

BERLIN DECLARATION ON E-FUELS IN MOBILITY

We, the undersigned, share the conviction that a variety of different modern drivetrain technologies and fuel types will be needed to reach the climate change mitigation targets for the transport sector.

We are united in our aim of decarbonizing all transport sectors.

We wish to deploy the different technologies – be it electric mobility with battery, hydrogen and fuel cell technology, advanced biofuels or renewable power-based fuels, that is e-fuels – in a technology-neutral manner, while ensuring the most efficient utilization of the existing and limited renewable energy generation potential within and outside of our countries.

We note the increased focus towards the decarbonization of the transport sector. For example, the 2023 G7 Climate, Energy and Environment Ministers' Communiqué refers to the following points;

- We are committed to the goal of achieving net-zero emissions in the road sector by 2050, and underline that a transition over the coming decade to infrastructure and a vehicle fleet that supports zero emissions transport (e.g. zero emission vehicles (ZEV) and associated infrastructure, and sustainable carbon-neutral fuels) is critical.
- Highlighting the various actions that each of us is taking to decarbonize our vehicle fleet, including such domestic policies that are designed to achieve 100 percent or the overwhelming penetration of sales of light duty vehicles (LDVs) as ZEV by 2035 and beyond; to achieve 100 percent electrified vehicles in new passenger car sales by 2035; to promote associated infrastructure and sustainable carbon-neutral fuels including sustainable bio- and synthetic fuels.
- Assessing developments in technologies such as renewable power-based fuels towards the decarbonization of fuels. Recognising that Carbon-Capture and Utilization (CCU)/ carbon recycling technologies, including e-fuels and e-methane, can be an important part of a broad portfolio of decarbonization solutions to achieve net-zero emissions by 2050.

In addition, the first global stocktake (GST) in COP28 also stresses the importance of accelerating efforts globally for the utilization of zero- or low- carbon fuels well before or by around mid-century.

We are of the opinion that, in addition to advanced biofuels, e-fuels, due to its ease in storage and transport, will serve as a crucial solution towards net-zero greenhouse gas (GHG) emissions, especially in sectors and regions where high energy density and

resilient supply chains are essential. This is likely to apply to some use cases of medium and heavy-duty commercial vehicles and, in particular, to aviation and maritime transport, as well as in areas with low grid connection. We also believe that there is potential in e-fuels for use of existing infrastructure and operating the existing road transport fleet in a climate-neutral way, as well as feedstock for green chemicals. Simultaneously, we underline the importance of ensuring energy security in our transition towards net-zero GHG emissions and recognize the role e-fuels can play in enhancing resilience through diversification of energy sources and supply chains, while also ensuring efficient utilization of the existing and available renewable energy generation potential.

Therefore, we are committed to creating a suitable regulatory framework to provide legal certainty and incentives for investment in all available technologies. This will also involve promoting the technological development and the market ramp-up of e-fuels so that their use will soon become competitive, taking note of the recent international commitments made in International Civil Aviation Organization (ICAO) for the global aviation and in International Maritime Organization (IMO) for international shipping, which aim to stimulate market demand for e-fuels.

We will boost the production, sales and utilization of e-fuels in all transport sectors by forging co-operation with industry, investors and consumers.

In doing so, we will also improve industrial policy opportunities for countries of the Global South, as e-fuels are an optimal energy vector for harnessing and transporting renewable energy across the world, and mass production will happen particularly in places with low wind and solar electricity production costs. Recognizing that this must not happen at the expense of the decarbonization of the energy sector in the countries of the Global South, we believe that this holds opportunities for all.

With the Berlin Declaration we declare our will to

- share knowledge and lessons learned on the operation, production and utilization of e-fuels (e.g. in aviation);
- invest in research and development and promote proper assessment of developments in e-fuel technologies, the deployment of e-fuel production plants, and the initiatives for early commercialization;
- continue to scale up renewable energy generation across the world to empower production of e-fuels,
- explore opportunities to accelerate deployment of e-fuels by enhancing interoperability in standardization and CO₂ accounting methods.
- maintain technological neutrality on our path towards a climate-neutral society and economy while ensuring the most efficient utilization of the existing renewable energy generation potential.

BERLIN DECLARATION ON E-FUELS IN MOBILITY

To this end, we would like to continue to liaise amicably. We invite other ministers to join this Declaration.

This Joint Declaration of Intent was signed in NN copies on 4th of June 2024 in Berlin in English.