

8 PROPOSED POPA FALLS HYDROPOWER PROJECT, OKAVANGO RIVER, NAMIBIA

8.1 Introduction

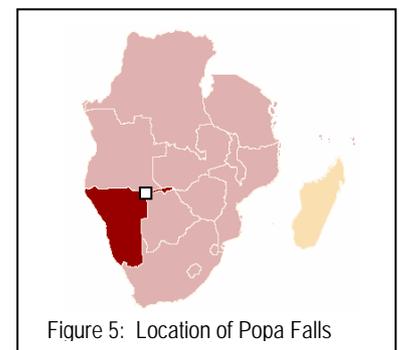
8.1.1 Overview

This case study focuses on a preliminary environmental assessment that was undertaken for a proposed hydropower project at Popa Falls in northern Namibia. The environmental assessment process was undertaken by an independent professional team led by Eco.Plan working together with South African and Namibian specialists. The preliminary nature of the assessment and the trans-boundary nature of the potential impacts associated with the project meant that the extent of the public participation had to be carefully considered.

This case study is based on a review of project literature as well as interviews with a cross section of stakeholders involved in the process. It provides a description of the project and overview of its policy and legislative context, a description of the environmental assessment and public participation process and an analysis of key aspects of the public participation process. Details of the references consulted and interviews are included in the final references section.

8.1.2 Project Description

The proposed Popa Falls Hydropower Project involves the proposed development of a 20 MW hydro power station at Popa Falls on the Okavango River by NamPower (Pty) Ltd. Nampower are currently investigating various options to meet growing demand for electrical power in Namibia. About half of Namibia's electricity is imported from South Africa, and there is concern that Namibia should become more self sufficient. Other alternatives currently being investigated include the Kudu Gas project, wind and other hydropower options. The Popa Falls Hydropower Project would provide additional power and would also ensure a reliable and stable supply of electricity in Northern Namibia. The project is primarily intended to supply the Kavango region.



Eco.plan was appointed by Water Transfer Consultants (WTC), the project engineers, to undertake a preliminary environmental assessment as part of the pre-feasibility stage of the project.

The Okavango River rises within Angola before flowing through Namibia to end in Botswana in the Okavango Delta. The portion of the river in Namibia, is located in north eastern Namibia at the western end of the Caprivi strip and is in the jurisdiction of the Kavango Regional Council. The project could be located at various sites that extend from Popa Falls to the Andara Mission Station located some 19 km upstream.

Land within the region is largely state-owned, being either communal or protected natural area. The Kavango region is densely populated and most of the people are rural dwellers living along the Okavango River. There are two main ethnic groups in the area, the Kavango - Mbukushu

and the San - Khwedam people. The river plays an important role in the livelihoods of the rural people, with intense subsistence agriculture taking place in the narrow fertile strip along the river. People are highly dependent on natural resources.

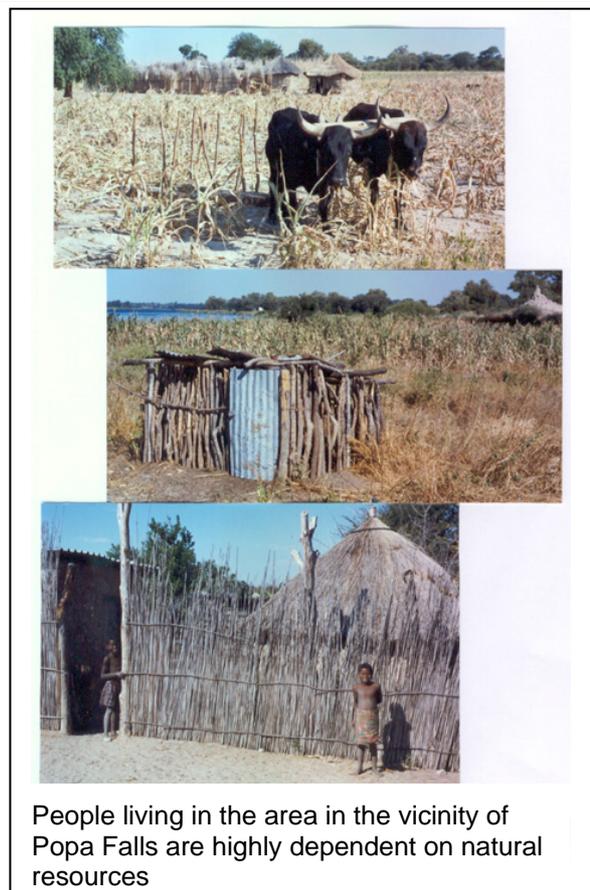
Tourism is a small but fast growing sector in the area, which has potential for further community based tourism ventures. There are three protected areas in the vicinity of the proposed hydro power station, namely the Popa Game Park (a tourist camp), the Caprivi Game Park, and the Mahango Game Park. The area is rich in faunal and floral species and there are extensive wetlands along the Okavango River. Below Popa Falls, extensive floodplains occur and mark the beginning of the Panhandle of the Okavango Delta.

