

<b>REGIONAL ASSESSMENT OF OFFSHORE OIL AND GAS EXPLORATORY DRILLING EAST OF NEWFOUNDLAND AND LABRADOR</b> <b>Technical Advisory Group (TAG) Sessions, September 2019: <i>Marine and Migratory Birds</i></b> <b>Engagement Activity / Meeting Notes</b> <b>Finalized: October 28, 2019</b>		
<b>Date and Time / Duration</b>	Tuesday, September 10, 2019 9:30 a.m. – 12:30 p.m. NDT	
<b>Location</b>	Conference Centre, Memorial University's Signal Hill Campus, St. John's, NL	
<b>Organization(s)</b>	<ul style="list-style-type: none"> <li>• Canada-Nova Scotia Offshore Petroleum Board (C-NSOPB)</li> <li>• Canadian Association of Petroleum Producers (CAPP)</li> <li>• Chevron</li> <li>• Edgewise Environmental / Newfoundland and Labrador Environmental Industry Association (NEIA)</li> <li>• Environment and Climate Change Canada (ECCC)</li> <li>• Husky Energy</li> <li>• Memorial University (MUN)</li> <li>• Mi'gmawe'l Tplu'taqnn Incorporated (MTI)</li> <li>• Mi'kmaw Conservation Group</li> <li>• Newfoundland and Labrador Wildlife Foundation (NLWF)</li> <li>• Northern Peninsula Mi'kmaq Band</li> <li>• Nunatisavut Government</li> <li>• NunatuKavut Community Council (NCC)</li> <li>• Sierra Club of Canada Foundation</li> </ul>	
<b>Participants (External)</b>	<u>In-person:</u> Steve Bettles, Husky Energy Andrew Bouzan, NLWF Marcy Cloud, MTI Dr. Michelle Fitzsimmons, ECCC Dr. April Hedd, ECCC Tony Lang, LGL for CAPP Bruce MacTavish, LGL for Chevron Dr. Bill Montevecchi, MUN Ashley Noseworthy, Edgewise/NEIA Dr. Sabina Wilhelm, ECCC	<u>Video/teleconference:</u> Stephanie Avery-Gomm, ECCC Joseph Beland, Mi'kmaq Conservation Group Dean Coates, Northern Peninsula Mi'kmaq Band Gretchen Fitzgerald, Sierra Club of Canada Jennifer Matthews, CAPP Stanley Oliver, NCC George Russell, NCC Claude Sheppard, Nunatsiavut Government Becky Whittam, ECCC Sarah Wong, ECCC Laura Wright, C-NSOPB
<b>Participants (Internal)</b>	<u>Committee Members:</u> Gerald Anderson Garth Bangay Wes Foote Maureen Murphy Rustad Keith Storey	<u>Regional Assessment Task Team:</u> <i>Impact Assessment Agency of Canada</i> Virginia Crawford Brent Keeping Erin Stapleton
<b>Record of Discussion</b>	<b>Key information and datasets</b> <ol style="list-style-type: none"> <li>1. ECCC has provided several datasets to the Committee for use in the Regional Assessment, including breeding colonies and tracking data.</li> <li>2. ECCC has predictive density modelling and maps for species for summer/fall, but this won't necessarily be available in the near-term.</li> </ol>	

