

COMMUNITY FOCUSED INTEGRATION & PROTECTED AREAS MANAGEMENT

IN THE HUASCARÁN BIOSPHERE RESERVE, PERÚ

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In Summer 2015, ConDev Student Media Grant winner Jessica Gilbert conducted a photojournalism and film project to document land use issues and a variety of stakeholder perspectives in protected areas in Peru. Peru's natural protected areas are threatened by a host of anthropogenic activities, which lead to additional conflicts with nearby communities. The core of this project involved a trip to Peru in May 2015 to highlight land use challenges in two distinct protected areas: Huascarán National Park and Tambopata National Reserve.

In this contribution to the Applied Biodiversity Science Perspectives Series (http://biodiversity.tamu.edu/communications/perspectives-series/), Gilbert discusses the integration of communities into conservation management and criticizes the traditional "fortress"-style conservation policies, which she argues are incompatible with ecosystem conservation.

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Community Focused Integration & Protected Areas Management in the Huascarán Biosphere Reserve, Peru

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Integrating communities into conservation management has become a priority for national and international organizations concerned with natural resource management. Traditional conservation policies aimed to exclude local resource users by placing a boundary between the community and the area of interest, often in the form of national parks (Ascher 1995, Agrawal and Gibson 1999). Park management has often prioritized keeping local people out, following the view that human activities are incompatible with ecosystem conservation (Wells 2004). This "fortress" style of conservation has been heavily criticized as poor conservation outcomes following decades of intrusive resource management has forced policy makers to reconsider the role of community in conservation (Agrawal and Gibson 1999).

Many attempts to integrate conservation priorities with community development have been made, but their impact has been questioned. Attempts such as ICDPs (Integrative Conservation Development Programs) have been criticized for being managed by an external agency, often a protected area or an NGO (Wells 2004). In many of these arrangements, the project gains rarely persist past the duration of the project or the presence of the external agency (Wells 2004). Additionally, many conservation agencies rarely examine the concept of community, assuming a community as a small spatial unit, a homogeneous social structure, and a shared set of norms (Agrawal and Gibson 1999). Communities are complex interactions with different actors and institutions. Failing to recognize this complexity ignores how intra community differences may affect resource management outcomes, local politics, and interactions that affect multiple levels of community life (Agrawal and Gibson 1999).

Rather than take a top down management approach, governments should transfer power to local authorities and decision makers to enable people as participants in conservation management rather than managed as subjects (Ribot 2002). This transfer of power "can provide local"

users the independence to make and enforce rules within a circumscribed scope of authority for a specific geographical area" (Ostrom 1998, Ollson et al. 2004). Design, implementation, and management by local people may ensure a more sustainable future for conservation, promoting more equitable distribution of resources and stewardship of natural resources. These issues are at the forefront of my ongoing research in the Central Andes of Peru near Huascarán National Park and the community of Huashao.

Huascarán National Park

Huascarán National Park (HNP) is a 340,000 ha protected area in the department of Ancash, Peru. HNP was recognized as a national park in 1975, a UNESCO Biosphere Reserve in 1977, and as a UNESCO World Heritage Site in 1985 due to its rich cultural and biological diversity. HNP is the 4th most visited natural protected area in Peru, with over 180,113 registered visitors during 2014 (MINCETUR 2015). Tourism is steady throughout the year as patrons are drawn to world class hiking, climbing and day trips to turquoise glacial lakes with striking mountain backdrops.

HNP ranges between 2400-6768masl over 340,000 hectares and comprises 45% grassland





34.5% moraine/rock, 14.8% glacier, 3.4% native forest, and 2.6% wetland (SERNANP 2009). It is home to over 901 species of flora and over 241 species of fauna, including endemic and endangered species (SERNANP 2009). HNP is a long, thin, north to south expanse of protected land surrounded by human settlements and cut laterally by roads that cross the demanding Cordillera Blanca mountain range. Parallel to the park runs the Callejon de Huaylas highway to the west and the Callejon de Conchucos to the east, providing multiple access routes into and across the national park between small, rural communities and larger cities in the valleys. Essentially, HNP is surrounded by people; people with needs and uses of the environment. The department of Ancash in which HNP resides is home to over 1,063,459 residents, of which 42.6% are considered to live in poverty and 17.2% in extreme poverty (INEI 2007). These percentages are much higher at the provincial level, and some of the territory in which HNP resides has a population residing in up to 73.5% poverty and 44.8% extreme poverty (INEI 2007).

