Environmental Mainstreaming – A User Guide to Tools and Tactics

Survey Report: Central and Eastern Europe

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¹ The detailed information about the respondents can be found in the Annex 1 to this report.

Executive summary

1.1. Background and Methodology

This report summarizes results of the survey on experiences and opinions of practitioners and other relevant stakeholders with the tools for environmental mainstreaming. Survey design has been based on the methodology and questionnaire developed by the International Institute for Environment and Development (IIED) and its results will serve to the global IIED initiative aiming to produce a *"User Guide' to environmental mainstreaming"*.

In the Central - Southern Europe the Czech Republic and Croatia were selected for carrying out the survey and thus provide the input reflecting the perspective of the Central and Eastern European transition countries to the prepared Guide. The survey was conducted simultaneously in both countries in March and April 2008.

In line with the overall IIED project aim, this survey aims to achieve following objectives:

- To identify and assess environmental integration tools which have been found to be the most effective in environmental mainstreaming in the Czech Republic and Croatia.
- To identify key problems associated with application of various methods and tools for the environmental mainstreaming.

The generic IIED questionnaire was used during the survey. 48 and 72 individuals were interviewed in the Czech Republic and Croatia, respectively. Among the interviewed participants, politicians, officials at the national, regional and local levels, environmental specialists and consultants, planners, representatives of non-governmental organizations and representatives of enterprise were the main groups represented.

1.2. Context for environmental mainstreaming in the Czech Republic and Croatia

The roots of environmental mainstreaming in both countries in question can be found already in 1970s mainly in the field of land-use or spatial planning. This long tradition maintains its influence and the land-use/spatial planning is often perceived as the most important planning tool, capable of serving all purposes including the environmental integration. Similarly, the role of the Environmental Assessment is relatively strong and well established in the region, at least since the early 1990s. In addition, many other tools and techniques were introduced during the last 15 years together with the overall societal transition, EU accession and rising of environmental awareness in public discourse. In general, in both countries there are routinely applied many (often formalized) procedures aiming at environmental mainstreaming, at the same time though, the actual effectiveness of the environmental mainstreaming remains debatable.

1.3. Findings

Understanding of environmental mainstreaming

According to the survey results, in terms of understanding to the concept, neither of the two countries exhibit substantial difference. Interviewed stakeholders often mentioned the protection and improvement of the environment, implementing the principles of sustainable development, minimising impacts of the development to the environment, and possible economic benefit (for enterprises) – gaining of the competitive advantage, profits and new customers, as a main purposes of the environmental mainstreaming. The survey participants also almost uniformly expressed their support to the idea and called for further deepening of the integration of the environmental concerns into the decision-making and planning.

Key drivers of environmental mainstreaming

As far as the driving forces of the environmental mainstreaming are concerned, the legislation and official regulations are the dominant drivers in both countries. This is further emphasized in case of Croatia, an EU-accession country with an economy still in relatively early phase of transition, where both state and non-state stakeholders are responsive to the demands and conditions set by external agents (EU, international banking and donor institutions, etc.). These external drivers were not mentioned by the participants in the Czech Republic (EU member state).

As for the group-specific driving factors, for business and industries of both countries the influence of the business partners and public demand as well as the marketing value of the green image and internal ethic of the organization were mentioned.

The representatives of the public and NGOs often listed also the topical environmental problems among the key drivers.

Main problems and constraints

Both countries seem to slightly differ in terms of main problems and constrains to the effective environmental integration. Whereas the lack of political will and awareness of the importance of environmental issues together with the lack of funding were listed among the main problems in the Czech Republic, the lack ho human resources and (perhaps related) lack of the absorption capacity for available financial resources were often mentioned by the Croatian participants.

The common problem in both countries seems to be the poor administration and enforcement of numerous obligatory formal procedures intended to secure the integration of the environmental concerns into the planning and decision-making. Too much emphasis is put on the formal aspects of these procedures, whereas the implementation of the outcomes and thus the actual effectiveness of the environmental mainstreaming exercises remains low.

The most frequently used tools and their efficiency

Similar "standard" set of tools appeared in both countries surveys results. The environmental assessments (both EIA and SEA), land-use planning, public involvement and participation (often as a part of the first two mentioned tools) are the most frequently used tools. Typically, they are used as required by the legislation.

Other commonly used tools are specific thematic/ technical studies (e.g. noise pollution, emission etc.) often elaborated as a part of the other tools (EIA, SEA, IPPC), and various certification schemas ISO / EMAS.

The efficiency of these tools is commonly perceived as low. The overuse of the EIA and SEA prevents concentration of expert and financial capacities as well as the public attention on the important cases. The poor enforcement and monitoring of the results further undermine the credit of the concept. The potential of the land-use planning is not fully used, as expert outcomes are often overridden by the partial interests.

Criteria for tools selection

While asked to recommend the criteria for selecting the environmental mainstreaming tools to be included into the prepared IIED User Guide, there were some differences between participants from the two countries. In the Czech Republic, the understandability of the outputs to the stakeholders, the readiness of the usage, and the robustness/credibility of the outcomes were the most favoured features, followed by the factors such as financial ant time costs and labour intensity of a tool. In Croatia, the costs in terms of time and money were by far the most important factors together with the ease of usage.

1.4. Conclusions and recommendations

The main message from the survey can be defined as follows: the problem is not the lack of tools, but in their effective application. The application of environmental mainstreaming techniques is often strictly guided by the legislation, the respective authorities, however, often focuses merely on the administrative aspects of the process. Furthermore, the recommendations and suggestions are then often implemented poorly or not at all. This often experienced inefficiency and ineffectiveness undermines the credit of the concept of the environmental mainstreaming tools among the stakeholders even when appropriate and context fitting tools and techniques has been used.

The activities for improvement are recommended in the following areas: education and awareness raising, support of good practice and distribution of the successful examples, simplification of the environmental legislation (from the procedural point of view), better control (monitoring) of the integration of the tools application in the decision-making and implementation, improved inter-sectoral and inter-institutional cooperation.

1. Introduction

This report summarizes results of the survey on experiences and opinions of practitioners and other relevant stakeholders who use (or have other practical experience and knowledge about) tools for environmental mainstreaming. The survey has been conducted simultaneously in the Czech Republic and Croatia, thus providing insight into the current situation in the Central and Eastern Europe. Survey design has been based on the methodology and questionnaire developed by the International Institute for Environment and Development (IIED) and its results will serve to the global IIED initiative aiming to produce a *"User Guide' to environmental mainstreaming"*.

1.5. Background information

An integration of environmental considerations into all aspects of development decisionmaking (e.g. physical, economic and social planning), in other words "environmental mainstreaming" is generally recognized as a key condition for achieving sustainable development. Given the increasing importance and dynamics of the decision making with visibly environmental considerations – in water insecurity, climate change, growth in the ecomarkets, the rapid expansion of bio-fuels, etc. - it is clear that potential costs of bad decisions can be extremely high and thus that such decisions cannot be poorly made, or delayed. At a practical level however, the successful application of the environmental mainstreaming remains exception rather then rule in most parts of the world, despite of rhetorical embracing the concept by most of the decision-makers of all levels. While analysing main obstacles to integration of the environment into the decision making, the International Institute for Environment and Development (IIED) has identified the need for a Guide to effective approaches to the environmental mainstreaming. The need arises particularly because there is now a wide array of tools, tactics and methods available, but little independent guidance exists as to which of these methods are appropriate and under what circumstances. Many tools are being 'pushed' by external interests and little is known about whether other more culturally relevant approaches have been successfully used.

To meet this need, the IIED has launched an initiative to produce a 'User Guide' to tools for integrating environment into development decision-making (environmental mainstreaming), steered by an international stakeholders panel. Following a project working group meeting involving participants from about 20 less developed countries in the early months of 2007, IIED designed the global approach to the study following consultations with representatives of donors and governmental and non-governmental agencies. IIED, in consultation with the country survey partners, developed a generic survey questionnaire and guidelines for conducting surveys in selected individual countries in order to produce a Guide that is relevant to a wide range of potential and actual users. Current participating regions/countries are Caribbean (Barbados, Jamaica, Trinidad and Tobago); Chile; Ghana; India; Kenya; Phillipines; Uganda; South Africa and selected countries in Central-Southern Europe (the Czech Republic and Croatia).

As stated in the IIED project document, the user Guide shall provide an overview of a small selection (approximately 30) of the approaches to environmental mainstreaming that users (consulted during the survey phase) have found most effective and in which contexts. In addition to providing short profiles of the selected approaches, the Guide will use case studies to examine the factors that influence the selection and effectiveness of the most appropriate approach. The User Guide will, therefore, benefit a wide range of audiences who have to cope with such environmental and developmental dynamics and respond appropriately at the same time. The Guide is likely to include an expanded set of tools and approaches, beyond those that tend to be emphasized by technical experts, e.g. those used for civil society or business actions. Decision-making methods will be offered to help users select the approach that is right for specific problems or tasks. An overview of areas for which all tools tend to be weak or missing will also be prepared, to guide further tool

development. The User Guide will provide a key resource for a wide range of actors who will have to address environmental mainstreaming, from senior decision-makers to development practitioners, indicating the tools available for particular tasks and contexts, and identifying the skills required.

In the Central - Southern Europe the Czech Republic and Croatia were selected for carrying out the survey and thus provide the input reflecting the perspective of the Central and Eastern European transition countries to the prepared Guide. The survey was conducted simultaneously in both countries in March and April 2008. The survey design was based on the generic questionnaire prepared by IIED, slightly adjusted so that it reflects specifics of the respective countries.

1.6. Objectives of survey

As mentioned above, the general purpose of the survey is to provide the input to the 'User Guide' to tools for integrating environment into development decision-making (environmental mainstreaming). In line with aim stipulated by IIED project document, this survey aims to achieve following objectives:

- To identify and assess environmental integration tools which have been found to be the most effective in environmental mainstreaming in the Czech Republic and Croatia.
- To identify key problems associated with application of various methods and tools for the environmental mainstreaming.

With use of questionnaires, the survey seeks to gather response from the broad spectrum of stakeholders (particularly decision-makers, but also consultants, NGOs, activists, government institutions and academics) so that it provides meaningful answers to the following general questions:

- What are the environmental management challenges or tasks for which a particular approach has proven most effective?
- What is the broader context in which the environmental mainstreaming is taking place and how does this affect the selection of the approach?
- Who is involved users, stakeholders and institutions? And how does this affect the selection of the approach?
- How can tools, tactics and methods be most effectively applied?

While carrying out the country surveys in the Czech Republic and Croatia, an emphasis was placed on genuine practical experience of stakeholders in order to identify actual benefits of individual tools and methods in different decision making contexts, both for the environment and for the users. This accent of the survey reflects the specifics of the Central and Eastern European transition countries; where there is on one hand relatively vast spectrum of formalized procedures aiming at environmental mainstreaming often required by national legislation and routinely applied, whereas on the other hand, there is not much success in delivering expected benefits.

2. Context for environmental mainstreaming

2.1 Evolution of environmental mainstreaming in Central and Eastern Europe

The environmental mainstreaming is not the issue of the last few years in the Central and Eastern Europe. The roots of environmental mainstreaming or integration of environmental issues in the planning and decision-making can be found already in 1970s mainly in the field of land-use or spatial planning.

Almost all land-use planning systems stipulated basic rights of citizens to comment on proposed options. They also emphasised the protection of the environment and public health as their main objective. This overall objective was to be accomplished mainly by using the following partial environmental analyses:

- mapping environmental vulnerability and resource potentials of the territory, which served as the main basis for elaboration of all tiers of land-use plans;
- establishment of limits for land-use activities as a means to define conditions for future development; and
- general assessment of the possible effects of the land-use options on areas of environmental importance or in relation to ambient environmental and public heath standards (especially for regional and local-use plans).

Environmental analyses were undertaken as an integral part of the planning process, based primarily on map overlays of various spatial and landscape features of the territory (simple pre-GIS applications). In some cases, multi-criteria analysis was used to compare specific proposals. Only rarely, however, were these analyses influential in the final decision-making process, which was heavily dominated by internal agreements within the ruling communist parties.

Politically manipulated decision-making processes were implicated in the notorious largescale environmental problems of the socialist era, exemplified by excessive levels of air and water pollution and contaminated lands. A notable exception to these practices was the former Yugoslavia, where environmental analyses and public consultations in land-use planning were more thoroughly applied from 1980. Many elements of these systems are still in place and are only now being upgraded to meet relevant international requirements.

With the collapse of communism in the late 1980s, CEE countries embarked on a period of reform and transition toward market economies, democratic governance, and integration into the EU. The planning instruments inherited from this era were regarded merely as tools for societal control and were largely abolished to pave the road to free-market economies. Land-use planning systems were considerably simplified and their previously dominant influence on decision-making was weakened as part of deregulation, although they remain a main instrument for decision-making.

It's possible to say that the processes of environmental assessment (both EIA and SEA) started to be used as the main instrument for the environmental mainstreaming after the change of the regimes in CEE countries. Especially countries in the Central Europe introduced EIA system in early 1990s. Several countries also established some form of SEA (for instance, Bulgaria, Czech Republic, Lithuania, Poland and Slovakia).

2.2 Situation in the Czech Republic

The Czech Republic belongs to the CEE countries, which introduced EIA / SEA system only few years after the collapse of communism. As mentioned above, both tools have been understood as a key for the integration of the environmental concerns in the plans and projects preparation and implementation.

The assessment of the development project impacts was partially stipulated already by the Act on Land-Use Planning and Building Code from 1974. The first legal act providing provisions on EIA process in the Czech Republic (in fact Czechoslovakia at that time) was Act on Environment, adopted in 1992. This act generally defined the categories of activities which shall be assessed.

The first specific EIA legislation was adopted in 1992 – the Act on Environmental Assessment stipulated the procedure for EIA and provided also (even if very short) basic obligations regarding SEA. This act was replaced by the new EIA Act, adopted in 2001 (amended in 2004 in order to include provisions on SEA), which transposes the requirements of EIA and SEA Directives of EU.

The practice in EIA started to be developed shortly after the entering the Act into force. The first group of experts was certified to be EIA/SEA experts (the only certified expert can sign the EIA/SEA report – this system still works in the Czech Republic). Altogether 325 EIA statements were issued by the Ministry of Environment in the period 1992 – 1996 (including 6 negative statements i.e. the project was not recommended from EIA point of view). The projects were submitted in the following fields – roads/railroads (altogether 129 projects), waste management (106), energy (57), chemical industry (55), mining industry (34), and other (61).

Opposite to EIA, the implementation of provision on SEA (article 14 of the EIA Act) was delayed until mid-1990s. The main factors responsible were the lack of a legal interpretation of the term "concept" and very limited elaboration of plans, programs, policies and strategies at that time. Methodological issues also played a minor role in limiting SEA application at this level. These concerned the practical approaches that could be used to assess general development interventions, which neither included specific projects nor had clear spatial projections. For these reasons, SEA for national concepts was not undertaken before 1996, although there was increasing use of SEA for regional land-use plans during that time.

There are two levels of the competent EIA/SEA authorities – the Ministry of Environment responsible for EIA for large projects and SEA for national and regional concepts², and Regional Authorities for EIA for other projects and SEA on the municipal level.

Besides environmental assessment processes the land-use planning is another quite important tool for the environmental mainstreaming with long history and evolution in the Czech Republic. The previous Act on Land-Use Planning and Building Code adopted in 1974 already included provision defining the land-use planning as "a tool, which creates the preconditions to ensure the sustainable accordance of all natural, civilization and cultural values in the territory, especially as regards to the management of the environment and protection of its main component – soil, water and air". But the reality didn't differ from the situation in CEE described in the previous chapter – i.e. the economic interests were usually prevailing over the environmental issues.

The land-use planning is coordinated by the Ministry for Regional Development since 1996 (originally the agenda of the land-use planning belonged to the Ministry of Environment). The Ministry for Regional Development prepared the new Act on Land-Use Planning and Building Code, which entered into force recently (January 2007). This act has not only changed the system of the land-use planning in the country, but also introduced the procedure of the

² The term "concept" refers to strategies, plans, programmes and policies which could be a subject of the SEA in accordance with the Act (i.e. those which are subject to preparation and/or adoption by an authority at national, regional or local level or which are prepared by an authority for adoption, through a legislative procedure by Parliament or Government, and which are required by legislative, regulatory or administrative provisions).

sustainability appraisal³ for all levels of the land-use planning documents i.e. National Policy of Territorial Development, regional principles of territorial development and municipal landuse plans. Despite the relatively short history several sustainability assessments were already carried out – but it's difficult to evaluate the efficiency since the assessment plans haven't been yet adopted. The current system of the land-use planning documents includes the National Policy of the Territorial Development, regional "principles of the territorial development, and local land-use plans. The surveys and analysis of the territory have to be summarized in the territorial-analytical bases, which present the background documents for the preparation of the land-use planning documents for the respective area.

