POSITION PAPER

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# Cefic Response to EC Consultation on the Review of Directive 2012/27/EU on Energy Efficiency

**1.1 What is the key contribution of the EED to the achievement of the 2020 energy efficiency target?**

- Unfortunately only 4 Member States have fully implemented the Directive and it will therefore take time to see the broader results.
- The EED has encouraged Member States to establish (often quite strict) energy efficiency programmes and create structural frameworks that more actively encourage energy efficiency improvement in sectors which are not influenced by market based mechanisms.
- The economic crisis in the EU has contributed to a reduction in energy consumption, which has reduced the incentive for energy efficiency investments. As such, the EU should foster technology and process specific research and innovation across all sectors.
- The implementation of bottom up measures such as voluntary agreements should be supported by the EC. They have a proven track record and represent an instrument fit for exploiting energy efficiency potential.

**1.2 How has the EED worked together with the Effort Sharing Decision, other energy efficiency legislation (on buildings, products and transport) and ETS? Could you describe positive synergies or overlaps?**

- For the European chemical industry, the ETS is a strong driver for energy efficiency improvements, along with energy costs which constantly push the industry towards more efficient processes.
- For those sectors falling under the ETS, energy efficiency targets should be avoided so as to allow the market to find GHG reduction measures at the lowest possible cost.
- The EC should ensure EU energy and climate policy (including ETS, RED, and EED) is consistent and does not overlap and cause distortion. This is the case in some Member States at present and can lead to increased costs for affected sectors.
- The EU should support industry to become more energy efficient by focusing on innovation.

**1.3 How has the EED worked together with existing national legislation? Could you describe any positive synergies or overlaps?**

- In addition to already high energy costs and the EU ETS, energy intensive industries also fall under other European and national legislation which have a direct or indirect impact on energy efficiency.

- In some Member States, existing national legislation on energy efficiency was already in place before the adoption of the EED which has resulted in overlap and in some cases the EED encouraged national governments to demand unrealistic energy efficiency improvements from industry.
- An absolute target on energy consumption is not mirroring the efforts already made and therefore impedes growth prospects, thus creating a negative investment climate.
- The EED should further promote cost effective use of CHP (where it can contribute to national targets), energy management systems implementation, and use of waste heat in industry.

**1.4 What are the main lessons learned from the implementation of the EED?**

- Energy efficiency should be considered as the most cost-efficient instrument in sectors that are not covered by the ETS, e.g. buildings. It is not the target that is important but the implementation of effective instruments adapted to a sector's potential.
- The EC should ensure EU energy and climate policy (e.g. ETS, RED, and EED) is consistent.
- For those sectors falling under the ETS, energy efficiency targets should be avoided so as to allow the market to find GHG reduction measures at the lowest possible cost.
- All sectors should contribute to energy efficiency, up to their potential and taking in to account efforts already made. This should be determined through bottom up analysis. The EC recognises sectors such as chemicals have already increased energy efficiency close to theoretical limits and contributed to other sectors efficiency gains. Whilst some potential may still exist in the chemical sector, it will come at higher costs that do not balance the economic reality of high energy prices and international competitiveness.
- Financial mechanisms & instruments should be developed in order to stimulate innovation and to trigger the implementation of long term energy efficiency measures in all sectors.

**1.5 Which factors should the Commission have in mind in reviewing the EU energy efficiency target for 2030?**

- Energy efficiency should be encouraged in non-economic sectors, especially where most gains can be made e.g. buildings, where energy is consumed without a value added. Energy used in industrial processes works as an input factor for the production of goods and therefore means a value added for the economy.
- Specific energy efficiency targets covering industry should be avoided as this would limit rather than deliver sustainable growth and energy savings, and would not create the necessary investment climate to develop innovative energy efficient solutions. It would also punish those who have already made voluntary investments.
- The EC should ensure that any overlapping policies are streamlined to ensure coherence.

- Companies should be left to choose which energy efficiency projects they make. Projects will be determined from criteria which include greatest energy efficiency gains against the length of payback time, the discount rate, and availability of funds.

