

Local Business for Global Biodiversity Conservation

Improving the Design of
Small Business Development
Strategies in Biodiversity Projects



United Nations
Development
Programme



Global
Environment
Facility

Global Environment Facility (GEF)

The Global Environment Facility was established to forge international cooperation and finance actions to address four critical threats to the global environment: biodiversity loss, climate change, degradation of international waters, and ozone depletion. Launched in 1991 as an experimental facility, the GEF was restructured after the 1992 Earth Summit in Rio de Janeiro. The facility that emerged after restructuring was more strategic, effective, transparent, and participatory. During its first decade, GEF allocated \$4.5 billion in grants, supplemented by more than \$13 billion in additional financing, for more than 1200 projects in 140 developing countries and transitional economies as well as 2,800 projects in 60 countries which participate in the GEF Small Grants Programme, managed by UNDP. In 2002, donors pledged \$3 billion to finance projects from 2002 to 2006.

In addition to its initial mandate, the May 2003 GEF Council approved two new focal areas for the GEF. The GEF now provides financial assistance for the mitigation and prevention of land degradation and persistent organic pollutants (POPs). GEF funded projects are implemented through the following development agencies: UNDP, UNEP and the World Bank. The GEF also benefits from having the following executing agencies: IDB, AfDB, ADB, EBRD, FAO, IFAD and UNIDO.

The GEF can succeed in its global environmental mission only as part of a worldwide movement towards sustainable development. GEF brings together 166 member governments, leading development institutions, the scientific community, and a wide spectrum of private sector and non-governmental organizations on behalf of a common global environmental agenda.

United Nations Development Programme (UNDP)

UNDP is the UN's global development network, advocating for change and connecting countries to knowledge, experience and resources to help people build a better life. With 132 country offices, it has long enjoyed the trust and confidence of governments and NGOs in many parts of the developing as well as the developed world. It is typically regarded as a partner rather than an adversary, and its commitment to a universal presence has proven especially useful in post-conflict situations and with States that have otherwise been isolated from the international community.

At the UN Millennium Summit, world leaders pledged to cut poverty in half by 2015. UNDP is charged with helping developing countries monitor their progress in meeting this and other key development goals. Its strategy focuses on six key thematic areas: Democratic Governance, Poverty Reduction, Crisis Prevention and Recovery, Energy and Environment, Information and Communications Technology, HIV/AIDS. Capacity development and gender mainstreaming are cross-cutting issues across the thematic areas.

A trusted source of knowledge-based advice and an advocate of a more inclusive global economy, UNDP provides funds, helps developing countries attract and use aid effectively and promotes South-South cooperation. It seeks to address the many causes of poverty and to promote development, including through the protection of human rights and the empowerment of women.

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Foreword

We are pleased to provide this guidebook to conservation planners, policy makers and practitioners to assist them in improving strategies for the conservation of globally important biodiversity. The guidebook is specifically targeted to stakeholders designing small business development strategies within biodiversity conservation and sustainable use projects to be co-financed by the Global Environment Facility.

The guidebook provides guidance for conservation planners and project designers to:

- assess the role of small business development in biodiversity conservation;
- determine if a small business could be socially, economically and environmentally viable and sustainable; and
- incorporate into project or strategy design, issues important to small business development.

Products or services that small businesses can develop to directly benefit biodiversity include ecotourism, wild products, agroforestry and sustainable agriculture, forestry, fisheries and livestock. It is hoped that more focused and successful strategies for small business development, in conjunction with activities for improving policy and legal frameworks, developing capacity and improving protected areas management, will prove an effective means to assist local communities in becoming active participants in sustainably managing globally important habitats, ecosystems and biodiversity. This also reflects UNDP's goal of promoting environmentally sustainable livelihoods and thereby contributing to poverty alleviation. I hope that this guidebook will help project proponents in the development of sound proposals.



Frank Pinto
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A vibrant outdoor market scene, likely a traditional fair or festival. The foreground is filled with wooden crates and tables overflowing with fresh produce, including large green leafy vegetables and yellow items. A woman in a black headscarf and a blue and white checkered skirt stands prominently in the center, facing away from the camera. To her left, a man in a dark jacket and a hat is seen from the side. In the background, a large crowd of people is gathered around various stalls and tables, some covered with white awnings. The market is set in an open area with buildings and trees in the distance under a bright, cloudy sky. An orange rectangular box is overlaid on the right side of the image, containing the word "Introduction" in white text.

Introduction

Purpose of the Guidebook

UNDP, with financial support from GEF, has one of the largest biodiversity conservation programmes in the world. The programme aims to help countries conserve globally important biodiversity while promoting sustainable human development and alleviating poverty. The majority of its projects seek to achieve this by one or more of the following:

- improving the extent and effectiveness of protected areas;
- maintaining biodiversity in the production landscape (e.g. in agriculture, livestock, forestry, fisheries systems); and
- improving the enabling environment for conservation.

Key strategies in many of these projects are to improve local livelihoods in order to relieve pressures on biodiversity, or to enhance the local economic value of biodiversity so that communities have positive incentives to conserve and sustainably use it. The development of small, local businesses can be an important tool in both of these strategies.

UNDP has prepared this guidebook to help improve the design of small business development strategies within biodiversity conservation projects in order to increase their long-term impacts on conservation and development. Specifically the guidebook will help practitioners to:

- assess and demonstrate the role of small business development in biodiversity conservation;
- determine if a small business could be socially, economically and environmentally viable and sustainable; and
- incorporate issues into project or strategy design that are important to small business development.



Nature of the Guidance

This guidebook is not intended to be a comprehensive “how-to” guide for the development of a business. Many such how-to guides for specific tools and activities already exist and are referred to in the text. Nor is it intended to replace guidance from small business development experts. Rather, it is intended to guide the assessment and design of preliminary strategies for business development, as a tool for conservation.

The guidebook is tailored for business strategy development within the context of biodiversity projects supported by UNDP-GEF, but it is hoped that it can also be more widely applied by conservation planners, policy makers and practitioners within governments, donors, NGOs, civil society and the private sector.

This guidebook should also be used in conjunction with tools that focus on other elements of larger conservation strategies such as capacity building, enforcement and awareness raising.

What are the Biodiversity Conservation Goals?

The end goal of projects supported by UNDP-GEF is the conservation or sustainable use of biodiversity of global importance. Globally important biodiversity includes: ecosystems, species and genes that are globally or regionally endangered, threatened, near threatened or at risk (see, for example, IUCN Red List of Threatened Animals); endemic and/or with restricted ranges; or of global economic significance, particularly those with potential future value such as the wild relatives of domesticated crops.

Areas that harbour any of the above, are particularly species rich or are a refuge for migratory species, are sources of seeds and larvae, or have a high degree of habitat diversity, can also be globally significant. Projects, as recommended by the Conference of the Parties of the Convention on Biological Diversity, take an ecosystem approach to conservation of this globally important biodiversity.



The Role of Small Business in Biodiversity Conservation

Small businesses are a common form of employment and a means of generating income for the world's rural poor who have limited opportunities to engage in regular well-paid off-farm employment. Local conservation strategies therefore often support small business development for communities living in and around conservation areas in the expectation that they can change the economic behaviour of the communities to reduce their threats to biodiversity. The specific goal of business development is to promote long-term conservation through either:

- the development of alternative activities for labour and capital that divert investment away from activities that negatively affect biodiversity; or
- the modification of systems of production that use biodiversity, both consumptively and non-consumptively, so that the biodiversity resources will be managed in a sustainable manner rather than being depleted to non-renewable levels and exhaustion.

Different types of businesses promote different relationships between communities and their natural resources. This guidebook focuses on the development of small businesses that develop products or services with a direct link and benefit to local natural resources and biodiversity (see Table 1). These include the following sectors: tourism, wild products, agroforestry commodities, sustainable agriculture and livestock.

Tourism can increase the value of the natural resource by bringing in revenue streams from visitors interested in viewing or otherwise experiencing it. If local people are engaged and receive a sufficient portion of the revenue, they may have a greater incentive to manage and protect the natural resource over the long term.



Wild products, when suitably valued, can create an economic incentive for local communities to not degrade or convert the habitat, in order to allow sustained harvesting of the wild resource.

Agroforestry products, which come from the integration of trees on farms, can maintain species, forest canopy and habitat within productive landscapes, and can buffer protected areas and maintain ecological corridors between protected areas.

Sustainable agriculture and livestock production can be important in buffer zones to reduce rates of encroachment into protected areas and maintain resources and habitat for biodiversity within the production landscape.



Table 1 Products or services that small businesses can develop to benefit biodiversity.

Type of Activity	Examples of Products or Services
Tourism	Hotels, resorts, guest houses, tour operations, handicrafts, restaurants, bars, campsites, transportation, site infrastructure and management, construction of tourist facilities, guides.
Wild Products	Live animal, bird and fish trade; fruit, tree nuts, mushrooms; rattan, bamboo, grass; flowers and ornamental plants; spices, herbs, resins and gums; medicinal plants; tannins and dyes; industrial oils; essential oils; insecticides; animal products.
Agroforestry	Coffee, cocoa, medicinal plants, timber, spices, fruits, fuelwood.
Sustainable Agriculture and Livestock	Vegetables, cereals, fruits, silk, cut flowers, herbs, cattle, sheep, goats, camels, butterflies, iguanas.

Challenges to Developing Small Businesses

Small businesses are difficult to set up and run profitably. Working with poor and remote communities to develop viable and sustainable small businesses is particularly challenging, and doing it in a way that secures significant conservation impacts from such business development is even more difficult. Conservation planners need to recognize that businesses will operate within an unpredictable national, and often global, economy and a highly demanding and competitive marketplace.

Furthermore, most small businesses to be supported by biodiversity conservation projects will be located in remote areas that often lack infrastructure, local markets, skilled labour and access to credit and saving mechanisms. Hence, linking local production and community skills to the commercial market place is complex and requires a different set of skills and analysis than for natural resource management.

Although biodiversity-related small businesses are often proposed as tools for ensuring the sustainability of conservation interventions, evidence of this occurring is limited. The ability of small businesses to assist in delivering conservation outcomes is dependent on many variables and assumptions and thus there are many associated risks. Many case studies show that due to limited market opportunities small businesses often benefit an insufficient portion of resource users to have a significant impact on reducing threats to biodiversity.

Small business development can also have adverse effects on biodiversity if not well managed. Businesses directly dependent on biodiversity can overexploit the resource. Similarly, increased wealth can increase the ability to exploit natural resources. As a result, past attempts to develop small businesses as tools for conservation have met with mixed results.

Projects that consider including small business development interventions should therefore approach this subject very carefully and develop strategies based on the results of careful analysis. This guidebook is intended to assist in undertaking such analysis.

What Is Meant by a Small Business?

Small businesses vary significantly in their nature, from a farmer selling surplus agricultural produce in local markets to cooperatives producing commodities for global markets to entrepreneur-led businesses producing processed goods with sophisticated marketing networks. In this guidebook the term “small business” refers to businesses of up to 30 people and can include household businesses, entrepreneurs and cooperatives. Cooperatives are included, although they can consist of more than 30 members, because they often face the same challenges as small businesses.

Organization of the Guidebook

The guidebook is divided into two main sections. **Section A** highlights key issues to consider when designing a strategy to develop small businesses in order to promote conservation. The Section is divided into four assessments: a conservation assessment, a sustainable livelihoods assessment, an economic assessment and an environmental assessment. Each assessment differs in its role and guides project developers in collecting distinct but complementary sets of data. Each assessment identifies key issues, provides country case studies, and gives guidance for gathering and analysing data. A project developer should undertake these assessments in close collaboration with key stakeholders.

Only if both the conservation and sustainable livelihoods assessments identify a critical role for business development should projects include such activities and the project developer continue with the economic and environmental assessments. The combined assessments will ultimately determine whether and how a business development strategy should be pursued.

The **conservation assessment** will help determine the need for and role of small business development in biodiversity conservation. It guides the reader through the challenges and key issues to consider in trying to assess and demonstrate the conservation impact from business development through changing local resource use. The assessment focuses on breaking down assumptions often made about impacts from business and employment opportunities and identifies risks and key issues associated with using business development as a tool for biodiversity conservation.

The **sustainable livelihoods assessment** will help determine how a business would fit into the social fabric of a local community as it pursues its livelihood needs. A livelihoods assessment will avoid preconceptions about what local communities seek and how they are most likely to achieve their goals. Specifically, the livelihoods assessment will help identify key stakeholders (resource users and entrepreneurs) and their history and relationship with the natural resource base, identify relevant macroeconomic and political factors, identify potential business opportunities, and help gain local ownership of any future business operations.

The **economic assessment** will help determine the economic and commercial viability of a potential small business. This assessment analyses the most suitable types of products and services to develop. The assessment guides the reader through a market analysis, cost and revenue projections, and a skills capacity assessment.



The **environmental assessment** will help determine whether a business could negatively impact its environment and provides guidance on how to manage potential impacts. This is different from the conservation assessment as it focuses on the sustainability of specific resources during the operation of a business instead of the links between business and conservation potential. This assessment is to determine the carrying capacity of the natural resources and focuses on the implications of resource replenishment rates, waste generation, energy and water requirements and supply.

Section B provides **guidance notes** for the development of the most commonly proposed types of businesses — ecotourism and non-timber forest products (NTFPs).

It also provides a **case study** to show how a UNDP-GEF-supported project assessed, designed and implemented strategies to develop small community based ecotourism businesses.

The **Annexes** provide references to further selected guidance resources as well as all references cited in the text.





Section A

Multidisciplinary Assessments



Purpose and Nature of a Conservation Assessment

The purpose of the conservation assessment is to determine the extent to which small business development can promote conservation of biodiversity. Project designers often make many assumptions that businesses, run by local communities, have the potential to modify locally driven economic practices that damage biodiversity. They expect businesses to contribute to conservation by:

- developing alternative, non- or low-extractive activities for labour and capital that divert investment away from activities that harm biodiversity; or
- modifying production of biological resources, so that they will be conserved through sustainable harvesting rather than depleted to non-renewable levels and exhaustion.

To assess whether these results can really be achieved, and hence whether business development is a useful tool to conserve biodiversity, project developers need to construct the link between biodiversity conservation and small business development. This requires the following two steps:

Step 1: Prepare a threat analysis to (i) assess the relative degree of threats from economic activities, (ii) assess the role of local communities in these economic activities and (iii) identify the underlying motivation for the local communities to carry out the economic activities.

Step 2: Demonstrate how small businesses can modify, reduce or halt the identified damaging economic activities.

If this link cannot be made a small business development strategy should not be pursued within a UNDP-GEF conservation project and instead other approaches should be explored.



Step 1: Analyse Threats

During the analysis of threats to the globally important biodiversity (a requisite in UNDP-GEF project design) project developers should assess the degree to which different economic activities are damaging biodiversity and its ecosystems. These economic activities commonly include over-extraction of natural resources, land conversion and pollution.

Next, the threat analysis should determine the degree to which the local communities, as opposed to large private sector activities such as logging concessions, large-scale farming, ranching or commercial fisheries, are responsible for the damaging activities. Where local communities are cumulatively degrading resources, small business development may be an appropriate economic instrument for conservation along with other measures such as stricter regulations, enforcement and environmental education.

Once the source of threats has been established, the project designer must identify why local communities use natural resources in an unsustainable manner. This can be due to a combination of factors such as tradition, available capital, risk, subsistence needs and weather. Understanding the economic and social factors that influence resource use will help shape effective strategies for small business development. For example, cultural factors affecting resource use may make communities resistant to alternative economic activities. In these cases it will be more important to promote sustainable use of traditional activities than to provide activities that aim to replace them.

