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**WORKING TOGETHER:  
FOREST-LINKED SMALL  
AND MEDIUM ENTERPRISE  
ASSOCIATIONS AND  
COLLECTIVE ACTION**

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## EXECUTIVE SUMMARY

Small and medium forest enterprises (SMFEs) provide an opportunity to reduce poverty and sustain forests. But they face a number of critical bottlenecks to their development (e.g. insecure forest access, lack of market information or bargaining power). Working together in associations can overcome such bottlenecks where few other support structures exist. There are literally thousands of forest-linked small and medium enterprise associations in developing countries. Many arise spontaneously from strong collective interest. Some fail, but many succeed. Successful associations are the means to achieve three important development ‘ends’:

- Reducing transaction costs
- Adapting strategically to new opportunities
- Lobbying for more supportive policies

This paper draws out some lessons on how and why associations work. It summarises research from Brazil, China, Guyana, India, South Africa and Uganda. The research found that lasting associations generally have a strong degree of autonomy. They usually have leaders with a track-record of social commitment. Most have gradually evolving sets of procedures that institutionalise the progress made by charismatic founders. Their focus is usually restricted to a few long-term issues. Equity is highest where there is greatest investment in democracy. Equitable associations tend to pay attention to transparency over costs and benefits. Most also have in place sanctions for free riders or those who break their rules, and clear procedures for resolving conflicts.

The single major policy implication is that forest based associations can and do work. They work in places where there is little else to improve the livelihoods of the poor. Decision-makers should support them as a result; the most useful support tends to be responsive rather than imposed. It is usually orientated towards self-help options such as strengthening umbrella associations and improving awareness of existing support services. It often has a strong focus on providing information on bureaucratic procedures, product design and markets, finance and technological innovation.

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## INTRODUCTION

*“Darwin was quite right when he saw in man’s social qualities the chief factor in his evolution, and Darwin’s vulgarisers are entirely wrong when they maintain the contrary”* (Kropotkin, 1902)

This paper provides some lessons about forest-based associations: how and why they work and how they can work better. Like many other natural resources, forest products and services can offer development opportunities to the rural poor. Small and medium forest enterprises (SMFEs) make up a significant proportion of those opportunities. Rough extrapolations from existing information suggest that (Macqueen and Mayers, 2006):

- About 80-90% of forestry enterprises are SMFEs in many countries
- Over 50% of all forest sector employment is in SMFEs in many countries
- Over 20 million people are employed by SMFEs worldwide
- Over US\$130 billion/year of gross value added is produced by SMFEs worldwide

These enterprises face many obstacles in attempting to make a living from the forest, quite apart from insecure natural resource ownership and access rights. These include:

- weak social stability and cohesion
- little access to capital

- poor market information
- weak bargaining power
- lack of technological know-how
- geographical isolation and poor infrastructure
- lack of knowledge of administrative and business standards and procedures.

Collective action is often the only accessible way of responding to such bottlenecks.

But there is still much that can be done to support such enterprises and maximise the benefits of collective action. This paper responds to the challenge set down by Poteete and Ostrom (2003): to better understand successful collective action in different contexts. We look for answers from forest-based associations<sup>1</sup> in six very varied contexts: Brazil, China, Guyana, India, South Africa and Uganda. Our goal is to direct greater attention and resources towards supporting forest-linked SMFE associations. The paper is targeted at both association members and potential supporters of associations. For those respective audiences the paper shows how to: (i) improve the internal operations of such associations; (ii) give support more effectively.

## A FRAMEWORK FOR ANALYSIS

Forest-based associations take on different institutional forms (informal groups, associations, cooperatives, companies etc). They also cover different elements of forest product or service supply. Some might manage private or common-pool resources. Others deal with processing activities far from the forest. They range from small groups of individuals (communities) to large groups of small and medium forest enterprises.

Many studies have already examined how and why groups are successful. Table 1 summarises generic lessons about what makes groups successful.

In this study, country research partners selected a small sample of successful associations (in most cases 10 or more) using locally relevant criteria to ensure a range of association types. They then tested four research hypotheses chosen to reduce the multiple variables for association success (Table 1) into manageable numbers of causal links (see Agrawal, 2001). The four hypotheses were that well-functioning associations depend on the:

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<sup>1</sup> In this paper we use the terms 'group' and 'association' interchangeably. We define forest-based associations broadly as 'user groups that band together about a common purpose and create organised institutions for collective decision-making'.

