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Food Risk Analysis and Regulatory Excellence Platform

Codex Initiative for the

Middle East and North

Africa

(to be relabeled : Arab

Codex Initiative)

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FOOD SAFETY CONFERENCE

Outline

Initiative implemented in collaboration with the Global Food Regulatory Science Society (GFoRSS) and Laval University's Food Risk Analysis and Regulatory Excellence Platform (PARERA)

Funded by the US Codex Office, US Department of Agriculture







Areas of Intervention

Three main areas of intervention:

- A. Regional coordination and support to the analysis of Codex Committee agenda items for Committees of priority.
- B. Support to sub-regional coordination structures:
 - For example: the creation of information exchange networks and communities of practice.
- C. Investment in National competencies and capacities
 - Strengthening of National Codex Contact Points.





Accomplishments to Date

- Creation of MENA Codex resources, amenable to ongoing updates and enhancement: arabcodex.com /.org
- Development of background material for use as reference in preparation for attendance and active participation in:
 - The Codex Committee on General Principles (CCGP).
 - The Codex Committee on Contaminants in Foods (CCCF).
 - The Codex Committee on Food Import and Export Inspection and Certification Systems (CCFICS) – ongoing.
 - The Codex Committee on Residues of Veterinary Drugs in Foods (CCRVDF) – ongoing.
 - Codex Committee on Food Labelling (CCFL)
 - Codex Alimentarius Commission (CAC44)
- □Investment in Creating Groups of Experts







Mapping of Areas of Intervention to enhance Codex Participation in the Arab Region





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Meetings Physical Meeting: Foundational Meeting for

Codex Communities of Practice (one of our objectives in Dubai)



Support to Enhanced Participation and Effective Preparation to Codex Meetings

Priorities : Horizontal Meetings – CCCF, CCFA, CCPR, CCRVDF, CCPR (CCFICS, CCFH)

Priorities : Vertical Meetings – CCSCH, CCFFP





Mapping of Areas of Intervention to enhance Codex Participation in the MENA Region



Data Generation / Availability

- A. Occurrence Data for Contaminants of Interest :
 - Mycotoxins
 - $\circ \mathsf{Pb}$
- B. Consumption Data Paving the way for better access to Data
- C. Methodological Aspects : Extrapolation of MRL based on CCRVDF Guidance





Creation of Codex Communities of Practice

- Anchoring the Initiative in Existing Structures of the Arab Region:
 - Aiming for a Collaboration with AIDSMO
 - Aiming for a Collaboration with GSO

- Collaboration with National Codex Structures and Enhancing their Capacity
 - First Collaboration being discussed with Codex Egypt







Sustainability of Investments





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Key Pillars

| Capacity Building & | |
|---------------------|--|
| Training | |

- Codex Processes and Procedures
- Food regulatory science: risk management, regulatory policy
- Spill over effect on Food Regulatory Systems

Competencies

- Risk Analysis
- Risk Assessment
- Formulation of Standards

Coordination and Support

Data & Intelligence Hub

- Support Preparation of Meetings
- Effective Preparation to Codex meetings
- Stronger Visibility and Impacts of Arab Codex Delegations
- Food Contaminants Occurrence data
- Food Consumption data
- Monitoring, Early Warning & Foresight



Aiming to Further Contribute in Supporting

Enhanced Consumer Protection

A Fair Environment for Food Trade

An Enabling Environment in Food and Agri-Food Businesses

Readiness to Address SDGs and Emerging Challenges e.g.,

Climate Change



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Pool Risk Analysis and Regulatory Excellence Platform

Importance of Food Laboratory Science in the Arab Region

حلول ابتكارية لنظم غذائية مستدامة

CREATIVE SOLUTIONS FOR SUSTAINABLE FOOD SYSTEMS

> مؤتمر دبي العالمي الخامس عشر لسلامة الأغذية

15th DUBAI INTERNATIONAL FOOD SAFETY CONFERENCE



Importance of Food Laboratory Science

Food / Feed Analysis as a Key Foundation in the Design and Implementation of a Food Control System

The reliance upon risk analysis as a foundation for food / feed regulatory decision-making requires the availability of:

Data on the occurrence of hazards in food

Trustworthy and Reliable Data









Food / Feed Laboratory Landscape in "Official Controls"

Several options for laboratory operators testing for food and feed:



Need for structure at the National and Regional level.

