



the Heron



Winter 2014-2015 A newsletter from the Islands Trust Fund, a conservancy for Canada's Islands in the Salish Sea



Thetis Island residents enjoying the future Lower Burchell Hill Nature Reserve. Pictured left to right are Leah Howard, Kelly Bannister, Matthias Bannister, and Katia Bannister. Photo by Kelly Bannister.

Help Create Thetis Island's First Community Nature Reserve Pledge your support for the acquisition of Lower Burchell Hill today!

A joint fundraising campaign is underway to create the first community nature reserve on Thetis Island. Three partners, the Thetis Island Nature Conservancy (ThINC), the Cowichan Land Trust and the Islands Trust Fund, aim to raise \$560K to acquire the property known as Lower Burchell Hill. Success will mean Burchell Hill forests will continue to be enjoyed by the Thetis Island community and keep offering ecological services that benefit the island and the region.

“The 16-hectare Lower Burchell Hill property has regionally important Douglas-fir forest, including provincially red-listed plant communities and sensitive ecosystems,” said Kate Emmings, Islands Trust Fund’s

Ecosystem Protection Specialist. “Protecting this property is an important step towards land conservation on Thetis Island and within the Coastal Douglas-fir biogeoclimatic zone, which is globally rare and has only 9% protected area.”

The property also has significant watershed value and offers recreational opportunities through its section of a popular trail to the summit of Burchell Hill. Once the Trust Fund Board acquires the property as a nature reserve, two local land trusts will jointly hold a conservation covenant to ensure its permanent protection.



continued on pg 2



ThINC – Thetis Island Nature Conservancy

ThINC recently launched their new brand, including a new logo designed by Sander Sarioglu. Formed in 2012, ThINC is the newest land trust in the Salish Sea. ThINC works closely with the Cowichan Land Trust, and has goals towards the conservation and stewardship of natural ecosystems as well as promotion of community food security on Thetis Island. www.thetislandnatureconservancy.org

continued from pg 1

The terms of the covenant will allow only low impact recreational, scientific and educational activities on the land.

The Thetis Island Nature Conservancy is currently seeking pledges toward the purchase price of Lower Burchell Hill property. Please consider helping make this community nature reserve a reality. Make a pledge today, by visiting www.thetislandnatureconservancy.org or email ThINC@thetisland.net.



Trail to the summit of Burchell Hill



McFadden Creek

McFadden Creek Nature Sanctuary Permanently Protected!

Salt Spring Island property joins the Islands Trust Fund's network of over 90 protected places

Between 1998 and 2002, the Islands Trust Fund worked in partnership with the Wild Bird Trust of BC and the Waterbird Watch Collective to raise funds for the acquisition of a 5-hectare property on Salt Spring Island to create the McFadden Creek Nature Sanctuary. First protected in 2002, the property recently transferred to the Islands Trust Fund to be permanently managed as a nature sanctuary. In addition, the Salt Spring Island Conservancy now holds a conservation covenant on the property, providing local oversight of the long-term stewardship of the land.

Once home to over 130 Great Blue Heron nests, the McFadden Creek Nature Sanctuary was the first *Important Bird Area* identified in British Columbia. The herons abandoned the site in 2000, likely due to Bald eagle predation, however with ongoing protection the herons could return to their former nesting site. The sanctuary protects a forest of western red-cedar and Douglas-fir, as well as large cottonwood, big-leaf maple and trembling aspen trees once used as nest trees by the herons. Threespine stickleback and coastal cutthroat trout are present in McFadden Creek.

A management plan will be developed for the nature sanctuary, which will describe the species and ecosystems currently found there and will recommend management actions, including a program for annual monitoring. As a nature sanctuary, the property will not be open to public access.

The partners would like to acknowledge and thank all the donors who contributed to the original purchase of the McFadden Creek Nature Sanctuary.

