

STATE OF ALASKA DEPARTMENT OF NATURAL RESOURCES
DIVISION OF MINING, LAND AND WATER

PRELIMINARY DECISION

ADL 233629
Fisherman Fresh
Application for Lease
AS 38.05.083

This Preliminary Decision is the initial determination on a proposed disposal of interest in state land and is subject to comments received during the Public Notice period. The public is invited to comment on this Preliminary Decision. The deadline for commenting is **December 4, 2020**. Please see the Comments Section of this decision for details on how and where to send comments for consideration. Only the applicant and those who comment have the right to appeal the Final Finding and Decision.

Proposed Action:

The Department of Natural Resources (DNR), Division of Mining, Land and Water (DMLW), Southcentral Regional Land Office (SCRO) has received a request from Briana Murphy and Kristen Smith dba Fisherman Fresh (FF) to lease 28.9 acres, more or less, of tide and submerged lands located approximately 2.7 nautical miles south of Seward, Alaska within Resurrection Bay for 10 years for the purpose of cultivating ribbon kelp (*Alaria marginata*) and sugar kelp (*Saccharina latissima*). The location of the project area is further described as being within the SW1/4 of Section 27, Township 1 South, Range 1 West, Seward Meridian.

SCRO is considering the issuance of a 10-year aquatic farmsite lease to FF for the purpose of an aquatic farm consisting of one parcel to be used for the commercial growth and harvest of ribbon kelp and sugar kelp.

Scope of Review:

The scope of this decision is to determine if it is in the State's best interest to issue this aquatic farmsite lease.

Authority:

This lease application is being adjudicated pursuant to AS 38.05.035 Delegation of the Powers and Duties of the Director; AS 38.05.070(b) Generally; AS 38.05.083 Aquatic Farming and Hatchery Site Leases; and AS 38.05.945 Public Notice. The authority to execute the Preliminary Decision, Final Finding and Decision, and the lease, has been delegated to the Regional Manager of SCRO.

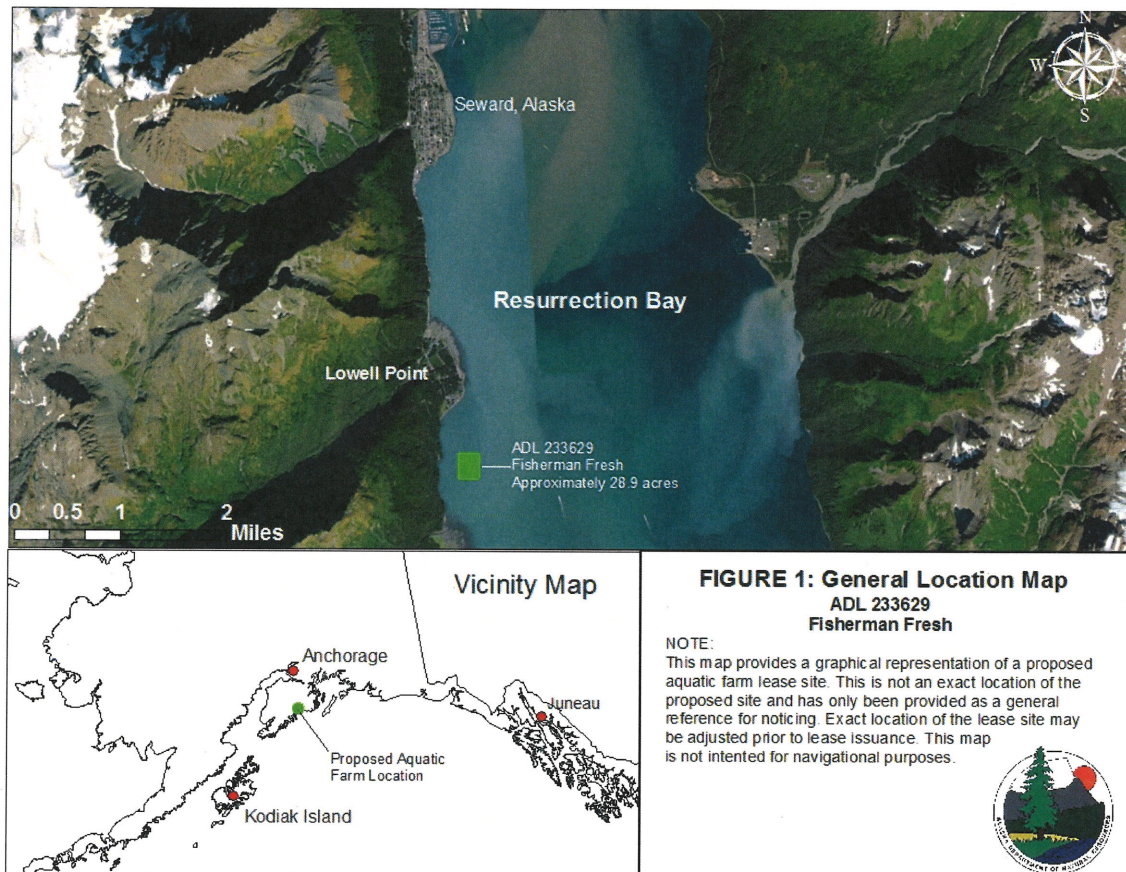
Administrative Record:

The administrative record for the proposed action consists of the Constitution of the State of Alaska, the Alaska Land Act as amended, applicable statutes and regulations referenced herein, the 2000 Kenai Area Plan, and other classification references described herein, and the casefile for the application serialized by DNR as ADL 233629.

Legal Description, Location, and Geographical Features:

The state land where this proposed lease site is located is described as follows:

- **Site reference name:** Resurrection Bay, Seward, Alaska
- **Legal description:** SW1/4 of Section 27, Township 1 South, Range 1 West, Seward Meridian.
- **Geographical locations:** Western side of Resurrection Bay, approximately 2.7 nautical miles south of Seward, Alaska. See Figure 1 for the project location.



- **Approximate Lat/Longs:**

Parcel #1: 28.90 acres

NE Corner: 60°03.600'N, 149°25.980'W
SE Corner: 60°03.414'N, 149°25.980'W
SW Corner: 60°03.414'N, 149°26.280'W
NW Corner: 60°03.600'N, 149°26.280'W

- **Existing surveys:** None
- **Municipality/Borough:** Kenai Peninsula Borough
- **Native Corporations/Federally Recognized Tribes:** Chugach Alaska Corporation

Title:

A DNR Title Report (RPT-20978) was requested on May 7, 2020 from DMLW's Realty Services Section. A Title Report issued from DMLW's Realty Services Section will state whether the State of Alaska holds title to the subject tidelands under the Equal Footing Doctrine and the Submerged Lands Act of 1953. SCRO reserves the right to modify the Final Finding and Decision based upon information contained within the Title Report.

