

RED 2.0 and (Advanced) Low Carbon Fuels in the EU



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Agenda

The bigger picture

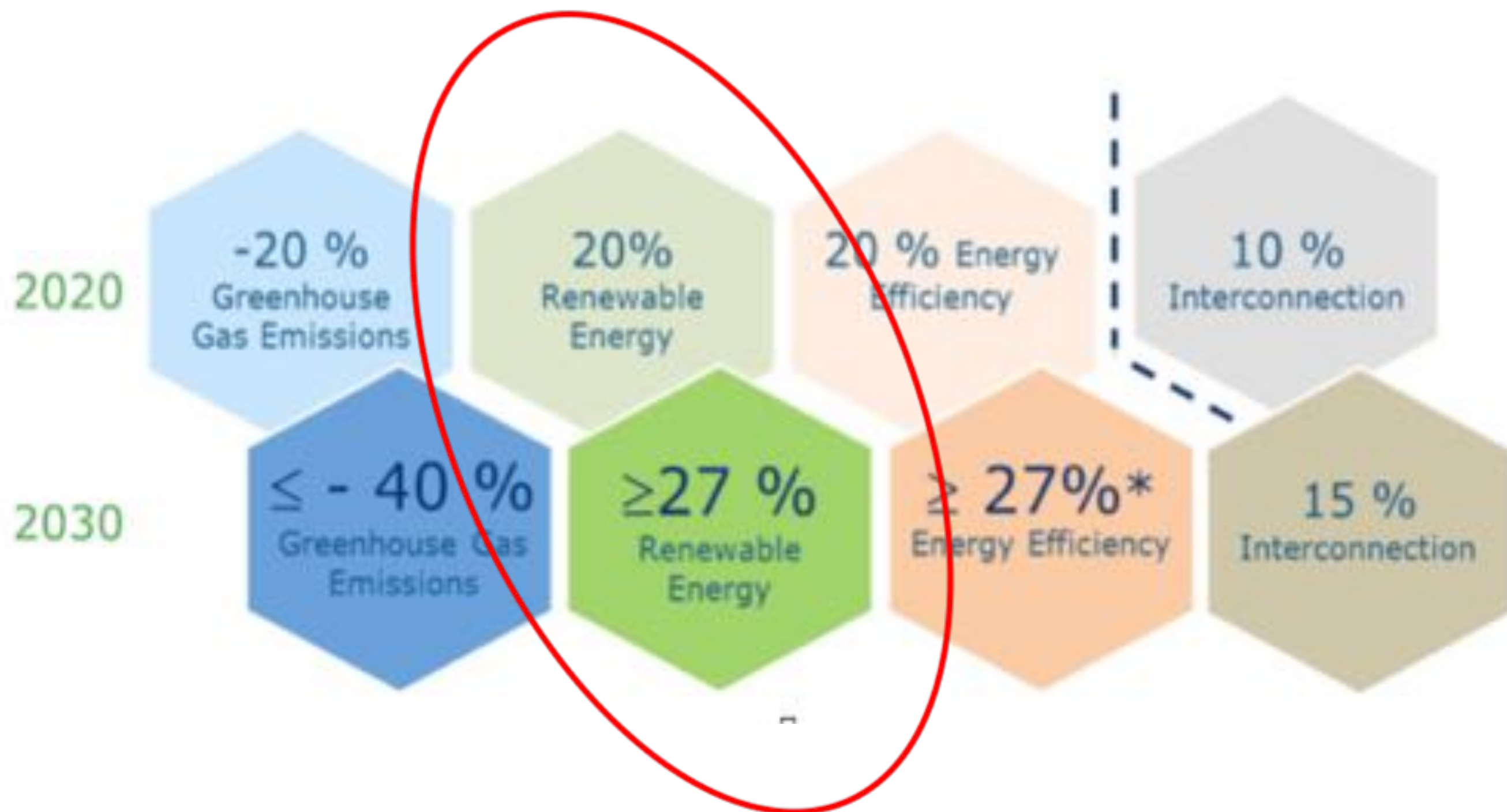
RED 2.0: the content

What next?