An additional element all project developers should consider is the impact from external factors, such as migration, which increases the difficulty to determine outcomes. Even if local communities change their economic practices to reduce their threat to local biodiversity, migration into the area may occur. Migration can increase if the area gains a reputation for increased standard of living, successful small businesses and agricultural activities. New migrants may increase pressure and unsustainable extraction on resources. Small business development initiatives therefore should not only consider the existing population but also take into account consequences from future populations.

Issues to Consider

- Is the proportion of environmental damage caused by local communities, as opposed to larger private sector activities sufficient to justify economic solutions targeted to the local communities?
- What current community practices degrade the natural resources?
- How did the current economic activities develop over time?
- To what extent are these activities driven by economic need as opposed to cultural traditions?

If it is local subsistence and income needs that drive environmentally damaging local economic activity, then a small business development strategy may help alleviate some of the threats and should be further considered.



Step 2: Assess the Potential for New Businesses to Modify Economic Practices

A project developer must question how the economic behaviour of local communities can be modified to reduce their threat to biodiversity. Business development can affect economic behaviour, resource use and hence biodiversity in a variety of ways. However, experience has shown that it is difficult to predict how stakeholders will respond to market-based approaches to altering economic behaviour. Each project should therefore explain the intended outcomes for its business development strategy and how they will be achieved. UNDP-GEF projects indicate that business development can influence local economic behaviour through four possible means, as outlined below:

1. Increase income potential from ecosystems to reduce the economic motivation to degrade or convert them to less environmentally friendly land uses.
2. Divert labour and capital away from biodiversity-damaging activities to non-damaging or conservation-friendly activities.
3. Meet the needs of local communities for products extracted from natural areas through environmentally sustainable or alternative means.
4. Generate sufficient income in productive landscapes (at the agricultural frontier) to reduce encroachment into natural areas (e.g. forests, wetlands or meadows).

Outcome 1: Increase Income Potential from Ecosystems Targeted for Conservation

Increasing revenue-earning potential from an ecosystem can reduce the economic motivation of local communities to degrade them or convert them to less environmentally friendly land uses. Additionally, promoting the harvest of certain products in protected areas can economically benefit a community and thus increase their compliance with conservation regulations in the protected areas.

Achieving sufficient economic motivation through the sustainable use of natural resources to stimulate conservation is difficult and the following specific issues should be considered:

- (1) comparing potential income from different land uses;
- (2) linking the product to the habitat;
- (3) distributing benefits to those who depend on the resource; and
- (4) securing long-term benefits to the resource users.

Case Study 1 Nepal: Income from Ecotourism

A UNDP-GEF project adjacent to the Royal Chitwan National Park, Nepal, is helping communities generate income from their forest from ecotourism, an activity that is possible because the forest contains endangered rhinos and tigers, which tourists will pay to view. This is

increasing the communities' motivation to protect the forest as it has a greater revenue potential conserved than degraded. Over the last ten years community behaviour towards the forest and its wildlife has changed noticeably (see Case Study in Section B).

Comparing Income Potential from Different Land Uses

In a dynamic and competitive market environment there are often several options for the development of private lands. Pristine areas can be converted to profitable land uses, such as agriculture or ranching. Logging forested areas can also provide large short-term financial gains. Income from alternative, biodiversity-friendly sources, such as tourism, non-timber forest products or agroforestry, may not be sufficient to provide the economic incentive to prevent such land conversion.

In areas where land tenure is weak and land is essentially a free commodity, the profit margins for agricultural and ranching activities are even greater. In these situations of market failure such activities can expand or move to new land once soil conditions degrade and thus long-term sustainability of land use practices are of little concern. Business opportunities to reduce the risk of land conversion, such as commercializing NTFPs, may consequently be limited to remote or marginal areas that have minimal alternative commercial prospects and where land ownership arrangements are established.

Project developers should therefore analyse the income potential from competing land uses and their consequences for conservation intervention.

Linking the Product to the Habitat

Many biodiversity resources, such as certain medicinal plants, are not ecologically dependent on their natural habitat and can be grown *ex situ* in production nurseries. Nursery production may allow communities to gain economic benefit from the biological resource and reduce pressure on collection of the resource, but it will not secure the protection of its natural habitat. Only where *in-situ* growth and harvesting is advantageous will such sustainable harvest strategies help conserve targeted habitats. Tourism also provides a revenue-earning opportunity based on selling conserved *in-situ* 'nature' as a commodity to visitors.

Such *in-situ* practices bear risks, such as over-extraction or ecologically insensitive harvesting or excessive visitation. An ecological assessment of the proposed activities should be undertaken to ensure that the proposed harvesting levels and production methods are sustainable and do not damage the surrounding habitat (see Environmental Assessment). Regulations and community agreements are therefore often required to ensure that natural resource-based business development does not become a threat to conservation.

Issues to Consider

- What are the land ownership arrangements in the area?
- What levels of income can be generated from the sale or conversion of private lands to environmentally less friendly land uses compared with more environmentally friendly land uses?
- How large is the market for land and the demand for environmentally less friendly land uses?
- What is the history of land conversion in the area?



Issues to Consider

- Does the resource being harvested depend on the habitat that is to be protected?
- What is the history of harvesting the habitat-based resources?
- Can local users increase their income from the resource without degrading the quality of the habitat?
- Are agreements with local communities required to ensure that they harvest resources sustainably and maintain habitat quality?

Distribute Benefits to the Biodiversity Resource Users

A business can be based on income from ecosystem products or services but this does not necessarily mean that the benefits will be shared with the members of the local community dependent on the resource for income. Even where new businesses increase income for a small group of local stakeholders, others who do not benefit may still extract the resource in an unsustainable manner.

Therefore, when a business initiative increases the economic value of a conserved ecosystem, the project developer needs to consider how this added value is distributed to a sufficient number of the main resource users. This should include considerations of how to increase individual household control over resources, and how to ensure that timing of income flow fits with seasonal income and expenditure patterns.

If a business initiative will be limited in extent and will exclude key resource users, its potential conservation impact should be questioned. However, if conservation of the resource benefits sufficient resource users, peer pressure may encourage those still extracting the resource to change their practices.

Local institution building can be important for establishing mechanisms that allow a portion of profits to be managed and invested in community development and conservation projects. These mechanisms for revenue distribution can help broaden the social, and hence conservation, impacts from business development (see Case Study 2).

Issues to Consider

- How many resource users can be included in new business activities and how does this compare with the total number of local resource users?
- Will there be resource users who will not benefit from new businesses and who may continue to significantly threaten the resources?

Case Study 2 India: Distributing Benefits from Medicinal Plants

In Kerala, India, the Kani people during long treks often ate the rare Argyapacha plant for its anti-fatigue properties. The Kanis' knowledge of this plant was shared with Dr. Pushpangadan of Kerala's Tropical Botanic Garden and Research Institute (TBGRI). Following discussions with Dr. Pushpangadan and other researchers, the Kanis agreed in 1987 that if a marketable product was made from the Argyapacha plant, the benefits arising from commercial production would be shared equally with the Kani people.

Following seven years of detailed research, Dr. Pushpangadan was finally able to produce a scientifically reproducible herbal formulation that could be widely marketed. The resulting product, "Jeevani," was licensed to the Arya Vaidya Pharmacy (AVP), which paid a license fee of US\$50,000 plus a 2 percent royalty. The Kanis, in turn, established the Kerala Kani Samudaya Kshema Trust in 1997 for the sharing of

benefits with TBGRI. Within its governance structure the Trust includes representatives of the 30 local Kani settlements. The capital received by the Trust is maintained, with interest used for community development projects.

So far, the Trust has helped support poorer members of the community and has provided insurance for pregnant women and families that have experienced an accidental death. This benefit-sharing model now covers over 700 Kani families. Activities related to the cultivation and post-harvest processing of Argyapacha have also employed community members.

The high level of community cohesion and participation in this initiative has led to equitable distribution of benefits from the natural resources so that the community benefits and is motivated to continue to sustainably use the rare plant and conserve its forest environs.

Source: Equator Initiative, UNDP

Securing Long-term Benefits to the Resources Users

Even an increase in a habitat's value will not necessarily increase a household's incentive to conserve it. In the absence of secure long-term rights to benefits, increasing the value of the biological resources may have unintended negative consequences. Particularly with public goods, short-term economic gain combined with uncertainty over future benefits will provide an incentive to harvest at a rapid rate until all economic benefits are dissipated (see Case Study 3).

A strategy needs to ensure that as the value of a resource or habitat increases, users have an incentive to extract the resource in a sustainable manner, otherwise as a resource becomes scarce it may be exhausted. Access to the resource through secure property and resource rights can be an important component of such a strategy.

Issues to Consider

- What is the status on land tenure and how will it affect decisions about resource use?
- What is the local knowledge about rates of sustainable harvest for resources?
- What is needed to modify incentive structures so that natural resources will be extracted sustainably over the long term?

Case Study 3 Guyana: Open Access Turtle Hunting

Large and commercially valuable leatherback turtles every year visit the northern beaches of Guyana to lay their eggs. Because the beaches are common property, locals had no motivation to limit the number of turtles they killed; refraining from killing turtles would not stop others from killing turtles nesting on the beach. This lack of incentive to conserve led to

many years of poaching and significant declines in turtle populations. Now a local conservation organization, the Guyana Marine Turtle Conservation Society, is organizing the communities to manage the sustainable use of the turtle resources.

Source: UNDP-GEF



Outcome 2: Divert Labour and Capital Away from Biodiversity-Damaging Activities

One important way to reduce loss of biodiversity is to encourage local residents to reallocate labour away from undesirable activities towards desirable ones, in a substitutional manner. This is possible if new businesses provide income greater than the existing returns on of labour and capital. However, even if some labour is attracted to new activities there will not necessarily be a reduction in available labour for environmentally damaging activities.¹

Project designs often assume that individuals who are provided with a new means of income will forego their previous income-generating activity. In reality, however, this is not often the case. The ability to divert labour, particularly in low-income communities, faces four key challenges:

¹ Lee, Ferraro and Barrett, 2000; Angelsen and Kaimowitz, 2001

1. People do not have fixed-income targets. Instead of only substituting one economic activity for another slightly better one, a worker might try to do both to increase his or her income as much as possible. For example, one person may work on a plantation during the day and continue to hunt at night or early morning; another may work in tourism in the dry season and continue to log forests illegally in the wet season.

Issues to Consider

- What is the labour pool for which the project is competing?
- Will the economic return be sufficient to compete for this labour?
- Will there be surplus labour?
- What cash benefits do the members of the target labour group derive from the natural resources currently extracted?
- What non-cash benefits (cultural, social) are derived from the natural resource?
- Are there seasonal fluctuations in cash and non-cash benefits derived from the natural resources?
- Are there particular periods during the year when the target group has greater need for cash?
- Will the alternative economic returns be greater than from the current practices?
- Will improved incomes provide more leisure time for non-income activities that may degrade resources?
- What is the likelihood of further migration into the area if living standards are raised or if locals discontinue their traditional activities, thus providing opportunities for others to undertake them?

2. Where there is underemployment there will be surplus labour. It will therefore be difficult to develop economic activities that divert sufficient labour away from damaging activities. Surplus labour, or even inactive potential labour, such as children and women, may fill a labour need. If the area receives migrants, then new workers may take over activities previously abandoned by the locals for more biodiversity-friendly activities.

3. New activities that rely on technology and are not labour intensive will not divert much labour and therefore will not have significant impact on the labour market.

4. Cultural traditions and reluctance to take on more work for small incremental gain may make local communities less receptive to new business ventures, especially if they have already invested capital in existing activities and are concerned about the risk of failure. Without assistance to exit from existing activities, individuals may be unable or unwilling to transfer their labour to alternative businesses.



Case Study 4 Thailand: Providing Alternative Sources of Income to Communities

For many years, residents of Sub Tai village were forced out of economic necessity to poach in nearby Khao Yai National Park. Lacking knowledge of sustainable agricultural practices and without recourse to credit, villagers were often forced to supplement their incomes through illegal logging and gathering of forest products. This began to change in 1985 when the Population and Community Development Association of Bangkok launched a local Environmental Protection Society (EPS) in Sub Tai to deal with issues of economic indebtedness and poaching. This participatory project radically changed the way villagers interacted with the national park. On joining the EPS, villagers signed a commitment that they would not cut down trees or hunt in the park and in return received low-cost loans that allowed them to invest in alternative

economic practices to obviate the need to poach.

The EPS evolved into a community-based integrated rural development CBIRD centre. The centre disburses loans, primarily for ecologically sensitive enterprises such as tree-planting and eco-tourism ventures. Since its inception, the benefits of the centre's work include a near doubling of local incomes, leading to sustainable livelihoods for many communities and a recorded 75% reduction in illegal logging in the park.

This example illustrates that under the right conditions the provision of alternative livelihoods can promote reduction in poverty and promote conservation of protected areas.

Source: Equator Initiative, UNDP



Outcome 3: Meet the Needs of Local Communities for Products Extracted from Targeted Ecosystems

A household may no longer produce a good by engaging in undesirable activities, but it may still want to consume the product and pay other workers to supply it. Therefore, in addition to diverting labour, a project must either promote sustainable management of the resource or promote alternative products (e.g. by growing wood plantations or providing cooking gas to reduce dependency on fuelwood from forests and mangroves, or by developing breeding farms to substitute for hunting endangered wild animals).

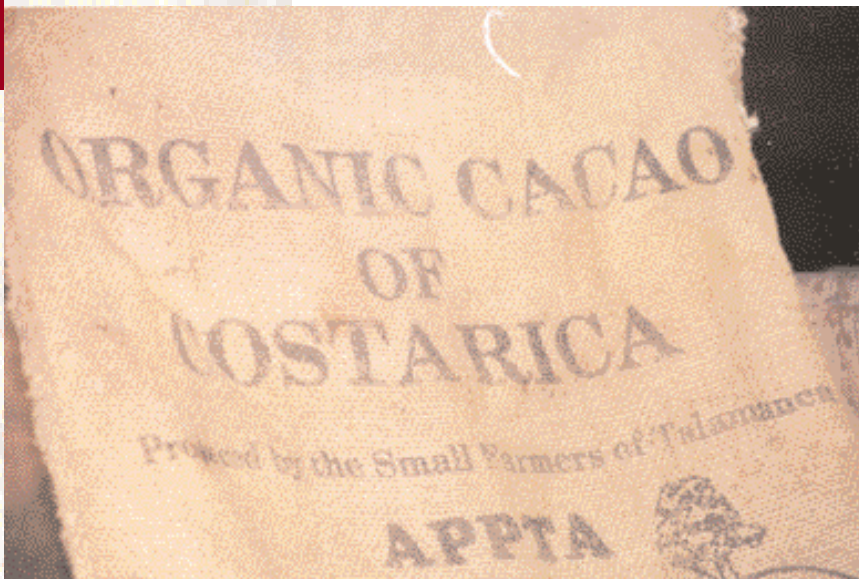
However, changing traditional activities, such as hunting bushmeat, is difficult to achieve even with new economic incentives. Businesses based on alternative activities might need to be accompanied by complementary tools, such as harvest permits or no-take seasons, to motivate changes to resource use.

Outcome 4: Generate Sufficient Income at the Agricultural Frontier to Reduce Agricultural Encroachment into Protected Areas

Where natural areas border productive landscapes, land conversion is a risk. A popular theory is that if farmers can produce sufficient crops and income from their existing farm units they will not expand into adjacent areas. A common strategy is to promote agricultural intensification where an agricultural frontier is adjacent to forests and possibly protected areas.

However, evidence that this strategy works is mixed and inconclusive. Increased intensification can lead to increased income, which increases the motivation for farmers to expand their farming units as their return on labour increases.² An alternative option is to try to increase non-farm activities, which could not only increase income but also divert labour and capital away from land conversion.

The effectiveness of small business development at the agricultural frontier will also be dependent on the level of regulation and enforcement in place locally. Where community structures are in place, community consensus on how to manage the common resources at the agricultural frontier will also be important.



