Protocol on Strategic Environmental Assessment
Facts and Benefits
ACKNOWLEDGEMENTS

This publication has been produced by the UNECE secretariat to the Protocol on Strategic Environmental Assessment to the Convention on Environmental Impact Assessment in the Transboundary Context (Espoo Convention) in collaboration with Zoï Environment Network, in the framework of the project “Greening Economies in the Eastern Neighbourhood” (EaP GREEN). EaP GREEN is funded by the European Union and implemented by four Partners: OECD, UNECE, UNEP and UNIDO.

The overall aim of the EaP GREEN project is to support six countries of the European Union Eastern Partnership (EaP) – Armenia, Azerbaijan, Belarus, Georgia, Republic of Moldova and Ukraine – in decoupling economic growth from environmental degradation and resource depletion. More specifically, the EaP GREEN aims to:

- Mainstream sustainable consumption and production (SCP) into national development plans, legislation and regulatory frameworks with a view to providing a sound legal basis for future policy development in line with the regional and international agreements and processes and consistent with existing EU acquis in the relevant policy areas
- Promote the use of Strategic Environmental Assessment (SEA) and Environmental Impact Assessment (EIA) as essential planning tools for environmentally sustainable economic development
- Achieve a shift to a green economy through the adoption of sustainable consumption and production practices in selected economic sectors (manufacturing, agriculture, food production and processing, construction)

The EaP GREEN is structured around three components:
- Governance and financing tools
- SEA and EIA: accompanying SCP policy implementation
- Demonstration projects

EaP GREEN supports the partner countries’ commitment to move towards a green economy as stated in the Joint Declaration of the Warsaw Eastern Partnership Summit and in the Declaration of the Seventh “Environment for Europe” Ministerial Conference held in Astana (September 2011). Its objectives are consistent with the agreed vision in the outcome document of the Rio+20 Summit.

The UNECE assistance within EaP GREEN focuses on three main directions:

1. Revision of existing national regulatory and legislative frameworks, including legislative reviews of SEA and, as appropriate, of EIA, legal drafting for SEA legislation and subregional overview
2. Capacity-building on SEA/EIA procedures, including national and subnational level training on SEA; development of national guidance documents; coordination and experience-sharing events; piloting SEAs
3. Strengthening of administrative capacities through the above-mentioned legislative reviews, training workshops, pilot projects, and facilitation of a policy dialogue

The related activities are linked to the workplan under the UNECE Espoo Convention and contribute to promoting the ratification and implementation of the Protocol on SEA.

Graphics: Carolyne Daniel, A. Papanastasiou, J. Wille (Zoï Environment Network),
English Text Editor: Geoff Hughes (Zoï Environment Network)
Concept: Elena Santer (UNECE)
Text: Elena Santer, Martin Smutny (Integra Consulting Ltd.), Oksana Yakovenko (Zoï Environment Network), Christina Stuhlberger (Zoï Environment Network)
Project Manager: Christina Stuhlberger (Zoï Environment Network)
Supervision and contributions: Tea Aulavuo (UNECE), Secretary to the Espoo Convention and the Protocol on Strategic Environmental Assessment
Contributors: Aphrodite Smagadi (UNECE), Maia Gachechiladze-Bozhesku (Ecoline International Ltd), Dmytro Skrylnikov (Ukraine), Jiri Dosuk (Integra Consulting Ltd.)

DISCLAIMER

The contents of this publication do not necessarily reflect the official opinions of UNECE, the European Union or other implementing partners. Neither the UNECE nor other implementing partners of EaP GREEN are responsible for the use that may be made of the information contained in this report.
# TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>PREFACE</td>
<td>2</td>
</tr>
<tr>
<td>WHAT IS STRATEGIC ENVIRONMENTAL ASSESSMENT?</td>
<td>3</td>
</tr>
<tr>
<td>WHAT IS THE UNECE PROTOCOL ON SEA?</td>
<td>4</td>
</tr>
<tr>
<td>WHEN IS SEA APPLIED?</td>
<td>6</td>
</tr>
<tr>
<td>WHAT PLANS, PROGRAMMES AND STRATEGIC DOCUMENTS REQUIRE SEA?</td>
<td>8</td>
</tr>
<tr>
<td>SEA PROCEDURE SET BY THE UNECE PROTOCOL ON SEA</td>
<td>10</td>
</tr>
<tr>
<td>WHAT ARE THE BENEFITS OF SEA?</td>
<td>12</td>
</tr>
<tr>
<td>HOW CAN A COUNTRY JOIN THE PROTOCOL ON SEA?</td>
<td>26</td>
</tr>
</tbody>
</table>
This brochure has been prepared by the United Nations Economic Commission for Europe (UNECE) secretariat of the Protocol on Strategic Environmental Assessment (Protocol on SEA) to the Convention on Environmental Impact Assessment in a Transboundary Context (Espoo Convention) with the support of consultants and with funding from the EU Programme “Greening Economies in the Eastern Neighbourhood” (EaP GREEN). It responds to a request from the Bureau under the treaties to produce material to promote the ratification and the implementation of the Protocol and to raise awareness of the Governments, the public and other stakeholders of the benefits of SEA.

The brochure is intended to address the authorities, but also the public and other stakeholders, in countries that are in the process of establishing national SEA systems and/or promoting their systematic implementation. It assists countries in preparing for joining the Protocol on SEA.

The brochure introduces the SEA procedure as set out in the Protocol with reference to its provisions,¹ and presents the benefits of SEA while rectifying misconceptions regarding this procedure. It also provides background information on the origins of SEA, and practical examples of the implementation of SEA. Finally, it presents steps to be undertaken by Governments that plan to accede to the Protocol.
WHAT IS STRATEGIC ENVIRONMENTAL ASSESSMENT?

Governments shape the future of communities by defining development strategies for nations and regions. These governmental plans and programmes, as well as policies and legislation establish the basis for future decisions on projects in such diverse fields as agriculture, energy, industry, transport, regional development, land use, waste management or water management. These strategic documents have a big influence on future decisions that affect people’s lives. Thus it is crucial that environmental and health considerations are among the decision-making factors. To ensure this, many countries apply a systematic and anticipatory planning tool called Strategic Environmental Assessment, or in short: SEA.

