FedEx ANCA Facility

Final Environmental Assessment

February 2024

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Approved By:

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2/1/2024

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Alaska Region

Date

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TABLE OF CONTENTS

Figures

Tables

Appendices

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1.0 PURPOSE AND NEED

1.1 INTRODUCTION

The purpose of the National Environmental Policy Act (NEPA) process is to fully consider and disclose to the public the environmental effects of a proposed federal action and its reasonable alternatives. This Environmental Assessment (EA) identifies and evaluates potential environmental effects related to the proposed relocation, construction, and operation of the FedEx Express (FedEx) ANCA Facility at Ted Stevens Anchorage International Airport (ANC or Airport).

The Federal Aviation Administration (FAA) is the lead federal agency to ensure compliance with NEPA for airport development actions. This EA is prepared in accordance with NEPA, as amended, Council of Environmental Quality (CEQ) *Regulations for Implementing the Procedural Provisions of NEPA*, FAA Order 1050.1F, *Environmental Impacts: Policies and Procedures*, 1050.1F Desk Reference, and FAA Order 5050.4B, *National Environmental Policy Act (NEPA) Implementing Instructions for Airport Actions*, applicable Executive Orders (EOs), and other applicable federal, state, and local requirements.

1.2 PROJECT BACKGROUND

1.2.1 Description of Existing Airport

The Airport is located adjacent to the Cook Inlet in Alaska on the westernmost mainland point of the Municipality of Anchorage, the populated urban area known commonly as Anchorage, Alaska. ANC covers 4,210 acres of land, not including Lake Hood Airport, and is located approximately four miles southwest of downtown Anchorage (see **Figure 1-1** for the location of the Airport). The Airport is generally bounded by Point Woronzof Road and Airport Maintenance Road to the west, Raspberry Road to the south, Jewel Lake Road to the east, and Northern Lights Boulevard to the north.

The Airport is owned and operated by the State of Alaska Department of Transportation and Public Facilities (DOT&PF). In the National Plan of Integrated Airport Systems (NPIAS), the FAA classifies the Airport as a medium hub, primary commercial service airport (FAA, 2022a).

1.2.2 Existing Runways and Passenger Terminal Building

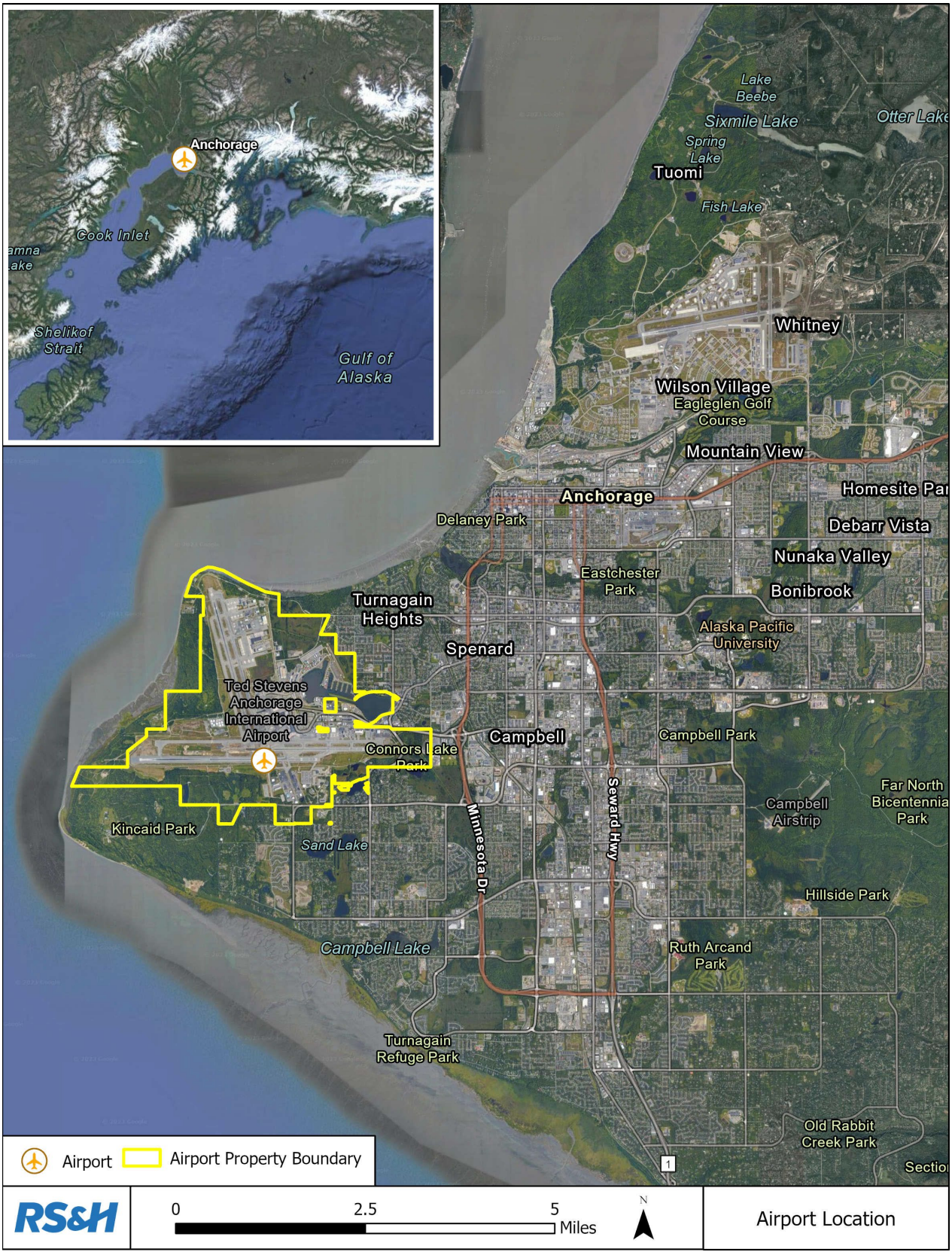
1.2.2.1 Existing Runways

The Airport has three runways; two parallel runways (7L-25R and 7R-25L) oriented in an east-west direction and a single runway (15-33) oriented in the north-south direction. Runway 7L-25R is 10,600 feet long and 150 feet wide; Runway 7R-25L is 12,400 feet long and 200 feet wide; and Runway 15-33 is 10,865 feet long and 150 feet wide (FAA, 2023).

1.2.2.2 Existing Passenger Terminal Buildings

The Airport's terminal area is comprised of the North and South terminals. The South Terminal serves Concourse A, Concourse B, and Concourse C. The North Terminal largely handles international flights, charter flights, and military flights and has eight aircraft gates.

Figure 1-1 Airport Location



The South Terminal is a four-level structure that provides facilities for passenger processing, inbound and outbound baggage, and 27 aircraft gates for passenger boarding and deboarding. Gates within Concourse A are ground-loading, and one gate within Concourse B has been turned into a concessions space.

The North Terminal is a three-level structure that provides facilities for passenger boarding and deboarding, ticketing/check-in lobby, passenger security screening, inbound and outbound baggage, cargo processing, concessions, and eight aircraft gates.

The South Terminal is connected to the North Terminal via a weather-protected, enclosed, connected corridor that extends from the north side of Concourse C to the south side of the North Terminal baggage claim area.

1.2.3 Existing FedEx Cargo Facilities

ANC is the third busiest cargo airport in the world. Cargo carriers at the Airport provide cargo and mail services to approximately 30 destinations. FedEx operates a major air cargo handling facility at the Airport. The Airport also serves as FedEx's primary courier delivery services processing center for the State of Alaska including the local Anchorage market area.

FedEx's existing operations area is accessible via Rockwell Avenue off of North Tug Road and Postmark Drive (see **Figure 1-2** for the FedEx operations area) and consists of 12 cargo aircraft parking positions, various ground service storage areas located adjacent to the main cargo processing buildings, and a taxilane that extends from Taxilane U to Taxiway T.

FedEx currently occupies buildings 115,116,120, 121, and 123 (see **Figure 1-2**) at North Airpark, which is a 646-acre area located north of the passenger terminal complex and east of Taxiway R. The majority of the buildings in the North Airpark are used for cargo purposes. The existing FedEx facilities at the Airport include space for the following activities: warehousing, equipment maintenance, ground service equipment storage and maintenance, cargo processing and sortation, aircraft storage, office work, employee training, snow storage, and employee parking. In addition, there is a dedicated fire suppression water system for the FedEx facilities.

On an average day, FedEx has 26 wide-body flights arriving or departing from the Airport, and six outbound feeder flights and five inbound feeder flights. Their sorting facility processes between 5,000 to 7,000 packages per hour and between 60,000 and 180,000 packages a day.

1.2.4 Aviation Activity

The FAA publishes the annual Terminal Area Forecast (TAF) for each airport in the federal system. TAF data is reported based on the FAA fiscal year, which is October through September.

The FAA released the 2022 TAF, which was the most recent version when the preparation of this EA began. There were 282,587 aircraft operations that took place in the 2021 fiscal year; and there are 315,067 aircraft operations forecast for 2026 fiscal year, when the Proposed Action would become operational (FAA, 2022b). Of the total aircraft operations in 2021, 128,674 operations were by cargo air carriers. FedEx, with an average of 26 flights a day to and from the Airport, encompassed about seven percent of all air carrier operations that occurred in the 2021 fiscal year.

Figure 1-2 Existing FedEx Operations Area

1.3 PURPOSE AND NEED FOR PROPOSED ACTION

The following section discusses the purpose of and need for the Proposed Action.

1.3.1 Purpose of the Proposed Action

The purpose of the Proposed Action is to provide suitable FedEx air cargo facilities at ANC to accommodate existing and future demand for cargo operations, increase operational efficiencies through new and improved cargo and airline support facilities, and be consistent with the Airport's long-term plans. The purpose and need of the FAA's action is to evaluate the DOT&PF request to update their ALP associated with the proposed FedEx ANCA Facility project and meet its statutory obligations under 49 U.S.C. 47101 and Section 163 of the 2018 FAA Reauthorization Act.

1.3.2 Need for the Proposed Action

The existing FedEx ANCA Facility at ANC is inadequate to meet FedEx's requirements for a delivery and sortation support facility. The existing facility does not provide the space needed for existing international and regional FedEx operations to occur efficiently as the facility was not designed to accommodate both operations at the existing level of demand. Simultaneous operations by numerous cargo aircraft, ground support, loading, and surface vehicles must be accommodated within pre-determined time periods that are predicated by next-day delivery schedules. FedEx has determined that to meet its operational goals, the integration of additional sorting facilities that would separate regional and international operations is required.

FedEx has indicated that simultaneous operations by numerous cargo aircraft, ground support, loading, and surface vehicles must be possible within pre-determined time periods that are predicated by next-day delivery schedules. Current air cargo facilities have historically met this need, but not resourcefully. Regular processing delays require that the proposed separation of facilities is necessary to maintain efficient operation.

1.4 SCOPE OF ENVIRONMENTAL ANALYSIS

The contents of each section of this EA are summarized below:

- Chapter 1 – Purpose and Need, provides a brief description of the Airport and the Proposed Action, its purpose and why it is needed.
- Chapter 2 – Alternatives, provides an overview of the identification and screening of alternatives considered as part of the environmental evaluation process.
- Chapter 3 – Affected Environment and Environmental Consequences, describes existing environmental conditions within the project study area and compares the environmental impacts associated with the Proposed Action, the No Action Alternative, and mitigation options considered.
- Chapter 4 – Cumulative Impacts, identifies and discusses the incremental effects of the Proposed Action on an environmental resource when added to effects on that resource due to past, present, and reasonably foreseeable projects on the Airport and within the vicinity of the Airport.
- Chapter 5 – Conclusion, identifies whether or not the described impacts are significant and summarizes any mitigations that reduce adverse impacts.

- Chapter 6 – List of Agencies Contacted, identifies which agencies have been consulted during the EA process.
- Chapter 7 – List of Preparers
- Chapter 8 – References

1.5 PUBLIC/AGENCY INVOLVEMENT

Under 40 CFR 1501.4, federal agencies are required to involve environmental agencies, applicants, and the public, to the extent practicable, in preparing EAs. The primary components of the agency coordination and public involvement program for the EA include:

- distribution of initial scoping letters to agencies;
- an agency scoping meeting;
- a public scoping meeting;
- publication of the Draft EA for agency and public review;
- a public workshop; and
- preparation of a Final EA that will include responses to comments received on the Draft EA.

Keeping agencies and the public informed and gathering input from each is an essential component of any environmental study. The following sections summarize the agency coordination and public involvement program for this EA.

