# CITES & Livelihoods

# Paper 2: Addressing livelihood impacts:

## Guidelines to address the impact of the implementation of CITES listing decisions on the livelihoods of the poor

CITES Project No. A-338

Prepared for the CITES & Livelihoods Working Group

United Nations Environment Programme -
World Conservation Monitoring Centre

in collaboration with

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## Acknowledgements

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## 1. Summary

Two papers have been produced to address CITES Decision 14.3. This Decision was agreed in response to an amendment to Resolution Conf. 8.3, which included a new paragraph: "*RECOGNIZES that implementation of CITES-listing decisions should take into account potential impacts on the livelihoods of the poor*". A summary of activities that lead to this Decision is described in Paper 1.

This paper comprises the second of these two papers and addresses paragraph b) of the Decision.

Decision 14.3 states that:

> *The Standing Committee shall, subject to the availability of external funding, and requesting the assistance of organizations including the IUCN Species Survival Commission, initiate and supervise a process to develop, by the 15th meeting of the Conference of the Parties:*
>
> *a) tools for voluntary use by the Parties for the rapid assessment at the national level of the positive and negative impacts of implementing CITES listing decisions on the livelihoods of the poor, in conformity with Resolution Conf. 8.3 (Rev. CoP13); and*
>
> *b) draft voluntary guidelines for Parties to address these impacts, particularly in developing countries. The guidelines should, where possible, assist Parties to develop local, national and regional initiatives that take account of the impacts of implementing CITES listing decisions on the livelihoods of the poor. This process may benefit from taking account of the deliberations and recommendations of the CITES and Livelihoods Workshop (5-7 September 2006) and should draw on the technical contributions of Parties, the Secretariat, non-governmental organizations and other national and international agencies, such as IUCN – The World Conservation Union.*
>
> *For further clarification, the process shall not include consideration of the criteria for amendment of the Appendices or the requirement to make non-detriment findings.*

Although the wording in paragraph b) "*address these impacts*" may generally be considered to imply a negative concept, the Decision makes clear that both positive and negative impacts should be considered, and the guidelines therefore focus on both proactive actions that Parties could take to enhance positive outcomes of CITES listings as well as mitigation measures to minimize negative impacts.

This paper summarises ideas and information on the impacts that implementation of CITES listing decisions can have on livelihoods; on activities that do or may help address such impacts; and from case studies of CITES listed species. The Draft Voluntary Guidelines (Annex 1) are based on key factors and principles (Annex 2) identified from this information. The Case Studies are provided in Annex 3. The document is not intended to provide a comprehensive literature review.

It should be noted that there is a general lack of detailed information on the actual positive or negative impacts on livelihoods of the implementation of CITES listings. The extent of livelihood impacts, both in terms of numbers affected and the level of impact are unclear and have not been comprehensively assessed. Information presented in the case studies is largely *ad hoc* and based on perceptions and conjecture rather than on evidence from multidisciplinary assessment methods. Methods to undertake livelihoods assessments need testing, and a process needs to be developed to prioritise aspects of implementation policies relating either to single taxa or to a wide range of taxa for assessment.

A preliminary draft of this paper was circulated to the CITES and Livelihoods working group. The final version includes feedback from working group members and others, as well as additional material.

## 2. Purpose of CITES

The aim of adopting CITES listing decisions is to conserve biodiversity and contribute to its sustainable use by ensuring that no species of wild fauna or flora becomes or remains subject to unsustainable exploitation through international trade, thereby contributing to the significant reduction of the rate of biodiversity loss (Res. Conf. 14.2).

To achieve this, CITES Parties regulate trade though listing taxa in Appendices I, II and III. By requiring findings of legal acquisition and non-detriment associated with these listings, CITES can in the longer term, help to ensure that rightful stakeholders obtain benefits of ongoing consumptive and non-consumptive use of CITES-listed species.

In their response to the working group, Oceania (N. Thappa, pers. comm.) reiterated the need for CITES to focus on and deliver the core mission of CITES, since this in turn can lead to a positive contribution to livelihoods. They note that other multilateral conventions specifically focus on addressing the issue of livelihoods and commend the work of the conventions in this area. Given this, Oceania supports the voluntary use of the CITES livelihood toolkit to mitigate any negative impacts of implementing CITES listing decisions on livelihoods, but provided the primary conservation/regulation goal of CITES is accorded paramount consideration.

Definitions of the terms “poor” and “livelihoods” for the purposes of this report are provided in Paper 1.

## 3. Impacts of regulating trade on livelihoods

### Long and short term impacts

The regulation of wildlife trade by CITES is associated with changes in levels and values of trade, changes in access to trade opportunities, changes in consumer attitudes to trade, and changes in the status of wildlife populations (see TRAFFIC 2008 for a recent regional compilation). Such changes can impact livelihoods of the poor, both directly through their ability to benefit from trade opportunities and indirectly, by allowing wildlife populations to recover and sustain domestic collection and long-term use. These impacts may differ in the long and short term, and a listing, and the implementation policies arising from it, may have negative impacts in the short term but deliver positive outcomes in the longer term. The impact on particular individuals may also differ depending on their role in the supply chain.

### Positive impacts

Often, the impacts of implementing CITES listing decisions on the livelihoods of the poor will be positive, as for example when enforcement of trade restrictions curbs over-exploitation, allowing for long-term access to resources for domestic and subsistence use. Positive outcomes can also occur when trade restrictions result in increased prices and income (including the benefits of shifting to more sustainable production systems or alternate uses of the species involved), provided that such increases are passed down the trade chain and do not fuel illegal trade. Such positive impacts may benefit from enhancement measures such as education and capacity building, followed by adoption of these measures in other locations/species.

### Negative impacts

Negative impacts are most likely to be associated with decisions that increase the level of regulation and reduce access by the poor for legal trade purposes, particularly if illegal trade is not addressed. Negative impacts can also arise out of misperceptions about CITES limiting trade, and from the administrative costs involved in trading in an Appendix II listed species.

### Differences between Parties

The outcome of implementing CITES listing decisions and their impacts on livelihoods may also be context specific and may depend both on the different ways in which they are implemented by the Parties and on the relationships between such implementation and broader wildlife-related national policies.

For example, the Appendix I listing of white (*Ceratotherium simum*) and black rhino (*Diceros bicornis*) is associated with very different outcomes. Clearly, the two species differ in both their biology, in being grazers and browsers, respectively. However, differences in national systems of governance and land tenure have been critical to their different patterns of recovery since their populations were decimated. In South Africa, ownership of white rhinos on private lands and the ability to generate income from hunting and live sales domestically and later internationally has contributed to both an increase in rhino numbers and some

livelihood contributions in the forms of local employment on private land farms. In contrast, in East African countries, where black rhinos have largely remained state-owned, and largely managed on state-run protected areas, recovery is slow (Leader-Williams, 2003). These are specific examples of policies relating to broader implementation issues, and illustrate the crucial importance of the manner of implementation measures (R. Orenstein, pers. comm.).

Lichtenstein (2009) notes that the outcomes in relation to trade in vicuña products on livelihoods differs between range states, due to different implementing legislation.

Similarly, the response to Appendix II listing of Agarwood producing species differs among range states, with some moving ahead rapidly on cultivation and plantation projects (see Burgener, 2007). However, a major issue in reviewing examples of CITES listings is the lack of detailed information on livelihood impacts.

## Differences between Appendices & other restrictions

### *Appendix I*

Appendix I listings may be predicted to be generally associated with reduced opportunities to legally trade wildlife internationally from the wild, particularly in the short-term. However, Appendix I listings may also enhance long-term population recovery which may be associated with improved domestic access to resources, and lead in time to the adoption of alternative production methods such as captive breeding or artificial propagation, the adoption of approved, scientifically-based quotas or specific down-listings which may provide community benefits.

### *Appendix II*

Appendix II and III listings likewise usually result in additional trade regulation, which may be predicted to be associated with reduced levels of legal trade from the wild and increased costs associated with permitting etc in the short term, particularly in the early period of a listing. In the longer term, such listings should deliver benefits in terms of sustainable supply and improved national management and conservation policies for the species concerned, which may in themselves increase benefits for people dependent on the listed species.

### *Further Restrictions*

Appendix II-listed species may also be subject to recommendations under the Significant Trade Review process that lead to further trade restrictions, or temporary or permanent cessation in trade, in order to deliver longer term sustainability. Such recommendations have resulted in documented shifts in trade to different production systems, such as from wild capture to captive breeding out of range for Fisher's lovebird (Burgener, 2007) or to different species, which may have different geographic distributions, such as Chameleons in Madagascar (Carpenter et al, 2004) or to different products (West African and Indonesian snake skin trades). Such changes may impact those who use trade as part of their "coping strategies".

### *Stricter domestic measures*

Stricter domestic measures (SDM) are used by a number of Parties to further restrict trade. While these generally aim to promote long-term sustainability or prevent disease introductions, they may encourage *ex situ* production in non-range states. The working group had differing opinions on the issue of SDM some considering this was outside the scope of considerations on the impact of the implementation of CITES listings on the livelihoods of the poor.

R. Orenstein (pers. comm.) for example, in comments submitted on behalf of Humane Society International and Kitty Block, considers that SDM not to be part of CITES implementation and that they are therefore irrelevant to the current discussions.

On the other hand the view of the Safari Club International Foundation (M. Eckert, pers. comm.) is that: "*the use (or indeed abuse) of stricter domestic measures is one of the very things that the mandate of the Working Group is aimed at. SCIF knows of at least one range state government that has complained to an importing Party that the importing Party's use of stricter domestic measures has impaired the conservation program of the range state for a CITES Appendix I species. In that case, the conservation program in question relies on the equitable sharing of benefits from sustainable use through trophy hunting and the positive impact of those benefits on livelihoods in order to achieve its conservation effect. It would be shortsighted in the extreme, and would not serve the needs of the CoP, if the Working Group ignored this aspect of the issue.*

*The Working Group and the CoP should in fact explore the "key factor" of limitations on the marketplace for the utilization of wildlife and plants, which includes the policies and practices of range states and their stricter*

*domestic measures. Whenever utilization has an economic aspect then the marketplace must be considered and it is the special province of CITES to deal with the international marketplace. Being international, the marketplace of necessity includes the exporting Party and the importing Party. Therefore, SCIF strongly encourages the Working Group not to remove the section on stricter domestic measures in Document 3, Paper 2".*

### *Exemptions to Appendix I*

With respect to the implementation of Appendix I listings, Parties can, if they choose, adopt measures that take into account exemptions listed under Article VII of the Convention (such as those relating to captive breeding or artificial propagation) as well as measures adopted in resolutions of the Parties, including the adoption of approved quota systems or measures promoting the development of alternative, sustainable production systems (such as ranching of crocodilians or the shearing of vicuna) that may, if approved by the Parties, lead to the transfer of the national population of a species to Appendix II. Incorporating such measures into implementation strategies may provide benefits to the poor, providing that such measures can be conducted sustainably and equitably (R. Orenstein, pers. comm.).

Trade from *ex-situ* production systems such as artificial propagation and captive breeding may have less direct negative impact on wild populations than removal of specimens from the wild. Artificial propagation is particularly important for trade in plants and with financial support may offer significant opportunities for the poor; although for medicinal plants and animal parts there may be a preference from consumers for wild origin material.

To benefit from such measures requires that individuals or projects have the ability to invest in the infrastructure required for ranching, artificial propagation/captive breeding, hunting operations, and so on. Such investment is rarely a possibility for the poor (Roe et al 2002), and governments may, where possible, wish to assist communities seeking to shift from direct harvest to alternative production methods as part of their mitigation strategies. However, some operations financed by investors do provide limited benefits to the poor through employment opportunities or egg collection.

