SLCC 2755                   | 6   | 2283  | 0,71 | +           | +LA       | +LA |   |       |       |             |
| L53       | <i>Listeria monocytogenes</i> 1/2c | Chopped steak               | 4,7   | 10709 | 3,31 | +           | +MA       | +MA | 4,7   | 10420 | 3,22  | +           |
| L54       | <i>Listeria monocytogenes</i> 1/2c | Beef bourguignon            | 6,6   | 313   | 0,09 | +           | +LA       | +LA |   |       |       |             |
| L55       | <i>Listeria monocytogenes</i> 3b   | SLCC 2540                   | 10,5  | 11361 | 3,54 | +           | +MA       | +MA |   |       |       |             |
| L56       | <i>Listeria monocytogenes</i> 3c   | SLCC 2479                   | 5,9   | 253   | 0,07 | +           | +LA       | +LA |   |       |       |             |
| L57       | <i>Listeria monocytogenes</i> 4a   | ATCC 19114                  | 3,2   | 12145 | 3,76 | +           | +MA       | +MA | 3,2   | 10996 | 3,4   | +           |
| L58       | <i>Listeria monocytogenes</i> 4b   | Salad                       | 7,2   | 10622 | 3,31 | +           | +MA       | +MA |   |       |       |             |
| L60       | <i>Listeria monocytogenes</i> 4d   | ATCC 19117                  | 9,3   | 10294 | 3,21 | +           | +MA       | +MA |   |       |       |             |
| L61       | <i>Listeria monocytogenes</i> 4e   | ATCC 19118                  | 4,8   | 2786  | 0,87 | +           | +LA       | +LA |   |       |       |             |
| L62       | <i>Listeria monocytogenes</i> 4e   | Reblochon                   | 3,9   | 11095 | 3,43 | +           | +MA       | +MA | 3,9   | 9830  | 3,04  | +           |
| L63       | <i>Listeria monocytogenes</i> 4e   | Munster                     | 4   | 10053 | 3,11 | +           | +MA       | +MA | 4   | 10030 | 3,1   | +           |
| L67       | <i>Listeria monocytogenes</i> 7    | SLCC 2482                   | 4,4   | 10053 | 3,11 | +           | +HA       | +HA | 4,4   | 10223 | 3,16  | +           |
| L69       | <i>Listeria monocytogenes</i>      | Sausage                     | 6   | 10310 | 3,58 | +           | +MA       | +MA | 6   | 11330 | 3,94  | +           |
| L 70      | <i>Listeria monocytogenes</i>      | Salmon Ireland              | 7,7   | 10439 | 3,63 | +           | +MA       | +HA | 7,7   | 10033 | 3,449 | +           |

| Reference | Strain                             | Origin              | inoculation level<br>CFU/225ml<br>LMX broth | RFV   | TV   | Test result | Isolation |     | inoculation level<br>CFU/225ml<br>LMX broth<br>+ 25ml UHT<br>milk | RFVF  | TV   | Test result |
|-----------|------------------------------------|---------------------|---|-------|------|-------------|-----------|-----|---|-------|------|-------------|
|           |                                    |                     |   |       |      |             | OAA       | RLM |   |       |      |             |
| L116      | <i>Listeria monocytogenes</i> 1/2a | Fish shell          | 5,5   | 10518 | 3,66 | +           | +MA       | +MA | 5,5   | 9993  | 3,47 | +           |
| L117      | <i>Listeria monocytogenes</i> 1/2c | Montbéliard sausage | 6,9   | 10698 | 3,72 | +           | +MA       | +MA | 6,9   | 10111 | 3,52 | +           |
| L119      | <i>Listeria monocytogenes</i>      | Spinach             | 17,2  | 10138 | 3,52 | +           | +MA       | +MA | 17,2  | 10667 | 3,71 | +           |
| L121      | <i>Listeria monocytogenes</i>      | Neufchâtel cheese   | 17,5  | 1284  | 0,44 | +           | +MA       | +MA | 17,5  | 10944 | 3,81 | +           |
| L123      | <i>Listeria monocytogenes</i>      | Mozzarella          | 15,8  | 9743  | 3,39 | +           | +MA       | +MA | 15,8  | 11891 | 4,14 | +           |
| L124      | <i>Listeria monocytogenes</i>      | Perch fillet        | 17,8  | 160   | 0,05 | +           | +LA       | +LA | 17,8  | 597   | 0,2  | +           |
| L125      | <i>Listeria monocytogenes</i>      | Fried vegetables    | 15,3  | 10313 | 3,59 | +           | +MA       | +MA | 15,3  | 9917  | 3,45 | +           |
| L128      | <i>Listeria monocytogenes</i> 1/2a | Soybean meal        | 13,8  | 11399 | 3,96 | +           | +MA       | +MA | 13,8  | 9747  | 3,39 | +           |
| L129      | <i>Listeria monocytogenes</i> 1/2a | Hash browns         | 2,9   | 11879 | 4,13 | +           | +MA       | +MA | 2,9   | 10140 | 3,53 | +           |
| L130      | <i>Listeria monocytogenes</i>      | Chopped steak       | 15,3  | 1517  | 0,52 | +           | +LA       | +LA | 15,3  | 10105 | 3,51 | +           |
| L137      | <i>Listeria monocytogenes</i>      | Coulommier raw milk | 13  | 689   | 0,23 | +           | +MA       | +MA | 13  | 6582  | 2,29 | +           |
| L141      | <i>Listeria monocytogenes</i>      | Environmental levy  | 15,8  | 11331 | 3,94 | +           | +MA       | +MA | 15,8  | 10661 | 3,71 | +           |
| L149      | <i>Listeria monocytogenes</i>      | Environmental levy  | 12,3  | 245   | 0,08 | +           | +LA       | +LA | 12,3  | 8121  | 2,82 | +           |
| L152      | <i>Listeria monocytogenes</i>      | Environmental levy  | 11,3  | 1510  | 0,52 | +           | +MA       | +MA | 11,3  | 8429  | 2,93 | +           |
| L156      | <i>Listeria monocytogenes</i>      | French fries        | 10,3  | 11018 | 3,83 | +           | +MA       | +MA | 10,3  | 11527 | 4,01 | +           |
| L176      | <i>Listeria monocytogenes</i>      | Beef steak          | 9,3   | 54    | 0,01 | -           | +LA       | +LA | 9,3   | 11266 | 3,92 | +           |

