



EU policy developments in the field of bioenergy

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Biomethane: Wide range of feedstocks

Renewable biomass such as organic waste, sewage, agricultural residues or energy crops.

Pretreatment of biomass broadens range of feedstocks.

Woody biomass like forestry residues through production of synthetic gas.



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Biomethane: Complementarities

Economic: Many residues, by-products from bio-refineries can be used e.g. glycerine from transesterification

Environmental: Digestate better for the environment than feedstocks, capture methane from agriculture (and processing).

Technological: Link to "solar fuels"



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Biomethane: Storage of RE

Feedstocks can be stored

Gas can be stored

*Use renewable power in times of excess supply
(liquifying to bio-LNG)*



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Outline

Power & Heat:

Biomass sustainability

Transport:

Update Annex V RED

Implementation FQD

ILUC

"Clean Power for Transport"

General:

"2030"



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Biomass sustainability

- ***EU sustainability criteria for transport biofuels and bioliquids:***
 - ✓ **15 international sustainability schemes recognized by the EU**
 - ✓ **Commission proposal to address ILUC risks**

- ***No EU sustainability criteria for solid biomass and biogas: potential risks dealt through environment/forest policy:***
 - ✓ **Reformed Common Agriculture Policy: cross compliance standards**
 - ✓ **EU Timber Regulation: due diligence on illegal logging products**
 - ✓ **EU Forest Strategy: development of EU-wide sustainable forest management (SFM) requirements by 2015**
 - ✓ **EU air quality standards: minimizing air quality emissions**



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Update Annex V RED

Clarify co-digestion in methodology

Default values for pathways

Manure bonus

Fossil Fuel Comparator (link to FQD implementation)



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ILUC

*Silage maize is a starch-rich crop
(cap, ILUC reporting for biomethane in transport)*

*Annex IX – role of separately collected biowaste
as feedstock.*

*Lowering of overall ambition of RE through double-
counting*



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"Clean Power for Transport"

In trilogue EP-Council-Commission

CNG and LNG (ports and trucks)

Refuelling stations: Dates and distances



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Biomethane: Further EU Policy Areas

State Aid Rules

Common Market Rules

*(Co-)Funding of R&D and demonstration etc
(Research Framework Programmes, SET plan,
Intelligent Energy Europe)*

Structural Funds (Rural and Regional Development)



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2030 GHG reduction target

Biomethane is fully included in the 40% reduction obligation.

Either through ETS or the Effort Sharing Decision (ESD) for non-ETS sectors (transport, agriculture, buildings, waste).



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Effort Sharing Decision (current)

Establishes binding annual GHG emission targets for Member States for the period 2013–2020.

These targets concern emissions from most non-ETS sectors. They are differentiated by MS.

Contrary to ETS (regulated at EU level), it is the responsibility of Member States to define and implement national policies and measures to limit emissions from the sectors covered by the ESD.



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Effort sharing to be continued for 2030

"The collective effort for the non-ETS sector must also be allocated among the individual Member States. [...] In implementing a 2030 framework, each Member State's GHG reduction target should continue to take into account distributional factors."



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Role of the EU in ESD

Despite the responsibility for MS to respect their ESD limits, there are (binding) instruments at EU level which "help" MS, e.g.:

CO2 from cars and vans, FQD

Energy Performance of Buildings Directive

Energy Efficiency Directive, Cogeneration



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Renewable energy "target"

Is derived: "A GHG reduction target of 40% should by itself encourage a greater share of renewable energy in the EU of at least 27%."

Is non-binding on Member States. Key elements are "commitments" by MS.

The target would be met by a mix of EU and national measures.



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Renewable energy in transport: "Don't do"

No renewable energy target for the transport sector after 2020.

Limited role for first generation biofuels because of ILUC: Food-based biofuels should not receive public support after 2020.



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Renewable energy in transport: "Do"

"The focus of policy development should be on improving the efficiency of the transport system, further development and deployment of electric vehicles, second and third generation biofuels and other alternative, sustainable fuels as part of a more holistic and integrated approach."

*2G and 3G biofuels (incl. biogas)
(Green) electricity*



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Biomethane: Policy Issues I

*Standards for use as fuel and for grind injection
(CEN)*

*Waste Hierarchy: Only energy recovery? – better
than landfill and composting. Or recycling?*



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Biomethane: Policy Issues II

Sustainability: GHG emissions, energy crops – landscape, biodiversity?

Energy efficiency: Biogas for power only is not best practice.

Post 2020 – better harmonization of support schemes etc?



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EU biomass policy post-2020

- Maximise **resource efficient use** of biomass in order to:
 - deliver robust and verifiable greenhouse gas savings*
 - allow for fair competition between the various uses of biomass resources*

- **Sustainability framework** should encompass:
 - the sustainable use of land and the sustainable management of forests*
 - address indirect land use effects as with biofuels.*