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COMMUNICATION FROM THE COMMISSION

concerning the promotion of energy efficiency in the European Union (SAVE II Programme)

Proposal for a COUNCIL DECISION

concerning a multi-annual programme for the promotion of energy efficiency in the Community - SAVE II

(presented by the Commission)

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SUMMARY

The SAVE programme was established by Council Decision 91/565/EEC and began officially on 29 October 1991. SAVE will expire on 31 December 1995. An evaluation of the programme has been carried out by a group of independent experts and a series of recommendations have been made by them for improvement in the overall content and operation of a new SAVE programme.

The Commission considers that a continuation of the SAVE programme is necessary due to the essential contribution of an improvement in the rational use of energy resources to the Community's strategy to stabilize CO₂ emissions at the 1990 level by the year 2000. This objective is in conformity with Article 130s of the Treaty.

The prudent and rational management of energy end-use also makes an invaluable contribution to the attainment of the Community's energy efficiency objectives and is one of the pillars on which the Green Paper on the Community's future energy policy, which has been presented by the Commission, has been based.

The Commission's White Paper on Growth, Competitiveness and Employment recognized the pre-eminent role of prudent energy use in improving the competitiveness of the Community's industry while at the same time creating a significant number of new jobs. Improved energy end-use efficiency introduces a demand side management approach which also contributes to social cohesion within the Community, promotes the valorization of local energies and accelerates the penetration of new energy technologies (many of which have been developed with Community funding) into the marketplace.

In the light of the consideration mentioned above, the Commission is proposing a continuation of the SAVE programme which will embody many of the recommendations made by the independent experts as well as the experience gained by the Commission in the operation of the SAVE programme and other energy actions.

This increase in the scope of the SAVE II programme actions, through the incorporation of the Community's actions in improving energy management at regional and urban level and through the necessity to develop policy instruments which complement existing Community actions in the field of energy efficiency, is justified by the importance of the programme in the Community's CO₂ limitation strategy.

The enlarged SAVE II programme will have the following elements:

(a) reinforced existing actions:

- labelling and standardization actions in the area of energy using equipment;
- pilot actions to be carried out by appropriate networks;
- targeted pilot actions;
- dissemination of information through appropriate networks;

(b) New actions:

- monitoring of energy efficiency progress at national and EU level,
- specific actions in favour of greater cohesion between Member States in the field of the establishment of policies aimed at efficient energy management;
- specific action aimed at improving energy management at regional and urban level;
- actions aimed at establishing energy efficiency as a criterion within existing EU strategic programmes.

SAVE II is scheduled to begin on 1 January 1996 and will run until 31 December 2000. Its actions are specifically designed to address the overcoming of barriers for achieving better energy efficiency within the Member States of the Union. Dissemination of the results of SAVE II actions to non-Member Countries can be undertaken by other Community programmes.

1. Introduction

- 1. This Communication has a dual purpose. First, it constitutes the report on the SAVE programme which was required by Article 7 of Council Decision 91/565/EEC setting up the programme. Secondly, it serves as the preamble to a Commission proposal for the continuing of the Community's energy efficiency actions through the setting-up of a SAVE II programme.
- 2. Energy efficiency will be used in its broadest definition in this paper, i.e. the prudent and efficient use of energy resources in all sectors of the economy and related to all resource types.
- 3. An evaluation has been made of the SAVE programme by a team of independent experts and the report is annexed to this document. Many of the suggestions of the team relating to a future SAVE programme have been incorporated in the proposal for the SAVE II programme.

Another element of programme evaluation was a conference held in Florence from 26 to 28 October 1994. This conference brought together over 300 participants who had been involved with the SAVE programme either as national officials of Member States (the SAVE Committee) or as SAVE contractors on pilot projects. The conference discussed the contribution of the SAVE programme to improving the energy management infrastructures within the Community and developed suggestions for future Community actions.

- 4. In the light of the recent effort to reduce the amount of Community legislation in the energy field and in order to clarify the existing situation, it is proposed that the Community action programme for improving the efficiency of electricity end-use (the PACE programme) set up under Council Decision 89/364/EEC⁽¹⁾ be completely incorporated into SAVE II permitting the cancellation of the original legislation.
- 5. With the same preoccupation, rather than presenting a new regulation as a follow-up to the regional and urban energy programming pilot action which has been carried out since 1990 without a legal basis, it is proposed to incorporate in the SAVE II programme the elements of this programme relating to actions on energy management in regions, cities and islands.
- 6. The incorporation of these two programmes added to the inclusion of the recommendations of the experts who evaluated both SAVE and the Community's programme for energy management in regions, islands and cities and the discussions undertaken during the SAVE Conference, have led to the development of a series of actions which greatly increase the effectiveness and scope of the programme. Some existing SAVE actions will continue in an adapted form while a series of new actions have been added.

OJ No L 157, 9.6,1989, pp. 32-34.

2.1 Environment

7. Since the efficient use of energy reduces the emission of pollutants to the atmosphere, it has been hailed as the single most important policy objective in attaining the EU's stated objective of stabilizing CO₂ emissions to the 1990 level by the year 2000. In recognition of this fact, the SAVE programme has been recognized by the Commission as a cornerstone of the Community's CO₂ reduction strategy. This situation has been reinforced by the Conclusions of the Environment Council of 15/16 December 1994 which states "The Council underlines once more that the target of stabilizing CO₂ emissions can only be achieved by a coordinated package of measures to improve energy efficiency and the rational use of energy which are based on supply and demand at all levels of energy production, conversion, transport and consumption and to exploit renewable energies"(2). This does not mean that the efficient management of energy use should be seen as a panacea for our environmental problems but it is widely recognized that, under normal economic growth conditions, a substantial improvement in the rational use of energy will be necessary if the EU is to attain its objective. This will inevitably mean that Member States will have to supplement their efforts to manage the use of their energy resources and that the EU will have a role to play in coordinating and optimizing the Member States' efforts.

2.2 The Commission's energy Green Paper

8. The Commission has established a Green Paper⁽³⁾ which outlines a proposal for the Community's future energy policy and which will act as a basis for a discussion on an energy chapter in a revised Community treaty. The Green Paper establishes three tenets to which energy policy should respond; industrial competitiveness, security of supply and protection of the environment. Energy efficiency satisfies these three imperatives. It safeguards security of supply by the wise use of energy resources, it reduces factor costs of industry thereby raising productivity, and it protects the environment by reducing the amount of harmful pollutants emitted into the air.

2.3 The White Paper on employment⁽⁴⁾

9. The White Paper on employment mentioned the role of the new eco-industries such as energy efficiency as a generator of jobs. The Commission estimated that such industries have an employment creation potential in the region of 100 000 permanent jobs and 200 000 man years by the year 2000. However, there is evidence that this may be a conservative estimate, and that the employment creation potential is much greater. There is also substantial empirical evidence to demonstrate that energy demand

^{(2) 11870/94 (}Presse 273-G).

⁽³⁾ COM(94) 659 final.

Growth, Competitiveness, Employment, Office of Official Publication of the European Community, 1993.

reduction investments create 3-4 times the number of jobs as equivalent energy supply projects⁽⁵⁾. A landmark study carried out in the EC in 1984⁽⁶⁾ has estimated that an enforced energy demand policy aimed at reducing energy consumption by 15% over 15 years might have an overall yearly net employment effect of about 520 000 man years.

2.4 The 1995 energy efficiency objective

- 10. It is now virtually certain that the Community will fall well short of the ambitious objective which the Council set in September 1986 for a 20% at least improvement in the Community's energy intensity by 1995. The attainment of such an objective would have required a confluence of increased Member State initiatives in energy use management allied to continuous price rises. In effect, Member States' efforts in the field of energy efficiency declined during the ten year period in question while oil prices collapsed in 1986.
- 11. The difficulty in attaining the energy efficiency objective demonstrates the very real barriers which impede the development of the very considerable potential which exists for further energy efficiency gains within the EU. The existence of the objective alone was not sufficient to maintain Member States' efforts to improve the rational use of energy and the benefits of an energy efficient society were foregone for the short-term gains associated with cheaper energy. The SAVE programme address in practical terms the barriers which exist to developing the energy efficiency potential by examining through pilot projects how such administrative and institutional barriers can be overcome.

2.5 Complement to technology

12. The European Community, mainly through the JOULE and THERMIE programmes, has supported a great deal of development in the area of improved energy production and end-use technologies. Much of this development has taken place against a background of difficulty in introducing energy technologies to the marketplace. Since 1989, the THERMIE programme has developed tools to assist market penetration of the technologies already developed. However, there is much which can be done on a policy level to remove barriers, both institutional and financial, to the introduction of efficient energy technology. The SAVE programme is the policy vehicle which complements the Community's energy technology programmes. SAVE in itself is technology neutral. For example, the SAVE I programme presented a directive on energy auditing in industry. Some Member States did not have a well developed cadre of energy managers capable of carrying out such audits. SAVE supported the training

Power to Spare-A plan for increasing New England's Competitiveness through energy efficiency, New England Policy Council July 1987.

