WORK PROGRAMME of EURL for

EURL AO

PERIOD: 2021/22

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INTRODUCTION

European Union Reference Laboratory for Pesticides in Food of Animal Origin and Commodities with high Fat Content (EURL-AO)
EURL-AO is part of the network of the 4 EURLs (EURL-AO, EURL-CF, EURL-FV, EURL-SRM) dealing with pesticide residues in food and feed (www.eurl-pesticides.eu).

Regulation (EU) 625/2017 Art 94(2):
European Union reference laboratories designated in accordance with Article 93(1) shall be responsible for the following tasks insofar as they are included in the reference laboratories' annual or multiannual work programmes that have been established in conformity with the objectives and priorities of the relevant work programmes adopted by the Commission in accordance with Article 36 of Regulation (EU) No 652/2014:
(taking into account Art 147 of (EU) 625/2017)

1 TO ENSURE AVAILABILITY AND USE OF HIGH QUALITY METHODS AND TO ENSURE HIGH QUALITY PERFORMANCE BY NRLs.

Please, provided activities related to Regulation (EU) 2017/625:
(Number of Sub-activity boxes can be adjusted by EURL)

- *Art. 94.2.a* ***Providing national reference laboratories with details and guidance on the methods of laboratory analysis, testing or diagnosis, including reference methods.***
- *Art. 94.2.b* ***Providing reference materials to national reference laboratories***
- *Art. 94.2.c* ***Coordinating the application by the national reference laboratories and, if necessary, by other official laboratories of the methods referred to in point (a), in particular, by organising regular inter-laboratory comparative testing or proficiency tests and by ensuring appropriate follow-up of such comparative testing or proficiency tests in accordance, where available, with internationally accepted protocols, and informing the Commission and the Member States of the results and follow-up to the inter-laboratory comparative testing or proficiency tests.***
- *Art. 94.2.l* ***Where relevant for their area of competence, cooperate among themselves and with the Commission, as appropriate, to develop methods of analysis, testing or diagnosis of high standards.***

Sub-activity 1.01 *Updating and evaluation of current methods used by NRLs*

Objectives: Keeping analytical methods up to date and assistance for NRLs in application of methods
Description: With reference to the substances included in the EU MACP and mentioned in Chapter 4 and Annex II of the Working Document SANCO/12745/2013, Rev 12, the EURL AO will support NRLs to enhance their ability in performing analyses. The EURL AO will prepare a list of poorly analysed substances by NRLs/OfLs. The selection of these analytes will be based on PT results and already available lists ("Analytical capabilities" by EURL SRM). A survey will be prepared with the aim to ask the NRLs AO about the reason for non-analysing those substances and on how the EURL AO can help. After evaluation of the survey the results will be used for preparing a training and method development, if necessary.
All AO MRM amenable pesticides mentioned in the Working Document/MACP will be part of the EUPT AO 16 and AO 17 pesticides target list.
As an ongoing task pesticide metabolites will be included in existing multi residue methods, if feasible.
Expected Output: Report on the outcome of the survey. Presentation of work at (EURL) workshops
Duration: Throughout 2021 and 2022.

Sub-activity 1.02 Scope-*Extension for* pesticides relevant in food of animal origin

Objectives: EFSA support regarding Art. 12 review, extension of scope, inclusion of pesticide metabolites in existing multi residue methods

Description: There is a need to develop and improve methods for analytes under Art. 12 review in order to support EFSA regarding achievable LOQs (see sub-activity 3.04 Support of Commission and EFSA including Art. 12 proposals). The spectrum of analytes will be frequently extended and updated. The EURL AO will start with the following analytes of interest: 6-benzyladenine, cyflumetofen, pinoxaden, cyproconazole, alpha-cypermethrin, beta-cypermethrin, zeta-cypermethrin, zoxamide, gamma-cyhalthrin, halosulfuron-methyl, malathion, metribuzin, clofentezine, difenoconazole, dimethoate, fosthiazate, lenacil, MCPA, MCPB, tri-allate, fluopicolide, benalaxyl-M, spirodiclofen, tetraconazole, azadirachtin, and penthiopyrad. At least 80 % of these pesticides will be tested if they can be included in existing MRM-methods. Afterwards, the analytes will be validated. The validation process will be performed for 3 out of 6 matrices of interest (muscle, fat, liver, kidney, egg and milk) using the SANTE 12682/2019 guidance criteria. Moreover, a concept will be developed aiming to get information as regards achievable LOQs for analytes under Art. 12 review once the list for pesticides is known. It is planned to add the pesticides into the scope of existing methods, e.g. QuEChERS, if feasible. Furthermore pesticide metabolites will be included in existing multi residue methods, if feasible. The list of pesticides to be evaluated in 2022 will be available in November 2021. Thus this list will be used for performing the validation in 2022.

