Findings of the Economic analysis of the impacts of the Chemicals Strategy for Sustainability (CSS)

Cefic Webinar
Overview of the Chemical Strategy for Sustainability
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Chemical Strategy for Sustainability

- Published on 14 October 2020
- Contains **around 80 actions**, most of them legislative changes, to be launched between 2021 – 2024
- Foresees a targeted revision of **REACH and CLP**

Source: p.4 of the CSS Communication
Overview of the main policy changes

- Ensure the most harmful chemicals are not used in consumer and professional products
- New hazard classes: on endocrine disruptors + persistent and mobile substances (CLP)
- Address combined exposure to chemicals i.e. Mixture Assessment Factor (REACH)
- Apply concept of essential uses in chemical legislation
- PFAS: REACH restriction on PFAS for non essential uses

- Safe and sustainable by design
- Funding to support industrial innovation
- Identify key chemical value chains: to strengthen EU’s strategic autonomy
- Achieving safe products and non-toxic material cycles

- Global targets beyond 2020
- Chemicals banned in the EU not produced for export
- Common standards & innovative assessment tools internationally
- Sound chemicals management in international cooperation

- One substance, one assessment
- Reform Authorisation & Restriction processes (REACH)
- Strengthen compliance, enforcement, market surveillance

- EU research & innovation (R&I) agenda for chemicals
- Innovative testing and risk assessment methods
- Improve availability of chemical data
- R&I programmes: (bio)monitoring
- Framework of indicators to assess policies
Economic Analysis of the Impacts of the CSS
Ricardo study
Objectives of the Economic Analysis of the Impacts of the CSS

• Provide input to the European Commission’s own Impact Assessment on CLP and REACH

• The work has followed the European Commission’s own Better Regulation Guidelines where possible.

• This report only assesses business impacts.
CLP and GRA modules: Economic Analysis of the Impacts of the CSS

Notes and references
Why CLP and GRA to start with?

• The CSS was reviewed to produce a longlist of (80+) action points that the EC could take forward.

• This longlist of measures was screened to identify which are likely to be most impactful, following an approach inspired by the Better Regulation Guidelines.

• This process resulted in a selection of the most impactful policy options for consideration – GRA and CLP

Source: Economic Analysis of the Impacts of the Chemicals Strategy for Sustainability Phase 1 Report
CLP Changes

- New hazard classes (ED, PBT, vPvB, PMT, vPvM, Immunotoxicants and Neurotoxicants) will be included as part of CLP.

- The direct impact of these changes is primarily an increase in administrative or compliance activities, including update of labels, SDS, renotification to the C&L inventory and to Poison Centres and update of registration dossiers, that take the form of additional costs.

- These reclassifications could also have indirect impacts, for example, companies may consider product discontinuation or substitution (e.g., as seen for CMR2 in fast moving consumer goods, fluorinated substances in food packaging in Denmark, etc.). This is driven by non-legislative pressures such as the SIN-list, pressure from retailers, expectations from consumers and professionals, ecolabelling schemes, etc.

- The extent to which products will be discontinued or substituted/reformulated [through this indirect channel] as a result of CLP changes only has not been investigated directly, although an assumption based on expert input has been considered.
Generic Risk Approach (GRA) restrictions

• According to the CSS Communication, the Generic Risk Approach will result in the banning of certain hazard classes in consumer and professional uses.

• Once substances have been through the process of harmonised classification, substances, mixtures and possibly articles containing the CLP-classified substances will be affected by generic restrictions.

• The impact will occur as a result of implementation through REACH and sectoral legislation.

Source: Economic Analysis of the Impacts of the Chemicals Strategy for Sustainability Phase 1 Report
Considered timeline applied

Source: Economic Analysis of the Impacts of the Chemicals Strategy for Sustainability Phase 1 Report
Scenarios and Results
Static stepwise representation of the portfolio in scope of being affected by the policy changes and expected responses from businesses (in percent of baseline turnover)

Source: Ricardo analysis based on Eurostat data and a bespoke survey to chemical companies.
Scenarios in the report

Mitigation measures applied by companies (substitution/reformulation) is included in the scenarios

**Baseline scenario**

Business as usual –i.e., CSS is not applied, CLP remains the same and GRA is not extended.

**Scenario 1**

Scenario 1 considers the **addition of hazard classes to CLP and extension of the GRA** over a gradual implementation timetable (market withdrawal except where substitution / derogation is possible).

**Scenario 2**

Scenario 2 assumes a 5-year implementation timetable of the GRA and CLP changes to the GRA and CLP (as per CSS Action Plan) and assumes businesses can respond immediately.

**Scenario 3**

Scenario 3 considers policy changes are implemented quickly such as in Scenario 2, but reflects time needed for businesses to respond.

Source: Ricardo
Estimated impacts on the turnover of the EU Chemicals sector

Baseline projections
Scenario 1 (Addition of hazard classes to CLP and extension of GRA)
Scenario 2 (Faster policy implementation)
Scenario 3 (Faster policy implementation with delay on substitution)

-12% 2040

Source: Ricardo analysis based on Eurostat data and a bespoke survey to chemical companies.
Note: The Y-axis has been truncated for ease of observation of differences between impact scenarios.
Estimated impacts on the turnover of the EU Chemical Sector

- The size of the potentially affected product portfolio was estimated to be around **43% of sectoral turnover or over 12,000 substances**.

