P9_TA(2021)0107

Implementation of the Ambient Air Quality Directives


The European Parliament,

– having regard to the agreement adopted at the 21st Conference of the Parties to the United Nations Framework Convention on Climate Change (COP21) in Paris on 12 December 2015 (the Paris Agreement),

– having regard to the UN 2030 Agenda for Sustainable Development and to the UN Sustainable Development Goals (SDGs),

– having regard to the Treaty on the Functioning of the European Union, in particular Article 191 thereof,

– having regard to Directive 2008/50/EC of the European Parliament and of the Council of 21 May 2008 on ambient air quality and cleaner air for Europe¹,


– having regard to the Commission communication of 11 December 2019 the European Green Deal’ (COM(2019)0640),

– having regard to the Commission communication of 17 May 2018 entitled ‘A Europe that protects: Clean air for all’ (COM(2018)0330),


– having regard to the report from the Commission to the European Parliament and the Council of 26 June 2020 on the progress made on the implementation of Directive (EU) 2016/2284 on the reduction of national emissions of certain atmospheric pollutants (COM(2020)0266),

– having regard to the report from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions of 8 January 2021 entitled ‘the Second Clean Air Outlook’ (COM(2021)0003),

– having regard to the Commission’s Roadmap for the inception impact assessment for the revision of the AAQ Directives,

– having regard to the EU health and safety at work policy, in particular to the Commission communication of 10 January 2017 entitled ‘Safer and Healthier Work for All – Modernisation of the EU Occupational Safety and Health Legislation and Policy’ (COM(2017)0012), and to Directive 2004/37/EC of the European Parliament and of the Council of 29 April 2004 on the protection of workers from the risks related to exposure to carcinogens or mutagens at work1,

– having regard to the Commission communication of 14 October 2020 on an EU strategy to reduce methane emissions (COM(2020)0663),

– having regard to Directive 2010/75/EU of the European Parliament and of the Council of 24 November 2010 on industrial emissions (integrated pollution prevention and control)2,


---

having regard to its resolution of 13 March 2019 on a Europe that protects: Clean air for all,

having regard to its resolution of 28 November 2019 on the climate and environment emergency,

having regard to the Committee of the Regions outlook opinion of 2 July 2020 on ‘The future of EU Clean Air Policy in the framework of the zero-pollution ambition’,

having regard to European Court of Auditors special report 23/2018 of 11 September 2018 entitled ‘Air pollution: Our health still insufficiently protected’,


having regard to European Parliamentary Research Service European Implementation Assessment of 18 January 2021 entitled ‘EU policy on air quality: implementation of selected EU legislation’, and its Annex I entitled ‘Mapping and assessing local policies on air quality. What air quality policy lessons could be learnt from the COVID-19 lockdown?’,

having regard to the study by its Policy Department for Economic, Scientific and Quality of Life Policies of January 2021 entitled ‘Air Pollution and COVID-19’,

having regard to the study by its Policy Department for Economic, Scientific and Quality of Life Policies for the Committee on the Environment, Public Health and Food Safety of 18 March 2019 entitled ‘Sampling points for air quality – Representativeness and comparability of measurement in accordance with Directive 2008/50/EC on ambient air quality and cleaner air for Europe’,


having regard to Rule 54 of its Rules of Procedure, as well as Article 1(1)(e) of, and Annex 3 to, the decision of the Conference of Presidents of 12 December 2002 on the procedure for granting authorisation to draw up own-initiative reports,

having regard to the opinion of the Committee on Transport and Tourism,

having regard to the report of the Committee on the Environment, Public Health and Food Safety (A9-0037/2021),

A. whereas clean air is essential to human health and quality of life, as well as the environment, and has been identified as a global health priority in the SDGs;

B. whereas air pollution is transboundary in nature and whereas there is a significant exchange of air pollutants between Member States and also between EU and non-EU countries, as noted in the Second Clean Air Outlook; whereas in many cases, the

3 OJ C 324, 1.10.2020, p. 35.
harmful effects of poor air quality have become a local problem for Member States, who are not able to take any action regarding emission sources outside their territory;

C. whereas air pollution is the single biggest environmental health risk in Europe¹, affecting regions, socio-economic groups and age groups unevenly, and causing, according to the most recent EEA estimates of the health impacts attributable to exposure to air pollution, nearly 400 000 premature deaths per year; whereas in 2018, particulate matter 2.5 (PM$_{2.5}$) concentrations were responsible for about 379 000 premature deaths originating from long-term exposure in the EU-28; whereas exposure to NO$_2$ and O$_3$ concentrations in the EU in 2018 is estimated to have caused around 54 000 and 19 400 premature deaths respectively²;

D. whereas air pollution is linked to respiratory and cardiovascular diseases, strokes and cancer, with recent studies also associating it with adverse impacts on fertility, pregnancy and newborn babies, as well as with dementia³, structural brain alterations in children, Alzheimer’s disease, systematic inflammation and cognitive impairment⁴, and diabetes-related mortality⁵; whereas the total number of premature deaths from air pollution has decreased by more than 50 % since 1990⁶;

E. whereas there is evidence that exposure to air pollution could affect the health outcomes of people who catch COVID-19, principally due to damage to the respiratory and immune systems and the expression of proteins that enable the virus to enter cells⁷;

F. whereas according to the Commission’s Second Clean Air Outlook report, the number of premature deaths due to air pollution per year is likely to drop by around 55 % by 2030 compared to 2005, if Member States implement all measures provided for in existing EU legislation regulating sources of air pollution;

G. whereas urban populations are the most exposed to air pollution, and whereas globally only one person in ten lives in a city that complies with the WHO air quality

guidelines\textsuperscript{1}; whereas nowadays 75\% of the EU’s population lives in urban and peri-urban areas\textsuperscript{2};

