



## Chapter 8

### Green forest, Nepal's wealth

The rhyming couplet "*Hariyo ban, Nepalko dhan*" – literally, "green forest, Nepal's wealth" has long been a popular slogan amongst people working in forestry in Nepal. Unlike some slogans, it contains much truth – healthy (green) forests are very much a part of people's livelihoods in rural Nepal. It is the forests that are the source of much of the fuel by which people cook and warm themselves on cold winter days, of the material used for house construction, and of the fodder eaten by livestock. Forests also yield the bamboo from which a plethora of articles are woven (baskets, stools, animal shelters, and winnowing trays, amongst others); seasonal food (mushrooms and young leaves); medicinal herbs; and fibre for ropes or sometimes even cloth (made of nettle fibre). Perhaps most importantly of all, in the absence of chemical fertilizer, it is also forests that serve to boost agricultural productivity – through the dung of livestock that have been fed on forest fodder, and the application of leaf litter that is carried to the fields.

I have good reason, of course, to warm to this subject. My original purpose in living in Suri was to study the use and management of trees. Although my research focused more on trees growing around people's homes and fields, I nevertheless went to the forest quite often – whenever the person with whom I was spending the day did so. The following extract provides one description of high altitude forest in spring.

Aerogramme home, 29 April 1989

*Today I'm sitting far above Nakpa, surrounded by broken slates and, beyond, fir trees and the odd maple, bright green in young leaf flush. This is my first visit to the quarry for roofing slates; Gunte<sup>1</sup>, like many others, is doing contractual work up here during these warm spring months. We must be at 10,000 feet or so. Stone extraction is limited to warm and dry times of the year – usually people sleep at the quarry when working here rather than making the long trek up and down to Nakpa every day. Gunte has been based here for the last fortnight and I would never have found him but for having fortunately met his cousin, who was heading up here. The walk up took over two hours. A brief storm last night has cleared the air, and it was a glorious morning. The vegetation smelled fresh and moist, and the birds were in full chorus. Indeed, they still are – competing loudly with the sound of hammer and chisel on stone. As we neared the quarry, we passed a chauri-gai<sup>2</sup> goth (shelter), around which white rhododendrons were still in bloom; the red ones lower down have already faded....*

During the monsoon months, the forest was (and remains) a less attractive place to be.

Aerogramme home, 21 July 1988

*With Esu, I went high up into the forest above Nakpa to dig potatoes, which her family – like others – plant in small clearings. It was a dry if cloudy day when we set off, but rain soon began to fall – and did the forest then become alive with leeches!!! Huge brown ones (well, 2"-3" before distension) as well as the small black ones that you get lower down; I could see them lying in wait for us as we struggled upwards. We had a good laugh regularly de-leeching each other from all parts of the body – quite a lot got through, though – even latching on to my scalp through my hair! Eventually, after 2 hours or so of walking, we reached the clearing, shrouded in mist and scattered with what only became obvious as potato plants on close inspection. They were growing amongst prolific nettles.*

*We spotted a wisp of smoke a little way off, and made our way down to the place from which it was issuing – a small shack or goth made from a couple of poles supporting woven bamboo walls, with a roof waterproofed by plastic sheeting. Life before the advent of plastic must have been very wet indeed... Inside the goth squatted a man, his two young sons and teenage daughter. It had begun to rain with force, so we squeezed our way in, warming ourselves against their small fire. The family makes their living out of raising livestock (those belonging to others as well as their own). They said that they spend all monsoon up in the forest, where the fodder is plentiful. They are not alone in this practice; others do so too, but generally only the poorer people, and particularly the Gurungs and Sherpas. Those who do not have to go into the forest at this time of year generally avoid doing so, because of the leeches.*

*When the rain had eased a bit, Esu dug potatoes whilst I watched helplessly – I had no digging implement. Planted some 6 months ago, the potatoes seemed very small to me (maximum 3" across, but generally less), and certainly not very numerous per plant. Anyway, they tasted OK. We boiled some over the fire and ate them with the family before we left on the downward trail.*