⁽⁶⁾ Employment Effects of Energy Conservation Investments in EC Countries, Fraunhofer Institute, study prepared for DG XVII.

of energy managers for energy auditing. Well qualified energy managers could be considered a tool in ensuring the penetration of energy technologies; therefore the SAVE initiative complements the efforts of the technological programmes in bringing energy technologies to the marketplace.

2.6 Social and economic cohesion of the EU

- 13. Studies have shown that where energy efficiency programmes have been launched the savings made tend to be spent in the local economy and thereby increase the level of local economic activity with consequent improvements in the quality of life. Whereas investment in energy supply (generally located near major population centres) have a distinct confined effect (only those in the general area of the construction benefit), investments in improving the efficiency of energy end-use produce jobs across a wide geographical area which may be important for the less-developed regions and towns of the Community. Furthermore, effective energy efficiency policies will diminish the economic vulnerability of the Union to any future supply-side shortage.
- 14. Energy management, through the reduction of factor costs, increases industrial competitivity thereby increasing the chances of industrial growth and increase of employment. Again this is particularly important for peripheral areas of the Community.
- 15. The adhesion of three new States on 1 January 1995 has improved the average Community energy intensity and thereby placed greater pressures on the Community to achieve cohesion in this important area of economic activity.
- 16. There is empirical evidence to show that policy programmes such as SAVE do much to accomplish the aim of social and economic cohesion by creating disposable income from energy savings. There is also evidence that technological-based programmes have a negative effect on social and economic cohesion since they tend to concentrate their efforts on areas where a high-technical competence already exists. These are generally not the areas in most need of social and economic cohesion.

2.7 The energy efficiency protocol of the Energy Charter

17. The Energy Charter Treaty was signed on 17 December in Lisbon. The Treaty which establishes cooperation in the energy sector between the countries of the West and the transitional economies of Eastern Europe and the former Soviet States includes a protocol which covers the subject of energy efficiency. It has been estimated that some of the transitional economies have energy intensities a multiple times that of the average in the European Community. The Member States of the Community have developed an important capability in the area of the efficient management of energy resources which can be transferred to the transitional economies. It is important, therefore, that experience gained on SAVE I be supplied to the transitional economies possibly through the mechanisms developed by the Energy Charter. The same argument is certainly true for all developing economies which, in the early stages of development, tend to be very energy intensive.

3. Setting a new EU energy efficiency goal

18. As mentioned above in the paragraph 2.4, an energy efficiency objective for 1995 was set by the Council in 1986. It is very unlikely that this objective will be attained. It could be argued that the objective was too ambitious in the first place since the most economic energy efficiency options had been taken during the period 1973/86 and that the marginal cost of each unit of energy saved would rise over time. However, the fact that the objective exists tends to focus Member States' minds on the subject of energy management. Without such an objective, Member States might possibly have reduced their energy efficiency programmes yet further. It is therefore proposed that an energy efficiency objective be set for the programme so that the progress of the Member States and the initiatives undertaken by the Commission can be monitored. Since 1986 the improvement in energy intensity of final demand has been in the region of 1% per annum. Most of this improvement was related to either structural effects or the implementation of new end-use technologies entrained in production related investments. Over the next five years we expect the reinforced SAVE might contribute as much as 1% point more than expected as an improvement to the energy intensity of final demand. This quantifiable goal will be agreed with the Member States and will represent a yardstick against which SAVE II and the individual programmes of the Member States can be judged. Such a level of improvement in the energy intensity of final demand will result in significant avoidance of CO₂ emissions and other pollutants.

Lessons from SAVE I

4.1 Introduction

19. The lessons learned from the SAVE programme have come in various forms. Firstly, a group of independent consultants carried out an interim evaluation of the programme during the first half of 1994. The evaluation report will be transmitted to the Council and the European Parliament and a shortened version is included in Annex 1. Similarly, an independent evaluation has also be made of the Community's action in favour of energy management in regions, cities and islands and a shortened version of that evaluation is included in Annex II. It should be pointed out that the SAVE evaluation mentioned above only covered the first three years of operation of the programme and that many of the initiatives supported by the programme were still underway at the time the evaluation was made. The second element in the lessons learned has been provided by the operation of the programme by the Commission itself. The third and final element has been the feedback from the Member States and those who have benefited from the programme and who used the occasion of the SAVE Conference in October 1994 to make their views on the programme known to the Commission. The following is a, necessarily, short description of what lessons have been learned in the three major actions of the programme.

4.2 Legislation and standard setting

20. The experience of SAVE in the area of administrative actions was less positive than originally planned. The programme coincided with the introduction of the subsidiarity principle and while it is acknowledged that the principle is particularly valid in the case of energy efficiency actions which undoubtedly have their greatest effect in closest proximity to the consumer, the effect on the package of administrative measures announced in SAVE I has been considerable. It appears that the only reasonable way to proceed is to develop measures only in those areas where the Community has a well-established competence. Such an area would appear to be traded goods where a substantial amount of work has already been done under SAVE I. The absence of an energy related Article in the Mastricht Treaty left no specific legal basis for legislation in the energy area. Therefore, new legislative action under SAVE II must concentrate on areas where individual action by Member States could lead to a disruption of a major Community policy such as the Internal Market. While the current climate appears to be against further general energy efficiency legislation, the Commission is, of course, constantly monitoring the situation and will bring such legislation forward as it deems effective, necessary and timely.

4.3 Pilot projects

21. The purpose of the pilot projects was to strengthen energy efficiency infrastructures within the Member States and to assist Member States with the introduction of the legislative actions proposed in SAVE I. In effect, a very large number of individual projects were undertaken (more than 200). This placed a large administrative burden on the staff managing SAVE and led to a restricted effort in the setting up of cooperative projects and in the diffusion of results which represent an important element of "added value". An effort to redress this situation was undertaken in the fourth year of the programme and it is intended that SAVE II will place a greater emphasis on having Member States help each other through the transfer of experience regarding different policy options.

4.4 Information programme

22. A comprehensive information programme was launched starting in 1993 through the use of the EnR network (a network of Member State energy efficiency bodies). This action has proved very effective and has been a good example of subsidiarity. To date the information programme has been proposed on an annual basis by EnR and discussed with the Commission. It might be more suitable to develop an information strategy within the SAVE Committee and have, if necessary, various information networks respond to elements of this announced strategy. Such an action would stress the "added value" of Community support.

4.5 Cooperative actions with other energy programmes

23. It became apparent during the administration of SAVE that there were large area of common interest between the actions being undertaken by the programme and those being undertaken by other programmes within the field of energy. A cooperative effort was established between SAVE and THERMIE in the area of third party financing

(a novel financing mechanism which could be seen either as a technique to accelerate investments in the rational use of energy or as a technique for speeding up the introduction of new technology). This type of action will be expanded in SAVE II always taking into account that the concentration of THERMIE is on gaining market penetration for new energy technologies while SAVE is concerned with the promotion of policy instruments. The SYNERGY programme and the regional and urban energy management programme will now become part of this common third party financing initiative. Other areas of cooperation, such as education and training, demand side management, targeting and monitoring, obviously exist and should be developed during the life of the SAVE II programme.

It should perhaps be mentioned that while the JOULE and THERMIE programmes research, develop and demonstrate energy technology and advance mechanisms to assist the penetration of these technologies in the marketplace, SAVE and SYNERGY are technology neutral (see discussion in paragraph 12). However, all three programme use the same tools to get part of their message across, but address themselves to different audiences. All the above mentioned programmes use conferences, seminars, workshops, brochures and other informational medias. An effort must be made to build into specific events elements of one or more of the programmes mentioned above the theme of energy efficiency. This effort is not as simple as it appears as the audience for THERMIE events is generally drawn from a different areas of the energy efficiency sector than SAVE events.

4.6 General observations

- 25. Energy efficiency can be accomplished in either of two ways: direct investment or behavioural change. Since the modest budget of the SAVE programme precluded it from being a vehicle for accelerating investment through direct subsidy, the main thrust of the programme has been aimed at creating a more positive environment for energy efficiency within the Community. This has been accomplished through administrative measures such as directives and through "capacity building" in the Member States via pilot projects and information activities. The cost of large public promotional exercises was beyond the scope of the programme.
- 26. The PACE programme, which was aimed at the development of policy initiatives aimed at improving the rational use of electricity, was an attempt to influence consumer behaviour directly via information and the development of standards. Because of the synergy between its objectives and the more global objective of the SAVE programme, PACE was incorporated into SAVE. The two programmes have successfully operated together and a range of electricity based directives have been developed in the course of the SAVE programme.
- 27. In the course of the five year SAVE programme it also became obvious that the action for energy management in regions, cities and islands responded to the global objective of SAVE. In effect, improvements in energy efficiency introduce a demand side approach to energy problems which necessitates the development of regional and urban structures which can act close to the final consumer. It is by means of these structures close to the consumer that one can act efficiently in advising consumers about wasting energy, in exploiting local energy sources and in disseminating the most

appropriate energy solutions; This action, like PACE, has a large element of behavioural change which appears synergetic with SAVE. Because of this synergy the former Regional and Urban Energy Management action activities has been incorporated into SAVE. This inclusion will lead to the enrichment of both programmes and the initiatives developed for the SAVE II programme will benefit greatly from this concentration of interest.

