Local Commons for Global Benefits: *Indigenous and community-based management of wild species, forests, and drylands*

A STAP document

August 2019

STAP
SCIENTIFIC AND TECHNICAL ADVISORY PANEL
An independent group of scientists that advises the Global Environment Facility

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The Scientific and Technical Advisory Panel (STAP) comprises seven expert advisors supported by a Secretariat, who are together responsible for connecting the Global Environment Facility to the most up to date, authoritative and globally representative science. http://www.stapgef.org

ABOUT GEF
The Global Environment Facility (GEF) was established on the eve of the 1992 Rio Earth Summit, to help tackle our planet's most pressing environmental problems. Since then, the GEF has provided over $18.1 billion in grants and mobilized an additional $94.2 billion in co-financing for more than 4500 projects. The GEF has become an international partnership of 183 countries, international institutions, civil society organizations, and the private sector to address global environmental issues. http://www.thegef.org

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SUMMARY

A large proportion – up to half – of the world's land area is used or communally-managed by indigenous people and local communities (IPLCs). This includes a large share of the planet's remaining high-quality, high-biodiversity ecosystems. These lands are critical for achieving global environmental benefits related to biodiversity, climate change mitigation, and addressing land degradation through the management and conservation of wild species, forests, and drylands – here collectively referred to as "wild resources".

However, governance over much of these lands is weak. Communities have no legally recognized tenure – a fundamental basis for robust governance – over around 80% of this area. At the same time, central governments often lack the capacity and resources to effectively manage these vast and often remote lands. This creates *de facto* "open access" areas susceptible to uncontrolled and destructive exploitation, which may be via mining, logging, agricultural encroachment, hunting, or wildlife trafficking.

Strengthening community rights to manage land and resources is showing promise as an approach to deliver on biodiversity, climate change mitigation, and land degradation objectives. For example, analyses have found that legally-supported community-managed forests perform as well or better than traditional, state-managed strict protected areas, in terms of avoiding deforestation, maintaining forest condition, and retaining carbon.

Clear principles and fundamental design characteristics have emerged from extensive research to guide interventions to support and establish robust governance of local "commons" – and interventions often fail when these are not followed.

Where Global Environment Facility (GEF) programs and projects involve lands and resources legally or *de facto* used and managed by indigenous peoples and local communities, STAP recommends that:

(i) projects include institutional drivers (such as insecure or weak tenure) in problem analyses, and consider how shifting the rights, incentives, and capacities facing IPLCs could lead to transformative change; and

(ii) projects to strengthen or establish community-based management incorporate fundamental design characteristics such as: encouraging the establishment of secure land and resource tenure for IPLCs; supporting inclusive, equitable, and effective community governance; and enhancing the financial and non-financial benefits that communities can gain from the sustainable use of wild resources and ecosystem services.

There is a clear need and opportunity for the GEF to stimulate transformational change through restoring, strengthening, or establishing sound and inclusive community-based governance of traditional "commons", promoting achievement of global environmental benefits.

The importance of community-based management of lands and resources has been recognized in relevant international conventions such as the Convention on Biological Diversity (CBD) that provide guidance to the GEF, with the emergence of new approaches and tools. This is evidenced in Aichi Target 18 of the CBD[1], and the CBD's recognition of the importance of "other effective area-based measures" (OECMs)[2] alongside traditional state-run protected areas as a key means to conserve biodiversity.

In GEF-7, this is particularly relevant for the Sustainable Forest Management and the Food Systems, Land Use, and Restoration Impact Programs[3], as well as for set-aside funds for "Inclusive Conservation"[4] in the biodiversity focal area. This issue is also important for the GEF Small Grants Programme (SGP), which provides financial and technical support to communities and civil society organizations (CSOs) to generate global environmental benefits through community-based initiatives and actions.

1. WHAT IS THE ISSUE?

Effective governance is lacking over large areas of the Earth's surface that are inhabited, managed, or used by indigenous peoples and local communities (IPLCs), primarily in forest and dryland areas with the high levels of biodiversity they contain and the high levels of carbon they store. Systems of traditional communal management of wild resources, have widely broken down, are undermined by the lack of formal rights, or face new challenges that threaten to overwhelm them[5]. Governments often lack the capacity and resources to impose and exercise effective governance over these areas.

