



Organización de las  
Naciones Unidas  
para la Alimentación y la  
Agricultura



IAEA

Átomos para la paz y el desarrollo

الوكالة الدولية للطاقة الذرية

国际原子能机构

International Atomic Energy Agency

Agence internationale de l'énergie atomique

Международное агентство по атомной энергии

Organismo Internacional de Energía Atómica

### Centro Conjunto FAO/OIEA

de Técnicas Nucleares en la Alimentación y la Agricultura

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Las Secretarías de la Organización de las Naciones Unidas para la Alimentación y la Agricultura (FAO) y del Organismo Internacional de Energía Atómica (OIEA) (denominados en adelante las “Organizaciones Patrocinadoras”) saludan a los países miembros de las Organizaciones Patrocinadoras y tienen el honor de señalar a su atención la celebración del **Curso de Capacitación sobre el Uso de Técnicas Rápidas de Elaboración de Perfiles/Obtención de Huellas para Determinar el Origen de los Alimentos y Verificar su Autenticidad** (denominado en adelante el “evento”), que tendrá lugar de manera virtual a través de la plataforma NUCLEUS del OIEA y Microsoft Teams del **22 de agosto al 2 de septiembre de 2022**.

La finalidad del evento es mejorar la capacidad de los Estados Miembros de responder con rapidez a incidentes y emergencias relacionados con la inocuidad de los alimentos y los piensos que afecten a las personas, los animales y el comercio, siguiendo una serie de procedimientos y métodos para la realización de ensayos con muestras agrícolas con el fin de detectar e identificar contaminantes y establecer medidas de control eficaces para proteger al público y reducir al mínimo las perturbaciones del comercio de productos agrícolas.

En la reseña informativa adjunta se ofrecen más detalles sobre el evento.

El evento se celebrará en inglés.

Se invita a los países miembros de las Organizaciones Patrocinadoras a designar a una o más personas para que participen en este evento en representación de su Gobierno y se los alienta encarecidamente a que seleccionen con ese fin a mujeres calificadas.

Las designaciones deben presentarse al OIEA por conducto de la autoridad nacional competente (el Ministerio de Relaciones Exteriores, la Misión Permanente ante el OIEA o la Autoridad Nacional de Energía Atómica), a más tardar el **24 de junio de 2022**, por medio del formulario de participación adjunto (Formulario A). Los formularios de participación debidamente cumplimentados y autorizados deben enviarse por correo electrónico a la dirección [Official.Mail@iaea.org](mailto:Official.Mail@iaea.org) o por fax al número: +43 1 26007 (no se precisan copias impresas). Asimismo, han de enviarse copias por correo electrónico al Secretario Científico del evento, Sr. Simon Kelly, Centro Conjunto FAO/OIEA de Técnicas Nucleares en la Alimentación y la Agricultura, Departamento de Ciencias y Aplicaciones Nucleares (correo electrónico: [s.kelly@iaea.org](mailto:s.kelly@iaea.org)), y a la Secretaria Administrativa, Sra. Malgorzata Rydeng (correo electrónico: [m.rydeng@iaea.org](mailto:m.rydeng@iaea.org)). Una vez recibidas las designaciones oficiales, el Secretario Científico del evento contactará directamente a los participantes en relación con otras cuestiones de organización, según proceda.

Las Organizaciones Patrocinadoras no se hacen responsables de virus informáticos, gusanos, troyanos, puertas traseras, temporizadores, relojes, contadores o cualquier otra rutina, instrucción o diseño que limiten el funcionamiento, u otro código no solicitado malicioso, ilícito o similar, incluidos programas de vigilancia o rutinas que puedan permitir a cualquier persona el acceso, que estén diseñados con ese fin, o que accedan por iniciativa propia, con el objetivo de borrar, o dañar o modificar de cualquier otro

modo datos o sistemas, servidores, instalaciones u otra infraestructura del usuario final (colectivamente, “código inhabilitante”). Asimismo, el proveedor de los servicios para la reunión virtual ha asegurado y garantizado que los Servicios no contendrán, ni ningún usuario final recibirá del programa informático empleado para celebrar la reunión virtual, ninguno de estos códigos inhabilitantes.

Las Secretarías de las Organizaciones Patrocinadoras aprovechan esta oportunidad para reiterar a los países miembros de las Organizaciones Patrocinadoras el testimonio de su distinguida consideración.



17 de marzo de 2022

Documentación adjunta (en inglés únicamente):

Reseña informativa

Formulario de participación (Formulario A)



# **Training Course on the Use of Rapid Profiling/Fingerprinting Techniques to Determinate Food Origin and Verify Food Authenticity**

**Virtual Event**

**22 August 2022 – 2 September 2022**

**Ref. No.: EVT2103920**

## **Information Sheet**

### **Introduction**

Food fraud and adulteration, though driven by economic gain, can also present a significant risk to human health. There have been many examples of this throughout history. In recent times, notable examples include melamine in milk powder, Sudan dyes in chilli powder and methanol in counterfeit spirits. The global occurrence of such incidents may cause negative impacts on international trade, reputational damage to companies or entire food sectors and, at worst, serious illness or fatalities to consumers.