Another frequently applied tool – IPPC – was introduced by the Act on Integrated Prevention and Pollution Reduction, which entered into force in 2003 as a transposition of the relevant EU IPPC Directive. The IPPC process shall integrate the number of individual permissions required by the specific acts within the environmental protection (wastes, air pollution, water pollution etc.). The proposed technology is compared with BAT standards within the process (BAT – best available technique). The competent IPPC authorities are regional authorities. There is also the IPPC Department within the Ministry of Environment. About 1700 facilities and over 800 operators were registered under the IPPC in the Czech Republic till November 2006. These figures include both issued IPPC permits as well as opened IPPC procedures in the period 2003 – 2006.

The Integrated Pollution Register (IPR) can be also understood as one of the environmental mainstreaming tools. The register is a publicly accessible information system on chemical substances and their amounts released into the air, water and soil. Furthermore, it contains information about the transfer of these substances in waste or wastewater. Reported substances, their amounts and origins are published on the IPR web site as of 30 September of the respective calendar year. The data can be looked up according to the region, environmental sector, industrial activity etc. All data about the discharged substances relate directly to a particular enterprise can be localised on a map. The IPR reporting obligation applies to all users of a registered substance, who discharge such monitored substances into the water, air, soil, or in transfers in an amount equal to or exceeding the reporting threshold (as specified in the relevant legislation). The authorities competent within IPR are the Ministry of Environment, Czech Environmental Inspection and Czech Environmental Information Agency (CENIA).

The voluntary tools used in the Czech Republic include mainly EMAS and ISO systems, cleaner production, environmental-friendly products, self-declared environmental claim, environmental product declaration, as well as Local Agenda 21. There is a Bulletin on Voluntary Tools issued by the Czech Environmental Information Agency.

The environmental management system in accordance with Eco-Management and Audit Scheme (EMAS) represents a company's active approach to the monitoring, management and gradual decrease of its environmental impact. It is based on Regulation 761/2001/EC of the European Parliament and of the Council. The relevant Governmental decision was adopted in the Czech Republic in 1998 stipulating the following activities and measures:

- Establishing the EMAS Programme Council and the EMAS Agency as the bodies responsible for the EMAS Programme
- The preparation and adoption of the "National Programme for the Implementation of EMAS" and the "Rules for the Implementation of EMAS"
- Establishment of an EMAS accreditation body

³ The term used by the Act is "assessment of the impacts of the land-use planning documents to the conditions of sustainable development of the territory". SEA is a part of the sustainability assessment / appraisal procedure.

Preparation of the methodical guidelines for the accreditation of environmental verifying bodies

The National EMAS Programme is a general document describing the basic relationships between environmental management and the role of the parties to the EMAS Programme. EMAS in the Czech Republic is provided by the following institutions:

- EMAS Programme Council,
- EMAS Agency,
- Czech Accreditation Institute,
- Czech Environmental Inspectorate.

The guarantor of the EMAS Programme is the Ministry of the Environment. The EMAS Agency operating under the auspices of CENIA functions as the executive body of the EMAS Programme in the Czech Republic. There are 30 companies with introduced EMAS in the Czech Republic and several hundreds companies with ISO14001.

The system of eco-labelling (environmental-friendly product) was introduced in the Czech Republic already in 1994. Currently, more than 82 Czech and foreign companies use the Eco-label on one or more products and this number is constantly growing. The range of certified environmentally friendly products is very broad – from toilet paper to paint on hot water boilers and from detergents to environmentally friendly services provided in tourism or education.

The issue of the Local Agenda 21 is promoted mainly by the Governmental Council for Sustainable Development and its Working Group for LA21. There are 23 municipalities with adopted LA21 in the Czech Republic and number of the other municipalities, several regions and organizations has a status of the "applicant". There are also several NGOs working in this field and supporting the further application of the LA21 principles.

2.3 Situation in Croatia

Most frequently used environmental mainstreaming tools in Croatia are considered to be the Environmental Impact Assessment, physical planning, and public participation in these two procedures. The EIA practice is founded on the US experience from late 1960ies, later adapted to the local circumstances.

Croatia has a long tradition of physical planning and zoning (dating back to former Yugoslavia), and thanking to the well developed expertise it is still considered by most people, if used properly, as the best sustainable development and environmental mainstreaming tool. Parallel to the new development of the independent Yugoslavia after the World War II, there came a need to arrange the territory in the way to protect strategic national interests and resolve the conflicting uses of space, and the practice continued throughout the decades, until the next war that occurred in this part of the world. The most recent national Physical Planning Strategy was made for the period 1997-2007, and a new strategy is currently being prepared.

EIA first appeared in 1984 as one of the physical planning instruments within the Physical Planning Law of 1980, regulated by a separate by-law. Later on, in 1997, it was shifted under the Environmental Law, the procedures for assessing environmental impact of projects and those for zoning got separated, and under the pressure of sudden development it became possible to initiate projects which were not in line with the existing physical plans. That might have been the start of the gap that was later on deepened between the environmental and physical planning sector. The physical planning lost its overarching role in development decision-making and became a tool in the hands of developers and politicians who introduce changes into them according to own agendas and political momentums, without any overall long-term development vision.

In 2000 a new Rule book on EIA introduced A (mandatory EIA) and B (screening for EIA) lists of projects, which was setting even stricter thresholds for projects than the one in the EC's EIA Directive. Only in its 2004 amendment the Rule Book re-introduces the obligation for the developers to only apply with projects which are already anticipated in relevant physical planning documents. However, it is questionable if this is a strong enough provision to curb ad hoc development projects, or is it only provoking more frequent changes in the current physical plans.

The new Law on Physical Planning and Construction (2007) anticipates re-structuring of the physical planning institutes - which previously were parts of the regional self-government systems and in certain cases even assumed the role of environmental protection departments in lack of available administrative capacity at regional level - and changing them into market-oriented public enterprises, without any environmental responsibilities. This step in the opposite direction from environmental mainstreaming is reportedly also a result of poor communication between relevant divisions in the Ministry of Environmental Protection, Physical Planning and Construction. The new Environmental Act (2007) introduces the SEA instrument, applicable to plans, programs and policies in more than 10 different sectors, to the level of regional (county) plans; however its recommendations would not be mandatory for decision-makers. The physical planning sector is however of the opinion that physical planning itself constitutes a powerful SEA tool and for a while there were even discussions as to which of these two sectors the SEA better belongs.

Below is a table presenting the current division of various environment-related responsibilities in the state administration, which demonstrates a grave need for improving inter-sectoral linkages and reforming of the public administration (also requested by the EU).

Ministry	Main responsibilities	Webpage
Ministry of Environmental Protection, Physical Planning and Construction	General Policy in Environmental Protection, air quality protection, waste management, climate change and ozone layer protection, sea and coastal zone, EIA/SEA, industrial accidents, soil protection, inspectorate	www.mzopu.hr
Ministry of Culture	Protection of natural heritage and biodiversity	<u>www.min-</u> kulture.hr
Ministry of Rural Development, Forestry and Water Management	Protection of forests from pollution by harmful substances and integrated water management	www.mrrsvg.hr
Ministry of Regional Development, Agriculture and Fisheries	Protection of agricultural land from pollution by harmful substances	www.mrrpr.hr
Ministry of the Sea, Transport and Infrastructure	Protection of the sea from pollution by ships; sustainable island development	www.mmpi.hr
Ministry of Tourism	Incentives for environmentally sound tourism	www.mint.hr
Ministry of Health and Welfare	Protection from ionising and non-ionising radiation, protection of human life and health, protection from harmful effects of poisons, prevention of poison abuse, protection against noise	<u>www.mzss.hr</u>
Ministry of Economy, Labour and Entrepreneurship	Nuclear safety, chemicals safety	www.mingorp.hr
Ministry of Foreign Affairs and	Coordination with EC	www.mvpei.hr

Ministry	Main responsibilities	Webpage
European Integrations		
Central Government Office for Development Strategy and Coordination of EU funds		<u>www.strategija.h</u> <u>r</u>
Ministry of Justice	Environmental crime	<u>www.pravosudje</u> <u>.hr</u>
Ministry of Interior	Environmental emergencies	www.mup.hr
Ministry of Defence	Responsibilities with direct link with	www.morh.hr
Ministry of Science, Education and Sport	environmental protection. Cooperation between these ministries is necessary to establish an integrated environmental protection policy.	www.mzos.hr

Initial background information for the survey was collected through a desk research, conducted mainly from the Internet sources and available information from the REC CO Croatia environmental library. Certain background documentation was also provided by respondents themselves on the occasion of interviews - these mainly included Corporate Social Responsibility statements of industrial enterprises, and environmental safeguards of international financing institutions.

In general, the desk research of available sources shows that economic/industry sector demonstrates (at least declarative) a high level of integration of environmental issues into their operation. Most medium-sized and large enterprises have developed and publicized their environmental and sustainable development strategies, corporate social responsibility (CSR) codes of conduct, and introduced Environmental Management and Quality Management systems (ISO 9000 and 14000 standard series). Many Croatian companies are members of the Global Compact Initiative and/or the Croatian Business Council for Sustainable Development (HR PSOR). The Global Compact is a UN-initiated framework for businesses that are committed to aligning their operations and strategies with ten universally accepted principles in the areas of human rights, labour, the environment and anti-corruption. As the world's largest, global corporate citizenship initiative, the Global Compact is first and foremost concerned with exhibiting and building the social legitimacy of business and markets. This is a purely voluntary initiative aimed at mainstreaming the ten principles in business activities around the world, and in Croatia it gathers 72 members so far, from the lines of industry, education and public sector. The HR BCSD, member to the World BCSD, promotes sustainable development in private sector and represents business in sustainable development. It was founded in 1997 by leading Croatian businesses, to gather its members (38 to date) in exchanging know-how, experience, capability and responsibility into a shared commitment to sustainable development aiming to balance the economic growth, social welfare and environmental safety. The Croatian Chamber of Commerce also offers possibilities of education, networking and exchange of good practices in environmental management, also on voluntary basis.

All multinational corporations which have their facilities in Croatia follow the internationally accepted environmental standards (with an exception of Rockwool insulation manufacturers, whose facility in Istria was recently shut down for non-compliance with environmental emission regulations). Many larger companies also have regular granting programmes for supporting local community NGO projects.

On the other hand, Governmental sectoral strategies demonstrate rather low level of both formal and practical environmental issues integration where usually environmental protection is declaratively stated as an issue of importance in most strategic planning documents but no concrete measures or actions to preserve the environment have been anticipated, or implemented. Exceptions can be found in the forestry sector, with its Forest Stewardship Certification system covering 90% of Croatian forests; and the maritime navigation sector, with developed (internationally recognised) protocols for waste disposal, environmental emergencies at sea, and the like.

The Penal Code recognises more then 10 different types of endangerment the environment as a separate form of crime, and envisages sanctions. However still the court practise is very weak, due to financial constraints for potential plaintiffs (usually NGOs, high court fines), inadequate level of public information about availability of legal tools for protecting their constitutional right to healthy environment, and low number of environmental lawyers (not a very profitable branch of law).

In educational sector, there are very few programmes that have integrated environmental aspects into their curricula. Around 20 secondary schools and tertiary education institutions have a certain number of subjects addressing Environment in general, but rare are those that have developed their curricula in the way that students are taught about the interrelations of their discipline (e.g. hydrological engineering, energy, economy, political science, journalism etc.) with the environment. On average these are educational institutions specialised for technical/natural sciences, and never those addressing social sciences. In high-schools and primary schools environment is addressed usually by biology teachers within extra-curricular activities, and dependent on enthusiasm and free-time of teachers. Universities in Dubrovnik and in Zagreb have set up several doctoral study programmes tackling environmental management, ecological engineering, integrated coastal zone management; the Polytechnic in Zagreb under one of its specialist studies tackles environmental management in construction; however these are rather recent programmes, and by default only open to a small number of people due to related financial costs. It seems of paramount importance to introduce environmental aspects into the curricula of all educational institutions and levels in a systematic and comprehensive manner.

Therefore the practical part of the survey started off from the assumption that environmental mainstreaming is still just a catch phrase without actual understanding of its practical application, and that the environment is still quite a low priority on the political agenda, while the environmental and nature protection institutions/organisations, due to staffing and capacity limitations, invest little effort to motivate inter-sectoral and multi-stakeholder dialogue.

3. Approach to survey

3.1 Methods used

Czech Republic

The survey was conducted mainly via both face to face interviews and e-mail distribution of the questionnaires. The previously identified and selected stakeholders were approached through personal and e-mail communication. Furthermore the electronic form of the questionnaire was available at the Integra Consulting Services Ltd. webpage and the opportunity for those interested to get involved by filling in the form was advertised through the relevant electronic conferences and e-mail networks.

The face to face interviews were conducted with the most relevant stakeholders in the form of semi-structured discussion based on the standard project questionnaire (translated in the Czech language and slightly modified to be relevant the situation in the Czech Republic). A telephone interviews were additionally used as an ancillary mean of consultation. Altogether 42 interviews were conducted within the survey.

There were two meetings with the selected key stakeholders organized during the survey. The first one was the roundtable organized in cooperation with the North-Moravia Region (Department of the Environment and Agriculture). The representatives of the regional politics and businesses (industries, developers etc.) were invited to discuss frequency of application and effectiveness of the most frequent tools.

The second meeting was organized in cooperation with CENIA (Czech Environmental Information Agency) at the end of the survey in the Czech Republic. The aim of the workshop was to present the preliminary results of the survey and discussed existing drivers / obstacles for environmental mainstreaming.

Croatia

Prior to starting the survey, available experience (previous analyses of such tools/practices in Croatia) was reviewed through a desk research, the findings of which are elaborated in more detail in subsequent chapters.

For obtaining the best results and reaching the representative sample of respondents, the survey was conducted through a combination of several approaches: e-mailing of questionnaires to a large group of stakeholders; organising structured personal interviews; organising several group meetings where the questionnaire was used only as basis for discussion.

Over 150 potential respondents in Croatia were contacted by e-mailing questionnaires and requested to e-mail them back – 24 questionnaires were received. The respondents were selected from all relevant stakeholder groups (sectoral ministries, environment agency, regional development agencies, regional and local authorities, academia, NGOs, media, protected area authorities, distinguished individuals). Another 48 stakeholders were interviewed - individually or in groups - using the questionnaire for structuring responses. Personal interviews were conducted with at least two-three representatives of each stakeholder group, and in each case, the questionnaire was sent to the interviewee in advance.

The survey was conducted during March 2008. The list of interviewees and questionnaire respondents is in Annex 1 to the report.

3.2 Target groups approached

The effort was made to cover a wide variety of professions and experiences. So the survey covered opinions of politicians, officials at the national, regional and local levels,

environmental specialists and consultants, planners, representatives of non-governmental organizations and representatives of enterprise.

The selection of participants was based on the fact if they work with environmental management tools and methods, both directly or indirectly (e.g. in planning or decision making). The aim was to focus the survey on specialists, who use environmental management tools in practice frequently, have enough experience with application of the tools and are able to measure their real effectiveness. It was also important that the respondents could identify main problems connected with using of the tools in practice and be able to propose changes and solutions in terms of their own experience.

Therefore, the environmental specialists and planners, both from private sector and public administration, were approached in order to cover up all sorts of environmental management tools.

In the Czech Republic, the largest group of the respondents was represented by officials at the national and regional levels – the majority of interviews within this target group was carried out with representatives of ministries (Ministry for Regional Development, Ministry of Environment) and regional authorities (Regional Authorities of Liberec, Pilsen and Ústí nad Labem Region). The representatives of local level (Municipalities of Opava, Chrudim and Dobříš) were included se well.

The second largest group of respondents was formed by environmental specialists from industrial enterprises (i.e. companies engaged in transport and structural engineering, automotive field, wholesale tobacco products trade, transport and logistics, consumer electronic, communication and electronic device components etc.)

Smaller groups of the environmental consultants, planners and representatives of the public expert institutions (Czech Information Agency of the Environment, CzechInvest, Health Institute, Institute of Land-Use Planning), politicians (Prague, Municipality of Chrudim), and NGOs (both environmental and business-cooperation oriented) were covered by the survey as well.

In Croatia, 72 respondents participated in the survey, including personal interviews, questionnaires and group discussions. There were representatives of international organizations operating in Croatia, research institutes, universities, public administration, non-governmental organisations and businesses and industries.

The largest group was formed by the representatives of public administration – ministries, regional and local authorities. The second largest group was represented by the public institutions like the Croatian Environment Agency, regional development agencies, nature park managing authorities etc. The smaller groups of representatives of international organizations operating in Croatia, businesses and enterprises, NGOs and universities and specialised expert institutes also took part in the survey.

