

2. What are the Benefits ?

2.1 As a Tool for Achieving Sustainable Development

It is widely accepted that taking into account social, economic and environmental considerations in decision-making processes is an essential step for achieving sustainable development. SEA helps achieve this as it provides early environmental information to decision makers for considerations. The role of SEA is particularly important should decisions involve PPPs with potentially significant long-term environmental implications.

Two milestone documents - AGENDA 21 and the Rio Declaration on Environment and Development- agreed at the UN Conference on Environment and Development (also named as the “Earth Summit”) in 1992 and reaffirmed at the World Summit on Sustainable Development in Johannesburg in 2002, outlining key policies toward achieving sustainable developments, have already reflected the importance of SEA on sustainability developments.

Principle 4 of the Rio Declaration states that :

“In order to achieve sustainable development, environmental protection shall constitute an integral part of the development process and cannot be considered in isolation from it.”

In AGENDA 21, “*Integrating Environment and Development in Decision Making*” and “*Information for Decision-making*” are identified as a major program area and a means for sustainable development respectively. In addition, paragraphs 8.2 to 8.12 of the agenda specifically outlines the program area of “integrating environment and development at the policy, planning and management levels.”

There is no doubt that SEA is becoming an important tool for integrating environmental considerations into PPP formulation processes. It provides a framework for predictions and assessments of environmental impacts and facilitates early integrations, essential for an informed decision-making.

2.2 Re-framing Issues to Facilitate Sustainable Solutions

SEA could facilitate more sustainable solutions by re-framing possible issues of PPPs from a traditional and “business as usual” approach to a perspective focusing on sustainable development. As SEA promotes early consideration of issues, it allows more rooms for devising sustainable solutions and alternatives which would enhance long term environmental

quality. On the contrary, if environmental assessments are carried out only after major decisions are made, solution spaces would be largely constrained and would usually end up in focusing on mitigation, rather than on sustainable outcomes, thus resulting in residual impacts which add together over a certain period of time would pose major threats to sustainability.

2.3 Early Consideration of Alternatives

Since SEA is conducted at an early stage of a decision making process, it allows early evaluation of the needs and comparison of different options including a broad range of alternatives well before any irrevocable decision is made. The early consideration of needs and alternatives can improve efficiency by avoiding or reducing the need for remedial measures at later stages particularly when alternatives are limited at a project level.

2.4 Avoid Major Environmental Problems and Minimize Cumulative Impacts

Certain PPPs would have the potential to cause tremendous and long-term environmental implications. If decision is made without sufficient consideration of their environmental implications, the community might suffer, which in fact could be avoided by adopting SEA.

After the formulation of PPPs and to put them into implementation, a group of projects would usually be followed. Project EIA could address and mitigate environmental impacts arising from the project itself but there might be difficulties at a project level to address the cumulative impacts arising from projects. SEA, however, can help avoid or reduce cumulative impacts by comprehensive assessment at a strategic level during PPP formulation.

2.5 Maximize Environmental Benefits

PPPs might have both positive (benefits) and negative (impacts) environmental implications. If decision is made with proper consideration of environmental implications through SEA, there exist opportunities for facilitating sustainability and significantly improving the environmental quality.

Example - Second Railway Development Study (RDS2)

http://www.epd.gov.hk/epd/english/environmentinhk/eia_planning/sea/second_railway.html

The SEA fully considered the hidden environmental benefits and costs between rail and road transport and confirmed the advantages of railway over road options from a strategic environmental perspective. Decision-makers, after taking into consideration the SEA findings, decided to adopt a “priority to railway” policy. Significant environmental improvements have been achieved as a result, for example, reducing air pollutants from vehicle emissions of about 600 tonnes of NO_x and RSP and about 160,000 tonnes of CO₂ per year.

2.6 Facilitate Discussions among Stakeholders

One of the major steps in conducting SEA is the continuous interaction among stakeholders and the members of the public so SEA provides opportunities for the project proponents, the stakeholders and the public to discuss the PPPs starting from the very beginning of the decision-making process. Discussions or public consultations permit a viable PPP with better environmental outcomes to be devised which can cater to the best interests of all and to be acceptable by the society, avoiding unnecessary objections and dispute over the PPP during the future implementation stages.