

Dialogue on Water, Food and Environment in Central and Eastern Europe

Dialogue on the Implementation of the EU Water
Framework Directive in Agricultural Water Management
in Central and Eastern European EU Candidate Countries

First phase 2001-2003



**Global Water
Partnership**
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The CEE Region considered by the GWP CEE: Bulgaria, Czech Republic, Estonia, Hungary, Latvia, Lithuania, Poland, Romania, Slovakia, Slovenia



ICID-CIID

ICID ERWG - International Commission on Irrigation and Drainage, European Regional Working Group
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WWF

WWF - World Wide Fund for Nature - Danube-Carpathian Programme: projects throughout the Danube River Basin and Carpathian ecoregions and staff in Austria, Bulgaria, Croatia, Germany, Hungary, Poland, Romania, Slovakia and Ukraine

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The authors of the Regional Report have done all their best to reflect adequately the opinions expressed in the National Reports and during the Dialogue meetings. It has to be acknowledged, however, that this not always could be done to the extent desired because of considerable differences of views expressed.

CEE WFE Dialogue

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Implementation of the EU Water Framework Directive
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**Final Report on the first phase of the Dialogue
2001-2003**

From the Hague to Kyoto

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1. Introduction

Before the change of the political, economic and social regime (around 1990), wetland drainage, river regulation, irrigation and heavy chemical fertilisation have been key policies for raising agricultural productivity in the countries of the Central and Eastern European region (CEE). Many reports on the relationship between agriculture and biological diversity in the countries mention the negative impacts of agricultural collectivisation, mechanisation, intensification, drainage and water regulation (IUCN 1992, 1993, 1995). These include river ecosystem degradation, habitat destruction, extinction of species, nitrate pollution of groundwater, etc.

In the past twelve years, the countries of Central and Eastern Europe continued their efforts to address their problems in the very unique context of a transition from the centrally planned to market economies. Although the problems, which need to be dealt with, are still many, there are clear signs of a rethinking of agricultural and water policy, food production practice and environmental protection in the region. In these countries of economical transition the most critical issue in the above fields is how to develop the weak agricultural sector in an environment-friendly way, while building market economy and preparing to join the European Union (EU). It has become evident that the CEE countries need to develop a science-based consensus between all stakeholders – including governments, NGOs, research specialists and farmers' organizations – which will help enhance agricultural production and environmental security, through sustainable water management.

In short there is a need for a Dialogue on Water, Food and Environment, which follows most directly from:

- the utmost necessity to help the agricultural sector to become modernised and stabilized,
- the ongoing need to alleviate further environmental degradation.

Table 1

Selected indicators of the candidate countries (2000)

	Total area	Population	Density of the population	Gross domestic product at market prices	Gross domestic product at current prices in Purchasing Power Standards (PPS)		Agriculture	
	1000 km ²	Million	persons per 1 km ²	GDP per capita Euro	GDP per capita Euro	GDP per capita per cent EU15= 100	Utilised agriculture area 1000 ha	Arable land 1000 ha
Bulgaria BG	111	8,0	72	1625	6083	27	5582	3400
Cyprus CY	9	0,7	78	13571	19150	85	.	
Czech Rep CZ	79	10,3	130	5340	13292	59	4482	3090
Estonia EE	45	1,4	32	3929	8336	37	1433	810
Hungary HU	93	10,0	109	5030	11265	50	5854	4500
Latvia LV	65	2,4	37	3208	7435	33		1816
Lithuania LT	65	3,7	57	3297	6534	29	3489	2933
Malta MT	0,3	0,4	1.333	9750	12392	55		10
Poland PL	313	38,7	124	4419	8787	39	18220	14063
Romania RO	238	22,5	94	1777	5407	24	14811	9366
Slovakia SK	49	5,4	110	3870	10814	48	2444	1461
Slovenia SI	20	2,0	100	9750	15546	69	508	171
Turkey TR	779	65,3	83	3329	5858	26		

Source: Eurostat yearbook 2002, The statistical guide to Europe, Data 1990-2000 and the National Dialogue Reports

Notes:

For the calculation of per capita GDP, population data are taken from the national accounts and may be different from those obtained via demographic statistics

Thirteen countries applied for EU membership: Bulgaria, Cyprus, the Czech Republic, Estonia, Hungary, Latvia, Lithuania, Malta, Poland, Romania, Slovakia, Slovenia and Turkey

EU15: average of the 15EU Member States

GDP per capita using purchasing power parities (PPP): GDP per capita data in national currencies are converted to euro using special conversion factors and not exchange rates. This eliminates the differences in price levels between the countries

2. The WFE dialogue process in the CEE region

Following the World Water Vision and Framework for Action process, that ended with the 2nd World Water Forum in March 2000 in The Hague, many felt that there had been insufficient interaction between the agricultural and the environmental sectors.

Nine of the primary international actors in the fields of water resources management, water resources research, environmental conservation and health (FAO, GWP, ICID, IUCN, IWMI, UNEP, WHO, WWC and WWF) have established a dialogue process to examine the question of future water needs for nature and food production. The Global Dialogue as envisaged in the "Dialogue on Water, Food and Environment Proposal" (May 2001) is a process that helps build bridges between agricultural and environmental communities on water resources issues, by improving the linkages between the sectoral approaches. (Read and download the full proposal for the Dialogue at www.iwmi.org/dialogue).

Following the first planning and design meeting for a possible global Dialogue on Water for Food and Environmental Security held in Colombo, Sri Lanka in December 2000, the GWP-CEE Region (Bulgaria, Czech Republic, Estonia, Hungary, Latvia, Lithuania, Poland, Romania, Slovakia, Slovenia) decided to run a series of relevant dialogues in the countries. Responding to the invitation of GWP, representatives of GWP-CEE, WWF Danube-Carpathian Programme and ICID European Regional Working Group formed in 2001 a temporary Working Group as an interim arrangement to take the initiative forward. The WG prepared a proposal on the CEE Dialogue on Water for Food and Environment, which was presented in August 2001 during the Stockholm Water Symposium. The proposal was further elaborated for the Bonn Conference on Freshwater held in December the same year. It was well received and was decided that GWP-CEE give priority to the Dialogue on the regional level.

