Abstract: There is a need for impact assessment processes that capture the complexity of partnerships (between
government, companies, and communities), while providing relevant and practical guidance. One reason is that
traditional impact assessment focuses much on the consent decision and less on the complete supply-chain from
the first strategic plan, to project development, realisation, up to operation and maintenance. However, in order
to create true partnerships, a good start is crucial. Here Strategic Environmental Assessment (SEA) plays a vital
role. At the same time, it is important to adopt a bottom-up perspective relating initiatives carefully to what is
happening on the ground (monitoring and daily operations).

Keywords: Strategic environmental assessment, social and environmental impact assessment, tiering, partnering, public private
partnerships, green procurement, social licence to operate, supply chain management, social development, corporate social responsibility,
project delivery.

1. Introduction

This paper aims at introducing the concept of partnerships and its relationship with Strategic Environmental
Assessment (SEA). In this paper, we argue that there is a need for Impact Assessment (IA) processes that capture
the complexity of partnerships (between government, companies, communities) in order to deal with the
complete supply-chain from the first strategic plan, to project development, realisation, down to operation and
maintenance. In order to create true partnerships for sustainable performance, a good start is crucial. Here SEA
plays a vital role. At the same time, it is important to adopt a bottom-up perspective relating strategic initiatives
carefully to what is happening on the ground (monitoring and daily operations). Also, we will elaborate on the
range of parties involved and the various instruments that are rapidly developing aiming at more sustainable
project delivery. Subsequently we will discuss the consequences for IA and especially SEA of the development
of these new instruments. Finally, we draw some conclusions and raise some issues for ways forward.

2. Background – Limitations to SEA

One of the major reasons for the development of the concept of Strategic Environmental Assessment (SEA) has
been the issue of foreclosure. Many decisions that have a bearing on environmental quality are taken before the
consent decision about a project without an explicit assessment of their environmental impact. Therefore, already
early on it has been discussed that there is need for Environmental Impact Assessment (EIA) at a higher level of
decision making than the project level (see e.g. Wood & Djeddour 1992, Therivel et al. 1992). As Partidario
(1999, p.60) indicates “The reasons [for SEA] are various but initially related to the timing of project EIA, i.e. it
enters the decision-making process at too late a stage to be able the final decision in a satisfactory way.” Closely
related to this the concept of tiering (see e.g. Arts et al 2010a) which assumes that by preparing a sequence of
environmental assessments at different planning levels and linking them, foreclosure may be prevented,
postponement of detailed issues may be permitted and assessments can be better scoped. A tiered approach
minimise the problem of Environmental Impact Assessment (EIA) being only a ‘snapshot in time’. Accordingly,
the EU SEA-Directive (2001/42/EC) explicitly assumes tiering of SEAs and EIAs at different planning levels
and the SEA- and EIA-Directive are directly linked (e.g. article 3(2) of Directive 2001/42/EC requires SEA for
those plans and programs, which set the framework for future development consent of EIA projects). See also
Figure 1.

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In this concept of tiered impact assessment (see Figure 1) it is usually assumed that at the policy, plan and programme level SEA addresses especially issues related to ‘what’ and ‘where’ questions (and sometimes also the ‘why’ question is added to this) as these issues of objective setting and geographical situation are major factors determining the (environmental) impact of activities. At the project level, EIA then addresses especially issues related to the ‘how’ question related to such issues as the detailed setting, design, lay-out, timing, mode of construction and/or operation. In the follow-up stages the implemented activity is monitored, evaluated and managed at which the focus is usually especially on ‘how’ issues (see e.g. Morrison-Saunders & Arts, 2004). Although all too often critical issues are not explicitly included in the consent decision and are postponed, the later follow-up stages after formal decision-making seem to get less attention amongst IA professionals.

The classic approach to SEA and EIA implies the following assumptions (often implicitly made):
- **Governance**: hierarchic steering – coordination – from the strategic level to the implementation (higher planning levels setting the framework for subsequent levels);
- **Instruments**: focus is on impact assessment that supports decision-making; very few other instruments are used after consent decision (‘making everything IA’), and
- **Parties**: Government is the dominant party, carrying out the process at the different stages, being initiator and authority at strategic level and authority at project level (the ‘who’ question).

