November 16, 2020

Jolie Harrison, Chief
Permits and Conservation Division
Office of Protected Resources
National Marine Fisheries Service
1315 East West Highway
Silver Springs, MD 20910

VIA ELECTRONIC MAIL to: ITP.Davis@noaa.gov

Re: Incidental Harassment Authorization related to Construction of the Alaska LNG Project in Prudhoe Bay, Alaska

Dear Ms. Harrison,

The Alaska Eskimo Whaling Commission (AEWC) appreciates the opportunity to submit comments to the National Marine Fisheries Service (NMFS) on the above-referenced project and NMFS’s efforts in reopening the comment period.1 The AEWC previously submitted comments for the record during the original comment period on August 17, 2020, incorporates those comments by reference, and supplements them here.

As we stated in our earlier comments, the AEWC recognizes that the Alaska LNG Project is important for the State of Alaska, the nation, and our local communities. However, we remain concerned that the construction at West Dock could negatively impact the bowhead whale migration and the bowhead harvest, which provides great nutritional and cultural benefits as the meat and muktuk are shared with our communities on the North Slope and with Native peoples in other areas of Alaska. These impacts need to be adequately mitigated through the IHA and through continued dialogue with the AEWC.

1. The AEWC Reiterates its Concerns about Mid-Beaufort Sea Pile Driving

---


Under the current proposal, the Alaska Gasline Development Corporation (AGDC) seeks an Incidental Harassment Authorization (IHA) for the Alaska LNG Project, which would require construction at West Dock. This construction includes pile driving up to 24 hours per day six-days/week for approximately 123 days during the July through October open water (i.e., ice-free) season. The AEWC supports and appreciates the proposed shutdown during the harvest at Nuiqsut, which typically occurs August 25th to September 15th. This is an appropriate mitigation measure for protection of the important harvest taking place at nearby Cross Island.

However, there is no information in the record demonstrating that pile driving in the mid-Beaufort Sea, even in shallow water, will not disturb the fall bowhead whale migration as it travels west past the project area toward Utqiagvik. As you know, in 2019, for unknown reasons, the migration was not present in the coastal waters off of Utqiagvik during the time period when our Whaling Captains normally see and harvest the whales. The hunters were only able to harvest one whale in mid-November. Typically, Utqiagvik lands 10 to 15 whales in the fall. It is not clear what caused the shift in distribution in 2019. We were fortunate to have a good harvest at Utqiagvik in 2020; however, the Whaling Captains voted to begin hunting in late August. In recent years, Utqiagvik has opened the season in late September or early October. This year, the first fall whale was landed on 25 August, and most of the available strikes, 16, were used by mid-September. The Barrow Whaling Captains’ Association then decided to take a hiatus in hunting and used the last few strikes in mid-October, with their last whale landed on 12 October.

The early fall harvest in 2020 and the variation in harvest outcomes between 2019 and 2020 are only two examples of the unprecedented changes we are seeing in our marine ecosystem, including in the behavior of our resources. Given the unpredictability of our times, we are being forced to adapt our hunting practices and to become more flexible in our planning. As a result, harvesting periods and established time-area closures may vary in coming years.

As the changes we are experiencing continue to unfold, it is essential that everyone – hunters, developers, and regulators – increase our vigilance in monitoring changes to the whales’ migratory behavior. We have no precedent to inform us as we attempt to judge whether, or to what extent, the changing ecosystem, including prey distributions, water temperatures, and potentially even seafloor conditions, might influence the impacts and responses of the whales to development activities.

