

# **Denman Conservancy Association**

PO BOX 60, Denman Island, BC VOR 1T0

March 27, 2023

Denman Island Local Trust Committee: Sam Borthwick, David Graham. David Maude Islands Trust Northern Office northinfo@islandstrust.bc.ca

Re: Proposed Bylaws Nos. 228 & 229

Dear Trustees:

CONTEXT: Warming climate → freshwater crisis → loss of biodiversity & lack of ability to sustain food production → inequality in water access

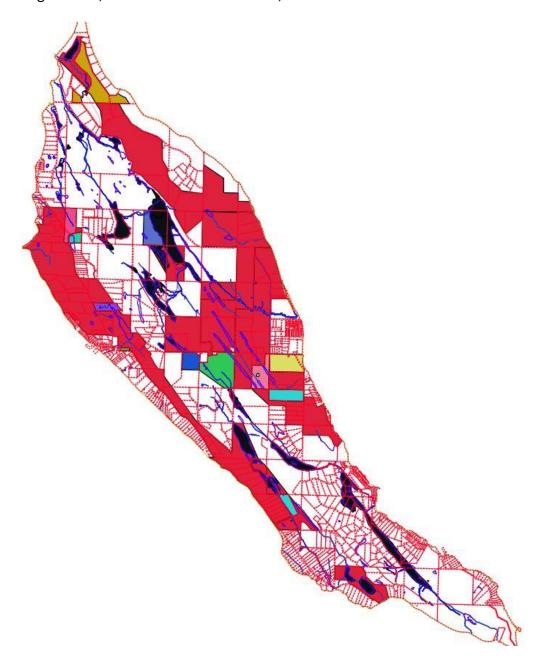
The Denman Conservancy Association (DCA) is writing to express grave concerns regarding Proposed Bylaws Nos. 228 and 229. DCA supports Bylaw 228's Guiding Objective – Agriculture "To preserve agricultural land and encourage farming on land in the Agricultural Land Reserve." However, natural ecosystem services and amenities, particularly the surface and ground water, of these lands may be compromised with the absence of DPA designations and increased uses permitted by these bylaws.

<u>Requested Action</u>: Given the climate/water/biodiversity crises, we recommend that the current Bylaw restore DPA protection to all Denman's creek and wetland systems within ALR/AG properties.

Background - In the past, the Islands Trust removed the DPA protected status of the creeks and wetlands located within Denman's ALR/Ag property borders. DCA formally opposed this step, stating that not only would this affect recognized fish populations, but this disruption of interconnected water systems could jeopardize overall fresh water supplies and subsequently also ground water on Denman. When this step was taken by the Trust, their maps dropped these creeks and wetlands, which left Denman maps looking ridiculous, as major creek systems stopped at, then continued past, Denman's ALR/Ag lands. Even Denman's two major salmon-spawning systems were represented in this way. We hope that this is just an unfortunate mapping error. Maps are powerful – and such removal of precious waterways, sends a very dangerous message at a time when the IPCC and the UN World Water Development Report emphasise conservation and prudent use.

A very preliminary DCA map of Denman's creeks and wetlands is included below. All creeks (blue lines) and wetlands (black) within all the colour-filled properties are on the various A-zoned Denman Lands and thus, <u>unprotected</u>.

We recommend that adequate funding be allotted to accurately map all the interconnected creeks and wetland systems on Denman that sustain us all. In addition, outreach education from the Islands Trust about the importance and care of Denman's water and the valuable biodiversity water supports, would significantly benefit support for Islands Trust endeavours and Denman's sustainability. All citizens, including farmers, will benefit from a reliable, clean water source.