## Exclusivity study

| Reference | Strain                                 | Origin                    | Inoculation level in non selective broth CFU/225ml | Water bath |              |        | Heat&Go |     |        | Isolation |        |
|-----------|--|---------------------------|--|------------|--------------|--------|---------|-----|--------|-----------|--------|
|           |  |                           |  | RFV        | TV           | Result | RFV     | TV  | Result | OAA       | RLM    |
| BA2       | <i>Bacillus cereus</i>                 | Betteraves                | 4,50E+05   | 65         | 0,02         | -      | 85      | 0   | -      | /         | /      |
| BA24      | <i>Bacillus mycoïdes</i>               | Prélèvement environnement | 5,70E+05   | 136        | 0,04         | -      |         |     |        | Ø         | Ø      |
| BA4       | <i>Bacillus stearothermophilus</i>     | Produit laitier           | 3,80E+05   | 18         | 0,00         | -      | 11      | 0   | -      | /         | /      |
| BA5       | <i>Bacillus sphaericus</i>             | Produit carné             | 7,20E+05<br>6,40E+05                               | 74<br>230  | 0,02<br>0,07 | -<br>+ | 173     | 0,1 | +      | /<br>Ø    | /<br>Ø |
| E3        | <i>Streptococcus bovis</i>             | Collection                | 5,60E+05   | 3          | 0,00         | -      | 8       | 0   | -      | /         | /      |
| E8        | <i>Enterococcus durans</i>             | Produit carné             | 4,60E+05   | 17         | 0,00         | -      | 10      | 0   | -      | /         | /      |
| E17       | <i>Streptococcus equinus</i>           | Collection                | 6,00E+04   | 3          | 0,00         | -      | 4       | 0   | -      | /         | /      |
| E6        | <i>Enterococcus faecalis</i>           | Collection ATCC 19433     | 7,50E+05   | 32         | 0,00         | -      | 35      | 0   | -      | /         | /      |
| E7        | <i>Enterococcus faecium</i>            | Collection CIP 5433       | 8,40E+04   | 3          | 0,00         | -      | 3       | 0   | -      | /         | /      |
| E14       | <i>Streptococcus anginosus</i>         | Collection                | 1,50E+05   | 3          | 0,00         | -      | 4       | 0   | -      | /         | /      |
| 33        | <i>Lactobacillus casei</i>             | Produit laitier           | 4,50E+05   | 14         | 0,00         | -      | 5       | 0   | -      | /         | /      |
| L139      | <i>Jonesia denitrificans</i>           | Collection                | 1,70E+05   | 4          | 0,00         | -      |         |     |        | -LE       | Ø      |
| ST26      | <i>Staphylococcus intermedius</i>      | Collection                | 7,00E+04   | 335        | 0,10         | +      |         |     |        | Ø         | Ø      |
| ST17      | <i>Staphylococcus aureus</i>           | Yaourt glacé              | 3,90E+05   | 325        | 0,10         | +      |         |     |        | Ø         | Ø      |
| ST3       | <i>Staphylococcus epidermidis</i>      | Yaourt                    | 3,30E+05   | 36         | 0,01         | -      |         |     |        | Ø         | Ø      |
| M1        | <i>Micrococcus</i>                     | Environnement             | 3,00E+04   | 1          | 0,00         | -      | 2       | 0   | -      | /         | /      |
| L 140     | <i>Listeria seeligeri</i>              | Frites surgelées          | 1,00E+05   | 19         | 0,00         | -      |         |     |        | -LE       | -LE    |
| L 147     | <i>Listeria grayi</i>                  | ATCC 25 401               | 3,40E+04   | 4          | 0,00         | -      |         |     |        | -LA       | -MA    |
| L 148     | <i>Listeria seeligeri</i>              | Prélèvement environnement | 4,00E+04   | 7          | 0,00         | -      | 5       | 0   | -      | -LE       | -LE    |
| L 155     | <i>Listeria welshimeri</i>             | Filet de saumon           | 1,70E+05   | 103        | 0,03         | -      | 141     | 0,1 | -      | -ME       | -ME    |
| L 157     | <i>Listeria ivanovii spp. ivanovii</i> | Collection                | 1,40E+05   | 14         | 0,00         | -      |         |     |        | -LE       | -LE    |
| L179      | <i>Listeria ivanovii</i>               | Prélèvement environnement | 1,10E+05   | 11         | 0,00         | -      | 26      | 0   | -      | -ME       | -ME    |
| L170      | <i>Listeria ivanovii</i>               | Collection                | 1,20E+05   | 41         | 0,01         | -      | 96      | 0   | -      | /         | /      |
| L64       | <i>Listeria innocua</i>                | Epoisses                  | 1,20E+05   | 140        | 0,04         | -      |         |     |        | -ME       | -ME    |
| L76       | <i>Listeria innocua 6b</i>             | Steak haché               | 6,00E+04   | 132        | 0,04         | -      |         |     |        | -ME       | -ME    |
| L80       | <i>Listeria ivanovii</i>               | Collection                | 1,70E+05   | 25         | 0,00         | -      | 51      | 0   | -      | -ME       | -ME    |
| L83       | <i>Listeria seeligeri 1/2b</i>         | Langue                    | 1,40E+05   | 26         | 0,00         | -      | 17      | 0   | -      | -ME       | -ME    |
| L91       | <i>Listeria welshimeri</i>             | Rosette Aoste             | 1,30E+05   | 61         | 0,02         | -      |         |     |        | -ME       | -ME    |
| L108      | <i>Listeria innocua</i>                | Gorgonzola                | 9,50E+04   | 111        | 0,03         | -      |         |     |        | -ME       | -ME    |
| L142      | <i>Listeria seeligeri</i>              | Fromage lait cru          | 1,70E+05   | 8          | 0,00         | -      | 8       | 0   | -      | -LE       | -LE    |
| L151      | <i>Listeria ivanovii</i>               | Steak haché               | 9,50E+04   | 37         | 0,01         | -      | 21      | 0   | -      | /         | /      |

| Reference | Strain                            | Inoculation level in non selective broth CFU/225ml | Reference method |     |        |     | result | Alternative method |      |        |               |     |              |
|-----------|-----------------------------------|--|------------------|-----|--------|-----|--------|--------------------|------|--------|---------------|-----|--------------|
|           |                                   |  | half-Fraser      |     | Fraser |     |        | VIDAS LMX          |      |        | Confirmations |     | Final result |
|           |                                   |  | PAL              | OAA | PAL    | OAA |        | RFV                | VT   | Result | OAA           | RLM |              |
| BA5       | <i>Bacillus sphaericus</i>        | 3,30E+05   | -LE              | -LE | -LE    | -LE | -      | 3                  | 0,00 | -      | Ø             | Ø   | -            |
| ST17      | <i>Staphylococcus aureus</i>      | 5,50E+05   | Ø                | Ø   | -LE    | -LE | -      | 5                  | 0,00 | -      | Ø             | Ø   | -            |
| ST26      | <i>Staphylococcus intermedius</i> | 8,50E+04   | Ø                | Ø   | -LE    | -ME | -      | 3                  | 0,00 | -      | Ø             | Ø   | -            |

## **APPENDIX 6**

### **Interlaboratory study raw results**

**Expert Lab.**

| Code | Reference method ISO 11290-1 |        |        |        |        | Comparison / expected result | Code | Alternative method: VIDAS LMX |      |             |                  |        | Comparison / expected result |
|------|------------------------------|--------|--------|--------|--------|------------------------------|------|-------------------------------|------|-------------|------------------|--------|------------------------------|
|      | half-Fraser                  |        | Fraser |        | Result |                              |      | Test                          |      | Test result | Confirmation OAA | Result |                              |
|      | O & A                        | Oxford | O & A  | Oxford |        |                              |      | RFV                           | TV   |             |                  |        |                              |
| 27   | -                            | -      | -      | -      | -      | =                            | 5    | 2                             | 0,00 | -           | -                | -      | =                            |
| 28   | -                            | -      | -      | -      | -      | =                            | 6    | 2                             | 0,00 | -           | -                | -      | =                            |
| 35   | -                            | -      | -      | -      | -      | =                            | 9    | 2                             | 0,00 | -           | -                | -      | =                            |
| 36   | -                            | -      | -      | -      | -      | =                            | 10   | 2                             | 0,00 | -           | -                | -      | =                            |
| 41   | -                            | -      | -      | -      | -      | =                            | 13   | 2                             | 0,00 | -           | -                | -      | =                            |
| 42   | -                            | -      | -      | -      | -      | =                            | 14   | 2                             | 0,00 | -           | -                | -      | =                            |
| 43   | -                            | -      | -      | -      | -      | =                            | 19   | 2                             | 0,00 | -           | -                | -      | =                            |
| 44   | -                            | -      | -      | -      | -      | =                            | 20   | 1                             | 0,00 | -           | -                | -      | =                            |
| 29   | +                            | +      | +      | +      | +      | =                            | 3    | 10528                         | 2,97 | +           | +                | +      | =                            |
| 30   | +                            | +      | +      | +      | +      | =                            | 4    | 10808                         | 3,05 | +           | +                | +      | =                            |
| 31   | +                            | +      | +      | +      | +      | =                            | 11   | 33                            | 0,00 | -           | 1+               | -      | #                            |
| 32   | +                            | +      | +      | +      | +      | =                            | 12   | 11493                         | 3,24 | +           | +                | +      | =                            |
| 39   | +                            | +      | +      | +      | +      | =                            | 17   | 10887                         | 3,07 | +           | +                | +      | =                            |
| 40   | +                            | +      | +      | +      | +      | =                            | 18   | 11528                         | 3,25 | +           | +                | +      | =                            |
| 45   | +                            | +      | +      | +      | +      | =                            | 23   | 9814                          | 2,77 | +           | +                | +      | =                            |
| 46   | +                            | +      | +      | +      | +      | =                            | 24   | 10411                         | 2,94 | +           | +                | +      | =                            |
| 25   | +                            | +      | +      | +      | +      | =                            | 1    | 12659                         | 3,57 | +           | +                | +      | =                            |
| 26   | +                            | +      | +      | +      | +      | =                            | 2    | 12408                         | 3,50 | +           | +                | +      | =                            |
| 33   | +                            | +      | +      | +      | +      | =                            | 7    | 10720                         | 3,02 | +           | +                | +      | =                            |
| 34   | +                            | +      | +      | +      | +      | =                            | 8    | 9545                          | 2,69 | +           | +                | +      | =                            |
| 37   | +                            | +      | +      | +      | +      | =                            | 15   | 11665                         | 3,29 | +           | +                | +      | =                            |
| 38   | +                            | +      | +      | +      | +      | =                            | 16   | 11761                         | 3,32 | +           | +                | +      | =                            |
| 47   | +                            | +      | +      | +      | +      | =                            | 21   | 10361                         | 2,92 | +           | +                | +      | =                            |
| 48   | +                            | +      | +      | +      | +      | =                            | 22   | 10372                         | 2,92 | +           | +                | +      | =                            |