**Table 1. Lessons about what affects group success**

Factor	Lesson	Reference
Successful past experience	Groups benefit from successful past experience	Ag, Ar, B&P, F, Sa, W
Wealth	Groups benefit from having some disposable income (low levels of poverty)	Ag, B&A, F
Political affiliation	Groups benefit from independence from political groups with the right to self organisation	Ag, Ar, B&A, H&R, H&S, M&O, O <sup>1</sup> , O <sup>2</sup> , Sa, Sh, W
Size	Groups often (but not always) benefit from being small or medium-sized and central to the total economy in which they operate	Ar, B&P, H&S, Sh, W
Activities at inception	Groups benefit from focusing on one manageable activity, potentially diversifying over time but retaining focus	H&R
Participative or individual leadership	Groups benefit from either individual or participative leadership, provided it is home grown and fair	Ag, Ar, B&A, B&P, F, H&R, M&O, Sa, Sh
Shared background	Groups benefit from a homogenous background but can do without it if they have good leadership	Ag, Ar, B&A, B&P, H&R, Sa, W
Skills and abilities	Groups benefit from a mix of skills to achieve collective interests	Ag, Ar, B&P, H&R, Sa
Degree of external support	Groups should start without external support to prove competitive advantage	B&A, H&R, Sh
Social or financial objectives	Groups benefit from having broader objectives than merely financial ones	H&R
Boundaries to group	Groups benefit from clear boundaries defined by collective interests	Ag, M&O, O <sup>1</sup> , O <sup>2</sup> , Sh, W
Simple shared norms and rules	Groups benefit from initial flexibility but should then evolve simple rules and procedures based on local norms	Ag, Ar, B&P, H&R, H&S, M&O, O <sup>1</sup> , Sa
Meetings with members	Groups benefit from regular and frequent meetings between members and leaders	B&A, H&R, Sh
Accountability and sanctions	Groups benefit from clear records, transparent decision-making and conflict resolution processes and graduated sanctions for non-compliance	Ag, Ar, H&S, M&O, O <sup>1</sup> , O <sup>2</sup> , Sa, W

Source: Ag = Agrawal, 2001; Ar = Arnold, 1998; B&A = Baviskar and Atwood, 1995; B&P = Baland and Plateau, 1996; F = Futeemma et al. 2002; H&R = Harper and Roy, 2000; H&S = Hobley and Shah, 1996; M&O = McKean and Ostrom, 1995; O<sup>1</sup> = Ostrom, 1999; O<sup>2</sup> = Ostrom, 1990; Sa = Sarin, 1993; S = Shah, 1995; W = Wade, 1988.

- strength of collective interests
- credibility and legitimacy of different types of decision-making
- extent and adequacy of representation of different interest groups
- degree to which policies and institutions are supportive

Questionnaires and semi-structured interviews were used to gather evidence about each hypothesis. Opinions were corroborated between leaders and, where possible, general members of these associations. While many specific constraints and solutions vary across association context and type, there were some lessons that were broadly applicable. We summarise these under the headings of cohesion, resilience, equity and support.

## **COHESION – WHAT DEVELOPMENT ‘ENDS’ DO ASSOCIATIONS DRIVE TOWARDS?**

Associations or groups of different kinds exist to further the common interests of their members or “*journey together with a view to particular advantage*” (Aristotle, circa 322 BC). In short, “*there is no group without its interest*” (Bentley, 1949). Four main factors influence the extent to which individuals put aside self-interest in favour of collective interest (NB benefits and costs are often non-financial in nature):

- **Philanthropy:** individual’s concern for the welfare of others within the group
- **Size of the group:** the overall cost of achieving the collective interest (see Olson, 1965)
- **Distribution of benefits:** the value to an individual of his or her portion of the collective interests championed by the group
- **Distribution of costs:** the cost to an individual of contributing to that group

Groups form either reactively (to some threat to member’s interests) or proactively (toward some perceived opportunity for member’s interests). Reactive groups may form in response to government requirements or as options of last resort in the face of commercial competition (Altenburg and Meyer-Stamer, 1999; Schmitz, 2003). Examples of ‘last resort’ include many struggling timber growers associations that have emerged in South Africa following difficulties with corporate outgrower schemes (Bukula and Memani, 2006). For many of these the main collective interest is simply survival.

Proactive groups tend to have more strategic collective interests – and greater long-term prospects as a result. Previous studies (Macqueen *et al.* 2005a; 2005b) document the fact that associations usually form to:

- reduce transaction costs
- adapt to new opportunities
- shape the policy environment

### **Reducing transaction costs**

Grouping together allows forest-linked enterprises to become more scale-efficient. Working together can drive down prices and reduce the time and costs of acquiring inputs, including training and information. Similarly, some assistance programmes may require a certain scale in order to disperse funds (Box 1).

#### **Box 1: Cutting costs**

In South Africa the Kwangwanase Association of small timber growers hires a truck at harvest time to reduce members' transport costs. And the Sakhokuhle Association, an umbrella body with 1400 small-grower members, has successfully negotiated better transport rates for association members wishing to sell their timber products (Bukula and Memani, 2006).

