

*In this Issue*

**Agenda for 2011**

**Progress in the CLRTAP**

**Developments in EU policy**

*Air quality*

- Debate in Commission

*Climate change*

- Results at Cancun
- Roadmap for low-carbon Europe

- Emission Trading
- Renewable energy
- Biofuels
- Mobile sources

*Energy and resources*

- Resources and resource efficiency
- Energy efficiency and ETS
- Energy efficiency plan

*Short news*

**EFCA events**

- UFP-3
- Biodiversity, Co-benefits
- NCGG-6

**News on EFCA and its members**

-

**Calendar**

**Agenda for 2011**

2 At the 15<sup>th</sup> World Clean Air Congress in September in Vancouver last year the community of the atmospheric sciences was challenged by the Executive Secretary of the UN Convention on Biodiversity to join forces and address biodiversity and ecosystem services from an atmospheric perspective. It was one of several global issues signalled at the congress which require a paradigm shift in their approach and will need continued attention; other were the co-benefits of integrated air pollution and climate change policies and the hemispheric dimension of transboundary air pollution. Together these resulted in IUAPPA's "Vancouver Declaration".

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5 It is not by coincidence that this year's EFCA events also address aspects of the IUAPPA agenda. In May the role of particulate matter is being discussed in relation to health risks as well as to climate at the 3<sup>rd</sup> EFCA-symposium on Ultrafine Particles. Detailing the connection between the "Black Carbon" in climate forcing and that of "Carbon Black" in exposure to particles is one of the challenges of an intended discussion on the metrics for particulate matter.

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12 Later in the year the 6<sup>th</sup> symposium on Non-CO<sub>2</sub> Greenhouses Gases the discussion will again deal with issues which are relevant to climate as well as to air quality health risks and biodiversity. Examples are tropospheric ozone and its precursors, and the nitrogen cycle.

13 To complete the picture there will be a joint two-day event in cooperation with IUAPPA and the Global Atmospheric Pollution Forum in September. It will focus on the biodiversity issue and the options for an international approach to control the hemispheric dimension of air pollution. The need to identify and emphasise the co-benefits between different policies will again be a leading element in these discussions.

# Convention on Long Range Transboundary Air Pollution

## Progress in the CLRTAP

In December last year the Executive Body (EB) for the Convention on Long-Range Transboundary Air Pollution (CLRTAP) held its 28<sup>th</sup> meeting. The meeting was supposed to decide on details as well as a time path for completing the ongoing revisions of some of the Protocols of the Convention. Among many items on the agenda an important one was also the recent report by the Task Force on Hemispheric Transport. The EB also considered a Long-Term Strategy to define a work programme for the next ten years.

### *Hemispheric Transport*

The reports of the Task Force on this topic (TFHTAP) had revealed and confirmed that components like black carbon, tropospheric ozone (as well as its precursors, NO<sub>x</sub>, CO and methane) are being transported intercontinentally at a significant level. These components also fall in the category of short-lived climate forcers (SLCFs) which had fuelled earlier discussions in order to address them within the context of the Convention. It has now been confirmed that the CLRTAP will include the SLCFs in its work programme and has asked the TFHTAP to explore policies to reduce hemispheric transport of air pollution.

### *Gothenburg Protocol*

The present Gothenburg Protocol considers the conventional pollutants SO<sub>2</sub>, NO<sub>x</sub>, VOC and NH<sub>3</sub> and sets national ceilings on their emissions from 2010. Its revision has been started under the agreement that PM was to be included. With respect to the SLCFs the EB decided that black carbon is to be addressed as part of PM. In addition, the objective of the GP to control ground-level ozone is to be considered, over the longer term, also on its regional impact with respect to climate change. It has also been agreed that the procedure to include later amendments should be made simple, in order to include new insights and knowledge more easily. It was

decided that all efforts are to be made to complete and adopt the revised Gothenburg Protocol by the end of 2011. The details of this process are agreed in negotiations between the parties and may potentially complicate its timely completion. The EU supports the time schedule.

### *Heavy Metals Protocol*

The revision work of the Heavy Metals (HM) Protocol has made less progress and there is still work to be done on several annexes which contain technical details, such as those on maximum HM levels in certain products and setting emission limit values for many sources. The handling of HM containing wastes will for the time being not be discussed. The EB decided, therefore, to take an additional year for this work and finalise the revision in 2012. This would also keep the secretariats capacity available this year for the final handling of the revised Gothenburg Protocol. Also with respect to the POP Protocol it was decided to wait until 2012 to progress with negotiations on the five substances in the pipeline.