The structure of SAVE II

5.1 Introduction

5.

28. The actions outlined below have drawn their inspiration from five sources. First, there is the experience of the Commission in operating the SAVE programme over the past five years. Secondly, there are the conclusions and recommendations of the group of experts who were charged with carrying out an evaluation of the SAVE programme. Thirdly, there are the opinions expressed by the attendance at the SAVE Conference held in Florence. Fourth, there are those initiatives formerly found within the PACE and Regional and Urban Energy Management Programmes which have now been incorporated into SAVE. Finally, there is the evaluation of the national CO₂ abatement programmes which have been developed by the Member States in response to the Council's CO₂ limitation objective.

5.2 Studies and other actions leading to the implementation and completion of Community energy efficiency legislation and performance standards

29. Studies are required to prepare the technical dossiers which are necessary to develop effective energy efficiency standards and legislative activity, if appropriate. A certain amount of on-going work in the area of labelling and equipment standards will be completed under SAVE II. These efforts fall mainly into four areas:

5.2.1 Appliance labelling

30. This relates in particular to continuing initiatives in the area of appliance labelling under framework Directive 92/75/EEC. Several applications directives have already been adopted by the Commission and there is a continuous effort in this area to bring forward additional applications directives for a range of energy using equipment.

5.2.2 Voluntary agreements^(*)

31. Negotiations to establish voluntary agreements relating to improvements in the efficiency of energy end-use are underway with associations representing energy using equipment manufacturers. Such negotiations are, by their nature, of a very technical nature. It is intended under SAVE II to continue investigations on the expected technological improvements and the long term potential for improving the end-use

^(*) Former PACE action.

efficiency in the area of energy using equipment. The work will act as the basis for the Commission's negotiating position with the manufacturers.

5.2.3. International energy end-use efficiency standards

32. The Commission is currently negotiating with the European Community's major trading partners on the establishment of international standards for several classes of energy-using equipment. At the moment the emphasis is on office equipment with large standby power requirements. However, the whole subject of comprehensive international energy end-use efficiency standards needs to be pursued. A series of mandates have already been communicated to CEN/CENELEC regarding the establishment of measurement standards for certain energy using appliances. This effort will be continued under SAVE II.

5.2.4. European Community energy end-use efficiency standards

33. In cases where the approaches outlined above prove to be unproductive, the Commission may consider proposing, through directives, European Community standards indicating maximum energy consumption for specific classes of energy using equipment.

5.2.5. Studies leading to other legislative actions

34. While activity of SAVE II will be concentrated on the items listed above, the Commission will from time to time carry out such studies as it thinks opportune as preparation for future legislative actions in the field on energy efficiency. Such studies may cover the entire spectrum of the improvement of energy management.

5.3 Phot actions through networks

35. The experience on the information programme of SAVE I has demonstrated the effectiveness of particular networks in carrying out the strategic objectives set by the Commission. Networks have several advantages over individual action. First, many of the programmes supported by SAVE I had a dimension far larger than the boundaries of the Member State in which the work was carried out. In some specific cases, the use of Community-wide networks as contractors would therefore appear to be the ideal vehicle to maximize the Community dimension of many of these programmes and to optimize the multiplier effect of the programme projects. Such networks involve large numbers of individuals and organizations and information flows have already been established. SAVE II will assign part of its budget to large cooperative projects managed by relevant existing pan-Community networks. Actions in this area might involve trans-national transportation networks in exploring how best to organize energy efficient transport systems or international architecture associations might be contracted to develop energy efficient solutions for new and existing buildings and disseminate these solutions to all their membership. Networks of energy educators would be stimulated to develop energy management course material based on the latest multi-media technology and to disseminate this material as widely as possible. In the industry sector, industry associations would be stimulated to develop energy management programmes and educational materials specific to their industry

and distribute such materials throughout their industry. Similar pilot actions relating to regions, cities and islands will be promoted. Consumer associations would be used to develop materials promoting better energy behaviour and disseminate them through their network(**). This list could be extended. This is a new activity which endeavours to optimize pilot action dissemination by utilizing existing effective networks.

5.4 Targeted pilot actions

36. By the end of 1995, SAVE I will have supported approximately 250 sectoral pilot actions. The main areas of interest were education and training, integrated resource planning, transport, buildings, cogeneration and monitoring and targeting. While a large amount of information has been gathered there is still scope for pilot initiatives in all these areas. The Commission proposes to continue pilot actions in these sectors but to change the mechanism for supporting individual actions in order to establish a more coordinated approach. A specific topic will be developed, for example how to overcome the barriers to cogeneration or the problems associated with urban transport systems, and a specific call for tender launched. A high degree of international cooperation will be required by tenderers and the results of these targeted actions will be disseminated as widely as possible. Other areas which would be considered as priorities for targeted pilot actions would be electricity end-use and the development and dissemination of novel financing mechanisms such as third party financing. This is a new activity which has been developed from the experience of the SAVE programme and which has been proposed by the team which evaluated that programme.

5.5 Dissemination of information

37. Information to the consumer is an important element in raising the awareness of improved energy consumption behaviour. As with 5.2 above, the network concept seems particularly appropriate to the dissemination of information. The experience of this concept within SAVE I was positive and should be continued and built on. In SAVE I only one pan-Community network was used but it is proposed in SAVE II that, where appropriate, additional existing networks might be responsible for different elements of the information programme and that the Commission, in consultation with the SAVE Committee, will carry out a strategic review with the networks involved to decide on the direction of the programme. This action would be closely coordinated with the results being obtained on all the initiatives developed under the SAVE II programme.

^(**) This was a former PACE activity for end-use in the electricity sector.

5.6 Monitoring of energy efficiency progress at national and EU level

38. A number of important analytical tool have been developed under SAVE I. These include the extension of the MURE II⁽⁷⁾ model to policy actions in the field of energy efficiency, a database on the SAVE I and Member State initiatives and the development of a user friendly method of disaggregating energy intensity information in such a way as to highlight the advances attributable to energy efficiency alone. It is proposed within SAVE II to set up a monitoring activity which will use a common methodology to analyze on a continuous basis the energy efficiency level within the Community and will chart the progress towards the achievement of the energy efficiency objective discussed in chapter 3. above. Member States already have a large amount of data concerning their own energy situation. An annual meeting will be held of Member State experts on the evolution of the energy efficiency indicators and on the efficacy of energy efficiency initiatives.

This will be a joint exercise between the Commission and the Member States. This is a new activity and is directly linked to the development of the appropriate tools under the SAVE programme.

- 5.7 Specific actions in favour of greater cohesion between Member States in the establishment of policies aimed at more efficient energy management
- Despite their best efforts and the best efforts of the SAVE programme there remains **39**. a high level of disparity between the energy management infrastructures of the Member States of the Community and, indeed, between regions. While some Member States began their energy efficiency efforts in the wake of the first oil crisis of 1973 other have scarcely begun their own national programmes. It is therefore important that SAVE II should be used as a vehicle for seeking a greater cohesion between the Member States and regions in the area of the prudent and rational use of energy resources. SAVE II would therefore launch a series of initiatives aimed at those Member States and regions where relatively little has thus far been done in the area of establishing energy use priorities which are more relevant to environmental and economic objectives. This initiative would be limited to Member States and in some cases specific regions of individual Member States whose energy efficiency infrastructures are underdeveloped. The purpose of this action will be to harness the experience of the Member States to create the greatest level of alignment of regional or local capacity. Actions in this area might be:
 - the setting-up of linkages between different Member States or regions of different Member States with a view to the exchange of information;
 - the creation of the necessary databases to allow those responsible for public policy to access information on effective local initiatives;
 - assistance in setting-up regional centres of excellence which will act as focal points for local energy management activities and which will have the expertise to develop regional energy resource solutions.

The MURE model is a predictative model which simulates the effect of different energy efficiency policy actions on both a Member State and European Union level.

This regional energy resource management capacity building is an important consideration in developing effective management solutions to the very different energy supply/demand situations of Member States and regions.

This is a new activity which is linked to the movement within the Community to create greater economic and social cohesion. Energy efficiency creates wealth through the consequent increase in disposable income and has been shown to be an effective regional development tool. This need is not simply philosophical but is very real in the context of the Member States' efforts to achieve the CO₂ objective set by the Council of Ministers.

