REGULATORY SCRUTINY BOARD OPINION


{C(2019) 2125 final}
{SWD(2019) 343 final}
{SWD(2019) 344 final}
Title: Impact Assessment - Ecodesign requirements for electric motors and variable speed drives

Overall 3rd opinion: POSITIVE

(A) Context

The Ecodesign Directive tackles negative environmental impacts that certain products may have during their entire life cycle. It "pushes" the market by banning the sale of new products which do not meet minimum design requirements for e.g. energy efficiency. The Commission establishes design requirements in implementing acts.

Regulation 640/2009/EC already establishes design requirements on energy use for some motors. This report analyses the case for including in the existing regulation smaller and larger electric motors, as well as some particular types of motors and variable speed drives.

(B) Main considerations

The Board acknowledges the improvements made with respect to the readability and evidence base of the report.

The Board gives a positive opinion, with a recommendation to further improve the report with respect to the following key aspects:

1. The added-value of the initiative in the wider context is not clearly presented (e.g. contribution to the Europe 2030 energy and climate targets; contribution to the overall Ecodesign potential).

2. The analysis of impacts on SMEs is insufficient. The report does not specify in how far the extension of the scope of the Ecodesign Regulation to small motors could negatively affect SMEs that produce motors. It does not analyse to what extent the proposed transition and exemption periods would be appropriate for these SMEs.

3. The impact on national Market Surveillance Authorities is unclear. Even though the report acknowledges that the wider scope of the Regulation will entail more burdens for Market Surveillance Authorities, there is no specific analysis on how the proposal will affect them.

4. The rationale behind the proposed transition and exemption periods is vague. The report does not clearly justify the selection of multiple transition and exemption periods for different categories of products. It does not explain them in the context of competitiveness and circular economy aspects.
(C) Further considerations and recommendations for improvement

(1) The evaluation is not a sufficient basis to support the problem description. The report could usefully estimate the energy savings and greenhouse gas reductions realised thanks to the 2009 Regulation, but also the gap resulting from regulatory failures and loopholes. Moreover, it could present upfront the remaining ecodesign potential which the extension of the scope of the Regulation could reap.

(2) The report could add other cost savings that are generated by the initiative. Apart from the direct cost savings for the consumers, ecodesign measures may reduce indirect costs, like the need to invest in the replacement of high-polluting energy supply, health costs of emissions, or damages to the environment.

(3) The report includes a new section on SMEs (6.3.4) and acknowledges that option ECO3 (the preferred one) would involve a greater number of SMEs directly engaged in motor production. While the industry organisation (CEMEP) issued warnings about the capability of SMEs to adjust to new requirements, the report concludes that, overall, the preferred option 'may be advantageous' for SMEs. The report should more thoroughly assess the impacts of the measures on those SMEs that produce motors.

(4) The report should assess the capabilities of national Market Surveillance Authorities to cope with the extended scope of the Regulation (or the possible increase in administrative cost linked to that). In particular, it should assess to what extent the implementation of ecodesign requirements to both components (motors in this case) and end-products will increase the costs of inspections and/or affect their quality.

(5) The report should clarify the rationale behind the choice of transitional periods for different categories of products. It should demonstrate that the length of the transition period measure will allow industry – and in particular SMEs – to adapt to the new regulation. Similarly, it should assess the duration of the period for spare parts availability for embedded motors in the context of consumer needs, life-cycle assessment and circular economy requirements.

(D) RSB scrutiny process

The lead DG shall ensure that the recommendations of the Board are taken into account in the report prior to launching the interservice consultation.

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Opinion

Title  
DG ENER – Ecodesign requirements for electric motors and variable speed drives  
(resubmitted version of 22 December 2015)*

(A) Context
The Ecodesign Directive tackles the negative environmental impacts that certain products may have during their entire life cycle. It "pushes" the market by banning the sale of new products which do not meet minimum design requirements (including energy efficiency). Design requirements are established by the Commission in implementing acts.

Design requirements on energy use have already been established for some motors in Regulation 640/2009/EC. This report analyses the case for including smaller and larger electric motors, as well as some particular types of motors and variable speed drives in the existing regulation.

(B) Overall opinion: NEGATIVE
While the report has been improved to some extent along the lines of the Board’s recommendations it still does not adequately inform decision making.