TVC (CFU/mL) : 50 000

**Lab. A**

| Code | Reference method ISO 11290-1 |        |        |        |        | Comparison / expected result | Code | Alternative method VIDAS LMX |             |                  |              | Comparison / expected result |
|------|------------------------------|--------|--------|--------|--------|------------------------------|------|------------------------------|-------------|------------------|--------------|------------------------------|
|      | half-Fraser                  |        | Fraser |        | Result |                              |      | Test                         | Test result | Confirmation OAA | Final result |                              |
|      | O & A                        | Oxford | O & A  | Oxford |        |                              |      | TV                           |             |                  |              |                              |
| 27   | -                            | -      | -      | -      | -      | =                            | 5    | 0,00                         | -           | -                | -            | =                            |
| 28   | -                            | -      | -      | -      | -      | =                            | 6    | 0,00                         | -           | -                | -            | =                            |
| 35   | -                            | -      | -      | -      | -      | =                            | 9    | 0,00                         | -           | -                | -            | =                            |
| 36   | -                            | -      | -      | -      | -      | =                            | 10   | 0,00                         | -           | -                | -            | =                            |
| 41   | -                            | -      | -      | -      | -      | =                            | 13   | 0,00                         | -           | -                | -            | =                            |
| 42   | -                            | -      | -      | -      | -      | =                            | 14   | 0,00                         | -           | -                | -            | =                            |
| 43   | -                            | -      | -      | -      | -      | =                            | 19   | 0,00                         | -           | -                | -            | =                            |
| 44   | -                            | -      | -      | -      | -      | =                            | 20   | 0,00                         | -           | -                | -            | =                            |
| 29   | +                            | +      | +      | +      | +      | =                            | 3    | 2,51                         | +           | +                | +            | =                            |
| 30   | +                            | +      | +      | +      | +      | =                            | 4    | 2,50                         | +           | +                | +            | =                            |
| 31   | +                            | +      | +      | +      | +      | =                            | 11   | 2,57                         | +           | +                | +            | =                            |
| 32   | +                            | +      | +      | +      | +      | =                            | 12   | 2,57                         | +           | +                | +            | =                            |
| 39   | +                            | +      | +      | +      | +      | =                            | 17   | 2,52                         | +           | +                | +            | =                            |
| 40   | +                            | +      | +      | +      | +      | =                            | 18   | 2,51                         | +           | +                | +            | =                            |
| 45   | +                            | +      | +      | +      | +      | =                            | 23   | 2,69                         | +           | +                | +            | =                            |
| 46   | +                            | +      | +      | +      | +      | =                            | 24   | 2,71                         | +           | +                | +            | =                            |
| 25   | +                            | +      | +      | +      | +      | =                            | 1    | 2,35                         | +           | +                | +            | =                            |
| 26   | +                            | -      | +      | +      | +      | =                            | 2    | 2,55                         | +           | +                | +            | =                            |
| 33   | +                            | +      | +      | +      | +      | =                            | 7    | 2,39                         | +           | +                | +            | =                            |
| 34   | +                            | -      | +      | +      | +      | =                            | 8    | 1,94                         | +           | +                | +            | =                            |
| 37   | +                            | +      | +      | +      | +      | =                            | 15   | 2,45                         | +           | +                | +            | =                            |
| 38   | +                            | +      | +      | +      | +      | =                            | 16   | 1,60                         | +           | +                | +            | =                            |
| 47   | +                            | +      | +      | +      | +      | =                            | 21   | 2,51                         | +           | +                | +            | =                            |
| 48   | +                            | +      | +      | +      | +      | =                            | 22   | 2,64                         | +           | +                | +            | =                            |

TVC (CFU/mL) : <1

**Lab. B**

| Code | Reference method ISO 11290-1 |     |        |     |        | Comparison / expected result | Code | Alternative method VIDAS LMX |             |                  |              | Comparison / expected result |
|------|------------------------------|-----|--------|-----|--------|------------------------------|------|------------------------------|-------------|------------------|--------------|------------------------------|
|      | half-Fraser                  |     | Fraser |     | Result |                              |      | Test TV                      | Test result | Confirmation OAA | Final result |                              |
|      | O & A                        | OAA | O & A  | OAA |        |                              |      |                              |             |                  |              |                              |
| 27   | -                            | -   | -      | -   | -      | =                            | 5    | 0,00                         | -           | -                | -            | =                            |
| 28   | -                            | -   | -      | -   | -      | =                            | 6    | 0,00                         | -           | -                | -            | =                            |
| 35   | -                            | -   | -      | -   | -      | =                            | 9    | 0,00                         | -           | -                | -            | =                            |
| 36   | -                            | -   | -      | -   | -      | =                            | 10   | 0,00                         | -           | -                | -            | =                            |
| 41   | -                            | -   | -      | -   | -      | =                            | 13   | 0,00                         | -           | -                | -            | =                            |
| 42   | -                            | -   | -      | -   | -      | =                            | 14   | 0,00                         | -           | -                | -            | =                            |
| 43   | -                            | -   | -      | -   | -      | =                            | 19   | 0,00                         | -           | -                | -            | =                            |
| 44   | -                            | -   | -      | -   | -      | =                            | 20   | 0,00                         | -           | -                | -            | =                            |
| 29   | +                            | +   | +      | +   | +      | =                            | 3    | 2,59                         | +           | +                | +            | =                            |
| 30   | +                            | +   | +      | +   | +      | =                            | 4    | 2,41                         | +           | +                | +            | =                            |
| 31   | +                            | +   | +      | +   | +      | =                            | 11   | 2,37                         | +           | +                | +            | =                            |
| 32   | +                            | +   | +      | +   | +      | =                            | 12   | 2,39                         | +           | +                | +            | =                            |
| 39   | +                            | +   | +      | +   | +      | =                            | 17   | 2,58                         | +           | +                | +            | =                            |
| 40   | +                            | +   | +      | +   | +      | =                            | 18   | 2,69                         | +           | +                | +            | =                            |
| 45   | +                            | +   | +      | +   | +      | =                            | 23   | 2,48                         | +           | +                | +            | =                            |
| 46   | +                            | +   | +      | +   | +      | =                            | 24   | 2,40                         | +           | +                | +            | =                            |
| 25   | +                            | +   | +      | +   | +      | =                            | 1    | 2,27                         | +           | +                | +            | =                            |
| 26   | +                            | +   | +      | +   | +      | =                            | 2    | 1,60                         | +           | +                | +            | =                            |
| 33   | +                            | +   | +      | +   | +      | =                            | 7    | 2,22                         | +           | +                | +            | =                            |
| 34   | +                            | +   | +      | +   | +      | =                            | 8    | 2,51                         | +           | +                | +            | =                            |
| 37   | +                            | +   | +      | +   | +      | =                            | 15   | 1,38                         | +           | +                | +            | =                            |
| 38   | +                            | +   | +      | +   | +      | =                            | 16   | 0,51                         | +           | +                | +            | =                            |
| 47   | +                            | +   | +      | +   | +      | =                            | 21   | 1,95                         | +           | +                | +            | =                            |
| 48   | +                            | +   | +      | +   | +      | =                            | 22   | 1,32                         | +           | +                | +            | =                            |

TVC (CFU/mL) : 1 900

**Lab. C**

| Code | Reference method ISO 11290-1 |        |        |        |        | Comparison / expected result | Code | Alternative method VIDAS LMX |             |                  |              | Comparison / expected result |
|------|------------------------------|--------|--------|--------|--------|------------------------------|------|------------------------------|-------------|------------------|--------------|------------------------------|
|      | half-Fraser                  |        | Fraser |        | Result |                              |      | Test TV                      | Test result | Confirmation OAA | Final result |                              |
|      | O & A                        | Oxford | O & A  | Oxford |        |                              |      |                              |             |                  |              |                              |
| 27   | -                            | -      | -      | -      | -      | =                            | 5    | 0,00                         | -           | -                | -            | =                            |
| 28   | -                            | -      | -      | -      | -      | =                            | 6    | 0,00                         | -           | -                | -            | =                            |
| 35   | -                            | -      | -      | -      | -      | =                            | 9    | 0,00                         | -           | -                | -            | =                            |
| 36   | -                            | -      | -      | -      | -      | =                            | 10   | 0,00                         | -           | -                | -            | =                            |
| 41   | -                            | -      | -      | -      | -      | =                            | 13   | 0,00                         | -           | -                | -            | =                            |
| 42   | -                            | -      | -      | -      | -      | =                            | 14   | 0,00                         | -           | -                | -            | =                            |
| 43   | -                            | -      | -      | -      | -      | =                            | 19   | 0,00                         | -           | -                | -            | =                            |
| 44   | -                            | -      | -      | -      | -      | =                            | 20   | 0,00                         | -           | -                | -            | =                            |
| 29   | +                            | +      | +      | +      | +      | =                            | 3    | 2,31                         | +           | +                | +            | =                            |
| 30   | +                            | +      | +      | +      | +      | =                            | 4    | 2,18                         | +           | +                | +            | =                            |
| 31   | +                            | +      | +      | +      | +      | =                            | 11   | 2,34                         | +           | +                | +            | =                            |
| 32   | +                            | +      | +      | +      | +      | =                            | 12   | 2,20                         | +           | +                | +            | =                            |
| 39   | +                            | +      | +      | +      | +      | =                            | 17   | 2,49                         | +           | +                | +            | =                            |
| 40   | +                            | +      | +      | +      | +      | =                            | 18   | 2,49                         | +           | +                | +            | =                            |
| 45   | +                            | +      | +      | +      | +      | =                            | 23   | 2,55                         | +           | +                | +            | =                            |
| 46   | +                            | +      | +      | +      | +      | =                            | 24   | 2,45                         | +           | +                | +            | =                            |
| 25   | +                            | +      | +      | +      | +      | =                            | 1    | 2,62                         | +           | +                | +            | =                            |
| 26   | +                            | +      | +      | +      | +      | =                            | 2    | 2,55                         | +           | +                | +            | =                            |
| 33   | +                            | +      | +      | +      | +      | =                            | 7    | 2,57                         | +           | +                | +            | =                            |
| 34   | +                            | +      | +      | +      | +      | =                            | 8    | 2,61                         | +           | +                | +            | =                            |
| 37   | +                            | +      | +      | +      | +      | =                            | 15   | 1,98                         | +           | +                | +            | =                            |
| 38   | +                            | +      | +      | +      | +      | =                            | 16   | 2,43                         | +           | +                | +            | =                            |
| 47   | +                            | +      | +      | +      | +      | =                            | 21   | 2,73                         | +           | +                | +            | =                            |
| 48   | +                            | +      | +      | +      | +      | =                            | 22   | 2,71                         | +           | +                | +            | =                            |