These extracts describe exactly how I remember the forest stretching high above Nakpa, roughly from 2,000 to 3,500m altitude, which was then broadly known as *Khadkako ban* – the forest of the Khadkas. Legally speaking, and with the debatable exception of the potato plots (for which they

paid a very nominal land tax), it certainly did not belong to the Khadkas. All forest was nationalised by the Nepal government in 1957, and was thus technically the property of the State. However, visits by Forest Department staff were rare, and the Khadkas had control over all aspects of village life – so it was (at least tacitly) accepted that this extended to the forest. A few wealthy households had tree and bamboo resources on their own land, but this was not so very common then; most people used the forest. This was universally true for specific needs such as monsoon supplies of firewood, and winter fodder.

During more than half of the year – from around mid September to early June - firewood collection was mainly women's work. They would go regularly to the forest – usually in groups, although more intrepid women went alone – to harvest dried branches and other dead wood that would readily burn. However, this was not a practical option during the daily rains of the monsoon period. Thus every March-April, men would go into the forest to fell a tree or two to meet their household fuelwood requirements over the wet season. The trees would be allowed to dry for a while, and then split into pieces. In May-June, parties of men and some women would go up into the forest to head-load down this fuelwood. In many cases this work was – and still is - conducted under a system of mutual reciprocity, or *parma*<sup>3</sup>.

Aerogramme home, Surigaon, 8 June 1989

*Firewood carrying is done in teams, usually on a shared basis so that on one day one household's firewood is bought down; on the next, another's. It is both hard work and a very social occasion – requiring the provision of much local beer (jaad) by the household concerned. This prompts much joking and singing; even on the days of torrential rain this month (it's getting late – the firewood should be in), I've heard loud bursts of song ringing out from the forest as firewood carrying teams emerge with another load. The standard rate down here in Surigaon is four trips in one day, at the end of which everyone is fairly drunk and exhausted. As I was washing my clothes at the water spout yesterday afternoon, one firewood-carrier on (I presume) his last lap placed his load down by the stream, curled up beside it, and promptly fell asleep!*

During the coldest and driest months of the year, when the fields were bare (the stubble grazed into the muddy ground), parties of head-loaders could again be seen emerging from the forests, this time carrying a different product: oak tree fodder. These fodder harvesters often resembled quivering, walking bushes, so weighed down by their bundles that only their legs appeared from underneath<sup>4</sup>. The dark green prickly leaves of *khasru* or the less prickly *banj* and *phalat* do not look like very obvious fodder, but being green when most other vegetation is not, they are quite readily eaten by livestock during the winter.<sup>5</sup> As in the case of monsoon fuelwood, the harvesting of oak fodder differed from the rest of the year in being usually done by men, as it was very heavy work and required walking far from home. Otherwise, women were the usual fodder collectors.

The way in which the Khadkas exercised control over the forest was not through charging for the collection of different forest products – these were broadly viewed as a free resource for all. Nevertheless, each part of the forest was “owned” by a particular household or households of one extended family, who imposed charges for the use of forest land – for erecting animal shelters (*goths*) or for cultivating potatoes. For the privilege of establishing an animal shelter, a non-Khadka had to pay the Khadka family concerned a certain amount of *ghee* (clarified butter); the exact amount was negotiated according to individual circumstance, but was of the order of a litre of butter per adult buffalo per season. For the use of potato plots, a present of potatoes was expected by the Khadkas at the harvest. If they had supplied the seed potatoes, the arrangement was one of sharecropping – half to the cultivator, and half to the Khadkas.

There was already a growing awareness amongst villagers 20 years ago that the forest belonged to the State, and that Khadka claims were legally invalid. However, State ownership was not viewed in a very positive light. The Forest Department had a mixed reputation at the time, and villagers feared that greater government intervention would mean heavy controls and fines. At least with the Khadka system, everyone could negotiate face to face; negotiating with a government bureaucracy wearing the face of an outside official (perceived to be self-seeking and insensitive) was a less comfortable proposition.