Consequently, the lack of clear and enforceable local tenure rights can lead to a governance vacuum at the local level, creating "open access" conditions that enable deforestation and illegal timber extraction, illegal mining, and wildlife trafficking. These lands are important both for alleviating poverty and supporting the livelihoods and cultures of large numbers of people, and for the achievement of global goals of combatting climate change, and conservation and sustainable use of forests, drylands and biodiversity.

There is an urgent need to restore and strengthen effective and inclusive community-based governance of these traditional "commons" [6]. The GEF can generate multiple local and global benefits by helping to strengthen community land and resource tenure, promoting equitable benefits from wild resources, supporting effective community governance, and building local capacity to manage natural resources.

2. WHAT DOES THE SCIENCE SAY?

The importance of Indigenous and communally-managed land for biodiversity, carbon change mitigation, and addressing land degradation

A vast area of land on Earth is used, managed, or governed *collectively*, under community-based governance, by indigenous peoples and local communities (IPLCs)[7]. Indigenous peoples' lands make up around 28% of the Earth's surface[8] (almost 38 million km^2); where other forms of communal management are included, estimates range up to 50%[9], covering a wide range of biomes including forests, rangelands, deserts and coastal areas. These figures include areas where IPLCs have legally recognized rights, as well as areas where they lack such rights but in practice claim, use, and manage land and resources, usually on a longstanding customary basis.

These lands are significant for future strategies and investments for conservation of biodiversity, climate change mitigation, and addressing land degradation. Land traditionally managed by indigenous peoples includes almost 40% of all remaining "natural lands" across the Earth, i.e., lands with relatively sparse human populations, intact ecosystems, and consequently high biodiversity and carbon storage. About 40% of the total current global protected area overlaps with indigenous land[10]. At least 17% of carbon stored globally in forest lands (almost 300,000 million metric tons (Mt) of carbon, above and below ground) is in forests collectively used and managed by IPLCs[11]. Areas managed by IPLCS (under various types of tenure and access regimes) are facing increasing resource extraction, commodity production, mining and transport and energy infrastructure[12].

These lands and their wild species are also important to the livelihoods, food security, and health of billions of people fully or partially dependent on them, and their management is significant to achieving environmental objectives in a manner supportive of broader sustainable development goals. While estimates are necessarily imprecise, up to one-third of the current world's population (up to 2.5 billion people) depend on indigenous peoples' and community land, including particularly the world's poor and the majority of the very poor[13]. An estimated 1.6 billion people are dependent on forests[14], and as much as 500 million on pastoralism[15]. The harvesting of wild/uncultivated plants, animals, and fungi (for food, fuelwood, health care, etc.) provides a substantial array

of products used by rural households, making up almost 30% of global household incomes in tropical forests (thus, nearly as important as crops), particularly on a seasonal basis or as a safety net in times of need[16]. Wild meat is the sole or main source of protein for millions, in savannas and drylands as well as forests[17].

Institutional mismatch: weak governance and weak incentives for conservation in these lands

Governance of these lands, however, is often unclear and weak. An estimated 80% of these lands are publicly owned, and IPLCs do not hold clear, legally recognized rights to manage lands and resources and exclude others from their use[18]. While over recent decades the recognition of indigenous and local community tenure and rights has expanded, such recognition is markedly lower in certain regions (such as Africa, most notably Central Africa, and in parts of Asia – see Box 1)[19]. Even where IPLCs hold rights to land, wild resources are typically governed as the property of the state, with IPLCs having little role in decision-making and having few rights to use.

The lack of clear tenure rights in lands that are inhabited and are – in practice – managed by IPLCs undermines effective environmental governance[20]. States frequently lack the capacity and resources for effective management of the vast and often remote areas involved, such as setting rules, managing use, monitoring and enforcing rule compliance, and excluding unauthorized users[21]. Where resident indigenous and local communities have no rights to exclude intruders or to benefit legally from wild resources over the long term, they likewise lack the ability and incentives to manage these lands.

This creates the condition of *de facto* "open access" to resources – a management vacuum in which no group has the rights, incentives, or capacity to exclude other users and limit use[22]. Such a situation often leads to uncontrolled exploitation, which may be via mining, logging, agricultural encroachment, hunting or wildlife trafficking. Such lands are also vulnerable to the granting of large-scale concessions for commercial agriculture, forestry, and mining, which can lead to large-scale deforestation, species decline, carbon emissions, and land degradation, exacerbated by weak governance relating to the granting of concessions. In parts of Central America, for example, weak indigenous and local title has enabled "land grabs" and illegal activity, leading to loss and degradation of ecologically important habitats while sparking intense social conflict[23].