SEA is a step-by-step procedure to analyse and communicate environmental and health considerations related to development strategies, plans and programmes prepared by the governments. These considerations are collected in consultation with relevant authorities and the public so that decision makers can compare all the pros and cons of each planning option. SEA thus improves transparency and public trust in decision-making. Ultimately, SEA is a tool for governments to ensure sound economic development choices that benefit human health and the environment alike.

SEA DEFINED

The UNECE Protocol on SEA defines strategic environmental assessment as, “...the evaluation of the likely environmental, including health, effects, which comprises the determination of the scope of an environmental report and its preparation, the carrying-out of public participation and consultations, and the taking into account of the environmental report and the results of the public participation and consultations in a plan or programme.” (Article 2.6)
WHAT IS THE UNECE PROTOCOL ON SEA?

The Protocol on SEA is an international agreement that provides for legal obligations and a procedural framework for the implementation of SEA in countries that are Parties to it. The Protocol is open to all member States of the United Nations. It formulates requirements for the implementation of SEA, including those of a procedural or methodological nature. Guidance material, such as Resource Manual to Support Application of the Protocol on SEA (2011)² and the Simplified Resource Manual (2012)³ provide useful references for the conduct of SEA.

The Protocol was negotiated under the 1991 UNECE Convention on Environmental Impact Assessment in a Transboundary Context (Espoo Convention) to extend the scope of the Convention, but it is a legally distinct instrument. This means that a country can join the Protocol without being a Party to the Convention. Moreover, unlike the Convention, which applies only to proposed activities that are likely to cause significant adverse impact across the national frontiers, the Protocol applies mainly to domestic plans and programmes. Should transboundary effects be likely, the Protocol provides also for transboundary consultations (Article 10).

The Protocol is similar to the European Union’s directive on SEA,⁴ but with distinctive features, such as a special emphasis on health impacts alongside the environmental ones. The Protocol’s provisions for extensive public participation resulted from consultations with the UNECE Convention on Access to Information, Public Participation in Decision-making and Access to Justice in Environmental Matters, adopted in the Danish city of Aarhus, mandates public participation under the environmental impact assessments.

Environmental impact assessment, as a national instrument, shall be undertaken for proposed activities that are likely to have a significant adverse impact on the environment and are subject to a decision of a competent national authority. Principle 17

1992 Rio Declaration on Environment and Development: Environmental impact assessment, as a national instrument, shall be undertaken for proposed activities that are likely to have a significant adverse impact on the environment and are subject to a decision of a competent national authority. Principle 17

1969 US NATIONAL ENVIRONMENTAL POLICY ACT ADOPTED

Environmental impact assessment is introduced to the national legal framework for the first time.

1985 EU EIA DIRECTIVE ADOPTED

The Convention on Access to Information, Public Participation in Decision-making and Access to Justice in Environmental Matters, adopted in the Danish city of Aarhus, mandates public participation under the environmental impact assessments.

1991 CONVENTION ON EIA IN A TRANSBOUNDARY CONTEXT ADOPTED

1999 The Third Ministerial Conference on Environment and Health agrees that, “We will carry out environmental impact assessments fully covering impacts on human health and safety. We invite countries to introduce and/or carry out strategic assessments of the environment and health impacts of proposed policies, plans, programmes and general rules. We invite international financial institutions also to apply these procedures. There will be appropriate participation of non-governmental organizations (NGOs) and members of the public in the procedures set out in this paragraph.”

2000 The United Nations adopt the Millennium Development Goals, including #7: “Integrate the principles of sustainable development into country policies and programmes and reverse the loss of environmental resources.”

2001 EU SEA DIRECTIVE ADOPTED

2002 The Johannesburg Plan of Implementation agreed at the World Summit on Sustainable Development in 2002, stresses the importance of strategic frameworks and balanced decision making as fundamental requirements for advancing the sustainable development agenda.

2003 SEA PROTOCOL ENTERED INTO FORCE

2005 The Paris Declaration commits donors and their partner countries to “Strengthen the application of EIAs and deepen common procedures for projects, including consultations with stakeholders; and develop and apply common approaches for strategic environmental assessment” at the sector and national levels.”

2010 SEA PROTOCOL IS OPEN TO ALL UN MEMBER STATES

2014 AGENDA FOR SUSTAINABLE DEVELOPMENT

SEA is a tool to assist the Parties in achieving Sustainable Development Goals

2016-2030

The Johannesburg Plan of Implementation agreed at the World Summit on Sustainable Development in 2002, stresses the importance of strategic frameworks and balanced decision making as fundamental requirements for advancing the sustainable development agenda.
Information, Public Participation in Decision-making and Access to Justice in Environmental Matters (the Aarhus Convention) during the negotiation of the Protocol. Finally, the Protocol sets a non-mandatory framework for the assessment of policies and legislation.

The Protocol is considered by its Parties as a key tool for sustainable development. Its implementation is expected to assist countries in achieving Sustainable Development Goals and their targets as set out in the 2030 Agenda for Sustainable Development, which came into effect in January 2016 and will guide the decisions of the United Nations Member Governments over the next 15 years and beyond.

**BASIC FACTS**

The SEA protocol:
- Was adopted in 2003 in Kiev
- Has been in force since 2010
- Is open to all member States of the United Nations
- Has 28 Parties (as of 30 March 2016)

**PARTICIPANTS OF THE PROTOCOL ON SEA**

![Map of Parties and Signatories of the Protocol on SEA](image-url)
Compared to an environmental impact assessment (EIA) of an individual project, SEA intervenes much earlier in the decision-making process. This allows SEA to prevent irreversible effects and costly mistakes due to bad planning. SEA also applies to a level of planning and programme development that sets the framework for future projects subject to EIA and potentially for many other actions that may have an impact on the environment. The potential for environmental gain is much higher with SEA than with EIA — developing a more sustainable transport policy rather than simply minimizing the environmental impact of building a road, for example.

On a practical level, SEA procedures should be initiated together (or with only a slight delay) with the planning or programme development process. This approach provides an opportunity to integrate SEA inputs in the plan or programme during its preparation and thus ensures that the results of SEA are properly considered when adopting a strategic document, or even before the adoption.
BACKGROUND ON SEA AND THE PROTOCOL

SEA has largely evolved as an extension of project-level environmental impact assessment principles to strategic planning at the national and local level.