Donation to Islands Trust Fund Honours Barrie Morrison and Nancy Waxler

Morrison Waxler Biodiversity Protection Legacy Fund encourages land conservation on Pender Islands

North and South Pender Island landowners may now apply to the Morrison Waxler Biodiversity Protection Legacy Fund for funding to pay all or a portion of the costs of a conservation covenant. This fund was established to remember Barrie Morrison and Nancy Waxler, two long-time residents of North Pender Island.

Barrie Morrison was born in Toronto in 1930 but was raised in Regina during the Depression – a social crisis that deeply shaped his perspective on life and his academic interests. He taught at a small school in northern Saskatchewan and spent time working on tugboats out of Vancouver, where he learned the moods of the Pacific Ocean. A lifelong scholar, he earned an honours degree in history in 1954 at the University of Saskatchewan where he met his first wife, Ann Spencer. He continued his studies at Oxford University with a British Council scholarship, earning a Master's degree in 1960. During this time, his first two children, Peter and Sara were born. By 1965 he had earned a PhD at the University of Chicago, studying archaeological remains and property transfer records in a culturally important region in what is now Bangladesh. At that time his third child, Douglas was born.

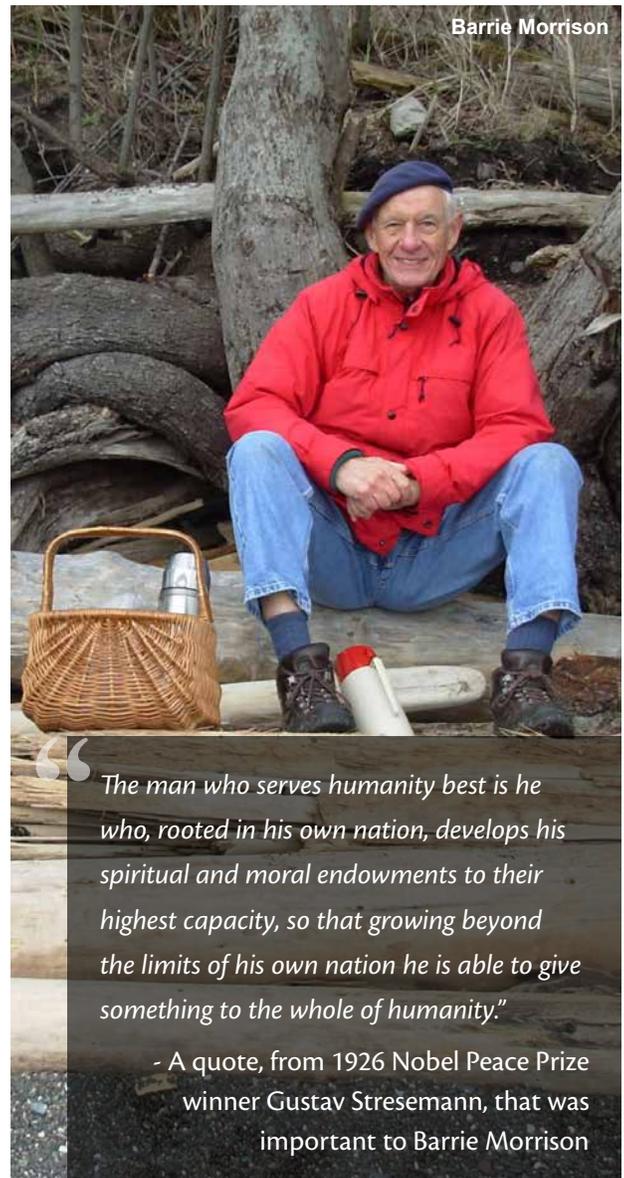
After a postdoctoral position at the University of Washington he returned to Canada as an assistant professor at the University of British Columbia (UBC), eventually becoming professor emeritus and an honorary research professor with the Institute for Asian Research.

During his academic career, Barrie's great intellectual curiosity shifted from history to sociology. In 1976, he met fellow scholar Nancy Waxler during a trip to Sri Lanka. They were married in 1982 and collaborated on several papers until their retirement from UBC when they moved to North Pender Island.