The Delta has a total surface area of 14 000km² of which 6 000 km² are perennial channels and swamps and 8 000 km² are seasonal swamps. This entire delta is of significance to local people living in Botswana and Namibia as many use the natural resources namely, wood, reeds, and thatching grass. Fish forms a large part of the local people's diet and lifestyle. The Okavango Swamps area is also a Ramsar site of global significance. Namibia is a signatory to the Ramsar Convention and must therefore protect the Okavango River such that it does not affect the functioning of the swamps. Tourism in the Delta also plays an important role in the local economy in Botswana. Affected stakeholders around the Delta in Botswana comprise a mix of traditional communities and tourism operators.

The proposed hydropower project involves the construction of a weir across the river, with turbines located in the weir structure. The scheme is a 'run of the river' scheme and water is not stored for later release as in conventional hydropower schemes. The flow regime of the river would thus remain the same. Key upstream issues associated with the project include localised flooding and subsequent loss of some riparian and island ecosystems, loss of valuable agricultural land with associated socio-economic impacts, and possible health threats. The main downstream concern is altered sediment flows, which, if not adequately mitigated, are likely to result in highly significant impacts on the viability of the ecosystem of the Okavango swamps. As a consequence, the proposed project has potential transboundary impacts. In addition, there are many other competing demands on water resources in the Okavango, which could have a cumulative impact on the viability of the project if river flow is reduced.

8.1.3 Process and Procedural Context

The Preliminary Environmental Assessment for the proposed Popa Falls Hydropower Project was undertaken in the context of the following Namibian legislative and administrative requirements:



- Draft Wetlands Policy;
- Biodiversity Action Plan (2002);
- Environmental Assessment Policy; and,
- Environmental Management Bill.

International law, policy and guideline documents, to which Namibia is signatory, and national legislation that was also considered during the preliminary environmental assessment included:

- SADC Protocol on Shared Watercourse Systems;
- UN Convention on the Non-navigational Use of International Watercourses;
- The International Convention on Biological Diversity;
- The Ramsar Convention on Wetlands;
- The Trans-boundary Okavango River Basin Agreement;
- The World Commission on Dams;
- The Forest Act (12 of 2001); and,
- The Water Act (54 of 1956).

In addition, the Constitution of Namibia (1990) provides a guide to Government policy in implementing legislation and approving proposed developments. This states that the *“State shall actively promote and maintain the welfare of the people by adopting policies aimed atthe maintenance of ecosystems, essential ecological processes and biological diversity of Namibia and utilisation of living natural resources on a sustainable basis for the benefits of all Namibians, both present and future”*¹.

Draft Wetlands Policy

This policy is intended to promote conservation and wise use of wetlands, thus promoting inter-generational equity regarding water resource utilisation. It also states that certain parts of these wetlands and certain wetlands demand absolute protection. The policy emphasises the need for:

- A basin wide management approach;
- The need to expand the protected areas network (specifically the Okavango River downstream of Mukwe);
- Decisions concerning water resources to be made in accordance with the Precautionary Principle and the Polluter Pays Principle; and,
- Promoting community based natural resource management activities, as well as protection of wetland fauna and flora.

Namibia’s Biodiversity Strategy and Action Plan (2002)

This document sets out the following aims in terms of Sustainable Wetland Management:

- Protect and maintain essential ecological functions and the biological diversity of Namibia’s wetland ecosystems;
- Create additional conservation areas for wetlands;
- Promote integrated land and water management; and,
- Raise awareness of wetland values and threats.

