

WECOOP NEWS BULLETIN Issue 11 | 10 January 2023

INSIDE THIS ISSUE

1. Introduction 2. COP27 3. EU Policies and Legislation 3.1 New EU Policies 3.2 New EU Legislation 3.2.1 Legislation in force 3.2.2 Legislation in progress 4. Reports and studies 4.1 European Commission 4.2 European Environment Agency (EEA) 4.3 United Nations Economic Commission for Europe (UNECE) 4.4 Organisation for Economic Cooperation and Development (OECD) 4.5 International Energy Agency (IEA) 4.6 United Nations Environment Programme (UNEP) 5. Contacts

1. INTRODUCTION

European Union - Central Asia Water, Environment and Climate Change Cooperation (WECOOP)

The EU renewed the project "European Union – Central Asia Water, Environment and Climate Change Cooperation (WECOOP)" in October 2019 to run for three and a half years. The project continues strengthening the policy dialogue on sustainable development between the CA partner countries and facilitating their cooperation with the EU on environment and climate change. Specifically, the project efforts are focused on improving and rationalising policies and enhancing the capacities of national ministries and government agencies working in relevant fields.

The WECOOP project aims to enhance environment, climate change and water policies in Central Asia through **approximation to EU standards and to promote green investments** in relevant sectors with the aim of contributing to measurable reductions in man-made pollution, including CO₂ emissions.

Priority areas for consultations and cooperation include environmental governance, circular economy and sustainable consumption and production, climate change adaptation and mitigation, and water resources management.

The WECOOP News Bulletin provides brief information on the recent developments in EU policies and legislation, as well as on new relevant reports and studies published by the European Environment Agency, OECD or other specialized agencies (UNECE, WHO, IEA). Special attention is paid to the documents developed under the umbrella of the European Green Deal.

Detailed information on the WECOOP project is available at the project website <u>https://wecoop.eu</u>.

2. COP27

The 27th UN Climate Change Conference (COP27) took place from 6 to 20 November 2022 in Sharm El-Sheikh. Under the presidency of Egypt, the COP27 summit brought parties together to accelerate action towards the goals of the Paris Agreement and the UN Framework Convention on Climate Change.

Key results

- Parties agreed that limiting global warming to 1.5°C requires rapid, deep and sustained reductions in global GHG emissions, reducing them by 43 % by 2030 relative to the 2019 level.
- They reiterated the call from the Glasgow Climate Pact for nationally determined contributions (NDCs) to be updated as necessary to align with the Paris Agreement temperature goal, by the end of 2023.
- Glasgow Climate Pact will guide a new Mitigation Work Programme to encourage Parties to align their targets and actions towards net zero.
- Agreement was reached among parties to establish new funding arrangements for assisting developing countries that are particularly vulnerable to the adverse effects of climate change. This includes a new fund with a focus on addressing loss and damage.

EU at COP27

At the COP27, the European Commission showed ambition and flexibility to keep the goal of limiting global warming to 1.5 degrees within reach. A strong and united European effort helped secure a hard-fought deal to keep the targets of the Paris Agreement alive. The EU's bridge-building also helped to put in place balanced new funding arrangements, with an expanded donor base, to help vulnerable communities to face loss and damage caused by climate change.

Ms Ursula von der Leyen, President of the European Commission, stated that:

"COP27 has kept alive the goal of 1.5°C. Unfortunately, it has not delivered on a commitment by the world's major emitters to phase down fossil fuels, nor new commitments on climate mitigation. But the EU will stay the course, notably through the European Green Deal and REPowerEU, because it is essential to keep the ambition of the Paris Agreement within reach."

Kazakhstan at COP27

Kazakhstan's Prime Minister Alikhan Smailov said the country is planning to adopt its **first low-carbon strategy** by the end of this year, but it would keep emissions reduction

targets unchanged. He stated that Kazakhstan was still aiming for net zero emissions by 2060, and he reiterated a pledge to achieve an unconditional 15 % carbon emissions cut by 2030, compared with 1990 levels. A reduction target conditional on additional international support for the country is 25 % by 2030, also compared with 1990 levels. The lowcarbon strategy will be an update to the country's nationally determined contributions (NDC).

Kazakhstan concluded an agreement on hydrogen with the EU at the COP27. Renewable hydrogen is among several areas covered by the agreement, alongside raw material supply chains and batteries. The agreement sets out objectives for the partners, including identifying joint projects, aligning on environment, social and governance standards, increasing transparency around investments and cooperating on research and innovation. The EU and Kazakhstan plan to develop a more specific roadmap for 2023-2024 "with concrete joint actions" in the next six months.

Kyrgyzstan at COP27

Over the past 20 years, due to the global warming Kyrgyzstan has seen an increase in the number of avalanches, mudflows and floods by 60 %, which cause considerable economic damage. At the same time, being an emitter of 0.03 % of global greenhouse gas emissions, Kyrgyzstan is calling for climate justice.

The statement of the official delegation of Kyrgyzstan at COP27 reiterated the goals stated last year to achieve carbon neutrality by 2050. After the adoption of the national programme "Zhashyl Muras", specific steps to achieve these goals (specific plans, programmes or projects) are being prepared.

Tajikistan at COP27

President Emomali Rahmon stated that the share of Tajikistan in global GHG emissions was very small as more than **98 % of electricity in Tajikistan is obtained from renewable resources, mainly hydropower.** He informed that the Government of the Republic of Tajikistan adopted the National Strategy of Adaptation to Climate Change (2030) and a number of other documents.

President Rahmon stated that water resources play a key role in the process of adaptation and stability to climate



change, as well as reducing its consequences. Taking into account that the glaciers and other water sources of Tajikistan form 60 % of the water resources of Central Asia, this process will bring additional problems to the water use plans in the countries of the region. In this context, Tajikistan, within the framework of the Water and Climate Alliance, proposed to declare 2025 as the "International Year of Glacier Protection".

