Indigenous Management and Conservation of Medicinal Plants among the Ifugaos of Northern Luzon

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The utilization and conservation of natural resources of the indigenous peoples of Cordillers region in northern Philippines hinge on their ideological and cultural or entation. Abayac examines the Henanga sub-group's beliefs, forest conservation practices and local intellectual property rights system, and how they influence the conservation of medicinal plant resources. Since time immemorial, Avangan Ifugaos have been practicing Pinuchu, a term used to refer to the preservation of privately-owned and managed forest. Rights to these lands are established by one's capacity to improve the area for several generations. A good relationship with the spiritual beings of nature is being maintained. To preserve and respect the areas where they dwell, paniyaw (taboos) are strictly observed. The local version of intellectual property rights protects the exclusivity of indigenous knowledge on medicinal plants within the circle of medicinal plants' specialists. The sacredness of these practices should remain intact, otherwise the effectiveness of the medicinal plants to cure will cease. However, one challenge facing the Ifugaos' medicirial plants preservation is the declining interests of the new generation to internalize these practices,

It is clear that our global interdependence is increasing everyday, and one of our primary commitments to maintaining biological diversity in the tropics requires acknowledging the value of indigenous knowledge and the importance of traditional medicine to people throughout the tropics.

Stephen King, in Balick, et. al., 1996.

Medicinal plants are among the priority concerns of people worldwide. They are naturally found in the forest and in areas near rivers, creeks and springs. While forests are popularly valued as a source of lumber and for watershed, many communities extend their value as a source of edible products including medicinal plants. Medicinal plants have long helped man confront illnesses and other health problems in the past. And knowledge of these plants have been discovered by various indigenous peoples. Numerous medicines have been derived from the knowledge of tropical forest people and clearly, there will be more in the future.¹

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The utilization and conservation of resources have various ideological orientations depending on the context communities operate. According to C.M. Cotton, decisions regarding the use and management of plants and natural resources are based on a combination of biophysical and socio-cultural factors, which together determine an individual's decision-making environment.²

This paper used the data collected in Batad, Banaue, Ifugao in 1995 and in Mayoyao, Ifugao in 1998 while the author was doing a fieldwork for her M.A. thesis. Following Cotton's argument that the cultural backgrounds are essential in determining how a community behaves towards its environment, this paper attempts to discuss the implications of 1) Indigenous forest conservation system, 2) beliefs and practices or taboos, and 3) traditional concepts of intellectual property rights on Ifugao conservation systems of medicinal plant resources.

The Ifugaos of Northern Luzon

The Ifugaos are among the ethnic groups found in northern Luzon particularly in the Cordillera region. Culture and language variations subdivided this group into three: the Tuwali (found primarily in the communities of Kiangan and Lagawe), the Ayangan (found primarily in the communities of Banaue, Hingyon, and Hungduan) and the Henanga (found in the communities of Mayoyao and Aguinaldo). Despite being labeled a fifth class municipality, the province of Ifugao is endowed with rich vegetation. Mount Polis and Mount Amuyao (approximately 2,780 ft. above sea level) are among the top 10 Philippine highest mountain peaks found in Ifugao. This paper will focus on the Ayangan and Henanga subgroups found in north-central Ifugao. The Ifugaos traced their ancestry to two legendary figures: Pfukhan and Gwikhan. Known as the Ifugaos' legendary ancestors, their names are normally invoked during rituals. The Ifugaos have long depended on wet rice farming. They have developed a profound rice farming tradition. The ethnographic works of Barton (1930, 1940, 1943), Conklin (1979), Loofs (1979), Beyer (1945) and Lambretch (1935-1955) can attest to their ingenuity.

The Ifugao province is highly mountainous. It is rich in forest, water and wildlife resources. According to the Ifugao Provincial Profile, about 89.91 percent of the total land area of the province has been classified as forestlands while 12.6 percent is unclassified forest. Whereas, only

10.09 percent of the total land area is classified as alienable and disposable lands. There are four major types of forest in the province: Dipterocarp forest, pine forest, mossy/sub-marginal and brush land types. They are the source of lumber, fuel wood, medicines, wildlife, and other tangible aesthetic value essential to the community. Ifugao has two major rivers. The waters of the Ibulao and Alimit Rivers flow to the Magat River, providing water to the Magat River Multipurpose Dam at the same time irrigating the vast rice lands of Isabela and Quirino provinces.