In Uganda, members of the Kamusiime Memorial Rural Development Association (KMRA) combined their land to meet the required 25ha size required for grants under the European Union-funded Sawlog Production Grant Scheme (SPGS) (Kazoora *et al.*, 2006).

Cutting out unnecessary intermediaries increases the share of benefits for poor producers. Some brokers play an important role in matching supply from diverse producers with demand, but this position of power can often result in a poor deal for producers. For example, in Brazil the Cooperativa dos Agricultores de Medicilândia (COOPERSAME) formed with the express intention of restructuring the cocoa market chain such that producers in the State of Para could challenge the power of middlemen and large traders could obtain prices comparable with elsewhere in Brazil (Campos *et al.*, 2005).

### **Adapting to new opportunities**

Working together can open up new strategic opportunities that would not have been possible alone. For example, having already established a Brazil nut processing plant, the Brazilian Cooperativa de Produção Agropecuária e Extrativista dos Municípios de Epitaciolândia e Brasília (CAPEB) is now investing in salting,



## Box 2: Building capacity to adapt to new opportunities

The Swayimane Small Growers Association in Warburg, South Africa runs joint training and information workshops for its members covering all aspects of small-grower forestry (Bukula and Memani, 2006). The Kabakaburi Handicraft Association (KHA) in Guyana secured funding from the Inter-American Institute for Cooperation for Agriculture (IICA) to give joint enterprise training in pottery, joinery/carpentry, sewing and craft making (Ousman *et al.*, 2006). The Uganda Community Tourism Association (UCOTA) was formed to promote community tourism by giving training in tourism marketing, organisational strengthening and craft making (Kazoora *et al.*, 2006). The Madhya Pradesh Minor Forest Produce (Trading and Development) Cooperative Federation Limited has opened a retail outlet (Sanjeevani) in Bhopal for medicinal plant sales. It has invested in drying, grading, powdering and packing in various districts to enhance product value (Bose *et al.*, 2006). The Federation of Rajasthan Handicraft Producers (FORHEX) in India has instituted awards for outstanding handicraft producers. It organises an annual symposium to share designs. It also runs seminars on trends in home furnishing. Visual merchandising and procedures for setting up export-orientated units are an additional focus. Association workshops explain export promotion of novel handicrafts and select leading members to participate in European trade fairs (Bose *et al.*, 2006).

producing flakes and fillings etc. It also plans to develop animal feed from the Brazil nut shell. Launching a new rubber product range and processing the pulp of a local palm fruit Açaí are additional plans (Campos *et al.*, 2005). In many instances, forming an association helps to secure training opportunities (Box 2).

Associations can also attract donor support that would be less likely for individual enterprises. For example, the Kamuni Women's Handicraft and Sewing Development Association in Santa Mission Village, Guyana, successfully applied to the Canadian International Agency (CIDA) for a new craft centre fitted out with water tanks, five sewing machines and new furniture (Ousman *et al.*, 2006).

### Shaping the policy environment

Decision-makers may ignore individuals, but it is more difficult to overlook large organised groups with people employed to agitate on their behalf. For example, the District Yamunanagar Plywood Manufacturers' Association in India took issue with a new Form 38 introduced in 2002. The new form made the procedure for sales tax collection cumbersome. The association, together with the whole timber industry, called a strike until the government withdrew the offending Form 38 (Bose *et al.*, 2006).

It can be expensive to campaign for rights through the courts. By working together, it may be possible to hire legal expertise to push for rights. For example, the Uganda

Wood Farmer's Association formed specifically to sue the Uganda Investment Authority (UIA). The UIA had created an industrial park overlying areas with trees planted and managed by farmers. Out of the litigation, the presiding judge ruled in favour of the farmers and granted compensation equivalent to four tree rotations (Kazoora *et al.*, 2006)

Personality differences and poor representation can lead to a fragmentation of associations, undermining their political influence. For example, the Uganda Forest Industries Development Association (UFIDA) established in 1990. But a break away group called the Uganda Commercial Tree Farmers and Saw-millers Association (UCTF&SA) split on grounds of poor representation. Acrimony led to a loss of credibility between the associations and the National Forest Authority (Kazoora *et al.*, 2006).

The capacity to shape the policy environment often comes only after association success in lowering members' costs or adapting to new opportunities. For example, the strike action of the District Yamunanagar Plywood Manufacturers' Association would have been less effective without buy-in from the other elements of the timber industry who respected the authority of that association.

This evidence suggests that whether the motivation springs from reducing transaction costs, or strategic adaptation or lobbying and advocacy work (or a mix of all three), effective group action requires strong collective interest.

