



16 and 17 November 2017 Hôtel de Ville de Paris



Karmenu Vella European Commissioner for Environment, Maritime Affairs and Fisheries

Dear Participants,

The air we breathe in Europe today is much cleaner than it has been for decades. And the European Environment Agency recently published a report showing that air quality in the European Union continues to improve.

So we are moving in the right direction, but when 399 000 premature deaths a year are linked to high concentrations of particulate matter, we cannot be satisfied. Millions of Europeans suffer from respiratory and cardiovascular diseases caused by air pollution. This is not acceptable.

The European Union's clean air policy framework strengthens national policies - specifically in aspects of air quality that Member States need help in delivering. In 2016 the European Union set stricter limits on the five main pollutants in Europe in order to halve the negative health impacts of air pollution by 2030. The Directive also helps enforce measures to meet air quality standards set in the Ambient Air Quality Directive.

However, setting targets is one thing; achieving them is another. Now we have to deliver, and that requires concerted action across societal stakeholders and economic sectors. That is what this forum is about.

The human cost of air pollution is of course the biggest issue, but the economic impact should not be underestimated. Poor air quality costs us at least twenty-four billion euros a year, increasing medical costs, through reduced productivity, and damage to soil, crops, forests, lakes and rivers. Tackling the problem not only saves money but also creates new business opportunities and jobs – be it by rolling out existing technologies or by generating new innovations and creative solutions.

The European Commission will continue supporting Member States in tackling air pollution. Europeans deserve levels of air pollution that do not pose significant risks to human health and the environment. I trust this inaugural Clean Air Forum will strengthen our resolve to have clean air for all.

Karmenu Vella

Welcome to the Clean Air Forum

This first European Clean Air Forum will focus on three main themes: air quality in cities, agriculture and air quality, and clean air business opportunities.

AIR QUALITY IN CITIES

Although poor air quality can be a problem anywhere, the negative impacts of air pollution are most distinctly felt in urban areas: our cities are hotspots for air pollution, and more than 130 of them see concentrations above EU air quality standards. Almost three quarters of the European Union's population lives in urban areas and economic activities are to a large extent concentrated in or close to urban areas. This results in a significant amount of locally emitted air pollution, adding to background concentration from national and international sources. The most significant air pollutants in cities today are particulate matter and nitrogen dioxide. The former originates to a large extent from the use of coal or wood for residential heating, while the latter originates mainly from transport.

AGRICULTURE AND AIR QUALITY

Agriculture is the primary emitter of ammonia, which is the principle driver of eutrophication of ecosystems resulting in loss of biodiversity. Ammonia also contributes to air pollution via the formation of (secondary) particulate matter—and particulate matter (whether

directly emitted particulates or in the form of secondary particulate matter) is the most problematic pollutant for human health in the EU nowadays. In Europe agricultural emissions make the largest relative contribution to fine particle concentrations, resulting in relatively high background concentrations of particulate matter across the EU. Improving air quality thus very much depends on achieving significant reductions in emissions from the agricultural sectors.

CLEAN AIR BUSINESS OPPORTUNITIES

A range of proven options to reduce air pollution exists. Reducing the emission of air pollutants can, for example, be achieved by using cleaner transport modes and clean energy, increasing energy efficiency, cleaning flue gasses from industry, and reducing ammonia emissions via proper manure management or the use of more efficient fertilizers. There are other examples, and by fostering further innovation many more possibilities can be created. The need to act on air pollution thus creates business opportunities - and at the same time reduces the societal costs incurred by poor air quality. To support the development and implementation of clean air solutions, the Commission offers, among others things, financial support within the framework of Structural Funds, Horizon 2020 and LIFE.