Expected Output: Support of Commission and EFSA. Validation reports for the expanded pesticides report on MRM amenable pesticides and their metabolites tested for Art. 12 proposals

Duration: Throughout 2021 and 2022.

Sub-activity 1.03 *Automatisation of GPC based method for GC amenable pesticides*

Objectives: EN1528 based method will be modified to have more clean-up steps automated

Description: The EN1528 based method containing a Gel Permeation Clean-up (GPC) step (in some cases followed by another silica clean-up step) is used by laboratories within Europe. A modification of this method is also performed at CVUA Freiburg routine lab. The method is of advantage for non-polar fat soluble pesticides. The disadvantage is that a lot of manual steps have to be done. The method needs a lot of man power resources and is time intensive. The EURL upgraded an existing GPC system. With this upgrade it should be possible to automate a clean-up and evaporation step and therefore save manpower without losing the efficiency of the method. The automated method will be developed and the results will be compared with the existing sample preparation scheme. The new procedure will then be validated with a matrix of interest (e.g. dairy products).

Expected Output: Support of NRLs (and OfLs), in particular in case of effective and fully automated clean-up methods. A method report will be published on CIRCA BC.

Duration: Up to 4 months in 2021.

Sub-activity 1.04 *Validation study on the matrix fish*

Objectives: Validation of GC and LC amenable pesticides in different fish species

Description: Around 25 kg of fish is consumed within the European Union per year. In the EU pesticide legislation 396/2005/EC no maximum residue levels (MRLs) are set for the matrix fish so far. The EURL AO will start a validation study for GC and LC amenable pesticides. For the validation different kinds of fish species will be used. The EURL will use fatty fishes (e.g. salmon, herring) and low fat fishes (e.g. pangasius, coalfish). Validation will be performed according to SANTE/12682/2019. Pesticides to be validated are fat soluble, but also semi-polar LC amenable pesticides will be taken into account. Around 80 pesticides will be used for this study.

Expected Output: Validation report.

Duration: 3 month in 2021

Sub-activity 1.05 *Accurate Mass GC-Orbitrap and/or LC-Q-ToF*

Objectives: Development and validation of a screening and/ or quantification method with GC and/or LC high resolution accurate mass instrumentation

Description: For the analysis of a high number of pesticides high resolution accurate mass instrumentation (eg. GC or LC coupled to ToF or Orbitrap) will be used to check for MRL compliance of the samples. With growing demand on pesticide residue laboratories to extend their scope of analysis high resolution accurate mass systems have found increasing popularity. The information obtained can be used to re-analyse the sample in case of later findings. Matrices of interest are i.e. fat, plant oil, meat, fish muscle, honey or dairy products. At least the development and validation of two screening method or quantitative method with either GC-Orbitrap or LC-Q-ToF will be performed.

Expected Output: Support of NRLs (and OfLs), in particular in case of implementation of screening and quantitative methods for high resolution accurate mass instrumentation. A method report will be published on CIRCA BC. The results will be presented on an international workshop.

Duration: 3 month in 2021

Sub-activity 1.06 *Validation study on the matrix honey*

Objectives: Validation of GC and LC amenable pesticides in different kind of honey from the market

Description: Honey is a matrix of animal origin where pesticides residues from the direct use on plants can be expected. Honey is a matrix with high sugar content and therefore differs from other commodities of food of animal origin. The spectrum of pesticides to be found is more polar than in other animal commodities. Therefore different kind of multi residue methods will be tested on their clean-up efficiency and extraction efficiency on relevant pesticides in honey. Developments have been done on HPLC-Q-ToF in the past using Quechers and direct injection. For GC-Orbitrap method validation has to be performed. An appropriate method for GC detection will be chosen and validated. For the validation different kinds of honey will be used. Validation will be performed according to SANTE/12682/2019. Pesticides to be validated are included in the EU MACP or the Working Document SANCO/12745/2013, Rev 12. The number of pesticides to be validated with GC methods will be around 200.

Expected Output: Validation report.