## **RESILIENCE – WHAT DECISION-MAKING STRUCTURES MAKE ASSOCIATIONS LAST?**

Several features appear to make associations last. These include autonomy, leaders with a track record of social involvement, mechanisms to hold leaders accountable, evolving procedures to institutionalise the gains made by early founding members, and a tight focus on a few achievable objectives.

### **Maintaining autonomy**

Almost every study dealing with associations has highlighted the benefits of independent beginnings, free from external interference. Where external forces drive the formation of associations, these same associations often implode once that external support is withdrawn (Box 3). While it may be difficult to avoid in some contexts (e.g. China), political patronage usually offers only short term security.

### Box 3: Autonomy, or not?

In Yunnan, China, political interference is strong—and associations are weak as a result. For example, the narrowly construed Yunnan Forest Products Industry Association currently does little more than hold an annual meeting. It offers few meaningful business support functions. But this may be set to change as forest companies begin to play a greater role in managing the association (Weyerhaeuser *et al.*, 2006). In Uganda, USAID supported COVOL in 1995 to improve shea nut butter production across 400 community-based organisations. This amalgamated into the Northern Uganda Shea Producers' Association (NUSPA). But USAID withdrawal in 2000 and subsequent disruption by the Lord's Resistance Army rebels led to the collapse of the association (Kazoora *et al.*, 2006).

Many of the associations we surveyed that had their origins in external support were in a state of crisis. In Brazil, the state agricultural extension agency EMBRAPA founded the Associação dos Produtores Rurais em Manejo Florestal e Agricultura (APLUMA) as a timber management project. Members felt the association was highly unorganised with multiple conflicts. Interviewees described little ownership by members, little trust in the leadership and little unity between members (Campos *et al.*, 2005).

There are many examples from Brazil of associations failing because political patronage evaporated with a change in government (Figueiredo *et al.*, 2006).

### Ensuring accountable leadership with a history of social commitment

Holding regular elections will help to dislodge poor leaders. For example, the Associação de Trabalhadores Rurais da Gleba Boa Esperança/Entre Rios in Mato Grosso Brazil has gone through four different leaderships. Two of these failed to deliver to dispersed members. A third was involved with illegal sales of timber and land plots. The fourth was too heavily involved with party politics, tarnishing the association with the change in government. Unsurprisingly, members value their capacity to vote in new leaders (Figueiredo *et al.*, 2006).

Members who have served well in a voluntary capacity are likely to make good leaders. For example, Ugandan interviewees regarded previous experience as the most important leadership quality after the ability to read and write. Many of the financially poorest associations involved leaders who had partly subsidised association activities out of personal commitment to the collective interest (Kazoora *et al.*, 2006).

It also makes sense to invest in future leaders. For example in the association of the Settlement Project California in Mato Grosso, Brazil, young people make up 12% of the association members. The association has worked in partnership with the municipality to develop programmes at the local high school and build sports facilities in the settlement (Figueiredo *et al.*, 2006).

## Evolving procedures

While dynamic leaders can carry an association at the beginning, longer-term survival depends on well-understood rules and procedures. For example, in Nova California in Brazil, two small rural producers associations joined in 1988 to form the cooperative called Reflorestamento Econômico Consorciado e Adensado (RECA). While early producer members defined the initial objectives, RECA has now evolved a unique organisational structure. It groups members by area with regional coordinators (male and female). A one-year membership trial period helps to build membership quality. Clear rules governing decision-making and the partitioning of costs and benefits are a major strength (Campos *et al.*, 2005).

Associations with financial irregularities quickly unravel. For example, because of doubt over financial dealings, members of the Amerindian Handicraft Association in Guyana quickly became reluctant to pay the 10% fee to the association required on the sale of craft products. Many opted instead to sell direct to buyers (Ousman *et al.*, 2006). In a review of 62 associations in Uganda, 71% had a bank account (some were too remote or too poorly endowed for it to be worthwhile). Even more (87%) kept accounts and made them public to members (Kazoora *et al.*, 2006).

## Restricting focus to a few long-term issues

Keeping it simple at the start allows time for successful functions to develop, building on core expertise. Most successful associations do a few things, but do them well (Box 4). Avoiding short-term single drivers improves long-term prospects. The risk is that once the association achieves its short-term aims, it can become redundant. For example, in Brazil many forest-based associations formed initially

### Box 4: Maintaining focus

In the state of Madhya Pradesh, India, the Lok Vaniki Sangh association formed to lobby for better timber processing and transport laws for private forest owners and tree farmers. Following its initial successful campaign, it then evolved into the state-level apex federation, allowing it to represent district and local federations. Its main role became institutional strengthening and getting working schemes approved—but without shifting away from its core competence (Bose *et al.*, 2006).