Third Party Interests:

No third-party interests are known at this time.

Classification and Planning:

The project area ADL 233629 is subject to the 2000 Kenai Area Plan (KAP), Region 3, Map 3A, Unit 586, Region 3 General Use Tidelands, and Unit 354, Tonsina Point.

The tideland designations for Unit 586 is Resource Management – high value (rh) and the tideland designation for Unit 354 is Public Recreation and Tourism – public use site (rp). As described within Chapter 4 of the KAP, these tideland designations convert to tideland classifications of Resource Management Land and Public Recreation Land.

Within Chapter 2 of the KAP, Goals, Management Intent and Guidelines, the goals set forth for aquatic farming are to provide opportunities to increase income and diversify the state's economy through the use of state tidelands and submerged lands. Chapter 2 within the KAP continues by stating the "siting of aquatic farming facilities may be more difficult on tidelands where there is or proposed to be waterfront development, high public use for tourism and recreation, anchorages, important habitat or nearby residential development. These areas will be available for aquatic farming if the department determines in the best interest finding that (a) it is practicable to operate an aquatic farming operation so that it is compatible with other uses of the immediate area and (b) the proposed activity is consistent with the guidelines and management intent on this plan".

According to Chapter 3 of the KAP, management intent for tidelands within Resurrection Bay is to continue to provide a variety of visitors and users of this area with a high-quality experience. Chapter 3 continues by highlighting the “state-owned tidelands in this region are designated Special Use Land. The guidelines that will be attached to the Special Use Land Designation will be developed through another public process separate from the Kenai Area Plan”.

Appendix D of the KAP explains that “Special Use Lands are designations placed on land identified as having special resource values needing protection. The result of this designation may be to prohibit certain activities, or to require a permit for certain activities that would otherwise be considered ‘generally allowed’ under 11 AAC 96 in order to protect those special resource values”. Appendix D of the KAP continues to describe how additional “guidelines for managing the Special Use Land will be developed through additional public process after the adoption of the KAP”.

According to Chapter 3 within the KAP, “the Department of Natural Resources will attempt to ensure that adequate opportunities are available for the full spectrum of developed and undeveloped recreation opportunities appropriate for the area. DNR will not authorize activities that intrude visually on the scenic values of the area, that monopolize anchorages, or that have significant negative impacts on the fish and wildlife resources.” As seen within the Project Description (Attachment A) gear is proposed to be installed in mid-October, a few weeks prior to installing seeded lines, and gear will be removed in April once product has been harvested. The siting and operation of the proposed farmsite should not interfere with recreational activities within Resurrection Bay. The siting of the proposed farmsite is located in an area closed to commercial fishing and would not pose any potential conflicts with commercial fishing. The proposed growing season is from November to March, which, according to Alaska Department of Fish and Game (ADF&G), this is outside potential conflicts with salmon harvest.

In accordance with the KAP, aquatic farming is an allowable use and is therefore consistent with the plan.

Traditional Use Findings:

Traditional use findings will not be discussed in this Preliminary Decision because the proposed lease site is located within the Kenai Peninsula Borough, an organized borough. Pursuant to AS 38.05.830 a traditional use finding is not required.

Access:

Access to and from the aquatic farm is by boat from Seward, Alaska.

Access To and Along Navigable and Public Waters:

Nearly all shore and tide lands in the State of Alaska are subject to a To and Along Easement under AS 38.05.127 and 11 AAC 51.045. The purpose of this easement is to uphold the constitutional

right of the public to have free access to, and use of, the state's waterways. At the proposed lease site, the Along easement is 50 feet seaward from the line of mean high water.

Public Trust Doctrine:

Pursuant to AS 38.05.126 all authorizations for this site will be subject to the principles of the Public Trust Doctrine; specifically, the right of the public to use navigable waterways and the land beneath them for: navigation, commerce, fishing, hunting, protection of areas for ecological studies, and other purposes. These rights must be protected to the maximum extent practicable while allowing for the development of this project. As such, SCRO is reserving the right to grant other authorizations to the subject area consistent with the Public Trust Doctrine.

Lease Discussion:

FF submitted an application for a DNR aquatic farm lease to culture on April 22, 2020. On May 19, 2020 FF submitted an updated application in response to a request for additional information from the DMLW Aquatic Farm Leasing Program.

The proposed lease site will be comprised of one parcel covering an area of approximately 28.9 acres, more or less. The parcel measures 900-feet by 1,400-feet. FF proposes using submerged longlines to culture and harvest two local species of kelp: ribbon kelp and sugar kelp. Seedstock will be obtained from hatcheries approved by the State of Alaska.

The parcel will be marked in each corner with a mooring buoy, for a total of 4. The mooring buoys will be connected to the anchoring system and submerged longlines by 1/2" cable leading to a brass ring where anchor lines and submerged longlines will be tied off. This will minimize the risk of floating lines from anchoring system at slack tide and to prevent conflict with recreational users within the area. The proposed farmsite will consist of two 910-foot sections of 5/16" longline and two 400-foot sections of 5/16" longline. Seeded longlines will be 400-feet in length and spaced 10-feet apart. Depth of the longlines will be maintained through 182 depth control systems maintaining a depth approximately 7 feet below the surface of the water.

The proposed farmiste will be anchored with a total of 8 500lb. anchors. Two anchors will be used in each corner of the proposed farmsite set at opposing 45° angles from the mooring buoy. Each anchor will be connected with a 3/8" galvanized shackle to a 12-foot, galvanized, 1/2" anchor chain.

Outplanting will begin at the end of October and go through March. Weekly checks of the farmsite will be conducted to measure growth progress and maintain an accurate record or external variables. Harvest will occur in late March of each year. After harvest, all gear will be removed in April. With the exception of anchors, gear will be stored on residential property in Wasilla, AK. Anchors will be kept at a local rental storage facility in Seward, AK. A 58-foot fishing vessel, the

F/V Mass Deception, will be used for the installation and removal of anchors at the beginning of the growing season and for the transport of kelp from the farmsite. All other activities on the farmsite will be accessed via skiff.

The proposed aquatic farmsite operation must be in the overall best interest of the State before an authorization may be issued. Factors that are to be considered in this decision are identified in 11 AAC 63.050(b). These factors are addressed above and include consideration of land management policies for the project area, existing uses, public access to and along public waters, and the Public Trust Doctrine.

At this time the Commercial Use Requirement (CUR) states a farm needs to be making annual sales in excess of \$3,000.00 per acre or \$15,000.00 per farm by the fifth year of operation of aquatic farm product. Failure to meet CUR constitutes a default and may be cause for termination. Annual reports of sales are due January 31 of every year.

The proposed lease will be subject to the terms of DMLW's standard lease document and any Additional Stipulations based, in part, upon the following considerations.

