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November 6, 2019

Re: Regional Assessment of Offshore Oil and Gas Exploratory Drilling East of Newfoundland and Labrador Input on draft literature review

We would like to submit our input and recommendations of the Regional Assessment for the Newfoundland and Labrador Offshore Study Area draft literature review. Our review of the documents was focused on those modules relating to wildlife and ecosystem impacts of the proposed development. As the Balaena Institute for Cetacean Conservation Studies (BICCS) is a small incorporated society focussed on marine mammal science, research and conservation, we have targeted our engagement in the Regional Assessment as it relates to the impacts on endangered marine mammal species, other sensitive marine wildlife and their habitats.

As academic researchers, we have limited capacity to comment on the full breadth of the process and policy implications of conducting the Regional Assessment. However, in our limited participation and experience, we share many of the concerns raised by other participant groups that have been shared with us. These include the need for more transparent and independent peer review of mitigation, a clear process for the consideration of cumulative effects, a policy assessment of the implications of expanding oil and gas development into Areas Beyond National Jurisdiction, and a commitment to respect existing marine fisheries closures, with appropriate buffer zones from development for effective biodiversity protection.

The main text of our review was provided by a leading expert on the impacts of noise and seismic related activities, Dr. Lindy Weilgart. While many of her comments relate to the impacts of seismic exploration and noise, this cannot from our perspective be considered separately or unrelated to the development of 100 wells or the cumulative effects of such an unprecedented level of development. Further the noise considerations with the scope and scale of this proposed development, as characterized in the literature review are in many cases analogous in terms of frequency range and response given what is known about noise impacts on marine life and ecosystems.

Our core recommendation is that contrary to the superficial and selective review of the literature drafted for the regional assessment, there is *no* clear scientific evidence that oil and gas development causes no harm, and in fact there is mounting evidence that particularly the noise associated with these activities does in many cases disturb, disrupt and harm marine wildlife. The only appropriate mitigation given our current state of knowledge is a precautionary approach. As field scientists who have worked in the region for many years, we note that these remote areas currently on the slate for development contain some of the richest biodiversity of marine mammal species of any we have seen. With scant knowledge of the ecosystem baseline or the impacts, proposed developments in this area should be held to a higher standard before being allowed to proceed.

Our recommendations can be summarized by Dr. Weilgart, “One of the difficulties in responsibly managing ocean noise pollution is the challenge in detecting the ecosystem and population consequences of underwater noise. There is sufficient evidence that impacts are occurring in at least 130 marine species (around 100 fish and invertebrate species alone), but being able to ascertain exactly to what degree, in which contexts, for which species, and at what sound types and levels these impacts occur remains imprecise. Because of the large natural variability in ocean systems (e.g. in currents, prey availability, chemistry), detecting human-caused changes in ecosystems and populations in the first place is a daunting task. The ocean is not a controlled laboratory. On top of that, isolating changes that are solely due to ocean noise pollution and not other human-caused stressors such as climate change, overfishing, and toxins, is formidable. As such, it makes more sense to take a more precautionary approach, one of simply turning down the volume of ocean noise pollution. Especially in cases where there are ancillary benefits of quieting, such as reducing greenhouse gas emissions by finding the overlap between greater efficiency and less underwater noise in shipping, and by encouraging technological innovation through quieter technological alternatives to airguns and by quieting pile driving, our efforts are likely more effective using this approach.”

Countless studies are not required to understand the precise point where noise is just tolerable, or exactly how stressed and disturbed we can make wildlife before needing to take remedial action—we can simply remove and quiet the noise, as much and wherever it is possible and safe to do so.

We appreciate the opportunity to comment on this draft product, look forward to seeing how our comments will be incorporated and considered by the Panel and CEAA staff.

Sincerely,
<original signed by>

Dr. Hal Whitehead
Director, BICCS