The presentation of the information has to be substantially improved to make the report more coherent and accessible for non-experts. Moreover, the report should still further clarify the following key aspects:

1) What lessons can be drawn from the implementation of the current Regulation? What evidence is there to explain the causes of the problem?
2) What is the added value of this initiative and how is coherence with existing ecodesign and labelling legislation ensured?
3) How are the market actors going to be affected? What are the foreseen costs to re-design the motors and how have these costs been estimated?

Given the nature of these issues, the RSB requests DG ENER to resubmit a revised version of the IA report on which it will issue a new opinion.

(C) Main recommendations for improvements
(1) Description of the market and causes of the problem: The report needs to better

* Note that this opinion concerns a draft impact assessment report which may differ from the one adopted.
describe the market (further clarifying who the market actors are) and more clearly showing for each sub-category of products the potential for energy saving and greenhouse gases reduction. While it explains that China and the US have regulations in place, the report should still show more clearly who the main trade partners are, presenting data on imports and exports. Moreover, the report should refer to experience gained from implementing the current regulation and to any changes in the evolution of the market and in the behaviour of the market players. Further evidence should be included, if available, to explain the causes of the problem, for instance why purchasers in a professional market do not take into account potential electric motors from the outset.

(2) **Added value and coherence with existing initiatives:** The report should still clarify potential consequences arising from the double regulation of motors and the appliances in which they are installed. More robust argumentation and concrete evidence should be presented on the reasons for including motors that possibly may be integrated in end-products which are also regulated under ecodesign. For instance, the report should better explain (a) if there are problems relating to market surveillance, why is a solution on reinforced enforcement not put forward rather than regulating through new ecodesign measures; (b) what are the drawbacks of allowing manufacturers to implement the cheapest solution to comply with energy savings imposed by other ecodesign regulations instead of focusing on improving motor efficiency?

(3) **Assessment of the options:** The report should still better assess the compliance costs involved, elaborating on how market actors are going to be affected and more thoroughly substantiating the statements describing the expected impacts on SMEs. Important information is missing, such as the magnitude of redesign costs or impact on overall economy (e.g. GDP and jobs in other sectors). The report should still provide a more in-depth comparison of the options, explaining the criteria chosen and the underlying analysis. It should explain whether there is a risk of stranded investments (including on downstream markets) and if not, provide a thorough explanation for that. Finally, the report should explain what operational monitoring and evaluation arrangements are going to be put in place and how likely it is that existing market surveillance arrangements are going to ensure compliance with the requirements.

(D) **Procedure and presentation**

The presentation of the report should be significantly improved in order to provide a clear basis for decision makers. Information should be presented in a less technical manner (to this end a glossary would be useful) and more coherence between the different sections should be ensured (e.g. presenting the preferred option after the comparison of the options). The main assumptions used in the cost/benefit analysis should be summarized in the main report. Different categories of stakeholders’ views should be better presented throughout the report, in particular on the options.

(E) **RSB scrutiny process**

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Title DG ENER – Ecodesign requirements for electric motors and variable speed drives
(draft version of 3 September 2015)*

(A) Context
The Ecodesign Directive tackles the negative environmental impacts that certain products may have during their entire life cycle. It "pushes" the market by banning the sale of new products which do not meet minimum design requirements (including energy efficiency). Design requirements are established by the Commission in implementing acts.

Design requirements on energy use have already been established for some motors in Regulation 640/2009/EC. This report analyses the case for including smaller and larger electric motors, as well as some particular types of motors and variable speed drives in the existing regulation.

(B) Overall opinion: NEGATIVE
The Board gives a negative opinion because the report is deficient in the following key aspects which should be improved.

(1) The rationale for developing performance requirements for these electric motors and drives and the additional energy savings that might accrue (in relation to those already achieved by improvements in the performance of other products) should be clearly presented.

(2) The market structure for the various categories of motors and variable speed drives should be better described, including the international dimension. In addition, the reasons why Regulation 640/2009 did not include all categories of electric motors from the outset need to be explained.

(3) Further evidence should be presented to explain the causes of the problem, for instance why purchasers in a professional market do not take into account potential energy/cost savings over the operational lifetime of a new motor or drive.