Day 1 5 Thursday 16 November 2017

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08:30 - 09:30	Registration
09:30 - 10:30	 Introductory remarks Karmenu Vella, European Commissioner for Environment, Maritime Affairs and Fisheries Anne Hidalgo, Mayor of Paris, France
10:30 - 11:00	 Framing the problem – Why do we need to focus on clean air and what are the consequences of not succeeding? Maria Neira, Director, Department of Public Health, Environmental and Social Determinants of Health, WHO (World Health Organization) François Bourdillon, Director General, Santé Publique France
11:00 - 11:30	Coffee break
11:30 - 13:00	 Reflections - What is the clean air challenge we face? Who and where do we need to act (more)? Norbert Kurilla, State Secretary, Ministry of Environment, Slovakia Marko Pomerants, Member of Parliament, Estonia Cor Lamers, Mayor of Schiedam/ENVE Chair, Committee of the Regions Teresa Ribera, Director, Institute for sustainable development and international relations (IDDRI) Anne Stauffer, Director for Strategy and Campaigns, Health and Environment Alliance (HEAL)
13:00 - 14:00	Lunch break
14:00 - 14:30	Framing the discussions – Assessing air quality in Europe today, and how we might transition to a clean air future? • Hans Bruyninckx, Executive Director, European Environment Agency
14:30 - 16:00	Focus session: Air quality in cities – Boundless mobility and clean air: friends or foes? • Winfried Hermann, Minister for Transport, Baden-Württemberg, Germany • Pex Langenberg, Vice Mayor, City of Rotterdam, The Netherlands • Daniel Rees, Special Adviser to Vice Mayor Berg, Oslo, Norway • Aurélie Solans, Councillor (Paris) in charge of Environment, France • Jorge Gonzalez-Iglesias, Head of Business and Strategy, Ubeeqo • Simon Birkett, Founder and Director, Clean Air in London
16:00 - 16:30	Coffee break
16:30 - 18:00	 Focus session: Agriculture and air quality – Can our agricultural regime sustain clean(er) air? Peter Power, Head of Cabinet of Phil Hogan (Commissioner for Agriculture and Rural Development) Dacian Ciolos, Former Prime-Minister of Romania and Former European Agriculture Commissioner Jannes Maes, President, Young Farmers Association Prof Mark Sutton, Co-Chair Chairman UNECE Task Force on Reactive Nitrogen Louise Duprez, Senior Adviser, European Environmental Bureau

Reception hosted by the European Commission

18:30

08:30 - 09:00 09:00 - 09:15

09:15 - 09:30

09:30 - 10:30

10:30 - 10:50

10:50 - 11:15 11:15 - 12:30

12:30 - 13:00

Registration

Opening day 2 - From understanding to policy to implementation

• Daniel Calleja, Director-General, European Commission, DG Environment

Presentation of upcoming EU Eco-Innovation Summit on Air Quality

Neno Dimov, Minister for Environment and Water, Bulgaria

Focus session: clean air business opportunities - Clean tech for clean air, already a reality

- Rosalino Usci, CEO, Tre P Engineering srl, CHIMERA, Life Project
- **Jacques Vroon**, Director of the Department Mobility and Environment Dutch Province Zuid-Holland, CLINSH Life Project
- Tomasz Pietrusiak, Deputy Director of the Department of the Environment Małopolska Life Project
- Thomas Kerting, President, Les Respirations

Framing the response – The cost of inaction is high for our health, our economy, our society: but we can all help make a difference

• Richard Fuller, Co-Chair, Lancet Commission on pollution and health

Coffee break

Reflections and concluding debate: Are EU, national, regional and local policy actions to ensure clean air coherent and how can we improve the synergies?

- Seb Dance, European Parliament
- Valerie Pécresse, President, Ile-de-France Region, France
- Camille Gira, State Secretary for Environment, Luxembourg
- Ingrid Felipe Saint Hilaire, Environment and Transport Minister, Tyrol, Austria
- Shirley Rodrigues, Deputy Mayor of London, United Kingdom
- Daniel Calleja, Director-General, European Commission, DG Environment

Concluding remarks

- Nicolas Hulot, Minister of Ecology and Inclusive Transition, France
- Pierre Moscovici, European Commissioner for Economic and Financial Affairs, Taxation and Customs



AIR QUALITY IN CITIES

An urban challenge

Clean air in Europe's cities improves our health and overall quality of life and helps fight climate change and preserve our environment.



Home to 3 out of
4 Europeans, many
urban areas suffer from
dangerously high levels
of air pollution. The
EU, national and local
authorities need to take
more action, especially
against the main offenders
– urban transport and
the use of fuels such as coal
or wood for household
heating.

Existing policies and international cooperation have resulted in Europe's air being cleaner today than it has been for decades. New EU policies and legislation aim to cut air pollution-related health impacts further, by at least half by 2030.

Did you know?



400 000 premature deaths in the EU every year
are linked to air pollution





About **130 cities** across
Europe do not meet EU air quality
standards

Air pollution costs over

€4 billion in healthcare and €16 billion in lost workdays



72% of Europeans want **public action** to improve air quality

Particulate matter and nitrogen dioxide are the main urban pollutants and are **very harmful** to **human health**

Good practices to improve city air quality include:



City or district heating, using heat from existing industry or renewable energy sources



Traffic restrictions such as low-emission zones, reduced speed limits and congestion charges



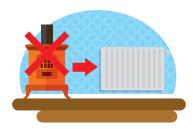
More **energy-efficient buildings**



Reliable, affordable and clean **public transport** such as electric buses and
trams and new Euro VI or retrofitted
buses



Extensive and safe **cycling networks**, abundant bike-parking
facilities with easy access to public
transport



Promoting substitution of old, dirty
stoves and boilers with clean
models, and banning dirty fuels for
household heating/cooking

AGRICULTURE AND AIR QUALITY

Minimising ammonia

Cutting agricultural ammonia emissions improves the air we breathe and benefits our health and environment, preserving biodiversity.