Enhanced production of source W specimens is often a cheap and realizable option for the poor but, if not properly regulated, can have negative impacts. There is also scope for encouraging harvest techniques that reduce unintended mortality and waste (C. Ó Críodáin, pers.comm.).

Benefits for local communities from implementation of measures relating to Appendix I listed species are also derived from conservation and development projects involving eco-tourism (Trong & Drews, 2004) and sport hunting (Weaver and Skyer, 2003). Such projects are credited with providing benefits to a range of stakeholders. However, the direct value of such projects to the poor has been questioned. Indeed, there is growing evidence that community-based natural resource management (CBNRM) projects, whether focused on consumptive or non-consumptive use of wildlife including CITES-listed species, may not distribute benefits equitably to the poor who are the pivotal stakeholders. The poorest of the poor, who by definition lack both land and education, are often disadvantaged by both the additional domestic restrictions on hunting and collecting that are associated with such projects, and by suffering conflict as wildlife populations recover and people from other areas move closer to wildlife areas (Jones, 2009; Woodroffe et al, 2005). These constraints need to be recognized more explicitly and addressed.

# 4. Activities addressing impacts

## Delay entry into force

Parties have been willing in the past to take a flexible approach with respect to the entry into force of certain listings in order to provide time to ensure that CITES-listings are implemented appropriately and that any trade conducted under the listing will be both legal and sustainable (e.g. sturgeon, sea-horses, eels). For example, the recent entry into force of the Appendix II listing for seahorses was delayed to allow Parties to make appropriate arrangements to implement the listing, and consider dealing with impacts on livelihoods of the poor (see Christie *et al*, 2007).

## Project support

Some Appendix II-listed species are the focus of projects implemented by individual CITES parties at the national level that are designed to support sustainable production and development. These projects have been developed by Parties acting alone or in conjunction with development bodies such as the UNCTAD biotrade initiative in Latin America and Africa (see FFI 2006), or NGOs as in the snowdrop *Galanthus* project in Turkey (Entwistle et al, 2002) .

## Learning from unlisted species

Some unlisted species or higher taxa have become the focus of attention by Parties (e.g. birds-nest swiftlets (*Collocalia* spp.); sharks (Chondrichthyians); sea cucumbers (Holothurians), *Harpagophytum* spp., etc.). In the case of sharks and sea cucumbers, the Animals Committee has undertaken extensive data collection and discussion to assess the status of species and encourage others to improve management measures that, in turn, could benefit livelihoods. Lessons learned from these efforts may be useful for Parties implementing existing listings, or may be appropriate for the design of specific implementation strategies should currently unlisted species in these taxa be added to the Appendices in future. In the case of *Harpagophytum* spp., although the taxon was not included in the Appendices, the Plants Committee has supported a programme to assess sustainability of use and local livelihoods.

## Incentive-driven conservation and sustainable-use measures

A summary of incentive-driven conservation measures that relate to local communities in Southern Africa is given by Abensperg-Traum (2009). These focus on Community-Based Natural Resource Management, transferring responsibility for species conservation to local communities which share their living space with wildlife in extensively managed areas outside protected zones. Property rights are a crucial element. By transferring ownership or user rights, local communities can benefit directly from ecotourism, hunting safaris etc. and consequently have a correspondingly higher incentive to use wildlife sustainably, rather than to use land for other purposes such as agriculture.

Ideally, the impacts of conservation incentives should be assessed in relation to issues that include: the social structure of those impacted; distribution and use of proceeds from trade; generation of direct and indirect work; education and training; and cultural identify and values (Sanchez, 2009).

## Existing standards and recommendations

To ensure that the implementation of CITES listings by Parties has the best possible impact on the livelihoods of poor people who are dependent on these species, lessons can be drawn from proactive processes, particularly in the development of trade standards, outside the CITES arena. Consideration of the work of other institutions or processes and encouraging their adoption will enable Parties to benefit from existing relevant efforts, and avoid repeating work that has already been done. This is particularly true since the processes described below have been developed and endorsed by a wide constituency of participating organisations and individuals.

In addition to the long-standing FSC standard, there has been a recent focus from various other organisations, on developing further standards for sustainable use and fair trade of natural materials. These provide examples of activities that Parties could encourage and promulgate; to enhance the positive impact of CITES listing on livelihoods of the poor, since evidence of responsible trade, resulting from adherence to these standards, may lead to continued and/or higher revenue for the poor. The standards are based on a series of principles, criteria and indicators.

### *FSC International Standard*

The FSC International Standard (FSC, 1996) has a much longer history than the other standards described below, and is much the best known and is widely used. The current version 4.0 was agreed in 1996.

The FSC's Principles and Criteria (P&C) apply to all tropical, temperate and boreal forests, as addressed in Principle #9 and the accompanying glossary. Many of these P&C apply also to plantations and partially replanted forests. While the P&C are mainly designed for forests managed for the production of wood products, they are also relevant, to varying degrees, to forests managed for non-timber products and other services. The standard comprises 10 principles, principles 2 and 3 being of particular relevance to livelihoods of the poor:

Principle #1: Compliance with laws and FSC Principles
Principle #2: Tenure and use rights and responsibilities
Principle #3: Indigenous peoples' rights
Principle #4: Community relations and worker's rights
Principle #5: Benefits from the forest
Principle #6: Environmental impact
Principle #7: Management plan
Principle #8: Monitoring and assessment
Principle #9: Maintenance of high conservation value forests
Principle #10: Plantations

### *ISSC-MAP & FairWild*

The International Standard for Sustainable Wild Collection of Medicinal and Aromatic Plants (ISSC-MAP) (MPSG, 2007), has been designed, as its name suggests, to meet the needs of medicinal and aromatic plants. For the ISSC-MAP, the term “medicinal and aromatic plants” include plants used to produce pharmaceuticals, dietary supplement products and natural health products, beauty aids, cosmetics, and personal care products, as well as some products marketed in the culinary/food sector (B. Paetzold, pers. comm.). The FairWild (FW) Standard (Meinshausen, 2006) applies to Wild Collection Companies who wish to add high social performance and Fair Trade aspects to their endeavours towards sustainability. Both standards are currently in the first version.

Organisations involved in development of the ISSC-MAP comprise: the German Federal agency for Nature Conservation (BfN), the SSC Medicinal Plants Specialist Group, IUCN, WWF Germany and TRAFFIC and an international, interdisciplinary advisory group. The FairWild Standard was developed by the Swiss Import Promotion Programme (SIPPO), Forum Essenzia and Institute for Marketecology (IMO). In 2008, during the IVth IUCN World Conservation Congress, the newly established FairWild Foundation was endorsed as the official owner of both standards and is responsible for the quality and implementation of a unified standard and certification system (D. Leaman, Chair MPSG, pers. comm.).

In a final report to WWF Germany on a project to support the implementation of ISSC-MAP in CITES through the NDF process, Leaman (2009) notes that implementation of the ISSC-MAP within the CITES context is one of the priority implementation scenarios identified for the standard. Results from the report were included in PC18 WG10 Doc.1.

The ISSC-MAP standard comprises three sections, each relating to two principles (Table 1).

**Table 1: ISSC-MAP Principles and Criteria**

| **SECTION 1: WILD COLLECTION AND CONSERVATION REQUIREMENTS** |
|---|
| **Principle 1. Maintaining Wild MAP Resources**<br>Wild collection of MAP resources shall be conducted at a scale and rate and in a manner that maintains populations and species over the long term. |
| **1.1 Conservation status of target MAP species**<br>The conservation status of target MAP species and populations is assessed and regularly reviewed.<br><br>**1.2 Knowledge-based collection practices**<br>MAP collection and management practices are based on adequate identification, inventory, assessment, and monitoring of the target species and collection impacts.<br>**1.3 Collection intensity and species regeneration**<br>The rate (intensity and frequency) of MAP collection does not exceed the target species’ ability to regenerate over the long term. |

| |
|---|
| **Principle 2. Preventing Negative Environmental Impacts**<br>Negative impacts caused by MAP collection activities on other wild species, the collection area, and neighbouring areas shall be prevented. |
| **2.1 Sensitive taxa and habitats**<br>Rare, threatened, and endangered species and habitats that are likely to be affected by MAP collection and management are identified and protected.<br>**2.2 Habitat (landscape level) management**<br>Management activities supporting wild MAP collection do not adversely affect ecosystem diversity, processes, and functions. |
| **SECTION II: LEGAL AND ETHICAL REQUIREMENTS** |
| **Principle 3. Complying with Laws, Regulations, and Agreements**<br>MAP collection and management activities shall be carried out under legitimate tenure arrangements, and comply with relevant laws, regulations, and agreements. |
| **3.1 Tenure, management authority, and use rights**<br>Collectors and managers have a clear and recognized right and authority to use and manage the target MAP resources |
| **3.2 Laws, regulations, and administrative requirements**<br>Collection and management of MAP resources complies with all international agreements and with national, and local laws, regulations, and administrative requirements, including those related to protected species and areas. |
| **Principle 4. Respecting Customary Rights**<br>Local communities' and indigenous peoples' customary rights to use and manage collection areas and wild collected MAP resources shall be recognized and respected. |
| **4.1 Traditional use, access rights, and cultural heritage**<br>Local communities and indigenous people with legal or customary tenure or use rights maintain control, to the extent necessary to protect their rights or resources, over MAP collection operations.<br>**4.2 Benefit sharing**<br>Agreements with local communities and indigenous people are based on appropriate and adequate knowledge of MAP resource tenure, management requirements, and resource value. |
| **SECTION III: MANAGEMENT AND BUSINESS REQUIREMENTS** |
| **Principle 5. Applying Responsible Management Practices**<br>Wild collection of MAP species shall be based on adaptive, practical, participatory, and transparent management practices. |
| **5.1 Species / area management plan**<br>A species / area management plan defines adaptive, practical management processes and good collection practices.<br>**5.2 Inventory, assessment, and monitoring**<br>Management of MAP wild collection is supported by adequate and practical resource inventory, assessment, and monitoring of collection impacts.<br>**5.2 Transparency and participation**<br>MAP collection activities are carried out in a transparent manner with respect to management planning and implementation, recording and sharing information, and involving stakeholders.<br>**5.4 Documentation**<br>Procedures for collecting, managing, and sharing information required for effective collection management are established and carried out. |
| **Principle 6. Applying Responsible Business Practices**<br>Wild collection of wild MAP resources shall be undertaken to support quality, financial, and labour requirements of the market without sacrificing sustainability of the resource. |
| **6.1 Market / buyer specifications**<br>The sustainable collection and handling of MAP resources is managed and planned according to market requirements in order to prevent or minimise the collection of products unlikely to be sold.<br>**6.2 Traceability**<br>Storage and handling of MAP resources is managed to support traceability to collection area.<br>**6.3 Financial viability**<br>Mechanisms are encouraged to ensure the financial viability of systems of sustainable wild collection of MAP resources.<br>**6.4 Training and capacity building**<br>Resource managers and collectors have adequate skills (training, supervision, experience) to implement the provisions of the management plan, and to comply with the requirements of this standard.<br>**6.5 Worker safety and compensation**<br>MAP collection management provides adequate work-related health, safety, and financial compensation to collectors and other workers |

The FairWild Standard addresses the chain-of-custody in four phases (sections) from collector to final buyer. Section 1: Relation between collectors and collection company is particularly relevant to livelihoods of the very poor (Table 2).

