Position on the 2050 Strategy - ‘A Clean Planet for all’

ePURE, representing European renewable ethanol producers from crop-based and advanced feedstock, is committed to a carbon neutral Europe by mid-century. The industry has a proven track record in delivering innovative and decarbonising solutions and will further contribute through technology improvements.

We welcome that the Commission acknowledges that transport needs to be decarbonised and the important role of advanced biofuels to achieve Europe’s long-term climate goals. In fact, all sustainable low carbon fuels incl. both crop-based and advanced ethanol have a critical role to play to reach carbon neutrality. As the IEA and IRENA recently highlighted, sustainable biofuels are essential to meet the Paris Agreement. It is therefore essential that the EU long-term strategy addresses how to effectively increase their share in the transport energy mix.

The following policy recommendations are key if the EU is to meet its long-term climate and energy commitments:

**Recognise that low carbon fuels must play an important role in decarbonising transport**

- There is no single solution for the future of low-carbon mobility and all main available alternative fuel options will be needed. Combining electrification based on renewable energy sources and low carbon fuels will reduce transport emissions without displacing job creation to other countries. The EU should pursue clear, consistent and binding measures that increase the climate performance of existing transport fuels, for instance by using locally produced renewable ethanol that already achieves 70% GHG savings against fossil fuel.

- According to a study by Ricardo, even under the most ambitious scenario in which electric vehicles would make up more than 20% of the passenger car sales in 2025 and 40% in 2030, they would still make up only 15.7% of the 2030 EU passenger car fleet. While that figure could rise significantly by 2050 an important share of the existing and future car fleet will still rely on internal combustion engines.

- IEA and IRENA have confirmed that both crop-based and advanced liquid biofuels will be needed to decarbonise the existing stock of vehicles with internal combustion engines and for transport modes where electrification is not an option such as heavy duty, air and maritime freight.

- In the Commission’s scenarios liquid biofuels represent a significant share of the 2050 fuel mix – up to 17-26% in the net-zero-by-2050 scenario. Biofuels will therefore have an important role to play, thanks to their low carbon abatement cost and the continuous use of liquid fuels in the transport sector.

- Policy makers must therefore recognise that transitioning to a climate neutral transport sector will require a significant boost in the use of both crop-based and advanced biofuels.

**Ensure investment security and predictability**

- A reliable policy framework is necessary to mobilise the necessary investments to meet the EU’s long-term decarbonisation objectives. Council and Parliament must ensure that the RED II compromise is respected and appropriately reflected in their responses to the EU’s vision for long-term GHG emissions reduction:
  - Contrary to the Commission’s statement that all crop-based biofuels should be phased out, the phase out will only apply to high-ILUC risk biofuels produced from crops for which significant expansion of the production area into land with high carbon stock is observed, a list of which will be established by delegated act.

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1. Europe’s Clean Mobility Outlook: Scenarios for the EU light-duty vehicle fleet, associated energy needs and emissions, 2020-2050, Ricardo, 2018
2. Technology Roadmap – Delivering Sustainable Bioenergy, IEA, 2017
3. Global Energy Transformation: A Roadmap to 2050, IRENA, 2018
4. In-depth analysis in support of the Commission Communication, p.112
The crop-based biofuels’ contribution was confirmed in the recently adopted RED II, as they represent an existing and well proven solution to decarbonise the transport sector. The wider deployment of advanced biofuels technologies will be progressive and will complement, not replace, the use of crop-based biofuels.

- The Commission should not further restrict the use of sustainable biofuels that can demonstrate GHG emissions reduction on a life cycle basis as it would reduce the limited options available for Member States to achieve the very challenging task to reduce GHG emissions in transport.

Ensure the swift revision of the Energy Taxation Directive

- The Communication highlights that taxation is amongst the most efficient tools for environmental policy. Environmental taxation, carbon pricing systems and revised subsidy structures should play an important role in steering the transition towards a low carbon economy by internalising the external costs of fossil energies.

- However, the current Energy Taxation Directive\(^5\) contradicts the EU climate and energy policy. The volume-based approach to energy taxation has led to the paradoxical situation where fossil energy sources are taxed at lower rates than their low-carbon and renewable alternatives.

- Past attempts to align energy taxation policies with EU climate and energy policies have failed because of the need for unanimous agreement between EU Member States. The EU should endorse the Commission Communication ‘Towards a more efficient and democratic decision making in EU tax policy’\(^6\), where a progressive shift to qualified majority voting would allow for the reform of the Energy Taxation Directive.

Reap the benefits of the bioeconomy

- Renewable energy produced from locally grown arable crops and their residues can be a major driver for long-term GHG emission reduction across large parts of the economy, including in agriculture and transport.

- Ethanol biorefineries are at the heart of the energy transition and represent an essential technology to convert biomass into low-carbon fuels as well as a range of other valuable low-carbon co-products, including food, feed, fertilizer, lignin, energy, CO\(_2\) and biomaterials. They can serve as a long-term energy storage at low cost and have the potential to be a carbon sink by adsorbing CO\(_2\) from the atmosphere if coupled with CCU technologies.

- In parallel they contribute to investments in more sustainable agriculture, help fighting climate change, support Europe’s rural economy by preserving and generating jobs and additional income sources for farmers. Ethanol production is a key outlet to manage crop surpluses and price volatility. This is fundamental to strengthen the profitability and competitiveness of food production in Europe, hence preserving the EU food security.

Support the deployment of carbon capture technologies

- The Communication recognises that carbon capture technology will be required if CO\(_2\) emissions from biomass-based energy are to be captured and stored to create negative emissions. The deployment of carbon capture technologies at renewable ethanol plants has significant mitigation potential. It further improves the emission savings of renewable ethanol and could in parallel offer a reliable, sustainable and scalable source of bio-based CO\(_2\) to harness the potential of power-to-X to deliver zero emission fuels.

- Policy makers should encourage the deployment of carbon capture technologies in renewable ethanol plants by incentivising the use of those biofuels that have the highest certified emission savings compared to fossil oil.

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\(^6\) Commission Communication COM(2019) 8 final