H. whereas 98\% of the EU’s urban population is exposed to ozone levels that exceed WHO guidelines; whereas 77\% of the EU-28 population is exposed to PM\textsubscript{2.5} levels above WHO guidelines\textsuperscript{3};

I. whereas the Lancet Planetary Health journal published a study on 19 January 2021 on the assessment of the impact of air pollution on mortality in almost one thousand cities in Europe\textsuperscript{4}; whereas it was found that the top 10 cities with the lowest mortality burden due to NO\textsubscript{2} and PM\textsubscript{2.5} pollution are mainly found in northern European; whereas air quality challenges vary widely from place to place, and whereas the main source of problems ranges from heating systems to transport; whereas despite economic growth, there is a general improvement trend in air quality, as compared to 1990;

J. whereas air pollution has significant human and economic costs, such as reducing life expectancy, increasing medical costs, reducing labour productivity, degrading ecosystems, and causing biodiversity loss and climate change; whereas the cost of air pollution to society, health and economic activities in Europe is between EUR 330 and EUR 940 billion per year overall, but whereas the cost of all measures that result in air quality improvements is EUR 70 to 80 billion per year\textsuperscript{5}; whereas the cost of inaction, including the harmful impacts of air pollution on citizens’ health, the economy and society, far exceeds the cost of action, despite it involving various policy measures; whereas, according to Commission estimations, the full implementation of existing EU clean air legislation could lead to net benefits of up to EUR 42 billion a year by 2030, notably from lower mortality and morbidity rates\textsuperscript{6};

K. whereas in the period between 1990 and 2018, the EU recorded reductions in emissions of all air pollutants; whereas the biggest fall was reported for sulphur oxides (SOx), which decreased by 90\%, followed by non-methane volatile organic compounds (NMVOC) and nitrogen oxides (NOx), which declined by roughly 60\% and 55\% respectively; whereas emissions of fine particulate matter (PM\textsubscript{2.5}) have decreased by

\textsuperscript{2} Eurostat statistical book of 7 September 2016 entitled ‘Urban Europe – Statistics on cities, towns and suburbs’.
almost half since 1990 and ammonia (NH$_3$) emissions by roughly one quarter$^1$; whereas NH$_3$ emissions plateaued as of 2010;

L. whereas according to the latest available data from 2018, 10 Member States needed to reduce their NH$_3$ emissions by up to 10% in less than two years, and six and five Member States respectively needed to reduce their PM$_{2.5}$ and NO$_x$ emissions by up to 30% or more to comply with the 2020 ceilings enshrined in the NEC Directive$^2$;

M. whereas air pollution leads to environmental degradation and has significant adverse effects on natural ecosystems and biodiversity – including eutrophication, acidification and damage to vegetation from ground-level ozone, the quality of water and soil, and the ecosystem services they support – as well as on the climate, and can damage the built environment and cultural heritage; whereas the air pollutants that currently cause most damage to ecosystems are O$_3$, NH$_3$ and NO$_x$; whereas air pollution is currently responsible for about two thirds of the ecosystem area in the EU being exposed to eutrophication;

N. whereas the deposition of nitrogen compounds, emitted into the air as NO$_x$ and NH$_3$, can cause eutrophication i.e. an oversupply of nutrients; whereas both sulphur and nitrogen compounds have acidifying effects; whereas both eutrophication and acidification can affect terrestrial and aquatic ecosystems and may lead to changes in species diversity and invasions by new species; whereas acidification may also lead to increased mobilisation of toxic metals in water or soils, which increases the risk of uptake in the food chain;

O. whereas high levels of O$_3$ damage plant cells, impairing plants’ reproduction and growth and thereby reducing agricultural crop yields, forest growth and biodiversity; whereas changing climatic conditions and the increase in emissions of carbon dioxide (CO$_2$) and other pollutants, such as reactive nitrogen, modify the responses of vegetation to O$_3$; whereas these modifiers influence the amount of O$_3$ taken up by leaves, thus altering the magnitude of effects on plant growth, crop yields and ecosystem services$^3$;

P. whereas toxic metal pollutants, such as lead (Pb), mercury (Hg) and cadmium (Cd), can cause harmful effects in plants and animals, in addition to humans, and whereas although their atmospheric concentrations may be low, they still contribute to the deposition and build-up of toxic metals in soils, sediments and organisms; whereas toxic metals and persistent organic compounds, in addition to their environmental toxicity, tend to bioaccumulate in animals and plants and to biomagnify, meaning that concentrations in the tissues of organisms increase with the level in the food chain;

Q. whereas there has been a significant reduction in all air pollutants in road transport despite passenger and freight transport increasing as compared to 1990; whereas road transport is still the primary contributor to NO$_x$ emissions (accounting for 39% of total

---


$^2$ COM(2021)0003.

EU NO\textsubscript{x} emissions) and second largest contributor of black carbon (26 %) and lead (16 %) emissions in the EU; whereas it is the major source responsible for air pollution in urban areas because of emissions from vehicles (exhaust-traffic-related emissions), and also brake and tyre wear (non-exhaust-traffic-related emissions); whereas diesel vehicles are responsible for around 75 % of the total air pollution costs related to road transport in Europe\textsuperscript{1};

R. whereas agriculture is the third biggest source of primary PM\textsubscript{10} emissions in the EU, as stressed by the EEA; whereas NH\textsubscript{3} emissions from agriculture contribute to episodes of high PM concentrations experienced across Europe each spring, as well as to both short- and long-term negative health impacts\textsuperscript{2}; whereas methane emissions from agriculture are an important precursor of ground-level ozone, which has adverse effects on human health;