EIA was introduced in the late 1960s in the United States as a tool to predict environmental impacts of planned industrial activities and identify opportunities for mitigating negative impacts and enhancing positive impacts of these activities. In the 1970s and early 1980s, EIA was increasingly used in many other countries. By the mid-1980s, EIA was largely established throughout Europe. The countries of the European Union adopted the European Commission’s EIA Directive (85/337/EEC) and the countries of Eastern Europe, the Caucasus and Central Asia developed their specific environmental impact assessment (OVOS) and State Ecological Expertise (SEE) schemes. By the early 1990s, EIA-like national procedures were applied in all UNECE countries. To address environmental concerns of projects that extend beyond national borders, countries under the auspices of UNECE negotiated the Convention on EIA in a Transboundary Context or Espoo Convention. The Convention was signed in 1991 in Espoo, Finland, and entered into force in 1997. As of early 2016, 45 States, including the European Union, had ratified the Convention.

By the late 1970s and early 1980s, governments had observed certain deficiencies in the capacity of the project-level EIA schemes to sufficiently protect the environment: decisions that failed to prevent (or caused) adverse environmental consequences had been made earlier at the policy or strategic level, while EIA could only address limited impacts in a relatively narrow geographical area. This led to the development of the concept of SEA following approaches used in regional and spatial planning.

By early 1990, the provisions for SEA were introduced into the national legal frameworks in Canada, the Czech Republic, Denmark, the United Kingdom and the United States. They stipulated the obligations for SEA within the framework of a “sustainability appraisal”. In 2001 the European Commission adopted European Directive (2001/42/EC) on the Assessment of the Effects of Certain Plans and Programmes on the Environment (the so-called SEA Directive). The member states of the European Union of that time had to incorporate the SEA Directive into their legislation by 2004.

Inspired by the United Nations Conference on Environment and Development (Rio de Janeiro, Brazil, 1992), in particular principles 4 and 10 of the Rio Declaration and Agenda 21, as well as the outcome of the third Ministerial Conference on Environment and Health (London, 1999) and the World Summit on Sustainable Development (Johannesburg, South Africa, 2002), an international legal framework on SEA was imposed. Consequently, the Espoo Convention was complemented with the UNECE Protocol on SEA, which was signed in Kyiv, Ukraine, by 38 countries, including the European Union, in May 2003. The Protocol on SEA entered into force in 2010.
WHAT PLANS, PROGRAMMES AND STRATEGIC DOCUMENTS REQUIRE SEA?

According to the Protocol, SEA is obligatory for governmental plans and programmes\(^\text{8}\) (Article 2.5) and their modification in thirteen economic sectors when the plans and programmes set the framework for future development consent for specific projects that require an EIA under national legislation (Article 4.2).

For plans and programmes in other economic sectors as well as for plans and programmes determining use of small areas at the local level, and for minor modifications, SEA is not applied automatically. Governments should determine whether SEA is required or not. This process is called screening (Article 4.4). If a plan or a programme or its minor modification is likely to have significant environmental, including health effects, SEA should be applied (Article 5.1).

Two types of plans and programmes are exempt from the application of SEA:
- Plans and programmes exclusively serving national defence and civil emergencies (Article 4.5)
- Purely financial or budgetary plans and programmes (Article 4.5).

The Protocol on SEA applies to plans and programmes prepared by public authorities at national and local levels. It is not applicable to already existing strategic documents that were adopted by a country before it joined the Protocol but only to proposed new plans and programmes.

QUESTION:

Is SEA required only for documents that are called a “plan” or a “programme”?

ANSWER:

A large number of official strategic documents have the characteristics of plans, programmes and policies as defined in the Protocol and the SEA Directive and, thus, should be subject to SEA. Often these documents have various names such as “strategies”, “concepts”, “guidelines” or “conditions”. It is not the name but the nature and the content of the document that determines whether SEA should or should not be conducted in each particular case. The Protocol specifies that the term “plans and programmes” includes those plans and programmes (and any modifications to them) that are required by legislative, regulatory or administrative procedures, and that are subject to preparation and/or adoption by an authority or prepared by an authority for adoption, through a formal procedure, by a parliament or a government (Article 2.5).

Source: First review of implementation of the Protocol on Strategic Environmental Assessment (2010-2012)
EXAMPLE 1: PLANS AND PROGRAMMES THAT UNDERGO SEA IN VARIOUS COUNTRIES

DOMESTIC SEAs

Denmark: Yearly investment plans of the Transport Ministry
France: Forest management plans (including private forests)
Hungary: Plans for encouraging investments
Poland: Urban renovation programmes
Montenegro: Offshore Hydrocarbon Exploration and Production Programme

Source: Prof. Jerzy Jendroska (Poland)*

TRANSBOUNDARY SEAs

Germany: Sectoral Plan for mining in Nochten
Finland: Spatial Development Plan for Hankivi in relation to the new planned Nuclear Power Plant in the Czech Republic: Actualization of the Energy concept planning of the Liberec Region

Source: First review of implementation of the Protocol on Strategic Environmental Assessment (2010-2012)**

Number of SEA procedures initiated
2010-2012 in selected countries

HUNGARY

- Water management <50
- Regional development <100
- Transport <5
- Town and country planning <200
- National Rural Strategy

CZECH REPUBLIC

- Water management
- Tourism 3
- Regional development 11
- Other 6

BULGARIA

- Water management
- Waste management 70
- Energy 11
- Town and country planning 1 300***
- Regional development 8
- Transport 5

* Includes Agriculture 1, Forestry 1, Fisheries 1

** Air protection 4, Nature protection 2

*** Town and country planning or land use subject to SEA include mainly detailed plans for land use of small territories. However, these plans set the framework for development of different investment proposals – production of electricity, roads, urban development projects, holiday villages and hotel complexes.

Source: First review of implementation of the Protocol on Strategic Environmental Assessment (2010-2012)
05 SEA PROCEDURE SET BY THE UNECE PROTOCOL ON SEA

01 Scoping

02 Environmental Report

03 Consultations

04 Decision-making

05 Monitoring

Determining if SEA is required

Health authorities

Environmental authorities

Affected parties

The public
01 Scoping

When it has been established that a given plan or programme falls under the scope of the Protocol, the SEA for that plan or programme starts with scoping (Article 6). The scoping defines those environmental and health issues related to the implementation of the plan or programme that need to be further addressed in the assessment. Establishing a clear scope of SEA early on helps focus the work on what is actually important, and helps use resources efficiently. Environmental and health authorities, as well as the public, need to be consulted when determining the scope of SEA.