¹ Constitution of the Republic of Namibia – Art 95 (1)

Namibia's Environmental Assessment Policy

A detailed Environmental Assessment was required for this project in terms of the Environmental Assessment Policy of Namibia. The assessment was submitted to the Ministry of Environment and Tourism (MET) for review.

Broadly, the objectives of the process prescribed by the policy are to:

- Inform decision makers and promote accountability for decisions;
- Enable a broad range of options and alternatives to be considered;
- Ensure a high degree of public participation and involvement by all sectors of the Namibian public; and,
- Promote sustainable development and ensure that costs and benefits are taken into account and that internationally recognised standards are promoted. In addition, negative, secondary and cumulative impacts must be minimised and benefits enhanced.

The policy also provides for monitoring and the implementation of an Environmental Management Plan following approval of a project proposal.

The Environmental Management Bill

The Bill promotes sustainability of resources and community involvement in natural resource management. It provides for public participation and seeks to ensure that the public has ample opportunity to raise issues and concerns on any activities that may potentially impact on their livelihoods.

The objectives of the Bill are to:

- Ensure the effective management of the environment and natural resources;
- Give effect to the environmental assessment policy;
- Promote co-ordinated and integrated management of the environment; and,
- Ensure Namibia's adherence to international conventions that its is a signatory to.

Civil Society Participation

Civil society is given the scope to participate in governance processes in Namibia as a result of a number of regulatory provisions. These include those set out below.

Access to information is granted through Namibia's Information Policy, although it has not been made a constitutional right. A National Integrity Strategy, which emphasises access to information and a right to participation, is presently being drafted.

Access to participation is granted through the Draft Environmental Management Act, which lists community involvement and public participation as principles of environment management. It also gives statutory effect to the Environmental Assessment Policy of Namibia (1995). Specific environmental impact assessment guidelines for mining onshore and offshore have also been developed.

8.2 Environmental Assessment and Public Participation Process

8.2.1 Environmental Assessment

The main objectives of the preliminary environmental assessment was to address requirements within the Namibian Environmental Assessment Procedure. The requirements were to:

- Determine the significance of the social and environmental impact of the project and subsequent requirement for a full environmental assessment;
- Identify the environmental implications of the proposed project across the national boundaries with both Angola and Botswana and to consult with interested parties and ministries in these countries, as well as in Namibia;
- Establish a comprehensive database so that a high level of confidence can be placed on the predictions of environmental impact and the mitigation measures required;
- Consult all interested and affected parties to ensure that their needs and concerns are considered; and,
- Comply with Namibia's Environmental Assessment Policy.

The preliminary environmental assessment process comprised the following:

- Stakeholder engagement;
- Baseline information gathering;
- Scoping study;
- Identification of alternatives; and,
- Preliminary assessment of environmental impacts.

There was interaction between the environmental assessment consultants and the project engineers. The environmental assessment team provided information on the biophysical and social environment, obtained during baseline information gathering and scoping, to the design engineers. For example, information was provided on sediment dynamics and the location of significant tourist infrastructure. This information was incorporated into planning and the design of mitigation measures. Once a basic design was formulated, it was subject to a preliminary environmental assessment.

The preliminary environmental assessment recommended that:

- Further and more detailed investigations of impacts and issues were required, in order to quantify the magnitude of potential impacts and determine the effectiveness of potential mitigation measures; and,
- A decision about the feasibility of the project should weigh up the costs and benefits of the project with respect to social, economic and environmental factors. It was noted that not all costs, e.g., aesthetic impacts can be translated into economic terms and that certain value judgements would have to be made. It was recommended that the public participation process in a full environmental assessment be used to assist in making such judgements.

Dr Peter Tarr of the Southern African Institute for Environmental Assessment (SAIEA) was appointed by NamPower as an external Reviewer, with oversight on the terms of reference, the process and the preliminary environmental assessment report. SAIEA engaged the services of a second independent reviewer, Dr Peter Ashton of the CSIR, who also reviewed the preliminary environmental assessment report. Both reviewers concluded that the preliminary environmental assessment was sufficient and adequate for a preliminary study and that a full environmental

assessment was required should NamPower wish to proceed to the next phase of project planning.

8.2.2 Public Consultation

A public participation process was carried out at the early stages of the preliminary environmental assessment so that concerns of stakeholders could be identified at the start of the exercise and fed into the assessment process.