### *Long Term Strategy*

The Executive Body adopted the draft Long Term Strategy for the Convention. This decision implies that the Convention will broaden its scope and include policy development on the short-lived climate forcers within its working programme.

More information: [www.unece.org](http://www.unece.org)

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# Developments in EU policy

## Debate in Commission on air quality

Reporting on a debate by the Commission, held in January of this year in the College on Air Quality, Commissioner Janus Potocnik recollected that in spite of the progress made Europe still is not on track when considering pressures on ecosystems, biodiversity loss and urban air quality. It was recognised, therefore, and accepted that there is a need for a renewed and comprehensive air quality policy, which should include a revision of the National Emission Ceilings Directive (NEC Directive).

The immediate actions which were announced to reduce emissions include reduction of the sulphur content of bunker fuels and regulation of the emissions from vehicles and machinery. It was further suggested that the implementation of measures in the climate and energy package, the new CAP and the use of Cohesion Funds will be beneficial for air quality.

It was also interesting to learn that the Commission confirmed an active participation in the negotiations for international conventions which referred to the CLRTAP and the current revision of the Gothenburg Protocol.

With respect to the revision of the NEC Directive which has been due for revision for some time the planning was not specified. It was recollected that some Member States have had difficulty in meeting the agreed ceilings for 2010. A revised NEC Directive which could deliver its targets would, therefore, have to be supported by additional measures which need some time to effect. Such measures include synergies from the implementation of the Industrial Pollution Directive, and the Climate and Energy Package and have to be placed in relation to the evaluation of the 6<sup>th</sup> Environmental Action Programme.

More information: [MEMO/11/31](#)

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## Climate change: Results at Cancun

The COP in Cancun is now some time ago. It was interesting to see that, after the low expectations for its outcome, the results which were achieved were welcomed in Brussels by the Commission and the European Parliament and in most European capitals as a success. Among these were:

- Acknowledgement for the first time in a UN document that global warming must be kept below 2°C compared to the pre-industrial temperature, and establishment of a process to define a date for global emissions to peak and a global emissions reduction goal for 2050;
- *The emission pledges of developed and developing countries have been anchored in the UN process and a process set out to help clarify them. The text also recognises that overall mitigation efforts need to be scaled up in order to stay within the 2°C ceiling;*
- Confirmation of the goal that developed countries will mobilise US\$ 100 billion in climate funding for developing countries annually by 2020, and establishment of a Green Climate Fund through which much of the funding will be channelled;

In addition, further steps were agreed on such issues as adaptation, reduction of emissions from deforestation (REDD+), an improved carbon market mechanism, and technology transfer. It was also agreed that the ad hoc working groups would continue for a further year under the same conditions to prepare a more substantial proposal to be agreed at the COP at the end of this year.

More information: [IP/10/1699](#); [MEMO/10/673](#); [Speech/10/755](#)

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## Roadmap for low-carbon Europe

On 8 March the Commission adopted a Roadmap for the transformation of the European Union into a low-carbon economy in 2050. In the Roadmap a cost-effective pathway towards the EU objective of cutting greenhouse gas emissions by 80-95% of 1990 levels in 2050. The reduction is supposed to result for 80% from domestic measures. This percentage may increase by using credits. The pathway projects reductions of roughly 20% per decade which is much more ambitious than the present -30% in 2030 and -40% in 2050. Analysis shows that the reduction in 2020 should be 25% instead of the present 20%. 25% will be feasible, however, if Member States succeed to comply simultaneously with their target of a 20% improvement in energy-efficiency (see also article on Roadmap 2050 of the European Climate Foundation in EFCA Newsletter No 10).

More information:

[http://ec.europa.eu/clima/policies/roadmap/index\\_en.htm](http://ec.europa.eu/clima/policies/roadmap/index_en.htm)

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## Emission Trading

Commissioner Connie Hedegaard announced an initiative to review the present structure and functioning of the EU Emissions Trading System. It will start with a stakeholders consultation via the internet in the first half of this year and be followed by an impact assessment. Recent fraudulent attacks at the ETS which caused an interruption of its activities have to be considered in a decision on whether new legislation is required.