In areas buffering forests it may also be worth supporting small-scale farming businesses to promote agroforestry. Agroforestry businesses, through mixed-tree cropping, maintain forest cover, which can help to conserve soil and water resources and extend habitat for some species. Such support can reduce the risk of conversion of buffer habitat to environmentally less friendly land uses such as pastureland and ranching.

² Lee, Ferraro and Barrett, 2000; Angelsen and Kaimowitz, 2001

Conclusion and Follow-up

A business development strategy should be pursued only if the resource users are likely to benefit enough to reduce pressures on biodiversity. When the following conditions occur, a business development strategy should be questioned:

- The opportunity cost of land is determined to be higher than income to be derived from biodiversity friendly activities. It may then be more effective for a project intervention to focus on strengthening the legal and regulatory framework influencing use of the land and resources than to attempt to work through market forces.
- If only a small proportion of current resource users will be engaged in business opportunities.
- If the products are not ecologically dependent on their ecosystem and hence there will be no economic incentive for local communities to conserve the targeted ecosystems. Even if there is ecological dependency, strategies will be required to ensure resources are managed sustainably and not left to market dynamics.
- Where resources exist on common property. In this case a business development strategy may need to include provisions for long-term access and management control.
- Where there are current or potentially significant levels of migration to the area.

Many of these issues should also be explored during a livelihoods assessment.

Furthermore, developing a business based on ecosystem products is not necessarily sufficient on its own to motivate communities to conserve the resources. The strategy should be formulated in conjunction with complementary measures such as increasing regulations and enforcement and improving awareness and capacity building among stakeholders.



Sustainable Livelihoods Assessment

The Purpose and Nature of a Sustainable Livelihoods Assessment

Sustainable livelihoods assessment carried out at a community level in conjunction with a conservation assessment can determine whether communities can develop a sustainable business and at the same time achieve desirable outcomes for conservation. A sustainable livelihoods assessment will identify the underlying relationship between the communities and the resources, and it will examine how the community prioritizes the development of certain businesses in its efforts to achieve sustainable livelihood. This is important to ensure that any business development strategy is selected and driven by the community.

Where poverty of communities is identified during a threats analysis as a root cause of biodiversity loss, business development may be one option for a conservation strategy. However, poverty has a multi-dimensional nature, and therefore it is risky and not necessarily accurate to assume that business development is the solution for poverty alleviation. An individual's livelihood consists of his or her well-being, availability of food, income levels, access to and use of natural resources and vulnerability to shocks.³ One or all of these may need to be improved to reduce poverty. The livelihoods framework encourages a broad and systematic view of the factors that cause poverty — whether these are shocks and adverse trends, poorly functioning institutions and policies or a basic lack of assets.⁴

The analysis should be carried out at an individual household level, as every household has its own assets, activities and needs, which can differ widely between households. This analysis should be done in iteration with the conservation assessment, as data gathered will inform the conservation assessment. Carried out with full community participation, the assessment can also increase local ownership of future economic activities and the intended conservation goals. The main steps of the assessment should be:

Step 1: Identify key factors influencing a community's interest, ability and role in business development.

Step 2: Assess and plan for social impacts from business development.

Step 3: Scope potential products or services that the communities want to develop commercially and how this goal can be achieved in the most socially acceptable manner.

Note: Whilst poverty may be a cause of natural resource degradation, its reduction may actually increase natural resource degradation as more capital is available for production. The achievement of specific conservation impacts will require poverty-reduction strategies to be integrated with other types of assistance—regulations over use of natural resources, conservation agreements, enforcement of protected areas, etc. — which are traditional elements of GEF projects. It is the combination of both that will allow local and global benefits for people and nature.

³ DFID, December 1999

⁴ See DFID Sustainable Livelihood Guidance Sheets for a more detailed explanation of the sustainable livelihood approach.

Step 1: Identify Community Livelihood Needs and Priorities

Communities should identify their needs and priorities for improving all elements of their livelihoods. The livelihoods assessment should therefore review the following:⁵

- the context in which different groups of people live, including the effects upon them of external trends (economic, technological, population growth, etc.), shocks (whether natural or man-made) and seasonality;
- people's access to different types of assets (physical, human, financial, natural and social) and their ability to put these to productive use;
- the institutions, policies and organizations that shape their livelihood;
- the different strategies that they adopt in pursuit of their goals; and
- vulnerability and dependency on the environment.

The assessment should be highly participatory and people-orientated and consensus should be attempted. The sense of ownership and empowerment are often powerful incentives for communities to participate not only in subsequent economic activities but also in the pursuit of broader conservation goals.

This assessment should identify the basic needs and priorities of the communities, the history of local economic development and local financial needs that influence use of resources. It will also identify the key barriers to generating income and developing small businesses (market volatility, lack of land tenure etc.). The livelihoods assessment can also be used to complement the threats analysis in mapping natural resource use and identifying the key resource users within each community. Project designs will also need to address non-income orientated needs and activities, e.g. food security or energy needs, that are identified in the livelihoods assessment.

The assessment should also produce a plan for ensuring that the communities continue to participate fully in the process of designing the business development strategy and in its implementation.

Follow-up

The identification of community livelihood needs and priorities should inform the conservation assessment. The information provided by the assessment should then be used to determine how the communities wish to proceed with regard to small business development.

Issues to Consider

- What are the community's priorities for improving livelihoods?
- How is the community socially organized and how does it internally resolve issues?
- What is the history of economic development in the area?
- Who are the key users of the biological resources in the community?
- What are the financial needs of the key resource users?
- To what degree are livelihoods dependent on the use of the natural resource base?
- Does the community use natural resources regularly or only when livelihoods are under stress?
- Is resource access equal across the community?
- Who are the community leaders or influential members of the community that should be included in developing the income-generating strategies?
- What does the community need in order to change its resource use practices?

⁵ DFID, December 1999.



Step 2: Assess and Plan for Social Impacts from Business Development

The livelihoods assessment should also identify potential social impacts on the community from small business development and the most socially appropriate ways for projects to support community priorities. Recognizing the challenges in working with heterogeneous communities divided across economic, class, gender, caste or religious lines can reduce negative social impacts. Competition for prestige and class in communities is often keen and it can be exacerbated when selected community members benefit from increased incomes whilst others do not.

Other potential social impacts can include a breakdown in traditional forms of governance and community organization, loosening of social controls and changes in the traditional economy of the community. Therefore, the assessment must identify risks and develop strategies to establish mechanisms to promote equitable development.

Additionally, communities inexperienced with the dynamics of businesses may have different perceptions of how they will work and gain benefit. It is important to understand the local expectations for business development and manage local expectations so that stakeholders understand to what they are committing themselves.

Issues to Consider

- Are there any socio-cultural factors that may hinder community members from developing businesses?
- What are the potential negative impacts of the business development on communities inside and adjacent to the project area? Can these be mitigated through planning and developing community based organizations such as cooperatives?

Follow-up

If there is a risk that communities cannot be organized and business development may stratify a community to the point that conflict arises a business development strategy may not be appropriate and should be reconsidered.

Case Study 5 Papua New Guinea: Community Participation

A project in Papua New Guinea found out that demands from the community were based not on actual business success but on community member's perceptions of how successful the business was. This was based on tangible signs of success such as acquisition

of fixed assets like buildings and equipment. There was therefore pressure from the community to distribute resources when the business was at its most fragile and needed to conserve cash.

Source: Small Business Development in Papua New Guinea, 1996

Step 3: Scope Products and Services to Develop

If a community reaches consensus that participating in the development of a business is a priority, an initial scoping exercise should be undertaken to rapidly determine potential products and services to commercialize. A diversified set should be identified to reduce risk of failure and help to plan steady income flows, which are important for poor households. Business failure can result from unexpected changes in many variables, such as market drop in demand or product supply problems.

A community should compare its options for either modifying its current practices or developing alternative and new businesses. Many factors may determine a community's level of interest in committing to a new economic activity. These include:

- cultural factors;
- time, effort and risk of the ventures compared with the economic returns;
- alternative options for labour and capital; and
- the financial needs of the community.

Most communities also have short-term needs for cash whereas the business development may take time to begin making and distributing money. These should all be explored during the livelihoods assessment and the findings should influence project design.

Therefore the livelihoods analysis should include rapid surveys to:

- (1) identify local skills and products in the project area;
- (2) assess the supply of potential product; and
- (3) assess the potential to increase revenues from existing products or services.

Local Skills and Products

Communities should identify possible products, services and participants for potential businesses. Ideally, a local business should build upon locally available skills (technical, managerial and entrepreneurial) and products already being produced or traded. If a product or service is already traded in an area, products, marketing

Case Study 6 Jordan: Conservation of the Dana and Azraq Protected Areas

The Dana project in Jordan funded by UNDP-GEF in 1992 took advantage of its proximity to a world-class tourist attraction in Petra and centuries-old local traditions of producing fine handicrafts. The project began with ecotourism and has added local handicrafts, fruits, jams and jellies to its product list. Communities were provided training and access to

modern designs, quality control and materials. The successful socio-economic programme has been developed not by pursuing 'one big alternative', but by experimenting with a large number of potentially promising alternatives. This avoids dependence on one single source of livelihoods

Source: Lessons Learned During the GEF Pilot Phase, 1998

Issues to Consider

- What products and services are commonly produced or traded in this area?
- What is the quality of the products currently being produced by the community?
- What technical and entrepreneurial skills are available in the project area?
- What technology is being used locally?
- What specific business experience do the stakeholders have?
- Can the resource be further processed to gain more value for the local producers?
- Will significantly more infrastructure be required to develop a business?

information, skills and technologies for production may already exist, thus lowering development costs and increasing profits within a shorter period. This will help meet the community's need for immediate return on labour and capital. On the negative side, market competition may already be strong in existing business areas, making it difficult to increase size and profits. New products, in contrast, may require more capital to start the business, take longer to start making a profit and require extensive training and marketing systems to build demand.

The seasonal availability of most natural products and services as well as extreme price fluctuations and competition can make long-term survival hard for a business based on only one product. A community should therefore look to develop more than one product or service so it can have a diversified source of income.

Supply of the Potential Products

The availability of a potential product, in terms of both security of supply and volume available, must also be assessed. In many countries, local and state government often control access to land and resources used by communities. Basing a small business on natural resources to which access is not guaranteed does not make business sense. In addition, communities are unlikely to protect resources to which they do not have clear rights or access. An initial step in the scoping exercise is therefore to determine if the community has guaranteed access to the resource and to identify social or environmental factors that might constrain this access.

A business needs to sell a minimum volume of the product or service to generate a profit and thus requires a minimum supply of product. Additionally, some purchasers will purchase only a minimum volume of a good to satisfy their production and sales levels.

Because many natural products are available only in small quantities and on a seasonal basis, the initial scoping exercise should estimate quantities of the product that may be available to a business and the ability to increase production.

If a small business strategy relies on a natural resource product without having verified the potential to secure access and supply, the risk of developing such as business may be too high. If there is potential then support to a business, through a project, may be able to address issues of supply.

Issues to Consider

- Is the community's access to the resource secure?
- If not, how is community access to the resource regulated?
- Is resource access equal across the community?
- Will there be sufficient volumes of the resource to supply a growing business?

Case Study 7 India: Himalayan Silk Rearing

A project in the Indian Himalayas introduced Tasar silk rearing in Oak forests controlled by the Forest Department. Since the community does not enjoy formal access to the Oak Forests, production of silk is dependant upon informal approval by the Forest Department on a yearly basis. The business almost had to close in 2000, when the

Forest Department suddenly decided not to allow the rearing of silk worms in the forests. Consequently, the business has had to completely change its production strategy. It is now working with local communities to plant fast growing species of oak (*Quercus serrata*) to develop a guaranteed access to a long term resource base

Source: A Gupta.

Revenue Potential of Existing Products

Currently traded products may produce low levels of revenue because communities lack information about the quality and type of products preferred by the market or the location of the better markets as well as access to the markets. Improving the marketing and organizational abilities of the community in order to increase the level of sales and the proportion of returns received by the community may easily increase revenue. Improved access to the markets through infrastructure improvement can also quickly raise sales.

Additionally, some of the most successful attempts to generate income focus on improving the efficiency of existing harvesting or production systems. These introduce new technologies or production systems to increase the return on labour.

Follow-up

The identification and preliminary assessment of local skills and products should help identify a set of business opportunities for which it is worth carrying out an economic assessment. If access, supply and volume appear in doubt for certain products, these products should not be pursued. Alternatively, if there is potential to improve the access, supply and volume, then the products can be further assessed and a business development strategy will need to provide for such improvements.

If the data indicate a possibility to increase revenues of existing production through increasing market share or prices, then it may be worth further exploring expansion of current business activities. If revenue potential appears limited then developing businesses may not be economically efficient or worthwhile and alternatives should be explored. Small businesses are extremely difficult to set up and run profitably. Therefore a rigorous economic assessment is important, and a basic assessment the minimal requirement, for project design. Without such assessment projects may channel resources into businesses which have no real chance of succeeding.

Issues to Consider

- Where are the main markets for the products?
- Can the supply chain (the link between the producers and consumers) be restructured to increase the retention of value of the product locally?
- Could the sale price of products be increased with assistance?
- Does the community have access to information about markets (demand and prices)?
- What are the key constraints to connect existing products to markets?
- Can productivity be increased?
- Do any other obvious factors inhibit generation of increased revenue?



Purpose and Nature of an Economic Assessment

**“75 percent
of new
products
fail.”**

—*Industry Standard, 2001*

An economic assessment can provide guidance at a unit level, a sectoral level and an inter-sectoral level. It can be used to:

- Indicate which sectors will be most profitable, through comparing net revenues of different business possibilities (e.g. medicinal plants compared with organic vegetables). This comparison does not preclude supporting a variety of sectors and hence promoting economic diversification, but it can avoid expending energies on businesses with relatively marginal economic benefit.
- Assess the potential scale of business development within specific sectors (e.g. ecotourism). The scale will indicate the number and size of businesses that can be developed within a sector. This is important for gauging the scale of local employment opportunities and conservation impact. Resulting business development strategies need to consider the dynamics of scaling up pilot businesses.
- Assess the economic viability of an individual business.
- Ensure that the business development strategies outlined in project design will have appropriate goals and indicators and sufficient financial resources and team expertise (management, accountants, marketing, markets sectors) for their further development and implementation.

An economic assessment needs to take account of both internal and external factors that can affect the profitability of a small business.

Internal factors include: management capacity, labour force, capital, facilities, marketing strategies, financial and business planning, production processes, cost structure, etc.

External factors: national economic policies and legislation, market dynamics, labour markets, macroeconomic shocks, resource supply, infrastructure to markets, access to credit and saving mechanisms and community relations.



Furthermore, small businesses supported in biodiversity conservation projects are usually located in remote regions that often lack infrastructure, local markets, skilled manpower and access to credit. Therefore, in addition to the standard challenges faced in product commercialization, business strategies must also take into account the underdevelopment of the areas in which they will work and how it will impede business development.

The project design will have to show that these factors will support business development or that the strategy of the project will ensure these factors will be reformed to provide a supportive environment for business development.

Project developers can plan to address the above mentioned variables by following four steps:

Step 1: Assess market potential

Step 2: Assess access to market

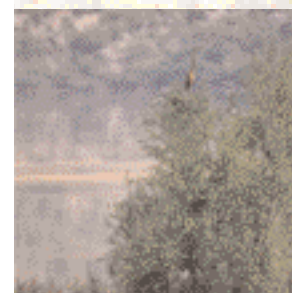
Step 3: Estimate costs, revenues and profits

Step 4: Review management capacity and partnerships

Household Versus Small Businesses

This guidebook treats household and small enterprises together. However, whilst carrying out an economic assessment, project developers should bear in mind that household businesses may face more difficulties than small enterprises. Household enterprises will face constraints with regard to risk, access to capital and resources and skills. Limited marketing skills can limit ability to access new markets, thus restricting households to local markets. Limited skills and capital can also impair quality control and production volume, making entry into larger, more demanding markets more difficult. Where households can sell sufficient levels of product to a local market this may not be a problem. However, there may be high competition between households for local markets.

