Primary health care, community participation and community-financing: experiences of two middle hill villages in Nepal

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Although community involvement in health related activities is generally acknowledged by international and national health planners to be the key to the successful organization of primary health care, comparatively little is known about its potential and limitations. Drawing on the experiences of two middle hill villages in Nepal, this paper reports on research undertaken to compare and contrast the scope and extent of community participation in the delivery of primary health care in a community run and financed health post and a state run and financed health post. Unlike many other health posts in Nepal these facilities do provide effective curative services, and neither of them suffer from chronic shortage of drugs. However, community-financing did not appear to widen the scope and the extent of participation. Villagers in both communities relied on the health post for the treatment of less than one-third of symptoms, and despite the planners’ intentions, community involvement outside participation in benefits was found to be very limited.

Introduction

It is almost universally acknowledged by national and international health planners that community participation is the key to the successful organization of primary health care (PHC). The 1978 Declaration of Alma-Ata identifies community participation as the process by which individuals and families assume responsibility for their own health and welfare and for those of the community, and develop the capacity to contribute to their community’s development (p. 20). Many arguments have been advanced for adopting community involvement in health activities (CIH) as a strategy for health development: (i) CIH is a basic right, which all people should be able to enjoy; (ii) CIH can be a means of making more resources available by drawing upon local knowledge and resources; (iii) CIH can make health services more cost-effective by extending their coverage and lowering their overall cost; (iv) CIH gives the community the right to ensure that services are acceptable and respond to the priorities of the community as opposed to medical needs as defined by the health authorities; and (v) CIH breaks the knot of dependence that characterizes much health development work and makes local people aware that they could become active participants in development in general.

More specifically, participation in the economic sphere (contributions of materials, labour and money by the community for use in the health sector) is argued to put no additional burden on individuals, at least to the extent that community-financing attracts resources otherwise unexploited. It also redirects resources already spent by individuals on health care services provided by the private sector. By drawing on untapped human and financial resources, PHC ‘can contribute to the awakening of the social interest that is so important for mobilizing people’s efforts for development’. Community-financing has, however, its own important limitations, notably its inability to bring about greater equity in health care,
its inherent tendency to promote curative care, and its inability to generate sufficient funds to pay for supervision, logistical support and referral linkages.

Relatively little is known about the potential and the limitations of community-financing and about its impact on community participation. This paper reports on research undertaken to explore the extent to which community-financing, as opposed to state-financing, enhances community participation in health. Based, in part, on Cohen and Uphoff’s analytical framework, the paper draws on the experiences of two predominantly Gurung middle hill villages in Kaski district of western Nepal with a state and a community sponsored health centre. The organization of primary health care in these two villages is similar to that in other parts of rural Nepal, encompassing a health post, village health workers, health volunteers, a health committee, and trained traditional birth attendants. However, the management and financing of primary health care differs between the two villages: in the village of Ghandruk health care is provided by a community controlled and financed health post while in the village of Sikles it is delivered by a state controlled and financed health post. In the Nepali context both of these health facilities are relatively successful in providing basic curative and prophylactic services and both health posts run their own drug revolving-fund. Unlike many other health posts in rural Nepal where staff are often disenchanted with the isolation and discomfort of rural life and make little effort to develop community involvement, both Ghandruk and Sikles health posts are staffed with qualified, enthusiastic individuals and, in the case of Ghandruk, are well integrated into the community.

This paper begins with a brief review of the history of the two health centres. The research method and results are then presented and discussed. Finally, the paper concludes with a summary of findings.

**Background**

The two villages, Ghandruk and Sikles, are located on the steep slopes of the foothills of the Annapurna mountains in western Nepal. They are predominantly Gurung with populations of over 5400 and 3700, respectively. Neither village has access to a road and both can be reached only by lengthy and arduous day-long hikes. The inhabitants of both villages are primarily subsistence farmers who cultivate the steep terraced slopes below their villages.