The proposal stated that "The agricultural impacts on water status are a major concern across Europe - both in terms of water quantity and quality". There are obvious regional differences, for example between north-west Europe, the Mediterranean and CEE countries. Apart from the impacts on the biodiversity and landscape of Europe, this 'water stress' threatens human health and the long-term sustainability of food production. Direct impacts include over-abstraction of groundwater and pollution of ground and surface waters due to excessive fertiliser application. But there are also ecosystem shifts that have resulted from intensification of agricultural practice during the last 50 years or so.

Eutrophication has become widespread across the continent, causing significant damage to rivers, lakes and wetlands and resulting in economic losses. As a result of drastic physical alteration, such as loss of natural vegetation cover and regulation of river systems, the landscape now has a reduced capacity to store and eliminate nutrients and pesticides. All of the current impacts are likely to be accentuated by climate change.

It is important to recognise that not all agricultural activities are detrimental to water quantity and quality. Farming

can also have a positive role in shaping Europe's landscapes and in securing valuable wetland habitats. However, true integration of agriculture and environmental objectives requires new approaches and policy instruments such as agri-environment and sustainable rural development to support and strengthen the long-term implementation of the new EU Water Framework Directive." (Ijjas et al., 2001).

It was concluded that the main focus of the Dialogue in the CEE region is the implementation of the Water Framework Directive (WFD) in the hope that by achieving good ecological status of waters the objectives of the Dialogue process will be reached in the agricultural regions as well.

Box 1.

The key issues in the WFD which should be considered:

- The environmental objective is to achieve the 'good water status' for all ground and surface waters until 2015
- The Nitrates Directive and the Habitat directive should be carefully implemented.
- Integrated river basin management is the framework within which measures for achieving 'good status' are to be implemented.
- River basin management plans should be developed for whole Europe, including the transboundary river basins requiring the joint management and planning of the two or more countries sharing the river basin.
- The spatial integration of measures is needed in favour of sustainable water management.
- The EU Common Agriculture Policy (CAP) should be considered and the planning under the WFD and the Rural Development Planning should be coordinated.
- The measures to be taken within a river basin will vary widely according to natural, socio-economic and cultural factors.
- Water pricing and cost recovery are central elements helping to reduce unnecessary consumption and protect the status of waters.
- Public participation is a fundamental component for recognition of the current water problems and for defining socially-acceptable solutions and programmes of measures.

Following the Bonn conference the GWP-CEE decided to financially support the process in the region and held a kick-off meeting to facilitate the implementation of national WFE dialogues in the CEE countries. The meeting (Bled, Slovenia, April 2002) attended by future facilitators of country dialogue meetings addressed some key questions related to the:

- organisational structure of the dialogues,
- dialogue purpose, principles and elements,
- action plans for initiating dialogues and
- timetables.

It was agreed that the general objective of the Dialogue is that all waters reach at least "good status" by 2015 and to ensure the sustainable development of the agriculture, while the specific objective is the successful implementation of EU WFD in the field of agricultural water management by involving all stakeholders to the planning and implementation process. A Knowledge Base for the country dialogues has been compiled including:

- EU Water Framework Directive,
- Common EU and National Strategies on the Implementation of WFD,
- Draft Guidelines for WFD implementation in EU - CIRCA network (approx. 900 documents),
- Other international and national documents.

The EU Member States and the European Commission jointly developed a Common Implementation Strategy (CIS) of the WFD. The Strategic Document is continuously being developed according to the progress of the implementation process of the WFD. This strategic document recognises the importance of an active involvement of stakeholders, NGOs and the civil society. The basic idea is to promote an open and clear exchange of views

and concerns between all parties directly responsible for the implementation of the WFD and those who will be interested in or affected by it. The CEE WFE Dialogue promotes the public participation and the involvement of the Candidate CEE countries.

In parallel with the activities under CIS of the WFD, the European Commission is pursuing a further integration of the specific requirements of the WFD into other Community Policies. Priority areas of action are the integration into the Common Agricultural Policy, Regional Policy, Fisheries Policy, Development Policy, Marine Policy and integration into other policy sectors such as Energy, Transportation and Internal Market. For example, it is more and more often recognised that some elements of the EU Common Agricultural Policy as applied to the CEE region, should change to favour sustainable rural development rather than provision of production-based payments and subsidies only.

The priority areas of action within the integration into Agricultural Policy:

- introduce the requirements of the WFD into specific projects, the rural development plans (e.g. agri-environmental measures), cross compliance, INTERREG guidelines and projects, including training and capacity building for farmers and authorities,
- ensure that the mid-term review of the Common Agricultural Policy (CAP) in 2003 and future CAP reforms or specific reforms of individual Common Market Organisations adequately take account of the requirements of the WFD with regard to the CEE dimensions.

The urgent need for integrating CAP and WFD planning and implementation was recently recognised by the European Commission in its Working Document "The Water Framework Directive (WFD) and tools within the Common Agricultural Policy (CAP) to support its implementation", published in February 2003 (EC 2003). This recognition underlines the absolute importance of the Dialogue and its objectives.

3. Objectives of the CEE WFE Dialogue

The new European Union Water Framework Directive came into force on 22 December 2000. The EU-candidate countries of the CEE Region will have to comply with this Directive which requires national and international co-operation in river basin management. One of the main guiding principles for effective river basin management is that of sustainable rural development in which agriculture is a key component of multifunctional rural areas.

There are significant differences between the current 15 EU Member States and the candidate countries in the CEE Region. These differences will be taken into account when assessing approaches and tools for reconciling water, agriculture and environment in this region of Europe.

The overall purpose of each national WFE Dialogue and the regional CEE WFE Dialogue is to develop a science-based consensus between all stakeholders - including governments, NGOs, research specialists and farmers' organizations - which will help enhance agricultural production and environmental security, through sustainable water management.

The specific objectives are:

- To strengthen the knowledge base on this topic, and develop conceptual and assessment tools to clearly understand the situation.
- To develop programmes of measures for sustainable water management in agricultural production in CEE countries.
- To offer platform for dissemination and discussion of EU Water Framework Directive, Common Agricultural Policy and other related EU policies.

The CEE WFE Dialogue deals with water management for agriculture in general, including irrigated and rainfed agriculture, drainage, flood management, erosion control, and large scale as well as small- and micro-scale farming. Agriculture is broadly defined, including food and cash crops, aquaculture, livestock and agro-forestry. Environmental issues include water quality as well as aquatic and land-based ecosystems, and look at biodiversity for its own sake as well as goods and services provided by nature, including capture fisheries. Wetland restoration and sustainable management are therefore key not only to the WFD but also the Dialogue itself.

