1. Basic Information
1.1. Desiree Number: PL01.01.08 Twinning number: PL/IB/2001/EY/01
1.2. Title: Energy market regulation
1.3. Sector: Energy
1.4. Location: Poland

2. Objectives
2.1. Wider Objective(s):
Improvement of the economic efficiency of Polish energy sector and improvement of energy supply security through full application of the common EU rules of the internal markets of electricity and gas and through adaptation of liquid fuels stocks system to the EU requirements

2.2. Immediate Objectives:
2.2.1. Defining of the necessary scope of the harmonisation of legal and institutional regulations with EU standards in the area of electricity and gas markets and improvement of Poland’s energy security.

of the existing regulations and consequently the advise concerning the improvement of the regulations in which any weaknesses have been recognised.

2.2.2. Improvement of Poland’s energy security through increase of oil stocks and improvement of legal instruments defining the principles of stocks management.

The quantities of oil stocks and the legal instruments of stock management are in Poland far behind the EU requirements. It is necessary to construct the new stocking capacities, to increase the stocks themselves, to introduce the legal acts defining the methods of stock management and to create the institution of crisis management (so-called NESO in IEA terminology). In this way the requirements of Council Directive No 68/414, as amended by the Directive No 98/93, would be satisfied. The assistance of EU experts on various systems of oil stocks management in Member States would be of great value to the Polish Government.

2.2.3. Growth of competition and liberalisation of electricity and gas markets.

The principles of Polish Energy Law and the practice how the President of the Energy Regulatory Authority regulates the electricity and gas markets, are to the large extent coherent with requirements of the European Union. For the various however reasons, institutional and economic, the practical growth of competition at these markets lags behind the legal possibilities. The reasons which may be mentioned are: the large legacy of long-term contracts in the power sector and the early phase of the company restructurisation in the gas industry. In this situation the EU assistance directed at the growth of competition and markets liberalisation would be advantageous, with the aim to implement fully in Poland the Directives No 96/92 („electric”) and No 98/30 („gas”).

2.3. Accession Partnership and NPAA priority:

The project is compatible with NPAA 2000 and meets requirements of its following Priorities: Priority 14.1: Preparation for participation in common electricity market, Priority 14.2: Adaptation of obligatory oil stocks to the EU requirements, Priority 14.5: Preparation for participation in common gas market.

2.4. Contribution to the National Development Plan: n.a.

2.5. Cross Border Impact: n.a.

3. Description

3.1. Background and justification:

The aim of the project is to set up an appropriate legal, institutional and organisational framework, which will enable efficient and smooth adaptation of Polish energy sector to the EU membership requirements. The adaptation activities will be aimed first of all at the gradual changes in organisation of the electricity and gas markets, which have been based on the natural monopolies, to the wider development of TPA principle. As transformation effects in several EU countries prove, the market mechanism forces the maximum efficiency of activities and causes the improvement of services level and range as well as reduction of the prices paid by end-users. There exist already in Poland basic legal (Energy Law) and institutional (Energy Regulatory Authority) conditions for the implementation of such solutions. Organisational structure, at least of electricity sector, creates also the appropriate background for the gradual application of free market mechanisms. According to the governmental document „Energy Policy Guidelines for Poland until 2020”, organisational transformations in the gas sector, which will create the advantageous conditions for the application of market solutions, are expected quickly. Exploration-production, transmission-storage, and distribution-trading activities will be separated. These will make possible to implement gradually the solutions recommended by the Directive No 98/30/EC („Gas Directive”). One of the most important requirements within the integration process is the necessity to ensure the liquid fuels supply security through maintaining of 90-days stocks. This problem needs urgent and detailed analysis especially in the context of significant financial consequences. Appropriate examination, qualitative and quantitative assessment of these problems will substantially influence the possibility and speed of Poland’s harmonisation activities in the energy sector. The results of the proposed project should give significant arguments and information about the costs and revenues connected with Poland’s integration process into the EU in the energy sector.