In this paper, we argue that because of these assumptions, limitations to the delivery of sustainable outcomes by SEA are created.

**Governance**

The classic approach to SEA and EIA assumes hierarchic governmental steering ‘coordination’. Government, being the regulator, is setting policies, adopts plans, and develops programmes to set the framework for projects developed by (other) governmental agencies or private companies who have to do EIA studies in order to get planning consent for their project by the competent authorities. Citizens, communities, NGOs and other stakeholders are mainly involved as the ‘public’ in public reviews, hearings, workshops etcetera. This hierarchic governance of coordination model assumes a stick and carrot approach. It works reasonably well as long there is a carrot to be given – the approval of an activity or project. However, after giving planning consent to a project no real carrot is to be given and the hierarchic governance approach seem to be little effective. Not surprisingly, one can see that more recent especially with respect to the follow-up stages new governance approaches have been developed relating to cooperation and competition (see also Williamson 1996 and Robertson et al 2000).

**Instruments**

However, until now it seems that the IA community has been focusing on single instruments which imply especially a hierarchic governance approach and focus on getting information about the consequences of the decisions that are prepared at the levels of strategic planning and project development. There seem to be much less attention to implementation issues. This approach might be summarised as “making everything impact assessment”. Many variations have been developed, for almost every issue some form of impact assessment has been developed: EIA, SIA, EEA, HIA, BIA etc. (see Figure 2) As stated before this approach works reasonably

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Figure 1: The theoretical concept of tiering as it usually is depicted in SEA literature (see e.g. Wood 2003; after Arts et al. 2010a).
well up to the consent decision of projects but afterwards it seems to be less effective. In the stages after the consent decision: many issues are left because of complexity of implementation in a dynamic society, many (new) parties are involved (regulator, government, market, community), many perspectives relevant (environmental, social and economic) and there is a “rich, but messy, toolbox out there” – see next section (Arts et al 2011).

**Figure 2:** Much attention to impact assessment approaches, governmental decision-making and less to implementation stages.

*Parties*

In general, there seems to be also little attention in impact assessment (IA) literature and amongst IA professionals for the ‘who’ question. At the more strategic level it is assumed that government is the major player initiating new policies, plans and programmes that set the framework for further decision-making. At the project level government agency or private companies might carry out EIA studies for initiatives they propose while government is the competent authority for giving planning consent to the project. The involvement of other parties is often mainly restricted to giving comments in a public review. However, as we will see in the next section, especially in the stage of project implementation many instruments have become available and many parties are involved – not only government but also to companies and communities – all of which might be relevant to EA follow-up. A common element is that all these concepts stress that partnerships between companies, governments, agencies and communities are needed to ensure responsible plan and project-delivery (see Arts et al 2010b, 2011).

3. Partnering – new governance arrangements, other parties and instruments

Much happens after impact assessment when proponents (government or private companies) implement the proposed development and contract work, goods or services. This is the stage when other parties 3 – often private parties such as (sub) contractors – become involved in project implementation, and most of the actual impacts on environment, economy and the social community occur. These implementation parties may not have insight in the IA process, and similarly, the IA practitioners may have limited insight in the role of the implementation agencies and therefore suggest unpractical mitigation. An important question is: How to deliver the commitments made during the environmental and social impact assessment process and decision-making?

Governments, agencies, companies and communities are changing the way they interact in project development and are moving towards new forms of governance involving partnerships (either public-public or public-private partnerships) (Ngowi, 2007, Bresnen and Marshall, 2000). There might be distinguished different governance strategies (see also Williamson 1996, Robertson et al 2000):
- coordination – hierarchic, directive steering (IA, permitting)
- cooperation – network steering (partnering)
- competition – market steering (tendering, buying, selling).