The public participation process was undertaken in both Namibia and Botswana and followed the requirements as set out in the Namibia Environmental Assessment Policy. The objectives of the public participation process were to:

- Introduce the project proposal;
- Explain the public participation and environmental assessment processes;
- Hear and record public issues and concerns;
- Provide opportunities for public input and gathering of public knowledge; and,
- Discuss alternatives to the project.

The following techniques were used:

- Distribution of background information;
- Formal meetings;
- Media announcements;
- Email distribution of documents for comment.

The following activities were undertaken during the public process:

- Stakeholders were invited to public meetings through advertisements placed in three Namibian newspapers as well as a Botswanan newspaper. A press release by NamPower was published in a national newspaper in December 2002. Meetings in northern Namibia were also advertised on NBC Radio and notices were put up in public places near Divundu. Known groups and individuals were contacted by fax, letter or email.
- Five public meetings were held between 4 and 13 February 2003. Three were held in Namibia - in Windhoek, Divundu and Rundu - and two in Maun, Botswana. These were to inform stakeholders about the project and identify issues and concerns. Translators were used at the meetings in northern Namibia, and the Botswanan meetings were held in English and Setswana respectively. Information sheets were distributed at all the meetings. Minutes of the meetings were distributed to attendees and other registered stakeholders.
- Individual and group meetings were also held. Government and tribal authorities were initially contacted in Namibia and Botswana by letter, which was followed by meetings with certain officials. A meeting was also held with a group of scientists in the Okavango Delta, who were undertaking research as part of a long term monitoring programme.
- Informal consultations were held with specialists outside of the project team to gather information and to assist in assessing possible environmental impacts.
- A summary of issues and concerns was circulated with the minutes of meetings, and stakeholders were requested to respond if their issues and concerns had not been accurately represented.
- The preliminary environmental assessment was released for public comment in June 2004 for a period of one month. A copy was made available on the NamPower website. Hard

copies were made available in areas where meetings were held, including at the Windhoek Library, Rundu and at Popa Falls. Stakeholders were notified of the availability of the report via email and a copy of the executive summary was attached to this correspondence. NamPower also announced the completion of the preliminary environmental assessment report at a press conference.

Stakeholders groups involved in the study included:

- Local, regional and national government officials from both Namibia and Botswana;
- Tribal authorities;
- Local people living in Divundu, Maun and Rundu;
- Scientists; and,
- Non-governmental organisations and community-based organisations.

8.3 Case Analysis

8.3.1 Overview

The study comprised a preliminary environmental assessment and commenced prior to the development of designs for the proposed hydropower plant or the selection of specific sites. The intention was to ensure that environmental considerations were taken into account early in the process, including possible concerns of stakeholders who may be impacted on by the project. In addition, the aim was to identify any potential fatal flaws. The environmental assessment consultant stated that the public participation process was thus tailored to meet the circumstances and that intensive consultation was not regarded as appropriate at this stage given the lack of detailed information. Accordingly, the process largely comprised a series of public meetings with affected stakeholders where the concept of the project was presented, with more intense consultations undertaken with key government officials. The environmental assessment consultant noted that stakeholders often requested more information than was available at the stage they were being consulted, but that early consultation with stakeholders was essential given the circumstances of the project.

NamPower was committed to an open and transparent process and publicly committed itself to not proceeding with the development should it pose an unacceptable impact.

In addition, there was a lack of political interference in the project, as evidenced by NamPower's open approach. This is in contrast to a previous process undertaken on a proposed hydropower project in Namibia, where political interference derailed the process and created mistrust. A NamPower employee noted that the company had been 'burnt in the past', where the process had not been as open and learnt that the most appropriate approach was to provide all available information to the public and enable a proposal to be challenged on its merits. The environmental assessment reviewer noted that he was not aware of NamPower holding anything back and that it was committed to the process.

The level of stakeholder mistrust of NamPower that had been generated by previous processes did appear to be reduced somewhat by the open approach adopted, although some level of skepticism still exists amongst some stakeholders, in particular, those in Botswana. A stakeholder commented that 'unacceptable' impacts had not been defined which could result in a development being 'pushed' through which the majority of people regarded as unacceptable.

The environmental assessment consultant noted that people were opposed to the project, but were happy with the preliminary environmental assessment process that had been undertaken to date.