S. whereas the energy production and distribution sector is responsible for more than half of SO\textsubscript{x} emissions\textsuperscript{3} and one fifth of NO\textsubscript{x} emissions\textsuperscript{4} in the 33 member countries of the EEA;

T. whereas coal and lignite plants significantly contribute to mercury emissions in the EU and whereas 62 % of mercury emissions from EU industry come from coal-fired power plants\textsuperscript{5}; whereas mercury is a dangerous neurotoxin which is damaging to the nervous system at even relatively low levels of exposure;

U. whereas in 2005, in the seas surrounding Europe (the Baltic Sea, the North Sea, the north-eastern part of the Atlantic, the Mediterranean and the Black Sea), sulphur dioxide (SO\textsubscript{2}) emissions from international shipping were estimated to amount to 1.7 million tonnes a year, NO\textsubscript{2} emissions to 2.8 million tonnes, and PM\textsubscript{2.5} to 195 000 tonnes\textsuperscript{6}; whereas a scientific study commissioned by the Commission concluded that without further action, maritime NO\textsubscript{x} emissions will likely match land-based NO\textsubscript{x} emissions within a decade\textsuperscript{7};

\textsuperscript{1} European Environment Agency (EEA) report 09/2020 of 23 November 2020 entitled ‘Air Quality in Europe – 2020 report’.
\textsuperscript{2} EEA indicator assessment of 23 February 2018 entitled ‘Emissions of primary PM\textsubscript{2.5} and PM\textsubscript{10} particulate matter’.
\textsuperscript{5} EEA report of 19 September 2018 entitled ‘Mercury in Europe’s environment. A priority for European and global action’.
\textsuperscript{6} Campling, P. et al., Specific evaluation of emissions from shipping including assessment for the establishment of possible new emission control areas in European Seas, Flemish Institute for Technological Research NV, Mol, 2013.
\textsuperscript{7} Cofala, J. et al., The potential for cost-effective air emission reductions from international shipping through designation of further Emission Control Areas in EU waters with focus on the Mediterranean Sea, International Institute for Applied Systems Analysis, Laxenburg, 2018.
V. whereas while the EU outdoor air quality policy framework is well-structured, EU legislation covering indoor air quality is fragmented; whereas a more holistic EU policy approach to air pollution may be needed, guaranteeing that ambient air quality, health and safety at work, chemical and buildings legislation are fully coherent and mutually reinforcing, in particular to ensure the safety of workers and the general public from hazardous substances in consumer products;

W. whereas 13 out of 18 ongoing infringement proceedings against 18 Member States were launched because of PM$_{10}$ emissions above the EU limit values, 11 because of NO$_2$ emissions and 1 because of SO$_2$ emissions, while six additional infringement procedures are open because of failures to implement monitoring requirements; whereas the PM$_{10}$ and SO$_2$ limit values should have been met as of 2005;

X. whereas for 2019, 17 Member States reported exceedances of EU air quality standards for NO$_2$, 14 Member States reported exceedances for PM$_{10}$, 4 reported exceedances for PM$_{2.5}$ and 1 for SO$_2$;

Y. whereas the current situation calls for countries to be given more support (technological, logistical and financial support and guidelines) to improve the implementation of existing legislation;

Z. whereas a recent decision of a local court ruled that the government of the Brussels Region, where the EU institutions are based, is legally obliged to put in place, within six months, air quality measuring systems on the busiest roads, such as ‘Rue de la loi’, which must measure the concentration of NO$_2$, course particulate matter (PM$_{10}$) and fine particulate matter (PM$_{2.5}$);

AA. whereas the majority of the EU population finds public action to promote good air quality to be insufficient, and whereas over 70 % of the EU population expects the EU to propose additional measures$^1$; whereas improving air quality is also linked to changes in the mentality of society, which cannot be easily achieved through legal changes, but rather through awareness campaigns on the benefits of clean air policies;

A partially effective tool that needs to be improved

1. Recognises that the three pillars of the EU clean air policy have been successful in driving a downward trend in emissions and concentrations of most air pollutants in Europe; highlights that while the AAQ Directives have been effective in setting common EU air quality standards and facilitating the exchange of information on air quality, they have been only partially effective in reducing air pollution and curbing its adverse effects on health, quality of life and the environment; draws attention to the fact that a high number of Member States still do not fully comply with current air quality standards and have not taken enough action to improve air quality and keep exceedances to a minimum, even after the start of infringement proceedings by the Commission and the issuance of court orders demanding compliance with the AAQ Directives;

2. Emphasises that within most European territory there has been an increase in a number of pathologies linked to air pollution, such as asthma, neurotoxic diseases and diseases

$^1$ SWD(2019)0427.
caused by endocrine disruptors, which justifies not only the full application of European legislation, but also fast and effective infringement proceedings by the Commission in the event of non-compliance by the Member States;

3. Recognises the fact that air pollution has no boundaries, and that there is a significant exchange of air pollutants between Member States, and also between EU and non-EU countries as noted in the Second Clean Air Outlook; points out that Member States are not able to take any action on emission sources outside their territory; encourages the Commission to take into account the complex nature of air pollution (e.g. secondary particulate matter formation, global and EU transfer of air pollution) when designing new air quality policy to ensure an integrated and holistic approach;

4. Notes that AAQ Directives are based on air quality standards that are now 15 to 20 years old, and that some of them are much weaker than current WHO guidelines and estimated reference levels based on excess lifetime cancer risk, and the levels suggested by the latest scientific evidence on human health and environment impacts; welcomes the commitment made in the European Green Deal to revise air quality standards, and calls on the Commission to align PM$_{10}$, PM$_{2.5}$, SO$_2$ and O$_3$ values with WHO guidelines, and benzene (C$_6$H$_6$) and benzo(a)pyrene (BaP) values with WHO reference levels, by means of legislative changes to the AAQ Directives following the conclusion of a comprehensive impact assessment on health, environmental, societal and economic aspects; insists on the fact that the WHO guidelines are currently being revised and that their publication is now imminent; points out to the need to update EU air quality standards as soon as the new WHO guidelines become available, and to include an obligation for a periodic review of the standards on the basis of the latest scientific and technical evidence in order to align them with regularly updated WHO guidelines; calls on the Commission to also take into account the latest critical loads for protection of ecosystems set by the Convention on Long-Range Transboundary Air Pollution;