Although the designation as a national park prohibits direct use within park boundaries, usufruct land rights were established with the creation of the park for registered campesino communities (peasant communities) with direct

activity within them, especially in the case of cattle grazing. The master plan sets out a strict set of rules and regulations for these direct uses, however they are often unenforced and ignored, leaving the park susceptible to misuse and overuse. A major use of the national park is tourism, with specific areas designated for recreational use. The entrance to HNP through Huashao is one of the most heavily frequented by tourists, as the only road in the area passes the idyllic Laguna Llanganuco, a, 80m deep turquoise glacial lake at 3800masl surrounded by elfin Polylepis sp. forests and snow-capped peaks. Llanganuco receives approximately 60% of all tourism in the park, amounting to over 108,076 visitors per year to this sector (SERNANP 2015).

Huashao

The rural community of Huashao has been integrated into park management in a mutually beneficial agreement between community and park. Since its inception, this arrangement has been the complete design and implementation of the local community, without assistance from external organizations. This arrangement is considered an "historic achievement" by SERNANP (Servicio Nacional de Areas Naturales Protegidas), the governing agency that manages Natural

Protected Areas in Peru. This arrangement is heavily centered on harnessing the economic benefits of conventional tourism, opposing previous arrangements where local residents pay the social and environmental costs of conventional forms of tourism, but seldom partake fairly in the benefits (West and Carrier 2004, Stronza and Gordillo 2008).

Huashao is located in the district and province of Yungay, in the department of Ancash, Peru. The district of Yungay is home to over 20,075 residents, 50.4% which are considered to live in poverty and 20.2% in extreme poverty. The community of Huashao is home to over 844 residents of 211 families, separated between 7 community annexes (Huashao, Incapacollkan, Yuracoto, Jara Allpa, Humacchuco, Coptac, and Huarca), small clusters of houses that create mini metropolises and family units within the community area (Municipalidad de Yungay 2009). Huashao is derived from the Quechua word "huasha," which means far away. Huashao is a traditional, Quechua speaking community of small scale, subsistence agriculturalists and pastoralists that sell products in the nearby city of Yungay. The principal crops produced in Huashao are potatoes, wheat, corn, and peas, and in the past 5 years, flowers.

In 2009, I conducted a series of surveys to complete a community diagnostic of Huashao while serving as a U.S. Peace Corps volunteer. Using structured surveys and unstructured interviews, I looked at the level of participation that community members had within the park, perceptions of park management, and interest in improving relations or learning more about the national park. The majority of the community had direct uses within the national park from grazing, but did not benefit economically from tourism. Many community members viewed the park as a barrier preventing them from using land that traditionally should be theirs. Although Huashao has a significantly better relationship with the national park than other sectors, a feeling of resentment against the park remained for







Top. Members of the Asociacion de Boteros take a rest in between taking tourists on the lake. Middle. Boat tours on Laguna Llanganuco, hosted by Asociacion de Boteros. Bottom. Women from Asociacion de Artesanas wait for tourists to arrive. Photo Credit: Jessica Gilbert

some community members. Most community members were not interested in learning more about the park or even improving relations, essentially maintaining a separation between the community and the national park, with the exception of the few that benefitted there from tourism.

On my return visit in 2015, there was a notable improvement in perceptions of the national park by community members. Every community member I interacted with viewed the agreement between the park and the community as a positive improvement from the previous arrangement, and highlighted that the entire community benefits, not only a few. While interviewing the workers in the park, they were happy to contribute to the community as a whole, and viewed their daily salary as a fair amount to be paid for their efforts. Interviews revealed that community members and national park staff view each other as alliances, rather than impediments to development. Mutual trust, improved capacity, and local stewardship of the national park can make the community an invaluable alliance for conservation in this sector. In the following sections, I trace this shift from marginalization and disenfranchisement to integration and cooperation.



