

Gwaii Forest Society  
Final Report

Incorporating Cultural Use Species  
SFM04-2008

Haida Tribal Society and Royal Roads University

March 2009

**Project Narrative:**

**Goals and Methods**

*Species selection and quality criteria assessment.*

The project description and objective was shifted early in the project based on feedback from Damaan X'il Committee to undergo an initial exploration of the effects of deer browse on culturally used species. Sampling plots, interviews, and comparative ecosystem data were used to understand the changes on cultural-use plants since the introduction of the Sitka black-tailed deer.

The workshop was changed from a two-day presentation to a one-day discussion in order to respond to elder availability and requirements.

With the input and guidance of the cultural plants committee, the 2008 inventory largely focused on areas important to Damaan X'il. We used adapted B.C. Ministry of Forest and Range site inspection cards (Ground Inspection Forms; GIF), which included site and stand variables as well plant presence, percent cover, height, vigour and browse (utilization rating). The results of these can be found in **Appendix A. Plant enclosure and habitat attribute data**. The associated **Sub-Appendix Ai** shows the adapted GIF plot card used in the assessments. Due to a lack of comfort and knowledge gaps, this project did not seek to develop specific quality criteria ratings for the various cultural-use species, which would have been used to tie habitat conditions (site and stand) with high quality and presence cultural use species, for use within the Haida Gwaii biophysical model. An example of the original criteria dismissed by the committee can be found in **sub-Appendix Aii. Example of Quality Criteria Rating**.

The project combined traditional and western knowledge where possible, with the two-way transfer of knowledge occurring more at an intergenerational level rather than an intercultural level.

#### *Predictive habitat associations and initial sample site selection*

As it was determined that the original approach would be changed from understanding habitat requirements for high quality cultural-use species to understanding effects of deer browse and alternate 'quality' ratings, only preliminary predictive habitat associations were developed. Sample site selection was thus based on deer enclosure sites (comparative inside to outside the enclosure). Data analysis was changed to reflect comparative deer browse versus non-deer browse sampling, as well as possible implications of structural stage on plant presence, cover, and vigour. To supplement deer and habitat impact analyses, we completed mainland versus Haida Gwaii comparisons based on existing biogeoclimatic ecosystem classification (BEC) databases (**Appendix B. Mainland to Haida Gwaii Vegetation Comparison**).

Project methods were adapted to include elders via interviews rather than during sampling. Interviews focused on identification of focus species, indication of the agents of change in plant areas and methods of harvest. (**Appendix C. Interview Summary, Sub-Appendix Ci Statement of Purpose, Sub-Appendix Cii Interview Questions**). The interview transcriptions were analysed using standard techniques (e.g. thematic analysis), to provide an initial overview of past and current uses of plant species, their qualities, and threats to continued use. Some of this information was spatially mapped to provide visual illustrations for the community (**Appendix D. DRAFT - Some Key Areas for Plant Gathering**).

#### **Deliverables**

- 1) *Quarterly meetings of Daamaan X'il, with partial team involvement, to ensure continued adherence to established Haida protocols, build awareness of the project, ensure continued active participation, and select culturally used species including an assessment of quality and locations for sampling.*

There were 2 meetings held, one at the outset of the field work, and one at the end of the project to discuss results. In addition, the one-on-one interviews provided a level of comfort to interviewees as well as solicited a broader audience of 10 elders/harvesters.

- 2) *Development of a cultural-use inventory method which combines conventional vegetation inventories with a quality rating for select species on Haida Gwaii.*

Based on Damaan X'il input, this deliverable was changed to an exploration of deer effect on cultural-use species, and an assessment of using other vegetation codes (e.g. vigour, utilization) to indicate 'quality'. The project was adapted to include the development of interviews to assess change from traditional ecological knowledge (TEK), comparative

sampling of deer enclosures, and comparative assessments of vegetation data across similar on-island versus off-island ecosystems.

- 3) *Capacity-building within the Haida Heritage and Forest Guardians to enable continuation of inventories in the future. This includes two-way knowledge transfer with on-going project development with Haida project managers and GIS specialists as well training of two to four forest technicians during the two week field sampling;*

The capacity-building was undertaken during all of the Damaan X'il meetings, the field work with ecologists and elder, and the interview transcription and digitization

- 4) *Inventory database and predictive species-habitat model for understory cultural-use species, which can be used by the Haida Heritage and Forest Guardians within the geospatial model to assist with land use plans and resource management;*

Changed to a better understanding of the effect of deer browse on understory species using comparisons of past and present availability and health (using interviews - local knowledge), and comparisons of deer-affected versus unaffected (sampling – inside/outside deer enclosures; data comparisons – mainland to HG ecosystems), as well as initial indications of the effects of structural stage on alternate plant 'quality' ratings.