TVC (CFU/mL) : 1200

**Lab. D**

| Code | Reference method ISO 11290-1 |        |        |        |        | Comparison / expected result | Code | Alternative method VIDAS LMX |             |                           |              | Comparison / expected result |
|------|------------------------------|--------|--------|--------|--------|------------------------------|------|------------------------------|-------------|---------------------------|--------------|------------------------------|
|      | half-Fraser                  |        | Fraser |        | Result |                              |      | Test TV                      | Test result | Confirmation Chrom ID OAA | Final result |                              |
|      | O & A                        | Oxford | O & A  | Oxford |        |                              |      |                              |             |                           |              |                              |
| 27   | -                            | -      | -      | -      | -      | =                            | 5    | 0,00                         | -           | -                         | -            | =                            |
| 28   | -                            | -      | -      | -      | -      | =                            | 6    | 0,00                         | -           | -                         | -            | =                            |
| 35   | -                            | -      | -      | -      | -      | =                            | 9    | 0,00                         | -           | -                         | -            | =                            |
| 36   | -                            | -      | -      | -      | -      | =                            | 10   | 0,00                         | -           | -                         | -            | =                            |
| 41   | -                            | -      | -      | -      | -      | =                            | 13   | 0,00                         | -           | -                         | -            | =                            |
| 42   | -                            | -      | -      | -      | -      | =                            | 14   | 0,00                         | -           | -                         | -            | =                            |
| 43   | -                            | -      | -      | -      | -      | =                            | 19   | 0,00                         | -           | -                         | -            | =                            |
| 44   | -                            | -      | -      | -      | -      | =                            | 20   | 0,00                         | -           | -                         | -            | =                            |
| 29   | +                            | +      | +      | +      | +      | =                            | 3    | 3,32                         | +           | +                         | +            | =                            |
| 30   | +                            | +      | +      | +      | +      | =                            | 4    | 3,38                         | +           | +                         | +            | =                            |
| 31   | +                            | +      | +      | +      | +      | =                            | 11   | 3,41                         | +           | +                         | +            | =                            |
| 32   | +                            | +      | +      | +      | +      | =                            | 12   | 3,33                         | +           | +                         | +            | =                            |
| 39   | +                            | +      | +      | +      | +      | =                            | 17   | 3,33                         | +           | +                         | +            | =                            |
| 40   | +                            | +      | +      | +      | +      | =                            | 18   | 3,01                         | +           | +                         | +            | =                            |
| 45   | +                            | +      | +      | +      | +      | =                            | 23   | 3,35                         | +           | +                         | +            | =                            |
| 46   | +                            | +      | +      | +      | +      | =                            | 24   | 3,44                         | +           | +                         | +            | =                            |
| 25   | +                            | +      | +      | +      | +      | =                            | 1    | 2,41                         | +           | +                         | +            | =                            |
| 26   | +                            | +      | +      | +      | +      | =                            | 2    | 2,92                         | +           | +                         | +            | =                            |
| 33   | +                            | +      | +      | +      | +      | =                            | 7    | 1,75                         | +           | +                         | +            | =                            |
| 34   | +                            | +      | +      | +      | +      | =                            | 8    | 1,43                         | +           | +                         | +            | =                            |
| 37   | +                            | +      | +      | +      | +      | =                            | 15   | 1,30                         | +           | +                         | +            | =                            |
| 38   | +                            | +      | +      | +      | +      | =                            | 16   | 1,05                         | +           | +                         | +            | =                            |
| 47   | +                            | +      | +      | +      | +      | =                            | 21   | 1,86                         | +           | +                         | +            | =                            |
| 48   | +                            | +      | +      | +      | +      | =                            | 22   | 1,12                         | +           | +                         | +            | =                            |

TVC (CFU/mL) : 1 500

**Lab. E**

| Code | Reference method ISO 11290-1 |        |        |        | Result | Comparison / expected result | Code | Alternative method VIDAS LMX |             |                  |              | Comparison / expected result |
|------|------------------------------|--------|--------|--------|--------|------------------------------|------|------------------------------|-------------|------------------|--------------|------------------------------|
|      | half-Fraser                  |        | Fraser |        |        |                              |      | Test TV                      | Test result | Confirmation OAA | Final result |                              |
|      | O & A                        | Oxford | O & A  | Oxford |        |                              |      |                              |             |                  |              |                              |
| 27   | -                            | -      | -      | -      | -      | =                            | 5    | 0,00                         | -           | -                | -            | =                            |
| 28   | -                            | -      | -      | -      | -      | =                            | 6    | 0,00                         | -           | -                | -            | =                            |
| 35   | -                            | -      | -      | -      | -      | =                            | 9    | 0,00                         | -           | -                | -            | =                            |
| 36   | -                            | -      | -      | -      | -      | =                            | 10   | 0,00                         | -           | -                | -            | =                            |
| 41   | -                            | -      | -      | -      | -      | =                            | 13   | 0,00                         | -           | -                | -            | =                            |
| 42   | -                            | -      | -      | -      | -      | =                            | 14   | 0,00                         | -           | -                | -            | =                            |
| 43   | -                            | -      | -      | -      | -      | =                            | 19   | 0,00                         | -           | -                | -            | =                            |
| 44   | -                            | -      | -      | -      | -      | =                            | 20   | 0,00                         | -           | -                | -            | =                            |
| 29   | +                            | +      | +      | +      | +      | =                            | 3    | 3,54                         | +           | +                | +            | =                            |
| 30   | +                            | +      | +      | +      | +      | =                            | 4    | 3,52                         | +           | +                | +            | =                            |
| 31   | +                            | +      | +      | +      | +      | =                            | 11   | 3,48                         | +           | +                | +            | =                            |
| 32   | +                            | +      | +      | +      | +      | =                            | 12   | 3,51                         | +           | +                | +            | =                            |
| 39   | +                            | +      | +      | +      | +      | =                            | 17   | 3,62                         | +           | +                | +            | =                            |
| 40   | +                            | +      | +      | +      | +      | =                            | 18   | 3,63                         | +           | +                | +            | =                            |
| 45   | +                            | +      | +      | +      | +      | =                            | 23   | 3,59                         | +           | +                | +            | =                            |
| 46   | +                            | +      | +      | +      | +      | =                            | 24   | 3,58                         | +           | +                | +            | =                            |
| 25   | +                            | +      | +      | +      | +      | =                            | 1    | 0,55                         | +           | +                | +            | =                            |
| 26   | +                            | +      | +      | +      | +      | =                            | 2    | 1,26                         | +           | +                | +            | =                            |
| 33   | +                            | +      | +      | +      | +      | =                            | 7    | 0,46                         | +           | +                | +            | =                            |
| 34   | +                            | +      | +      | +      | +      | =                            | 8    | 0,65                         | +           | +                | +            | =                            |
| 37   | +                            | +      | +      | +      | +      | =                            | 15   | 0,39                         | +           | +                | +            | =                            |
| 38   | +                            | +      | +      | +      | +      | =                            | 16   | 0,54                         | +           | +                | +            | =                            |
| 47   | +                            | +      | +      | +      | +      | =                            | 21   | 0,27                         | +           | +                | +            | =                            |
| 48   | +                            | +      | +      | +      | +      | =                            | 22   | 0,38                         | +           | +                | +            | =                            |