1.5.1 Cooperating Agencies

There are no cooperating or participating agencies for this EA.

1.5.2 Agency and Organization Coordination

As part of initial scoping coordination efforts, on January 23, 2023, FedEx submitted, via email, invitations to comment on the scope of the EA and attend a scoping meeting on February 16, 2023. In total, eight federal, state, or local agencies and nine community-based organizations were contacted. The comments received were incorporated into the environmental studies where applicable. **Appendix A** includes the requests for comments sent to the agencies and organizations, confirmation of electronic delivery, and copies of responses received.

1.5.3 Public Involvement

1.5.3.1 Scoping

FedEx published a public notice with the Anchorage Daily News on January 23, 2023, announcing that it was holding a public scoping meeting on February 16, 2023, for the Proposed Action. The public scoping meeting was held in person on February 16, 2023, from 6:00 p.m. to 7:30 p.m. Alaska Standard Time (AKST) at the Coast Inn at Lake Hood in Anchorage. There were five attendees at the public scoping meeting. The format of the public scoping meeting was an open house with poster boards for the public to walk through and ask questions at their own pace. The poster boards covered a brief overview of NEPA and the NEPA process, the

purpose and need for the project, and the proposed scope for the environmental analysis of potentially affected resource categories, along with how to provide comments during the 30-day scoping period. Members of the public had an opportunity to ask questions and converse with FedEx staff and the EA consultant team. In addition, members of the public were given the opportunity to submit written comments during the scoping meeting. FedEx received no written comments during the public scoping meeting. A total of two comments, one from an agency and one from a community-based organization, were received during the 30-day comment period that ended on March 20, 2023, at 5:00p.m. AKST. **Appendix A** includes materials from the public scoping meeting and all comments received.

1.5.3.2 Public Draft EA

The Draft EA was available for review by the general public, government agencies, and interested parties for a period of 47 days. The Notice of Availability (NOA) of the Draft EA and information on the scheduled public open house was published in the Anchorage Daily News, notification on the State of Alaska Online Public Notification System and through the State of Alaska GovDelivery, and emailed to parties who had requested notification during the scoping period. The Draft EA was available electronically on the project website (https://bit.ly/ANCA-EA) and on the Airport's website (https://dot.alaska.gov/anc/). Hard copies of the Draft EA were available for public review at the DOT&PF offices (4111 Aviation Avenue, Anchorage, AK 99519) and at the Z.J. Loussac Library (3600 Denali Street, Anchorage, AK 99503).

A public open house was held during the Draft EA comment period on Tuesday, October 17, 2023, from 6:00 p.m. to 7:30 p.m. Alaska Daylight Time (AKDT) at the Coast Inn at Lake Hood in Anchorage (3450 Aviation Ave, Anchorage, AK 99502).

Comments on the Draft EA could be submitted during the comment period in writing at the public open house, electronically to Karin.Bouler@rsandh.com, or via mail to RS&H, Attn: Karin Bouler, 311 California Street, Suite 720, San Francisco, CA 94104. Written comments were accepted until 5:00 PM AKDT on Tuesday, October 31, 2023. The public was advised that before including their address, phone number, e-mail address, or other personal identifying information in their comment, that their entire comment – including their personal identifying information – may be made publicly available at any time.

Copies of the materials from the public open house, comments received during the comment period, and responses to those comments are provided in **Appendix A**.

1.5.4 Summary of Revisions to Draft EA

The following is a summary of the text changes to the EA, reflecting necessary revisions in response to comments or that were initiated to correct the Draft EA.

- The Table of Contents was updated to reflect this additional section (Section 1.5.4), the addition of the cumulative construction noise section (Section 4.1.5), the change of section number of the cumulative water resources section (Section 4.1.6), and any page number changes resulting from the text revisions. The list of appendices was also added to the Table of Contents.
- **Section 1.3.2** was updated to include additional detail as to the "need" for the Proposed Action.

- **Section 1.5.3.2** was updated to provide details of the Draft EA public comment period, including Draft EA availability information, how comments were received, and details of the public open house.
- **Section 1.5.4** was added to summarize the revisions to the Draft EA that are included in the Final EA.
- **Section 2.1.2** was updated to clarify that only regional operations would be moved from the existing FedEx ANCA Facility to the new facility. Domestic operations would remain at the existing facility. The construction of grassed swales and a detention basin was added to the list of components of the Proposed Action. A statement was added indicating that the site is being developed in a manner that inhibits stormwater from interacting with potentially contaminated groundwater.
- **Section 2.1.4** (Table 2-1) was updated to reflect any revisions made to Section 3.
- **Section 3.2** was updated to let the reader know that tribal consultation documentation has been added to Appendix C. The zoning designation was added under Land Use.
- **Section 3.3.2.3** was updated to reference the FAA's Aviation Emissions and Air Quality Handbook to clarify why an emissions inventory is not required for the Proposed Action.
- **Section 3.5.2.3** was edited for clarity purposes, including clarifying that the construction emission estimates would be spread out over two years, rearranging some sentences, and separating paragraphs in the operational discussion. Table 3-3 was added to provide estimates of the social cost of GHG emissions during construction and operation of the Proposed Action.
- **Section 3.6.2.3** was updated to include additional details related to the treatment of contaminated groundwater, during construction and operation, and information related to on-going water quality monitoring that would continue beyond construction.
- **Section 3.8.2.3** was revised to describe noise attenuation in greater detail, to add an evaluation of multiple pieces of construction equipment, and to reference the Airport's FAR Part 150 Compatibility Study Update. Clarification was also added that the Proposed Action would not result in any change to aircraft operations and an approximate distance was added for the proposed aircraft parking apron relative to the existing apron.
- **Section 3.10.4.2** was updated to include information about the on-going water quality monitoring of Postmark Bog.
- **Section 4.0** was updated to refer to the cumulative study area instead of a 3-mile radius and a description of how the cumulative boundary was determined was added. Table 4-1 was updated to revise the construction years for the Cargo and Cold Storage Facility to 2024-2026 from 2023-2025.
- **Section 4.1** was updated add construction noise to the list of environmental categories evaluated for cumulative impacts and to specify that operational noise was not evaluated for cumulative impacts.

- **Section 4.1.1** was revised to remove “and operation” from the first sentence, to add discussion of the Alaska Cargo and Cold Storage Project’s in relation to cumulative construction emissions, and to remove “construction and” from the second to last sentence.
- **Section 4.1.2** was revised to include the CEQ’s interim guidance on cumulative climate analysis and to discuss the Alaska Cargo and Cold Storage Project in relation to cumulative climate impacts, including quantifying the combined greenhouse gas (GHG) emissions for the Alaska Cargo and Cold Storage Project and the Proposed Action.
- **Section 4.1.3** was revised to add “also” following “Reasonably foreseeable projects would . . .”; to correct the title of Section 3.6, to state that the environmental management plan (EMP) details the plan to treat contaminated water and materials onsite; and to discuss the Alaska Cargo and Cold Storage Project in relation to cumulative hazardous materials, solid waste, pollution prevention impacts.
- **Section 4.1.5** was added to discuss cumulative construction noise impacts, specifically in relation to the Alaska Cargo and Cold Storage Project.
- **Section 4.1.6** was renumbered from Section 4.1.5 in order to keep the cumulative discussions in the same resource order as they appear in **Chapter 3**.
- **Section 4.1.6.1** (formerly Section 4.1.5.1) was revised to include additional detail, including the description of the USACE-identified geographic scope for cumulative wetland impacts as well as the USACE determination “that the incremental contribution of the Proposed Action to cumulative impacts in the area are not significant.”
- **Section 4.1.6.2** (formerly Section 4.1.5.2) was revised to add in mention that the Alaska Cargo and Cold Storage Project also has an approved EMP that includes soil handling, stormwater management, and groundwater management procedures at the site and to change “Best Management Practices” to “BMPs” in the second paragraph since the acronym has already been defined. A discussion of long-term management of contaminated soils and groundwater was also added.
- **Section 5.1** (Table 3-1) was revised to account for any revisions made throughout Section 3.
- **Section 5.2** was revised to include the EMP.
- **Section 6.2** was added to include Tribal Consultation.
- **Section 6.3** was renumbered from Section 6.2.
- **Section 6.4** was renumbered from Section 6.3 and was updated to identify Cathy Gleason as the Vice President and Acting President of the Turnagain Community Council.
- **Section 6.5** was renumbered from Section 6.4.
- **Section 8.0** was updated to include the CEQ reference that was added in Section 4.1.2.
- **Appendix C** was updated to include the tribal consultation letters. The title of Appendix C was updated from “Cultural Resources” to “Cultural and Tribal Resources.”

1.6 FEDERAL ACTION REQUESTED

The following federal action and approval is requested from the FAA. The Project Sponsor may not implement the Proposed Action prior to FAA approval.

- Unconditional approval of portions of the Airport Layout Plan (ALP) that depict the Proposed Action.

2.0 ALTERNATIVES TO THE PROPOSED ACTION

This EA discloses the environmental impacts that would result from implementation of the Proposed Action, the reasonable alternatives to the Proposed Action, and the No Action Alternative. The FAA has the responsibility to:

- Identify a range of reasonable alternatives that fulfill the purpose and need for the Proposed Action, as described in Title 40, or the Code of Federal Regulations (CFR), § 1502.14, and FAA Order 1050.1F, paragraph 7-1.1(e). At a minimum, the range of reasonable alternatives will include the Proposed Action and the No Action Alternative.
- Discuss the reasons that an alternative was eliminated from detailed study (40 CFR § 1502.14[a]) (1978).
- Identify the FAA's preferred alternative, unless an applicable law prohibits the expression of such a preference (40 CFR § 1502.14[e]) (1978).

As stated in FAA Order 1050.1F, paragraph 6-2.1(d):

> *"(t)here is no requirement for a specific number of alternatives or a specific range of alternatives to be included in an EA. An EA may limit the range of alternatives to the proposed action and no action when there are no unresolved conflicts concerning alternative uses of available resources. Alternatives are to be considered to the degree commensurate with the nature of the proposed action and agency experience with the environmental issues involved."*

2.1.1 No Action Alternative

Under the No Action Alternative, FedEx would not develop the ANCA Facility and supporting elements and no physical changes to FedEx operations area would occur. All operations would remain at the existing ANCA facility.

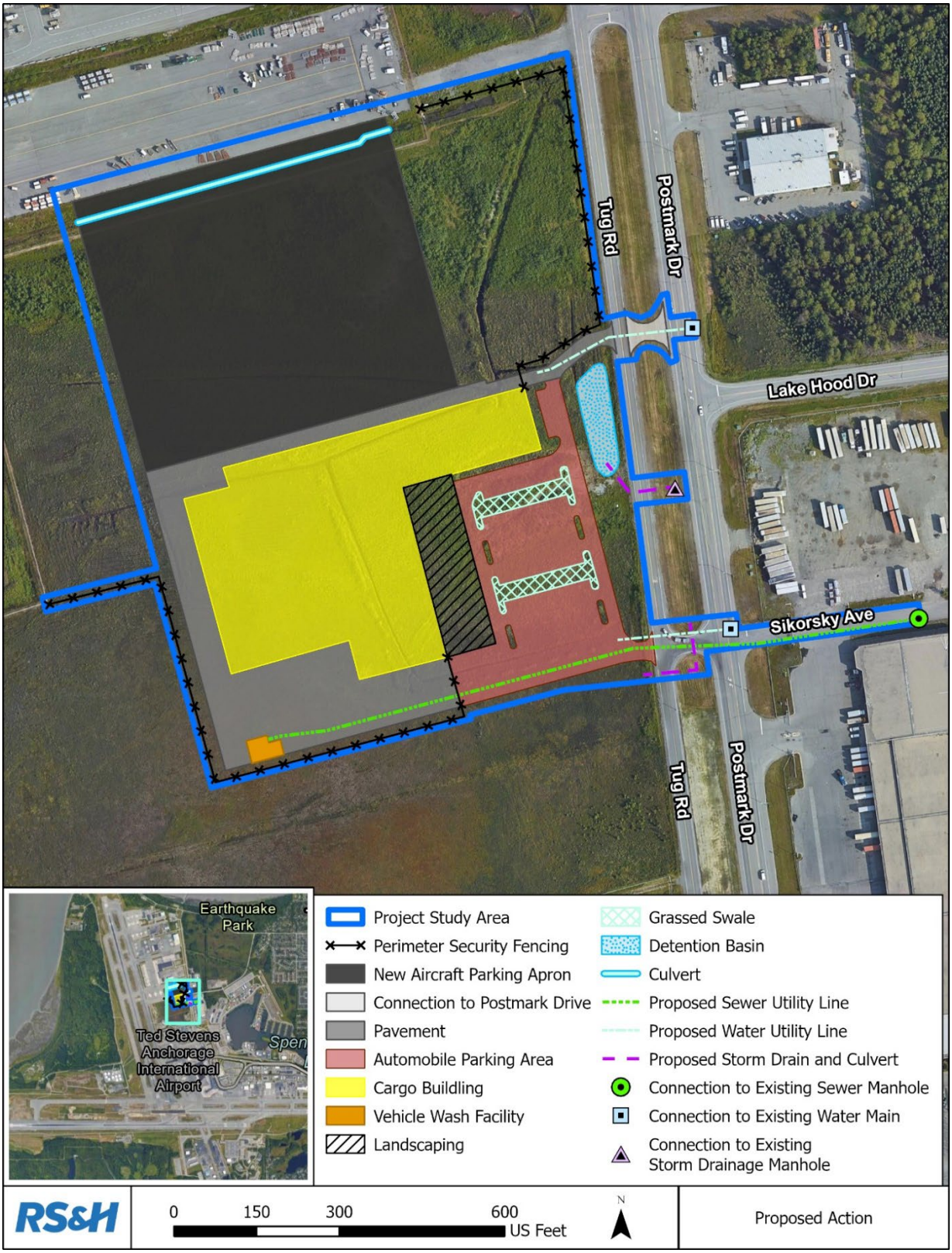
2.1.2 Proposed Action (Preferred Alternative)

The Proposed Action would relocate regional operations at the FedEx ANCA Facility to an adjacent area south of the existing facility and Taxilane U, on a 21.9-acre parcel that has been leased from the Airport. International operations would remain at the existing facility. The separation of regional and international operations would reduce processing delays and allow FedEx to efficiently meet existing consumer demand.