Barrie became an active member of the Pender Islands Conservancy Association (PICA) and was instrumental in supporting the Hope Bay Stream Salmon Restoration Project. He placed a conservation covenant on his land to help ensure protection of its flora and fauna. After Nancy's death in 2007, he started a fund in her name to help others register conservation covenants on their Pender Islands properties.

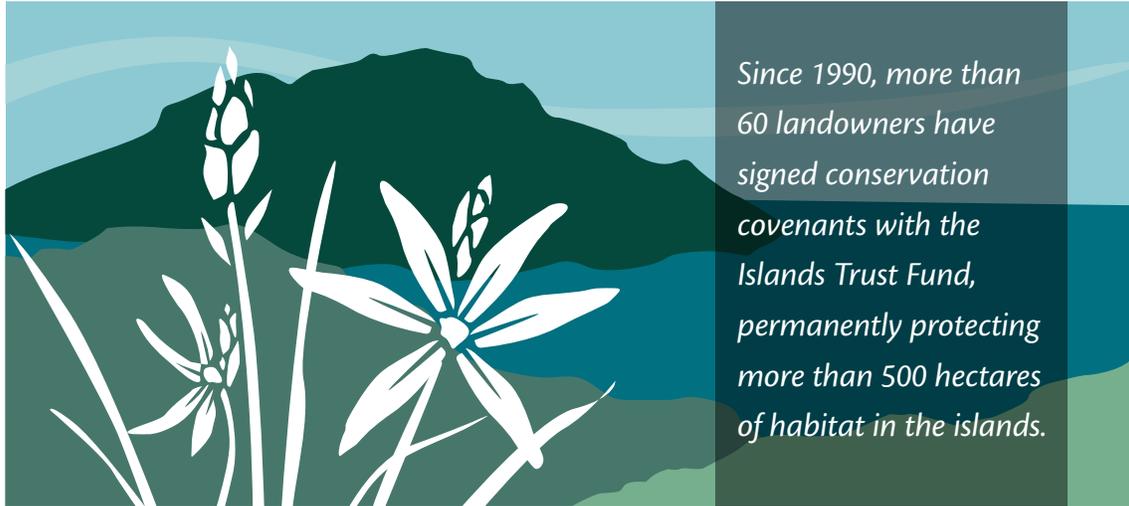
Barrie passed away in 2013. To honour Barrie and Nancy's commitment to protecting the natural values of the Penders, the family has donated \$20K to the Islands Trust Fund to establish the *Morrison Waxler Biodiversity Protection Legacy Fund*. The fund is intended to help other Pender Island landowners protect habitat on their land with covenants, carrying on Barrie and Nancy's legacy. The funding is intended to cover costs including survey plans, baseline reports, legal costs, and registration costs.

To be eligible for funding, the covenant must include the Trust Fund Board as one of the covenant holders. Covenants registered as part of



the *Natural Area Protection Tax Exemption Program* (NAPTEP) are eligible for funding support. Applications for funding may be made at the start of covenant negotiations (accompanying or following the submission of a Conservation Proposal to the Trust Fund Board) or at any time until three months after the registration of the covenant. Covenants associated with a development application (e.g. rezoning, subdivision) are not eligible for funding.

Grants from the *Morrison Waxler Biodiversity Protection Legacy Fund* range from \$100 - \$4,000. Larger grants may be considered for covenants with larger protected areas or exceptional biodiversity values. Please contact us to discuss your application with a staff member.



Since 1990, more than 60 landowners have signed conservation covenants with the Islands Trust Fund, permanently protecting more than 500 hectares of habitat in the islands.

Caring for the Natural Beauty and Ecological Values of our Islands

The Islands Trust Fund is here to help!

With over 68% of the land in Canada's islands in the Salish Sea privately owned, private landowners are the primary caretakers of this region's beautiful, unique and sensitive environment. The Islands Trust Fund offers landowners a number of tools that can help ensure that the ecological values of their property are preserved forever. The options vary in cost, tax benefits, and degree of protection, but our staff are available to walk landowners through these options. Read on for an overview of the tools available!

