THE UNIVERSITY OF BRITISH COLUMBIA

Re: B.C.'s Draft Biodiversity and Ecosystem Health Framework January 31, 2024

Dear Minister Cullen,

As scientists and experts on biodiversity issues across British Columbia and globally, we write to commend the province on producing a clear and forward-looking statement that outlines a new perspective on biodiversity policy in BC. We believe this is an essential next step, and one that needs to quickly evolve into concrete commitments, policy and action. We believe the province can go further, now, to take the actions that are overdue to restore and sustain the diversity that makes our province one of the best places on earth.

Across the group of signees, we have extensive experience on matters of biodiversity and ecosystem health: we have conducted scientific assessments underpinning the establishment of protected areas in Canada and elsewhere, provided scientific expertise to national committees such as the Species at Risk Advisory Committee (SARAC), advised federal ministers and/or their direct staff, contributed as scientists to international science-policy platforms such as the Intergovernmental Panel on Biodiversity and Ecosystem Services (IPBES) and the United Nations Convention on Biological Diversity, served on Scientific Advisory boards for provincial, national and international conservation organizations, supported the efforts of BC Parks, delivered regional-scale costed priority threat management plans for over 400 Canadian Species at Risk (SARA),[1] worked with First Nations communities on natural resource management and conservation, and worked with the BC Ministries of: Environment and Climate Change Strategy, Water, Land, and Resource Stewardship, and Agriculture, on topics ranging from sustainable agriculture to wildlife conservation and invasive species management.

Drawing from this experience, we also write with some important concerns about what we think is missing in this draft framework. While we strongly agree with the aspirations of the framework, we are concerned that the draft is not explicit enough about the immediate actions it will take for biodiversity and ecosystem protection, and therefore lacks substance with respect to policy or legislation. Below, we identify three major points of concern and provide recommendations for concrete steps, with the goal of working with the province to achieve the objectives set out in the framework.

Concern 1: The document needs more concrete, mandated action. The framework as it stands represents a commitment to further planning rather than a set of concrete and measurable objectives for ecosystem and biodiversity protection. We agree that "increasing awareness, strengthening

[1] To date we've produced 8 regional plans for investment in recovery of species at risk in Canada covering over 400 species at risk and including 4 priority places (See: https://www.taramartin.org/).

knowledge networks, and building relationships" are important. However, we find this language, in lieu of more explicit commitments, to stand in contrast with the needs of the present moment: one in which biodiversity and ecosystems are well-understood to be at risk, many opportunities for action exist, and existing knowledge networks have indicated that what is most needed is strong, actionable legislation.

Recommendation 1: Provide clear guidance to all branches of government about how to "prioritize the conservation and management of ecosystem health and biodiversity." Biodiversity has often taken the back seat when there are competing priorities within and between different sectors. Only specific guidance on *how* to prioritize biodiversity – in the context of ongoing pressures to expand resource extraction practices – would reverse this trend to protect British Columbia's unique biodiversity for future generations.

The framework should specify the legal and regulatory mechanisms that will protect biodiversity and ensure sustainable land use. Concrete steps in line with the Kunming-Montreal Global Biodiversity Framework include:

- Commit to restore 30% of degraded terrestrial, inland waters, and coastal and marine ecosystems by 2030 (Target 2)
- Agree to identify perverse subsidies that harm biodiversity and reallocate them to support activities that protect and restore ecosystems by 2030 (Target 18)
- Commit to producing and enacting costed regional multi-species recovery plans which prioritize the actions needed to recover species and ecosystems[2] and can be used to help fulfill BC's commitment to protect 30% of land and waters (Target 3)
- Specify changes in legislation that will be made to protect species and ecosystems and a time frame for doing so (Target 4), in line with the framework's stated purpose to provide "strategic direction that sets the course for changes in legislation and current practices"

Concern 2: We support the move towards multi-species recovery planning with a focus on prioritizing actions for species recovery, as this approach has been shown to be most cost-effective.[3] However, in the absence of provincial legislation for species at risk in BC, we are concerned that single species currently at risk of extinction in BC could be overlooked. As members of this group have written previously to the BC Government, the Environment Minister must act to protect SARA-listed species in BC, both in law and policy, and through effective action.[4] Our previous letter addressed how inadequate current protections and enforcement have been:

> *"Of the 1336 species at risk recognized by the province, only four are legally protected under the Wildlife Act (burrowing owl, American white pelican, Vancouver Island marmot and sea otter).*

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[2] Kehoe et al. (2018) Prioritizing recovery funding to maximize conservation of endangered species. Conservation Letters, 11, e12604.