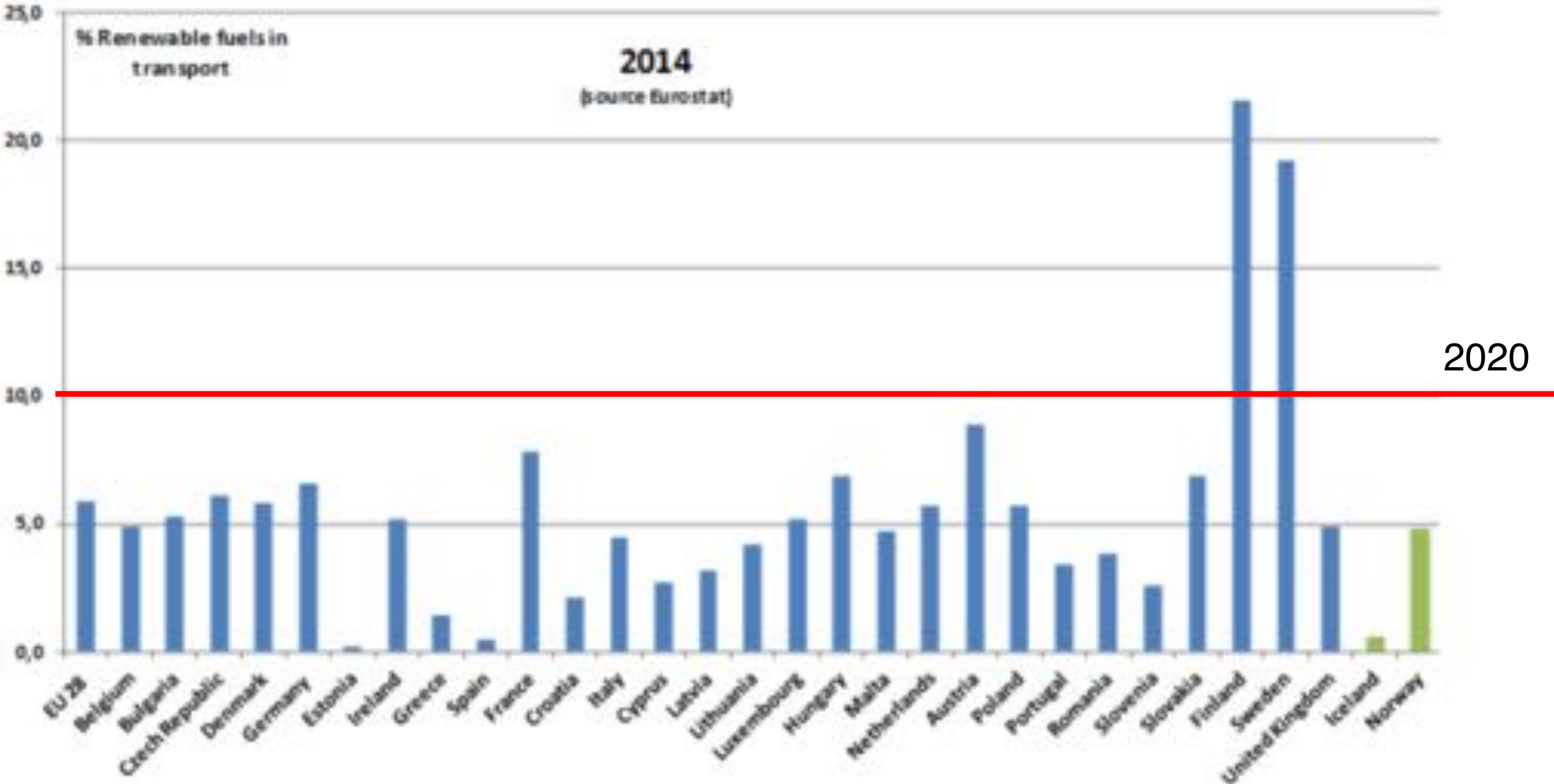
Assessment

Outlook for business

The post 2020 era - EU Energy and Climate targets



The share of RE transport fuels in the EU



Source: European Commission Sub-Group on Advanced Biofuels

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RED 2.0 - The main elements

 Council of the European Union

Brussels, 21 June 2018
(OR. en)

