Proposed Action: The Department of Natural Resources (DNR) received a request from Alyeska Pipeline Service Company (APSC), agent for the Trans-Alaska Pipeline System (TAPS) lessees, to amend the TAPS Right-of-Way (ROW) Lease, ADL 63574 to add State lands approximately 20 miles south of Pump Station 1 near Deadhorse, Alaska.

At this project location, there is a previously used gravel pit with a pond that is located between TAPS and the Sagavanirktok (Sag) River. Along its easterly edge, progressive erosion by the Sag River has reduced the width of the remaining vegetated buffer, and the river is expected to hydraulically connect to the pond within the next few spring breakup seasons, leading to additional bank erosion in the area. To mitigate potential damage to the pipeline, APSC proposes to install a berm and several rock vanes between the gravel pit pond and the Sag River, but not within the active channels. This amendment request is for land use during construction and for the extraction of material from the Sag River to be used for construction of the berm, and the continued maintenance of permanent rock vanes.

The amendment request is necessary to protect Trans-Alaska Pipeline from continued accelerated erosion as a result of progressive erosion and high-water flood events. The project is described in more detail below in the Project Description section. Once construction activities conclude, the added operational ROW land will be surveyed and may include less acreage than approved for in this amendment.

The additional land is necessary to support the existing pipeline system as defined in Alaska Statute (AS) 38.35.230(7) and authorized by the Trans-Alaska Pipeline ROW Lease, ADL 63754. See the attached project maps and drawings (Attachments A, B, C, D) for more details.

Authority: AS 38.35.015 and the Trans-Alaska Pipeline ROW Lease, ADL 63574.

Administrative Record: Trans-Alaska Pipeline ROW Lease, ADL 63574, and the associated ROW Lease Amendment case files constitute the administrative record.

Location: The proposed ROW addition is located within the SE1/4 of Section 5, Township 7 North, Range 14 East, Umiat Meridian, those lands adjacent to the TAPS ROW and above the Ordinary High Water (OHW) line; containing approximately 99 acres, more or less.
**Background:** Public Notice of the ROW amendment request was published in the Anchorage Daily News, posted on the State of Alaska Online Public Notice and the Division of Oil and Gas Newsroom and TAPS webpages, and sent for posting in the Tuzzy Consortium Library in Utqiagvik, and the U.S. Post Offices in Utqiagvik and Prudhoe Bay on July 18, 2022. In addition, the Public Notice was published in the Arctic Sounder on July 21, 2022.

Pursuant to AS 38.35.070, the following coordinate agencies were notified of the application and associated documents: Department of Labor & Workforce Development, Department of Transportation and Public Facilities, Department of Environmental Conservation, and the Regulatory Commission of Alaska. Additionally, the following agencies received the link to the application and associated documents: the Alaska Departments of Fish and Game, Public Safety, Revenue, and the Alaska Oil and Gas Conservation Commission.

The Office of History and Archaeology (OHA) State Historic Preservation Office (SHPO) is reviewing the amendment request. If inadvertent discoveries of cultural resources occur during project activities, OHA must be notified to evaluate whether the resource should be preserved in the public interest pursuant to AS 41.35.070(d). Examples of cultural resource sites that can be encountered include historical cabin remains, adits, dredges, mining equipment, cultural depressions or pits, graves or cemeteries, tools, artifacts, and paleontological remains.

**Project Description:** The project site is located approximately 20 miles south of Pump Station 1 and 37 miles north of Pump Station 2, east of the Dalton Highway, and west of the Sagavanirktok River.

At Pipeline Milepost (PLMP) 20, the Sag River crosses the Arctic Coastal Plain, which primarily supports lowland tundra vegetation types. Wetland plant communities are the predominant vegetation type in the lowland tundra zone which includes mosses, lichens, herbs and low shrubs. The soils in this area consist of organic silt with some sand, gravel mixed with sand, numerous cobbles and scattered boulders. The adjacent gravel bar is almost exclusively bare mineral soils such as gravels and sands with scarce, if any vegetation. The Sag River and its side channels are classified as anadromous fish streams. Arctic char, cisco and whitefish inhabit the Sag River. There is also a known caribou winter concentration area and a polar bear denning habitat between PLMP 13 – 26.

The eroding buffer strip between the gravel pit pond and the river will be augmented along the entire length of the pit. In-situ alluvial material will be scraped from the surface of the adjacent gravel bar to raise the elevation of its westerly edge and widen the buffer strip. At certain locations along the buffer that are most vulnerable to erosion, riprap will be placed discretely to enhance the buffer stability as eight separate rock vanes. The expanded buffer area will be left to naturally revegetate with native flora.