- 5) *Plain language report for community members.*

The extension article was submitted and accepted in Haida Laas as opposed to the QCI Observer in order to better target the intended audience (Appendix E).

We also include **Appendix F. Draft Guidelines for Ethical Harvest**, which is an additional delivery. This delivery responds to concerns and requests expressed by the interviewees and Damaan X'il.

Most photographs were submitted as part of the Interim Report. Additional photographs are provided as part of the final report (on cd-dvd), which specifically demonstrate deer browse effect based on mainland to Haida Gwaii vegetation comparisons.

## Financials

ITEM	RATE/UNIT	# UNITS	GFS COST	Final Actuals	Notes
project management	\$350.00	8	\$2,800.00	\$2,734.73	
<b><i>Species selection and quality criteria established; Daamaan X'il mtngs</i></b>					
<b>Salaries</b>					
workshop facilitator, Q1 mtng	\$350.00	6	\$2,100.00	\$2,403.41	
workshop facilitator, Q1-4 mtngs	\$250.00	9	\$2,250.00	\$3,750.00	
honourariums (5 elders, 8 days)	\$200.00	40	\$8,000.00	\$3,400.00	
<b>Travel</b>					
flight Victoria-HG	\$900.00	1	\$900.00	\$2,969.58	
flight Smithers-HG	\$900.00	1	\$900.00	\$929.95	

misc (parking, etc)			\$200.00	\$106.25	
<b>Food per diem</b>					
facilitators (2 people, 3 days)	\$42.00	6	\$252.00	\$110.00	
<b>Accommodation</b>					
facilitators (2 people, 3 days)	\$70.00	6	\$420.00	--	
<b>workshop costs, Q1</b>					
lunch (12 people, 2 days)	\$12.00	24	\$288.00	\$96.75	
hall rental	\$100.00	2	\$200.00	\$150.00	
local travel	\$130.00	2	\$260.00	\$230.00	
<b>workshop costs, Q2-4</b>					
lunch (7 people, 2 days, 3 mtng)	\$12.00	21	\$252.00	\$155.00	
hall rental (2 days, 3 mtngs)	\$100.00	6	\$600.00	--	
local travel (HHFG van)	\$130.00	6	\$780.00	\$750.00	150/day HHFG Field crew
<b><i>Habitat model and initial sample site selection</i></b>					
<b>Salaries</b>					
Ethnobotanist	\$350.00	5	\$1,750.00	\$1,750.00	
HTS/HHFG project manager	\$250.00	5	\$1,250.00	\$2,403.41	10 days includes interview
Haida mapper	\$200.00	5	\$1,000.00	\$455.25	
<b><i>Field sampling</i></b>					
<b>Salaries</b>					
Ethnobotanist	\$350.00	14	\$4,900.00	\$4,900.00	
field technician	\$200.00	10	\$2,000.00	\$1,773.72	
field technician	\$200.00	10	\$2,000.00	\$2,537.28	
elder/harvester	\$200.00	20	\$4,000.00	\$4,000.00	
HTS/HHFG project manager	\$250.00	5	\$1,250.00	\$2,403.41	
local ecologist	\$300.00	12	\$3,600.00	\$3,465.00	
<b>Travel</b>					
flight Victoria-HG	\$900.00	1	\$900.00	\$828.10	
flight Smithers-HG	\$900.00	1	\$900.00	\$975.47	
car rental and fuel	\$120.00	14		\$2,368.58*	Formerly MoFR in-kind
misc (parking, etc)			\$200.00	\$75.25	
local travel (HHFG van)	\$130.00	10	\$1,300.00	\$1,350.00	150/day HHFG Field crew
<b>Food per diem</b>					
tech & elder per diem (4)	\$10.00	40	\$400.00	--	
ecologist, ethnobotanist (2)	\$42.00	28	\$1,176.00	\$1,179.50	
local ecologist	\$42.00	12	\$504.00	--	
<b>Accommodation</b>					
ecologists (2)	\$70.00	28	\$1,960.00	\$1,310.00	
<b>Field supplies</b>					
misc gear			\$300.00	\$139.99	
<b><i>Analysis, model development and write up</i></b>					
Ethnobotanist	\$350.00	10	\$3,500.00	\$2,450.00	
Haida Mapper	\$200.00	10	\$2,000.00	\$1,762.25	

HTS/HHFG project manager	\$250.00	6	\$1,500.00	\$1,922.73
GIS specialist	\$350.00	2	\$700.00	\$700.00
<b>Totals</b>			<b>\$57,292.00</b>	<b>\$56,535.61</b>

\*Note: car rental and fuel under 'field sampling' was originally indicated as an MoFR in-kind contribution. Due to timing of the field work overlapping significantly with MoFR field tours, there was an unavoidable inability to obtain the vehicle as planned. We were therefore required to rent a vehicle, but were able to incorporate this cost through savings in other travel budget lines.