We know, through our hunters’ observations and western science research, that under normal conditions bowhead whales are very sensitive to disturbance from anthropogenic activities, including relatively quiet anthropogenic sounds that may be below ambient levels. We also know that the waters around West Dock are used by westward-migrating bowhead whales for resting and feeding. However, we do not know whether, given the whales’ sensitivity to anthropogenic sounds and vibrations in the ocean, there is potential for deflection of the migration and other behavioral changes as the migration passes the proposed project. Unfortunately, based on the current record, the AEWC and NMFS cannot reasonably conclude that the construction activity will not have an impact on our critical fall bowhead whale subsistence harvest at Utqiagvik.
Suspension of pile driving activities until Utqiaġvik completes its fall harvest would help to ensure adequate mitigation of impacts from that sound source. However, the AEWC recognizes that because the timing of the migration and completion of the harvest are difficult to predict, a shutdown throughout this period could be prohibitive from the perspective of the operator. Therefore, because the risk of interference will be borne by the Utqiaġvik Whaling Captains should the project go forward, the AEWC requests that NMFS direct AGDC to meet directly with the Whaling Captains’ Association and to continue meeting with the AEWC. The AEWC also requests that NMFS reiterate the requirement for signing the Conflict Avoidance Agreement as the Federal Energy Regulatory Commission has done in its Order Granting Authorization of the Project.³

3. Impacts from Other Noise

The IHA application focuses only on pile driving, yet the Project will include screeding, gravel deposits and vessel traffic. More consideration should be given to potential impacts from these sources and to NMFS’s decision to exclude these items from further analysis.⁴

It is unclear if there has been discussion of the cumulative impacts from these sources. The additional potential impacts, as well as the Proposed Level A Harassment, should have been outlined in analysis and in the Plan of Cooperation, as well as and in the meetings with the potentially affected communities.

4. Modeling, Mitigation and Monitoring

While NMFS is not authorizing Level A Harassment of bowhead whales through this IHA, AGDC did apply for Level A Harassment.⁵ Because Level A Take of bowhead whales would be a serious matter from a regulatory and co-management perspective, it would be helpful to see a well-reasoned analysis from NMFS to support its conclusion that Level A Harassment will not occur, particularly given the questions raised by the Peer Review Panel⁶ and the Marine Mammal Commission (MMC).⁷

Further, the IHA must prescribe “means of effecting the least practicable adverse impact’ on the affected species or stocks and their habitat, paying particular attention to rookeries, mating

---

⁴ See, e.g., 85 Fed. Reg. at 43384 (“NMFS does not expect screeding to result in take of marine mammals, given that it is a continuous noise source comparable to other general construction activities. The Biological Opinion issued by NMFS’ Alaska Regional Office conservatively requires AGDC to shut down at 215 m during screeding operations. AGDC has not requested, and NMFS does not propose to authorize take incidental to the proposed screeding.”); 85 Fed. Reg. at 43386 (“does not expect take to occur associated with ordinary vessel transit, and therefore the use of sealifts is not discussed further”).
⁵ We note that NMFS is still authorizing Level A Harassment of ice seals.
⁷ Letter from MMC to Jolie Harrison, August 14, 2020, available at https://www.fisheries.noaa.gov/webdam/download/110277644
grounds, and areas of similar significance, and on the availability of the species or stocks for
taking for certain subsistence uses (referred to in shorthand as ‘mitigation’).\footnote{Fed Reg 43382.} NMFS must
ensure any proposed mitigation is sufficiently protective.

We support the suggestions provided by the North Slope Borough and Peer Review Panel for
mitigation and monitoring. Any efforts to dampen the sound would help to shrink the projected
ensonified zones and mitigate the impacts. Reducing the area would also help alleviate the
cconcerns raised regarding the ability to monitor the ensonified area. The AEWC supports the
recommendations from the Peer Review Panel and the North Slope Borough regarding additional
hydrophones and other requirements to help assist the Protected Species Observers in spotting
bowhead whales. We also invite AGDC and NMFS to investigate other methods to mitigate
these impacts.