4. Findings

4.1 Understanding of environmental mainstreaming

Czech Republic

As emerges from the survey results, there is a strong demand for the strengthening of the the environmental mainstreaming in the Czech Republic. All respondents expressed that integration of the environmental issues in the planning and decision making should be supported. However, the analysis of the interviews shows that there are often differences in perceptions of the environmental mainstreaming among individuals (differences do not depend on the target group). The most frequent purposes for the environmental mainstreaming mentioned by the interviewees are the following:

- Implementing the principles of sustainable development
- Protection and improvement of the environment
- To ensure standards of the quality of the environment as the public interest
- To minimize impacts of the development to the environment
- To ensure balance within the planning (e.g. balance of sustainability issues / pillars)
- Strengthening of the relation of the inhabitants to the area (where they live) and to planning and decision-making on their "own" territory and development
- Possible economic benefit (for enterprises) gaining of the competitive advantage, profits and new customers

Croatia

Though all respondents agree with the need for giving stronger priority to environmental issues, majority of responses reveals a traditional understanding that "taking care of the environment" is a task of environmental authorities, which is then reflected in the practice of most institutions. It is noticeable that usage of most tools mentioned above depends on whether they are prescribed by the law or not, as this is usually the only reason that makes decision-makers use them. Most respondents thought that environmental mainstreaming is quite well regulated, but administrative and financial capacity for enforcement is lacking, both in the business sector and in the governmental institutions.

The most frequent purposes for the environmental mainstreaming offered by the interviewees include:

- Raising overall awareness of environmental importance in all relevant sectors
- Protection and improvement of the environment
- Minimising impacts of the development to the environment through physical planning
- Possible economic benefits for industrial enterprises by investing into environmental improvements

4.2 Key drivers of environmental mainstreaming

Czech Republic

Results from Czech Republic survey clearly indicate that the motivations for being concerned with the environmental mainstreaming vary among the target groups and that the respondents' reactions were similar within individual target groups.

For **businesses and industries** the environmental mainstreaming is driven mainly by legislation and regulations (i.e. to comply with the environmental standards and limits) as well as by the objectives and plans of a company. The company's internal rules and regulations

and values are also important. The demands of the public and other stakeholders were mentioned mainly in the sense of the pressure for adopting such measures which would ensure better environmental performance of the company than standards and limits stipulated by the relevant legislation. In some cases the environmental mainstreaming – represented mainly by introducing of the voluntary tools (ISO, EMS etc.) – can be beneficial from the marketing point of view. This is still more relevant for companies with clients / partners abroad (in EU15), but it's possible to see positive trend also in the Czech Republic.

For *public administration* are the most relevant following aspects:

- Legislation and regulations (which is in accordance with the primary role of the public administration i.e. to ensure and control the compliance with the legislation)
- Requirements of the public
- Actual environmental problems (its related to the previous point, since dealing with the actual environmental problems is required by the public quite often)

For the public bodies responsible for the administration of the financial support from the EU funds are also important the requirements / conditions stipulated on the EU level for the implementation of the funds in the member countries (note: environmental sustainability is one of the horizontal priorities for EU funds). Values of the organization as well as personal ones were mentioned by several respondents – even if the public administration has to "play" within the legal provisions, the personal activity can bring results which are more environmentally beneficial than actions strictly following relevant legislation.

The representatives of *politicians* mentioned legislation, regulation and the requirements of public as the most important drivers for the environmental mainstreaming.

The motivation of *non-governmental organizations* is mainly based on the actual environmental problems, organizations' and personal values. Their activities are often initiated by the public requirements (i.e. public raises the environmental problems to be addressed).

The *consultancy companies, expert institutions and freelance experts* are mainly motivated by the requirement of the clients, but the values of the organization and personal values are also quite important driving force.

Croatia

Active integration of environmental issues into other aspects of development decisionmaking is "by default" considered a task of institutions belonging to the environment and nature protection sectors (Ministry of Environmental Protection, Physical Planning and Construction, Ministry of Culture, regional and local self-governments, environment agency etc.). This they do predominantly through introducing legislative requirements based on international obligations, and rare are the cases of additional "voluntary" efforts.

In addition to legal obligations, most respondents agree, regardless of their sectoral affiliation, that environmental mainstreaming is mainly fostered by external political and financial motives:

- **EU accession:** All applicants for EU funds now are obliged to integrate environmental aspects into all their projects in order to access the pre-accession funding,
- Under "influence" of EU approximation process, the public administration in various sectors starts to make steps to integrate environment into their policies, programs and strategies; however the general opinion is that it still remains at a declarative level
- International financing institutions (IFIs EBRD, World Bank, UN/GEF) also pose strong obligations to include environmental aspects into development of projects submitted for IFI financing. World Bank, for instance, has a well developed system of

Safeguards, including environment and natural resources, which obliges all project proponents to check their projects against environmental criteria and to develop an Environmental Management Plan for easier monitoring of implementation.

• Membership/affiliations in **international business groups** that have embraced environmental mainstreaming practices forces domestic ones to adhere to same rules (industrial sector, maritime, forestry etc.).

Due to the fact that Croatia is still an economy in transition, with more than a 10-years gap in terms of infrastructure investments and maintenance, and human resource development (mainly due to a recent war), environment is still low on priority list and considered more as a non-necessary cost than as a business and sustainable development opportunity. So the overall feeling is that there is still much work needed to integrate of environmental aspects in sectoral policies, however under the positive influence of international environmental trends and the EU approximation that need has been recognised, and is being addressed through various technical assistance and capacity building programmes.

However, there are strong contrasts among perceptions of the public administration, business sector and civil society, as to the success rate of this integration in actual practice.

Public administration representatives have predominantly a positive attitude and feel positive steps are being taken into this direction. (Despite current public polemics regarding Croatia's membership in the NATO, for instance cooperation of Environment Ministry with Ministry of Defence has improved under influence of NATO requirements re. increased transparency of registers and environmental emergency plans, reporting on hazardous substances etc.). The NGO and business sector representatives both feel left out of decision-making, however cooperation between these two groups is also weak, as the NGOs consider that industry lacks transparency in informing the public about environmental impacts of their operations.

4.3 Main problems and constraints

Czech Republic

The results produced by the survey clearly show that there is no problem with a lack of the tools for environmental mainstreaming in the Czech Republic. Instead, the difficulty to find/choose effective tools was often expressed. Often mentioned was a frustration over effectiveness of tools aiming at providing relevant results to be integrated into the planning (in appropriate time and financial frame). At the same time, the planning itself (both socio-economic and land-use) doesn't fulfil its potential to create the platform for sustainable development and to balance all aspects of sustainability.

Unlike in the case of drivers for the environmental integration (chapter 4.3), the problems, constraints and obstacles identified by the respondents were almost identical across various target groups. Representatives of *businesses and industries, public administration and non-governmental organization* as the most significant problems for the effective environmental mainstreaming mentioned:

- i) lack of political will
- ii) lack of financial sources and funding,
- iii) lack of understanding and awareness of relevance of environmental issues in development planning, and
- iv) corruption.

The low political support to the enforcement of the environmental and sustainability issues causes not only actual inappropriate integration of these issues in the planning and decision-making, but can also lead in the long-term perspective to the broader societal scepticism regarding the links between planning, decision-making and sustainability. Even the "best plan ever" perfectly integrating relevant environmental issues doesn't automatically mean the real

changes in the territory or sector, if not supported by the political representatives and leaders. It's also possible to identify the influence of the EU general objectives and priorities mainly focused on the economical competitiveness in the last years. This is the most evident comparing the situation in the early 1990s in the Czech Republic, when the environment was one of the most sensitive and important issues for the whole society, since the public (and so politicians) asked for the significant improvement of the environmental status heavily damaged by the previous regime.

The problem of low understanding of the effects of the development to the environment can be generalized – the negative impacts of the human activities are still underestimated (from local level to the global one). The NIMBY effect works well (e.g. local land-use plans or the specific projects are usually of the high public interest), but in case of more general issues especially within the planning on the national level there is low awareness of the environmental consequences of the decisions adopted.

Also over-complicated environmental legislation and over-regulated environmental protection is one of the key obstacles for **businesses and industries** to achieve better environmental performance. This was mentioned especially in relation to complicated procedures (EIA, SEA, IPPC, various types of permits for environmental issues – waste etc.). At the same time, the very strictness of the environmental limits and standards was only of small concern (the very limits and standards imposed by the legislation are obviously reachable by the businesses, it is the extreme complexity and incomprehensibility of the regulation what constitutes the main burden). The same problem does exist for the **public administration** – e.g. too many EIA screening procedures (or even pre-screening i.e. to inform proponent whether the specific project falls under the regime of the EIA Act) for the projects with insignificant environmental impacts presents unnecessary workload, which in turn doesn't allow to properly concentrate the human and expert resources to environmentally significant projects.

The "bad" image of the environmental protection was specifically mentioned by the *consultancy companies, expert institutions and freelance experts* as one of the problems. This can be caused by too "militant" actions for environmental protection done by NGOs in specific cases.

The lack of relevant data and information on the integration of environmental issues and lack of relevant expertise is a problem for public administration and expert institutions.

Croatia

There is a number of challenges indicated by respondents, and regardless of sectoral affiliation most respondents agree that they are predominantly related to:

- lack of understanding and awareness of relevance of environmental issues in development planning,
- lack of human resources,
- lack of available and timely data/information for informed decision-making,
- lack of absorption capacity for available financial resources,
- lack of political will to give the environment a higher level priority.

International institutions and NGOs have recognised also a lack of long-term development vision, which results in making investment decisions based on political "moment", availability of funding for certain types of development projects and level of completeness of project documentation, and not on any environmental parameters. The "development" is often identified with "construction" and not with sustainable planning, especially in the water management and physical planning sectors. The lack of (balanced) funding for protected areas has also been mentioned.

Also, although many companies advertise their CSR concepts and finance local development projects through their granting schemes, it is considered by majority of other stakeholder groups as "greenwashing". On the other hand, the **business sector** is dissatisfied with the attitude of public administration, which doesn't see the business/industry as a dialogue partner (having in mind that all environmental technologies have been developed by this sector after all) but merely as a polluter, which they see reflected in most legislation, and they feel "punished" instead of being motivated to invest into environmental improvements. Large corporations are financially able to bear the burden of various financial obligations and able to afford standard environmental management practices (in-house waste management systems, emissions monitoring and reduction, etc.), but small and medium-sized enterprises (SMEs), which form the majority in Croatia, are forced to comply only with minimum requirements and do their planning on an ad hoc basis because there are no financial resources left for voluntary improvements.

Another common problem stated by **regional and local environmental authorities (LRAs)** is the hyper-production of new legislation (triggered by the EU approximation) and the related new obligations for them, which usually come in the form of general directions without concrete guidance/measures from the national level authorities about operational implementation in the field, and without anticipated possibilities for financing of implementation costs, so LRAs are left on their own to find implementation solutions and secure adequate funding. This results in the lack of sufficient staff and/or adequate technical knowledge to perform all administrative tasks in a satisfactory manner and to develop Terms of Reference for provision of goods and services for projects in their competence (primarily infrastructure).

There is also a lack of horizontal cooperation both in drafting of legislation and in its implementation, and also of vertical cooperation, as laws are often drafted in camera often without proper consultation with relevant stakeholder groups and with lower level of government (local and regional authorities). This results in low level of successful application of legislation, both in terms of financial possibilities of business sector, and human resource capacities at local and regional authorities.

Certainly a challenge is the fragmentation of environmental responsibilities across different sectors, so it brings either a gap in implementation or an overlapping. One example is the Adriatic Sea, which is felt by all respondents not to be properly managed due to different uses of space and interests (navigation & transport, tourism, marine water quality, coastal wastewater discharges), which are each in the competence of a different state administration authority - combined with poor communication among authorities, result is the lack of strategy and vision for sustainable development of this most important national resource. Another example is the fragmentation and understaffing of inspection services (separate inspection for environment, construction, water, health, nature protection, forestry, fisheries etc.). The new Environmental Act of 2007 has now introduced a concept of integrated permitting – IPPC (anticipating integrated inspection) which is being developed through a large EU-funded technical assistance project.

It is felt by the **NGO sector** that Croatian legislation doesn't ensure effective public participation in environmental decision-making. Though it is a formally prescribed requirement to organise public hearings and public inspections of EIA documents, preliminary discussions and hearings on draft physical planning documents etc., there is no mechanism which would oblige the decision-makers (not even to oblige the public servants administratively in charge of conducting the procedure) to include public comments into the final documents. There appear to be no cases where public interests have been taken into consideration in cases of development projects, and decisions seem to be mainly based on political and economic considerations. Though it may well be that developers have taken, or planned for, good precautionary measures against environmental damage, the public develops distrust into public administration because it doesn't show willingness to reach out to them. Another obstacle for civil society is that without proving (in)direct legal interest one

cannot participate in legal proceedings about an environmental issue. As citizens have no or little opportunity to address their needs and interests, they resort to methods outside of those anticipated by the law (protests, extreme actions etc.) and are in return considered by public authorities frequently as a nuisance rather than as an equal social dialogue partner.

4.4 The most frequent tools and their efficiency

Czech Republic

The following tools were identified as the most frequently used:

- EIA and SEA
- Land-use planning including sustainability appraisal
- Public involvement and participation / policy "lobbying"
- Monitoring

Other commonly used tools are

- Specific thematic/ technical studies (e.g. noise pollution, emission etc.) often elaborated as a part of the other tools (EIA, SEA, IPPC)
- Cost-benefit analysis (note: even if CBA was mentioned by the businesses and industries quite often, its application usually didn't include environmental issues neither as the costs, nor on the side of the benefits. So, the use of the CBA as a tool for the environmental integration is questionable)
- Cleaner production
- ISO / EMAS

Regarding the efficiency of the tools the difference between legally required and voluntarily tools shall be made. The most frequently used tools listed above are mainly tools, which are stipulated by the relevant legislation. But their efficiency is commonly perceived as low – the reasons have been already mentioned in chapter 4.4 and more specifically can be defined as:

- Overuse of EIA and SEA: the scope of application (which comes from the relevant EU directives) is too broad and doesn't allow to focus necessary human and expert capacity (of public administration, expert institutions, NGOs, public) on the most important cases. On the other hand there are several examples where environmentally controversial projects were enforced against (or even through) EIA results. There is also insufficient control of the integration of EIA / SEA results in the decision on the plan or project and its implementation.
- The potential of the land-use planning is not fully used: the land-use planning is one of the most important tools for sustainable management of the territory. The basic principles of the land-use planning already include the effort to achieve the balance between socio-economic development and environmental conditions and human health in the area. Even though the new Act on Land-Use Planning and Building Code (in force since January 2007) introduced the procedure of the sustainability appraisal⁴ for all levels of the land-use planning document (i.e. national, regional and municipal), this objective is often not fulfilled.
- *Public involvement:* the situation is similar to the described in case of EIA and SEA. Too many processes running for insignificant projects and plans cause "tiredness" of

⁴ The term used by the Act is "assessment of the impacts of the land-use planning documents to the conditions of sustainable development of the territory". SEA is a part of the sustainability assessment / appraisal procedure.

the public. Moreover the activities for the public involvement and participation are carried out only formally in many cases. Effective public participation needs to integrate directly to the planning procedure optimally from the beginning – the public shall be invited to participate in the planning, not only to provide comments to the draft plans. It is problematic to involve public in the planning on the national level – the general strategic character of the documents is difficult to understand and issues addressed are "too far from the real life". Better results can be achieved on local level especially in case of the land-use plans, since the problems addressed are known by the inhabitants and they are interested in participating.

- Policy "lobbying": this tool is used by NGOs and the public in order to enforce their interests in the planning and decision-making. Usually it's connected with promoting the issue or problem in the media. The results can be effective; on the other hand it can cause negative perception of the environmental protection in the society if too pressure policy is used. It doesn't always lead to the improvement of the environment (i.e. adoption of mitigation measures), but at least some kind of compensation can be achieved (e.g. financial compensation for the affected public).
- Monitoring: this tool is used both by the private sector businesses and industries (environmental performance of the factory) – as well as by the public administration (monitoring of the sectoral / land-use plans implementation, monitoring of environmental status). The monitoring presents one of the most useful tools for the businesses and industries – it allows to appropriately modify the operation of the facility.

The situation is different in case of the public administration. The environmental monitoring system does exist on the national and regional level. But there is usually no link to the preparation and implementation of the various plans – the indicators are established without relevance to the environmental objectives of the plans.

 The perception of efficiency of voluntary tools (ISO, EMAS) differs – for businesses and industries

Croatia

The tools identified as the most frequently used, particularly by the public sector, are those prescribed by the law:

- EIA,
- physical planning,
- public participation in these two procedures.