Operation and Development Plan:

The Operation and Development Plan revised and submitted on April 20, 2020 is accepted by SCRO as complete but may be subject to change based on agency and public review. Should the proposed lease be granted, it is anticipated that the Development Plan will need to be updated throughout the life of the lease as activities and/or infrastructure are added or subtracted. All updates must be approved, in writing, by SCRO before any construction, deconstruction, replacement of infrastructure, or change in activity will be permitted. SCRO reserves the right to require additional agency review and/or public notice for changes that are deemed by SCRO to be beyond the scope of this decision.

Hazardous Materials and Potential Contaminants:

No hazardous materials or fuel will be stored on the proposed leasehold. The use and storage of all hazardous substances must be done in accordance with existing federal, state and local laws. Debris (such as soil) contaminated with used motor oil, solvents, or other chemicals may be classified as a hazardous substance and must be removed from the sites and managed and disposed of in accordance with state and federal law.

Lease Performance Guaranty (bonding):

In accordance with AS 38.05.083(e) and 11 AAC 63.080, FF will be required to submit a performance bond for the lease site.

- **\$2,900.00 Performance Bond:** This bond will remain in place for the life the proposed lease. The bond amount is based upon the level of development, amounts of hazardous material/substances on site, and the perceived liability to the state. This bond will be used to insure the applicant's compliance with the terms and conditions of the lease issued for their project. This bond amount will be subject to periodic adjustments and may be adjusted upon approval of any amendments, assignments, re-appraisals, changes in the development plan, changes in the activities conducted, or changes in the performance of operations conducted on the authorized premises, and as a result of any violations to one or more of the authorizations associated with this project.
- **Reclamation Bond:** SCRO is reserving the right to require a reclamation bond due to non-compliance issues during the term of the lease or near the end of the life of the project.

Insurance:

FF will be required to submit proof of liability insurance to SCRO, with the State of Alaska listed as a "NAMED" insured party. FF will be responsible for maintaining such insurance throughout the term of the lease.

Survey:

In accordance with AS 38.04.045, this short-term lease does not require a survey. However, the State of Alaska reserves the right to require one in the future should the need arise due to changes in statutes or increased use of the area. FF has submitted GPS coordinate point(s) for the four corners of the proposed leasehold.

Compensation/Appraisal:

DMLW has approved an administrative lease fee schedule for aquatic farm sites that meet the conditions listed within the schedule. The most current lease fee schedule will be used to establish the fair market rental each lessee must pay. Fees are subject to adjustment per AS 38.05.083(c). The current annual rate for a 28.9-acre aquatic farm lease is a base fee of \$450.00 for the first acre, and \$125.00 for each additional acre or partial acre. In accordance with the Aquatic Farmsite Fee Schedule, Report No. 2522-14, a breakdown of the lease fee will be as follows:

$$28.9 \text{ acres } (1 \text{ acre at } \$450) + (27.9 \text{ acres } \times \$125) = \text{\$3,950.00 per year}$$

If the applicant does not agree with the fee schedule amount of \$3,950.00, a fair market value determination can be obtained by the applicant. Fair market value is determined by obtaining a DNR approved appraisal of the lease. If an appraisal is conducted to determine fair market value of the lease site, the applicant will be required to pay the appraised amount and the \$3,950.00

annual fee will no longer be an option. The appraisal cost will be borne by the applicant. The Parcel may need to have an approved Alaska Tidelands Survey to accomplish the appraisal. If a survey is required, cost will be incurred by the applicant.

Assignment of Lease:

The proposed lease, if issued, may be transferred or assigned to another individual or corporation **only** with prior written approval from DMLW. A lease will not be assigned to an entity if that entity does not meet the statutory requirements of the lease or the lease is not in good standing. DMLW reserves the right to amend the terms of the lease prior to assignment.

Reclamation:

In accordance with AS 38.05.090(b), all Lessees must restore their lease sites to a “good and marketable condition” within 120 days after termination of the lease. What level of reclamation constitutes as being “good and marketable” is at the discretion of SCRO. DNR reserves the right to require a reclamation bond at any time.

Agency Review:

An Agency Review was conducted for a 20-day review starting on June 11, 2020 and ending on July 1, 2020. The following agencies were included in the review:

- Alaska Department of Fish and Game
- DNR DMLW – Realty Services
- DNR DMLW – Mining
- DNR DMLW – Water
- DNR Division of Parks and Outdoor Recreation (DPOR)
- DNR DPOR Office of History and Archaeology, State Historic Preservation Office
- DNR Division of Oil and Gas
- Alaska Department of Environmental Conservation
- Alaska Department of Transportation and Public Facilities
- National Oceanic and Atmospheric Administration
- U.S. Army Corp of Engineers
- U.S. Forest Service
- U.S. Coast Guard
- U.S. Fish and Wildlife Service
- U.S. Environmental Protection Agency
- DNR Natural Resource Conservation and Development Board
- State of Alaska Department of Commerce, Community, and Economic Development
- National Park Service
- Alaska Association of Conservation Districts
- Alaska State Troopers Wildlife Division

- Kenai Soil and Water Conservation District
- Kenai Peninsula Borough
- City of Seward

Agency Review Comment(s):

During the Agency Review, SCRO received comments from three agencies.

ADF&G Comments:

As stated in ADF&G's Permit Coordinator's June 29, 2020 letter, "The Alaska Department of Fish and Game (ADF&G) has completed a preliminary review of the proposal, ADL 233629, relevant to criteria specified in authorizations for Aquatic Farming AS 16.40.105 and 5 AAC 200-400. The ADF&G Division of Commercial Fisheries, Division of Sport Fish, Subsistence Section, Habitat Section, Division of Wildlife Conservation, Gene Conservation Lab, and Fish Pathology Section were part of the initial review. There are no concerns pertaining to an aquatic farm operation permit at the proposed location."

The ADF&G letter contains a Department Advisory and a request that the PD herein contain ADF&G's letter.

SCRO Response:

DNR's statutes and regulations for aquatic farmsite leases do not specify management of aquatic farms relating to fish and game but authorize DNR to issue a lease of state-owned tideland, shoreland, or submerged land to develop an aquatic farm. Management of fish and game is within the authority of ADF&G, not DNR. ADF&G may add to its operation permit authorization the conditions it deems appropriate regarding fish and game.

SCRO has provided a copy of ADF&G's June 29, 2020 letter to FF to inform FF of these concerns. As requested within ADF&G's letter, the PD herein contains ADF&G's Department Advisory as Attachment B, which will be advertised for a 30-day public comment period. The ADF&G letter is attached to the PD.

NOAA National Marine Fisheries Service Comment:

Within the June 30, 2020 letter from the NMFS, specific marine mammal considerations were listed concerning entanglement, vessel interactions, and habitat exclusion. A site-specific consideration was listed concerning specific marine mammals, including endangered species such as fin, sperm, humpback, and North Pacific right whales. Within the June 30, 2020 NMFS letter, there were specific recommendations listed to minimize interactions with marine mammals.