The Proposed Action (see **Figure 2-1**) would consist of the following components:

- construct two new buildings (an approximately 186,000-square-foot package sorting facility and an associated 2,100-square-foot vehicle wash building);
- construct an automobile parking area (261,403 square feet, including paved area surrounding buildings);
- construct a feeder aircraft parking apron (339,924 square feet), which is also referred to as the new aircraft parking apron, and culvert the existing drainage ditch at this location;
- construct a connection to Postmark Drive;

Figure 2-1 Proposed Action



- construct grassed swales and a detention basin to treat the increase in stormwater runoff;
- install new perimeter security fencing; and
- extend the water, storm drain, and sanitary sewer utilities off-site to connect into existing utilities under Tug Road, Postmark Drive, and Sikorsky Avenue.

The site is being developed in a manner that inhibits stormwater from interacting with potentially contaminated groundwater. The buildings would be built on Geopier Rammed Aggregate Piers® (RAP)[1] (Geopier, 2023) south of the ramp extension using a structural slab to reduce surcharging requirements. The parking area would be located east of the building and connected to North Tug Road and Postmark Drive via a short driveway. A silt fence would be placed along the edge of the disturbed area during construction.

Approximately 142,500 cubic yards of classified fill and backfill and 21,642 cubic yards of cut would be required in order to construct the facilities. The cut would remain onsite and be relocated adjacent to the cut areas or to another area of the site. Approximately 6,600 cubic yards of asphalt concrete (AC) pavement would be required as well as 2,900 cubic yards of Portland cement concrete (PCC) pavement.

Once the Proposed Action has been completed regional operations would be managed out of the new facility, with international and conterminous United States operations remaining in the existing facility. Currently, all operations are being managed out of the existing facility.

Construction of the Proposed Action is anticipated to start in May 2024 and be completed by September 2026.

2.1.3 Alternatives Development and Comparison

This section lists the reasonable alternatives, describes the process for screening the alternatives, and the results of the process. Only practicable alternatives are considered in this alternatives analysis. “Practicable” is defined as those that were or could become available and can potentially be implemented with the logistics, technology, and cost that meet the purpose of the Proposed Action.

2.1.3.1 Alternatives Considered but not Carried Forward

Specifications for potential off-site sorting facility locations included appropriately zoned sites greater than 10 acres within a 15-mile radius of the Airport. Three off-site alternative sites were considered for the sorting facility. The potential off-Airport sites are located near each other and are approximately 7.5 miles from the proposed feeder ramp location. **Figure 2-2** shows the location of the off-Airport sites.

[1] Geopier System (RAP) is a ground improvement method that prestrains and prestresses the soil using soil replacement and soil displacement technology to strengthen soft soil and loose soil with very dense, stiff, rock columns constructed by heavy equipment crowd force and vertical impact ramming.

Figure 2-2 Locations of Off-Site Alternatives

Off-Site Alternatives Locations Overview

Option 1

Option 2

Option 3

Option 1 – 151 West 100th Avenue

Option 1 is a 26.62-acre parcel located at 151 West 100th Avenue. The parcel is zoned for industrial uses and is currently used as a small truck terminal. The parcel has relatively level topography and is on-market for sale. Option 1 would be located 7.5 miles from the proposed feeder ramp location and a separate feeder ramp from the sorting facility would be inefficient and would not meet the purpose and need. Therefore Option 1 was not carried forward for further analysis.

Option 2 – 100th and C Street

Option 2 is a 27.26-acre parcel located at the West 100th Avenue and C Street intersection. The parcel is zoned for industrial uses and the current owner has indicated that there is the potential to divide the parcel. The parcel is currently undeveloped other than some utilities and contains deep peat that would require excavation and replacement with appropriate fill material in order to develop. The parcel is currently not on the market for sale. Option 2 would be located 7.5 miles from the proposed feeder ramp location and a separate feeder ramp from the sorting facility would be inefficient and would not meet the purpose and need. Therefore Option 2 was not carried forward for further analysis.

Option 3 – Cook Inlet Region, Inc. (CIRI)

Option 3 is a 19.83-acre parcel located at the C Street and Walter J. Hickel Parkway intersection. The parcel is zoned for industrial uses and the current owner has indicated that there is the potential to divide the parcel. The site has been surcharged for development and utility connections are present at the corner of the parcel. The parcel is currently not on the market for sale. Option 3 would be located 7.5 miles from the proposed feeder ramp location and a separate feeder ramp from the sorting facility would be inefficient and would not meet the purpose and need. Therefore Option 3 was not carried forward for further analysis.

2.1.3.2 Screening Process

The proposed sorting facility is directly tied into the feeder ramp and alternative on-Airport ramps or properties adjacent to the FedEx facility are currently unavailable. As such, the location of the feeder ramp is not considered to have any alternatives and any alternatives that would separate feeder ramp from the sorting facility would be inefficient and would not meet the purpose and need. Therefore, the only reasonable alternatives to assess are the No Action Alternative and the Proposed Action, which is the preferred alternative.

2.1.4 Comparison of Environmental Impacts

Environmental effects of the Proposed Action are discussed in **Chapter 3**. A discussion of the environmental impact categories considered but found to have no impact from the Proposed Action can be found in **Section 3.2**. **Table 2-1** compares the potential environmental effects of the No Action Alternative and the Proposed Action for those environmental categories that may be affected.

Table 2-1 Comparison of Environmental Impacts by Alternative

Resource	No Action Alternative	Proposed Action
Air Quality	No effect	• Not expected to result in an exceedance of any air quality pollutants based on NAAQS standards. • Not considered a "major source of air pollutants."
Biological Resources	No effect	• No removal of any trees or structures that may be used as nesting habitat for migratory birds protected by the Migratory Bird Treaty Act. • No effect on any endangered or threatened species.
Climate	No effect	• Temporary increase in CO_2 emissions over the duration of construction (2,474 metric tons over two years). • No changes to aircraft operations or surface traffic. • The new facility would produce 1,144 metric tons of CO_2 per year, which is not expected to be a significant effect to climate.
Hazardous Materials, Solid Waste, and Pollution Prevention	No effect	• Presence of contaminated groundwater, soil, and peat. • Potential for the Proposed Action to temporarily impact and displace per- and polyfluoroalkyl substances (PFAS)-contaminated groundwater. • Would generate relatively small amounts of solid waste from construction that would be disposed of at the local landfill, which has the capacity to receive the solid waste and be of low significance.
Natural Resources and Energy	No effect	• Temporary increase the consumption of energy and natural resources in the form of fuel, lubricants, and other construction materials necessary to build the proposed facility. • Would extend the water, storm drain, and sanitary sewer utilities off-site to connect into existing utilities under Tug Road, Postmark Drive, and Sikorsky Avenue • Energy demands would not exceed available or future energy supplies.
Noise	No effect	• Construction noise level would not likely be perceptible over typical ambient noise levels of the Airport. • Operation of the Proposed Action would have no effect on noise setting at the Airport.

Visual Resources	No effect	• Light Emissions: Lighting installed would be consistent with that of an airport and would not create annoyance or interfere with normal activities from light emissions or affect the visual character of the area due to the light emissions. • Visual Resources and Character: The proposed facility would be in character with the surrounding Airport uses and would not result in viewshed changes for residents or a community off-Airport property.
Water Resources	No effect	Wetlands: • Proposed Action would affect 14.32 acres of depressional wetlands, which would be mitigated with the purchase of wetland compensatory mitigation credits. • A culvert would be constructed at the existing drainage ditch along the north side of the project study area to continue to allow uninterrupted drainage flow under the proposed new aircraft parking apron. Floodplains: • The Proposed Action would not occur within any existing floodplain. Surface Water: • There are no surface waters within the project study area or on Airport property. • The amount of impervious surfaces would increase by about 18.7 acres and increase the amount and rate of stormwater runoff within the project study area. • The Proposed Action includes grassed swales and a detention basin in order to reduce stormwater runoff and reduce any potential effects to stormwater. Groundwater: • Construction of the Proposed Action may affect groundwater resources.

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3.0 AFFECTED ENVIRONMENT AND ENVIRONMENTAL CONSEQUENCES

3.1 INTRODUCTION

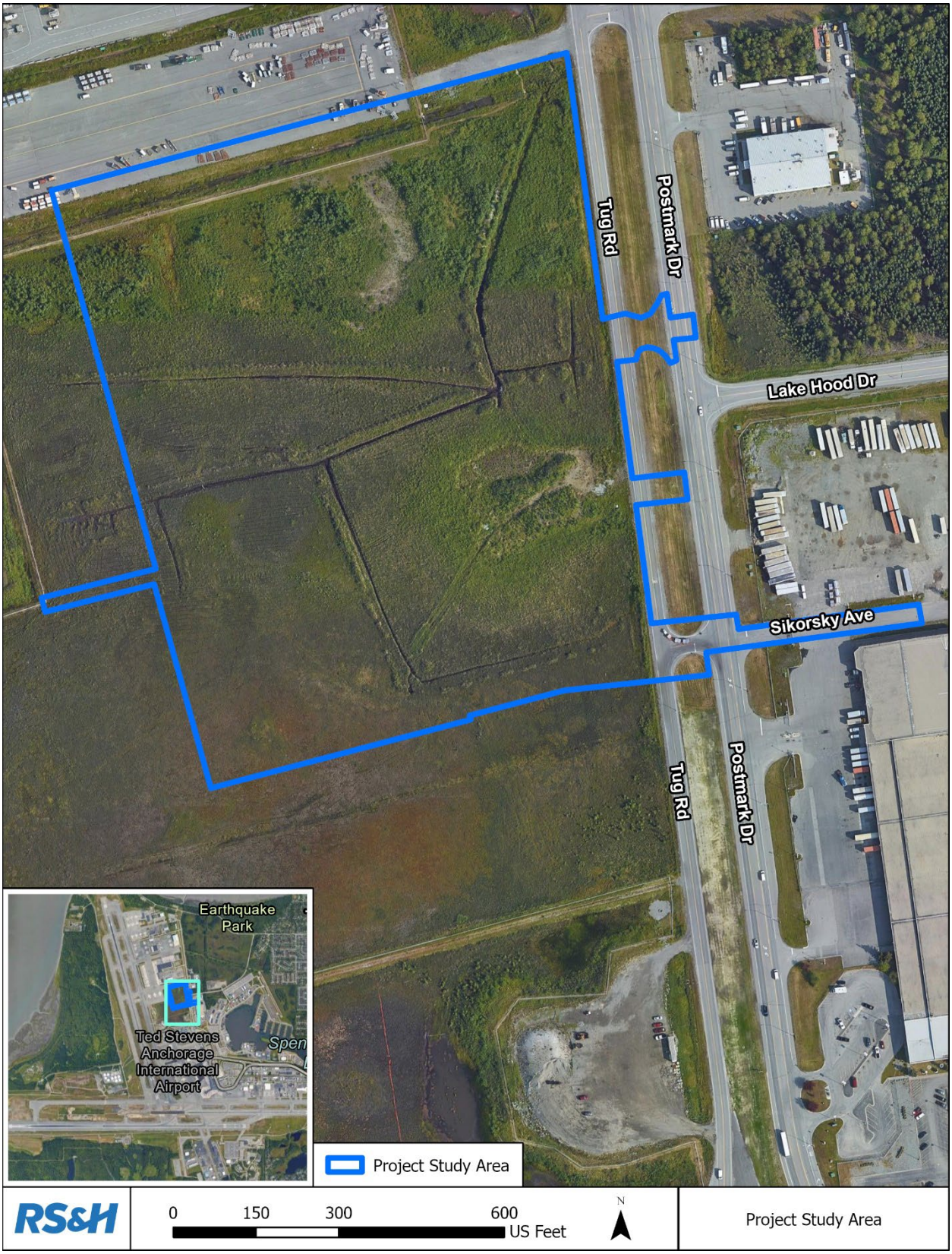
For the purposes of the analysis in this EA, a project study area (see **Figure 3-1**) has been developed and is used to describe the affected environment and the potential environmental consequences associated with the implementation of the Proposed Action..

