



## The Arctic Borderlands Ecological Knowledge Co-op 1999-2000 Community Ecosystem Monitoring- Questionnaire

<b>Interview ID number:</b>	<b>Community:</b> <i>circle one</i> <i>Old Crow; Fort McPherson; Aklavik</i>
<b>Interviewer:</b>	<b>Date of Interview</b>
<b>Sub-sections completed in this interview:</b> <input type="checkbox"/> Fish <input type="checkbox"/> Berries <input type="checkbox"/> Caribou	

*(Read this first or talk about each point in your own words.)*

I would like to talk with you about what you've seen on the land this past year – the plants, animals, and weather in our traditional homelands. I'm especially interested in what you've observed from last summer to the present, although I'm interested in hearing about other periods of time you feel are important to know about.

This information is being collected to learn what is changing in the environment and why. It will become part of an ecological monitoring system that records what locals know about the land and the findings from scientific studies. Having this information recorded will also allow us to look back years from now and compare tomorrow's conditions with today.

Our monitoring system involves the communities of Old Crow, Aklavik, and Fort McPherson, government agencies, and co-management boards. We call it "Arctic Borderlands Ecological Knowledge Co-op." This is the fourth year we've completed the community monitoring program.

My job is to interview knowledgeable people, like yourself, and record community members' observations on these forms. I will present a summary of what I've heard at the Co-op's annual gathering which will be held in Old Crow during the last week of February.

This interview will take about forty five minutes to complete and includes questions on berries, fish, caribou, and weather conditions. Your name remains confidential so no one will be able to connect what people said with who said it.

Are you willing to be interviewed?

**Yes** *(if yes, proceed)*

**No** *(If no, stop; if questions, explain further)*

## 1. General Questions

First, I'd like to ask a couple questions about you. How much time did you spend on the land this past year from July 1 to December?

Did you ..

- only take day trips from town,
- day trips with occasional overnights,
- were you on the land for a week or more at a time,
- or did you spend more than half of that time out of town on the land?

What age group are you in?

- less than 30 years of age?,
- between 30 and 50?,
- older than 50?

Now I'd like to ask you about the weather in our area. How was the weather this past summer (June to till the end of August)?

How was the weather this fall (September until the present)?

Were there any unusual storms or other kinds of unusual weather?  
*(if yes, what kind and how many, and which season?)*

Where were you for freeze up this year?

in town

on the land —▶ (If in the bush, ask:) Where were you?

Did the river

freeze-up quickly this winter,  freeze-up slowly,  or did it seem like a normal year?  
(note comments on freeze up)

What has this year's snow been like so far?

Is there anything else about the weather you would like to mention?

*In the sections below, I'll be asking about plants and animals, so when you're talking about them, please tell me how the weather has affected those animals.*

## 2. Fish

First let's talk about fish.

Did you do any fishing last year?

yes  no  —————> *If no, ask no more questions about fish.*

What are the two most important kinds of fish that you catch?

*(Write fish species names in the blanks below, then go back and ask questions)*

Fish #1: \_\_\_\_\_ Fish #2: \_\_\_\_\_

*(Commonly used fish. You can circle and number.)*

**Whitefish** (Broad Whitefish); **Coney** (Inconnu); **Loche** (Lingcod, Burbot);

**Char** (Arctic Char); **Herring** (Cisco); **Dog salmon** (Chum); **King salmon** (Chinook);

**Silver salmon** (Sockeye); **Crooked Back** (Lake Whitefish); **Lake Trout**; **Grayling**

### 2.1 Fish #1

Where did you do most of your Fish #1 fishing this past year?

*(Note place name here and location on map with reference # if specific location)*

What was the year like for (fish #1)?

*(If salmon, herring, char, ask How was the run this year?)*

timing:

location:

numbers:

How did the (fish #1) this past year compare to the year before?

How was the quality of (fish #1) this past year?

- How was the size of fish?
- Were there any parasites?
- Did you notice anything unusual about the livers?
- Was the color okay?
- Anything unusual about the taste?
- How about the firmness of the fish?

Did you notice anything else unusual about (fish #1) this past year? (*If yes, please note*)

Do you think (fish #1) are healthy?

yes

no      →      (If no, ask) Why not?

## **Fish #2**

Where did you do most of your Fish #2 fishing this year?

*(Give place name here and note location on map with reference # if specific location)*

What was the year like for (fish #2)?

(If salmon, herring, char, ask) How was the run this year?

timing:

location:

numbers:

How did the (fish #2) this past year compare to the year before?

How was the quality of (fish #2) this past year?

- How was the size of these fish?
- Were there any parasites?
- Did you notice anything unusual about their livers?
- Was the color okay?