From a more theoretical perspective, these problems can be viewed as resulting from an institutional mismatch between the type of governance regime in place (public) with the type of resource being governed (common pool). Wild resources frequently do not fulfil criteria for public goods, and thus may not be best managed under public ownership[24].

Where wild resources are publicly owned, this often means that local people cannot use and benefit from them. By contrast, people can derive benefits from communally or privately-owned goods such as livestock and crops. This will often mean local incentives strongly favor the conversion of wild habitats to intensive uses – public ownership can inadvertently drive the replacement of natural ecosystems with domesticated stock and crops. This simple local economic equation (derived from larger scale political dynamics) drives considerable deforestation and habitat loss globally[25].

How can strengthening community rights and management deliver for biodiversity and forest conservation, climate change mitigation, and improved land management?

The weak and insecure governance that drives deforestation, land degradation, and biodiversity loss across lands claimed and used by IPLCs can be addressed by establishing, supporting, or strengthening institutions and capacities for community-based management – rebuilding the local commons. Such efforts draw on the

insights of decades of detailed and careful work, initiated by Elinor Ostrom, that highlight the potential for robust, sustainable communal management over common pool resources[26]. In many cases this will involve legal recognition and practical support for customary practices still continuing on these lands, whereas in other cases, this will require the establishment of new institutions and capacities.

Over the years, various related approaches have been called "community conservation", "community-based forestry", "community-based conservation", "community management", and related terms[27]. Here the term "community-based management" is used to refer to governance approaches that are founded on substantive rights for communities to make decisions about lands and resources, while often sharing power to greater or lesser extent with other entities. Under these approaches, communities are partners: partnership is much more than participation or consultation in a top-down process with predetermined design[28].

Strengthening and securing community rights to land and resources can reduce deforestation and forest degradation and safeguard carbon stores, and under some circumstances does so as well as traditional state protected areas. While not all efforts to promote community-based management have worked[29], empirical evidence from remote-sensing data indicates that legally-recognized indigenous and community management rights have been effective in reducing deforestation and preventing carbon emissions[30] (see Box 1).

Indeed, a number of studies have found that community-managed forests perform *better* than state protected areas in maintaining forest cover and associated carbon stores. For example, a meta-analysis of 40 protected areas and 33 community-managed forests found that community-managed forests presented lower and less variable annual deforestation rates than state-protected forests[31] (see Box 1).

BOX 1.
Performance of community-managed forests in Latin America

Latin America is the region with the highest level of recognition of indigenous and local community rights to manage forests. In a recent study focused on lower and middle-income countries, 7 out of the 9 Latin American countries analyzed had legal frameworks recognizing community-based forest ownership[32], as compared to 5 of 13 in Asia and only 3 of 12 in Africa. Latin American countries recognized indigenous or local community rights over approximately 36% of forest, compared to 32% in Asia[33] and 7.4% in Africa.

These indigenous and community-managed forests perform very well in terms of countering deforestation and storing carbon. For example, rates of deforestation in indigenous and community-managed forests have been found to be six times lower inside than outside these areas in the Bolivian Amazon (0.5% compared to 3.2% outside)[34]; 11 times lower in the Brazilian Amazon (0.6% inside compared to 7% outside)[35]; 20 times lower in community forests with FSC certification[36] in the Guatemalan Petén Maya Biosphere Reserve (0.02 % deforestation compared with 0.41 percent in nearby protected areas)[37]; and 350 times lower in one part of the Mexican Yucatán (0.002% compared with the nearby Calakmul Biosphere Reserve)[38].

These results are not just due to remoteness from pressures. A recent analysis that controlled for confounding characteristics found legally-recognized indigenous management reduced both deforestation and forest carbon

Adobe Stock – Aerial view of mangrove forest and river

emissions in Bolivia, Brazil, and Colombia[39]. An analysis in Brazil comparing indigenous areas to protected areas (and sustainable-use areas) found indigenous areas achieved the greatest avoided deforestation *while* facing the highest levels of deforestation pressures[40].