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3. It was suggested that researchers, non-governmental organizations, etc. may have seabird tracking data that are not necessarily publicly-available but that they are willing to share with the Committee for use in the Regional Assessment, and that the Committee should inquire with these organizations.
4. Some data is lacking in this particular study area but the Committee can look at other national and international areas for additional information that is lacking.
5. A key data gap surrounds Leach's storm petrel, which are declining throughout Atlantic Canada, and are attracted to light. This one item could be an extensive discussion in and of itself. We are just beginning to understand the species' spatial distribution, and need to better understand fine-scale behavioural interactions with platforms/offshore structures (e.g., juveniles being more vulnerable to light).
6. Collecting more data on this topic is critical. There is a lack of data/understanding and there needs to be more effort to collect and quantify interactions (e.g., landings, strandings, deaths, etc.), and to do so independently of the operator.
7. To be able to quantify bird mortality (and response to mitigation), we need to first establish the baseline to determine location, timing, and frequency, then there needs to be a research program. Independent observer should be a priority to help address these gaps.
8. Offshore oil and gas has added significant amount of light to the Grand Banks – 30 years ago, it was dark. ECCC recommended a paper and online map for the Committee to review to better understand light pollution.
9. There was a workshop last February in Norway about birds and offshore platforms. There should be a final report from that workshop that the Committee should obtain and consider in the Regional Assessment.
10. There is a lack of data on how many bird deaths result from oil spills. There is concern that spills are unreported/under-reported.
11. The Committee should consider Transport Canada's ISTOP (Integrated Satellite Tracking of Pollution) as a data source, particularly in terms of cumulative effects.
12. In the event of an oil spill, ECCC has existing surveys in the Eastern Canada Seabirds at Sea (ECSAS) database and can determine abundance and distribution of birds. Data is also obtained from aerial surveys and vessels. ECCC staff are working on a model to estimate impact.
13. It was noted that questions around data gaps/unknowns need to be answered through research and that the results of that research can inform regulatory decision-making. It was suggested that ESRF was the best opportunity for all interested parties to work together on this issue.

**Important and/or sensitive aspects of marine and migratory birds**

1. September –October is a key time for movement of birds along the coast, so lighting at this time is of particular concern.

**Potential interactions between offshore exploratory drilling and marine and migratory birds**

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Light

1. The underlying issue of why birds are attracted to light is unknown – we do not have a complete understanding of the interactions (e.g., Leach’s storm petrels and light).
2. There is evidence that light is a problem (i.e., cause of mortality) for 25 years – we can and must do something about the unnecessary light.

Oil spills

3. Though the focus is on light, there is also concern regarding impact of oil spills on marine and migratory birds.
4. There are both spatial and temporal components to this issue and there is an opportunity to drawn on lessons learned from past spills.
5. Some species are more susceptible to oil spills (diving versus non-diving species).

**Existing and potential mitigation and follow-up requirements**

1. It was advised that the Committee take a precautionary approach. The unknowns/critical data gaps should not prevent the Committee from putting forth recommendations to help decrease the impact of drilling on marine and migratory birds.

Light

2. Mitigation is lacking when it comes to marine and migratory birds.
3. Knowing September to October is a key time period for bird movement along coast, reducing/avoiding flaring would help. An offshore operator noted that there are certain safety aspect/concerns around lighting/flaring.
4. We have known light is a problem for 25 years and nothing has been done. There are proactive, straight-forward actions that we can take. Oil and gas operators can take voluntary actions (e.g., turning off lights/pulling down blinds), but it is incumbent upon the regulator to make it happen. Stronger regulation is needed.
5. There are simple things that can be done (e.g., turning off unnecessary lights, automated on/off, no skyward-projecting light) but the onus is on the operator to say what they can do to reduce artificial light (i.e., what would be a safety risk, what would be feasible).
6. While offshore rigs and associated vessels are not the only sources of light (there are also tankers, shipping, etc.), the oil and gas industry can do something to help the situation.
7. At the Norway workshop, there were discussions on making search methods and protocols more rigorous.

Spills

8. Reporting - Operators are legally required to report spills of any volume, and have procedures in place.
9. Flyovers - Regular flyovers (as occurred in the 90s and early 2000s) would serve as an independent check for spills. It was noted that the ISTOP system (via satellite) was implemented to provide this oversight, that the C-NLOPB also monitors for spills (and notifies operators of any surface anomalies), and that Transport

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Canada conduct flyovers as well (where surface anomaly detected). While participants were unsure of exact frequency, flyovers occur several times a week and crew onboard is trained in spill detection.