4. Activities

The CEE WFE Dialogue has been carried out with the following main activities, plus a communication program:

- Planning and design of regional and national CEE WFE dialogues,
- Preparation of the knowledge base for the dialogue,
- Preparation for regional and national dialogues,
- Conducting of regional and national dialogues,
- Synthesis of CEE WFE dialogue information and reporting for the Global Dialogue,
- Participation on the Global Dialogue events.

The implementation process of the EU Water Framework Directive creates a lot of information, experience and knowledge. The main CEE WFE Knowledge Base activities for the implementation of the EU Water Framework Directive are as follows:

- Planning and design of CEE Knowledge Base,
- Knowledge components (analysis of the characteristics of the river basins, of pressures and impacts of agricultural activities and the economics of water use, ecological status classification systems, reference conditions and reference sites, programs of measures, River Basin Management Plans according to the EU Water Framework Directive),
- Joint evaluation of best practices (agriculture/ecosystem),
- Synthesis of material, presentation, publications,
- Development of alternative programmes of measures, modelling and presentation for integrating agriculture and rural development into WFD implementation, including definition of water aspects of "Good Agricultural Practice" as required by the CAP first pillar.

Box 2

Key elements of the Knowledge Base for the CEE WFE Dialogue

- GWP (February 2000): Water for the 21st Century: Vision to Action, Central and Eastern Europe
- ICID ERWG (May 1999): ICID Sector Vision - Water for Food and Rural Development - Regional Meeting for Europe, DVWK
- ICID (March 2000): Draft
- ICID Strategy for Implementing Sector Vision - Water for Food and Rural Development and Country Position Papers
- ICID (July 2001): Strategy for Implementation of ICID's Concerns Emanating from the Sector Vision on Water for Food and Rural Development
- Dialogue on Water for Food and Environment Security, ERWG Letter, Land and Water Management in Europe, 1/2001
- Dialogue on Water, Food and Environment, Proposal of FAO, GWP, ICID, IUCN, IWMI, UNEP, WHO, WWC and WWF, Final Version, May 2001.
- Rijsberman, Frank (May 1, 2001): Dialogue on Water, Food and Environment, Progress Report 1
- Baldock, D., J. Dwyer, P.Lowe, J.E.Petersen, N.Ward (January 2001): The Nature of Rural Development: Towards a Sustainable Integrated Rural Policy in Europe, A Ten-Nation Scoping Study for WWF and the GB Countryside Agencies, National Reports: Austria, France, Germany, Hungary, Latvia, Poland, Spain, Sweden, Switzerland, UK
- Dwyer, J., D. Baldock, G. Beaufoy, H. Bennett, P. Lowe, N. Ward (December 2002): Europe's Rural Futures - The Nature of Rural Development II - Rural Development in an Enlarging European Union, IEEP/WWF Comparative Report
- WWF: Enlargement and Agriculture: Enriching Europe, Impoverishing our Rural Environment? WWF position paper on EU enlargement and the Common Agriculture Policy (October 2002)
- Institute for European Environmental Policy (March 2000): The environmental impacts of irrigation in the European Union, A report to the Environmental Directorate of the European Commission
- EU Water Framework Directive (22 December 2000)
- EU Common Strategy on the Implementation of the Water Framework Directive (2 May 2001)
- EU Rural Development Regulation
- EU CAP reform
- WWF/EC: Implementing the EU Water Framework Directive - A Seminar Series on Water -
- 10-11 February 2000, Seminar 1: Water and Agriculture
 - 9-10 November 2000, Seminar 2: The Role of Wetlands in River Basin Management
 - 29-30 May 2001, Seminar 3: Good Practice in River Basin Planning
 - WWF/EC: Elements of Good Practice in Integrated River Basin Management - A Practical resource for implementing the EU Water Framework Directive (October 2001)

Networking for local and basin level action-oriented projects in CEE is focused on testing and evaluating innovative approaches that enhance sustainable water services for agriculture and the environment. This means essentially a platform for information exchange - leading to identification of "best practices" and then appropriate training. The key actions of networking are, in broad terms:

- Network development in CEE
- Networking activities (communication, information exchange, meetings)
- Capacity development (farmer to farmer/research, manager to manager training, site visits)

The above list is an indication of the types of activities that are expected to be carried out in the framework of the CEE WFE Dialogue. Specific proposals were developed for the various activities listed, particularly through the Dialogue workshops held. Those proposals will be considered during the next phases of the dialogue process.

5. Schedule and work programme

The CEE WFE Dialogue process is foreseen as a decentralised, multi-year process, with milestones at the 3rd and 4th World Water Forum in Kyoto and Montreal. The overall co-ordination and timing of the CEE WFE Dialogue is ensured with the Global Dialogue activities, with the overall work programme of the Common Strategy on the Implementation of the EU Water Framework Directive and with the activities of the GWP CEE, ERWG ICID and WWF Europe activities.

Box 3

Timing of the Dialogue on Water, Food and Environment in Central and Eastern Europe (CEE)

- May 2001, A short info on the dialogue has been published in the ERWG Letter of ICID
- June 2001, The short project proposal has been discussed at the meeting of the European Regional Working Group of ICID in Brno, Czech Republic
- August 2001, Launch of Global Dialogue at the Stockholm Symposium Plenary Session (Water Security for the 21st Century - Building Bridges - Stockholm Water Symposium), the GWP CEE, ERWG ICID and WWF Danube Carpathian Programme will initiate the CEE Dialogue
- August 2001, First design workshop on the Knowledge Base, Stockholm
- August 2001, Trade-offs in Water for Food and Environmental Security, Joint SIWI-Dialogue workshop, Stockholm
- August 2001, The first Global Dialogue Consortium meeting, Stockholm
- August 2001, Producing an overview document that contains the conclusions of the Dialogue meeting in Stockholm and the comments received on the first draft of the CEE Dialogue proposal
- September 2001, ERWG ICID Meeting in Seoul, Korea, 52nd IEC Meeting of ICID
- November 2001, Kick off meeting of partners of CEE Dialogue
- September 2001 - January 2002, Preparatory studies resulting in discussion notes.
- December 2001, Second design workshop on national dialogues, Bonn (held just before the Bonn International Freshwater Conference)
- January 2002, 1st GWP CEE Council Meeting, Guidelines for the National CEE WFE Dialogue Projects to be initiated by the GWP Country Water Partnerships
- January 2002 - September 2002, Round of country dialogues
- April 2002, ERWG ICID Meeting in Bled, Slovenia, Kick off Meeting of the CEE WFE Dialogue, International Conference on Drought Mitigation and Prevention of Land Desertification organised by ICID and a Joint CEE WFE Dialogue Meeting, organised by GWP CEE, ICID and WWF
- July 2002, ERWG ICID Meeting in Montreal, 18th Congress and 53rd IEC Meeting of ICID
- Sept/Oct 2002, presentation of preliminary results at the regional Water Forum
- December 2002 - January 2003, Regional consultation
- March 2003, Presentation of results at the 3rd World Water Forum in Kyoto
- March 2006, Presentation of results at the 4th World Water Forum in Montreal