5. Stresses that, according to data collected by the European Environment Agency, and despite the reduction in PM$_{10}$ emissions, most of the urban population in European countries monitored between 2000 and 2015 is exposed to concentrations above the annual guideline value recommended in the WHO guidelines; asks the Commission to propose legislation where legal gaps exist, while also looking into co-benefits for other pollution dimensions, for example noise; asks the Commission to look into the consequences of indoor air pollution and possible legislative remedies for all relevant sources of indoor air pollution;

6. Recommends that revised air quality standards and monitoring requirements should, where appropriate, on the basis of an assessment of the latest scientific evidence, also cover other non-regulated pollutants with demonstrated negative health and environment impacts in the EU, such as ultrafine particles, black carbon, mercury and ammonia; highlights the EU’s ambition to lead the transition to a healthy planet, and recalls that in order to become a global leader it should lead by example by adopting, and enforcing, inter alia, ambitious quality standards for all air pollutants;

7. Notes that the great majority of infringement procedures launched by the Commission thus far pertain to exceedances of limit values, which shows that limit values have been the most enforceable elements of the AAQ Directives; calls on the Commission to propose the replacement of the current target values (O$_3$, As, Cd, Ni and BaP) with limit
values; points to the fact that yearly standards allow spikes in pollutant concentrations to go unnoticed, particularly in the case of PM$_{2.5}$;

8. Calls on the Commission to establish a watch list of substances or compounds of concern to the public or the scientific community on health grounds (‘the watch list’), such as microplastics, in order to enable follow-up on new knowledge about the relevance for human health of these emerging compounds and substances, and the most appropriate monitoring approaches and methodologies;

**Measuring air pollution**

9. Stresses the need to guarantee that air quality is being measured by the Member States in appropriate locations and at emissions sources in order to avoid underestimation or overestimation of air pollution and to obtain representative results; calls on the Member States to improve their monitoring networks, to reinforce the knowledge of the levels of pollutants existing in their territory, and to evaluate the level of their air quality monitoring network with a view to identifying chronic and episodic situations of atmospheric pollution, and to acting towards their resolution; calls on the Commission to enforce the obligations of the Directive in this regard, and to make sure that sampling points are comparable and representative for a specific area, including by providing immediate support to Member States in setting up a mix of fixed monitoring sites and modelling, optionally accompanied by passive sampling points, to guarantee representative results and to avoid systemic shortcomings, as well as by the training and hiring of experts, and by ensuring greater accuracy in inspection, control and monitoring, and the establishment of a platform for the exchange of good practices; stresses the need to train new experts on a continuing basis, including the retraining of peoples who have worked in other fields and who want to become active in this area, as well as young unemployed people; stresses that, the fact that Member States can choose the monitoring sites from which they communicate data to the EEA, can also lead to potential underestimation of air pollutant concentrations;

10. Acknowledges the fact that Member States have established an air quality monitoring network based on common criteria defined by the AAQ Directives, with more than 4,000 monitoring stations and 16,000 sampling points; points out that site location provisions involve multiple criteria and offer a degree of flexibility which can make verification more difficult, which often generates situations in which monitoring networks in cities do not provide information on locations where the highest concentrations of air pollutants occur, creating the risk that exceedances of limit values go unnoticed; urges the Commission to provide immediate guidance to Member States through an implementing act in accordance with Article 28 of Directive 2008/50/EC on how to set up their monitoring networks; calls on the Commission, in the framework of the proposals for revised AAQ Directives, to review and establish new mandatory rules for locating monitoring stations and sampling points, such as the possibility for the Commission to require additional monitoring points to be located where necessary to ensure better measurement of air pollution or setting a minimum number of measurement stations per type of emissions source (transport, industry, agriculture or residential);

11. Considers that a more effective air quality monitoring network must also be able to measure the impact of major pollution sources on air quality standards in nearby
villages and protected ecosystems, and provide more information regarding the range of pollutants being assessed;

12. Calls on the Commission to put forward measures to promote investment by the Member States to improve monitoring networks, involving the construction of monitoring stations and the training and recruitment of specialists and analysts, and to provide support for more stringent oversight, control and monitoring procedures;

13. Suggests the introduction of a combination of fixed monitoring sites and modelling optionally accompanied by passive sampling, because the high variability of air pollutants is difficult to grasp with fixed monitoring sites; stresses that air quality modelling can complement sampling; points out, therefore, that the AAQ Directives should incorporate air quality modelling (with suitable spatial resolution) more clearly into the air quality assessment process; underlines the importance of the real-time data in air quality; points out that the Commission should always consider the most recent technical measuring systems, norms and standards;

14. Stresses that even though the AAQ Directives include some provisions on reducing emissions in places where people suffer most from air pollution, or where concentrations are highest, further guidance on the macro scaling of the sampling points is needed from the Commission in order to strengthen the implementation of these specific provisions; notes that less well-off socio-economic groups are more exposed to air pollution because they are more likely to live close to sources of heavy pollution, both outdoor, such as traffic and industrial areas, and indoor, such as the combustion of low-quality solid fuels for domestic heating; underlines in this regard the need to adequately and better reflect human exposure to air pollution in EU law, and urges the Commission to include new indicators in air quality indices, such as population density around monitoring stations and sampling points, in order to set up criteria for ‘general population exposure’ and provisions for the representativeness of monitoring sites, as well as to share existing best practices in this regard, such as the establishment of Priority Areas for Air Quality Improvement; stresses, however, that these new criteria should be additional to, and not substitute, limit values, which have proven to be the most enforceable standards so far, and that the same air quality standards must apply across Europe;