The President emphasized that water and climate cooperation is one of the main topics of the COP27 as a part of efforts to prepare for the United Nations Water Conference, which will be held in March 2023 at the UN Headquarters in New-York under the chairmanship of Tajikistan and the Netherlands.

Turkmenistan at COP27

Turkmenistan has joint the Regional Statement "Voice of Central Asia". The Statement will draw the attention of the world community and international financial institutions to the climate change vulnerability of the region, emphasize the readiness of the Central Asian countries to strengthen international cooperation on the measures taken by the countries of the region to adapt to and mitigate climate change and to strengthen regional cooperation on transboundary issues, as well as to attract climate financing in the region.

Uzbekistan at COP27

Uzbekistan has reaffirmed its commitment to reduce GHG emissions per unit of GDP by 35 % by 2030 under the Paris Agreement. To achieve these goals, the implementation of large-scale programmes for the introduction of renewable energy sources has begun. By 2026, country plans to increase the share of "green" energy to 8 thousand MW, which will reduce carbon dioxide emissions by 5 million tons. By 2030, the energy efficiency of the economy is planned to be doubled, and the share of renewable energy to at least 25 %. The newly-adopted nationwide Green Space project provides for the annual planting of 200 million trees and shrubs. As a result, in five years, the area of green spaces in the Uzbekistan cities will increase from the current 8 to 30 %.

For the purpose of efficient use of water resources, largescale reforms are being carried out in the country with the widespread introduction of water-saving technologies.

Uzbekistan is taking decisive action to resolve the problems associated with the Aral Sea crisis. Over the past five years, more than 1.7 million hectares of forest plantations have been planted on the dried bottom of the Aral Sea, and by 2026 this figure will be up to 2.5 million hectares, or almost 80 % of the territory.

3. EU POLICIES AND LEGISLATION

3.1 NEW EU POLICIES

EU POLICY FRAMEWORK ON BIOBASED, BIODE-GRADABLE AND COMPOSTABLE PLASTICS

The European Commission is proposing new EU-wide rules on packaging, to tackle this constantly growing source of waste and consumer frustration. On average, each European generates almost 180 kg of packaging waste per year. Packaging is one of the main users of virgin materials as 40 % of plastics and 50 % of paper used in the EU is destined for packaging. Without action, the EU would see a further 19 % increase in packaging waste by 2030, and for plastic packaging waste even a 46 % increase.

The new rules aim to stop this trend. For consumers, they will ensure reusable packaging options, get rid of unnecessary packaging, limit overpackaging, and provide clear labels to support correct recycling. For the industry, they will create new business opportunities, especially for smaller companies, decrease the need for virgin materials, boosting Europe's recycling capacity as well as making Europe less dependent on primary resources and external suppliers. They will put the packaging sector on track for climate neutrality by 2050.

The Commission also brings clarity to consumers and industry on biobased, compostable and biodegradable plastics: setting out for which applications such plastics are truly environmentally beneficial and how they should be designed, disposed of and recycled. The proposals are key building blocks of the European Green Deal's Circular Economy Action Plan and its objective to make sustainable products the norm.

PREVENTING PACKAGING WASTE, BOOSTING REUSE AND REFILL, AND MAKING ALL PACKAGING RECYCLABLE BY 2030

The proposed revision of the EU legislation on Packaging and Packaging Waste is described in sub-chapter 3.2.2 of this WECOOP News Bulletin.

CLEARING UP CONFUSION AROUND BIOBASED, BIODEGRADABLE AND COMPOSTABLE PLASTICS

The use and production of biobased, biodegradable and compostable plastics has been steadily increasing. A number of conditions have to be met for these plastics to have positive environmental impacts, rather than exacerbating plastic pollution, climate change and biodiversity loss. The Commission's new framework clarifies in what way these plastics can be part of a sustainable future.

Biomass used to produce biobased plastics must be

sustainably sourced, with no harm to the environment and in respect of the 'cascading use of biomass' principle: producers should prioritise the use of organic waste and byproducts as feedstock. In addition, to fight greenwashing and avoid misleading consumers, producers need to avoid generic claims on plastic products such as 'bioplastics' and 'biobased'. When communicating on biobased content, producers should refer to the exact and measurable share of biobased plastic content in the product (for example: 'the product contains 50 % biobased plastic content').

Biodegradable plastics must be approached with caution. They have their place in a sustainable future, but they need to be directed to specific applications where their environmental benefits and value for the circular economy are proven. Biodegradable plastics should by no means provide a licence to litter. Also, they must be labelled to show how long they will take to biodegrade, under which circumstances and in which environment. Products that are likely to be littered including those covered by the Single-Use Plastics Directive cannot be claimed to be or labelled as biodegradable.

Industrially compostable plastics should only be used when they have environmental benefits, they do not negatively affect the quality of the compost and when there is a proper biowaste collection and treatment system in place. Industrially compostable packaging will only be allowed for tea bags, filter coffee pods and pads, fruit and vegetable stickers, and very light plastic bags. The products must always specify that they are certified for industrial composting, in line with EU standards.

Document (English): Communication from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions: EU policy framework on biobased, biodegradable and compostable plastics; COM(2022) 682 final

Link: https://europa.eu/!C9kbFn

3.2 NEW EU LEGISLATION

3.2.1 Legislation in Force

BAT CONCLUSIONS: FERROUS METALS PROCESSING INDUSTRIES

These BAT conclusions concern the following activities specified in Annex I to Directive 2010/75/EU:

2.3. Processing of ferrous metals:

(a) operation of hot rolling mills with a capacity exceeding 20 tonnes of crude steel per hour;

(c) application of protective fused metal coats with an input exceeding 2 tonnes of crude steel per hour; this includes hot dip coating and batch galvanising.

or chemical processes where the volume of the treatment vats exceeds 30 m3, when it is carried out in cold rolling, wire drawing or batch galvanising.