SCRO Response:

DNR's statutes and regulations for aquatic farm site leases do not specify management of aquatic farms relating to marine mammals but authorize DNR to issue a lease of state-owned tideland,

shoreland, and submerged land to develop an aquatic farm. Management of marine mammals is within the authority of the NMFS, not DNR.

SCRO has provided a copy of the NMFS June 30, 2020 to FF to inform FF of these concerns and recommendations.

Alaska Department of Transportation & Public Facilities:

A “no comment” was received from the Alaska Department of Transportation & Public Facilities (ADOT&PF) within a June 26, 2020 email.

SCRO Response:

SCRO acknowledges the “no comment” from ADOT&PF.

Public Notice of the Preliminary Decision:

Pursuant to AS 38.05.945, this PD will be advertised for 30-day public comment period. Notice will be posted on the Alaska Online Public Notice System, and the post office located in Seward, Alaska. Courtesy notices will also be mailed or emailed to neighboring property owners, permit/lease holders, and other interested parties on **November 4, 2020** for a 30-day public comment period.

Comment(s):

This decision is subject to both public and agency comments and all comments received by the comment deadline will be considered in the Final Finding and Decision. Only those who comment and the applicant have the right to appeal the Final Finding and Decision.

**Written comments about this project must be received in this office no later than
5:00 PM on December 4, 2020 to be considered.**

To submit comments, please choose one of the following methods:

Postal: Department of Natural Resources
Southcentral Regional Land Office
ATTN: Brent Reynolds
550 West 7TH Avenue Suite 900C
Anchorage, AK 99501-3577
Phone: 907-269-8567
E-mail: brent.reynolds@alaska.gov
Fax: 907-269-8913

If public comments result in significant changes to the Preliminary Decision, additional public notice may be given. To be eligible to appeal the Final Finding and Decision, a person must provide written comments during the Preliminary Decision comment period per AS 38.05.035(i)-(m).

Signature Page Follows

Recommendation:

DMLW has completed a review of the information provided by the applicant, examined the relevant land management documents, and has found that this project is consistent with all applicable statutes and regulations. DMLW considered three criteria to determine if this project provided the best interest to the State and the development and enjoyment of its natural resources. The criteria include direct economic benefit to the State, indirect economic benefit to the State, and encouragement of the development of the State's resources. This authorization provides a direct economic benefit to the State with the collection of one-time filing fees and any yearly rent/fees. The authorization of this lease is in the State's best interest as it furthers economic development of the State's aquatic farm industry. It is recommended that DMLW issue a 10-year lease to FF.

Brent Reynolds

10/22/2020

Brent Reynolds, Natural Resource Specialist II

Date

Preliminary Decision:

It is the determination of the Division of Mining, Land, and Water that it may be in the State's best interest to issue an aquatic farm site lease to FF, as described above. Upon authorization of lease ADL 233629, the applicant will be required to pay the annual lease fee of \$3,950.00, submit a \$2,900.00 performance bond, and provide proof of liability insurance. This Preliminary Decision shall now proceed to public notice.

Samantha Carroll

10/29/2020

Samantha Carroll, Regional Manager
Southcentral Regional Land Office
Division of Mining, Land & Water

Date

Attachments

Attachment A – Development Plan: Project Description, General Location Map, Detailed Location Map, Site Plan Maps, and Cross-Sectional Diagram.

Attachment B – Alaska Department of Fish and Game Agency Review Comments; Murphy and Smith / Fisherman Fresh – Aquatic Farm Site Proposal – Resurrection Bay; DNR File No.: ADL 233629



Attachment A Development Plan

Project DESCRIPTION Fisherman Fresh - Briana Murphy and Kristen Smith Seward, AK, Southcentral AK April 20, 2020

The proposed aquatic farm site consists of one parcel located on state-owned submerged lands, totaling 28.9 acres. The parcel includes a suspended kelp grow-out area measuring 1,400 feet x 900 feet.

The proposed aquatic farm is located about 2.7 nautical miles south of Seward in Resurrection Bay and approximately a half mile north-northeast of Tonsina Creek, and a quarter mile south of Lowell Point. (Figures 1 and 2)

The project location, parcel 1, will consist of 90, 400-foot submerged longlines for growing ribbon kelp, *alaria marginata*, and sugar kelp, *saccharina latissima*. Seedstock for these two species will be purchased from a licensed hatchery, Alutiiq Pride Shellfish Hatchery, and outplanted at the farm site. 45 longlines will be devoted to growing each species; longlines will be separated by a distance of 10 feet.

Seeded longline for kelp growth will be purchased from hatchery. A large, mooring buoy will mark each of the four corners of the farm site; a total of four mooring buoys will be used throughout the farm site. Mooring buoys will be connected to anchor systems and submerged longlines by half inch cable leading to a brass ring, where anchor lines and submerged longlines will be tied off. Cable and brass ring systems will minimize the risk of floating lines from anchor systems at slack tide, to prevent conflict with recreational boaters or other visitors to the area. The farm site will consist of two, 910-foot sections of 5/16 inch longline and two, 400-foot sections of 5/16 inch longline. Seeded longlines will be 400 feet in length and spaced 10 feet apart, beginning at 5 feet from corner of farm site (see Figure 4a for detailed diagram). This additional space will ease stress on longlines at either end of the farm site as anchors move throughout the tides. The depth of the longlines will be maintained through 182 depth control systems (see Figure 4c for detailed diagram of depth control system). Depth control systems will be 7 feet in length, with a large buoy of approximately 10-14 pounds displacement connected via a ¼-inch line to a cement weight of approximately 10 pounds at the bottom of the control system. The line will be encased by a 7-foot section of 1-inch PVC pipe. Depth control systems will be placed at either end of the submerged, seeded kelp grow-out longlines, and one depth control system will be placed in the middle of each longline, approximately 200 feet from the depth control system at each end of the line. More depth control systems will be added as needed, to ensure that submerged seeded longlines maintain a depth of approximately 7 feet below the surface of the water.

Attachment A

Development Plan

Farmsite will be anchored with a total of eight, 500-pound anchors. Two 500-pound anchors will be set at each corner of the farm site. Anchors will be set at opposing 45° angles from the mooring buoy at the corner of the farm site, so as to provide for adequate anchorage for the farm site at each stage of the tide. Each anchor will be connected with a ¾-inch galvanized shackle to 12 feet of galvanized, ½-inch anchor chain. Anchor chain will be connected to ½-inch anchor line, which will be tied off to a 6 inch brass ring, connected to the mooring buoy at each corner of the farm site via ½-inch cable. (See Figure 4b for a detailed diagram of the anchor system; see Figure 4d for cross-sectional overview of farm site, detailing calculations for distance from farm site to anchor's settling point, to ensure that all anchors remain within boundary of farm site.)

