**Currently Pyrolysis** is the favoured process for chemical "recycling" within the EU.

**BUT**, while current legislation favours chemical recovery companies, the EU must prevent chemical recovery from gaining an undue

MONOPOLY!

## There is no definition of chemical recycling in the EU legislation, and pyrolysis has been the

**CURRENT SITUATION** 

most strongly supported technology, despite the process' environmental impact and the debate on how to legislate and categorise such technology. Since the process relies on integration into petrochemical infrastructure, there are different entry doors, which can create a

RECYCLING Definition of recycling -End-of-Waste criteria favours chemical recycling processes.

PYROLYSIS

favourable framework for the industry.

**VIRGIN** 

substances will be acceptable and comparable with those obtained from non-waste source, providing an easier route for the chemical industry. Accounting methodology for recycled content favours the petrochemical industry.

**Quantity and Quality?** 

recovered pyrolysis oil

with a virgin feedstock -

then the quality of recovered

If industry blends a

WHAT'S AT STAKE Lack of transparency

TOP SECRE

You Are Free Card

for pyrolysis regarding

provision of or delivery

of 'recycled content'.

The credibility of

accounting methodology

for recycled content.

**OUR FINDINGS** 

when comparing

different technologies.

**FALSE** 

**CHEMICAL** 

**RECOVERY** 

**TECHNOLOGIES** 

(PYROLYSIS AND

**GASIFICATION**)

Carbon building block -

change in the

**TRUE** 

RECYCLING

**TECHNOLOGIES** 

Olygomer or monomer change in the

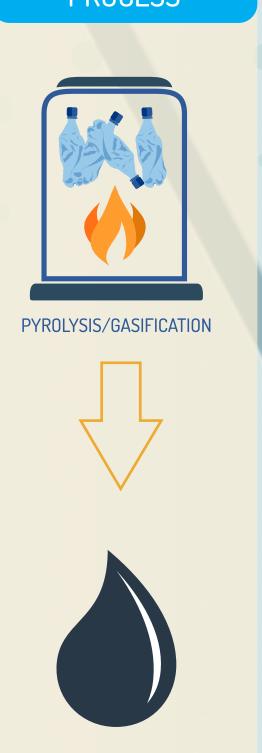
RECYCLING DEFINITION AND END-OF-WASTE CRITERIA **MECHANICAL CHEMICAL** 

**RECYCLING** 

**TECHNOLOGIES** 

Polymer - no modification

of the chemical structure





NOT

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2022/2016

Deemed to have enough

insurance regarding

safety point of view BUT

there are still debates

on the capacities of such

technologies to remove substances of concern from

feedstock, i.e. pyrolysis oil

Within a level-playing field:

solution for waste that

cannot be mechanically

recycled.

Without a level-playing field:

risk of outcompeting all recycling including

mechanical and chemical,

and fighting for the same

waste input.

Lower environmental

benefits and reduced

maximum recycling rates.

Within a level-playing field:

solution for waste that

cannot be mechanically

recycled.

Without a level-playing field:

risk of outcompeting

mechanical recycling

and fighting for the same

waste input.

DEFINING METHODOLOGY FOR RECYCLED CONTENT

**COVERED BY** 

**REGULATION** 

2022/2016

Reporting and monitoring

obligations to assess

the quality of recycled

material from the human

safety point of view



Methodology calculating

recycled content from

mechanical recycling is straight forward and based

on segregation - meaning

that there is no mix of recovered and virgin

substances to meet

requirements for

plastic products.

**COVERED BY** 

**REGULATION** 

2022/2016

Reporting and monitoring

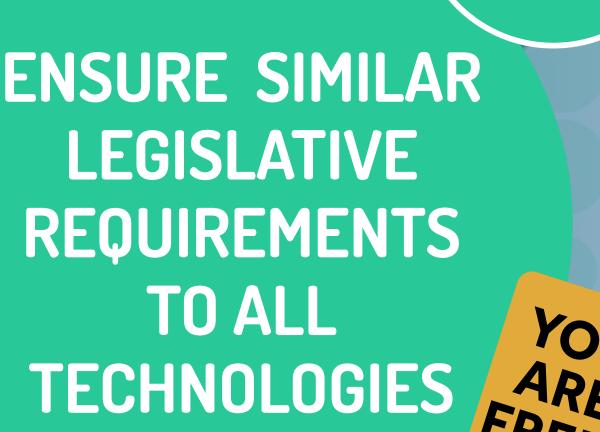
obligations to assess

the quality of recycled material from the human

safety point of view







All plastics recycling technologies should be covered by EU Regulation (EU) 2022/1616, and recovery technologies by regulations dealing with substances (REACH and Regulation (EU) No 10/2011).

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