Where increasing sales is a goal, a valuable strategy may be for households to pool resources by forming associations or cooperatives.



Step 1: Assess Market Potential

A market assessment for a potential business (or sector) is essential because a product or service will only sell if it fulfils the needs of customers at a price they are willing to pay. Therefore, customer demand, existing market supply and prevailing market prices for potential products must all be analyzed. This process will aid communities and planners in narrowing down their list of potential products (identified during the sustainable livelihoods assessment) so that further analysis can concentrate on products or services with real potential for sales.

Business development strategies should demonstrate that sufficient research has been conducted to ascertain that sufficient market demand exists for the proposed products and that the competitive landscape and prevailing prices are such that if a cost-effective business is developed, sales and revenues will be promising.

Step 1.1: Assess Market Demand for Products

Markets may exist locally, nationally and internationally, and the demand for a product in each market may vary. Planners should estimate the current, past and future demand for products at the local and national levels first. International markets can be very difficult to assess, and access and may be beyond the capabilities of many small businesses. However, where applicable (e.g. for commodities such as coffee and cocoa) the dynamics of international markets should be understood. International markets can be divided between western and regional markets.

Assessments of market demand should obtain data both on the volume of products sold and on the type and quality of the products. Volume analysis should record annual and seasonal fluctuations. If no market exists for the exact product to be developed, sales for products of a similar quality should be researched. If a market does not exist for similar products, there may be an unmet, untapped demand. Planners should then investigate why no one else has yet developed the product, as there may be unseen risks or difficulties.

Issues to Consider

- Who currently buys the potential products?
- Where are the products bought?
- Who are the eventual consumers of each product?
- What quantity of the product has been bought in the local and national market (monthly, seasonally, annually over the past three years)?
- Does demand fluctuate during the year?
- What are the quality standards at local and national levels?
- What is the long-term trend in the market?
- What factors could decrease or increase demand at a local and national level?
- Is there a strong international demand for the product?

Demand can be estimated by surveying primary sources such as local communities or existing buyers and wholesalers. Secondary data can be obtained from trade publications and industry organizations, which can provide nationwide figures for past (and sometimes predicted) demand for a product.

Follow-up

Based on data collected on market demand, a strategy can be tailored to suit market conditions and consider potential volumes of production to match demand.

Case Study 8 Peru and Papua New Guinea: Comparing Approaches

Project designers working on ecotourism in a UNDP-GEF supported project in the Amaraeri Indian territories in Peru ascertained the annual number of tourists visiting nearby Machu Picchu and Manu Biosphere Reserve by consulting tour operators and park managers. The tourists visiting these famous sites represented a potential market of which a percentage could be attracted to visit the nearby Amaraeri territory. Ecotourism was thus gauged to be a credible business opportunity for the Amaraeri Indians to further consider.

The pitfalls of failing to assess the demand in advance can be illustrated by an example in Papua New Guinea. A community in Papua New Guinea that was working with a donor-funded sustainable livelihood project built a small lodge and then waited for tourists to arrive. Before building the lodge they did not consider potential demand or the fact that they were located in a remote area of PNG that was hard to get to. Every day they would ask the project manager, "When are the tourists going to arrive?" *Sources: UNDP-GEF; Salafsky 1999*

Step 1.2: Assess Competition

Most new products and services will compete against other, already established businesses selling similar products. Often if a product is profitable and the costs to produce and sell the products are low, competition may be high. Honey is a good example. It is cheap to produce and is relatively simple to process. In many countries donor assistance to communities to produce honey has led to a saturation of the marketplace. The consequent oversupply has led to a fall in honey prices.

Large competitors may often have lower unit costs (owing to more established and larger scale operations), bigger marketing budgets and established relationships with wholesalers and retailers who tend to promote their products. The result is that products from small enterprises may be relatively expensive compared with those of larger competitors. Consumers may also be more familiar with a competitor's products. Therefore, it may be difficult for a small business to be profitable and compete with established larger firms.

On a positive note, a small business should be able to use information on competitors' behaviour to inform its own strategy to access the market and to determine the likelihood of finding a market niche. Conversely, a lack of competitors may be a sign that a product is not viable.

Follow-up

The nature of the competition should indicate whether the supply side is sufficiently underdeveloped to allow a new business into the market, whether competition will be too tough to enter the market at all or whether a product should be designed in a specific manner to fill a market niche and avoid existing competition.

Issues to Consider

- Are the same products commonly available in the local or national markets?
- Is the market supplied by a few large companies or a multitude of smaller ones?
- What are the strengths and weaknesses of the competition?
- Why would customers buy this product (or visit a site if a tourism opportunity is being considered) instead of a similar product from a competitor?
- What are the competitor's prices and quality standards?
- What factors could lead to an increase in competition?
- What is the evidence that a market opportunity exists in spite of competition?
- Is there a market niche a new product could fill?



Step 1.3: Identify Market Prices for Products

Data on market prices are essential for determining how much revenue from sales a business can expect to generate and what products provide a higher return (vis-à-vis production cost). By producing better-quality or processed products, a business can often charge higher prices and increase the return on community labour and raw materials.

Prices of most natural products fluctuate widely in local, national and global markets both during the season and over a number of years. In Brazil, for example, between 1995 to 1996, the price of a lata (12–13 kg) of Brazil nuts fell from R\$2.8 to R\$ 1.8. Within the 1997, harvest season the price started at R\$2.0 in December, rose to R\$3.3 in March and then fell to R\$2.4 in May (Cooperative Agro-Extrativista do Xapuri, 1997).

This can make estimates and planning difficult. It also means that recent and historical price fluctuations in the market need to be assessed and estimates of future prices made as well as looking at current prices. Key long-term strategies for reducing risk from price fluctuations are product diversification, value addition (see Value Addition box) and fixing prices over the long-term with purchasers (e.g. futures contracts for commodities).

Issues to Consider

- What are the prices of the products (current and past three years)?
- What are the seasonal annual variations in price paid for the products/ services?
- What are some of the factors that can affect prices at a local, national or international level?
- Will producers be able to access up-to-date market and price information?
- How do prices differ between local, national and international markets?
- How do prices vary for different levels of processing, e.g. timber vs. furniture?

Information on prices can be obtained from wholesalers, retailers and industry organizations and trade associations. For example, prices for commodities like coffee and cocoa are published in major newspapers, and for tourism, prices can be ascertained from tourism trade associations or travel agents.

Follow-up

The price data should be used along with potential volume of sales to determine potential revenues (see Step 3.4). If price fluctuations are too great for a specific

product it may be too risky to develop. Whilst decisions over the level of planned processing for a good do not have to be made during project design they should be taken into account.

Value Addition

Farmers and landowners often sell primary products eg fish, wood, fruits etc which then are purchased and processed and eventually reach the market place and sell for many times more than the initial sale price. The producers of the raw material receive only a fraction of the end sale value to which they contribute.

'Value addition' is often proposed to counter the low prices paid for raw materials by traders and middlemen and to capture additional value per unit. Value addition entails performing more processing and/or improving the quality of the product. In the case of coffee, this has led to organic, gourmet and other types of higher-quality coffees. Value can also be added to the product by providing services for which customers might be willing to pay higher prices, such as reliability of supply, branding, special delivery, consistent quality, attractive presentation and product information. There are also options for producers to become involved with activities further up the supply chain such as roasting coffee beans.

Increasing the amount of processing and packing undertaken at the site may help producers recapture some of the value often kept by middle-men and processors. Additionally, the prices of value-added products often fluctuate less. On the flip side, value addition can entail an increase in the complexity of the operation or require more investment, management skills, transportation and marketing expertise and even new institutional structures such as cooperatives to manage these requirements. It may also delay receipt of payment for sales of the product.

The decision to add value needs to be based on market research for each product, the resources available to the business and an analysis of the additional expense and complexity versus the additional anticipated revenue. For instance, market research may well suggest that it is better to pursue a low-risk strategy of selling unfinished products.



Step 2: Assess Access to the Market

Once markets have been identified for products, a strategy to achieve market access has to be developed. Ascertaining whether this can be achieved in a cost-effective manner requires knowing whether current infrastructure levels meet the infrastructure requirements for selling the product. However, access to markets is not just physical. Businesses must also know how to enter markets and deal with purchasers and how to move their products.

Marketing is the key, linking local production with potentially distant markets. Thus the development of a marketing strategy that allows a business to bridge the gap and gain a share of the market is critical to its success and requires attention during the formulation of business development strategies. Rather than marketing products directly, small businesses often employ middlemen to deliver goods to market. This practice, while valuable, can also be costly and thus needs to be assessed.

In general, local markets will be easier to access than national markets, which require more complex business and marketing strategies. A business development strategy should confirm that necessary infrastructure will be in place, identify marketing channels and develop a preliminary marketing strategy.

Step 2.1: Assess Infrastructure Requirements

Business strategies should assess how the distances between suppliers and markets, the condition of the road and the cost of transportation may affect the viability of the product, particularly if it is perishable. The infrastructure needs of a business (roads, shipping, airports and communication systems) should be assessed against existing infrastructure, as most biodiversity conservation projects are in remote areas lacking basic infrastructure.

Where infrastructure is severely lacking, strategies should consider options for outsourcing certain tasks or setting up offices in areas with better market links. This was a successful strategy for a silk-producing project in the Himalayas (see Case Study 4). Because of poor telecommunication links, the business had trouble communicating with customers. Initially, it negotiated with a business centre in a larger town to handle mail and phone calls, but eventually it opened its own sales office there.

Issues to Consider

- Where are potential customers located?
- What infrastructure does the business need to deliver its products?
- Will transportation to the potential customers be timely and affordable?
- Will the provision of vehicles be sufficient to ensure delivery capabilities?

Follow-up

If goods cannot be transported to markets in a cost-effective manner, then either local markets should be targeted or that type of business should not be promoted in the project area.

Case Study 9 Brazil: Non-Timber Forest Products

During the design of a UNDP-GEF-supported project in Brazil, the team tried to develop a strategy for commercializing non-timber forest products. The team identified many natural products useful for medicinal and cosmetic purposes. Expensive chemical analyses were also conducted to identify their proper-

ties. Towards the end of the process, the team realized that the remote location of the project site made it difficult to achieve competitiveness because of the high cost of transport to markets.

Source: UNDP-GEF Project: Promoting Biodiversity Conservation and Sustainable Use in the Frontier Forests of Northwestern Mato Grosso, 1999

Step 2.2: Identify Marketing Channels

Products and services are typically sold through a network of distributors and retailers called 'middlemen'. Middlemen can take on the task of logistics and handling sales with large numbers of customers, activities that an enterprise may find difficult. Many buyers, such as brand-name commodity-based companies, will buy only through reputable middlemen who can guarantee a reliable supply and quality.

The services provided and price paid by the middlemen can make the difference between failure and success of the business. Some middlemen charge extremely high commissions or pay extremely low procurement prices for the products. Small enterprises are often at an inherent disadvantage because middlemen can typically choose from a range of sellers and they often have access to more market information. A small enterprise will be able to sell to fewer middlemen.

Purchasers prefer to work with a business that has an established brand name offering quality, quantity and reliability of supply. End-purchasers are often reluctant to work with small businesses and NGOs because of perceptions that they cannot meet these criteria. Middlemen can thus provide useful and sometimes cost-effective services.

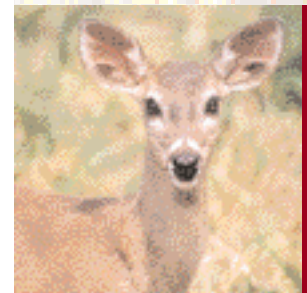
A community business may decide to bypass middlemen and set up its own marketing system to obtain market information and handle sales. The decision should be based on the results of research assessing the service provided by the middlemen versus the going rates and the cost to the business of replacing the existing channels.

Follow-up

The identification of how products are sold to markets and the assessed value of middlemen should inform the development of plans to strengthen or reform the supply chain to create a conducive and efficient enabling environment for small businesses.

Issues to Consider

- Where are the products or services to be sold?
- Who are the different middlemen involved along the marketing channel until the eventual sale of the product and what commissions do they normally charge?
- What services will the middlemen provide?
- Can the enterprise perform those services on its own?
- What are the standards for quality, quantity and packing demanded by the purchasers middlemen and can they be met?



Case Study 10 Venezuela: Marketing Cooperative

A UNDP-GEF project in Venezuela set up a marketing cooperative in response to the low prices being paid to local communities for highly sought after Macaws. By eliminating the middlemen, the cooperative

has greatly increased the returns to the producers. In return the cooperative agreed to limit the number of macaws caught.

Source: UNDP-GEF

40 “Marketing is the process by which the space between the producer and the consumer is bridged.”⁶

Step 2.3: Develop a Preliminary Marketing Strategy

A marketing strategy essentially outlines — who to sell what product to, at what price and how to achieve this. One of the common misconceptions in small businesses is that marketing is of less importance than getting the basic production systems in place. In reality, a marketing strategy is essential to the success of any business. A marketing strategy should be developed after understanding the market and the capabilities of the business. A strategy can also be formulated at a sector level in a given locality.

A strategy should first identify target customer groups. A small enterprise should try to break the market into segments, identify and focus its sales efforts on customer groups that are growing, have low competition and high potential for profits.

For example, a segment of the ecotourism market is 'bird-watching'. Bird-watchers are relatively affluent and like to travel. An ecotourism operation targeted at bird-watchers may be more successful than one that has not defined a target market.

Market segmentation is a useful tool to identify customer group segments and learn about their characteristics. However, information on certain market segments may be difficult to attain.



The marketing strategy should also differentiate the product/service offered by the business from those offered by its competitors, thus avoiding direct competition. Organic or green certification can be a useful differentiating marketing strategy. The products then need to be priced. If certification is to be adopted, the project must make provisions for capacity building and monitoring on the ground to ensure that standards are achieved and sustained.

⁶ Dixie, 1989.

A marketing strategy should also consider arrangements for sale and purchasing of the products such as establishing contracts with purchasers to secure long-term markets.

Finally, marketing should involve an information channel for feedback from the market to the producer. Producers will require clear information on how their markets are evolving in their preferences and prices. Not only must enterprises collect this market information, but they must also be able to evaluate its implications for their business and respond. This will allow producers to adapt production to fit the market and avoid sales collapse from market saturation.

Follow-up

A preliminary marketing strategy will not help determine economic viability of a business but a business development strategy should take account of its goals and resource needs.

Issues to Consider

- What are the different customer group segments?
- What are the characteristics of the various customer group segments (size, growth, preferences, ability to pay, competition)?
- What are the competitors marketing strategies?
- What market niches are currently being targeted by the competitors?
- What will be the quality and characteristics of the product?
- How will customers learn about the product?
- Will it be practical to use special labelling or certification to distinguish the product?

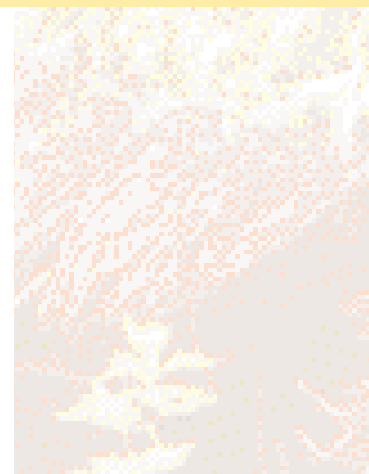


Case Study 11 Brazil: Transforming Production and Marketing Channels

The Centre for Alternative Agriculture (CAA), a Brazilian NGO supported by a grant from the GEF Small Grants Programme in 1996, worked with small local farmers and rural settlers subsisting in the poor semi-arid region in the northern part of the State of Minas Gerais, to form a cooperative to process native fruits for sale. At first the production process was centralized and the farmers and settlers only collected the fruit and transferred it to the CAA factory, maintained by community labour. Now, however, CAA is supporting decentralized processing so that communities retain

control of the finished products. This new decentralized model, which promotes more autonomy and greater productivity (less loss of fruit during transportation, for example), has proven very successful and beneficial to the communities. The initiative now includes 127 families in 36 communities producing 9 tons of fruit pulp for a variety of products such as juice and ice cream. The cooperative is generating close to US\$3,000 a month, distributed among the participants. The expectation is to reach the goal of at least 30 tons of pulp every year

Source: GEF Small Grants Programme, 2002



Market Segmentation

What is market segmentation? Segmentation is a commonly accepted way to divide the market into homogeneous groups that have different buying habits. It is a useful tool to develop marketing strategies and customize product offerings.