**Surface and Groundwater** – An issue that DCA has identified repeatedly in the past, and which is becoming even more significant as the impacts of climate change intensify is **Denman's surface water and the importance of that water to the ground water supplies and to all living things on Denman. Certainly,** 

with the increase in Denman's human population, and increased permitted land uses, as well as to the mounting risk to the many sensitive, significantly 'at-risk" biodiversity features of Denman Island, surface water must be of the foremost importance to the Islands Trust and its land use requirements. The *BC Drought Information Portal* reports that in the last 5 years there have been 2 years in which our area reached Drought Level 5, meaning adverse impacts to socio-economic or ecosystem values are certain. And, the frequency of summer drought conditions is predicted to increase.

On the Islands Trust's small self-contained islands, water is a critical issue. Trust policies state that Denman must be self-sustaining for water and yet in contravention of this, fresh water currently is brought from Vancouver Island. Water protection and sustainability must be a key issue for Denman's present and future survival. While the legal history on this issue is unknown, various BC Water legislation, including the Water Act and the Water Sustainability Act support the protection of creeks and wetlands, especially for ecologically important and fish-bearing systems (see attached references).

**Exclusion of land from the ALR** – Given the risk to natural amenities noted above, Policy 7 (Bylaw 228) is important - "The Local Trust Committee should only support applications for exclusion of land from the Agricultural Land Reserve where there is a **significant benefit for the greater community of Denman Island."** Among significant benefits for the community is the conservation of water resources, forest stands and biodiversity. The Trust Council declared a "climate change emergency" (March 2019) – they must follow the science to ensure water for all. Trust Council committed to take climate action, which may mean the removal of lands from the ALR as climate mitigation may be their highest and best use.

Finally, we are sobered by the Intergovernmental Panel on Climate Change (IPCC) most recent report (March 20, 2023). We note in particular information of relevance and urgency to the subject of this letter. The IPCC reports:

Terrestrial, marine and freshwater ecosystems are being profoundly altered by climate change across North America (very high confidence). Rising air, water, ocean and ground temperatures have restructured ecosystems and contributed to the redistribution very high confidence) mortality (high confidence) of fish, bird and mammal species. Extreme heat and precipitation trends on land have increased vegetation stress and mortality, reduced soil quality and altered ecosystem processes including carbon and freshwater cycling (very high confidence). Warm and dry conditions associated with climate change have led to tree die-offs (high confidence) and increased prevalence of catastrophic wildfire (medium confidence) with an increase in the size of severely burned areas in western North America (medium confidence). Nature-based Solutions (NbS) and ecosystem-based management have been effective adaptation approaches in the past but are increasingly exceeded by climate extremes (medium confidence).

We all need to work to together to ensure present and future water is there for all. We appreciate your attention to our concerns.

Sincerely

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Luise Hermanutz, Co-chair, DCA - NOTE: 1 Attachment

# ~Various BC Water Legislation:

# **Water Sustainability Act**

The Water Sustainability Act (WSA) was brought into force on February 29, 2016 to ensure a sustainable supply of fresh, clean water that meets the needs of B.C. residents today and in the future.

The WSA is the principal law for managing the diversion and use of water resources. The WSA provides important new tools and updates B.C.'s strategy for protecting, managing and using water efficiently throughout the province.

# Water Sustainability Act WATER SUSTAINABILITY REGULATION

[Last amended April 1, 2022 by B.C. Reg. 84/2022]

https://www.bclaws.gov.bc.ca/civix/document/id/complete/statreg/36\_2016

"fish habitat" means the areas of an aquatic ecosystem on which fish depend, directly or indirectly, in order to carry out their life processes, including areas for spawning grounds, nurseries, rearing, food supply and migration;