A project to test the applicability and practicality of the ISSC-MAP in India identified as a major problem the issue of who would be responsible for pursuing the standard at particular sites, and concluded that fiscal measures were needed to push the herbal industry towards greater involvement in sustainability (Hamilton, 2008).

It is interesting to note that TRAFFIC has field tested the use of the FairWild Standard when developing an NDF for *Pelargonium sidoides* in Lesotho and South Africa. The species is not CITES-listed but populations are under severe pressure due to land conversion and harvesting. The ISSC-MAP proved to be a comprehensive and useful tool to prepare an NDF in Lesotho, and the results were presented at the 2008 CITES NDF workshop in Mexico (B. Paetzold, pers. comm.).

The first trial use of the FairWild standard is being made in FairWild projects in Bosnia and Herzegovina, Croatia, France, Kazakhstan, Macedonia, and Uzbekistan (Meinshausen, 2006). Although none of these projects yet cover CITES-listed species, future feedback from these and future projects might help inform the CITES/livelihoods issue at a later date.

**Table 2: FairWild Standard – Section I: Relation between Collectors and Collection Company – Principles and Criteria**

| SECTION 1: WILD COLLECTION AND CONSERVATION REQUIREMENTS |
|---|
| **Principle 1 Fair Contractual relationship between company and collectors.**<br>Collectors have the structures and access to information to represent their interests towards the wild collection company |
| 1.1. **Contractual relationship**<br>The economic relation between company and collectors is fair and transparent. |
| **Collectors organisation**<br>Collectors have the organizational structures to represent and defend their interests. |
| **Principle 2 No discrimination**<br>No discrimination of particular social groups as collectors. The company supports the registration of women as collectors. |
| **2.1. Selection of collector**<br>No discrimination of particular social groups and encouragement of women as registered collectors. |
| **Principle 3 Child Labour is avoided**<br>Collection activity is done without substantial work contribution of children |
| **3.1. Child Workers and Young Workers**<br>Children are not contracted as collectors no used by collectors as workers. All young workers never do hazardous work. |
| **3.2. Children helping their parents in collection**<br>Children do very limited work in collection and under supervision only. |
| **Principle 4 Respecting customary rights**<br>Local communities' and indigenous peoples' customary rights to use and manage collection areas and wild collected MAP resources shall be recognized and respected. |
| **4.1. Traditional use, access rights, and cultural heritage.**<br>Local communities and indigenous people with legal or customary tenure or use rights maintain control to the extent necessary to protect their rights or sources over MAP (medicinal and aromatic plants) sources. |
| **4.2. Benefit sharing**<br>Agreements with local communities and indigenous people are based on appropriate and adequate knowledge of MAP resource tenure, management requirements, and resource value. |
| **Principle 5 Fair Trade benefits the collectors and their communities**<br>Fair Trade minimizes trade intermediaries, ensures collectors a fair price for the collected goods and allows for social community development through means of a FairTrade premium fund. |
| **5.1 Transparent Cost Calculations**<br>Transparent calculation of costs allows fair price negotiations between company and collectors as well as with buyers/traders |
| **5.2. Payment of collectors**<br>The Collection company agrees with collectors on fair prices and effectively pays the agreed prices on time. |
| **5.3. Intermediate traders and product assortment**<br>FairTrade minimizes trade intermediaries and keeps long term interests of collectors in mind. |
| **5.4. FairTrade Premium use**<br>As soon as any FairTrade premium is received, it is administered transparently in a premium fund and decisions on the use are done in a democratic way. |

### *Union for Ethical Biotrade*

The Union for Ethical BioTrade has developed a BioTrade Verification Framework for Native Natural Ingredients) for use by private-sector organisations looking to make a positive contribution to sustainable development and the objectives of the Convention on Biological Diversity through recognition of their policies on quality, sustainable sourcing and corporate social responsibility. The framework has been prepared following a lengthy, inclusive and participative development process involving economic, environmental and social interest groups. During its preparation stakeholders from around the world and from all parts of the

supply chain were consulted. The process by which the Framework has been developed follows both the World Trade Organization (WTO) requirements for developing standards and the International Social and Environmental Accreditation and Labeling alliance (ISEAL) Code of Good Practice for Setting Social and Environmental Standards (UEBT, 2007).

The framework defines a list of 7 principles and a long list of related criteria. The Principles comprise:

1. Conservation of biodiversity
2. Sustainable use of biodiversity
3. Fair and equitable sharing of benefits derived from the use of biodiversity
4. Socio-economic sustainability (productive, financial and market management)
5. Compliance with national and international legislation
6. Respect for the rights of actors involved in BioTrade activities
7. Clarity about land tenure, right of use and access to natural resources

CITES is recognized in Criterion 5.3 which states that *inter alia* the provisions of CITES should be recognized. Verification bodies do not insist that all criteria have to be satisfied; however failure to meet a subset of minimum indicators prohibits an organization being a member of UEBT. These minimum criteria do not include criterion 5.3. It may be useful for discussions to be held between organisations involved with implementation of CITES (Secretariat/Parties/IGOs/NGOs) and UEBT to encourage the inclusion within the minimum criteria, of compliance with CITES (i.e. ensuring presence of CITES permit).

### *NTFP Report*

A report on the commercialization of non-timber forest products (NTFPs) is of particular relevance (Schreckenberg et al, 2006). This includes recommendations for a number of government-level interventions and options for direct assistance to communities by government, NGOs and private sector organizations. These include the need for:

- Policies that support NTFP activities as part of a diversified livelihood strategy;
- Clarification of legal and regulatory and institutional frameworks governing commercialization;
- Promoting local regulatory mechanisms for resource access and management to ensure equitable access and sustainable supplies;
- Support of credit-provision to the rural poor and small scale entrepreneurs;
- Improvement of access to education and information;
- Improvements to transport and communications infrastructure that will facilitate market access.
- Enhancing community organizations to increase the market power of producers and processors to decrease their vulnerability to external shocks;
- Increasing opportunities for involvement of women;
- Building business capacity;
- Building technical know-how to ensure sustainable resource management, harvesting, domestication where appropriate and product processing;
- Support for collaboration between producer communities and for development of mechanisms, such as certification, that value the origin and identity of the product.

### *CITES & Livelihoods process report*

A comprehensive account of the process leading to the production of this report is given by Dickson (2008). This lists three issues that need to be taken into account for the guidelines to be effective:

1) Many different factors shape how the trade in a CITES species affects the livelihoods of the poor. A significant number of these factors operate within range states and some of them, such as rights over land and wild resources, are difficult to change quickly.

2) Some of the other factors that affect impacts are those that originate in importing states.

3) Much remains unknown about the causal relationships between different factors and particular outcomes. Even if it is known, for example, that the trade in a CITES species contributes to livelihoods at the local level, it may not be easy to identify which particular factors are causally significant in bringing that about. It may be yet more difficult to predict the impact of a particular policy change.

Dickson therefore recommends that:

1) The guidelines should not be too prescriptive with regards to particular ways of improving impacts on livelihoods. Solutions are likely to be case specific, and a mechanistic application of a model that works in one place to a different context is unlikely to be successful. The guidelines should identify at a generic level, the kinds of factors that are likely to be important, or focus on the types of decision-making processes that lead to the development of good solutions;

2) The guidelines should acknowledge that developing solutions within range states will take time and may require significant policy changes. The guidelines will need to respect Party sovereignty and it may be useful to see the formulation of the guidelines as a process, that extends over time, of supporting Parties to address livelihoods.

3) The guidelines will need to address what importing countries individually, and CITES as a whole, can do to implement the Convention in a way that contributes to the livelihoods of people at the local level. In this regard the use of stricter domestic measures, efforts to influence consumer demand, and the automatic link between a CITES listing and a particular type of trade regulation are all relevant.

# 5. Key factors

## Case studies and Kirstenbosch Workshop

Case studies of CITES-listed taxa in relation to livelihoods are provided in Annex 3.

Key issues discussed at the Kirstenbosch CITES and livelihoods workshop and included in the initial workshop report (FFI, 2006) are listed in Table 3.

**Table 3: Key issues identified by Participants at the CITES and livelihoods workshop (2006)[1]**

| | |
|---|---|
| **a** | Empowering strong tenure over land and resources |
| **b** | Forming representative associations for harvesters |
| **c** | Forming trader and exporter associations |
| **d** | Developing standards, labels, certification, and so on |
| **e** | Ensuring cross-sectoral cooperation |
| **f** | Building a supportive international context |

A review of the case studies in Annex 3 indicate a number of key factors that CITES Parties could consider when addressing the impact of implementing CITES-listing decisions on livelihoods of the poor.

## Key factors

### *Key Factor 1: Compensation for costs associated with the implementation of CITES listings*

The costs of conservation programmes associated with CITES-listed species may fall disproportionately on the poor. The implementation of Appendix I and, to some extent, Appendix II and III, listings places restrictions on trade and may restrict the options for the poor, particularly in the short term, unless mitigation or alternatives are available.

There may also be costs associated with successful conservation measures in the long-term for a few high-profile species whose behaviours may lead to human-wildlife conflict if these conflicts increase due to depredations on crops and livestock. Without adequate means of compensation and/or mitigation through, for example, crop and livestock protection schemes, the poor who have few assets and alternatives may be disproportionately affected by increasing conflicts with some species of wildlife.

[1] NB: These issues were not specifically incorporated into the final Workshop recommendations; see CITES Doc. 14.4.

The implementation of CITES listings may be associated with increased costs through permitting which are generally short-term and are usually borne by middlemen rather than harvesters, but may in some cases be passed down the trade chain and affect harvesters. Implementation measures, should therefore include, or form part of measures addressing trade structures and the distribution of costs.

### *Key Factor 2: Equity, empowerment and tenure*

In determining who should benefit from conservation programmes associated with the implementation of CITES listings, the key lies in part in the definition of "poor". Many conservation programmes, both consumptive and non-consumptive, aim to deliver benefits to the poor – but commentators suggest that the poorest of the poor often do not benefit equitably (see Jones 2009; Honey 1999). Furthermore, community conservation projects are often associated with restricted access to natural resources, yet it is the poorest of the poor who require seasonal access to such resources to get them through periods of vulnerability, such as seasons when food is in limited supply or when school or clinic fees become due and immediate access to revenue becomes necessary (see Roe, 2002, 2008; de Stage, 2002).

High demand for restricted products can also stimulate prices and illegal trade, and without equity in terms of tenure over resources, coupled with increased enforcement, education and capacity-building efforts to control illegal trade, the poor may be unable to exclude outsiders (FFI, 2008).

Implementation policies should therefore be designed to ensure both that benefits that accrue are directed as much as possible to the poor and are distributed equitably, and that those benefiting from the implementation of the listing are supportive of, and assist with to the greatest extent possible, enforcement efforts directed at illegal trade.

### *Key Factor 3: Representation*

The need for representation of the poor through harvester/ collector organizations and of trader organizations was discussed at the CITES and livelihoods workshop (FFI, 2006). Such representation may be important to ensure that sharing of benefits is equitable and does not disadvantage the poorest sectors of society. Implementation strategies may include licensing measures designed to promote such organizations (e.g. for *Hoodia* in South Africa).