This section provides an overview of the existing environmental conditions within the project study area. This section also describes the regulations, significance thresholds, methodology used, potential environmental effect that the Proposed Action would have on the affected environment, and any proposed mitigation that would be implemented to minimize impacts from the Proposed Action. As required by FAA Orders 1050.1F and 5050.4B, this EA considers the following environmental resource categories outlined in FAA Order 1050.1F, paragraph 4-1:

- Air Quality
- Biological Resources
- Climate
- Coastal Resources
- Department of Transportation Act (U.S. DOT), Section 4(f)
- Farmlands
- Hazardous materials, solid waste, and pollution prevention
- Historical, architectural, archeological, and cultural resources
- Land use
- Natural resources and energy supply
- Noise and noise-compatible land use
- Socioeconomics, environmental justice, and children's environmental health and safety risks
- Visual effects
- Water resources (including wetlands, floodplains, surface waters, groundwater, and wild and scenic rivers)

Appendix B lists the regulations and significant thresholds associated with each environmental resource category listed above.

Figure 3-1 Project Study Area



3.2 RESOURCE AREAS WITH NO POTENTIAL FOR EFFECTS

Coastal Resources
According to the National Oceanic and Atmospheric Administration (NOAA), the State of Alaska stopped participating in the federal Coastal Zone Management Act in 2011 and no longer has a Coastal Zone Management Plan (National Oceanic and Atmospheric Administration, 2022a). Although the Municipality of Anchorage has its own Coastal Management Plan (Municipality of Anchorage, 2007), it cannot be effectively implemented without a State plan. According to 15 CFR 930.32(a), federal law requires "federal agencies, whenever legally permissible, to consider state management programs as supplemental requirements to be adhered to in addition to existing agency mandates."

According to the U.S. Fish and Wildlife Service (USFWS), the closest Coastal Barrier Resource System to the project study area is Minnesota Point, located approximately 2,450 miles southeast of the Proposed Action (U.S. Fish and Wildlife Service, 2022a). In addition, there are no National Marine Sanctuaries within the project study area. The closest National Marine Sanctuary is the Olympic Coast, located approximately 1,350 miles southeast of the project study area (National Oceanic and Atmospheric Administration, 2022b). Because the Proposed Action would occur entirely on Airport property and is not near any coastal resources, the Proposed Action would not result in impacts to coastal resources.

Department of Transportation Act (U.S. DOT), Section 4(f)
There are no Section 4(f) resources located within the project study area. The closest recreational parks are Earthquake Park, located 0.5-mile northeast of the project study area, and Point Woronzof Park, located about 0.75-mile west of the project study area (Municipality of Anchorage, 2023a). The closest wildlife refuge is Anchorage Coastal Wildlife Refuge, located about 10-miles southeast of the project study area, and the closest state park is 10-miles to the east of the project study area (U.S. Forest Service, 2023). The closest historical resource listed on the National Register of Historic Places (NRHP) is the KENI Radio Building, which is approximately 2.5 miles northeast of the project study area (National Park Service, 2023). Due to the distance from the closest Section 4(f) resources, the Proposed Action would not result in any "use" of a Section 4(f) resource.

Farmlands
According to the U.S. Department of Agriculture, there are no prime, unique, state, or locally important farmlands in/ near the project study area (Natural Resources Conservation Service, 2022). In addition, the Proposed Action does not entail the acquisition and conversion of any farmland. Therefore, the Proposed Action would not affect any farmland resources.

Historical, Architectural, Archeological, and Cultural Resources
For the purposes of this analysis, the Area of Potential Effects (APE) is the same as the project study area. A Cultural Resources Technical Report was prepared to identify cultural resources within the project study area (see **Appendix C**).[2] The APE has been substantially modified and disturbed as the result of previous Airport and road expansion and upgrade projects as well as for water containment and removal. No buildings or other structures are present within the APE.

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[2] The portions of the project study area for utility connections that are under existing roadways (Tug Road, Postmark Drive, and Sikorsky Avenue) were not included in the pedestrian field survey as they are already paved and inaccessible without demolishing the pavement.

The cultural resources report did not identify any cultural resources and determined that there was low potential for the APE to contain cultural resources.

As no historical, architectural, archaeological, and cultural resources were identified in the cultural resources report, a finding of No Historic Properties Affected was recommended for the Proposed Action. A Findings Letter was sent to the State Historic Preservation Office (SHPO) on July 19, 2023, requesting a finding of No Historic Properties Affected. The SHPO responded with concurrence agreeing to a finding of No Historic Properties Affected on August 18, 2023 (see **Appendix C** for SHPO documentation).

Letters initiating tribal consultation were sent to the Chickaloon Native Village, the Knik Tribal Council, and the Eklutna Native Village on July 19, 2023 (see **Appendix C** for documentation of tribal consultation). No response was received.

Land Use

According to the Municipality of Anchorage, the project study area has a land use designation for “Airport, Railroad, or Port Facilities” (Municipality of Anchorage, 2023b) and is zoned by the Municipality of Anchorage as “Transitional” (Municipality of Anchorage, 2024). The Proposed Action would occur entirely on Airport property on land leased from the Airport to FedEx, would be consistent with the plans and goals of the local community, would not alter the characteristics of the Airport or local community, and would not disrupt any nearby communities or planned development. Therefore, the Proposed Action would not result in any land use impacts.

Socioeconomics, Environmental Justice, Children’s Environmental Health and Safety Risks

The project study area is within Census Tract 23.01 Block Group 1. There are 2,560 people living in the project area census tract. of the 2,560 people, about 15.0 percent identify as minority (American Community Survey, 2020a) and about 0.7 percent are living below poverty level (American Community Survey, 2020b). The project study area census tract has a smaller percentage of minority populations and people living below poverty level compared to the Municipality of Anchorage.

The Proposed Action would not result in the acquisition of land, relocation of residences or businesses, involve off-airport construction, or cause significant environmental impacts that would affect minority and/or low-income populations as identified in Executive Order (EO) 12898 and EO 14096. The Proposed Action would not increase aircraft operations or vehicle traffic. No effects related to socioeconomic, environmental justice, or children’s environmental health and safety are expected as a result of the Proposed Action.

Transportation and Traffic

The major roadways serving the Airport are Northern Lights Boulevard, Point Woronzof Road, West International Airport Road, and Old International Airport Road. The project study area can be accessed through North Tug Road and Postmark Drive which connects to Northern Lights Boulevard, Lake Hood Drive, and International Airport Road and are designated as Class IA (Industrial/Commercial Collector) and Class II (Minor Arterial) roads (Municipality of Anchorage, 2014). The Proposed Action may result in a temporary and minor increase in surface traffic during the construction period; however, construction-related traffic would not result in significant surface traffic impacts due to the temporary nature of construction traffic. Additionally, ANC building permits include restrictions that limit construction traffic along Northern Lights Boulevard, which at Postmark Drive is a west-east minor arterial roadway that passes through the Turnagain community.

The operation of the Proposed Action would not result in any increase in surface traffic congestion or degrade the level of service provided on local roads. The Proposed Action consists of the expansion of FedEx facilities at the Airport and is due to the existing facilities' inability to provide the space needed for existing FedEx operations to occur efficiently. The Proposed Action would partially relocate existing operations and would not result in an increase in operations. Regional operations would be relocated from the existing facility to the new facility, including parking for employees working in regional operations. Therefore, the Proposed Action would not result in significant impacts to transportation and traffic resources.

Wild and Scenic Rivers

According to the Nationwide Rivers Inventory, there are no designated rivers in the National System or under the State Jurisdiction near the project study area. The closest river registered in the Nationwide Rivers Inventory is Little Susitna River, located approximately 18-miles northwest of the project study area (National Park Service, 2022). According to the National Park Service, the closest Wild and Scenic River segment is the Tikakila River, located 100 miles southwest of the project study area (U.S. Geological Survey, 2022).

Due to the distance between the project study area and the closest wild and scenic river segment and river listed in the National Rivers Inventory, the Proposed Action is unlikely to directly or indirectly affect the rivers mentioned above within 0.25-mile of their ordinary high-water mark.

3.3 AIR QUALITY

This section describes the affected environment and the significance threshold(s) pertaining to air quality. This section also identifies potential air quality impacts that may result from the Proposed Action and No Action Alternative.

3.3.1 Affected Environment

The U.S. Environmental Protection Agency (USEPA) set National Ambient Air Quality Standards (NAAQS) for certain air pollutants to protect public health and welfare. The NAAQS consists of primary and secondary standards for six criteria pollutants, which include: Ozone (O_3), Carbon Monoxide (CO), Sulfur Dioxide (SO_2), Nitrogen Oxide (NO), Particulate matter (PM_{10} and $PM_{2.5}$), and Lead (Pb).

Areas found to be in violation of one or more NAAQS of these pollutants are classified as "nonattainment areas." States with nonattainment areas must develop a State Implementation Plan (SIP) demonstrating how the areas will be brought back into attainment of the NAAQS within designated timeframes. Areas where concentrations of the criteria pollutants are below (i.e., within) these threshold levels are classified as "attainment areas." Areas with prior nonattainment status that have since transitioned to attainment are known as "maintenance areas."

According to Alaska Administrative Code (AAC) 18 AAC 50, Anchorage is considered a Class II area. As such, there are designated maximum allowable increases for PM_{10}, nitrogen dioxide (NO_2), and SO_2. Activities in these areas must operate in such a way that they do not exceed listed air quality controls for these compounds. According to the USEPA, a portion of the Municipality of Anchorage is in "maintenance" for CO (U.S. Environmental Protection Agency, 2023a). The project study area is located outside the boundaries of the CO maintenance area (see **Figure 3-2**) and is, therefore, in an area that is in attainment for all air pollutants.

Figure 3-2 Carbon Monoxide Maintenance Area

3.3.2 Environmental Consequences

3.3.2.1 Significance Threshold

FAA Order 1050.1F establishes that an action's effect on air quality would be significant if the action would cause pollutant concentrations to exceed one or more of the NAAQS, as established by the Environmental Protection Agency under the Clean Air Act, for any of the time periods analyzed, or to increase the frequency or severity of any such existing violations.

3.3.2.2 No Action Alternative

Under the No Action Alternative, no physical changes to the project study area would occur. FedEx would continue to operate at the existing location and serve forecast cargo demands. There would be no effect on air quality.

3.3.2.3 Proposed Action

Construction would temporarily result in a minor increase in air pollutant emissions from earth moving activities and construction equipment emissions. However, the Proposed Action is in an area that is in attainment for all air pollutants and, therefore, a construction emissions inventory is not required (FAA, 2015a). Additionally, construction would be temporary and dust during construction would be regulated using Best Management Practices (BMPs) and through compliance with the Alaska Pollutant Discharge Elimination System Construction General Permit. Therefore, the Proposed Action is not expected to result in an exceedance of any air quality pollutants based on NAAQS standards. Due to the temporary nature of construction and the size of the Proposed Action, the Proposed Action would not result in significant air quality impacts.