Duration: 2 month in 2022

Sub-activity 1.07 Organisation of *EUPT AO-16, preparation for EUPT AO-17 and PT on infant formulae (Art. 94.2.c)*

Objectives: Performing a Proficiency Test in the matrix egg

Description: Performance of a proficiency test (EUPT) for MRM-pesticides. EUPT AO-16 will be performed with all NRLs and OfLs of EU Member States and Associated States. It is designed for 90 to 130 participating laboratories (intention 110: 27 NRLs, 78 EU-OFLs, 2 EFTA laboratories, 1 Candidate State laboratory and 1 Third Country laboratory).

The target analyte list will comprise about 60 to 90 MRM-pesticides (intention 75) which are part of the MACP and the Working Document SANCO/12745/2013 Rev12. According to the General Protocol for EU proficiency tests the target pesticide list will be fixed in January 2021 with the assistance of the members of the Scientific Committee for EUPTs. The PT will be performed and evaluated in accordance with the General Protocol for EU proficiency tests for pesticide residues in food and feed. The time schedule will be coordinated with the other pesticide EURLs and the Commission to avoid overlapping periods. The planned matrix is liquid whole egg.

Preparation of EUPT AO 17 and of an additional PT on infant formulae will start at the end of 2021.

Expected Output: report on EUPT AO-16, certificates for participants.

Duration: 2021.

Sub-activity 1.08 Organisation of *EUPT AO-17 (Art. 94.2.c), preparation of EUPT AO 18*

Objectives: Performing a Proficiency Test in the matrix rape seed oil

Description: Performance of a proficiency test (EUPT) for MRM-pesticides. EUPT AO-17 will be performed with all NRLs and OfLs of EU Member States and Associated States. It is designed for 100 to 130 participating laboratories (intention 110: 27 NRLs, 80 EU-OFLs, 2 EFTA laboratories, 1 Candidate State laboratory and 2 Third Country laboratories).

The target analyte list will comprise about 70 to 100 MRM-pesticides (intention 80) which are part of the MACP and the Working Document SANCO/12745/2013 Rev12. According to the General Protocol for EU proficiency tests the target pesticide list will be fixed in January 2022 with the assistance of the members of the Scientific Committee for EUPTs. The PT will be performed and evaluated in accordance with the General Protocol for EU proficiency tests for pesticide residues in food and feed. The time schedule will be coordinated with the other EURLs for pesticides and the Commission to avoid overlapping periods. The planned matrix is rape seed oil obtained from pressed rapeseeds which were fortified on the field.

Preparation of EUPT AO 18 will start at the end of 2022.

Expected Output: report on EUPT AO-17, certificates for participants.

Duration: 2022.

Sub-activity 1.09 Organisation of a *PT on infant formulae (Art. 94.2.c)*

Objectives: Performing a Proficiency Test in the matrix infant formulae

Description: An additional EUPT on infant formulae is planned for the second half of 2022. This PT is designed for laboratories undertaking this kind of analysis in routine. The number of laboratories participating in this PT will be expected to be 40-70. The pesticide target list will comprise about 60 analytes of interest according to the monitoring programme performed in 2019.

The PT will be out of the EUPT schedule season in the second half of 2022, to avoid overlapping with other PTs

Expected Output: report on EUPT on infant formulae, certificates for participants.

Duration: 2022.

2 TO PROVIDE SCIENTIFIC AND TECHNICAL ASSISTANCE TO NRLs

Please, provided activities related to Regulation (EU) 2017/625:
(Number of Sub-activity boxes can be adjusted by EURL)

- *Art. 94.2.d* ***Coordinating practical arrangements necessary to apply new methods of laboratory analysis, testing or diagnosis, and informing national reference laboratories of advances in this field.***
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- *Art. 94.2.e* ***Conducting training courses for staff from national reference laboratories and, if needed, from other official laboratories, as well as of experts from third countries.***
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- *Art. 94.2.g* ***Providing information on relevant national, Union and international research activities to national reference laboratories.***

Sub-activity 2.01 *Workshop with NRLs AO; Art. 94.2.d and 94.2.g*

Objectives: Discussion of EUPT AO-16 and general Exchange of Information
A joint EURL-NRL workshop is planned for 2021 in Almeria, Spain or as online-meeting, if a physical meeting is not possible. The joint workshop will allow the comprehensive exchange of information on the results of EUPT AO-16. In addition, also other important analytical developments and aspects of general importance will be exchanged. Number of NRL-AO participants: 31 (27 NRLs, 4 experts)
Expected Output: Carrying out the workshop with comprehensive exchange of information and strengthening of the cooperation between the EURL, NRLs and COM. The presentations will be available in CIRCA BC. Evaluation schemes will be analysed.
Duration: During 2021