More information: [Emissions trading](#)

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## Renewable energy

The path for a transition towards a European economy which runs on renewable energy has been specified recently in a report of an expert

group of stakeholders on future transport fuels. In the report a comprehensive approach covering the whole transport sector is described which could result in a gradual phase-out of fossil fuels and a largely CO<sub>2</sub>-free energy supply for transport in 2050. The expected demand from all transport modes could be met by a combination of electricity (batteries, hydrogen/fuel cells) and biofuels as main options and supported by bridging options, such as synthetic fuels (increasingly from biomass), (bio)methane and possibly LPG.

For the Commission, Siim Kallas welcomed the report as input for its initiative on clean transport systems, to be launched later this year.

More information: [Expert group report](#)

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## Biofuels

In December the Commission adopted a report on *indirect land use change* in relation to the production of biofuels. It covers a further step in the prevention of deforestation which is driven by the demand for biofuels and biomass. The Directive on renewable energy forbids imports to EU Member States of biomass or biofuels produced on land that had been deforested explicitly for that purpose or on other land with a rich biodiversity. It had been noted, however, that this restriction was being circumvented by converting agricultural grounds for growing palms or sugar cane, and consequently still driving further deforestation to make up for the lost agricultural area. The report announced that the Commission will conduct an impact assessment to decide on the need to change existing legislation. While a number of policy options will be considered the Commission does not want to exclude a precautionary approach in this stage.

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## Mobile sources

On 15 February the European Parliament voted in favour of the proposal of the Commission to regulate CO<sub>2</sub>-emission from vans. The regulation follows the model which was developed earlier for

passengers cars. It should result in a fleet-averaged, though differentiated according to vehicle mass, reduction of CO<sub>2</sub>-emissions/km of all new types of light-duty vehicles with a weight not exceeding 2610 kg. The regulation will be phased in from 2014 and will gradually bring emissions down by 28% in 2020.


More information:

[http://ec.europa.eu/clima/policies/transport/vehicles/vans\\_en.htm](http://ec.europa.eu/clima/policies/transport/vehicles/vans_en.htm)

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## Resources and resource efficiency

For some time now environmental policy development has been characterised by a new focus. While legislation to protect the environment, including human health, has long been the main output of the EU's policies and is still important a more holistic approach is presently developing momentum. Increasing concern over the loss of the planet's capacity to provide its free ecological services is now forcing policymakers to prepare for a future in which access to essential resources is not self-evident anymore.

On 2 February 2011 the European Commission adopted a [new strategy](#)  document, prepared by DG Trade, defining a raw materials policy for the EU. Non-energy raw materials are vital inputs for the EU's economy, and are particularly crucial for the development of modern environmentally friendly technologies such as electric cars and photovoltaics.

The strategy defines 14 so-called critical raw materials, primarily metals or metal groups (rare earths; platinum group) on the basis of their risk of supply shortage and impacts on the economy. As global raw material markets are increasingly distorted by protectionist trade policies, it becomes increasingly difficult to maintain fair and undistorted access to these materials for EU industry and citizens. For many of these metals the EU has a 100% import dependency and for most of these no recycling industries exist. Another challenge is the EU's own production: exploration and extraction have to face increased competition for different land uses and a highly regulated environment.

In the Strategy three 'pillars' define the efforts which the Commission wants to make.

The first is an international 'raw materials diplomacy' through strategic partnerships and policy dialogues. The EU already agreed last year with the African Union Commission on bilateral cooperation.

A second pillar will address raw materials produced within the EU and their sustainable supply, by supporting initiatives such as statistical information exchange, developing skills within the relevant sectors and by promoting research in the raw materials value-chain, including extraction, processing and substitution.

A third pillar focuses on resource efficiency and the promotion of recycling. This part of the strategy is highly interwoven with the EU's waste policy and it is no accident that Commissioner Janus Potocnik termed recycling a top priority of his portfolio at several earlier occasions. The Thematic strategy on waste prevention and recycling was among several other actions the Commission proposes to review in 2012.

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## Energy efficiency and ETS

Both industry and politicians consider the Emission Trading System (ETS) to be an effective instrument for the reduction of CO<sub>2</sub>-emissions, in particular when considering costs. Industries are free in the timing of necessary investments which may often be connected to other changes in production with their own time path. The ETS provides the possibility to buy certificates for the additional emissions in the intermediate period.