Once seeded longlines are purchased from hatchery, they will be transported to farmsite wrapped in muslin sheets soaked in sterilized seawater and stored in plastic containers. These efforts will minimize damage to seedlings during transportation and will prevent seedlings from drying out during period of transportation.

Seeded longlines will be deployed on a day with favorable weather conditions, to avoid excessive wave action aggravating seedlings during deployment. Longlines will be tied off to a 400-foot section of 1/4-inch longline attached at the eastern and western boundary of farmsite. These 1/4-inch lines will be spaced 10 feet apart, running from the north end to the southern end of the site. Seeded longlines will run parallel to the 400-foot section of longline connecting the eastern and western boundary of farmsite.

Outplanting will begin at the end of October; throughout the months of November, December, January, February, and March, weekly checks on the progress of the farm will be conducted to measure growth progress and maintain an accurate record of external variables. Weekly farm checks will include an assessment of the farmsite environment, including the current of water at site location, water temperature, turbidity, nutrient levels, and salinity of water.

Additionally, growth measurements of the kelp will be taken from 5 different sections (every 100 ft from beginning of longline) of 10 randomly selected longlines for each species. Kelp measurements over the course of the growing season will be monitored to measure efficacy of the farm from year to year; final pounds of product (wet) per fathom of seeded line will be measured at the end of each harvest to measure overall progress and efficiency of farm's output.

Macroalgae (both ribbon kelp, *alaria marginata*, and sugar kelp, *saccharina latissima*) will be harvested in late March of each year. Macroalgae will be harvested with F/V Mass Deception,

Attachment A Development Plan

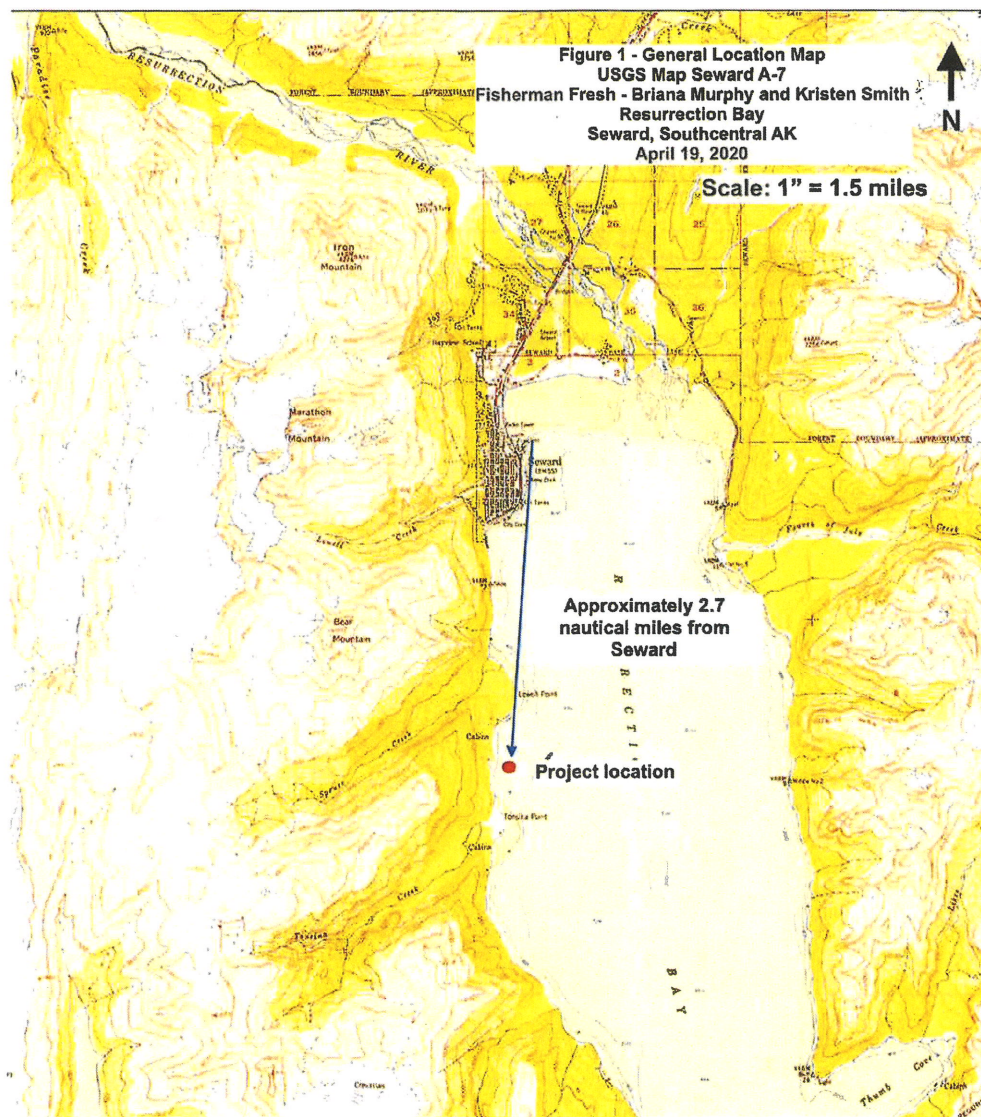
a seine boat with adequate deck space to collect product in storage totes, which will be placed in fish hold. Mass Deception's hydraulic systems will allow for ease of transportation of product to and from vessel, and its deck and fish hold space will allow for adequate storage of product to be transported from farm site upon harvest. Outboard skiffs will be used for harvest of macroalgae; product will be removed by knife and collected in brailer bags in skiffs, to be offloaded to support facility of F/V Mass Deception for storage until product is transported.

F/V Mass Deception is approximately 58 feet in length and 16 feet in width; anchorage system will not be necessary, as the vessel will only be used for the installation and removal of anchors at the beginning and end of each growing season and for transportation of product from farm site. Mass Deception will return to anchor in Seward harbor at the end of each work day.

