

Integrated Environmental Management Information Series

Socio-Economic Impact Assessment



Other topics in the series of overview information reports on the concepts of, and approaches to, integrated environmental management are listed below. Further titles in this series are being prepared and will be made available periodically. Sequence of release and titles are subject to change.

Overview of Integrated Environmental Management Information Series 0: Information Series 1: Screening Information Series 2: Scoping Stakeholder Engagement **Information Series 3:** Specialist Studies Information Series 4: Impact Significance Information Series 5: Ecological Risk Assessment Information Series 6: **Environmental Resource Economics** Information Series 7: Information Series 8: Cost Benefit Analyses Project Alternatives in IEA Information Series 9: **Environmental Impact Reporting Information Series 10: Information Series 11:** Review in IEA **Environmental Management Plans Information Series 12: Environmental Auditing** Information Series 13: Life Cycle Assessment **Information Series 14:** Strategic Environmental Assessment **Information Series 15:** Cumulative Effects Assessment Information Series 16: Information Series 17: **Environmental Reporting** Environmental Assessment of Trade Related Agreements and Policies in South Africa **Information Series 18:** Environmental Assessment of International Agreements Information Series 19: Linking EIA and EMS Information Series 20: **Environmental Monitoring Committees** Information Series 21: Socio-Economic Impact Assessment **Information Series 22:** Risk Management Information Series 23:

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PREFACE

This document is one of a series of overview information documents on the concepts of, and approaches to, integrated environmental management (IEM). IEM is a key instrument of South Africa's National Environmental Management Act (NEMA). South Africa's NEMA promotes the integrated environmental management of activities that may have a significant effect (positive and negative) on the environment. IEM provides the overarching framework for the integration of environmental assessment and management principles into environmental decision-making. It includes the use of several environmental assessment and management tools that are appropriate for the various levels of decision-making.

The aim of this document series is to provide general information on techniques, tools and processes for environmental assessment and management. The material in this document draws upon experience and knowledge from South African practitioners and authorities, and published literature on international best practice.

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SUMMARY

This document describes the background to Socio-economic Impact Assessment (SEIA). It introduces the reader to the concept of SEIA and how it forms part of Integrated Environmental Management. It aims to serve a broad audience, from environmental practitioners, NGOs and tertiary institutions to the general public. The document includes a brief discussion on the benefits of SEIA and when such an assessment should be conducted. Like all assessments SEIA follows a certain process. The process described in the document is on par with international practice. SEIA is a specialist study that can be conducted in many ways as part of an Environmental Impact Assessment study, or a stand alone study, and there are a number of techniques that can be utilised in conducting such a study. The technique used would differ depending on the purpose of the assessment, the budget and the community that will be affected. SEIA can play an important role in involving communities and including them in the environmental assessment process.

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1. INTRODUCTION

Environmentalists have studied the impact of development on natural resources extensively. Since the 1970's, it became clear that development also impacts on the human environment (compare Dietz, 1987:54; Burdge & Robertson, 1990:81; Finsterbusch, 1995: 229; Henry, 1990: 91; Freudenburg & Keating, 1982:71). The White Paper on an Environmental Management Policy for South Africa (Government Notice 794 of 1998) introduced a new paradigm of sustainable development based on integrated, coordinated environmental management with a focus on people's quality of life, access to land and resources, integration of economics, development, social justice and environmental sustainability and participative governance. Sustainable development requires local governments to integrate environmental, economic and social planning. The World Commission on Environment and Development defines sustainable development as development that meets the needs of the present without compromising the ability of future generations to meet their own needs (Atkinson, 2000:2). Social, economic and biophysical impacts are interconnected and a change in one will lead to change in the others. Socioeconomic Impact Assessment plays an important role in creating social awareness and bringing home the fact that the environment does not only comprise of natural phenomena, but also incorporates human nature.

2. PURPOSE OF THIS DOCUMENT

The purpose of this document is to introduce the concept of Socio-economic Impact Assessment to a wide audience and to create awareness about this tool. This document is by no means exhaustive, and references provided at the end of the document can be used for further reading. The scientific field of Socio-economic Impact Assessment stretches across boundaries of many disciplines, and therefore these assessments can be approached from many different angles. This document is only a basic guideline and the intricacies of this rather complicated form of assessment are not discussed in depth.