6. National WFE Dialogue in Hungary

Country experiences on the national WFE dialogue processes are presented through the example of Hungary, which started the earliest and organized most of the events until now. The experiences of Poland are discussed in a paper by Mioduszewski (2002). Results, experiences and conclusions of the other countries (Bulgaria, Czech Republic, Estonia, Latvia, Lithuania, Romania, Slovakia, Slovenia) are referred in the chapter on conclusions.

At the very beginning of the process it was clear that for a successful country dialogue more partners were needed. GWP-Hungary therefore was looking for organizations sharing the above objectives and found very soon interested parties, like the Ministry of Agriculture and Regional Development, Ministry of Environment and Water (after the general elections in April 2002, because of the new governmental structure), WWF - World Wide Fund, Hungary, ICID Hungarian National Committee, two universities and the National Union of Water Management Associations.

Water Management Associations (WMAs) are independent organizations playing important role in solving rural water management tasks. Members are individuals or agricultural companies having land or other properties within the area of interest of a WMA, and therefore being locally interested in the protection against water induced damages including excess water as well. Presently there are 72 WMAs in Hungary covering almost the whole territory of the country. Members contribute financially according to the value of their property. The Ministries proved to be committed partners showing not only political will, but also providing financial support to the local level dialogues organized in the countryside, as well as delegating high level officers to help facilitate the meetings and draw conclusions. WWF-Hungary, the ministries, and ICID National Committee were instrumental supporters by providing keynote lecturers at the meetings and giving professional expertise. The consortium was based on mutual interest and created a constructive atmosphere for the whole process. The GWP-Hungary played a catalytic role which was appreciated by other members.

The countryside events were organized in form of a "road show" in various spots of the country starting with general presentations on the problems, prevailing trends and objectives of the Dialogue. Since the main driving force in the CEE countries is joining the EU and the implementation of the Water Framework Directive is a major task also for the candidate countries the EU water policy as well as its agricultural policy were presented. Other important regulation, which was referred to in many countries (Lithuania, Romania, Estonia, Latvia) is the Nitrate directive with the objective of reducing water pollution caused or induced by nitrates used in agriculture and preventing further such pollution.

The wetland restoration programme of WWF-Hungary was reported and its relation to the WFD was highlighted. This was followed by questions and answers in plenary. Key questions have been then formulated, which were discussed in small working groups of six to eight participants. While the facilitators were the lecturers of the plenary session, the reporter was a volunteer from the participants in order to receive feedback from those whose opinion is the most important for decision makers and encourage real dialogue.

The attendees of the Dialogue meetings were members of the local WMAs, farmers, representatives of agricultural companies, municipalities, professionals from district water authorities, environmental inspectorates, local governments, ministries, universities, NGOs (WWF and ICID) and GWP, presenting real grass root interest in the discussions. In Hungary a total of nine meetings were held between March and October 2002 with 400 participants.

The Dialogue was a two-way process, the top-down approach (initiated by the Ministry) was well complemented by the bottom-up approach represented by the WMAs. The informal character of the meetings (similar to experience in Estonia) helped to develop a constructive discussion both horizontally (among representatives of the water sector, agriculture and environmental protection) and vertically (between practitioners of the field and ministerial officers). This latter helped and (since the process is planned to run until the 4th World Water Forum in 2006) will hopefully continue to help build trust and raise political will.

The Dialogue meetings were prepared by the organisation team. The most important elements of the Knowledge Base of the CEE WFE Dialogue are the series of the guidance documents drafted by the EU CIS Working Groups for the implementation of the WFD. The summaries and synthesis of the drafts of the guidance documents with regard to the WFE Dialogue have been prepared by the key-note speakers of the Dialogue meetings and distributed through the information system of the WMAs. The preparation of the written documents as a knowledge base for the Dialogue was financed by the Ministry of Agriculture and Rural Development. There were some obstacles of the Dialogue processes:

- the guidance documents were still under development,
- a large amount of information is covered by the guidance documents,
- the difficulties of the common understanding of the provisions of the WFD with regard to the rural water management aspects,
- the difficulties of the simplification of the professional terms and provisions under the WFD making them understandable for the non-professional participants of the Dialogue process,

Issues raised during the Dialogue meetings include:

- Most important provisions of the WFD related to agricultural water management,
- Obstacles hindering the implementation of WFD,
- Development of "do's and don'ts" in agricultural water management for the successful implementation of WFD,
- Suggestions for the EU CIS and ICPDR RBM working groups preparing guidelines of implementation (in order to avoid unfavourable prescriptions from the viewpoint of the Hungarian agricultural water management),
- Future tasks of WMAs in connection with the implementation and relevant preparations.

Immediate output - an agreement was launched between WWF and the Union of Water Management Associations in Hungary on four pilot studies (implementation of WFD in a large drainage system)

7. The link of the CEE WFE Dialogue with the political process

The EU accession is an unprecedented political step and as the likely date of joining the EU (May, 2004) is approaching it is becoming the issue number one in the candidate countries. Although by the end of 2001 the accession negotiations on the environment chapter were provisionally concluded with nine countries, the implications of becoming EU member is still unclear for many professionals of the water and the agri-food sector. On the other hand a study confirms that all candidate countries will reap significant benefits from EU environmental directives (Wallstrom, 2002).

Luckily this situation (definite support to join, uncertainties related to implication and clear signs of positive impact on the environment) helps to call the attention of senior decision makers and governmental officers to the Dialogue process in the CEE countries. The efforts of the Country Water Partnerships (CWPs) preparing the national consultations were generally acknowledged and supported by relevant ministries and the meetings were attended by their representatives. They considered the meetings as a contribution to the ministries' public awareness campaign and usually gained good impressions. The top-down and bottom-up approaches complemented each other and resulted in trust building.