3.2. Linked activities:

The earlier Phare projects in the field of energy have been implemented in 1993-1998. The obtained results were: preparation of Energy Law and associated secondary acts as well as current support for the Ministry of Industry and Trade, and later for the Ministry of Economy in a series of analysis and evaluations related to the processes of reorganisation and privatisation of the energy sector. Within these projects, the joint team of Polish and EU experts called the Energy Restructuring Group was active.
In the year 2000 two subprojects of Phare project PL9707 have been implemented. One of them concerned the preliminary analysis how Poland should reach IEA’s requirements in building the oil stocks system (subproject number PL970701-04-0001). The second project concerned the harmonisation of Polish law in the area of energy and metrology (subproject number PL970701-01-0002). Both subprojects had the character of preliminary analyses how to comply with the requirements and the analyses of compatibility and/or incompatibility of the legal bases. The results of these subprojects may be a good starting point for the advanced qualitative and quantitative analyses which are proposed to be performed within the present project.

3.3. Results:
Main results of the project will refer directly to the immediate objectives. Therefore the expected effects of the project implementation will consist in the presentation of:

3.3.1. decision procedures applied by the EU institutions and Member States governments in the field of the legal background for the energy sector operation (implementation of the Immediate Objective No 2.2.1).

3.3.2. proposals of the activities of Ministry of Economy and Energy Regulatory Authority in the area of the practical application of acquis communautaire in the energy sector (implementation of the Immediate Objective No 2.2.1).

3.3.3. proposals of the application in Poland of the procedures and analytical tools which are used in Member States for the management of oil stocks and for the evaluation of the costs and revenues of the liberalisation of electricity and gas markets (implementation of the Immediate Objectives No 2.2.2 and 2.2.3).

3.3.4. calculations of the costs and elaboration of the methods and structures of activity in the area of oil stocks gathering and of stocks management in the crisis situations (implementation of the Immediate Objective No 2.2.2).

3.3.5. methodology and procedures of the calculation of stranded costs, related to the market transformations of the energy sector, and methods and procedures of classifying the costs to the category of “stranded” (implementation of the Immediate Objective No 2.2.3).

3.3.6. criteria, methods and principles of the calculation of capital cost (own and borrowed) for the process of calculating the prices and tariffs for the energy supplied as well as for transmission and distribution services (implementation of the Immediate Objective No 2.2.3).

3.3.7. methodology of estimating the macroeconomic and regional costs and results of the process of energy markets liberalisation (implementation of the Immediate Objective No 2.2.3).

3.3.8. principles of the restructurisation of long-term electricity contracts, including proposals for the improvement of the System of Compensation Payments (implementation of the Immediate Objective No 2.2.3).

3.4. Activities:
Analytical and research activities, twinning, seminars, training and study visits, for a total of 4M€.

The following analytical and research activities are expected to be performed:

1. Variant estimation of the investment costs and operating costs of the functioning of compulsory oil stocks system (achievement of the results No 3.3.3 and 3.3.4, activity within the Contract No 2).

2. Elaboration of the methods of reducing the liquid fuels consumption in the crisis situation and the estimation of efficiency of suggested methods (achievement of the result No 3.3.4, activity within the Contract No 2).

3. Designing of the structure and tasks of the National Oil Emergency Organisation (NESO) in the implementation of the country’s energy security policy and cooperation with the international organisations (achievement of the result No 3.3.4, activity within the Contract No 3).

4. Analysis and optimisation of the influence of stranded costs, environmental fees and the costs of renewable energy sources development for the methods of formation of the electricity tariffs (achievement of the result No 3.3.5, activity within the Contract No 3).

5. Elaboration of the study of operational and financial efficiency of the regulated energy corporations (achievement of the result No 3.3.6, activity within the Contract No 1).