Create a Nature Reserve

When you or your estate donate an ecologically valuable property to the Islands Trust Fund, you protect those values forever as a nature reserve. We can help you provide a sanctuary for native species and to create a legacy for generations to come. We work closely with land donors to create a plan for the nature reserve that meets their vision for the future. Since 1990, 17 people like you have donated their land to the Islands Trust Fund, establishing a network of nature reserves we can all treasure.

A donation of land may provide tax benefits to you or your estate. The Islands Trust Fund is a qualified donee able to issue tax receipts for the appraised value of your donation for income tax purposes.

If you donate a property with significant ecological value, you may be eligible for additional tax benefits through the Government of Canada's *Ecological Gifts Program*.

Protect Habitat with a Conservation Covenant

A conservation covenant is a formal commitment you can make to protect the natural features on your property. With a conservation covenant, you still own your land, can live on the property, and sell it whenever you want. The covenant binds future owners to the same commitment you made to protect your land, meaning it will remain protected forever.

We work closely with our covenant donors to create a covenant agreement that meets their long-term vision for the land. Since 1990, more than 60 landowners have signed conservation covenants with the Islands Trust Fund, permanently protecting more than 500 hectares of habitat in the islands.

Save on Property Taxes with NAPTEP

The *Natural Area Protection Tax Exemption Program* (NAPTEP) is a type of conservation covenant available to landowners in qualifying regions whose property includes eligible natural features.

continued on pg 5



Mt. Tuam Protected by a Conservation Covenant

Last year, the Salt Spring Island Conservancy and Islands Trust Fund teamed up to protect more than 13 hectares near the summit of Mt. Tuam with a conservation covenant. The covenant prevents the private landowner or any future owners from

developing inside the protected area, keeping intact the vast Garry oak meadow. The covenant was made possible with the generous support of Environment Canada's *Habitat Stewardship Program for Species at Risk*.

Stunning view from the summit of Mt. Tuam

continued from pg 4

By registering a covenant through NAPTEP, landowners receive an annual property tax exemption of 65% on the protected portion of their land. Contact us to learn if your property is eligible for this incentive.

Other Ways to Protect Habitat

Landowners interact daily with native plants and animals that seek sanctuary on their property. There are many ways to care for those natural features without making a formal commitment. We share the islands with an amazing diversity of ecosystems and species that can be both beautiful and fragile. As a property owner, you can maintain this diversity by making easy choices, such as:

- Leaving natural areas undisturbed to allow native flora and fauna to thrive
- Gardening with native species
- Conserving water, for example by collecting rainwater to use for irrigation
- Removing and controlling invasive species

The Islands Trust Fund has many resources and expert staff to help you be a good caretaker of your land. Contact us today to discuss how we can help!

Yellow Flag Iris – A Beautiful Invader

Yellow flag iris (*Iris pseudacorus*) is an attractive ornamental flower but it is also an aggressive invader. When introduced into natural habitats, such as ponds, marshes and other wetlands, yellow flag iris forms dense thickets and displaces native species. This introduced plant can impact amphibians, birds, and other wetland life by reducing habitat.



