

## Guest Editorial: The Future of Wildlife Management in the N.W.T.

In the last 20 years there has been an astonishing number of changes in research and management of wildlife in the Northwest Territories (N.W.T.). The traditional roles and viewpoints of government departments and native people are evolving with remarkable speed. Factors such as settlement of land claims, a rapidly increasing native population, changing patterns of renewable resource use, and the influence of independent environmental groups are becoming increasingly important. There is vital common ground in the desire to maintain healthy wildlife populations while sustaining human use, but as land claims are settled, there will be considerable redistribution of decision-making power relative to wildlife. Aboriginal peoples want, need, and will have much more direct involvement than they have had. However, a consensus has not yet formed on how to ensure equal participation in the decision-making process, on fair allocation of access to wildlife by all groups, and on the application of scientific information. As a result, the future of wildlife management in the N.W.T. is at a vital stage in its development.

The following opinions are my own and do not necessarily reflect views of the Canadian Wildlife Service (CWS) or the federal Department of Environment, for which I work.

Unlike all other jurisdictions of Canada, native people in the N.W.T. outnumber non-native people. About 58% of the 52 000 residents and two-thirds (16/24) of the elected members of the Legislative Assembly in Yellowknife are native: Inuit, Dene, and Metis. For them wildlife is the centre of their culture and economy. Consequently, wildlife and the environment have a higher priority in government policy there than elsewhere in Canada or even most countries in the world. The N.W.T. is also unusual in that wildlife habitat is largely unspoiled and most populations of harvested species are healthy. Existing problems are probably solvable, given the will, although this window of opportunity will not last indefinitely.

The concept of government agencies and user groups having equal participation in decisions will be easier to accept in theory than to implement. Not only must the input of others be considered objectively, but all parties need to contribute equally. Equally important is agreeing on what issues need to be addressed and what fundamental principles will form the basis of decisions.

At present, because aboriginal hunting rights prevail, there are few limitations on seasons or numbers of animals that can be harvested by natives. However, the native population is rapidly increasing and, with modern technology, has so greatly improved its ability to harvest wildlife that indigenous knowledge of natural history and traditional hunting practices may be inadequate for coping with future demands on the resource. For example, hunters from different settlements often harvest animals from a single population. If the number of hunters increases or the animals decrease, the settlements are in direct competition for shares of the sustainable yield. In land claim areas, increased pressure from native users may aggravate the problem of ensuring just access for non-beneficiaries. Guidelines for sharing the harvest need to be developed before there is a crisis.

For native groups to be effective wildlife managers, their decisions need to unite the best of their own traditional knowledge and practices with modern wildlife science. Since there are no university-trained native biologists, indigenous people must rely on non-native advisors and government departments for assistance with technical and scientific aspects (e.g., population assessments or acceptable pollution levels) and guidance on their interpretation. This advice will usually be adequate. However, if the resolution of differing viewpoints rests on interpretation of technical data, native groups may be at a significant disadvantage. Their own technical advisors, however good, are few in number and cannot be expected to provide advice equal to that available to government. The Inuvialuit Final Agreement actually provides for the formation of a Research Advisory Committee, but because it requires such a large proportion of the members to be appointed from government departments, it nullifies the potential benefits of an independent body. Over the short term, individual scientists could be seconded to advise native groups, and an ad hoc body of experts could be assembled for independent technical consultation as needed.

Over the longer term, it is essential that a significant number of native people become qualified in scientific aspects of wildlife conservation. Native people, with considerable justification, already regard themselves as the experts on wildlife, especially in areas where they have lived and hunted for generations. The knowledge and traditions developed in the past must not be lost, but times have changed sufficiently that it is important now to augment that background. To avoid the suggestion of tokenism in hiring, native biologists must eventually obtain the same scientific training as everyone else. Initially at least, this will be difficult because, in general, native people are educationally disadvantaged and have more problems with social adjustments because of having to leave family and familiar surroundings to attend southern universities. Eventually, university training in environmental sciences will probably be available in the North, but in the meantime, native wildlife students will require long-term support in the form of scholarships, tutoring, career-related summer employment, and possibly additional travel to enable them to maintain their ties to their communities.

In the case of the Inuvialuit, land claims have been settled and they now have their own Wildlife Management Advisory Committee (WMAC) and Fisheries Joint Management Committee (FJMC). These committees have equal numbers of Inuvialuit and government members and they jointly choose a chairman, who votes only to break a tie. Similar committees will be formed in future land claim settlements in the N.W.T. It is clear they will strongly influence, and in some cases make, future decisions on wildlife research and management.

