ORGALIME’s BACKGROUND PAPER ON THE PROPOSAL FOR A DIRECTIVE ON
ESTABLISHING A FRAMEWORK FOR THE SETTING OF ECO DESIGN
REQUIREMENTS FOR ENERGY USING PRODUCTS (“EUP”)

Brussels, 19 November 2004

Executive Summary
This paper aims at providing an overview of the current state of play on the EUP proposal, its main content, the main developments during the legislative process to date and industry’s key positions.

It is structured into three parts:

1. OVERVIEW ON THE EUP PROPOSAL

   1.1 State of play
   The European Parliament will be shortly receiving the Council’s common position on the eco design of energy using products directive for further proceedings.

   1.2 EUP in a nutshell
   Based on article 95 of the EC Treaty and following a life cycle perspective, EUP would establish a framework for setting eco design requirements on energy using products. EUP would provide a mandate to the Commission to adopt implementing measures for specific product areas, covering one or more relevant environmental aspects, if certain criteria are fulfilled.

2. WHAT IS THE HISTORY BEHIND THE EUP PROPOSAL?

   2.1 Parallel preparation of different Commission initiatives
   Prior to the adoption of the EUP proposal, various different initiatives have been under discussion in the European Commission being inconsistent and overlapping. EUP is the result of the merger of the former draft “EEE” and draft “EER” proposals and is stated to be the first IPP model directive.

   2.2 Industry’s input on environmental product policy
   From the beginning of the discussions and throughout the whole preparatory and legislative process of any of the different legislative initiatives, ORGALIME has provided constructive input based on its vision on environmental product policy.

3. BACKGROUND TO INDUSTRY’S KEY POSITIONS ON EUP

   3.1 Coherence of environmental product policy and in depth consideration of implementation aspects
   In the interest of proper implementation of the proposal, EUP must be coherent with various other different legislative initiatives that apply to the same products potentially targeted by EUP.

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1 ORGALIME speaks for 33 trade federations representing some 130,000 companies in the mechanical, electrical, electronic and metalworking industries of 23 European countries. These industries employ some 7 million people and account for 1175 billion euros of annual output, which is a quarter of the EU’s output of manufactured products and a third of the manufactured exports of the European Union. The engineering industry, which manufactures both consumer products and capital goods, is the industry, which will be most affected by the EUP proposal.

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### 3.2 Preservation of competitiveness and fair trade within the internal market

Sustainable development requires a balance of the three pillars: environmental, social and economic. It is important to respect this balance when setting requirements. Fair trade within the internal market is still not sufficiently guaranteed by the proposal, as loopholes in EUP, resulting from a misleading definition of the manufacturer, still exist. This leads to unclear obligations for trading companies importing products into the EU.

### 3.3 Safeguard free movement in an enlarged Europe

Any product related legislation must be based on the sole legal base of article 95 of the EC Treaty as otherwise the internal market would be further fragmented. EUP regulates products, thus it should be exclusively based on article 95.

### 3.4 Consistency with existing concepts, especially “New Approach”

Many products that would be potentially targeted by EUP fall under the scope of so called “New Approach” directives, in which the legislator sets essential requirements but leaves it up to the manufacturer how to best achieve these, e.g. by applying harmonised standards. EUP should be consistent with the New Approach principles, especially in the area of conformity assessment procedures. Both, authorities and industry have gained substantial experience with the New Approach.

### 3.5 YES to Life cycle Thinking – NO to mandatory Life Cycle Assessment

Life Cycle Thinking is the fundamental discipline to environmentally conscious design practices. It encourages considering environmental aspects from cradle to grave of a product and helps arriving at environmentally, socially and economically sustainable solutions. Mandatory LCA (Life Cycle Analysis), on the contrary, is not an appropriate tool as it is far too complex and burdensome in many areas.

### 3.6 Conflicting goals lead to need for well balanced political decisions

Action towards reducing the environmental impact of products often conflict with each other or with other important aspects, such as their safety or functionality, thus requiring a political decision of regulators. EUP should aim at introducing a well balanced and structured approach for the setting of eco design requirements, including stakeholder consultation and technical studies to be commissioned prior to considering legislation.