Because the Proposed Action would relocate partial operations from the existing FedEx facility to the new facility and would not result in an increase in operations, the Proposed Action would not increase emissions from any mobile sources, including aircraft and surface vehicles. The Proposed Action includes the construction of a new building that would introduce a new stationary source of emissions due to the use of natural gas boilers.[3] However, regional operations at the existing FedEx facility would be relocated from the existing facility to the new facility in order to increase operational efficiency. This would minimize any increase in stationary source emissions to a negligible level due to the increased operational efficiencies. In addition, the Proposed Action does not include any changes in aircraft operations and does not include an expansion in landside operations, so the Proposed Action would not be considered a "major source of air pollutants." Therefore, the Proposed Action would not cause or create a reasonably foreseeable emission increase and as identified in the FAA's Aviation Emissions and Air Quality Handbook, an emissions inventory is not required (FAA, 2015a).

3.3.3 Summary of Mitigations

No mitigation measures are proposed.

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[3] Building emissions related to GHG emissions are discussed in **Section 3.5, Climate**.

3.4 BIOLOGICAL RESOURCES

This section describes the affected environment and the significance threshold(s) pertaining to biological resources. This section also identifies potential biological resource effects that may result from the Proposed Action and No Action Alternative.

3.4.1 Affected Environment

According to Alaska Center for Conservation Science, which is part of the University of Alaska Anchorage, vegetation within the project study area consists largely of wetland and upland communities (Alaska Center for Conservation Science, 2023). There are 14.32 acres of wetlands within the project study area (see **Section 3.10.1** for further discussion of wetlands). Much of the vegetation within the project study area can be characterized as low and high shrubs and dominantly consists of the following vegetative species: Canada bluejoint grass (*Calamagrostis canadensis*), Labrador tea (*Rhododendron tomentosum*), water sedge (*Carex aquatilis*), water horsetail (*Equisetum fluviatile*), marsh cinquefoil (*Comarum palustre*), and willows (*Salix barclayi*) (see **Appendix D**).

According to the U.S. Fish and Wildlife Service (USFWS) Information for Planning and Consulting (IPaC), there are no federally listed endangered, threatened, or candidate species or designated critical habitat in or near the project study area (U.S. Fish and Wildlife Service, 2022b). Four migratory birds have the potential to occur within the project study area:

- Bald Eagle (*Haliaeetus leucocephalus*) – breeds February 1 to September 30
- Hudsonian Godwit (*Limosa haemastica*) – breeds May 15 to July 31
- Lesser Yellowlegs (*Tringa flavipes*) – breeds May 1 to August 15
- Short-billed Dowitcher (*Limnodromus griseus*) – breeds June 1 to August 10

The Bald Eagle is also individually protected under the Bald and Golden Eagle Protection Act. There are no state listed endangered, threatened, or candidate species within the project study area (Alaska Department of Fish and Game, 2022).

For non-federally recognized animal species, the Airport has a Wildlife Hazard Management Plan (WHMP) that includes the techniques in use at the ANC to reduce the threat posed by wildlife to aircraft and human health and safety.

3.4.2 Environmental Consequences

3.4.2.1 Significance Threshold

FAA Order 1050.1F establishes that an action's effect on biological resources would be significant if the USFWS or the National Marine Fisheries Service determines that the action would be likely to jeopardize the continued existence of a federally listed threatened or endangered species, or would result in the destruction or adverse modification of federally designated critical habitat. The FAA has not established a significance threshold for non-listed species.

3.4.2.2 No Action Alternative

Under the No Action Alternative, no physical changes to the project study area would occur. FedEx would continue to operate at the existing location and serve forecast cargo demands. There would be no effect on biological resources. The WHMP would remain in place and continue to be implemented.

3.4.2.3 Proposed Action

The Proposed Action would not entail the removal of any trees or structures that may be used as nesting habitat for migratory birds protected by the Migratory Bird Treaty Act. Given the absence of habitat for endangered or threatened species within the project study area, the Proposed Action would not affect any endangered or threatened species. The WHMP would remain in place and continue to be implemented.

3.4.3 Summary of Mitigations

No mitigation measures are proposed.

3.5 CLIMATE

This section describes the affected environment and significance threshold(s) pertaining to climate resources. This section also identifies potential impacts to climate that may result from the Proposed Action and no Action Alternatives and any mitigation recommendations, if necessary.

3.5.1 Affected Environment

Although the Airport does not have an Airport-specific climate action plan, the Municipality of Anchorage had previously adopted the Anchorage Climate Action Plan that provides a strategic framework for reducing greenhouse gas (GHG) emissions and adapting to the impacts of climate change. The Municipality had outlined a goal in the climate action plan to reduce greenhouse gas emissions by 80 percent based on 2008 levels by 2050, with an interim goal of 40 percent by 2030 (Municipality of Anchorage, 2019).

The Clean Air Act, administered by the EPA, regulates GHG emissions from surface transportation vehicles and stationary power generation sources. CEQ guidance provided on the consideration of GHG emissions and climate change has recommended that agencies should be guided by a rule of reason, as well as their expertise and experience, in conducting analysis commensurate with the quantity of projected GHG emissions and using GHG quantification tools suitable for the proposed action (Interim Guidance Jan. 9, 2023). The rule of reason and the concept of proportionality caution against providing an in-depth analysis of emissions regardless of the insignificance of the quantity of GHG emissions that the proposed action would cause. As the Proposed Action does not occur within a regulated air shed, nor would it result in a change of operations, the depth of analysis consists of quantitative disclosure of estimated GHG emissions associated with the temporary construction and the long-term operation of the FedEx facility.

The FAA 1050.1F Desk Reference provides limited guidance for qualitatively or quantitatively evaluating GHGs under NEPA, though references the FAA Air Quality Handbook (2015) regarding the establishment of appropriate GHG assessment area boundaries. FAA notes that for project-level actions, the affected environment for climate is defined as the entire geographic

area that could be directly or indirectly affected by the proposed project. While the FAA Air Quality handbook outlines the climate study area in part based on factors including topography, landscape roughness and vegetation, albedo, and values associated with either rural or urban settings, these recommendations are generally applied in assessing pollutants resulting from ongoing airport operations versus construction activities. One model recommended by the FAA for construction project assessment is a former EPA pollutant model, "NONROAD", now obsolete and replaced by a broader-based model named MOVES3 (U.S. Environmental Protection Agency, 2022a). One variant of MOVES3 (MOVES-Nonroad) is noted as capable of forecasting emissions inventories of off-road equipment generated pollutants as well as modeling their dispersion, with its smallest (and default) modeled study area based on 'county' units. For an equivalent of that modeling unit, Alaska substitutes political subdivision referred to as 'boroughs,' with ANC located within the Anchorage Borough. MOVES-Nonroad is designed to estimate potential emission from multiple off-road equipment use sectors (construction, agriculture, etc.), with outputs based on detailed inventories of known-populations of county-level nonroad equipment fleets and activities. This information is not obtainable for the Anchorage Borough. However, based on estimates of construction equipment likely to be utilized during construction of the Proposed Action, CO_2 emissions were estimated for construction. For operation, CO_2 emissions were estimated based on a facility-related energy use value of 6 kilowatt hours (kWh) per square foot per year. Consistent with EO 14008, EO 13990, and the 2023 GHG Guidance, this EA examines GHGs as a category of air emissions.

The project study area is currently undeveloped and does not emit any GHGs that may contribute to climate change.

3.5.2 Environmental Consequences

3.5.2.1 Significance Threshold

The FAA has not established significance thresholds for aviation or commercial space launch GHG emissions, nor has the FAA identified specific factors to consider in making a significance determination for GHG emissions. However, GHG emissions should follow the basic procedure of considering the potential incremental change in CO_2 emissions that would result from the proposed action and any alternative(s) compared to the no action alternative for the same timeframe, and discuss the context for interpreting and understanding the potential changes. Consistent with the NEPA Guidance on Consideration of Greenhouse Gas Emissions and Climate Change, 88 Fed. Reg. 1196 (Interim Guidance Jan. 9, 2023), the FAA will try when reasonably possible to quantify GHG emissions, compare GHG emission quantities across alternative scenarios, and place emissions in relevant context.

3.5.2.2 No Action Alternative

Under the No Action Alternative, no physical changes to the project study area would occur. FedEx would continue to operate at the existing location and serve forecast cargo demands. There would be no effect on climate.

3.5.2.3 Proposed Action

Construction of the Proposed Action would result in a temporary increase in CO_2 emissions due to the use of heavy construction equipment. The USEPA's diesel fuel emissions factor of 0.01018 metric ton of CO_2 per gallon of diesel was used (U.S. Environmental Protection Agency, 2023b). The engineer's estimate for total diesel fuel needed for project construction is

243,000 gallons (see **Table 3-1**). Based on the USEPA diesel fuel emissions factor, the estimated CO_2 emissions from construction of the Proposed Action would be 2,474 metric tons over the duration of construction, which is approximately two years. This is equivalent to the energy use of 156 homes for each year, or 312 homes total (U.S. Environmental Protection Agency, 2023b).

Operation of the Proposed Action would relocate regional FedEx operations from the existing facility to the new facility in order to increase operational efficiency. In addition, the Proposed Action would not increase the amount of surface vehicle activity at the FedEx facility at the Airport, does not include any changes in aircraft operations, and does not include an expansion in landside operations.

The Proposed Action would relocate partial (regional) operations from the existing FedEx facility to the new facility. CO_2 emissions of the proposed new FedEx facility were estimated based on the USEPA's natural gas emissions factor of 0.0053 metric ton of CO_2 (based on therms per square foot per year) (U.S. Environmental Protection Agency, 2023b) and electricity emissions factor of 1067.7 metric ton of CO_2 from the USEPA eGRid (based on kilowatt hours per square foot per year) (U.S. Environmental Protection Agency, 2023b). Based on the facility's estimated energy usage, it would produce 1,144 metric tons of CO_2 per year, which is equivalent to the energy use of 144 homes for one year (see **Table 3-2**). This is not expected to be a significant effect to climate.

Table 3-1 Construction Carbon Dioxide Estimates

Type of Construction Work	Estimated Amount of Fuel (gallons)	Fuel Type	Emission Factor (MT CO_2/gal)	Estimated CO_2 Emissions (metric tons)e
Civil Work	80,000	Diesel	0.01018	814.40
Transport of Fill/Material	113,0000	Diesel	0.01018	1,150.34
Water Handling/Treatment	10,000	Diesel	0.01018	101.80
Light Equipment and Craning	40,000	Diesel	0.01018	407.20
TOTAL	**243,000**	**-**	**-**	**2,473.74**

MT CO_2/gal = metric tons of carbon dioxide per gallon of fuel
CO_2 = carbon dioxide
Source: USEPA Greenhouse Gas Equivalency Calculator, 2023; Roger Hickel Contracting, 2023; ASRC Energy Services, LLC, 2023

Table 3-2 Facility Carbon Dioxide Emissions Estimates

Type of Energy Source	Estimated Amount of Energy Use	Estimated Facility Energy Use Factor	Emission Factor	Estimated CO_2 Emissions (metric tons/year)
Electricity	1,127,502 (kWh/yr)	6 kWh/sf/yr	1,067.7 (lbs CO_2/MWh)	546
Natural Gas	112,750 (therms/yr)	0.6 therms/sf/yr	0.0053 MT CO_2/therm	598
TOTAL	**-**	**-**	**-**	**1,144**

CO_2 = carbon dioxide
kWh/yr = kilowatt hours per year
kWh/sf/yr = kilowatt hours per square foot per year
lbs CO_2/MWh = pounds of carbon dioxide per megawatt-hour
Source: USEPA eGrid, 2023

The CEQ's *NEPA Guidance on Consideration of Greenhouse Gas Emissions and Climate Change* recommends that agencies use the best available social cost of GHG emissions (SC–GHG) estimates to translate climate impacts into the more accessible metric of dollars (Council on Environmental Quality, 2023). The estimation of SC-GHG allows the monetization of climate change effects expected from a Proposed Action. The *Technical Support Document: Social Cost of Carbon, Methane, and Nitrous Oxide Interim Estimates under Executive Order 13990* released by the Interagency Working Group on Social Cost of Greenhouse Gases (IWG SC–GHG) in February 2021 presents a methodology to estimate the SC-GHG using three discount rates (2.5 percent, 3 percent, and 5 percent) per year (IWG SC-GHG, 2021). The term "discount rate" refers to the reduction or discount in value per year as a future cost or benefit is adjusted to be comparable with a current cost or benefit from a project.

For purposes of this analysis, all three discount rates are presented in **Table 3-3** to provide a range of global social costs from the increase in GHG emissions related to the Proposed Action. The social cost is highest during construction years due to temporary construction activities.

