

NATURE AND HUMAN NATURE: CONSERVATION, VALUES AND SNOW LEOPARD

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Background

The failure of top-down environmental conservation practices gave rise to the so-called 'Community Based Conservation' or CBC approach. CBC promises to achieve the dual goals of conserving nature *and* improving peoples' livelihoods. CBC programs also aim to involve local communities as active partners in conservation efforts, and to use traditional knowledge and local values in management of resources (Adams & Hulme 2001; Agrawal & Gibson 1999). There are variations between different CBC programs; however, the underlying rationale of the approach, common to all programs, is that introducing or changing economic incentives into the conservation calculus of local people will bring about the behavioural change necessary for successful conservation (Kellert et al 2000). Thus, the major emphasis in CBC programs is conserving nature based on its utilitarian value. Since utilitarian value is measured in terms of economics, hence the emphasis of CBCs on economic incentives in promoting conservation.

Recent evaluation of the CBC approach has shown that while local people may have benefited in economic terms from the use of nature, no tangible improvements in biodiversity conservation have occurred (Kellert et al 2000; Terborgh 1999). The disappointing performance of CBC programs, which promised so much and yet have failed in practice to deliver, has recently led to a resurgence of the protectionist approach, calling for a renewed separation between the conservation and human development objectives (Redford & Sanderson 2000; Terborgh 1999; Oats 1999). Others, however, believe that the CBC approach has enormous potential, and that a return to protectionist strategies would be disastrous, like 'reinventing the square wheel' (Brechin 2001; Wilhusen 2001). It is crucial that the flaws in the CBC approach are remedied if there is to be any hope of a conservation agenda that does not conflict with the needs, aspirations and interests of local people, and that therefore has a chance of having a long term, sustainable conservation outcome.

Introduction

The current CBC approach, which promotes and builds a conservation ethic around economic incentives *alone* has been criticised as being problematic. Conservation ethics of local communities are complex and deeply embedded in their local cultural and historical cosmologies, and are therefore often indiscernible to, or misunderstood by, outsiders, such as staff of CBC programs. Local communities often also have wide ranging conservation ethics

and institutions that, in addition to economic considerations, are also based on spiritual, aesthetic, religious, moral and other non-economic values (Kothari 2001; Butz 1996; Posey 1999). While these different conservation values are usually lumped together as cultural tendencies and therefore vary across geographical regions, some have argued that these cultural tendencies are in fact manifestations of a universal biologically based tendency in humans for affinity towards nature. This affinity towards nature is called biophilia (Wilson 1993)

In this paper I will look at this biological-based tendency towards nature and its cultural manifestations. I argue that “nature” in nature conservation today is mainly based on a western concept of nature, which does not fit with the conception of nature in many cultures, mainly non-western, where nature conservation projects are implemented. The case of CBC is particularly illuminating, because it claims to be working with local communities, but in reality it faces serious challenges in actually integrating local views of nature fully into the programs. Using the concept of biophilia and the case of the snow leopard, I will argue that humans’ relationship with nature is biological, but mediated through culture. It is thus important that CBC programs appreciate how different cultures reflect the biological nature of the human/nature relationship in different ways, and that they integrate this into conservation activities through building on the appropriate cultural beliefs and practices in each particular context.

The Biophilia Hypothesis

Put forward by Edward Wilson (1993), the biophilia hypothesis states that humans have an innate tendency to associate with life-like processes found in the natural world, and that this tendency serves our vital biological needs. Kellert (1993) builds on Wilson’s theory and states that biophilia is biologically based, thus it is part of our evolutionary heritage and is associated with genetic fitness. He argues that biophilia exists because it gives humans an advantage in the evolutionary struggle to thrive as a species; this advantage derives from the fact that biophilia increases the possibility of humans finding meaning and personal fulfillment in their lives with their interaction with nature. The nourishment of these broader human needs contributes towards achieving the most fundamental goal of human species – its survival. Thus a disconnection with the natural world mainly through degradation of species does irreversible damage to the well being of humans, particularly in cognitive and evaluative respects, and ultimately limits the capacity of the human species to survive in the long term.

