





# **MetClimVOC** workshop

# **Metrology for atmospheric monitoring**

### 07 March 2023 (09:00 – 12:45 h CET), Lyon (France)

In the framework of the EURAMET-EMPIR project MetClimVOC (<a href="https://www.metclimvoc.eu">https://www.metclimvoc.eu</a>), we are pleased to invite you to the MetClimVOC workshop, which will take place on 7 March 2023 as a satellite event of the International Metrology Congress CIM2023.

The workshop will cover topics related to the challenges of monitoring atmospheric volatile organic compounds (VOC) that are relevant for climate.

### Session 1 – Needs of atmospheric VOC monitoring (09:00-10:30)

#### 09:00 An introduction to MetClimVOC

Céline Pascale - METAS / Switzerland

Maitane Iturrate-Garcia – METAS / Switzerland

#### 09:05 Towards an unbroken SI-traceable calibration chain for VOCs at monitoring stations

## 09:10 Preparation of reference gas mixtures of climate relevant VOCs

Annarita Baldan – VSL / The Netherlands

Tatiana Macé – LNE / France

#### 09:35 Transferring SI-traceability to the field – assessment of new working standards

Maitane Iturrate-Garcia – METAS / Switzerland

Stefan Reimann – Empa / Switzerland

#### 09:55 New and classical techniques to measure formaldehyde – a laboratory intercomparison

Thérèse Salameh – IMT Nord Europe / France

Audrey Grandjean – Chromatotec / France

#### 10:10 Round table:

### Can SI-traceability be achieved at atmospheric monitoring stations? – Needs & challenges

Presenters: Stefan Reimann – Empa / Switzerland & Céline Pascale – METAS / Switzerland

With: Ralf Tillmann – FZ-Jülich / Germany

Rupert Holzinger – University of Utrecht / the Netherlands

Yoana Hristova – NPL / United Kingdom Etienne Smith – AP2E DURAG / France

*Martine Carré – Air Liquide / France (to be confirmed)* 





### Session 2 – Project outcomes on VOC sampling and analysis (11:15-12:45)

#### 11:15 Improvements on VOC sampling and analytical systems

### 11:15 Sampling methods – effects of sorbent materials and scrubbers on VOC measurements

Anja Claude – Deutscher Wetterdienst (DWD) / Germany

#### 11:30 New calibration protocols for Proton Transfer Reaction Mass Spectrometry (PTR-MS)

Yoana Hristova – NPL / United Kingdom

Rupert Holzinger – University of Utrecht / the Netherlands

#### 11:45 A fit-for-purpose methanol analyser

Maricarmen Lecuna – Politecnico di Torino / Italy

#### 11:55 Remote sensing input data – analysis and improvement strategies

Alexandra Lüttschwager – PTB / Germany

Iouli Gordon – HITRAN database / USA (pre-recorded video)

#### 12:10 Project outcomes and uptakes: uncertainty tools, directives and calibration facilities

Stefan Reimann – Empa / Switzerland

Thérèse Salameh – IMT Nord Europe / France

Tobias Bühlmann – METAS / Switzerland

#### 12:25 Round table:

## Metrology for atmospheric monitoring – uptake and further steps

Presenters: Thérèse Salameh – IMT Nord Europe /France & Maitane Iturrate-G. – METAS / Switzerland

With: Anja Claude – Deutscher Wetterdienst (DWD) / Germany

Jean-Philippe Amiet – Chromatotec / France Alexandra Lüttschwager – PTB / Germany

Paolo Laj – Aerosol, Clouds and Trace Gas Research Infrastructure (ACTRIS) / France

Céline Pascale – METAS / Switzerland

## 12:45-13:15 Lunch

# **▶** HOW TO PARTICIPATE?

- 1- Send an e-mail to <a href="mailto:theo.ravailler@cfmetrologie">theo.ravailler@cfmetrologie</a> and <a href="mailto:kirill.berezkin@ptb.de">kirill.berezkin@ptb.de</a> indicating your name, affiliation and professional email address.
  - ⇒ By attending this workshop, you will be able to:
  - 1- Access the restaurant on Tuesday
  - 2- Access to the <u>CIM International Metrology Congress programme</u> during Tuesday and Wednesday
  - 3- Visit freely the Global Industrie exhibition

# **P** HOW TO GET TO EUREXPO LYON – USEFUL INFORMATION

- Venue: Eurexpo Lyon, Hall 2.1 Boulevard de l'Europe, 69680 Chassieu
- How to come: by car, park at Parking P0, or by public transport (Tramway T5, Bus 100)
- → IMPORTANT: a national strike is scheduled on March 7. We strongly recommend that you allow extra time for your travels, stay close to Eurexpo Lyon or that you travel to Lyon the day before to avoid any delays on D-Day.
  - <u>Badge / Pocket Programme:</u> go straight to the CIM Welcome Desk to collect them, Hall 2.1 entrance ONLY (all participants are expected at Hall 2.1)
  - Arrival is from 8 a.m. from MetClimVOC participants

We look forward to meeting you all in Lyon!