The Ghandruk Community Health Centre (CHC) was initiated by the Annapurna Conservation Area Project (ACAP), a local non-governmental organization, in 1987 as a part of its overall goal of conservation and harmonious development in the Special Management Zone within the Annapurna Conservation Area. The primary objective of the Ghandruk pilot health project has been to develop a community based, community supported health care system that (i) encourages the members to actively participate in their own health process; (ii) raises the overall level of health awareness; and (iii) trains local individuals to act as information sources for health issues. Village leaders were encouraged to discuss the village’s priorities for establishing a permanent health centre of its own, the location of the health centre, the community’s willingness and ability to finance the health centre on a long-term basis, and the selection of local individuals to be trained as health workers and health volunteers. To finance the operation of the health centre, a trust fund and revolving drug fund was established through the financial contribution of the community and ACAP. The trust fund was initially expected to generate a return sufficient to finance the salary of the two staff members of the centre.

The Sikles health post was first established in the mid-1950s through financial support from the Indian government, in order to provide Indian army pensioners and their families, as well as other villagers, with basic medical care services. Later, the Government of Nepal took over the operation of the health post during its drive toward the implementation of an Integrated Community Health Program in the late 1970s. To supplement the meagre essential drugs supplied by the government the health post has more recently established its own drug revolving fund with financial support from ACAP and other external sources.

**Methodology**

The data for this paper is based on 6 weeks’ research carried out in the villages of Ghandruk and Sikles in the summer of 1992. A stratified sample of 105 households (520 people) was drawn from the largest concentrated settlement in each village, where about one-third and two-thirds of the populations of Ghan-
druk (Wards 3-8) and Sikles (Wards 5-9) live, respectively, and where the distance from the health post is about a half-hour's walk. Questionnaire-guided interviews with participant observation were used to ascertain a range of information, including illness history and method(s) of treatment, perception of the quality and effectiveness of services provided by the health centre, awareness of village health committee, health volunteers (HVs), village health workers (VHWs) and traditional birth attendants (TBAs) and the services provided by them.

In addition to the sample household interviews, personal interviews were also conducted with various other individuals involved in the delivery and organization of health care services, including the members of the health committee, the staff of the community health centre, private practitioners and traditional healers. All interviews were conducted by the first author and our three local research assistants – two females, one from Ghandruk, one from Sikles, and one male from Ghandruk – who underwent standard research training with us. All our household interviewees were female heads of households, although in a few instances other household members also participated. Great care was also taken in translating the questionnaires from English to Gurung and Nepali to ensure that conceptual categories included in the questionnaires were meaningful to respondents in the way intended.

Community participation and community-financing

Before presenting and discussing our findings it might be useful, especially in view of the ambiguity created by various interpretations given to the concepts of community-financing and community participation, to define explicitly what these two concepts mean. As Cohen and Uphoff\(^1\) noted in their review of the literature it might be useful to treat the concept of participation as a rubric under which a number of clearly definable elements can be assembled rather than treating it as a clearly defined concept capable of measurement. Following Cohen and Uphoff's analytical framework, community participation could then be approached by examining the dimensions and contexts of participation. Briefly, dimensions of participation concern (i) the kind of participation that is taking place, (ii) the sets of individuals in the participatory process, (iii) the various features of how that process is occurring, and (iv) the purposes of participation. The context of participation focuses on historical, environmental and socioeconomic parameters under which participation is taking place.

In the following section we focus primarily on the kind of participation – participation in benefits, participation in decision-making and implementation – and on who participates, while making some general observations about the context of participation.

The concept of community-financing is often defined broadly as contributions by individuals or family beneficiaries or community groups to support a part of the cost of the health services. \(^17\) Community-financing is here defined in a more narrow sense as 'a concerted action [by people who live together] for the benefit of people who share a common interest or purpose'. \(^18\) The latter definition excludes public health facilities funded through taxation or formal social security schemes, loans obtained from national governments or the resort by national governments to straight deficit-financing from the domain of community-financing health care, even though in all these cases there clearly are direct or indirect contributions from the general public.