6.11. Independently operated treatment of waste water not covered by Directive 91/271/EEC, provided that the main pollutant load originates from the activities covered by these BAT conclusions.

These BAT conclusions also cover the following:

- Cold rolling and wire drawing if directly associated with hot rolling and/or hot dip coating.
- Acid recovery, if directly associated with the activities covered by these BAT conclusions.
- The combined treatment of waste water from different origins, provided that the waste water treatment is not covered by Directive 91/271/EEC and that the main pollutant load originates from the activities covered by these BAT conclusions.
- Combustion processes directly associated with the activities covered by these BAT conclusions provided that:

 \checkmark the gaseous products of combustion are put into direct contact with material (such as direct feedstock heating or direct feedstock drying); or

✓ the radiant and/or conductive heat is transferred through a solid wall (indirect heating):

- without using an intermediary heat transfer fluid (this includes heating of the galvanising kettle), or
- when a gas (e.g. H2) acts as the intermediary heat transfer fluid in the case of batch annealing.

BAT associated air pollutants channelled emission levels are laid down for dust, sulphur dioxide, nitrogen oxides, HCI, HF, Ni, Pb, TVOC (and indicative emission levels for carbon monoxide).

BAT associated emission levels for discharges of waste water are laid down for Total suspended solids (TSS), Total organic carbon (TOC), Chemical oxygen demand (COD), Hydrocarbon oil index (HOI), Metals (Cd, Cr, Cr(VI), Fe, Hg, Ni, Pb, Sn, Zn), Total phosphorus (Total P) and Fluoride (F-).

Besides, BAT associated environmental performance levels are laid down for specific energy consumption (energy efficiency), specific material consumption and specific water consumption.

Document (English): Commission Implementing Decision (EU) 2022/2110 of 11 October 2022 establishing the best available techniques (BAT) conclusions, under Directive 2010/75/EU of the European Parliament and of the Council on industrial emissions, for the ferrous metals processing industry

Link: https://eur-lex.europa.eu/eli/dec_impl/2022/2110

2.6. Surface treatment of ferrous metals using electrolytic

3.2.2 Legislation in progress

PROPOSAL FOR A DIRECTIVE ON AMBIENT AIR QUALITY AND CLEANER AIR FOR EUROPE

The proposed revision of the Ambient Air Quality Directives will set interim 2030 EU air quality standards, aligned more closely with World Health Organization guidelines, while putting the EU on a trajectory to achieve zero pollution for air at the latest by 2050, in synergy with climate-neutrality efforts. To this end, regular review of the air quality standards is proposed to reassess them in line with latest scientific evidence as well as societal and technological developments. The annual limit value for the main pollutant – fine particulate matter (PM2.5) – is proposed to be cut by more than half – from current 25 μ g/m3 to 10 μ g/m3 by 2030.

The revision will ensure that people suffering health damages from air pollution have the right to be compensated in the case of a violation of EU air quality rules. They will also have the right to be represented by non-governmental organisations through collective actions for damage compensation. The proposal will also bring more clarity on access to justice, effective penalties, and better public information on air quality. New legislation will support local authorities by strengthening the provisions on air quality monitoring, modelling, and improved air quality plans.

New proposals leave it to national and local authorities to determine the specific measures they would take to meet the standards. At the same time, existing and new EU policies in environment, energy, transport, agriculture, R&I and other fields will make a significant contribution, as detailed in the factsheet.

New proposal will help achieve dramatic improvement in air quality around Europe by 2030, leading to gross annual benefits estimated at EUR 42 billion up to EUR 121 billion in 2030, for less than a EUR 6 billion costs annually.

Document (English): Proposal for a Directive of the European Parliament and of the Council on ambient air quality and cleaner air for Europe; COM(2022) 542 final

Link: https://europa.eu/!DdNq8m

PROPOSAL FOR A DIRECTIVE AMENDING THE WATER FRAMEWORK DIRECTIVE, THE GROUND-WATER DIRECTIVE AND THE ENVIRONMENTAL QUALITY STANDARDS DIRECTIVE

Based on up-to-date scientific evidence, the Commission is proposing to update lists of water pollutants to be more strictly controlled in surface waters and groundwater.

25 substances with well-documented problematic effects

on nature and human health will be added to the lists. These include:

- PFAS, a large group of "forever chemicals" used among others in cookware, clothing and furniture, fire-fighting foam and personal care products;
- a range of pesticides and pesticide degradation products, such as glyphosate;
- Bisphenol A, a plasticiser and a component of plastic packaging;
- some pharmaceuticals used as painkillers and antiinflammatory drugs, as well as antibiotics.

The substances and their standards have been selected in a transparent and science-driven process.

In addition, learning the lessons from incidents such as the mass death of fish in the Oder river, the Commission proposes mandatory downstream river basin warnings after incidents. There are also improvements to monitoring, reporting, and easier future updates of the list to keep up with science. The new rules recognise the cumulative or combined effects of mixtures, broadening the current focus which is on individual substances solely. Standards for 16 pollutants already covered by the rules, including heavy metals and industrial chemicals, will be updated (mostly tightened) and 4 pollutants that are no longer an EU-wide threat will be removed.

Document (English): Proposal for a Directive of the European Parliament and of the Council amending Directive 2000/60/EC establishing a framework for Community action in the field of water policy, Directive 2006/118/EC on the protection of groundwater against pollution and deterioration and Directive 2008/105/ EC on environmental quality standards in the field of water policy; COM(2022) 540 final

Link: https://europa.eu/!yHYMgk



PROPOSAL FOR A REVISED URBAN WASTEWATER TREATMENT DIRECTIVE

The revised Urban Wastewater Treatment Directive will help Europeans benefit from cleaner rivers, lakes, groundwaters and seas, while making wastewater treatment more cost-effective. To make the best possible use of wastewater as a resource, it is proposed to aim for energy-neutrality of the sector by 2040, and improve the quality of sludge to allow for more reuse contributing thus to a more circular economy.