02 Environmental Report

With the information from the scoping stage at hand, experts analyze the plan or programme for its potential environmental and health effects, and develop mitigation measures and alternative planning options that can reduce the negative and enhance the positive effects. All findings must be documented and presented in an environmental report (Article 7). The Protocol on SEA specifies the information to be included. The environmental report provides those authorities who have to decide on the adoption of a plan or programme, say, in the Ministry of Energy or Ministry of Transport, valuable information to help them consider the environmental and health effects so they can take the best decision for their community.

03 Consultations

Before any decision is taken, the environmental and health authorities must be consulted on the findings of the environmental report and the concerned public must be invited to express its opinions (Articles 8 and 9). Also, neighbouring countries have to be able to share their concerns in cases where transboundary impacts are expected (Article 10). Such consultations are crucial in SEA and applied throughout the process to produce results that are as transparent and comprehensive as possible.

04 Decision-making

The consultation results are not binding but decision makers consider all opinions before taking a final decision. They must also inform the environmental and health authorities and the public about the final decision taken (Article 11).

05 Monitoring

Once a decision is taken, the Parties are responsible for monitoring the effects of the adopted plan or programme, and for making the monitoring results publicly available (Article 12).
WHAT ARE THE BENEFITS OF SEA?

SEA PROVIDES A HIGH LEVEL OF ENVIRONMENTAL PROTECTION

SEA identifies likely significant environmental and health effects of proposed strategic development options. It equips planning authorities with suggestions to mitigate these effects and opens the planning to alternative development opportunities. With this information the planning authorities are able to ensure reduction or avoidance of irreversible and severe consequences of development, safeguard protected areas and sites, and maintain critical habitats and other areas that are important for the conservation of biodiversity.

QUESTION:

Is implementing SEA difficult and cumbersome?

ANSWER:

SEA is not a long and complicated research study but a practical tool to improve decision-making at the strategic level by highlighting potential environmental and health risks associated with the implementation of plans or programmes. Rather than covering all possible consequences that might arise, SEA focuses planning on a few important aspects where the major effects may occur. This makes SEA cost-effective and saves time and money. As institutions and practitioners gain experience, SEA can become more complex, matching the capacity of those in charge and the knowledge gathered over time.

EXAMPLE 2:

SEA CONTRIBUTIONS TO INCORPORATION OF ENVIRONMENTAL CONSIDERATIONS INTO ECONOMIC PLANNING DEVELOPMENT

In Bulgaria as a result of SEA, the draft National Renewable Energy Action Plan (2011–2020) included some restrictions and prohibitions for developing renewable energy projects in specific areas.

Similarly, in Denmark the SEA procedure led to the exclusion of one location for wind farms due to the expected high level of noise that would disturb nearby human habitats.

Based on SEA conclusions in Hungary, the authorities turned down the entire settlement development plan of the village of Pilisszentkereszt in order to prevent the negative environmental impacts associated with the planned construction projects.

In the Netherlands, an SEA resulted in some amendments to the draft national strategic policy on pipelines: certain pipeline routes have been altered or dropped for environmental safety reasons.

An SEA in Romania modified a master plan for coastal protection and rehabilitation to protect an existing Natura 2000 site.

Source: First review of implementation of the Protocol on Strategic Environmental Assessment (2010-2012)
SEA PROMOTES SUSTAINABLE ECONOMIC DEVELOPMENT AND FACILITATES THE GREENING OF ECONOMIES

SEA provides planners with a tool that allows the pursuit of environmental objectives (such as biodiversity protection, increased energy efficiency or mitigating climate change) in tandem with economic interests and goals. It helps reach green economy targets by considering sustainable alternatives and encouraging the search for win-win options for further economic development within the carrying capacity of ecosystems.

**QUESTION:**
Is SEA an elitist and expensive tool for rich countries?

**ANSWER:**
The costs of SEA vary with the scope and complexity of the SEA, which in turn depend on the scale of the plan or programme assessed, the number of alternatives to be evaluated, as well as the selected plan-specific methodology of the SEA. The Protocol on SEA does not prescribe a specific methodology, but allows Parties to utilize a procedure that suits their capacities and economic contexts. Therefore, if a country is able to develop a plan or programme it should be able to conduct SEA.

According to a study of SEA in the European Union, the costs for carrying out SEAs vary between 5 and 10 per cent of the planning cost, and are marginal in comparison with the costs of the implementation of plans or programmes (i.e., financing all activities and projects proposed by the planning document). When SEA can be done without expensive modelling or other complex data processing tools, these costs are mostly associated with fees for SEA practitioners employed in many countries by planning authorities to conduct the SEA procedure. Experience has shown that small municipal SEAs can be carried out in as little as 30 working days. Medium-scale SEAs require 50-100 working days, while more complex large-scale SEAs require between 150 and 300 working days depending on the amount of information to be processed.

Source: EU Commission, EIA – costs and benefits 14
SEA IMPROVES PLANNING AND PROGRAMMING

SEA generally improves the overall quality of planning and programming processes by introducing focus, adding rigour and creating openness to alternatives that are not only environmentally sound, but often more cost-efficient. It encourages planners to consider a full range of risks and opportunities for more sustainable forms of development.

For countries where planning procedures are not yet codified and represent a maze of different actions, this benefit is particularly relevant. Introducing a well-structured SEA framework in these countries makes planning more systematic, less sporadic and ultimately more effective.

**QUESTION:**

Does SEA delay the planning process?

**ANSWER:**

A number of planning and programming steps have logical links with the SEA procedure. Therefore it is more effective to integrate SEA into planning instead of doing first one and then the other. This saves time and keeps additional costs for the planning procedure modest. Planning and SEA can share efforts when, for instance, filing data requests, conducting consultations with national authorities and the public and undertaking review processes. Planning and SEA teams can inform each other of findings as they progress and create an iterative process allowing for SEA findings to be integrated into the development of the plan or programme. Experience has shown that for planning procedures with a duration of 1-2 years, an SEA almost never prolongs the planning process when it is integrated into the planning procedure.