In Guyana, the Upper Berbice Forest Producers Association (UBFPA) formed to achieve more secure jobs. With secure access to forest land they improved the viability and sustainability of timber production. Problems associated with sustainable harvest from the forest have subsequently led them to realise that they need to diversify into replanting manicole (heart of palm), fish farming and non-timber forest products. But all these planned activities maintain a strict focus on improving jobs for association members (Ousman *et al.*, 2006).

simply to gain access to government credit (e.g. FNO-Especial) that required formal establishment. Once associations accessed this credit, many quickly became empty shells (Campos *et al.*, 2005). Immediate goals, such as markets for products, therefore need to be balanced against longer term interests, such as employment derived from sustainable resource management. The Chico Mendes association in Acre, Brazil, originally started through Brazil nut collection alone. But it is now developing tree nurseries based on superior genotypes to reforest particular areas (Campos *et al.*, 2005).

Alongside many others, these examples show how association functionality depends on the credibility and legitimacy of different types of decision-making processes. Strong autonomous leadership and evolving clear procedures are keys to success.

## **EQUITY – WHAT FACTORS MAKE ASSOCIATIONS FAIR?**

How do associations ensure that benefits are spread equitably among the poorest and most marginalised members? An essential starting point is investment in democratic processes. Additional features that improve equity include transparency over costs and benefits (especially finances). Having clear procedures to detect and deal with conflict also improves equity.

### **Ensuring democracy and representation**

Investing in democracy is the best guarantee of equity. Collective interest benefits from one member one vote. The membership of the executive committee or equivalent is crucial in determining many day-to-day decisions. But there may be a need for tiered decision-making – separating decisions of the executive committee from general membership in larger associations (Box 5). Avoiding dominance by powerful industries can improve social gains.

#### **Box 5: Procedures for equity**

The Guyana Forest Products Association has monthly meetings of the 12 member executive committee requiring a quorum of six members, plus less frequent general membership meetings requiring a quorum of 50% of members to take decisions (Ousman *et al.*, 2006). In South Africa, the large industrial association—Forestry South Africa—has an executive committee dominated by large timber growers (five members). These carry more weight than medium growers (three members) and small growers (two members). Large industries and their interests therefore dominate discussions. The flourishing of many alternative associations of small producers is one outcome (Bukula and Memani, 2006). In some instances, very large associations can benefit from sub-groups that deal with specific issues. For example, a papermaking sub-group may develop within the Yunnan Provincial Forest Products Industry Association in China (Weyerhaeuser *et al.*, 2006).

Men and women often have very different livelihood concerns, yet often women are less represented in leadership positions. For example, in Uganda, despite women making up 53% of the members of the 62 associations surveyed, only 44% held leadership positions (Kazoora *et al.*, 2006). In many countries, women create their own associations in order to have their interests represented. For example, in the Caetés Settlement in Brazil, women producers formed the Association of Caetés Women because the two existing producers' associations failed to represent their interests (Figueiredo *et al.*, 2006). In exceptional cases, associations decide on strict gender equity – one example is the Reflorestamento Econômico Consorciado e Adensado (RECA) (Campos *et al.*, 2005).

### **Making costs and benefits transparent**

Trust grows when members know what their rights and obligations are. Developing clear procedures for costs and benefits and sticking to them can avoid corruption and abuses by powerful elites. For example, although few associations in Uganda charged membership fees (34%), interviewees felt that such payments were good practice. Even tiny payments strengthened ownership and concern over association activities. Most association members (87%) felt they were better off than non-members. Membership advantages included training, employment, product sales, self-esteem, land ownership and freedom of expression (Kazoora *et al.*, 2006). Clarifying benefits and costs was critical to many of the associations in Guyana (Ousman *et al.*, 2006). For example, one of the main attributes of the success of the Kamuni Women's Handicraft and Sewing Development Association is the meticulous financial record keeping of the stock held in the newly built craft sales centre (Ousman *et al.*, 2006).

Finding ways of rewarding members and penalising free riders helps to reward those who sacrifice most to belong. It is vital that members perceive some advantage over non-members. Graded membership can also be used to build loyalty for continuing membership and can improve inclusion of the poor (Box 6).

#### **Box 6: Clear membership benefits**

The Brazilian Cooperativa de Produção Agropecuária e Extrativista dos Municípios de Epitaciolândia e Brasília (CAPEB) offers its members more competitive prices for agroforestry products, better credit and a percentage of the total profit made by the cooperative (as a bonus) (Campos *et al.*, 2005). In India the FORHEX association has three types of members, founder members, chartered members and associate members. The latter pay reduced fees and receive partial benefits in comparison with the former two categories. The Madhya Pradesh Minor Forest Produce (Trading and Development) Cooperative Federation Limited has a set membership fee, but distributes profits in line with particular activities—50% to primary collectors, 20% for forest regeneration and 30% for infrastructure development (Bose *et al.*, 2006).