Technical studies (pre-feasibility and feasibility studies on specific environmental aspects) are used quite often by environmental authorities at different levels, as background documents for development decisions.

The business sector also commonly uses voluntary quality assurance tools, such as ISO standards and EMAS, as well as monitoring of environmental performance.

As to the efficiency of most commonly used tools, the general opinion is that frequently application of these tools and studies serves only to satisfy formal requirements and that final development decisions are anyway taken by the 'politics of the moment', without clear long-term development visions.

Generally speaking, all the problems related to low efficiency of environmental mainstreaming tools in the Czech Republic are valid also for Croatia.

4.5 Tools to be included in the User Guide

According to the opinion of respondents, the following table summarizes the tools which were mentioned and/or recommended for inclusion into the User Guide. The tools mentioned only by one or two respondents are listed bellow the table.

Explanatory notes to the table:

The colours of cells indicate division into groups by the number of respondents:

- yellow the three "top" tools
- light blue the tools mentioned by more than 10 respondents
- orange the tools mentioned more than 2 respondents and less than 10 respondents

Order of tools within the same score doesn't indicate any kind of ranking.

CZECH REPUBLIC		CROATIA	
ΤοοΙ	Number of respondents	ΤοοΙ	Number of respondents
Public participation	17	Public participation/actions	23
SEA, EIA	15	EIA	22
Monitoring and evaluation	12	Monitoring and evaluation (of energy flow, material flow, cash flow) / monitoring through public involvement	19
Environmental management tools (ISO, EMAS etc,)	12	Education: - of project developers - of LRAs (administrative and professional) - of (present & future) decision-makers - environment integrated in educational materials for all subjects, not as a separate subject matter - setting up special educational institutions	17
Land use planning tools	11	Land use planning tools	15
Economic and financial evaluation (general)	9	QA tools, e.g. ISO, EMS and EMAS, even outside the business sector	14
Legislation tools	6	Information/general awareness raising	12
Sustainability appraisal	5	Economic/financial assessments and analyses	11
Conflict management	5	Multi-stakeholder consultation (workshops) combined w. expert analyses/assessments	7
Political decision making	4	Inspection and enforcement	7
Strategic planning	3	Indicators of baseline state of environment / Monitoring environmental parameters of projects	5

Sustainability indicators	Sustainability indicators 3 Cross-sectoral networki		5
Environmental education and awareness raising	3	RIA (environmental, fiscal)	4
Motivation tools	3	3 Public discussions / hearings	
		Certification - forestry - Global GAP (Good Agricultural Practice, industrial sector)	4
		Cross-sectoral networking	4
		(Pre)Feasibility studies	4
		Green accounting in governmental institutions	4
		Access to justice (without proving legal interest)	3
		Access to information	3
		Political analyses/actions	3
		Engaged / committed public media	3

Following tools were mentioned only by one or two respondents (order doesn't indicate ranking):

Czech Republic:

- Indicators for efficiency of the environmental mainstreaming (benchmarking)
- Landscape planning
- Legislation
- Community planning
- Connection of strategic and land-use planning
- Involvement of experts to the planning process
- Politics of the businesses
- Communication with people
- Creating of strategies and programmes
- Risk management
- Marketing
- Working groups of experts, round tables
- Regulatory tools
- Tools to ensure the balance between all 3 pillars of the sustainability
- Tools to measure efficiency of the tools for environmental mainstreaming
- Eco-consultations
- Eco-design, environmental-friendly products
- HIA

- Cleaner production
- Expert studies
- Environmental guidelines
- Health hazards
- Independent impact assessment, independent impact assessment experts
- Coordination of land-use planning and protection of environment
- Tools for waste disposal in the company

Croatia:

- Deposit refund system for packaging
- Stable financing mechanisms
- Unified environmental reporting to institutions
- Databases/database management/environmental information system
- Defining carrying capacity of space / limitations of growth
- Economic instruments (taxes, incentives etc.)
- Local advisory councils (co-decision-making bodies in local communities)
- Legal remedies
- PA management planning
- Protected areas system
- Education of the public and NGOs on environmental legal rights
- Self-evaluation
- Rationalisation of state government
- National reporting on state of environment
- National environmental programs and plans
- National SD strategy
- APELL (Awareness and Preparedness for Emergencies at Local Level)
- Strong political will
- Multi-disciplinary approach
- Mathematical models (for calculating environmental carrying capacity, assessing scope of environmental impact)
- Environmental Fund
- Open administration (partnership with the civil society)
- · Externalisation of environmental protection costs
- · Definition and operationalisation of SD principles
- Watchdogging
- Options/Alternatives
- Liability for environmental damage
- Compensation for reduced real-estate/environmental value
- Innovative eco-technologies

- Volunteers in PAs
- By-laws/implementing regulations
- Anti-corruption methods
- Project Cycle Management
- Environmental Mgmt Plans (planning in advance, instead of EMSystems)
- Strategic business planning
- Lobbying
- Demonstration projects/sites
- Eco-referenda
- Rational resource use
- NGO networking
- Cross-border cooperation
- Better definition of overriding public interest
- · Horizontal and vertical cooperation of authorities
- In-house specialisation of staff on various environmental aspects
- Citizens mobilisation/organising
- Promoting corporate social responsibility
- Case studies of negative experience (lessons learned)
- Legal appeals for environmental damage

The following tools were indicated as not sufficiently known or applied in Croatia:

- SEA, including concrete examples
- CBA based on quantitative data
- Social Impact Assessment
- Health Impact Assessment
- Incentives for green investments
- IPPC
- Sustainable development indicators
- Integrated RIA Regulatory Impact Assessment (social & economic aspects are lacking)
- Assessment of the value of nature "as such"
- Incentives for energy efficiency
- Performance budgeting in public administration
- Algorithm of calculating amounts of environmental charges (municipal service prices)
- Mathematical models to assess risk of ecological disaster
- · Methods to increase carrying capacity for human activity
- · Precise quantitative assessments of impact on biodiversity/eutrophication
- Optimal monitoring of environmental parameters and impacts by maximising benefits to costs

• Methods for environment-oriented decision-making

4.6 Criteria for tools selection

The tables bellow provides the overview of the criteria for selecting the tools recommended by the respondents to be included into the User Guide.

Explanatory notes to the table:

The colours of cells indicate division into groups by the number of respondents:

- yellow the three "top" criteria
- light blue the criteria mentioned by more than 10 respondents
- orange the criteria mentioned more than 2 respondents and less than 10 respondents

Order of criteria within the same score doesn't indicate any kind of ranking.

Czech Republic:

Criteria	Number of respondents
How understandable the outputs are to the primary stakeholders	28
Ease of use	27
Robustness (does the approach deliver credible and sufficient information for effective decision-making?)	21
The costs	17
The time required	14
The extent to which the approach requires data, fieldwork, etc	13
Level of impact on helping to make progress towards sustainable development	13
The extent of the skills, training, qualifications required to use the tool	11
Other criteria (not included in the questionnaire)	
Efficiency	2
Independency	1
Utility in practice	1
Access to data	1
Economic efficiency	1
Possibility of control and feedback	1
Enforceability	1

It's possible to conclude the answers didn't vary between the groups of respondents – comprehensibility of outputs and simplicity of using of the tool is obviously important for the representatives of almost all groups (public administration, expert institutions, political representation and businesses as well). The respondents also place the emphasis on the quality of information for good and effective decision making.

Two respondents pointed out that they cannot choose the criteria because it is impossible to formulate them generally, when the cases are always different.

Respondents also mentioned other criteria outside of the list – e.g. efficiency, access to data, enforceability or possibility of control and feedback. These criteria were mentioned only once or twice but they are very important, too, and more votes for them could be expected if they were included in the list of criteria in the questionnaire.

Croatia:

Almost 50% of Croatian respondents did not consider it useful to rank the tools at all according to any specific criteria, because majority of tools would probably function differently in different social, political and cultural contexts, and also differently in cases where a certain tool has a long history of use in comparison to environments in which a tool has been newly introduced.

Criteria	Number of respondents	
The time required	42	
Ease of use	41	
The costs	41	
Robustness (does the approach deliver credible and sufficient information for effective decision-making?)	23	
How understandable the outputs are to the primary stakeholders	21	
The extent to which the approach requires data, fieldwork, etc	15	
The extent of the skills, training, qualifications required to use the tool	15	
Level of impact on helping to make progress towards sustainable development	11	
Other criteria (not included in the questionnaire)		
Access to data for monitoring	14	
Utility in practice	12	

4.7 Case examples

Several both positive (+) and negative (-) examples of environmental mainstreaming described by respondents of the survey are listed bellow. It needs to be mentioned that not all collected examples are listed here, since there were many examples given by different stakeholders describing the usual tools (e.g. EIA, (pre)feasibility studies).

Czech Republic

Example 1 – Principles of Territorial Development for Prague (+): From the perspective of the land-use planning the Prague is both region and municipality. The Regional Principles of Territorial Development presents the background land-use planning document and the basis for the further preparation of the more detailed land-use plan (for the same territory i.e. Prague municipality, but in smaller scale). The Principles were prepared by the Section of the Development of the Prague Municipality.

The sustainability appraisal had to be carried out as requested by the Act on Land-Use Planning and Building Code. The appraisal was conducted through ex-ante approach i.e. in parallel with the preparation of the Principles. The expert responsible for coordination of the sustainability appraisal was an employee of the authority preparing the Principles – this arrangement enabled the mutual communication between planners and sustainability appraisal process, which led to the early identification of the potential conflicts and provided "environmental point of view" to the main objectives and priorities of the Principles.

Tools used: Sustainability Appraisal

Example 2 – Study of wind energy potential in the Moravian – Silesian Region (+): The study was prepared on the request of the Region (as ad-hoc study) and it's the documents with recommendatory character for permitting of the new wind power plants in the Region. It's currently used for decision-making as a voluntary and supportive tool and it will be also adopted – in the form of spatial limits – in the Regional Land-Use Plan. Based on this study the similar ones have started to be assigned by the other regions and municipalities.

Tools used: Specific technical study prepared by the consultancy.

Example 3 – EIA for multi-purpose sport arena in Prague (+): The project developer asked for the extensive public participation and involvement in the EIA from the beginning of the process. The main motivation of the developer was to identify, address and solve all potential problems and conflicts during the early stage of the project, since the time-schedule for the project implementation (i.e. construction of the sport arena) was tight with very strict deadlines given by the financing institutions. The consultancy company assigned to carry out the EIA involved "umbrella" type NGO active in Prague to ensure the public consultation process. The consultation process can be considered as successful since the comments received from the public (regarding e.g. increased transport intensity during the sport and cultural events in the arena, parking places etc) were discussed and used in the EIA report.

Tools used: Public participation

Example 4 – Parallel SEAs for 4 development strategies of Moravian-Silesian Region (+): The assessment was conducted in 2004 – 2005 on the voluntary base. The SEA team tried to consider the requirements of proposed legislation (at the time, the draft EIA Act with new provisions for SEA was already known, but not officially approved by the Parliament). The administrative requirements were minimised by the fusion of SEAs for 4 concepts in one process, and so it was possible to concentrate mainly on impact assessment itself.

Tools used: SEA

Example 5 – Noise study for ArcellorMittal Ostrava (+): ArcellorMittal Ostrava is a big metallurgical company. After poor noise study (too general, without specific measures) the noise studies for the specific installations were prepared – defining specific measures. In connection with strong public pressure for the minimising the environmental and health effects of the operation of the industry, there is real effort to realize proposed measures.

Tools used: Specific technical study + raising awareness on the environmental issues, which initiated the public pressure.

Example 6 – EIA of downhill course Kyčerka (+): The detail biological survey including assessment of impacts to Natura 2000 sites was conducted based on the results of the screening and in the cooperation with the investor. The project was finally realized according to the recommendation of EIA.

Tools used: EIA and specific study

Example 7 – OKD Foundation (+): The foundation was established by OKD (big black coal mining company) in January 2008. It finances among others also projects in the field of protection of the environment. These projects are focused on the improvement of the environmental quality or on the support of the environmental friendly behaviour and other forms of the enforcement of the sustainability principles.

Tools used: Private financial schemes for environmentally beneficial projects.

Example 8 – Environmental monitoring for Operational Programme Enterprise and Innovations (+): The Operational Programme Enterprise and Innovation (hereinafter "OPIE) is a document concerning the use of EU financial sources in the area of enterprise and innovation. The Programme was prepared by the Ministry of Industry and Trade of the Czech Republic and it develops the priority axis "Strengthening competitiveness of the Czech economy". The OPEI sets the objectives, priority axes and areas of intervention for support in the framework of which it will be possible to submit project proposals for co-financing from the EU Structural Funds.

The SEA for OPEI was carried out – it proposed the system for the environmental monitoring as one of the outputs. The proposal for the environmental monitoring is based on a presumption that the single projects submitted within the programs are the OPEI implementation tools. The system outlined takes into consideration the fact that, during monitoring of environmental indicators on national level, it is impossible to distinguish the OPEI environmental impacts from impacts of other activities /interventions (projects financed from sources other than the OPEI). So, the logic of the system is to use the proposed environmental indicators also as environmental criteria for the project evaluation and selection (i.e. projects submitted within the OPEI for financing) and by aggregation of the data from the project level to estimate the overall environmental effects of the OPEI.

As resulted from the discussion with the representatives of the Ministry of Industry and Trade within the User Guide survey, they integrated the relevant environmental indicators (5 altogether) in the overall monitoring system and use them also as a environmental criteria for the project selection (use of brownfields, use of renewable energy sources, energy savings, reduction of the waste production and reduction of CO_2 emissions). If the project contributes to these criteria, it can obtain +8 points from 100 points (total maximum for the project). So, this system forces the project developers to integrate the relevant environmental issues in the project since it enhances the chances of the project to be granted.

Tools used: SEA, environmental monitoring

Example 9 – EIA/SEA Information System (+/-): The EIA information system (project database) and the SEA information system (concept database) are central for the whole Czech Republic. The system registers all EIA and SEA processes (both already closed and running) in the Czech Republic. The first version was established already in mid-1990s. It is publicly available and accessible trough the web page of the Ministry of Environment or Czech Environmental Information Agency.

Relevant authorities are obligated to publish documents in the systems, as stipulated by law, i.e. all relevant documents during the EIA and SEA process (notification, screening and scoping decision, report + project / plan itself, final statement etc.). The system also includes a list of authorised persons and a section containing regulations relating to the environmental impact assessment. The information systems also include lists of entities authorised to provide documents and expert opinions, a summary of the legislation related to the assessment process including explanations, and provide other notifications.

The information system is very widely used by all relevant stakeholders, since it already operates many years and the public is used to it. Unfortunately, since the legislative changes linked to the adoption of the new Act on Land-Use Planning and Building Code, the local land-use plans have been excluded from the system and shall be published separately under the regime of the Act (i.e. by means stipulated for the land-use planning process). This means the integrity of the EIA/SEA system has been disrupted.

Tools used: distribution of information, raising awareness

Example 10 – EIA for highway D43 (-): The EIA carried out for the highway was only formal. Although even ombudsman (i.e. public defender of rights⁵) calls attention in the long-term basis to the missing evaluation of the alternatives, there is a pressure (from the public administration and investors) to enforce the preferred alternative – the necessity of the fast solution of the transport connection is used as the main argument.

⁵ The Czech Public Defender of Rights was established by Act No. 349/1999 Coll. on the Public Defender of Rights. The main role of the ombudsman is to ensure protection of rights and legitimate interests mainly in the areas in which the citizens or other entities and subjects encounter the offices of state administration.

Tools used: EIA, legal tools

Example 11 – Strategic development plan of microregion situated on the border of the protected landscape area (–): The plan preparation was initiated by the local authority (motivated by the possibility to get the funding from the EU Structural Funds) and prepared by the external experts. The environment was considered as one of the development strategies and spatial development tools within the preparation of the strategic development plan. All strategic objectives were formulated towards to the sustainable development of the territory as a main aim. Unfortunately, the strategic plan was not implemented – the plan stipulated the priorities and measures, which were not accepted by the local authority.

Tools used: Strategic planning

Example 12 – The land-use plan of City of Pilsen (–): The amendments of the land-use plan for the City of Pilsen were prepared under the coordination of the Department of the City Development and Conception. The implementation of the amended plan faces the number of difficulties and it's hardly applicable in practice. The municipal council does not try to buy (or change) the land owned by the private subject, which is necessary for the realisation of the proposed development project and so the implementation of the plan is blocked. This leads to the limited utilization of the specific localities (but the proposed projects cannot be implemented there, since the City doesn't own these sites), and the negative public opinion as a consequence (the projects are not implemented, but the localities cannot be used for other purposes).

