

Re-establishment of Thinhorn Sheep to Caribou and Nares Mountains in the vicinity of Carcross, Yukon

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Survey Report
December, 1991

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INTRODUCTION

Dall sheep (*Ovis dalli dalli*) were at one time common in the vicinity of Carcross in the southern Yukon (A. Johns, R. Atland, pers. comm.). As many as 27 sheep were commonly observed on Caribou Mountain overlooking Carcross in the late 1960's (D. Nolan, pers. comm.), and sheep were common on Nares and Montana Mountains (K. Squirechuck, d.; Fig. 1). Since the early 1970's sheep have disappeared from the area, probably due to uncontrolled hunting and harassment. It is generally believed that populations were severely reduced around the turn of the century due to commercial wildlife harvest (McCandless 1985). A road was developed from Carcross to Tagish in 1942, and nearby Montana Mountain was extensively explored and mined during the 1960's; these developments likely accelerated the decline and impeded recolonization of the area.

In recent times the upgrading of both the Klondike and Tagish Roads, Yukon human population growth, and an increase in tourism in the territory have led to an increase in residential and recreational activity in the vicinity. Since 1980, a few transient sheep have been observed on Caribou, Nares and Montana Mountains, but numbers have been few and irregularly observed. In 1986, two rams were observed on Caribou Mountain and both were illegally shot.

Prior to recent sheep sightings on Caribou and Nares Mountains, translocation of a small group of sheep to Caribou Mountain, in conjunction with a campaign to reduce harassment and illegal and subsistence harvest, was considered to effect population recovery in this area of the Yukon. The proximity of this site to Whitehorse, Carcross, and Tagish and the location in relation to both the Klondike and Tagish highways would provide future opportunities for wildlife viewing.

METHODS

There were two phases to the planned reestablishment:

1. The area was surveyed intensively with a helicopter to define potential sheep habitat and document sheep trails. Periodic ground surveillance and contact with the local public, supplemented by historic accounts, provided evidence of incidental sheep sightings and spoor.

2. Once range conditions were assessed, 12 sheep were to be captured in an area distant to the study area and released on Caribou Mountain. Radio collars would be attached to enable monitoring of movements and assess survival rates.

RESULTS AND DISCUSSION

In the spring of 1990 a number of sheep sightings were reported on both Caribou and Nares Mountains (Table 1). Reports of sheep on Caribou Mountain continued until early winter while on Nares Mountain sheep were observed periodically throughout the winter (R. Atland, pers. comm.). A helicopter search in early March, 1991, revealed 8 sheep on Caribou Mountain and 15 sheep on Nares Mountain.

Local people were contacted to determine the chronology of this natural recovery, and provide observations and opinions about range use. Their observations are compiled as follows:

Nares Mountain

Seventeen sheep, a mix of Dall, Stone (*O. d. stonei*) and Fannin sheep, are believed to have spent an entire annual cycle on Nares - Caribou Mountains in 1990-91: 10 non-lamb nursery sheep (ewes, yearlings, and 2-year old rams), 3 lambs, and 4 identifiable rams. They are believed to have arrived on Nares Mountain, possibly from the Tutshi Lake area in B.C. (R. Atland, pers. comm.), perhaps via Montana Mountain, sometime between the summer of 1989 and the spring of 1990.

This group of sheep was seen periodically throughout 1990-91 (see Table 1). In August 1990 they were observed on Caribou Mountain, all other observations are from Nares Mountain. A systematic search of the mountain block in July 1991 revealed 12 nursery sheep and 3 lambs. We suspect there is currently a resident population of at least 18 sheep on Nares Mountain. Probable lambing and winter ranges are depicted in Fig. 1.

Caribou Mountain

A few Dall sheep have appeared irregularly on Caribou Mountain since the late 1970's. The first regular occurrence of sheep was observed in the spring of 1990, prior to lambing (see Table 1). These arrivals were classified as 2 ewes, 5 young rams and 4 mature rams (C. Buchanan, pers. comm.). All were

white sheep. They are believed to have immigrated from Grey Ridge to the west, crossing the Watson River valley in the vicinity of Spirit Lake (Fig. 2). This is believed to be a traditional sheep crossing route, used regularly prior to 1970 (A. Johns, pers. comm.).

Two lambs were born on the lower slopes of the SW corner of Caribou Mountain (C. Buchanan, pers. comm.) in 1990. Throughout the summer of 1990 this group of 13 sheep were observed regularly above the Klondike Highway from Spirit Lake to Carcross. In addition, at least 4 individual sheep were observed periodically as singles and pairs, classified as 2 young rams, 1 ewe and 1 2-year-old ram. In total it was estimated that a minimum of 17 sheep occupied Caribou Mountain during the summer and fall of 1990. Rutting activities were also observed on the SW slopes of Caribou Mountain. Late that winter (March 1991), a helicopter survey revealed 8 young (1/2 and 3/4 curl) rams.