However, a disadvantage from the viewpoint of climate change policy is that the instrument does not mix well with more traditional instruments, such as emission limit values. Limit values generally apply alike for all industries within the same sector and have never been popular with industry because it leaves little flexibility. For CO<sub>2</sub>-emissions such regulation would be incompatible with the ETS.

In an advice from the European Economic and Social Committee (EESC) this deadlock is being noted. In addition, the observation is made that a sector approach is still viable for those sectors which are not covered by the ETS. The EESC



recommends therefore to select these sectors, notably transport and construction, for the development of policies with strong incentives for energy-efficiency measures and so contribute to save the 20% target for 2020. It would require that in the transport sector the recent successful agreements on road vehicles are extended to the entire transport sector.

More information: [EESC](#)

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## Energy efficiency plan

On 8 March the Commission published an energy-efficiency plan which in order to assist Member States with developing policies for achieving their national target. It could finally result in savings of up to €1000 per household on energy bills. However, this also requires investments in the order of €250 billion annually. The plan also highlights the exemplary role of the public sector. With an average spending of 17% of GDP the public sector is supposed to have a big share of the investments.

More information:

[http://ec.europa.eu/energy/efficiency/action\\_plan/action\\_plan\\_en.htm](http://ec.europa.eu/energy/efficiency/action_plan/action_plan_en.htm)

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## Short news

### *Impact of selected policy measures on Europe's air quality*

This EEA-report analyses and quantifies the effects that certain past policy measures in the road transport and industrial combustion facilities have had on the magnitude of air pollutant emissions and subsequent air quality in Europe. The policies selected are the Euro emission standards for road vehicles and the EU directives on Integrated Pollution Prevention and Control (IPPC) and large combustion plants (LCP).

[EEA Technical report No 8/2010](#), Published: 05 Jan 2011

### *Clean Vehicle Directive in force*

Since December last year the Clean Vehicle Directive (2009/33/EC), adopted in 2009, applies

to the procurement of all vehicles meant for public transport in the EU. It means that public authorities as well as private operators have to take into account the impact of energy consumption, CO<sub>2</sub>-emissions and pollutant emissions affecting air quality, integrated over the entire lifetime of vehicles. Market penetration of cleaner and more energy-efficient vehicles is expected to benefit from this requirement, in spite of the likely higher initial investment.

More information: Clean Vehicle Portal:

<http://www.cleanvehicle.eu>

### *Information on environment and security*

The Global Monitoring system for Environment and Security (GMES) which was launched a few years ago aims at providing real time information to European citizens on relevant parameters on their environment and security. In January further steps were made to make GMES operational. At the end of 2011 it will be possible for citizens and professional parties to sign up for receiving information via smart phone platforms and SMS messages of air quality information on the conventional pollutants: SO<sub>x</sub>, NO<sub>x</sub>, O<sub>3</sub>, CO and PM (ObsAIRve). Another service foreseen at the end of this year is on sea ice information in the Arctic Ocean and Baltic seas (Icemar).

More information: <http://ec.europa.eu/gmes>

### *Renewable Energy projections*

EU Member States have agreed on a target of 20% renewable energy (RE) in 2020. In a study committed by EEA, ECN recently compiled and analysed the intended contributions of each energy category in 2020 as specified in the National Renewable Energy Action Plans (NREAPs) of the 27 EU Member States. If all Actions Plans are realised the projected contributions add up to 20.7%. The Action Plans have an annual growth rate for RE which averages at 6% and will primarily result in a rise of electricity production by wind power and of heat production from Biomass.

L.W.M. Beurskens and M. Hekkenberg, Renewable Energy Projections as Published in the National Renewable Energy Action Plans of the European Member States covering all 27 EU Member States. Energy research Centre of the Netherlands, report ECN-E-10-069, published 01 February 2011. [data report](#) .