The Role of the Pinuchu in the Conservation of Medicinal Plants

The conservation of medicinal plants cannot be examined apart from the utilization, management and conservation of the forest. Martin⁵ asserted that native woody plants act as nurse trees, provide protection to herbs and shrubs, and are used by the local people. Ifugao medicinal plants are taken from trees, shrubs, vines and grasses. According to one informant, certain medicinal plants are given particular attention throughout the conservation process. Since most of these plants are used for prolonged ailments and skin illnesses, it is important to ensure their availability in the forest. Forest conservation is innately practiced by the Ifugaos. This is manifested in a customary practice called Pinuchu a term also used to refer to the privately owned forest. The Tuwali Ifugac subgroup calls it Muyong. Rights to this property are established by continuously conserving the area according to Ifugaos' forest practices passed on to them by their forefathers. Improvement starts with planting of seeds that may be taken in faraway areas. Rights can also be acquired through inheritance or can be bought. While forest conservation is mainly pursued for benefits of timber and watershed, herbalists claim that it also encourage the conservation of medicinal plants. It favors the growth of medicinal plants. Herbalists make this assertion based on their experience.

Let us now examine the Ifugao's indigenous system of forest management. The management of the woodlot is done exclusively by the owner. While the conservation practice is done mainly for timber benefits, the practice as a whole neither creates a hostile environment nor adversely affects the medicinal plants. Enkiwe⁷ describes the techniques employed and among these are:

- Frequent cutting of prolific rono, shrubs, and grasses that compete with the growing trees and tree seedlings for nutrient intake and space.
- Thinning activities are employed on heavily stocked or overcrowded portions of the *Pinuchu*.
- Sparsely stocked portions of the Pinugo are replenished by planting other tree species specially the premium ones taken from adjacent areas or from far places.
 - 4) Poisonous tress, shrubs and climbing vines are removed.
 - 5) Pruning is also employed to remove excess branches of young and maturing trees to improve tree growth and help the tree stem straighten as it grows to maturity. Pruned-out materials are collected for firewood.
 - 6) Selective cutting are employed. Trees that are stunted, defective, already deteriorating or dying are cut-down. They are mainly used for firewood. Young trees growing straight and robust are protected until maturity. Good mature trees are sources of timber or lumber.

The conservation of forest and medicinal plants has a very strong ideological component. The ideological component serves to guide the way people utilize and consorve these resources. Rifes and rituals reflect the way people look at the environment and their social relationships. Conservation among the Ifugaos are embodied in a general concept of maintaining a favorable relationship with the supernatural beings, who in turn grant them quality life and abundant harvests instead of illnesses and other difficulties. Some parts of the forest are considered abodes of certain supernatural beings and their ancestors. Thus, it is necessary to protect and respect these areas. The Ifugaos believe that natural resources such as forests are granted to them by supernatural beings and therefore, must be nurtured and respected. Their tradition would attest to a policy of no exploitation of any form of natural resource. The lfugaos have long depended on their forest resources. Aside from water and lumber, there are other forest resources that Ifugaos value much. These include honey, beeswax, indigenous fruits such as Pfunog, Appaw, Khigi and Pfinor, iklog chi allakha (eggs of red ants). Some of these resources can only be found in forests. Also, the famous rice terraces would have not been built without the forest that supply water flowing to their fields. This perspective therefore shows how Ifugao put much value and respect to their forest resources. As explained aptly by Prill-Brett:⁸

An important basic principle of most Cordillera indigenous groups is the perception of harmony between man and nature. Since man depends on his environment for survival, there evolved the indigenous philosophy that nature was not to be conquered and controlled but rather to be respected by adapting to and harmonizing with it. This philosophy could be very well reflected by the *Muyongs* of the Ifugaos.

Ifugao Taboos and Medicinal Plants Conservation

While taboos have long been studied only for their eccentric nature, conservationists appreciate the value of restrictions. Cunninghams reports that in South Africa, it is taboo for menstruating women to collect medicinal plants. In Zimbabwe, permission must be obtained from ancestral spirits before entering the forest where medicinal plants can be found. Furthermore, Cunningham points out that taboos, seasonal and social restrictions on gathering, and the tools and techniques used in plant collection have all served to limit harvests of medicinal plants among traditional communities.

Among the Ifugaos, it is very important to forge a harmonious relationship with the elements of the natural world — forest, rivers, mountains, creeks, springs, to name a few. This perspective is evident in the Ifugao Paniyaw (taboos). Ifugao taboos are restrictions that define people's proper behavior and / or action toward their environment. Among the restrictions are:

- areas considered "sacred" such as graves, certain areas in the streams, creeks, rivers, forest, and hills which are considered to be the abode of certain spirits. These areas are restricted from improper use;
- 2) properties entrusted by the ancestors such as the pinuchu, pfalay (traditional native house) and pajaw (rice fields). The negligence of cleaning and tilling inherited rice fields can cause illnesses which may only be cured through the performance of special healing rituals.