6. Detailed technical and economic analysis concerning the possibilities of adaptation of gas transmission infrastructure to the EU standards and to the requirements of the trans-European networks programme (achievement of the results No 3.3.3 and 3.3.6, activity within the Contract No 3).
7. Identification and analysis of the barriers to the application of TPA principles at the electricity and gas markets, with the conclusions for the Energy Regulatory Authority (achievement of the results No 3.3.6 and 3.3.7, activity within the Contract No 1).
8. Analysis and evaluation of the social and economic effects of the Polish electricity and gas markets liberalisation and opening for the foreign competition (achievement of the result No 3.3.7, activity within the Contract No 1).
9. Evaluation which country regions and economic sectors are the most and the least 'sensitive' to the possible effects of energy markets liberalisation (achievement of the result No 3.3.7, activity within the Contract No 1).

The following activities are expected in the field of seminars, trainings and study visits:
Preparation of the cycle of seminars, training workshops and study visits for the representatives of central administration institutions and the management staff of the energy corporations, with the aim to study and achieve the knowledge of the procedures used in the processes of EU law preparation and its practical application. (achievement of the results No 3.3.1 and 3.3.2).
It is particularly proposed to organise the following seminars and visits:
• 4 seminars for the staff of the Ministry of Economy and the Energy Regulatory Authority (40 participants in each) on the subject of electricity and gas markets liberalisation – total cost ca. 120,000 Euro (activity within the Contract No 1),
• 4 seminars for the staff of the Ministry of Economy and the Energy Regulatory Authority (40 participants in each) on the subject of oil stocks – total cost ca. 120,000 Euro (activity within the Contract No 2),
• 2 seminars for the management staff of the energy corporations (150 participants in each) on the subject of electricity and gas markets liberalisation – total cost ca. 200,000 Euro (activity within the Contract No 1),
• Study visits might be part of the project.

It is proposed to include a Twinning Covenant in the project, with the following subject areas:
1. application of the Directive No 96/92 (‘electric’), with the support to the Energy Regulatory Authority in the process of market opening, companies licensing and settlement of eventual disputes,
2. application of the Directive No 98/30 (‘gas’), with the support to the appropriate institutions in the process of restructuring and market opening of the gas sector,
3. creation of an appropriate system of oil stocks management, under the requirements of the Directives No 68/414 and 98/93, related EU acts and IEA requirements,
4. training and seminars concerning the above listed subject areas.

3.5. Inputs:
In the framework of the twinning contract the Ministry of Economy and the Energy Regulatory Authority expect the experts which have the wide practical experience within the subjects of electricity and gas markets organisation and the subject of oil stocks.
It is proposed to employ 1 Pre-Accession Advisor and 2 Medium-Term experts in the framework of twinning, namely:
1. an advisor on the electricity market (PAA): during the period IIIQ2002 – IIO2003,
2. an advisor on the gas market (Medium-Term): during the period IIQ – IVQ2002,
3. an advisor on oil stocks (Medium-Term): during the period IQ – IIQ2003.
It is planned that the Pre-Accession Advisor and the Medium-Term advisors will take active participation and the programme leadership in each of the seminars listed in the part 3.4 (Activities) of the present fiche.

4. Institutional Framework
The Ministry of Economy will be responsible for the general project coordination and for its appropriate implementation. Also the Energy Regulatory Authority will be the important beneficiary of the project. Project results will not lead to the institutional changes.

5. Detailed Budget (M€)

| | Phare Support |
|---|---|---|---|

PL01.01.08 Energy market regulation – p.4
The co-financing funds for the project implementation will be ensured within the budgets of the Ministry of Economy and the Energy Regulatory Authority. Each of the 3 contracts will be financed in exactly 50% from the budgets of both institutions.