**EXAMPLE 3:**

**THE REPUBLIC OF MOLDOVA**

The SEA of the Master Plan of the Orhei town helped the Master Plan development team identify major environmental problems, obtain new environmental data and prepare environment-related maps that combine business data and development options with locations and borders of natural areas, river basins and nature protection zones, as well as air and water pollution data. This information considerably enhanced the environmental chapter of the Master Plan. The SEA also helped to improve road schemes and justify the introduction of proper waste management schemes and indicated places where waste management facilities cannot be located. Based on the information from the SEA report the Orhei town administration is now able to address the national government funds and donors with a request to allocate necessary resources for road and waste management schemes in the town.

The identification of data gaps during the SEA facilitated improvements in regular statistical data collection and aggregation schemes for both the local and national levels. As a result of the SEA, data on noise levels and the impacts of stone mine operations on the surrounding urban areas will be made available.

Source: Ministry of Environment of the Republic of Moldova
Preparing a plan or programme

**SEA process**

- Defining the scope of the plan or programme
- Drafting the plan or programme
- Analyses
- Developing alternatives etc.
- Consultations on plan/programme
- Determining if SEA is required
- Environmental report preparation
- Analyses
- Inputs to planning alternatives
- Mitigation measures
- Consultations on plan or programme including environmental and health aspects
- Decision-making regarding the plan or programme
- General monitoring of implementation
- Inputs for decision-making regarding the environmental and health aspects of the plan or programme
- Environmental and health monitoring of implementation

---

**SEA conducted after the plan or programme is drafted (ex-post SEA)**

**SEA process**

- Defining the scope of the plan or programme
- Drafting the plan or programme
- Analyses
- Developing alternatives etc.
- Consultations on plan/programme
- Determining if SEA is required
- Environmental report preparation
- Analyses
- Inputs to planning alternatives
- Mitigation measures
- Consultations on plan or programme including environmental and health aspects
- Decision-making regarding the plan or programme
- General monitoring of implementation
- Inputs for decision-making regarding the environmental and health aspects of the plan or programme
- Environmental and health monitoring of implementation

---

**SEA conducted in parallel with the preparing the plan or programme**

**SEA process**

- Defining the scope of the plan or programme
- Drafting the plan or programme
- Analyses
- Developing alternatives etc.
- Joint consultations on the proposed plan/programme and environmental report
- Environmental report preparation
- Analyses
- Inputs to planning alternatives
- Mitigation measures
- Decision-making regarding the plan or programme
- General monitoring of implementation
- Environmental and health monitoring of implementation

---

**Time**
SEA LEADS TO MORE EFFICIENT DECISION-MAKING

SEA enables planners to take environmental and health issues into account before decisions are made, when multiple alternatives are still open for consideration. SEA also allows further incorporation of issues of concern at different stages and levels of decision-making. Better and more consistent decision-making at the plan or programme levels leads to fewer appeals and less discussion at the operational level. Such decision-making processes save time and are thus cost-effective.

QUESTION:
Does SEA shift the decision-making power from the planning authority towards the ministry responsible for environment?

ANSWER:
The Protocol on SEA stipulates which plans and programmes are subject to SEA procedure and provides for mandatory consultation with environmental and health authorities. It is left to the Governments to assign roles and responsibilities to their national authorities for the implementation of SEA. In most countries that are Parties to the Protocol, the planning authority has the main responsibility for carrying out or coordinating the SEA procedure. The ministries responsible for environment and health are usually assigned a supporting and/or consultative role. They also review the quality of SEA documentation and provide recommendations to the planning authority, but they do not interfere with the final decision on a plan or programme.

EXAMPLE 4: CROATIA
The SEA of the Spatial Plan for Požega-Slavonija County was conducted in 2014. It took two months to complete the SEA Report and an additional four months to complete relevant consultations with environmental and health authorities and the public. The SEA team established good communication and coordination with the planning team and the planning authority, so that both were open to sharing data with the SEA experts. A geographic information system (GIS) methodology was selected for assessing environmental and health impacts. The SEA team defined criteria on the basis of which restrictions in land use were identified, including sanitary protection zones, flood plain areas, protected nature areas, agricultural areas, valuable landscapes and others. These were used as a base for the assessment. Depending on the location of the planned activities (inside, outside or close to the restriction zones), mitigation measures were proposed. After that, a few discussions on the results of the SEA were organized with the planning team and the planning authority. Most measures were accepted and integrated into the Plan. Now projects are only developed for non-restricted zones.

Source: Ivana Saric, Dvocut Ecro Ltd. (interview)
EXAMPLE 5: CZECH REPUBLIC

The SEA for the operational programme “Enterprise and Innovations 2007–2014 of the Czech Republic” proposed an overall scheme for environmental and health monitoring including 18 specific environmental and health criteria to be considered when evaluating and selecting individual projects to be funded under the programme. The final SEA statement issued by the Ministry of Environment recommended that those criteria be integrated in the overall system for project evaluation and selection. The Ministry of Industry and Trade, however, which was responsible for drafting and implementing the programme, adopted only the criteria it considered most relevant to the projects eligible for funding under the programme. Although not all SEA criteria were integrated into the programme selection process, the SEA helped the ministry improve the environmental and health components of the programme by selecting those projects that could satisfy the carefully chosen SEA criteria.

Source: Integra Consulting LTD
SEA IMPROVES GOVERNANCE

SEA promotes good governance and public trust in decision-making by fostering greater transparency in planning and programming. SEA provides clear procedures for consultation and communication between the key national and local planning authorities, business and civil society. It promotes better-informed, credible decisions for greening economies while sustaining a business environment of trust.

QUESTION:

Is SEA a tool for public administration without relevance for the general public?

ANSWER:

Public participation is one of the keystones of SEA. Besides the right to access certain information, the Protocol on SEA provides the public with the right to participate and express its opinion in determining the scope of an SEA and on draft environmental reports. To make this process more effective, the Protocol on SEA includes a specific requirement for a non-technical summary of proposed plans or programmes. It is designed specifically for the layperson so that he/she can clearly understand what the planning authorities propose to do, what the alternatives are and what the consequences of each alternative will be. In keeping with the Protocol on SEA, national SEA legislation should include provisions on public participation.

EXAMPLE 6: SLOVAKIA

The SEA of the Slovak Energy Policy 2000 started at the initial phase of policy preparation. The Ministry of Economy developed an energy policy outline for comment by NGOs, then a discussion document for parliamentary meetings. A full text of the draft energy policy was made available through the Internet and at Government offices. A public announcement with an invitation to provide comments was made in the Economic News. Two months were allowed for public review and the submission of comments on the SEA scope. More than 400 comments were received.