Table 3-3 Estimated Social Cost of Greenhouse Gas Emissions

	Social Cost GHGs (U.S. Dollars)/a/		
Year	5% Discount	3% Discount	2.5% Discount
2024/b/ (construction)	$20,325	$68,474	$100,995
2025/b/ (construction)	$19,932	$67,762	$100,108
2026 (operation)	$18,063	$61,994	$91,745
2031 (operation)	$16,217	$58,516	$87,429

/a/: all values are in 2020 dollars, as provided by the model
/b/: construction emissions were split across two years
Source: IWG SC-GHG, 2021; costofcarbon.org

3.5.3 Summary of Mitigations

No mitigation measures are proposed.

3.6 HAZARDOUS MATERIALS, SOLID WASTE, AND POLLUTION PREVENTION

This section describes the affected environment and the significance threshold(s) pertaining to hazardous and toxic materials and waste. This section also identifies potential hazardous and toxic materials and waste effects that may result from the Proposed Action and No Action Alternative.

3.6.1 Affected Environment

According to the Alaska Department of Environmental Conservation's (ADEC's) contaminated sites database, the active contaminated sites within vicinity of the project study area are a permitted underground storage tank (UST) within the existing FedEx operations area and the Airport's Aircraft Rescue and Fire Fighting (ARFF) station and Tanks #19, 20, 21, both about 1,000 feet south of the project study area. The USEPA does not show any superfund sites in the vicinity of the project study area (U.S. Environmental Protection Agency, 2022b). However due to concern over the use of the aqueous film forming foam (AFFF), site investigations have been conducted at the ARFF and within Postmark Bog in which per- and polyfluoroalkyl substances (PFAS) and petroleum hydrocarbons have also been documented within soil, surface water, and/ or groundwater samples. As such, an environmental management plan (EMP) for handling potentially contaminated soil, groundwater, and surface water during construction has been prepared in general accordance with ADEC's March 2017 *Site Characterization Work Plan and*

Reporting Guidance for Investigation of Contaminated Sites and January 2022 *Field Sampling Guidance* document (see **Appendix E**). The EMP also provides procedures to handle, stockpile, sample, and dispose of any excess soil generated during construction. ADEC approved the EMP on July 10, 2023 (see **Appendix E** for approval documentation).

3.6.2 Environmental Consequences

3.6.2.1 Significance Threshold

The FAA has not established a significance threshold for hazardous materials, solid waste, and pollution prevention. Factors to consider include if the action would have the potential to:

- Violate applicable Federal, state, tribal, or local laws or regulations regarding hazardous materials and/or solid waste management.
- Involve a contaminated site (including but not limited to a site listed on the National Priorities List). Contaminated sites may encompass relatively large areas. However, not all the grounds within the boundaries of a contaminated site are contaminated, which leaves space for siting a facility on non-contaminated land within the boundaries of a contaminated site.
- Produce an appreciably different quantity or type of hazardous waste.
- Generate an appreciably different quantity or type of solid waste or use a different method of collection or disposal and/or would exceed local capacity.
- Adversely affect human health and the environment.

3.6.2.2 No Action Alternative

The No Action Alternative does not require any disruption of land or soil. Therefore, it would not affect the hazardous materials that exist at ANC. The No Action Alternative would not increase the amount of cargo aircraft operations, aviation fuel needed, or volume of solid waste generated at the Airport. Therefore, the No Action Alternative would not result in hazardous materials, solid waste, and pollution prevention impacts.

3.6.2.3 Proposed Action

Because the project site is several feet lower in elevation than North Tug Road, Postmark Drive, and Taxilane U, the site would require filling (approximately 142,500 cubic yards) in order to raise the grade of the site an average six feet and channel drainage towards North Tug Road, Postmark Drive, and Taxilane U. Due to the presence of contaminated groundwater, soil, and peat, excavations of soil would be minimized to the extent feasible. The site is being developed in a manner that inhibits stormwater from interacting with potentially contaminated groundwater. As the PFAS plume does not originate within the project study area or within the FedEx operations area, it was determined that the most effective remediation of the site would be to reduce the future migration of the PFAS plume in the groundwater. To minimize excavations, the structures would be supported by piers that would be advanced to 15 to 20 feet below ground surface and the peat within the project study area would be surcharged with non frost susceptible (NFS) fill materials. Any potentially contaminated material and excavated soil would temporarily be stockpiled approximately 1,000 feet north of the project study area at the FedEx snow disposal site. The onsite excavated material would be used as fill material in areas outside

the footprint of the package sorting facility and to backfill the drainage ditches located on the FedEx site.

During the initial fill, excavation, and surcharging activities, there is potential for the Proposed Action to temporarily impact and displace PFAS-contaminated groundwater. As documented in the EMP, the displaced water would be treated at the eastern FedEx property boundary with permeable filter barriers amended with a site-specific blend of activated carbon, mixed with imported NFS fill material. This mixture of Powdered Activated Carbon (PAC) and Colloidal Activated Carbon (CAC) would be used due to the increased adsorption efficiency gained from the smaller particle size of the activated carbon when compared to Granular Activated Carbon (GAC).

The PAC/CAC mixture would filter the PFAS from groundwater through the process of adsorption. The activated carbon would continue to bind and inhibit migration of contaminates as long as there is capacity within the activated carbon. The PFAS capture system is designed to be effective throughout the multi-year construction period capturing PFAS from both the high-flow surcharge water and groundwater. Additionally, the proposed dosage has a 5x capacity of the known PFAS mass found in the groundwater and surrounding soils. In the future the active sorption sites in the activated carbon would fill and the barrier may need to be supplemented. The most likely option would be the injection of additional CAC into the existing permeable barrier to “recharge” the adsorptive capacity. Monitoring is currently planned following installation of the permeable filter barrier and placement of the surcharge and fill material. Temporary monitoring wells would be installed in the vicinity of former locations of Drive Point Wells MW4 and MW5. These temporary wells would be installed approximately five feet west and east of the permeable filter barrier. Groundwater samples would be collected from the temporary wells during non-frozen months. These samples would be analyzed by an ADEC-certified analytical laboratory for PFAS by EPA Method 1633. More information is provided in the EMP in **Appendix E**.

The proposed grassed swales and detention basin would continue to treat stormwater onsite, reducing interaction with the contaminated groundwater. Annual water quality monitoring is currently conducted and would continue to be done in accordance with the Alaska Pollution Discharge Elimination System (APDES) permit issued to ANC and would continue to occur beyond construction of the Proposed Action. Groundwater sampling in the Postmark Bog is conducted annually by DOT&PF. The number of samples and frequency of sampling may increase as more information is gathered about the extent of contamination within the area. The samples are analyzed for PFAS compounds and petroleum hydrocarbons. ADEC is notified if any samples exceed maximum contaminant levels for the targeted analytes. Samples are also collected by DOT&PF from the stormwater system to monitor for potential contamination.

Excess soil which requires off-Airport disposal and/or treatment, would be managed in accordance with all local, State, and Federal regulations. The Contractor and FedEx would be responsible for identifying the proper off-site treatment and/or disposal facilities. An *ADEC Transport, Treatment, Disposal Form for Contaminated Media* would be prepared and submitted to the ADEC for review and approval. Complying with the ADEC requirements related to potentially contaminated groundwater and soil would ensure that there would be no unacceptable risk to human health or the environment.

The Proposed Action would generate relatively small amounts of solid waste from construction that would be disposed of at the local landfill, which has the capacity to receive the solid waste

and be of low significance. The increase in solid waste generated during operation of the proposed facility would be minimal as the Proposed Action has been proposed to relocate existing operations to increase efficiency and would not result in an increase in operations.

3.6.3 Summary of Mitigations

As required by ADEC, an EMP has been prepared that consists of a construction mitigation plan outlining guidelines and BMPs relating to the handling of potentially contaminated soil, groundwater, and surface water that could be encountered during construction (see **Appendix E**). Implementation of these BMPs would reduce and avoid impacts to hazardous materials, solid waste, and pollution prevention and no additional mitigation measures are proposed.

3.7 NATURAL RESOURCES AND ENERGY

This section describes the affected environment and the significance threshold(s) pertaining to natural resources and energy. This section also identifies potential natural resources and energy effects that may result from the Proposed Action and No Action Alternative.

3.7.1 Affected Environment

Utilities at the Airport include electrical, natural gas, stormwater, public water, sewer, solid waste and recycling, and telecommunication services. The Airport's electricity is supplied to all developed areas and provided by the Chugach Electric Association. Natural gas is supplied by ENSTAR Natural Gas Company. The stormwater drainage system is owned, operated, and maintained by DOT&PF. Public water and sewer services are provided by Anchorage Water and Wastewater Utility (AWWU). Solid waste and recycling services are provided by Alaska Waste and the Municipality of Anchorage Solid Waste Services. Lastly, telecommunication services are provided by Alaska Communications Systems.

3.7.2 Environmental Consequences

3.7.2.1 Significance Threshold

The FAA has not established a significance threshold for natural resources and energy supply. Factors to consider include if the action would have the potential to exceed available or future supplies of these resources.

3.7.2.2 No Action Alternative

Under the No Action Alternative, no physical changes to the project study area would occur. FedEx would continue to operate at the existing location and serve forecast cargo demands. There would be no effect on natural resources and energy supply.

3.7.2.3 Proposed Action

Construction and operation of the Proposed Action would not require the use of any rare materials that are in short supply. Construction would temporarily increase the consumption of energy and natural resources in the form of fuel, lubricants, and other construction materials necessary to build the proposed facility; however, all materials needed are readily available and could be met by existing resources. The temporary increase in demand for these resources would not represent a significant impact to natural resources or energy supply.

The Proposed Action would extend the water, storm drain, and sanitary sewer utilities off-site to connect into existing utilities under Tug Road, Postmark Drive, and Sikorsky Avenue, as shown in **Figure 2-1**.

Once in operation, energy in the form of electricity and natural gas would be utilized at the facility. The electricity use at the proposed facility is estimated to be 1,127,502 kWh/year, which equates to the annual electricity use of 94.9 residential homes (U.S. Environmental Protection Agency, 2023c). The natural gas use is estimated to be 112,750 therms/year, which is equivalent to the annual energy use of 75.2 homes (U.S. Environmental Protection Agency, 2023c). These energy demands would not exceed available or future energy supplies.

3.7.3 Summary of Mitigations

No mitigation measures are proposed.

3.8 NOISE

This section describes the affected environment and the significance threshold(s) pertaining to noise. This section also identifies potential noise effects that may result from the Proposed Action and No Action Alternative.

3.8.1 Affected Environment

As defined in Paragraph 11-5.b.(8) of FAA Order 1050.1F, a noise sensitive area is “an area where noise interferes with normal activities associated with its use. Normally, a noise sensitive area includes residential, educational, health, and religious structures and sites, and parks, recreational areas, areas with wilderness characteristics, wildlife refuges, and cultural and historical sites.” The project study area is located on an existing airport and noise sources in the area are primarily associated with the Airport. Existing land uses in the vicinity of the project study area include Airport uses. The nearest residences are approximately 0.9 mile (4,616 feet) east of the project study area.

3.8.2 Environmental Consequences

3.8.2.1 Significance Threshold

FAA Order 1050.1F establishes that an action’s effect on noise would be significant if the action would increase noise by Day-Night Average Sound Level (DNL) 1.5 decibel (dB) or more for a noise sensitive area that is exposed to noise at or above the DNL 65 dB noise exposure level, or that will be exposed at or above the DNL 65 dB level due to a DNL 1.5 dB or greater increase, when compared to the no action alternative for the same timeframe. For example, an increase from DNL 65.5 dB to 67 dB is considered a significant impact, as is an increase from DNL 63.5 dB to 65 dB.

3.8.2.2 No Action Alternative

Under the No Action Alternative, no physical changes to the project study area would occur. FedEx would continue to operate at the existing location and serve forecast cargo demands. There would be no effect on noise.

3.8.2.3 Proposed Action

Construction of the Proposed Action would result in varying levels of noise generation subject to change based on the construction intensity and distance to a given receptor. As a logarithmic unit of measurement, the decibel cannot be added or subtracted linearly. Some guidelines for understanding changes in noise levels follow.

- If two sounds of the same level are added, the sound level increases by approximately 3 dB. For example: 60 dB + 60 dB = 63 dB.
- The sum of two sounds of a different level is only slightly higher than the louder level. For example: 60 dB + 70 dB = 70.4 dB.
- Sound from a "point source," such as construction equipment, decreases approximately 6 dB for each doubling of distance.
- Although the human ear can detect a sound change as faint as 1 dB, the typical person does not perceive changes of less than approximately 3 dB.
- A 10 dB change in sound level is perceived by the average person as a doubling, or halving, of the sound's loudness.