- After applying different weighting factors to account for uncertainty about definitions and criteria in the CSS, Ricardo estimated that the size of products in scope of being affected by the policy changes by 2040 would be lower and around **28% of the estimated sectoral turnover**.

- Changes to CLP and GRA, **when accounting for potential business responses**, could lead to a reduction in product portfolio and business (in turnover terms) of around **12%**.

Source: Economic Analysis of the Impacts of the Chemicals Strategy for Sustainability Phase 1 Report
### Annualised impacts on selected business and economic indicator of the EU chemicals sector, against the baseline scenario (%)

<table>
<thead>
<tr>
<th>Themes (business or economic indicators)</th>
<th>Scenario 1 (Addition of hazard classes to CLP and extension of the GRA)</th>
<th>Scenario 2 (Faster, 5-year implementation timetable)</th>
<th>Scenario 3 (Faster implementation timetable with delay on substitution/reformulation)</th>
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</thead>
<tbody>
<tr>
<td>Turnover (first order effects)</td>
<td>A loss of €47 billion per year on average against the baseline</td>
<td>A loss of €67 billion per year on average against the baseline</td>
<td>A loss of €81 billion per year on average against the baseline</td>
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<td>Total GVA contribution (direct, indirect, induced)</td>
<td>A loss of €40 billion per year on average against the baseline</td>
<td>A loss of €57 billion per year on average against the baseline</td>
<td>A loss of €68 billion per year on average against the baseline</td>
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<td>Regulatory burden</td>
<td>An additional annualised burden of €434 million each year over the period</td>
<td>An additional annualised burden of €518 million each year over the period</td>
<td>An additional annualised burden of €518 million each year with a delay</td>
</tr>
<tr>
<td>Total employment contribution (direct, indirect, induced)</td>
<td>77,000 fewer jobs, on average, when compared to the baseline in any given year</td>
<td>106,000 fewer jobs, on average, when compared to the baseline in any given year</td>
<td>126,000 fewer jobs, on average, when compared to the baseline in any given year</td>
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</tbody>
</table>

Source: Economic Analysis of the Impacts of the Chemicals Strategy for Sustainability Phase 1 Report
Effect on Downstream Users
Effect on downstream sectors

Professional and consumer products represent 74% of all products potentially impacted (the rest are industrial use products): 60% professional uses and 14% consumer uses.

The results suggest that the downstream user sectors that could be most significantly impacted are:

- Polymer preparations and compounds (used in various value chains – from pharmaceuticals to construction)
- Paints and coatings;
- Washing and cleaning products;
- Paper and board treatment products;
- Adhesives and sealants;
- Cosmetics and personal care products;
- Lubricants and greases;
- Biocidal products and plant protection products;
- Ink and toners.

Source: Economic Analysis of the Impacts of the Chemicals Strategy for Sustainability Phase 1 Report
Next steps
### Next modules

<table>
<thead>
<tr>
<th>Phase 1</th>
<th>Phase 2</th>
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<td><strong>February 2021 – December 2021</strong></td>
<td><strong>2022</strong></td>
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<tr>
<td>Addition of hazards to the CLP Regulation (EC) No. 1272/2009</td>
<td>Requirements for Polymer Registration</td>
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<tr>
<td>Extension of the Generic Risk Approach (GRA)</td>
<td>REACH restriction on non essential uses of PFAS</td>
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<td><strong>Mixture Assessment Factor (MAF)</strong></td>
<td>Ban on exports</td>
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<tr>
<td><strong>Qualitative</strong></td>
<td>Extension of REACH Registration requirements to low tonnage substances</td>
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<td>Essential Use (Qualitative)</td>
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Transition Pathway for the Chemical Industry

• Martin Brudermuller, Cefic President: “The results of this study indicate that there could be an opportunity for an industry-wide substitution effort to deliver on the goals of the Chemicals Strategy for Sustainability. However, there is a lot of uncertainty as to how businesses along the value chain could achieve it under the current framework. Industry needs a predictable growth framework for economic investments in the next two decades to come. For us to meet the many challenges of the Green Deal, we need a robust Chemical Industry Transition Pathway.”

• The proposed Transition Pathway should include
  
  — Timelines and measures for the industry to develop substitutes and focus on those products where these substitutes could be available first. In this, it should build on proven and established approaches such as the risk assessment under REACH.

  — Incentives will be needed to create markets for these new chemicals,

  — Doubling down on enforcement of REACH and product safety legislation for imports.

  — A strong innovation agenda to accelerate the development of safe and sustainable by design alternatives.

  — Should also address the other three transitions that the chemical industry has to undergo - climate neutrality, digitalisation and circularity.
Q&A’s
Thank you.

About Cefic
Cefic, the European Chemical Industry Council, founded in 1972, is the voice of large, medium and small chemical companies across Europe, which provide 1.1 million jobs and account for 15% of world chemicals production. Cefic members form one of the most active networks of the business community, complemented by partnerships with industry associations representing various sectors in the value chain. A full list of our members is available on the Cefic website. Cefic is an active member of the International Council of Chemical Associations (ICCA), which represents chemical manufacturers and producers all over the world and seeks to strengthen existing cooperation with global organisations such as UNEP and the OECD to improve chemicals management worldwide.