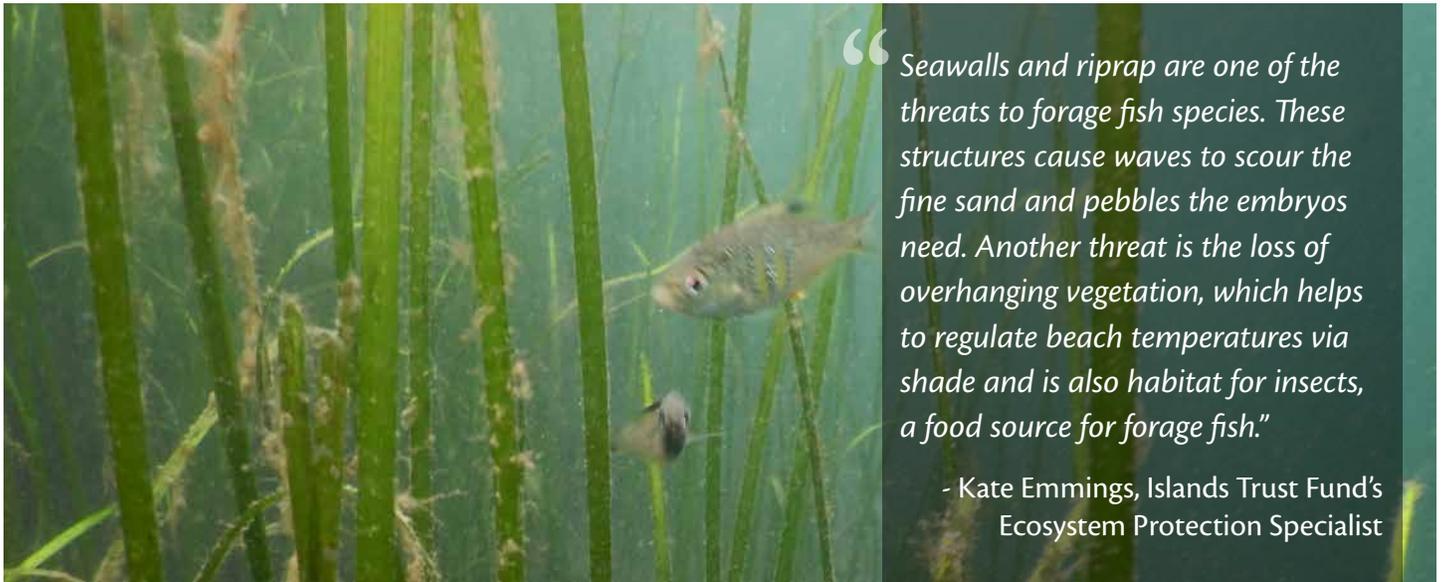
Salt Spring Islander reduces his Property Taxes by Protecting Forest

Larry Appleby is Salt Spring Island's 10th landowner to permanently protect private land with a NAPTEP covenant. With the addition of Mr. Appleby's 0.8 hectare Coastal Douglas-fir forest on Old Divide Road, Salt Spring Island now has 45 hectares of land protected by NAPTEP covenants.

A unique feature of Mr. Appleby's forest is that it is enclosed by a fence, which protects it from grazing deer. Increasingly, biologists are concerned about the effects of overbrowsing by burgeoning deer populations on plants and young trees in the Gulf Islands. This already fenced area may provide an interesting study plot in the future. The Salt Spring Island Conservancy co-holds the NAPTEP covenant with the Islands Trust Fund. The covenant is only 350 meters from the Blackburn Lake Nature Reserve, recently acquired by the Salt Spring Island Conservancy.



Kate Emmings, Island Trust Fund's Ecosystem Protection Specialist, presents Larry Appleby with a Conservation Covenant sign for his property.



“Seawalls and riprap are one of the threats to forage fish species. These structures cause waves to scour the fine sand and pebbles the embryos need. Another threat is the loss of overhanging vegetation, which helps to regulate beach temperatures via shade and is also habitat for insects, a food source for forage fish.”

- Kate Emmings, Islands Trust Fund's Ecosystem Protection Specialist

Where are the Forage Fish Spawning Areas and Eelgrass Meadows in the Salish Sea?

Mapping natural features of the marine shoreline to help protect important habitats

Shiner Perch, a species of forage fish, use eelgrass meadows for shelter and food. Photo by Jamie Smith of Coastal Photography Studio.

The Islands Trust Fund and partners initiated two mapping projects to identify important habitat for forage fish spawning and eelgrass meadows in the Islands Trust area. Partial results are now available on our website, and additional results will be posted in January 2015.

Eelgrass Meadow Mapping

Eelgrass (*Zostera marina*) is a flowering marine plant that provides critical habitat to fish, shellfish, birds and mammals. Eelgrass meadows serve as nursery habitat, providing food and protection for over 80% of the region's commercially important fish and shellfish species at some point in their lifetimes. Sometimes referred to as "salmon highways", eelgrass habitat is essential to the survival of all species of salmon along our coast. Eelgrass meadows sequester carbon at a much faster rate than the equivalent area of forest, thus acting as important carbon sinks. When its contributions towards fisheries and carbon sequestration are taken into consideration, the plant can be considered to have a significant economic value.