### 3.7 Acknowledgement of voluntary action as part of mix of policy tools

The concept of Integrated Product Policy of which EUP is claimed to be a first application directive, provides a toolbox, which includes the acknowledgement of the potential of alternative courses, such as self-regulation, for environmental improvement. EUP accords priority to such alternative courses in the area of eco design. In many areas voluntary action has delivered environmental policy objectives more rapidly and at the same time more cost efficiently than legislation.

### 3.8 Inclusive process that provides stakeholders the possibility to contribute

Including those who have day-to-day experience in product design and the integration of environmental aspects into the design of a product would contribute to finding optimum solutions, which would both meet the environmental objective as well as be technically and economically feasible. EUP in its present form provides for the consultation of stakeholders in line with Better Regulation principles by the establishment of a consultative forum.

### 3.9 No “top runner” approach

EUP will immediately ban non-compliant products from the EU market. Thus it would not be appropriate to introduce a concept similar to the Japanese top runner. The "top runner" is based on another concept than EU-regulation.

### 3.10 Keep possibility of using management systems for conformity assessment (Annex V)

At the level of this framework directive, for conformity assessment procedures both options, annex IV (Internal Design Control) and annex V (Use of Management System) should be kept to meet the needs of different manufacturers potentially targeted in EUP implementing measures.

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1. Overview on the EUP proposal

1.1 State of play

Following the adoption of the Commission’s proposal on 1 August 2003, the European Parliament concluded its first reading on 20 April 2004 and the Council reached political agreement on a common position on 10 June 2004. Also, the European Social and Economic Committee delivered its opinion on the proposal by 31 March 2004.

Shortly, the common position will be submitted to the European Parliament for further proceedings.

ORGALIME as the umbrella organisation of all the sectors covered by the EUP proposal has been closely following developments at a European level and has continuously represented industry’s views to the European institutions in course of the legislative process.

Considering the major impact that the EUP directive and its future daughter directives will have on the innovation capacities and competitiveness of European engineering industries, ORGALIME will continue to offer industry’s expertise and perspectives to European decision makers in Brussels and via our national member associations network to the member states of the European Union.

At technical level, industry has already been active in the past in shaping the environmental performance of products and will be committed to continue along this path also apart from the EUP proposal.

1.2 EUP in a nutshell

Based on article 95 of the EC Treaty, the Commission proposal would create a framework for the integration of various environmental aspects (such as energy efficiency, water consumption or noise emissions) into the design of energy using products. Such a product is defined as “a product, which is dependent on energy input to work as intended and a product for the generation, transfer and measurement of such energy including parts, the environmental performance of which can be assessed independently”. If certain criteria (listed in article 12 of the proposal) were fulfilled, the Commission would be mandated to adopt by means of Comitology so-called “implementing measures” and set generic or specific eco design requirements. Following the model used under the New Approach products that comply with harmonised international or European standards would presume to conform to the set requirement. So would products complying with certain eco labels.

Following discussion in the EP and Council, the political agreement on a common position includes a working plan into the proposal and establishes a consultative forum to ensure balanced stakeholder participation of all parties concerned when envisaging the preparation of an implementing measure. Also, the political agreement limits the scope of the proposal to EUP of a sales and trade volume of 200,000 units in the EU. Relevant self-regulation taken by the industry shall be taken into account in considering whether to prepare a draft implementing measure.

2. What is the history behind the EUP proposal: From “EEE” to “EUP”

2.1. Prior to the final Commission EUP proposal of 1 August 2003, three different legislative initiatives were under parallel preparation in three different services of the European Commission:

a) EEE under the leadership of DG Enterprise

At the European Council held in Helsinki in December 1999 the three dimensions of sustainable development: economic, social, and ecological development - were emphasised. At the same occasion the Council urged the Commission to integrate the environmental perspective into all other policy areas.