5.8 Specific action aimed at improving energy management at regional and urban level(***)

The pilot action programme established to improve energy management in the regions 40. and the cities of the Community, and which has been in operation since 1990, has shown the importance of responding as a priority to local energy issues and actively researching local solutions. The programme provides assistance to local authorities in regions, islands and in cities to help them create energy management agencies whose main role will be to implement the regional and local policies for optimum energy use. By this means, the programme contributes to the integration of energy into local plans for sustainable development and contributes to local and regional environmental efforts. This bottom-up approach requires, as a necessity, a proximity with the consumers through very decentralized channels of information, education and advice on energy management. This effort can sometimes be at the level of all consumer classes such as small companies (including SME), public bodies, and even at the level of the citizen who perhaps represents the greatest potential for energy management actions. This point was highlighted in the SAVE I programme which considered actions close to the consumer aimed at changing his energy use pattern to be of paramount importance. SAVE II would not only continue this action by coordinating the activities of SAVE with those of the programme for energy management in the regions and in the cities but would propose to re-inforce this action. Actions in this area would be complementary to those in 5.3, 5.4, 5.5 and 5.7. and shall be focused on the setting up regional and local energy management agencies. They might include flanking supports such as the creation of energy end-use education programmes, setting up of local energy management and information agencies and the carrying out of targeted projects with a high dissemination potential. The focus of this action is on regional and local authorities and is oriented towards altering the energy habits of all classes of consumers. The specific actions which will take place in this sector will be discussed with the SAVE Committee.

^(***) This is the former PERU activity.

5.9 Actions aimed at establishing energy efficiency as a criterion within existing EU strategic programmes

41. The more rational use of energy is a strategic objective which impacts on many aspects of EU life. Chapter 2 at the beginning gave a short exposition of the effect of improving energy efficiency on employment, the environment, regional development and industrial competitiveness. However, the SAVE programme has been established to accomplish only one aim - an improvement in the way we utilize our energy resources. It is therefore important that SAVE link with other Community programmes which have been set up to accomplish specific aims to which improved energy use can contribute. This linkage has already been acknowledged by the Commission who have made strenuous efforts to include energy efficiency and renewable energy projects in the latest ERDF funding exercise. Every effort must be made to ensure that the very considerable investment funds which have been granted by the Community are used in an efficient manner. SAVE, through its capacity building exercises, will complement the investment funds by assisting planners within the Objective 1 regions to optimize the Community contribution towards their development. The SAVE programme must, through cooperation with other Services of the Commission, endeavour to ensure that improving the efficient use of energy resources is permitted to make its full contribution to the aims of the Community's programmes. The first element of this strategy will be a set of comprehensive studies which will examine the role the prudent and efficient management of energy end-use can play in job creation and in regional and local development.

This is a new activity which has evolved as the Community's programmes have evolved. Programmes such as VALOREN (now included within INTERREG) which was funded by the European Development Fund have shown the enormous potential of energy efficiency as an engine for regional development. This very positive experience should be built upon.

6. Financial considerations

- 42. The budget for SAVE II has been set at ECU 150 million for the five-year period. This increase in budget from the earlier SAVE programme is justified for the following reasons:
 - The SAVE II programme will be an integral part of the Union's future CO₂ strategy. In effect, with the failure to agree on a common approach to the CO₂/Energy tax there will be a greater burden on SAVE to produce short-term results in the area of CO₂ reduction. It is well established that efforts in energy efficiency produce the fastest and easiest quantifiable effects on the reduction of CO₂ emissions. Energy efficiency initiatives taken today will produce immediate reduction in energy use with consequent reductions in CO₂ emissions. Other strategic options such as fuel switching, clean energy technologies, new energy technologies or a move to a greater use of renewable energies all have greater lead times than energy efficiency.

Given the relatively short time scale for positive impacts to the year 2000, there is an imperative to construct an effective energy efficiency programme.

- The gains estimated for the SAVE I programme were in very large measure (+/-80%) associated with the legislative programme. These estimated results were derived on the basis of a wholehearted response from the Member States to the proposed Union legislation. The subsidiarity principle leads to an uneven response to Union initiatives and the 1990 estimates for the impact of SAVE I could be viewed as optimistic. On the basis of the experience gained on SAVE I it is intended to reduce the legislative element of the SAVE programme. Therefore, a consequently larger effort in the promotional area will be necessary. Taking the 80% figure above, a five-fold increase in the budget would be required for the same impact in SAVE II as had been hoped for in SAVE I. This would have led to a budget of ECU 170 million for energy efficiency promotion within SAVE activities alone.
- It should also be pointed out that the Programme on Regional and Urban Energy Management (PERU) is being incorporated into SAVE with an estimated budget of ECU 50 million. There is a substantial synergy between the two programmes and the utilization of this synergetic effect will permit significant savings on the total funds required for the PERU and SAVE programmes if they had been adopted individually. PERU actions also have a similar short-term effect and should begin to produce positive results almost immediately.
- The Union has grown from 12 to 15 members since the inception of the SAVE programme. This growth alone would have required a modest increase in the budget to maintain the former (and ostensibly inadequate) SAVE efforts, especially since the Community's expansion towards the north to different climatic zones may necessitate new energy saving actions A certain, though small, increase would have also been justified by inflation.
- SAVE II will be a major (perhaps the major) strategic initiative for the attainment of the Union's CO₂ objective. Because Union legislation in the field of energy efficiency poses major problems in terms of subsidiarity, the future gains in energy efficiency will have to be paid for. Such gain can only be achieved by developing programmes and policies which can effectively change the behaviour of our citizens. This in turn can only be accomplished by the creation of a positive environment for energy efficiency and by using the weight of the Union to create within our Member States the capacity to carry out our energy efficiency initiatives.

The proposed budget for the SAVE II is realistic in that in has been developed with the aim of contributing in a meaningful way to the Union's strategic objective in the area of CO₂ reduction. A lesser would budget inevitably mean a smaller impact and non attainment of a critical level of action.

7. The proposed measure and subsidiarity

- 43. The measure proposed by this communication is presented within the framework of Article 130s of the Treaty establishing the European Community which has as its object:
 - to preserve, to protect and to improve the quality of the environment;
 - to ensure a prudent and rational utilization of natural resources.

The proposal will thus contribute to the attainment of the Council's environmental and energy efficiency objectives.

While the Community does not have an exclusive competence in this area, there is a shared competence with the Member States.

- The proposed programme is a general action programme setting out priority objectives to be attained as defined by the Treaty on European Community⁽⁸⁾.
- 45. The proposed action is complementary to actions being undertaken by Member States and the Community. At their meeting on the 15/16 December 1994, the Council of Environmental Ministers underlined the need for both Member State and Community efforts in the area of CO₂ emissions reduction by stating "the Council invites the Commission to submit to the Council as soon as possible, in due time before the first Conference of the Parties of the World Climate Conference, a set of options in terms of policies to be taken at Community level and by Member States..."(9). Therefore the Council recognized that a concerted effort at both Community and Member State level would be required if the Community's CO₂ objective is to be attained. The transnational nature of CO₂ emissions as well as the possible distortion in competitiveness caused by different and unconnected national measures requires a common approach. The actions proposed by the programme would represent a real added value in that they would contribute to the development of trans-national solutions to energy efficiency bottlenecks, endeavour to build upon the experience of some Member States in developing energy management solutions by transferring this experience to other regions and assist existing networks to create a positive environment for energy management within the EU.
- 46. The actions envisaged under this proposal are economically viable and justified. The added value element of the programme is enhanced in that it will improve the competitiveness of EU industry and increase the purchasing power of energy consumers by exploiting the large energy-saving potential which exists within the industrial, tertiary and building sectors. Since the objective of the programme is to remove the very considerable barriers to energy efficiency, the success of the programme will also provide Member States with a "no-cost" element for the CO₂ abatement strategies.

Treaty on European Union, paragraph 3 of Article 130s.

^{(9) 11870/94, (}Presse 273 - G).

8. Conclusion

- 47. The SAVE programme has been assessed as having a positive effect on the evolution of the efficient use of energy in the EU. There are many important reasons for continuing and expanding this effort including environmental protection, energy policy considerations, employment, regional and local policy and social cohesion. Lessons learned from the SAVE programme indicate a re-orientation of activities towards those action with a high Community dimension and actions aimed at coherence within the Community in energy-efficiency infrastructures.
- 48. The proposal for a SAVE II programme represents a comprehensive approach by the Community to the great environmental and economic potential for further rational use of energy. In order to create this comprehensiveness two existing initiatives (the programme for efficiency end-use in the electricity sector and the programme for the promotion of energy management in the regions, the islands and in local communities) have been included in the SAVE II proposal. The proposal incorporates those elements which have proved successful in SAVE I, augmented by a series of new actions aimed at strengthening the programme and creating a more effective and synergetic approach to the Community's environmental and energy problems.
- 49. The Commission invites the Council and the European Parliament to adopt a decision implementing the SAVE II programme.

Short evaluation of the existing SAVE programme⁽¹⁾

SAVE stands for Specific Actions for Vigorous Energy Efficiency. It was approved by the European Council on October 29, 1991 as one of the three main Union-wide programmes to promote energy efficiency. The other two programmes, THERMIE and JOULE, are technology-oriented, representing the spectrum from research through to demonstration and dissemination of energy technologies, of which energy efficiency is but one of the technologies promoted.