Why use market segmentation? Easier marketing: It is easier to address the needs of smaller groups of customers, particularly if they have many characteristics in common (e.g. seek the same benefits, are of same age or gender).

Easier to find niches: Market segmentation helps identify underserved or unserved markets. Using 'niche marketing, segmentation can allow a new company or new product to target less-contested buyers and help a mature product seek new buyers.

Efficient: Market segmentation allows more efficient use of marketing resources by focusing on the best segments for the product/service-product, in terms of price, promotion and place (distribution).

How to segment a market: Almost any demographic, geographic, psychographic or behavioural criterion can be used to classify people into segments. These segments can then be researched to see if the product or service holds a competitive advantage.

Demographic variables: Age, gender, income, ethnicity, marital status, education, occupation, household size, length of residence, type of residence, etc.

Geographic variables: City, state, region, metropolitan or rural location, population density, climate, etc.

Psychographic variables: Attitudes, lifestyle, hobbies, risk aversion, personality traits, leadership traits, magazines read, etc.

Behavioural variables: Brand loyalty, usage level, benefits sought, distribution channels used, reaction to marketing factors, etc.

Source: Adapted from Kotler, 2000

To download "Introduction to Market Segmentation" go to: <http://www.marketsegmentation.co.uk>

Step 3: Estimate Costs, Financing, Revenues and Profits

A business will need to generate sufficient profit so that it can continue to operate and motivate owners, manager and employees to not revert back to their previous environmentally damaging activities. Therefore, project developers need a basic understanding about potential profitability for business ideas before they can develop specific strategies.

Profit is the difference between long-term revenue flows and costs to the business. Project designers should therefore estimate the cost to set up and operate a business and potential revenues. A rough idea about cash flow (revenues minus costs over time) is also useful to ensure that businesses will be able to function and pay for their inputs. Also a business development strategy should plan for financing to cover costs until the business has sufficient internal capital.⁷

When project developers have an understanding of cost requirements and potential revenues from various sectors they can judge how many businesses and what size businesses they should plan to support and how much that support may cost.

Step 3.1: Estimate Initial Capital Investment Costs

A business needs to invest in equipment and other required capital to start and maintain its operations. The amount of investment required to meet the costs of starting the business should be estimated. Lower up-front investment costs is one way to help shorten time needed to pay back loans and reduce risk to the entrepreneurs.

Investment costs include items such as the cost of land, buildings, machinery and vehicles. This could range from purchasing a machete or a sewing machine to constructing a processing plant. Cost estimates will require financial knowledge of the product or service to be produced. Talking to vendors of equipment can inform about approximate costs of equipment. There may be non-financial costs when communities provide assets, such as land, for business start-up. In these cases, even though no financial transaction occurs, such costs should be taken into account.

Follow-up

The initial capital investment cost estimates should be used to: (i) forecast profit; (ii) identify costs that may need to be covered in a small business development strategy; and (iii) indicate the entry cost and hence potential for other local stakeholders to replicate the business models demonstrated in the project. If business start-up costs are high, even though a project can directly support demonstrations, future replication and hence overall impact may be limited.

Issues to Consider

- How large is the expected scale of operations?
- What is the cost of the infrastructure (land, buildings, vehicles etc.) needed?
- What equipment will be needed?
- How much will the equipment cost to purchase?
- How much will training needs of employees cost?

⁷ The overall net present value or an internal rate of return of a business is also helpful but may be too complex to calculate during project design and may only be needed for applications to financial institutions for credit.

Step 3.2: Estimate Ongoing Operational Costs

Once a business is running it will continue to incur a host of regular ongoing costs. Some of these costs will remain fixed and independent of the scale of operations and some will vary.

Fixed costs are the minimum costs of operation and will remain constant even if nothing is produced. These will include rent, insurance, administrative costs and salaries of management and the core workforce.

Variable costs are the costs of the direct inputs required to produce additional units of a product or service, for example, the costs of the raw material, labour and electricity and other inputs used in preparing, packaging and transporting the product. Variable costs will therefore change depending upon the level of business and will increase as the business grows.

For some investments, like equipment and machinery, a fixed portion of their costs are deducted from yearly revenues over a number of years. This calculation is known as depreciation.⁸ Costs also need to include loan repayments and tax charges. An optional cost that should be considered, particularly by businesses in areas of frequently occurring natural disasters, is insurance.

Many of these costs will require low levels of expenditure and will not necessarily significantly influence profits levels. However, they need to be considered during strategy formulation in case they may impose an extraordinary high financial burden on a business or if cumulatively they will outweigh potential revenues and lead to financial losses for a business.

Talking to vendors of equipment can inform about approximate costs of equipment needed after start-up. Labour costs will depend on the local labour market. Communities may provide some labour at no cost, and this should be taken into account even if no financial transaction takes place. The costs of raw materials and prices of other inputs need to also be estimated. The assumptions behind the estimates of all these

variables should be documented. Costs should also include provisions for loss of product from spoilage and pests, which can reduce harvests of even durable items by 25 percent or more. The cost analysis should consider options for reducing costs, such as developing measures to reduce post-harvest losses.

Follow-up

The estimated operational cost data should be considered in addition to the initial investment costs and fed into the profit analysis.

Issues to Consider

- What are the administration, management and marketing costs?
- What is the cost of raw materials required (including packing and labour)?
- What will be the annual rent costs?
- What will be the transportation costs to the potential markets?
- What will be the labour costs?
- What will be the cost of marketing services?
- Will insurance be significant?
- What will be the increased operational costs of increasing the scale of operation?
- To what extent could inflation adversely affect costs?

⁸ Depreciation is a method for a business to gradually account for the costs of the equipment or machinery it has purchased. For example, a refrigerator costs \$5,000 and has an estimated life of 10 years. The business would then write off \$500 each year so equipment could be replaced when its life is over. Depreciation is also a way for a business to lower its tax liability and conserve cash.

Step 3.3: Consider Financing Needs

In determining how to cover business costs, a project must take into account the following four factors: the amount of external financing that will be needed, the form of financing, the cost of financing and who will supply the financing. Lack of available capital to start a business is a common barrier for entrepreneurs. A business will therefore need to obtain external finances to cover costs before the business generates sufficient internal capital. They are thus commonly faced with three options: apply for a loan from a financial institution, seek a partner to provide equity or take a high-interest loan from a money lender in the informal sector.

Loans will have interest charges that will need to be repaid along with the borrowed capital. Subsequent revenues must be sufficient to repay these costs and ongoing costs and still have remaining profit, so loans should be small enough to be paid back. Interest charges should be added to the operational costs in calculating total costs of a business.

Once financing requirements are estimated a business development strategy needs to consider whether existing financial institutions might be a source of credit for start-up operations. Many formal financial institutions will not lend to low-income rural households because of lack of credit history, lack of business experience and lack of collateral; many are also simply not interested in lending small amounts of capital. If there are rural micro-finance institutions nearby, they are more likely to be amenable to and experienced in lending for small business initiatives and providing other useful financial services (such as insurance).

Follow-up

If credit appears scarce, a small business development strategy may need to include the establishment of a local micro-finance institution.

Issues to Consider

- How much of the estimated investment costs needs to be covered by external financing?
- Are there any financial institutions that may be willing to lend to the business?
- Is so, do they have a limit to their loans and what are their loan criteria?
- What will be the interest rates and charges on a loan?



Step 3.4: Estimate Revenues

Revenues are the sum of the number of units sold multiplied by the sale price of each unit. Revenues may be determined between years and during a year. Revenue determination involves estimating the market price for a product and how much of the product can realistically be sold. A preliminary marketing strategy will identify market demand, levels of competition and the quality of the product, hence providing a basis for estimating sale price. The volume of sales also can be estimated from the market analysis. Forecasting revenues must consider not only the sale price and ultimate production levels but also the build-up of production from start-up to full production (which can take years).

Forecasting revenues also involves estimating the likely annual increases in sales once stable production is reached, based on market demand and possible fluctuations to the selling prices of the product.

Evidence from the field indicates that revenue projections are often overly optimistic. Therefore, planners must carefully analyse the assumptions that will influence the revenue projections.

Issues to Consider

- Approximately how many product or service units will be sold?
- What will be the sale price of each unit?
- To what extent is either volume or price expected to vary over time?
- What are the assumptions underlying the future sales and selling price estimates?
- In light of estimated revenues in a sector, what scale of business may be able to be generated?

Short-term problems can occur if revenues are so low that a business cannot maintain a positive cash flow (revenues minus costs over time). A preliminary cash flow analysis will indicate whether business expenses expected to be incurred in one year can be covered by revenues, so that wages and suppliers can be paid in a timely manner. If such expenses cannot be paid, a business might have to halt operations.

Follow-up

Revenue data should be fed into the profit analysis. A small business development strategy should consider how to manage revenue streams that may fluctuate or determine that a business sector may be too risky to develop. The revenue analysis can also be the basis to estimate the scale of business potential for different sectors.

Step 3.5: Forecast Profit

The **profit** is the excess of revenues over costs over time. Forecasting profits provides quantitative evidence of whether a business is likely to be financially viable and will meet the financial needs of a community. Therefore, whilst profits are difficult to forecast during project design, an indication of whether profits will be low, medium, high or negative is essential to justify business support.

Profit can be calculated for the lifetime of a business and on an annual basis. Annual net profit is the annual revenue minus annual operating costs (including annualized depreciation and interest charges) and taxes. Total profit is revenue over the lifetime of the project minus both investment and operating costs. This calculation is complex, involving discounting future net revenues based on the cost of capital. For guidance on this please refer to further reading material in Annex 1.

It is important to recognize that most new businesses may take several years to begin making profits. The duration of this start-up period should not be underestimated. Forecasts of profit should be made for the first three to five years in order to estimate when the firm can expect to recover its costs and begin making profits (after five years, forecasting will be too unpredictable to be a useful tool). This initial phase requires capital inputs to start the business, and revenues start being received only after goods or services are sold. Because cash outlays are greater than cash inflow, this initial period is difficult for low-income workers, who need short-term returns.

Profit forecast should be complemented by a sensitivity ('what if') analysis. A sensitivity analysis involves determining 'what might happen to the business if everything went wrong' and 'how much could be made if everything went perfectly'. A sensitivity analysis is particularly important for small businesses dealing in products that are subject to fluctuations in prices or limited availability or that may be subject to natural disasters. Sales dependent on natural products such as wild resources can be particularly vulnerable to risk, e.g. from unfavourable weather conditions.

Support to small businesses should include a component to monitor how actual performance of business operations compares with projections (a variance analysis). Businesses will therefore need to be able to collect financial and other data to make operational adjustments accordingly.

Follow-up

Any type of business (from hotels to coffee farming), which indicate negative or low profits (which could turn negative under different scenarios), should not be supported, unless there are clear non-economic reasons to pursue it.

Issues to Consider

- How many units of the product need to be sold (or in the case of tourism, the number of visitors), at what price, and how much time will this take, in order to recover the initial investment costs and financing charges?
- Does the business seem likely to attain sufficient revenues to generate a profit and meet the financial needs of the owner and employees?
- How do projected profits compare to profits generated from existing environmentally damaging activities?
- Can a sector be sufficiently profitable to support numerous businesses to create widespread community benefit?

Step 4: Review Management Capacity and Partnership Possibilities

The success of a business is dependent on the people who run it. Most rural communities lack the skills, resources and experience to develop new business. If capacity is found to be limited, a needs assessment should be carried out to identify appropriate training and capacity-building activities to be incorporated into project activities. Small businesses should also explore options to develop strategic partnerships with already established companies to benefit from their expertise and resources. Business development strategies must make provisions for building this capacity, entrepreneurial mindset and partnerships.

Step 4.1: Assess Management Capacity

A variety of capabilities are needed to develop and run a small enterprise. The first step is to assess, with the stakeholders, whether their existing capacity in different areas meets the skills needed by the different business opportunities under consideration. Some of the functional areas in which skills may be needed are:

- Business management
- Entrepreneurial leadership
- Financial planning
- Bookkeeping, accounting and auditing
- Working with financial institutions (for credit and savings)
- Sales and marketing
- Partnership and contract negotiations
- Labour and community relations
- Technical expertise in production and processing

Issues to Consider

- What functional skills are needed to operate a small business in the sector under assessment?
- What relevant skills (management, financial, etc.) are available?
- What training and skill enhancement activities are needed?
- Are there national trade associations or rural development programmes that can provide technical, marketing or financial assistance?
- Could there be value in collaborating with one or more private companies?
- How many people will need to be trained?

These skills take a long time to acquire and it is difficult to transfer skills to communities with little experience. Developing capacity should be viewed as a long-term process throughout the lifetime of a project and beyond. Furthermore, individual household entrepreneurs may find such skills particularly difficult to learn. Capacity can be developed through a mixture of direct training and bringing in expertise from outside the community. Once a

business is running, provisions should be made for ongoing capacity building so the entrepreneurs and workers can learn new skills that may be required as the enterprise develops (e.g. managing a larger labour force or using new equipment).

Follow-up

The findings of this capacity needs assessment should be incorporated into the small business development strategy so that sufficient resources and time are provided for this critical element of business development.

Step 4.2: Consider Partnerships with the Private Sector

Business development strategies should explore options for collaborating with already established companies to take advantage of their experience in production, management, marketing and sales (see Table 2 for the benefits of such partnerships). In the following situations, exploring partnership arrangements is useful:

- If communities wishing to develop businesses have limited or no prior business experience.
- If a business will require a relatively large capital investment to start.
- If a new business can gain services from a company that it would otherwise have to develop on its own at considerable expense and time, such as marketing at national and international levels.

Table 2. Benefits of Partnering an Emergent Small Business with Established Private Sector Operations.

Benefits	Description
Market development	Distribution and retail companies with access to and operations in international markets can provide a sales outlet for products from small businesses. Additionally, companies can use their ties to the marketplace and trade association networks to identify potential buyers for business products. Purchasing companies can provide markets through long-term purchasing contracts, which allow stable income flows for a business. Companies may be interested in order to diversify their product lines.
Financing and Infrastructure development	Companies, if sufficiently interested in a business opportunity, may want to develop their own complementary operations in the project area or become equity partners in a small business. Such commitment could bring with it working capital and investment in infrastructure for production, facilities or access that a small business could not afford.
Commercial expertise	Companies can provide advice on management techniques, commercial possibilities for different products, expected quality, prices, markets, financial planning and marketing strategies. This can be provided as part of training programmes and ongoing advisory services. These may be multinationals looking to develop capacity along the supply chain to improve security of supply.



A Tourism Example

A UNDP-GEF project aimed at strengthening conservation of the Darien National Park in Panama assisted local indigenous communities in developing small ecotourism businesses. The communities realized they could benefit from partnering with a tour operator in the capital. The tour operator had established links to a customer base in the capital city and could promote the area and arrange transportation to bring the customers to the area as part of a tour. The project helped facilitate the development of a partnership between the tour operators based in the capital and these remote community-based ecotourism businesses.