5. **Peer review process**

An important component of the IHA process was the inclusion of the peer review of the
monitoring plan, which the AEWC worked extremely hard to help establish. The peer review
process requirements are outlined in the statute and further delineated in the regulations for the
Arctic.\footnote{MMPA § 101(a)(5)(D)(ii)(III); 50 CFR 216.107 et seq.}

The ultimate purpose for required monitoring, and the review of the proposed monitoring, is to
ensure that the applicant can adequately observe whether species are entering the noise zones for
Level A and Level B, and ultimately to decrease the amount of take that might occur by shutting
down operations as needed, and not beginning operations if marine mammals are within the
zones. Thus, the monitoring program is critical to ensuring that the operator complies with the
overall requirements of the MMPA. The Peer Review Panel raised many questions related to the
size of the ensonified area, the applicant’s ability to adequately monitor the ensonified area, and
the use of sound attenuation devices. NMFS has not adequately addressed the Peer Review
Panel’s comments in developing the Draft IHA and has not adequately responded to the Peer
Review Panel’s findings that many of the applicant’s objectives cannot be reasonably obtained.
This may lead directly to inadequate monitoring and mitigation.

**Conclusion**

The AEWC appreciates the importance of the proposed Alaska LNG Project to the State of
Alaska, to the local communities, and to the global economy. And we appreciate that NMFS
reopened the comment period to allow the AEWC greater opportunity for review of details
related to this project.

Upon review, the AEWC strongly recommends that AGDC personnel meet with the Barrow
Whaling Captains’ Association to collaboratively develop appropriate means of mitigating
potential impacts from the pile driving activity on the fall harvest at Utqiaġvik. In addition, the
AEWC supports the suggestions from the North Slope Borough, the Peer Review Panel, and the
MMC regarding the implementation of sound dampening technologies and additional passive
acoustic monitoring. We also support the adjustments to the monitoring program and proposed mitigation. We encourage NMFS to adopt these recommendations as it revises the Draft IHA.

The AEWC would appreciate the opportunity to work with NMFS and AGDC to seek appropriate solutions to the issues raised here. And we look forward to continued collaboration with AGDC regarding measures needed to ensure potential impacts to the Utqiaġvik harvest are mitigated.

Sincerely,

[Signature]

John Hopson, Jr.
Chairman
Alaska Eskimo Whaling Commission

cc: Mayor Harry K. Brower, Jr.
AEWC Commissioners
Senator Lisa Murkowski
Senator Dan Sullivan
Representative Don Young
November 16, 2020

Jolie Harrison  
Chief Permits and Conservation Division  
Office of Protected Resources  
National Marine Fisheries Service

Submitted by email: ITP.Davis@noaa.gov

Re: North Slope Borough Comments on the Alaska Gasline Development Corporation's Application for an Incidental Harassment Authorization

To Ms. Harrison,

Thank you for the opportunity to comment on the Alaska Gasline Development Corporation’s (AGDC) application for an Incidental Harassment Authorization (IHA), and for the reopening of the comment period to allow adequate time to respond. The North Slope Borough (NSB) is generally supportive of AGDC’s proposed project, which will enhance the ability to develop and transport natural gas resources from North Slope oil and gas fields. While the NSB supports the project, the NSB has some concerns and recommendations for the expansion of West Dock, for improving the mitigation and monitoring related to potential impacts to marine mammals, particularly those that are important for subsistence to help meet the needs of our hunters and communities.

I. The North Slope Borough

The Borough is the recognized unit of local government spanning the North Slope of Alaska, an area covering 89,000 square miles. The Borough’s jurisdiction stretches from the United States-Canadian border across to western Alaska, with a coastline that extends along the Beaufort and Chukchi Seas. The Borough has built and maintains most of the public infrastructure and provides basic services in its eight communities, including education, health and social services, roads, water and sewers, and emergency services.
Over 74 percent of Borough residents are Iñupiat. Our livelihood and future depend on reasonable access to and development of the natural resources of Northern Alaska. For thousands of years, our people have relied on Arctic species for subsistence purposes, and the social fabric of our communities revolves around subsistence traditions. Not surprisingly, we in the Iñupiat community have acquired an unparalleled understanding of these species’ behaviors and habitat needs over these many years.