Dialogue results were well communicated to competent ministries of all the nine participating countries, where the recommendations will be considered for the EU accession negotiations. Information for decision makers on practical obstacles encountered in the field and on local preferences are prerequisites of implementing the Dialogue results. This process however is time consuming and as envisaged the Dialogue will last until 2006.

Regarding the CEE countries located in the Danube River Basin, both GWP-CEE and WWF are observers with the International Commission for the Protection of the Danube River (ICPDR), which includes governmental

delegates of the countries sharing the basin (the most complex one in the world in terms of number of countries involved). ICPDR provides the multilateral setting of the implementation of Water Framework Directive. Observers are not idle parties at the meetings; they bring expertise and from time to time volunteer or are requested to contribute with issue papers, like the recent one on public participation in connection with the implementation of WFD. This led to the formation of a small preparatory group on public participation, and a workshop to be held in April 2003 which is responsible for the elaboration of a Danube basin strategy on Public Participation. Observers are therefore active partners in the lasting political process of joining the EU and are able to influence the decisions of this international body including EU member states and associated countries as well. The CEE Dialogue consortium (GWP, WWF and ICID) therefore can put through the ideas, recommendations and results of country and regional meetings directly by its observers and indirectly through country delegates. This is the case in the Danube basin, where six out of the ten CEE countries can be found.

The Baltic sub-region of GWP-CEE with four countries is different, mainly because instead of one large trans-boundary river like the Danube, there are several parallel river basins like Oder (Odra), Vistula and Nemunas discharging their flows into the Baltic Sea. Here solutions are being sought through the Baltic Sea Commission HELCOM and the recently established CEE Network of Basin Organizations (CEENBO).

Furthermore, partners in the Dialogue are also inputting directly at the pan-European level through participation in the WFD Common Implementation Strategy. This multi-level influence is seen as crucial to ensuring the results of the Dialogue are disseminated and acted upon at all levels of policy development and programming.

8. Conclusions

The final deliverables of the first phase of the CEE WFE Dialogue were the ten National Dialogue Reports (Bulgaria, Czech Republic, Estonia, Hungary, Latvia, Lithuania, Poland, Romania, Slovakia and Slovenia). The key issues that have been discussed during the national dialogue processes and considered as most important are as follows:

- environmental pressures and impacts caused by agriculture in the CEE region,
- the provisions of the EU WFD, the Nitrate Directive, and the Habitat Directive,
- elements of the Good Agricultural Practice,
- loss of wetlands,
- expected impacts of the climate change,
- privatisation, land use changes,
- financial difficulties of farmers,
- competitiveness of CEE agriculture,
- coordination of rural development planning and the WFD,
- coordination of WFD and the new flood management policies and strategies,
- integration of environmental, economic and social objectives and integrated planning to achieve those objectives,
- possible EU funds to introduce the necessary agri-environment measures,
- the need for new education and training programmes,
- the need for improved information exchange,
- the role of farmers and farmer's organisations in the implementation process of the WFD.

Box 4

Agri-environmental measures for the river basin management strategies

In order to achieve the agri-environmental objectives in Estonia, it is important:

- to preserve agricultural landscapes characteristic as part of the cultural heritage;
- to organize effective management of farmyard manure;
- to introduce HELCOM recommendations for the use of mineral fertilizers, manure and toxicants;
- to achieve a balance between the number of farm animals and the area of arable land;
- to avoid concentration of agriculture in the areas susceptible to water pollution;
- to promote biodynamic agriculture and support the use and export of biodynamic products (Estonian National Environmental Strategy, 1997)

Source: National WFE Report of Estonia

The Latvian National Report "Rio + 10" formulates the following objectives for integration of environmental and agricultural policy:

- to modernise rural and farm technologies and to improve specialisation;
- to develop horizontal cooperation links between the producers of traditional and non-traditional agricultural products;
- to develop further non-traditional and organic farming activities;
- to popularise and implement better agricultural practice principles;
- to develop the provision of non-agricultural services by farmers by access to further education, investment resources and market surveys;
- to introduce integrated agricultural systems for more effective production and use of natural resources;
- to utilise agricultural land not in use (especially lower quality land) for growing renewable energy products;
- to facilitate the development of new and effective types of work and to modernise production and storage facilities in agricultural goods processing plants. Development of an investment policy;

Source: National WFE Report of Latvia

In 2000, an operational concept of national ecological networks (NECONET), as well as its implementation strategy, was created in Lithuania. The implementation of ecological network is necessary for ecologically balanced development of the region and for implementation of the principles of sustainable development, maintenance of landscapes and biodiversity, as well as implementation of the EU Habitat and Bird Directives (Natura 2000 areas) and agri-environmental programmes. The general structure of ecological network - core areas, corridors, buffer zones and stepping stones - was also established. Development of the national ecological network provides Lithuania a tool for setting priorities in biodiversity protection and will promote integration of general and cross-sectoral policies, applying concepts of European and Regional Ecological Networks. The guidelines and criteria for the selection of Natura 2000 protected areas were also prepared.

Source: National WFE Report of Lithuania

Box 5

Policy measures for the agri-environmental strategies

The Strategy for Development of Irrigated Agriculture was developed in Bulgaria, including proposals for:

- Development of economic and pricing policies ;
- Development of the legislation;
- Improvement of the ecological policy;
- Improvement of the involvement of NGOs,
- Education and research programs; and
- Development of information management systems.

Source: National WFE Report of Bulgaria

The aims of the Slovene structural policy in the area of agriculture and rural development (Slovene agri-environmental programme, 2001) are the following:

- Improvement of efficiency and competitiveness;
- Improvement of agrarian (size, socio-economic, production) and organizational (support to different forms of groups of producers, processors and consumers) structures in agriculture;
- Introduction and encouragement of management, which is environmental-friendly and preserve the landscape features of an area;
- Preservation of biodiversity and characteristic habitats;
- Improvement of economic and social conditions in the countryside by extending development and employment opportunities in the other branches of economy (tourism, small industry, craft, trade);
- Support to private enterprises and introduction of alternative production;
- Improvement of transport, urban and social infrastructure.

Source: National WFE Report of Slovenia

In order to conduct successful Dialogue committed partners are needed from both ends of the political palette. In CEE the unique political situation of historic reunification of the European continent helps to gain political support for the Dialogue process.