This was the incentive for the Commission’s DG Enterprise to propose a so-called "New Approach" to the environment, i.e. to use New Approach legislation in the framework of the "IPP/Integrated product policy" which also came up for discussion during that period within the Commission’s DG Environment.
The concrete result of the deliberations on using the New Approach to the environment was the working paper and later draft proposal for a directive "on the impact on the environment of electrical and electronic equipment" (abbreviated “EEE”). Based on article 95 of the EC Treaty, the idea was to demonstrate in practice how environmental issues could be integrated into enterprise policy. The overall aim being to ensure that the public interest of protecting the environment remains while at the same time enterprises were enabled to enhance their competitiveness without obstructing innovation or technology transfer.

The EEE-draft proposal was based on Life Cycle Thinking, allowing the manufacturer to find the optimal balance between economic, social, technical and environmental requirements when designing his products.

b) EER under the responsibilities of DG Energy
In the light of the European Union’s commitments under the Kyoto protocol on combating climate change, the Commission’s DG Energy in April 2002, prepared the launch of a draft framework directive on energy efficiency for end use equipment (abbreviated “EER”), based on article 95. The aim of this proposal would have been to set specific requirements for energy consumption of products targeted in so-called "implementing measures".

c) IPP initiated by DG Environment
At the same time, the Commission’s DG Environment further elaborated its Integrated Product Policy concept as a general strategy for environmental product policy. IPP seeks to improve the environmental performance of products following a life cycle perspective and taking action where it is most cost effective. To achieve this, IPP offers a box of different tools and instruments either voluntary or mandatory.

d) Joint EUP proposal of DG Energy and DG Enterprise
The risk of incoherence and inconsistency of parallel activities of individual Commission services, for which the Commission was challenged by stakeholders including industry, made the Commission decide to merge the two proposals of EEE and EER and present one sole draft directive. This merger finally resulted in the existing proposal for a framework directive for the setting of eco-design requirement for energy using products (EUP). This proposal is now trying to combine the original principle of life cycle thinking with the setting of more specific requirements.

Generally speaking, annex 1 would find its origin in the original draft “EEE” proposal while annex 2 would rather mirror the previously intended draft EER directive.

Overall, the EUP proposal is claimed to be a first model directive of the Integrated Product Policy concept (IPP).

2.2 Industry’s input on environmental product policy

From the beginning of these discussions and throughout the whole preparatory and legislative process of any of these different initiatives, ORGALIME has provided constructive input based on its vision on environmental product policy.

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This vision^4 includes the following elements:

- Coherence with other legislation and existing approaches
- Fully harmonised approach - free movement of goods in the internal market
- Life Cycle Thinking
- Priority for alternative courses, such as self-regulation
- Development of a common view between regulators (national and EU) and stakeholders requires stakeholder involvement

3. What are the reasons behind industry’s key positions on the EUP proposals?

In the light of the above outlined fundamental building blocs, we summarise the key messages of our previous statements and background to the main areas of our concerns on the EUP proposal as follows:

3.1 Industry requests regulators to ensure coherence in product related environmental policy taking into consideration implementation aspects in more depth

Industry has been sensitive to the proposition of a new legislative instrument in the field of environmental product policy:

- Firstly, legislating the design of a product means addressing an area, which by nature constitutes the manufacturer's core competence, which is a key factor for the manufacturer’s business success and competitiveness.
- Secondly, EUP comes into an area where products are already heavily regulated: In the interest of workability and practicability, additional environmental legislation should therefore fit into existing concepts and approaches, which have proved to be successful (see position 3.4). One major such concept is the New Approach of which the EUP proposal contains some elements. In other areas, however, EUP clearly departs from New Approach principles. This might prove to be a disadvantage at the stage of implementation. The recent examples of WEEE and RoHS^5 have proven how difficult it is for industry to cope with directives when all perspectives are not well thought through at the decision stage and when committed involvement of authorities at the transposition stage is lacking.
- Thirdly, the different initiatives underway in parallel in the different Commission services were overlapping and inconsistent.
- Finally, EUP covers an enormous range of different product sectors, all having different cultures, traditions, and different products having different product characteristics. To target all these different products in one-umbrella directive makes it even more important to arrive at a framework that would be as open as possible and that would retain maximum flexibility with a view to implementation while at the same time establishing clear compliance criteria.