- The EC should on the other hand foster and develop more instruments to support energy efficiency technology development.

**1.6 What should the role of the EU be in view of achieving the new EU energy efficiency target for 2030?**

- In contrast to perception, increasing energy costs for industry does not always directly translate in to energy efficiency investments. This is because high energy costs are a burden to competitiveness. More often than not, industrial growth and improved competitiveness takes place in regions with lower energy costs and more favourable feedstock costs, which in turn leads to energy efficiency improvement through new, modern, capacities. Therefore attracting investments to the EU and favouring an investment climate is of a high importance.

- Rather than setting an absolute target on energy consumption, the EC should develop instruments to support energy efficiency technology development.

- The EU should take a governance role to encourage Member States to define and share their national plans for energy efficiency - so policy measures can be coordinated - and monitor and report progress related to improvements. The governance system should ensure that all Member States efficiently contribute to European targets while minimising the administrative burden and leaving them freed on how to best achieve them.

**1.7 What is the best way of expressing the new EU energy efficiency target for 2030:**

Other.

- Absolute energy consumption targets covering industry should be avoided as these would limit rather than stimulate sustainable growth and hamper the production of innovative goods that enable energy efficiency and/or carbon emission reduction in other sectors. Such targets do not take into consideration economic cycles, and would drive energy-intensive sectors from Europe with products then being imported from other regions (creating new import dependencies and due to lower efficiencies in other regions to increasing global emissions).

- For the chemical sector, future energy efficiency contributions should look at economic and technological feasibility of any improvements and efforts already made in the past. Energy efficiency measures should aim to increase EU competitiveness and not be detrimental to it. Europe's chemical industry is a pioneer of energy efficiency as such measures are an important competitiveness factor, but delivering further significant efficiency improvements would require breakthroughs in technological innovation.

- Energy savings across the value chain should also be recognised, especially where parties work together to realise these energy efficiency improvements, (while avoiding double counting).

**For the purposes of the target, should energy consumption be:**

Other.

- To achieve the EU's GHG emissions reduction target and energy efficiency target, the use of energy needs to be more efficient; regardless of its source e.g. increased use of renewable energy to replace fossil fuels does not result in energy efficiency improvement.
- Targets for energy consumption should be limited to non-economic sectors, e.g. buildings. Contrary to the industrial sector, energy in the building sector is consumed without a value added. Energy used in industrial processes works as an input factor for the production of goods and therefore means a value added for the economy with all related positive impacts. Therefore energy consumption targets have to be well balanced without harming industrial production in the EU.

**2.1 In your view, are the existing EU energy efficiency requirements for public procurement sufficient to achieve the needed impact of energy savings?**

No opinion.

**2.2 How could public procurement procedures be improved in the future with regard to high energy efficiency performance?**

- They could for example include a value chain analysis/assessment in promoting routes and products with high efficiency ($CO_2$ reduction gains).

**2.3 Do you think that there is sufficient guidance in your country to characterise "energy efficient products, services and buildings"?**

No opinion.

**2.4 Have you seen information campaigns or other public initiatives in your or in another EU country that explain public procurement of energy efficient products, services and buildings?**

Yes.

- The European chemical industry is active in a number of areas including the organisation of events, meetings, briefing sessions and onsite technical visits to installations with other industry sectors, EU institutions and national government representatives.
- Specific examples include SPIRE and SPiCE[3].

**<u>If yes</u>, how useful have they been to increase awareness? Please describe.**

- SPIRE is a public/private partnership which focuses on concrete action towards innovation in resource, energy efficiency and an optimized cooperation between different process sectors including steel, water, minerals and chemicals. http://www.spire2030.eu/

- The SPiCE$^3$ project has the aim to boost energy efficiency across the EU chemical industry, particularly in small and medium-sized companies (SMEs). In particular an online platform was created containing information relevant to companies seeking to become more energy efficient, that included resource material on public procurement, products, access to finance, best practices, industry case studies etc. www.spice3.eu

**3.1 Are you aware of any energy efficiency measures that have been carried out or are planned in your country, by the utilities or third parties in response to an energy efficiency obligation scheme?**

No opinion.