3. DEFINITION OF SOCIO-ECONOMIC IMPACT ASSESSMENT

In order to define Socio-economic Impact Assessment it is important to understand the difference between Social Impact Assessment and Socio-economic Impact Assessment. Internationally, Social Impact Assessment (SIA) is seen as an overarching framework that embodies the evaluation of all impacts on humans and on all the ways in which people and their communities interact with their socio-cultural, economic and bio-physical environment. SIA has strong links with a wide range of specialist sub-fields involved in the assessment of areas such as: aesthetic impacts, archaeological and heritage impacts, community impacts, cultural impacts, demographic impacts, development impacts, economic and fiscal impacts, gender assessment, health impacts, indigenous rights, infrastructural impacts, institutional impacts, political impacts, poverty assessment, psychological impacts, resource issues, tourism impacts and other impacts on societies (Vanclay, 2003: 7). Social Impact Assessment variables include the economic environment (compare Vanclay, 2003: 85-89; Burdge, 2004:101; Taylor, Bryan & Goodrich, 2004: 75). Social Impact Assessments and Economic Impact Assessments are often undertaken separately, but they are complementary and sometimes overlap. The social and economic environment cannot be separated, as these environments are closely entwined.

The current practice in South Africa is similar to the international practice as described in the previous paragraph, and Social Impact Assessments generally include social as well as economic impacts. The terms Social Impact Assessment and Socio-economic Impact Assessment are often confused and refer to the same assessment in many instances. The University of Wisconsin (http://www.uwex.edu/cescced/) defines Socio-economic Impact Assessment as an examination of how a proposed development will change the lives of current and future residents of a community. The Australian Government Department of the Environment and Heritage (2005:5) states that Socio-economic Impact Assessment is a useful tool to help understand the potential range of impacts of a proposed change, and the likely responses of those impacted on if the change occurs.

The International Association for Impact Assessment (2003) defines Social Impact Assessment as including the process of analysing, monitoring and managing the intended and unintended social consequences, both positive and negative, of planned interventions (policies, programmes, plans, projects) and any social change processes invoked by these interventions. The primary purpose of SIA is to bring about a more sustainable and equitable biophysical and human environment.

From an international perspective, Socio-economic Impact Assessment falls under the umbrella of Social Impact Assessment. A Social Impact Assessment will look at the social environment in more depth than a Socio-economic Impact Assessment. For South African purposes, the two terms are generally used as one and the same. Social and economic impacts should be integrated in order to provide a comprehensive and cost effective outcome and avoid duplication. For the purpose of this document the term Socio-economic Impact Assessment will be used.

4. SOCIO-ECONOMIC IMPACT ASSESSMENTS IN INTEGRATED ENVIRONMENTAL MANAGEMENT

Integrated Environmental Management (IEM) is designed to ensure that the environmental consequences of development proposals are understood and adequately considered in the planning process. The term environmental is used in its broad sense, encompassing biophysical and socio-economic components (Department of Environmental Affairs and Tourism, 1992:5). IEM is intended to guide the development process by providing a positive, interactive approach to gathering and analysing useful data and by presenting findings in a form that can be easily understood by non-specialists (Preston, Robins & Fuggle, 1996: 748).

Socio-economic Impact Assessment is an interactive process by nature, and input from the community is crucial. This tool assists the community to be part of the environmental decision-making process, and empower communities to participate in decisions that will affect their livelihoods. The Department of Environmental Affairs and Tourism (1992:5) identified twelve basic principles underpinning Integrated Environmental Management, and most of these principles relate directly to the social environment. These principles include:

- * Informed decision-making;
- * A broad meaning for the term environment (i.e. one that includes physical, biological, social, economic, cultural, historical and political components);
- * An open, participatory approach in the planning of proposals;
- Consultation with interested and affected parties;
- * An attempt to ensure that the social costs of development proposals (those borne by society, rather than the developers) be outweighed by the social benefits (benefits to society as a result of the actions of developers);
- * Democratic regard for individual rights and obligations;
- * The opportunity for public and specialist input in the decision-making process.

Socio-economic Impact Assessment creates the opportunity for the inclusion/participation of communities in Integrated Environmental Management. Participation in a Socio-economic Impact Assessment can lead to the empowerment of a community by giving it a channel through which its voice can be heard.