### *Key Factor 4: Supportive international context*

Implementation of CITES listing is associated with stricter domestic measures pertaining to certain species, and these can restrict market access for products from that species, and so restrict the income that can be earned. There have been concerns of this nature in relation to the import of crocodile and sport hunting products to the USA, of wild birds to the USA and Europe, and of reptiles to Europe, and of many species to Australia (Kievert, 2000; Cooney & Jepson, 2005). Stricter domestic measures can also impact the opportunity for exports as in the case of the Appendix II listing of seahorses in the Philippines (Christie In press). The recommendations of the CITES Significant Trade Review can also have impacts on trade opportunities (Roe, 2002). Thus issues of the impacts of broader legislation on the poor remain to be addressed. However, there were queries from the working group regarding the relevance of consideration of stricter domestic measures in the current context. The problem of identifying what constituted a stricter domestic measure was also raised within the working group and suggested as a topic that could be discussed further, e.g. whether a voluntary zero quota set by a Party for a species newly listed in Appendix II is considered to be national implementation, or stricter domestic measure (T. Oldfield, pers. comm.).

However there were different views within the working group concerning whether or not stricter domestic measures should be considered (see Stricter Domestic Measures in Chapter 3).

### *Key Factor 5: Market mechanisms and access to micro-finance*

Market forces may mean that CITES-listed species cannot be assumed to be a source of sustainable revenues indefinitely even if the collection of specimens is conducted on a sustainable basis. The fashion for some products derived from wildlife may change for reasons that have nothing to do with CITES or conservation issues in general. When projects aim to provide alternative sources of specimens, such as ranching or *ex situ* production become successful, there is the danger of swamping the market and driving prices down. This has been recorded for the crocodilian skin trade, and in relation to live sales of white rhino and trophy hunts of Marco Polo sheep in Mexico (MacGregor, 2006; Reidl, 2006).

Similarly, demand for specimens from the wild often declines when captive breeding become more cost-effective, as the captive-bred specimens have the added advantage of attributes such as tameness, lack of disease and the availability of unusual colour morphs (Robinson, 2001). However, *ex situ* production of some species remains expensive, so there is scope for sustainable wild production to compete successfully (C. Ó

Críodáin, pers.comm.). Meanwhile the requirement for investment and lack of access to micro-credit, mean that poor local people often cannot benefit from developing *ex situ* production systems (Entwistle, 2002; Roe, 2002). Implementation policies may need to address such issues, as may broader development policies aimed at providing entrepreneurial assistance, including micro-financing, to poor communities. This issue goes well beyond the context of CITES implementation and may include the encouragement of alternative means of revenue generation not related to the use of CITES-listed species.

### *Key Factor 6: Consumer confidence*

The CITES vision statement starts with the words "*Conserve biodiversity and contribute to its sustainable use……*" (Strategic Vision Res. Conf 14.2). However the broad perception of CITES is of a Convention that protects species against overuse, and as such it is largely seen as restricting rather than promoting trade. Whilst Appendix II listings provide a positive means to promote well managed and sustainable trade, this is not the general external perception of CITES, particularly amongst NTFP, fishery and timber producers (IUCN, 2000). For example, C. Ó Críodáin (pers. comm.) recalls a situation where an NGO was was encouraging a public body to adopt a procurement policy that excluded purchase of any CITES timber listed on Appendices I, II or III, overriding any considerations about FSC certification etc

### *Key Factor 7: Certification*

One means of increasing consumer confidence may be to continue strengthening the basis for non-detriment findings and enforcement of the Convention coupled with promotion of CITES as a reliable stamp of sustainability where production contributes to the livelihoods of the poor. However, meeting certification standards can be expensive and can act as a trade barrier for the poor, unless NGOs support the poorest to gain accreditation (Bodmer, pers. comm.; Watson, 2005). Reversing the trends towards *ex situ* production of products such as crocodilian skins may be addressed by developing certification of wild produced skins (Macgregor, 2006).

The need to encourage certification standards that support the poor therefore remains to be addressed. This may be possible if existing certification standards are included in integrated management planning and managed by the country concerned. If Scientific Authorities uphold the required standards then the costs of certification may be reduced. This is being attempted by the pilot projects of the ISSC MAP in five countries.

The ISSC MAP includes all the standards required of a government, industry and other stakeholders (including poorer communities) to adopt and manage a resource from a biological/ sustainability perspective but also taking into account the access and benefit sharing, value-adding and certification process through FairWild. The adoption of such a management system may or may not require a CITES listing because its main aim is to strengthen domestic management and not place management in the hands of CITES or the certifier, however, it does not preclude a listing. This approach does encourage national authorities to consider livelihood and biological parameters together as required by the CBD. Naturally the ability to implement such a system is limited by the resources of the government and the country but is perhaps in the long term the best way to go (D. Newton, pers.comm.).

### *Key Factor 8: Cross-sectoral technical support*

Since poverty is a result of a range of political, institutional, and social injustices - including marginalisation of women and the failure to protect poor communities from powerful vested interests, livelihood issues associated with the implementation of CITES listings can only be addressed successfully as part of wider poverty alleviation strategies (C. Ó Críodáin, pers. comm.).

Many of the areas outlined above for further mitigation work fall beyond the remit of CITES authorities, yet are vital to the effective workings of the Convention. Therefore, it will be important for CITES authorities to develop further cross-sectoral linkages with government agencies that deal with issues such as land, agriculture, conservation, rural development, trade and industry. The technical support needed should help CITES Parties make robust non-detriment findings, improve enforcement of the requirements of the Convention, make use of market mechanisms where appropriate, and ensure that appropriate benefit sharing arrangements are in place to mitigate livelihood impacts on the poor.

Implementation policies should therefore be integrated with broader national policies relating to wildlife conservation and sustainable development, as well as wider issues of poverty alleviation, to the extent that doing so will not interfere with proper implementation and enforcement of the Convention itself (R. Orenstein, pers. comm.).

## 6. Principles

Based on the matters discussed above, principles (see Annex 2) have been identified that Parties might consider when addressing livelihood issues. These principles form the basis of the draft resolution in CoP15 Doc. 14.

The principles relate to four themes:

- Empowerment of the poor
- Compensatory mechanisms for the shift form *in situ* to *ex situ* production
- Mitigation strategies for human-wildlife conflict
- Enabling policies

## 7. Draft Voluntary Guidelines

The draft voluntary guidelines (Annex 1) are based on all the issues considered above. They also provide for a prioritization process for a Party to identify its CITES-listed species that are likely to be of particular importance to the poor, such as medicinal plants that are used for primary health care or species that provide the only source of cash income, however small that might be.

The draft guidelines provide for consideration of the principles and criteria listed in the ISSC-MAP, FairWild and UEAB standards, but do not list each of these for reasons of brevity. The FairWild and UEAB standards are of particular relevance to actions that promote the positive impacts of implementing CITES listings rather than for mitigation measures for negative impacts.

The preliminary phase of the guidelines also provides for information from rapid assessments undertaken to assess the impact of CITES listing on the livelihood of the poor to be considered.

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## Annex 1: Draft Voluntary Guidelines

Draft Voluntary Guidelines for Parties to address the positive and negative impacts of implementing CITES listing decisions on the livelihoods of the poor. In using these guidelines it is important that:

- Principles included in Resolution CoP 15.XX (see CoP15 Doc.14 Annex 1) are taken into account;
- National Agencies work with stakeholders at all levels;
- Activities are integrated with existing relevant implementation practices;
- Procedures followed should be transparent.

**1. Preliminary activities – identify priority species to test the guidelines against.**

1.1. Identify priority species to test the guidelines against, including:

1.1.1. Species that are of direct use by the poor (e.g. medicinal plants) or that form the sole source of cash income.

1.1.2. Species subject to regular or high international trade.

1.2. Analyse outcome of rapid assessments to inform actions below.

**2. Empowerment of the poor**

2.1. Equity

2.1.1. Develop policies to ensure that benefits that accrue from CITES trade are directed to the poor and are distributed equitably.

2.1.2. Develop policies to ensure that those benefiting from the implementation of the listing are supportive of and assist with enforcement efforts directed at illegal trade.

2.1.3. Promulgate and encourage use of sustainability and Fair Trade standards.

2.2. Tenure

2.2.1. Recognise resource tenure for indigenous and tribal communities and the poor.

2.2.2. Promulgate and encourage use of standards which address issues of tenure.

2.3. Empowerment

2.3.1. Promote transparency of any enabling policies.

2.3.2. Consider a delay in the entry into force of the CITES listings, to allow development of strategies to mitigate any negative effects.

2.3.3. Encourage development of harvester associations.

2.3.4. Support development of trade associations with clear obligations for benefit-sharing.

2.3.5. Ensure these guidelines are updated to ensure feedback from the poor.

2.4. Education and Public Awareness

2.5. Ensure the positive aspects of CITES and CITES-related legislation are understood by improving understanding of CITES as a tool promoting sustainable use

2.6. Develop interim aid packages to provide assistance to collectors and harvesters most severely affected by the implementation of a CITES-listing decision

**3. Compensatory mechanisms for the shift from *in situ* to *ex situ* production**

3.1. Prevent de-localization of profits as a result of *ex situ* production by:

3.2. Develop market-based incentives to encourage benefit-sharing from *ex situ* production.

3.3. Remove barriers to the development of *in situ* production systems.

3.4. Ensure consumer countries work with *ex situ* traders and trade associations to support positive and minimize negative impact.

3.5. Develop supportive strategies through bilateral conservation and development projects.

3.6. Explore use of alternative production systems, such as ranching, artificial propagation or captive-breeding.

**4. Mitigation strategies for human-wildlife conflict**

4.1. Provide alternatives or compensation schemes (e.g. crop and livestock protection schemes, payment for ecosystem services, employment in eco-tourism or as game wardens; provision of tourist or local hunting and collection permits; development of alternative products).

**5. Enabling policies**

5.1. Ensure cross-sectoral technical support with government agencies dealing with issues such as land, agriculture, conservation, rural development, trade & industry etc.

5.2. Identify increased costs created by CITES-listing, including costs created by the permitting procedure and develop compensatory measures to address these.

5.3. Encourage market mechanisms and access to micro-finance to enable poor local people to benefit from developing *ex situ* production systems.

5.4. Initiate or strengthen collaborative partnerships between development and conservation agencies to enhance aid effectiveness for wildlife conservation and eliminate duplication of efforts.

5.5. Encourage international financial institutions and cooperation agencies to assist Parties in the development of multilateral and bilateral measures, supportive policies and institutions at the regional, national and local levels to address negative impacts of the implementation of CITES listings on the livelihoods of the poor.