Several improvements will support health and environmental protection. These include obligations to recover nutrients from wastewater, new standards for micropollutants and new monitoring requirements for microplastics. Obligations to treat water will be extended to smaller municipalities with 1,000 inhabitants (from 2,000 inhabitants currently). To help manage heavy rains, made more frequent by climate change, there is a requirement to establish integrated water management plans in larger cities. Finally, building upon the Covid-19 experience, the Commission proposes to systematically monitor wastewater for several viruses, amongst which CoV-SARS-19 and anti-microbial resistance. EU countries will be required to ensure access to sanitation for all, in particular vulnerable and marginalised groups.

As 92 % toxic micro-pollutants found in EU wastewaters come from pharmaceuticals and cosmetics, a new Extended Producer Responsibility scheme will require producers to pay for the cost of removing them. This is in line with the 'polluter pays' principle and it will also incentivise research and innovation into toxic-free products, as well as making financing of wastewater treatment fairer.

The wastewater sector has significant untapped renewable energy production potential, for example from biogas. EU countries will be required to track industrial pollution at source to increase the possibilities of re-using sludge and treated wastewater, avoiding the loss of resources. Rules on recovering phosphorus from sludge will support their use to make fertiliser, benefiting food production.

The changes are estimated to increase costs by 3.8 % (to EUR 3.8 billion a year in 2040) for a benefit of over EUR 6.6 billion a year, with a positive cost-benefit ratio in each Member State.

Document (English): **Proposal for a Directive of the European Parliament and of the Council concerning urban wastewater treatment (recast;** COM(2022) 541 final

Link: https://europa.eu/!nffBjG

PROPOSAL FOR A REVISED REGULATION ON PACKAGING AND PACKAGING WASTE

The proposed revision of the EU legislation on Packaging and Packaging Waste has three main objectives. First, to prevent the generation of packaging waste: reduce it in quantity, restrict unnecessary packaging and promote reusable and refillable packaging solutions. Second, to boost high quality ('closed loop') recycling: make all packaging on the EU market recyclable in an economically viable way by 2030. And finally, to reduce the need for primary natural resources and create a well-functioning market for secondary raw materials, increasing the use of recycled plastics in packaging through mandatory targets.

- The headline target is to reduce packaging waste by 15 % by 2040 per Member State per capita, compared to 2018. This would lead to an overall waste reduction in the EU of some 37 % compared to a scenario without changing the legislation. It will happen through both reuse and recycling.
- To foster reuse or refill of packaging, which has declined steeply in the last 20 years, companies will have to offer a certain percentage of their products to consumers in reusable or refillable packaging, for example takeaway drinks and meals or e-commerce deliveries. There will also be some standardisation of packaging formats and clear labelling of reusable packaging.
- To address clearly unnecessary packaging, certain forms of packaging will be banned, for example singleuse packaging for food and beverages when consumed inside restaurants and cafes, single-use packaging for fruits and vegetables, miniature shampoo bottles and other miniature packaging in hotels.
- Many measures aim to make packaging fully recyclable by 2030. This includes setting design criteria for packaging; creating mandatory deposit return systems for plastic bottles and aluminium cans; and making it clear which very limited types of packaging must be compostable so that consumers can throw these to biowaste.
- There will also be mandatory rates of recycled content that producers have to include in new plastic packaging. This will help turn recycled plastic into a valuable raw material – as already shown by the example of PET bottles in the context of the Single-Use Plastics Directive.

The proposal will clear up confusion on which packaging belongs to which recycling bin. Every piece of packaging will carry a label showing what the packaging is made of and in which waste stream it should go. Waste collection containers will carry the same labels. The same symbols will be used everywhere in the EU.

By 2030, the proposed measures would bring GHG emissions from packaging down to 43 million tonnes compared to 66 million if the legislation is not changed –

the reduction is about as much as the annual emissions of Croatia. Water use would be reduced by 1.1 million m3. The costs of environmental damage for the economy and society would be reduced by EUR 6.4 billion relative to the baseline 2030.

Single-use packaging industries will have to invest into a transition, but the overall economic and job creation impact in the EU is positive. Boosting reuse alone is expected to lead to more than 600,000 jobs in the reuse sector by 2030, many of them at local small and medium sized companies. Much innovation in packaging solutions is expected making it convenient to reduce, reuse and recycle. Measures are also expected to save money: each European could save almost EUR 100 per year, if businesses translate savings to consumers.

Document (English): Proposal for a Regulation of the European Parliament and of the Council on packaging and packaging waste, amending Regulation (EU) 2019/1020 and Directive (EU) 2019/904, and repealing Directive 94/62/EC; COM(2022) 677 final

Link: https://europa.eu/!MXMgYc

4. REPORTS AND STUDIES

4.1 EUROPEAN COMMISSION

Zero Pollution Monitoring and Outlook Report

The Third Clean Air Outlook

The Commission has published its first Zero Pollution Monitoring and Outlook report and its third Clean Air Outlook report – together setting pathways to cleaner air, water and soil. The reports show that EU policies have contributed to reducing air pollution as well as pollution from pesticides. However, pollution levels are still too high. In other areas such as harmful noise, nutrient pollution or municipal waste generation, progress has stalled. The results show that, overall, much stronger action is necessary if the EU is to achieve 2030 pollution reduction targets, by adopting new anti-pollution laws and better implementing existing ones.

Progress towards 2030 targets can be seen but pollution levels still too high. The progress towards the six 'zero pollution' targets is mixed. Pollution is decreasing from pesticides, antimicrobials and marine litter. Not much progress has been made for pollution from noise, nutrients and waste. On the other hand, the overall high rates of compliance with the EU drinking and bathing water pollution standards (>99 % and >93 % respectively) are encouraging. For 2030, we can achieve most of the targets if additional efforts are made.