Source: Good practice recommendations on public participation in strategic environmental assessment, UNECE

EXAMPLE 7: SPAIN

The public participation process in preparation of Spain’s Sustainable Rural Development Programme resulted in nearly 700 responses, and nearly 1,200 suggestions for improving the programme. Of these, 46 per cent were about the programme actions, SEA and rural strategy; 85 per cent of these suggestions were accepted. They included guaranteed treatment of waters for all protected nature areas, enforcement of environmental provisions and guaranteed public participation at local and regional levels of decision-making.

Source: Good practice recommendations on public participation in strategic environmental assessment, UNECE 2014
SEA PREVENTS COSTLY MISTAKES

SEA helps countries prevent costly mistakes that arise from neglecting environmental and health effects by providing early warning signals about environmentally unsustainable development options. It reduces the risk of costly remediation of harm or corrective actions, such as relocating or redesigning facilities. It saves time and money.

EXAMPLE 8: AZERBAIJAN

An SEA was applied to the 2015–2020 National Strategy on Use of Alternative and Renewable Energy Sources in the Republic of Azerbaijan. Although the strategy is relatively general and outlines only main priorities for renewable energy development without further specification regarding the likely scope of potential projects or the territories where specific projects would be implemented, the SEA provided an indication of sensitive areas that should be avoided for certain types of renewable energy developments that might interfere with bird migratory corridors or damage sensitive areas in coastal waters. Thus, further planning of renewable energy production and project design can focus on the areas without the risk of the major adverse environmental effects.

Source: Ministry of Ecology and Natural Resources of Azerbaijan Republic

EXAMPLE 9: The Aral Sea

The tragedy of the Aral Sea is a dramatic example of what can happen when environmental, social and health impacts of development plans and programmes are not taken into account. The Aral Sea was once the world’s fourth largest lake, and supported thriving fisheries, abundant wildlife and a large human population. It is now a deserted wasteland with abandoned irrigation infrastructure and rusty ships contaminated by cast-off pesticides, fertilizers and other chemicals. In the early 1960s, the Soviet government decided the two rivers that fed the Aral Sea, the Amu Darya in the south and the Syr Darya in the east, would be diverted to irrigate the desert in an attempt to grow rice, melons, cereals and cotton. The Aral Sea fishing industry, which in its heyday had employed some 40 000 and reportedly produced one-sixth of the Soviet Union’s entire fish catch, has been devastated, and former fishing towns along the original shores have become ship graveyards. SEA can help preventing such fatal planning mistakes in the future by anticipating environmental consequences and providing viable development alternatives.
SEA STRENGTHENS THE EIA PROCESS

Identifying the environmental and health issues of plans and programmes at the strategic level can help to strengthen and streamline EIAs undertaken at the project level. SEA can address effects that are difficult to grasp at the project level; in particular, SEA can provide an early warning of large-scale and cumulative effects, including those resulting from a number of smaller-scale projects that individually would fall under thresholds for triggering a project EIA.

QUESTION:

Does SEA duplicate work conducted in the framework of an EIA?

ANSWER:

EIA and SEA are procedural instruments of environmental assessment, designed to prevent any likely negative effects of economic development on the environment and human health. They differ significantly, however, in relation to the type of activities covered and the scope of the assessment.

Compared to EIAs for individual projects, SEA intervenes much earlier in the decision-making process and targets government plans and programmes as well as policies and legislation. While EIA is focused on the physical impact of a concrete project on the state of the environment, SEA analyses whether the implementation of a proposed strategic document would hamper or facilitate the achievement of relevant environmental objectives set by the state. SEA is also able to capture cumulative effects of individual projects at a very early planning stage.

The efficient application of SEA to plans and programmes can help streamline subsequent project level EIAs by identifying locations most suitable for a certain type of development, by reducing the number of potential alternatives and by determining the specific problems to be addressed in detail in subsequent EIAs. Consequently, SEA narrows the scope of EIAs and can make the overall planning process more efficient and less work intensive. The different roles of SEA and EIA should be clarified during the scoping of the SEA to avoid any duplication of work.
EXAMPLE 10: Indonesia

The SEA for the National Master Plan for Acceleration and Expansion of Indonesian Economic Development 2011–2025 aimed at assessing the likely cumulative effects of multiple activities proposed for implementation under the Master Plan in the context of existing environmental pressures. For instance, for the Greater Jakarta area, the SEA estimated air emissions from a number of new industries to be established in the area. The results indicated that additional large volumes of CO, NOx, SOx, and PM would be expected due to implementation of the Master Plan – which is particularly significant for an area with high air pollution. Based on these findings, the SEA could recommend reducing a number of proposed industrial projects in certain territories, reallocating some projects from densely populated areas or formulating further EIA guidelines, such as air quality modelling.

Source: DHI Water & Environment and Integra Consulting Ltd. 2015
SEA FACILITATES ENVIRONMENTAL DIPLOMACY AND REDUCES THE POTENTIAL FOR INTERNATIONAL CONFLICTS

SEA can provide an important arena for regional cooperation to address difficult issues concerning shared protected areas, waterways, transport connections and transboundary pollution.

In cases where the envisaged plan or programme is likely to cause environmental and health impacts across the national frontiers of a Party, the Protocol on SEA provides for clear procedures for information sharing and consultations across national borders. Dialogue between those national governments that initiate development plans and projects and those governments whose citizens and national territories can potentially be adversely affected by such developments through transboundary or long-range environmental pollution contributes to the prevention of potential political and resource-driven international conflicts and promotes regional and global stability.

In effect, an investor for an activity planned under a development strategy does not run the risk that the activity will later be opposed by the national authorities or the public or a potentially affected country. This approach avoids delays and damages in the subsequent project implementation.

QUESTION:
Can one party to the Protocol on SEA prevent or stop other parties from developing programmes, plans and projects that are of significant strategic importance, and create an opportunity for political or economic pressure?

ANSWER:
The Protocol on SEA does not envisage any right of veto for other Parties potentially affected by a plan or programme. The government in charge remains sovereign in taking decisions regarding the implementation of the plan or programme. The Protocol only requires consultations when other countries can potentially be affected. In that case, those countries should be given the opportunity to raise their concerns and to enter into a dialogue with the government in charge of a plan or programme so that concerns can be jointly addressed. Outcomes of the consultations should be taken into consideration and integrated into the decision-making process where appropriate, but they are not binding as such.
EXAMPLE 11: POLAND

Voivodeship Spatial Development Plan for Lubuskie is a regional development and land-use plan that had been modified from 2007.