Building in additional social benefits for marginalised groups can strengthen association unity. For example in Brazil, association barbecues and games proved a popular reason for belonging to the Association of the Settlement Project California (Figueiredo *et al.*, 2006). In India, the Harda District Timber Merchant Association (HDTMA) collects money and makes loans to particularly needy members who have suffered losses beyond their control (Bose *et al.*, 2006).

### **Developing clear conflict resolution procedures and effective sanctions**

Personality differences and poor representation can lead to a fragmentation of associations, undermining their political influence (Box 7). Conflicts usually hurt the weakest groups most.

#### **Box 7: Avoidable conflict**

The Uganda Forest Industries Development Association (UFIDA) established in 1990. But a break-away group called the Uganda Commercial Tree Farmers and Saw-millers Association (UCTF&SA) split on grounds of poor representation. Acrimony led to a loss of credibility between the associations and the National Forest Authority (Kazoora *et al.*, 2006). In India, the Saharanpur Wood Carving Association (SWCA) in Uttar Pradesh formed in 1960 to represent the wood carving industry. It successfully campaigned for changes in tax incentives and export policies. But disputes among the office bearers in 2004 caused the president to leave to establish the Saharanpur Wood Carving Manufacturers and Exporters Association (SWCMEA) that grew rapidly to 300 members. The new association took many of the former members of the SWCA with it. Formal dispute resolution procedures could have avoided this (Bose *et al.*, 2006).

Expecting and preparing for conflicts can reduce power imbalances. One useful strategy is to ensure space for extraordinary meetings. Such meetings deal with contentious issues, new developments, hosting important visitors or discussing new government policies. In Uganda, 95% of the surviving associations had procedures in place to call such meetings (Kazoora *et al.*, 2006).

Developing clear disciplinary guidelines irrespective of position can also improve equity. The credibility of the association (and the willingness to pay membership fees) often hinges on how people who fail to pay are treated. For example, the Guyanese Orealla Fruit Cheese Women's Association (which makes forest fruit jams) stipulates an annual membership fee, commitment to waged work in the 'fruit cheese' production facility and regular participation in meetings. The association expels members if they fail to pay the annual membership fee or if a two-thirds majority votes against them (Ousman *et al.*, 2006).

The evidence presented above suggests that association functionality depends on the extent and adequacy of representation of different interest groups including gender representation – and the mechanisms by which associations deal with disputes.

## **SUPPORT – WHAT ASSISTANCE IS APPROPRIATE?**

What assistance can best help associations achieve their development goals? Supporters (i.e. donors) often have pre-set agendas. But our research suggests that support is best when it responds to associations' own agendas and is orientated towards self-help rather than dependency on grants.

### **Respond to existing association objectives**

Getting to know the association is fundamental to well-targeted support. Assumptions about what associations need can do more harm than good. There are many good examples of responsive support based on a real knowledge of the association's needs. In many cases, successful support occurs through loans in response to demand from the association itself (Box 8). On the other hand, forcing particular models of association can cause lasting damage. For example, in Uganda the cooperative form of association provokes a highly negative reaction because of the high failure rates among government-sponsored cooperatives in the 1980s (Kazoora *et al.*, 2006).

#### **Box 8: Finance that works**

In Uganda, Kazoora *et al.* (2006) cite multiple successful loans to associations from institutions such as national and international NGOs, churches, development and village banks and other associations or credit unions. Finance may involve external loans, but internal credit unions or revolving loan funds often work just as well. For example, the North Rupununi District Development Board (NRDDB) in Guyana runs a women's revolving loan scheme for small loans at 5% interest. It also finances a larger North Rupununi Credit and Development Trust (NRCDT) geared towards business start-up. This is initially repayable in 6-9 months, at which time a second larger loan can be accessed (Ousman *et al.*, 2006).

In many cases, associations need to patch together support from different sources. For example, in Brazil, the Associação de Mulheres e Campo e Cidade de Porto de Moz (EMANUELA) received multiple types of support. Financial support came from an umbrella association (FVPP) and the Ministry of the Environment. Political support came from the workers party (PT). Technical support came from the Centre for International Forestry Research (CIFOR) and the Brazilian agricultural extension agency EMBRAPA (Campos *et al.* 2006).