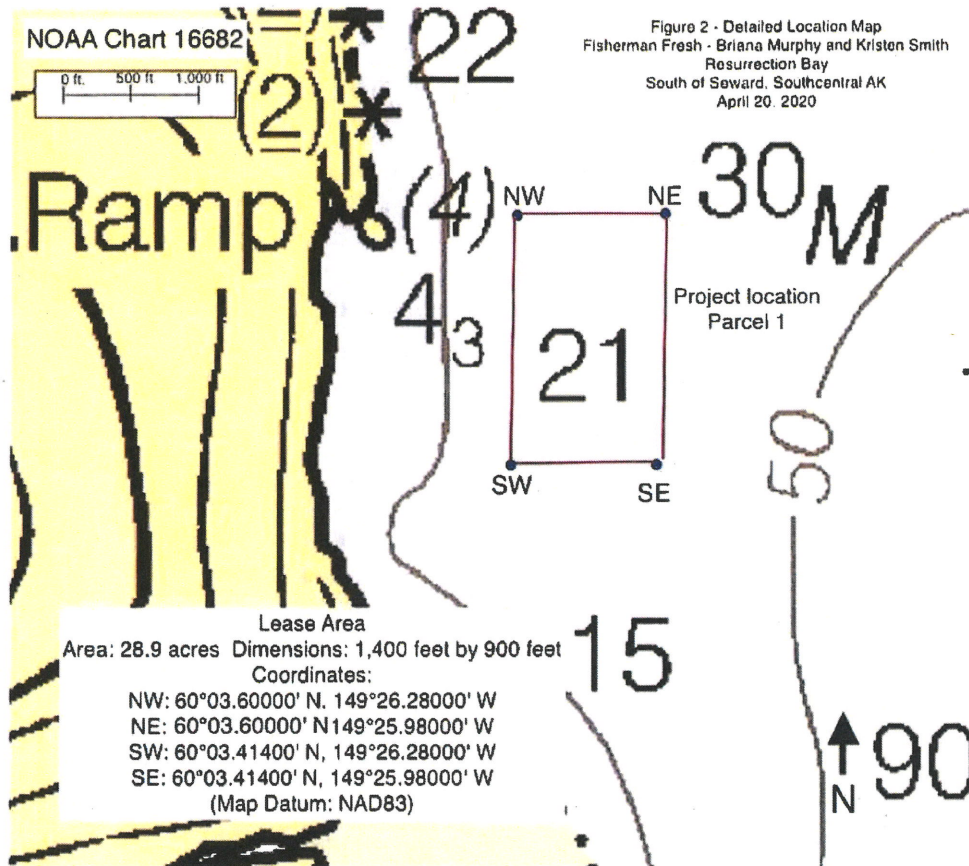
Support facilities also include an outboard, aluminum skiff, 12 feet by 22 feet, for recurrent checks on farm site throughout the growing season. Anchors for the farm site will be set and removed at the beginning and end of each season with a seine boat, F/V Mass Deception, for efficient and safe removal of anchors. Site will be accessed by boat from the harbor of Seward; recurrent checks on gear throughout the growing season will be managed by small boat launch access points just offshore of site or by small boat launches in Seward harbor. Site will be visited once a week during the growing season, from November to March.

Gear will be installed in mid-October, a few weeks before installing seeded lines in order to allow time to observe how anchors hold throughout various tides and weather patterns. Gear will be removed in April, once product has been harvested. When not in use, gear will be stored on residential property in Wasilla, Alaska; anchors will be kept at rented storage facility in Seward, AK. All gear will be removed at the end of each harvest season and reinstalled at the beginning of next grow-out season.

Attachment A Development Plan



Attachment A Development Plan



Attachment A Development Plan

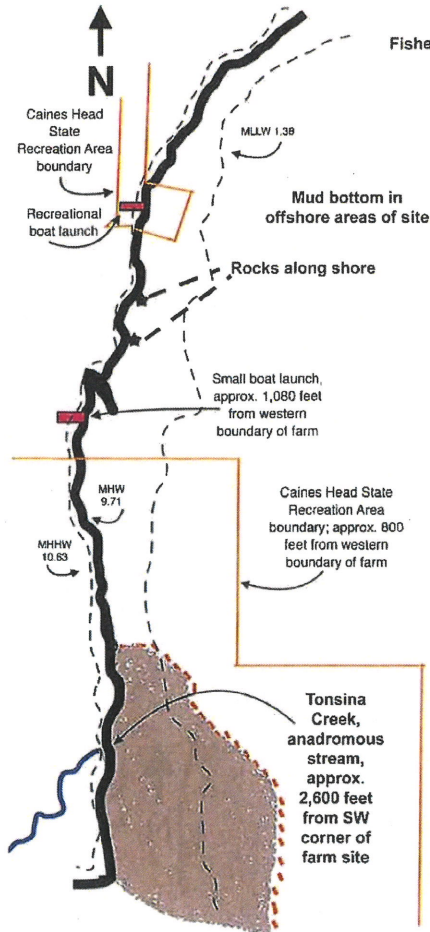
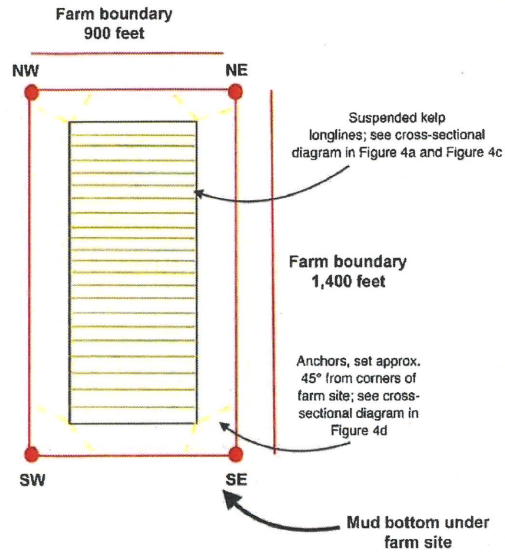


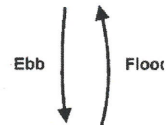
Figure 3 - Site Plan Map
Fisherman Fresh - Briana Murphy & Kristen Smith
Resurrection Bay
Seward, Southcentral AK
April 20, 2020

Note: Diagram not to scale



Project Area
Parcel 1 - Suspended kelp grow-out area
Area: 28.9 acres Dimensions: 1,400 feet by 900 feet

Coordinates:
NW: 60°03.60000' N, 149°26.28000' W
NE: 60°03.60000' N, 149°25.98000' W
SW: 60°03.41400' N, 149°26.28000' W
SE: 60°03.41400' N, 149°25.98000' W