Construction noise typically dissipates at a rate of approximately 6 dB for each doubling of distance (between the noise source and the receptor, which is the location that is representative of where the sound would be experienced (e.g., a residence)). Based on anticipated equipment that would be used during construction of the Proposed Action, the typically noisiest construction equipment with mufflers (independent of background ambient noise levels) used during excavation and grading was the basis for this analysis. These pieces of equipment may generate a noise level of approximately 88 dB at 50 feet from the noise source. Based on a sound dissipation rate of 6 dB per doubling of distance, a sound level of 88 dB at 50 feet from the noise source would be approximately 82 dB at a distance of 100 feet, 76 dB at a distance of 200 feet, and so on. That sound dissipation rate and the corresponding attenuation estimates are conservative in that they do not take into account any intervening shielding (including landscaping or trees) or barriers, such as structures or hills between the noise source and noise receptor, which would further reduce noise levels. (Federal Highway Administration, 2006).

As the nearest residences are approximately 0.9 mile (4,616 feet) east of the project study area, construction noise would attenuate and reduce the sound level of an 88 dB piece of equipment by approximately 39 dB to about 49 dB. With two pieces of 88 dB equipment operating at the same time the construction noise would be approximately 52 dB at the nearest residence, and with three pieces of 88 dB equipment operating at the same time it would be 55 dB. As reported in the Airport's FAR Part 150 Compatibility Study Update, a semi-permanent noise monitor was set up at 3190 Bridle Lane, which is at the approximate location of the nearest residential land use to the project study area (FAA, 2015b). The ambient noise at this monitoring site was recorded at 59.3 dB in the winter and at 64.9 dB in the summer. Therefore, due to the distance from the closest sensitive noise receptor, noise attenuation from the project study area, and typical ambient noise levels, construction noise would not likely be perceptible at the nearest residence to the project study area.

The Proposed Action would be subject to the Anchorage Noise Control Ordinance (AMC 15.70), which requires a Noise Permit for construction work on nights, weekends, or holidays.

Operation of the Proposed Action would not result in an increase in aircraft operations or cargo operations at the Airport. Regional operations would be relocated from the existing facility to the new facility with no increase in operations. Additionally, the proposed facility and aircraft parking apron would be located adjacent to the existing FedEx operations area, with the proposed aircraft parking apron located approximately 375 feet south from the existing apron, so any change in noise due to operations is not anticipated to be perceptible. The Proposed Action would not change airfield configurations, runway uses, flight patterns, or aircraft operations at the Airport. Additionally, the Proposed Action would not result in changes to local traffic patterns or result in additional traffic. Therefore, operation of the Proposed Action would have no effect on the noise setting at the Airport.

3.8.3 Summary of Mitigations

No mitigation measures are proposed.

3.9 VISUAL RESOURCES

This section describes the affected environment and the significance threshold(s) pertaining to visual resources. This section also identifies potential visual resource effects that may result from the Proposed Action and No Action Alternative.

3.9.1 Light Emissions

3.9.1.1 Affected Environment

Airport lighting is characterized by airfield lighting (i.e., runway, taxiway, approach and landing lights) and landside lighting (i.e., security lights, building interior lighting, parking lights, and signage). The project study area can currently be seen by those travelling along North Tug Road and Postmark Drive. The closest residential area is located about 0.9 mile northeast of the project study area. The project study area can be characterized as an undeveloped wetland area with no major light source. However, the project study area is directly surrounded by Airport infrastructure and development and south of existing FedEx facilities which are contributors to light currently emitted by the Airport.

3.9.1.2 Environmental Consequences

Significance Threshold

The FAA has not established a significance threshold for light emissions. Factors to consider include the degree to which the action would have the potential to:

- Create annoyance or interfere with normal activities from light emissions; and
- Affect the visual character of the area due to the light emissions, including the importance, uniqueness, and aesthetic value of the affected visual resources.

No Action Alternative

The No Action Alternative would not result in any changes to the existing project study area and would not add additional light sources to the project study area. Therefore, the No Action Alternative would not result in significant impacts relating to light emissions.

Proposed Action

The Proposed Action would construct the new FedEx facility over the existing undeveloped wetland area. No nighttime construction would be required for the Proposed Action. The Proposed Action would require lighting to be installed for safety and security reasons. Although, the Proposed Action would introduce new light sources to the Airport, the lighting installed would be consistent with that of an airport. In addition, BMPs included in the design of the Proposed Action would minimize light emissions. BMPs could include shielding and angling light sources downwards to focus on the area of development. Lighting for the cargo building would illuminate the interior and exterior of the facility. The new feeder aircraft ramp extension and the automobile parking areas would be illuminated with directional and focused lighting on parking, vehicle, and pedestrian movement areas. The closest light sensitive land use (e.g., a recreational or residential area) is about 0.9 mile northeast of the project study area and does not have a direct line of sight to the project area. Therefore, the Proposed Action would not create annoyance or interfere with normal activities from light emissions or affect the visual character of the area due to the light emissions.

3.9.1.3 Summary of Mitigations

No mitigation measures are proposed.

3.9.2 Visual Resources and Character

3.9.2.1 Affected Environment

The visual character around the project study area can be described as light industrial for Airport and FedEx cargo uses. The project study area itself can be characterized as featureless, low-lying wetlands covered by mesic and hydric tundra; sedge and marsh grasses, alder, birch, and willow shrubs; and cottonwood, aspen, and birch saplings. There are no major visual structures within the project study area. As previously mentioned, the project study area can be seen by those travelling along North Tug Road and Postmark Drive. The closest residential area is located about 0.9 mile northeast of the project study area; however, there is vegetation between the Airport and the closest residential area that prevents direct view of the project study area. There are no designated scenic byways or corridors within the vicinity of the project study area. The closest scenic byway is the Alaska Railroad that runs about two miles east of the project study area (Alaska Department of Transportation and Public Facilities, 2023a). There are trees and structures along the railroad that prevent any direct view of the project study area from this scenic byway.

3.9.2.2 Environmental Consequences

Significance Threshold

The FAA has not established a significance threshold for visual resources and character. Factors to consider include the extent to which the action would have the potential to:

- Affect the nature of the visual character of the area, including the importance, uniqueness, and aesthetic value of the affected visual resources;
- Contrast with the visual resources and/or visual character in the study area; and

- Block or obstruct the views of visual resources, including whether these resources would still be viewable from other locations.

No Action

The No Action Alternative would not result in any changes to the existing project study area. Therefore, the No Action Alternative would not result in significant impacts relating to l visual resources and character.

Proposed Action

The Proposed Action would occur entirely on Airport property and would construct the new FedEx facility over the existing undeveloped wetland area. The proposed facility would be in character with the surrounding Airport uses. The closest residential area is about 0.9 mile northeast of the project study area and does not have a direct line of sight to the project study area. Therefore, the Proposed Action would not result in viewshed changes for residents or a community off-Airport property.

3.9.2.3 Summary of Mitigations

No mitigation measures are proposed.

3.10 WATER RESOURCES

This section describes the affected environment and the significance threshold(s) pertaining to water resources, including wetlands, floodplains, surface waters, and groundwater. This section also identifies potential water resource effects that may result from the Proposed Action and No Action Alternative.

3.10.1 Wetlands

3.10.1.1 Affected Environment

The U.S. Army Corps of Engineers (USACE) regulates the discharge of dredge and/ or fill materials into Waters of the United States (WOTUS), including adjacent wetlands, under Section 404 of the Clean Water Act. Wetlands are defined by EO 11990, *Protection of Wetlands*, as “those areas that are inundated by surface or groundwater with a frequency to support and under normal circumstances does or would support a prevalence of vegetation or aquatic life that requires saturated or seasonally saturated soil conditions for growth and reproduction.” Wetlands include swamps, marshes, bogs, and similar areas and exhibit three characteristics: hydrology, hydrophytes (plants able to tolerate various degrees of flooding or frequent saturation), and poorly drained soils.

A wetland may be jurisdictional and considered a WOTUS under federal regulations due to the wetland’s connection to navigable waters or due to the contribution to the watershed (including the downstream navigable water). In other cases, a wetland may be “non-jurisdictional” because it has no such connection and would not be considered a WOTUS. For a wetland to be regulated under the Clean Water Act (CWA), that wetland would have to qualify as a WOTUS, whereas the other applicable statutes, regulations, EOs, and Acts apply to both jurisdictional and non-jurisdictional wetlands.

For the purpose of this EA, a wetlands investigation was conducted for the project study area (see **Appendix D**). As concluded by the investigation and shown in **Figure 3-3**, a total of 15.113 acres of wetlands were identified within the project study area. According to the wetland functional assessment, although the existing wetlands within the project study area were once classified as "Class A" high valuation, palustrine emergent wetlands in 1996, the recent wetland assessment concluded that past permitted dredging, hazardous substance contamination of water, and surrounding developments have since reduced the wetland system connectivity and severely impacted the area's value to wildlife and surrounding ecosystems. As a result, the wetlands within the project study area no longer hold the same value they once did when they were first classified as "Class A" wetlands.

The wetlands within the project study area belongs to the Hood Creek watershed and was historically part of a contiguous large wetland complex, Turnagain Bog, that is separated from the Knik Arm by the natural bank that exists and abutted Jones Creek, Jones Lake, and Hood Lake.

Refer to **Section 4.1.6.1** for a discussion of the geographic scope for the cumulative effects on wetlands.

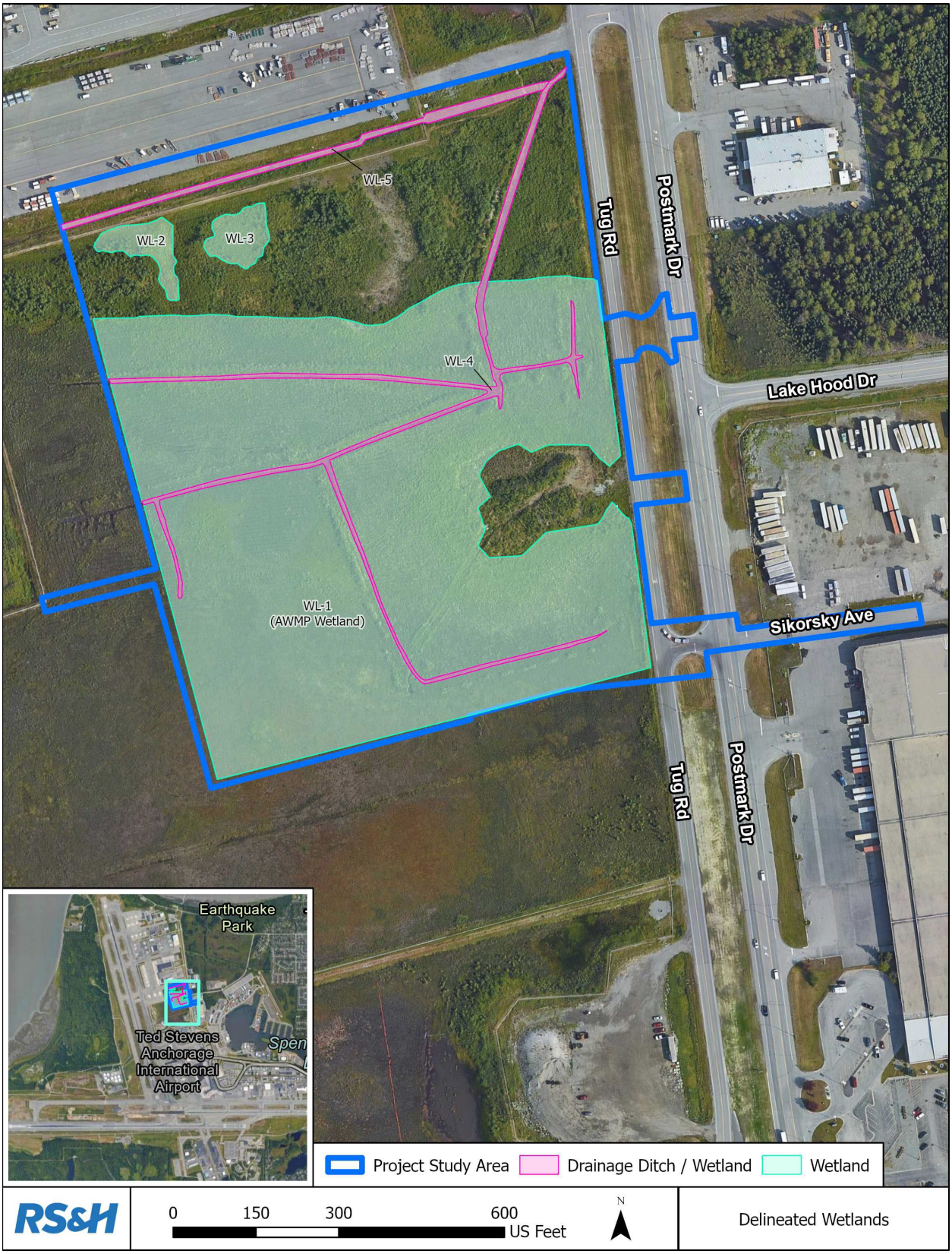
3.10.1.2 Environmental Consequences

Significance Threshold

FAA Order 1050.1F establishes that an action's effect on wetlands would be significant if the action would:

1. Adversely affect a wetland's function to protect the quality or quantity of municipal water supplies, including surface waters and sole source and other aquifers.
2. Substantially alter the hydrology needed to sustain the affected wetland system's values and functions or those of a wetland to which it is connected.
3. Substantially reduce the affected wetland's ability to retain floodwaters or storm runoff, thereby threatening public health, safety or welfare (the term welfare includes cultural, recreational, and scientific resources or property important to the public).
4. Adversely affect the maintenance of natural systems supporting wildlife and fish habitat or economically important timber, food, or fiber resources of the affected or surrounding wetlands.
5. Promote development of secondary activities or services that would cause the circumstances listed above to occur.
6. Be inconsistent with applicable state wetland strategies.