To access the work area, a temporary gravel ramp will be built from the bank at the north of the pit pond where a gravel pad extends to the riverbank. After construction the ramp will be removed. Equipment used on the project will be primarily trucks, backhoes, loaders, dozers and compactors.
This work will be implemented in late fall when the river stage is typically very low and local seasonal side channels are frozen or dry. Therefore, it is anticipated that the work area will be mostly frozen and/or dry. Depending on field conditions, APSC states that there is a small possibility that equipment tracks may be in contact with isolated areas of groundwater seepage especially in the early stages of construction before full freeze-up. And, in the unlikely event that an open channel across the work area is encountered, a stream diversion or a temporary installation of culverts will be performed.

APSC states in their application that the project will avoid adverse impacts to water flow, floodplain and existing, riparian vegetation. Heavy equipment use will be confined to the existing TAPS access road, pad and the gravel bar. All fueling will be done in permitted areas outside the active floodplain and at least 100 feet from the Ordinary High Water (OHW) line.

The Lessee also states that there will be minimal impact to aquatic life because the work will not be in active channels. Any fish encountered in pools subject to the work will be captured and released in the waterways nearby. APSC’s operations in this area are covered by the company’s Polar Bear Interaction Plan and a Letter of Authorization for Unintentional Take from the US Fish and Wildlife Service. The cut and fill work and its support areas will not occur in wetlands. No net loss of habitat is anticipated because the buffer is being augmented by use of alluvial material immediately adjacent to the berm and rock vanes.

The proposed bank erosion mitigation structure will be built with rock vanes using approximately 1,500 cubic yards of riprap and an estimated 16,000 cubic yards of alluvial fill in the voids of the riprap. The proposed construction area limit is approximately 68 acres, with a buffer area of approximately 31 acres, for a total of 99 acres, more or less. See Attachment D for details. The alluvial fill or gravel is proposed to be extracted within the construction area pursuant to AS 38.05.565(a)(3). In a separate action, DNR may authorize the sale of materials under the terms of a material sale contract with APSC.

**Title:** The State of Alaska holds fee title to the subject land under GS 1609, Patent No. 50-74-0107, recorded April 1, 1974, in Book 278, Pages 446 and 447, in the Fairbanks Recording District as Document Number 401-1974-003789-0. On June 19, 1992, the Bureau of Land Management issued a Water Acreage Credit to the State of Alaska for lands under navigable waters, recorded in the Barrow Recording District in Book 63, Pages 982 through 999, as Document Number 413-1992-000576-0. Patent 50-74-0107 was not changed to reflect the acreage credit.

Reservations: The United States excepts and reserves unto itself a right-of-way for ditches or canals and a right-of-way for railroads, telegraphs, and telephone lines.

The United States pursuant to Sec. 9(c) of the Act of December 18, 1971 (85 Stat. 688), reserved for the benefit of the Alaska Natives, payments into the Alaska Native Fund. The reservation would continue only until $500,000,000 had been paid into the Alaska Native Fund from sources
identified in Sec. 9 of the 1971 Act. This reservation no longer applies since the obligation has been fulfilled and final payment was made in 1980.

**Planning and Classification:** The proposed land to be added to the Trans-Alaska Pipeline ROW is subject to ADL 50666, North Slope Special Use Area; within the James Dalton Highway, a Legislatively Designated Area (LDA); and is subject to the North Slope Area Plan. The North Slope Special Use Area does not prohibit the development of land within the Umiat Meridian for the proposed bank erosion mitigation structure.

Under 11 AAC 96.014, for the North Slope Area (ADL 50666), all state lands are designated in the Umiat Meridian as “special use land”. This designation as special use land requires that, in addition to permitting requirements under 11 AAC 96.010, a permit is required for motorized vehicle use, unless that use is for subsistence purposes or is on a graveled road. The requirement for a permit or authorization would be fulfilled through the issuance of the proposed TAPS ROW Lease amendment. This requirement does not prohibit the development of lands within the Umiat Meridian and does not prohibit the proposed action.

The proposed ROW amendment lies within the North Slope Area Plan adopted on March 12, 2021. The lands encompassed by the proposed ROW amendment fall within Unit D-12 of the Dalton Corridor Region. The lands within this unit are designated as Habitat/Materials (Ha/Ma). This unit is primarily used for gravel and construction material extraction. The management intent of the plan is to manage unit for its material values and resources consistent with the authorization issued by ADNR. ADNR shall consult ADF&G regarding authorizations involving uses that may impact musk ox concentrations and caribou calving and moose wintering habitat.