**3.2 In your view, is Article 7 (energy efficiency obligation scheme or alternative measures) an effective instrument to achieve final energy savings?**

No.

- EEOS may prove to be effective tools in some sectors, specifically those that do not have other incentives or performance requirements, such as the ETS or vehicle efficiency standards. However, it remains an important task to maintain EEOS and the ETS as separate but linked tools to incentivise energy efficiency, and to eliminate any overlap between the two separate schemes, prioritising the ETS as the primary tool.

- As it is written today, Art.7 is neither an effective nor an efficient tool since it obliges all sectors to make consumption reductions at any cost. Absolute reduction targets harm industrial end consumers and result in a de facto cap for growth.

- Existing white certificates schemes, such as the ones in Italy and France have been constructed as a tool for investment which does not imply higher energy prices for industry. Such mechanisms should be viewed in a best cases study to improve Art.7 in a way that obligation does not put pressure on industrial consumers. Also, obligation volumes should not be as arbitrary as 1.5% since energy efficiency has limits.

- At the same time Cefic welcomes the flexibility from Art.7.9. Member States must be allowed to develop their own instruments to help reach a potential target set under the 2030 framework.

**3.3 What are, in your view, the main challenges or barriers to implementing Article 7 effectively and efficiently in your country? Please select up to 5 options from the list.**

Other.

- No additional costs should be imposed on industry (e.g. via costs of the energy system).

- Companies that are already covered by other schemes (e.g. ETS) should not be burdened with more complicated systems.
- The possibility to implement alternative measures is offering Member States the opportunity to address specific sectors with the right measures.

**3.4 Do you believe that the current 1.5% level of energy savings per year from final energy sales is adequate?**

Disagree.

- All sectors should contribute to energy efficiency improvements, up to their potential. There should be no absolute reduction targets for energy consumption, nor a differentiated target on EU level since this is not tapping energy efficiency potential but imposing a blunt energy consumption reduction regardless of efforts made by sectors or countries. An absolute target does not take into account potentials and economic cycles, nor degree days or other influencing parameters that cannot be neglected.
- The EC recognises some sectors (e.g. chemicals), have already made significant energy efficiency contributions. Whilst some potential may still exist in these sectors, it will come at higher costs that do not balance the economic reality of high energy costs and international competitiveness. The lowering of energy use per ton produced will continue within the limits of what is economically and physically feasible but not at a rate of 1.5 % which is not realistic.
- It is not necessary at this time to ask MS to introduce new legislation with additional requirements when the original requirements are generally not fully transposed, and their impact cannot be empirically assessed. Likewise, there has been wide interpretation of the EED resulting in different rules and requirements between one MS and another.

**3.5 Should energy efficiency obligation schemes have specific rules about energy savings amongst vulnerable consumers?**

No opinion.

**4.1 Overall adequacy: Do you think the EED provisions on metering and billing (Articles 9-11) are sufficient to guarantee all consumers easily accessible, sufficiently frequent, detailed and understandable information on their own consumption of energy (electricity, gas, heating, cooling, hot water)?**

No opinion.

**4.2 Do you think it appropriate that the requirement to provide individual metering and frequent billing (Articles 9(1), 9(3) and 10(1)) is subject to it being technically feasible and/or cost effective?**

No opinion.

**4.3 Should such conditions of being technically feasible and/or cost effective be harmonised across the EU?**

No opinion.

**4.4 How would these conditions of being technically feasible and/or cost effective affect the potential for energy savings and consumer empowerment?**

No opinion.

**4.5 Smart meters: Do you think that A) the EED requirements regarding smart metering systems for electricity and natural gas and consumption feedback and B) the common minimum functionalities, for example to provide readings directly to the customer or to update readings frequently, recommended by the Commission[1] together provide a sufficient level of harmonisation at EU level?**

No opinion.