Source: UNDP-GEF

Small business opportunities may also arise indirectly through private sector investments, particularly in the tourism industry. Hotels can hire staff locally and also provide a market for local produce, catering services and handicrafts. Community members can develop small businesses to service this demand (see Case Study 12).

Case Study 12 Madagascar: Hotel Employment Opportunities

In Anjozorobe, Madagascar NGOs have been helping a hotel implement ecotourism projects to assist community development, but revenue generated directly to the community has been insufficient to alter its forest use patterns. However, spin-off businesses have developed between the community and the hotels. Guests at the

hotel started purchasing local products and creating new markets. As word of mouth spread via guests, hotels and shops in other regions of the country now demand the products. This has had a greater impact on community development.

Source: Rajaobalina, Fanamby (a national NGO) 2002

Working with companies can be risky for a community. Most companies will try to maximise their profit in ways that could conflict with community interests. The companies may try to negotiate to reduce community benefit or act in a culturally insensitive manner. To ensure maximum benefit from a partnership, communities need support to prepare for negotiations and agreements with companies and then be able to work alongside them (see Case Study 13).

Case Study 13 Namibia: Investment Competition Increases Community Income

In Namibia, a community supported by a conservation project invited companies to bid on building and operating an eco-lodge in its territory. A previous, unsolicited investment proposal would have earned the community only \$11,000 per annum and would not have created any full-time jobs. After having gone through an investment solicitation process, the community was able

to sign a contract that is projected to earn it nearly \$142,000 in revenue-sharing income (once the lodge is fully operational) and will create 14 full-time jobs. Plus, the developer will provide one full-time management- or tourism-related scholarship and, after the 15-year lease is up, the community will earn a 25 percent equity stake in the business.

Source: Callihan, 2001

Partnerships between small businesses and larger companies can be formal or informal and can include the following types of arrangements:

- A company could develop a joint venture with a small business, taking an equity stake.
- A company could agree to a long-term purchasing contract from a small business (see Case Study 14).
- A company can be contracted on an ongoing basis through a concession to provide restaurant and catering services in a community-managed area, whereby it either shares revenues or keeps revenues but pays for the entitlement.
- A company can be subcontracted and paid to perform a one-off discrete set of functions, such as running a marketing campaign or constructing a building.
- A company could agree to provide technical and commercial advice on an ad-hoc basis to community-based businesses for good public relations and improving its security of supply.

Each of these agreements will require small businesses to identify potential partners and negotiate terms and conditions for a contractual arrangement. The arrangement may not be formal but will still require thought and planning to reduce risks. The managers of the small businesses should be trained in negotiation skills and provided with background on types of contracts possible so they understand the potential options and how best to construct and negotiate them.

Follow-up

If small businesses can benefit from partnerships with already-established companies, a business development strategy should include provisions for enabling the small businesses to develop private sector partnerships.

Issues to Consider

- What resources could a company bring to a small business?
- Would bringing in a company as a partner address weaknesses in a small business?
- Are there any national companies interested in working with and supporting small community-based business?
- What type of company would be the best type of partner — multinational, national, local?
- What type of working relationship with a company would best suit a small business, e.g. through a subcontract or as an equity partner?
- What skills training will be needed to enable the enterprise to contact and negotiate with a company?

Case Study 14 Kenya: Long-term Product Purchasing Contracts between Communities and Private Sector

The Kenyan NGO, Christian Community Services, works with local farmer groups around Mount Kenya National Park to produce quality honey for commerce while protecting species-rich natural areas in Kenya from overuse and encroachment.

Supported by a US\$50,000 grant from the GEF Small Grants Programme (SGP), the NGO trains the farmers for bee-keeping and loans hives and bee-keeping gear. It also helps farmers select locations in local forests for the hives that deter poachers and loggers, and works with villagers to plant tree nurseries for enrichment planting. To secure a market for the honey produced by the farmers, SGP contacted Honey Care Africa Ltd., a well-known, small, locally owned private company committed to the Triple Bottom Line and fair trade.

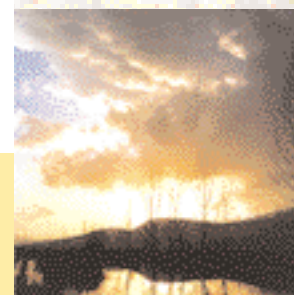
Honey Care now works closely with the farmers, providing them with extension services and buying their honey at a mutually agreed and guaranteed price. Each farmer runs four hives, which in optimal situations produce approximately 200 kg of honey per annum and for which Honey Care pays the farmer between \$200–255.

On the agreed day, farmers bring their full boxes of honey to an agreed-upon collection centre close to their farm or village. The honey is then weighed. This entire process is carried out in full view of the farmers as well

as a representative of the NGO. The farmers are then paid cash on-the-spot for their honey as per the price agreed and stipulated in their contracts with Honey Care. If any deductions are to be made (for example, a loan repayment to the NGO who provided the farmer with a loan for the hives), this deduction is made from the payment to the farmer. The farmer is issued with a 'Goods Received Note' (GRN), clearly recording the transactions. The farmer then signs the GRN (in triplicate) to verify that the information is correct and that she or he has been paid and is given a copy of the GRN. Honey Care retains the two other copies of the GRN for its own accounting and administrative purposes. All the payments to the farmers are made only by Honey Care's operations manager only are given directly to the farmer. This procedure prevents any impropriety whatsoever and ensures that the farmers receive full payment for their produce directly from Honey Care.

This strategic alliance between a private enterprise and local communities demonstrates that well-constructed partnerships with the private sector can provide low-income farmers with products to sell, an opportunity for steady, guaranteed income, which can make the difference between living above or below the poverty line.

Source: GEF Small Grants Programme, 2001



Environmental Assessment

Purpose and Nature of an Environmental Assessment

In addition to generating biodiversity conservation benefits small businesses should have no significant negative environmental impacts. Therefore, to identify and avoid such impacts and to develop measures for sustainable use, a business strategy must consider the life cycle of the potential product or service.

Sustainable use requires careful selection of species, resources and sites as well as techniques of use or harvesting based on carrying capacity. Indirect impacts from wastes or immigration can also be significant and should be assessed. As an integral part of sustainable use, monitoring will assess the impact of use and permit adjustment of resource use. There are two steps to this assessment:

Step 1: Identify the carrying capacity of the resource.

Step 2: Assess potential impacts resulting from business development.



Step 1: Identify the Carrying Capacity of the Resource

Exploitation of a resource must not exceed the estimated carrying capacity limits of the ecosystem or species. The environmental assessment must first determine the abundance and distribution of the species, its ecological needs and characteristics of the sites. It is important to note that carrying capacity can fluctuate widely on a yearly basis because of environmental factors and it varies with the type of resource extraction practices and harvesting techniques used. Thus, the level of sustainable use will depend on the sensitivity of the ecosystem and the type of activity. These issues also need to be considered for tourism activities.

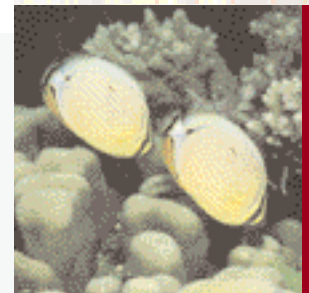
If the natural resource to be commercialized is ecologically sensitive, costs of production may be too high or sales may have to be limited. Therefore, the ecological needs and regeneration rate of the resource should be identified and appropriate harvesting techniques assessed and costed. It should also be noted that in the field it is difficult to determine carrying capacity without long-term monitoring and research into the population dynamics of the resource.

Follow-up

If the findings from the carrying capacity assessment indicate that the natural resource can be ecologically sustained and still profitably commercialized, then provisions for its sustainable use should be made in the business development strategy.

Issues to Consider

- What are the biological resources (species or habitats) to be used?
- Do they have any specific ecological sensitivities?
- What are the regeneration characteristics of the biological resources?
- Can they be commercially harvested in a sustainable manner?
- What sustainable use practices will be employed (e.g. harvesting technique or ecotourism activities)?
- What are the indicators that point toward the health of the ecosystem?
- Can the resource be cultivated?



Case Study 15 Peru: Ecotourism and the Manu Biosphere

The carrying capacity of the Manu Biosphere reserve in Peru has been estimated at 2,000 tourists a year. However, 3,000 tourists were expected to visit the reserve

in the year 2000. In order to reduce the number of tourists, the Manu Management plan proposes to divert visitors to adjacent protected areas. *Source: UNDP-GEF*

Step 2: Assess Potential Impacts Resulting from Business Development

A small business can also directly affect the biological resources and local environment by generating wastes or indirectly affect it by building roads and infrastructure that might encourage immigration or make extraction of biological resources easier. Ecotourism operations, for example, often require firewood, building materials or agricultural products that deplete biological resources. Another activity, mariculture, is increasingly proposed, but its environmental impacts are uncertain and need to be carefully monitored. All potential impacts generated by the economic activity, from extraction of raw material to delivery to market, should be identified and assessed by using baseline data.

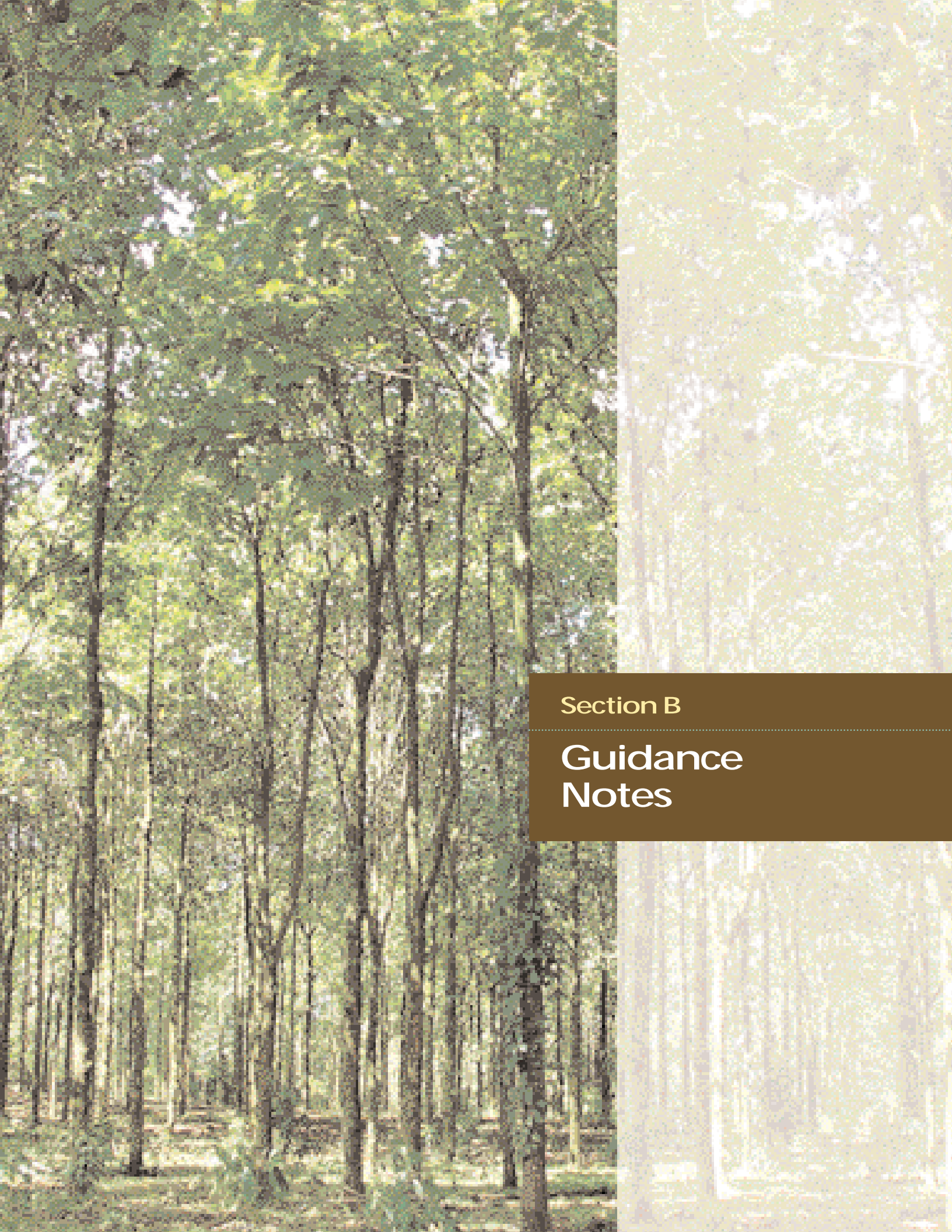
Issues to Consider

- Will the business produce any wastes or pollution or require inputs that deplete biological resources?
- How will overharvesting be regulated?
- What direct and indirect impacts could result from the proposed activity on the natural resource base?
- How can these direct impacts be managed or mitigated?
- Will increased wealth within the communities have an impact on resource use patterns?
- Is the resulting impact acceptable?

A business strategy should also include feasible and cost-effective mitigation measures to reduce potentially significant adverse environmental impacts to acceptable levels. Alternative designs (e.g. different scales or means of production) should also be assessed to reduce impacts. Any residual negative impacts that cannot be mitigated should be identified and compensation measures offered. Decisions then need to be made as to whether the resulting impact is acceptable and which project design is most appropriate.

Follow-up

Plans for environmental impact assessment and resulting mitigation measures as well as mechanisms for ongoing environmental monitoring and management of the businesses should be incorporated into the business development strategies.



Section B

Guidance Notes

The purpose of these guidance notes is to provide sector-specific examples of the generic issues introduced in multidisciplinary assessments in **Section A**. The two sectors worked through in this section are ecotourism and non-timber forest products. In each guidance note the issues raised in **Section A** are tailored to be relevant for each sector to illustrate the types of questions project developers should be asking and addressing whilst formulating small business development strategies for either ecotourism or a non-timber forest product. Project developers should learn from this exercise how to tailor the generic issues in **Section A** to any other economic sector that they believe may be worth supporting.

The guidance note for ecotourism also includes a case study of a UNDP-GEF-supported project promoting ecotourism development to further illustrate the data-gathering requirements for project design. It provides an excellent opportunity to see how a project investigated and addressed key issues for ecotourism development during project design and implementation.



Guidance Note 1: Ecotourism

In many instances, within UNDP-GEF biodiversity conservation projects, tourism ventures either did not attract any tourists or caused serious negative sociocultural and sometimes environmental impacts. Pre-feasibility studies can avoid such negative outcomes. The following main questions within the conservation, sustainable livelihoods, economic and environmental assessments will help determine whether ecotourism is a worthy and viable option for a proposed project:

Conservation Assessment

Assess the linkage between biodiversity conservation and ecotourism development.

1. What is the biodiversity and ecosystem to be protected?
2. What are the threats to the ecosystem?
3. How will an ecotourism business reduce those threats?
4. Could the tourism activities have the potential to raise the economic value of the intact ecosystem so that it is greater than the economic value derived from its exploitation, thus motivating local communities to protect the ecosystem and its biodiversity?
5. To what extent will the tourism activities reduce local economic dependence on extraction of natural resources?
6. Who will be engaged in the tourism activities and are they the persons currently damaging the biodiversity?
7. What is the evidence that engagement in the ecotourism sector will divert sufficient labour away from activities that are damaging biodiversity?

Sustainable Livelihood Assessment

Determine a community's level of interest, needs and commitment to developing ecotourism businesses.

1. Are local communities prioritizing tourism and, specifically, ecotourism as an economic priority for their development?
2. How would ecotourism businesses integrate into the lives of local communities?
3. Is there a risk that tourists could negatively impact and erode the local culture?
4. Will economic benefits be distributed so that there will be widespread community benefit from visitors (e.g. through homestays, tourism fees and funds) or will benefits be channelled to only a few people, thus increasing income disparities within or between communities?
5. Will local stakeholders be able to influence and manage visitor impact?