"Official Controls", using the EU definition, means activities performed by the competent authorities ... in order to verify ... compliance by the operators (with the regulations).



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Generally, Food / Feed Testing Anchored in Regulations

Requirements of food / feed testing anchored in regulations:

EU Regulation 2017/625 of 15 March 2017 (replacing EC 882/2004).

| 7.4.2017 | EN Official Journal of the European Union | L 95/1 |
|----------|--|--------|
| | ¥ | |
| | (Legislative acts) | |
| | | |
| | REGULATIONS | |
| | REGULATION (EU) 2017/625 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL | |
| | of 15 March 2017 | |
| | on official controls and other official activities performed to ensure the application of food and feed law, rules on animal health and welfare, plant health and plant protection products, amending Regulations (EC) No 999/2001, (EC) No 396/2005, (EC) No 1069/2009, (EC) No 1107/2009, (EU) No 1151/2012, (EU) No 652/2014, (EU) 2016/429 and (EU) 2016/2031 of the European Parliament and of the Council, Council Regulations (EC) No 1/2005 and (EC) No 1099/2009 and Council Directives 98/58/EC. 1999/74/EC. 2007/43/EC. 2008/119/EC and 2008/120/EC, and renealing | |

"Laboratories designated by competent authorities to carry out ... tests ... in the context of official controls ... should possess expertise, equipment, infrastructure and staff to carry out tasks to the highest standards."





Multiplication of Food and Feed Safety Challenges

- □Food and feed safety and quality requirements are increasingly enhanced to procure:
 - Added protection and guarantees for consumers.
 - Support for the propagation of trust among various actors of the supply chain.
- Emerging issues in food safety and quality result in various parameters that need to be controlled:
 - New target analytes, multiple matrices, etc.







Food and Feed Laboratory Testing – Requirements

There is a need to:

□ Supply reliable results.

Operate according to set procedures and protocols:

- Selection of the analytical method.
- Validation of the method.
- Demonstration of proficiency.

Adapt to new testing needs and requirements

- Analytes vs. Matrices.
- □ Adapt to new technologies / competencies.
- Respond in a fast and reliable manner.



ACCREDITATION

NETWORK OF

ABORATORIES

STRUCTURED



Raison d'etre of Reference Laboratories

Excerpt from paragraph 71, preamble of Regulation EC No. 625/2017:

"Official Controls and other official activities should be based on analytical testing and diagnostic methods that meet state of the art scientific standards and offer sound, reliable and comparable results"

"Methods used by (official) laboratories as well as the quality and uniformity of analytical, testing and diagnostic data generated by them, should (therefore) be continuously improved"





Benefits of a Network of Laboratories

- □Supports uniformity of testing.
- Disseminates knowledge and experience:
 - Reference point for select methods.
 - Ability to address technological
 - advancement.
 - Supports reliability of testing operations.
- Improvement of food and feed safety.







The European Experience

□Beginning in the 1970s – development of a network of laboratories.

Reliance upon National Reference Laboratories (NRLs), European Reference laboratories (EURL).



Legal basis established through Regulation (EC) N° 882/2004, repealed and replaced by Regulation (EU) 2017/625.





Structure of Network of Laboratories in Specialized Areas of Testing²²



Food Risk Analysis and Regulatory Excellence Platform

Areas of Expertise: EU Reference Laboratories

- **EU RL GMOs.**
- **EU RL Feed Additives.**
- **DEU RL Food Contact Materials.**
- **D**EU RL Biological Risks.
- **EU RL Pesticides.**
- **EU RL Residues.**
 - Veterinary drugs, ...
- **D**EU RL Contaminants.
 - Mycotoxins, PAHs, Heavy Metals, PCBs, Dioxins, ...