**4.6 What obstacles have national authorities/actors faced in introducing on a large scale individual meters that accurately reflect the final customer's actual energy consumption? Do you have any good experiences to share on how to overcome these obstacles?**

No opinion.

**5.1 What should be the most appropriate financing mechanisms to significantly increase energy efficiency investments in view of the 2030 target?**

- For industry energy efficiency investments are best stimulated by ensuring a competitive playing field. To further increase investments will require measures that can help reduce pay-back time and/or the risk involved in investments in new technologies as well as investment friendly energy and climate policies (also regarding overlapping policies like the ETS). Additional efforts under the EED will require more research and innovative solutions, together with financing mechanisms supporting research & innovation, as well as the implementation of energy efficiency measures.
- Any mechanism should ensure cost-efficient energy efficiency improvements and be predictable (i.e. provide certainty for the investor), technology neutral, and not impose requirements on

[1] C(2012)1342

what parties need to participate to qualify for the incentive (i.e. combination of SME, technology provider, knowledge institute, participants from multiple countries, etc.).

**5.2 Should there be specific provisions aimed at facilitating investment in specific areas of energy efficiency?**

Yes.

Building renovation
District heating and cooling networks
SMEs
City and community infrastructures in relation to transport, waste heat recovery, waste-to-energy

- The State of the Energy Union report (December 2015) recognises that one of biggest sectors for potential investment is the building sector which accounts for 40% of the EU's energy consumption.
- The target rate for energy efficiency renovation of public buildings should be 3% of all public buildings irrespective of their ownership or use. Presently it is 3% of buildings owned by central government and occupied by them. Currently less than 2% of the 22 million public buildings in Europe are owned by central government and therefore the current renovation rate would only apply to less than 0.01% of public buildings.
- Areas (e.g. buildings) where potentially significant energy efficiency gains exist should be a target for financing investments. Funding should be focused within such sectors in projects which will deliver most gain at lowest cost. Therefore additional focus on the further development and efficient implementation of innovative technologies is needed.

**5.3 Do you agree that one way to increase the impact of energy efficiency investments could be through making the energy performance/savings monitoring mandatory under Article 20 whenever public funds/subsidies are used for EE investments? Such monitoring could be done, for example, via on-line platforms, by users in the regular intervals.**

Disagree.

**6.1 Do you think that the existing reporting and monitoring system under the EED is a useful tool to track developments with regard to energy efficiency in Member States?**

Yes.

- It adds value but it still has issues of overlap and administrative burden that could be lessened.
- The burden of reporting in some Member States is heavier than in others, creating a disparity in obligations on companies. Alignment between Member States should be investigated.

- In general, reporting systems should seek to be fit for purpose, not introduce unnecessary administrative burden, and avoid overlap with other reporting requirements. This is particularly important in this circumstance as the EED is closely related to other Directives that have reporting requirements.
- To truly define energy efficiency, EED data should focus on energy usage as compared to productivity, and on efficiency (instead of energy intensity or energy use) rather than the source of the energy. It should take into account all relevant parameters, such as temperature, that influence the degree of energy efficiency. The level of industrialisation should also be taken into account. Reporting requirements should also align with recognized international standards for managing energy use (ISO 50001 or similar) in the effort to be fit for purpose.

**6.2 Do you think that the reporting of national indicators (for example, value added/ energy consumption, disposable income, GDP etc. for year (n-2)[2] under Annex XIV (1)(a)) of the EED should be simplified?**

No opinion.

**6.3 Do you think additional indicators (in addition to those referred to in Annex XIV (1)(a) – (e)) are needed to improve monitoring to assess Member States' progress towards their energy efficiency targets?**

No opinion.

**7.1 Do you believe that measures on public procurement of energy efficient products, services and buildings should become mandatory also for public bodies at regional and local levels?**

No opinion.

**7.2 In your view, what are the main barriers that preventing the use of energy efficiency requirements in the existing public procurement procedures (please select from the list and explain your reply:**

No opinion.