Participation in benefits and community utilization of health care services

The delivery of health care services in the villages of Ghandruk and Sikles is as complex and diverse as are the villagers’ beliefs and practices surrounding illness, and their causation. In addition to the village health centre, the majority of villagers rely on curative/preventive services provided by a diverse group of individuals, including traditional healers such as shamans, herbalists, and private practitioners (often retired army nurses who provide basic curative medicines), or by individual villagers who possess knowledge of a specific cure such as a remedy for snake bites or toothache. Illness is believed to be caused by soul loss, witchcraft, attacks by malevolent spirits and deities, natural causation and unfavourable astrological positions.

The provision of curative and, to a limited degree, preventive/promotional services by the two health posts, as well as the availability of drugs, have undoubtedly benefited many villagers: they need not suffer unnecessarily from many simple and curable illnesses, and also they need not incur travel costs and other costs associated with accompanying their patients to the nearby town hospitals. It is generally believed that benefits are greater under a community-financed health centre, such as Ghandruk CHC, since
community-financing, as a tangible demonstration of community participation, will increase utilization. 19

Table 1 provides a comparison of the pattern of health-seeking behaviour between the two villages. It shows a remarkable similarity in the pattern of treatment in the two villages, especially with regard to the utilization of services provided by health post/hospitals and self-treatment. The health centre was resorted to only for the treatment of about 30% of the symptoms, both under a state sponsored health post and a community sponsored and run health post. About 40% of all cases were self-treated in both villages. As is clear from Table 1, over one-quarter and one-third of all illnesses were left untreated in Ghandruk and Sikles, respectively. The higher proportion of untreated illness for Sikles might be related to the higher level of verti in Sikles and the higher prices for medicine.

Table 1. Sources of treatment and their utilization *(percentages)*

<table>
<thead>
<tr>
<th></th>
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<tbody>
<tr>
<td>Health post</td>
<td>30.4</td>
<td>18</td>
<td>29.7</td>
</tr>
<tr>
<td>Hospitals/clinics</td>
<td>2.0</td>
<td>n.a.</td>
<td>1.8</td>
</tr>
<tr>
<td>Traditional healers</td>
<td>8.8</td>
<td>6.5</td>
<td></td>
</tr>
<tr>
<td>Self treatment</td>
<td>40.6</td>
<td>3</td>
<td>39.4</td>
</tr>
<tr>
<td>Herbs</td>
<td>7.9</td>
<td>n.a.</td>
<td>6.1</td>
</tr>
<tr>
<td>Medicines</td>
<td>25.2</td>
<td>n.a.</td>
<td>15.2</td>
</tr>
<tr>
<td>Others</td>
<td>7.5</td>
<td>n.a.</td>
<td>18.0</td>
</tr>
<tr>
<td>No treatment</td>
<td>26.1</td>
<td>59</td>
<td>35.2</td>
</tr>
</tbody>
</table>

* Includes treatments for the most common symptoms: stomach ache/swollen stomach/burning stomach/gas; diarrhoea/dysentery/vomiting/worms; cold/cough/breathlessness/chest pain; headache/fever; wounds/boils/itching; eye problems/redness/watering eye; ear infection/ear pain; joint pain/whole body pain/back pain/knee pain; tingling body; dizziness/numbness and weakness of whole body, hands and legs.

Table 1 should, however, be interpreted with some caution. First, the sources of treatment are not mutually exclusive, as for many illnesses, especially the more serious ones, patients utilize more than one treatment. These treatments are used either simultaneously or sequentially, depending on the perceived effectiveness of each treatment system, the type of illness experienced, the belief system held by the patient or his/her relatives and neighbours, and cost of treatment (including the travelling and waiting time at the health post). 21 Second, the results tend to deflate the relative importance of traditional healers and inflate the size of illnesses left untreated. Many villagers do not feel so comfortable talking freely about their use of traditional healers as they do about their use of health post/hospital services. The same argument, though to a limited extent, applies to the two sub-categories of self-treatment, herbal remedies, and 'others'. Third, since none of the members of the interviewing team had medical training, heavy reliance had to be placed on the informants' description of illnesses and their perceived symptoms. Finally, the problem of translating between the terms of scientific medicine and those of a folk taxonomy of illness further complicated the tabulation of our findings.