5. APPLICATION OF SOCIO-ECONOMIC IMPACT ASSESSMENT

In order to understand the Socio-economic Impact Assessment process, it is important to have a broad understanding of the concept. A Socio-economic Impact Assessment (SEIA) aims to develop an understanding of the current social and economic environment and aims to assess or assesses the potential impact of the project on the socio-economic environment. The specific aim of a Socio-economic Impact Assessment will depend on the nature of the project. The aim might simply be to develop a thorough understanding of the socio-economic environment. A SEIA can be conducted in such a way that it contributes to participatory planning and management. Traditionally a SEIA aims to evaluate the potential social and economic impacts of a development and then propose mitigating measures (Malan, 2001: 2).

Socio-economic Impact Assessments are directly related to decision-making (Branch et al, 1984:6). Probable undesirable social and economic effects of development need to be identified before they occur in order to make recommendations for mitigation (Interorganizational committee, 2004: 94). Burdge(2004:16) is of the opinion that recommendations for mitigating actions is an important reason for conducting SEIA, because even reversible but undesirable effects can sometimes be avoided if we know in advance what they might be. SEIA is designed to forecast, monitor and control prospective social and economic problems resulting from development projects or the process of technological change (Hindmarsch, 1990:196).

According to Henry (1990:93) SEIA intends to minimise negative impacts due to mismatches between people and projects by indicating the social and economic impact of projects prior to implementation, by facilitating project modification and mitigation through public input or by incorporating social values and priorities such as social equity. SEIA that involves the community minimizes local resistance to projects and therefore reduce disruption; they increase project success and they prevent major planning disasters and associated costs (Burdge, 2004:248).

Dietz (1987:61) is of the opinion that SEIA can be an effective tool for informing the public and encouraging their participation. It can also clarify the relationship between scientific information and values. Cramer and Dietz (1980: 62) states that SEIA enhances people's well-being. Revealing the existence of adverse impacts before they occur ensure that planners, the general public and groups specially affected can conduct an informed debate over which impacts can be avoided, which are socially necessary and which are socially intolerable. SEIA is a way to enhance benefits or make a better policy decision (Burdge & Vanclay, 1998:267). In addition, SEIA provides a foundation for assessing the cumulative impacts of development on a community's social and economic resources (http://www.uwex.edu/cescced/).

Generally speaking, SEIA can be seen as a tool implemented in planning and decision-making. It can also be used to make recommendations in terms of mitigation measures and identifying alternatives. It is not always clear whether a SEIA would be necessary. When considering whether to conduct a SEIA or not, the practitioner should keep the following in mind (Burdge, 2004:106):

- * The purpose of the SEIA;
- The project scale;
- * Level of vulnerability in the social environment;
- * Uncertainty;
- * Nature and potential significance of the impacts;
- * Controversy; and
- * Heterogeneity in the social environment.

The aim of SEIA is to understand the current social and economic environment and use it as a baseline for predictions and measurements

SEIA can be used on project level, on policies and for events such as disasters, demographic change and epidemics. The aim of SEIA is to understand the current social and economic environment and use it as a baseline for predictions and measurements. If a SEIA is done effectively a lot of time and money can be saved in the long run. Socio-economic Impact Assessment is an important part of sustainable development, contributing to ensure development serves present and future generations.

It is a difficult task to precisely prescribe the contents of any given SEIA, as each assessment is project-specific. In general, a good SEIA will have the characteristics as described in Table 1.

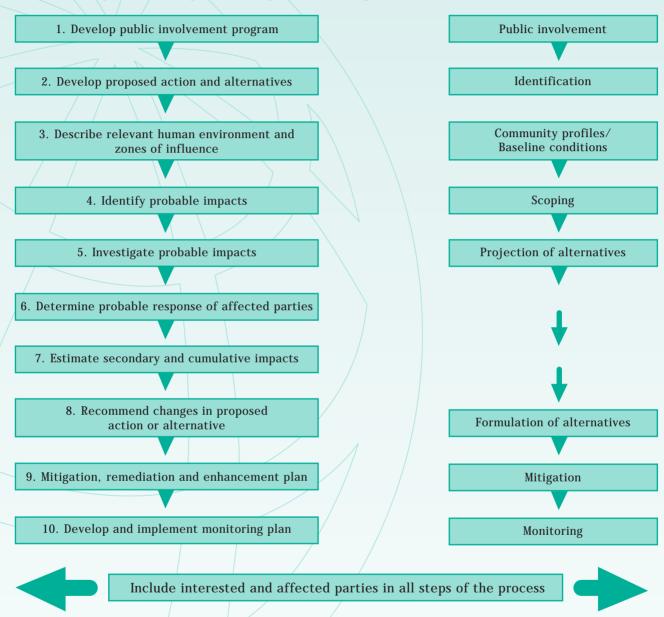
Table 1. Characteristics of a good SEIA (Vanclay, 2003; 8).