8.3.2 Stakeholders

A broad range of stakeholders was consulted in a series of public meetings. The database included stakeholders from a variety of sectors and, given the international nature of the potential project impacts, included stakeholders from both Namibia and Botswana. The environmental assessment consultant was familiar with the Namibian situation and a separate Botswanan consultant was appointed for the public participation process in Botswana. In general, the familiarity of the consultants with local stakeholders enabled the appropriate people to be identified and involved in the process.

In Namibia, those consulted included local scientists and non-governmental organisations, tribal authorities, local residents as well as local tourism operators. A tourism operator commented that 'for a change', there was an opportunity for stakeholders to comment on a proposed development. A key Namibian stakeholder not involved in the process noted, however, that her organisation was unaware of the process and had not been notified. She suggested that a central registry of key organisations, non-governmental organisations and community-based organisations should be kept and that as a matter of course be notified of environmental assessment projects, in particular high profile projects with potentially highly significant impacts. A tourism operator with a lodge at Popa Falls, also noted he had picked up on the project via a newspaper advertisement and the 'grapevine' as opposed to being directly invited to participate. A stakeholder from a non-governmental organisation in Divindu noted that he felt that local grass roots communities were well informed and represented.

In Botswana, a broad range of stakeholders was also consulted, including local residents, tourism operators, scientist, local and regional government officials as well as certain national government officials. An interviewee noted that, although they were not entirely satisfied with form and content of the public meeting (see below), at least the proponent had taken the trouble to consult with stakeholders as this did not usually happen.

Despite the public process being largely limited to a series of public meetings, the process was successful in accessing a broad range of stakeholders and elicited a diverse range of issues.

8.3.3 Communication

a) Stakeholder Communication

Initial communication with stakeholders and notification of meetings was successful as evidenced by the turnout at public meetings. The meetings in Botswana were extremely well attended with one meeting attracting more than 100 stakeholders. Meetings in Namibia were, on the whole, well attended although the meeting in Rundu was not well attended, possibly due to the distant location of the town from the project site.

Some stakeholders commented that follow up after the meetings was good and that they had received the minutes of the meetings. Other interviewees from Botswana noted that they had not received minutes of the meetings or other follow up correspondence.

The release of the preliminary environmental assessment was announced at a press conference and its release was well covered in the media. Based on the comments of some interviewees, however, recent communication on the project does not appear to have been as comprehensive. Several stakeholders noted that they were unaware of what had occurred in the preliminary environmental assessment since receiving the minutes of meetings and the summary of issues. Although the environmental assessment consultant noted that all stakeholders were notified via email of the release of the preliminary environmental assessment report, some stakeholders had not received notification of the release of the report or the opportunity to comment on it. It is noted that not all stakeholders on the database have access to email. In addition, a few interviewees with email noted that they had not received anything. The reason for this is unclear. Given the nature of the stakeholders, it may have been more appropriate to have posted a copy of the executive summary to stakeholders on the database.

b) Media

Media coverage of the project was also fairly extensive, given its high profile. The environmental assessment consultant commented that there was some irresponsible reporting in the press and magazines. A reporter commented that they were not adequately notified or informed of the project and picked up on it through a very small newspaper advertisement. Given the high profile nature of the project, a specific communication strategy for the media, press and radio, on the part of the environmental assessment consultant may have been of value in ensuring that the correct information on the environmental assessment process and the 'facts' of the proposed development were reported. Such a communication strategy should be distinguished from the strategy a proponent (in this case NamPower) may undertake. Although NamPower did actively engage with the press, putting out a press release at the commencement of the project and organising a press conference at the release of the preliminary environmental assessment, such communication can often be perceived as biased by journalists, coming as it does from the proponent. An active communication strategy and building trust in the media on the part of an environmental assessment consultant can assist in assuring journalists of a more 'neutral' source of information on the process.

8.3.4 Process Techniques

a) Public Meetings

The meetings held provided a forum in which stakeholders could raise their issues and concerns. The format of the meetings was formal. A comment was made by a stakeholder that they were perhaps too formal and that a more informal approach would have been more appropriate. This is discussed further in Section b) below.