Community participation in the delivery of health services

The organization and delivery of PHC in the two villages under consideration are modelled according to the original Integrated Community Health Program drafted in 1975 by the Government of Nepal and WHO. Each health post is supported by a health committee, a VHW, and several HVs and TBAs, all of whom are elected by villagers. The actual delivery of PHC in both villages, however, was found to be quite different from that described in the Integrated Community Health Program. Table 2 summarizes the villagers' organizational health knowledge and their perception of services delivered by the formal health sector. These data need careful interpretation, especially in view of the small size of our sample and

Table 2. Villagers’ knowledge of village formal health organization and perception of services (as % of sample population)

<table>
<thead>
<tr>
<th></th>
<th>Ghandruk</th>
<th>Si.dles</th>
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<tbody>
<tr>
<td>Aware of health commune</td>
<td>2</td>
<td>7</td>
</tr>
<tr>
<td>Aware of health volunteers</td>
<td>44</td>
<td>30</td>
</tr>
<tr>
<td>or was given advice by them</td>
<td>n.a.</td>
<td>19</td>
</tr>
<tr>
<td>Doctor checked well</td>
<td>49</td>
<td>73</td>
</tr>
<tr>
<td>Doctor explained the nature of illness and how it could be prevented in future*</td>
<td>10</td>
<td>8</td>
</tr>
<tr>
<td>Medicine was effective</td>
<td>61</td>
<td>53</td>
</tr>
</tbody>
</table>

* About 89% and 65% of the sample population of Ghandruk and Si.dles, respectively, answered this question.
of the potential problems posed by interpretation of the questions by the interviewees.

Health committee
In both villages, over 90% of the sampled population appeared to be unaware of the existence of a health committee and of the identity of the person representing their ward. In theory, the function of the health committee (whose members consists of village council members, other local leaders, and the person in charge of the health post) includes supervision over the health post operation and promotion of community involvement in health activities. Many members of the Ghandruk CHC were not aware of their responsibility, rarely attended meetings, and their knowledge of the financial operation of the CHC was either non-existent or inaccurate and out-dated. In comparison with other village committees (such as the forest committee) the health committee was generally viewed by the committee members, many of whom were also members of other committees, as lacking the importance of the other committees in terms of prestige, financial resources involved, and relevance to the daily life of the village. As one member of the health committee (ex-village leader and a lodge owner) put it, 'the committee members do not attend meetings regularly because the village health post is very small, staffed only by two persons who treat only minor illnesses'.

In contrast to Ghandruk, the Sikles’ health committee members were found to be more active, even though the health post is effectively controlled from above by district/regional health authorities. Like the Ghandruk health committee, the members of the Sikles health committee were all men, ex-Gurkha officers and relatively affluent.

Villagers were not only generally unaware of the existence of a health committee, they also held different views about the quality of services provided by the village health centre from those held by the health committee members. In both villages, over 90% of the surveyed population indicated that the health post's staff were well qualified for the treatment of their illnesses, while, according to most of the health committee members, the village health post should ideally be staffed with well qualified doctors/surgeons.

Health volunteers (HVs)
HVs appeared to be better known to villagers than the health committee members as providers of curative, preventive and promotional services. Although the popularity of HVs varied greatly from one ward to another, about 44% and 30% of the sample population of Ghandruk and Sikles, respectively, had encountered HVs. In theory, HVs are supposed to perform, in total, 27 functions, ranging from health promotion (encouraging villagers to vaccinate their children and use birth control measures) and education (education in proper nutrition, the use of rehydration fluid, safe home-delivery practices), to diagnosis of tuberculosis, leprosy and malnutrition, and treatment of minor ailments, all for free. HVs, however, were found to perform only a few educational and promotional tasks, and they had already all abandoned their treatment task. The drug kit given to them at the end of their training had been depleted long ago, as the drugs sold to their relatives and neighbours on credit were never replaced.