- Anything unusual about the taste?
- How about the firmness of the fish?

Did you notice anything else unusual about (fish #2) this past year?

Do you think (fish #2) are healthy?

- yes  
 no (If no, ask) —▶ Why not?

## 2.2 Loche (also called lingcod)

Have you noticed any unusual loche livers this year?

- no  yes —▶ (If yes, ask) Of the livers you observed this year, how many looked normal and how many were unusual?  
One out of every \_\_\_\_\_ livers seems to be unusual.
- ↓

### 2.3 For Fort McPherson and Aklavik fishers only -- Salmon Questions

Have you or has anyone in your family caught salmon in our area in the past two years?

no *(if no, go to next section)*

yes *(If yes, ask)*



What kind of salmon were they?

**Dog salmon** (Chum)  **King salmon** (Chinook)  **Silver salmon** (Sockeye);

In what areas were they caught?

*(note on map)*

In what condition were the salmon in when you catch them?

silvery  Yes  no

Is the flesh firm and good to eat?  Yes  no

Is it unusual for people to catch salmon in our region?

no *(if no, go to next section)*

yes *(If yes, ask)*



Do you recall stories from Elders about salmon in this area?

Yes  no



*(if Yes, ask for details)*

What do you think is causing salmon to start coming into our area?

### 3. Berries (Salmonberries and Cranberries)

I'd like to ask you some questions about the berries of the past year.

#### 3.1 Salmonberries (Also called Akpik, Yellowberries, Cloudberrries)

Where do you do most of your berry picking?

(ask for general area, not exact locations, and note on map)

Overall, how were the salmonberries last year?

- exceptionally good quality
  - pretty good year for salmonberries
  - not that good
  - really bad year for salmonberries
- quality of berries
  
  - quantity of berries

Why is that? (*record explanation*)

Did this past year's salmonberries grow better in some kinds of areas and worse in others?

yes

no



(*If yes, ask*) What kind of areas did they grow best?

How did the year's weather affect the salmonberries this year?

How did the salmonberries this year compare to last year's crop?

Did the quality of the salmonberries this year affect the animals in any special ways?

yes       no



*(If yes, ask)* In what way?

Did anything else affect salmonberries that we should know about?



How did the year's weather affect the cranberries this year?

How did the cranberries this year compare to last year's crop?

Did the quality of the cranberries this year affect the animals in any special ways?

yes       no



*(If yes, ask)* In what way?

Did anything else affect cranberries that we should know about?

**Other changes**

Is there anything else you have noticed recently about plants and changes in plants in our area that you would like to report?

**4. Caribou / Vutzui / Tuktu**

I'd like to ask you a few questions about Porcupine Caribou, about how they migrated this year, and what kind of condition they're in. First we'll talk about this past summer season and then the fall to winter period.

**4.1 Fall (August 1 to November 1) Porcupine Caribou Observations:**

Did you, personally, see any Porcupine Caribou from July 1 to November 1 this year?

yes     no    —————>    (*If no, go to section on winter caribou*)

↓  
(*If yes, continue*)

Given what you saw and what you've heard from others in the community, please tell to me where caribou traveled from July 1 to the beginning of the rut this year.

***(Use map to document fall caribou migration. Reference map with numbers and notes in section below.)***

Location: Please show me on this map where you know caribou were from July to November 1.

Timing of movements: When were they in each of these areas?

Direction of travel: What direction(s) were the caribou traveling?

Number: How many were in the groups?

Sex and age of animals:

(note types of groups on map – “c” = cows, “b” = bulls)

Where there groups of just bulls, just cows, or mixed groups? (note locations on map)

Did anything in particular seem to affect their movements this past year from July to the first of November?

(ask about the key factors below and take notes on comments)

- Anything about this year’s weather/snow conditions?
- Anything about this year’s human activities (like hunters or road traffic)?
- Any other things?

Did you hunt any caribou from July 1 till the first of November this past year or work with caribou meat?

yes     no    → (if no, go to next section..)

↓  
(If yes, )

What condition were the bulls in this past fall?

↓     don’t know    → (if answers “don’t know” – go to section below)

- Were most of the bulls you worked with in good shape (lots of rump fat?),
- were most in poor shape (no rump fat),
- were the caribou somewhere in between fat and poor,
- or was there a mix of some fat bulls and some poor bulls?

What condition were the cows in?

↓

- don't know → (If answers "don't know" – go to section below)
- Were most of the cows you worked with in good shape (lots of rump fat) ,
- were most in poor shape (no rump fat)
- were they somewhere in between fat and poor
- or was there a mix of some fat cows and some poor cows?