Given our special relationship with Arctic species, our people have the most direct and current knowledge of species habitat, numbers, health, behavior, and activity on and adjacent to the North Slope. Many of our citizens participate in species conservation efforts, as well as in Arctic circumpolar scientific, cultural and educational initiatives. Further, the Borough, as a municipality, has adopted a Code of Ordinances that explicitly provides for cooperative management of North Slope wildlife resources. The Borough’s Department of Wildlife Management (“DWM”) facilitates sustainable subsistence harvests and monitors the population and health of fish and wildlife species. This is accomplished through regular research, cooperation and collaboration with the Services and the State of Alaska. As a result, the Borough has a significant amount of knowledge and data regarding the existence and location of habitat for Arctic species, which physical and biological features or specific areas are essential to the conservation of the species such that the habitat is critical, and the relevant impacts and consequences of designating particular areas as critical habitat.

II. AGDC’s Proposed Project

AGDC has requested an IHA for construction-related activities to expand the capacity of the West Dock facility in the Prudhoe Bay oilfields. The expansion of this facility is part of an integrated liquefied natural gas project and is designed to widen the existing causeway and to install morning and abutments to accommodate the offloading of material, supplies, and large liquefied natural gas modules essential to the production and sale of liquefied natural gas. The activities are proposed to occur from 1 July 2022 to 30 June 2023. Most of the work is likely to occur during the open water period in 2022, but AGDC is also seeking permission to work during the ice covered period (2022-2023) if they are not able to complete their work in the open water period of 2022. Even though West Dock is located near shore, the driving of sheet piles produces a considerable amount of noise that has the potential to impact marine mammals, including ice seals, beluga whales, and bowhead whales. Unfortunately, the IHA does not address other activities associated with AGDC’s project, such as screeding, gravel dumping, or vessel traffic that could also impact marine mammals. The NSB asks that NMFS encourage organizations to deal with all aspects of a proposed project in future IHAs.

III. Comments on IHA Application

The NSB is supportive of industrial activities that balance the development of resources and protection of subsistence resources to ensure our people meet their nutritional and cultural needs. The North Slope Borough and its residents not only benefit from the financial revenue generated by industry but also continue to rely upon subsistence resources. Balanced development helps
fund State and NSB programs that provide many services for our residents while also ensuring the continued access to subsistence resources that our people have used for millennia. The AGDC’s proposed project is likely to such an example, but some of the mitigation and monitoring aspects need to be strengthened. In order for this balanced development to occur adequately, we need to have (1) quality baseline information about resources, (2) effective mitigation measures, and (3) appropriate monitoring.

IV. NSB’s General Concerns and Recent Events

AGDC’s project has the potential to impact marine mammals that are important for subsistence, especially bowhead whales. The potential impact on ringed and bearded seals is a concern as is the inability of AGDC to effectively monitor the ensonified area. Monitoring the entire area is needed in order to mitigate possible takes and to estimate the actual number of takes relative to those that are permitted.

AGDC’s project is proposed to occur during the open water period while bowheads are migrating west across the Beaufort Sea. The noise likely to be produced by the project has the potential to propagate considerable distances, perhaps as far as the migratory path of bowheads and possibly deflect whales to the north away from their more typical migratory path. Because bowheads are so important to our communities, the potential to deflect them away from traditional harvest areas or change their behavior to become more difficult for our hunters to approach is a great concern.

The consequences of deflection were clearly seen in open water period of 2019. The distribution of bowheads in the Beaufort Sea was substantially different than in a more typical year. Whales were much farther to the north than is typical. While Nuiqsut and Kaktovik were able to land three whales each (which is about normal), hunters at Utqiagvik were only able to land one whale. Typically, Utqiagvik lands 10 to 15 whales in the fall. It is not clear what caused the shift in distribution in 2019. If the cause of the different migration was due to oceanographic or prey shifts, any added industrial affects could have exacerbated the situation even more. That situation in 2019 demonstrates that our communities’ ability to hunt these necessary resources is being challenged by many factors. Thus, it is important that industrial activities are mitigated as much as possible to reduce possible impacts to our hunters’ ability to land whales. Should there be a coincidence of loud industrial activities such as sound propagation from the proposed AGDC work and bowheads being “out of reach” for Utqiagvik whalers, then blame for the deflection—although confounded—would most likely be attributed to AGDC activities.