This sub-unit will be managed to maintain transportation and pipeline development while considering impacts on the habitat and harvest values and including general mitigation measures to avoid or minimize any potential negative effects. Lands are available for lease, permit, or other less-than-fee disposals. The North Slope Area Plan does not change or affect the North Slope Special Use Area, ADL 50666. The North Slope Area Plan does not prohibit the proposed addition of land to the Trans-Alaska Pipeline ROW to protect the transportation of oil resources.

**Public Notice:** Notice of this Analysis and Proposed Decision for the lease amendment request was published in the Anchorage Daily News, posted on the State of Alaska online Public Notice webpage, and on the Division of Oil and Gas Newsroom webpage on July 18, 2022, and published in the Arctic Sounder on July 21, 2022. This Notice will also be sent for posting in the Tuzzy
Analysis and Proposed Decision
Trans-Alaska Pipeline Right-of-Way Lease Amendments, ADL 63574
Bank Erosion Mitigation at Sagavanirktok River at Pipeline Milepost 20
Page 5 of 6

Consortium Library in Utqiagvik and the U.S. Post Offices in Prudhoe Bay and Utqiagvik on September 13, 2022.

If public comment indicates the need for significant changes in the proposed decision, additional public notice will be given on or after October 13, 2022. If no significant change is required, the proposed decision, including any minor changes, will be issued as the final decision of DNR after October 13, 2022, without further notice.

Analysis: AS 38.35, the Alaska Right-of-Way Leasing Act, sets forth the procedures by which certain ROW leases are granted by the State of Alaska and the conditions under which they can be amended. Pursuant to AS 38.35.010, it is the policy of the state that development, use, and control of a pipeline transportation system make the maximum contribution to the development of the human resources of this state, increase the standard of living for all its residents, advance existing and potential sectors of its economy, strengthen free competition in its private enterprise system and carefully protect its incomparable national environment.

Pursuant to AS 38.35.015, the Commissioner has the power to grant leases of state land for pipeline ROW purposes. The Commissioner found it to be in the best interest of the residents of the State of Alaska to issue the Trans-Alaska Pipeline ROW Lease, ADL 63574, on May 3, 1974, and the Renewal and Amendment of the ROW Lease on May 2, 2004. The terms, conditions, stipulations, and reservations contained in the Trans-Alaska Pipeline ROW Lease, ADL 63754, will apply to these lands if added to the Lease.

AS 38.35.020(a) requires the applicant to obtain a ROW lease for state land from the Commissioner. The bank erosion mitigation structure proposed will mitigate ongoing and prevent future erosion caused by progressive erosion and flood events for protecting Trans-Alaska Pipeline integrity and is consistent with the original purpose of the lease.

Erosion control structures are addressed under Stipulation 1.1.1.36 of the Trans-Alaska Pipeline ROW Lease, ADL 63574 that defines “Related Facilities”, as “… those structures, devices and improvements and sites, the substantially continuous use of which is necessary for the operation or maintenance of the Oil transportation pipeline, including … (8) retaining walls, berms, dikes, ditches, cuts and fills, including hydraulic control structures; …”.

Since the improvements will be outside the existing ROW boundaries, they require an additional disposal of interest in state land beyond what was included in the original terms of the Trans-Alaska Pipeline ROW Lease, ADL 63574. An amendment to the lease is required when there is a disposal of interest in state land or resources beyond what was reviewed and approved during the original adjudication.

Findings: The proposed project is integral to the protection of the pipeline. The erosion control structures are considered “Related Facilities”, as defined by the lease, and will be managed under the lease. The proposal to add the above-described land to the Trans-Alaska Pipeline ROW Lease, ADL 63574, is consistent with the lease. The terms, conditions and stipulations contained in the
Trans-Alaska Pipeline ROW Lease, ADL 63574, adequately address and protect the interests of the State of Alaska. The bank erosion mitigation project will moderate impacts from ongoing and future erosion and potential exposure of the buried pipeline during flooding events.

DNR will examine the project areas upon completion of the construction activities to ensure all lands are in a condition acceptable to the Commissioner. An as-built survey is required for the amendment to identify the additional ROW area and to depict the location of the bank erosion mitigation project in relation to the control line survey of the ROW. The as-built survey is to be submitted for review and acceptance by the Commissioner, pursuant to Section 1(e) of the Trans-Alaska Pipeline ROW Lease, ADL 63574, as amended.