Lubuskie Voivodeship is located close to the border with Germany. This region has natural landscapes of high value, favourable transport connections with Germany and other parts of Poland, the Odra River waterway (a European ecological corridor), deposits of natural resources (especially energy resources), large areas of forest and agricultural land.

Poland recognized that implementation of the plan was likely to have significant transboundary environmental and health effects on German territory. As a result of the transboundary SEA procedure, the relevant Polish authority received 1,099 comments from the German public and two official statements from Brandenburg and Saxony, which included opinions of the municipalities and other concerned German authorities. The adopted plan includes a summary of how the comments and suggestions from Germany were taken into account and to what extent they were used. Germany was fully satisfied with the SEA documentation and had no further questions or concerns.

Source: UNECE Case Study Fact Sheet: Spatial Development Planning at the regional level, Lubuskie Voivodeship, Poland, bordering with Germany (Brandenburg and Saxony)
SEA PREVENTS INTERSECTORAL CONFLICTS

SEA can contribute to preventing potential conflicts between different economic sectors within the country by examining the relationship of a plan or programme to other plans and programmes at the earliest stage of planning and offering alternatives that can help to avoid conflict.

EXAMPLE 12: NORWAY

The Norwegian Water Resources and Energy Directorate (NVE) carried out a SEA for the construction of offshore wind power at sea. The goal of the SEA was to provide the best possible basis for the Government in deciding which of the 15 pre-selected zones should be opened for license applications. The SEA was based on a comprehensive assessment of environmental impacts, business and public interests as well as technical-economic suitability for each of the 15 zones. The five zones selected and recommended by the NVE allowed for both bottom-fixed installations and floating turbines. These five zones stand out due to good technical-economic conditions, good prospects for grid connection by 2025, and lower overall impacts than those identified for the other zones. Among the impacts considered were environmental impacts, conflict with other actual and potential users of the sea, such as fisheries and oil and gas extraction industries, landscape and outdoor activities as well as tourism.

Source: Institute for Marine Research, Norway

SEA GENERATES JOBS AND HELPS REDUCE UNEMPLOYMENT

Adopting and implementing an SEA system will create jobs for environmental and health specialists and experts both in public administration and the private sector. In most cases, a country has sufficient expertise to carry out environmental impact and health assessments. For the practical implementation of SEA, however, countries also need specialists who know how to organize SEA processes and what analytical tools to use for each specific sector.

Under the framework of the Protocol, the UNECE secretariat strives to provide legislative advice and technical support to assist countries in establishing and implementing their national SEA systems with the aim of having more Parties join the Protocol. The best means to build capacity for SEA is to apply it in practice: To this end, pilot SEAs and training courses are organized as training opportunities. Major target groups are governmental authorities, environmental institutions, experts and anyone involved in the implementation of SEA.
SEA IS A TOOL FOR CLIMATE CHANGE ADAPTATION

SEA can be an effective tool for climate change adaptation and mitigation, by introducing climate change considerations into development planning. It is a particularly useful mechanism for introducing the consideration of climate change impacts in plans and programmes that are prepared for regional development planning and for town and country planning or land-use planning.15

EXAMPLE 13:
THE NETHERLANDS

Water management has always been essential for the socioeconomic development of the Netherlands because about 25% of the country and half of the population is living below sea level. Since early 2010 the Dutch Governmental Programme “Room for the River” has been working to protect about two millions of inhabitants of the Rhine River basin from high water levels related to climate change. The Programme aimed to offer a set of measures to provide extra space for free flow of the river throughout the coming decades, to maintain a level of safety against floods and to improve the quality of the river basin environment and strengthen the function of the rivers as an ecological corridor. The SEA for the Room for the River Programme helped to:

– Identify alternatives for approximately 30 sites
– Compare the pros and cons of the alternatives
– Select preferred alternatives in consultation with the people and organizations affected
– Inform the debate among stakeholders on the necessary trade-offs

The SEA presented an integrated approach to display the social and economic costs and benefits of climate change adaptation alternatives, and ensured a participatory approach to decision-making to obtain public support for the future projects, in particular, in the areas where inhabitants were to be relocated.

Source: The Dutch Room for the River Programme17
HOW CAN A COUNTRY JOIN THE PROTOCOL ON SEA?

The Protocol is open to all Member States of the United Nations. A State does not need to be a Party to the Espoo Convention to join the Protocol.

To prepare for the implementation of the Protocol, the Government will need to take necessary legislative, regulatory and other appropriate measures to apply the provisions of the Protocol within a clear, transparent framework.

To become a Party to the Protocol, a State that signs the Protocol deposits an instrument of ratification, acceptance or approval with the United Nations Secretary-General in New York. In other cases, an instrument of accession needs to be deposited. This procedure for accession to the Protocol is identical for all Members of the United Nations, whether they are members of UNECE or not.

QUESTION:

Is it better to implement SEA without joining the Protocol on SEA?

ANSWER:

By developing a national SEA system without joining the Protocol on SEA, a country misses out on many advantages. The Protocol on SEA creates a joint legal and institutional framework under which Parties and stakeholders mutually support each other and collectively work towards better environmental and health protection. The meetings of the Protocol’s governing and subsidiary bodies provide a platform for networking and for learning from the exchange of information and experiences among the Parties. The regular reporting by Parties on their implementation of the Protocol provides useful reference material. The treaty bodies and the secretariat provide advisory services and the Implementation Committee can be referred to for assistance in compliance matters, or for concerns about another Party’s compliance with its obligations under the Protocol. The workplans under the Protocol also provide opportunities for capacity development financed by donors, such as pilot projects or training courses for the application of SEA.

The Protocol is based on know-how and UNECE experiences that have proven to be successful. The resulting joint standards on the SEA procedure create an effective and uniform system that facilitates exchange and communication among partner countries. Such reliability is favourable for investment and therefore compliance with an international standard for SEA is often required for obtaining loans and grants from international finance institutions.

A country adopting its own SEA framework may be in line with Protocol provisions but without being a Party, it has no say in the Protocol, and cannot benefit from its strengths. By becoming a Party, a country demonstrates its commitment to internationally recognized standards of SEA, as well as its support for the related principles of environmental democracy and good governance.