Stakeholders commented that the information presented at the meetings was in a relatively accessible format that they could understand. They indicated that information transfer was more effective than in other projects they had been involved in. This is in contrast to the reviewer who felt that the presentations could have been less technical. Extensive use was made of translators at the Namibian meetings and two separate meetings were run in Maun, one in English and one in Setswana. This technique provided an effective means of facilitating the meetings and enabled clear identification of issues.

The public meetings differed in tone. The Namibian meetings were in general well received and stakeholders commented that space was provided in which issues could be raised. This is

despite a tribal leader at the Divindu meeting strongly endorsing the proposed project, which created an environment in which stakeholders found it difficult to raise concerns. The reviewer noted that the leader is a well known figure and that the problem was anticipated to some extent. Although protocol dictates that the public meeting should be held at the tribal authority, more individual and smaller meetings could have assisted in working around such a problem. The consultant noted, however, that most of the issues and concerns did emerge during the process.

The public meetings in Botswana were more acrimonious in character, with participants expressing the opinion that Namibia stood to gain all the advantages from the project and that Botswana would only be negatively impacted. Concern was expressed that Namibia may go ahead with the project despite the objections of Botswana, and that a basin wide approach was needed in deciding whether or not to proceed with the project. This issue is discussed further in Section 8.3.6 below. Botswanan interviewees expressed differing opinions about the meetings. Some interviewees were of the opinion that more time should have been provided for debate and less time spent on presentations. In addition, an interviewee also noted that insufficient information was provided on the impacts of the proposed activity. Other interviewees were of the opinion that the meetings were well run and provided good opportunity for people to raise issues prior to the environmental assessment. As noted below, very little project information was available given the pre-feasibility nature of the project and the stage at which the initial public consultation occurred. Early consultation with stakeholders is a key principle of public participation, which was observed in the preliminary environmental assessment.

The proposal and process was carefully explained to meeting participants and the environmental assessment consultant stated that stakeholders were reasonably happy that there would be time for further input. The Botswanan consultant also noted that it was extremely valuable that the development proponent was at the meeting to gain an appreciation of the degree and level of concern expressed by stakeholders.

b) Other Meetings

In addition to the public meetings, smaller meetings were held with scientist in the Okavango swamps, as well as with government and tribal authorities in Botswana and Namibia. Both a NamPower employee and one of the project engineers noted that the meeting with the scientists in the Okavango was valuable and enabled a good exchange of information.

Grassroots, focus group and individual meetings were not held with stakeholders as part of the formal preliminary environmental assessment process. A local government representative in Namibia noted that he believed that local stakeholders were not adequately involved and that although traditional leaders were consulted, information was not well communicated through local authority and community structures and that smaller group meetings with villagers would have been more appropriate. As very little project information was available at the time of the consultation given the pre-feasibility nature of the project, it is debatable as to whether such meetings would have yielded further issues and concerns beyond those raised in the public meetings at that stage of the process. Stakeholders at a meeting in Divindu had already noted that they could not adequately comment at that stage as insufficient information was available. In addition, at the time of the consultation, no firm preliminary designs of the proposed hydropower project had been undertaken and the area of impact was unclear. As such, particular communities to focus on for grassroots meetings could not be identified. According to the environmental assessment consultant once the process was explained, most people were

happy that there would be further stages for input during a full environmental assessment, should a decision be taken to proceed to a full feasibility study.

Despite the absence of individual meetings with local stakeholders, a stakeholder from a local non-governmental organisation noted that his organisation had workshoped the issues report with stakeholders in the local language to ensure that their issues and concerns were addressed. This local initiative added value to the environmental assessment process and ensured that stakeholder concerns were adequately identified. The interviewee noted that stakeholders were happy with the manner in which issues had been represented in the documentation.

It is noted in the preliminary environmental assessment report that more intensive consultation as well as full socio-economic assessment would be required as part of a full environmental assessment.