Villagers broadly recognised that the forest was becoming degraded through heavy use; older people would often regale me of tales of the density and wide extent of the forest when they were young. The Khadkas had thus decided that something should be done, and had placed a number of rules on forest use. The area and quality of a particular type of bamboo<sup>6</sup>, had become scarce – so its harvesting was limited to every second year. Then the oak forests – in particular the *khasru* – had, as in many other parts of the mid hills, been reduced through lopping to stumpy trees with spiky outgrowths, reminiscent of punk haircuts. Their harvesting for fodder was also restricted – which effectively meant that one year, the Suri livestock ate *khasru* during the winter, and the next, *banj* and *phalant*. It was accepted by everyone that you did not fell oak trees for fuelwood or timber - their fodder was more valuable. Whilst these simple rules for forest conservation were broadly followed, there were always some who tried to get round the system, either because they were too poor to have a choice, or because they refused to acknowledge the Khadka supremacy. Overall, there was a perception that the forest was continuing to decline.

Over 20 years on, the forest is actually in better condition than it was. This is not just according to my own observations, but also to the observation of any villager asked on the subject – and further confirmed by a recent study<sup>7</sup>. A number of factors have contributed to this improvement, but a very significant one is that the forests of Suri are now Community Forests. Here I must declare a bias: as a forester with responsibilities for the management of the Nepal Swiss Community Forestry Project (NSCFP), I am an enthusiastic proponent of community forest management. Under community forestry, all the households using a particular forest area formally constitute themselves as a Community Forest User Group (CFUG), and discuss and agree a forest management plan. The plan is based on an assessment of the forest condition, and balances what harvesting is allowed against the needs of the different users.<sup>8</sup> Special provision for the poorest and most disadvantaged is a legal requirement.

There are also other factors involved in the improved condition of the forest today. One is a reduction in the number of livestock kept in animal shelters in the forest, due to lack of local labour; people prefer to become migrant workers. Another possible factor is the cessation of potato cultivation in forest plots, this being now practised more intensively around homesteads instead. However, in terms of area covered, the potato plots were never highly detrimental to the forest. Probably of greatest significance is the increase in tree and bamboo planting on private land.<sup>9</sup> Of course it is the poorest households who have least opportunity to plant their own trees, having least land. Furthermore, what land they have is often in the highest areas where the cool temperatures are already a limit on crop ripening and overall yields – so tree shade on crops must be particularly avoided. That said, people

can be very innovative in finding a space to grow a valued fodder tree that will provide emergency winter rations for their cow (fig species are a common preference), or a clump of bamboo that can be easily harvested close to their house, when they need it. Yet the forest is still a lifeline for regular tree product needs.

Diary extract, April 2008

*It is a beautiful clear spring morning, and outside the Health Post, a group of banner-waving Maoists is slowly gathering to celebrate electoral victory. We leave them behind, heading upwards to the forest, with a member of the Bajredanda Community Forest User Group committee. His name is Sukrabar Sherpa; "Man Friday" inevitably comes to mind, as he was named for the day of the week on which he was born. Where once there were low yielding terraced fields at the forest edge, there is now a plantation of pine, in amongst which oak has come up naturally, and is now well established.*

*Further up, the path enters an area of mature khasru – still punk-like in appearance due to fodder lopping but, says Sukrabar, in better condition than it was. As we climb higher, the voices of two girls singing floats across the other side of the valley, and Sukrabar shakes his head, saying that you hear singing in the forest less often these days, because there are fewer goths in the forest. A cuckoo is calling sporadically, and a bright red flash of a small scarlet bird in flight provides sudden colour. The path climbs steeply upwards, through fading red rhododendrons and then eventually to still blossoming white ones – just as recalled in my letter 19 years ago. Eventually, after some one and a half hours of walking, we reach our goal; a chauri-gai goth in the middle of clearing. The chauri-gai are at home in the cool mountain temperatures and would overheat at lower altitudes in the summer. They are large, mainly black animals covered in white splodges or visa versa, with impressively pointed horns and oddly fluffy tails.*