SAVE's role is intended to be complementary to THERMIE and JOULE, i.e. through legislation and "capacity building/infrastructure" activities, to facilitate and promote the implementation of energy efficiency policies and programmes at the EU and MS levels. This framework consists of Union-wide measures and support for national and regional efforts. The SAVE programme consists of three main elements: technical measures, financial measures and measures relating to consumer behaviour. These elements relate to the main areas of legislative initiatives, creating and developing and infrastructure for energy efficiency policies and programmes, and an information network.

The objective of this short evaluation is to provide a basis for the examination of the draft proposal on the renewal of the SAVE programme and is intended to be read in conjunction with the draft prepared by DG XVII.

Overall programme

The debate amongst the Commission, Council and Parliament who approved SAVE caused delays in launching the programme which reduced the momentum for programme effectiveness. Furthermore, the legislative programme suffered difficulties due to the clarification of the principals of subsidiarity leading up to the Maastricht Treaty. Since SAVE was intended to focus on the legislative programme, this had an important impact on both the legislative and the overall shape of SAVE.

Legislative programme

Under the SAVE umbrella, the following legislative measures have been adopted:

- 1. Council Directive 92/42/EEC on "efficiency requirements for new hot-water boilers fired with liquid or gaseous fuels";
- 2. Council Directive 92/75/EEC on "the indication by labelling and standard product information of the consumption of energy and other resources by household appliances";
- 3. Council Directive 93/76/EEC "to limit carbon dioxide emissions by improving energy efficiency (SAVE)";

This evaluation is based on the interim evaluation of the SAVE programme carried out by Eoin Lees, Bernard Laponche and Walter Fissamber.

4. Commission Directive 94/2/EEC implementing Council Directive 92/75/EEC "with regard to energy labelling of domestic electric refrigerators, freezers and their combinations".

The Directive on hot-water boilers has been successful (nevertheless it must be noted that five Member States have not yet implemented it at national level and are late according to the Council Decision timetable). The implementation of this Directive resulted in a considerable reduction of energy consumption. A study for the European Union estimates a primary energy saving of about 11.2 mtoe a year by 2010 when the Directive will be fully effective. With the EU's current fuel mix, this would imply a carbon dioxide savings of approximately 7 Mt C/annum. This does not mean that any future adoption of Community legislation on the principle of minimum standards will be welcomed by all Member States, and other competent bodies.

The CO₂ Directive is not as powerful as most other Community Directives, because it does not require Member States to adopt any legislative measures but they must undertake specified measures. However, this rather "light" measure has already led to the adoption of a range of energy efficiency related legislation in some Member States. However, studies carried out in the course of 1990-1992 suggest that if the Directive is fully applied by the Member States, savings of 17 MT of CO₂ could be made for the building sector measures (3 MT for building certification, 3 MT for heat billing, 5 MT for third-party financing and 6 MT for insulation), 16 MT CO₂ for the energy certification element and 20 MT CO₂ for the inspection of boilers element.

The Directive on labelling of household appliances provides for the implementation of this regulation in seven categories of appliances. However, only one of them has been covered so far, by the Commission Directive on refrigerators and freezers. In general, both Directives have been welcomed by the interested parties, despite initial reservations by some manufacturers on the initial cost implications for consumers and from some Member States on the effectiveness of labelling on its own to influence the consumer. There will be further Commission Directives on washing machines and dryers and other appliances.

The Directive regarding energy labelling of domestic electric refrigerators, freezers and their combinations is important as it provides a standardized measuring system for each appliance under consideration. There is empirical evidence emerging that it has contributed significantly to improving the energy efficiency of appliances in general. The EU labelling system has been adopted by four Central and Eastern European countries.

It should be noted that while some Member States are pleased to date with the progress on the directives, other countries want to go further and faster than the current pace. It is intended that future measures will concentrate on specific technologies and appliances that are traded goods in the European Union. Most Member States appear to be keen to pursue energy labelling directives although there is no agreement on establishing minimum performance standards for appliances.

Towards the end of 1994, the Commission adopted a draft directive on performance standards for refrigerators and freezers which should help to eliminate low-efficiency appliances from the market.

Creating and extending infrastructure

A crucial aspect of the SAVE programme is to provide various support projects, partly funded by SAVE, aimed at strengthening Member States' energy efficiency structures. This "capacity building" includes a wide range of activities including training, education, developing expertise and methods and policy tools, and establishing networks and/or organizations to undertake both policy analysis and deliver local programmes. This capacity building can occur at the national, regional or local levels.

Based on a sample of projects, most of the projects funded by the SAVE programme would not have gone ahead without SAVE funding. Furthermore, there appears to be a value added by the SAVE support which ranged from countries where it was essential for the development of the national programmes through to raising the profile because of SAVE participation, helping secure other sponsors and even reassuring senior management within companies.

Similarly, the projects improved EU cohesion and many of the later projects in particular have a distinct "European added value." A vital element of the pilot projects are the "contractors meetings" which bring together contractors having projects in a specific sector, such as buildings or transport, to report on the progress of their work to their peers.

There is an important need to develop experience in "tools" that are non-technical (training, education, financial, M&T, etc.) and the pilot projects and general studies funded by SAVE are an important way of developing such expertise.

All countries have participated within the pilot projects with a general bias towards those countries which have less national infrastructure than average. Table 1 shows the breakdown of the 1991-94 projects by theme.

Table 1
Pilot Projects by Theme

Areas	1991	1992	1993	1994	Total	Share of Total (%)
A: Education, information, training	0	25	22	10	5 7	28
B: Least-cost planning, DSM	16	1	19	13	49	24
C: Third-party financing	0	1	2	3	6	3
D: Monitoring and targeting	0	7	1	4	12	6
E: Cogeneration	0	8	3	1	12	6
F: Transport	0	0	11	5	16	8
G:Energy management, audits, savings	0	10	16	23	49	24
H: Market research	0	1	0	1	2	1
TOTAL	16	53	74	60	203	100

Clearly, it is important to establish that all Member States have participated and benefited from the SAVE programme. However, since one of the original intentions of the Commission and SAVE is to improve the infrastructures of all Member States, but in particular those with less mature programmes, the distribution of projects and funding is important.

Table 2 shows the distribution between the 12 Member States of the European Union of the pilot projects financed by SAVE for the four years 1991, 1992, 1993 and 1994. The number of projects by country varies between 12 and 24, with two extreme cases: 34 projects for the United Kingdom and only one for Luxembourg, the first year (1991).

Table 2

The SAVE Pilot Projects
(1991-1994)

Countries	1991*	1992	1993	1994	TOTAL	SHARE OF TOTAL (%)
BELGIUM	1	6	5	4	16	8
DENMARK	1	4	5	3	13	6
FRANCE	2	4	10	6	22	11
GERMANY	3	3	6	10	22	11
GREECE	1	4	7	7	19	9
IRELAND	1	5	3	3	12	6
ITALY	0	3	5	4	12	6
LUXEMBOURG	1	0	0	0	1	0
NETHERLANDS	1	4	6	4	15	7
PORTUGAL	1	3	5	5	14	7
Spain	2	6	10	5	23	11
UK	2	. 11	12	9	34	17
TOTAL	16	53	74	60	203	100

^{*} all 1991 projects are least-cost planning (LCP) studies.

To date, SAVE has provided ECU 20.982 million to fund the pilot projects.

Information Activities

One of the major elements of the SAVE programme is to foster the creation of an information network. In view of the limited manpower resources available to the SAVE team within DG XVII, it was decided to utilize EnR, an existing network of national energy agencies, to carry out the information programme.

The cost effectiveness of this approach and the commitment from Member States through ensuring that co-funding between the SAVE programme and Member States in producing publications and events has led to a successful cooperation. However, there is substantial scope to leverage the funds which have already been expended by SAVE by ensuring a more effective and widespread dissemination of the information obtained from the pilot project activity.

The strong links between the ENR members and the Member States at the programme level has been a very positive aspect; however, this has not removed the complaints from Member States of insufficient feed-back on projects that have been initiated.

It has now been decided to incorporate information on all SAVE activities into the CORDIS database and this activity should be completed by July 1995. This will ensure that detailed data on all SAVE projects will be available to the 14 000 subscribers currently connected to the database. Those interested in obtaining further information on specific projects will find the name and address of the project coordinator in the database and will be able to contact him directly with their queries.

Conclusion

The SAVE programme has contributed to the Union's strategic objectives by:

- enacting energy efficiency legislation which will contribute to the Union's CO₂ reduction strategy;
- assisting Member States in establishing programmes aimed at building an "energy efficiency capacity" nationally, regionally and locally,
- developing methodological tools which will assist energy efficiency professionals in setting up cost effective and efficient programmes;
- assisting Member States to implement SAVE Directives;
- setting up linkages between contractors on various energy efficiency "themes" with a view to creating synergy between individual projects;
- promoting a Union-wide energy efficiency information activity which has disseminated the SAVE "message" through publications, seminars, workshops and conferences.

A SAVE conference was held in Florence in October 1994 which was attended by some 300 delegates who, in large measure, endorsed the conclusions above.

With a very modest budget, the SAVE programme has succeeded in establishing itself as a credible vehicle for the promotion of energy efficiency both within the Union and on the world stage.