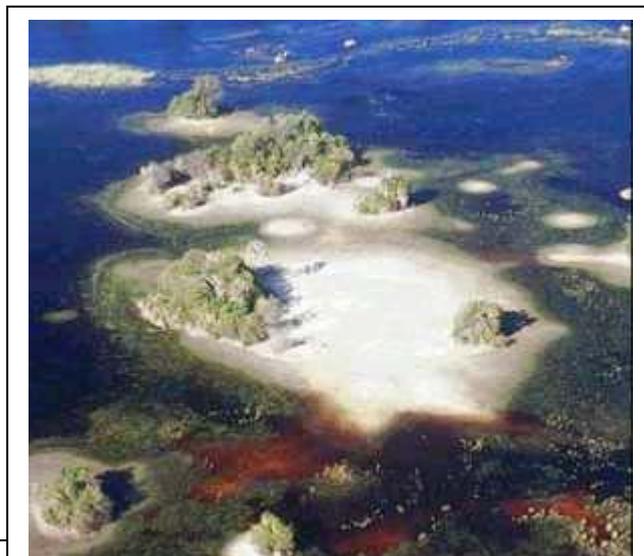
8.3.5 Incorporation of Issues

Issues raised by stakeholders were noted and documented in the preliminary environmental assessment report. Issues raised by stakeholders included, amongst others:

- Concern about the impact of the proposed project on the Okavango Swamps downstream of Popa Falls, including impacts on water flow and sediment transport, a process critical to the maintenance of the Okavango Delta;
- Potential destruction of unique habitats and the cumulative impacts of the proposed project and other projects proposed for the area;
- Resettlement and potential impacts on subsistence livelihoods; and,
- Distribution of costs and benefits associated with the project.

The environmental assessment consultant displayed openness and a willingness to listen to issues raised by stakeholders. Stakeholders commented that issues that they raised were taken up by the environmental assessment consultant and included in the report. The report recommended that although initial mitigation measures were identified for many of the issues raised by stakeholders, further detailed investigation was required to more precisely determine the significance of issues. In addition, those issues that were not as comprehensively addressed in the preliminary environmental assessment report, such as compensation methods and issues related to social impacts such as health and safety impacts, were noted as requiring detailed assessment in a full environmental assessment.

The environmental assessment consultant noted that most of the issues emerged during the public process. The issues and impacts were actively used in the process of refining the project proposal and potential mitigation measures. For example, an issue related to disruption of sediment supply to the Okavango Delta was raised by stakeholders as a significant issue. This issue was investigated and actively addressed by the design engineers



in refining the project proposal. A stakeholder from a local non-governmental organisation also noted that the project team was flexible in its approach to the placement of the hydropower scheme as a result of the concerns and suggestions arising from local communities.

8.3.6 Policy and Governance

A key concern expressed by stakeholders related to the transboundary nature of the impacts associated with the project. Stakeholders in Botswana raised the issue during the public participation process that intergovernmental decision making was required, and that the decision should not rest with Namibia alone. The Okavango River Basin Water Commission (OKACOM), a basin wide intergovernmental committee responsible for overseeing management of the Okavango River Basin, was noted as an appropriate forum in which the preliminary environmental assessment could be discussed.

A presentation was made to OKACOM on the pre-feasibility study at an OKACOM meeting in Windhoek. The Committee provided its consent to continue with the study. All project correspondence was sent to OKACOM as well. However, although discussions were held with government officials in Namibia and Botswana during the preliminary environmental assessment, OKACOM was not consulted in the series of meetings to determine their issues and concerns as undertaken with other stakeholders. OKACOM, as the body responsible for interbasin catchment management and co-ordination in the Okavango catchment, should have taken an active interest and role in contributing to the preliminary environmental assessment process.

The preliminary environmental assessment and feasibility study were submitted to OKACOM prior to it being publicly released. Logistical difficulties were encountered by the project team and NamPower in presenting the report directly to OKACOM and the team received no comments from OKACOM after waiting for one month for these. In the words of a stakeholder, the report was subsequently passed without comment, and approval was given to proceed to a feasibility study. Several stakeholders raised the issue during the process that OKACOM, as the central co-ordinating body, should play an active role in the decision making for the process given the transboundary nature of the potential impacts.

It is unclear as to whether more proactive involvement of OKACOM officials in the participation process, would have resulted in a more considered review of the findings of the preliminary environmental assessment.

8.4 Conclusion and Lessons Learnt

The public process for the Popa Falls project provided input into the preliminary environmental assessment in highlighting issues that needed to be considered such as sedimentation impacts and impacts on island eco-systems. A key challenge of the public process was to meaningfully engage at an appropriate level with a very broad spectrum of stakeholders at a very early stage of the project. This was achieved through the use of a variety of meeting techniques with differing stakeholder groups.