However, current pollution levels are still far too high: over 10 % of premature deaths in the EU each year are still related to environmental pollution. This is mainly due to air pollution, but also to noise pollution and exposure to chemicals, which is likely to be underestimated. The pollution similarly damages biodiversity. There are significant differences between Member States, with premature deaths levels around 5-6 % in the North and 12-14 % in the South and East of Europe.

The Commission has by now delivered or advanced on all 33 of the announced actions in the Zero Pollution Action Plan of 2021. In order for them to have an impact, the report calls for the swift agreement and adoption of the legislative proposals to reduce harmful pollution, and the improved implementation of the existing ones at local, national and cross-border level. Notably, it finds that if the EU implements all relevant measures proposed by the Commission, the number of premature deaths due to air pollution would fall by over 70 % in 2030 compared to 2005, with benefits of clean air measures outweighing costs and leading to overall GDP gains. The report also points to the importance of promoting global initiatives and supporting third countries in their efforts towards reducing pollution.

Document (English): Report from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions: The Third Clean Air Outlook; COM(2022) 673 final

Link: <u>https://environment.ec.europa.eu/publications/third-</u> <u>clean-air-outlook_en</u>

Document (English): Report from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions: First 'zero pollution' monitoring and outlook. 'Pathways towards cleaner air, water and soil for Europe'; COM(2022) 674 final

Link: <u>https://europa.eu/!BDYrCV</u>



4.2 EUROPEAN ENVIRONMENT AGENCY (EEA)

Zero Pollution Monitoring Assessment (EEA Briefing)

Key messages

The Zero Pollution Action Plan sets six headline targets for 2030. Trends that relate to these targets show a mixed picture:

- Good progress in reducing the health impacts of air pollution has been achieved, with a 45 % fall in premature deaths since 2005. If this past trend continues, the EU will be on track to meet the target of a 55 % reduction.
- The area of land negatively affected by air pollution has fallen by only 12 % since 2005. If this past trend continues, the EU probably will not meet the target of a 25 % reduction.
- Little progress has been made in reducing nutrient losses since the 2012-2015 baseline. Based on the limited progress to date, the EU is not on track to achieve the 50 % reduction target.

The use and risk of pesticides has fallen by 14 % since the baseline period of 2015-2017, while the use of more hazardous pesticides has fallen by 26 %. Based on this recent trend, the EU is on track to meet its target of cutting the use and risk of pesticides, and the use of more hazardous pesticides, by 50 %.

- Sales of veterinary antimicrobials have fallen by 18 % since 2018. If this past trend continues, the EU will be on track to meet the target of a 50 % reduction.
- There was no significant reduction in the share of people impacted by transport noise between 2012 and 2017. With no indications of noise levels having declined significantly since then, the EU is unlikely to meet the target of reducing the share of people chronically disturbed by transport noise by 30 %.
- Provisional analysis suggests that the amount of plastic litter at sea has fallen in recent years. While this is encouraging, consistent and comprehensive EU-wide data are needed to assess progress towards the targets of reducing plastic litter at sea by 50 % and reducing releases of microplastics into the environment by 30 %.
- Total waste generation has been stable since 2010, while residual municipal waste generation has been stable since 2016. If these waste streams do not decline significantly in coming years, the EU will not meet the targets of significantly reducing total waste generation and of reducing residual municipal waste by 50 %.

Good progress has been made towards reducing air pollution from industry, transport and homes — reducing the number of deaths linked to air pollution as a result. At the same time, Europe has been maintaining and improving its bathing and drinking water quality and reducing the risk of antimicrobial resistance. Encouraging trends are taking place in reducing pesticide use, although the resulting positive impact on the environment is yet to be seen.

Progress is slower in other areas:

- Noise from transport continues to harm health, with little progress made towards reducing noise levels.
- Preventing excess nutrients and persistent chemicals from harming Europe's freshwater and marine ecosystems is proving to be a significant challenge.
- Efforts to reduce waste have delivered limited results to date. Europe's present systems of production and consumption are a barrier to a more sustainable and circular economy.

Several emerging issues can be identified, even if evidence is not available for all EU countries:

- An increasing body of evidence demonstrates that citizens' health is being adversely affected by hazardous chemicals that pollute our bodies.
- Growing evidence of soil pollution highlights the longterm damage being done to ecosystems that are crucial for healthy food and biodiversity.
- Light pollution, which affects nocturnal species, is another potential area of concern where there are currently little or no legislative controls.

There are clear inequalities in terms of exposure to pollution. People in lower socio-economic groups are more affected by air pollution, while noise disproportionately impacts those living in urban areas. Children are also particularly vulnerable to the effects of air pollution and chemicals.

While Europe is making important progress towards its 2050 ambition of reducing pollution to levels no longer harmful to health and natural ecosystems, further efforts will be needed to eliminate all negative impacts. Several new policy proposals are currently under consideration that have the potential to accelerate progress towards this ambition.

Links (English):

Web Report: <u>https://www.eea.europa.eu/publications/</u> zero-pollution Summary for Decisionmakers: <u>https://bit.ly/3BW60Tn</u>

Financing nature as a solution (EEA Briefing)

More effective financial investment in nature-based solutions and the restoration of biodiversity require focus on four key areas:

- the compilation of more location- and species-specific data, based on clear standards, for assessing biodiversity impacts at business and ecosystem level;
- the development of logic chains for biodiversity impact of different types of economic activity (e.g., to compare farming or fishing with manufacturing or the mining of minerals);
- the creation of geospatial tools to guide targeting and biodiversity metrics to support standardised measurement of biodiversity status for evaluating effectiveness in restoring biodiversity to support decision-making among investors and the finance community;

• the development of mechanisms and instruments that allow public support and private investment to be effectively combined for different types of biodiversity or in certain landscapes (e.g., at floodplain level);

Building on existing data, the EEA aims to work with monitoring bodies, financial institutions, companies and its country members to help build a stronger geo-spatial knowledge foundation on biodiversity that maximises the benefits of public and private investments in nature.