6. Implementation Arrangements

6.1. Implementing Agency:
PAO: Mr Pawel Samecki, Undersecretary of State, The Office of the European Integration Committee, Al. Ujazdowskie 9, 00-918 Warsaw, Tel. +48 22 455 52 41.
CFCU: Foundation „Cooperation Fund”, Nowy Swiat 6/12, 00-400 Warsaw, Mr Wojciech Paciorkiewicz, CFCU Director, Tel. +48 22 661 79 27, Fax +48 22 661 72 26. CFCU is responsible for the organisation of tendering, contracting and disbursement of payments.

6.2. Twinning:
Phare support of 0.6 M Euro is planned to be spent on twinning. This amount, jointly with the national cofinancing also of 0.6 M Euro, will be allocated to cover the costs of 3 experts, with the total engagement of about 2 man-years. The Ministry of Economy and the Energy Regulatory Authority will be the main beneficiaries of the twinning contracts. The Pre-Accession Advisor will be located in the Ministry of Economy. The Polish party will cover, within its cofinancing input of 0.6 M Euro, the material expenditures connected with the stay of experts in Poland, such as the costs of the office, computer and communication means. The following schedule of EU experts stay in Poland is proposed: an advisor on the electricity market (PAA): during the period IIIQ2002 – IIQ2003, an advisor on the gas market (Medium-Term): during the period IIIQ – IVQ2002, an advisor on oil stocks (Medium-Term): during the period IQ – IIQ2003. The contact person for the twinning is: Mr Wojciech Tabis, Director of the Energy Department, Ministry of Economy, pl. Trzech Krzyzy 3/5, 00-507 Warsaw, Tel. +48 22 693 56 74, Fax +48 22 628 08 82.


6.4. Contracts:
Three contracts will be concluded: see list under point 5. Detailed Budget.

7. Implementation schedule

7.1. Start of tendering / Call for proposals: IV quarter 2001
7.2. Start of project activity: II quarter 2002
7.3. Project completion: IV quarter 2003

8. Equal Opportunity
Equal participation in the project by the minorities, women and men will be assured in all stages of implementation, including participation in seminars and trainings.

9. Environment
The implementation of the project will not have any direct influence on the state of the natural environment. It may however motivate the environmental improvements indirectly, if the new legal instruments will influence the fuel mix used for electricity generation.

10. Rates of return
Not applicable to this project.

11. Investment Criteria
Not applicable to this project.

12. Conditionality and Sequencing
The substantial improvement of the economic efficiency of Polish energy sector operation should take place as a result of the project implementation. The activities aimed at the full adjustment of Polish Energy Law and related legal acts to the requirements of the EU will be the important steps in the achievement of the above result. This may be achieved through the amendments to the appropriate acts and also through supporting the central administration institutions in the supervision of all activities which are aimed at the achievement of the main objective.
The appropriate implementation of the tasks of the project will require the close cooperation between the main beneficiaries: Ministry of Economy and Energy Regulatory Authority. The milestones in the project implementation will be as follows:

- full application in Poland of the common rules for the internal market of electricity (31.12.2002),
- full application in Poland of the common rules for the internal market of natural gas (31.12.2002),
- detailed definition of the methods and schedule of future achievement by Poland of EU required level of oil stocks (31.12.2003).
### ANNEX 1: LOGFRAME PLANNING MATRIX FOR PROJECT

**Programme No.** | **Project Title** | **Energy market regulation** | **Sources of Information** | **Assumptions and Risks**
--- | --- | --- | --- | ---

#### Wider Objective
Improvement of the economic efficiency of Polish energy sector and improvement of energy supply security through full application of the common EU rules of the internal markets of electricity and gas and through adaptation of liquid fuels stocks system to the EU requirements.