Sub-activity 2.02 *Workshop with NRLs AO; Art. 94.2.d and 94.2.g*

Objectives: Discussion of EUPT AO-17, EUPT on infant formulae and general Exchange of Information
The EURL-AO-NRL workshop is planned for 2022 in Freiburg in presence or as online-meeting, if a physical meeting is not possible. The workshop will allow a comprehensive exchange of information on the results of EUPT AO-17 and the additional EUPT on infant formulae. In addition, also other important analytical developments and aspects of general importance will be exchanged. Number of NRL-AO participants: 31 (27 NRLs, 4 experts)
Expected Output: Carrying out the workshop with comprehensive exchange of information and strengthening of the cooperation between the EURL, NRLs and COM. The presentations will be available in CIRCA BC. Evaluation schemes will be analysed.
Duration: During 2022

Sub-activity 2.03 *Training Workshop (Art. 94.2.e)*

Objectives: Training on methods and evaluation

Description: Representatives of NRLs will be invited to attend a training in Freiburg in 2021. If a physical meeting is not possible, an online-training will be offered to NRLs-AO. It will take place after or before the workshop (see 2.01). The training will cover analytical and technical aspects as regards the analysis of pesticides in products of animal origin (AO), including those with low analytical capabilities indicated in Chapter 4 of document SANCO/12745/2013 Rev12, and the exchange of experiences among participants. Special needs and problems of the laboratories will be discussed during the training. If a physical meeting will not be possible, an online meeting with videos will be offered.

Expected Output: An evaluation will be performed. Lessons and presentations will be available on CIRCA BC. A report will be written and uploaded on CIRCA BC.

Duration: During 2021

Sub-activity 2.04 *Training Workshop (Art. 94.2.e)*

Objectives: Training on methods and evaluation

Description: Representatives of NRLs will be invited to attend a theoretical training in Freiburg in 2022. If a physical meeting is not possible, an online-training will be offered to NRLs-AO. It will take place after or before the workshop (see 2.02). The training will cover aspects on the SANTE Document SANTE/12682/2019 in cooperation with the EURL CF in Copenhagen. The aim is to have one physical session in Freiburg and one session in Copenhagen as it was performed in the past. If a physical meeting is not possible, an online meeting session will be performed. Laboratories will be asked for their topics for this training in advance.

Expected Output: An evaluation will be performed. Lessons and presentations will available on CIRCA BC. A report will be written will be uploaded on CIRCA BC.

Duration: During 2022

Sub-activity 2.05 *Visit of a NRL (Art. 94.2.e)*

Objectives: Visit of a NRL with obvious analytical problems in 2021 (if feasible)

Description: An NRL with obvious analytical difficulties will be visited allowing to identify problems directly in the laboratory – according to the experience, the identification of the real reason for underperformance is difficult on basis of questionnaires and/or exchange of emails and phone calls. The NRL will be selected after the evaluation of EUPT AO-16 and the Commission will be informed about the selected NRL.

Expected Output: Issues will be faced at the NRL and solutions to solve possible problems will be developed. A mission report will be written.

Duration: During 2021

Sub-activity 2.06 *Visit of a NRL (Art. 94.2.e)*

Objectives: Visit of a NRL with obvious analytical problems in 2022 (if feasible)

Description: An NRL with obvious analytical difficulties will be visited allowing to identify problems directly in the laboratory – according to the experience, the identification of the real reason for underperformance is difficult on basis of questionnaires and/or exchange of emails and phone calls. The NRL will be selected after the evaluation of EUPT AO-17 and the Commission will be informed about the selected NRL.

Expected Output: Issues will be faced at the NRL and solutions to solve possible problems will be developed. A mission report will be written.

Duration: During 2022

Sub-activity 2.07 *Test Material Service (Art. 94.2.d)*

Objectives: Test Material Service

Description: Left overs from previous EUPT AO will be offered to NRLs (and OfLs) via CIRCA BC to be used for their internal quality control. On the request of NRLs (and OfLs) test items from previous EUPT AO will be sent to these laboratories. The analysis of the test items assists laboratories to check the quality of their methods and especially to identify any bias in results. As the left overs are not offered as reference material, no quality control of the material has been performed yet. To check the stability of the test items over the storage period it is planned to perform a quality test of selected pesticides present in the test items and compare the results with the data given in the final report. Left overs from stored PT spiking solutions will be analysed on the selected pesticides, too. Stability of the selected pesticides in matrices and in solvent should be compared and discussed. The results of the test can be provided to the laboratories that order the corresponding test material.