10308/18

Interinstitutional File:
2016/0382 (COD)

ENER 246
CLIMA 114
CONSOM 188
TRANS 274
AGRI 309
IND 175
ENV 455
CODEC 1118

NOTE

From: General Secretariat of the Council
To: Permanent Representatives Committee
Subject: Proposal for a Directive of the European Parliament and of the Council on the promotion of the use of energy from renewable sources
- Analysis of the final compromise text with a view to agreement

1. The fifth and final informal trilogue on the Renewable Energy Directive was held on 13-14 June 2018, and an informal agreement was reached on the basis of the text as reflected in Annex.

10308/18 DGE 2B RH/iss 1 EN

- At least **32%** RE by 2030 at EU level
- At least **14%** RES-T; obligation on fuel suppliers
- Sub-target of **3.5%** advanced biofuels in 2030 (mandatory)
- **7%** cap on crop-based biofuels with strings attached
- High ILUC-risk biofuels to be **0%** by 2030
- Novel fuels allowed
- Various multipliers set
- Higher GHG emission saving targets
- New fossil fuel comparator: **94 g**

RED 2.0 - The details (3b) - Annex IX

Annex IX of Directive 2015/1513

Part A ("Advanced")

- Algae if cultivated on land in ponds or photobioreactors
- Biomass fraction of mixed municipal waste but not separated household waste subject to recycling targets **under point (a) of Article 11(2) of Directive 2008/98/EC**
- Bio-waste as defined in Article 3(4) of Directive 2008/98/EC from private households subject to separate collection **as defined in Article 3(11) of that Directive**
- Biomass fraction of industrial waste not fit for use in the food or feed chain, including material from retail and wholesale and the agro-food and fish and aquaculture industry, and excluding feedstocks listed in part B
- Straw
- Animal manure and sewage sludge
- Palm oil mill effluent and empty palm fruit bunches
- Tail oil pitch
- Crude glycerine
- Bagasse
- Grape Marcs and wine lees
- Nut shells
- Husks
- Cobs cleaned of kernels of corn
- Biomass fraction of wastes and residues from forestry and forest-based industries, i.e. bark, branches, pre-commercial thinnings, leaves, needles, tree tops, saw dust, cutter shavings, black liquor, brown liquor, fibre sludge, lignin and tall oil
- Other non-food cellulosic material **as defined in point q of the 2nd § of Article 2**
- Other ligno-cellulosic material **as defined in point P of the 2nd § of Article 2** except saw logs and veneer logs
- ~~Renewable liquid and gaseous transport fuels of non-biological origin~~
- ~~Carbon capture and utilisation for transport purposes, if energy source is renewable~~
- ~~Bacteria, if energy source is renewable~~

Part B (Not considered as "advanced")

- Used Cooking Oil (UCO)
- Animal fats categories 1 and 2 **and in accordance with Regulation (EC) 1069/2009 of the EP and the Council**

In **red** the changes with the legislation in force

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Next steps

- Legal and linguistic check coming months
- The European Parliament has to adopt the agreement. Vote expected in November
- Back to the EU Council and, once adopted, will be formally signed by both co-legislators
- Then publication in the Official Journal beginning of 2019
- The Directive will enter into force 20 days after publication
- Transposition by Member States due by 30 June 2021