- * Identifies Interested and Affected Parties
- * Facilitates and coordinates participation of stakeholders
- * Documents and analyses local historical setting of project
- * Gives rich picture of local cultural context
- * Identifies and describes activities likely to cause impacts
- Predicts likely impacts and how different segments of community is likely to respond
- * Assists in evaluation of alternatives
- * Assists in site selection
- * Recommends mitigation measures
- Provides suggestions about compensation
- * Describes potential conflict and advises on resolution processes
- * Develops coping strategies in community for dealing with non-mitigatable impacts
- * Contribute to skills development and capacity building in community
- * Advises on appropriate institutional and co-ordination arrangements for all parties
- * Assists in developing and implemention of monitoring and management programs
- * Collects baseline data for evaluation and audit purposes

6. THE SOCIO-ECONOMIC IMPACT ASSESSMENT PROCESS

The SEIA process is often regarded as part of the EIA process. It is, however, a separate but closely related process for which the following ten steps has been identified by the Interorganizational Committee (2004:103-110), Finsterbusch (1995:241-243), Vanclay (1999:309) and Taylor et al, (2004:60-76). The process is schematically represented in Figure 1, after which a brief discussion of each step follows. The column on the right hand side aims to align the SIA process with the generic EIA process and is a simplified version of the column on the left.

FIGURE 1: Steps in the SEIA process (Adapted from Burdge, 2004)



6.1 Public Involvement

Develop and implement an effective plan involving all potentially affected parties. The public involvement should commence at the very beginning of planning for the proposed action and last through implementation to form the foundation for monitoring. The practitioner must be aware of literacy levels, language barriers and cultural differences in preparing the public involvement programme.

6.2 Identification of alternatives

Describe the proposed action or policy change and reasonable alternatives. Enough detail must be provided to begin to identify the data requirements needed from the proponent to do a preliminary assessment. This activity should ideally occur at a time when there is intensive interaction and communication between the SEIA practitioner and the proponent and design/planning team. Different alternatives, including the "no-go" alternative must be considered.

6.3 Baseline conditions

Describe the relevant human environment/area of influence and baseline conditions. The baseline conditions are the existing conditions and past trends associated with the human environment in which the proposed activity is to take place. The terms "baseline condition" and "community profile" are used interchangeably. Baseline in this context means a point in time and geographical location to start the assessment. The description of baseline conditions should include the relationship with the biophysical environment, historical background, political and social resources, culture, attitudes and social conditions, economic and financial background and population characteristics.

6.4 Scoping

After obtaining a technical understanding of the proposed action, identify the full range of probable social (including economic) impacts that will be addressed through a variety of means including discussion or interviews with a number of those potentially affected. During the initial scoping, the SEIA practitioner selects the SEIA variables for further assessment situations. Relevant criteria for selecting "significant" social and economic impacts are:

- Probability of event occurring;
- * Number of people that will be affected;
- * Duration of impact;
- * Value of benefits and costs to impacted groups (intensity of impacts);
- * Extent to which identified impacts are reversible or can be mitigated;
- Likelihood that an identified impact will lead to a secondary or cumulative impact;
- * Relevance for present or future policy decisions;
- Uncertainty over possible effects;
- * Presence or absence of controversy over the issue.

Table 2 represents a list of variables that must be considered. This list is not exhaustive, but a good guideline of matters to investigate. It should be considered with the categories of impacts in Table 3.