## EFCA Events in 2011

The organisation of three EFCA symposia is presently in progress:

- 3<sup>rd</sup> symposium on Ultrafine Particles (UFP-3; 26-27 May 2011)
- Biodiversity, co-benefits and international cooperation (29-30 September 2011)

- 6<sup>th</sup> symposium on Non-CO<sub>2</sub> Greenhouse Gases (NCCG-6, 2-4 November 2011)
- Information on each is presented at the following pages.
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## Ultrafine Particles: Sources, Effects, Risks and Mitigation Strategies

EFCA symposium, Brussels, Belgium, 26-27 May 2011

“**Ultrafine Particles: Sources, Effects, Risks, Mitigation Strategies**” (UFP-3) is the third symposium in a series which started in 2007 and takes place on 26 and 27 May in Brussels. UFP-3 is a joint activity with our German member GUS e.V., the Confederation of European Environmental Engineering Societies (CEEES) and the Karlsruhe Institute of Technology KIT. Uncertainty on what the preferred metrics are for air quality aspects and the protection of human health against the effects of particulate matter prompted this EFCA initiative and are still a valid reason to continue the series.

Due to a higher response at the Call for Papers this year the organizers had to decide on a program in two parallel sessions during most of the first day. The presentations will be arranged in six sessions, covering the topics Sources, Emissions, Modelling (A), Air Quality Monitoring and Chemical Characterization (B), Health Effects and Mechanisms (C), Climate Effects (D) Mitigation Options (E) and Metrics (F).

The program below is still under review as authors are presently asked to confirm their paper and changes are possible.

### PROGRAM

#### 26 May, 09.30 – 10.45 Plenary Opening session

09.30 **Greetings and Opening Ceremony**

Representatives of the State of Baden-Württemberg, the Ministry for Environment Baden-Württemberg, and the EFCA;

Chair: *Karl-Friedrich Ziegahn, Karlsruhe Institute of Technology KIT, Germany*

09.45 **Keynote lecture:** Future prospects for UFPs and other metrics

*Martin Williams, Kings College, London, United Kingdom*

10.15 **Keynote lecture:** Atmospheric measurements in the field of PM

*Xavier Querol, Institute of Environmental Assessment and Water Research, Barcelona, Spain*

## Stream I

### Sources, Emissions and Modelling Session A.1 - 26 May, 11.05 – 12.25

Studies of the behaviour of traffic-generated ultrafine particles in urban atmosphere

**R. M. Harrison**, *University of Birmingham, United Kingdom*

Long term measurements of particle number and lung deposited surface area concentrations in an urban background: indications on particle origin and sources

**U. Quass**, *IUTA e.V., Duisburg, Germany*

Chemical composition and size distribution of ultrafine particles at the stack and in the plume of a Fe-Mn alloys manufacturing plant

**K. Deboudt**, *Université du Littoral Côte d'Opale, Dunkerque, France*

Dispersion modelling of traffic induced ultrafine particles in urban street canyon

**I. Nikolova**, *University of Antwerp, Belgium*

#### 12.25 Lunch

### Sources, Emissions and Modelling Session A.2 - 26 May, 13.25 – 15.05

Concentrations of UFP in a tunnel in Belgium

**M. van Poppel**, *VITO Flemish Institute for Technological Research, Mol, Belgium*

Accurately modelling the size-distribution of UFP in a traffic tunnel

**P. Vos**, *VITO Flemish Institute for Technological Research, Mol, Belgium*

Ultrafine particles in flue gas from waste-to-energy (WTE) plants

**S. Ozgen**, *DIIAR Environmental section, Politecnico di Milano, Italy*

Fast evolution of atmospheric aerosol in an urban area

**P. Avino**, *INAIL, Rome, Italy*

A non negative matrix factorization based method for source apportionment in atmospheric aerosols

**F. Ledoux**, *Université Lille Nord de France, Lille, France*

## Stream II

### Air Quality Monitoring and Chemical Characterisation Session B.1 - 26 May, 11.05 – 12.25

Hot spots of fine and ultrafine particulates in Vienna

**M. Neuberger**, *Medical University of Vienna, Austria*

Spatial-temporal variation of ultrafine particles in an urban area during wintertime

**P. Berghmans**, *VITO Flemish Institute for Technological Research, Mol, Belgium*

Ultrafine and nanoparticle number concentrations in an urban environment of Milano, Italy

**S. Ozgen**, *Politecnico di Milano, Italy*

Continuous monitoring of UFP: Practical implementation

**B. Bergmans**, *Institut scientifique de service public, Liege, Belgium*

#### 12.25 Lunch

### Air Quality Monitoring and Chemical Characterisation Session B.2 - 26 May, 13.25 – 15.05

Commute exposure to ultrafine particles – Measurement approaches and investigation of exposure determinants