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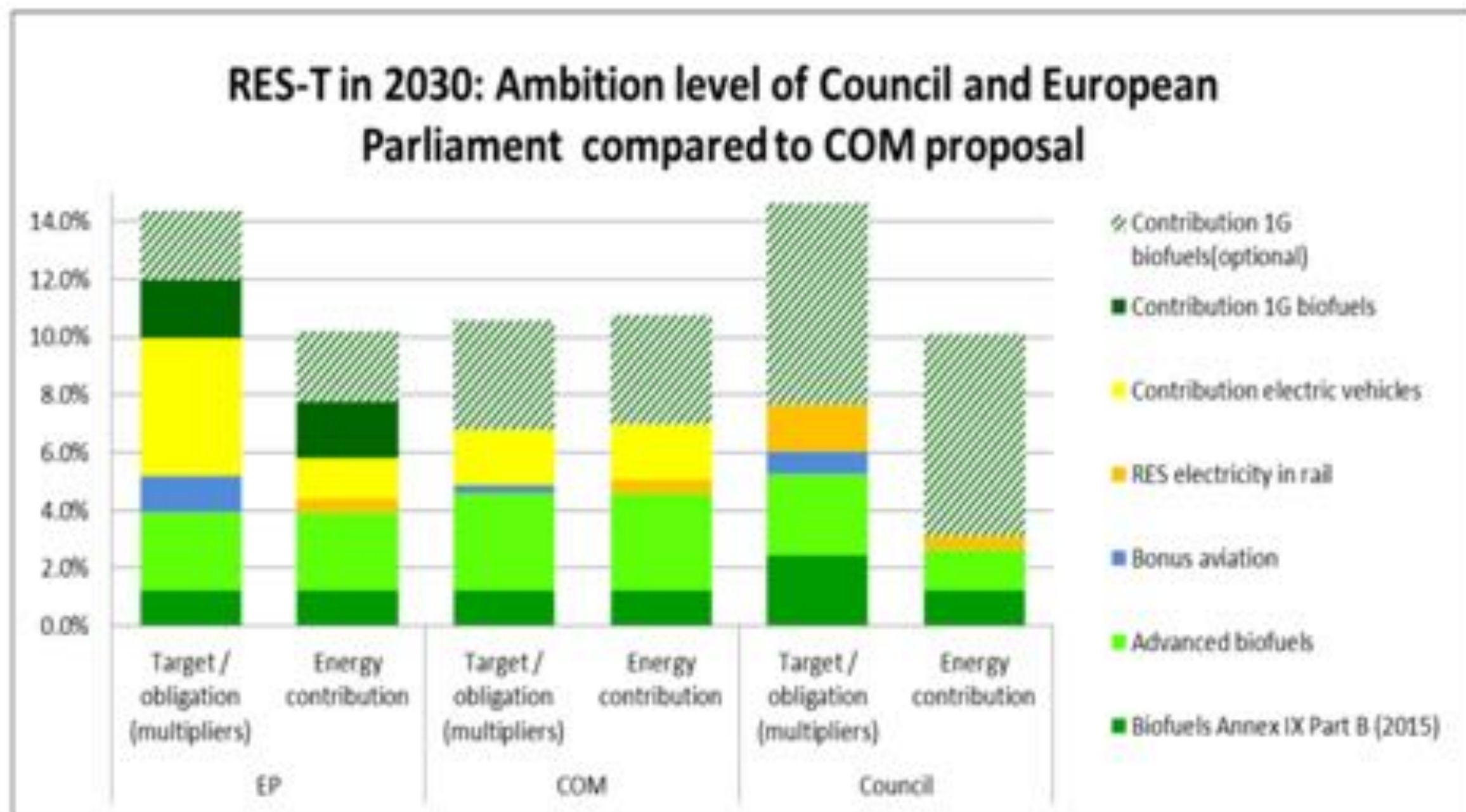
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Ambitious or not?



A first careful assessment

- The legal text is dense and detailed with some parts still to be developed by implementation rules; wording sometimes imprecise and not clear. Makes any assessment difficult
- Even though ambitious overall targets (32%, 14%, 3.5%) Member States have much flexibility to apply the instrument - kind of fuel, multipliers - of their choice
- There is strong electricity agenda that may reduce the relative share of biofuel; no serious change expected within the next decade though as electric driving is (still) too expensive
- The target for advanced biofuels (Annex IX A) is ambitious, maybe too ambitious
- If Member States are serious and maximise biofuel use there will be a modest growth in the years to come