**Indicators of Achievement**
Production costs and energy commodities prices, level of emissions, existing system of fuels stocks

**Sources of Information**

**Assumptions and Risks**
Amendments to Energy Law and the Act of the state reserves and compulsory fuel reserves, stable development of Polish economy

#### Immediate Objectives
Defining of the necessary scope of the harmonisation of legal and institutional regulations with EU standards in the area of electricity and gas markets and improvement of Poland’s energy security. Among the government institutions this objective concerns mainly the Ministry of Economy and the Energy Regulatory Authority, and to the smaller extent also the Ministry of State Treasury. Within the Ministry of Economy two Departments: of Energy and of European Integration are responsible for the legal and institutional harmonisation of the energy sector.

**Indicators of Achievement**
Participation of 200 beneficiary representatives in seminars, training and workshops organised within the project.

**Sources of Information**
Governmental Monitor, Official Journal, Periodic reports concerning implementation of project.

**Assumptions and Risks**
Effective cooperation between central administration offices, efficient application of new legal regulations incl. current cooperation with Energy Regulatory Authority.

Improvement of Poland’s energy security through increase of oil stocks and improvement of legal instruments defining the principles of stocks management. The quantities of oil stocks and the legal instruments of stock management are in Poland far behind the EU requirements. It is necessary to construct the new stocking capacities, to increase the stocks themselves, to introduce the legal acts defining the methods of stock management and to create the institution of crisis management (so-called NESO in IEA terminology). In this way the requirements of Council Directive No 68/414, as amended by the Directive No 98/93, would be satisfied. The assistance of EU experts on various systems of oil stocks management in Member States would be of great value to the Polish Government.

**Indicators of Achievement**
Application of about 10 methods and analytical algorithms verified by independent EU and Polish experts.

**Sources of Information**
Governmental Monitor, Official Journal, Periodic reports concerning implementation of project.

**Assumptions and Risks**
Independent experts opinion about work progress.

Growth of competition and liberalisation of electricity and gas markets. The principles of Polish Energy Law and the practice how the President of the Energy Regulatory Authority regulates the electricity and gas markets, are to the large extent coherent with requirements of the EU. For the various however reasons, institutional and economic, the practical growth of competition at these markets lags behind the legal possibilities. The reasons which may be mentioned are: the large legacy of long-term contracts in the power sector and the early phase of the company restructurisation in the gas industry. In this situation the EU assistance directed at the growth of competition and markets liberalisation would be advantageous, with the aim to implement fully in Poland the Directives No 96/92 (‘electric’) and No 98/30 (‘gas’).
### Results of Projects

- Presentation of the decision procedures applied by the EU institutions and Member States governments in the field of the legal background for the energy sector operation,
- Proposals of the activities of Ministry of Economy and Energy Regulatory Authority in the area of the practical application of acquis communautaire in the energy sector,
- Application in Poland of the procedures and analytical tools which are used in Member States for the management of oil stocks and for the evaluation of the costs and revenues of the liberalisation of electricity and gas markets,
- Calculations of the costs and elaboration of the methods and structures of activity in the area of oil stocks gathering and of stocks management in the crisis situations,
- Methodology and procedures of the calculation of stranded costs, related to the market transformations of the energy sector, and methods and procedures of classifying the costs to the category of ‘stranded’,
- Criteria, methods and principles of the calculation of capital cost (own and borrowed) for the process of calculating the prices and tariffs for the energy supplied as well as for transmission and distribution services,
- Methodology of estimating the macroeconomic and regional costs and results of the process of energy markets liberalisation,
- Principles of the restructurisation of long-term electricity contracts, including proposals for the improvement of the System of Compensation Payments.

### Indicators of Achievement

- Training standards of appropriate institutional and economic structures working on adaptation of Polish legislation to EU standards.
- Participation of 200 beneficiary representatives in seminars, trainings and workshops.
- Number of analytical and research methods used in regulation practice and by Ministry of Economy.

### Sources of Information

- Experts opinions.
- Working papers and summary reports

### Assumptions and Risks

- Effective cooperation between central administration offices, efficient application of new legal regulations incl. current cooperation with Energy Regulatory Authority.