# Annex 2: Principles when addressing livelihoods

The draft resolution contained in CoP15 Doc. 14 lists principles to be considered by Parties when addressing livelihood issues. These were derived from the draft voluntary guidelines included in the preliminary draft papers circulated to the CITES and Livelihoods working group in August/September 2009, as the Annex to Document 3. The text, as included in CoP15 Doc. 14 Annex 1 is provided below:

DRAFT RESOLUTION OF THE CONFERENCE OF THE PARTIES

CITES and livelihoods

RECALLING Resolution Conf. 8.3 (Rev CoP13), adopted at the 13th meeting of the Conference of the Parties (Bangkok, 2004) where the Conference recognized that implementation of CITES-listing decisions should take into account potential impacts on the livelihoods of the poor;

RECALLING ALSO Decision 14.3 requesting the Standing Committee to develop draft voluntary guidelines for Parties to address these impacts, particularly in developing countries;

RECOGNIZING that CITES-listing decisions are neither the sole cause nor the sole solution to the livelihood problems of the poor, but that the effective implementation of such decisions can form part of a strategy to provide livelihoods for the poor and accelerate achievement of the Millennium Development Goals;

RECOGNIZING that the proper implementation of CITES listings may enhance livelihoods by delivering long-term species conservation;

RECOGNIZING ALSO that implementation of some listings (particularly Appendix I listings) may impact livelihoods of the poor by restricting access to income, employment and other resources such as food, materials and medicines, but that it need not always do so if appropriate implementation strategies are adopted;

THE CONFERENCE OF THE PARTIES TO THE CONVENTION

AGREES that the following principles be considered when Parties address livelihood issues:

***Regarding empowerment of the poor***

ENCOURAGES all Parties to work with key stakeholder groups to design, implement and monitor effective strategies for the implementation of CITES listings recognizing that:

a) Solutions are likely to be case and situation specific;
b) Although amendments to the CITES Appendices must, unless indicated otherwise in an annotation, come into effect 90 days after their adoption by the Conference of the Parties, developing appropriate solutions to mitigate negative impacts on the livelihoods of the poor may require time to incorporate significant policy changes;
c) Developing guidelines may be an ongoing process as more knowledge is gained about specific impacts and successful as well as failed experiences; and
d) Monitoring and evaluation of strategies will be an important aspect of the development of appropriate implementation strategies and policies;

AGREES THAT:

a) Empowerment of the poor should be encouraged through measures that include, as appropriate:

i) Promoting transparency in the development and implementation of policies regarding poverty and the use of natural resources;
ii) Developing harvesters associations;
iii) Developing trade associations with clear obligations for benefit sharing; and

iv) Recognizing resource tenure for indigenous and tribal communities and the poor;

b) Support for the implementation of CITES listings should be enhanced by public awareness and education, including education of poor people, to ensure that:

i) The positive aspects of CITES and CITES-related legislation are understood;

ii) The need to take measures to conserve listed species, and the benefits, particularly to poor people, that can accrue from doing so, are appreciated; and

iii) Poor communities support policies and activities designed to reduce or eliminate illegal trade in specimens of CITES-listed species; and

c) As implementation of some listings may have short-term negative impacts on the poor, mitigation strategies may include:

i) Developing interim aid packages to provide assistance to the collectors and harvesters most severely affected by the implementation of the CITES-listing decisions; and

ii) Waiver of permit fees during the first six months of a listing so that local harvesters and producers can internalize the transaction costs generated by the implementation of the CITES-listing decisions;

***Regarding compensatory mechanisms for the shift from in situ to ex situ production***

AGREES THAT:

a) Implementation of some CITES-listings may encourage *ex situ* production, which may lead to delocalization of profits. Mechanisms may be required to:

i) Develop market-based incentives to encourage benefit sharing;

ii) Remove barriers to the development of *in situ* production systems;

b) Consumer countries may work with producer countries to develop effective strategies to support positive impacts and minimize negative impacts of the implementation of CITES listings. These could include:

i) Working with *ex situ* producers and trade associations;

ii) Developing supportive strategies through bilateral conservation and development projects; and

c) Mitigation strategies may explore the use of alternative production systems such as ranching, artificial propagation or captive breeding.

**Regarding mitigation strategies for human-wildlife conflict**

RECOMMENDS THAT mitigation strategies provide alternatives or compensation schemes (e.g. payment for ecosystem services, employment in eco-tourism or as game wardens; provision of tourist or local hunting and collection permits; development of alternative products);

**Regarding enabling policies**

INVITES Parties to initiate or strengthen collaborative partnerships between development and conservation agencies to enhance aid effectiveness for wildlife conservation and eliminate duplication of efforts (e.g. CITES authorities making cross-sectoral links to seek assistance in mainstreaming wildlife trade policies into poverty reduction strategies and wider development plans).

ENCOURAGES international financial institutions and cooperation agencies to assist Parties in the development of multilateral and bilateral measures, supportive policies and institutions at the regional, national and local levels to address negative impacts of the implementation of CITES listings on the livelihoods of the poor.

# Annex 3: Case Studies

## I. Eco-tourism

### A. Marine turtles (App. I)

Marine Turtle populations have been impacted by harvest, bycatch, shipping and destruction of nest beaches. However, marine turtles are viewed as “flagship species” and are reportedly a valued component of ecotourism projects that are being developed to contribute to local livelihoods. The potential for revenue generation from marine turtles for tourism purposes is reportedly greater than from turtle products, and such revenue generation is arguably more sustainable than from consumptive use. However, benefits from such projects depend on investment and the stability of the tourism market. Also, benefits to the poor will generally flow through employment, which in turn may require the poor to have education and training.

Meanwhile, in the Caribbean, as elsewhere in the world, marine turtles are harvested legally and illegally particularly for domestic use of their eggs and flesh, although other parts too are used. Often there is little government enforcement of regulations and increasingly, government is entering into co-management agreements with communities whereby the community derives benefits in return for sustainable use of the resource, whether it be consumptive or non-consumptive. Often such projects are supported by NGOs who support training, research and management.

In Cuba, marine turtles were harvested for food, contributing to local livelihood needs and the shells produced from this harvest were stockpiled. Following the defeat of proposals to downlist the Cuban population so that the shells could be sold on the international market to raise extra revenue, there is currently no market for these shells (CITES amendment proposals submitted at CoP 10, 11, 12). These proposals proved controversial, partly due to the regional nature of turtle populations.

G. Webb (pers. comm.) notes that "Clearly, had Cuba's proposal been supported by the IUCN MTSG (Marine Turtle Specialist Group),and the legal trade allowed, CITES would have been in a prime position to maintain the incentives to increase legal trade and counter illegal trade. No such incentives exist today, and when WWF tires of funding Cuba, so they will be left with naught."

#### *Key factors leading to success or failure*

- Flagship species;
- Consumptive use less profitable than value to ecotourism;
- Stability of tourism market.

#### *Future issues*

- Need to reduce bycatch and other sources of mortality and implement existing legislation
- Where tourism is not possible need to find means to support disadvantaged poor.

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Troeng, S. and Drews, C. 2004. Money Talks: Economic Aspects of Marine Turtle Use and Conservation. WWF International, Gland, Switzerland.

### B. SEE Turtles: Building a Market for Sea Turtle Conservation Tourism

Six out of seven species of sea turtles around the world are in danger of extinction due primarily to poaching (meat, eggs, and shells) and entanglement in fishing gear. With slow growth rates and long maturation periods, sea turtles are especially susceptible to these threats. In many places, people earn income from

these activities including the sale of meat and eggs or fishing in turtle hotspots (Troeng & Drews, 2004). SEE Turtles, a project of The Ocean Foundation, links people with turtle sites in ways that directly support protection efforts, while increasing resources in communities to help residents thrive and value sea turtles in their environment. We work with community-based organizations working at key turtle sites to promote responsible tourism that will allow the organizations to expand their work and bring alternative sources of income to communities where poaching and fishing are common practice.

SEE Turtles is strengthening the international network of sea turtle conservation organizations by filling gaps in tourism market access and capacity building. To enhance market access, we develop relationships with international tour operators to include sea turtle conservation activities and educate key constituencies through our website, media outreach, and other outlets. We also build capacity in turtle communities by providing mini-grants to partners, sharing knowledge on the necessary components of a tourism strategy, and training community members to run small tourism businesses and earn income as guides. In addition, we worked with representatives of more than twenty conservation organizations and government agencies to create and disseminate a turtle watching best practices guide for travelers, tour operators, and turtle communities.

The primary goal of SEE Turtles is to encourage transition away from destructive and consumptive uses of sea turtles by providing alternative sources of income for local communities. Secondary goals are to support field conservation efforts through increased income and technical support; to set the standard for turtle-friendly ecotourism and elevate sea turtles into a top wildlife attraction; and to inspire life-long conservationists for marine wildlife and the ocean**.**

The goal of our project is to protect sea turtles through conservation tourism. In the two years of our project, we have reached the following goals:

- Since 2007, the project has generated more than $50,000 for conservation and local communities. This income is a combination of donations, small grants, fees, and indirect spending.
- More than 100 people have visited turtle partners to date, ranging from long-term volunteers to travelers visiting a nesting beach for an evening.
- Small grants have funded the removal of outdated, inefficient and destructive fishing gear and helped train guides in Baja California Sur, as well as paying for beach patrols and allowing a women's cooperative to expand an innovative recycled plastic bag program in Costa Rica.
- The project has reached more than 10 million people with the message of responsible turtle tourism through magazines, blogs, video, E-newsletters, and speaking engagements.
- Volunteers recruited have completed more than 175 shifts patrolling nesting beaches, guarding hatcheries, and other important activities.

### *Key factors leading to success or failure:*

- Ability of community-based conservation projects to adequately handle a modest increase in tourism
- The overall health of the international tourism industry
- The likelihood of generating enough tourism business to benefit a large percentage of the community
- The overall attractiveness of the destination to tourists
- The ability of tourism to directly reduce primary threats to turtles in the specific communities

### *Issues for the Future:*

- Shifting ranges of turtles due to climate change could affect communities where turtle tourism has developed
- Downward population trends for sea turtles related to pre-project or distant poaching/bycatch
- Large increases in tourism in small communities can provide an incentive for unsustainable coastal development
- Expansion of the conservation tourism model to support recovery of other marine species?

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## C. Tigers (App. I)

Tigers have been listed in Appendix I since 1975, but this has not arrested their population decline. Populations have declined through conflict with people as natural prey populations have dwindled, and tigers have also been poached to supply skins and bones for medicinal purposes. Meanwhile, in India, tourism

helps to support protected areas as evidenced in the case of the Periyar Tiger Reserve. The community based ecotourism programmes of Periyar have reportedly contributed to halting illegal activities, strengthening park protection and generating income for park protection and community welfare. Local livelihoods are reportedly enhanced through community benefits from ecotourism revenue, administered by an eco-development committee and villagers live in the buffer zone around the protected area. However, surveys indicated no difference in the conservation awareness in villages included in an Integrated Conservation and Development Project compared with those not included in the project (Gubbi *et al*, 2008). Meanwhile the majority of respondents expressed the hope that their children would have a greater range of livelihood opportunities and would not have to collect NTFPs (Gubbi and MacMillan, 2008). According to Gubbi *et al* (2008) ecotourism provided a source of primary occupation for only 43 households or 0.8% of the 5540 households targeted by the Periyar ICDP. Although the project provided access rights for NTFP extraction, these groups held negative views of the project, possibly because it raised high expectations of benefits that did not materialize.

#### *Key factors leading to success or failure*

- Community based ecotourism ventures generate funds for community benefits, but only a small proportion of people benefit.

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### D. Elephant, Rhino, Leopard, Cheetah (App. I) & Lion (App. II)

The viewing of elephant, rhino, lion, leopard, cheetah contribute to eco-tourism revenues and countries such as Kenya and India have emphasized the development of eco-tourism projects as sources of revenue to provide local incentives for conservation. In Kenya tourism provides around 12% of GD, but wildlife populations have reportedly declined some 40-60% since 1977 largely due to land conversion and increasing agriculture.

In a number of areas, conservation and development projects have been criticized as being associated with leakage and powerlessness of the poor, who suffer the depredations of wildlife conflict, but receive little direct income. In Tanzania, Zeppel (2005) has concluded that both tourism and hunting have been of little benefit to most tribal people while wildlife-conflict and poaching reduce benefits to locals. However, the question remains as to what would have happened to both people and wildlife without benefits from tourism and hunting?

#### *Key factors leading to success or failure*

- Community-based tourism ventures generate funds for community benefits, but only a small proportion of people benefit and leakage remains a concern.

#### *References*

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## II. Hunting

### A. Trophy Hunting - Species with quotas (Apps I & II)

Hunting of CITES Appendix-I listed species to contribute to conservation is undertaken under quotas approved by the CoP for specific populations of black rhino, elephants, leopard, cheetah and markhor.