[3] Carwardine et al. (2018) Prioritizing recovery funding to maximize conservation of endangered species. Conservation Letters, 11(6), e12604. https://doi.org/10.1111/conl.12604

[4] Otto, S et al. (November 16, 2020) [Letter from scientists to Premier John Horgan regarding legislation and action to protect biodiversity in British Columbia]. Retrieved from: https://www.sfu.ca/~amooers/scientists4species/HorganLetter16Nov2020.pdf

Other provisions of the BC Wildlife Act, including the prohibition against the direct killing of endangered species, have not been enforced. As one example, over 19,000 cubic metres of the endangered whitebark pine have been harvested in BC without penalty."[5]

The outlook for many species in BC remains dire. As the most biodiverse Canadian jurisdiction, BC is also home to the highest number of species-at-risk in Canada.[6] Across Canada, 80% of SARA-listed species that have been re-evaluated by COSEWIC face the same or higher risk of extinction as when they were first listed.[7] Even worse, when improvements were noted, many of these derived from new scientific information rather than genuine reductions in risk.[8]

Recommendation 2: While BC should aim for a biodiversity framework that benefits multiple species and entire ecosystems, one key metric must be to improve the status of those species that have declined due to human activities. The framework should be explicit that BC will take an ecosystem-based approach *in addition* to legal protection for individual endangered species, rather than as a replacement for it. Some of us have outlined recommendations for enacting a made-for-BC law that protects species-at-risk by prioritizing actions that benefit multiple species.[9] We urge the government to consider and commit to a strong species-at-risk and biodiversity law that ensures that the natural world we pass on to future generations is as nurturing, inspiring, and healing as when we were born. This is a commitment made by multiple provincial governments dating back to the 1990s, and it is time to finally move it forward, in line with UNDRIP, as committed to in the Tripartite Framework Agreement on Nature Conservation signed in November.[10]

Concern 3: While calling for a "transformational shift" away from "a land management system that prioritizes resource extraction", the framework does not specify how and to what extent this shift will be accomplished.

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[5] Otto, S et al. (November 16, 2020) [Letter from scientists to Premier John Horgan regarding legislation and action to protect biodiversity in British Columbia]. Retrieved from: https://www.sfu.ca/~amooers/scientists4species/HorganLetter16Nov2020.pdf

[6] Wilderness Committee and Sierra Club BC (November 9, 2022) Report brief: Species at risk recovery in BC. Retrieved January 22, 2024, from https://www.wildernesscommittee.org/publications/report-brief-species-risk-recovery-bc

[7] Government of Canada (2023, December 14) Changes in the status of wildlife species at risk. https://www.canada.ca/en/environment-climate-change/services/environmental-indicators/changes-status-wildlife-species-risk.html

[8] McKee and Findlay, pers. comm.

[9] Westwood, A.R., Otto, S.P., Mooers, A., Darimont, C., Hodges, K.E., Johnson, C., Starzomski, B.M., Burton, C., Chan, K., Festa-Bianchet, M., Fluker, S., Gulati, S., Jacob, A.L., Kraus, D., Martin, T., Palen, W.J., Reynolds, J.D., Whitton, J. (2018) Protecting biodiversity in British Columbia: Recommendations for an endangered species law in B.C. from a species at risk expert panel [eport prepared for the B.C. Ministry of Environment and Climate Change Strategy (retrieved from www.scientists-4-species.org]; Westwood, A. R., Otto, S. P., Mooers, A., Darimont, C., Hodges, K. E., Johnson, C., Starzomski, B. M., Burton, C., Chan, K. M. A., Festa-Bianchet, M., Fluker, S., Gulati, S., Jacob, A. L., Kraus, D., Martin, T. G., Palen, W. J., Reynolds, J. D., & Whitton, J. (2019) Protecting biodiversity in British Columbia: Recommendations for developing species at risk legislation. FACETS, 4(1), 136–160. https://doi.org/10.1139/facets-2018-0042

[10] Government of Canada, British Columbia and the First Nations Leadership Council sign a historic tripartite nature conservation framework agreement (2023) UBCIC. Retrieved January 22, 2024, from https://www.ubcic.bc.ca/government_of_canada_bc_and_flnc_sign_historic_tripartite_nature_conservation_framework_agreement

Recommendation 3: We fully agree that a meaningful approach to biodiversity conservation must include limits on the resource extraction that drive biodiversity loss and ecosystem degradation. Elaborating on how resource extraction practices will change or be constrained will be paramount, particularly given the province's historical track record on these matters. With so much of provincial crown land already linked to mining and forestry tenures, for example, a plan to rollback the pace and scale of exploitative land use will be necessary to create the paradigm shift described. We recognize and applaud the recent change to B.C.'s Forest Range and Practices Act that removes the clause requiring that forest planning could include other values such as biodiversity and ecosystem health **only if doing so did not "unduly reduce the supply of timber from British Columbia's forests.**" Removing this clause was a necessary step towards the transformational shift outlined in the Framework.[11] Similarly, it is critical to adopt existing biodiversity-oriented solutions for how agriculture can be conducted in a less exploitative and more sustainable manner (i.e., based on regenerating ecological interactions and environmental functions), with fewer concomitant environmental harms from pollution, greenhouse gas emissions and land conversion. We ask that the government commit to:

- Avoid actions by the Province of British Columbia that would further impact or degrade natural environments (e.g. old growth forests, undammed rivers, undredged estuaries and mature second growth forests), while respecting the rights of First Nations to determine the uses of these lands and waters. Further, protect these critical ecosystems whenever possible through joint-decision making processes with First Nations.
- Allocate funds to buy back rights to timber or other resources currently held by licensees and tenure holders to prevent further degradation of natural landscapes
- Facilitate the transfer of high biodiversity value lands to Indigenous communities and provide financial support to these communities to steward them for non-timber products and regenerative forestry
- Identify harmful subsidies in primary sectors driving biodiversity loss (forestry, oil and gas, mining, monoculture agriculture) and set timelines for their phaseout
- Enact stronger pesticide regulation (at the municipal, provincial and federal level) that explicitly requires consideration of non-target organisms and species-at-risk[12] and provide incentives and funding to support alternative practices such as integrated pest management strategies
- Increase protection of waterways adjacent to agricultural lands through riparian buffers and incentivize adoption of science-based farming practices known to enhance agricultural sustainability while supporting biodiversity within and adjacent to agriculture (e.g., cover-cropping, complex rotations, perennials integration, silvopasture)

Finally, we celebrate the commitment to "co-development and implementation of new policies, legislation, and strategies" with First Nations. This is a long overdue and much needed transition in

[11] Yunker , Z. (2023, February 17). BC's New Forest Rules: A Small Word Change May Be Big for Saving Trees [Review of BC's New Forest Rules: A Small Word Change May Be Big for Saving Trees]. The Tyee. https://thetyee.ca/News/2023/02/17/BC-Forest-Health-Industry-Needs/

[12] Sargent, R. D., Carrillo, J., & Kremen, C. (2023) Common pesticides disrupt critical ecological interactions. Trends in Ecology & Evolution, 38(3), 207–210. https://doi.org/10.1016/j.tree.2022.12.002.

vision for the province's land use. We urge the province to make clear how the working relationship will change with First Nations so that a "commitment to consult" becomes an obligation to work together and a meaningful departure from a history of overruling First Nations in land, water, and ecosystem management. We echo First Nations organizations who call for the following steps to move towards reconciliation in stewarding the lands and waters of BC:

- While working to co-develop legislation and policies, embrace a precautionary approach, as was recently done in the case of open net pen fish farms in the Discovery Islands of BC.[13]
- Respect the right of First Nations to free, prior and informed consent regarding activities in their traditional territories, which requires meaningful inclusion in decisions in each place and context. We highlight recent calls by the First Nations Leadership Council for a moratorium on placer mining[14] and by the Union of BC Indian Chiefs to protect Northern Spotted Owl habitat from logging.[15]
- We also encourage the province to specify explicitly the "consistent capacity funding for Indigenous communities" and make these financial supports available for co-development to become a reality.

OVERALL:

British Columbia's natural environment holds incredible ecological and cultural value and thus our joint responsibility for protecting it is immense. It is a bold and necessary move for British Columbia to undergo a "transformational shift from a land management system that prioritizes resource extraction (subject to constraints) to a future that is proactive, prioritizes the conservation and management of ecosystem health and biodiversity, and is implemented jointly with title and rights holders." To sustain the natural richness of British Columbia for future generations, we must work together to ensure that concrete actions to protect biodiversity and ecosystem health in the province soon follow. We applaud the desire to undertake this transformation and offer our assistance in achieving the objectives set out by this draft framework.

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[13] First nations coalition supports minister's decision to close open net-pen fish farms in the discovery islands. (2023). UBCIC. Retrieved January 22, 2024, from https://www.ubcic.bc.ca/first_nations_coalition_supports_ministers_decision_close_open_net_pen_fish_farms_discovery_islands

[14] BCFNEMC and FNLC call for moratorium on placer mining in British Columbia. (August 28, 2023) UBCIC. Retrieved January 23, 2024, from https://www.ubcic.bc.ca/bcfnemc_and_fnlc_call_for_moratorium_on_placer_mining_in_british_columbia

[15] UBCIC calls on Canada and the province to take First Nations lead in northern spotted owl protection. (October 23, 2023) UBCIC. Retrieved January 23, 2024, from https://www.ubcic.bc.ca/ubcic_calls_on_canada_and_the_province_to_take_first_nations_lead_in_northern_spotted_owl_protection

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