**7.3 In your view, should all EU public procurement rules relating to sustainability (including in particular energy efficiency in buildings, the use of renewable energy sources, etc.) be gathered into a single EU guidance framework?**

[2] In the year before last [year X(1) – 2], where "X" is the current year.

Yes.

- At least for climate policy where the main/central target is GHG emission reduction.

**7.4 Do you think that there is sufficient guidance/framework to know what is meant by "energy efficient products, services and buildings"?**

No.

- These definitions should include the purchase and use of products that reduce energy consumption on a lifecycle basis. Regardless of the energy input to create the materials used for the product, as long as over their lifecycle they create an overall energy savings vs. other comparable products then they are by definition more efficient.
- Greater focus should be given to providing guidance on the terms, taking in to account the experience of those industries best placed to them.
- The chemical industry is a products solution provider to sustainable low-carbon economies, both domestically within the EU and with significant export potential, producing products which drive energy efficiency measures in all areas of life, including buildings and transport. We enable advances in energy storage, develop new material designs for creating better gas and electricity networks, and help innovate down the costs of low-carbon technologies.

**7.5 While energy efficient products will be cheaper to operate, their initial cost might be higher and a longer period of time will be needed to "pay back" this higher cost. Is this a problem and if so, how can public authorities overcome it?**

- The right indicator to compare product efficiency should be the total lifetime cost of operation which includes the purchase price, installation cost, and the operation costs.

**8.1 Emerging evidence suggests that most of the measures introduced under Article 7 have long lifetimes (20-30 years) and will continue have an impact beyond 2020. Do you share this view?**

No opinion.

**8.2 What is your view on the potential benefits (listed) of energy efficiency obligation schemes?**

| | Strongly agree | Agree | Disagree | Strongly disagree | No opinion |
|---|---|---|---|---|---|
| Lower energy bills for consumers | | X | | | |
| Better awareness of energy efficiency potential by consumers | | X | | | |
| Better relationship between energy suppliers, distributors and customers | | | | | X |
| Lower energy generation (and transmission) costs for the utilities | | | X | | |
| Improved business and administrative environment for up-coming innovative energy services | | X | | | |
| Aggregation of small-scale investments (pooling/bundling) | | X | | | |
| Development of new financing models – e.g. energy performance contracting | | X | | | |
| Stimulation of energy efficient renovation of buildings | | X | | | |
| Increased competitiveness in the energy markets | | | | X | |

| | | | | | |
|---|---|---|---|---|---|
| Other | | | | | |

- There is no correlation between lower energy generation costs and consumer energy efficiency measures.
- As a low-carbon economy develops so with it an array of energy services, which will take time to gather and learn experience.
- There is no direct link between increased competition in the energy markets and obligation schemes that we can think of.

**8.3 Are you aware of any developments in the energy services markets that have benefited particular actors (e.g. service providers, suppliers, distributors, etc.) in Member States having an obligation to define the obligated parties under the energy efficiency obligation scheme?**

No opinion.

**8.4 If you think that some requirements of Annex V need more precise guidance please list those requirements and specify briefly what further information you think would be useful.**

- Investment pay-back times are an important part of the decision-making process when making a business-case for energy efficiency measures, together with other decision making tools considered functional, like “net present value” of energy efficiency improvements initiatives.
- The calculation of energy savings takes into account the lifetime of savings. However, the savings are currently limited to the one achieved between its implementation and the end of the period i.e. 2020. Such calculation methodology is not fair and strongly decreases the amount of savings for actions implemented close to the end of the period. It prevents the full potential realisation of energy savings. Therefore the lifetime of the savings should be based on technical realistic lifetime of the project and not limited to the end of the period.

**8.5 As you might know, the current framework of Article 7 is set until 2020, linked to the energy efficiency target for 2020, which will expire at the end of 2020. In your view, should the Article 7 obligations continue beyond 2020 in view of the new energy efficiency target for 2030?**

No.

- The chemical industry has already invested significantly in energy efficiency but delivering further significant efficiency improvements would require breakthroughs in technological innovation.