Similarly, hunting of Appendix II listed species (lion, bears, wolves etc) is also undertaken, with less stringent permitting requirements. The revenues from some of these hunting opportunities goes to community-based programmes, and has reportedly contributed positively to both conservation and local livelihoods through community development projects and in some cases providing "small" direct payments, which contribute to seasonal costs such as school fees etc. But such hunting projects have also impacted the very poorest, by restricting access to meat and cash income, whether legally or illegally derived, and restricting the expression of cultural identity. The poorest are also least able to accommodate the depredations of wildlife on crops and livestock, which in Namibia were estimated to comprise 18%-22% of average household incomes in certain areas. CITES Appendix-I listed predators such as jaguar, tiger, lion, cheetah and crocodiles are particularly problematic in this regard. Thus Vaughan et al (2004) recommend that means should be found to accommodate local hunting of certain species and Martin (2005) notes that unless income from wildlife increases, tolerance of crop losses is likely to be limited.

### *Key factors leading to success or failure*

- Equitable sharing of costs and benefits is needed.

### *References*


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Zimmermann, A., Walpole, M.J. and Leader-Williams, N. 2005. Cattle ranchers' attitudes to conflicts with jaguar Panthera onca in the Pantanal of Brazil. *Oryx*, 39, 406-412.


## B. Trophy Hunting & Live Sales of White & Black Rhinos (App. I)

Southern white rhinos have recovered from just a single population of between 20 and 50 animals in 1895 to about 17,500 today, with an additional 750 animals in captive breeding institutions worldwide. Listed in Appendix I in 1975, the south African population was downlisted to Appendix II in 1995 for the purposes of live sales and hunting trophies, followed in 2005 by the Swaziland population. South Africa has a policy of encouraging landholders to benefit from sales of hunting trophies and live animals and also from tourism. This policy, coupled with strict management and the species' grassland habitat and social grouping structure have contributed to its dramatic population increase. Removals of animals have maintained populations below carrying capacity to ensure maximal rates of reproduction. Some contributions to the livelihoods of the poor will have been generated through a range of employment opportunities as guards, in hunting and capture operations as well as in the tourism industry. Whilst measures to allow landholders to derive economic incentives from the sustainable hunting and live sales are connected with maintenance of areas of "bush" habitat, it seems unlikely that local people benefit from access to collect medicinal and other local resources.

Black rhinos *Diceros bicornis* were included in Appendix I in 1977. In contrast to the white rhino, Black rhinos were decimated more recently, in the 1980s when a wave of poaching spread through Africa, but was halted at the borders of Zimbabwe, Namibia and South Africa. More recently, the populations of South Africa and

Namibia were annotated with a quota for hunting trophies in 2004. Rhino poaching in Africa and Asia continues to be problematic.

## C. Trophy Hunting – Elephants (App. I)

The African elephant was uplisted to Appendix I in 1989, at which point a number of southern African and importing countries took reservations. These reservations were largely based on the grounds that populations in southern Africa were deemed secure, well-managed and the revenue derived from sales of hunts and products was used to fund conservation. The southern African countries withdrew reservations in 1997 when their populations were downlisted variously for live sales, hunting trophies, non-commercial carvings, sale of hair and leather goods and one-off ivory shipments. When the Appendix-I listing came into effect a range of employment opportunities for local people in the hunting and processing industries of range states were curtailed and carvers in both range states and importing countries were affected. However, trophy hunting continued to provide limited employment opportunities, and other community infrastructure benefits have been delivered through community conservation projects.

### *Key factors leading to success or failure*

- Flexibility of CITES listings for hunting;
- High value product and competition to purchase trophies;
- Problems with stricter domestic measures re trophy hunting;
- Such ventures good for the better-off, but the poor may continue to be marginalized;
- Protection of the population and in some cases translocation to keep reproductive rates high to allow population recovery;
- Cheaper live sales to establish new populations;
- Tenure arrangements;
- Some Cost and Benefit Sharing;
- Tourism associated with higher volumes of visitors.

### *Future issues*

- Empowerment of marginalized groups;
- Examination of impacts of harvest restrictions on the poorest;
- Stricter domestic measures;
- Difficulty in getting appendix I quotas approved;
- Need to better integrate needs of the poor – requires understanding of their livelihood strategies and needs see for example *Savannah's Forever* project in Tanzania.

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## D. Trophy Hunting – Markhor (App. I )

Markhor were included in Appendix I in 1975, whilst urial were included in Appendix II. Populations were declining due to poaching in the 1980s leading to establishment with assistance from USFWS of a conservation programme. Following negotiation, local tribesmen agreed to stop local hunting in exchange for potential employment and hunting opportunities and in 1986, the first hunts for markhor and urial went ahead. Finally in 1997 a CITES quota was agreed for trophy hunting and this quota was doubled in 2002. The Programme has continued to employ local tribesmen and to provide support through extension work to improve infrastructure and agriculture, meanwhile the wildlife population continues to grow.

### *Key factors leading to success or failure*

- Multispecies hunts;
- Conservation Champions;
- High value, Low off-take, allowing population recovery;
- Community buy-in and agreement;
- Community benefits through, employment, infrastructure projects and agricultural outreach.

### *Issues for the future*

This successful markhor project appears to provide a model for other communities to emulate, but results from Mexico suggest that increasing the supply of trophies may reduce prices and impact the projects (see Reidl, 2006).

### *References*

Frisina, M.F. and Tareen, N.A. 2009. Exploitation prevents Extinction: Case study of endangered Himalayan sheep and goats In Dickson, B. et al 2009. Recreational Hunting, Conservation and Rural Livelihoods: Science and. Practice. ZSL Wiley.

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## E. Trophy Hunting - Mexican Population of Bighorn Sheep (App. II)

In the 1970s the Isla Tiburon population of Bighorn Sheep *Ovis canadensis* was established in Mexico, to build the population in a secure, but non-native environment for later reintroduction to the species' historic range. The project involves government agencies, NGOs, researchers and the Seri community, an indigenous group who were granted communal possession of Isla Tiburon. The project aims to: guarantee the survival of the Bighorn Sheep population; to establish a hunting program that benefits the Seris; and to contribute to the recovery of the species in its historic range. The sheep population has increased and been reintroduced elsewhere. Meanwhile, hunting permits have been auctioned and the Seri community have received around USD 3 million. The increased income to the community has been associated with changes in culture and lifestyle, including alcohol abuse. Recently, income to the Seri community has decreased due competition for sale of trophy hunts with other areas where sheep have been re-introduced.

### *Key factors leading to success or failure*

- Initial population protection, allowing the population to flourish;
- Managed trophy hunting has provided high levels of income to the community who have land tenure;
- Unaccustomed income levels have caused social problems;
- Competition with other hunting areas is now reducing income to this area.

### *Future Issues*

- Market factors influencing trophy prices;
- Community investment programmes to manage changes in revenue generation.

### *References*

Reidl, P.M. 2006. A Mexican experience combining international trade regulations, species conservation and benefits for a local community, CONABIO, Mexico. CITES Livelihood Workshop Report.

## F. Hunting - Large mammals in Thailand (Apps. I, II & III)

Depressed mammal densities characterize the interior of many Southeast Asian protected areas, and are the result of commercial and subsistence hunting. Local people are part of this problem but can participate in

solutions through improved partnerships that incorporate local knowledge into problem diagnosis. The process of involving local people helps build a constituency that is more aware of its role (positive and negative) in a protected area and generates site-specific conservation assessment for management planning.

A project in Thung Yai Naresuan Wildlife Sanctuary in Thailand illustrates the practical details of initiating such a partnership. In local workshops, village woodsmen were led through ranking exercises to develop a spatially explicit picture of 20-year trends in the abundance of 31 mammal species (mostly CITES listed) and to compare species-specific causes for declines. Commercial poaching (for meat, hides, trophies and medicine) contributed heavily to extensive population declines for most species and subsistence hunting was locally significant for some small carnivores, leaf monkey, and deer. Workshops thus clarified which species were at highest risk of local extinction, where the most threatened populations were, and causes for these patterns. Most important, they advanced a shared problem definition, thereby unlocking opportunities for collaboration.

As a result, local people and sanctuary managers have increased communication, initiated joint monitoring and patrolling and established wildlife recovery zones. Using local knowledge was noted to have limitations, but the process of engaging local people was considered to promote collaborative action that large mammals in Southeast Asia need.

Five working principles were used to guide bridge building:

1. Provide stakeholders the opportunity to practice working together
2. Make values explicit
3. Be prepared to work with a small nucleus of people
4. Focus on one issue
5. Reframe management questions to focus on the problem and not on who to blame

#### *Key factors leading to success or failure*

- The local people consider the area in question to be their home;
- The local people were invited to help define and solve the problem;
- Facilitating joint fact-finding expeditions between local people and protected area staff can build the confidence to work together successfully at a later stage, such as in a workshop;
- Joint patrolling (local people and protected area staff) can inspire other villages to adopt the same system;
- The long term (six year commitment) involvement and persistence of a third party (e.g. NGO) were considered instrumental to success. Where mistrust and conflict predominate, and communication has broken down, a third party is often necessary to bring stakeholders together.

#### *Future issues*

- Many protected areas in Southeast Asia present similar opportunities;
- Wildlife workshops are more likely to be successful where local people have a long history in the area and a strong stake in the shape of their relationship with protected area authorities;
- Conflict between local people and protected area authorities has not disappeared, especially regarding agriculture, but there is fresh confidence to work together on wildlife issues;
- Approaches that incorporate local peoples' historical perspective and ecological knowledge generate a shared conservation assessment that leads to better planning.

#### *References*

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# III. Trade in Live Animals and Plants

## A. Seahorses (App. II)

#### *Stricter domestic measures*

Seahorses are an important ingredient in traditional medicines when dried, and have been increasingly in demand for the live aquarium trade. During the 1980s and 1990s, trade in seahorses swept around the

globe, serially from one population to another, suggesting that as populations were depleted, the trade moved to new areas. This led to the Appendix II listing of seahorses which came into effect in 2004, to regulate trade to ensure sustainability. The entry into force was delayed for 18 months to allow Parties to establish necessary procedures and minimum size limits were established to assist in the making of non-detriment findings. A major concern was domestic legislation in the Philippines, where national legislation bans trade in Appendix II listed species. Trade data from the CITES database, indicates that reported imports to EU countries from the Philippines peaked in 2003 and declined from 2004 onwards (A. Rosser pers. obs).

Seahorses are collected by artisanal fishers and sold on. In some areas, "*Project Seahorse*" has been working with such groups, to develop alternative livelihoods and to encourage fishers to establish protected areas, to allow stock to increase. These approaches have met with some success, but the Appendix II listing is thought to have reduced livelihood opportunities in Philippines where stricter domestic measures means that export of Appendix II listed species are banned.

The Appendix II listing has also resulted in development of captive breeding of non-native species for export from Sri-Lanka. As export of captive-bred specimens is deemed simpler than making non-detriment findings for native species, local fishermen are often excluded from the trade, thus removing requirements for monitoring of local seahorse populations. Recent modelling with a European species suggests that increasing the minimum size of fish captured, could increase population viability and lead to longer-term increases in income. This is provided that fishers could be supported in the short short-term whilst changing their fishing habits and allowing populations to recover.

#### *Key factors leading to success or failure:*

- Stricter Domestic measures;
- Burden of non-detriment findings;
- Delay of listing entry into force, supposedly allowed Parties to make provisions for implementation;
- Community-based project have been developed with outside donor assistance.

#### *Future issues*

- Will captive breeding undercut the live market?
- How to support fishers in dealing with traders who now have permitting costs to meet?