TVC (CFU/mL) : 3 900

**Lab. G**

| Code | Reference method ISO 11290-1 |        |        |        | Result | Comparison / expected result | Code | Alternative method VIDAS LMX |             |                  |              | Comparison / expected result |
|------|------------------------------|--------|--------|--------|--------|------------------------------|------|------------------------------|-------------|------------------|--------------|------------------------------|
|      | half-Fraser                  |        | Fraser |        |        |                              |      | Test TV                      | Test result | Confirmation OAA | Final result |                              |
|      | O & A                        | Oxford | O & A  | Oxford |        |                              |      |                              |             |                  |              |                              |
| 27   | -                            | -      | -      | -      | -      | =                            | 5    | 0,00                         | -           | -                | -            | =                            |
| 28   | -                            | -      | -      | -      | -      | =                            | 6    | 0,00                         | -           | -                | -            | =                            |
| 35   | -                            | -      | -      | -      | -      | =                            | 9    | 0,00                         | -           | -                | -            | =                            |
| 36   | -                            | -      | -      | -      | -      | =                            | 10   | 0,00                         | -           | -                | -            | =                            |
| 41   | -                            | -      | -      | -      | -      | =                            | 13   | 0,00                         | -           | -                | -            | =                            |
| 42   | -                            | -      | -      | -      | -      | =                            | 14   | 0,00                         | -           | -                | -            | =                            |
| 43   | -                            | -      | -      | -      | -      | =                            | 19   | 0,00                         | -           | -                | -            | =                            |
| 44   | -                            | -      | -      | -      | -      | =                            | 20   | 0,00                         | -           | -                | -            | =                            |
| 29   | +                            | +      | +      | +      | +      | =                            | 3    | 3,14                         | +           | +                | +            | =                            |
| 30   | +                            | +      | +      | +      | +      | =                            | 4    | 3,12                         | +           | +                | +            | =                            |
| 31   | +                            | +      | +      | +      | +      | =                            | 11   | 2,92                         | +           | +                | +            | =                            |
| 32   | +                            | +      | +      | +      | +      | =                            | 12   | 2,97                         | +           | +                | +            | =                            |
| 39   | +                            | +      | +      | +      | +      | =                            | 17   | 3,24                         | +           | +                | +            | =                            |
| 40   | +                            | +      | +      | +      | +      | =                            | 18   | 3,32                         | +           | +                | +            | =                            |
| 45   | +                            | +      | +      | +      | +      | =                            | 23   | 3,21                         | +           | +                | +            | =                            |
| 46   | +                            | +      | +      | +      | +      | =                            | 24   | 3,23                         | +           | +                | +            | =                            |
| 25   | +                            | +      | +      | +      | +      | =                            | 1    | 3,44                         | +           | +                | +            | =                            |
| 26   | +                            | +      | +      | +      | +      | =                            | 2    | 3,41                         | +           | +                | +            | =                            |
| 33   | +                            | +      | +      | +      | +      | =                            | 7    | 3,36                         | +           | +                | +            | =                            |
| 34   | +                            | +      | +      | +      | +      | =                            | 8    | 3,24                         | +           | +                | +            | =                            |
| 37   | +                            | +      | +      | +      | +      | =                            | 15   | 3,56                         | +           | +                | +            | =                            |
| 38   | +                            | +      | +      | +      | +      | =                            | 16   | 3,54                         | +           | +                | +            | =                            |
| 47   | +                            | +      | +      | +      | +      | =                            | 21   | 3,54                         | +           | +                | +            | =                            |
| 48   | +                            | +      | +      | +      | +      | =                            | 22   | 3,64                         | +           | +                | +            | =                            |

TVC (CFU/mL) :

**Lab. H**

| Code | Méthode de référence ISO 11290-1 |           |        |           | Result | Comparaison / Résultat attendu | Code | Alternative method VIDAS LMX |             |              |              | Comparison / expected result |
|------|----------------------------------|-----------|--------|-----------|--------|--------------------------------|------|------------------------------|-------------|--------------|--------------|------------------------------|
|      | half-Fraser                      |           | Fraser |           |        |                                |      | Test TV                      | Test result | Confirmation | Final result |                              |
|      | O & A                            | 2nd media | O & A  | 2nd media |        |                                |      |                              |             |              |              |                              |
| 27   | -                                | -         | -      | -         | -      | =                              | 5    | 0,00                         | -           | -            | -            | =                            |
| 28   | -                                | -         | -      | -         | -      | =                              | 6    | 0,00                         | -           | -            | -            | =                            |
| 35   | -                                | -         | -      | -         | -      | =                              | 9    | 0,00                         | -           | -            | -            | =                            |
| 36   | -                                | -         | -      | -         | -      | =                              | 10   | 0,00                         | -           | -            | -            | =                            |
| 41   | -                                | -         | -      | -         | -      | =                              | 13   | 0,00                         | -           | -            | -            | =                            |
| 42   | -                                | -         | -      | -         | -      | =                              | 14   | 0,00                         | -           | -            | -            | =                            |
| 43   | -                                | -         | -      | -         | -      | =                              | 19   | 0,00                         | -           | -            | -            | =                            |
| 44   | -                                | -         | -      | -         | -      | =                              | 20   | 0,00                         | -           | -            | -            | =                            |
| 29   | +                                | +         | +      | +         | +      | =                              | 3    | 3,23                         | +           | +            | +            | =                            |
| 30   | +                                | +         | +      | +         | +      | =                              | 4    | 3,17                         | +           | +            | +            | =                            |
| 31   | +                                | +         | +      | +         | +      | =                              | 11   | 3,01                         | +           | +            | +            | =                            |
| 32   | +                                | +         | +      | +         | +      | =                              | 12   | 2,99                         | +           | +            | +            | =                            |
| 39   | +                                | +         | +      | +         | +      | =                              | 17   | 3,17                         | +           | +            | +            | =                            |
| 40   | +                                | +         | +      | +         | +      | =                              | 18   | 3,23                         | +           | +            | +            | =                            |
| 45   | +                                | +         | +      | +         | +      | =                              | 23   | 3,27                         | +           | +            | +            | =                            |
| 46   | +                                | +         | +      | +         | +      | =                              | 24   | 3,14                         | +           | +            | +            | =                            |
| 25   | +                                | +         | +      | +         | +      | =                              | 1    | 0,65                         | +           | +            | +            | =                            |
| 26   | +                                | +         | +      | +         | +      | =                              | 2    | 1,87                         | +           | +            | +            | =                            |
| 33   | +                                | +         | +      | +         | +      | =                              | 7    | 2,13                         | +           | +            | +            | =                            |
| 34   | +                                | +         | +      | +         | +      | =                              | 8    | 1,41                         | +           | +            | +            | =                            |
| 37   | +                                | +         | +      | +         | +      | =                              | 15   | 0,00                         | -           | -            | -            | #                            |
| 38   | +                                | +         | +      | +         | +      | =                              | 16   | 0,00                         | -           | -            | -            | #                            |
| 47   | +                                | +         | +      | +         | +      | =                              | 21   | 0,00                         | -           | -            | -            | #                            |
| 48   | +                                | +         | +      | +         | +      | =                              | 22   | 0,00                         | -           | -            | -            | #                            |

TVC (CFU/mL): 4 300

**Lab. I**

| Code | Reference method ISO 11290-1 |        |        |        |        | Comparison / expected result | Code | Alternative method VIDAS LMX |             |                  |              | Comparison / expected result |
|------|------------------------------|--------|--------|--------|--------|------------------------------|------|------------------------------|-------------|------------------|--------------|------------------------------|
|      | half-Fraser                  |        | Fraser |        | Result |                              |      | Test TV                      | Test result | Confirmation OAA | Final result |                              |
|      | O & A                        | Oxford | O & A  | Oxford |        |                              |      |                              |             |                  |              |                              |
| 27   | -                            | -      | -      | -      | -      | =                            | 5    | 0,00                         | -           | -                | -            | =                            |
| 28   | -                            | -      | -      | -      | -      | =                            | 6    | 0,00                         | -           | -                | -            | =                            |
| 35   | -                            | -      | -      | -      | -      | =                            | 9    | 0,00                         | -           | -                | -            | =                            |
| 36   | -                            | -      | -      | -      | -      | =                            | 10   | 0,00                         | -           | -                | -            | =                            |
| 41   | -                            | -      | -      | -      | -      | =                            | 13   | 0,00                         | -           | -                | -            | =                            |
| 42   | -                            | -      | -      | -      | -      | =                            | 14   | 0,00                         | -           | -                | -            | =                            |
| 43   | -                            | -      | -      | -      | -      | =                            | 19   | 0,00                         | -           | -                | -            | =                            |
| 44   | -                            | -      | -      | -      | -      | =                            | 20   | 0,00                         | -           | -                | -            | =                            |
| 29   | +                            | +      | +      | +      | +      | =                            | 3    | 3,35                         | +           | +                | +            | =                            |
| 30   | +                            | +      | +      | +      | +      | =                            | 4    | 3,35                         | +           | +                | +            | =                            |
| 31   | +                            | +      | +      | +      | +      | =                            | 11   | 3,32                         | +           | +                | +            | =                            |
| 32   | +                            | +      | +      | +      | +      | =                            | 12   | 3,23                         | +           | +                | +            | =                            |
| 39   | +                            | +      | +      | +      | +      | =                            | 17   | 3,14                         | +           | +                | +            | =                            |
| 40   | +                            | +      | +      | +      | +      | =                            | 18   | 3,17                         | +           | +                | +            | =                            |
| 45   | +                            | +      | +      | +      | +      | =                            | 23   | 3,13                         | +           | +                | +            | =                            |
| 46   | +                            | +      | +      | +      | +      | =                            | 24   | 3,08                         | +           | +                | +            | =                            |
| 25   | +                            | +      | +      | +      | +      | =                            | 1    | 3,26                         | +           | +                | +            | =                            |
| 26   | +                            | +      | +      | +      | +      | =                            | 2    | 3,35                         | +           | +                | +            | =                            |
| 33   | +                            | +      | +      | +      | +      | =                            | 7    | 3,24                         | +           | +                | +            | =                            |
| 34   | +                            | +      | +      | +      | +      | =                            | 8    | 3,28                         | +           | +                | +            | =                            |
| 37   | +                            | +      | +      | +      | +      | =                            | 15   | 3,31                         | +           | +                | +            | =                            |
| 38   | +                            | +      | +      | +      | +      | =                            | 16   | 2,61                         | +           | +                | +            | =                            |
| 47   | +                            | +      | +      | +      | +      | =                            | 21   | 3,28                         | +           | +                | +            | =                            |
| 48   | +                            | +      | +      | +      | +      | =                            | 22   | 3,21                         | +           | +                | +            | =                            |