TABLE 2: SEIA Variables for assessment (Interorganisational Committee, 2003: 101)

1. Population Change

- * Population size, density and change
- * Influx and outflow of temporary workers
- * Presence of seasonal (leisure) residents
- Relocation of individuals or families
- * Racial and ethnic composition and distribution

2. Community/Institutional arrangements

- Voluntary associations
- * Interest group activity
- Size and structure of local government
- * Industrial/commercial diversification
- Employment/income characteristics
- * Local/regional/national linkages
- * Employment equity of disadvantaged groups
 - Historical experience of change

3. Political and social resources

- * Distribution of power and authority
 - Inter-organisational cooperation
- * Conflict between newcomers and long term residents
- Identification of stakeholders
- Interested and Affected Parties
- Leadership capability and characteristics

4. Individual and family level impacts

- * Displacement/relocation concerns
- Trust in political and social institutions
- * Residential stability
- Family and friendship networks
- Density of acquaintanceships
- Perceptions of risk, health and safety
- * Attitudes towards the proposed action
 - Concerns about social well-being

4. Community Resources

- * Change in community infrastructure
- * Indigenous populations
- * Changing land use patterns
- * Family and friendship networks
- * Effects on known cultural, historical, sacred and archaeological resources

6.5 Projection of estimated effects

Investigate the probable impacts with and without the actions and predicted impacts that can be interpreted as the difference between the future with and without the proposed action. A number of projection techniques are commonly used by social scientists, including population multiplier approaches, cost benefit analysis, comparison communities (comparing communities with similar social fabric that was exposed to similar projects) consulting experts, input-output models, economic base models and many others. It is recommended that more than one technique is used in order to triangulate and ensure the proposal is on the right track. Table 3 represent categories of social impacts that can be used as guideline to ensure all possible impacts are considered. It can be used in conjunction with the variables in Table 2.

Table 3: Categories of impacts to be considered (goes hand in hand with variables) (Vanclay 2003: 84-89)

Health and social wellbeing

Death; Nutrition; Actual health and fertility; Perceived health; Mental health; Aspirations for future; Autonomy; Stigmatization; Feelings in relation to the project.

Quality of the living environment

Physical quality – exposure to noise, dust, risk, odour etc; Leisure and recreation opportunities; Aesthetic quality; Availability of housing; Quality of housing; Physical & social infrastructure; Personal safety & hazard exposure; Crime & violence.

Economic impacts & material wellbeing

Workload; Standard of living; Economic prosperity and resilience; Income; Property values; Employment; Replacement cost of environmental functions; Economic dependency.

Cultural impacts

Change in cultural values; Violation of culture; Experience of being culturally marginalized; Commercial exploitation of culture; Loss of local language; Loss of natural and cultural heritage.

Family and community impacts

Alterations in family structure; Obligations to family/ancestors; Family violence; Social networks – interaction with others in community; Community connection –sense of belonging; Community cohesion; Social differentiation and inequity; Social tension and violence.

Institutional, legal, political and equity impacts

Capacity of government agency to handle workload generated by project; Integrity of government agencies – absence of corruption and competence of agency; Legal rights; Human rights; Participation in decision making; Access to legal advice; Fairness of distribution of impacts across community.

Gender relations

Woman's physical integrity – decide about own body; Personal autonomy of woman – independence in all aspects; Gendered division of labour – income, household, childbearing and rearing of children.; Access to resources & facilities; Political emancipation of woman.

6.6 Predicting responses to impacts

Determine the importance of the identified social impacts to the affected public. This is an important and difficult task, but necessary, since the responses of the affected parties will have significant higher-order impacts. After the direct impacts have been estimated, the assessor must estimate how the affected public will respond in attitude and actions. Their attitudes before implementation predict their attitudes afterwards. These attitudes can be estimated using comparable cases and interviews with those affected, expert judgement and field investigations.

6.7 Estimate Indirect and Cumulative impacts

Consider the flow-on ramifications of projects, including the cumulative and secondary or indirect impacts. Secondary or indirect impacts are caused by primary or direct impacts. They often occur later both in time and geographical distance than primary impacts. Cumulative impacts are those resulting from the added impacts of other past, present or future developments. It considers how the impacts of one project may affect and be affected by other projects and can be seen as the sum of the proposed action plus past and present activity in the same area.

6.8 Changes in alternatives

Recommend new or changed alternatives and estimate or project their consequences. Each new alternative or recommended change should be assessed separately. The techniques used for the estimation apply to this step, but on a more modest scale.