Link: <u>https://www.eea.europa.eu/publications/financing-</u> nature-as-a-solution

Climate change as a threat to health and well-being in Europe: focus on heat and infectious diseases. (EEA Report No 07/2022)

Key messages:

- The severity of the current and projected impacts of climate on health in Europe call for a stepping up of action in both mitigation of, and adaptation to, climate change.
- Heatwaves cause the largest number of deaths among weather- and climate-related events in Europe. Over the next few decades, more frequent extreme heat episodes and increasing vulnerability of the population to extreme heat will lead to a substantial increase in morbidity and mortality unless adaptation measures are taken.
- Increasingly frequent, long and intense heatwaves in combination with an ageing population and growing urbanisation mean that more vulnerable populations are exposed to high temperatures, particularly in southern and central Europe. The location of many schools and hospitals in areas experiencing the urban heat island effect, further exacerbating high temperatures, calls for urgent adaptation of those facilities.
- Increasing temperatures in Europe also affect occupational health and safety, with an average annual loss of 16 hours per worker (compared with the 20th century baseline) in highly exposed sectors, with the largest losses in southern Europe.
- Climatic conditions across Europe are becoming more suitable for emergence and transmission of climatesensitive infectious diseases, which may particularly affect those working in agriculture, forestry or emergency services (through higher exposure) or the elderly, young children and those with compromised immune systems (through higher vulnerability).
- The projected lengthening of the transmission season and wider distribution of mosquito species that act as vectors for malaria and dengue, combined with the growing number of travel-imported disease cases, increases the likelihood of local outbreaks.
- Higher temperatures increase the risk of West Nile fever outbreaks in central, eastern and southern Europe and expand the risk of transmission to previously unaffected areas of northern and western Europe.
- The warming sea waters are increasingly suitable for the dangerous Vibrio bacteria, in particular along the Baltic Sea coastlines.

- Reducing the health impacts of heat requires implementing a wide range of solutions, including effective heat health action plans, urban greening, appropriate building design and construction, and adjusting working times and conditions. Effective monitoring of vectors and disease surveillance enable the development of early warnings and targeting of vector control or vaccination.
- Cross-sectoral collaboration between public health and the built environment, spatial planning and employment sectors is needed to prevent climate threats where people live and work. Interventions aimed at reducing exposure to heat or diseases should prioritise vulnerable groups, as well as people and locations that are particularly exposed.
- Adapting to the existing and emerging health threats arising from climate change requires better preparedness of the health sector through increasing awareness, improving knowledge and widening engagement of public health and healthcare professionals; improving the resilience of healthcare facilities to climate hazards; and ensuring that health systems have the capacity to respond to increased demand for patient care or diagnostics.
- The need to better understand and address the impacts of climate change on human health and well-being is increasingly recognised in EU and national policies, albeit the subject is covered to a greater extent in policies focused on adaptation than those focused on health. At the local level, the engagement of health or social care stakeholders with climate adaptation planning remains low.

Link: <u>https://www.eea.europa.eu/publications/climate-</u> <u>change-impacts-on-health</u>

Energy prosumers and cities (EEA Briefing)

Key messages:

- Establishing prosumption in cities is more challenging than in rural areas because of the limited space available for energy generation and the more complex arrangements for the ownership of surfaces (e.g., rooftops in apartment blocks).
- However, shorter travelling distances and the possibility of establishing integrated energy districts provide opportunities for sector coupling (e.g., among the electricity, heating, cooling and mobility sectors).
- Generating electricity outside the city (offsite generation) opens up possibilities for prosumers to overcome the lack of space.
- Municipalities can support prosumption by providing surfaces that can be used for citizen-led energy generation, such as the rooftops of public buildings or unused municipal land. They can also offer targeted financial support schemes to prosumers and set requirements for companies to promote citizen participation.
- Municipalities can encourage the involvement of citizens in energy planning. They can also act as information hubs and centres of expertise, and contribute to building the right skill pool in their cities.

Progress and prospects for decarbonisation in the agriculture sector and beyond (EEA Briefing)

Key messages:

- Non-CO₂ GHG emissions from the agriculture sector declined by a notable 15 % between 1990 and 2000. The rate of reduction declined further, although to a lesser extent, between 2000 and 2005. Since 2005, however, emissions have declined by only 2 %, despite concerted efforts. National policies and measures currently in place across the EU are expected to deliver further reductions of only 1.5 % by 2040.
- Policies and efficiency gains have reduced the emission intensities of some agricultural products, but this has been offset by an increase in agricultural production. New policies and an increased uptake of existing measures are needed to further reduce emissions.
- It is important to raise farmers' awareness around their responsibilities and the technical possibilities for reducing emissions. Technical and financial support for investments and tailored advice at farm level can be available under the common agricultural policy (CAP). These elements could lead to a faster transition and better implementation of a variety of policy mechanisms.
- Responsibility for moving the agri-food system towards climate neutrality lies not only with farmers but also with consumers and other agri-food actors. Stronger stakeholder engagement is needed to progress towards decarbonisation.
- Implementing circular economy actions could help further reduce GHG emissions in the agri-food system. The potential for waste reduction, the reuse of materials and greater circularity start in the design phase; next, this persists through the production, consumption and waste management phases of the agri-food life cycle.