Intellectual Property Rights

Ifugaos developed an indigenous means of keeping certain knowledge systems to a few gifted individuals. Knowledge of medicinal plants and how they are used are being kept by the healing practitioners. They claim that these are sacred and should remain as is; otherwise, the plants will loose their efficacy to cure. Examples of these can be gleaned from the ritual myths relating to the use of medicinal plants. This mechanism shows how the Ifugaos define their concept of property rights on health resources.

The Herbalist

There is no local term for this particular specialist. The people of Mayoyao believe in the curative power of numerous plants if properly used. These plants range from grasses, fern, trees, shrubs and vines. Some of the grasses do not have specific names and are only called *holo*, which literally means grass. More so, certain herbs are believed to be curative only if they are taken, prepared and applied by the herbalist. The application involves an herbalist's recitation of a prayer. The prayer is composed of an intercession asking the past herbalist to help in curing the illness. The herbalist keeps the herbs to himself because he/she thinks that the healing power of the herb will be lost if they will be known. However, there are common herbs, such as those used for colds, which are readily available, but some can be hardly seen nowadays.

Further, in a study done by Loofs, ¹⁰ it was noted that the cholera epidemic (called *pe-or*) that raged a community in 1912-1915 led them to discover a concoction to cure the illness. It was first invented by the people of *Bunhian* (now Aguinaldo). The concoction is composed of brew of the roots of *po'nog* and the leaves of various local plants such as *pfangeh*, *potoptod* (shave grass), *aklipfong*, *pfila* and its most important ingredient called *hanol* (a vine). Most of these plants only grow in the forest.

Medicinal plants are harvested in small amounts and for domestic use only. Up to the present, there is no record of trade or market of medicinal plants in any form. Harvesting can only be done by herbalists who specialize in the curing effects of these plants. It is believed that curing becomes effective only when the plants are properly used or when the herbalist has properly performed the necessary "apfu-ab"—invocations

and/or incantations performed by the Ifugao priest during rituals and rites including the use of medicinal plants". Some plants need invocations for them to be effective. They are usually used to cure snakebites and centipede bites.

Ifugao indigenous healers and health care practitioners have long used medicinal plants during healing or curing ceremonies. These healers specialize in different aspects of health problems concerning the eyes, skin, bone, veins, internal organs, genital organs, and childbirth, among others. Rituals are the primary component of the healing process of socio-culturally constructed illnesses and they are always accompanied by the recitation of ritual myths to invoke ancestral spirits and the gods. The rituals are offered to a specific deity or ancestral spirit who caused the illness and diagnosed by the mom-anap, an indigenous diagnostician who performs the rite. The practitioner usually goes into trance and communicate with ancestors. He/She interpret dreams and other manifestations of messages of supernatural beings. Indigenous healers may however diagnose some illnesses (e.g. pfujuy) that do not require the mom-anap. An indigenous healer may specialize in one or more healing processes.

The leaves of the Amelong and the bark or leaves of the Khatawwa are among the medicinal plants used by indigenous healers. They are used to cure the swollen part of body caused by bone dislocations and bone fractures. These plants are recommended by the bonesetter. The specialist, called mun ujad, will only continue attending to the patient after a day or until the swollen part has subsided.

Some Remarks on the Conservation of Medicinal Plants

Knowledge on the use and conservation of medicinal plants has always been transmitted orally. This poses a problem now since the young generation does not appreciate the value of these knowledge systems. There is a need to raise the consciousness of communities regarding the conditions of their medicinal resources. Perhaps, one critical aspect is to come up with a mechanism to transmit this knowledge. Conservation programs fail when traditional management is withdrawn. However, traditional ways of conservation alone will not succeed. We can no longer find communities that have remained "traditional". Like other highland communities in the Philippines, the Ifugaos have opened up to the

demands of modernization. As a result, traditional practices of conservation are now rapidly declining.

Endnotes

- 1 King, 1995 in Salick et. al. 1995.
- 2 Cotton, 1997: 245,
- 3 Ibid., 1997: 245.
- 4 Provincial Planning and Development Office-Ifugao, 2000.
- 5 Martin, 1995; 226.
- 6 Refer to Enkiwe, 1999 for full description.
- 7 Enkiwe, 1996.
- 8 Prili-Brett, 1997.
- 9 Cunningham, 1993,
- 10 Loofs, 1975.

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