Eelgrass meadows are particularly sensitive to docks, mooring buoys and anchor chains, hardened shorelines, and contaminated or silt-laden runoff from land. The Islands

Trust Fund aims to use the eelgrass mapping to focus voluntary conservation efforts on the shorelines and watersheds that have the greatest impact on eelgrass meadows. Local governments and island communities may also use the maps when considering community education programs, land use plans and development applications along the shoreline.

Our partners in the eelgrass mapping project are SeaChange Conservation Society, and the Seagrass Conservation Working Group. Project funders included the Islands Trust, the Pacific Salmon Foundation, the Victoria Foundation, Greater Victoria Savings and Credit Union, Comox Valley Regional District, Capital Regional District and Metro Vancouver. Learn more at: www.IslandsTrustFund.bc.ca/Eelgrass

Forage Fish Spawning Areas Mapping

Forage fish are several species of small schooling fish on which larger animals and birds feed. The Islands Trust and Islands Trust Fund project focussed on mapping and assessing habitat for surf smelt and Pacific sand lance. These forage fish are known to be an important part of the diet of coastal

cutthroat trout and provide at least 50% of the diet of Chinook salmon. Surf smelt and Pacific sand lance spawn on sand and pebble beaches. They deposit their eggs on the upper beach near high tide levels, a few meters below the log line.

Shoreline activities such as shellfish aquaculture and shoreline modifications have an impact on beach spawning habitat for forage fish. Point sources of oil, such as land-based oil leaks or small but chronic oil spills from boats can also be detrimental to forage fish eggs.

Surf smelt and Pacific sand lance spawning habitat assessments were completed for the coastlines of North and South Pender, Thetis, Hornby, Denman, Gambier and Bowen Islands over the last two years to identify potential shorelines where forage fish start their lives. The studies inform waterfront landowners and governments about the habitats of these cornerstone species, and how to protect them.

The forage fish habitat surveys were completed by the BC Marine Conservation and Research Society and community volunteers, and funded by the Islands Trust Council and Pacific Salmon Foundation. Local trust committees and

UBC Study: Islands Trust Area Forests are Significant Carbon Sinks

Researchers from the University of British Columbia's Department of Forest and Conservation Sciences released a report last summer with encouraging conclusions about forests on B.C.'s Gulf and Howe Sound Islands. The study, commissioned by the Islands Trust Fund, analyzed maps of forest biodiversity and carbon storage and concluded that protecting forests in the Islands Trust area is integral to preserving the Coastal Douglas-fir (CDF) zone.

"We've always known the Islands Trust area was special because it is in the Coastal Douglas-fir Biogeoclimatic zone," said Kate Emmings of the Islands Trust Fund. "What we were excited to find was that relative to other areas within the CDF zone, the Islands Trust area is biologically significant."

The Coastal Douglas-fir Biogeoclimatic Zone is characterized by forests of Douglas-fir, arbutus, western redcedar and salal. The unique set of ecosystems that make up the CDF zone occur on south-east Vancouver Island, the Gulf Islands, the Fraser Valley and the Sunshine Coast. Due to its small range, the CDF zone contains some of the most rare and endangered ecosystems in B.C. The Islands Trust area makes up 25% of the CDF zone.

The researchers also found species diversity, specifically bird species, to be higher in the Islands Trust area than in other areas of the CDF zone.

The study found the forests of the Islands Trust area store and sequester more carbon than CDF forests outside the Trust area. On average, forests in the Islands Trust area store 82% more carbon per hectare and have the potential to absorb 43% more carbon per hectare over the next 20 years than forests in the rest of the CDF zone. These results are likely due to a higher forest density in Islands Trust area, and more forests in

a mature or maturing state, which tend to store and take in more carbon to support their rapid growth rate.