3.2 The proposal must preserve industry’s competitiveness and fair trade within the internal market

Sustainable development consists of three equally important pillars, environmental, social and economic. During the legislative process on EUP, there were tendencies to completely cut off the economic pillar when establishing implementing measures, which industry could not support. It is the economic pillar and industry's global competitiveness that is of vital importance for employment and social welfare and should therefore not be neglected.

To avoid negative impacts on the competitiveness of European engineering industries, the directive must also ensure that products imported through trading companies meet the same requirements.

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Regulators, when setting requirements, should also ensure that these can and do apply effectively to all suppliers in the internal market. Failure to do so will open the door to “free riding” and will fail to ensure that the environmental objectives of the implementation measure are met. To ensure fair trade within the internal market, it is important that compliance with a set requirement can be properly controlled in the EU.

The European Parliament in first reading has made proposals which would take these concerns into consideration, which have however not been taken up in the political agreement on a common position. Efficient market surveillance is a must and has been included in these EP proposals.

3.3 Safeguard free movement of goods in an enlarged Europe

One of the major success stories of the European Union is the internal market. It offers its advantage to both, the industry and the consumer. On the one hand, free movement of goods in the internal market guarantees a level playing field to the industry and on the other hand, makes the consumer enjoy a broader choice of competitive products.

Also, many of the products covered by EUP already enjoy free movement according to other article 95-directives. A consistent approach makes it necessary to opt for a fully harmonised approach cross Europe in order to safeguard the interests of the internal market.

Therefore, article 95 of the EC Treaty is the sole appropriate legal base for the proposal.

3.4 Consistency with existing concepts, especially “New Approach”

The main idea of the New Approach is that the legislator sets the overall, essential requirements, but leaves it to the manufacturer to find the best way to fulfil these requirements. This is primarily done through the use of standards, which are elaborated under participation of all stakeholders, including environmental NGOs, industry and consumers. Conformity with such standards would presume compliance of the product to the essential requirements. Such standards are regularly updated to reflect the state of the art of the given aspects considered.

New Approach directives have especially been a success in the area of product safety regulation. Examples of this are the Low Voltage Directive and the Machinery Directive, which would also apply to many of the products falling under the scope of EUP and potential implementing measures.

EUP being a product related legislation it is important that it follows the same principles as already used in other directives, which apply to the same products. This is an opportunity to incorporate the New Approach in product related environmental policy.

As an example, EUP conformity assessment rules should be fully coherent with rules set in other New Approach directives in the interest of practicability and workability.

Conformity assessment modules as defined in the Global Approach, which goes in parallel with the New Approach are fixed according to the principle of proportionality, i.e. depending on the type of products and the nature of the risks involved. This approach has been defined in order to avoid unnecessary procedures, which are too onerous relative to the objectives.

Authorities and industry have more than 10 years experience with the directives under this approach, including the main principle of internal design and production control without the involvement of a notified body (i.e. module A).

Also, a comparisons of accident statistics between the US and the EU in the area of electrical appliances show that the EU has a lower number of accidents and a better rate of improvement than the US, in spite of the US having a model with strong pre-market control. Thus, module A (the manufacturer’s self declaration) has proved to be successful in the area of safety.
The European system is based on post-market control by the authorities. It is therefore essential that requirements be set in a way, which can be controlled by authorities at an equal level in all countries. Efficient and effective market control has a vital role to play.

No mandatory third party certification or verification
The use of third party certification or verification (modules B, C, D, E, F) should only be used when the costs and delays incurred are proportionate to the risk. When the question is about environmental impacts related to product design there are no direct risks or long-term impact of one specific product, which would require the involvement of a third party.

The involvement of a third party leads to extra costs and time consuming burdens for companies, which are especially difficult to handle for SMEs. Furthermore, it delays the marketing of new products, especially of those having short innovation cycles, as any change of the product would require a new certification/verification. This would inevitably hamper innovation and competitiveness.