Overall, the public process contributed to the sustainability of the project by exposing a range of issues early enough in the project life cycle for them to be considered and incorporated into the design of the proposed project.

8.4.1 Benefits to Stakeholder Groups

Some of the benefits for the various stakeholder groups arising from the public process included:

- An opportunity being provided for a broad range of stakeholders to raise issues and engage in a debate with NamPower regarding their proposed projects;
- NamPower's open attitude and commitment to the process promoted governance in Namibia; and,
- NamPower gained an important initial measure of public response to the proposed project.

8.4.2 Lessons Learnt about Techniques

Lessons learnt about public process techniques that contributed to the success of the process include:

- Recognise appropriate channels of communication in traditional communities and be aware of their limitations. Traditional community structures were used to consult with stakeholders in the Popa Falls process. Although this provided an effective means of consulting with local stakeholders, in one case a chief may have inhibited certain stakeholders from raising issues due to his endorsement of the proposed project;
- Use a variety of meeting techniques appropriate to the project and stakeholders such as formal meetings and individual meetings. Formal meetings were largely used in the preliminary environmental assessment in order to identify initial issues and concerns for investigation. Smaller meetings were held with 'higher level' stakeholders such as government officials, as these stakeholders had specific concerns which may not have emerged in an open formal meeting. Given the pre-feasibility nature of the project, individual meetings with grassroots stakeholders may not have yielded further issues and the specific communities to be targeted were unknown at the time of the consultation as the precise area of impact of the project was unknown. Such meetings are more suited to a full environmental assessment.
- Use communication methods appropriate to the stakeholder group to disseminate information about project outcomes. In this case study, use of email to disseminate information on the outcome of the preliminary environmental assessment may not have been appropriate to the nature of certain stakeholders. The use of media did provide an accessible means of disseminating information in Namibia.

8.4.3 General Techniques

More general lessons arising from the Popa Falls process include:

- Identify and involve a broad range of stakeholder groups at a level appropriate to the environmental assessment process and project;
- Actively incorporate and respond to issues raised by stakeholders, which ensures trust and credibility in the process;
- Commitment and transparency of the proponent can enhance the integrity and independence of the process. Nampower adopted an open approach to the process which assisted in generating trust amongst stakeholders. This is in contrast to a previous process, which was very controversial due to political interference;

- Discrete processes may be required for public participation in trans-boundary projects. Separate public participation consultants undertook the public process in Namibia and Botswana, with slightly different approaches which were consistent with local conditions; and,
- Local NGO's can enhance participation of local community groups in the process. A local NGO in Divindu in Namibia workshopped the minutes of the meeting with stakeholders which enabled more textured feedback to be provided to the environmental consultant.

8.5 List of Interviewees

(in alphabetical order with an indication of their capacity or position at the time of the environmental assessment)

Brown, Chris

Executive Director, Namibian Nature Foundation

Windhoek, Namibia

22 July 2004

Mannheimer, Colleen

National Botanical Research Institute of Namibia

Windhoek, Namibia

22 July 2004

Christian, Colin

Preliminary Environmental Impact Assessment project leader for Eco.plan

Windhoek, Namibia

23 July 2004

Masche, M

Partner, Suclabo Tourist Lodge

Windhoek, Namibia

22 July 2004

Cliff-Hill, Anne

Willie Phillips Safaris

Botswana

8 September 2004

Mofati, Reuben

IRDNC

Divindu, Namibia

18 August 2004

Coler, Concilia

Okavango Wilderness Safaris

Botswana

8 September 2004

Muremi, Cllr

Local Councillor

Divindu, Namibia

17 August 2004

Langford, John

NamPower

Windhoek, Namibia

23 July 2004

Pallet, John

Desert Research Foundation

Namibia

19 August 2004

Lenhardt, Hetty

Popa Falls Resort, Previous Manager

Namibia

17 August 2004

Parry, David

Public Participation consultant, Ecosurv

Botswana

31 August 2004

Lund, Kai

Project Engineer, Water Transfer Consultants

Windhoek, Namibia

22 July 2004

Randall, Richard

Birdlife Botswana

Botswana

8 September 2004

Tarr, Peter
Project Reviewer, Southern African Institute
for Environmental Assessment
Namibia
12 August 2004

Weidlich, Brigitte
Journalist
Windhoek, Namibia
22 July 2004