**Lessons learnt from the COVID-19 crisis**

15. Points out that the COVID-19 pandemic is an example of the inextricable links between human health and ecosystem health; emphasises the need to include the lessons learnt on air pollution from the COVID-19 pandemic when designing new policies;

16. Notes that confinement measures to control the spread of pandemic led to a drastic temporary reduction in traffic and industrial activity, and as a consequence resulted in unprecedented decrease in emissions and air pollution on a continental scale, with pollutant concentrations well below the legal limits and WHO recommendations, thus clearly showing the impact of human activities on the environment; suggests that all measures are analysed to understand their impact notes with regret that continuous, long-term exposure to air pollution may worsen the impact of respiratory diseases such as COVID-19; is concerned about the risk that pollution may bounce back to previous levels or, worse, to even higher levels, and cautions against the postponement or cancellation of local measures aiming to reduce air pollution; highlights the fact that
substantially reducing air pollution over the long-term would have substantial benefits for human health, as well as for agriculture and natural ecosystems; underlines, therefore, that fighting air pollution must be at the core of the EU recovery plan, and that mandatory EU air quality requirements and their effective enforcement are key to guaranteeing citizens’ health and improving their resilience against future health threats; urges Member States to step up the ambition of their clean air policies, including through the targeted use of funding from the EU Recovery and Resilience Facility;

17. Notes that the COVID-19 crisis has showed that the reduction of motorized traffic and changes in mobility patterns are an effective tool for reducing air pollution in cities; believes, therefore, that good practices such as proximity shopping, voluntary teleworking, electronic administration or staggered working hours should be promoted;

**Promoting successful local policies on air quality**

18. Points to the fact that clear decreasing trends in air pollution can be observed mainly when policies are implemented in combination, and therefore a coherent approach across the EU in the design and implementation of local policies is fundamental to their success; underlines that achieving policy coherence also requires cooperation between different authorities, and calls on the Commission and Member States to collaborate closely with national, regional and local authorities in this regard; calls on Member States to develop coherent and long-term strategies for cleaner air; calls on the Commission to establish new legal provisions in the AAQ Directives to prevent local policies and measures that have proven to be effective in improving air quality from being reversed without in-depth analysis or assessment;

19. Welcomes the Commission’s fitness check of the AAQ Directives published in 2019; calls on the Commission to explore means for swift and more efficient cooperation with national, regional and local authorities in order to promote compliance with air quality legislation, including through EU funding; calls on the Commission to provide technical assistance and expertise to national, regional and local authorities encountering difficulties in enforcing and implementing air quality legislation;

20. Encourages the Member States and local and regional authorities to devise and implement strategic and evidence-based sustainable urban mobility plans, aiming at a coordinated planning of policies, incentives and subsidies, that target the various sectors and modes of transport, and investment in sustainable and accessible public transport, measures to renew the existing vehicle fleet, investments in technologies relating to clean transport modes and mobility as a service, as well as for infrastructure for active, shared and zero-emission mobility, low emission zones, vehicles charging schemes, and demand-related measures to raise public awareness and step up communication activities surrounding the EU’s role in tackling air pollution;

21. Highlights the need for cities to be healthier and to implement substantial reductions in air pollution levels; calls on local authorities to devise sustainable urban plans including measures such as the creation of green areas, pedestrian and car-free areas in urban centres, and encouraging walking and cycling, the use of accessible public transport, of shared, sustainable mobility solutions, while ensuring co-existence with motorised transport; highlights that broad, well-maintained and unobstructed pavements and cycle lanes, with a focus on central commuting streets and integrated into existing road networks while being securely separated from car lanes, can incentivise active travel,
such as cycling and walking; urges national, regional and local authorities to adopt ambitious policies and measures accordingly; believes that ‘15-minute cities’, within which homes, workplaces, public services and shops are accessible within 15 minutes by foot or public transport, should form the basis of the long-term urban planning; urges the Commission to establish an annual award for the cities or regions that have taken the best measures with visible effects and concrete results in reducing air pollution to encourage local and national authorities to be more active and efficient and to promote these measures at European level;

22. Points out that the Commission’s recent Sustainable and Smart Mobility Strategy advocates increasing the modal shares of collective transport, walking and cycling, as well as automated, connected and multimodal mobility, in order to significantly lower pollution and congestion from transport, especially in cities, and improve citizens’ health and wellbeing;

23. Calls for appropriate investment in extensive cycling infrastructure, particularly in urban areas, in order to ensure the safety of all vulnerable road users, and increase the attractiveness of cycling as an efficient and healthy mode of commuting; stresses the importance of ensuring smooth intermodality between rail and cycling in order to offer sustainable commuting between rural and urban areas; encourages the expansion of the EuroVelo network to this end;

24. Points out that public transport services, especially in rural areas, are frequently unsatisfactory, irregular and expensive;

The impact of EU policies on air quality

25. Welcomes the announcement of the Commission’s Zero Pollution Action Plan; recalls the close link between nature conservation and air quality, and emphasises that air pollution is a burden that requires a holistic approach, as it has negative impacts on soil and water life through eutrophication and acidification; alerts that any new measures will be worthless if air quality is not properly prioritised and mainstreamed in all EU policies in line with the latest scientific evidence and EU emission source legislation, such as on climate, energy, transport, industry, agriculture and waste management, while ensuring that there are no contradictions and better synergies between all policy areas; calls on the Commission and the Member States to cooperate more closely in all areas and at all levels, and to consider all technical solutions to reduce emissions in a technologically neutral way in order to help local authorities embark on an ambitious, yet challenging path towards zero emissions and achieve cleaner air;