"What we've found is that if forests in the Gulf Islands were maintained, or otherwise protected, the Islands Trust area has the capacity to be a major sink for carbon produced in the region," said Richard Shuster, PhD candidate at UBC and author of the report. "At the current growth rate, there is a potential that old growth forests could be restored in the islands within a century."

The researchers also found species diversity, specifically bird species, to be higher in the Islands Trust area than in other areas of the CDF zone. Coupled with a comparison of property values, the data showed investments in habitat protection in the Islands Trust area would be more cost effective and would achieve more biodiversity protection than investments in other areas of the CDF zone.

"In 2008, the Province determined the ecosystems of the CDF were critically imperiled and of greatest provincial conservation concern," said Emmings. "The reason this new study is significant is because it now provides scientific data showing that resources dedicated to preventing further loss of CDF ecosystems in the Islands Trust area would be a superb investment in biodiversity protection and carbon storage. Most of these carbon storing and sequestering forests are the result of good private land stewardship. The challenge is to ensure that these forests are maintained in a landscape that is over 68% privately owned."

Read the full report at:
www.IslandsTrustFund.bc.ca/CarbonSinkReport



Support island habitats. Donate today.

Our 100% Promise

When you donate to the Islands Trust Fund, every dollar of your donation goes directly to protecting endangered island habitats.

All donations of \$20 or more will receive a tax receipt for Canadian income tax purposes. The Islands Trust Fund is a qualified donee under the *Income Tax Act*.

Save time! Donate online!

<http://www.islandstrustfund.bc.ca/donate.aspx>

YES! I want to help protect natural habitat on the islands

\$50 \$100 \$250 \$ _____

Please designate my donation to: Where most needed

Opportunity Fund Covenant Management and Defence Fund

Lasqueti Island Acquisition Fund Gambier Island Acquisition Fund

Name _____

Address _____

City _____

Prov/State _____ Postal/Zip code _____

Phone _____

E-mail _____

Yes, I am okay with public recognition of my donation.

I wish to donate by:

cheque (made payable to the Islands Trust Fund)

Visa MasterCard

Card number _____

Expiry Date _____

Security Code (back of card) _____

Signature _____

Please mail to:

200-1627 Fort Street, Victoria, BC V8R 1H8

To Contact Us:

Telephone: 250-405-5186

Toll free via Enquiry BC: 1-800-663-7867 (604-660-2421 in Vancouver)

E-mail: itfmail@islandstrust.bc.ca Website: www.islandstrustfund.bc.ca

continued from pg 6

island municipalities can use this data when considering shoreline development setbacks and other planning tools that could preserve spawning habitat on the islands. Waterfront property owners can refer to the new mapping to see if nearby beaches might be home to spawning forage fish, and take steps to 'soften' or green their shoreline so that populations remain strong. The maps and report are available at www.IslandsTrustFund.bc.ca/ForageFish.

Thank you for your support!

We would like to thank the numerous individuals and organizations that help the Islands Trust Fund and our partners protect rare ecosystems and habitat. Your contributions to the work we do are greatly appreciated.

A perfect gift for someone
passionate about the islands!

\$17.95
each or 2 for
\$29.95

Our birthday calendar features the stunning beauty of our island nature reserves captured by local photographers. Record birthdays and anniversaries with this perpetual calendar that lasts year after year.

100% of all proceeds go to the Opportunity Fund to benefit local conservation projects on the islands of the Salish Sea.

To order a calendar, phone 250-405-5186 or visit us online at

www.IslandsTrustFund.bc.ca/Shop.



Islands Trust Fund Staff

Jennifer Eliason, Manager

Kate Emmings, Ecosystem Protection Specialist

Nuala Murphy, Property Management Specialist

Rob Gratton, Communications and Fundraising Specialist

Corlynn Strachan, Secretary



Like us on Facebook

www.facebook.com/IslandsTrustFundBC



Follow us on Twitter

www.twitter.com/IsldsTrustFund

Newsletter Design and Production

Ripple Design www.rippledesign.info



The Heron is printed on 100% post consumer recycled paper. Please recycle.