## Outputs

<table>
<thead>
<tr>
<th>Published analytical studies.</th>
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<tbody>
<tr>
<td>Trained staff of public administration as well as energy companies' management staff in the area of energy markets liberalisation.</td>
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<table>
<thead>
<tr>
<th>Indicators of Achievement</th>
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<tbody>
<tr>
<td>Qualitative analysis of published papers.</td>
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<tr>
<td>Training of 200 beneficiary representatives.</td>
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<tr>
<th>Sources of Information</th>
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<tr>
<td>Experts opinions</td>
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<tr>
<th>Assumptions and Risks</th>
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<tbody>
<tr>
<td>Adequate skills of staff involved in the project implementation.</td>
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<tr>
<td>Suitable co-ordination and project control.</td>
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</table>
### Activities

<table>
<thead>
<tr>
<th>Activities</th>
<th>Inputs</th>
<th>Sources of Information</th>
<th>Assumptions and Risks</th>
</tr>
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<tbody>
<tr>
<td>Analytical and research activities, twinning, seminars, trainings and study visits (4 M Euro)</td>
<td>Financial expenditures (total): Analytical studies, seminars, training, workshops, study visits and twinning – 4 M EURO (incl. Phare: 2 M EURO)</td>
<td>Reports concerning each stage of project implementation.</td>
<td>Suitable project control and proper coordination between institutions involved in implementation of the project.</td>
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<tr>
<td>1. Variant estimation of the investment costs and operating costs of the functioning of compulsory oil stocks system.</td>
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<td>2. Elaboration of the methods of reducing the liquid fuels consumption in the crisis situation and the estimation of efficiency of suggested methods.</td>
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<td>3. Designing of the structure and tasks of the National Oil Emergency Organisation (NESO) in the implementation of country’s energy security policy and cooperation with the international organisations.</td>
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<td>4. Analysis and optimisation of the influence of stranded costs, environmental fees and the costs of renewable energy sources development for the methods of formation of the electricity tariffs.</td>
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<td>5. Elaboration of the study of operational and financial efficiency of the regulated energy corporations.</td>
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<td>6. Detailed technical and economic analysis concerning the possibilities of adaptation of gas transmission infrastructure to the EU standards and to the requirements of the trans-European networks programme.</td>
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<td>7. Identification and analysis of the barriers to the application of TPA principles at the electricity and gas markets, with the conclusions for the Energy Regulatory Authority.</td>
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<td>8. Analysis and evaluation of the social and economic effects of the Polish electricity and gas markets liberalisation and opening for the foreign competition.</td>
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<td>9. Evaluation which country regions and economic sectors are the most and the least ‘sensitive’ to the possible effects of energy markets liberalisation.</td>
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<tr>
<td>10. Preparation of the cycle of seminars, training workshops and study visits for the representatives of central administration institutions and the management staff of the energy corporations, with the aim to study and achieve the knowledge of the procedures used in the processes of EU law preparation and its practical application</td>
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<td>11. The twinning contract, with the following subject areas: 1. application of the Directive No 96/92 (‘electric’), with the support to the Energy Regulatory Authority in the process of market opening, companies licensing and settlement of eventual disputes, 2. Application of the Directive No 98/30 (‘gas’), with the support to the appropriate institutions in the process of restructuring and market opening of the gas sector, 3. Creation of an appropriate system of oil stocks management, under the requirements of the Directives No 68/414 and 98/93, related EU acts and IEA requirements.</td>
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**ANNEX 2.4**

**CUMULATIVE IMPLEMENTATION, CONTRACTING AND DISBURSEMENT SCHEDULE**

| Project Title: | Harmonisation of legal and institutional regulations with EU standards in the area of electricity and gas markets and improvement of Poland’s energy security | Date of drafting | 31 October 2000 |
| Planning period | IVQ 2001 - IVQ 2003 | Cost Estimate Total | MEURO | Phare: 2,00 |

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