TVC (CFU/mL): 1 600

**Lab. J**

| Code | Reference method ISO 11290-1 |        |        |        |        | Comparison / expected result | Code | Alternative method VIDAS LMX |             |                  |              | Comparison / expected result |
|------|------------------------------|--------|--------|--------|--------|------------------------------|------|------------------------------|-------------|------------------|--------------|------------------------------|
|      | half-Fraser                  |        | Fraser |        | Result |                              |      | Test TV                      | Test result | Confirmation OAA | Final result |                              |
|      | O & A                        | Oxford | O & A  | Oxford |        |                              |      |                              |             |                  |              |                              |
| 27   | -                            | -      | -      | -      | -      | =                            | 5    | 0,00                         | -           | -                | -            | =                            |
| 28   | -                            | -      | -      | -      | -      | =                            | 6    | 0,00                         | -           | -                | -            | =                            |
| 35   | -                            | -      | -      | -      | -      | =                            | 9    | 0,00                         | -           | -                | -            | =                            |
| 36   | -                            | -      | -      | -      | -      | =                            | 10   | 0,00                         | -           | -                | -            | =                            |
| 41   | -                            | -      | -      | -      | -      | =                            | 13   | 0,00                         | -           | -                | -            | =                            |
| 42   | -                            | -      | -      | -      | -      | =                            | 14   | 0,00                         | -           | -                | -            | =                            |
| 43   | -                            | -      | -      | -      | -      | =                            | 19   | 0,00                         | -           | -                | -            | =                            |
| 44   | -                            | -      | -      | -      | -      | =                            | 20   | 0,00                         | -           | -                | -            | =                            |
| 29   | +                            | +      | +      | +      | +      | =                            | 3    | 2,78                         | +           | +                | +            | =                            |
| 30   | +                            | +      | +      | +      | +      | =                            | 4    | 2,80                         | +           | +                | +            | =                            |
| 31   | +                            | +      | +      | +      | +      | =                            | 11   | 2,86                         | +           | +                | +            | =                            |
| 32   | +                            | +      | +      | +      | +      | =                            | 12   | 2,82                         | +           | +                | +            | =                            |
| 39   | +                            | +      | +      | +      | +      | =                            | 17   | 2,86                         | +           | +                | +            | =                            |
| 40   | +                            | +      | +      | +      | +      | =                            | 18   | 2,77                         | +           | +                | +            | =                            |
| 45   | +                            | +      | +      | +      | +      | =                            | 23   | 2,78                         | +           | +                | +            | =                            |
| 46   | +                            | +      | +      | +      | +      | =                            | 24   | 2,81                         | +           | +                | +            | =                            |
| 25   | +                            | +      | +      | +      | +      | =                            | 1    | 2,66                         | +           | +                | +            | =                            |
| 26   | -                            | -      | -      | -      | -      | #                            | 2    | 2,93                         | +           | +                | +            | =                            |
| 33   | +                            | +      | +      | +      | +      | =                            | 7    | 2,83                         | +           | +                | +            | =                            |
| 34   | +                            | +      | +      | +      | +      | =                            | 8    | 2,55                         | +           | +                | +            | =                            |
| 37   | +                            | +      | +      | +      | +      | =                            | 15   | 0,68                         | +           | +                | +            | =                            |
| 38   | +                            | +      | +      | +      | +      | =                            | 16   | 1,41                         | +           | +                | +            | =                            |
| 47   | +                            | +      | +      | +      | +      | =                            | 21   | 2,60                         | +           | +                | +            | =                            |
| 48   | +                            | +      | +      | +      | +      | =                            | 22   | 2,33                         | +           | +                | +            | =                            |

TVC (CFU/mL): 17000

**Lab. K**

| Code | Méthode de référence ISO 11290-1 |           |        |           |        | Comparaison / Résultat attendu | Code | Alternative method VIDAS LMX |             |              |              | Comparison / expected result |
|------|----------------------------------|-----------|--------|-----------|--------|--------------------------------|------|------------------------------|-------------|--------------|--------------|------------------------------|
|      | half-Fraser                      |           | Fraser |           | Result |                                |      | Test TV                      | Test result | Confirmation | Final result |                              |
|      | O & A                            | 2nd media | O & A  | 2nd media |        |                                |      |                              |             |              |              |                              |
| 27   | -                                | -         | -      | -         | -      | =                              | 5    | 0,00                         | -           | -            | -            | =                            |
| 28   | -                                | -         | -      | -         | -      | =                              | 6    | 0,00                         | -           | -            | -            | =                            |
| 35   | -                                | -         | -      | -         | -      | =                              | 9    | 0,00                         | -           | -            | -            | =                            |
| 36   | -                                | -         | -      | -         | -      | =                              | 10   | 0,00                         | -           | -            | -            | =                            |
| 41   | -                                | -         | -      | -         | -      | =                              | 13   | 0,00                         | -           | -            | -            | =                            |
| 42   | -                                | -         | -      | -         | -      | =                              | 14   | 0,00                         | -           | -            | -            | =                            |
| 43   | -                                | -         | -      | -         | -      | =                              | 19   | 0,00                         | -           | -            | -            | =                            |
| 44   | -                                | -         | -      | -         | -      | =                              | 20   | 0,00                         | -           | -            | -            | =                            |
| 29   | +                                | +         | +      | +         | +      | =                              | 3    | 3,06                         | +           | +            | +            | =                            |
| 30   | +                                | +         | +      | +         | +      | =                              | 4    | 2,99                         | +           | +            | +            | =                            |
| 31   | +                                | +         | +      | +         | +      | =                              | 11   | 2,97                         | +           | +            | +            | =                            |
| 32   | +                                | +         | +      | +         | +      | =                              | 12   | 2,92                         | +           | +            | +            | =                            |
| 39   | +                                | +         | +      | +         | +      | =                              | 17   | 3,01                         | +           | +            | +            | =                            |
| 40   | +                                | +         | +      | +         | +      | =                              | 18   | 2,94                         | +           | +            | +            | =                            |
| 45   | +                                | +         | +      | +         | +      | =                              | 23   | 3,04                         | +           | +            | +            | =                            |
| 46   | +                                | +         | +      | +         | +      | =                              | 24   | 2,85                         | +           | +            | +            | =                            |
| 25   | -                                | -         | -      | -         | -      | #                              | 1    | 3,07                         | +           | +            | +            | =                            |
| 26   | +                                | +         | +      | +         | +      | =                              | 2    | 2,89                         | +           | +            | +            | =                            |
| 33   | +                                | +         | +      | +         | +      | =                              | 7    | 2,96                         | +           | +            | +            | =                            |
| 34   | +                                | +         | +      | +         | +      | =                              | 8    | 2,18                         | +           | +            | +            | =                            |
| 37   | +                                | +         | +      | +         | +      | =                              | 15   | 3,13                         | +           | +            | +            | =                            |
| 38   | +                                | +         | +      | +         | +      | =                              | 16   | 1,59                         | +           | +            | +            | =                            |
| 47   | +                                | +         | +      | +         | +      | =                              | 21   | 2,35                         | +           | +            | +            | =                            |
| 48   | +                                | +         | +      | +         | +      | =                              | 22   | 0,00                         | -           | -            | -            | #                            |