#### **Division 2** — Sensitive Streams

# Sensitive streams designated

17 The streams named and described in Schedule B are designated as sensitive streams.

#### **Applications respecting sensitive streams**

- **18** The decision maker considering an application for an authorization in respect of a sensitive stream may require that the applicant provide the following information:
  - (a)a fish inventory of the stream;
  - (b)a flow or runoff analysis of the stream, including additional flow measurements for correlation of data;
  - (c)seasonal distribution of water demand from the stream, including for irrigation purposes;
  - (d)if there is a tributary or aquifer designated with the sensitive stream,
    - (i)the contribution to the sensitive stream of water from the tributary or aquifer, and
    - (ii) the seasonal distribution of water demand from the tributary or aquifer;
  - (e)an assessment of the fish habitat at the point of diversion, or proposed point of diversion, on the stream and in the area of the stream affected or that will be affected;
  - (f)the design of proposed works, including diversion structure and balancing and storage reservoirs;
  - (g)if appropriate, any specific water conservation measures that the applicant will use to minimize the amount of water used;

- (h)whether material is to be removed from the stream or stream channel in connection with the works;
- (i)proposed measures for the protection of natural materials and vegetation that contribute to the fish habitat of the stream and the stability of the stream channel;
- (j)whether substances, sediment, debris or other material is to be deposited in the stream or stream channel in connection with the works;
- (k)a proposal for restoration of the worksite after the works have been completed.

# BC Water Act May 2014 in effect March 2023

https://www.bclaws.gov.bc.ca/civix/document/id/complete/statreg/14015#section8

#### **Definitions**

**1** (1)In this Act: ...(*long list*...)

## Water use purposes

- **2** The following defined purposes are the purposes in respect of which water may be diverted from a stream or an aquifer:
- "conservation purpose" means the diversion, retention or use of water for the purpose of conserving fish or wildlife and includes the construction of works for that purpose;
- "domestic purpose" means the use of water for household purposes by the occupants of, subject to the regulations, one or more private dwellings, other than multi-family apartment buildings, including, without limitation, hotels and strata titled or cooperative buildings, located on a single parcel, including, without limitation, the following uses:
  - (a) drinking water, food preparation and sanitation;
  - (b) fire prevention;
  - (c)providing water to animals or poultry kept
    - (i)for household use, or
    - (ii) as pets;
  - (d)irrigation of a garden not exceeding 1 000 m<sup>2</sup> that is adjoining and occupied with a dwelling;
- "industrial purpose" means a use of water designated by regulation as a use for an industrial purpose, but does not include the use of water for any other water use purpose;
- "irrigation purpose" means the use of water on cultivated land or hay meadows to nourish crops or on pasture to nourish forage;
- "land improvement purpose" means the diversion or impounding of water to

- (a)protect land,
- (b)facilitate the development of a recreational facility or of a park or other protected area,
- (c)facilitate the reclamation, drainage or other improvement of land, or
- (d)carry out a project of a nature similar to a project described in paragraph (b) or (c);

# "mineralized water purpose" means

- (a)the bottling and commercial distribution of water so impregnated with mineral salts, elements or gases as to potentially give the water therapeutic properties, or
- (b) the use in commercial bathing pools of water that is
  - (i)impregnated with mineral salts, elements or gases, or
  - (ii)naturally at a temperature suitable for that use;

# "mining purpose" means

- (a) the use of water, including the use of water under pressure, for recovering minerals from the ground or from ore, or
- (b)the use of water under pressure to move earth, sand, gravel or rock;
- "oil and gas purpose" means the use of water in the development of petroleum or natural gas wells or the production of petroleum or natural gas resources;
- "power purpose" means the use of water in the production of electricity or other power;
- "storage purpose" means the impounding and retention of water for subsequent use for a water use purpose;
- "waterworks purpose" means the carriage or supply of water by one person or entity for the use in British Columbia of another person or entity.

#### Water Protection Act

3 Nothing in this Act authorizes a person to do anything prohibited by the *Water Protection Act*.

#### Powers respecting applications and decision maker initiatives

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(8)A decision maker may not issue a licence authorizing the diversion or use of dedicated agricultural water unless the licence is for a qualifying agricultural use on qualifying agricultural land.