Under the Inuvialuit Final Agreement, funding was guaranteed by the Federal Government for 10 years of studies of wildlife and fisheries to guide management within the settlement region. The WMAC and FJMC decide what studies will be done. However, it was largely predetermined that wildlife studies should be done by the N.W.T. Department of Renewable Resources and fisheries studies by the federal

Department of Fisheries. There is no independent review of either research proposals or completion reports. This means that even if better expertise is available, it might be politically awkward for the Inuvialuit to suggest using it. It would probably result in better research being done if any qualified scientist could bid for a contract to do a particular project. This open competition model is currently used effectively in the North by the Environmental Studies Revolving Fund, which is allowed to select the most competent bidder, even if it isn't the lowest bid. The result is consistent production of quality research and peer-reviewed completion reports done to deadlines.

The availability of settlement funds for research might also tempt a government agency to reduce its normal commitments in some areas of responsibility. This should not happen. Planning needs to facilitate the continuation of funding, and responsibilities, for research and management priorities when settlement funds run out. Although ten years of study with settlement funds may seem like infinity at the beginning, the time will pass quickly and problems will not all be solved at the end.

There is an important difference between being consulted with no guarantee that recommendations will be acted upon and making decisions for which one has to be responsible to one's peers. In the final analysis, if decisions are not made by users who take full responsibility for their implementation, they will not work. For the most part, seeking compliance through enforcement by government agencies is ineffective. Conversely, decisions made with the full understanding and support of the users will probably need little enforcement. There are precedents for users being able to make hard decisions, given the opportunity. For example, when research indicated that the char stocks of the Big Fish River near Aklavik were being overfished, the local users decided to simply close the fishery until stocks recovered. No enforcement was needed. Similarly, when the Inuvialuit of Canada and the Inupiat of Alaska realized there were potential problems with conservation of the shared population of polar bears along the mainland coast of the Beaufort Sea, they negotiated their own precedent-setting management agreement to solve the problem. Admittedly, the Inuvialuit/Inupiat Agreement has not yet stood the test of time, but if successful, it will be a significant model for the resolution of similar problems.

Finally, a pivotal political development that was not appreciated quickly enough by management agencies everywhere was the meteoric rise in the global influence of "environmental" groups. Until relatively recently, the outside world has not questioned the legitimacy of native hunting and trapping because of its perceived importance to indigenous culture and the sense that wildlife populations (as opposed to individual animals) were not being harmed. A consequence of high-profile campaigns such as those of the antisealing and antitrapping movements is that external forces have come to bear on the harvest of wildlife in the N.W.T. with unexpected force. Nowhere in the world, including the North, can the views of the rest of society about natural resource harvesting and management be ignored. Everyone now realizes that, rightly or wrongly, the immense

power of public opinion will determine whether or not furs will find a market or if anyone at all may hunt certain species. Understandably, most northerners, including native people, find it difficult to comprehend why people in Europe or southern Canada who have already obliterated many species and fouled their own environment should dictate terms to them. However, dictate terms they do.

In relation to international committees such as the Convention on International Trade in Endangered Species, northerners have also discovered that decisions on issues affecting them are often out of their control. For example, international trade in gyrfalcons, populations of which are healthy in the N.W.T., was disallowed. Similarly, because of international concern about the survival of elephant populations, the market of "look-alike" ivory, such as walrus tusks, will possibly be closed to international trade within a few years as well, with significant consequences to Inuit carvers.

One response to the resulting reduced income from wildlife may be to consider game ranching or fur farming. Such initiatives are consistent with the concept of sustainable development and should be evaluated. However, these approaches can be misleadingly simple in appearance. Game ranching and fur farming involve major changes in lifestyle for the people involved, potential for legal and animal health difficulties, and the risk of capitalization driving the system over ecological considerations. There is considerable potential in this area, but proposed projects should be very carefully reviewed before implementation.

In summary, it is clear that sustained use of wildlife will continue to be fundamental to the culture and economy of native people in the N.W.T. for the foreseeable future. At the same time, it must not be forgotten that wildlife and wilderness are also very important to non-native people and they should not be overlooked in the rush to settle land claims. Although the majority of the harvested wildlife populations are reasonably secure at the moment, that will not continue indefinitely. Change stimulated by natural causes alone is fundamental to biology. In addition, wildlife in the N.W.T. remains vulnerable because of increasing demand by a rapidly expanding human population, the potential impact of industrial development on habitat, the longer term negative effects of global pollution, and the uncertainties of climate change. In a world becoming generally more opposed to any killing of animals, it is essential that critics understand the importance of hunting and trapping to cultural values and that harvested populations be sustained. As never before, the consumptive and non-consumptive use of wildlife in the N.W.T. must be guided, and seen to be guided, by scientific research of unquestionable quality. Yet science is only part of the answer. The unique knowledge and cultural practices of northern native people must also be kept intact. With imagination and mutual respect between groups, traditional and modern approaches could be combined to develop wildlife management in the N.W.T. in a way that would be the envy of the world.

*Ian Stirling  
Edmonton, Alberta, Canada*