### **Link, document and promote**

Improving the visibility and reach of existing association is a vital, but often overlooked, priority. One of the most productive forms of support is to document and promote the activities of associations. For example, some of the success of the



North Rupununi District Development Board (NRDDB) in Guyana has come from the tireless engagement and promotion of its activities by the Iwokrama International Centre for Rain Forest Conservation, linking to various other donors (Ousman *et al.*, 2006). In China, the Zhajijaiwa Village's Persimmon Association posted information about its products in the Baoshan Forestry Bureau's publications and secured buyers from as far away as Shanghai (Weyerhaeuser *et al.*, 2006).

Fostering umbrella groups that represent multiple associations is another quick way to spread the benefits of associations. Good articulation between dispersed rural associations and central services is a major issue. Umbrella associations such as the Budongo Forest Conservation and Development Organisation (BUCODO) or the Uganda Honey Association (UHA) in Uganda help to represent diverse interests of member associations and target support more effectively (Kazoora *et al.*, 2006)

It is often less important to provide new support and more important to link associations with support that already exists. It may sometimes be necessary to cover the travel or communication costs to make that possible. For example in Uganda, Kazoora *et al.* (2006) list 22 different national government services, international donor programmes, NGO and other private sector initiatives that are explicitly geared towards supporting SMFEs and their associations.

### **Aim for good information**

One of the bottlenecks for remote forest-based associations is lack of information about what consumers want, as well as information on registration procedures, available finance, market trends, technological innovations etc. Many associations would also benefit from exposure to other like-minded product or service groups. Support in this area through printed or radio bulletins or by financing visits to trade fairs can be very useful. For example, the Essential Oil Association of India (EOAI) publishes a journal entitled 'Indian Perfumer' containing the latest research and market information. It also sponsors workshops and seminars for member entrepreneurs (Bose *et al.*, 2006).

Improving internal administrative capacity can help associations to be 'bankable' and attract credit. For example, Forestry South Africa (with funding from the UK Department for International Development) has helped to support many of the smaller timber grower groups to form associations, helping to design a communication strategy to further enhance their capacity (Bukula and Memani, 2006).

It can often help to bring successful entrepreneurs from one association to another to share technical tips. For example, in Guyana the Ministry of Amerindian affairs sponsored a useful exchange visit. An experienced member of Kabakaburi community trained craftswomen of the Orealla Women's Group in the making of *tibisiri*<sup>2</sup> craft (Ousman *et al.*, 2006).

In summary, association functionality can be both impaired and assisted by external intervention. The danger is that external support imposes structures and incentives that are not sustainable in the end. But support that responds to existing associations' expressed needs can be highly productive.

## POLICY IMPLICATIONS

The single major policy implication from the preceding paragraphs is that forest based associations can and do work in places where there is little else available to improve the livelihoods of the poor. They should therefore be supported. Three priority areas require attention, based on findings from the six country case studies:

- *Make association easy and advantageous:* in many countries formal registration of different forms of association is still overly bureaucratic or centralised. Policy-makers should find ways to reduce administrative hurdles, provide assistance to smooth the path, and channel support through the associations that result.
- *Subsidise information, training and association networks:* Create policy incentives and support programmes to provide information and training on registration procedures, available finance, market trends, technological innovations etc. Finding ways to support networking through trade fairs, workshops, seminars etc. can also be very useful.
- *Favour local associations in government procurement:* market access is a perennial problem for forest-based associations. Government procurement policies that favour local products are not only likely to have substantial political cache but also can mean the difference between survival and failure for local associations.

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2. *Tibisiri* straw is extracted from the young shoots of native Guyanese palms and is then woven into items that are very popular with tourists and local tradesmen.