6.9 Mitigation

Develop and implement a mitigation plan. Mitigation includes:

- * avoiding the impact by modifying or not taking an action;
- * minimizing, rectifying or reducing the impacts through the design of the project or policy; or
- * compensating for the impact by providing substitute facilities, resources or opportunities.

Ideally, mitigation measures should be built into the selected alternative, but it must still be identified even if it is not immediately adopted or if it would be the responsibility of someone other than the proponent.

6.10 Monitoring

Develop and implement a monitoring plan. A monitoring plan, that is capable of identifying deviations from the proposed action and any important unanticipated impacts, should be developed. A monitoring plan should track project development and compare real impacts with projected impacts and should spell out the nature and extent of additional steps to be taken when unanticipated impacts or impacts larger than the projections occur. It is suggested that a Community Monitoring Committee consisting of key role players from the community, local authorities and proponent, is established early in the SEIA process and acts as a watchdog throughout the project lifecycle of the proposed development. This committee will have a similar function to Environmental Monitoring Committees, but will include the social aspects of the proposed development. Alternatively the functions of the EMC's can be extended to include the social environment.

7. APPROACHES AND TECHNIQUES

Traditionally, there are two main approaches to SEIA, a technocratic approach or a participatory approach. The following paragraphs will distinguish between these two approaches.

7.1 Technocratic approach

A technocratic approach entails that a scientist remains a neutral observer of social phenomena. The role of the scientist is to identify indicators, obtain objective measures relevant to the situation and provide an expert assessment on how the system will change. A key assumption is that, given sufficient data, accurate predictions can be made by trained social scientists. (Becker, Harris, Nielsen & McLaughlin, 2004:178). The technocratic approach is product orientated (Hugo, Viljoen & Meeuwis, 1997:224). The principle drive in this approach is to make top-down decisions based on expert knowledge within a formal and structured bureaucracy (Taylor et al, 2004:27).

7.2 Participatory Approach

A participatory approach uses the knowledge and experiences of individuals most affected by the proposed changes as the basis for projecting impacts. In this case, the role of the scientist is facilitator of knowledge sharing, interpretation and reporting of impacts. The assumption is that, when appropriately and effectively implemented, elicitation and consideration of individuals' perceptions, attitudes and beliefs can be a key component of impact assessment (Becker et al, 2004:178). The participatory approach is process-oriented (Hugo et al, 1997:224). This approach is a bottom-up attempt to organise for social change (Taylor et al, 2004:27).

The South African society is well suited to a participatory approach, since many traditional and formal structures are based on input from communities. The best approach however, remains an integrated approach using methodology from both approaches. Community involvement in SEIA is crucial. Most communities have both political and traditional leaders - often with different opinions about what is the best for the society. Community infrastructures (not physical infrastructure, rather non-tangible infrastructure based on social relations) are well developed and there is an abundance of social capital.

Social capital, something that does not have a monetary value in the traditional sense, can add to the wealth of a community. Social capital can be defined as a public good comprised of trust among a diverse group of citizens within the same community and as such it facilitates cooperative networks among those citizens (Young Larance, 1996:8). Barrow (2002:187) supports this by stating that social capital comprises the abilities, traditions and attitudes that help ensure that a group of people will support each other, respond to challenges in a constructive manner, and innovate. A community that possesses social capital will thus participate more in community matters and work together for collective benefits. Research in the field indicates that enhanced community integration can promote local economic development (Midgley, 1999:11).

SEIA is a tool designed to assess the impacts of development on communities, but also to find social capital and build on its strengths. One of the aims of SEIA is to create sustainable communities (compare Vanclay, 2003:2 and Interorganizational Committee, 2003:232). Thus the participatory approach lends itself to achieving one of the aims of SEIA whilst empowering communities at the same time.

7.3 Research techniques

There are basically two broad research approaches to choose from. The first is the quantitative approach, which aims to measure the social world objectively, to test hypothesis and to predict and control human behaviour (Hoyle, Harris & Judd, 2002: 394). Quantitative research can be described as an inquiry into a social or human problem, based on a theory composed of variables, measured with numbers, and analysed with statistical procedures, in order to determine whether the predictive generalisations of the theory hold true (Sogunro, 2001:3).