Village health workers (VHWs)
In contrast to the relatively active roles of HVs, VHWs appeared to be generally inactive. VHWs are supposed to perform a wide range of educational and promotional tasks, such as the mobilization of mothers and their children for vaccination and other services provided by the monthly maternal and children health clinics. In addition, they are responsible for the enumeration and updating of household information, and frequent home visits to check for diseases such as malaria, smallpox, and tuberculosis and to provide medication or to make referral to the health post. However, only 19% of the sample population of Sikles had encountered the VHW during his monthly two-day visit to the village, if he had come at all. In the case of Ghandruk the staff of the health centre had only recently realized that there was a government appointed VHW responsible for the village.

Traditional birth attendants (TBAs)
Although there were several TBAs with some training in both villages, none of them were actively practising. With the exception of a few well-to-do families, all households with children under one year old in our sample population relied on family members and relatives for both delivery and postnatal care. A few women with families with sufficient resources and relatives in Pokhara (the closest town to both villages) delivered in hospital. According to statistics compiled by the Sikles health post, only 11.4% of births were assisted by the health post staff, even though the health post had its own auxiliary nurse midwife (ANM).
Community participation in health-related activities

Although no significant differences can be detected in the extent of the two communities' participation in the delivery and utilization of health services, the two villages do, however, differ in terms of their experiences with community involvement in the health-related activities. Since its establishment in Ghandruk in 1986, ACAP has been instrumental in mobilizing villagers to carry out several health-related works, such as the construction of private latrines, the construction and maintenance of a village water supply, the establishment of a community day care centre, and regular clean-up campaigns. Numerous attempts have also been made to help villagers improve their farming practices and develop income-generating activities. In our sample about 76% of houses had their own toilets, as compared to 32% in 1985. Moreover, 39% of the sampled houses had their own water tap and 70% of houses with no water tap had access to a communal water tap not far from their houses.

These improvements in health-related factors have undoubtedly contributed to a better health status for the community as a whole. The morbidity rate in our sample population was found to be lower than the rate reported by the health survey of 1985. Within the two weeks preceding our survey, illness was reported for 23.9% of households, as compared with 36% in 1985.

In contrast to Ghandruk, the scope and extent of community involvement in health-related activities in the village of Sikles has been, at least till very recently, very limited. ACAP has more recently undertaken several steps to improve the socioeconomic well-being of the villagers by popularizing the concept of community development. The general sanitation and hygiene is still very low and incidence of illness is much higher than in Ghandruk. The morbidity rate in the sample population was found to be as high as 81%, compared with 23.9% for Ghandruk.

The context of participation

The pattern and extent of community participation in health activities, as described above, is largely influenced by the physical, social, and cultural environment or what is referred to by Cohen and Uphoff as the contexts of participation. Rather than providing a detailed examination of the possible impacts of these socioeconomic and cultural factors, an examination which is beyond the scope of this paper, the following section makes only two general observations.

First, the applicability of a participatory approach to development to rural Nepal is questionable from a cross-cultural perspective. As one commentator observes:

'Most descriptions of this concept [community participation] reflect cultural values of Western individualism and equality. By contrast, rural Nepalese society operates through principles of hierarchy, interdependence, and action through personal relationships and social networks . . . [In these small-scale, fact-to-face communities, where members are linked through kinship, caste and other institutions, persons manipulate their multiple 'connections' for access to resources, goods, and services.]' (p. 212)

These cross-cultural differences are more evident in the delivery of PHC services, an area where the community's beliefs and practices surrounding illness and healing are often not shared by the paramedical staff. As can be seen from Table 2, less than 10% of the sample population claimed that the 'doctor' explained the nature of their illness and how the illness could be prevented in the future; medicine received from the health post in their last visit was effective for only 53 and 61% of Sikles and Ghandruk's sample populations, respectively; and only about half the sample population of Ghandruk felt that they were appropriately examined by the 'doctor', in comparison to 73% for Sikles. The community perception of services provided by the health post was found to be especially low among our informants from the service castes, who complained openly about their poor treatment by the paramedical staff and high drug prices.