*The goth is being managed by a Sherpa family, who pay a fee to the community forest fund for the privilege. We are invited for tea; it is made with leaves plucked and dried from their own tea bushes (grown beside their house in the village) and flavoured with salt, ghee, and a little milk for good measure. If you do not think of tea, but more of soup, it is delicious. The family make a living from their 14 chauri gai, which they move around the forest throughout the year – highest up in the rainy season, back down to close to their house in winter – changing location roughly every two months. Every morning they milk the animals, which they say yield some 16-20 litres. The husband then sets off for the dairy at Jiri, where he sells the whole milk and returns – a round trip that takes him some 5 hours walking. They eat and sleep in their smoky goth of woven bamboo, sharing the space with a few chickens and the calves when they are first born. Their large Tibetan mastiff dog guards against wild animals outside. It is a simple life, and not without risk, especially given that the death of a chauri gai is a huge financial disaster. The monsoon months are particularly difficult, when there is constant wetness and leeches are everywhere. Yet when asked about their choice,*



*the Sherpini (Sherpa woman) shrugs and says that this is the life they know. It is indeed – they have been doing it for 16 years - but it is a life that fewer and fewer people are choosing to lead.*

The committee in charge of what is now Bajredanda Community Forest is made up of Sherpas, Tamangs, Dalits, Newars, Chhetris and a Bhujel - women as well as men<sup>10</sup>. The contrast with the previous domination of the Khadkas is striking. I can only guess at the power games that must have played out in the process; the current committee members acknowledge these struggles with laughter. Of course some of the Khadkas resisted, they say – but they also point out (perhaps because a Khadka is present, perhaps because it is true) that some Khadkas supported change. In fact it is not difficult to believe that different Khadkas had different views, given that some families in the past claimed rights over larger areas of forest than others. The committee has also seen internal fights, highlighted when the first chairman absconded with some of the funds. Whilst the funds are still missing, he is said to be too ashamed to show his face in the village – which the current committee argues is a moral victory, at least.

During the time of the civil conflict, the CFUGs were one of the few – and certainly the most inclusive and best organised – local institutions to keep functioning. In the absence of an elected village administration<sup>11</sup>, it was often the CFUGs that made decisions over village development activities, using their funds for matters such as maintaining paths or repairing the school roof. They still do so. Indeed, community forestry has developed beyond a tool to promote the sustainable management of forests. It is seen by many as a means of facilitating social change.<sup>12</sup> Of course, this must be set within the overall political climate

of Nepal – of the greater awareness of rights, and demand for change, that has arisen out of the civil conflict.

In talking with some of the Kami members of Bajradada Community Forest – who include Hasta Lal, Tirtamaya and Kaili (chapter 7) – two particular changes in attitude emerged. One was an expression of responsibility for the forest – Tirtamaya, for example, explained how it is important to lop the oak trees without destroying the crowns, and rotate the harvesting area each year to allow time for regrowth. Amongst the Kamis, who so often in the past took such a fatalistic view on everything (that nothing was in their hands to change), this was striking. Of course Tirtamaya could have been saying what she thought I wanted to hear – but her words were certainly a contrast with the past. A second point which all the Kamis emphasised, and which in many ways is even more significant, is that they have a voice in decision making. Others listen to them. Thus the annual membership fee for the CFUG was originally set at Rs 35 per household, but the Kamis argued that this was too expensive for them and other poor households. The members then agreed that the cost should be reduced to Rs 25. It seemed less the saving of the Rs 10 in itself, than their success in arguing their case that was of particular satisfaction to them. These are small things in themselves, but important in what they represent.

The Bajredanda CFUG generates funds from their annual membership fee and from fining persons who break the rules, in addition to charging for certain specific uses of the forest, and selling what forest products they can.<sup>13</sup> In this they are similar to other CFUGs, although the bank balance of each varies according to the type of forest



and its productivity, as well as to how well the members organise themselves and their finances. The overall hope for community forestry is that the CFUGs will be able to generate jobs for their members, as well as group revenue, from the commercial harvesting and processing of products. A number of plants yielding essential oils are promising in this regard and indeed the Bajredanda CFUG has established a distillation plant for wintergreen oil. However, the greatest profits are to be made from the sale of timber.

