



Fisheries and Oceans
Canada

Pêches et Océans
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Your File Votre référence

August 14, 2015

Our File Notre référence
15-HNFL-00023

Darren Hicks
Environmental Analyst
Canada-Newfoundland and Labrador Offshore Petroleum Board
140 Water St., 4th Floor
St. John's, NL
A1C 6H6

Dear Mr. Hicks:

Re: Review of ExxonMobil Canada Ltd.'s Eastern Newfoundland Offshore Geophysical, Geochemical, Environmental and Geotechnical Program, 2015-2024 Environmental Assessment.

As requested, Fisheries and Oceans Canada (DFO) has reviewed the document "*ExxonMobil Canada Ltd. Eastern Newfoundland Offshore Geophysical, Geochemical, Environmental and Geotechnical program, 2015 to 2024 Environmental Assessment*" dated July 2015 and offer the following comments:

Figure 1.1 (page 2), Figure 2.1 (page 10) and Figure 3.2 (page 28)

- While these figures (and other similar figures in the EA) show a polygon labelled "Sectors" located immediately outside the NW boundary of the Project Area it is not clear what this area represents as it has not been defined or referenced within the EA. This should be clarified and an indication provided as to the nature of this area and its relationship to the activities undergoing EA.

Sections 2.4.1.1 2D Seismic Surveys and Section 2.4.1.2 3D Seismic Surveys (Page 12 and 13)

- The sound levels anticipated for both 2D and 3D seismic surveys are presented in terms of volume 3000 – 5000 in³, pressure 1800 – 2000 psi and peak to peak pressure 100 – 180 bar-meters. It is not clear what these values represent in terms of decibels (dB). This should be clarified.

Section 4.2.1.1 Approach, Key Data Sources and Administrative Considerations (page 53)

- Since the proposed exploration program is planned to continue into 2024 and the Environmental Assessment (EA) report utilizes commercial fishing data up to 2013, it would be prudent to periodically revisit the potential impacts on commercial fisheries if fishing activity or the planned exploration survey activities vary significantly from that described in this EA report.

Section 4.2.1.6 Marine Fish – Fish Species at Risk and Otherwise of Special Conservation Concern Table 4.6 (page 112-113)

- The information in the "*Population*" column refers to the species range (*i.e.* Atlantic Ocean (AO) and Newfoundland and Labrador (NL)) and not the applicable population

name. The heading should be changed to reflect the information in the column, or the information in the column changed.

- When referring to SARA listed or COSEWIC assessed species it is important to include the applicable population names. For example the population names for the following species are:
 - White shark - Atlantic population
 - Smooth Skate - Funk Island Deep population
 - Acadian Redfish - Atlantic population
 - Deepwater Redfish - Northern population
 - Short fin Mako Shark - Atlantic population
 - Spiny Dogfish - Atlantic population
- Spiny dogfish is assessed by COSEWIC as “*Special Concern*”, and not as “*Threatened*”, this should be corrected.

Section 4.2.3.1 Mysticetes Table 4.14 (page 171)

- There is no designated population name for North Atlantic Right Whale; the population name “*Western North Atlantic*” should be removed.

Section 4.2.3.2 Odontocetes Table 4.15 (page 173-179)

- There is no population name designated for Sowerby’s Beaked Whale; the population name “*Atlantic Ocean*” should be removed.
- The population name for Harbour Porpoise is Northwest Atlantic population, this should be corrected.

Section 4.2.3.5. Species at Risk and Otherwise of Special Conservation Concern Table 4.18 (page 186)

- The population name for Harbour Porpoise - Northwest Atlantic population, should be included.

Section 4.2.3.6 Key Areas and Times for Marine Mammals and Sea Turtles (page 188)

- This section should also make reference to Figure 4.68 Protected and Special Areas (page 195) as it depicts areas that are described in this section - see Table 4.19.

Section 4.3.1.6 Recreational Fishing and Other Activities (page 242)

- Aboriginal communal commercial fishing licenses for both the Qalipu First Nation Band, (shrimp, snow crab and groundfish in NAFO 3K) and Innu Nation (groundfish in NAFO 3LMNO, shrimp in NAFO 3K and 3L) are factored into the Commercial Fishery statistics. As such the last sentence of this section i.e. “*There are no known Aboriginal interests or associated resource use activities...*” should be revised to indicate “*...There are no known aboriginal food, social or ceremonial fishing activities...*”

Section 5.3 Environmental Planning, Management and Mitigation (page 251-254)

- It should be noted (most likely within this Section of the EA report) that the Marine Mammal Regulations (MMR) under the *Fisheries Act* is currently undergoing amendment. While public consultation on proposed amendments have only just recently ended it should be noted that Schedule 11 of the proposed amended MMR provide approach distances for marine mammals based on species, vehicle (vessel, aircraft, etc), area and timing. Given that the proposed exploration survey is planned to continue into 2024 it is recommended that the proponent be aware of potential implications that may arise if proposed amendments to MMR are accepted during the timeframe covered by the proposed survey program.

Section 5.5.1 Potential Environmental Issues Interactions and Existing Knowledge - Table 5.2 (page 258 – 262)

- As noted earlier in relation to seismic sound levels the EA report should provide an indication of the anticipated and likely level of seismic sound in terms of decibels (dB), especially so since all the information presented in Table 5.2 is relative to seismic sound in terms of dBs. It is not clear how the likely / probable levels of seismic sound during 2D/3D seismic surveys as provided on page 13 relate to, or compare to, the levels presented within Table 5.2 and the subsequent analysis of potential effects of seismic sound. This should be clarified.

Section 5.5.2.1 Vessel and Equipment Use (Last sentence 1st paragraph Page 264) and Section 5.9.2 Environmental Effects Assessment (Last sentence 1st paragraph page 290)

- Both of these sentences note that *“Prior to undertaking seabed sampling in work areas that are protected and/or have been identified as having a high probability of occurrence of corals and sponges (see Section 4.2) a representative sea bed characterization (reconnaissance) drop camera/video system survey transect will be acquired to investigate the potential presence of these sensitive benthic organisms”*. There is no indication what is proposed to happen if noted reconnaissance surveys confirm that such sensitive benthic organisms are present – would the area be sampled regardless or would the survey move to an adjacent area with no such organisms? This should be clarified.

Section 5.12 Environmental Monitoring and Follow-up (Page 300)

- The last sentence of the 1st paragraph notes that the implementation and effectiveness (of the various mitigations committed to) will be *“...directed, managed and tracked in accordance with ExxonMobil’s existing policies and procedures...”*. It is assumed that this includes audits and monitoring reports describing compliance with, and the effectiveness of, the various mitigations committed to within the EA (e.g. CNLOPB Guidelines, Statement of Canadian Practice, etc...). This should be clarified and copies of existing policies and procedures provided – e.g. as an appendix to the EA.
- 2nd Paragraph – given that 2D / 3D seismic surveys will occur during periods of darkness it is felt that the noted *“..operational monitoring program for marine mammals...”* should / will describe measures to allow monitoring of marine mammals and sea turtles within the safety zone during periods of darkness and/or reduced visibility and that it would be adaptive from one year, or one survey, to another. This should be clarified and details of noted operational monitoring programs provided for review and information – e.g. as an appendix to this EA and subsequent EA updates.

Thank you for providing the opportunity to review and comment on this EA document. Should you have any questions or comments regarding the above please feel to contact me [REDACTED]

Sincerely,

[REDACTED]
Senior Biologist– Marine, Coastal, Oil and Gas Development
Fisheries Protection Program
Ecosystems Management Branch