Although the initial plan of Ghandruk CHC acknowledges the cultural significance of traditional healing knowledge, traditional healers continue to be viewed with suspicion by the health post staff, and no attempt has been made to utilize the valuable services of these healers in the provision of PHC. Moreover, the paramedical staff's style of practice - an office-setting, hierarchical, and often intimidating style of practice that is mainly confined to dispensing drugs, with little emphasis on education - stands in sharp contrast to that of the traditional healers. In the latter style of practice, patients are often visited by the traditional healers in their home, treated in a setting in which all family members and neighbours are actively involved, and conveyed to in a language familiar to their daily experiences.
Second, rather than being homogenous communities of common interest and fellowship, these two villages are characterized by sharp divisions running along the lines of ethnicity, wealth and gender. The existence of these socioeconomic and cultural hierarchies, combined with male domination within health committees and geographical constraints, prevent health committees from adequately representing the interests of the entire community, especially those of vulnerable groups and women. Community participation in the delivery and organization of PHC might also have been hampered by the under-representation of women among the paramedical staff, as well as by non-remuneration of valuable services provided by HVs (all females).

To what extent the above listed and other sociocultural factors have hindered the development of community participation in health development in the two study villages is an important subject for further research.

Conclusions

Drawing on the experiences of two middle hill villages in Nepal, this paper reported on research undertaken to compare and contrast the scope and extent of community participation in the delivery of primary health care in a community run and financed health post and a state run and financed one. Community-financing did not appear to widen the scope and extent of community participation in the delivery and utilization of health care services. Villagers in both communities relied on the health post for the treatment of less than one-third of symptoms only. Many households in both villages were unaware of health committee members and village health workers, and seldom sought the help of the trained traditional birth attendants and assistant midwife nurses. Moreover, community-financing did not appear to bring about greater equity in health care, at least to the extent that people had to pay for drugs.

In both villages sample households from the service castes were found to be equally dissatisfied with high drug prices.

These limitations of community-financing and community participation in health care do not, however, imply that this option of funding is not viable and therefore should be abandoned. Once placed in the context of the socioeconomic and cultural environment of rural Nepal, the awareness of these limitations should help in devising mechanisms and activities where the shortcomings are minimized and in finding a proper balance between the role of government, non-governmental organizations and community-financing or 'self-help'.

References

5. Abel-Smith and Dua, and Stinson W. op. cit.
9. ACAP has a 'grassroots' philosophy and involves villagers in all aspects of the conservation and development process, ranging from forest conservation, conservation education and alternative energy, through to community development projects and community health and sanitation.
11. The community’s contribution amounted to about 29%, with each household providing Rs 150(approximately US$3.8).
12. After nearly five years in operation the Ghandruk CHC has yet to achieve a state of financial independence. In 1991, nearly one-third of the staff salary were paid by ACAP.
13. The Integrated Community Health Program turned out, as Justice notes, to be simply a renaming of the Nepal Rural Integrated Basic Health Program already in operation; the only substantive change was the addition of the community health volunteer. Justice, op. cit.
14. This research was undertaken by the second author within the context of a two-year fieldwork project.
15. Each village is divided into 9 wards which stretch over several hill-sides.
The health post charges a rate of about 15% over the wholesale price of medicine. This is paid by the 'in-charge' as a compensation for his private pharmacy which he used to run prior to the establishment of the revolving drug fund. According to the 'in-charge', three or four out of 6 patients could not afford to pay for the medicine.


This lack of knowledge appears, as documented by Justice, to be a common phenomenon throughout rural Nepal. Justice, op. cit.

Although the pandrayat system was abandoned following the democracy movement of 1990, the health committees in the two villages under consideration have continued to be composed of the same politically and economically powerful individuals.

For a detailed list of all duties expected to be performed by HVs and VHWs, see Justice, op. cit., Appendix 3.


These morbidity rates should be interpreted with caution. Our survey was conducted just prior to the beginning of the monsoon when the food stock was at its lowest level. The 1985 survey was conducted in October, typically the harvest season.

Cohen and Uphoff, op. cit.


Stone, op. cit.


Bichmann W. Community Involvement in Nepal’s Health System: A Case Study of District Health Services Management and the Community Health Leaders Scheme in Kaski District. Liverpool School of Tropical Medicine, Department of International Community Health, Dissertation, 1987.

Abel-Smith and Dua, op. cit., p. 106.

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