Evaluation of the action for energy programming in the regions, towns and islands of the European Union (PERU) over the period 1989 - 1993

This action was implemented without a legal basis. It had therefore neither legal constraint nor prescribed methods to evaluate its implementation. DG XVII took the initiative to engage three independent experts to draw up a report on the evaluation. Mr Walter Fissamber, Mr Bernard Laponche and Mr Gordon MacKerron submitted their evaluation report in June 1993. The text which follows is a synthesis of their report of 43 pages.

On the whole, the guidelines and the priorities outlined in the first Communication (COM(91) 53) and shared by the Council, were observed substantially during the period under consideration. Thus, on the basis, the scope and the contents of the programme were widened in the following manner:

- emphasis on the environmental questions, particularly in the urban studies of energy programming;
- close attention to studies concerning the islands;
- an growing interest in the problems of development of the rural areas;
- emphasis on cooperative studies; cross-border and inter-regional, in particular;
- more accent on concrete action plans:
- by supporting the creation of local teams which had as their aim the drawing-up and implementing of programmes at local level, particularly in the rural and isolated areas, which in general do not have the institutional capacities and the human resources to deal with their energy problems.
- Moreover, very strong priority was granted to the support of actions aiming to encourage cooperation among the regions and cities of the various Member States with a view to disseminating and better implementing the results obtained and thus to increase their impact:
 - three cooperative networks (FEDARENE (regions), ENERGY-CITIES (cities) and ISLENET (islands)) which assist the dissemination of results in the field of energy were created and started to function:
 - two workshops were organized to present the results obtained by the contractors benefiting from financial support which enabled them to exchange their experience;
 - two guides were prepared and disseminated widely with the cooperation of FEDARENE; they were addressed to the decision-makers at national, regional and local levels. One covered energy programming and the other on the creation of regional energy agencies;

- a broad distribution of the results of the various studies financed by the European Union was carried out with the cooperation of the OPET network under the THERMIE programme;
- the publication and the broad distribution of "map-brochures" summarizing the results of the activities financed by the European Union of energy programming were carried out;
- a conference was organized on the topic "Regions and Energy" in Milan, in July 1993. During the conference, the importance of energy programming at regional and urban level was discussed in the broader context of the continuing development of the regions and of economic and social cohesion; the occasion also was favourable to a broader distribution of the results.

Questionnaires were sent directly to the recipients of this action on the conclusion of their energy programming project. On the whole, the importance of the role the action of the European Union in this field was confirmed and was stressed. The results of this evaluation are summarized below:

- (a) inter-regional cooperation, although increased appreciably, remains still rather too limited; this is due to the substantial cost of such cooperation, particularly when there are linguistic barriers and long geographical distances; similarly, the institutional differences between Member States (various levels of responsibilities at sub-national level) hardly facilitate alignments;
- (b) certain methodological inadequacies and omissions were identified in the energy concepts. The approach followed did not always allow an integrated overall analysis of the questions of environmental and energy development.
 - A too narrow approach, although interesting, was sometimes followed focusing on the situation in one particular sector such as transport, buildings;
- (c) in general, the feasibility studies carried out stressed the engineering aspects rather than the economic and financial aspects. Certain studies paid only scant attention to the economic profitability of the proposed solutions. Nevertheless, the completed studies were of rather high technical quality. Moreover, the relative gaps in this field were due to a lack of targeting and to the lack of setting priorities which consequently limited the effectiveness of these studies whether at the level of the European Union (for dissemination) and at national and regional levels (for the implementation);
- (d) the effective implementation of the conclusions of the energy programming studies increased, although slowly. This slowness is mainly explained by:
 - the lack of financial resources at regional and local level, particularly at a time of competing needs;
 - the absence of institutionalized responsibilities in the field of energy at these levels;

- the insufficiency of human resources having the technical capabilities to act in the fields of energy, particularly in the rural and isolated areas and in the regions, the islands and the cities of the less developed areas of the European Union;
- the three experience sharing networks FEDARENE, ENERGY-CITIES, ISLENET although recently established with the support of the Commission (in particular financial support), showed their relevance and have to continue promoting experience sharing and later cooperation. That proved particularly beneficial in the regions, the least-developed cities and the islands of the European Union where the experience often is lacking or is only slightly developed in the essential aspects of the management of energy;
- (f) the interface with other energy programmes of the European Union, to a large extent, was made. Energy programming is indeed upstream from a series of energy programmes.

In particular:

- it provided valuable information and thus identified the suitable fields for a targeted and concrete action under the SAVE and THERMIE programmes;
- it often helped the preparation of national operational framework programmes supported by the European Union, and of initiatives of the European Union (for example, VALOREN, REGEN, INTERREG) functioning within the framework of the structural Funds;
- it provided an important quantity of information and of useful examples in energy and in environmental management to the outside world, particularly in Central and Eastern Europe and the Confederation of Independent States, as well as to the countries of the Mediterranean circumference, by means of the suitable programmes of the European Union (for example, the twinning of the cities-HEADLIGHT, the programme of energy cooperation). Moreover, through the active participation of cities in this field and of the cooperation networks (FEDARENE, ENERGIE-CITIES), it promoted experience between the Union and other international organizations such as the OECD.

In conclusion, one can say that the action of the European Union - while being a catalyst - has been a success in the promotion of better management of the energy which led to positive results in the regions or in the cities concerned. This was achieved by:

- (a) The mobilization of a large number of human and financial resources in the field of energy and of public environmental management as a whole.
 - Management and the direction of a study of energy programming involve a broad variety of interested parties such as regional and local authorities, energy supply companies, consumer's organizations, environmental pressure groups, research institutions and design offices. Moreover, on average, for each ECU spent by the European Union, at least ECU 2.5 were contributed by the public and private sector in the region or the city concerned.

- (b) This action launching resulted in more effective use of energy and in the improvement of the environment. Certain indicative figures based on a sample of completed studies of energy programming are as follows:
 - energy efficiency: ECU 1 spent by the European Union on energy programming would encourage energy saving of approximately 0.54 TOE, and oil substitution (by natural gas or renewable energy) of 0.3 TOE;
 - environmental improvement: ECU 1 spent by the European Union on energy programming would have allowed the prevention of the emissions from 1.2 t of CO₂, from 50 kg of SO₂ and from 15 kg of NOx.
- (c) Contribution to local development: ECU 1 spent by the European Union in energy programming would encourage investments of ECU 300 while ECU 160 spent in energy programming would lead to the creation of one permanent employment.
- (d) Rationalization of the authorities' regional and local finance, for example, energy saving in the public buildings.

Proposal for a COUNCIL DECISION

concerning a multi-annual programme for the promotion of energy efficiency in the Community - SAVE II

THE COUNCIL OF THE EUROPEAN UNION,

Having regard to the Treaty establishing the European Union, and in particular Article 130s(1) thereof,

Having regard to the proposal from the Commission⁽¹⁾,

In cooperation with the European Parliament⁽²⁾,

Having regard to the opinion of the Economic and Social Committee⁽³⁾,

Having regard to the opinion of the Committee of the Regions⁽⁴⁾,

Whereas Article 130r of the Treaty states that one objective of the action of the Community relating to the environment shall be to ensure a prudent and rational utilization of natural resources;

Whereas the Council of Environment and Energy Ministers at their meeting on 29 October 1990 set an objective of the stabilizing total CO₂ emissions by the year 2000 at the 1990 level in the Community as a whole;

Whereas Council Decision 93/389/EEC⁽⁵⁾ established a monitoring mechanism for CO₂ emissions and other greenhouse gases;

Whereas nonetheless, despite efforts made, the CO₂ emissions in the Community generated by energy consumption are expected to increase by 5 to 8% between 1995 and 2000, assuming normal economical growth;

Whereas the Commission in its communication of 8 February 1990 on energy and the environment highlighted energy efficiency as the cornerstone of future efforts to reduce the negative impact of energy on the environment;

Whereas the improvement in the management of energy will have a positive effect on the environment, the security of energy supply and sustainable development;

<sup>(1)
(2)
(3)
(4)
(5)</sup> OJ No L 167, 9.7.1993, p. 31.