Tools used: Land-use planning

Example 13 – EIA for the river channel Přelouč (–/+): EIA was conducted for the river channel, resulting in the EIA report with the positive statement (i.e. the project can be implemented) with conditions for the implementation stipulated. One of the conditions was to move several rare species of the protected butterflies and other protected species (insects) out from the construction site. The Ministry of Environment decided not to follow the conclusions proposed by the EIA report and issued the negative statement.

Tools used: EIA

Croatia

Majority of interviewees pointed out that they consider EIA as a good tool in principle (given its traditional use in Croatia since 1984), but its concrete application has been limited in the past decade, due to too strong political influences on final decision-making often without regard for professional/expert opinions, which causes too weak motivation of experts involved (insufficient field research, mainly relying on desk research and old data, not sufficiently using internationally available tools like CBA, SIA, HIA etc.), weak motivation of EIA Review Panels for issuing stricter and more specific environmental mitigation measures and, combined with poor possibilities of monitoring the application of these measures (inspection, self-control), consequently, almost all EIAs get assessed positively, which also points to under-refined criteria and external influences on decision-making. They are hopeful that introduction of SEA would help introduce an efficient multi-sectoral approach to decision-making, and would like to see in the future User Guide some concrete examples/case studies.

Example 1 - Environmental civil sector (+): Draft national Water Management Strategy – as there was no experience or political will for public participation in the (traditionally self-sufficient) water sector, the document was initially drafted without any consultations with external stakeholders. After publication of the draft and announcement of the start of Parliamentary adoption procedure, the public strongly reacted (lead by Zagreb-based NGO Green Action) and prepared substantial comments which stopped the parliamentary

procedure and forced a dialogue between the ministry in charge of water management and the non-governmental organisations. The comments referred to the declarative language of the Strategy, which concentrated mainly on infrastructure investments. After the NGO intervention, it resulted in a much improved document, e.g. introducing measures to ban privatisation of water supply, protect strategic water wells, shifting investment priorities to water infrastructure and water protection, etc.

Parliamentary procedure is expected to start by June 2008. However still the feeling of the public is that protection measures have not been fully reflected, but the water ministry is working on the development of a rulebook to regulate public participation in development of water policy documents, so there is reason to believe that there will be a mechanism to intervene into subsequent legislative processes as well. Involvement of public and intermunicipal cooperation in preparation of river basin management plans will be included here as well, according to EU Water Framework Directive requirements.

Example 2 - Environmental civil sector (+): Stopping illegal exploitation of sand and gravel / banning sports fishing in protected area of Kopacki Rit Nature Park (wetland, Ramsar site)

Tools used: initially formal requests for sanctions were sent to inspection authorities, which left without reply, so NGOs (lead by Environmental Press Center and Osijek Greens) resorted to photographic monitoring of critical hot spots and sending them to the competent Ministry (regardless of administrative silence); publishing stories and photo evidence in local and national newspapers; mobilising local population to assist in monitoring and report any illegal actions they observe, even to the police. This helped to motivate the nature protection inspectors to come to the field and start issuing sanctions, and it resulted in the Park management hiring additional Park rangers and introduction of additional rulebooks and better regulation (zoning) of sports fishing. Also, although there are just few closed exploitation sites still, there have been noticed some positive changes in the mining sector legislation and bigger and bigger reluctance of construction companies to purchase construction material from problematic/potentially illegal locations.

Example 3 - Environmental civil sector (+): A model for motivating local enterprises to environmentally responsible behaviour, jointly developed by the NGO PCAP International and the Local Citizens Council – establishment of a local Environmental fund, which collects revenues from business sector contributions and uses them for greening public areas, tree planting, watercourses maintenance etc. Representatives of the Local Citizens Council sit on the evaluation committee for the selection of best greening projects, which can be submitted by local schools, NGOs, municipal councils etc..

Tools used: regular meetings of the Local Citizens Council with business representatives; awareness raising of the business sector for responsible social behaviour, advocacy actions towards promoting social consciousness.

Example 1 - National authorities (+): Newly introduced joint nature protection inspection - joint inspection visits by a nature protection, forestry and fisheries inspectors, together with Protected Areas ranger services. The initiative started less than 1 year ago and it is difficult to measure success still, but it is an attempt to integrate environmental and nature resource protection considerations into (traditionally resource-exploitative).

Tools used: joint application of natural resource protection measures; annual monitoring of success.

Example 2 - National authorities (+/-): High-profile project DruzbaAdria (reconstruction of the oil pipeline for transport of larger quantities of oil from Cro-Hungarian border to the oil terminal in Omisalj on Adriatic coast - to be joined with the oil distribution pipeline from Russia, and ensuring conditions for transport of oil through the Adriatic) - the EIA report was rejected because of inadequacy of the expert data in the report, despite the EIA Review

Panel's requests. A strong and loud NGO campaign was initiated against this project, primarily motivated by the secrecy of the whole process and no public access to the data, which were mainly proclaimed as business secret. As a precaution and to avoid even larger protests, the Ministry of Environment set up an unusually large EIA Review Panel, and announced the Panel's sessions like large conferences; for the same reason, the Panel's requests to the developer to improve the information in the EIA report were set stricter than usual; however the developer decided to ignore those requests so the project was finally stopped. Some NGOs take credit for stopping the project - although the project wasn't stopped only because of NGO action, it was certainly the trigger that enabled a closer scrutiny of the EIA documentation, and disabled potential political influencing on the decision on environmental acceptability of the project.

Example 3 - National authorities (--): SEA for the General Zoning Plan of the Town of Šibenik. The case was developed as a pilot study in the framework of a larger EU-CARDS institutional strengthening project to introduce a SEA system into Croatian legislation. The document was supposed to make comments/recommendations for actions planned on 14 strategically important locations within the wider town territory from the point of view of environment. It was reportedly difficult for the SEA team to communicate with the planning team.

Although the final SEA document did give certain recommendations for improving the Šibenik Zoning Plan in 14 most important locations for the town, it will not be enforced because this level of document is not subject to SEA according to the new Environmental Act (Nov 2007) – the SEA will affect only the national and regional level planning documents. Also, the General Zoning Plans have been abolished as a physical planning category with the new Physical Planning and Construction Act. This was an example of a lack of coordination in law-making procedures between separate sectors of a same ministry (Ministry of Environmental Protection, Physical Planning and Construction) – the SEA process was completed in spring 2007, while the new Physical Planning and Construction Act and the new Environmental Act came into force in October/November 2007. This way the pilot project was not a useful learning experience as it was done on a type of planning document which will not be used.

Example 4 – National authorities: Since May 2007, the Government has prescribed an obligatory Regulatory Impact Assessment to estimate environmental aspects of (implementation of) all draft bills and regulations. A standard form has been developed for the proponents to identify and describe impacts of the proposed regulation to all environmental media and parameters, including an indication of cause & effect relations, and a qualitative impact assessment (likelihood of impacts; whether impacts will be positive, negative or unknown; and importance/scope of impact). The Ministry of Environment has a crucial role in deciding whether the environmental impacts have been assessed properly and whether a regulation in question can be subsequently approved.

Example 5 - National authorities: Division for Selective Forms of Tourism of the Ministry of Tourism for 5 consecutive years supports (financially and with experts) environmentally sustainable tourism projects at local level (e.g. eco-village destinations). Tools usually include multi-stakeholder consultations in project planning and implementation, and use of international experiences in developing sustainable tourism products. Also there is a standing budgetary fund for co-financing such local initiatives, managed by the Tourism Ministry.

Example 6 - National authorities: Draft Nautical Tourism Strategy has been drafted and sent out for comments this March. The document anticipates SEA for every single nautical port system in relation to other neighbouring activities, and doesn't anticipate construction of new ports but only reconstruction of existing ports and revitalisation of obsolete facilities, which should enable organised use of space in natural bays and prevention of further degradation

of space (docks, waste containers etc. to be located where the space is traditionally used in that way). The document is a product of multi-sectoral consultations and workshops for stakeholders in nautical tourism, like all other national level documents in the competence of the Division for Islands Development of the Ministry of the Sea, Transport and Infrastructure.

Example 1 - Business sector (+/-): Rule Book on Packaging Waste (2005) – the new rulebook defined the obligations for producers of all packaging material to cover costs of their collection, final disposal and recycling, through a system of fees, and possibility of issuing concessions for collection and disposal of this waste. It also introduced a possibility for consumers to get a deposit refund for certain types of plastic, glass and aluminium containers of drinks. With this Rulebook the producers were obliged to adapt their production lines to certain prescribed types of packaging, and it also set the target of 55% of recycled packaging waste by 2008, and 80% by the year 2015. The whole system is managed by the Croatian Environmental Protection Fund (opposed to usual practice in other countries, where this is handled by a recovery organisation set up by the business sector itself).

The application of Rulebook provoked many protests of the business sector as they claimed it has set unrealistic waste management targets, too short deadlines for adaptation of production processes to prescribed packaging types, increased largely the production costs which cannot be compensated easily due to various collection and disposal charges, and it aimed to resolve only the 20-30% of packaging waste volumes (packaging for beverages), without obliging the Fund to deal with the recycling or final disposal of the rest. It also does not resolve the issue of re-investing the revenue collected from the business sector into environmental improvements. Their main objection was that the rulebook as such was produced without stakeholder consultations (despite earlier submitted comments and extensive several year discussions/dialogues), and that Ministry is not flexible enough for adaptation to the actual situation in the field. However the rulebook was supported by the public/NGOs due to anticipated high sanctions on the economic sector, its social/welfare component (0.5 kn per piece of returned packaging helped improve the status of the poorest part of population), and spin-off effect of visually cleaner public spaces.

Example 2 - Business sector (+): Agrokor, major Croatian business concern (30 organisational units, food and beverage production and marketing companies) – recognising the importance of environmental protection, it recently introduced a corporate position of Executive Environmental Manager, directly linked to the top management of the corporation, and starting to introduce uniform EMS principles and ISO 14001 and 9001 certification in all organisational units. Earlier an environmental manager in each organisational unit was related to occupational safety or maintenance units, and the new system has elevated this position to a corporate level in all 30 organisational units, with direct line of communication to the management. Success story: Belje agriculture and food industry (food/wine production, agricultural services, own pig farms) is about to receive the ISO 14000 certification.

Example 3 - Business sector (+): Croatian Business Council for Sustainable Development Calculation and Ericsson Nikola Tesla (IT equipment) a decade ago initiated the charging of waste collection in industry according to volume, not square meter, which helped reduce the operation costs, contributed to separation of waste, recycling and commercial use of recovered waste, even before the legislative framework was set up. Initially it was implemented only for City of Zagreb, subsequently expanded to several counties, and also to calculation of household waste per container. Tools that were used included consultation within the business sector and with local municipal utilities.

Example 4 - Business sector (+): Holcim Cement Industry: corporate environmental strategy includes a component related to eco-design - the product was adapted to sustainable

consumption (product segmentation) in the way that cement types are adapted to intended usage (more or less clinker/ CO_2 in production process).

Example 5 - Business sector (+): Voluntary initiative of professional association of the solvents-consuming industry (dry-cleaners, paints and varnishes) to reduce consumption of VOCs even before the related EU Directive was transposed into domestic legislation (Sept 2007), and to increase education levels of involved companies about health and environmental effects (request for inspection's lectures). The initiative developed by word of mouth (awareness of health impacts, awareness of future fines for non-compliance).

Similar initiative is starting for the halons industry (fire-extinguishing agents) and there are direct requests to the Ministry of Environment for education of the entire target group (importers, bank of halons, users).

Example 1 - Local government (+): Town of Samobor - measures to limit the rapid increase of town population and related use of space.

Tools: increased municipal service prices for apartment buildings (not for individual houses) as a de-stimulation for new residents, this is the way of saving on resources and energy use because in the end there will be less people living in the town and less burden on the quality of environment and living space.

Example 2 – Local government (+): The Zagreb Institute of Economy has developed local strategic development programmes for several towns (Virovitica, Sisak, Samobor, Benkovac, island of Šolta), which included SWOT analysis, analysis of existing physical planning documentation, implementation guides, and a Public Budgeting model which anticipates planning of local development measures in line with budgetary possibilities (including subsequent monitoring & evaluation of public spending). The model was later successfully applied in Benkovac and Samobor only, due to local enthusiasm and the fact that the project idea came from the local level, and was not suggested by external experts or imposed by national institutions.

Example 3 - Local government (+): The Nature Protection Law limits the competence of local authorities towards proclamation of protected areas - only Culture Ministry has the authority for protected areas proclamation, which restricts possibilities of physical plans to protect certain territories. However, City of Zagreb issued in 1991 a municipal decision to protect Savica-Šanci floodplain as a valuable biodiversity area in its territory and issued a separate physical plan. Another problem in the area is the disposal site for gudron (inert waste from oil refineration processes), which for decades has been disposed in the nearby area, unaware earlier of the hazardous characteristics, and now it poses a threat to Zagreb groundwater reserves. In line with new international obligations and biodiversity trends, the City of Zagreb recently introduced the category of preliminary protection of the area as ornithological reserve. The initiative anticipates also remediation of the gudron-contaminated site, and currently a pre-feasibility study has been initiated to define available remediation technologies.

Example 4 - Local government (+/-): Mobile facility for incineration of organic waste located in the area of Zagreb disposal site (used for all hazardous waste regardless of the type and point of generation), was shut down after a fire accident, due to unsatisfactory protective measures, and remediation of the area initiated. However, opinions are split as to whether that was the best thing to do: instead of improving the technology and keeping the capital in the local community to create more job opportunities, political pressures and local public protests that existed even earlier (lack of trust into decision-makers and into modern incineration technologies) were the trigger to use the fire accident as a reason for shutting it down. Later on the hazardous waste management was entrusted to various concessionaries, according to waste types, and it becomes more difficult to check compliance.

Failure to keep the incinerator facility running was due to lack of information about hazardous waste and management technologies (the authorities didn't bother to deal with public information, but rather took the easy way out, to calm down the public protests).

Example 1 – Regional government: As an offset to the proposed hydro-power plant system on the Drava River (bordering Hungary), the counties of Koprivnica-Krizevci, Varazdin and Medjimurje and Town of Osijek initiated procedure for proclamation of the Drava-Mura Rivers Regional Park to preserve natural eco-systems and valuable habitats in the area. Based on its natural importance as the potential Natura 2000 site the preliminary protection status (3-year period validity) was granted to this area in February 2008, which now extends over the territory of 5 Croatian border counties. The tools used included public discussions, EIAs and feasibility studies, as well as background scientific material developed by the State Institute for Nature Protection, and cross-border consultations with Hungary. Thanks to the joint Hungarian and Croatian civil society organised protests and petitions, support of the domestic and international scientific community, and regional authorities' option for ecosystem conservation, the hydro-power plant development was temporarily stopped, and the final decision about the project is still pending.

Example 2 - Regional government (--): There is an obligation to form new/separate administrative departments for environmental protection at regional/county level, brought in by the new Environmental Act of 2007, whereby the regional authorities have received new duties in the area of implementing EIA and SEA procedures at county level, and environmental reporting. Until the end of 2007, environmental issues were dealt with within multi-sectoral departments for economic affairs, municipal infrastructure, housing, development etc., usually with very few staff to cover all areas. The new legal obligation prescribes transfer of certain amount of staff to these new departments, however regardless of the substantial differences in staffing, funding and expertise levels of the previous multi-sectoral departments, these obligations have been prescribed same way for all 21 counties, giving a maximum 5-months period to adjust to the new obligations. The Law entered into force in November 2007, after the annual budgets of regional authorities have already been adopted, and now the regional self-government units are left on their own to find best solutions to fulfil this obligation.

Methods: Although the usual method of consulting the statutory consultees about the draft bill has been conducted, the comments and objections of regional authorities didn't seem to be taken into consideration in this respect, in the final version of the Law.

Example 3 – Regional government (Regional Development agencies): Varazdin County Regional Development Agency (AZRA) undertook a cross-border project with Slovenia, for reconstruction of local elementary schools. In order to define order of priority for reconstruction, calculation of energy consumption was undertaken and the schools with highest consumption levels were the first to be addressed. Tools that were used included: energy accounting; cost-benefit analysis (CBA); benchmarking of buildings – justified by low implementation costs and relatively easy application.

Example 4 – Regional government (Regional Development agencies): Podravina & Prigorje Regional Development Agency (PORA) in 2007, in the framework of the project EUQUALEN Increasing European Quality of Entrepreneurship Culture in the Koprivnica-Krizevci County, coordinated work of the multi-stakeholder group on the development of Integrated Environmental Monitoring and Control System for the same county (establishing baseline state of pollution of air, soil and groundwater and their continuous monitoring), for which a permanent County task force has been set up, consisting of regional administration, local public and private sector representatives and SMEs.

Example 5 – Regional government: APELL procedure in the development and adoption of county emergency plans. APEL – is "Awareness and Preparedness for Emergencies at Local Level", a tool developed by UNEP, which anticipates an active partnership among all relevant sectors.