The most likely impact to ringed and bearded seals is also because of noise from pile driving. However, the risks to seals are probably greater than to whales for several reasons. Seals are more likely to be near the pile driving activities where the noise occurs. Thus, they are more susceptible to receiving sounds that are loud enough and of great enough duration that physical injury, whether temporary or permanent, could occur. If AGDC conducts pile driving activities
during the ice covered season when it would be almost impossible to observe seals under the ice, the risks are even greater. Disturbing or injuring seals could impact subsistence hunting and resources.

On 12 November 2020, the NSB, the AEWC, and the AGDC met telephonically to discuss potential impacts from construction activities to bowheads and hunters. AGDC is aware and attentive to this potential situation of their activities causing impacts to whales and hunters far to the west at Utqiagvik. They have expressed desire to avoid those types of impacts if at all possible.

**Mitigation**

The best approach to reducing risk to our community’s food security and food sovereignty is relatively straightforward: reducing the amount of anthropogenic sounds introduced into the water and nearshore habitats. Reducing the amount of sound put into the Beaufort Sea by AGDC’s activities could occur through the use of sound attenuation curtains/devices or bubble curtains. The goal of this approach is to reduce the sound footprint of the construction activities. The benefit of sound attenuation is reducing risk of injury to seals and whales, diminishing the amount of sound that would propagate to the area of the main bowhead migration, and decreasing the size of Level A and Level B zones. Reduction in the size of these zones would achieve more realistically observable zones (see Peer Review comments). Therefore, observers can do a better job of implementing mitigation measures to avoid Level A takes more efficiently and realistically observe the entire Level B to estimate actual takes (see Monitoring below). The NSB strongly recommends that NMFS require AGDC to implement the use of sound attenuation devices when conducting vibratory or impact pile driving activities at West Dock.

If sound attenuation devices are not used, NMFS should require that AGDC to sign the Alaska Eskimo Whaling Commission’s Conflict Avoidance Agreement, which includes time and area closures to protect the availability of bowhead whales for hunters at Kaktovik, Nuiqsut, and Utqiagvik. Furthermore, NMFS should require AGDC to strengthen their proposed monitoring plan.

**Monitoring**

As currently proposed by AGDC, the area needing to be monitored, by their own calculation, for potential Level A and B impacts, is quite large. The Level A monitoring zone for low frequency cetaceans (e.g., bowhead whales) is up to 1.5km and 843m for seals for impact pile driving of the largest pipe piles. Because Level A takes could result in injury or mortality, observers play an important mitigation role. If a marine mammal is about to enter or is within the Level A zone, the observer must halt operations to prevent injury. Thus, observers must be able to see the entire Level A zone. Previous monitoring for oil and gas projects show that sightability curves begin to drop off at ~1 km for whales and ~200 m for seals even when conditions are suitable for seeing marine mammals (LGL, Greeneridge Sciences and JASCO. Report (Draft). 2011. Joint
Monitoring Program in the Chukchi and Beaufort Seas, 2006-2011. Figures 3.28 and 3.44). This means that whales and seals beyond those sightability distances would be very difficult, if not impossible at times, to see. The result of this difficulty could be misinterpretations of data, such as a downward bias in estimated takes. The situation is even worse during inclement and windy weather or in low light conditions and at night. Observers stationed near the pile driving activities would not be able to adequately monitor the entirety of Level A zones. NMFS should require AGDC to have a monitoring plan that allows observers to see the entire Level A monitoring zone.