The Protocol on SEA is consistent with relevant EU legislation. Therefore, SEA legislation in compliance with the Protocol on SEA helps countries that have or plan to conclude an Association Agreement with the European Union to meet those requirements as well.
Organizational structure of the Espoo Convention

Meeting of the Parties to the Convention (MoP) -> Implementation committee -> Bureau
Meeting of the Parties to the Convention serving as the Meeting of the Parties to the Protocol (MoP/MoP)

Working group on EIA and SEA

Inquiry commission (not permanent)

supported by

Secretariat
Is it sufficient for countries in Eastern Europe, the Caucasus and Central Asia to extend their current OVOS-expertise systems to plans and programmes to comply with the Protocol on SEA?

The traditional OVOS/State Ecological Expertise systems do not correspond well with the international standards for SEA and do not allow for effective implementation of the Protocol on SEA. These systems are conceptually different. Environmental assessment under the OVOS system is focused on compliance with national technical environmental standards, while issues not clearly regulated by standards are considered to be outside the scope of assessment. Environmental assessment under the SEA system has a preventive nature, and requires consideration of significant impacts (even if those are not included in national environmental standards), as well as the development of alternatives and mitigation measures. In addition, the environmental assessment of plans and programmes under the OVOS/SEE system is implemented by environmental authorities. In contrast, SEA is implemented by the sectoral authorities responsible for the development of the plan or programme in question.

Source: UNECE: Practical Guidance on reforming legal and institutional structures with regard to the application of the strategic environmental assessment (SEA) procedure in accordance with the UNECE Protocol on SEA (2016)
<table>
<thead>
<tr>
<th>Activity</th>
<th>SEA</th>
<th>OVOS/SEE*</th>
</tr>
</thead>
<tbody>
<tr>
<td>SCREENING</td>
<td>✔</td>
<td>✗</td>
</tr>
<tr>
<td>SCOPING</td>
<td>✔</td>
<td>✗</td>
</tr>
<tr>
<td>ENVIRONMENTAL REPORT</td>
<td>✔</td>
<td>✗</td>
</tr>
<tr>
<td>PUBLIC PARTICIPATION</td>
<td>✔</td>
<td>✗</td>
</tr>
<tr>
<td>CONSULTATIONS WITH ENVIRONMENTAL AND HEALTH AUTHORITIES</td>
<td>✔</td>
<td>✗</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Based on draft plan or programme only</td>
</tr>
<tr>
<td>TRANSBOUNDARY CONSULTATIONS</td>
<td>✔</td>
<td>✗</td>
</tr>
<tr>
<td></td>
<td></td>
<td>SEE or approval by environmental and health authorities</td>
</tr>
<tr>
<td>INTEGRATION OF THE RESULTS OF CONSULTATIONS AND THE RECOMMENDATIONS OF THE ENVIRONMENTAL REPORT INTO THE FINAL PLAN OR PROGRAMME</td>
<td>✔</td>
<td>✗</td>
</tr>
<tr>
<td>MONITORING</td>
<td>✔</td>
<td>✗</td>
</tr>
</tbody>
</table>

*SEE – State Ecological Expertise*
5 For up to date status of ratifications, please see: https://treaties.un.org/Pages/ViewDetails.aspx?src=TREATY&mtdsg_no=XXVII-4-b&chapter=27&lang=en
6 Eastern Europe – Belarus, the Republic of Moldova, the Russian Federation, Ukraine; Caucasus – Armenia, Azerbaijan, Georgia; Central Asia – Kazakhstan, Kyrgyzstan, Tajikistan, Turkmenistan, Uzbekistan.
7 OVOS is an acronym whose terms, in direct translation, can be rendered as "assessment of the impact upon the environment". However, in some countries of Eastern Europe Caucasus and Central Asia where traditional (soviet based) OVOS system is used, it is often conceptually and procedurally different from the EIA procedure required by the Espoo Convention (See Question 10 for more details).
8 The Protocol specifies that the term "plans and programmes" includes those plans and programmes (and any modifications to them) that are required by legislative, regulatory or administrative procedures, and that are subject to preparation and/or adoption by an authority or prepared by an authority for adoption, through a formal procedure, by a parliament or a government (Article 2.5).
10 Available online from http://www.unece.org/fileadmin/DAM/env/eia/Publications/2015/ECE.MP.EIA.SEA_REVTA>Type3 ENG.pdf
11 Available online from http://www.unece.org/fileadmin/DAM/env/eia/Publications/2015/ECE.MP.EIA.SEA_REVTA>Type3 ENG.pdf
12 Available online from http://www.unece.org/fileadmin/DAM/env/eia/Publications/2015/ECE.MP.EIA.SEA_REVTA>Type3 ENG.pdf
15 Available from https://www.unece.org/fileadmin/\DAM\env/eia/documents/mop6/2_Fact_Sheet_Study_Case_on_SEA_long_version.pdf
17 Available online on 12/02/2016 at [https://www.ruimtevoorderivier.nl/english/]
Acronyms and abbreviations

**CO:** Carbon monoxide
**EaP:** European Union Eastern Partnership
**EaP GREEN:** Greening Economies in the Eastern Neighbourhood
**EIA:** Environmental Impact Assessment
**Espoo Convention:** Convention on Environmental Impact Assessment in a Transboundary Context
**GIS:** Geographic information system
**NGO:** Non-governmental organization
**NOx:** Nitrogen oxides
**OECD:** Organisation for Economic Co-operation and Development
**OVOS:** Equivalent to “environmental impact statement” in Eastern Europe, the Caucasus and Central Asia
**PM:** Particulate matter
**SCP:** Sustainable Consumption and Production
**SEA:** Strategic Environmental Assessment
**SEE:** State Ecological Expertise
**SOx:** Sulphur oxides
**UNECE:** United Nations Economic Commission for Europe
**UNEP:** United Nations Environment Programme
**UNIDO:** United Nations Industrial Development Organization
For more information, please contact:
UNECE Secretariat to the Espoo Convention
and its Protocol on SEA
Tel: +41 22 917 1723
Fax: +41 22 917 0107
E-mail: eia.conv@unece.org
Website: www.unece.org/env/eia
Protocol on Strategic Environmental Assessment
Facts and Benefits