The discussions revealed that to meet WFD requirements is not enough. A delicate balance has to be reached by meeting EU water and common agricultural policies and by being competitive without increasing the burden on the environment under harsh conditions of limited subsidy (average 15% compared with 40-60% in EU). To raise the relatively low living standards typical in agriculture in all CEE countries reconsideration of subsidiary policy is needed. Compensation of people living in disadvantageous areas is also needed for achieving social justice and environment-friendly investments must be encouraged by adequate incentives.

Concept of integrated water resources management (or the way to implement it) is different in the world, in the EU and in the local environment. The EU WFD stipulates the planning of action plans necessary for meeting the environmental objectives and do not deal with programmes of measures related to social and economic objectives. This, therefore, necessitates the integration of social and economic considerations – through CAP and the Rural Development Regulation for example – into WFD programmes of measures.

Given the relatively small extent of the irrigated area and moderate use of fertilisers and pesticides in CEE (mostly because of the increase of their prices in the last 10 years), agricultural irrigation is currently not judged as important threat to natural resources or biodiversity in that part of Europe (European Commission DG Environment, 2000). It is generally considered, however, that drainage systems built in the past, sometimes over large areas, have caused considerable change of the natural flow regime in several rivers of the region.

Table 2

Current Extent and Type of Irrigation and Drainage in the CEE region

Source: The Environmental Impacts of Irrigation in the European Union; A report to the Environment Directorate of the European Commission; by the Institute for European Environmental Policy, London; in Association with the Polytechnical University of Madrid and the University of Athens; March 2000 and the National Dialogue Reports

Country	Area of irrigated land/ % of agricultural land Area of drainage systems	Type of irrigation or crops irrigated
Bulgaria	1995: 690.000 ha (~11%) 1997: only 50.000 ha are actually irrigated	1989: 50 % long furrow irrigation 49 % sprinkler irrigation 1 % trickle irrigation
Czech republic	1995: 141.249 ha (3.3%) 7-14,000 ha are actually irrigated by farmers	1999: 99 % sprinkler irrigation 0.5 % trickle irrigation 0.5 % other systems of irrigation
Estonia	1982: 21000 ha 1996: 4,886 ha (~0.3 %) 2000 ha are actually irrigated 734000 ha drainage systems	1996: 100 % sprinkler irrigation (traditionally mainly used on grassland)
Hungary	1980s: 250000 ha (4 %) 1998: ~ 100000 ha are actually irrigated 4.4 million ha surface drainage systems	1999: mostly sprinkler irrigation drip irrigation is increasing sheet irrigation is declining strongly
Latvia	very small 1,6 million ha drainage systems	
Lithuania	8000 ha 4800 ha are actually irrigated 2.6 million ha drainage systems	
Poland	1989: 450 000 2001: 99 000	2001: subsurface 94370 ha sprinkler 4458 ha surface 241 ha (90 - 95 % of irrigation is targeted at grasslands)
Romania	1990: 3.19 million ha (21%) 1999: only ~10 % of this is actually irrigated by farmers	1990: 87.7 % sprinkler irrigation 10.2 % furrow irrigation 2.1 % saturated (rice production)
Slovak Republic	~1990: 350000 ha (14.3%) 1998: 323000 ha are actually irrigated by farmers	1999: all sprinkler irrigation (water use per ha declined by 70 % from 1986-1990 to 1991-1995, then was 309 m3 /ha/year)
Slovenia	1999: 2535 ha (0.64 %) increasing	1999: mainly sprinkler irrigation drip irrigation in fruit plantations

Table 3**Current Environmental Impacts of Agricultural Water Management**

Source: The Environmental Impacts of Irrigation in the European Union; A report to the Environment Directorate of the European Commission; by the Institute for European Environmental Policy, London; in Association with the Polytechnical University of Madrid and the University of Athens; March 2000 and the National Dialogue Reports

Country	Soil and water resources	Landscapes and biodiversity
Bulgaria (past and present effects)	Significant lowering of groundwater tables; salinisation of groundwater and soils; contamination of water by pesticides and nutrients; Reduction of water flow in rivers; Disruption of natural regulation of water flow by flood plains; soil erosion on irrigated slopes	Dryland habitats were destroyed in the past; drying out of valuable wetlands; reservoir creation and diverting water from rivers destroys valuable habitats; leaky irrigation systems are creating artificial wetlands of value for flora and fauna
Czech Republic	No significant problems, sourcing of water is well regulated	Currently no significant problems
Estonia	Pollution by fertilisers	Eutrophication
Hungary	Significant lowering of groundwater tables	Drying out of valuable wetlands; reservoir creation and diverting water from rivers destroys valuable habitats; leaky irrigation systems are creating artificial wetlands of value for flora and fauna
Latvia	Pollution	Eutrophication
Lithuania	Erosion, pollution by fertilisers and pesticides	70% of the wetlands have been lost
Poland	Significant lowering of groundwater tables, contamination of water by nutrients, changes of water flow regime in rivers, erosion	Drying out of valuable wetlands; reservoir creation and diverting water from rivers destroys valuable habitats; leaky irrigation systems are creating artificial wetlands of value for flora and fauna
Romania	Limited contamination of water by pesticides and nutrients (as inputs are expensive); salinisation effects – localised on groundwater but more extensive on soils.	Dryland habitats were negatively affected in the past
Slovak Republic		Reservoirs and dams in upstream catchment areas have negative impact on river ecosystems; no negative impacts reported in irrigated areas
Slovenia	Irrigation is well regulated and does not use very large resources of water compared to river flow	Reservoir creation have negative impacts on valuable habitats, no other significant effects; new irrigation projects need to undergo Environmental Impact Assessment

In the next phase of the Dialogue the cross-sectoral dialogue process among the stakeholders, primarily at regional, national and river basin levels, that is open, clear, transparent and inclusive will continue. The national level dialogues or roundtables would form the heart of the dialogue. Central and East European regional and river basin level dialogues would complement these to exchange information and address issues affecting users directly. Special efforts would be made to connect to the local level, where the key challenge is to involve the real users of water services.

The Knowledge Base will be the scientific and policy core of the Dialogue. An enhanced CEE knowledge base will feed the dialogue to establish credible and authoritative knowledge accepted by both agricultural and environmental constituencies. The knowledge base would focus on improving agricultural production and achieving environmental security and on impacts of past development as well as on evaluation of options for future development. The implementation process of the EU Water Framework Directive will create wealth of information, experience and knowledge.