Kellert (1993) extends the basic notion of biophilia and proposes nine biologically embedded values in humans that they seek in nature. These nine expressions of the biophilia tendency are utilitarian, naturalistic, ecologicistic-scientific, aesthetic, symbolic, humanistic, moralistic, dominionistic and negativistic values of nature. Kellert uses these values across many geographical regions, cutting across many socioeconomic and cultural variables to study human perspectives of nature (Kellert 1996). He asserts that the physical appearance and behavior of natural elements has a profound and pronounced effect on how we perceive them and derive values from them. For example, the way large carnivores, live, hunt, run, and form group structures affects how humans perceive them. According to Kellert (1997), although biophilia exists within all humans as a weak biological tendency, it is highly influenced by socio-cultural conditions. This is the reason why different cultures may exhibit varying biophilic inclinations and tendencies, despite biophilia being innate to all humans. Kellert (1997) believes that the

biophilia tendency may be frustrated and “atrophied” in cultures where ample opportunities for its *full* expression do not exist.

Based on Kellert’s assertion, it is likely that cultures which have world-views that see nature predominantly in terms of economic and material progress have few opportunities for the full expression of biophilia. On the other hand, in cultures where nature is viewed more broadly with functions beyond the mere fulfillment of human’s material needs, there are likely to be more opportunities to express and derive the different biophilia values. The extent to which different cultures provide opportunities to people, through their dominant world-views, to express biophilia has important implications for nature conservation. Generally speaking, there are likely to be more “avenues” for targeting conservation in societies where biophilia is fully expressed because more kinds of values can be invoked to alter peoples’ behavior. In societies where biophilia is relatively repressed, and where nature is seen as serving human material needs, only utilitarian values are likely to affect people’s behavior.

Cultural Roots of Nature

It has been argued that the roots of current ecological crises in the western world lie at least partly in western Christianity’s view of nature (White 1967). This argument states that theological interpretation largely determined the kind of treatment that nature received from humans. In the Bible, man is considered the master of the universe, with nature generally viewed as full of evil, unholy and fearful creatures. Based on this view, early European society depicted nature as a realm of sin and ignorance, representing an animal side of humans (Nash 1982; Lopez 1978). Different natural elements were seen as symbols of human weaknesses and its evil nature. The message propagated by Christianity that humans needed to tame nature was understood as a symbolic representation of humans overcoming their own weaknesses (Lopez 1978). God was perceived as intractable and beyond the perception of normal human senses (Marangudakis 2001).

The writings of St Augustine during the third and fourth centuries, and of St Aquinas in the eleventh century, led to the reformation of Christian thought. Both writers promoted a view that led to the emergence of materialism and rationalism as the two dominant ways of perceiving nature (Marangudakis 2001). This interpretation of the Christian belief system was based on the idea that the existence of God can be explained rationally and therefore that there was no need to view nature with symbolic meanings and mythological characters.

The focus of the western Church on rationalism led to a *weltanschauung* that was based on a dichotomy between humans and nature. This dichotomous relationship relegated the realm of nature, hitherto seen as forbidding, mysterious, and feared, to the level of a resource mainly for satisfying humanity’s utilitarian and material needs. The reclassification of nature from a “realm” to a “resource” was, in my view, the turning point in the modern history of natural resource management.

Aquinas argued that animals are mere objects without any feelings and that killing them is sinful only if they belonged to another man (Marangudakis 2001). This ideology of the western Church propagated a very anthropocentric view of nature, defining it not in terms of its true

nature, but rather how humans saw it. This view also distinguished itself from the early pagan religions of medieval Europe. Throughout the second millennium, the western church judged people for their “heretic” views towards nature; a practice that resulted in a systematic rooting out of views of nature that were based on empathy, compassion and inspiration (Nash 1982). According to Marangudakis (2001), this strict utilitarian view of nature was integrated in the mainstream socio-cultural ethos of medieval western society when it was appropriated by the political and economic elite to increase their personal wealth and privileges.