Whereas the Commission has communicated to the Council by means of the Green Paper of 11 January 1995 its views on the future of energy policy in the Community, and the role of energy-saving and energy efficiency measures,

Whereas Article 130a of the Treaty provides that the Community should develop and pursue its actions leading to the strengthening of its economic and social cohesion, and that it should, in particular, reduce disparities between the various regions and the backwardness of the least-favoured regions; whereas energy should be integrated into that effort;

Whereas by Council Decision 91/565/EEC⁽⁶⁾ a Community energy efficiency programme (SAVE), aimed at strengthening energy efficiency infrastructures within the Community, was adopted; whereas that programme will expire on 31 December 1995;

Whereas the Community recognized the SAVE programme as an important element of the Community's CO₂ reduction strategy; whereas the communication of the Commission of 8 May 1991 on the European Community's energy programming activities at regional level, the conclusion of the Energy Council on this communication, and the Resolution of the European Parliament of 16 July 1993⁽⁷⁾ stated that those actions should be pursued, amplified and utilized as a support to the energy strategy of the Community; whereas this initiative for regional actions should now be totally incorporated into a new SAVE II programme;

Whereas by Decision No 1110/94/EC of the European Parliament and of the Council⁽⁸⁾ a Fourth Framework Programme for actions in technological research, development and demonstration was established; whereas energy efficiency policy constitutes an important instrument for the use and promotion of the new energy technologies that the Framework Programme will establish; and whereas the SAVE II programme represents a policy instrument which complements this programme,

Whereas the Council of Environment Ministers at their meeting of 15 and 16 December 1994 stated that the target of stabilizing CO₂ emissions can only be achieved by a coordinated package of measures to improve energy efficiency and the rational use of energy which are based on supply and demand at all levels of energy production, conversion, transport and consumption and to exploit renewable energies, and that a local energy management programme could be one of these measures;

Whereas improved energy efficiency will have a positive impact on both the environment and the security of energy supplies which are global in nature; whereas a high level of international cooperation is desirable to produce the most positive results;

Whereas all the elements of the Community action programme for improving the efficiency of electricity use set out in Council Decision 89/364/EEC⁽⁹⁾ should be incorporated into the SAVE II programme; whereas therefore that Decision should be repealed,

⁽⁶⁾ OJ No L 307, 8.11.1991, p. 34.

⁽⁷⁾ OJ No C 255, 20.9.1993, p. 252.

⁽⁸⁾ OJ No L 126, 18.5.1994, p. 1.

⁽⁹⁾ OJ No L 157, 9.6.1989, pp. 32-34.

Whereas between 180 and 200 MT of CO₂ emissions could be avoided by the year 2000 by an improvement of 5% in the energy intensity of final demand additional to the conventional expectations;

Whereas a strengthened SAVE II programme is an important and necessary instrument for promoting increased energy efficiency;

Whereas it is politically desirable to open the SAVE II programme to the associated Central and Eastern European Countries (CEECs) in accordance with the conclusions of the European Council meeting in Copenhagen in June 1994, and as outlined on the Commission communication to the Council on the subject in May 1994;

Whereas, since the budget for the SAVE II programme is reserved only for participants from the Member States, the appropriations required for the participation of the associated CEECs in the programme will be made available from other Community resources,

HAS ADOPTED THIS DECISION:

Article 1

- The Community shall support a five-year programme of measures and actions in order to
 promote energy efficiency within the Community. The general overall objectives of this
 programme are to stimulate energy efficiency measures and increased levels of investment
 for energy saving, and to contribute to improving the energy intensity of final demand
 by a further percentage point per annum over that which would have been otherwise
 attained.
- 2. Community financing will be given under the "SAVE II programme to promote energy efficiency in the Community" hereafter referred to as "the programme", for actions which fall within the objectives of this Decision.

Article 2

Under the programme, the following categories of actions and measures on energy efficiency policy shall be financed:

- (a) studies and other actions leading to the implementation and completion of Community legislation and performance standards governing energy efficiency;
- (b) sectoral pilot actions aimed at accelerating energy efficiency investment and/or improving consumer energy use patterns, to be carried out essentially by Community-wide networks;
- (c) targeted sectoral pilot actions aimed at accelerating energy efficiency investment and improving consumer energy use patterns, to be carried out essentially by public and private enterprises;

- (d) measures proposed by the Commission to foster the exchange of experience, mainly through information networks, aimed at promoting better coordination between Community, international, national, regional and local activities through the establishment of appropriate means for exchanging information,
- (e) measures proposed otherwise than by the Commission to foster the exchange of experience, mainly through information networks, aimed at promoting better coordination between Community, international, national, regional and local activities through the establishment of appropriate means for exchanging information;
- (f) an action relating to the detailed sectoral monitoring of energy efficiency progress in the Community, in individual Member States and including the programme itself;
- (g) specific actions in favour of greater cohesion between Member States and regions in the field of energy efficiency through support for the creation of energy efficiency infrastructures in those Member States and regions where energy efficiency policies are not yet sufficiently developed;
- (h) specific actions in favour of energy management at the regional and urban level;
- (i) studies and other actions in support of energy efficiency initiatives, within other programmes, with a view to establishing energy efficiency as a criterion within Community strategic programmes;
- (j) evaluation and monitoring of the actions and measures undertaken under points (a) to (i).

Article 3

- 1. All the costs relating to the actions and measures referred to in Article 2(a), (d), (f), (i) and (j) shall be borne by the budget of the Community.
- 2. The level of funding for the actions and measures referred to in Article 2(b), (c), (e), (g) and (h) shall be set at a maximum of 50% of their total cost.
- 3. The balance of the funding of the actions and measures referred to in Article 2(b), (c), (e), (g) and (h) may be made up from either public or private sources or from a combination of the two.

Article 4

- 1. The Commission will be responsible for the financial execution and implementation of the programme at Community level.
- 2. The conditions and guidelines to be applied for the support of all actions and measures referred to in Article 2 shall be defined each year in accordance with cost effectiveness criteria, the list of priorities referred to in the second paragraph of Article 6, the trends in energy efficiency identified by the action described in Article 2(f) and according to the procedure laid down in Article 5.

Article 5

The Commission shall be assisted by a committee of an advisory character composed of the representatives of the Member States and chaired by the representative of the Commission.

The representative of the Commission shall submit to the committee a draft of the measures to be taken. The committee shall deliver its opinion on the draft within a time-limit which the chairman may lay down according to the urgency of the matter, if necessary by taking a vote.

The opinion shall be recorded in the minutes, in addition, each Member State shall have the right to have its position recorded in the minutes.

The Commission shall take the utmost account of the opinion delivered by the committee. It shall inform the committee of the manner in which its opinion has been taken into account.

Article 6

The Member States shall report to the Commission annually on national energy efficiency programmes with a view to assisting the Commission in formulating appropriate flanking measures.

The Commission shall formulate on an annual basis a list of priorities for funding under the programme which shall reflect an examination of the reports submitted under the first paragraph. This list shall take into account the complementarity between SAVE II programme and the national programmes. Priority shall be given to those areas where such complementarity is greatest.

Article 7

- 1. After the third year of the programme, the Commission shall present a report to the European Parliament and to the Council on the energy efficiency measures undertaken at Community and Member State level and on the results achieved, with particular reference to the objective outlined under Article 1. The report shall be accompanied by proposals for any amendments which may be necessary to the programme in the light of these results.
- 2. On expiry of the programme, the Commission shall make an overall assessment of the results obtained through the application of this Decision, and of the consistency of national and Community actions. It shall present a report thereon to the European Parliament, the Council, the Economic and Social Committee and the Committee of the Regions, stating, in particular, how far the objective outlined under Article 1 has been achieved.

Article 8

Decision 89/364/EEC is hereby repealed.

Article 9

The programme shall be open to the associated Central and Eastern European countries (CEECs) in accordance with the conditions contained in the additional protocols to the association agreements concerning their participation in Community programmes.

Article 10

This Decision shall apply from 1 January 1996 to 31 December 2000.

Article 11

This Decision is addressed to the Member States.

Done at Brussels,

For the Council The President

FINANCIAL STATEMENT

1. TITLE OF THE ACTION

SAVE II - A renewed effort for greater energy efficiency in the European Union.

2. BUDGET HEADING CONCERNED

B4.1031

3. LEGAL BASIS

Council Decision 91/565/EEC of 29 October 1991 (OJ No L 307 of 8 November 1991, p. 34). SAVE I programme.

Council Decision 89/364/EEC of 5 June 1989 (OJ No L 157 of 9 June 1989, p. 32). PACE programme.

The attached proposal for a Council Decision.

4. DESCRIPTION OF THE ACTION

4.1. General objective of the action

The general objective of the action consists of strengthening the initiatives with respect to energy efficiency of the Member States so as to achieve a final energy saving of 60-70 Mtoe/year by the year 2000. This corresponds to a reduction of 6-7% of the energy consumption and would lead to a reduction in CO₂ emissions of more than 6% by the year 2000. In the absence of the adoption on a EU level of the Commission's Energy/Carbon Tax, the SAVE programme remains one of the only Community instruments still likely to make a significant contribution to the reduction of the emissions from CO₂ by 2000. This contribution will depend directly on the vigour with which this programme is implemented. Since it appears that the regulatory initiatives within the SAVE II programme will be limited, it will be advisable to strengthen the other types of actions of the programme. For these reasons, and taking into account the increase in the number of the Member States, it appears necessary to obtain a significantly larger budget in order to achieve the objectives of the programme.

The carrying out of the SAVE I programme highlighted the fact that more actions were carried out near the consumer the more effective they were. It was thus decided to incorporate the regional and urban energy programme (PERU) into the SAVE II programme.

4.2. Period covered by the action and methods planned for its renewal

The action lasts five years, from 1 January 1996 to 31 December 2000.