Example - International organisations (+): COAST project Conservation and Sustainable Use of Biodiversity in the Dalmatian Coast (UNDP-GEF funded, 2007-2011) - operating in four Dalmatian counties (Zadar, Sibenik-Knin, Split-Dalmatia and Dubrovnik-Neretva) the project aims to ensure that investment decisions among operators in tourism, agriculture, fisheries and mariculture sectors are made on the basis of biodiversity and environmental criteria. The wider objective is that the development path of Croatian coast is environmentally sustainable. In order to accomplish this goal, the project aims to effectively mainstream biodiversity and landscape diversity conservation and sustainable use into the activities and practices of large numbers of private-sector stakeholders and consumers. The project is working to remove barriers to mainstreaming and implementing environmentally friendly practices of the key economic sectors in Dalmatia: tourism, fisheries, mariculture, agriculture and banking/finance. Activities focus on:

- (1) Biodiversity-friendly development is demonstrated in four small but globally important productive landscapes (demonstration-sites).
- (2) An improved investment climate for biodiversity friendly enterprises making private sector more willing to invest in these and other biodiversity-friendly production across the four counties, with a special focus on SMEs. Work with the banking sector to increase the supply of BD-friendly loans.
- (3) Increase compliance with existing biodiversity-related regulations in the tourism, fisheries and agriculture; it will also increase compliance with protected area regulations, and it will strengthen capacity to enforce BD-related planning regulations.

5. Conclusions

5.1 Main features of the environmental mainstreaming

The main message from the survey can be defined as follows: the problem is not the lack of tools, but in their effective application.

The findings from the Czech Republic show, that the most frequently used tools (EIA, SEA, land-use planning) are those required by the relevant legislation. On the other hand, the efficiency of these tools is generally considered as low – i.e. the contribution of their application to the decision-making processes is insignificant quite often. Taking into account also finances and time required for carrying of the EIA, SEA, IPPC or preparation of the land-use plan, these costs are not balanced by the appropriate benefits. This is perceived so both by planners, investor and businesses (since they "pay for nothing, but fulfilling legal obligations"), as well as by NGOs (since there are number of cases where plans/projects with environmentally adverse effects were enforced and implemented, even if EIA or SEA was applied).

In the field of environmental assessment still dominates the bureaucratic level of the process. In the most of the cases, the investors don't anticipate any real contribution and they consider the assessment process only as a fulfilment of legislative requirements in line with the timeline of the project preparation. In practice, the results of EIA are often not added to spatial planning documentation; there is a lack of the relevant provision in the legislation to ensure that an EIA is applied before the planning inquiry.

One of the key principles which can enhance the efficiency of the environmental mainstreaming is the integration of the relevant tools to the development activity (preparation and implementation of the plan/project, the operation of the industrial facility etc.). The most relevant stakeholders i.e. plan/project developer as well as decision-makers have to understand the purpose of the tools application as a way to improve the plan/project from the environmental perspective, not as a method which will block or forbid the activity. This can be generalized also for the perception of the sustainable development concept as such – it still tends to be understood as a synonym for the environmental protection, which is often not helpful, since it can lead to general rejection of this concept.

In fact sustainability issues are, at least rhetorically, integrated in almost all national and regional strategic and planning documents, but there is a significant gap between the addressing the sustainability / environmental issues on the strategic level and their application in practice. The land-use planning can be used as an example – though widely recognized as a tool with remarkable potential for environmental mainstreaming (which results from the primary definition of the land-use planning objectives), the general scepticism about its real role for management and coordination of the territory can be noticed.

Another problem reported is an overcomplicated legal system for environmental protection – long and complicated procedures as well as their overlaps. In some sectors (e.g. transport) the usual planning itself was mentioned as the primary cause of negative environmental effects, since it doesn't appropriately integrate the relevant environmental issues.

As results from the survey in Croatia, it is noticeable that usage of most tools mentioned above depends on whether they are prescribed by the law or not, as this is usually the only reason that makes decision-makers use them. It also confirms the fact that environmental mainstreaming actually seems quite well regulated, but administrative and financial capacity is lacked for their better enforcement, both in the business sector and in the governmental institutions. Some international institutions' respondents also pointed out that, since environment is a cross-cutting issue (even often wrongly identified with sustainable development), it should be incorporated into all sectoral institutions and not exist as a separate administrative authority. This might help in raising overall awareness of its importance and foster mainstreaming into relevant strategies, policy documents and, finally, into their practical implementation in the field.

In Croatia several sectors seem to be still unaware of the need to integrate environmental issues into their decision-making, primarily: healthcare, water management, tourism, energy, transport, metallurgy, oil industry. Agricultural sector is still quite unprepared for cooperation with the environmental sector, but improvements are visible (under the EU approximation influence) in terms of starting of implementation of the organic products certification scheme. and start of development of the Best Agricultural Practice code with a view of anticipating measures for reducing agricultural impacts on soil and groundwater guality. It is guestioned by many respondents whether the physical planning is able to really reflect strategic development goals - the planning of uses of space is under influence of local/national political or private interests; many physical plans are designed in a general way and leave room for different interpretations, usually in favour of large development/construction projects, too ambitious in terms of existing local infrastructure capacities (especially tourism and municipal housing projects) or without taking into consideration the need for balanced spatial elements (change of use of privately owned urban green areas into construction land, while local authorities don't have sufficient financial resources to buy out land). Environment is not sufficiently integrated in the educational system either - some respondents have noticed that students leave their schools/studies without any specific knowledge of environmental management through the prism of their studied discipline. Some respondents mentioned also a problem of sensationalist approach to environment by the media.

Due to the fact that Croatia is still an economy in transition, with more than a 10-years gap in terms of infrastructure investments and maintenance, and human resource development (mainly due to a recent war), environment is still low on priority list and considered more as a non-necessary cost than as a business and sustainable development opportunity. So the overall feeling is that there is still much work needed to integrate environmental aspects in sectoral policies, however under the positive influence of international environmental trends and the EU approximation the need has been recognised, and there is a positive trend of human resource strengthening and capacity building for improving effectiveness and intersectoral cooperation in the public administration (which is the most "blamed" part of the Croatian society). Same can be said for most countries of the South East Europe (Albania, Bosnia & Herzegovina, Macedonia, Montenegro, Serbia).

On the example from Croatia it seems the regulation and strong legislation doesn't automatically mean the successful environmental mainstreaming. It confirms the findings from the Czech Republic, which (being the EU member state) can be considered as a country with more detail and complex environmental legislation and regulation compare to Croatia. But again, the legally mandatory tools such as land-use planning, EIA, SEA etc., even if the most frequently used, are not commonly rated as the efficient – i.e. a) presents administrative and financial burden for the industries and planners, b) doesn't sufficiently ensure the quality of the environment.

In fact, environment and/or sustainability issues can be found in almost all strategic documents at all levels (national, regional, local). But the usual problem is the missing measures for implementation of the proposed objectives and targets.

Even if the majority of respondents understands and supports the idea of the environmental mainstreaming, there are still not clear ways how this can be ensured. The political will and support was mentioned as one of the key preconditions for the successful integration of the environmental issues in the planning and decision making. Number of cases shows that even the perfect application of standard procedures (EIA, SEA, IPPC etc.) cannot guarantee the implementation of the plan or project in line with the results and recommendations provided by these procedures if these are not backed by the top decision-makers (politicians, and top-management in case of the private sector).

To sum up, the efficiency of the environmental mainstreaming critically depends on the value placed on the environment by the stakeholders. The success or failure of environmental mainstreaming techniques in individual cases can be only partially attributed to the design of an individual tool and/or to the way of its application. Instead, the more complex set of factors (such as individuals' and societal values, decision-making culture, environmental awareness, strength of interests in stake) seems to play the key role.

5.2 Key recommendations for improvement

The following activities can be recommended in order to improve the efficiency of the environmental mainstreaming:

• Education and awareness raising

As mentioned above, the success of the environmental mainstreaming strongly depends on the perception of the importance of the environmental and sustainability issues in the society. It's important to reach all target groups – from general public, though experts, managers, to the politicians.

• Support of good practice and distribution of the successful examples

This shall be connected with the above listed point, or in fact it can be part of the environmental education. The presentation of the real-life successful cases is usually more persuasive compare to the "theory".

• Simplification of the environmental legislation (from the procedural point of view)

The frequent overlaps of the various tools for the environmental integration / mainstreaming can be identified. E.g. EIA doubles in some cases the individual permits (for the waste management, noise, air etc.), which have to administrated within the project preparation anyway. Also reduction of the scope of EIA, SEA application would be needed.

• Better control (monitoring) of the integration of the tools application in the decisionmaking and implementation

This is related mainly to the legally mandatory tools such as EIA, SEA, and IPPC. Even if the assessment is carried out quite well (i.e. the recommendations for the project/ plan modification are provided, and it's further confirmed by the final statement of the competent EIA/SEA/IPPC authority), the results are often not included in the final decision on the plan/project and its implementation. So, the responsibility for the monitoring of the integration of the assessment results shall be defined.

• Improved inter-sectoral and inter-institutional cooperation

This refers mainly to fragmentation of responsibilities for the environment across different authorities, where it ends up either in overlapping competencies for the same issue or in avoiding responsibility because it is not clear who is in charge. For instance, environmental inspectorates are understaffed and not sufficiently connected to other enforcement agencies, therefore introduction of an IPPC tool and integrated permitting should improve this situation significantly. Another example is the frequent lack of coordination between different pieces of legislation, which produces conflicting and unclear obligations and makes it very difficult to organise efficient implementation at regional and local levels (especially in physical planning).

6. Annexes

6.1 Annex 1: Overview of survey respondents

Czech Republic

Croatia

1. Names and affiliations of people interviewed, including group discussions:

NAME	INSTITUTION	FUNCTION	DATE/PLACE of INTERVIEW	
1. Mr. Ivica Peric	OKEA crafts	Small entrepreneur, jewellery, souvenirs	March 07, 2008, Murter	
2. Mr. Goran Bulat	Tourist Board Town of Šibenik	Director	March 08, 2008, Šibenik	
3. Ms. Martina Markov Podvinski	Town of Šibenik; Environmental and physical planning department	environmental expert	March 09, 2008, Murter	
4. Ms. Biljana Janev Hutinec	Maksimir Park Managing Authority	Conservation manager	March 10, 2008, Zagreb	
5. Ms. Snjezana Malic- Limani	Medvednica Nature Park Managing Authority	Conservation manager	March 10, 2008, Zagreb	
6. Mr. Nenad Mikulic	Ministry of Environment, Physical Planning and Construction, EIA Department	Head of department		
7. Ms. Anamarija Matak	Ministry of Environment, EIA Department	adviser, head of section	Group discussion, Zagreb, March 11, 20078	
8. Mr. Hrvoje Buljan	Ministry of Environment, Department for environmental emergencies	senior adviser		
9. Ms. Vesna Montan	Ministry of Environment, EIA department	senior adviser		
10. Ms. Gorana Cosic- Flajsig	Zagreb Polytechnic	Lecturer for water management issues	March 11, 2008, Zagreb	
11. Mr. Srdjan Dvornik	Croatian Helsinki Committee		March 11, 2008, Zagreb	
12. Ms. Mira Lizacic- Vidakovic	Town of Osijek, Environmental Department	Head of Department		
13. Ms. Nevenka Krklec	County of Varaždin, Environmental Department	Head of Department	Group discussion, March 12, 2008, Osijek	
14. Mr. Emil Tkalec	Varaždin County Regional Development Agency	Project manager		
15. Ms. Ljiljanka Mitos- Svoboda	NGO Environmental Press Center	NGO president	March 13, 2008, Osijek	
16. Ms. Mojca Luksic	Ministry of Rural Development, Forestry	Head of Water Policy Sector	March14, 2008, Zagreb	

NAME	INSTITUTION	FUNCTION	DATE/PLACE of INTERVIEW
	and Water Management		
17. Mr. Tarzan Legovic	Rugjer Boskovic Institute	Head of department for marine and environmental research	March 14, 2008, Zagreb
18. Mr. Zvonimir Markovac	Agrokor corporation	Corporate environmental manager	March 17, 2008, Zagreb
19. Ms. Anita Pokrovac Patekar	Ministry of Environment, Physical Planning and Construction	Senior environmental inspector	March 17, 2008, Zagreb
20. Ms. Zeljka Kordej deVilla	Zagreb Institute of Economy	Senior researcher	March 18, 2008, Zagreb
21. Ms, Ivana Vlasic	Central Government Office for Development Strategy and Coordination of EU Funds	Head of environment projects department	March 19, 2008, Zagreb
22. Mr. Zoran Barisic	Croatian Chamber of Commerce	Head of Industry sector	Group discussion, 19 March 2008, Zagreb
23. Ms. Renata Patarcic	Croatian Chamber of Commerce	Coordinator of the CCC's association for environmental protection	
24. Ms. Dijana Varlec	Croatian Chamber of Commerce	Adviser for environment	
25. Ms. Irma Popovic	Green Action (NGO)	Coordinator of biodiversity projects	March 19, 2008, Zagreb
26. Mr. Dejan Komatina	International Commission for the Sava River Basin	Executive Secretary to the Commission	March 19, 2008, Zagreb
27. Mr. Samo Groselj	International Commission for the Sava River Basin	Advisor for water protection issues	March 19, 2008, Zagreb
28. Ms. Mirjana Matesic	Croatian Business Council for Sust. Development	General Manager	March 20, 2008, Zagreb
29. Mr. Roland Gajsak	Town of Samobor	Head of Finance Department	March 20, 2008, Zagreb
30. Mr. Niko Malbasa	Ekonerg Institute	Head of environmental department	March 20, 2008, Zagreb
31. Ms. Maja Jerman Vranic	Ekonerg institiute	Associate	
32. Ms. Dunja Fadljevic	UNDP Croatia	Program associate	March 20, 2008,
33. Ms. Sandra Vlasic	UNDP Croatia	Program coordinator – environment	Zagreb
34. Ms. Natasa Vetma	World Bank office in Croatia	Environmental officer	March 20, 2008, Zagreb
35. Ms. Mojca Starc	EC Delegation in Croatia	Sector manager - Environment	March 21, 2008, Zagreb
36. Ms. Kornelija Pintaric	Ministry of Culture - Nature Protection Division	Head of Department for Protected Areas	March 21, 2008, Zagreb
37. Ms. Katica Bezuh	Ministry of Culture -	Head of Nature	

NAME	INSTITUTION	FUNCTION	DATE/PLACE of INTERVIEW	
	Nature Protection Division	Protection Inspectorate		
38. Ms. Sanja Tisma	Institute for International Relations	Head of Department for Resource Economy and Environmental Management	March 21, 2008, Zagreb	
39. Ms. Vesna Rajkovic	Ministry of Tourism	Senior adviser	March 21, 2008, Zagreb	
40. Mr. Ivan Matijevic	PECON d.o.o.	Occupational safety adviser	March 25, 2008, Rijeka	
41. Ms. Tajana Huzak	Ministry of the Sea, Transport and Infrastructure, Division for Island Development	Head of Department	March 25, 2008, Rijeka	
42. Ms. Anica Juren	Croatian Environment Agency	Head of marine and water quality department	March 25, 2008, Rijeka	
43. Ms. Sara Litke	US Embassy in Croatia	Economic officer	March 26, 2008, Zagreb	
44. Ms. Valerija Kelemen Pepeonik	City of Zagreb - Physical Planning Institute	Head of Environmental Department		
45. Mr. Ivan Loncaric	City of Zagreb - Physical Planning Institute	associate for waste management	Group discussion,	
46. Ms. Ivana Vojnic Rogic	City of Zagreb - Physical Planning Institute	associate for biodiversity	March 27, 2008, Zagreb	
47. Ms. Kristina Mudronja	City of Zagreb - Physical Planning Institute	junior associate		
48. Mr. Hrvoje Caric	Institute of Tourism	Junior expert	March 28, 2008, Zagreb	

2. Names and contact details of people who returned the questionnaires:

NAME	INSTITUTION	FUNCTION
1. Igor Dvanajscak	Town Mursko Sredisce	Head of department for economy, construction, housing and municipal affairs
2. Ivan Beslic	UNIKOM d.o.o. municipal utility, Osijek	Head of waste management sector
3. Ognjen Caldarovic	Faculty of philosophy, Sociology Department	University professor
4. Petrica Kostic	Municipal utility company Komunalac d.o.o., Koprivnica	Head of sanitation and vehicle fleet
5. Anto Rajic	Sisak-Moslavina County – Department for environmental and nature protection	Head of department
6. Blanka Bobetko- Majstorovic	Sisak-Moslavina County – Department for environmental and nature protection	Environmental adviser
7. Zeljka Kucinic	Zagreb County – Physical Planning and	Head of Physical Planning

NAME	INSTITUTION	FUNCTION
	Environmental Protection Institute	Section
8. Dora Radosavljevic	Environmental NGO 'Franjo Koscec', Varazdin	NGO president
9. Zeljka Kolar	Koprivnica-Krizevci County – Protected Natural Values Managing Authority	Head
10. Dusica Radojcic	NGO Green Istria – Istria verde, Pula	NGO President
11. Tamara Saric	Vukovar-Srijem County – Physical Planning Institute	Head of environmental section
12. Rene Vukelic	Croatian Environment Agency	Head of department for development, projects and cooperation
13. Vesna Vugec	City of Zagreb – Town office for physical planning, environmental protection, construction, municipal affairs and transport	Head of environmental section
14. Matija Frankovic	ArkaArka consulting	Owner
15. Zeljko Milkovic	International Commission for Sava River Basin	Advisor for navigation issues
16. Jasna Gorupic	Osijek-Baranja County – Department for Physical Planning, construction and environmental protection	Head of environmental section
17. Martin Marulin	Osijek-Baranja County – Regional Development Agency	Head
18. Neven Knezevic	Coca-Cola Beverages Hrvatska d.d.	Environmental specialist
19. Tanja Gusic-Dobra	Sibenik-Knin County – Department for environmental protection and municipal affairs	Adviser
20. Zeljka Lukesic	PCAP Karlovac (Prevention of Cruelty to Animals and Plants)	NGO president
21. Iva Vukancic	APO Hazardous Waste Management Agency	Environmental expert
22. Mladen Matica	Koprivnica-Krizevci County – Physical Planning Institute	Deputy head; adviser
23. Davorka Zegrani	Podravina & Prigorje Regional Development Agency	Project manager for EU funded projects
24. Kata Benac	Sisak-Moslavina County – Protected Natural Values Managing Authority	Conservation manager

6.2 Annex 2: Minutes from the round table

Round table "Environmental mainstreaming"

11 March 2008, Ostrava

Introductory information

The round table within the project "Environmental Mainstreaming – A User Guide to Approaches" was organized in cooperation with the Regional Authority of Moravia-Silesia Region (Department of Environment and Agriculture) and took place on 11th March 2008 in Ostrava.