Rethinking agriculture (EEA Briefing)

Key messages:

- The European Green Deal and its Farm to Fork strategy treat agriculture as more than an economic sector: it also contributes to sustainability goals such as social well-being, ecosystem health, and food and nutrition security. Yet despite significant investment in the common agricultural policy and other relevant EU policies, agriculture's contribution to biodiversity loss, water overconsumption and GHG emissions continues. Moreover, rural abandonment and rural heritage loss are still challenges in Europe.
- Looking at agriculture from different angles allows us to explore the root causes of unsustainability and debate possible paths forward. For instance, efficiency and productivity gains in agriculture have increased food production and improved access to it. However, food insecurity is still a major issue worldwide. Even in Europe, currently more than 1 in 12 citizens cannot afford a meal with meat, fish or a vegetarian equivalent every second day.
- Coupled with climate change, agriculture's pressure on the environment and natural resources undermines food systems today. Paradoxically, strategies to improve agriculture's sustainability may hinder overall sustainability goals from being met. For example, efficiency gains are effective for reducing crop and nutrient losses — but solely focusing on system optimisation at the farm level may lock agriculture into a cycle of unsustainability. Promoting and reinterpreting traditional practices through agroecology may be the answer to today's sustainability challenges, but many questions remain.
- Rather than focusing the discussion on farming practices and technologies, we should be asking broader questions: What roles might agriculture and the food system play in a sustainable future? Which of agriculture's functions should society strive to preserve and support?

Link: <u>https://www.eea.europa.eu/publications/rethinking-agriculture</u>

4.3. UNITED NATIONS ECONOMIC COMMISSION FOR EUROPE (UNECE)

Guidance Document on Integrated Sustainable Nitrogen Management

The purpose of the document is to mobilize Parties' efforts to control pollution from agricultural sources in the context of the wider nitrogen cycle in an integrated manner harvesting multiple co-benefits of improved nitrogen management. The document is in particular aimed to support the implementation of the Gothenburg Protocol to Abate Acidification, Eutrophication and Ground-level Ozone. The Nitrogen Guidance Document focuses on agriculture in the context of the food system and environment. It identifies the principles of integrated sustainable nitrogen management, followed by measures to reduce nitrogen losses from livestock housing and manure storage, including measures to promote nutrient recovery. It then identifies measures to reduce nitrogen losses from organic and inorganic fertilizers, and measures that focus on landscape and land-use management, finishing by considering coherent 'measures packages'.

Link (English): <u>https://bit.ly/3GuuCUG</u> Link (Russian): <u>https://bit.ly/3CxBdwb</u>

Code of good practice for wood-burning and small combustion installations

Domestic wood heating is a major source of emissions of particulate matter, including black carbon (BC), and organic pollutants, such as dioxins/furans, polycyclic aromatic hydrocarbons (PAHs) and benzo[a]pyrene (B(a) P), in the UNECE region, resulting in poor local air quality conditions and significant negative effects on human health. The present document responds to the need to inform the general public of:

- Available best practices for domestic wood heating in order to minimize emissions and increase efficiency, reducing expenditure due to decreased storage needs and the use of wood, while reducing the negative impact on the environment and human health;
- The best heating devices currently available on the market;
- The proper origin and characteristics of wood biomass and the need to burn dry, clean wood and thus to avoid use of composite, treated and/or contaminated wood.

Link (English & Russian): https://bit.ly/3CEBNZo

Handbook on water allocation in a transboundary context (in Russian)

The first-ever 'Handbook on Water Allocation in a Transboundary Context' explains the various phases, benefits and challenges of transboundary water allocation and guides interested states through the process of assessing its potential usefulness in their shared basins. The Handbook contains 46 exemplar case studies highlighting key features of allocation and demonstrating their practical application in different transboundary water contexts around the world. It also helps build the capacity needed to address complex issues of water allocation, supports governments in establishing water allocation arrangements and, as such, sends a strong message on the importance and feasibility of transboundary cooperation and of adaptability. Last but not least, the Handbook presents the first-ever overview of water allocation agreements in transboundary waters.

English version: see WECOOP News Bulletin Issue 8.

Link: <u>https://unece.org/info/publications/pub/372389</u> The Ninth "Environment for Europe" Ministerial Conference

The "Environment for Europe" process is a unique partnership of Member States within the UNECE region, the United Nations organizations represented in the region, other intergovernmental organizations, regional environmental centres, non-governmental organizations, the private sector and other major groups. The process and its Ministerial Conferences provide a high-level platform for stakeholders to discuss, decide and join efforts in addressing environmental priorities across the 56 countries of the UNECE region, and is a regional pillar of sustainable development.

The Ninth Environment for Europe Ministerial Conference was held in Nicosia, Cyprus, on 5-7 October 2022. It was organized by the Republic of Cyprus with the support of UNECE.

The conference was focused on two themes: "Greening the economy in the pan-European region: working towards sustainable infrastructure" and " Applying principles of circular economy to sustainable tourism". A ministerial declaration has been adopted at the Conference.

All documents and materials for the Conference are available in English and Russian on <u>https://unece.org/</u> <u>nicosia-conference</u>

4.4 ORGANISATION FOR ECONOMIC COOPERATION AND DEVELOPMENT (OECD)

Cross Country analysis of BAT and BAT-associated emission and environmental performance levels in the Thermal Power Plants, Cement and Textile industries.

Industrial facilities play a major role in environmental consequences as their processes may use large amounts of raw materials and energy, and in return, may release significant amounts of pollutants into the air, water and soil. As part of their operational obligations, industrial facilities are required to meet various regulatory requirements in the form of emission limitations and/or standards of performance and environmental quality objectives at the local level.

This report is a cross-country analysis of BAT Reference Documents (BREFs) for three selected industrial sectors; thermal power plants (TPP), cement production and textile manufacturing. It examines seven BREFs for TPP, five BREFs for cement production, and six BREFs for textile manufacturing from countries/organisations, including China, India, Japan, South Korea, the US, the EU, Belgium (Flanders), and the World Bank. The information received from various jurisdictions may encourage and assist countries in their progress towards developing sector-specific BREFs. Beyond that, this comparative analysis may indicate the areas of possible harmonisation between countries, and also highlight the structures or parts of the BREFs that may need expanding or updating for better environmental impact considerations.