#### *References*

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### B. *Amazona aestiva* (App. II)

#### *Stricter domestic measures*

The Blue-fronted parrot *Amazona aestiva* was an important flagship species for an innovative programme of the Argentine government that aimed to contribute to local livelihoods. The programme of regulated trade of blue-fronted amazons *Amazona aestiva* from the Chaco region, was designed to replace a high volume and poorly regulated trade that yielded only minor revenues to local people. As a result of the project, the regulated trade was much reduced from the unregulated levels. Moreover, revenue from the programme reportedly financed three strictly protected areas of the species habitat, and provided almost 20% of annual family income for peasant landowners, countering pressures for agricultural intensification and conversion to soybeans. However, the issue of stricter domestic measures in the US and the European ban on imports of wild birds, designed to protect Europe against the introduction of bird flu have impacted the programme removing conservation incentives and livelihood contributions from the project.

#### *Key factors leading to success or failure*

- Investment by the government;
- Discussions and support for stakeholders;
- Open market for the live birds.

### *Future issues*

- Availability of other markets?
- Illegal trade?

### *References*

Cooney, R. & Jepson, P. 2006. The International Wild Bird Trade: What's Wrong With Blanket Bans? Oryx, 40, 18–23.

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## C. Bulb Propagation *Galanthus* (App. II)

In the mid 1980s the trade in *Galanthus* spp. bulbs from Turkey was believed to be unsustainable. A project was developed to work with villagers to develop cultivation of the bulbs as a means of contributing to local livelihoods and reducing the impact of wild collection on the species. Villagers collected bulbs from necessity rather than preference, and collection was both organized and *ad hoc*. Villagers received less than 1% of the final sale price. Bulbs were exported by five main traders to Netherlands for re-sorting and dispatch to the UK, US and Germany. The project organized the donation of seed bulbs by the exporters. These were wild collected bulbs that were too small to export. Villagers planted these bulbs in marked areas around the village and after three years, the bulbs were harvested and the small daughter bulbs replanted for subsequent harvest in three years time. The exporters paid a premium for artificially propagated bulbs and eventually villagers were getting 12% of the final market price.

In all, three villages of over 250 people were ultimately involved with the project. The project used existing trade structures, complied with regulation through national legislation, and undertook monitoring of overseas suppliers, and awareness raising with customers about conservation issues. In particular the project worked to provide rural development support, local horticultural training, and worked on international legislation, fair-trade, and environmental consumer issues.

### *Key factors leading to success or failure*

- An integrated approach to local development issues;
- Support from international donors & national government;
- Customer awareness raised and price premium sought;
- Existing trade structures used;
- Project improved husbandry techniques;
- Discussion over classification of production techniques as ranching/propagation;
- Increasing capture of value;
- Trade restricted to relatively few traders.

### *Future issues*

- Could certification help to generate revenue for the local community?

### *References*

Entwistle, A., S. Atay, A. Byfield and S. Oldfield. 2002. Alternatives for the bulb trade from Turkey: a case study of indigenous bulb propagation. *Oryx* (2002), 36:4:333-341.

## D. Orchids, Cacti & Succulents (App. I)

Artificial propagation is recognized as a means of reducing collection from the wild but allowing trade in specimens of species listed in Appendix I (Res Conf 9.19 Rev CoP13 on Guidelines for Nursery Registration). So this mechanism would allow species listed in Appendix I to contribute to livelihoods. However, whilst there are now 108 nurseries registered to export Appendix I listed specimens these are from only 11 countries. Of these, 10 nurseries are from European countries, 91 from India and the remaining seven from the high biodiversity countries of Chile, Colombia, The Democratic Republic of Congo, and Malaysia and Myanmar. Thus the majority of options for CITES to contribute to livelihoods is through trade of Appendix II listed species as so few nurseries are registered to export Appendix I specimens.

More work may be needed to register nurseries in range states that can contribute to livelihood generation.

# IV. Products – Medicinals & Aromatics

## A. Medicinal - *Harpagophytum* Potential Listing & Certification

*Harpagophytum* or Devil's claw (*H. procumbens* and *H. zeyheri),* is collected manly from three Southern African countries, Botswana, Namibia and South Africa and exported, to Europe, to treat rheumatism and arthritis. It is estimated that around 9,000 of the poorest people in the region depend on wild collection, in some cases as their only source of cash income, thus their continued involvement in the trade is crucial to their livelihoods (Wynberg, 2004). However, concern over sustainability of the wild resource led to a proposal by Germany to list the species in CITES Appendix II in 2000 (CITES, 2000). Meanwhile a desire to standardize the chemical properties of collected material has led to experimentation with domestication. The withdrawal of the listing proposal under heavy pressure from Namibia was subsequently followed by a process of consultation and reviews of information by the CITES Plants Committee and ongoing work, by consumer nations, range states, conservation agencies and NGOs to support local communities. This consultative process let to the development of methods to: improve sustainability of wild collection, and to empower local resource holders to implement harvesting restrictions (D. Newton, pers. comm.).

Although poor communities continue to benefit from this industry it is clear that government oversight in combination with strong NGO involvement is required to implement sustainable harvesting techniques and to encourage industry to pay premiums for material harvested in a sustainable manner. As is typical of any free-market system, the fact that some poor harvesters and middlemen cannot be drawn into a co-ordinated national or regional marketing or trade plan and are willing or forced by circumstance to buy and sell at lower prices undermines efforts to pay premium prices to communities implementing sustainable harvest methods.

Another lesson from this case study is that the international attention focused on the Devil's Claw resource for about five years through the CITES Plants Committee and a regional Devil's Claw Working Group, assisted range state governments with their planning and conservation interventions without the species ultimately being listed on CITES. This highlighted an issue sometimes overlooked by CITES Parties that listing complements domestic management of resources rather than replacing it and therefore in some cases a CITES-listing may not add sufficient ongoing management value for it to be adopted. This is despite the value of CITES to provide a trade monitoring mechanism allowing range states to track international and domestic trade trends for management purposes.

According to Cole (2006), the proposed listing of *Harpagophytum*, reduced interest from niche markets, since the proposed listing suggested concern over sustainability issues; it reduced harvester prices by reducing the numbers of buyers and it further stimulated domestication projects. The proposed listing also stimulated interest in certification projects, with the possibility that CITES could become a seal of sustainability.

### *Key factors leading to success or failure*

- Dialogue allowed projects and reporting structures to be put in place with the intention of safeguarding livelihoods, but not apparently before harm had been done to the market. It is not clear whether the damage arose from the listing proposal - at most it was one of several factors influencing the market, the other being normal market fluctuation (since that time the price has fluctuated up and down several more times), and the presence of many other poor people and traders in the market who do not participate in certification schemes, who sell at lower prices and hence undermine attempts to bring more certainty into the price structure (D. Newton, pers. comm.).

### *Future Issues*

- *Harpagophytum* provides a useful case study of a species that has been proposed for, but not included in, the CITES Appendices.
- Need to re-assure the market that CITES listing can be positive. This was not done in Namibia, the main focus during the proposal discussions was highly negative towards the proposal with little time given to the positive aspects of a listing. This reaction was not unreasonable as the proposal came as a surprise and gave little time for proactive engagement. In hindsight, a process of engagement six months before the proposal was submitted could have allowed time for careful consideration of the facts, including livelihoods, and produced a different result. The attitude toward the *Hoodia* listing was very much more positive perhaps because the NA government was trying to proactively build in a livelihood based annotation.
- Need for harvesters etc to have a voice. In the case of Devil's Claw, the harvesters' voices were largely through NGO's. In reality the communities were guided by the NGO's rather than the other way round. CITES and its effects were simply not understood by most people involved in the community end of the industry and at the time of the listing proposal there was too little time to

generate the data necessary to improve understanding. Perhaps greater collaboration between Germany and Namibia before the listing was presented could have solved this. Obviously it is important for poor people to have a voice but it needs to be based on informed consultation and understanding – a very challenging goal to achieve given the very isolated and desperate circumstances that some communities find themselves in. In Namibia it is often only the NGO's, and very rarely government staff, that are able to get into distant parts of the country to meet with poor communities (D. Newton, pers. comm.).

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## B. Medicinal - *Prunus africana* (App. II)

*Prunus africana* bark is used internationally in the production of medicines to treat prostate problems, and is used locally for medicine and timber products. The species was listed in Appendix II in 1994, and has been the subject of significant trade reviews and recommendations by the Plants Committee. In 2009 five Parties had issued quotas (four of which were zero quotas).

A review of the trade notes that, following extensive debarking or felling of whole trees, the species was listed in Appendix II in 1994. However, despite significant efforts in Cameroon, the source of most trade from mainland Africa, from government, business and local communities, problems remain in many areas including tenure arrangements, enforcement, sanction mechanisms, corruption, accountability, incentive structures and sustainable use. The greatest benefit of management efforts have been the creation of a broad awareness of the need for sustainable use of forest resources (Abensperg-Traun, 2009).

One study in Cameroon reported how commercialization of *Prunus* sp. collection has contributed to local livelihoods, contributing to community infrastructure projects as well as to individual livelihoods (Ndam & Marcelin, 2004). Bark collection is seasonal, and attracts migrant workers, however wild collection from state forests is gradually being complement by domestication with the aim of further supply from village lands. The local harvesters receive a small percentage of the final price, and although organized in harvesters associations, require further support in this regard. The study concluded that further work is needed on regulation, recognizing customary rights and sharing of benefits and on technology and development of scientific basis for non-detriment findings.

TRAFFIC South Africa and the CITES Secretariat facilitated a *Prunus africana* workshop to guide the governments of the main range states in the direction of a management plan for the species. The issue of livelihoods was not addressed due to time constraints, although the topic was raised numerous times. Ideally some sort of simple management plan, accompanied by practical facilitation is needed, but this is only likely to be effective if all parties work in a collaborative manner (D.Newton, pers. comm.).

### *Key factors leading to success or failure*

- The combination of a high value product and absence of a simple management system to regulate the trade has lead to unsustainable harvest;
- More sustainable collection methods;
- Donor support;
- Seasonal harvests do not clash with agricultural year;
- Harvester organisations are needed to control trade.

### *Future issues*

- Recognition of customary rights and benefit sharing.
- Development of a simple management system.

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## C. Medicinal - *Hoodia* spp. (App. II)

*Hoodia* spp occur in southern Africa. Certain species, such as *H. gordonii* produce a complex of substances that have appetite suppressant properties, they are also used as ornamental plants.

Trade in the genus reached a peak during the period 2003 to 2007 causing widespread damage to wild populations of *H. gordonii* and to a lesser extent other *Hoodia* species. Consequently, in 2004, the genus *Hoodia* was listed in Appendix II with an annotation that indicated that CITES permits would not be needed for products produced from controlled harvesting and production operations collaborating with the CITES authorities in Botswana, Namibia, and South Africa (Anon 2008a.). Effectively this would require that trade not managed by the range state authorities would be subject to CITES controls. According to the proponents the intent was to encourage pharmaceutical companies to deal directly with range states to deliver added value in the countries of origin. However, whilst recognizing the importance of supporting livelihoods, Switzerland placed a reservation noting that the annotation goes beyond the remit of CITES, regulating in effect only material from artificially propagated sources, or sources not working with the range state authorities (Swiss CITES MA, 2005). None of the range states have thus far entered into commercial agreements with companies and so in effect trade in the entire *Hoodia* genus is controlled under Appendix II with no exceptions.