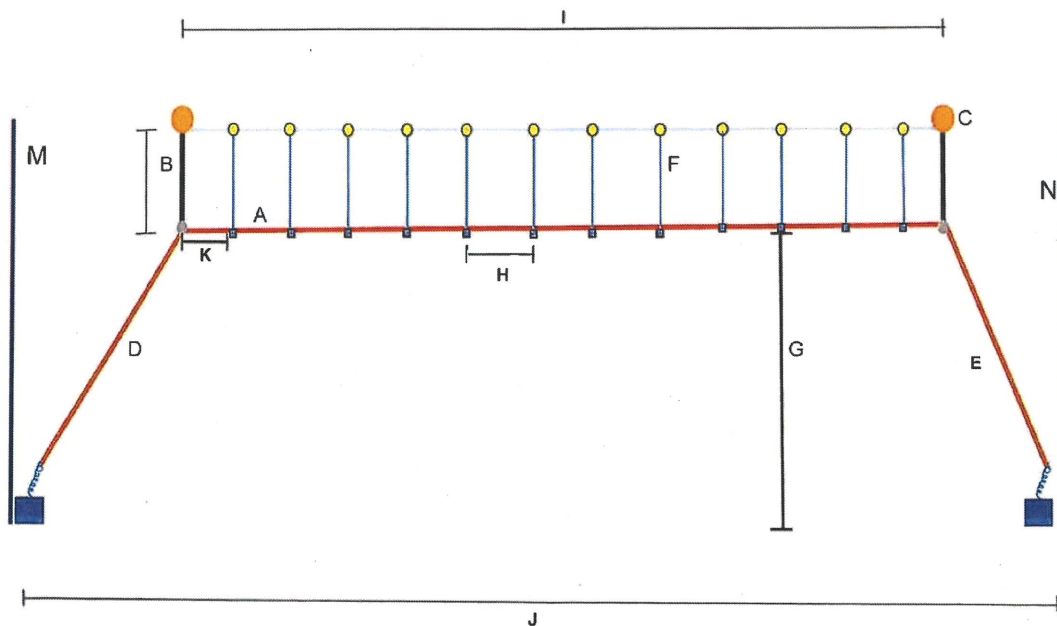


Attachment A Development Plan

Figure 4a - Cross-sectional diagram of parcel 1 from northeast corner to southeast corner
Fisherman Fresh, Briana Murphy & Kristen Smith
Resurrection Bay
Seward, Southcentral Alaska
April 19, 2020

Note: Diagram not to scale

- A. 5/16-inch submerged longline
- B. 7 feet of 1/2-inch cable to brass ring
- C. Surface mooring buoy, polyform A-6, 34 x 44 inches with approx. 800 lb buoyancy
- D. 438 feet of 1/2-inch anchor line, with 3:1 scope, and 12 feet of anchor chain
- E. 276 feet of 1/2-inch anchor line with 3:1 scope, and 12 feet of anchor chain
- F. Depth control systems to maintain 7-foot depth of kelp longlines
- G. 89 feet from kelp longline to ocean floor at low tide
- H. 10 foot distance between seeded kelp longlines
- I. 900 foot distance from mooring buoy at northeast corner to mooring buoy at southeast corner
- J. 1,392 foot distance from outside anchor at northeast corner to outside anchor at southeast corner*
- K. 5 feet from mooring buoy to start of kelp longlines
- L. 500 pound anchor, shackled to 12 feet of galvanized anchor chain
- M. 150 feet water depth at low tide at northeast corner
- N. 96 feet water depth at low tide at southeast corner

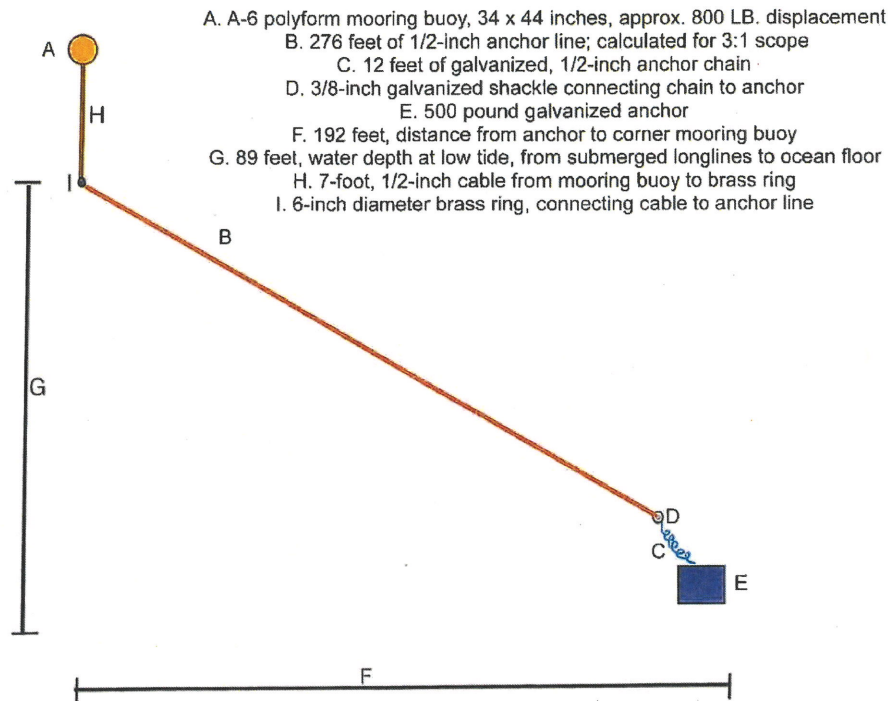


*See Figure 4b and Figure 4d for more detailed diagrams of anchor systems

Attachment A Development Plan

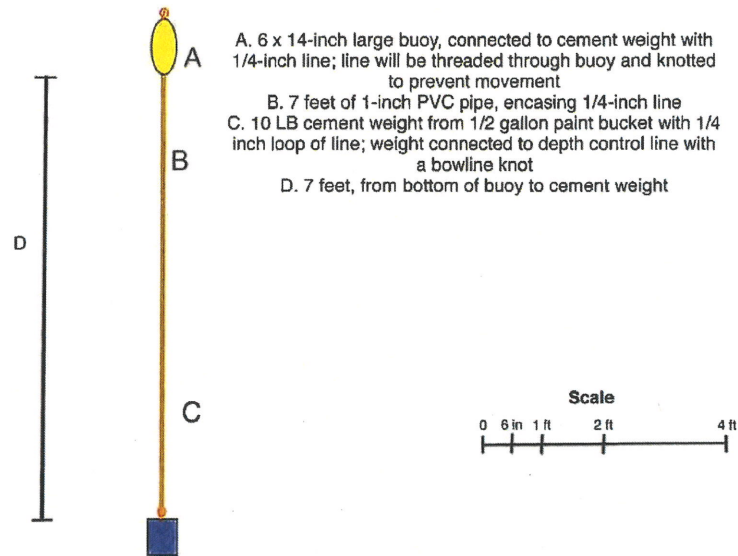
Figure 4b - Cross-sectional diagram of anchoring system at southeast corner
Fisherman Fresh, Briana Murphy & Kristen Smith
Resurrection Bay
Seward, Southcentral Alaska
Date: April 10, 2020

Note: Diagram not to scale



Attachment A Development Plan

Figure 4c - Detailed diagram of kelp depth controlling system
Fisherman Fresh, Briana Murphy & Kristen Smith
Resurrection Bay
Seward, Southcentral Alaska
April 19, 2020