The second is the qualitative approach, which is more concerned with understanding social life and the meaning that people attach to everyday life (Rubin & Babbie, 1989:338; Fouché & Delport, 2002:79). Qualitative research can be described as an inquiry process of understanding a social or human problem, based on building a complex, holistic picture, formed with words, reporting detailed views of informants and conducted in a natural setting (Sogunro, 2001:3). The major differences between the two approaches are in the areas of data collection and analyses. Both these approaches are used in conducting a SEIA. For example, the use of statistical data to obtain insight about the number and availability of community facilities will be used, but it would be explored further by obtaining the views and perceptions of the people on the effectiveness and accessibility of these facilities. By using both qualitative and quantitative methodology more comprehensive data will be obtained, and a more holistic product would result, without excluding important areas of assessment. The following two sections will consist of a brief discussion of each of the above-mentioned technologies.

7.3.1 Qualitative techniques

Qualitative techniques are used extensively in SEIA. A number of research methods are used, for example:

- * Ethnographic research, which entails in-depth interviews and detailed observation aimed at developing an insider perspective. It is not intended to be statistically representative (Fouché, 2002:274).
- * Focus group interviews, which are concentrated in-depth group interviews with selected participants. It follows the logic of the persons being interviewed rather than that of the interviewer and may present the researcher with a valuable new perspective of the issue at hand (Greeff, 2002: 305).
- * Interviews are a popular tool and can be structured, semi-structured or casual. Semi-structured interviews are individual or group interviews guided by a set of questions pertaining to finite themes. Casual and unplanned contacts can be valuable sources of information and insight (Taylor et al, 2004:163).
- * Participatory rural appraisal (PRA) is a methodology that was developed in an attempt to understand and enable sustainable livelihoods in the perspective of people themselves rather than the professionals. It is aimed at empowerment rather than simply data collection and the information gathered is owned, analysed and used by local people rather than by outsiders. PRA involves shared visual representations and analysis by local people. PRA is a good method to use in developing countries and informal communities, especially where there is a high rate of illiteracy and few sources of secondary data.
- * Experts or key informants are persons from both the public and private sectors having knowledge of the community under study. The assessor selects them because they have broad knowledge of the community, its services and its history (Burdge, 1998: 196).
- * A community forum is based on one or more public meetings to which people are invited to express their opinions about a proposed project.
- * Workshops are a method of working with groups and learning how the group mind develops in dialogue with the action agency and other affected parties (Finsterbusch, 1995:246).

The list of qualitative research methods can be quite extensive. The methods mentioned above are the most commonly used in practice, but by no means the only available.

7.3.2 Quantitative techniques

The most important quantitative technique used in SEIA is the analysis of census data. This data is used to produce historic and demographic profiles, and can be used to provide extensive baseline information. Other official statistics, like crime statistics are also useful and credible (Taylor et al, 2004:113). Data that can be analyzed in a quantitative way can be obtained from many sources, for example:

- * Integrated Development Plans
- * Local Municipalities
- * Maps
- * Information centres
- * The internet
- * Libraries
- * Questionnaires
- * Checklists
- * Surveys
- * Multipliers
- * Input-output analysis and
- * Computer modelling.

Questionnaires are very good at finding out what people think are important community needs and problems. Surveys are useful for collecting very specific information from a statistically representative sample of a population (Taylor *et al*, 2004:113).

8. GUIDANCE FOR PRACTITIONERS

When conducting a SEIA, the practitioner should always remember that just the fact that they are present in the community is an intervention itself. The community will become aware of a stranger in their midst, and this in itself can offset certain social change processes. A practitioner should see from an insider's perspective and imagine how it would be to be a member of the affected community. Once a practitioner enters a community, it is important to clarify his role and to explain what a SEIA is and why he is there. The community must be treated with respect. The practitioner must guard against creating unrealistic expectations, and be sure that the community understand the aim of the project. A dialogue must be created with the community and findings must continuously be weaved back into planning and management. All people have social filters which influence the way in which they perceive the world, and certain people or situations can trigger bad (or good) emotions in the practitioner. It is therefore important to listen without prejudice. All relevant dimensions of the social environment must be considered, not only the obvious and easily accessible dimensions. The SEIA practitioner should empower the community to speak for themselves and take ownership of the process. Assumptions about the needs of the community should never be made without being tested (compare Malan, 2001).