Economic Assessment

Step 1: Assess Market Potential⁹

1. What is the number of possible visitors to the project area? A variety of factors can affect the number of visitors and their level of spending:

- Is there a natural asset that will attract visitors?
- Are the project area's natural assets well known in the country or internationally?
- Is there a high level of competition within the country from other ecotourism attractions?
- How does the site compare with other visitor sites in the country/region?
- Does the project area already receive tourists? If so, how many?
- Is the project area on or near an established tourist route or site, and if so, frequented by how many tourists?
- What is the country's reputation internationally? Is it viewed as safe, attractive, friendly or efficient?
- Are there any major reasons to deter tourists – civil strife or disease?
- How does the cost of living compare with other countries in the region?
- How easy is it to fly into the country? Are there scheduled airlines, visa restrictions, costly tickets?
- How far is the project from the capital city or the nearest airport? What method of transportation exists, and what is its quality?
- Can locals speak English or other European languages?
- What type of visitor will be interested in the site (high disposable income, backpacker)?
- Are there existing ecotourism operators in the area, indicating market demand (but also competition)? If so, what do they offer?
- What level of infrastructure is already in place (accommodation, restaurants, clean water, toilets, transportation, maps)?
- What activities and services could be offered to the visitors (e.g. diving or bird-watching) and for how many days could a tourist be entertained?
- Are any tour companies interested in partnering with the local communities to bring in tourists and perhaps invest in infrastructure (lodges, trails etc.)?
- Is the government promoting tourism or ecotourism in the project area?

2. What is the likelihood that tourists will suddenly stop coming to the proposed tourism areas e.g. because of political or economic crises in the country?

⁹ Data gathering during Step 1 should include extensive consultations with national and international tour operators.

Step 2: Assess Access to the Market¹⁰

1. What infrastructure investment will be required so that tourists can affordably visit the site?
2. To what extent are local, national or international tour operators interested in partnering with the local communities to bring in tourists?
3. Are there any other well-known sites nearby that may already be attracting tourists?
4. To what extent will the businesses have the ability to promote the destination, facilities and services in the national and international marketplace?

Step 3: Estimate Costs, Revenues and Profits

1. How much time and money will visitors spend in the project area?
(This will depend on the types and quality of services offered and local pricing for accommodation and services of similar quality).
2. What is the estimated cost to market the area and facilities to attract sufficient numbers of tourists?
3. What are the other major costs required to start local ecotourism businesses?
4. How much income will be generated from the tourists and how does this compare with current income levels?
5. Will seasonal variations in visitor numbers negatively affect revenue flow?
6. How many visitors are needed to pay off the investment costs?
7. How many years will it take for proposed ecotourism ventures to be financially sustainable?

Step 4: Review Management Capacity and Partnership Possibilities

1. Do local communities have experience in the tourism sector or in starting businesses?
2. Will the business staff have a suitable attitude and language skills to manage the tourists?
3. Would the business benefit from partnering with one or more private tour operators from outside the project area to assist with marketing, bringing in tourists, transportation etc?



¹⁰ Data gathering during Step 2 should include extensive consultations with national and international tour operators.

Environment Assessment

1. What will be the environmental impact from constructing tourism facilities (hotels, trails, roads, jetties, airstrips or restaurants)?
2. How will solid waste be managed?
3. How will additional energy be provided?
4. Will infrastructure and transportation add to pollution (e.g. diesel from boats)?
5. How will these impacts be reduced or mitigated?
6. What is the maximum number of visitors the tourism site can handle over time and how does this compare with project estimates?

Ecotourism Business: A Full Length Case Study

Landscape-scale Conservation of Endangered Tiger and Rhinoceros Populations in and around Chitwan National Park, Nepal¹¹

This is a case study of how a UNDP-GEF-supported project assessed, designed and started to implement strategies for small, community-based, ecotourism business development.¹² The case study illustrates:

- the complexity of developing ecotourism businesses for conservation;
- how the extent of research during project design and the quality of a business development strategy will directly affect the effectiveness of project implementation and hence the importance for project designers to undertake the assessments laid out in Section A; and
- that a business strategy will need to be adjusted and further developed based on new information and events arising during project implementation.

Conservation Assessment

The project goal is to increase the habitat for wildlife, particularly tigers and rhinos, in the Royal Chitwan National Park (RCNP) by managing Barandabhar Forest, the last remaining corridor of forest connecting the park to preserved upland habitat in a nearby mountain range. Threats to the Barandabhar Forest Corridor include:

- **Poaching.** This is mainly by non-local people.
- **Encroachment.** Farmers continue to expand agricultural practices at either side of the forest, gradually reducing its width.
- **Natural resource extraction.** Local communities rely heavily on the forest to provide fodder for livestock and fuelwood for their energy needs. Traditionally, communities graze their livestock in the forest on a daily basis, preventing natural regeneration of grassland and vegetation.

¹¹ This UNDP-GEF-supported project started in 2001, with planned termination in 2004.

¹² This is based on a case study by A. Bovarnick for a GEF study on Financial Arrangements for Sustainability of Biodiversity Resources, 2002.

A key project strategy was to increase the economic interest of communities living adjacent to the forest in protecting the wildlife; to generate capital for community development projects such as roads and conservation initiatives; and to generate capital for communities to purchase resources instead of having to collect them directly from the forest. Ecotourism was viewed as particularly advantageous as its income was partly dependent on the existence of wildlife, hence wildlife would become an economic asset rather than an economic liability (by damaging crops). However, no comparative income analysis was carried out beforehand to verify the robustness of these assumptions.

To engage the persons damaging the forest biodiversity, the project was designed to target the 14 communities living adjacent to the forest corridor. These are the prime users of the forest. However, planners did not determine how many of the 14 communities living alongside the forest corridor the project would support to develop ecotourism businesses. During project implementation it has become apparent that the ecotourism business will not become large enough to divert a significant number of laborers away from agricultural and forest extraction activities. These activities will therefore continue to put pressure on the remaining habitat. Furthermore, tourism revenues were not expected to outweigh income from illegal poaching.

It was therefore determined that a small business development strategy to alter economic behaviour was needed, to be supplemented by a set of regulations to manage use of forest resources and by other measures to control poaching.

Sustainable Livelihoods Assessment

In conjunction with many of the communities in the project area, the project team undertook a sustainable livelihoods assessment. The communities identified the development of health services, energy supply, livestock management, education and additional sources of income generation as priorities. Initial scoping for income-generating activities identified ecotourism, producing honey and growing fruit and vegetables. The project preparation team specifically encouraged a diversity of small business opportunities so that local communities would not become too dependent on income from tourism.

One concern during project preparation was that most economic benefit from ecotourism would accrue to the already established hotels in the nearby towns, which offer day trips and collect fees directly from tourists. The communities and project team therefore decided to develop community-based tourism, to ensure that communities can control visitation to their forest territories and can collect fees directly from visitors. During project implementation the project team started working with the communities to set up management mechanisms for the collected fees so that the economic benefits from ecotourism would be distributed equitably to community members.

Whilst not considered during project design, the potential for tourism to erode local culture has become apparent during project implementation (through an influx of backpackers). This will be a problem particularly if numbers of visitors increase significantly, but there are currently no mechanisms or plans to avoid, manage or mitigate these potential negative social impacts.



Step 1: Assess Market Potential

Prior to the project, the forest corridor was receiving only a handful of tourists and these were not paying to visit the area. During project design the team determined the area to be highly attractive for ecotourism, largely because it is habitat for world-famous, charismatic rhinoceros and tiger species. The forest corridor is next to the Royal Chitwan National Park (RCNP), which is one of the best sites in the region to view large and endangered wildlife and receives 100,000 visitors per year. Although the forest corridor itself is degraded, community-managed secondary forest patches are regrowing and now contain rhinos for viewing.



Local infrastructure in the area includes roads and many hotels and restaurants catering to all price levels. The RCNP has offices and interpretation centres. However, before the project began, the local communities essentially lacked infrastructure for receiving tourists. One of the communities in the forest corridor has since built a wildlife viewing station, which has two bedrooms for an overnight stay.

The project has not yet estimated the number of possible visitors to the project area. However, a quick assessment could have been carried out as follows. The RCNP receives 100,000 per year. Of these, half stay in RCNP and half stay in the hotels in the

nearby towns. Those staying in RCNP are not likely to visit the corridor. Of the 50,000 staying in the hotels many, perhaps 20 percent, might visit the corridor. It is likely that one-third to one-half of the 14 communities will develop ecotourism and thus could expect 1,500 to 2,000 tourists annually. Whilst these numbers are highly elastic with wide margins for error, they can provide a basis for planning and thinking about the scale of budget and support a project will need to provide during implementation.

Surveys during project implementation found visitors only spend an average of two days in the Chitwan area. Visitation to the community-owned forests is only a part of this and usually only a few hours for an elephant ride. This can double if visitors also take a canoe ride. The project is now planning a trekking route, which would promote overnight stay in the corridor. Pristine wetlands within the forest corridor provide opportunities for bird-watching, an activity the project is investigating.

Market size could also increase if the government actively promoted the area and stimulated ecotourism. The project had not considered the role of government in local ecotourism development. To promote tourism effectively, the project will have to allocate more resources to motivate the government to introduce measures, which will promote ecotourism in the region.

During project design ecotourism appeared a stable and low-risk venture, as Nepal historically was safe. However, civil strife in Nepal in 2002 caused tourist visitation

to decline by 50 percent. These events demonstrate that external factors influencing levels of tourism and hence changes to market size are difficult to predict. This sudden change also validated the approach taken during project design to diversify income opportunities and not rely too heavily on the development of ecotourism.

Step 2: Assess Access to the Market

An assessment made during project design concluded that the area would be accessible to tourists. There is a local airport with several flights daily to the capital, Kathmandu, and roads connect the forest communities to the nearby towns. However, the communities lack vehicles to transport tourists staying in the nearby towns to their communities and the forest corridor, and now must rely on the hotels and tour operators to bring tourists to their sites.

The project designers failed to consult with tour operators to see if they viewed the community forests as a tourist attraction to which they would be willing to bring tourists; however, consultations with tour operators during the implementation phase are slowly starting and the initial signs are positive. Some hotels already bring tourists to the community forests for elephant rides, but no specific partnerships have yet been developed.

Project designers also did not consider how the communities would market their forests to tourists. This is now being considered during project implementation, particularly the possibilities to partner with local hotels and tour operators. Because tourists already come to the area, however, marketing locally should not be expensive or too complicated. The project will have to build the capacity of the local communities so that they better understand the needs of the tourists and how to inform the tourists of the community forests' attractions.

Step 3: Estimate Costs, Revenues and Profits

The assessment of market potential estimated visitation rates of 10,000 per year. Entrance fees to the community forest are US\$0.5 and canoe rides are US\$2. The project assumes that 5 percent of visitors to the community forests will go on canoe rides. Therefore, the communities might expect US\$6,000 per year in revenue. This would be split among participating communities and then among members of each community. Whilst the per capita amounts are small, these communities are mainly subsistence-based and hence any cash is extremely valuable, particularly as seed capital for further business development or purchasing domestic necessities. Furthermore, investment costs are low. The pilot community has only an entrance hut to the forest, a few elephants and a viewing tower, which was financed by a donor project and therefore does not represent debt to the communities. Costs for these assets will easily be repaid and revenues quickly channelled back to the community.

During the year, the visitor flow and hence revenues will vary seasonally. The project is thus assisting the communities in developing savings mechanisms. These will allow income from tourism to be saved and channelled into other micro-businesses, which can then generate income throughout the year. The pilot community has also set up a management board, which manages and distributes profits fairly among the community. The community has determined that profits would go into a micro-lending programme to support alternative businesses.



The above analysis indicates that the community-based ecotourism business will be financially sustainable after a few years of set-up time. This conclusion, however, is based upon the assumption that the national civil strife will not cause tourist visitation rates to fall dramatically over the long term.

Step 4: Review Management Capacity and Partnership Possibilities

Before the project began, the communities had not been engaged with tourism, so they had no skills relevant to managing visitors. However, one or two community members had acted as guides in the RCNP and others were experienced elephant drivers. Furthermore, local people have a good attitude for hosting visitors. Project designers therefore determined that it was feasible to build local capacity for managing tourists. Many, though, will need training in English, but training programmes were not proposed during project design. As a result, capacity building has been carried out in a limited and non-strategic manner amongst the forest communities.

During project implementation, the communities have begun to recognise the potential value of partnering with private tour operators from outside the project area to assist with marketing and transportation. This partnership is taking a long time to explore and develop and should have been considered during project design.

Environmental Assessment

The infrastructure for tourism could harm forest habitats if it is constructed in certain places. Even medium volumes of tourists may cause an assortment of impacts. Additional energy will not be required as all transportation of tourists is by elephant or canoe, and accommodation is mostly in hotels in the nearby town. Solid waste will need to be monitored and managed. The wetland area within the forest corridor will be particularly sensitive to development. Any motorised boats introduced to the wetland sites could cause water and noise pollution and disturb fragile bird nesting and feeding habitats. However, neither during project design nor in project implementation to date have any strategies been devised to prevent or mitigate these

potential impacts. This oversight could create a risk not only to the environment but also to the sustainability of this business, and will need to be addressed.



Guidance Note 2: Non-Timber Forest Products

The following assessment should be used as a basis for a pre-feasibility study to determine whether developing small businesses to sell non-timber forest products (NTFPs) found in habitats targeted for conservation is a viable option for a proposed project.

Conservation Assessment

Assess the linkage between the conservation of biodiversity and the development of businesses based on NTFPs.

1. What ecosystem and species are to be protected?
2. What are the threats to the ecosystem?
3. How will the collection and sale of one or more NTFPs reduce those threats (e.g. divert labour, raise the economic value of the ecosystem, reduce economic dependence on extraction of other natural resources, particularly forests)?
4. Will sales of the NTFPs raise sufficient income for local communities so that they protect the ecosystem?
5. Will sales of the NTFPs benefit enough stakeholders to reduce overall resource extraction to sustainable levels?

Sustainable Livelihoods Assessment

Assess the community's needs and its interest in and commitment to developing a business based on NTFPs.

1. Was NTFP commercialization identified by the local communities as a priority for economic development?
2. What are the traditional uses of the forest and the NTFPs?
3. How can the maximum number of local stakeholders benefit from developing business from NTFPs?
4. Will NTFP commercialisation lead to conflicts over land use?

Economic Assessment

Step 1: Assessing Market Potential

1. What commercially viable wild resources exist in the project area?
2. In what ways are these resources already used by the locals, in either a subsistence or a commercial manner?
3. How do the quantities and quality compare with other sites in the country/region?



4. What is the projected volume of sales based on different investment scenarios?
5. Are many similar production activities (e.g. honey production) trying to access the market?
6. What are the basic barriers to commercialisation of the resources?
7. What is the likelihood of a future market saturation or collapse?

Step 2: Accessing the Market

1. What marketing is needed to sell the resources nationally or internationally and how much will it cost?
2. Will the business have sufficient marketing capabilities to brand its products and gain market share?
3. Can quantities of the NTFP be sufficient to satisfy purchasers?
4. How far is the project from the capital city or the nearest market and what type and quality of transportation exists?
5. What are the infrastructure investment needs within and outside of the project area to allow sale of resources?
6. How easy is will it be to fly the NTFPs out the country? Are their scheduled airlines, high costs for air freight, refrigeration?
7. Can storage facilities be used to regulate sale to markets?
8. Will product branding and/or certification be needed?

Step 3: Estimate Costs, Revenues and Profits

1. How much income are the sales likely to generate?
2. How much will equipment needed to collect the resources cost?
3. How much will transportation of resources to market cost?
4. Will a loan be needed?
5. What are the options for distribution of income within the local communities?
6. How will the communities be affected if the market fails and revenues are temporarily halted?