### Water reservations

- **39** (1) If the Lieutenant Governor in Council considers it advisable
  - (a)to enable a specified person to investigate the suitability of a stream or an aquifer for a specified water use purpose,
  - (b)to make provision for a water supply from a stream or an aquifer for a proposed waterworks, irrigation or power system or project of a specified person,
  - (c)to ensure water from a stream or an aquifer is available for the benefit of the Crown, or

(d)to retain the reserved water in a stream or an aquifer,

the Lieutenant Governor in Council may reserve all or part of the water that is in the stream or the aquifer, and that is unrecorded and unreserved and is not dedicated agricultural water, from being diverted or used under this Act except as provided by section 6 (2), (3) or (4) [use of water].

- (8)Despite subsection (1), a licence may be issued authorizing for domestic purpose or a land improvement purpose the diversion or use of water to which a reservation established under subsection (1) applies.
- (9)Despite subsection (1), a use approval may be issued authorizing, for any water use purpose, the diversion and use of water to which a reservation established under subsection (1) applies.

# Water objectives

- **43** (1)For the purposes of sustaining water quantity, water quality and aquatic ecosystems in and for British Columbia, the Lieutenant Governor in Council may make regulations
  - (a)establishing water objectives for a watershed, stream, aquifer or other specified area or environmental feature or matter in order to sustain
    - (i)water quality required for specified uses of water,
    - (ii)water quantity required for specified uses of water, and
    - (iii)water quality and water quantity required to sustain aquatic ecosystems

in relation to the watershed, stream, aquifer or other area, feature or matter,

- (b)specifying factors and criteria to apply for evaluating the impacts of a land use or resource use proposal on objectives established under paragraph (a), and
- (c)respecting measures to address impacts of such proposals on the objectives.
- (2)A regulation under this section may
  - (a)require that a water objective be considered by a public officer making a specified decision under a specified enactment, if the decision is in relation to the watershed, stream, aquifer or other area or environmental feature or matter for which the water objective was prescribed, and
  - (b)authorize or require a person referred to in paragraph (a), in order to promote achievement of the water objective, to impose requirements, as terms and conditions, on any instrument the person issues.
- (3)Terms and conditions authorized or required to be imposed by a regulation under subsection (2) are deemed to be imposed under the specified enactment.
- (4)Despite any other enactment, a regulation under subsection (2) may provide that a specified water objective applies despite or subject to objectives, standards, requirements or plans established in relation to environmental matters under the specified enactment or another specified enactment.
- (5)A regulation under this section may require that
  - (a) a regional district consider specified water objectives when developing, amending or adopting a regional growth strategy under Part 13 [Regional Growth Strategies] of the Local Government Act,

(b)a municipality consider specified water objectives when developing, amending or adopting an official community plan under Part 14 [Planning and Land Use Management] of the Local Government Act or Part XXVII [Planning and Development] of the Vancouver Charter, (c)a local trust committee consider specified water objectives when developing, amending or adopting an official community plan under section 29 [land use and subdivision regulation] of the Islands Trust Act, and

(d)a prescribed person or entity consider specified water objectives when developing, amending or enacting plans or undertaking planning processes under prescribed enactments.

# Order designating area for planning process

- **65** (1)The minister, on request or on the minister's own initiative, by order, may designate an area for the purpose of the development of a water sustainability plan
  - (a)if the minister considers that a plan for the area will assist in
    - (i)preventing or addressing
      - (A)conflicts between water users,
      - (B)conflicts between the needs of water users and environmental flow needs,
      - (C)risks to water quality, or
      - (D)risks to aquatic ecosystem health, or
  - (ii)identifying restoration measures in relation to a damaged aquatic ecosystem, or (b)in other prescribed circumstances.
- (2)A request to the minister referred to in subsection (1) must
  - (a)be made in the prescribed manner, if any, and
  - (b)include the prescribed information, if any.
- (3)An order under subsection (1) must include the reasons for which the order is made.
- (4)Section 124 (4) (d) [general regulation-making powers] applies to an area designation under subsection (1) of this section.