It's a paradox that selling timber is the most obvious and most difficult way for CFUGs to make money. It's obvious because of the high prices that can be gained, and difficult because of the practical hurdles of felling, sawing and getting the timber to market, the complicated rules and regulations that have to be followed, and – most of all – the informal payments that are often demanded along the way. This is becoming increasingly apparent to the members of Bajredanda and Koshnidhi CFUGs, who are together planning to extract timber for sale. For a start, they had to halt all harvesting activities for a number of months in 2010 due to a temporary nation-wide timber ban, introduced by the Minister at the time, who was sceptical about community forestry<sup>14</sup>. Now they are trying to develop a business plan, for which task they have established a timber committee. It is disappointingly noticeable that those in the committee are almost all Khadka men – it is they who have the business experience and confidence. NSCFP staff members are encouraging a more representative involvement, but it is clear that “old habits die hard.”

Community forestry represents a huge movement in Nepal – one that is widely hailed as a major success story, but which is also not without critics. In Dolakha district alone, there are now some 342 CFUGs, managing some 40,583 ha of forest<sup>15</sup>, whilst country-wide there are some 14,500 CFUGs, their membership numbering over 1.6 million households. About one quarter of the entire forest area of the country is now managed by communities, its uptake being particularly concentrated in the middle hills<sup>16</sup>.

The CFUGs are federated at district and national level, which makes them a powerful grassroots movement. Indeed, they are vocal in lobbying for the rights of their members<sup>17</sup>. This is important, as there are different views about community forestry within the government, and some officials would like to see the rights of forest users curtailed. Such retrogressive views are particularly apparent when it comes to harvesting valuable resources such as timber – as illustrated by the recent temporary ban on timber. Another potentially valuable resource, in the light of international attempts to address climate change, is the carbon sequestered in forests (particularly those that are managed to maximise sequestration). There is much talk of carbon markets and the mechanism of REDD – yet how this can be applied to community forests in an equitable manner is not entirely obvious, and is the subject of considerable debate<sup>18</sup>.

Community forestry in Nepal still faces many challenges, especially in ensuring that the rights of the poorest and disadvantaged are fully respected. By no means all CFUGs function as democratically as those of Bajredanda and Koshnidhi, and they cannot be considered to be “perfect”. Yet the achievements made nationally in community forestry over the past 20 years – in terms of user participation in decision making, sustainable management and the generation of income – are very significant.

## Endnotes

- 1 Gunte was the nickname of one Padam Bahadur Shrestha, a Newar man whose activities I followed as part of my research.
- 2 A *chauri-gai* is a female cross between a yak (*Bos grunniens*) and a hill cow (*Bos indicus*). *Chauris* are apparently more productive than female yak, and more tolerant of heat – thus they are raised in the intermediate altitude between cattle and yak, being tolerant of altitudes over 4,000m in the summer, but also adapting to altitudes down to some 2,500m in the winter. The usual cross is between a yak bull and a hill cow, although bigger and stronger animals are said to result from a hill bull and a female yak. I remember Karnak Bahadur Karki remarking to me that the keeping of *chauri gai* was a sin, because the progeny are infertile and are thus kept from their mothers and allowed to die. However, I am not sure if this practice is the norm.
- 3 The system of *parma* was used when a task demanded an intensive input of labour. Participating households shared their labour on an equal basis. One day's labour for another household meant that one day's labour by a member of that household should be given in return.
- 4 I weighed some of these loads, and commonly found them to be 50-60 kg. A forester friend who also weighed some fodder loads in a different part of Nepal found them to be of similar weight – one 50kg load being carried by a teenage girl (Jane Gronow, *pers.comm*).
- 5 The botanical names of these oaks are: *khasru* - *Quercus semecarpifolia* ; *phalant* - *Quercus lamellosa* ; and *banj* – *Quercus lanata*
- 6 The bamboo was known as *tite ningaalo* (*Arundanaria* spp) and was (still is) used to weave fine baskets (coarser baskets and animal shelters being made from another type of bamboo, *ghurde ningaalo*).
- 7 Surya Maharjan, *personal communication*. The study that he coordinated is: Niraula, R.R. and Maharjan, S.K. (2011) *Forest Cover Change Analysis in Dolakha District (1990 – 2010) A study from project cluster VDCs*. Nepal Swiss Community Forestry Project, June 2011.
- 8 The legal validity of a CFUG rests on the management plan that they draw up being agreed by the (government)