Step 4: Assess Management Capacity and Partnership Possibilities

1. To what extent are the communities engaged in a cash economy?
2. Do local communities have experience in setting up a business or selling wild resources?
3. Do they need to partner with private purchasers from outside the project area to act as marketing middlemen, particularly for sale of NTFPs to distant markets?

Environmental Assessment

1. What will be the environmental impact from collecting wild resources or cultivating them?
2. Will infrastructure and transportation of NTFPs to market add to pollution?
3. How will these impacts be avoided or mitigated?
4. What is the maximum rate at which the wild resources can be collected sustainably?

Cultivation versus Collection: An Example with Medicinal Plants

When medicinal plants are found wild in a habitat deemed to be of global biodiversity importance, projects have three options for promoting the supply of medicinal plants to increase commercialization:

- (1) the communities can continue to collect the plants growing wild in the habitat targeted for protection;
- (2) they can cultivate the plants ex-situ; or
- (3) they can combine both approaches.

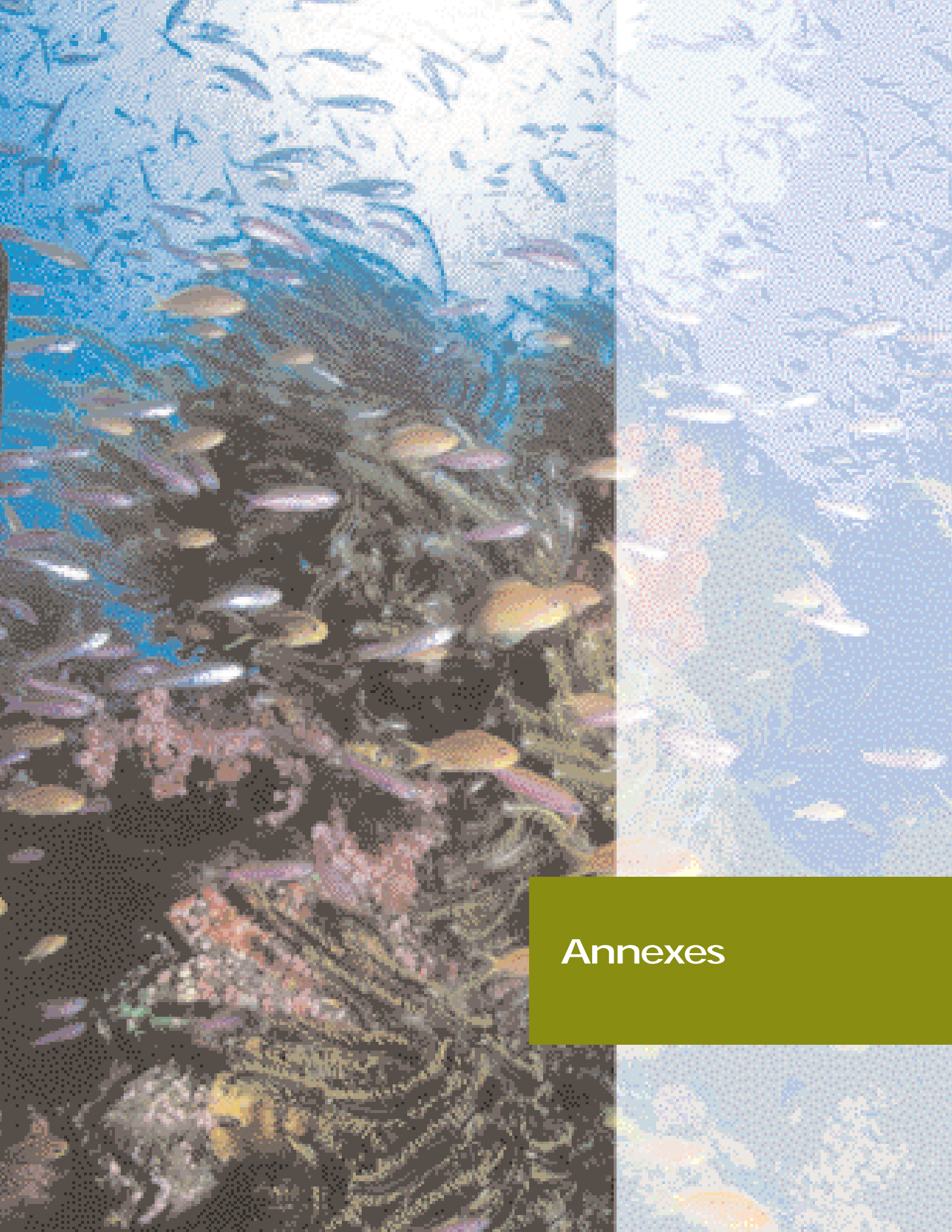
Each approach has advantages and disadvantages (see Table 3).



Table 3 Advantages and Disadvantages of cultivation versus collection.

Cultivation	In-Situ Collection	Combined Approach
<p>Advantages Can be a way of adding value to biological resources, and raising income levels without increasing environmental damage.</p> <p>If viable, can be a quid pro quo for local communities who agree to reduce existing damaging activities.</p> <p>Can be cost competitive with collection if cultivated product is of similar quality and wild resources are scarce.</p> <p>Is in line with arguments that 'intensification' benefits conservation.</p>	<p>Advantages Helps raise awareness amongst local communities of the ecological dependence of a species on its habitat, thus increasing the economic value in habitat and providing greater (but not necessarily sufficient) incentive to conserve the habitat itself.</p> <p>Is the only grow alternative for wild species that cannot be cultivated.</p> <p>Retains genetic characteristic that may be lost by cultivation.</p> <p>Is often more compatible with indigenous people's ways of life and existing knowledge.</p>	<p>Advantages May be necessary where there are multiple threats to biodiversity and neither cultivation nor sustainable collection by itself is sufficient.</p> <p>Can satisfy varying preferences of stakeholders, as some may prefer to continue with in-situ collection whilst more entrepreneurial ones may wish to commercialize through cultivation.</p> <p>Can increase combined total production (for products in high demand) and generate more income for local communities.</p> <p>Can be used for a gradual transition from wild to cultivated production if protection regimes become stricter or carrying capacity can no longer support wild harvesting.</p> <p>Is better able to survive economic change because strategy is diverse.</p>
<p>Disadvantages De-links alternative livelihood from conservation issue, unless cultivated species are endangered.</p> <p>Requires land already converted or degraded.</p> <p>Can have high set-up costs (compared with wild collection).</p> <p>Reduces the capacity for opportunism and response to changing economic climate (since investments are fixed).</p> <p>May require learning new information and adopting new ways of thinking by local communities.</p> <p>May be socially unacceptable, or may not suitably complement existing ways of life.</p> <p>May result in loss of useful genetic characteristic of wild species.</p>	<p>Can be done part-time, or seasonally to accommodate other forms of income generation.</p> <p>Requires low investment costs.</p> <p>Can be useful marketing strategy.</p> <hr/> <p>Disadvantages Is difficult to regulate (collection practices and sustainable harvest levels).</p> <p>Cannot guarantee product of consistent quality.</p> <p>Cannot guarantee quantity of supply.</p> <p>May yield profits insufficient for competing with alternative, and more damaging, land uses.</p>	<hr/> <p>Disadvantages Unnecessarily complicates project design unless combined approach is necessary for conservation.</p>

Source: UNDP-GEF



Annexes

Useful Toolkits, Publications and Websites for Project Developers

Agricultural Business Development

The Guide to Developing Agricultural Markets and Agro-Enterprises, World Bank
http://lnweb18.worldbank.org/essd/essd.nsf/Agroenterprise/agro_guide

A resource on agribusiness issues.

Business Planning

Small Business Resource Guide, U.S. Small Business Administration
 Available at the U.S. Business Administration website:
www.sbaonline.sba.gov/starting/startup.pdf

A guide to starting a small business. Includes information on writing a business plan, financing a business, writing a loan proposal.

The Business Plan, U.S. Small Business Administration
 Available through the U.S. Small Business Administration website:
www.sbaonline.sba.gov/classroom/pplan914.html.
 Also available in Spanish at: www.sbaonline.sba.gov/classroom/sp_bplan.html

A business plan guide including a sample business plan.

Business Planning for Environmental Enterprises: A Manual for Technical Staff,
 Edward Millard, Conservation International
 Available from Conservation International, Washington, D.C.

The purpose of the manual is to strengthen the use of good business practices in the field of environmental enterprise development. It provide guidance for enterprise development by presenting the business planning process for new and existing small-scale enterprises.

The Successful Business Plan: Secrets and Strategies, Rhonda M. Abrams
 and Edward Kleiner
 Available in bookstores. A business planning guidebook.

Conservation Enterprises

Conservation Enterprise Literature Review, Biodiversity Conservation Network
<http://www.bcnet.org/bsp/bcn/learning/biblio/bib.htm>

Provides an extensive bibliography on literature for bioprospecting, hunting, ecotourism, extractive reserves, forest products and sustainable agriculture.

Ecological Assessment

Sustainable Harvest of Non-timber Plant Products in Tropical Moist Forests: An Ecological Primer; Charles M. Peters

Available at Biodiversity Support Programme website:
www.bsponline.org/bsp/publications

Written for NGOs, entrepreneurs and organizations promoting the extraction of NTFPs. A strategy for managing NTFPs on a sustained yield basis is outlined and procedures for selecting resources, collecting baseline data and monitoring the impact of harvesting are described.

Ecotourism

The Ecotourism Planning Kit: A Business Planning Kit for Ecotourism Operators,

Sherry M. Bushnell

Available at the Pacific Business Center, University of Hawaii, website:
www.cba.hawaii.edu/pbcp/ecokit.htm

Highly recommended. Detailed business planning guide for ecotourism operators. A little U.S.-centric, but highly useful. Runs through business plan development, market research and financial planning.

Ecotourism and Private Sector Partnerships

Getting the Lion's Share from Tourism: Private Sector-Community Partnerships in Namibia, 2 volumes, Dilys Roe, Maryanne Grieg-Gran, Wouter Schalken, International Institute for Environment and Development (IIED) in association with Namibia Community Based Tourism Association (NACOBTA)

Available from IIED. To order by email: mailbox@iied.org

Or to download PDF: <http://www.iied.org/pdf/Namibia-vol1.pdf>
<http://www.iied.org/pdf/Namibia-vol2lo.pdf>

Volume I contains case studies and issues for considering and developing partnerships between communities and private sector in ecotourism.

Volume II contains practical guidelines and recommendations for both communities and private sector for the development of partnerships, based on the Namibian experiences, but with broader application.

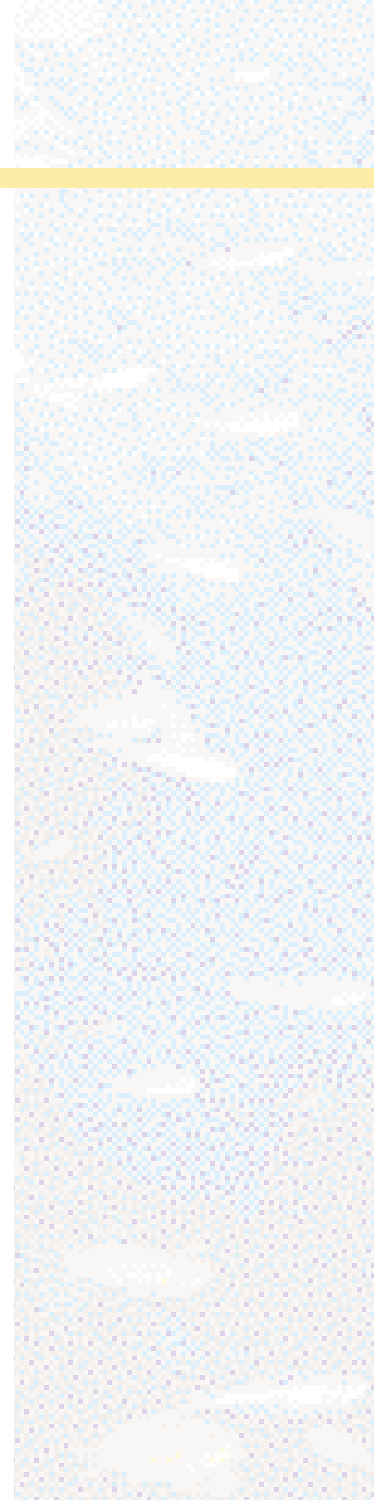
Financial Analysis

Guidelines for Financial Analysis of Activities; USAID

U.S. Agency for International Development (USAID)

Available through USAID website: www.usaid.gov/pubs/ads/200/2026s5.doc

Provides guidance on the basic terms and principles for financial analysis and how to carry one out for a potential project.



Marketing Information Systems

Marketing Information Systems for NTFPs, Carla Koppell
Available through FAO website: www.fao.org

Presents a systematic approach to gathering market information about NTFPs. Designed for use by facilitators working with communities to develop marketing plans.

Market Research

Rapid Market Appraisal: A Manual for Entrepreneurs, The FIT Manual Series, International Labour Organization
Available through International Labour Organization website:
www.ilo.org/public/english/employment/ent/sed/bds/fit/download/rmaent.pdf.
Also available in Spanish.

Presents a rapid market-appraisal methodology for use by small entrepreneurs. Extremely simplistic, but provides a good overview of gathering market information at a local level, with questions to ask.

Non-Timber Forest Products

NTFPs for Pacific Islands: An Introductory Guide for Producers, Kim Wilkinson and Craig R. Elevitch
Available at Agroforestry.net website: www.agroforestry.net/pubs/NTFP.pdf

A guide to starting an NTFP business. Includes information on opportunities, risks and barriers, planning, improving management, expanding commercial options, and political, legal, cultural and economic issues.

Community-based Tree and Forest Product Businesses: Market Analysis and Development, Isabelle Lecup and Ken Nicholson
Available at Food and Agriculture Organization (FAO) website:
<http://www.fao.org/forestry/FON/FONP/cfu/MADoENG.pdf>

Highly recommended: A detailed 7-booklet guide to developing an NTFP-based business. Excellent manual for use by facilitators, particularly those conducting logframe workshops. Runs through the process of making financial projections. Also has 2 detailed actual case studies.

Sustainable Livelihoods

DFID Sustainable Livelihoods Guidance Sheets, Department for International Development (DFID) and Institute of Development Studies (IDS)
Available through Livelihoods Connect website:
www.livelihoods.org/info/info_guidancesheets.htm

Provides a good introduction and detailed explanation of DFID's model and concepts for sustainable livelihoods.

Useful websites

Global Environment Facility (GEF)

<http://www.gefweb.org>

This is the GEF website providing information on GEF policies, programmes and projects.

UNDP-GEF

<http://www.undp.org/gef>

This website provides information on the UNDP-GEF team and its work on GEF programmes.

The International Ecotourism Society (TIES)

<http://www.ecotourism.org>

This website contains a variety of useful information and links to further resources pertaining to ecotourism development and ecotourism operators.

Biodiversity Conservation Network (BCN)

<http://www.bcnet.org>

The Biodiversity Conservation Network is a component of the Biodiversity Support Program; BCN has two goals: (1) promoting community-based conservation through grants and (2) testing the hypothesis that if local communities receive sufficient benefits from a biodiversity-linked enterprise, then they will act to conserve the environment. The website has a host of useful lessons and resources for conservation enterprises.

Forest Stewardship Council (FSC)

<http://www.fscoax.org>

The FSC website provides useful information on all issues pertaining to forest certification and accreditation.

Artisan Enterprise Network

<http://www.artisanenterprisenetwork.org>

This network aims to assist artisan entrepreneurs by bringing together and supplying business expertise both in person and via the internet. The website is a good starting point for businesses considering the production of artisanal crafts for domestic and international sales. It also has links to training programmes.

International Federation of Alternative Trade (IFAT)

<http://www.ifat.org>

This website provides information on fair traded products that can help small businesses develop products and link them to export markets.

Capital Development Fund of the United Nations

<http://www.unCDF.org>

This website provides useful information on micro-finance schemes.



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