**M. S. Ragetti**, *Swiss Tropical and Public Health Institute, Basel, Switzerland*

Measuring levels of ultrafine particle concentrations during human activities in residential environment

**O. Le Bihan**, *Institute National de l'Environnement Industriel et des Risques, Verneuil-en-Halatte, France*

Analyzing the chemical composition of ultrafine particles by X-ray spectrometry under grazing incidence

**R. Falk**, *Physikalisch-Technische Bundesanstalt (PTB), Berlin, Germany*

Characterisation of wintertime fine and ultrafine particles sampled at an urban background site

**V. Riffault**, *Université Lille Nord de France, Lille, France*



## Health Effects and Mechanisms

Session C.1 - 26 May, 16.40 – 17.40

Long-term effects of repeated exposure to Paris ambient particles on the pro-inflammatory response and differentiation of human bronchial epithelial cells in vitro

*L. Boulil, University Paris Diderot, France*

Lung-bioaccessibility of trace elements in size-resolved urban atmospheric particles *L. Y. Alleman, Université Lille Nord de France, Lille, France*

Internalization, translocation of silicium and titanium dioxide nanoparticles in human pulmonary vascular endothelial cells

*I. Baudrimont, Université Bordeaux, Segalen, France*

Predominant effect of ultrafine and fine particles of the ambient air on the induction of the pro-inflammatory response and mucus expression in airway epithelial cells

*S. Val, University Paris Diderot, France*

### 16.25 Coffee break

## Health Effects and Mechanisms

Session C.2 - 26 May, 16.40 – 17.40

Polycyclic aromatic hydrocarbon components contribute to the antiapoptotic effect of fine and ultrafine particles on human bronchial epithelial cells via the aryl hydrocarbon receptor

*I. Ferecatu, Université Paris Diderot, France*

In-vitro cell exposure studies for the assessment of UFP-toxicity from wood combustion

*H.-R. Paur, Karlsruhe Institute of Technology KIT, Germany*

Chemical Characterisation of the most abundant acidic species and their contribution to PM<sub>10</sub>, PM<sub>2,5</sub> and PM<sub>1</sub> in Zagreb Air, Croatia

*M. Čačković, Institute for Medical Research and Occupational Health, Zagreb, Croatia*

## Air Quality Monitoring and Chemical Characterisation

Session B.3 - 26 May, 15.25 – 16.25

Influences of volcanic clouds upon the ultrafine particle concentration in the Northern Alpine region

*K. Schäfer, Karlsruhe Institute of Technology KIT, Germany*

Assessing variability of UFP in urban street

*J. Theunis, VITO Flemish Institute of Technological Research, Mol, Belgium*

Pollution of PM<sub>10</sub> and PM<sub>2,5</sub> in selected Polish cities

*K. Zareba, Poland*

Wide range aerosol spectrometer for comprehensive measurement of atmospheric fine and ultrafine aerosol particles

*M. Pesch, GRIMM Aerosol GmbH, Ainring, Germany*

### 16.25 Coffee break

## Air Quality Monitoring and Chemical Characterisation

Session B.4 - 26 May, 16.40 – 17.40

Dust inquiry around two different stone crushers

*F.B.H. de Bree, Buro Blauw, Wageningen, The Netherlands*

A new versatile condensation particle counter for research and environmental monitoring

*J. Spielvogel, Palas GmbH, Karlsruhe, Germany*

Detection efficiency of condensation particle counters (CPCs) – Effect of nanoparticle morphology

*L. Keck, GRIMM Aerosol GmbH, Ainring, Germany*

## Climate Effects

Session D - 27 May 8.30 - 9.20

**Keynote Lecture:** The role of airborne particulate matter in climate change

*Andreas Petzold, Deutsches Zentrum für Luft- und Raumfahrt DLR, Oberpfaffenhofen-Wessling, Germany*

Secondary organic aerosol formation, aging, and impact on climate relevant aerosol properties

*H. Saathoff, Karlsruhe Institute of Technology KIT, Germany*

## Mitigation Options

Session E - 27 May 9.20 – 10.20

Integrated particulate matter and NOx photocatalytic removal process

*M. Smits, University of Antwerp, Wilrijk, Belgium*

The effectiveness of vegetation screens for particulate matter collection

*R. Samson, University of Antwerp, Antwerp, Belgium*

Contribution of agriculture in French PM emissions: emission factors and abatement strategies

*J. Faburé, Institut National de Recherche Agronomique – Environnement et Grandes Cultures, Thiverval-Grignon, France*

**10.20 Coffee break**

## Metrics

Session F - 27 May 10.50 – 13.10

**Keynote Lecture:** Value of measures of combustion particles as indicators of air quality in addition to PM mass

*Nicole Janssen, RIVM, Bilthoven, The Netherlands*

Is PM<sub>2.5</sub> a better metric for traffic emissions than PM<sub>10</sub> or do we need a standard for Black Carbon?