The Level B monitoring zones are even larger. The size of the area that is likely to be ensonifed above the thresholds for behavioral harassment (Level B) for some of AGDC’s activities is a distance of 4.6 km. This distance is much larger than an observer standing on shore near the construction activities could adequately observe, even if that observer was on an elevated platform. Monitoring the Level B zone is required by NMFS so that IHA applicants can estimate how many marine mammals they disturbed during the construction activities. This is important to ensure that Level B takes are kept small and do not exceed those allowed by NMFS. Monitoring and mitigating impacts are especially important for marine mammals that are important for subsistence.

In order to estimate the number of Level B takes, there needs to be adequate monitoring of the Level B zones. Currently, AGDC is planning to have observers at West Dock and use some passive acoustic monitoring. We expect that AGDC is planning to use observations within the viewable zone of observers and somehow expand those observations to the entire Level B zone to estimate takes. The Open Water Peer Review Panel did a good job of explaining the weaknesses and difficulties of using this approach. NMFS should take advantage of the expertise of that panel and implement their recommendations on how to improve visual monitoring.

AGDC has agreed to use passive acoustic monitoring. The addition of acoustic monitoring is helpful, but AGDC needs to consult with NMFS, the NSB, and the AEWC to ensure that there are enough acoustic monitoring devices deployed and placed in the most appropriate locations and distances from West Dock. NMFS should also implement the guidance of the Peer Review panel for acoustic monitoring.

Monitoring the Level A and B zones cannot be observed either efficiently or sufficiently, even when conditions are suitable. The situation is even more dire during periods of low light and inclement weather. Use of sound attenuation devices would dramatically improve this situation as both the Level A and B monitoring zones would be much smaller. If sound attenuation devices are not used by AGDC, NMFS should require AGDC to implement a monitoring program that is able to see most of the Level A and B monitoring zones during the open water period. The Peer Review panel provided guidance about how this might occur.
Level A Takes

AGDC has requested Level A takes for ringed and bearded seals. The NSB is concerned that NMFS is considering using an IHA to allow for Level A takes. This is a major concern for us, as marine mammals, including ringed and bearded seals, are important for subsistence, and are difficult to monitor. Therefore, it is difficult to determine if or how many Level A takes may have occurred. If NMFS is going to allow for Level A takes of marine mammals important for subsistence, they should instead use a Letter of Authorization (LOA) that has greater public review and input.

We are also concerned that NMFS may allow pile driving to occur during the ice covered season. When ice covers the Beaufort Sea, seals continue to use the area for feeding and pupping. Monitoring seals under ice, especially to prevent Level A takes and avoid serious injury or mortality, is next to impossible. Additionally, because the ocean and lagoons are ice covered, it is more risky to seals because they cannot simply stick their heads out of the water to avoid loud sounds. If NMFS is going to allow AGDC to conduct pile driving during ice-covered period, adequate monitoring, that must include acoustic monitoring, should be required by NMFS.

V. Conclusion

The Borough greatly appreciates the opportunity to provide these comments on AGDC’s application for an IHA. The NSB is supportive of AGDC’s project. But to ensure balanced development, modifications are needed to their monitoring and mitigation plan. The simplest solution would be to reduce the amount of noise from spreading from the AGDC’s pile driving activities into the waters of the Beaufort Sea. This could be accomplished with sound attenuation devices. If AGDC is not going to use those type of devices, the monitoring plan needs to be enhanced so that the entire Level A zone can be adequately monitored and most of the Level B zone. Finally, we also support the recommendation of the NMFS Open Water Peer Review Panel and the comments from the Alaska Eskimo Whaling Commission.

Thank you for the opportunity to comment on this proposed project. Feel free to contact Kevin Fisher (kevin.fisher@north-slope.org) or Robert Suydam (robert.suydam@north-slope.org) if you have any questions or need clarification.

Sincerely,

Harry K. Brower, Jr.
Mayor