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Summary of the Survey on

Food / Feed Testing in the

Arab Region

Towards an Enhanced

Structure



Survey Characteristics

□Survey Administered from March 15th – June 1st, 2020.

Target Audience:

- Arab Accreditation Bodies and stakeholders.
- Food Competent Authorities.
- Stakeholders and Partners.
 - \odot Laboratories, Industry, ...



Objectives:

- To obtain a self assessment on food / feed laboratory testing capacity.
- To identify gaps and future areas of investments.
- To establish direction for enhanced structure of food / feed testing capacity in the Region.





Survey Outcomes

28 respondents:

- 13 Accreditation bodies.
- 3 Competent authorities.
- 1 Third party.
- 14 Food / feed laboratory organizations.
- 3 other: risk assessment agency, ...
- **1**2 Arab countries:
 - Algeria, Egypt, Iraq, Jordan, Kuwait, Morocco, Oman, Palestine, Qatar, Saudi Arabia, Tunisia, UAE.
- □Most institutions operate under a well established legal framework:
 - Food laws / standards law.
 - Accreditation laws.







Survey Outcomes (2)

Overwhelming response – 93% - that Arab countries / region has a sufficient food / feed laboratory testing capacity.

Challenges identified:

- 86% Access to accreditation: Very Important / Important.
- 85% Reliability in performance: Very Important / Important.
- 75% Limited availability of competent analysts: Very Important / Important.
- 50 55% Access to reference materials, proficiency testing: Very Important.







Survey Outcomes (3)

□Coverage of most target analytes:

- 100% Pathogens.
- 80 93% Chemicals.
- 64% GMOs.
- Areas to consider: radionuclides.



- Despite the challenges identified there is confidence in the abilities of the region:
 - 100% support the idea that food / feed testing results are reliable.
- □Areas of concern:
 - Lack of capacity in Mass Spectrometry testing.
 - Independence of laboratories.
 - Promotion of monitoring programs.





Survey Outcomes (4)

Areas of guidance needed:

- Access to reference material.
- Selection of (official) analytical methods.
- Access to reference laboratories.



Overall support for the idea of establishing Reference Laboratories at the National and Regional Levels.







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Opportunities / Considerations Towards

an Enhanced Structure of

Food / Feed Laboratory Testing

Aiming for an AOAC MENA Section

Countries of the Arab Region

Overlap with Geopolitical Entity:

 Majority of countries belonging to the League of Arab States, Mauritania, Morocco, Algeria, Tunisia, Libya, Egypt, Sudan, Saudi Arabia, Qatar, UAE, Kuwait, Bahrain, Oman, Yemen, Jordan, Lebanon, Iraq, Syria, Comoros Islands, Djibouti, Somalia









Momentum for Food Regulatory Transformation

□Strong support from key institutions in the Region

- Food Regulators in KSA (SFDA), Jordan (JFDA), Abudhabi (ADAFSA) and Qatar (MoPH)
- Bureau of Food Safety Morocco (ONSSA)
- Centre Technique de l'Agro Alimentaire (Tunisia)
- National Food Safety Authority (Egypt)
- Standardization Organization (Libya)







Maintaining Momentum

- Mobilization of resources from
 PARERA the Food Risk Analysis and
 Regulatory Excellence Platform to
 cover AOAC membership in the
 Region for up to 3 years
- Memberships in Targeted countries
 - Tunisia, Libya
 - Egypt, Jordan, Iraq, Lebanon







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Next Steps

Confirm membership in the Region

Aiming for Approval by AOAC International Board of Directors, Marhc 2022





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Vision for a P P P in Food Laboratory Science

To establish (a)Reference Laboratory/ies in North Africa / Middle East serving parts of Africa:

- Anchor(s) for food analytical technologies.
- □To address immediate shortages in food analytical services
- □To contribute to the development of a network of laboratories in Africa and the Middle East.
- □To support competency enhancement.
- □To support sustainable development of food laboratory infrastructure in the region.