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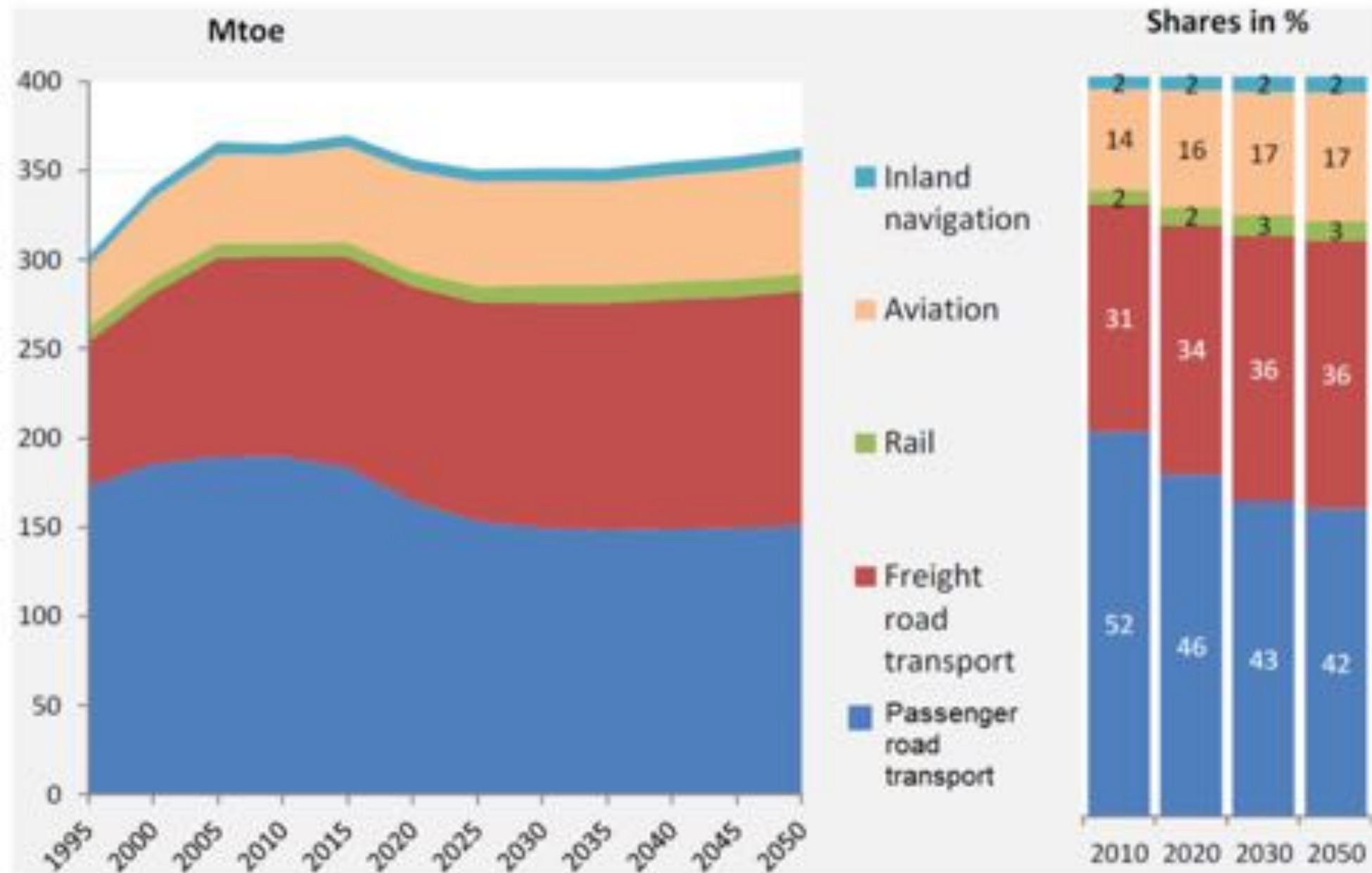
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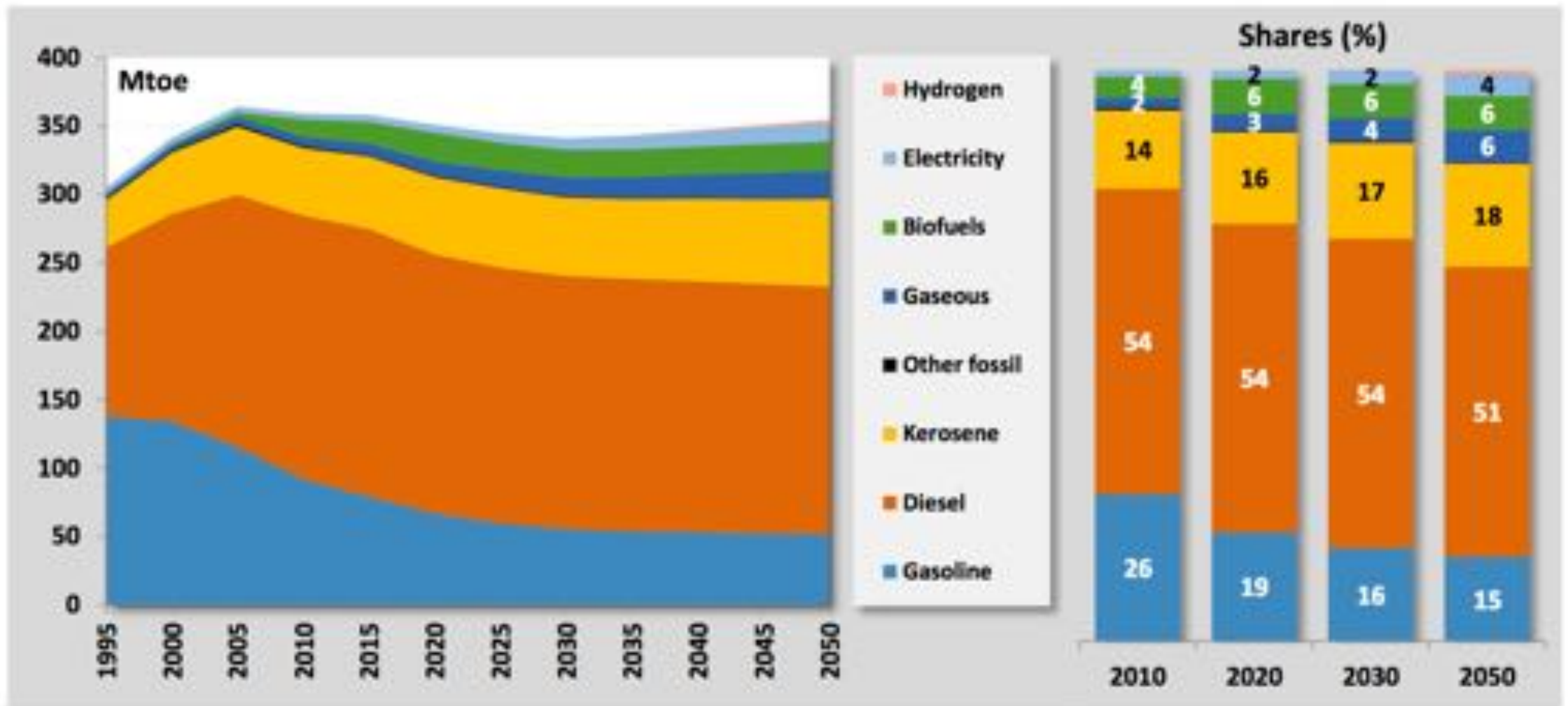
Outlook for business

The development of fuel consumption per transport mode to 2050



Source: EU Reference Scenario 2016, Energy, transport and GHG emissions to 2050, European Commission 15 July 2016

Final Energy Demand in transport by fuel type



Source: EU Reference Scenario 2016, Energy, transport and GHG emissions to 2050, European Commission 15 July 2016

Fossil versus non-fossil – the biggest challenge

TRANSPORT ENERGY EUROPE TODAY



Potential market share per biofuel by 2030

	2030 (toe)
Diesel	160.000.000
Gasoline	65.000.000
Total	225.000.000

7% Crop-based:
15 750 000 toe

3.5% Part A Annex IX:
7 875 000 toe

1.7% Part B Annex IX:
3 825 000 toe

Source: Fuel data form European Commission, DG ENER

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Questions ?