European farms
play a crucial role in
providing healthy,
high-quality food
for millions. But the
agricultural sector is
also the EU's main
source of harmful
ammonia emissions
due to manure and
inorganic fertilisers.

Proven measures exist to tackle this and should be applied more widely.

Did you know?



Ammonia-induced particulate matter contributes up to **58%** of particulate matter in cities

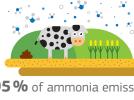


Ammonia contributes to the formation of (secondary)

particulate matter,

which is very harmful

to human health



95% of ammonia emissions come from agriculture: 80% from **manure** and 20% from **inorganic fertilisers**



Europeans consider **protecting the environment** as a top
responsibility for farmers



400 000 premature deaths in the EU every year
are linked to air pollution

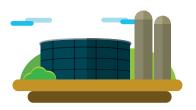
Good practices to cut ammonia emissions include:



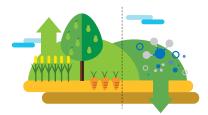
Improved livestock feeding
strategies so that animals produce
less ammonia-rich manure



Injectors or band spreaders to apply manure and inorganic fertilisers



Closed manure storage



Nitrogen management focusing on farms' feed and fertiliser needs and cutting overuse, lowering costs and emissions



Replacing urea-based fertilisers with ammonium nitrate-based ones



Housing animals in dry, clean spaces and minimising the surface area of manure pits



Air pollution costs
the EU at least
€24 billion a
year. Tackling the
problem not only
saves money but also
creates new business
opportunities and
jobs. More action is
needed to implement
measures to reduce
dangerous emissions
and foster further
innovation.

Did you know?



Air pollution costs over

€4 billion in healthcare and €16 billion in lost workdays



Air pollution costs €3

billion in lost crops and €1 billion in building damage



400 000 premature

deaths in the EU every year are linked to air pollution

Examples of clean air business opportunities



Cleaner transport such as electric cars or buses and retrofitted dirty vehicles and ships



Harnessing **renewable energy sources** like wind and solar



Boosting **energy efficiency** by refurbishing buildings



Implementing cleaner industrial processes



Replacing **energy-hungry household appliances** such as old stoves, boilers
and refrigerators



Better livestock feed and low-emission mineral fertilisers, manure storage and spreading techniques

SPEAKERS





Karmenu Vella has been European commissioner for environment, maritime affairs and fisheries since 2014.



Anne Hidalgo became the first woman to be elected mayor of Paris in April 2014. She is also currently president of the AIMF, president-elect of C40, co-president of the UCLG and first vice-president of the Greater Paris Metropolitan Area.



Maria Neria was appointed director of the Department of Public Health, Environmental and Social Determinants of Health at the World Health Organization (WHO), Geneva, Switzerland in September 2005. WHO is a specialized agency of the United Nations that is concerned with international public health



François Bourdillon is the director general of the national public-health agency, Santé publique France and an associate professor at the Pierre et Marie Curie University (Paris).



Norbert Kurilla was appointed as the state secretary of the Slovak Ministry of Environment in March 2016. He is responsible for numerous environmental and climate policies including international and EU affairs.



Marko Pomerants is a member of the Estonian Parliament and chairman of the Constitutional Committee. He was minister of the environment from 9 April 2015 to 12 July 2017.



Cor Lamers is the mayor of Schiedam in the Netherlands and will be the chair of the ENVE committee of the European Committee of the Regions (CoR) for the next 2,5 years.



Teresa Ribera is the director of the Institute for Sustainable Development and International Relations (IDDRI), an independent research institute dedicated to fostering the transition to sustainable development and prosperity for all.



Anne Stauffer is the director for strategy and campaigns at the Health and Environment Alliance (HEAL). She leads HEAL's overall policy input to the EU Institutions and provides expertise for decision-making processes on outdoor and indoor air quality, noise, pesticides and strategic EU environmental files.

CLEAN AIR FORUM







Hans Bruyninckx is the executive director of the European Environment Agency which aims to provide sound, independent information on the environment.



Winfried Hermann has been the minister of transport in Baden-Württemberg, Germany since May 2011, and since May 2014 in a green-black coalition.



Pex J. Langenberg is the vice mayor, responsible for mobility, sustainability and culture for the City of Rotterdam, the Netherlands.



Daniel Rees is the special adviser to the City of Oslo Vice Mayor for Environment and Transport Ms. Lan Marie Berg. He has been in the position since 2015. Air quality is one of his primary interests and main responsibilities.