Participants of the meeting were representatives of public administration (The Regional Authority of Moravia-Silesia Region), expert public institutions (Regional Hygienic Station), environmental consultancies (Regional Centre EIA, Enviform Ltd.), and businesses and industries (OKD Inc., Ostrava Water and Sewerage Company, The Union for the Development of the Moravian-Silesian Region).

Discussion

The meeting started with the introductory speech of Mr. Milan Machač, Head of the EIA and Forestry Unit of the Regional Authority of Moravian-Silesian Region. After his presentation the basic information regarding the project were introduced as well as the brief overview of the tools used for environmental mainstreaming the Czech Republic. The discussion, which started after initial presentations, was focused on the following questions:

- Which tools are the most frequently used in practice?
- What is the effectiveness of these tools?
- What are the problems connected with the application of these tools?
- What can help to increase the effectiveness of the tools application?
- What are the good practice and success stories of the tools practical application?

The tools used the most frequently in practice

The most frequently used tools for environmental mainstreaming in practice are environmental assessment tools, spatial planning documents, IPPC and noise and dispersal paper (often as a part of EIA or SEA). So the most used tools are the tools required by legislation. The water management plans, EMS/ISO were mentioned as well. The public involvement ad participation in the planning and decision-making can be also understood as the tool for the environmental mainstreaming.

Effectiveness of the tools

When speaking about the effectiveness, it is necessary to make a difference between tools which have to be used by law, and the tools which can be applied voluntarily. As already mentioned above, the most frequently used tools are those required by the relevant legislation. But the low effectiveness of these tools was mentioned by the participants i.e. low real contribution of these tools from the integration of environmental issue in the planning and decision-making point of view.

Generally, it's possible to say that environmental issues integrated directly to the development activities (preparation and implementation of the project, the operation of the industrial facility etc.) is a key for achieving higher effectiveness of the environmental

mainstreaming. E.g. in case of EIA its necessary the proponent understands the purpose of EIA as a tool for the improvement of the project from the environmental perspective.

It is also necessary to pay attention to the health and social impacts of industrial activities (e.g. impact on the employment rate in the case of the inhibition of industrial activities). For ensuring this the communication between investor and potentially affected municipalities is of a key importance.

Problems connected with application of the tools

In the field of environmental assessment still dominates the bureaucratic level of the process. In the most of the cases, the investors don't anticipate any real contribution and they consider the assessment process only as a fulfilment of legislative requirements in line with the timeline of the project preparation. In practice, the results of EIA are often not added to spatial planning documentation; there is a lack of the relevant provision in the legislation to ensure that an EIA is applied before the planning inquiry.

The bureaucratic level of the processes appears not only in the field of environmental assessment, but also in the case of other tools, which causes their degradation and lack of effectiveness within their exercitation.

Regarding EIA, very high number of assessments procedures is being started, but in the most of the cases it finishes by the screening decision – it means there is no need fro the "full" assessment procedure. EIA also loses its role as an integrated tool and often it is considered only as a partial licence, and doubles these licences respectively.

The assessment is conducted for the most of the development projects (i.e. screening procedure starts) and the investors and the competent authorities are overloaded by many processes for the projects without any impact to the environment.

There are areas (within the Region and outside) with existing environmental pressures (noise, air quality) are so high, that even successful EIA process (i.e. realization of the project according to the requirements of the assessment – e.g. introduction of BAT) doesn't bring sufficient effects and the newly realized project still increases the environmental pollution above the legal limits. In spite of strong legislative regulation, the condition of environment is often unsatisfactory.

Regarding SEA, it's a key tool for the assessment of cumulative effects of the projects and assessment of strategic options in the broader context (e.g. assessment of building the new water dam within the context of development planning of the whole drainage area).

But similar to EIA the importance of SEA is often decreased by its application for the documents without any environmental impacts, or the application of SEA in the latter stages of the planning.

Regarding spatial planning, the environment is often considered as a limit of the spatial development. There is also lack of methodology for sustainability appraisal, which needs to be defined. Land-use plans have to be often modified because of the new requirements for the environmental protection.

Enhancement of effectiveness

Despite the effort of the industries the environmental pollution is still high. Although legislation regulations are sufficient, there is still lack of arrangements ensuring protection of environment. Some of the legislation regulations are redundant or overlapping with other regulations and their high number can be often counterproductive. It is necessary to revalue this number in order to improve transparency and their applicability in practice.

The reduction of EIA and SEA number would allow focusing the efforts of all relevant stakeholders (authorities, experts, public) on the assessment of document, which can have significant impacts on the environment.

In some cases (land-use plan and sustainability appraisal) the methodological support would be needed.

Examples of good practice

The participants mentioned following examples of good practice of environmental mainstreaming:

- Parallel SEAs for 4 strategies of Moravskoslezsky region (2004 2005): the administrative requirements were minimised by the fusion of SEAs for 4 concepts in one process, and so it was possible to concentrate mainly on impact assessment itself.
- Noise study for ArcellorMittal Ostrava (big metallurgical company): after poor noise study (too general, without specific measures) the noise studies for the specific installations were prepared – defining specific measures. In connection with strong public pressure for the minimising the environmental and health effects of the operation of the industry, there is real effort to realize proposed measures.
- EIA of downhill course Kyčerka: the detail biological survey including assessment of impacts to Natura 2000 sites was conducted based on the results of the screening and in the cooperation with the investor. The project was finally realized according to the recommendation of EIA.
- The study of the placement of wind power plants in the Moravian-Silesian Region: the study was prepared on the request of the Region (as ad-hoc study) and it's the documents with recommendatory character for permitting of the new wind power plants in the Region. It will be also adopted in the form of spatial limits in the Regional Land-Use Plan.
- OKD Foundation: the foundation was established in January 2008 and finances among others also projects in the field of protection of the environment. These project are focused on the improvement of the environmental quality or on the support of the environmental friendly behaviour and other forms of the enforcement of the sustainability principles.

Use of the conclusions

The conclusions from the round table will be integrated in the survey of the environmental mainstreaming tools in the Czech Republic and will also serve as a baseline for further discussion on the effectiveness of the environmental protection.

This report summarizing the discussion within the round table and its conclusions will be published on the web page of Integra Consulting Services Ltd. (<u>www.integranet.cz</u>) – in the part dedicated to the project "Environmental Mainstreaming – A User Guide to Approaches". The report will serve – together with the case examples – as a base for further discussions on this issue.

The discussion can continue within the EIA/SEA Conference, which will take place in 2009 in Ostrava. The question of effective environmental mainstreaming can be one of the thematic sections of the conference.

6.3 Annex 3: Minutes from the final workshop

Workshop "Environmental Mainstreaming" Prague, CENIA, 3 April 2008

Introductory information

The workshop within the project "Environmental Mainstreaming – A User Guide to Approaches" was organized in cooperation with CENIA (Czech Environmental Information Agency) and took place in Prague, 3rd April 2008.

Participants (altogether 20) of the meeting were representatives of public administration (The Ministry of Agriculture, The Ministry for Regional Development, The Ministry of Environment, The Regional Authority of Pilsen Region, The Regional Authority of Liberec Region, Prague Municipal Authority, and Municipality of Dobříš), expert institutions (CENIA, The Czech Environmental Inspectorate) and political representation (Prague Municipal Council).

Discussion

The meeting started with introductory word of Mr. Jan Prášek, head of the Department of Technical Protection of the Environment of CENIA. After his presentation the basic information regarding the project were introduced as well as the overview of the preliminary results and findings from the survey. The discussion, which started after initial presentations, was focused on the following questions:

- What is your opinion on the survey results?
- Would you define another drivers / problems?
- Which do you mostly use in practice?
- What is the effectiveness of these tools?
- What could improve the effectiveness of the environmental integration?
- What are the examples of the good practice in this field?

The tools used for environmental mainstreaming

The participants of the seminar frequently use following tools for environmental mainstreaming:

- EIA
- SEA
- Strategic planning
- IPPC
- Cleaner production
- Public involvement
- Envi- marking
- Economic assessment
- Sustainability appraisal of spatial plans
- Monitoring
- Integrated Pollution Register

- Research and Development
- Best Available Techniques (BAT)
- Emission permits

Problems

- Insufficient political will represents the key problem of environmental mainstreaming in the Czech Republic.
- Another problem mentioned in the discussion was the strict division of competence within the government departments / sectoral ministries. Then, the cooperation between the sectors is limited. But it is necessary to solve problems in cooperation in order to fulfil the public interest.
- Regarding EIA, the assessment is often conducted for environmentally insignificant projects – so the system doesn't work effectively. Moreover, the final EIA statement (issued by the competent EIA authority) is usually positive (the negative statements are only exceptional).
- Regarding SEA, the "ex-post" approach to the assessment still dominates, and the whole SEA process is very complicated. The process is difficult even for SEA competent authorities as well as for planning authorities, and can provoke negative attitude to the environmental protection. Another problem concerning SEA is too general level of the assessed plans, programmes and strategies.
- In some sectors (e.g. transport) the primary reasons for negative environmental effects is the planning itself, since it doesn't appropriately integrate the relevant environmental issues.
- New Land-Use Planning and Building Code Act is not quite optimal, even if adopted only 14 months there is already the second amendment of this Act discussed in the Parliament. One of the most positive aspects of the Act i.e. the protection of unbuilt areas has been limited though these amendments. Land-use plans should work with particular facts and be focused on improving the situation in the territory. It is also necessary to ensure linkage between land-use and strategic planning, since some (especially "soft") measure cannot be stipulated by the land-use plans (e.g. limited access to the individual cars to the specific parts of the city, traffic sings etc.).
- The question of indicators for qualitative measuring of sustainability was addressed as well. It is evident that it is not possible to use one set of indicators for all contexts and it is necessary to assess indicators for particular contexts and situations. One of the opportunities could be updating of the National Strategy of Sustainable Development, where particular indicators should be formulated.
- The sustainable development tends to be understood as environmental protection in some cases, which is often unfavourable in context of integration of socio-economic aspects.

Possible solutions

- Simplification of communication with public, active methods of public involvement, right approach to the particular target groups.

The tool of public involvement is not used effectively in the Czech Republic. The process of public consultation (submitting suggestions and comments) is very complicated and suggestions are often left out because of formal imperfections.

It is necessary to involve the public from the beginning of the strategy preparing process. The two groups of public shall be distinguished – general public and experts. Some of the

topics addressed in the plans are too complicated for the general public, therefore using various case-specific methods is necessary to obtain a meaningful feedback. On the other hand, experts shall be approached directly.

The situation of public involvement gets better. For example, non-governmental organizations are becoming more interested in education focusing ,among other issues, on the field of strategic planning.

- Support of good practice

Examples of good practice are very important for initiating and activating the environmental mainstreaming activities. E. g. mayors can visit other municipalities, successfully developing the sustainable tourism, and get inspired there. This needs good promotion in public media.

- Correct formulation of objectives / the importance the analysis

The formulation of the development objectives (including environmental / sustainability ones) is essential for successful implementation of the plans. The objectives must be based on trend analysis of the area or sector in order to bring the real contribution to the environment. But unfortunately, the objectives are often established only on the political opinions without analysis of the past development and the current status – the implementation of such objectives doesn't have positive environmental effects (in some case it can cause even negative impacts).

The specific problems presents International agreements signed years ago, which are still valid, but the conditions have changed a lot (e. g. agreement concerning Danube – Odra - Elba canal)

- Access to information

Information system on SEA was designated as an efficient and user-friendly tool summarizing information and relevant documents related to all SEA processes in the country. Because of changes regarding the new Act on Land-Use Planning and Building Code, some of the important items (especially land-use plans assessed) have been displaced from the system (i.e. their placement in the system is not obligatory), and so its difficult for the public to find them.

As resulted from the discussion, the key aspects for effective environmental mainstreaming are following:

- Personal initiative
- Advertising and promotion of the environmental issues in the media, distribution of information
- Diversification of the tools and conducting of CBA before implementation of the tool
- It is necessary to place emphasis on content of the assessment and not on formal requirements

Findings of the round table

Findings of the round table will serve as a baseline for further discussion of questions of effective environmental mainstreaming in the Czech Republic.

This report summarizing the discussion within the workshop and its conclusions will be published on the web page of Integra Consulting Services Ltd. (<u>www.integranet.cz</u>) – in the part dedicated to the project "Environmental Mainstreaming – A User Guide to Approaches". The report will serve – together with the case examples – as a base for further discussions on this issue (even beyond the frame of the current "User Guide" project).

6.4 Annex 4: Summary of survey findings on urban sustainability, example of the town Dubrovnik (Croatia)

Attached is a report about the findings of a research done in the framework of the DISCUS project - Developing Institutional and Social Capacities for Urban Sustainability (Sustainability indicators in the local communities), conducted in 2003 on 40 European cities, including Dubrovnik in Croatia. This example of a local community was thought by the researchers to be illustrative of the general approach to environment and sustainable development.