Expected Output: Improvement of the quality of pesticide residue analysis. The number of requests will be reported in the technical report 2021/22, quality control results will be made available to NRLs.

Duration: Throughout 2021 and 2022

3 TO PROVIDE SCIENTIFIC AND TECHNICAL ASSISTANCE TO THE EUROPEAN COMMISSION AND OTHER ORGANISATIONS

Please, provided activities related to Regulation (EU) 2017/625:
(Number of Sub-activity boxes can be adjusted by EURL)

- *Art. 94.2.f* ***Providing scientific and technical assistance to the Commission within the scope of their mission.***

- *Art. 94.2.h* ***Collaborating within the scope of their mission with laboratories in third countries and with the European Food Safety Authority (EFSA), the European Medicines Agency (EMA) and the European Centre for Disease Prevention and Control (ECDC).***

- *Art. 94.2.i* ***Assisting actively in the diagnosis of outbreaks in Member States of foodborne, zoonotic or animal diseases, or of pests of plants, by carrying out confirmatory diagnosis, characterisation and taxonomic or epizootic studies on pathogen isolates or pest specimens.***

Sub-activity 3.01 *Technical and Financial Report for 2019-2020, Art. 94.2.f*

Objectives: Provision of information to the European Commission concerning funds granted.
Description: In the frame of providing detailed information to the European Commission concerning the funds granted for the work program of 2019-2020, the EURL AO will draft and submit a full financial and technical report by 31 March 2021.
Expected Output: Technical and Financial Report for 2019-2020.
Duration: 1 month in 2021

Sub-activity 3.02 Interim *Technical and Financial Report for 2021, Art. 94.2.f*

Objectives: Provision of information to the European Commission concerning funds granted.
Description: In the frame of providing detailed information to the European Commission concerning the funds granted for the work program of 2021 and 2022, the EURL AO will draft and submit an interim financial and technical report describing the activities in 2021 by 31 March 2022.
Expected Output: Interim Technical and Financial Report for 2021.
Duration: 1 month in 2022

Sub-activity 3.03 *Planned activities and estimated budget for 2021-2022, Art. 94.2.f*

Objectives: Provision of information to the European Commission concerning WP 2021-2022
Description: In the frame of Regulation 625/2017, the EURL AO will draft and submit a budget estimation for the Work Program planned for 2021-2022.
Expected Output: working program and budget estimation for 2021-2022 onwards.
Duration: 1 month in 2021

Sub-activity 3.04 *Planned activities and estimated budget for 2023 onwards, Art. 94.2.f*

Objectives: Provision of information to the European Commission concerning WP 2023
Description: In the frame of Regulation 625/2017, the EURL AO will draft and submit a budget estimation for the Work Program planned for 2023.
Expected Output: working program and budget estimation for 2023 onwards.
Duration: 1 month in 2022

Sub-activity 3.05 *NRL-OfL-Contacts¸ (Art. 94.2.f)*

Objectives: Maintenance of contacts to official laboratories (OFLs) and National Reference Laboratories (NRLs)
Description: For the EURL/NRL network, the list of all NRLs and contact points in the field "pesticides in food of animal origin and commodities with high fat content" will be kept updated. The list of NRLs will be published on the web page of EURL AO. In addition, all OfLs as reported by the NRLs will be added to another list and will be made available to the Commission and NRLs.
This task will be performed in close cooperation with the EURL for Single Residue Methods (EURL SRM).
Expected Output: Transparency of NRLs and OfLs, clarification on inclusion of OfLs in EUPTs
Duration: Throughout 2021 - 2022

Sub-activity 3.06 Support of Commission and EFSA including Article *12 Proposals (Art. 94.2.f)*

Objectives: Support of Commission and EFSA
Description: Scientific support to the Commission and EFSA as regards the evaluation of possible applicability of proposed post-registration methods in routine analysis laboratories and residue definitions, especially in the case of article 12 proposals. If it is necessary to establish achievable LOQs for pesticides considered of low importance in food of animal origin and thus not in the scope of EURL AO commercially available standards will be purchased. Validation according to the SANTE AQC Guidance Document will be performed in as much cases as possible. For method development and validation see 1.02.