Comunidad Campesina Unidos Venceremos de Huashao

The community of Huashao is officially titled the "Comunidad Campesina Unidos Venceremos de Huashao," which translates to the United We Stand Peasant Community of Huashao. The community of Huashao earned its designation and land title in 1974 under the agrarian reform of ex-President Juan Velasco Alvarado. Prior to 1974, Huashao was a hacienda in which community members worked and lived, but had no ownership over the land or the agricultural products they produced. As a registered and titled campesino community, Unidos Venceremos de Huashao owns and manages their territorial land, but is unable to disburse individual land titles to be bought or sold outside of the community. All lands are owned by the community as a whole, and community members, comuneros, may have a claim on them by owning a home or actively maintaining a plot for agriculture. The community is governed by an elected body lead by the community president who is then advised and checked by a panel of advisors and community group leaders. Community members of Huashao are direct and indirect users of the national park under a set of usufruct rights that were established during the creation of the national park in 1975.









Top. Vicuña (Vicugna vicunga) in grassland, one of many species found in Huascarán National Park. Middle. Huascarán overlooking mixed agricultural fields in Huashao. Bottom. Women from Asociacion de Vendedoras de Comida start the early morning food preparation before a swell of tourists during Fiestas Patrias. Opposite left. Woman preparing chiccharones, fried pork to sell during the lunch hours. Opposite right. Women peeling potatoes to prepare papas rellenas, stuffed potatoes. Photo Credit: Jessica Gilbert

The most ubiquitous of these uses is livestock grazing, particularly sheep and cattle. The majority of grazing is concentrated at the border of the park but other activity occurs in the heart of the park in less accessible forests and pasturelands, which are areas designated for recovery or strict protection.

Since 1975, HNP permitted a small group of families from the annexes closest to the park to provide goods and services to tourists within the park. This practice began as porters and guides for mountaineers, and later evolved into conventional tourism such as food sales, boat rides, and artisan craft sales to day tripping visitors. For decades, these few families controlled who could enter the park to sell goods and services, excluding other community members from working within the park. After moving to Huashao in 2009, I noticed a disparity between families working within the national park and those who had no relationship with tourism or the park. Those families that worked in the park often lived in better conditions than those who did not; they often had cook stoves rather than open pit fires, latrines or bathrooms, and owned small luxury items like televisions. All of the profits gained through tourism in the park remained within these few families, setting them apart from the rest of the community which had few opportunities other than subsistence agriculture and small scale construction for their livelihoods.

Huashao is no stranger to participating in development projects; high ranking development NGOs and government development projects have targeted Huashao as a location for project activities, with varying levels of success. Many of these projects are targeted towards outgoing community members that live in more accessible areas, a typical flaw in many development projects and planning (Chambers 1979). Past development projects from NGOs and local municipalities have failed to design effective projects that benefit the more geographically isolated annexes and individuals that may be more socially isolated, particularly women and the elderly.

Many of these organizations target numbers rather than impact or behavior change, and projects result in half completed, unused projects that are discarded in the community or are gifted to families that do not have a need for them. Multiple homes along the road have two bathrooms or two cook stoves that are waiting in storage, while families in distant annexes received no support. Some NGOs previously targeted the small group of families working in the national park, as they were easier to work with, had experience with outsiders, and were already organized. These external organizations and park management themselves failed to recognize differences within the community, but viewed the members that they worked with as representatives of the community as a unified whole. Many of these projects resulted in mistrust within the community, resentment towards outside organizations and challenges of power between family groups.