26. Points to the growing link between air pollution and climate change, as shown by growing ozone concentrations triggered by temperatures rises and more recurrent heat waves; considers that a holistic approach to combating air pollution is compatible with a case-by-case analysis of the specific characteristics of each pollutant, for example for ozone, a colourless and pungent gas, which is not a primary pollutant and the prevention of which requires measures to reduce precursors (NOx and VOCs) on a long-term basis;

27. Urges the Commission and the Member States to assess the effectiveness of all emissions legislation, and to strengthen it, while ensuring its effective implementation; underlines that reducing emissions at source is the only effective way to guarantee clean air; alerts that most Member States will not comply with their 2020 and 2030 emissions
reduction commitments under the NEC Directive; stresses the need for stringent measures to reduce emissions in all sectors, particularly road and maritime transport, aviation, industrial installations, buildings, agriculture and energy production; underlines the need to incorporate the EU air quality and emission standards into its trade policy to prevent the transfer of emissions outside the EU, which would further exacerbate the effect of transboundary air pollution on EU air quality; recommends that appropriate financial support from existing EU funds is dedicated to clean air objectives in order to support Member States in their actions;

28. Calls on the Commission to rapidly start infringements proceedings to enforce the emission reduction commitments under the NEC Directive; highlights that EU measures to reduce emissions across sectors must draw a clear pathway towards zero emission and zero pollution from these sectors; calls for a coherent policy approach to GHG and pollutant emission regulation;

29. Regrets the flexibility mechanism proposed for section 5 of the NEC Directive in the Commission report entitled ‘The Second Clean Air Outlook’; highlights that in 2018, 11 Member States requested adjustments to their national emission ceilings; calls on the Commission to limit the use of emission inventory adjustment to the strict minimum, and to consider whether Member States have taken action to compensate for possible unforeseen emissions from certain sectors before applying for an adjustment of emission inventories;

30. Highlights that methane emissions are not regulated under EU air pollution legislation, and not specifically regulated under EU climate policy; welcomes the recently published ‘EU strategy to reduce methane emissions’, and encourages the Commission to effectively address the need to minimise methane emissions, especially from agriculture and waste;

31. Notes with concern that while emissions of most air pollutants remain on a downward trend across the European Union, emissions of ammonia (NH₃), especially from the agricultural sector, continue to rise, posing a challenge for EU Member States in meeting EU air pollution limits; highlights that in urban areas ammonia emissions account for around 50% of the health impacts of air pollution, as ammonia is a key precursor to particulate matter; calls on the Member States to use their national common agricultural policy (CAP) Strategic Plans as an opportunity to fight air pollution from the agricultural sector; asks the Commission and Member States to also look into options to mitigate these emissions within the Industrial Emissions Directive¹ (IED);

32. Points out that the European Green Deal aims to reduce the EU’s environmental impacts, and that in view of industry’s important contribution to overall pressures on the environment, it must make an appropriate contribution to meeting this overall goal; expresses concern about the practice of building new industrial installations with a capacity just below the IED thresholds to deliberately leave them outside the scope of this Directive; welcomes in this regard the announced revision of the IED in order to better address pollution from large industrial installations, to promote industrial activities with the least negative environmental impact, and to make them fully consistent with EU environment, climate, energy and circular economy policies; calls

---

on the Commission to introduce an obligation on Member States to make publicly available information on compliance and permits;

33. Considers, in this regard, that it would be advantageous to include other sectors in the IED, limit the derogations to the Directive to a minimum, revise current best available technologies (BATs), adopt a consistent outcome-oriented approach of promoting the industrial activity with the least negative environmental impact, and to integrate provisions to stimulate progress in the authorisation phase or the process of best available techniques reference documents (BREF);

34. Encourages local authorities to implement, including as part of their Air Quality Plans (AQPs), information campaigns and incentive schemes for building renovations and the replacement of old, inefficient and polluting residential heating and cooling systems, which are responsible for large proportion of air pollution by substances that are dangerous to health; considers that district heating based on sustainable solutions can be a good alternative to dispersed and highly inefficient individual heating sources;

35. Notes that power generation using solid fuels will be the main source of mercury emissions to air in Europe for the foreseeable future; welcomes, in this regard, the commitments made by at least 10 EU Member States to phase out coal; calls on the other Member States to phase out coal as an energy source by 2030 at the latest;

36. Points out that while transport-related emissions of most pollutants have fallen substantially in recent decades, persistent hotspots remain in the EU, where levels of air pollution are too high, especially in urban areas, where almost one in six inhabitants continue to be exposed to concentrations of air pollution above EU air quality standards for certain pollutants; underlines that excessive levels of air pollution from transport pose a particular risk to the health of people living in urban areas and near transport hubs;

37. Recalls that road transport is the main source of NO\textsubscript{x} in Europe; calls on the Commission to develop stringent EU car emissions standards for air pollutants (future Euro 7 standards for light-duty vehicles and Euro VII standards for heavy-duty vehicles) in a technology-neutral manner which doesn’t discriminate between fuels; underlines that the new testing procedures for vehicles should be reviewed to broaden the scope of regulated pollutants measured, to increase their accuracy and effectiveness, and to eliminate loopholes, thereby ensuring emission standards are indeed met under real driving conditions;

38. Underlines that it is crucial to incentivise the market for zero and low emission vehicles, and to issue Member States with guiding recommendations to encourage them to implement a wide range of incentives for zero- and low-emission vehicles while ensuring that such incentives are geared towards vehicles with the lowest real-world emissions; stresses that the availability and accessibility of charging infrastructure, including in private and public buildings in accordance with the Energy Performance of Buildings Directive\textsuperscript{1} (EPBD), and the competitiveness of zero and low emission vehicles are essential for increasing consumer acceptance;