3.5 YES to Life Cycle Thinking (LCT), but NO to mandatory life cycle assessment (LCA)

Life Cycle Thinking means that all environmental aspects from the cradle to the grave are to be considered and weighted against each other when considering action to improve the environmental performance of a product. Life Cycle Thinking seeks to identify the most significant environmental impacts of a product at whatever stage of the product’s life cycle and to seek for ways in which continuous improvements to products can be identified and implemented. It is a holistic approach, ensuring that a balanced and pragmatic solution to the various dimensions of sustainable development can be better achieved.

Life Cycle Thinking is the fundamental discipline to environmentally conscious design practices. It must be stressed that LCA (Life Cycle Analysis) is not an appropriate tool in the design process. An LCA is an "end of pipe" tool, which is extremely complex and burdensome. If it is to be run on manufactured products, only experts can do this, and is impossible to realise LCA on drafted products.

Annex 1
While the Commission draft EUP directive gave rise to different interpretations on the role to be played in accordance with annex 1, the compromise on annex 1 reached in the political agreement by the Council fixes a clearer framework under which future generic eco design requirements are to be developed and applied in implementing measures.

3.6 Conflicting goals lead to need for well-balanced political decision

When designing products, designers must respect all existing legislation, either environmental or other, such as safety.

Reduction goals of the environmental impact can be partly (mutually) conflicting as following examples may illustrate:
- PVC as a material has low emissions over the life cycle, but is posing high environmental risks and causes problems in recycling electronics.
- Miniaturisation of electronics generally is good for emission reduction, but has adverse effects in recycling and increases certain environmental risks.
- Savings in stand-by energy consumption requires extra equipment (i.e. extra use of materials, and energy in manufacturing).
- Reuse might be more expensive than new production (use of energy and resources for sorting, splitting up products etc.).
- Third party refurbishment undertaken to extend the useful life of a product may adversely affect the integrity/safety characteristics and as such invalidate the product warranty provided by the manufacturer. Without a warranty the refurbished product effectively becomes redundant in many industrial applications. Therefore, when the process of reuse is promoted within a directive it can have a negative effect on the environment.
• Flame-retardants in plastics are good for the safety of products, but from an environmental point of view have a negative impact.

Such conflicting goals lead to the need for political decisions: It is up to policy makers to indicate what the relative importance of the various environmental, safety or other perspectives should be. Scientific evidence is a tool of utmost importance in taking such decisions.

The EUP proposal in article 12 establishes a list of criteria, which shall apply when implementing directives are to be brought forward.

Such a balanced approach is of interest to all:
- The consumer who expects that his product meets as high as possible environmental profile, however, without compromising other important aspects, such as safety or the functionality of the product,
- Industry that has to compete on global markets and needs a level playing field, and
- Regulators that have to consider both, citizen’s needs and a positive investment climate.

3.7 Acknowledgement of voluntary action as part of policy tools

IPP acknowledges voluntary action as part of the policy mix. In some areas, voluntary initiatives have succeeded in delivering policy objectives more rapidly and at the same time more cost efficiently. The EUP proposal takes up this useful instrument as part of its toolbox.

For example, unilateral commitments are already well-known in the market place and industry supports the preference given to such an approach as such commitments typically deliver policy objectives more swiftly and cost-effectively than the regulatory approach. They also stimulate a pro-active approach on behalf of industry, respond better to market sensitivities and reduce market distortions. Thus, they can better secure both environmental and competitiveness aspects.

3.8 Inclusive process that provides stakeholders the possibility to contribute with their technical knowledge and expertise

Including those who have day-to-day experience in product design and the integration of environmental aspects into the design of a product would contribute to finding optimum solutions, which would be both, meeting the environmental objective as well as technically and economically feasible. Therefore, if considering legislative action in the area of product design, industry should be involved from the outset of the whole process, both in the identification of a possible product to be covered by an implementing measure, and in defining the content of any eco-design requirement.

In this context, the present EUP text proposes the establishment of a consultative forum in the spirit of Better Regulation principles.

Thus, EUP establishes a structured framework for the establishment of eco design requirements.

While regulators and stakeholders shared the view that a structured and balanced approach should become the norm, some felt that there should be a list of products that should be immediately targeted by an implementing measure without considering the procedures set in the proposal.