Irrigated and non-irrigated agriculture as an important water consumer is a significant element in the water balance of river catchments. Transformation and modernisation of the agriculture in the CEE region should consider social and economic aspects but also problems of protection of natural environment and water resources. Agriculture should not be understood as only the food producer but also as a factor affecting natural environment and landscape (Mioduszewski, 2002).

Many problems associated with the co-existence of the three elements: water, agriculture and environment are not yet finally solved. Interdisciplinary studies are needed as well as the stimulation of dialogue and discussion among specialists in ecology, agronomy, economy, water management etc. The dialogue carried out both home and internationally is expected to bring definite results and to enable the improvement of environmental status and water resources and, at the same time, to secure production of food in appropriate amounts and of good quality. To summarize:

- The role of agriculture is not only in the production of food. It is also necessary to envision and define "the public function of agriculture". The public function is to protect biological diversity and high value of the present cultural landscape, the so-called "land stewardship" concept. From this point of view there is a need to define a new function of water management in the agricultural landscape and vice versa.
- Integrated water management in catchments has to be implemented as quickly as possible and the water management plans have to be elaborated.
- The important task is to reduce diffuse pollution from agricultural sources. To define, and then introduce, an agreed and accepted code of "good agricultural practice" (as required by some rural development measures and by the CAP's first pillar) is one challenge. The second is how to mitigate the transport of nitrates into rivers. A solution might be in buffer zones along the water bodies, in small ponds, restored wetlands, regulated drainage systems, etc., which would help to recover - or achieve - the good ecological status of rivers and other surface and ground waters.
- The question is whether the increase of yield in rainfed agriculture has any influence on water balance, how much water we need for irrigation (orchards, vegetables). The global climate change will affect water balance, water resources and water requirement.
- The local physical planning is very important from the point of view of water protection, especially such measures as afforestation, protection of flood plains, construction of buffer zones, wetlands, etc. The water protection problems should be considered in such plans, much more than they are nowadays.

9. The future plans for the CEE WFE Dialogue

The National Dialogue processes in the ten EU Candidate Countries were based on the outputs of the Setting up National Dialogues Design Workshop in Bonn and the CEE WFE Dialogue Kick-off Meeting in Bled. The further discussion on the best approaches and tools for country dialogue processes could be very useful. The dialogue has not been finished, many problems remained unsolved, yet some actions are undertaken at various levels to

improve environmental quality in rural areas.

The key elements of the knowledge-base for the CEE WFE Dialogue in the next phase of the Dialogue will be the guidance documents completed by the EU CIS Working Groups (Box 1). It should be considered a key issue how to adopt these guidance documents - the main knowledge base for the implementation of the EU Water Framework Directive - in the CEE region with regard to the specific conditions. The international exchange on the practical application and adoption of the guidance documents would be also useful (e.g. tool-box/approaches for integrated river basin management planning).

The work programme and the development of the knowledge base for the CEE WFE Dialogue were discussed by the meetings of the European Regional Working Group of ICID and by its Work Team on EU Water Framework Directive (in Brno and Cape Town in 2001 and in Bled and Montreal 2002). It is agreed to continue the cooperation with ICID in the next phase of the Dialogue.

Box 6

Future plans for the second phase of the CEE WFE Dialogue

Proposals for the key issues of the second phase of the CEE WFE Dialogue:

- Dialogues should be organized in river basin level in agreement with the process of the preparation of the river basin management plans under the WFD
- There is an urgent need for the involvement of the representatives of farmers and their associations/co-operatives (the Agrarian Chamber will be involved in Czech Republic)
- The local dialogue meetings will start in Czech Republic at the River Orlice, which was selected for pilot river basin management planning with the assistance of a "twinning project" (by the consortium UK-France and Austria)
- There is clear need for the more detailed introduction of the relationship between the Water Framework Directive and the Common Agriculture Policy of the European Communities
- The use of EU structural funds (namely EAGGF, HRDP) for the improvement of water-related investments have to be prepared well (including the process of payments)

Source: National WFE Report of Czech Republic

Two major issues are currently on the top agenda in the water community in Slovakia: the EU accession and the application of the Integrated Water Resources Management.

The next phase of the WFE Dialogue should focus on:

- Implementation of the EU Common Agricultural Policy,
- Integrated Water Resources Management
- Relationships between Water, Agricultural Production and Environment
- Implementation of the EU Water Framework Directive

Source: National WFE Report of Slovak Republic

For the protection of waters against pollution caused by nitrates from agricultural sources, Nitrates Directive recognizes that whilst the use of nitrogen-containing fertilizers and manure is necessary for agriculture, any over-use of fertilizers and manure constitutes an environmental risk. Therefore, common action is needed to control the problem arising from intensive livestock production, and that agricultural policy must take greater account of environmental policy. Another main threat of agriculture to the environment is the risks of pesticide application to humans and aquatic life. It's recommended to prepare a legal, policy and management framework which would enable authorities to develop risk reduction programmes.

Source: National WFE Report of Romania

Box 7

Guidance Documents for the implementation of the EU Water Framework Directive

(as of January 2003)

IMPRESS - Guidance for the analysis of Pressures and Impacts In accordance with the Water Framework Directive

HMWB - Guidance Document on identification and designation of Heavily Modified and Artificial Water Bodies

REFCOND - Guidance on establishing reference conditions and ecological status class boundaries for inland surface waters

COAST - Guidance on typology, reference conditions and classification systems for transitional and coastal waters

INTERCALIBRATION - Towards a guidance on establishment of the Intercalibration network and on the process of the Intercalibration exercise

WATECO - Economics and the Environment. The implementation challenge of the Water Framework Directive. A Guidance Document

MONITORING - Guidance on Monitoring for the Water Framework Directive

GW - The EU Water Framework Directive: Statistical aspects of the identification of groundwater pollution trends, and aggregation of monitoring results

BPRBP - WP1 Identification of RBDs - Identification of River Basin Districts in Member States. WP2 Planning Process - Guidance on the planning process WP3 Public Participation - Guidance on Public Participation in relation to the Water Framework Directive.

GIS - Guidance Document on Implementing the GIS Elements of the WFD

PRB - Summary of Proposals for Pilot River Basins submitted by Member States

Water Bodies - Horizontal guidance on the application of the term "water body" in the context of the Water Framework Directive

Wetlands - NOTE - reflecting the importance of wetlands for the WFD process, a new drafting group, under the leadership of Italy and including WWF as participants, has been established and is currently developing a Horizontal Guidance on Wetlands to be delivered to the Greek Presidency Water Directors meeting in Athens in June 2003.