Link (English): https://bit.ly/3vtgeqN

Green Economy Transition in Eastern Europe, the Caucasus and Central Asia

Since the 1990s, the countries of Eastern Europe, the Caucasus and Central Asia (EECCA) have made great progress in pursuing economic development that is also environmentally sustainable. The countries, in collaboration with the GREEN Action Task Force hosted by the OECD, have developed a number of policies aiming to improve environmental quality and social wellbeing, while creating opportunities for strong economic growth and decent jobs in the region.

This report was prepared as the OECD contribution to the Ninth "Environment for Europe" Conference (5-7 October 2022). In this context, this report aims to: (i) take stock of progress on policy developments towards a green economy in the EECCA countries; (ii) showcase selected contributions from of the Green Action Task Force that integrate environmental and climate considerations into development pathways of the EECCA countries, and mobilise finance for action; and (iii) provide an outlook for the future, including priority actions that the Task Force in cooperation with the EECCA countries should take to enhance the momentum for green economy transition in the region.

Link: https://doi.org/10.1787/c410b82a-en

Green hydrogen opportunities for emerging and developing economies

Hydrogen is a cross-cutting energy vector that can help to decarbonise various end-use sectors. At least twothirds of the global hydrogen production is projected to be green hydrogen by 2050, supporting the transition to a net-zero emissions global energy system. This paper presents a value chain approach to identify priority areas for developing national hydrogen strategies, focussing on emerging and developing economies. Further, the analysis highlights success factors for green hydrogen projects, based on eight case studies covering applications in industrial, transport and power generation sectors. The paper summarises the enabling conditions and financing solutions that can spur the green hydrogen market creation and growth.

Link: https://doi.org/10.1787/53ad9f22-en

4.5 INTERNATIONAL ENERGY AGENCY (IEA)

Net Zero by 2050: A Roadmap for the Global Energy Sector

The number of countries announcing pledges to achieve net zero emissions over the coming decades continues to grow. But the pledges by governments to date - even if fully achieved - fall well short of what is required to bring global energy-related carbon dioxide emissions to net zero by 2050 and give the world an even chance of limiting the global temperature rise to 1.5°C. This special report is the world's first comprehensive study of how to transition to a net zero energy system by 2050 while ensuring stable and affordable energy supplies, providing universal energy access, and enabling robust economic growth. It sets out a cost-effective and economically productive pathway, resulting in a clean, dynamic and resilient energy economy dominated by renewables like solar and wind instead of fossil fuels. The report also examines key uncertainties, such as the roles of bioenergy, carbon capture and behavioural changes in reaching net zero.

Link (English): <u>https://www.iea.org/reports/net-zero-by-2050</u>

Energy Efficiency 2022

Energy Efficiency 2022 is the IEA's primary annual analysis on global developments in energy efficiency markets and policy. It explores recent trends in energy intensity, demand and efficiency-related investment, innovation, policy and technology while also discussing key questions facing policy makers.

This year record-high consumer energy bills and securing



reliable access to supply are urgent political and economic imperatives for almost all governments. In response to the energy crisis countries are prioritising energy efficiency action due to its ability to simultaneously meet affordability, supply security and climate goals.

While efficiency investment has recently been increasing to reach new record levels, the pace of global energy intensity improvements had noticeably slowed in the second half of the last decade and virtually stalled during the first two years of Covid-19. With efforts to better manage energy consumption as a result of the crisis increasing the rate of improvement once more, the question as to whether 2022 will see a sustained efficiency turning point, and what more can be done, are key themes of this year's report.

Link (English): <u>https://www.iea.org/reports/energy-</u> efficiency-2022

Renewables 2022

Renewables 2022 is the IEA's primary analysis on the sector, based on current policies and market developments. It forecasts the deployment of renewable energy technologies in electricity, transport and heat to 2027 while also exploring key challenges to the industry and identifying barriers to faster growth.

The current global energy crisis brings both new opportunities and new challenges for renewable energy. Renewables 2022 provides analysis on the new policies introduced in response to the energy crisis. This year's report frames current policy and market dynamics while placing the recent rise in energy prices and energy security challenges in context.

In addition to its detailed market analysis and forecasts, Renewables 2022 also examines key developments and trends for the sector, including the more ambitious renewable energy targets recently proposed by the European Union; the issue of windfall profits; the diversification of solar PV manufacturing; renewable capacity for hydrogen production; and a possible feedstock crunch in the biofuels industry and viable ways to avoid it.

Link: <u>https://www.iea.org/reports/renewables-2022</u>

4.6 UNITED NATIONS ENVIRONMENT PROGRAMME (UNEP)

An Eye on Methane: International Methane Emissions Observatory (IMEO) 2022 Report

This report delves into the progress made to achieve deep reduction of methane emissions, starting with the fossil fuel sector. A strong basis is needed for action grounded on improved emissions data to close the emissions gap and reduce warming in the short term. The International Methane Emissions Observatory's second annual report seeks to provide decision makers with a framework of action to track and monitor methane emissions to plan targeted and ambitious action for their mitigation.

Emissions of methane, the second biggest driver of global warming, have soared faster than at any time since the 1980s. To keep the average temperature increase at 1.5°C, the world needs urgently to reduce methane emissions by about a third, according to the latest Intergovernmental Panel on Climate Change Assessment Report published in April 2022. Slashing emissions of this powerful GHG is the single fastest way to tackle climate change in the short-term and move towards a net-zero world. Key messages: i) Methane contributes to at least a quarter of today's climate warming; ii) The oil and gas sector can reduce methane emissions by 75 % by 2030; iii) UNEP's IMEO has set the standard for transparency; and iv) More accurate data will enable more targeted action.

Link: <u>https://bit.ly/3FPdkkQ</u>

5. CONTACTS



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