5. CLASSIFICATION OF EXPENDITURE/INCOME

DNO/CD

6. TYPE OF EXPENDITURE/INCOME

The programme will be composed of nine types of actions:

- (a) studies and other actions leading to the adoption of legislation and of performance standards of energy efficiency in the Union;
- (b) sectoral pilot actions aiming to accelerate investment in energy efficiency and/or to improve the behaviour of the energy consumers, such actions to be carried out primarily by networks of specialized organizations within the Union,
- (c) targeted pilot actions aiming at accelerating investment in energy efficiency and/or to improve the behaviour of the energy consumers; such actions to be carried out primarily by private public or enterprises;
- (d) measures proposed by the Commission on the one hand (d1) and by third parties on the other hand (d2) to stimulate experience sharing by means of information networks aiming to promote better coordination between the activities undertaken on a level with the Union, as well as at international, national, regional and local levels through the establishment of suitable means of exchange of information;
- (e) actions concerning the monitoring of the progress of energy efficiency in the European Union and in the various Member States, using the analytical tools partially developed by SAVE;
- (f) specific actions for greater cohesion in the Member States and the regions in the field of energy efficiency; support for the creation of energy efficiency infrastructures in the Member States whose energy efficiency policies are not yet sufficiently developed;
- (g) specific actions for the energy management at regional and urban level;
- (h) studies and other actions aiming at the use of energy efficiency in the strategic programmes of the EU;
- (i) evaluation and control of the actions undertaken under the terms of (a), (b), (c), (d), (e), (f), (g) and (h).

Subsidies at 100% for the expenses relating to the actions described in paragraphs (a), (d1), (e), (h) and (i).

Subsidies for the co-financing of between 30% to 50% of the total cost, the remainder to be borne by the Member States or by private companies, described in paragraphs (b), (c), (d2), (f) and (g).

The actions selected will enter under a multiannual indicative programme with annual fixing of priorities and of the action plans.

Programmes will be submitted for the opinion of an advisory committee made up of representatives of the Member States.

Any financing will be the subject of a contract between the Commission and the person responsible or the coordinator of the financed action.

7. FINANCIAL CONSEQUENCE

7.1. The amount will be fixed annually by the budgetary Authority.

The proposed sum amounts to ECU 150 000 000 for the duration of the programme.

7.2. Breakdown by elements of the action

in ECU million

	Ventilation	1996	1997	1998	1999	2000	Total
(a)	Legislation and standards of performance	· 0.900	2.000	1.000	3 000	3.100	10.000
(b)	Specific actions through networks	0.500	2.500	4.000	8 000	10.000	25.000
(c)	Specific targeted actions	2.500	3.000	1.500	5.500	7.500	20.000
(d)	Dissemination of information through networks	1.600	2.000	2.000	4.200	5.200	15.000
(e)	Control of progress on energy efficiency at EU and Member States level	0.500	0.500	1.000	1.500	1.500	5.000
(f)	Specific action for greater cohesion of the Member States in energy efficiency	0.500	2.500	3.000	6.500	7.500	20.000
(g)	Specific actions aiming to improve the management of energy on the regions, the cities and the islands	4.000	8.000	8.000	15.000	15.000	50.000
(h)	Actions aiming at the use of energy efficiency in the strategic programmes of the EU	0.200	0.200	0.200	0.700	0.700	2.000
(i)	Evaluation and programme monitoring	0.300	0.300	0.300	1.100	1.000	3.000
TOTAL		11.000	21.000	21.000	45.500	51.500	150.000

8. ANTI-FRAUD MEASURES FORESEEN (AND THE RESULT OF THEIR OPERATION)

The contracts undertaken are paid on the basis of real expenditure (except for study expenses which are flat-rate and paid on the basis of the accepted results). The larger share of the costs associated with the SAVE projects are not associated with investments, therefore in most cases expenses are paid on the basis of the accepted results.

9. ELEMENTS OF COST-EFFECTIVENESS ANALYSIS

9.1. Specific objectives of the action to be taken under SAVE II

Reinforce the energy efficiency activities of the Member States so as to obtain a reduction of the final consumption of energy of the European Union of about 60-70 Mtoe by the year 2000 and to contribute to the achievement of the Community aim of reducing CO₂ emissions.

Concerning the performance indicators, given that there is a major difficulty in establishing performance criteria for a policy programme, we have attempted this in section 9.3. (the number of measures proposed, accepted and translated into national measures, the number of man-days/year for the training activity, the number of software tools and databases put at public disposal, the number of conferences, seminars, newsletters and other publications).

Population concerned by the action

Regional, urban and national agencies and for the promotion of energy efficiency; all the sectors engaged in the promotion of energy efficiency, (for example, manufacturers of domestic appliances, heating fitters, etc.) and by extension, the whole of the population of the European Union.

9.2. Justification of the action

Costs

To achieve a permanent annual energy saving of 1 tonne of oil equivalent (TOE), ECU 1 000 must on average be invested. The aim of saving 60-70 mtoe/year corresponds to investment of about ECU 60-70 billion. Financing of such a volume from the budgets of the European Union and from the Member States is excluded. The only possibility is independent financing by all the economic operators acting in a Community framework. The Commission intervenes by co-financing only for those actions where the additionality is demonstrated objectively.

Derived effects

The projects supported by SAVE correspond to the following criteria:

- to contribute significantly to environmental protection and to the control of the greenhouse effect;
- to exert a stabilizing effect on the energy prices at world level;
- to improve the balance of payments of the European Union,
- to strengthen the competitive position of European industry on the world market;
- to improve the security of supply of the European Union and reduces its vulnerability at the time of disturbances in the energy market;
- to strengthen the completion of the internal market and economic and social cohesion.

Moreover, the availability of technologies with high energy efficiency encourages technological transfer towards third countries and thus contributes to a better management of resources and to better environmental protection on a world level.

Legislative action and standardization produce the highest multiplier effect. It is also high in the case of energy efficiency standards. In the case of the other part-financed actions, the multiplying factor is at least 2 or 3.

The Commission, for the evaluation and the establishment of the criteria of selection of the projects, is assisted by a Consultative Committee of the representatives of the Member States and national experts.

9.3. Follow-up and evaluation of the action

Selected performance indicators:

Global indicators:

the reduction of CO₂ emissions; the improvement of the energy-intensiveness of the Community.

Specific indicators:

the number of measures proposed, accepted and translated into national measures; the number of man-days/year for the training activity; the number of software tools and of databases put at the disposal of the public; the number of conferences, seminars, newsletter and other publications.

Methods and periodicity of the evaluation envisaged

The Commission continuously assesses the development of the energy intensiveness in the Member States and submits a report periodically to the Council.

In addition, the Commission will make continuous reports to the SAVE Consultative Committee which is made up of representatives of the Member States and which meets three to four times a year.

The Commission engaged a team of independent consultants to carry out an evaluation. This report will be forwarded to the Council and to the European Parliament, in accordance with Article 7 of the Council Decision of 29 October 1991 (91/565/EEC).

The evaluation also examined:

the former and current directions of the programme with a view to establishing the potential for improvement;

the relations between the committed expenditure and the results obtained; effective and potential complementarities between these programmes and the other existing Union instruments.

The new SAVE II programme comprises a large number of the recommendations proposed by the group of experts which evaluated the SAVE I programme The proposals of the experts on the use of networks, the priority actions and the suggestions for the management of the programme have been included.

10. ADMINISTRATIVE INCIDENCE

The effective mobilization of the necessary administrative resources will result from the annual Commission Decision pertaining to the allocation of resources, taking account in particular manpower and the additional amounts which will have been granted by the Budgetary Authority.

10.1 Effect on the number of posts

Types of po	st	Manpower to be assigned to the management of the action		of which		duration
		Permanent posts	Temporary posts	by the use of the existing resources within the DG or within the service concerned by recourse to additional resources		
Officials or temporary staff	A B C	11.5 3 6		7.5 1 3	4 2 3	5 years
Other resources			5 experts extra muros		•	

Impact report on the SMES and employment

1. Administrative obligations arising from the application of legislation for the companies:

There will be an application procedure to obtain financial support.

2. Advantages for companies

YES

- (i) The dissemination of the energy efficiency experience developed by the companies, bodies and the administrations of the Member States leads to a reduction in production costs and a consequent increase in industrial competitiveness.
- (ii) Additional support to the initiatives which have been developed by the research, development and demonstration programmes of the European Union and by the national programmes of the Member States.
- (iii) Strongest international cooperation with the third countries, in particular with CEECs/CIS.

Whereas energy efficiency requires bright ideas requiring limited financial resources SMEs benefit additionally (virtually all contractors)

Effects on employment:

Positive, owing to the creation of the energy efficiency infrastructures which can be regarded as ecological industry and consequently a job generator.

Improved use of energy leads to more competitiveness and gives a company a better chance it has of maintaining or increasing its employment.

Was there a preliminary cooperation with the social partners?

NO

6. Is there a less restrictive alternative approach?

A recommendation without financial support, at a period when the level of the prices does not constitute an incentive for a more rational use of energy, would not lead to actions which would benefit SMES and new investments. To leave the establishment of initiatives to industry would only handicap the SMES or would have lead to a lack of action.

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DOCUMENTS

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