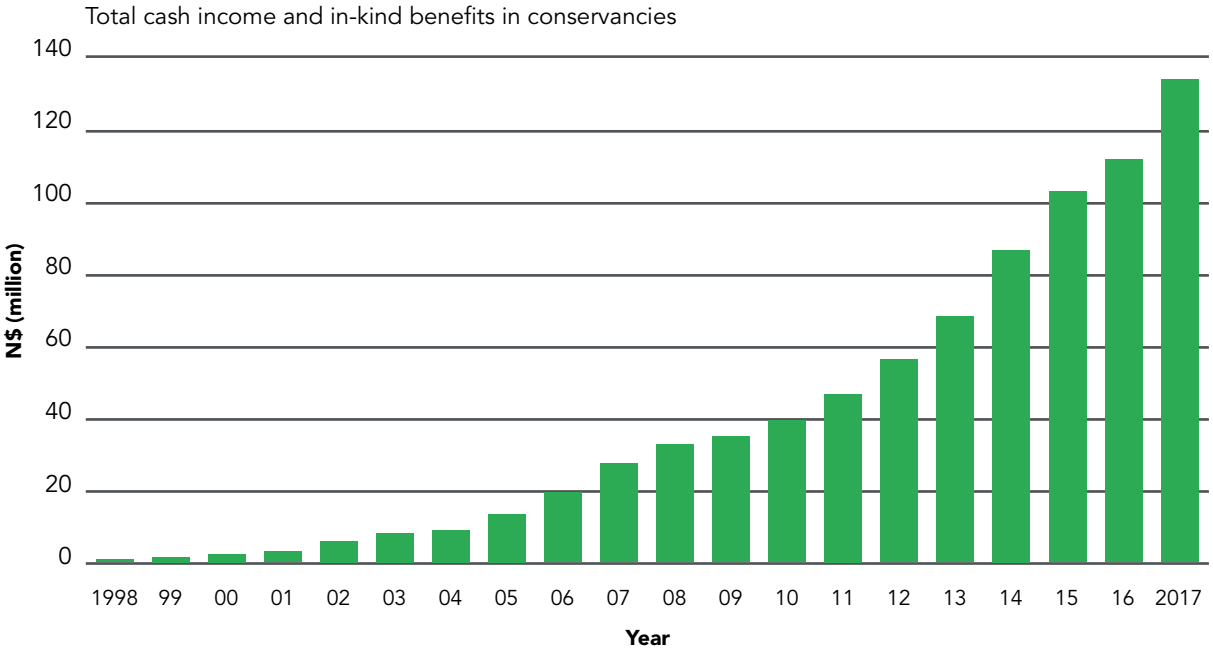
Community-based forest management often delivers greater socio-economic benefits at the same time as supporting conservation outcomes. For example, a study of 84 cases across East Africa and South India found that communities having a legally-recognized decision-making role in forest management was strongly associated with positive outcomes for both forest biodiversity and socio-economic benefits[41]. Likewise, community management was associated with significant net reductions in both poverty and deforestation across Nepal, and increased likelihood of win–win outcomes[42].

Evidence from more local-scale studies indicates the potential of community management of wild species, where (and only where) favorable conditions have been created for these to succeed, including enabling local development of rules around use (see below)[43]. Community management may involve deriving benefits from a variety of forms of use from non-timber forest product (NTFP) harvest and trade, to fishing, to small-scale forestry, to sustainable hunting and tourism. For example, support for well-managed local community-based monitoring and harvesting of the giant *pirarucu* fish (*Arapaima gigas*) in the Amazon has led to flourishing fish populations and restored food security, a reversal from decades of unsustainable overexploitation under top-down government control[44]. Community wildlife management through the establishment of community conservancies in the mountains and pastoral lands of several Central Asian countries has led to increases in species such as Markhor (*Capra falconeri*) and Argali (*Ovis ammon*), as well as their key predator Snow Leopard (*Panthera uncia*). It has also led to reduced poaching and overgrazing and broad social benefits[45]. Strengthening community management by tribal communities of honey and other NTFP in the Nilgiri Biosphere Reserve in India has led to more robust governance of harvest[46].