A group of 13 nursery sheep (all white) were observed again on 1 May 1991 (C. Buchanan, pers. comm.), and incidental observations from the Carcross Road have reported as many as 9 rams in one group. A systematic helicopter search in July, 1991, found 5 nursery sheep, 2 lambs and 10 rams. Eight of these rams were 1/2 curls, very likely mixed with nursery sheep in early May to account for the 13 nursery sheep observed at that time. One ram was a Fannin phase. We estimate there to be a minimum summer population of 17 sheep on Caribou Mountain. We believe that a traditional lambing site has been established on Caribou Mountain, with fall/spring movements of predominantly nursery sheep between Grey Ridge and Caribou Mountain.

Key habitat is depicted in Fig. 2. Adequate range appears to be restricted to Caribou Mountain, although one incidental sighting of sheep was reported from Lorne Mountain, and a group of 5 young rams was observed beside Cowley Lake in the late 1980's (Y.T.G. files).

Montana Mountain

Montana Mountain historically supported a high density of sheep, and was a key hunting area during the days of commercial wildlife exploitation (K. Squirechuck, d.). Mychasiw and Hoefs (1988) believe that Montana Mountain could support at least 50 sheep. A series of mining developments on the mountain served by an extensive network of roads opened up this area to severe hunting pressure and disturbance of wildlife in the 1960's. In 1967 a

year-round camp on Montana housed 8-10 employees. The mines closed in 1971, but since then roads into the area have been periodically upgraded to serve the interests of mining exploration (Yukon Archives files).

Since 1970 few sheep have been observed in this area. In 1985, 6 young rams were observed on the south end of this mountain block, and 2 mature rams were observed here in 1986 (Y.T.G. files). An intensive helicopter survey in 1987 revealed 19 sheep on Montana Mountain, 10 nursery sheep, 3 lambs, and 6 rams. Another systematic survey in July, 1991, located 22 sheep; 14 nursery sheep, 5 lambs and 3 rams. This increase in numbers of sheep observed coincides with an increase in resident goats; in July, 1991, 48 goats were observed on Montana Mountain, compared with 22 in 1987.

MANAGEMENT IMPLICATIONS

We suspect that, historically, populations of sheep on Caribou, Nares, and Montana Mountains, and Grey Ridge, were not discrete but rather regular movements occurred between these mountain blocks. Initially, heavy commercial harvest and, subsequently, sport and subsistence hunting and industrial development (including mining and improved access) are conjectured to have severely reduced these populations and impaired their abilities to recolonize.

The recolonization of Nares and Caribou Mountains by at least 33 sheep, and at least 22 sheep on Montana Mountain, is considered sufficient to provide the seed for population recovery to the area. The recolonization is promising given the fact that the Nares group spent the entire year on that block and that lambing occurred in two consecutive years on both Nares and Caribou Mountains.

The proposed translocation of 12 sheep is concluded as unnecessary and risky. The capture of sheep is subject to the dangers of net-gun capture, and is very unpopular with local Indian bands. There were no guarantees that the translocated sheep would remain on Caribou Mountain, or make adequate use of range in the area.

We will continue to monitor sheep from Caribou, Nares, and Montana Mountains with the help of local observers.



Figure 1. Study area showing probable lambing and winter ranges.

Table 1. Observations of sheep in the vicinity of Caribou and Nares Mountains, 1990-91 (Y.T.G. files).

Month	Location	Observation
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6 May, 1990	Caribou Mt.	6 sheep (nursery sheep)
May-June 1990	Caribou Mt.	frequent observations: group of 13 sheep; 2 ewes, 2 lambs, 5 yng rams, 4 mat. rams 4 individuals; 1 ewe, 3 yng. rams. total= 17 Dall sheep
June 1990	Nares Mt.	periodic observations: 12-17 Dall-Fannin-Stone sheep; 12 nursery sheep, 2 rams.
Late July 1990	Caribou Mt.	14 sheep (Dall-Fannin-Stone) observed (presumed to be the Nares group).
August 1990	Nares Mt.	14 sheep on Nares
March 1991	Caribou Mt.	8 young rams
March 1991	Nares Mt.	15 sheep; 10 ewes/yrlgs, 3 lambs, 2 rams.
May 1991	Caribou Mt.	13 sheep; nursery sheep
May 1991	Caribou Mt. (above Spirit Lake)	1 ram.

PERSONAL COMMUNICATIONS

- R. Atland, Carcross, Y.T.
- C. Buchanan, Carcross, Y.T.
- A. Johns, Carcross, Y.T.
- D. Nolan, Whitehorse, Y.T.
- K. Squirechuck, deceased.

LITERATURE CITED

McCandless, R.G. 1985. Yukon Wildlife: A social history. Univ. Alberta Press. Edmonton, Alberta. 200 pp.

Mychasiw, L. and M. Hoefs. 1988. Access-related impacts of backcountry roads to wildlife and management approaches to mitigate them. Y.T.G. unpubl. rep. TR-88-4, 44 pp.



Figure 2. Suspected lambing and winter ranges.