When a practitioner enters a community, he should investigate the following sectors in people's lives (Vanclay, 2002:185) before he attempts to classify types of social impacts:

- * People's way of life how they work, play and interact with one another on a daily basis;
- * Their culture their shared beliefs, customs, values and language or dialect;
- * Their community its cohesion, stability, character, services and facilities;
- * Their political systems the extent to which people are able to participate in decisions that affect their lives, the level of democratisation that is taking place and the resources provided for this purpose;
- * Their environment the quality of the air and water that people use; the availability and quality of the food that they eat; the level of hazard or risk, dust and noise which they are exposed to; the adequacy of sanitation, their physical safety, and their access to and control over resources;
- * Their health and well-being where health is understood as a state of complete physical, mental and social well-being, not merely the absence of disease or infirmity;
- * Their personal and property rights particularly whether people are economically affected, or experience personal disadvantage, which may include a violation of their civil rights; and
- * Their fears and aspirations their perceptions about their safety; fears about the future of the community; and their aspirations for their future and the future of their children.

SEIA is a complex form of impact assessment, and the role of the community in the assessment should never be under-estimated. All communities should be treated with respect and from the basis that the said community is a unique social structure with characteristics similar, but not identical, to other communities made up from similar social fabric.

The websites in the box that follows indicates where further information on SEIA can be found, as well as where information that can inform the SEIA report is situated.

USEFUL WEBSITES:

- Theory about SEIA:
- http://www.socialimpactassessment.net
- http://www.iaia.org
- http://www.gsa.ene.com/factsheet/1098b/1098bfact.htm
- http://www.uwex.edu/cescced/
- http://www.deh.gov.au/coasts/mpa/nrsmpa/seia/
- Crime statistics
- http://www.saps.gov.za/statistics/reports/crimestats/2004/crime_stats.htm
- http://www.iss.co.za
- Demographic information
- http://www.demarcation.org.za/
- Integrated Development Plans
- www.idp.org.za/
- http://www.sahistory.org.za

9. CONCLUSIONS

SEIA is an important tool in the IEM toolbox. It is a complicated process that requires specialist input. A SEIA can add value to the Environmental Impact Assessment process and serve the additional purpose of empowering communities and involving them in decision-making. Social issues and community buyin are getting increasingly important globally and locally. Community members are aware of their rights and the likely impacts that developments can have on their lives. SEIA is a process that should be initiated as early in the project cycle as possible, in order to provide sufficient time for communities to participate and influence decisions which can alter their lives and livelihoods. In addition to using accepted social science methodology for quantitative research, it is crucial that people must be consulted and included via participatory methods. SEIA can be used effectively in large projects, but is also necessary in small controversial projects. The message that people are important and part of the environment is reinforced by SEIA.

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11. GLOSSARY

Socio-economic Impact Assessment

An examination of how a proposed development will change the lives of current and future residents of a community and a useful tool to help understand the potential range of impacts of a proposed change, and the likely responses of those impacted on if the change occurs.

Social Impact Assessment

The processes of analysing, monitoring and managing the intended and unintended social consequences, both positive and negative, of planned interventions (policies, programs, plans, projects) and any social change processes invoked by these interventions. Its primary purpose is to bring about a more sustainable and equitable biophysical and human environment.

Environment

The definition of the environment is very broad. According to the National Environmental Management Act (Act No 107 of 1998), the environment can be defined as "the surroundings within which humans exist and are made up of:

- (i) the land, water and atmosphere of the earth;
- (ii) micro-organisms, plant and animal life;
- (iii) any part or combination of (i) and (ii) and the interrelationship among and between them; and
- (iv) the physical, chemical, aesthetic and cultural properties and conditions of the foregoing that influence human health and well-being."

Integrated Environmental Management

Integrated Environmental Management (IEM) is designed to ensure that the environmental consequences of development proposals are understood and adequately considered in the planning process. The term environmental is used in its broadest sense, encompassing biophysical and socio-economic components.

Sustainable development

Development that meets the needs of the present without compromising the ability of future generations to meet their own needs.

Social Science

Social science is the branch of science that deal with a particular phase or aspect of human society. It involves the study of people, their beliefs, behaviour, interaction and institutions.

Social capital

Social capital comprises the abilities, traditions and attitudes that help ensure that a group of people will support each other, respond to challenges in a constructive manner, and innovate.





Department of Environmental Affairs and Tourism