3 IA involves different parties (government, NGOs, stakeholders, specialists) than those involved in the stages of project implementation (governmental commissioners, contractors/ suppliers, sub-contractors, engineering consultants, project developers, banks etc.).
Many new types of instruments have been developed assuming various governance strategies, which can be seen in sectors such as infrastructure, energy and mining (Arts et al. 2010b). Figure 3 and Table 1 provide some examples of such instruments or concepts as: green procurement, agreement-making, innovative contracting, sustainable supply chain management, green accounting, cradle-to-cradle, corporate social responsibility, and environmental rating systems such as CEEQUAL, BREEAM and LEED. Several of these instruments (e.g. Bream, LEED, CEEQUAL, EMS and green procurement) are more business-like and include clear performance indicators. However, many of these instruments are sometimes criticised of having limitations such as being too detailed and rigid. Nevertheless, many users of these instruments seem to overlook these limitations – the main reason being that the instruments are considered to fit better to implementation and better deliver sustainability than IA Follow-up. These instruments assume new forms of governance and new partnerships – different from IA – and aim at ensuring sustainable outcomes. They also relate to better linking project stages (assessment, construction, operation, maintenance), tools (impact assessment, procurement, contracting) and eventual desired outcomes. This involves more than just impact assessment. It requires looking at strategic partnerships to address local issues.

**Figure 3:** The various parties and tools used in post-consent decision stages relevant to impact assessment (after Arts et al. 2011).

**Table 1: Main governance strategies of various instruments available at the implementation stage.**

<table>
<thead>
<tr>
<th>Approaches</th>
<th>Parties</th>
<th>Governance</th>
<th>Description and definitions</th>
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<tbody>
<tr>
<td>State of the Environment (SOE) monitoring</td>
<td>Regulator - government</td>
<td>Coordination</td>
<td>A legal requirement of governmental bodies. It aims at monitoring the ongoing state and development of the environment.</td>
</tr>
<tr>
<td>Permitting (incl. Env. Req.)</td>
<td>Regulator – government/ market</td>
<td>Coordination</td>
<td>An environmental permit is a document prepared by a regulator - either the Environment Agency or a local authority. It has conditions which have to be followed in order to prevent a project from harming the environment or human health.</td>
</tr>
<tr>
<td>Environmental auditing</td>
<td>Regulator – government/ market</td>
<td>Coordination</td>
<td>An independent third party assessment of the current status of an organization’s compliance with local environmental laws and regulations.</td>
</tr>
<tr>
<td>EIA Follow-up</td>
<td>Regulator – government/ market</td>
<td>Coordination</td>
<td>The monitoring and evaluation of the impacts of a project or plan (that has been subject to EIA) for management of, and communication about, the environmental performance of that project or plan (Arts et al., 2003).</td>
</tr>
<tr>
<td>Green procurement</td>
<td>Government – market</td>
<td>Competition</td>
<td>Greener purchasing – the integration of environmental considerations into purchasing policies, programmes and actions (Russel, 1998).</td>
</tr>
<tr>
<td>Innovative contracts (DBFM, performance)</td>
<td>Government-market</td>
<td>Competition</td>
<td>Design Build Finance and Maintain (DBFM) are integrated contracts for construction projects. The contractor bears responsibility for the design, building, financing, maintenance and sometimes operation of the building.</td>
</tr>
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### Approaches, Parties, Governance Description and definitions