A pioneering example is Zimbabwe's CAMPFIRE[47] program, which delivered environmental, economic, and governance benefits[48] through empowering communities to manage and benefit from wild species on their lands, including African Elephant *(Loxodonta africana)* and African Lion *(Panthera leo)*. Similarly, Namibia's Communal Conservancy Programme has led to large-scale wildlife recoveries (including desert elephant and lion) in over 80 participating community conservancies supporting over 120 hunting and tourism concessions. Communities receive substantial income and over 500,000 kg of meat annually, a highly valued benefit for protein-poor communities[49] (see Figure 1). A recent evaluation by the GEF Independent Evaluation Office highlighted the Namibia

wildlife project as one of eight "transformational change stories"[50]. Approaches that enable and support community management may be particularly relevant where IPLC rights would be infringed upon by the establishment of state protected areas, where effective state management is unlikely (due to resource and capacity limitations), and/or where indigenous/local knowledge and practices are important for biodiversity conservation.

Figure 1: Benefits of community-based wildlife management in Namibia



(Source: MET/NACSO, The state of community conservation in Namibia – a review of communal conservancies, community forests and other CBNRM activities (Annual Report 2017).

The total cash income and in-kind benefits generated in Namibian conservancies grew from less than N$ 1 million in 1998 to more than N$ 132 million in 2017. Cash income to conservancies derives mostly through partnerships with private sector operators, cash income to residents derives from enterprises (mostly through employment and the sale of products), and in-kind benefits to residents are mostly the distribution of harvested game meat.

Traditional practices of pastoralism and shifting cultivation (swidden or "slash and burn") in forests and drylands have often been viewed as destructive or wasteful, with the corollary that it is necessary to remove local people or change their lifestyles in order to achieve environmental objectives. Shifting cultivation is often blamed for forest degeneration[51], with the implication that a transition to settled agriculture should be preferred. This view of traditional practices, however, has been challenged over recent decades, given various strands of evidence regarding the impact of these practices and the impacts of alternative management regimes. In particular, long-cycle swidden agriculture can sustain high biodiversity/carbon values and soil health, while producing a diversity of goods and services for local people, and it can be more favorable in these terms than settled agriculture[52]. Likewise, traditional pastoralism practices, characterized by high mobility, high labour intensity, and flexible herd sizes, are now generally viewed positively in terms of sustainable use of grazing resources that are highly variable across space and time[53].

Rebuilding management of the local commons

Community-based management is not a panacea, and there is no single blueprint approach[54]: it must be implemented in a way that is appropriate to the local political, cultural, and ecological situation[55]. A diverse range of legal frameworks and policy approaches that enable and support decision-making by communities can be adapted or developed to suit local contexts. These may include, for example, indigenous territories, community forests, conservancies, co-management arrangements or community wildlife management areas. While all community-based management devolves the primary role for decision-making on wild resources to the local level, different approaches retain more or less authority at higher levels. Sub-national and national governments, as well as other entities at regional and global level will typically still have important roles to play. Successful local management is fostered by multi-level governance, and by explicit recognition and integration[56] of a range of objectives of different stakeholders (from local livelihoods and preservation of cultural traditions to global biodiversity and climate protection)[57].

However, establishing the following foundational conditions is generally necessary to create or re-build community-based management of land and wild resources[58].

1. **Clearly defined land and resource rights and boundaries.**

The boundaries and membership of the user group need to be clearly defined. Local people require clear, legally recognized and secure rights to land and wild resources, including right to access, withdraw, manage and use, benefit from, and exclude others.

It is important that the rights to make rules – or at least participate in making rules – about use and management are respected. Where local users of wild resources (such as forests, drylands, and wild species) are involved in making rules and these rules are known, understood, and viewed as legitimate, users are much more willing to invest in monitoring the resource and compliance with rules[59]. For example, greater autonomy of local communities to make rules about use is associated with higher carbon storage, as well as livelihood benefits[60]. This requires a level of trust and respect from external sources of authority.

Many countries lack national policy or regulatory frameworks that recognize and enable community-based management for land and wild resources, for instance by recognizing indigenous or community land tenure, establishing appropriate protected area categories, or allowing community forest or wildlife management. In these countries, addressing this issue should be a primary emphasis, and such frameworks should be developed through a fully inclusive and participatory process.