TVC (CFU/mL): 2 000

**Lab. L**

| Code | Reference method ISO 11290-1 |        |        |        |        | Comparison / expected result | Code | Alternative method VIDAS LMX |             |                          |              | Comparison / expected result |
|------|------------------------------|--------|--------|--------|--------|------------------------------|------|------------------------------|-------------|--------------------------|--------------|------------------------------|
|      | half-Fraser                  |        | Fraser |        | Result |                              |      | Test TV                      | Test result | Confirmation Rapid'Lmono | Final result |                              |
|      | O & A                        | Oxford | O & A  | Oxford |        |                              |      |                              |             |                          |              |                              |
| 27   | -                            | -      | -      | -      | -      | =                            | 5    | 0,00                         | -           | -                        | -            | =                            |
| 28   | -                            | -      | -      | -      | -      | =                            | 6    | 0,00                         | -           | -                        | -            | =                            |
| 35   | -                            | -      | -      | -      | -      | =                            | 9    | 0,00                         | -           | -                        | -            | =                            |
| 36   | -                            | -      | -      | -      | -      | =                            | 10   | 0,00                         | -           | -                        | -            | =                            |
| 41   | -                            | -      | -      | -      | -      | =                            | 13   | 0,00                         | -           | -                        | -            | =                            |
| 42   | -                            | -      | -      | -      | -      | =                            | 14   | 0,00                         | -           | -                        | -            | =                            |
| 43   | -                            | -      | -      | -      | -      | =                            | 19   | 0,00                         | -           | -                        | -            | =                            |
| 44   | -                            | -      | -      | -      | -      | =                            | 20   | 0,00                         | -           | -                        | -            | =                            |
| 29   | +                            | +      | +      | +      | +      | =                            | 3    | 2,30                         | +           | +                        | +            | =                            |
| 30   | +                            | +      | +      | +      | +      | =                            | 4    | 2,34                         | +           | +                        | +            | =                            |
| 31   | +                            | +      | +      | +      | +      | =                            | 11   | 2,36                         | +           | +                        | +            | =                            |
| 32   | +                            | +      | +      | +      | +      | =                            | 12   | 2,35                         | +           | +                        | +            | =                            |
| 39   | +                            | +      | +      | +      | +      | =                            | 17   | 2,33                         | +           | +                        | +            | =                            |
| 40   | +                            | +      | +      | +      | +      | =                            | 18   | 2,32                         | +           | +                        | +            | =                            |
| 45   | +                            | +      | +      | +      | +      | =                            | 23   | 2,43                         | +           | +                        | +            | =                            |
| 46   | +                            | +      | +      | +      | +      | =                            | 24   | 2,35                         | +           | +                        | +            | =                            |
| 25   | +                            | +      | +      | +      | +      | =                            | 1    | 2,24                         | +           | +                        | +            | =                            |
| 26   | +                            | +      | +      | +      | +      | =                            | 2    | 2,13                         | +           | +                        | +            | =                            |
| 33   | +                            | +      | +      | +      | +      | =                            | 7    | 2,24                         | +           | +                        | +            | =                            |
| 34   | +                            | +      | +      | +      | +      | =                            | 8    | 2,31                         | +           | +                        | +            | =                            |
| 37   | +                            | +      | +      | +      | +      | =                            | 15   | 2,41                         | +           | +                        | +            | =                            |
| 38   | +                            | +      | +      | +      | +      | =                            | 16   | 2,43                         | +           | +                        | +            | =                            |
| 47   | +                            | +      | +      | +      | +      | =                            | 21   | 2,34                         | +           | +                        | +            | =                            |
| 48   | +                            | +      | +      | +      | +      | =                            | 22   | 2,38                         | +           | +                        | +            | =                            |

TVC (CFU/mL): 1 700

**Lab. M**

| Code | Reference method ISO 11290-1 |        |        |        |        | Comparison / expected result | Code | Alternative method VIDAS LMX |             |                  |              | Comparison / expected result |
|------|------------------------------|--------|--------|--------|--------|------------------------------|------|------------------------------|-------------|------------------|--------------|------------------------------|
|      | half-Fraser                  |        | Fraser |        | Result |                              |      | Test TV                      | Test result | Confirmation OAA | Final result |                              |
|      | O & A                        | Oxford | O & A  | Oxford |        |                              |      |                              |             |                  |              |                              |
| 27   | -                            | -      | -      | -      | -      | =                            | 5    | 0,00                         | -           | -                | -            | =                            |
| 28   | -                            | -      | -      | -      | -      | =                            | 6    | 0,00                         | -           | -                | -            | =                            |
| 35   | -                            | -      | -      | -      | -      | =                            | 9    | 0,00                         | -           | -                | -            | =                            |
| 36   | -                            | -      | -      | -      | -      | =                            | 10   | 0,00                         | -           | -                | -            | =                            |
| 41   | -                            | -      | -      | -      | -      | =                            | 13   | 0,00                         | -           | -                | -            | =                            |
| 42   | -                            | -      | -      | -      | -      | =                            | 14   | 0,00                         | -           | -                | -            | =                            |
| 43   | -                            | -      | -      | -      | -      | =                            | 19   | 0,00                         | -           | -                | -            | =                            |
| 44   | -                            | -      | -      | -      | -      | =                            | 20   | 0,00                         | -           | -                | -            | =                            |
| 29   | +                            | +      | +      | +      | +      | =                            | 3    | 3,55                         | +           | +                | +            | =                            |
| 30   | +                            | +      | +      | +      | +      | =                            | 4    | 3,49                         | +           | +                | +            | =                            |
| 31   | +                            | +      | +      | +      | +      | =                            | 11   | 3,67                         | +           | +                | +            | =                            |
| 32   | +                            | +      | +      | +      | +      | =                            | 12   | 3,59                         | +           | +                | +            | =                            |
| 39   | +                            | +      | +      | +      | +      | =                            | 17   | 3,54                         | +           | +                | +            | =                            |
| 40   | +                            | +      | +      | +      | +      | =                            | 18   | 3,48                         | +           | +                | +            | =                            |
| 45   | +                            | +      | +      | +      | +      | =                            | 23   | 3,49                         | +           | +                | +            | =                            |
| 46   | +                            | +      | +      | +      | +      | =                            | 24   | 3,52                         | +           | +                | +            | =                            |
| 25   | +                            | +      | +      | +      | +      | =                            | 1    | 2,04                         | +           | +                | +            | =                            |
| 26   | +                            | +      | +      | +      | +      | =                            | 2    | 2,00                         | +           | +                | +            | =                            |
| 33   | +                            | +      | +      | +      | +      | =                            | 7    | 2,68                         | +           | +                | +            | =                            |
| 34   | +                            | +      | +      | +      | +      | =                            | 8    | 2,12                         | +           | +                | +            | =                            |
| 37   | +                            | +      | +      | +      | +      | =                            | 15   | 0,21                         | +           | +                | +            | =                            |
| 38   | +                            | +      | +      | +      | +      | =                            | 16   | 2,61                         | +           | +                | +            | =                            |
| 47   | +                            | +      | +      | +      | +      | =                            | 21   | 1,90                         | +           | +                | +            | =                            |
| 48   | +                            | +      | +      | +      | +      | =                            | 22   | 2,54                         | +           | +                | +            | =                            |

TVC (CFU/mL):

**Lab. N**

| Code | Méthode de référence ISO 11290-1 |             |        |             |        | Comparaison / Résultat attendu | Code | Alternative method VIDAS LMX |             |                                 |              | Comparison / expected result |
|------|----------------------------------|-------------|--------|-------------|--------|--------------------------------|------|------------------------------|-------------|---------------------------------|--------------|------------------------------|
|      | half-Fraser                      |             | Fraser |             | Result |                                |      | Test TV                      | Test result | Confirmation Rapid'Lmono et OAA | Final result |                              |
|      | O & A                            | Rapid'Lmono | O & A  | Rapid'Lmono |        |                                |      |                              |             |                                 |              |                              |
| 27   | -                                | -           | -      | -           | -      | =                              | 5    | 0,00                         | -           | -                               | -            | =                            |
| 28   | -                                | -           | -      | -           | -      | =                              | 6    | 0,00                         | -           | -                               | -            | =                            |
| 35   | -                                | -           | -      | -           | -      | =                              | 9    | 0,00                         | -           | -                               | -            | =                            |
| 36   | -                                | -           | -      | -           | -      | =                              | 10   | 0,00                         | -           | -                               | -            | =                            |
| 41   | -                                | -           | -      | -           | -      | =                              | 13   | 0,00                         | -           | -                               | -            | =                            |
| 42   | -                                | -           | -      | -           | -      | =                              | 14   | 0,00                         | -           | -                               | -            | =                            |
| 43   | -                                | -           | -      | -           | -      | =                              | 19   | 0,00                         | -           | -                               | -            | =                            |
| 44   | -                                | -           | -      | -           | -      | =                              | 20   | 0,00                         | -           | -                               | -            | =                            |
| 29   | +                                | +           | +      | +           | +      | =                              | 3    | 2,77                         | +           | +                               | +            | =                            |
| 30   | +                                | +           | +      | +           | +      | =                              | 4    | 2,57                         | +           | +                               | +            | =                            |
| 31   | +                                | +           | +      | +           | +      | =                              | 11   | 2,52                         | +           | +                               | +            | =                            |
| 32   | +                                | +           | +      | +           | +      | =                              | 12   | 2,52                         | +           | +                               | +            | =                            |
| 39   | +                                | +           | +      | +           | +      | =                              | 17   | 2,59                         | +           | +                               | +            | =                            |
| 40   | +                                | +           | +      | +           | +      | =                              | 18   | 2,60                         | +           | +                               | +            | =                            |
| 45   | +                                | +           | +      | +           | +      | =                              | 23   | 2,61                         | +           | +                               | +            | =                            |
| 46   | +                                | +           | +      | +           | +      | =                              | 24   | 2,57                         | +           | +                               | +            | =                            |
| 25   | +                                | +           | +      | +           | +      | =                              | 1    | 2,25                         | +           | +                               | +            | =                            |
| 26   | +                                | +           | +      | +           | +      | =                              | 2    | 2,32                         | +           | +                               | +            | =                            |
| 33   | +                                | +           | +      | +           | +      | =                              | 7    | 1,93                         | +           | +                               | +            | =                            |
| 34   | +                                | +           | +      | +           | +      | =                              | 8    | 0,80                         | +           | +                               | +            | =                            |
| 37   | +                                | +           | +      | +           | +      | =                              | 15   | 2,52                         | +           | +                               | +            | =                            |
| 38   | +                                | +           | +      | +           | +      | =                              | 16   | 1,68                         | +           | +                               | +            | =                            |
| 47   | +                                | +           | +      | +           | +      | =                              | 21   | 2,24                         | +           | +                               | +            | =                            |
| 48   | +                                | +           | +      | +           | +      | =                              | 22   | 2,65                         | +           | +                               | +            | =                            |