39. Believes that in order to improve air quality in hotspots, it is vital to move towards a more sustainable and less polluting transport system and design of mobility infrastructure, aimed at reducing road congestion, especially in urban areas, while using all the available means as effectively as possible, and taking account of the most recent scientific evidence and the latest technological innovations; calls on the Commission to assist Member States in carrying out regular quality checks of their transport infrastructure in order to identify the areas in need of decongestion and optimisation, and to take appropriate measures in these areas to make air quality a priority in its own right, including by making use of available EU funding, and by better targeting of the principal funding mechanisms, such as the European Regional Development Fund and Cohesion Fund;

40. Reiterates the importance of a substantial modal shift away from road and towards less polluting forms of transportation, such as combined transport, inland waterways and rail, in particular by making use of the European Year of Rail in 2021; underlines, in this regard, the urgent need to improve and modernise railroad infrastructure by fully implementing the European Railway Traffic Management System (ERTMS), removing bottlenecks and completing missing links, notably in the framework of the Trans-European Transport Network, and to further ease and encourage intermodality and multimodality; believes that for the last mile and medium distances, this approach should be combined with the need to make road transport more efficient and more sustainable;

41. Stresses that the most effective way to reduce air pollution from road transport is to promote the shift from conventional fuel towards cleaner alternative fuels, as described in Directive 2014/94/EU\(^1\) on the deployment of alternative fuels infrastructure; believes that the upcoming revision of Regulation (EU) 2019/631\(^2\) setting CO\(_2\) emission performance standards for new passenger cars and for new light commercial vehicles would accelerate the uptake of zero- and low-emission vehicles;

42. Calls on the Commission and the Member States to ensure that emission standards in current legislation are better enforced, and to raise awareness of the opportunities for the alignment of second-hand cars with environmental standards, such as through retrofitting;

43. Stresses that combined transport of goods contributes to the reduction of transport emissions by promoting a shift from road freight transport to lower-emission transport modes, including zero-emission river corridors;

44. Points to the need to take account of structural constraints that may affect the introduction of alternative transport modes in outermost regions and islands; calls for the Commission and the governments of the outermost regions to envisage an action plan aimed at providing incentives and specific funding for transport in these regions;

---


45. Emphasises that air pollution from maritime transport is responsible for over 50,000 deaths annually in the EU, and must therefore be further reduced; stresses the need for the EU to adopt appropriate and effective measures to regulate maritime transport; draws attention to the fact that port cities facing additional pollution from shipping, cranes, cruises and various transportation vehicles must address these aspects if they are to improve their air quality; remarks with concern that ships’ detrimental impact on air quality continues to increase as the sector grows; calls on the Commission to urgently fulfil its commitment to regulate access to ports for the most polluting ships, and to oblige docked ships to use the available recharging and refuelling infrastructure, such as shore-side electricity, to decrease polluting emissions, thereby protecting coastal areas and their populations; calls on the Commission and Member States to implement a ‘zero emission at berth standard’ in all European ports;

46. Stresses that emission control areas (ECAs) are essential tools to limit air pollution from shipping, and contribute to tackling climate change, reducing the adverse effects on human health and marine biodiversity; calls therefore for the extension of ECAs to all EU seas; calls on the Member States to strictly control ECA zones in their territorial waters;

47. Underlines the impact of aviation on air pollution and the corresponding negative effects on health; recalls, in this respect, that the supply of electricity to stationary aeroplanes at airports can improve air quality, and therefore urges the Member States to ensure that their national policy frameworks take account of the need to install an electricity supply at airports in accordance with Directive 2014/94/EU;

Air Quality Plans

48. Notes that AQPs, a key requirement of the AAQ Directives in cases when Member States do not comply with air quality standards, are often ineffective in terms of delivering their expected results; calls on the Commission to establish as soon as possible through an implementing act in accordance with Article 28 of Directive 2008/50/EC a set of minimum requirements and best practices for both the drafting and implementation of AQPs in order to make sure AQPs set time-bound action which is commensurate with the pollution problem they need to address; calls on the Commission to guarantee that there is enough funding to carry out the planned action, and that reliable reduction calculations to measure implementation are included; considers that the current lengthy production of AQPs puts at risk their efficacy, and believes that AQPs should be better targeted and focus on short and mid-term measures that are results-oriented and tackle emissions from identified main pollution sources; points out that more harmonised and comparable measures taken across all Member States would increase their effectiveness and general acceptance; highlights the important role of municipal and local authorities in the drafting and implementation of the AQPs given the localised nature of the drivers and consequences of air pollution;

49. Notes that Members States produce public annual reports for all pollutants covered by the AAQ Directives, and report yearly to the Commission in accordance with Article 27 of Directive 2008/50/EC; regrets, however, the fact that the AAQ Directives neither

---

require Member States to report on the implementation of AQPs to the Commission nor to update them when new measures are adopted or when the progress is insufficient; points, moreover, out that the Commission does not analyse or give any feedback on the AQPs submitted and the measures contained therein; notes that proper and critical feedback on the AQPs submitted could help Member States to design better AQPs with more effective measures, and could prevent non-compliance with air quality standards; calls on the Commission to establish a more transparent and responsive system for exchanging information and the yearly reporting obligation on the implementation of AQPs, as well as an evaluation procedure for AQPs submitted to ensure that Member States’ measures are quick and effective in improving air quality;

50. Highlights the importance of sufficient expertise and resources at local and regional levels for drafting AQPs and for elaborating the choice, implementation and evaluation of measures to improve air quality; underlines the need, in this respect, to raise awareness about the funding available, technical resources and flexible pathways that can be tailored to local and regional realities;