Independent Observers

10. It was explained that currently, the observer is not dedicated full-time to environmental monitoring (stationary surveys 3 times a day) and has other responsibilities to fulfill (i.e., safety).
11. There should be full-time, independent observers dedicated completely to environmental monitoring, including bird mortality and spills.
12. An independent observer would provide non-biased oversight, confirm regulatory compliance, evaluate effectiveness of mitigation measures and ensure public trust.
13. Requiring that operators designate a Person-on-Board (POB) be given to an independent dedicated, qualified environmental observer biologist with safety training to systematically search the vessels for stranded birds at dawn, to monitor for birds on the water according to the ECCC standardized protocol, and to report on accidental or operational releases will help to understand bird interactions with offshore platforms and to evaluate the effectiveness of mitigation measures.
14. ECCC stated they are not getting the data they need with the current observer role, and said having a full-time observer would be improve data/information-gathering.
15. It was asked what the barrier is to having a full-time, independent observer and having no room on board was cited as a reason.
16. It was noted that observers do not have access to certain areas of the rig for safety reasons, which limits data collection (but data can be extrapolated).

**Other topics**

GIS platform

1. The Committee was asked what the timeframe was for getting data into the GIS system. The Committee replied that data is continuously being added, and will continue to be added/updated even after the Regional Assessment report is released.
2. It was suggested that as data is incorporated into, and updated, in the GIS platform over time, "hotspots" for marine and migratory birds may be identified, and data gaps will also become apparent. ECCC hopes that the tool will be useful in the quantification of risk.
3. Data gets old quickly, so it is imperative that the Committee make recommendations around the updating/maintenance of the GIS platform once the Regional Assessment is complete.

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	<ol style="list-style-type: none"> <li>4. It was confirmed that metadata would be included in the GIS system, and the Committee said they are looking to ECCC and others to say what they would like to see in the metadata.</li> <li>5. The Committee acknowledged that new uses for the tool will likely be found by other groups or agencies.</li> <li>6. It was asked if the GIS tool will be able to determine specific impact to marine and migratory birds (e.g., drilling activity in location X would kill Y storm petrels). The response was that we just don't know enough/have enough data to be able to provide that level of analysis.</li> </ol> <p><u>Regional Assessment scope and timeline</u></p> <ol style="list-style-type: none"> <li>1. The Committee was asked what the end product of Regional Assessment will be, and the Committee replied that the exact end product(s) are still unknown, but will be a report <i>and</i> the GIS platform.</li> <li>2. There are concerns regarding the short timeline and how that may affect the quality/effectiveness/outcomes of the Regional Assessment, and the Committee was asked if they would be requesting a timeline extension. The Committee replied that doing it right was more important to them than the timeline, and that they haven't made an extension request yet but have not ruled it out.</li> </ol> <p><u>Regulation of the offshore</u></p> <ol style="list-style-type: none"> <li>1. There was a general concern that the C-NLOPB was not in attendance at the sessions, as the board is the body that makes/enforces these regulations/mitigations.</li> <li>2. The Committee has an opportunity here to make recommendations that will require future offshore oil and gas exploration drilling projects to implement mitigation measures that will most likely reduce the impact from such things as lighting and accidental and operational releases on marine birds (e.g., Leach's Storm petrels).</li> <li>3. There is an opportunity to set a new standard and be proactive, to be seen as leaders in environmental monitoring.</li> </ol>
<p><b>Follow-up / Action Items</b></p>	<ol style="list-style-type: none"> <li>1. Committee to obtain copy of final report/summaries/presentations from workshop in Norway on birds and offshore platforms (ECCC and LGL representatives were at the workshop and may be able to provide the Committee with some information; CAPP offered to follow-up with Equinor for the report).</li> <li>2. ECCC to provide light pollution reference to the Committee.</li> <li>3. CAPP to bring back comments on Independent Observers to their Environmental Committee.</li> </ol>
<p><b>Prepared By:</b></p>	<p>Erin Stapleton, Virginia Crawford</p>