Attachment A Development Plan

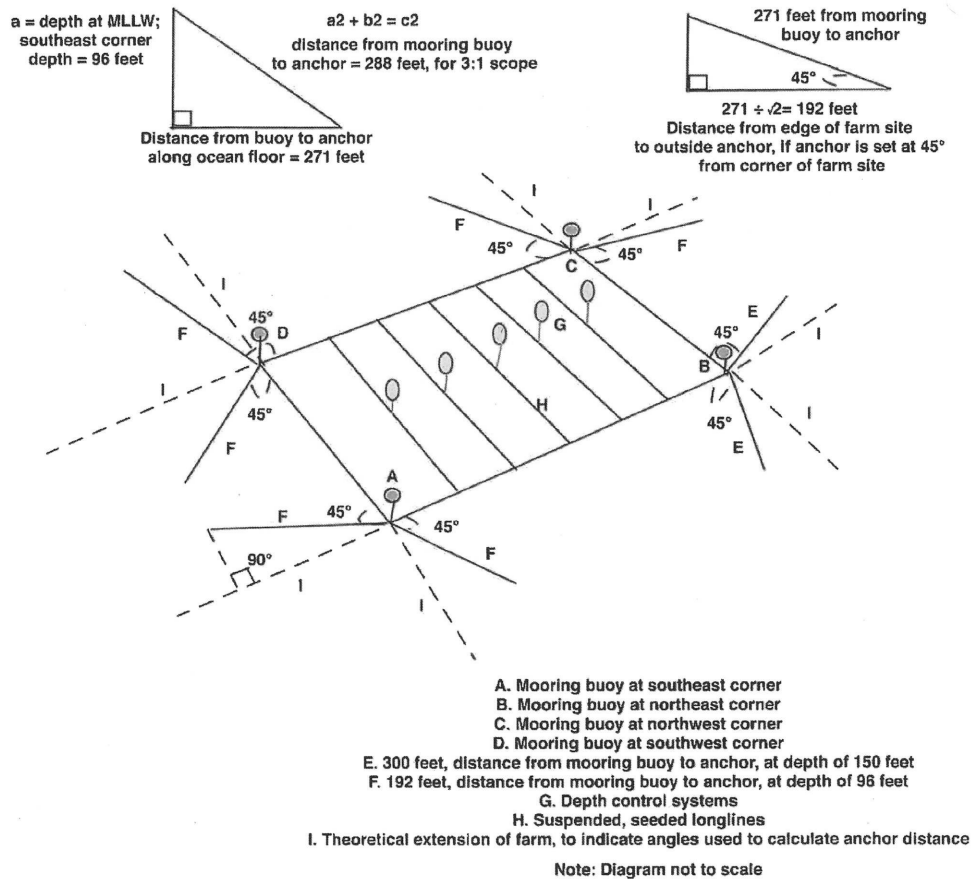


Figure 4d - Detailed drawing of anchoring system, relative to farm site
Fisherman Fresh, Briana Murphy & Kristen Smith
Resurrection Bay
Seward, Southcentral Alaska
April 19, 2020

Attachment B ADF&G Letter



THE STATE
of **ALASKA**
GOVERNOR MICHAEL J. DUNLEAVY

Department of Fish and Game

Division of Commercial Fisheries
Headquarters Office

1255 West 8th Street
P.O. Box 115526
Juneau, Alaska 99811-5526
Main: 907.465.4210
Fax: 907.465.4168
Permit Coordinator: 907.465.4724

June 29, 2020

Brent Reynolds
Department of Natural Resources
Southcentral Regional Land Office
Aquatic Farm Leasing Program
550 West 7th Avenue, Suite 900C
Anchorage AK 99501

Re: Alaska Department of Fish and Game Agency Review Comments
Murphy and Smith /Fisherman Fresh - Aquatic Farm Site Proposal – Resurrection Bay
DNR File No.: ADL 233629

Dear Mr. Reynolds:

The Alaska Department of Fish and Game (ADF&G) has completed a preliminary review of the project proposal, **ADL 233629** relevant to criteria specified in authorizations for Aquatic Farming AS16.40.105 and 5 AAC 200-400. The ADF&G Division of Commercial Fisheries, Division of Sport Fish, Subsistence Section, Habitat Section, Division of Wildlife Conservation, Gene Conservation Lab, and Fish Pathology Section were part of the initial review. *There are no concerns pertaining to an aquatic farm operation permit at the proposed location.* Any comments from other government agencies, or through the public comment period that may impact applicable department provisions, will be considered as part of the final department review for an aquatic farm operation permit. Recommendations from this preliminary review are summarized below.

Department Advisory

Please advise the applicant that if the project is approved, general conditions pertaining to Alaska Department of Fish and Game statutory and regulatory provisions for issuance of an Aquatic Farm Operation Permit (AFOP) will be included in the operation permit. In addition, site-specific conditions that have been recommended by staff may be included in the AFOP.

Division of Commercial Fisheries has reviewed this request and have no concerns. The proposed area is within waters closed to commercial salmon fishing. The proposed growing season is from November to March, which is outside potential conflicts with salmon harvest. These closed waters have occasionally been rescinded to target chum salmon bound for adjacent Tonsina Creek. If this project expands its growing season, this potentially could have an impact on commercial salmon fishing in Resurrection Bay which will be addressed in future permit amendment reviews.

Attachment B ADF&G Letter

Brent Reynolds
Department of Natural Resources
Aquatic Farm Proposal ADL 233629 ADF&G Review Comments

- 2 -

June 29, 2020

Division of Sport Fish has reviewed this request and has no comments at this time.

Division of Wildlife Conservation has reviewed this request and have no concerns.

Marine Mammal Research Program: This application complies with the guidelines set forth with the ADF&G marine mammal mariculture policy established on April 12, 2019. Marine mammals may occur in the project area and any advisories or mitigation steps recommended by NOAA Fisheries National Marine Fisheries Service (NMFS) or the US Fish and Wildlife Service (FWS) to reduce marine mammal disturbances should be followed.

Access Defense Program: Has reviewed this request and have no concerns. Outside of this project footprint, the proposed project does not block public access to public land and waters.

Seabird Program: Has reviewed this request and no comments at this time.

Habitat Section has reviewed this request and has no comments at this time.

Subsistence Section has reviewed this request and have no concerns. Project location is the Anchorage-Matanuska-Kenai Peninsula Nonsubsistence Area.

Gene Conservation Lab has reviewed this request and have no concerns.

Pathology Lab has reviewed this request and have no concerns.

Invasive Species Program Coordinator has reviewed this request and has no concerns.

Our department requests that the Department of Natural Resources consider providing this in their Preliminary Decision as an advisory to the applicant and for public reference.

Thank you for the opportunity to provide comments on this aquatic farm proposal. If you have any questions, please contact me at (907) 465-4724.

Sincerely,



Michelle Morris
Permit Coordinator

ecc: Garold V. Pryor, Aquaculture Section Chief, ADF&G, Juneau
Briana Murphy and Kristen Smith, Fisherman Fresh