2. **Value (local benefits).**

The resources must have sufficient (monetary or non-monetary) value to incentivize managing, conserving, and protecting them, through measures such as the development of harvest controls, carrying out monitoring, building governance institutions, and excluding unauthorized users or uses. Values can be spiritual, cultural, subsistence, or financial in nature. Making wild resources competitive with intensive uses may sometimes require boosting commercial values, where these are culturally appropriate and self-chosen by the community.

Such commercial values can often be enhanced by the development of markets and the ability to participate in them (e.g., REDD+[61], tourism); the development of producer associations and cooperatives that enable collective negotiation (e.g., for NTFPs[62], wildlife products); strengthening the ability of communities to value-add to wild products and thereby gain greater benefits (e.g., producing cosmetic or culinary products from wild plants); and the creation of a supportive policy environment, such as the removal of excessive government fees

or administrative hurdles. For example, the promise of gaining benefits from the sustainable, legal trade of CITES-listed American crocodile (*Crocodylus acutus*) in Cispata Bay, Colombia, through downlisting from CITES Appendix I to Appendix II, incentivized local crocodile poachers to invest time and resources into habitat and nest protection and the exclusion of poachers. This has led to sustained population increases and broader conservation and social benefits[63].

3. **Local institutions for inclusive, effective, and equitable decision-making.**

Elite capture of the benefits of wild resource management is a key danger that can stymie robust community-based management and building sound local governance and management institutions is a key requirement for success. Local decision-making tends to operate best where all people affected by resources participate in well-informed decisions about resources, with strong mechanisms in place to ensure that the rights of marginalized groups (including women and youth) are protected from elite capture. Community-based face-to-face governance may be more effective than representative governance[64].

Extensive capacity-building and support in realms such as administration, establishment of governance processes and mechanisms, conservation and harvest monitoring and management, negotiation, enterprise development, representation, and advocacy will often be required.

4. **Supportive and inclusive broader governance and policy environment.**

Community management is strongest where the broader governance environment is inclusive, participatory, and supportive. Multi-stakeholder linkages and partnerships, with a diverse set of partners at different levels (national, regional, international) are typical of successful interventions[65]. Local rights usually require external support to be effectively exercised; for example, communities will often require the support of the state to exclude unauthorized access or use of their forests, drylands or wild species[66].

Strong community inclusion, or "voice", at all levels of decision-making, from local to national to global, is important to ensure that decision-making adequately takes account of community concerns and perspectives and provides appropriate support for community-based management. The strong involvement of IPLCs in discussions within the CBD, for example, has led to policy outcomes that recognize the contributions of IPLCs to biodiversity conservation and that establish a clear framework for community-managed areas to be recognized as conservation areas[67]. However, this is often undermined by the political marginalization of IPLCs. Capacity building for government staff and others in dealing and negotiating with IPLCs is often helpful, along with the reform of administrative and policy frameworks and procedures to create a supportive context for community-based management.

Corruption and elite capture of the benefits of wild resource management (from outside, rather than within, the community) can critically undermine community management. In relation to CAMPFIRE in Zimbabwe, for example (see above), more recent circumstances demonstrate how quickly gains can be reversed by authoritarian, and extractive regimes. Highly politicized "fast-track" land reform accompanied by deepening rural poverty undermined the wildlife economy and disrupted CAMPFIRE in many areas, although it remains functional across 34 communal areas today[68].

External assistance, over substantial periods, is likely to be needed to establish the necessary conditions for robust governance and for ensuring that these conditions are maintained. It is noteworthy, for example, that while Namibia's successes are now well-known, it took 12 years of substantial investment[69] for gains to be consolidated (but by year 25, economic benefits exceeded costs by a factor of six)[70].

Many community management initiatives have not lived up to their theoretical potential, because of insufficient rigor in following key principles[71], weak design and implementation[72], and poor governance and technical support[73], but the large-scale successes detailed above are testimony to its impacts when well applied. Rigorously applying these key design principles is therefore critical for delivering broader global benefits through this approach.

3. WHY IS THIS IMPORTANT TO THE GEF?

The Global Environment Facility is charged with preserving and protecting the global environment, including safeguarding biodiversity, mitigating global climate change, and halting land degradation[74]. (Re)building community management across areas of high-quality land that are legally or in practice managed by indigenous peoples and local communities offers a means to achieve this, while delivering on broader social benefits enshrined in the Sustainable Development Goals (SDGs).