Was there anything unusual about these animals' body condition this past fall?

- no    yes (if yes ask) → Please explain.

Do you know where caribou rutted this year?

- no    yes → (if yes locate areas on map with "R")

*(add hunter's comments about this year's rut)*

#### 4.2 Winter (since November 1) Porcupine Caribou Observations:

Have you seen any Porcupine Caribou since November 1?

- yes    no → (If no, skip caribou section and go to next)

↓  
If yes, continue

Given what you've seen and have heard from others in the community, where have the caribou been since November 1?

***(Use map for questions about wintering caribou. Reference drawings on the map with #'s and with notes below. Use questions to prompt additional comments.)***

Location: Please show me on this map where you've seen caribou since November 1.

Time: When were they in these areas?

Number: How many were in the groups?

Movements: Have the animals been moving since November 1? *(if yes)* Which direction were the caribou traveling?

Sex and age of animals:

*(note types of groups on map – “c” = cows, “b” = bulls)*

Are there areas with just bulls? *(If yes, ask where these are found and note of map)*

Just cows? *(If yes, ask where these are found)*

Mixed groups? *(If yes, ask where these are found)*

Were there any calves in these groups?

yes    no



*(if yes ask)* → Did you notice if the calves were still nursing?

Didn't notice/Don't know

yes

no

Did anything in particular seem to affect where caribou are wintering this winter this year?

- Weather/Snow conditions?
  
  
  
  
  
  
  
  
  
  
- Human activities?
  
  
  
  
  
  
  
  
  
  
- Other?

Have you hunted any caribou since November 1?

no → (If no, skip questions below and go to last section on caribou.)

yes



What kind of condition are the bulls in this winter?

↓  don't know → (If answers "don't know" – go to next question)

Were most of the bulls you worked with in good shape (lots of rump fat),

were most in poor shape, (no rump fat)

were they somewhere in between fat and poor,

or was there a mix of some fat and some poor bulls?

And what kind of condition are the cows in this winter?

↓  don't know → (If answers "don't know" – go to next question)

Were the cows mostly in good shape (lots of rump fat),

mostly in poor shape (no rump fat)

in between fat and poor

or was there a mix of some good cows and some poor? → Why is that?

Is there anything unusual about body condition this winter?

no  yes (if yes ask) → Please explain.

### 4.3 General Questions about Porcupine Caribou?

Have you noticed any differences in Porcupine caribou's body condition this year as compared to last year?

- Yes       No       Can't tell/Don't know



*If considered different, ask,* —▶ Do they appear to be in

- overall better shape  
 about the same shape  
 worse shape —▶ *(if in poorer shape, ask) Why?*

Recent studies show Porcupine caribou cows are giving birth to a high number of calves each year, but the population count shows that the herd population is decreasing. How would you explain this?

Have you noticed anything about the past five springs (March to May) that may have affected the survival of caribou?

The weather stations show that March, April, and May have been slowly been getting warmer over the past 30 years. How might this be affecting the caribou herd?

Do you think the Porcupine Herd is healthy?  yes       no —▶ (If no, ask) Why not?

## 5. Observations about other animals

I'm going to read a list of animals. Please tell me if you've noticed anything unusual or noteworthy about these animals, like changes in populations, diseases, interactions with other animals.

*(If person mentions anything, note species and document specific locations on map with reference number and dates where possible. Also, when noting unusual observation, ask person to explain why.)*

Ducks, swans and geese

Birds of prey (hawks, falcons, owls)

Grouse

Small birds (ask name of bird)

Moose

Muskoxen

*(If talking about caribou-muskoxen interactions, ask for specific observations)*

Rabbits

- lots around this year
- few
- none

Predators

Bears,

## Wolves

### Furbearers

What was the quality of this year's furs?

Which furs seem to be in good and which are in poor shape?

What were the mosquitoes like last summer?

- worse than other years
- about normal
- fewer bugs than usual

Do you have any other comments on the insects this past summer?

*(For Aklavik people) marine mammals*

### Whales

### Seals

Do you have any other observations about these animals or other animals?

## 5. COMMUNITY OBSERVATIONS AND ALL OTHER OBSERVATIONS

Are there any other observations you have made or other changes you have noticed that you feel are important to share?

*(if yes, ask questions below and ask Why that is happening?)*

Do you have any observations about recent changes in community hunting and fishing activities?

Do you have any observations about recent changes in local employment and the local economy?

Do you have any observations about recent changes in local culture or language?

Are there questions I should have asked that I didn't ask?

We do this monitoring project every year and would like your input on how to make it better.  
What can we do to make this interview better?

**(Say thank you for sharing, give them their coupon, and have them sign the receipt)**