Snow Leopards and Biophilia

The local people of the Himalayas have always held mixed attitudes towards the snow leopard. Local myths in the Baltistan region of Northern Pakistan describe the snow leopard as a part land, part water animal. A myth popular among people of all ages, class and educational backgrounds is that there is only a female snow leopard. According to this belief, the female comes into heat on a full moon night, goes to the edge of a water body, a lake or a river, and calls its mate, the otter. The otter comes out of water, mounts the female snow leopard and they copulate. After copulation, the female returns to the mountains and the otter goes back into the water. At the time of birth the pregnant snow leopard comes again to the edge of the water and gives birth. A newborn male cub goes in the water and becomes an otter while the female cub goes in the mountain with the mother. In this story the snow leopard becomes a mythological character, symbolizing the mystical, almost magical character of nature. The story demonstrates that Baltis do not necessarily seek rational explanations of nature; in their world-view it is believed, and accepted, that nature is full of mysterious and unexplained things. In keeping with their wider world-view, the view of the snow leopard provides the Baltis with the opportunity to express their biophilia tendencies in the form of engaging in a mental creative activity that revolves around an imaginative secret life of the snow leopard.

According to the traditional beliefs of the people of the Pamir region of Northern Pakistan, herders consider the pasture areas to be a spirit realm known as *mergich* (Mock 1998). This realm is governed by *mergicham*, spirits who are pure beings and help the herders in locating good hunting and grazing areas. But *mergicham* only help those herders who respect the laws and customs of the *mergich*. The *mergicham* often come to the aide of the herders in the shape of an animal of the *mergich* realm. The most powerful and revered animal of the *mergich* realm is the snow leopard. Without the help of the snow leopard, the locals believe, no hunter can ever succeed. The local people see the snow leopard as an equal being worthy of respect and having a right to live. They see the use of snow leopard’s territory, to meet their subsistence needs, comparable to help from fellow humans in time of need. This view of the snow leopard is derived from the integrative world-view of nature in which all beings have the potential to benefit from each other and no one single being, including humans, is the overall master. Physical nature is divided between different realms that are ruled by other animals; their cooperation, not subjugation is required, if humans are to benefit from those realms of nature (Mock 1998). This world-view of the Pamir community provides a wide range of opportunities for the expression of biophilia. People hone their humanistic values and express their moralistic values through using the snow leopard as a symbol for conveying concepts of integrity and cooperation. They derive naturalistic value from the snow leopard and indeed they also derive material value through the help they get from the snow leopard with their hunting.

In the Upper Manang region of Nepal, local communities consider the snow leopard to be a form of life that is born to carry out sinful jobs by killing other animals (Gurung 1998). They believe that killing a snow leopard means transferring all its sins to yourself. In cases where people do kill snow leopards they have to ask for forgiveness from the gods. This view illustrates the belief that the natural and the non-human world are inextricably linked with the deeds of the human's world. Here, again, the view of nature and humans is integrative. The underlying view presents the natural world as a means to express and illustrate basic human morals. This view reflects a perception towards nature as being the most important medium for seeking personal salvation and a realm that is essential for the fulfillment of humans' meta-physical needs. It enables local people to derive symbolic and moralistic values from the snow leopard; the snow leopard presence serves to remind the people to do the right thing and refrain from engaging in sinful acts.

The snow leopard also features in almost all the pre-historic petroglyphs found in Baltistan and throughout the northern mountains of Pakistan. It is often shown stalking a herd of ibex. Hunters inspired by the snow leopard's agility and physical prowess, Dani (1983) suggests, must have carved these petroglyphs. In this case the hunters seem to have driven aesthetic, naturalistic and ecologicistic values from the snow leopard. It is also not unusual for early humans who were inspired by the snow leopards and other animals to articulate their appreciation for these creatures in the form of artistic expression such as painting (Kellert 1983).

In Mongolia, ancient shamanist practices, later incorporated into Lamaist traditions, used a snow leopard's pelt as the vehicle on which the shaman rode to the upper spirits. This view lets the local communities derive a symbolic value from the snow leopard and reminds them of their constant quest for achieving a higher state of consciousness and spiritualism.