Aurélie Solans was elected councilor of Paris in 2014. In October 2017 she was appointed as councilor in charge of environment, alongside Célia Blauel, the deputy mayor of Paris for environment, sustainable development, water, canals, and the Climate, Air and Energy Plan.



Jorge Gonzalez-Iglesias is the global head of business for Ubeeqo, a startup that specialises in corporate carsharing and mobility solutions. Ubeeqo was acquired by Europear in January 2015



Simon Birkett is the founder and director of Clean Air in London, which campaigns for full compliance with World Health Organisation (WHO) guidelines for air quality throughout London and elsewhere.



Peter Power has an extensive European career. He is currently the head of cabinet for European Commissioner for Agriculture and Rural Development Phil Hogan. He previously worked for Chris Patten, Lord Mandelson and Baroness Aston, when they served as European Commissioners, and held several other positions in both the European Commission and the European External Action Service.



Dacian Cioloş is the founder and president of the civic organisation Romania 100 Platform, an open organization that has its roots in the values and principles of the Romania 100 Manifesto proposed to the political parties. The number 100 is a symbol for the Centenary which Romania will celebrate in 2018.

SPEAKERS





Jannes Maes is the president of CEJA, the European Council of Young Farmers. CEJA is the voice of Europe's next generation of farmers to the European institutions.



Mark Sutton is a professor at the UK Centre for Ecology & Hydrology (CEH) in Edinburgh, Scotland. His research is focused on the emission, deposition, impacts and mitigation of atmospheric ammonia in the context of the wider nitrogen cycle.



Louise Duprez joined the European Environmental Bureau (EEB) as a senior adviser in 2009 and is now in charge of air quality and noise policies.



Daniel Calleja is the director general for environment of the European Commission. He has broad experience in the Commission having worked in many different areas since 1986.



Neno Dimov is the minister of environment and water of the Republic of Bulgaria. He has had an extensive career in the environmental field, with expertise covering both national and EU environmental issues.



Rosalino Usci is the CEO, together with Michele Marcantoni, of the company Tre P Engineering Srl located in Chiaravalle, Italy. He is also the project leader of the EU project LIFE-CHIMERA. The main objective of the CHIMERA project is to set up a pilot plant to demonstrate innovative sustainable treatment of poultry manure that can be done on a farm's premises (hence avoiding transport).



Jacques Vroon is the director of the Department of Mobility and Environment for the Province of Zuid-Holland in the Netherlands. His department is working on the transition to clean and smart transport.



Tomasz Pietrusiak is the deputy director of the Environment Department of the Marshal's Office, Małopolska Region. He runs the LIFE Project entitled: 'Implementation of Air Quality Plan for Małopolska Region – Małopolska in a healthy atmosphere'.



Thomas Kerting is the president of Les Respirations, the leading forum in France looking at major environmental and health issues from an air quality standpoint. He has been an air purity advocate for the last 10 years.

CLEAN AIR FORUM







Richard Fuller is co-chair at the Lancet Commission on pollution and health. The Commission on Pollution and Health is an initiative of The Lancet, the Global Alliance on Health and Pollution (GAHP), and the Icahn School of Medicine at Mount Sinai.



Seb Dance is a British member of the European Parliament for the London region who sits in the Group of the Progressive Alliance of Socialists and Democrats (S&D). He is the UK Labour Party's environment and climate change spokesperson in Europe.



Valerie Pécresse is the president of Ile-de-France, also known as the région parisienne (Parisian Region), one of the 18 regions of France, which includes Paris.



Camille Gira was appointed secretary of state for sustainable development and infrastructure in December 2013 in the coalition government formed by the Democratic Party (DP), the Luxembourg Socialist Workers' Party (LSAP), and the Green Party.



Ingrid Felipe Saint Hilaire is the deputy governor of the Government of Tyrol in Austria. Since May 2017 Ms Felipe has been the spokesperson for the Austrian Green Party.



Shirley Rodrigues is the deputy mayor for environment and energy of London City Hall. She is using her environmental expertise to work with Transport for London (TfL) to deliver the mayor's plans for tackling air pollution across London.



Nicolas Hulot was appointed Ministre d'Etat, minister for the ecological and inclusive transition, in the government of Edouard Philippe on 17 May 2017. He has worked, in turn, as a reporter, TV presenter/producer and writer.



Pierre Moscovici has been European commissioner for economic and financial affairs, taxation and customs since November 2014.



Clean air is essential for healthy living. The EU is working to ensure that every citizen can breathe without risking their well-being.



ADDITIONAL INFORMATION

EU laws and clean air policies have a direct benefit on our health, the economy and the environment.

EU air policy: http://ec.europa.eu/environment/air/



EUEnvironment



EU_ENV

#cleanairEU



