Introduction

Introduced, invasive species are detrimental to the cultural and ecological integrity of Gwaii Haanas National Park Reserve, National Marine Conservation Area Reserve, and Haida Heritage Site. The restoration of cultural and ecological integrity in Gwaii Haanas is a priority for Gwaii Haanas’ co-operative management body the Archipelago Management Board (AMB) and its members: the Council of the Haida Nation, Fisheries and Oceans Canada and Parks Canada. In 2017, the AMB guided the implementation of a large-scale ecosystem restoration project, Llgaay gwii sdiihilda - Restoring Balance. The first push of the project was completed by Gwaii Haanas team members and partners who specialize in preventing extinctions by removing invasive species from islands.

COMMUNITY UPDATE: JUNE 2018
Restoring Balance
Llgaay Gwii Sdiihlda

Goals

The aim of Llgaay gwii sdiihilda is to re-establish native flora and fauna by removing browsing pressures of introduced, invasive Sitka black-tailed deer from Ramsay Island and surrounding islands the Bischofs, Faraday, Murchison, Hotspring, and House. One of the goals of this project is to remove deer from this chain of islands to create an invasive mammal-free zone in the Juan Perez Sound area.

When forest ecosystems are over-browsed, plant and animal populations suffer. As deer populations grow, the number of ecologically and culturally important plant and animal populations shrink and could disappear forever. The goal of Restoring Balance is also to create a large area where shrubs, medicinal plants, bushes, trees - namely red cedar and yellow cedar, and associated wildlife such as Northern Goshawk, Ancient Murrelets and Saw-Whet Owls can thrive. To date, all known invasive deer were removed from Bischofs, House, Hotspring and Murchison Islands, bringing the project one step closer to creating an invasive-mammal free area in Gwaii Haanas.

The Project

The AMB-approved three-phase restoration plan was developed in 2014, with implementation taking place between 2017-2019. Shoreline hunting happened throughout the project. Bait stations were employed as the first method where corn, cedar and apple were used to attract the invasive deer so they could be taken at set locations and times on Ramsay Island. This was followed by dog assisted ground hunting and aerial shooting from a helicopter. Early on, the AMB consulted with the BC Yukon SPCA on the how to ensure the humane treatment of the animals and invited them to participate in project design.

As much as possible, the deer were harvested and processed locally to go to programs such as the Local Food to School program and elder day programs on-Island. Venison was distributed to Haida Gwaii elders. The field crews needed to run the project also consumed venison between March – September 2017.

The state of the forest soil, carbon and nitrogen balance and the above ground shrub diversity were assessed for two years before the start of the project to record the health of the forest ecosystems of these islands. In 2017, a team of scientists from the University of British Columbia travelled to Ramsay Island again to measure and record forest health data and will continue to do so for the next two years.
Local training was very successful with several Gwaii Haanas team members and other local contractors receiving advanced training in eradication techniques, deer behaviour, invasive species science and advanced marksmanship. A few Haida team members also gained major project management experience and training.

All known invasive deer were removed from Bischofs, House, Hotspring and Murchison Islands.

As of January 2018, an estimated 10 individuals remain on Ramsay Island.

Forests are rebounding; many native plants are returning including huckleberry and crab apple.

Partnerships and local knowledge are key. The learning and information sharing opportunities that took place during this project are invaluable to the Gwaii Haanas team. In turn, the Gwaii Haanas team has contributed knowledge and expertise to the international invasive species conservation field of knowledge.

Haida Nation Leaders (Gaahlaay, CHN President Peter Lantin, Chief Councillor Billy Yovanvich and CHN Old Masset representative Robert Bennett ) travelled Gwaii Haanas in the height of the project to learn about the project and see the various forms of hunting taking place.

A total of 598 deer were removed during the project.

To date the costs of the project has been $3.1 million. This covered two years of training, supplies and preparation, and one season (2018) of implementation employing dozens of local Haida Gwaii residents. If the project continues for another two years, it will cost $2.6 million, much of which will be spent and reinvested in the local economy.

Only deer over 40 pounds and that were in locations safe enough to get back to the boats were recovered. In some cases animals weren’t recovered due to location and poor quality meat.

Deer harvested from the program provided meals to community programs on Haida Gwaii including Meals on Wheels, Adult Day Program Masset, Adult Day Program Skidegate, and every single school on Haida Gwaii via the Local Food to School program. Additional meat was used to feed the Restoring Balance team during five months of project implementation.

All venison was processed and transported by Haida Gwaii residents. Local contractors provided food-safe meat processing and transportation services.

Many deer parts were distributed and used for cultural purposes: hides and hooves were used for regalia making workshops in Skidegate and Masset.

People can learn about the effects of introduced, invasive Sitka black-tailed deer thanks to three cultural plant enclosures: in the front country on the Spirit Lake Trail and in Gwaii Haanas on Kunga Island and at Windy Bay.

Deer harvested from the program provided meals to community programs on Haida Gwaii including Meals on Wheels, Adult Day Program Masset, Adult Day Program Skidegate, and every single school on Haida Gwaii via the Local Food to School program. Additional meat was used to feed the Restoring Balance team during five months of project implementation.

Haida Nation Leaders (Gaahlaay, CHN President Peter Lantin, Chief Councillor Billy Yovanvich and CHN Old Masset representative Robert Bennett ) travelled Gwaii Haanas in the height of the project to learn about the project and see the various forms of hunting taking place.
What’s Next?

• A ‘community hunt’ plan is in development in order to keep deer populations on southern Lyell Island reduced. Gwaii Haanas and CHN staff are developing a plan for a pilot mentored youth hunt in the fall of 2018 to introduce local youth to the conservation reasons and benefits of this work and to the opportunities for employment and research in Gwaii Haanas.

In 2018, Faraday Island will be the focus of continued eradication hunting, as will extensive grid searches to confirm the absence of invasive deer on other project islands and a further hunt if needed conducted by Gwaii Haanas team members with local contracted hunters.

A biosecurity plan is in place. This plan describes next steps and ways to maintain the deer-free status of Ramsay Island and surrounding islands the Bischofs, Faraday, Murchison, Hotspring, and House through prevention, detection and response and ongoing infrared camera monitoring.

Local contractors Kenny Richardson and Julian Rorick unload deer to bring to Baru Farms for processing.

Students at Gudangaay Tlaats’gaa Naay in Masset learned how to make kale venison burgers and bone broth thanks to the venison from Llgaay gwii sdiihda.

In May 2018, local youth danced the regalia created from hides harvested from Llgaay gwii sdiihda.
Questions? Looking for more information?
Contact the Gwaii Haanas office: 250-559-8818.