## REFERENCES

- Agrawal, A. 2001. Common property institutions and sustainable governance of resources. *World Development* 29 (10): 1649-1672.
- Altenburg, T. and Meyer-Stamer, J. 1999. How to promote clusters: policy experiences from Latin America. *World Development* 27 (9) 1693-1714.
- Aristotle. Circa 322BC. *The Nichomachean Ethics*. Oxford University Press, Oxford.
- Arnold, JEM. 1998. *Managing Forests as Common Property*. FAO Forestry Paper No 136. FAO, Rome, Italy.
- Baland, JM. and Plateau, JP. 1996. *Halting Degradation of Natural Resources: Is there a role for rural communities?* Clarendon Press, Oxford, UK.
- Baviskar, BS. and Atwood, DW. 1995. *Finding the Middle Path: The political economy of cooperation in rural India*. Vistaar Publications, New Delhi, India.
- Bentley, A. 1949. *The Process of Government*. Harvard University Press, Cambridge, USA.
- Bose, S., Lal, P., Pareek, P.S., Verma, M. and Saigal S. 2006. *Forest-based Associations in India – An Overview*. Winrock International India and the International Institute for Environment and Development (IIED), London, UK.
- Bukula, S. and Memani, M. 2006. *Speaking with One Voice: The role of associations of small and medium enterprise driving change in the South African forest sector*. Upstart Business Strategies and the International Institute for Environment and Development (IIED), London, UK.
- Campos, M., Francis, M. and Merry, F. 2005. *Stronger by Association: Improving the understanding of how forest-resource based SME associations can benefit the poor*. Instituto de Pesquisa Ambiental da Amazônia (IPAM) and the International Institute for Environment and Development (IIED), London, UK.
- Figueiredo, LD., Porro, N. and Pereira, LS. 2006. *Associations in Emergent Communities at the Amazon Forest Frontier, Mato Grosso*. Instituto de Pesquisa Ambiental da Amazônia (IPAM) and the International Institute for Environment and Development (IIED), London, UK.
- Futemma, C., de Castro, F., Silva-Forsberg, M.C. and Ostrom, E. 2002. The emergence and outcomes of collective action: An institutional and ecosystem approach. *Society and Natural Resources* 15: 503-522.
- Harper, M. and Roy, AK. 2000. *Co-operative Success: What makes group enterprise succeed*. Intermediate Technology Development Group Publishing, London, UK.
- Hobley, M. and Shah, K. 1996. What makes a local organisation robust? Evidence from India and Nepal. *ODI Natural Resource Perspectives* 11. Overseas Development Institute, London, UK.
- Kazoora, C. Acworth, J., Tondo, C. and Kazungu, B. 2006. *Forest based Associations as Drivers for Sustainable Development in Uganda*. Sustainable Development Centre and International Institute for Environment and Development, London, UK.
- Kropotkin, P. 1902. *Mutual Aid: A factor of evolution*. Freedom Press, London, UK.

- Macqueen, D.J., Vermeulen, S., Kazoora, C., Merry, F., Ousman, S., Saigal, S., Wen, S., and Weyerhaeuser, H. 2005a. Advancement through association: Appropriate support for associations of small and medium forest enterprise. In: Bigg, T. and Satterthwaite, D. 2005. *How to Make Poverty History: The central role of local organisations in meeting the MDGs*. IIED, London, UK.
- Macqueen, DJ, Figueiredo, L. Merry, F. and Porro, N. 2005b. Stronger by association: small and medium scale forest enterprise in the Brazilian Amazon. *Participatory Learning and Action* 53: 31-36.
- Macqueen, D.J. and Mayers, J. (2006 forthcoming). *Forestry's Messy Middle: A review of sustainability issues for small and medium forest enterprise*. International Institute for Environment and Development, London, UK.
- McKean, MA. & Ostrom, E. 1995. Common property regimes in the forest: just a relic from the past? *Unasylva*, 46 (180): 3-15.
- Olson, M. 1965. *The Logic of Collective Action: Public goods and the theory of groups*. Harvard University Press, Cambridge, USA.
- Ostrom, E. 1999. *Self-governance and Forest Resources*. CIFOR Occasional paper No. 20. Centre for International Forestry Research, Bogor, Indonesia.
- Ostrom, E. 1990. *Governing the Commons: The evolution of institutions for collective action*. Cambridge University Press, Cambridge, UK.
- Ousman, S., Roberts, G. and Macqueen, DJ. 2006. *Development from Diversity: Guyana's forest based associations*. Guyana National Initiative for Forest Certification (GNIFC) and the International Institute for Environment and Development (IIED), London, UK.
- Poteete, A. and Ostrom, E. 2003. *In Pursuit of Comparable Concepts and Data About Collective Action*. International Forestry Resources and Institutions (IFRI) workshop presentation published as CAPRI Working paper No. 29, CGIAR Systemwide Program on Collective Action and Property Rights (CAPRI), International Food Policy Research Institute (IFPRI), Washington, USA.
- Sarin, M. 1993. *From Conflict to Collaboration: Local institutions in joint forest management*. Joint Forest Management Working Paper No. 14. New Delhi, SPWD and Ford Foundation.
- Schmitz, H. 2003. Globalised localities: introduction. In Schmitz, H. (Ed) *Local Enterprises in the Global Economy: Issues of governance and upgrading*. Elgar, Cheltenham forthcoming.
- Shah, T. 1995. *Making Farmers' Co-operatives Work: Design, governance and management*. Sage Publications, New Delhi, India.
- Wade, R. 1988. *Village republics: Economic conditions for collective action in South India*. ICS Press, Oakland, USA.
- Weyerhaeuser, H., Wen, S. and Kahrl, F. 2006. *Emerging Forest Association in Yunnan, China – Implications for livelihoods and sustainability*. World Agroforestry Center, ICRAF-China and the International Institute for Environment and Development (IIED), London, UK.

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