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<tr>
<td>Supply-chain-management</td>
<td>Market – market</td>
<td>Competition</td>
<td>Supply chain management is the integration of business processes from end user through original suppliers that provide products, services, information that add value for customers (Cooper, Lambert &amp; Pagh, 1997)</td>
</tr>
<tr>
<td>Bream/LEED</td>
<td>Government – market</td>
<td>Coordination</td>
<td>Bream is an environmental assessment method and system for buildings. It is based on a certification system and applied in housing projects but also sustainable neighbourhoods. LEED is a rating system for green buildings.</td>
</tr>
<tr>
<td>EMS</td>
<td>Market</td>
<td>Coordination/ self-</td>
<td>EMS is a process whereby organisations can assess and plan actions in order to minimise environmental impacts and improve environmental performance (Whitelaw, 1997; Welford, 1998; Steger, 2000).</td>
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<tr>
<td>Local content</td>
<td>Market – government/ community</td>
<td>Self-coordination</td>
<td>Local content is a recognised term in the oil and gas industry. It can be defined in terms of the ownership and/ or location of the enterprises involved in production and/ or the value-added in the production process (Wells &amp; Hawkins 2008).</td>
</tr>
<tr>
<td>CSR</td>
<td>Market – government/ community</td>
<td>Self-coordination</td>
<td>... social licence...is based not on compliance with legal requirements (although breach of these requirements may jeopardise the social licence), but rather upon the degree to which a corporation and its activities are accepted by local communities, the wider society, and various constituent groups. (Gunningham, Kagan &amp; Thornton 2002, p. 4).</td>
</tr>
<tr>
<td>Social-licence-to-operate</td>
<td>Market – community</td>
<td>Cooperation</td>
<td>A concept whereby companies integrate social and environmental concerns in their business operations and in their interaction with their stakeholders on a voluntary basis (European Comission, 2006).</td>
</tr>
<tr>
<td>Community participation</td>
<td>Community – government/ market</td>
<td>Cooperation</td>
<td>Community Participation refers to an active process whereby beneficiaries influence the direction and execution of development projects rather than merely receive a share of project benefits (Samuel 1987).</td>
</tr>
</tbody>
</table>

These instruments will influence social and environmental impact assessment. The new ways of working between parties are blurring sectoral boundaries. Traditional sector solutions are deemed inadequate in addressing the ‘big’ issues. Moreover, strategies may be enhanced by borrowing and learning from other sectors. There is a need for impact assessment processes with the ability to capture the complexity of partnerships, while providing relevant and practical guidance to managers. This is not only true for EIA at the project-level but also at the more strategic level – SEA (see Figure 5).

**Figure 5:** SEA capturing the complexity of various parties, instruments and governance arrangements.
4. The Impact of Partnering on SEA

The diversity of approaches that can be seen in practice at follow-up stages relating to the implementation of projects and activities should not be considered a weakness but a potential strength. Also, a diversity of approaches is not a weakness but a strength (smart combinations). For complex problems there is need for sufficient diversity (a varied response potential) conform the law of ‘requisite variety’ (Ashby 1956 in Nooteboom 2007). Moreover not everything should be approached via an approach of hedging approach (of content) but also approaches of flexing (process) (see Collingridge 1983). In order to ensure sustainable performance throughout the whole planning cycle it is important that SEA gives direction not only to project EIA but also to the follow-up stages. However, difficulties with the implementation of the concepts of tiering IA follow-up (see e.g. Arts et al 2010a, Morrison-Saunders & Arts 2004) indicate that SEA should become more inclusive.

Two important aspects to discuss in this context are (see Figure 4):
- the role of SEA in giving direction to subsequent process; and
- the importance of being inclusive of other instruments than IA already at the SEA stage.

First of all, this requires that SEA (and EIA) enlarge their scope by addressing not only IA in subsequent stages. SEA should address the whole life-cycle up to construction and operation as well as the rich and broad array of instruments available at follow-up stages also focussing on sustainable performance – see Figure 6. In order to be more effective in delivering commitments made during IA and decision making and in achieving sustainable performance throughout the whole life-cycle SEA should not only give direction to subsequent IA studies but also to the other relevant instruments available.

Secondly, in order to link up effectively with these tools and instruments in the follow-up this requires adaptation to the new governance arrangements implied by those instruments – see Figure 6. These instruments imply partnerships between various parties (see table 1). They assume not only hierarchic, directive steering but also exploiting network steering and market steering mechanisms (cooperation and competition). This means not only a focus on strategic issues of ‘what’ and ‘where’ but also the strategic issue of ‘who’, addressed earlier (see Figure 1). There is need for partnerships with other parties and their involvement in earlier stages. This means that IA has to engage in other approaches and the parties involved in them (outside – in).