By 2009 the wild collection industry had virtually shut down because of a glut of artificially propagated material and a decision by Unilever to pull out of the industry which benefited relatively few people, mostly farmers and business people in the medicinal plants industry in Namibia and South Africa. The only poor people to benefit were farm workers (local and imported from the cities) and this was curtailed by seasons and cancellation of permits to harvest wild plants. The only exception to this was the agreement signed with the SAN Council that allocated them (a trust fund) a portion of profits from the business based on their intellectual knowledge relating to use of the plant as an appetite suppressant (see the extensive work by Rachel Wynberg 2008 and 2009). Now that the industry has gone into decline, due to Unilever pulling out, the value of this agreement is questionable. There is still a demand for *Hoodia* but mainly for rough medicine and it is unclear how much benefit will accrue to poor people.

### *Key factors leading to success or failure*

Unilever's decision to cease trade in *Hoodia* has lead to a dramatic decline in the industry and its future remains uncertain. The continuation of the industry will depend on how much value is attributed to the inherent medicinal value of the plant and to some extent its ongoing use as a rough medicine driven by its perceived or actual medicinal value and whether any other large industry players enter the space left by Unilever. The decline of the formal medicine market represented by Unilever leaves the future of the industry largely in the hands of the rough medicine market which does not add a huge value to the product in South Africa or Namibia as it is mainly dried plant material that is exported and value added in the importing country. Income from this is likely to be small in comparison and income streams to poor communities and the San Council will also decline. Unless value is added by entry of other large companies it is hard to envisage a more lucrative future for the industry and beneficiaries. As the annotation for this species is based on commercial agreements, its future without substantial corporate interest seems somewhat uncertain; and this similarly seems to limit livelihood options (D. Newton, pers. comm.).

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Swiss CITES MA. 2005. Anon. Annotation #9 and the guiding principles for annotations relating to medicinal plants PC15 Inf 8.

## D. Aromatics – Agarwood (App. II)

Agarwood is an aromatic material used in the production of incense. It comes from fungal infections of trees in the genera *Aquilaria* and *Gyrinops*. In 1995, *Aquilaria malaccensis* was listed in CITES Appendix II, and in

2005, the remaining species in the genera *Aquilaria* and *Gyrinops* were also included in Appendix II. Mostly, agarwood harvesting is done by organised groups, but there may also be some opportunistic harvesting. The majority of the harvest is likely to be destined for international trade. Studies in Lao PDR suggest that harvesters obtain a comparatively high proportion (20%) of the final sale price at national level compared to other NTFPs. This high price means that agarwood makes a significant contribution to livelihoods. However, the resource seems to be declining in all range states and more time is required on harvesting trips to gain comparable returns, even though prices are increasing in line with scarcity of the resource.

Since the CITES listing, plantations have been developed in some countries ranging from small scale home gardens to larger commercial enterprises, have generally increased with levels of scarce supply, particularly for higher quality grades.

#### *Key factors leading to success or failure*

- High Value;
- Lack of enforcement;
- High proportion of final price captured by harvesters;
- Donor and Business investment in experimental inoculation and plantation.

#### *Future Issues*

- Sustainability;
- Tenure & Governance.

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# V. Products - Timber

## A. *Dalbergia melanoxylon* Proposal for App. II

*Dalbergia melanoxylon*, Mpingo, is used as a specialist wood in the manufacture of wind instruments and so can command a relatively high price. *Dalbergia* was proposed for inclusion in CITES Appendix I in 1994, but the proposal was defeated. Following this, a project was established to work with the local community to develop participatory forest management for a sustainable supply of the wood. The project was developed on the rationale that if the stocks can be rebuilt, then the community stands to benefit substantially from a managed certified trade, in this high value product. The project has already helped to empower the community to seek funds from mineral prospectors, and to seek grants for alternative small scale enterprises etc.

#### *Key factors leading to success or failure*

- Unsuccessful listing proposal;
- High value product;
- External donor support;
- Community willingness to participate.

#### *Reference*

FFI. 2008.Participatory Forest Management: Mpingo Conservation Project, Tanzania. In FFI. 2008. Biodiversity Conservation and Human Needs: A Compendium of Case Studies, Lessons and Recommendations.

### B. Mahogany (App. II)

In the Maya Forest of Mexico – land is managed communally, by ejidos. These areas are used for timber production s well as farming. Mahogany, is the most valuable product, commanding higher prices that the softwood and other hardwoods produced in the region. The ejidos now have management plans and operate a 25 year cutting cycle. In addition, experiments on mahogany regeneration have shown that collecting seeds, producing seedlings and replanting in large areas of disturbance is beginning to show positive results. These locally managed forests are contributing to local livelihoods.

#### *Reference*

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## VI. Products – Fibre & Skins

### A. Vicuna fibre (Apps I & II)

As a native species, the vicuna is perfectly adapted to the harsh climatic conditions of the region, making it ideal as a renewable animal resource. The species also plays a very important role in the ecosystem (I. Sanchez, pers.comm.).

Vicuna populations were included in Appendix I in 1975 as numbers had been driven to low levels by competition with livestock, and poaching. Following the listing in Appendix I, the species has shown dramatic population recovery, resulting in some conflict with local people over grazing competition. During the late 1980s and 1990s, many populations were moved to Appendix II, latterly for the purposes of live shearing and allowing trade in this wool and products made from it, provided that such products are marked with the range state origin (all other products remain in Appendix I). This shearing is reportedly also successful in delivering benefits from wool sales to local people. The management differs between range states depending on their socio-economic climate and policies.

In Bolivia and Peru, the traditional Inca Chakus or round-ups are used. In contrast in Argentina, where land is generally in private ownership, the vicuna are maintained on ranches and in Chile there is a mixture, with Chakus on communal lands and ranches on private lands. There are concerns that the development of these fenced areas in some countries could lead to population fragmentation and genetic erosion. In Peru, the live capture and shearing has been shown not to adversely affect population status. There have also been issues about distribution of benefits, role of privatization, and issues associated with the marketing boards. Modelling studies have recently warned that if community based conservation is not implemented carefully, its impact can be perverse.

National censuses carried out by various bodies (PEURV, INRENA and CONACS) showed that vicuna populations increased in Peru from a few thousand individuals in the 1960s to around 120,000 by 2000. In 1994, local communities were permitted to use vicunas sustainably. Ensuring the conservation of the species, however, remains the responsibility of The Government (I. Sanchez, pers. comm.).

Law No. 26496 officially recognised over 600 local community organisations as entitled to sustainably use the species. This has been a successful experience where local communities manage the trade and it has placed Peru as a leader in the recovery and sustainable use of a threatened species. It has also had a positive impact on the cohesion of local communities, as the whole community, including men, women and children, needs to get involved (I. Sanchez, pers. comm.).

Despite the social and economic importance of vicunas to local poor and very poor communities in Peru, lack of infrastructure, including access roads to areas where shearing takes place is a common problem to fibre producing organizations, limiting their ability to profit from the trade. In 2008 the national market price for kilo of dirty wool was between US$350 and US$380. Combed fibre can reach US$650 per kilo. Local women are responsible for combing the wool, receiving US$70-140 per kilo. Export prices per kilo are much higher, from $400 for dirty wool, to US$1,575 for combed wool (I. Sanchez, pers. comm.).

More than 5,680 communities (>2 million people, or 40% of the total rural population) control 39.8% of agricultural land, mostly natural pasture in the high Andes. Most of these people live in conditions of extreme poverty. To ensure sustainable development, these communities need to be officially recognised and allowed to benefit as much as possible from the trade in vicuna wool (I. Sanchez, pers. comm.).

Lichtenstein (2009) notes that despite the high international commercial value and world demand for vicuña products, benefits for local communities remain elusive and that intermediaries capture much of the value of the production chain. In addition the vicuña fibre market comprises a few large buyers and a large number of sellers (oligopsony), which puts control of the trade and most of the profits with the buyers. Lichtenstein reports that a key issue in tackling poverty alleviation is to secure exclusive usufruct rights of vicuñas to Andean communities.

#### *Key factors leading to success or failure*

- Ban in trade contributed to long-term population recovery;
- Split-listings allowed some experimentation with novel approaches to develop sustainable collection methods;
- High value product;
- Marketing board restricts supply and keeps prices high;
- Donor investment in projects to develop the new approach.

#### *Future issues*

- Need for consumer marketing of sustainable products;
- Need for in-situ production, and review of captive husbandry;
- Equitable sharing of benefits with the poor;
- The vicuña provides a particularly relevant case study for future consideration of livelihoods impact.

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## B. Ranched Crocodilian skins (Apps I & II)

Following large population reductions in a number of crocodilian species populations (although the status of some species were contested), many species were included in Appendix I in the early days of the Convention, banning commercial trade. However, a number of trading states were non-parties and continued to trade and others took reservations for the particular species which allowed them to continue to trade. So application of the Appendix I listing was patchy, allowing some trade to continue. In addition, the Convention allows specimens of Appendix I species bred in captivity to be traded as Appendix II specimens, thus encouraging a switch from wild caught to captive-bred specimens. In the meantime, as the definition of bred in captivity was tightened, so the procedure for transferring crocodilians to Appendix II for ranching purposes was brought in and this effectively resulted in split listing of several taxa. Ranching of crocodilians increased during the 1980s and 1990s, but is increasingly turning to captive breeding, which has very reduced linkages to wild populations. As ranching and captive breeding have grown, producers have faced some difficulties in marketing their products, particularly in the face of public perceptions that crocodilians are endangered, and some prices are declining. Meanwhile, in livelihood terms for the poor, there is concern that entry barriers in terms of investment are too high, for the programmes to benefit local people except through seasonal egg collection and employment. Interestingly, a recent study in Cambodia has shown how crocodile farming has increased demand for water snakes as a food source for the crocodilians, and snake harvesting now contributes to seasonal smoothing of vulnerability of the poor, although the impacts on snake populations

may be of concern in the future. If crocodilian production is to continue to contribute to conservation and to livelihoods of the poor, marketing of sustainably produced crocodilian products to consumers coupled with better sharing of benefits with the poor will be required.

### *Key factors leading to success or failure*

- Ban in trade contributed to Population recovery;
- Reservations to Appendix I listing allowed some trade;
- Ranching provisions;
- Split listings;
- Individual/ commercial investment in crocodile facilities;
- Some to luxury goods market.

### *Future issues*

- Need for consumer marketing of sustainable products;
- Need for in-situ production, linking production with the poor;
- More equitable sharing of benefits with the poor.

### *References*

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## C. Peccary skins (App. II with zero quotas)

Peccaries are included in Appendix II and produce a high grade leather in international demand. Following significant trade reviews in the 1990s, and concern over the high level of export of peccary skins, trade was banned from many range states. Thus those involved in the trade lost much of their revenue. Meanwhile, subsistence hunting – which was the main source of benefit for the poor continued despite the lack of value for the skins. In Peru, projects to develop added value for the skins in exchange for implementation of sustainable forest management have been developed with the assistance of donors and NGOs. Communities are working to develop management plans and to regulate their hunting of forest animals and collection of plant products to sustainable levels. Once sustainable harvests are in place and verifiable, then pelts can be certified as emanating from forests that are managed for sustainable use. Peccary pelts provide a specialist high end leather product and as such it is anticipated that a certification programme should increase benefits to local communities. However, the development of such programmes requires substantial financial and human inputs and may do so for some time.

### *Key factors leading to success or failure*

- Population recovery; reduced consumption; investment in experimental projects
- High value skins;
- Local communities have rights to use natural resources;
- But in neighbouring logging concessions, wildlife hunting is likely to be unsustainable.

### *Future issues*

- Individual returns on skins uncertain;
- Management of hunting for sustainability should allow continued hunting, but at lower levels than in the past.

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