The addition of these lands to the lease does not constitute a significant amendment to the lease; since the impact on state resources will be negligible and the project does not conflict with or significantly change existing use of the land. Approval of the request for the amendment to add the described land is consistent with state statutes and the terms of the lease. The lessee is required to secure all necessary permits or authorizations required by other local, state, and federal agencies.

**Proposed Decision:** I find that the request to amend the Right-of-Way Lease for the Trans-Alaska Pipeline, ADL 63574, to include the lands described in this proposed decision is in the best interest of the state and does not constitute a significant amendment to the lease.

If no significant change is required due to public comment or objection, then the proposed decision, including any minor changes, will be issued as the final decision of the Department of Natural Resources after October 13, 2022, without further notice.

Anthony Strupulis P.E. Date
State Pipeline Coordinator

9/12/2022

Attachment A: 2022 Rivers and Floodplains Improvements, Lower Sag River – MP 20, Bank Erosion Mitigation, Location and Vicinity Map (1 Page)

Attachment B: 2022 Rivers and Floodplains Improvements, Lower Sag River – MP 20, Bank Erosion Mitigation, Site Plan (1 Page)

Attachment C: 2022 Rivers and Floodplains Improvements Lower Sag River – MP 20, Bank Erosion Mitigation, Enlarged Site Plan (1 Page)

Attachment D: 2022 Rivers and Floodplains Improvements, Lower Sag River – MP 20, Bank Erosion Mitigation, Sections (2 Pages)
ADJACENT PROPERTY OWNER: STATE OF ALASKA

ALYESKA PIPELINE SERVICE CO.

2022 RIVERS AND FLOODPLAINS IMPROVEMENTS
LOWER SAG RIVER – MP 20 BANK EROSION MITIGATION LOCATION AND VICINITY MAP

DATE: 07/12/22

SCALE: AS NOTED

TRANS ALASKA PIPELINE SYSTEM

PLMP 20
BANK EROSION MITIGATION
69.988°N 148.688°W
T7N R14E SEC5 SE4
UMIAT MERIDIAN, ALASKA

DALTON HIGHWAY

FILE DATE:

FILENAME:

AUTOCAD DWG. DO NOT REVISE MANUALLY.
PROPOSED RIGHT-OF-WAY ADDITION AREA

BUFFER AREA
(~ 31 ACRES)

PROPOSED CONSTRUCTION AREA LIMIT
(68 ACRES APPROX, NOTE 1)

EXISTING GRAVEL BAR
(ACTIVE RIVER FLOODPLAIN)

ADOT GRAVEL PIT

TAPS WORKPAD
(48" MAINLINE B/G)

SITE ACCESS AND STAGING AREA
(1.8 ACRES APPROX)

DOWNSTREAM END OF GRAVEL BAR: OPENED TO RIVER PRIOR TO DEMOBILIZATION (TYP)

ALYESKA PIPELINE SERVICE CO.

TRANSLASKA PIPELINE SYSTEM

ADJACENT PROPERTY OWNER: STATE OF ALASKA

2022 RIVERS AND FLOODPLAINS IMPROVEMENTS
LOWER SAG RIVER – MP 20 BANK EROSION MITIGATION SITE PLAN

NOTE 1:
AREA OF EARTHWORK IS APPROXIMATELY 18 ACRES. SEE SECTION A FOR DETAILS ON TEMPORARY PROTECTIVE GRAVEL BERM.

PLASt 1028+50

PLASt 1059+50

SCALE: 1" = 400'

PLAN

GRAPHIC SCALE

N

0

400

800

FEET

PHOTO DATE: 2013

DATE: 04/18/22

PLATE 2

SCALE: AS NOTED

SHEET 2 OF 4

AUTOCAD DWG. DO NOT REVISE MANUALLY.
ESTIMATED MATERIAL QUANTITIES

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* Riprap placed discretely in sand and gravel fill to provide reinforcement as rock vanes

TYPICAL SECTION

Scale: 1" = 15'

ADJACENT PROPERTY OWNER: STATE OF ALASKA

ALYESKA PIPELINE SERVICE CO.

2022 RIVERS AND FLOODPLAINS IMPROVEMENTS
LOWER SAG RIVER - MP 20 BANK EROSION MITIGATION
SECTIONS

TRANS ALASKA PIPELINE SYSTEM

DATE: 07/12/22

PLATE 4

SCALE: AS NOTED

FILE SHEET: 4 OF 5