(4) The potential consequences/conflicts arising from the double regulation of motors and the appliances in which they are installed should be better explained. What is the real added value of this initiative, given the substantial benefits which can be attributed to the ecodesign requirements of many other product categories in which motors are installed?

* Note that this opinion concerns a draft impact assessment report which may differ from the one adopted
The report should provide a better assessment of the impacts of the policy options. In particular, given the estimated cost of 5 million euro per manufacturer to re-design the motors, what is the risk that some SMEs would go out of business? Is there a risk of stranded investments? What are the likely impacts on the environment such as greenhouse gas savings and the costs/benefits for consumers and producers?

Once revised, the IA must be resubmitted to the Board which will issue a new opinion on the revised draft.

(C) Main recommendations for improvements

(1) Significance of energy saving potential of electric motors: It should be made clear how significant this initiative will be in comparison to the energy savings achieved by the 2009 Regulation and by regulations for other product categories which have already been adopted, supported by more quantitative evidence.

(2) Policy context and description of the market: The report should clearly explain what is included in the scope of this initiative and why Regulation 640/2009 did not include all categories of electric motors. In order to understand the reason for presenting this initiative, a clear market description should be provided for these products, specifying the market structure, the size of the different sub-markets and their characteristics. The report should explain who the market actors are and how many of them are SMEs, including in downstream markets where motors are integrated into other products. Given that one of the reasons for this initiative is the likely influx in the EU of low energy efficiency motors coming from third countries, the report should explain who the main trading partners are, presenting data on imports and exports and describe what regulations/agreements are implemented by EU's main competitors.

(3) Causes of the problem: The report should better analyse the causes of the problem for the motors and explain why the identified market failures would be specific to this sector. For instance, what evidence is there to explain why purchasing decisions in a professional market do not take into account potential energy/cost savings over the operational lifetime of a new motor or drive? Moreover, the argument of negative externality should be presented in a more balanced manner and presented in a broader context, mentioning for instance the current EU policies put in place to counteract these effects (e.g. ETS measures). Moreover, the report should refer to experience gained from implementing the current regulation and to any changes in the evolution of the market and in the behaviour of the market players.

(4) Added value of the initiative: The report should provide more convincing arguments for discarding at an early stage the option of a voluntary agreement and explain why labelling measures could not solve the problem, given the recently adopted international standards. Moreover, it should clearly differentiate between measurement and performance standards and on this basis explain why the market alone is not likely to converge to higher energy efficiency categories, given the adoption of more stringent requirements by EU's main competitors. Given the substantial overlap with the ecodesign requirements of many other product categories in which motors are installed, the report should better justify the added value of this initiative and explain how a coherent approach will be ensured and how the double counting effect has been considered when estimating the potential energy savings of this proposal.

(5) Assessment of impacts: The report should better assess the compliance costs involved, discussing how market actors are going to be affected given that investment
decisions for the next couple of years in the production line are likely to have already been taken (risk of stranded investments in motor and downstream markets). The expected impacts on SMEs should be better described, taking into account the market structure for electric motors, and it should be clarified whether these impacts will be mitigated in some way in the measure itself. The report should better assess likely impacts on the environment, referring for instance to the likely reduction in greenhouse gas emissions. Moreover, it should more clearly mention the methodology used in the cost/benefit analysis, summarizing the main assumptions. The report should explain what operational monitoring and evaluation arrangements are going to be put in place and how likely it is that market surveillance arrangements in place are going to ensure compliance with the requirements. A more thorough comparison of options should be carried out, explaining the criteria chosen and providing underlying analysis when evaluating how the options compare.

Some more technical comments have been transmitted directly to the author DG and are expected to be incorporated in the final version of the impact assessment report.

(D) Procedure and presentation

The report should present the information in a less technical manner in order to be accessible to non-experts. It should clearly explain the content of the options; for instance: (a) are 8-pole motors subject to performance requirements in the preferred option? (b) does the preferred option foresee any provision on rare earth materials? The report should better present different categories of stakeholders’ views throughout the report, in particular on the options. Moreover, if possible, it should describe the views of sub-groups of stakeholders that are affected by possible “double ecodesign measures”, in particular those where full overlap occurs.

(E) RSB scrutiny process

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