*S. van den Elshout, DCMR Environmental Protection Agency Rijnmond, Rotterdam, The Netherlands*

European Regulation on ambient fine particles why the overall mass concentration is no longer the only right metric

*G. Guillosoy, EDF Medical Studies Department, Levallois-Perret, France*

Health impact assessment of elemental carbon in the period 1985-2008 in the city of Rotterdam, the Netherlands

*M. Keuken, TNO, Utrecht, Netherlands*

Black carbon instead particle mass concentration as indicator for the traffic related particles in the Brussels capital region

*P. Vanderstraeten, Brussels Institute for the Management of the Environment, Brussels, Belgium*

## Discussion

Chairman: *Martin Williams*

Moderator: *Flemming Cassee*

**13.10 Lunch break**

## Concluding Session

27 May - 13.50 – 15.10

**Keynote Lecture:** EU strategies on mitigating air pollution  
*Andre Zuber, European Commission (to be confirmed)*

### Panel Discussion

*Andre Zuber (tbc), Martin Williams, Andreas Petzold, Nicole Janssen, Xavier Querol, Thomas Leissner*  
Chairman: *Karl-Friedrich Ziegahn*

### Concluding remarks

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#### Venue

Vertretung des Landes Baden-Württemberg bei  
der EU  
Rue Belliard 60-62  
B-1040 Brussels

#### Conference chairman

***Karl-Friedrich Ziegahn***

Karlsruhe Institute of Technology KIT and  
president of the Gesellschaft für  
Umweltsimulation GUS e.V., Germany

#### Social Programme

A conference buffet has been arranged on 26<sup>th</sup>  
May at 18.30.

#### Conference secretariat

Karlsruhe Institute of Technology KIT  
Energy and Environment Programs  
*Mrs. Biserka Mathes*  
P.O.Box 3640, D-76021 Karlsruhe, Germany  
Phone: +49-721-6082-3967  
Fax: +49-721-6082-7967  
[biserka.mathes@kit.org](mailto:biserka.mathes@kit.org)

#### Registration and Accommodation

A Registration and Hotel Booking Form and  
further details are available soon at [www.efca.net](http://www.efca.net)



*The audience at one of the sessions of UFP-2 in 2009*

## Biodiversity, co-benefits and international cooperation

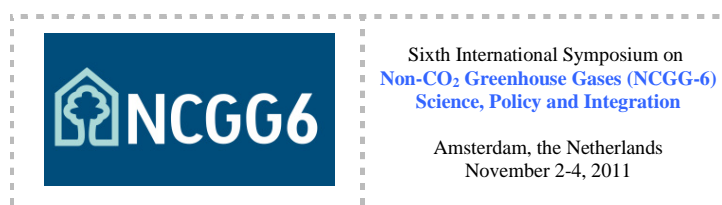
“**Biodiversity, co-benefits and international cooperation**” is an event which will be hosted in Paris on 29 and 30 September this year by our French member APPA, in cooperation with IUAPPA and the Global Atmospheric Pollution Forum (GAPF). It will cover the three main elements of IUAPPA’s “Vancouver Declaration”: ‘Biodiversity and air pollution’; ‘Co-benefits between climate and air pollution policies’ and ‘Developing international cooperation’.

The initiative of APPA effectively replaces the earlier proposal for an EFCA workshop on Co-benefits at local levels which appeared to be less feasible in the context of French government initiatives as the French ministry of environment is organizing a big gathering of local governments and administrations on this very topic in April this year. In such a context, the EFCA initiative, which at first had been planned to be coupled with this event, could no longer appear as genuine and independent, and had to be canceled.

Instead, APPA is currently programming, for September 29-30<sup>th</sup>, the above mentioned workshop, building on the conclusions and recommendations of the Vancouver Declaration.. Working groups will try to identify the main paths for further progress, in each of the three concerned domains, that will be necessary for more integrated and coordinated policies.