Networking for local and basin level action-oriented projects in CEE region will focus on testing and evaluating innovative approaches that enhance sustainable water services for agriculture and environment. This would essentially be a platform for information exchange - leading to identification of "best practices". Within the framework of the CEE Dialogue Project pilot case studies and/or pilot river basins will be selected. The selection will be based on data availability, prior studies carried out at each test site, and system scale.

The CEE Dialogue Project is foreseen as a decentralised, multi-year process, with milestones at the 3rd and 4th World Water Forum in Kyoto and Montreal. The overall co-ordination and timing of the Project is co-ordinated with the Global Dialogue activities as well as with the overall work programme of the Common Implementation Strategy of the EU Water Framework Directive. The CEE Dialogue Project is co-ordinated also with other relevant activities of the GWP CEE, ER WG ICID, WWF Danube-Carpathian Programme and WWF Europe.

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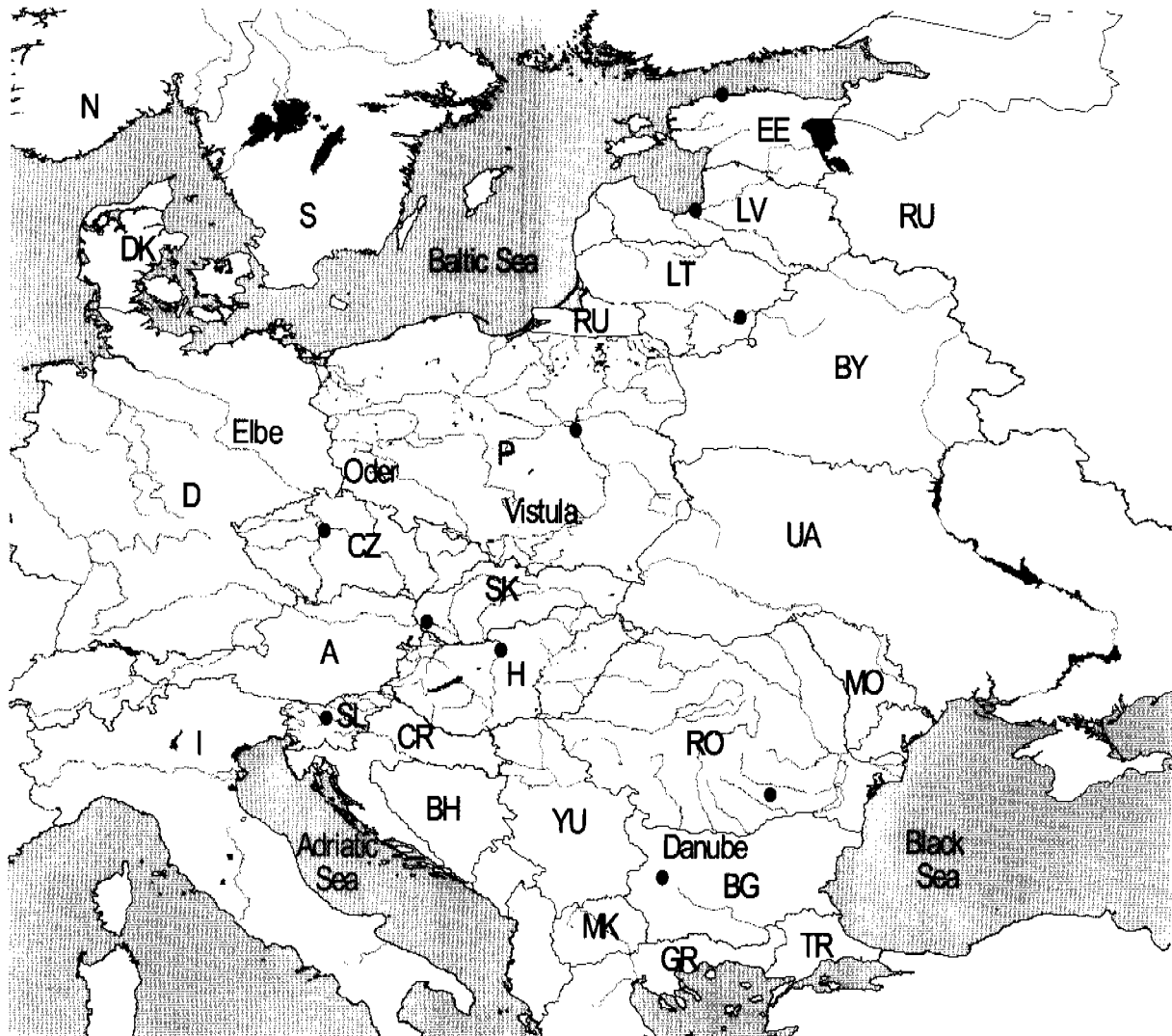
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TRADE: http://europa.eu.int/comm/trade/pdf/infpcck_enlarg.pdf
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The GWP-CEE region



BG – Bulgaria

CZ – Czech Rep.

EE – Estonia

H – Hungary

LT – Lithuania

LV – Latvia

P – Poland

RO – Romania

SK – Slovakia

SL – Slovenia

The Global Water Partnership (GWP), established in 1996, is an international network open to all organizations involved in water resources management: developed and developing country government institutions, agencies of the United Nations, bi- and multilateral development banks, professional associations, research institutions, non-governmental organizations, and the private sector.

GWP was created to foster Integrated Water Resources Management (IWRM), which aims to ensure the coordinated development and management of water, land, and related resources by maximizing economic and social welfare without compromising the sustainability of vital environmental systems. GWP promotes IWRM by creating fora at global, regional, and national levels designed to support stakeholders with their practical implementation of IWRM.

Currently, the GWP network consists of eleven regions: Central America, South America, Southern Africa, Eastern Africa, West Africa, the Mediterranean, Central and Eastern Europe, Central Asia and the Caucasus, South Asia, Southeast Asia and China. The GWP Secretariat is located in Stockholm in Sweden and supported by the following resource centers: DHI Water & Environment in Denmark, HR Wallingford in the UK, and the International Water Management Institute (IWMI) in Sri Lanka. The mission of GWP is to "support countries in the sustainable management of their water resources."