![Figure 6: SEA taking into account the various parties and tools used in post-consent decision stages for strategy development in SEA.](image-url)
Establishing partnerships brings a number of benefits to the development of plans, programmes and projects. It can ensure effectiveness through greater access to resources, leveraging effects and greater reach, and increase transparency and legitimacy and therefore acceptance and support for the project within local communities and amongst other stakeholders. Sharing of risks and costs can encourage greater innovation in safeguarding environmental performance. By involving other sectors in the region in project development, community dependency on a particular industry or project can be minimised. Involving communities and local NGOs is crucial in meeting ever-increasing expectations amongst affected communities for opportunities to participate in the benefits associated with projects. Partnership approaches can assist in creating a lasting heritage independent of proponents by developing local capabilities that meet the needs of projects yet are transferable and attractive to other sectors in the area. The promotion of collaboration amongst the local community, NGOs, government and service providers can also strengthen democratic processes and empowerment at the local level, a fundamental principle underlying IA practice.

All these concepts stress that partnerships between companies, governments, agencies and communities at different planning levels are needed to ensure responsible project-delivery. One way to do this is by using partnerships and instruments in addition to SEA for responsible project delivery over the life cycle (See Figure 7). A more sustainable outcome of a plan, programme or project can be achieved by using partnerships and instruments in addition to SEA. Recent studies have showed that new, more innovative procurement and contracting processes can help to improve the performance of EIA (Faith-Ell and Arts, 2009). Also, Varnäs et al. (2009) indicate a need to understand the scope for improving the coordination between green procurement and EIA in order to initiate discussions on and planning for green procurement at the EIA stage itself. On the other hand, EIA can provide information and scope issues that are relevant for green procurement and partnering contracts, thereby strengthening environmental outcomes of infrastructure projects. This link between partnerships, SEA and the environmental outcome of plans, programmes and projects is highly relevant to explore in future studies.

![State of the environment](image)

**Figure 7**: Using partnerships and instruments in addition to IA For responsible project delivery over the life cycle

5. Conclusion and Discussion

There is an on-going development of new government arrangements and instruments in many countries and sectors. SEA can play an important role in this development. In this paper we have brought out a number of issues that need to be addressed in the future development of SEA.

SEA was initially developed to prevent foreclosure. At this SEA has focused especially on what and where questions. However, the ‘who’ question has also become a strategic issue for the SEA stages due to new government arrangements (e.g. private public partnering, social-licence-to-operate, etc.). These new governance arrangements pose challenges to SEA and EIA because it forces SEA practitioners to determine how to other parties, apart from the government, will take responsibility for environmental delivery. There is a broad array of instruments available. If we want to use this rich toolbox we also have to look into the question of ‘who’. These other parties and tools determine how you can safeguard environmental delivery. Because of this ‘multi-tude’ there seems to be no ‘silver bullet’ for ensuring sustainable performance.

One important question we need to ask our self with regard to this is: How can SEA govern later stages? Building relationships already in early stages proves to be essential. The instruments and contract arrangements presented above are already in use. This means that the strategic room is already limited for the government
parties i.e. that if we are not observant, we might move towards foreclosure once again parties from the later stages are not involved in the SEA process. In this sense, it is also important to consider that SEA is not an issue of just government and hierarchic steering any more but an issue of many parties and a mix of governance approaches.

SEA is also about making contacts for making contracts later on. It is therefore important to build relationships that last over the initiatives life/life cycle already in the SEA stage. One fundamental issue that needs to be addressed with regard to this is: How do we get communities and companies to think about strategic environmental issues early in the process? This also means that the challenge of public participation in SEA will probably grow in the future and new methods for public participation will be needed. Also, there is a scattered picture of responsibilities with respect to e.g. infrastructure networks (due to DBFM, performance etc. contracts). This is important to consider when starting a new planning cycle (for reconstruction, enlargement or renewal of infrastructure networks).

This means that, for sustainable development, SEA must go beyond traditional environmental management and include partnerships to cover multiple project stages from both environmental and social-economic perspectives. These partnerships should be aimed at establishing long lasting cooperative relationships in order to make them flexible and adaptive. Also, the partnerships should balance environmental, social and economic risks and enhance opportunities.

6. References