Such an approach would -despite undermining the approach set up in the proposal, i.e. to apply specific criteria and thorough analysis before selecting product groups- also be disproportionate and maybe even contrary to the interest of the environment, as not listed products may well have a scientifically proved potential for environmental improvement.

The Council incorporates the balanced proposal of a working plan into its common position: For the subsequent three years an indicative list of products which will be considered as priorities for the adoption of implementing measures shall be set up. In a transitional period, implementing measures for the products that have been identified by the ECCP (European Climate Change Programme) may be adopted by the Commission in accordance with the procedures laid down in the EUP proposal.
3.9 No “top runner” approach

During first reading, the European Parliament showed sympathy for the introduction of a so-called “Top runner” approach for setting specific eco design requirements.

The “Top runner approach” has been introduced in Japan in 1998 when revising the Japanese Energy Conservation Law and consecutive government ordinances. This concept means setting standards on the basis of the best possible performance. All products should achieve this level of best possible performance after a certain time frame. In case of non-compliance after a certain transition period, the product would not be banned from the market but first be challenged by a system of marking poor performing products and eventually penalised (up to a maximum of 1 Mio. Yen equalling some 7400 Euro).

The EUP proposal however claims to be directed towards the improvement of various environmental aspects depending on the product category to be targeted. For one product the most important environmental aspect that would require improvements might be noise emissions, for another one water consumption should be primarily improved, again for another product category energy efficiency improvements should be the priority area of action.

As to energy efficiency improvements, the EUP proposal would generally intend to work from two ends:
- To cut off and therefore ban from the market least performing products by setting minimum energy efficiency requirements for product categories for which energy efficiency has been identified as priority area for environmental improvement (following a least life cycle cost analysis)
- To encourage and attribute incentives to best performing products by acknowledging presumption of conformity to products which would bear the eco label (the eco label is conceived as a marking of excellence by legislators)

In addition, EUP would in parallel provide for information requirements to the consumer in order to drive his responsibility in the market place and ensure that the product is used and later on disposed of in an environmental friendly way.

Even if at first sight, a top runner approach seems rather ambitious, would it fit at a European level and constitute a practical way to approach EUP implementing measures?

It would not - for various reasons:
- Cultures and philosophies behind the EUP concept and the top runner concept differ fundamentally. This becomes especially evident when looking at enforcement rules: Introducing a system of bad marking and eventually penalising in case of non-compliance as done by the Japanese top runner, is completely different from a concept that immediately bans products from the market which do not fulfil set requirements. In the first case, all products can potentially remain available on the market. Including the top runner into EUP, however, would mean, that all other products than best performing would disappear from the market.
- How can a “best performing product” be reliably defined?
- What may be considered the best performing product at the moment of setting the target for a specific date doesn't necessarily mean that at the moment of entry into force the chosen solution is still the best performing. Markets evolve quickly, especially in the area of energy using products. There are certain product groups, which are characterised by extremely short innovation cycles (e.g.: information technology equipment).
- The top runner approach could even lead to a discrimination of certain technologies and reduce the variety of products available on the market.
- The Japanese top runner approach focuses on energy efficiency improvements without balancing against other potentially important aspects, e.g.: environmental, economic or technical.
- Finally, not all consumers can afford best performing products. Their purchase decision is rather dominated by price considerations notwithstanding the increasing environmental consciousness of European citizens.
3.10 Keep possibility of using management systems for conformity assessment (Annex V)

Conformity assessment procedures should be flexible, i.e. taking into account both the different characteristics of the different product categories covered by potential implementing measures and the different companies to perform the assessment. This would include keeping the option of management systems (annex V of the EUP proposal) when assessing the conformity of a product.

Also, two essential elements, which have been lacking in the Commission’s proposal at the beginning, have been properly addressed by the Council and have therefore lifted reservations of many actors who would have preferred to drop annex V at the beginning, namely:

a) In comparison to the original proposal, EUP now allows for an integrated management system.

b) The uncertainties on whether the same level of documentation requirements would be required by both annex IV and annex V have been removed. Same requirements will now have to be fulfilled under both options.

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As soon as the Council’s common position will be adopted, Orgalime will be pleased to provide the position of the European engineering industry on it.