As tourism increased, and with it its impacts, HNP officials issued a series of requirements for this group of families to fulfill in return for access to the national park. This group was required to participate in trash cleanups along trails, manage trash that was generated by food sales, participate in reforestation events, maintain a nursery of native tree species (Polylepis sp.), and provide labor for work events, including construction or maintenance projects. Little by little, their participation decreased in these activities, and they requested that the park become less demanding of their requirements, particularly in reforestation that saw a decrease from 10,000 trees planted per year to only 1,000 trees per year. Some members of these families were found illegally grazing within national park boundaries, including reforestation areas, and fishing illegally in the lake.

As the relationship between the park and this group of families was souring, momentum was growing down the hill in the community of Huashao to take advantage of the economic opportunity of tourism within the park.

Community members began to pressure the community president to propose an act to the park to establish equal access to sell goods and services at Laguna Llanganuco. After a few years of pressure from the community, reduced support by the participants from the previous arrangement, and infractions committed by members of the family association, the park removed the exclusive rights of access to the few families that had worked within its borders, providing equal access to the community as a whole.

On July 14, 2013 the Comunidad Campesina Unidos Venceremos de Huashao signed a formal agreement with SERNANP (Servicio Nacional de Areas Naturales Protegidas) to allow the community the exclusive right to provide goods and services to tourists in the Llanganuco Sector of HNP. This arrangement establishes a 5-year contract between the community of Huashao and the national park under series of guidelines and requirements that the community must fulfill in order for the contract to be considered for renewal in 2018.

Complete management of this arrangement is the sole responsibility of the community and its governing body, which consists of an elected community president and a team of advisors. Rather than a top down management strategy implemented by the national park, the community has complete ownership and independence to manage this arrangement. Currently, the community employs over 90 community members to work on a rotating basis in the national park. Each annex of Huashao works for one week, rotating to the following annex. For the assigned week, each community provides about 15 workers to sell typical foods, handicrafts, photographs, boat rides across the lake, and restroom services. The community organized a training program in which new participants were trained by experienced community members in order to ensure consistent quality of goods and services. Once trained, a person is assigned to one of the associations: the association of boat rowers,

artisans, and food sellers. These associations exist to maintain quality control of the products sold within the park, restock supplies, keep records of sales, and report needs to the community president.

For each day of work in the park community members receive S/.25 (\$7.76USD) per day during regular periods and S/.35 (\$10.86USD) per day for holiday periods (Semana Santa or Fiestas Patrias). This may not seem like a large sum of money, but it is a significant increase for those who do not generally have an income, especially single mothers and stay at home mothers. During interviews, most community members were content with this payment, stating that it provides their "pan del dia," their daily bread. Some remarked that without this payment they would be paid nothing, and make little from selling agricultural products.

This arrangement is both an economic and cultural exchange between community members and national and international tourists. All of the community members in the park wear their traditional clothing and sell products that are typical to the region, including dishes such as fried guinea pig, a lupine bean salad, and fried pork. In every interview and photo I took, everyone made sure they were wearing their best typical clothes; the shiny, lacy blouses and colorful skirts for the women and the neatly pressed pants and shirts for the men. This is a huge step from the past, as many Quechua speakers hid their language and culture for fear of discrimination from nonindigenous Peruvians. Now when visiting HNP you might meet someone who wants to give you a lesson in Quechua, teases you about speaking it poorly (personal experience), and lends you a traditional shawl to warm you from the cool winds blowing off the lake.

After paying all of the workers and replenishing stocks, the community is left with a sizable profit to be managed at the discretion of the community. In the past arrangement,

all of these profits were shared between the few families benefitting from tourism in the park. Now, these profits are funneled into a community bank that is used for development projects and materials that are purchased with the intention of benefitting the community as a whole. To date, the community has purchased 4 computers for the combined primary and secondary school, a copy machine for the health post, and a truck to transport agricultural products and transport workers to the park each day. A long awaited dream, the community is currently building a locale communal, a local meeting house to hold monthly community meetings. Previously, the community would hold these mandatory meetings in a central location for all of the annexes; a large clearing at the upper reaches of the community alongside a ridgeline that was exposed to strong winds and rain during the wet season. Additionally, the community provides a modest pension of S/.500 (\$155.15USD) per month to elderly community members that have no family members to care for them, and provides grants to community members that fall ill and incur high medical expenses.