- District Forest Officer. He (rarely she) then signs over to the CFUG responsibility for managing the forest, and rights to its use. The CFUG thus becomes a legal entity, with a written constitution, a committee, and a bank account. This is a process that has been facilitated in Dolakha district through the Nepal-Swiss Community Forestry Project (NSCFP) over the period 1990 – 2010 – although Swiss support for community forestry in the area goes back even further. The project works with both the Forest Department and a variety of local non-government organisations (NGOs) which provide services in CFUG establishment, training, and subsequent coaching.
- 9 Having spent many long weeks in my student days scrambling up and down terrace banks and in and out of gullies, recording all the trees and bamboo clumps on people's private land, it only takes a glance to see that there has been a near explosion of vegetation on such land over the intervening 20 years.
  - 10 Legally, the committee membership should be at least one third women; this is indeed the case for this particular CFUG.
  - 11 Local elections were impossible during the years of conflict, and are still unlikely to be held for some time. The last were held in 1998; the committees thus formed were dissolved in 2002.
  - 12 The NSCFP has placed particular emphasis on governance issues in CFUGs – notably, supporting transparency and inclusivity in decision-making, active participation by individuals belonging to disadvantaged groups such as Dalits and women, and the detailing of specific provisions for such groups in management plans. Governance coaching sessions are held to discuss and reflect on these issues, using role plays and songs to provoke thought. See <http://communityforestry-nscfp.org/>
  - 13 In the case of Bajredanda CFUG, the main provisions of the management plan concern fodder and timber harvesting, and payment for the erection of goths. The harvesting of oak fodder is rotated on a three-yearly basis, so that each year, a different area is harvested – thus allowing regeneration in the non-harvested areas. The amount charged to members is effectively the annual membership fee, of Rs 25 per year. The harvesting of timber is charged to members at Rs 5 per cubic foot, although the poorest members have provision to harvest free of charge. Kamis are allowed to manufacture charcoal free of charge. The CFUG is also gaining revenue from the distillation of wintergreen oil (derived from the shrub *Gaultheria fragrantissima*, and used in ointments and inhalations against blocked breathing) – for which the NSCFP has provided support. (This was both in the establishment of the distillation unit and the marketing of the oil; limited marketing skills, information and networks are often a constraint to CFUGs making a decent profit from forest products).
  - 14 This felling ban was widely covered in the media, generally quoting the government perspective.
- See for example <http://www.bbc.co.uk/news/10338218> (dated 17 June 2010).
- 15 The total forest area of Dolakha district is 101,500 ha, but of this only 61,915 ha is considered to have potential as community forest (the rest being too distant from settlements or otherwise unsuitable). Thus nearly two-thirds of the area that could become community forest is indeed under that management regime.
  - 16 Community forestry is not so prevalent in the high value forests of the plains, or in the high altitude forests.
  - 17 Most CFUGs belong to the Federation of Community Forest Users of Nepal, FECOFUN, which has a powerful voice at national level and is also active in more international fora. See <http://www.fecofun.org/> and <http://www.rightsandresources.org/>
  - 18 REDD, Reducing Emissions from Deforestation and Degradation, is an excellent idea in theory that is nevertheless difficult to put into practice. For further discussion in the case of Nepal, see: Pokharel, B. and Byrne, S. (2009) *Climate Change Mitigation and Adaptation Strategies in Nepal's Forest Sector: How Can Rural Communities Benefit?* NSCFP Discussion Paper 7, Nepal Swiss Community Forestry Project, SDC and Intercooperation.