Expected Output: Responses to consultation requirements, to EFSA`s Reasoned Opinions and to European Commission`s Draft Proposals.
Duration: Throughout 2021-2022

Sub-activity 3.07 *Documentation services I (Art. 94.2.f)*

Objectives: Maintenance of EURL website

Description: Maintenance of the EURL-website in cooperation with the other EURLs for pesticide residues, exchange of information via the website and updating on regular basis with the particular aim of disseminating information to NRLs. Information about important improvements of analytical methodology and major changes in EU legislation.
Expected Output: Always updated EURL website.
Duration: Throughout 2021-2022

Sub-activity 3.08 *Documentation services II (Art. 94.2.f)*

Objectives: Maintenance of CIRCA BC platform
Description: Maintenance of the CIRCA-BC domain in cooperation with the other EURLs for pesticide residues; continuous provision of the status of the enrolled members; updating of the content.
Expected Output: Actual information in CIRCA BC.
Duration: Throughout 2021-2022

Sub-activity 3.09 *Co-ordinating meetings I (Art. 94.2.f)*

Objectives: Participation in annual co-ordinating meetings and general management activities of the EURLs for Pesticides
Description: Inter-EURL-meetings in some cases in presence of DG-SANTE representatives will be carried out with the aim to discuss, plan, coordinate or evaluate EURL-activities (e.g. work programs, EUPTs or web-applications). In certain cases online-meetings or tele-conferences will be carried out. Date and place of these events will be decided later.
Expected Output: Exchange and harmonizing of information; meeting reports.
Duration: Throughout 2021-2022

Sub-activity 3.10 *Co-ordinating meetings II (Art. 94.2.f)*

Objectives: Participation in annual co-ordinating meetings and general management activities of the Commission
Description: If planned by the Commission, participation in annual co-ordinating meetings and general management activities of the Commission (e.g. meetings between COM and directors of EURLs).
Expected Output: Exchange and harmonization of information; meeting reports.
Duration: Throughout 2021-2022

Sub-activity 3.11 *International Cooperation (Art. 94.2.h)*

Objectives: Cooperation with international organizations, in particular EFSA, CEN, WHO, UNEP, and other institutes, and dissemination of information (also as online meetings)
Description: If required, cooperation with international organizations**,** also for harmonization of requirements in the field of pesticide analysis. Participation in the 8th LAPRW in Panama (Panama - May 2021, not participated), in the Nordic Pesticide Residue Workshop in June 2021 (not held), RAFA Prague (Czech Republic – November 2021, virtually planned and in 2022) or other conferences for dissemination of information and achievements of the EURL. In 2022 participation the European Pesticides Residue Workshop (EPRW) is planned in Rome, Italy. Due to the Covid19-situation it is unclear, whether the workshops will be held physically or online, or if they are cancelled!
Expected Output: Exchange of relevant information via oral and/or poster presentations.

Duration: Throughout 2021-2022

Sub-activity 3.12 *Scientific Committee for EUPT (Art. 94.2.f)*

Objectives: Harmonized Procedures for EUPTs for Pesticide Residues
Description: Online and mail discussions about matrices and target lists for EUPTs. EURL AO participates in all meetings to discuss and evaluate individual EUPT results and overall EUPT performances.
Expected Output: Harmonized EUPTs for Pesticide Residues
Duration: Throughout 2021-2022

Sub-activity 3.13 *Scientific Committee for the SANTE Document (Art. 94.2.f)*

Objectives: Harmonized Analytical Quality Control for Pesticide Residue Analysis
Description: Contribute in the revision of "Method Validation and Quality Control Procedures for Pesticide Residue Analysis in Food and Feed": Participation in all meetings of the Advisory Group for the improvement of the document and contributions by mail contacts.
Expected Output: Harmonized Procedures for Analytical Quality Control in Pesticide Residue Analysis
Duration: Throughout 2021-2022

Sub-activity 3.14 *Analytical and Scientific Support for NRLs (Art. 94.2.f)*

Objectives: Solving of Analytical Problems and Interpretation of Data/Documents
Description: General scientific information will be provided to NRLs. In particular in case of problems, NRLs will be supported with methods for analysis of MRM-pesticides. In certain cases also the analytes could be supplied (e.g. in case of lack of information about pesticides and the availability of standards, degradation of analytes).
Expected Output: Report on the number and type of requests that the NRLs have in 2021/2022 and on how many of those the EURL-AO managed to respond.
Duration: Throughout 2021