TVC (CFU/mL): 2 500

**Lab. O**

| Code | Reference method ISO 11290-1 |        |        |        |        | Comparison / expected result | Code | Alternative method VIDAS LMX |             |                                 |              | Comparison / expected result |
|------|------------------------------|--------|--------|--------|--------|------------------------------|------|------------------------------|-------------|---------------------------------|--------------|------------------------------|
|      | half-Fraser                  |        | Fraser |        | Result |                              |      | Test TV                      | Test result | Confirmation Rapid'Lmono et OAA | Final result |                              |
|      | O & A                        | Oxford | O & A  | Oxford |        |                              |      |                              |             |                                 |              |                              |
| 27   | -                            | -      | -      | -      | -      | =                            | 5    | 0,00                         | -           | -                               | -            | =                            |
| 28   | -                            | -      | -      | -      | -      | =                            | 6    | 0,00                         | -           | -                               | -            | =                            |
| 35   | -                            | -      | -      | -      | -      | =                            | 9    | 0,00                         | -           | -                               | -            | =                            |
| 36   | -                            | -      | -      | -      | -      | =                            | 10   | 0,00                         | -           | -                               | -            | =                            |
| 41   | -                            | -      | -      | -      | -      | =                            | 13   | 0,00                         | -           | -                               | -            | =                            |
| 42   | -                            | -      | -      | -      | -      | =                            | 14   | 0,00                         | -           | -                               | -            | =                            |
| 43   | -                            | -      | -      | -      | -      | =                            | 19   | 0,00                         | -           | -                               | -            | =                            |
| 44   | -                            | -      | -      | -      | -      | =                            | 20   | 0,00                         | -           | -                               | -            | =                            |
| 29   | +                            | +      | +      | +      | +      | =                            | 3    | 2,61                         | +           | +                               | +            | =                            |
| 30   | +                            | +      | +      | +      | +      | =                            | 4    | 2,65                         | +           | +                               | +            | =                            |
| 31   | +                            | +      | +      | +      | +      | =                            | 11   | 2,58                         | +           | +                               | +            | =                            |
| 32   | +                            | +      | +      | +      | +      | =                            | 12   | 2,56                         | +           | +                               | +            | =                            |
| 39   | +                            | +      | +      | +      | +      | =                            | 17   | 2,54                         | +           | +                               | +            | =                            |
| 40   | +                            | +      | +      | +      | +      | =                            | 18   | 2,51                         | +           | +                               | +            | =                            |
| 45   | +                            | +      | +      | +      | +      | =                            | 23   | 2,48                         | +           | +                               | +            | =                            |
| 46   | +                            | +      | +      | +      | +      | =                            | 24   | 2,54                         | +           | +                               | +            | =                            |
| 25   | +                            | +      | +      | +      | +      | =                            | 1    | 2,58                         | +           | +                               | +            | =                            |
| 26   | +                            | +      | +      | +      | +      | =                            | 2    | 0,55                         | +           | +                               | +            | =                            |
| 33   | +                            | +      | +      | +      | +      | =                            | 7    | 2,53                         | +           | +                               | +            | =                            |
| 34   | +                            | +      | +      | +      | +      | =                            | 8    | 2,54                         | +           | +                               | +            | =                            |
| 37   | +                            | +      | +      | +      | +      | =                            | 15   | 2,56                         | +           | +                               | +            | =                            |
| 38   | +                            | +      | +      | +      | +      | =                            | 16   | 2,59                         | +           | +                               | +            | =                            |
| 47   | +                            | +      | +      | +      | +      | =                            | 21   | 2,89                         | +           | +                               | +            | =                            |
| 48   | +                            | +      | +      | +      | +      | =                            | 22   | 0,00                         | -           | -                               | -            | #                            |

TVC (CFU/mL): 20 000

**Lab. P**

| Code | Méthode de référence ISO 11290-1 |           |        |           |        | Comparaison / Résultat attendu | Code | Alternative method VIDAS LMX |             |              |              | Comparaison / expected result |
|------|----------------------------------|-----------|--------|-----------|--------|--------------------------------|------|------------------------------|-------------|--------------|--------------|-------------------------------|
|      | half-Fraser                      |           | Fraser |           | Result |                                |      | Test TV                      | Test result | Confirmation | Final result |                               |
|      | O & A                            | 2nd media | O & A  | 2nd media |        |                                |      |                              |             |              |              |                               |
| 27   | -                                | -         | -      | -         | -      | =                              | 5    | 0,00                         | -           | -            | -            | =                             |
| 28   | -                                | -         | -      | -         | -      | =                              | 6    | 0,00                         | -           | -            | -            | =                             |
| 35   | -                                | -         | -      | -         | -      | =                              | 9    | 0,00                         | -           | -            | -            | =                             |
| 36   | -                                | -         | -      | -         | -      | =                              | 10   | 0,00                         | -           | -            | -            | =                             |
| 41   | -                                | -         | -      | -         | -      | =                              | 13   | 0,00                         | -           | -            | -            | =                             |
| 42   | -                                | -         | -      | -         | -      | =                              | 14   | 0,00                         | -           | -            | -            | =                             |
| 43   | -                                | -         | -      | -         | -      | =                              | 19   | 0,00                         | -           | -            | -            | =                             |
| 44   | -                                | -         | -      | -         | -      | =                              | 20   | 0,00                         | -           | -            | -            | =                             |
| 29   | +                                | +         | +      | +         | +      | =                              | 3    | 3,21                         | +           | +            | +            | =                             |
| 30   | +                                | +         | +      | +         | +      | =                              | 4    | 3,22                         | +           | +            | +            | =                             |
| 31   | +                                | +         | +      | +         | +      | =                              | 11   | 3,34                         | +           | +            | +            | =                             |
| 32   | +                                | +         | +      | +         | +      | =                              | 12   | 3,39                         | +           | +            | +            | =                             |
| 39   | +                                | +         | +      | +         | +      | =                              | 17   | 3,46                         | +           | +            | +            | =                             |
| 40   | +                                | +         | +      | +         | +      | =                              | 18   | 3,31                         | +           | +            | +            | =                             |
| 45   | +                                | +         | +      | +         | +      | =                              | 23   | 3,31                         | +           | +            | +            | =                             |
| 46   | +                                | +         | +      | +         | +      | =                              | 24   | 3,31                         | +           | +            | +            | =                             |
| 25   | +                                | +         | +      | +         | +      | =                              | 1    | 1,34                         | +           | +            | +            | =                             |
| 26   | +                                | +         | +      | +         | +      | =                              | 2    | 0,50                         | +           | +            | +            | =                             |
| 33   | +                                | +         | +      | +         | +      | =                              | 7    | 0,68                         | +           | +            | +            | =                             |
| 34   | +                                | +         | +      | +         | +      | =                              | 8    | 0,96                         | +           | +            | +            | =                             |
| 37   | +                                | +         | +      | +         | +      | =                              | 15   | 0,35                         | +           | +            | +            | =                             |
| 38   | +                                | +         | +      | +         | +      | =                              | 16   | 0,55                         | +           | +            | +            | =                             |
| 47   | +                                | +         | +      | +         | +      | =                              | 21   | 0,69                         | +           | +            | +            | =                             |
| 48   | +                                | +         | +      | +         | +      | =                              | 22   | 0,16                         | +           | +            | +            | =                             |

TVC (CFU/mL): NC