The above discussion shows how wider world-views about nature allow the people of the Himalayan region to express their biophilic tendencies. But it is also true, as explained in Kellert's hypothesis, that the physical appearance of the snow leopard can invoke biophilia in humans, irrespective of their affiliation with a particular world-view. This case can be illustrated by looking at how the snow leopard is described in "Stones of Silence" by George Schaller (1988) and "the Snow Leopard" by Peter Matthiessen (1998). The authors, who are modern day western naturalists, raise the snow leopard to the status of a spirit like being – not dissimilar to the beliefs of the Mongolian Shamanist or the Pamir herdsmen.

The classical description symbolising the snow leopard as an elusive and mythical animal is in the Snow Leopard by Matthiessen. He writes, "If the snow leopard manifests itself then I am ready to see the snow leopard. If not, then somehow I am not ready to perceive it...I think I must be disappointed, having come so far, and yet I don't feel that way. I am disappointed, and also, I am not disappointed. That the snow leopard *is*, that it is here, that its frosty eyes watch us from the mountain – that is enough." (p.221).

Schaller (1988) writes "... in the fog and the swirling snow I could just see the snow leopard, dry, and protected in the shelter of an overhang. I had learned nothing new that night, but the hours of silence, the celestial beauty of the mountains in the moonlight, and, above all, the

knowledge of having been a part of the snow leopard's world filled me with quiet ecstasy.” (P.24). The fact that the local residents of the Himalayas in northern Pakistan talk about the snow leopard with the same awe and mystique as a celebrated naturalist from New York is a testimony to the appeal of this animal to human senses and imagination. This appeal is not world-view bound, rather it cuts rights across all social and economic factors and is based on the physical appearance and ecology of the snow leopard.

The values derived by local people from snow leopards that I have described have been generally positive; there are however also negative perceptions of the snow leopard, mainly because of its predation of local people's domestic livestock. Roberts (1997) describes a tradition in the former northern princely states of Pakistan where any man who killed a snow leopard was offered a feast organised by the Rajah (local king) of a particular area. Other historical accounts exist which clearly show that the locals of the Himalayan region attached both negative and positive value to the snow leopard (Trevelyan 1987).

Though there are some quite strong negative perceptions of the snow leopard among Himalayan people, due to the threat it constitutes to people's livelihoods, the positive perceptions outweigh these negative perceptions; otherwise the snow leopard would not have survived. Moreover, I believe that negative perceptions based on threats to people's livelihoods can and does lead to snow leopards being killed, but the rationale behind such killings is a basic motive to survive. Thus, as long as people's survival is ensured, the desire to kill the snow leopard will not persist. We shall see that Europeans and North Americans also persecuted large carnivores for apparently the same reason (threat to livestock), but their hatred and persecution was motivated by a completely different world view, one in which carnivores were seen as a symbol of backwardness, hindrance to civilisation and material progress. Therefore the persecution continued beyond eradicating the threat to livestock; rather it was to the death.

Conclusion

By emphasising the need to focus on the biophilia tendency among humans in nature conservation, I am not attempting to undermine the importance of humans' livelihood and other more obvious needs. My contention is to present biophilia as a complementary concept for targeting human values in nature conservation programs. I believe that a species as sublime as the snow leopard has the tendency to appeal to humans' innate and instinctive affinity towards nature. Current snow leopard conservation efforts advocate two main approaches: protected areas and CBC. While CBC, unlike the protected areas approach, attempts to integrate human values into conservation, I believe that its focus on economic values – arising from loss of livestock, or economic benefit arising from income proceeds from ecotourism based around snow leopard - does not allow it to incorporate the full range of human values. Because current conservation practice operates within a strictly western scientific tradition based on positivism, it allows little if any room for concepts such as biophilia, which cannot be tested deductively, to be integrated into mainstream efforts. Indeed this is the reason why Schaller had to write two books about his work on mountain ungulates of the Himalayas – one a strict scientific treatise and the other a more emotional and spiritual account. As Schaller (1988) quotes William Bebe who states “there is also a need of softening facts with quiet meditation, leavening science with thoughts of the sheer joy of existence” (p 3). It is my hope that snow leopard conservation

efforts can provide us with the opportunity to dismantle the artificial divide that exists between our scientific pursuits and our humanistic pursuit of finding meaning and sense in nature.

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