Sub-activity 3.15 Monitoring on pesticide residues in different fish species *(Art. 94.2.f)*

Objectives: Analysis of pesticide residues in different commercially available fish species.
Description: After the validation study (see 1.04) a small monitoring on the most important commercially available fish species in Europe will be performed to have an overview about the pesticide situation in this matrix. Therefore at least 20 samples from the market will be collected by EURL AO and validated pesticides will be quantified. Analysis of the fish extracts will be done using low and/or high resolution mass spectrometry instruments (GC-Orbitrap, LC-Q-ToF, LC-QQQ and GC-QQQ).

Expected Output: Monitoring of pesticides in different fish matrices. A report will be published.
Duration: 2 month in 2021.

Sub-activity 3.16 Monitoring on pesticide residues in honey *(Art. 94.2.f)*

Objectives: Analysis of pesticide residues in different commercially available honey samples.

Description: The EURL AO has validated a high number of MRM amenable pesticides in honey. Together with the EURL-SRM a monitoring of the most important commercially available honeys in Europe (e.g. blossom honey, forest honey, rape honey) will be performed to get an overview about the pesticide residues situation in this matrix. Therefore 60-80 samples from the market will be collected by EURL AO and the validated pesticides will be quantified. The target analyte list will also comprise pesticide metabolites in order to find out if not regulated metabolites are of further interest. The samples will be shared with EURL-SRM to perform the analyses of SRM amenable pesticides as well as other pesticides of interest not in the scope of EURL AO. Analysis of the honey extracts will be done using low and/or high resolution mass spectrometry instruments (GC-Orbitrap, LC-Q-ToF, LC-QQQ and GC-QQQ).

Expected Output: Monitoring of pesticides in different honey matrices. A report will be published.

Duration: 2 month in 2022.

Sub-activity 3.17 Import of validation data from EURL AO into the EURL Datapool *(Art. 94.2.f)*

Objectives: Support of EURL Datapool by entering validation data from EURL AO.

Description: The EURL Datapool is a helpful tool for the laboratories with a lot of information regarding pesticides and validation data. The majority of validation data in the Datapool is from food of plant origin. Data from food of animal origin is poorly represented. The EURL AO has generated a lot of validation data in the past years. The data was made available to the NRLs in the form of validation reports but is not available in the Datapool so far. It is the aim to enter the latest datasets from different kind of animal matrices into the EURL Datapool. The data will be from quantification studies using GC-MS/MS, LC-MS/MS and GC-HRMS. New validation results should be entered continuously on a regular basis.

Expected Output: Increasing the availability and simplify the access (for NRLs) to validation data for pesticides in food of animal origin.

Duration: Throughout 2021/2022

4 REAGENTS AND REFERENCE COLLECTIONS

Please, provided activities related to Regulation (EU) 2017/625:
(Number of Sub-activity boxes can be adjusted by EURL)

- *Art. 94.2.*j ***Coordinating or performing tests for the verification of the quality of reagents and lots of reagents used for the diagnosis of foodborne, zoonotic or animal diseases and pests of plants.***

- *Art. 94.2.k* ***Where relevant for their area of competence, establishing and maintaining:***
  - ***i. reference collections of pests of plants and/or reference strains of pathogenic agents;***
  - ***ii. reference collections of materials intended to come into contact with food used to calibrate analytical equipment and provide samples thereof to national reference laboratories;***
  - ***iii. up-to-date lists of available reference substances and reagents and of manufacturers and suppliers of such substances and reagents.***

Sub-activity 4.1 *(name of Sub-activity)*

Objectives: Description: Expected Output: Duration:

Sub-activity 4.2 *(name of Sub-activity)*

Objectives: Description: Expected Output: Duration:

Sub-activity 4.3 *(name of Sub-activity)*

Objectives: Description: Expected Output: Duration:

Sub-activity 4.x *(name of Sub-activity)*

Objectives: Description: Expected Output: Duration:

5 REQUIREMENTS RELATED TO OTHER LEGISLATION

Please specify applicable legislation:
(Number of Sub-activity boxes can be adjusted)

Sub-activity 5.1 *(name of Sub-activity)*

Objectives: Description: Expected Output: Duration:

REMARKS

(if necessary)