**Enforcement of the Ambient Air Quality Directives**

51. Alerts that as of February 2021, 31 infringement procedures against 20 Member States on the implementation of the AAQ Directives are pending; recognises that some of these infringement procedures have been ongoing since 2009, and that despite ongoing infringement procedures, pollution concentration exceedances in Member States continue to occur; considers that persistent and systemic exceedances of air quality standards by Member States indicate their lack of commitment to adopting more effective measures to protect their citizens’ health and the environment, and indicate the ineffectiveness of the current enforcement procedure; urges the Commission to review the current enforcement procedure for the AAQ Directives;

52. Is concerned by the lack of enforcement of the NEC Directive; alerts that since 2010 no infringement procedures were opened on emissions above the ceilings set by the NEC Directive, even though three Member States have never reported NH$_3$ emissions below their ceiling;

53. Calls on the Commission to take legal action as soon as it becomes aware that EU air quality laws are not being implemented, and to swiftly follow up with court referrals and sanctions when violations are established; calls on the Commission to regularly produce clear and comprehensive overviews of open infringement procedures, and to publish without delay its exchanges of communication with the non-compliant Member States; calls on the Commission to make available the necessary resources to ensure swift follow-up in cases of non-compliance by Member States;

54. Recalls, in addition, that European Court of Auditors’ Special Report No 23/2018 on air pollution also refers to the large number of infringement procedures relating to air quality limits, and to evidence of a widespread implementation gap in air quality legislation across the Union; notes that this implementation gap is growing over time, not least because of the recurrent lengthy delays in the various stages of the infringement procedures – usually between six and eight years; considers that the two-year period for the Commission to issue a notification over an exceedance of limit values is too long for ensuring timely enforcement;
55. Calls on the Member States to improve the implementation of existing legislation in line with the rulings of the Court of Justice of the European Union;

**Improving public information, awareness and involvement**

56. Considers that public information and awareness have a critical role in addressing air pollution and enabling citizens to be directly involved in actions to improve air quality; draws attention to the fact that Member States, regions and cities define air quality indices differently, and that information and alert thresholds are currently missing for some pollutants; urges the Commission and Member States to establish a standardised air quality classification system applicable across the EU; calls on the Commission, Member States and relevant regional and local authorities to launch programmes to facilitate investments that improve air quality;

57. Stresses that information on the possible health effects of air pollution provided by Member States is scarce, unclear and not easily accessible for the public; notes, however, that there are positive trends in the practical implementation of Member States’ obligations under the AAQ Directives in terms of informing the public about the state of air quality; calls for further harmonisation of air quality information available to the public at all geographical scales across Member States and regions while ensuring easy access to real-time, accurate information on air quality; calls on the Commission, Member States and relevant regional and local authorities to launch updated public information and awareness campaigns on topics such as different types of air pollutants and their impact on human health or existing levels of air pollution in the territory, including information targeted at vulnerable groups, and to publish rankings of the best and worst progress made by air quality zones; believes that awareness campaigns about the devastating effects of air pollution next to relevant pollution sources and/or the installation of air quality displays could also improve public awareness and information, and prompt a change in behaviours and patterns that can contribute to air quality;

58. Calls on the Commission and Member States to implement and promote tools to encourage public participation in the implementation of the AAQ Directives, such as development by Member States of an online tool or/app that informs citizens about air quality and its impact on human health, gives them a possibility to call for air monitoring stations or sampling points, reports on air quality violations or provides feedback to the Commission on issues related to Member States actions on air quality;

59. Underlines the fact that civil society organisations, environmental activists and investigative journalists, on account of their proximity and direct access to the data on the ground, play a crucial role in promoting and controlling the implementation of ambient air quality legislation, and should therefore be fully involved in the consultation procedures.

60. Urges the Commission to update the AAQ Directives to include explicit provisions that guarantee the right of citizens to justice in line with the Aarhus Convention and calls on the Council to facilitate its implementation which is of particular relevance where the Council is acting in its legislative capacity;

**Other recommendations**
61. Calls for the Commission to consider regulating indoor air quality independently or as a part of sustainable buildings legislation, covering indoor air quality in confined spaces at least in public and commercial real estate;

62. Considers it essential to carry out an overall analysis of results obtained by the monitoring network and to produce annual reports, which, being in the public domain, include spatial and temporal data analyses and assessments of the impact on quality of life and ecosystems, accompanied by recommendations concerning action to address any chronic or episodic air pollution detected;

63. Believes Member States should seek to ensure that the example set by those cities with good practices in this area is followed by other cities in general through the formulation and implementation of contingency or emergency plans, to be activated as soon as possible where high concentrations of pollutant gases and particles that jeopardise public health are predicted or are actually occurring;

64. Emphasises the need to improve the working conditions of transport workers by better protecting workers who are exposed to high levels of air pollution and toxic fumes on a daily basis, and by investing in their reskilling, upskilling and training;

65. Stresses that innovation and research in low-emission and emission-reducing technologies will help to reduce emissions in all sectors; urges the Commission to honour the principle of technology neutrality; stresses the need for innovative solutions such as filtration systems in vehicles and on streets, fleet renewal and similar initiatives;

66. Encourages the Commission and the Member States to ensure that air quality policies guarantee innovation and competitiveness in the related sectors while striving towards achieving zero pollution ambitions;

67. Calls on the Commission and the Member States to continue to support forums and encourage consultations with other countries as part of an effort to identify effective solutions and facilitate the implementation of European, national and local policies seeking to achieve acceptable air quality standards;

68. Instructs its President to forward this resolution to the Council, the Commission and the governments and parliaments of the Member States.