EFCA will play a strong part in the definition of the program, of which APPA will arrange the biodiversity, air pollution and climate change part, while the IUAPPA and the GAPF will substantially contribute to the two last topics.

## Sixth International Symposium on Non-CO<sub>2</sub> Greenhouse Gases (NCGG-6) – Extended deadline for abstracts



From 2-4<sup>th</sup> November 2011, the Sixth International Symposium on science, implementation and policy aspects of non-CO<sub>2</sub> greenhouse gases (NCGG-6) will be organized. NCGG-6 will be held in Amsterdam, The Netherlands and will address both the role of non-CO<sub>2</sub> greenhouse gases and aerosols in human-induced climate forcing, and options for their reduction by industry and society. The symposium aims to overcome any barriers between policy, industry and science that might exist. It also fosters the dialogue between scientists, engineers and officials in industry and government working in this field from different perspectives. This multidisciplinary approach is expected to yield realistic and achievable mitigation solutions that might significantly lower NCGG emissions.

### Extended deadline for abstracts

We have already received a number of abstracts. But we also noted that many potential contributors had difficulties sending in their abstracts in time. We therefore extend the deadline for submitting abstracts to 31 March 2011.

### Reduced fees for MSc and PhD students

We particularly welcome presentations by MSc and PhD students this year. PhD students pay a reduced fee to participate (50%). For MSc students we have a limited number of waivers. We encourage MSc students to also send in their abstracts; excellent student papers will be considered for oral presentations.

For more information on the themes of NCGG6, please visit our website [www.ncgg.info](http://www.ncgg.info) or send an email to [NCGG6@ncgg.info](mailto:NCGG6@ncgg.info)

# News on EFCA and its members

## Event of KRdL

The Kommission Reinhaltung der Luft im VDI und DIN (KRdL) is organizing a national conference on “New developments in air quality measurements and their interpretation“. The

programme of this two-day event includes presentations on monitoring, exposure to traffic, emission measurements and fine particles and takes place on 11 and 12 May in Baden-Baden. The working language is German. Full information of the program is available at [www.vdi.de/UMTK](http://www.vdi.de/UMTK)

## Calendar

*CfP = Deadline Call for Papers*

Neue Entwicklungen bei der Messung und Beurteilung der Luftqualität. VDI-Fachtagung UMTK 2011

11-12 May 2011, Kongresshaus Baden-Baden, Germany ([www.vdi.de/UMTK](http://www.vdi.de/UMTK))

8<sup>th</sup> International Conference on Environmental Engineering

19-20 May 2011, Vilnius, Lithuania (<http://enviro.vgtu.lt>)

3<sup>d</sup> International EFCA-symposium on Ultrafine Particles

26-27 May 2011, Brussels, Belgium ([www.efca.net](http://www.efca.net))

Indoor Air 2011

5-10 June 2011, Austin, Texas, USA (<http://lifelong.engr.utexas.edu/2011/>)

7th International Conference on Renewable Resources and Biorefineries (RRB7)

8-10 June 2011, Bruges, Belgium ([www.rrbconference.com](http://www.rrbconference.com))

International Nordic Bioenergy Conference  
5-9 September 2011, Jyväskylä, Finland ([www.nordicbioenergy.finbioenergy.fi](http://www.nordicbioenergy.finbioenergy.fi))

Second Conference on Air Pollution and Control (CAPAC II 2011)

19 – 23 September 2011, Antalya, Turkey (<http://www.capac2011.org/>) CfP: 29-04-2011

EFCA-workshop on Biodiversity, co-benefits and international cooperation

29-30 September 2011, Paris, France ([www.appa.asso.fr](http://www.appa.asso.fr))

1<sup>st</sup> International 100% renewable energy conference and exhibition (IRENEC 2011)

6-8 October 2011, Istanbul, Turkey ([www.irenec2011.com](http://www.irenec2011.com))

6<sup>th</sup> International Symposium on Non-CO<sub>2</sub> Greenhouse Gases

2-4 November 2011, Amsterdam, Netherlands ([www.ncgg.info](http://www.ncgg.info)) CfP: 31-03-2011

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## **EFCA**

|                          |   |
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| <b>Secretary-general</b> | Joop van Ham (VVM-CLAN, The Netherlands)                                  |

## **Newsletter**

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