In exchange for access to the park, the community must fulfill specific requirements as terms of the contract. For each visitor that enters the national park at the Llanganuco sector, the community must pay a tax, which is increased each year of the contract. During the first year, the community was required to pay S/.0.10 (\$0.03USD) for each visitor. This tax increases by S/.0.10 per year, ending in a maximum of S/.0.50 (\$0.15USD) per year during the fifth year of the contract. This may not seem like a sizable amount, but considering the influx of tourists during high tourist seasons such as Holy Week and Fiestas Patrias, this amount accumulates rapidly. In addition to receiving this tax, the national park is receiving S/.10 per visitor for conventional tourism as an entrance fee. Some community members argue that this should be a fixed tax, and are concerned that the park is earning money from both tourists and the community.

In addition to this tax, the community is obligated to provide the park with two communal park guards to work alongside the state hired park guards. The community provides a salary to the volunteer park guards who work during 26day increments alongside the official park guard counterparts. HNP is constantly challenged by a lack of time and resources of the official park guards, as a majority of their focus is directed towards tourism rather than monitoring for illegal activity within the park. The communal park guards serve the same roles and duties as the official park guards however, enforcement of rules becomes complicated if a fellow community member is committing the infraction. Generally, the enforcement will be the responsibility of the official park guard, reducing the risk of marginalization within the community due to a breach of trust between community members. The local park guards create a direct connection between the community and national park enforcement, helping to smooth the dialogue between park management and community members with a person that is connected both to the community and to the park.

In the past, resentment and anger has been felt against park management or staff from outside departments who attempt to enforce rules upon community members. Community members have viewed them as distant from their own reality and culture, trying to impose a set of unrealistic guidelines on them from an outsider's agenda. Increasing the interaction between the community park guards and official park guards has noticeably improved this relationship, as friendships and alliances have been created through mutual understanding and aligned priorities. I had the opportunity to interview two of the volunteer park guards this summer who have been working in the park since last year. They both exhibited a strong sense of pride to work in the park, and they embraced their identity as park guards.

As a term of the contract, Huashao is

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responsible for promoting the conservation and sustainable use of natural resources in this sector. First, the community must remove 250 heads of cattle from within the national park boundaries. In this region, the cows do not produce milk and are rarely slaughtered for beef, but are rather viewed as a sort of bank. The cows maintain a direct claim within the protected area, a living, breathing object of property that depends directly on the resources within the national park. In most sectors of HNP, including the Llanganuco sector, communities are exceeding the permissible amounts of cattle within the park, which are not accounted for due to the lack of time and resources of the park to monitor less accessible, higher altitude areas. Cattle are a serious concern in the park, contributing to overgrazing, reduced regeneration of native grasses, soil compaction in wetlands and peat lands, and water contamination (Lozada 1991, Byers 2001). Additionally, the community will be constructing new tree nurseries to provide seedlings of *Polylepis sp.* to be used for reforestation activities.

Although this arrangement is in its nascent stages, it shows long-term promise for the community of Huashao and HNP. SERNANP is currently exploring the possibility of creating partnerships such as this in other natural protected areas. Although this arrangement seems to be working in Huashao, it may not be applicable to other regions that are lacking an existing tourism destination and market. Huashao is unique in that it receives such a huge quantity of tourists each year and is a strong, self-defined community, which may pose a challenge in other locations. The alliance between community and park, mutual trust, and capacity of a community to design and implement projects independently are considerations that should be taken by conservation organizations in the future. Constructive ways of involving local stakeholders in the conservation and sustainable use of biodiversity in and around the most significant protected areas remains one of the most important challenges and priorities for nature conservation at the beginning of the

21st century (McShane and Wells 2004). Viewing local people as capable allies of conservation may strengthen some of the shortcomings of previous conservation attempts, and provide sustainable solutions to natural resource problems in the future.

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