Building community-based management, therefore, is important to the GEF wherever it is investing in projects that affect these lands. Some GEF projects have explicitly promoted community-based efforts[75], and many more include support for local livelihoods as a component under one or more key objectives[76], though such livelihoods benefits do not necessarily link to wild resource management rights and benefits.

Community-based management is relevant for the GEF-7 Sustainable Forest Management Impact Programs in the Amazon and Congo basin forests, and drylands. In all these contexts, there are areas of high-quality landscapes that are relied on and managed by IPLCs in practice, as well as pervasive conditions of weak and insecure governance. The Congo Basin, for example, is the global region with the lowest level of recognition of indigenous peoples and local community land tenure, as well as widespread limitations on the capacity of national governments to manage such areas effectively. Strengthening existing and building new forms of community-based management suited to specific local contexts offers considerable potential to safeguard the vital biodiversity and carbon stores of the region.

Similarly, the Impact Program on Food Systems, Land Use and Restoration (FOLUR) seeks to address interconnected environmental and social challenges by using a systems approach[77] encompassing both forests and drylands. Many of these areas are likely to overlap with IPLC lands, where the problems of weak or absent institutions are acute and recognized as one of the drivers of degradation.

In addition, $25 million has been allocated under the biodiversity focal area for 'inclusive conservation,' to support investment in the following areas: (a) site-based conservation and sustainable use; (b) sustainable financing of IPLC-driven conservation; and (c) capacity development for IPLC organizations and the integration of diverse knowledge systems to achieve conservation and sustainable natural resource management outcomes[78]. These areas of investment are directly relevant to building community-based management. However, strengthened community management by IPLCs will likewise be relevant to other focal areas.

In general, the GEF Small Grants Program (SGP), administered by the UN Development Program (UNDP), is the primary modality for the GEF's engagement with indigenous peoples and local communities. It provides grants of up to $50,000 directly to local communities including indigenous peoples, community-based organizations, and other non-governmental groups[79], and has yielded impressive results[80]. However, it is notable that the success of community-based management relies on larger scale supportive policy and regulatory frameworks at national and sometimes international level[81]: it cannot depend primarily on site-level and local interventions that do not change the systemic drivers of insecure or weak governance.

The Small Grants Programme Vietnam – Photo by Patrizia Cocca

BOX 2.
Small Grants Programme (SGP) Project: Community-based conservation and sustainable harvesting of land crabs in the Cham Islands, Vietnam.

The Cham Islands are a highly biodiverse marine protected area (MPA) located in the Quang Nam province of Vietnam. These islands are home to a species of large crab (*Gecarcoidea lalandii*) locally named "Cua Da". These crabs are a biological indicator of the health of terrestrial and marine ecosystems in this area, as well as an important economic resource for local inhabitants. A rapid rise in tourism to the island combined with overharvesting led to a major decline in *G. lalandii* beginning in the mid-2000s.

In 2009, the "Community Participation in the Cham Island Nature Rehabilitation and Sustainable *Gecarcoidea lalandii* Crab Harvest" project was launched with financial support from the GEF Small Grants Programme. Led by the Cham Island authority and local communities, the project created a cooperative charged with conserving, managing and using the land crab more sustainably. As part of this, a working group was established comprised of relevant stakeholders including tourism operators, local government, community members, catchers and others to develop appropriate land use planning and regulatory measures, as well as community-based monitoring systems and a labelling program to identify crabs which can be legally sold in the market. After the project was completed, the local authority (Tan Hiep Communal PC of Hoi An City) issued a decision to formally recognize the community group charged with protecting and managing the *G. lalandii* crab, and approved regulations to ensure the legal status of the group and its mission. Since then, the group has been working together with the local authority and other stakeholders to protect the Cham Islands' *G. lalandii* crabs. It is important to note that this approach empowered the community with clear use and management rights, maintained and increased the value of the resource to local people, and developed well-functioning local management institutions.

As a result of the project, the crab population has since rebounded and stabilized. The cooperative has become a self-sufficient institution that oversees the monitoring of the harvest zones, times and seasons. In addition to limiting the number of total crabs harvested, their commercial value has also increased and pressure has been reduced not only on Cham Island but also on adjacent coral reefs.