Effective systems to prevent or control such incidents require robust analytical methods to detect adulteration or contamination of foods, and to provide information on their origin. The required methods encompass both sophisticated techniques capable of providing essential information such as the identity and amount of adulterants present or the probable origin of a food product, that allow follow-up actions to deal with the issue, and cost-effective, screening, ‘point of contact’ methods that can be deployed in the field (on the food production line or supply chain) to provide rapid answers regarding the safety or authenticity of food raw materials or products. A combination of these techniques provides member countries with effective measures to protect the public from fraud, mitigate the disruptive impact of emergencies affecting the food supply chain, and minimise disruption to trade in agricultural commodities.

This virtual training course will focus on rapid, bench-top or portable technologies that can be applied when there is a food safety or food fraud incident to detect adulteration or contamination of food, or to

provide information on the geographical/botanical origin of the food commodity to enable effective response and control of the problem. The techniques employed may also be used under normal circumstances as rapid screening tests within national food control systems.

## **Objectives**

The objective of this virtual training course is to enhance the capabilities of laboratory personnel in the application of rapid, untargeted screening methods, enabling member countries to respond to food safety-related incidents and emergencies and to improve their food control systems.

The training will employ recorded lectures, video presentations of laboratory procedures and 'live' online question and answer sessions. Selected applications will be presented to provide the participants with a solid basic to intermediate knowledge of techniques including:

- Fourier transform infrared (FT-IR) and Fourier transform near-infrared (FT-NIR) spectroscopy;
- Benchtop nuclear magnetic resonance (NMR) spectroscopy;
- Ion mobility spectrometry (IMS);
- Multispectral imaging (MSI);
- Spectral data processing and chemometrics to enable interpretation of the data.

Examples of standard operating procedures and method protocols will be provided to course participants, to foster adoption of the demonstrated methods in their own laboratories.

## **Target Audience**

Research and technical personnel from food control or research laboratories in the Sponsoring Organizations' member countries interacting with the Food Safety and Control subprogramme in the field of testing for food authenticity and geographical origin are eligible to apply. Hands-on experience in any of the above-mentioned analytical techniques would be an advantage.

## **Working Language**

English.

## **Expected Outputs**

The expected outcome of the course will be well informed, trained personnel in the application of nuclear and nuclear-related screening technologies for detecting food adulteration and providing information on food origin.

## Participation and Registration

This training course will be open for remote self-study access from **22 August to 2 September 2022** via the IAEA NUCLEUS platform. Three ‘live’ online interactive question and answer sessions will be held via Microsoft Teams on **26th August, 2nd and 9th September 2022**.

All persons wishing to participate in the event have to be designated by the Sponsoring Organization’s member countries or should be members of organizations that have been invited to participate.

In order to be designated by the Sponsoring Organizations’ member country, participants are requested to send the **Participation Form (Form A)** to their competent national authority (e. g. Ministry of Foreign Affairs, Permanent Mission to the IAEA or National Atomic Energy Authority) for onward transmission to the IAEA by **24 June 2022**. Participants who are members of an organization invited to attend are requested to send the **Participation Form (Form A)** through their organization to the IAEA by the above deadline.

Selected participants will be informed in due course on the procedures to be followed to access the course materials.

Participants are hereby informed that the personal data they submit will be processed in line with the [Agency’s Personal Data and Privacy Policy](#) and is collected solely for the purpose(s) of reviewing and assessing the application and to complete logistical arrangements where required.

An online multiple-choice examination will be open following the course. Candidates who successfully complete the virtual training course will receive a certificate.

No registration fee is charged to participants.

## IAEA Contacts

### Scientific Secretary:

#### Mr Simon Kelly

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### Administrative Secretary:

#### Ms Malgorzata Rydeng

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Subsequent correspondence on scientific matters should be sent to the Scientific Secretary/Secretaries and correspondence on other matters related to the event to the Administrative Secretary.

## **Event Web Page**

Please visit the following IAEA web page regularly for new information regarding this event:

[www.iaea.org/events/EVENT\\_2103920](http://www.iaea.org/events/EVENT_2103920)





# Participation Form

## Training Course on the Use of Rapid Profiling/Fingerprinting Techniques to Determine Food Origin and Verify Food Authenticity

### Virtual Event

**22 August 2022 – 2 September 2022**

To be completed by the participant and sent to the competent national authority (e.g. Ministry of Foreign Affairs, Permanent Mission to the IAEA, or National Atomic Energy Authority) of his/her country for subsequent transmission to the International Atomic Energy Agency (IAEA) either by email to: [Official.Mail@iaea.org](mailto:Official.Mail@iaea.org) or by fax to: +43 1 26007 (no hard copies needed). Please also send a copy by email to the Scientific Secretary [S.Kelly@iaea.org](mailto:S.Kelly@iaea.org) and to the Administrative Secretary [M.Rydeng@iaea.org](mailto:M.Rydeng@iaea.org).

**Deadline for receipt by IAEA through official channels: 24 June 2022**

Family name(s): (same as in passport)	First name(s): (same as in passport)	Mr/Ms
Institution:		
Full address:		
Tel. (Fax):		
Email:		
Nationality:	Representing following Member State/non-Member State/entity or invited organization:	
If/as applicable: Do you intend to submit a paper?                      Yes <input type="checkbox"/> No <input type="checkbox"/> Would you prefer to present your paper as a poster?      Yes <input type="checkbox"/> No <input type="checkbox"/> Title:		

Participants are hereby informed that the personal data they submit will be processed in line with the [Agency's Personal Data and Privacy Policy](#) and is collected solely for the purpose(s) of reviewing and assessing the application and to complete logistical arrangements where required. Further information can be found in the [Data Processing Notice](#) concerning IAEA InTouch+ platform.