City Summary – Dubrovnik, Croatia

PART A: GENERAL DATA

- Name of the fieldworker: Irena Brnada
- Name of the town: Dubrovnik
- Dates of visits in the town: Visit 1) 25-27 March 2003

Visit 2) 15-22 July 2003 Visit 3) 3-6 September 2003

• Names and contact details of people interviewed (+ date of interview):

NAME	INSTITUTION	FUNCTION	DATE of INTERVIEW
49. Mr MATO TOMLJANOVIC	National Radio-TV Network - Radio Dubrovnik	Journalist	25 March 2003
50. Ms NIKE SUDAREVIC	Town of Dubrovnik Authority,	Head of Section	26 March 2003
	Physical Planning and Environmental Protection Dept, Environmental Section		
51. Mr FRANO MATUSIC	Town of Dubrovnik Authority, Office of the Mayor	Deputy Mayor in charge of, environmental, ph. planning & cultural affairs	15 July 2003
52. Mr NIKOLA OBULJEN	Dubrovnik Town Council	Council Chairman	16 July 2003
53. Mr STIJEPO BOGDANOVIC	"Dub" Nature Friends Society	NGO president	18 July 2003
54. Mr STASA PUSKARIC, PhD	American College of Management and Technology (ACMT)	Lecturer	20 July 2003
55. Ms NIVES MILOS	Dubrovnik Tourist Board	General Manager	03 Sept 2003
56. Mr BOZO LETUNIC	Dubrovnik Town Council (Social Democratic Party, opposition)	Town Councillor	05 Sept 2003

• Names and contact details of people who were passed the questionnaire:

NAME	INSTITUTION	FUNCTION	
25. Mr FRANO MATUSIC	Town of Dubrovnik Authority,	Deputy Mayor	
	Office of the Mayor		
26. Ms NIKE SUDAREVIC	Town of Dubrovnik Authority,	Head of Dept.	
	Physical Planning and Environmental Protection Dept.		
27. Mr NIKOLA OBULJEN	Dubrovnik Town Council	Council Chairman	
28. Mr BOZO LETUNIC	Dubrovnik Town Council (Social Democratic Party, opposition)	Town Councillor	
29. Ms KATE MILOSLAVIC	Town of Dubrovnik Authority,	Senior Adviser	
LAZIC	Physical Planning and Environmental Protection Dept.		
30. Ms MARIJA CRNCEVIC,	Town of Dubrovnik Authority,	Research assistant	
M.SC	Physical Planning and Environmental Protection Dept.		
31. Ms VANDA IVANKOVIC	Town of Dubrovnik Authority,	Research assistant	
KONTIC	Physical Planning and Environmental Protection Dept.		
32. Mr NIKOLA PAVLOVIC, M.Sc	Town of Dubrovnik Authority,	Head	
	Finance Department		
33. Mr HRVOJE MACAN	Town Government	Member	
34. Ms ASJA SKARAMUCA	Town of Dubrovnik	Head	
	Culture Department		
35. Mr TONCI DEDO	Public Institution <i>Lokrum</i> Botanical Reserve	General Manager	
36. Mr PERO KACIGA	Cistoca d.o.o Waste Utility	General Manager	
37. Ms NIKOLINA KAPOVIC	Centre for Historical Gardens and Landscapes	Junior researcher	
38. Mr NENAD JASPRICA, PhD	Institute of Oceanography and Fisheries - Dubrovnik Laboratory	Research fellow	
39. Ms ANA BRATOS	Three-year College Dubrovnik	Junior researcher	
40. Ms ZORICA SMOLJAN	Public Health Institute	Head of Laboratory	
41. Mr IVAN VUKIC	Public Enterprise Croatian Forests, Forestry Office Dubrovnik	General Manager	
42. Ms INES LOZINA	Ministry of Environmental Protection and Physical Planning, Inspection Division in Dubrovnik- Neretva County	Environmental inspector, in charge of Dubrovnik area	
43. Mr NEVEN KLINAC	Ministry of Interior - Central Police Station Dubrovnik	Head	
44. Mr MATO TOMLJANOVIC	National Radio-TV Network - Radio Dubrovnik	Journalist	
45. Mr STIJEPO BOGDANOVIC	"Dub" Nature Friends Society	NGO president	
46. Ms NIVES MILOS	Dubrovnik Tourist Board	General Manager	
47. Mr STASA PUSKARIC, PhD	American College of Management and Technology (ACMT)	Lecturer	

NAME	INSTITUTION	FUNCTION
48. Ms TAMARA TUDESKO	DU ART - Flower growing industry	Young entrepreneur
49. Mr MATO DJUROVIC	Public Transportation Utility GP DUBROVNIK d.d.	Businessman
50. Mr IVICA PRLENDER	Dubrovnik Summer Festival	General Manager
51. Ms JELKA TEPSIC	Hotel President - Dubrovnik	PR Manager
52. Mr HRVOJE LJUBIMIR	Dubrovnik Congress Services	Director
53. Ms KRISTINA FILICIC	Weekly newspaper "Dubrovacki vjesnik"	Correspondent
54. Ms MATIJA CALE MRATOVIC	NGO "Healthy Town Dubrovnik" c/o County Public Health Institute	Coordinator
55. Ms MIRJANA KARAMAN	Croatian Mountaineering Association "Dubrovnik"	NGO president
56. Mr SRECKO KLJUNAK	Town of Dubrovnik Authority	Deputy Mayor
57. Mr MIHO KATICIC	Town of Dubrovnik Authority, Social Affairs Department	Head
58. Mr DARINKO IVEKOVIC	Town of Dubrovnik Authority, Utility Management Department	Head
59. Mr STIJEPO BUTIJER	Town Government	Member
60. Mr ANTUN KISIC	Town Government	Member
61. Mr TVRTKO BREKALO	Town of Dubrovnik Authority, Mayor's Office	Webmaster
62. Mr TEO ANDRIC	Vodovod d.o.o Water Utility	General Manager
63. Mr ANTE PERUSINA	"Dubrovnik" Diving Club	NGO president
64. don PETAR PALIC	Catholic see	Secretary of the Chancery

• Names of people who filled in the questionnaire (+ date of collection):

NAME	DATE of collecting/returning the QUESTIONNAIRE
1. Ms NIKE SUDAREVIC	26 March 2003
2. Ms ASJA SKARAMUCA	31 March 2003
3. Mr MATO TOMLJANOVIC	01 April 2003
4. Ms KRISTINA FILICIC	01 April 2003
5. Mr FRANO MATUSIC	15 July 2003
6. Ms ZORICA SMOLJAN	15 July 2003
7. Mr NIKOLA OBULJEN	16 July 2003
8. Ms NIKOLINA KAPOVIC	16 July 2003
9. Ms MARIJA CRNCEVIC, M.Sc	16 July 2003
10. Ms VANDA IVANKOVIC KONTIC	16 July 2003
11. Mr NIKOLA PAVLOVIC, M.Sc	16 July 2003

NAME	DATE of collecting/returning the QUESTIONNAIRE
12. Mr HRVOJE MACAN	17 July 2003
13. Mr NEVEN KLINAC	17 July 2003
14. Ms KATE MILOSLAVIC LAZIC	17 July 2003
15. Mr IVAN VUKIC	18 July 2003
16. Mr STIJEPO BOGDANOVIC	18 July 2003
17. Mr MATO DJUROVIC	18 July 2003
18. Ms MIRJANA KARAMAN	19 July 2003
19. Ms JELKA TEPSIC	19 July 2003
20. Mr STASA PUSKARIC, PhD	20 July 2003
21. Mr TONCI DEDO	21 July 2003
22. Mr PERO KACIGA	21 July 2003
23. Ms ANA BRATOS	21 July 2003
24. Mr IVICA PRLENDER	22 July 2003
25. Ms MATIJA CALE MRATOVIC	31 July 2003
26. Ms TAMARA TUDESKO	31 July 2003
27. Mr NENAD JASPRICA, PhD	28 August 2003
28. Ms NIVES MILOS	03 Sept 2003
29. Ms INES LOZINA	03 Sept 2003
30. Mr BOZO LETUNIC	05 Sept 2003
31. Mr HRVOJE LJUBIMIR	05 Sept 2003

PART B: PERSONAL SUMMARY

General impression about the city

Brief overview of the town:

Town of Dubrovnik is a part of the Dubrovnik-Neretva County, and its greater administrative area is covering 143 km2 (belongs to the category of medium-sized towns in Croatia), with cca 43,770 inhabitants.

The authority in the Town of Dubrovnik is divided among the following bodies: Town Council (25 members) with legislative powers, Mayor's Office and Town Government (9 members) with executive powers; the Town Administrative Authority is divided into 14 sectoral departments. Municipal utilities, Port and Airport authorities and some hotel companies are partly owned by the Town, and main cultural public institutions, kindergartens, Sports Facilities Dubrovnik, Lokrum Reserve and Dubrovnik Fire Brigade are in full Town ownership.

Local self-government units in the competence of the Town Administrative Authority include 8 town districts and 16 local self-government councils (in surrounding satellite settlements and islands).

According to the 2001 regulations addressing the area of central and local (self-) government, decentralisation was prescribed and more authority and executive power was given to local levels (towns and municipalities), while sectoral branches of central government have been founded in each county. This principle, however, is really implemented only in the public education and public health and welfare sectors, while in others there is no real local jurisdiction, e.g. in the monitoring or control of implementation of physical planning documents (site permits, building permits). This is a very important area, as it hinders accentuation of protected areas, their rating, establishing and monitoring codes of conduct therein. The Town has no legal mechanisms at its disposal, apart from a (very small) share in ownership, for management of its space, including protected areas in its territory. In permitting, there is no respect for the Town entity, segmentation of plots is frequent and unsystematic, while the Town doesn't have enough funds for the buy-off and management of all municipal infrastructure and green areas, which are therefore being converged into building plots. Attempts to solve this situation are made through biannual planning and development programmes - progress is being made, but it is still slow.

There is a general feeling of totally opposing views between the Local Authority and Civil Society representatives regarding accomplishments and chances for achieving sustainable development.

One of the reason for such a difference of views could be inadequate knowledge – in both these "entities" - of what sustainable development really is, and how it can be achieved. Most respondents identify SD with environmental protection, and therefore certain views expressed in interviews and questionnaires might be more negative than it is realistic, because they mostly consider only this environmental component. Share of environmental issues in the Town budget is less than 1%, and this fact may also partly account for such a negative opinion about addressing local environmental concerns.

The truth can be found somewhere in the middle, because Local Authority faces certain realistic financial and legal constraints, and is also influenced a great deal by the politics, while the public in general doesn't take an active approach, and fails to use all the available information and participation possibilities and mechanisms.

- <u>Successful sustainable development policies implemented by the Local Authority</u> (with innovative approaches possibly interesting for the DISCUS research team)
 - Initiative of transferring authorities over the Lokrum Special Reserve from the County to the local (Town) level the County is too understaffed to cover environmental issues, and has also failed to establish a Public Institution for managing protected areas in its territory, to which it has been legally obliged. This change of competence has and will increase the local budget revenues, thus enabling improvement of management and protection of the area, as well as the quality of promotion of this protected site.
 - Prized and very informative web-pages of the Town Authority, aiming for a direct, interactive communication of the Town Authority and citizens, and public participation in decision-making that is directly relevant for the broader Town area. This website is also the first stage of the e-Government concept which is a part of the National Sustainable Development Strategy *Croatia in the 21st century*.
- Main points from the interviews conducted within the Local Authority

Representatives of the Local Authority approached for interview-questionnaire were mainly public servants (heads of departments) from the Town Administrative Authority, town councillors, and managers of some Town-owned public utilities/institutions. Dubrovnik is a small town and greater diversity was not possible.

Interviewed were the town councillors from the ruling and the opposition parties, a Deputy Mayor, and the Head of Town Authority's Environmental Section.

Considering that the local government structures have been established quite recently (8 years ago), this is quite a well organised structure, although SD is not explicitly part of regular programming. They strike as quite positive and open minded; however the statements are mainly politically coloured, and predominant is the wish to give answers that would be favourable for the public image of the Local Authority.

A respondent who in her daily tasks is closer to the public and public opinion (lower in rank than the other three) indicates that the general public rarely approaches them and rarely makes use of the communication and cooperation opportunities that are available to them (Internet, public debates, proposing and conducting joint campaigns).

Main points from the interviews conducted within the Civil Society

Representatives of the Civil Society that were approached for interview-questionnaire have shown a rather low level of informedness about the activities of the Local Authority was noticeable, and various public institutions and utilities were not considered as parts of the Local Authority structure.

Interviewed were a president of the environmental NGO that is highly esteemed in the community for tradition of existence and experience of its members, a university lecturer, the local tourist board manager, and a radio journalist dealing mainly with municipal utility issues.

Two interviewees have shown high inclination to criticising the authorities, not only for nonperformance of their tasks, but also for "malpractice" in the actions undertaken. The other two were quite calm in their judgments, and mainly satisfied with the level of cooperation and communication with Local Authority.

• Documents reviewed especially relevant for the DISCUS research

The 2 documents analysed and presented in the other file were the only complete and official documents available from the Local Authority and relevant for the DISCUS research, although they do not cover all areas needed for this research.

Thus, there was no document available that would resemble the Local Authority's Strategy, or Sustainable Development Plan / Environment strategy.

At the time of conducting the research, both the draft Physical Plan for Greater Dubrovnik area and the draft Master Plan for zoning of the narrow Dubrovnik area were still in public consultation process, scheduled to be adopted preferably by the end of 2003. Local Agenda 21 is still in the process of drafting within the Physical Planning and Environmental Protection Department.

Major difficulties encountered in conducting the research

It was very difficult to arrange interviews with politicians, therefore the research process took substantially longer than expected.

The list of potential respondents had to be modified several times, even when the fieldwork was already ongoing, because some people were unwilling (or reluctant) to be involved in this research – for the following main reasons:

- concept of SD unfamiliar, therefore thinking that they wouldn't have anything to say on the subject;
- no trust in the confidentiality of answering, probably because of certain innate "fear" of their superiors;

 no use of answering the questions, this is just another research, that will bring no tangible benefits to the Town.

The contact person took upon herself the task of distributing and collecting the questionnaires among the people in the Town Administrative Authority (18 people), which due to her other priority tasks took almost 3 months, with no real result, so they had to be contacted again by the fieldworker. This caused another delay in the fieldwork.

• Other comments

Several questionnaire respondents complained about not very much variance among offered answers; e.g. many people wanted to give an "average" rating to the questions which offered several possible ratings of intensity, mainly re. quality of relationships among organisations, quality of town policies – they wanted to rate these in between "to a little extent" and "to a high extent", which was not possible according to the questionnaire format - therefore it is likely that many replies do not reflect the true state of affairs, and might lead to wrong overall conclusions.

Another issue are very different definitions of SD that respondents had, if they had them at all, and in that context also understanding, and level of informedness, of the sustainable development policy of the Local Authority was difficult – since Local Authority has no explicit SD policy. Therefore, e.g. answers on question 21. mostly concern contacts in general, and not how much are they in the function of sustainable development (intention of such contacts is mostly not equal to the results accomplished).

Due to the lack of a pronounced SD policy (and the related questions dealing with various plans and sectoral policies of the Local Authority), such questions were also difficult to answer to most respondents, which created a general feeling of uneasiness among them about non-understanding the questions, and lack of self-confidence whether they will be capable of completing the questionnaire.

Therefore in many questionnaires there are answers missing.

In view of the above, it was noticed, and it has been commented by several respondents, that such unification of questions and possible answers for any local community all over Europe - with big diversity among them in terms of size, economic and social development, environmental awareness, level of civic engagement and knowledge - could not be applicable to all target sectors in the Town of Dubrovnik. When selecting the control group of cities in this research, perhaps a prior investigation in this respect should have been done.

Therefore, more diversity in answers should have been made possible. And perhaps the question to define "sustainable development" should have been the opening question in the questionnaire, in order to set the scene for the questionnaire in total, and not the closing one.

6.5 Annex 5: Sources of information

- Smutny, M., Dusik, J., Kosikova, S.: SEA of Development Concepts in the Czech Republic. in: Strategic Environmental Assessment at the Policy Level: Recent Progress, Current Status and Future Prospects, ed. Sadler, B. 2005.
- Dusik J. and B. Sadler (2004), Reforming Strategic Environmental Assessment Systems: Lessons from Central and Eastern Europe, In: Impact Assessment and Project Appraisal, volume 22, number 2, June 2004
- Croatia Implementation and enforcement capacities for environmental *acquis*. Final report to DG Environment. 2005. Ecolas / IEEE / Elektroprojekt
- William Sutton, *et.al.:* Integrating Environment into Agriculture and Forestry: Progress and prospects in Eastern Europe and Central Asia. 2007. EBRD / World Bank
- <u>www.env.cz</u> The Ministry of Environment of the Czech Republic
- <u>www.mmr.cz</u> The Ministry for Regional Development of the Czech Republic
- <u>www.mze.cz</u> the Ministry of Agriculture of the Czech Republic
- <u>www.cenia.cz</u> Czech Environmental Information Agency
- <u>www.ecn.cz</u> ECONNECT, the informational portal for NGOs focused on the environmental and public participation issues
- <u>http://portal.env.cz</u> portal on the status of the environment in the Czech Republic
- <u>http://tomcat.cenia.cz/eia/view.jsp</u> EIA information system (in Czech only)
- <u>http://eia.cenia.cz/sea/koncepce/prehled.php</u> SEA information system (in Czech only)
- <u>www.vlada.hr</u> Government of the Republic of Croatia, including websites of relevant ministries
- <u>www.hrpsor.hr</u> Croatian Business Council for Sustainable Development, including the relevant sites of member companies
- <u>http://www.unglobalcompact.org/NetworksAroundTheWorld/country_contact/croatia.</u>
 <u>html</u> Global Compact initiative, including the relevant member sites
- <u>www.alertonline.org</u> independent environmental news portal
- www.step.hr/std-info/veleucilista/veleucilista-i-visoke-skole.shtml polytechnic studies in Croatia
- <u>www.unizg.hr</u> University of Zagreb, postgraduate scientific studies
- <u>http://www.unist.hr/</u> University of Split, postgraduate scientific studies
- <u>www.unidu.hr</u> University of Dubrovnik, postgraduate scientific studies
- <u>www.acmt.hr</u> American College of Management and Technology, Dubrovnik
- <u>www.hrsume.hr/</u> Public Forests Management Enterprise *Hrvatske šume*
- <u>www.voda.hr</u> Public Water Management Enterprise *Hrvatske vode*