

Non-road mobile machinery engines: inclusion of hydrogen as a reference fuel for the testing of an engine type or engine family

2026/0294(COD) - 01/10/2026 - Legislative proposal

PURPOSE: to include hydrogen as a reference fuel for non-road mobile machinery (NRMM) in Regulation (EU) 2016/1628.

PROPOSED ACT: Regulation of the European Parliament and of the Council.

ROLE OF THE EUROPEAN PARLIAMENT: the European Parliament decides in accordance with the ordinary legislative procedure and on an equal footing with the Council.

BACKGROUND: the proposal is fully aligned with the **EU Hydrogen Strategy**, which positions hydrogen as a key energy carrier in the EU's path to climate neutrality. This strategy provides a framework for scaling up hydrogen production and utilisation across various sectors, including transport and industry, aligning with the EU's overarching climate objectives.

The potential of hydrogen to facilitate decarbonisation is acknowledged within the UNECE framework, where it is considered a viable fuel option for non-road mobile machinery (NRMM). This recognition highlights hydrogen's environmental benefits and its capacity to significantly lower emissions from NRMM engines.

Despite this international acknowledgment, **hydrogen is not listed as a reference fuel** under Article 25 of Regulation (EU) 2016/1628 on requirements relating to gaseous and particulate pollutant emission limits and type-approval for internal combustion engines for non-road mobile machinery.

The absence of hydrogen in the regulatory framework limits the NRMM sector's ability to transition to more sustainable technologies, hindering the EU's goals of reducing carbon emissions and dependence on fossil fuels as outlined in the European Green Deal.

CONTENT: the proposal makes two targeted amendments to Regulation (EU) 2016/1628:

- **hydrogen is added to the list of "reference fuels "** used in type-approval/emissions testing;
- **the obligation to provide CO information/reporting** is removed where the engine is operated solely on hydrogen, because there is no CO of fuel origin from combustion.

By incorporating hydrogen into the regulatory framework, the initiative supports the EU's strategy to reduce carbon emissions and achieve climate neutrality by 2050. It helps reduce reliance on fossil fuels and contributes to a

resilient and sustainable energy system.

Recognising hydrogen as a viable fuel encourages innovation within the NRMM sector, supporting research, development, and deployment of hydrogen technologies. It aligns EU regulations with UNECE standards, facilitating international trade and maintaining the competitiveness of EU manufacturers globally.