IPLCs are important partners to be engaged and supported in the effort to protect global environmental benefits, and community-based management is a critical approach. The importance of community-based management of lands and resources has been recognized in relevant international conventions that provide the framework for the GEF's work, with the emergence of new approaches and tools. This is evidenced in Aichi Target 18 of the Convention on Biological Diversity (CBD)[82], and the CBD's recent recognition of the importance of "other effective area-based measures" (OECMs)[83] alongside traditional state-run protected areas as a key means to conserve biodiversity. This opens the door to the recognition of areas conserved by IPLCs as a key approach for biodiversity conservation. The CBD has long recognized the contribution of the sustainable use of biodiversity to conservation[84], and it has agreed on a Plan of Action to recognize and support customary sustainable use of biodiversity[85].

On hunting, the CBD has recently adopted voluntary guidance for countries to achieve a sustainable wild meat sector[86]. Likewise, the UN Convention to Combat Desertification (UNCCD) recognizes the critical role of land tenure and rights for improved land management[87], and climate change negotiations related to the Paris Agreement have recognized the need "to strengthen knowledge, technologies, practices and efforts of local communities and indigenous peoples related to addressing and responding to climate change"[88].

4. HOW CAN THE GEF RESPOND?

GEF support for strengthening the potentially powerful role of community-managed "local commons" across forests, drylands, and other lands where IPLCs use, manage, and depend on wild resources will help to maximize global environmental benefits and achieve transformational change. These lands represent a major proportion of remaining high-quality "intact" ecosystems that are unlikely to be effectively and equitably conserved by conventional, state-based protection and are very important for achieving global goals on biodiversity, climate change mitigation, and land degradation.

STAP recommends that, wherever GEF projects involve lands and resources legally or *de facto* used and managed by indigenous peoples and local communities:

1. Program or project-level problem analyses and Theories of Change:

    a. Include clear analysis and recognition of any institutional drivers (such as insecure and unclear IPLC land and resource tenure) that underpin negative environmental outcomes (such as deforestation, land degradation, and biodiversity loss); and clarify how shifting the rights, incentives, and capacities facing IPLCs can lead to transformative change; and

    b. Are based on an initial assessment and understanding not only of the extent to which IPLCs are present in and dependent on the intervention area, but the extent of their current rights and capacities to use and manage lands and resources, as well as customary tenure and wild resource management practices.

2. Programs and projects to strengthen or establish community-based management rigorously promote the following fundamental design characteristics for successful community-based management, through action not only at site level, but at other appropriate scales such as national policy frameworks:

    a. Support and encourage the establishment of secure land and resource tenure for IPLCs, including rights of access, use, management, equitable benefit-sharing, and exclusion of unauthorized users, through context-specific and locally appropriate approaches;

b. Enhance the financial and non-financial benefits that communities can gain from culturally appropriate and self-chosen forms of sustainable use of wild resources and ecosystem services;

c. Support inclusive, equitable, and effective community governance, building institutions from the bottom up, guarding against elite capture, and supporting the capacity of communities to effectively and adaptively manage lands and resources; and

d. Support the development of inclusive and supportive governance at higher scales – national, regional, and international – including mechanisms for communities to exercise their voices in decisions that affect them.

Endnotes

1 Aichi Target 18 states that "By 2020, the traditional knowledge, innovations and practices of indigenous and local communities relevant for the conservation and sustainable use of biodiversity, and their customary use of biological resources, are respected, subject to national legislation and relevant international obligations, and fully integrated and reflected in the implementation of the Convention with the full and effective participation of indigenous and local communities, at all relevant levels."

2 CBD Decision XIV/08. An OECM is defined as "a geographically defined area other than a Protected Area, which is governed and managed in ways that achieve positive and sustained long-term outcomes for the *in situ* conservation of biodiversity, with associated ecosystem functions and services and where applicable, cultural, spiritual, socio-economic, and other locally relevant values."

3 The GEF 7 strategy including the Impact Programs can be found in the GEF-7 Replenishment Programming Directions document.

4 In GEF 7 under the Biodiversity focal area, there is a $25 million regional/global set aside to focus in geographies where IPLC territories overlap with globally significant biodiversity and that may also include important carbon stocks and that are under threat. Project investments will focus on 1) site-based conservation and sustainable use; 2) sustainable financing of IPLCs-driven conservation; and 3) capacity development for IPLC organizations and integration of diverse knowledge systems to achieve conservation and sustainable natural resource management outcomes. See the GEF 7 Biodiversity Strategy for more information.

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