#### Declarations of significant water shortage

- **86** (1)If the minister considers that one or more streams in an area have fallen or are at risk of falling below their critical environmental flow thresholds, the minster may make a temporary order declaring a significant water shortage in the area designated in the order.
- (2)An order under subsection (1) must specify the term of the order, which term may not exceed 90 days.
- (3)Whether or not a temporary order under subsection (1) has been made or expired, if the Lieutenant Governor in Council considers that one or more streams in an area have fallen or are at risk of falling below their critical environmental flow thresholds, the Lieutenant Governor in Council may make an order declaring a significant water shortage in the area designated in the order.
- (4)When an order of the Lieutenant Governor in Council under subsection (3) comes into force, an order under subsection (1) in relation to the same designated area expires.

(5)Section 124 (4) (d) [general regulation-making powers] applies to an area designated in an order under subsection (1) or (3).

# **Critical environmental flow protection orders**

- **87** (1)If an order under section 86 (1) or (3) is in force, the comptroller must, for the purposes of section 22 (9) [precedence of rights], by order, determine in accordance with any applicable regulations, the critical environmental flow threshold for each stream that meets all of the following criteria:
  - (a) the stream is in the area designated in the order and has a regionally significant aquatic ecosystem;
  - (b)water is being diverted from the stream under this Act or the stream is hydraulically connected to an aquifer from which water is being diverted under this Act;
  - (c)the comptroller considers that enforcing the precedence of the stream's critical environmental flow threshold under section 22 (9) will assist in preventing significant or irreversible harm to the aquatic ecosystem of the stream.
- (2)If the comptroller considers that more than one stream in an area to which an order under section 86 (1) or (3) applies is described in subsection (1), the comptroller may determine the critical environmental flow thresholds for the streams based on the degree of benefit the comptroller considers the aquatic ecosystems of the streams would derive from enforcement of the precedence of their critical environmental flow thresholds, in descending order, beginning with the stream that would derive greatest benefit and stopping
  - (a)when the critical environmental flow threshold has been determined for all of the streams described in subsection (1), or
- (b)if the order under section 86 (1) or (3) expires before paragraph (a) applies, upon that expiry.
- (3)An order under subsection (1) is final and may not be appealed to the appeal board.
- (4)An order under subsection (1) and the implementation, under this Act, of the precedence provided for in section 22 (9) apply
  - (a)despite the rights of any person who, under this Act, is diverting or using water from the stream or the aquifer hydraulically connected to the stream, as the case may be, and
  - (b)whether or not a right that is acquired, accrued or accruing under this Act at any time before or after the coming into force of this section is affected by the order.

# Fish population protection orders

- 88 (1)If the minister considers that the flow of water in a specified stream is or is likely to become so low that the survival of a population of fish in the stream may be or may become threatened, the minister may make an order respecting the diversion, rate of diversion, time of diversion, or use, including storage and time of storage, of water from the specified stream, or a specified aquifer hydraulically connected to the stream, regardless of the precedence set out in section 22 [precedence of rights].
- (2) The minister may make an order under subsection (1) only after giving due consideration to the needs of agricultural users.
- (3)An order under subsection (1) must specify the term of the order.

- (4)An order under subsection (1) applies
  - (a)despite the rights of any person who, under this Act, is diverting or using water from the specified stream or the specified aquifer, as the case may be, and
  - (b)whether or not a right that is acquired, accrued or accruing under this Act at any time before or after the coming into force of this section is affected by the order.

# ~ WATER PROTECTION ACT

# [RSBC 1996] CHAPTER 484

https://www.bclaws.gov.bc.ca/civix/document/id/complete/statreg/00\_96484\_01

#### **Purpose**

2 The purpose of this Act is to foster sustainable use of British Columbia's water resources in continuation of the objectives of conserving and protecting the environment.