The lowering of energy use per ton produced will continue within the limits of what is economically and physically feasible but not at a rate of 1.5 %, which is not realistic.

- Absolute savings targets covering industry and higher energy costs from energy efficiency obligations schemes for industry will hinder investment and growth in the industry. The ETS sector should be excluded from the target.
- Any continuation of Article 7 after 2020 must avoid setting a target and bring with it maximum flexibility for industry to work with MS to develop their own instruments to help reach a possible 2030 target. That would include the possibility of taking into account early measures (introduced before 2020) that will have an effect after 2020 so as to include "early bird" countries and their portfolio of existing policy instruments.
- EE should be encouraged in all sectors and especially in sectors where most gains can be made e.g. buildings.

**8.6 Do you think that the scope of eligible measures allowed under Article 7 should be clarified?**

- Investigation could be made in to the possible expansion in scope, as long as any expansion ensures flexibility in choice of measures, and alternative measures are also highlighted as being possible ways to reach any target. Measures which might be appropriate to look at further include utilisation and recovery of waste heat, and savings from energy management systems.

**8.7 Would there be benefits in greater harmonisation of some of the requirements of Article 7 to allow more consistent implementation across Member States?**

| Provision of Article 7/Annex V | Strongly agree | Agree | Disagree | Strongly disagree | No opinion |
|---|---|---|---|---|---|
| Calculation methods | | | | | X |
| Materiality | | | | | X |
| Additionality | | | | | X |
| Lifetimes | | | | | X |

| | | | | | |
|---|---|---|---|---|---|
| Price demand elasticities[3] for taxation measures in real terms | | | | | X |
| Indicative list of eligible energy saving measures | | | | | X |
| Monitoring and verification procedures | | | | | X |
| Reporting | | | | | X |
| Other | | | | | |

**8.8 What role should the EU play in assisting the Member States in the implementation of Article 7?**

- MS should be transparent and share information on the energy savings they have achieved. For this to be relevant at an EU level, methodologies should be harmonized. Likewise, there should be guidelines for auditors which would help ensure harmonised, clearer and more transparent auditing across the EU.
- Member States should be able to use the creativity and flexibility that fits to their economic, housing and transport structure and takes into account the efforts already made. Therefore no target can be put in, since this would be non-differentiated between Member States and sectors
- The EC should ensure EU energy and climate policy (including ETS, RED, and EED) is consistent and does not overlap causing distortion.

**8.9 Please state which best practice examples could be promoted across the EU and how?**

No opinion.

[3] Price demand elasticity is a measure used in economics to show the responsiveness, or elasticity, of the quantity demanded of a good or service.

**8.10 Would it be appropriate and useful to design a system where some types of energy savings achieved in one Member State would count towards obligations carried out either by governments or by economic operators in another country, just as the option to cooperate on greenhouse gas emissions reductions already exists?**

- Generally, and from an economic point of view, the schemes with highest savings potential at the lowest cost should be exploited first as it is logic when applying market based instruments such as the ETS.
- An EU wide trading scheme for energy savings would require harmonised calculation methods and harmonised policy frameworks. However, a trading system would assume that a party seeking a trade has an energy efficiency target which exceeds its economic potential to reach it, which is not the desired setup of the EED. In any case, the sectors covered by the ETS should not need to be included in any obligation scope as there is already a signal to consider energy efficiency while investing.

**8.11 Would it be appropriate and useful to design a system where energy efficiency obligations would also include elements aiming at gradually increasing the minimum share of renewable energy applicable to energy suppliers and distributors?**

- Member States choose their energy mix thus it is dubious that it would be possible to establish such a system of binding targets for RES share in the portfolios of energy suppliers. This overlaps with RED, and RES has no relation to energy efficiency.

**8.12 Could the option of establishing an EU wide 'white certificate' trading scheme be considered for post 2020?**

Strongly disagree.

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About Cefic

Cefic, the European Chemical Industry Council, founded
in 1972, is the voice of 29,000 large, medium and small chemical companies in Europe, which provide 1.2 million jobs and account for 17% of world chemicals production.