Figure 3-3 Delineated Wetlands



No Action Alternative

Under the No Action Alternative, FedEx would not implement the Proposed Action, and FedEx would continue to operate their existing facilities and serve forecasted cargo operation demands. Therefore, there would be no effect on wetlands.

Proposed Action

Although the Municipality of Anchorage classifies most of the wetlands identified within the project study area as "Class A" wetlands, the recent wetland investigation has concluded the wetlands to no longer hold the value of "Class A" wetlands due to previous development, contamination, and disturbances to the project study area and surrounding areas. Nonetheless, the Proposed Action would affect 14.32 acres of depressional wetlands within the project study area (see **Figure 3-4**). Therefore, it would require mitigation measures to be implemented to reduce impacts to wetland resources. A culvert would be constructed at the existing drainage ditch along the north side of the project study area to continue to allow uninterrupted drainage flow under the proposed new aircraft parking apron.

Refer to **Section 4.1.6.1** for a discussion of the cumulative effects on wetlands.

3.10.1.3 Summary of Mitigations

FedEx and the DOT&PF coordinated to submit a mitigation plan to USACE while applying for a wetlands permit (see **Appendix D**). The Anchorage Debit-Credit Method, developed by the USACE, the USEPA, USFWS, and the Municipality of Anchorage, was used to determine debits created from the Proposed Action. According to the wetland investigation conducted for this EA, direct impacts to wetlands as a result from the Proposed Action were mapped to be 14.32 acres. According to the Anchorage Debit-Credit Method (see **Appendix D**), indirect impacts must be calculated for wetlands bordering within 300 square feet of the direct impact zone to account for disturbances to the overall wetland system. After considering both direct and indirect impacts, the Proposed Action would result in a total of 9.74 debits. The Airport currently holds 8.563 compensatory mitigation credits within the Airport's Klatt Bog wetland band and proposes using the available credits as mitigation for the Proposed Action. As determined through consultation and coordination with USACE and ADEC, an additional 4.092 wetland compensatory mitigation credits will be purchased from Portage Reserve Mitigation Bank (Alaska Railroad).

3.10.2 Floodplains

3.10.2.1 Affected Environment

According to the Federal Emergency Management Agency, the project study area does not occur within the 100-year floodplain (FEMA, 2022). The closest floodplain is located about 0.55-mile northeast of the project study area (see **Figure 3-5**).

3.10.2.2 Environmental Consequences

Significance Threshold

FAA Order 1050.1F establishes that an action's effect on floodplains would be significant if the action would cause notable adverse impacts on natural and beneficial floodplain values.

Figure 3-4 Delineated Wetlands Impacts

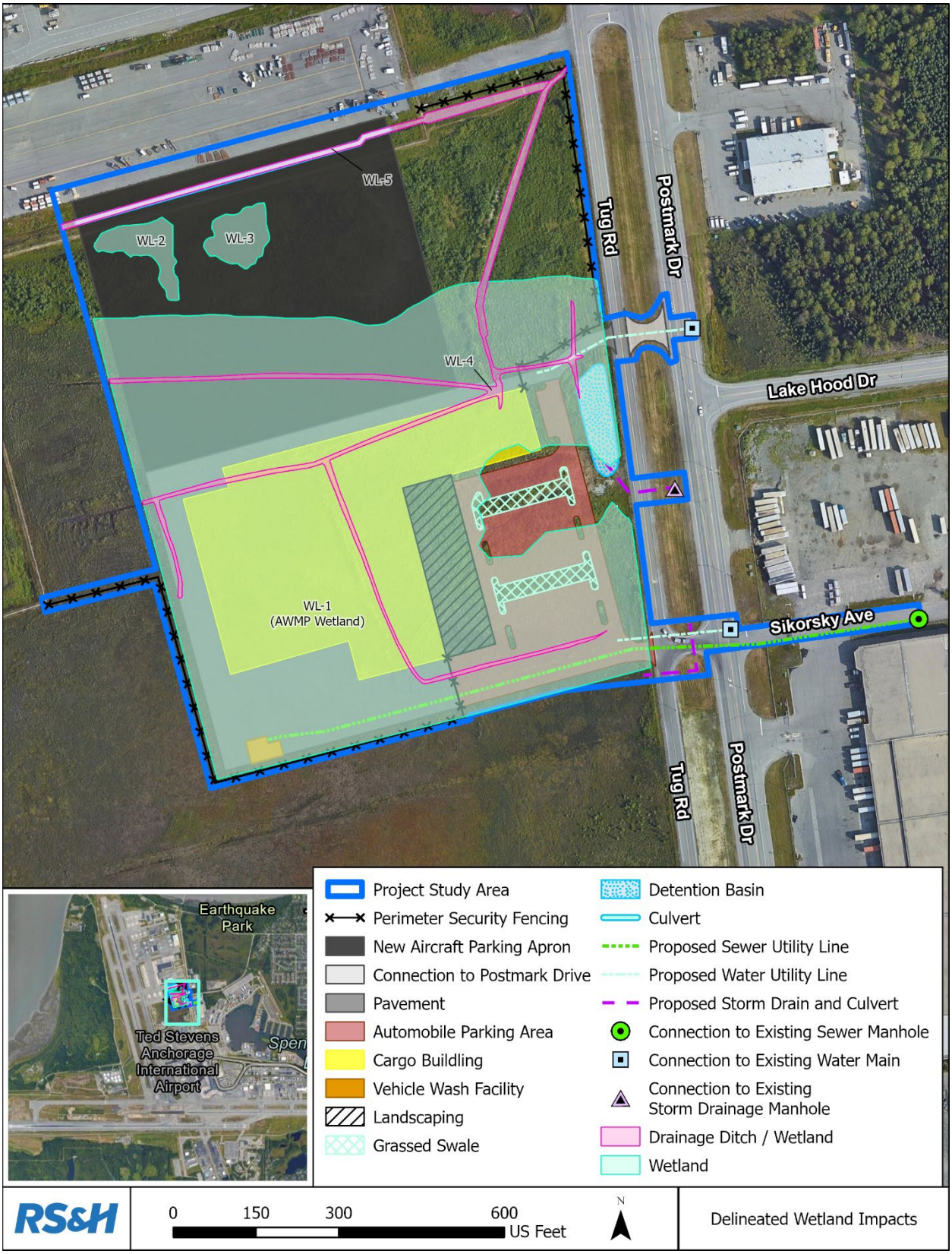
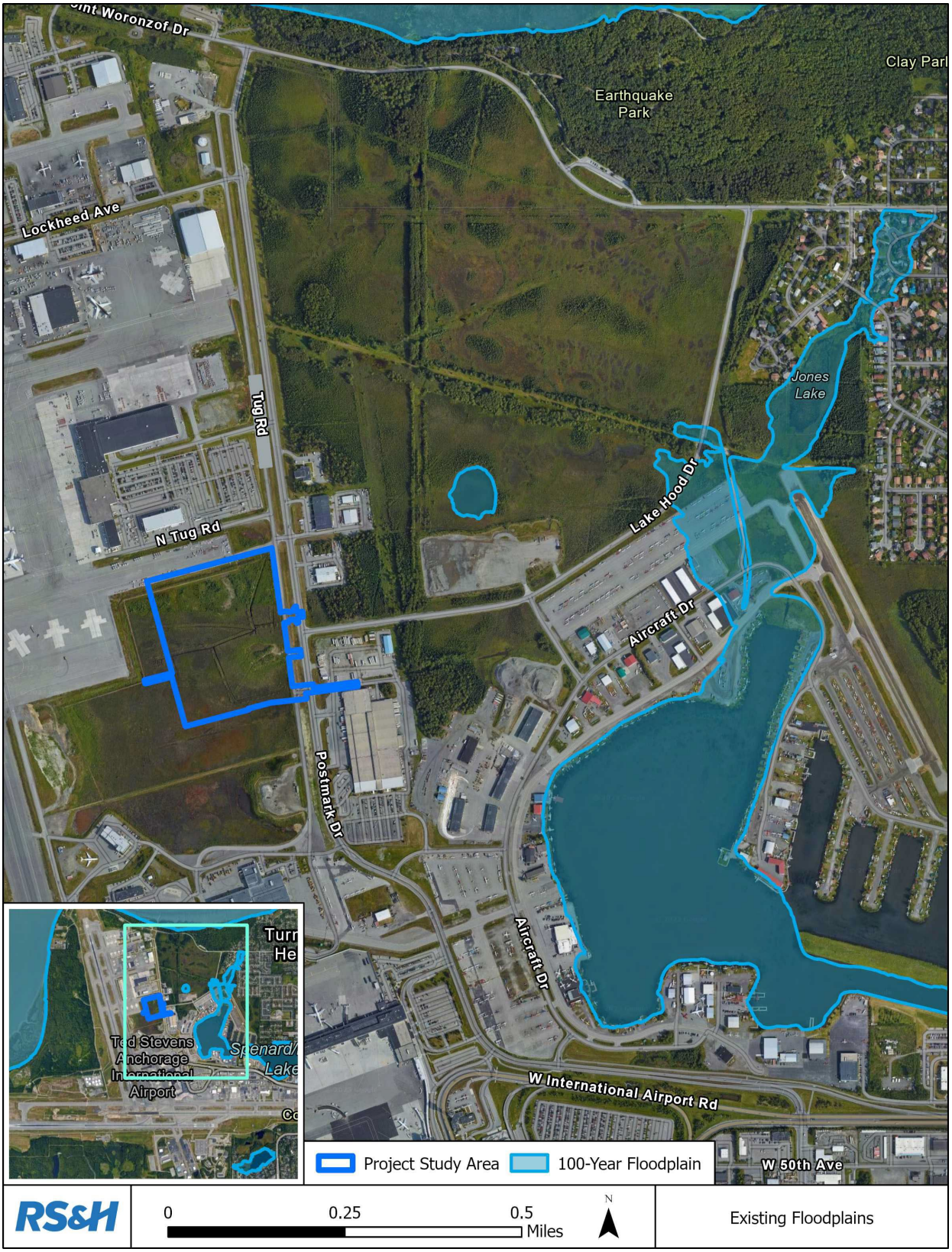


Figure 3-5 Existing Floodplains



No Action Alternative

Under the No Action Alternative, the Proposed Action would not be implemented. FedEx would continue to operate their existing facilities and serve forecasted cargo operation demands. The No Action Alternative would not involve any construction. There would be no effect to floodplains.

Proposed Action

The Proposed Action would not occur within any existing floodplain and, therefore, would not impact any floodplain resource.

3.10.2.3 Summary of Mitigations

No mitigation measures are proposed.

3.10.3 Surface Water

3.10.3.1 Affected Environment

Data from the Municipality of Anchorage shows the closest perennial stream to be Hood Creek, located a little over 0.8 mile northeast of the project study area and the closest lake is about 0.25 mile east of the project study area (see **Figure 3-6**) (Municipality of Anchorage, 2022).

3.10.3.2 Environmental Consequences

Significance Threshold

FAA Order 1050.1F establishes that an action's effect on surface water would be significant if the action would:

1. Exceed water quality standards established by Federal, state, local, and tribal regulatory agencies.
2. Contaminate public drinking water supply such that public health may be adversely affected.

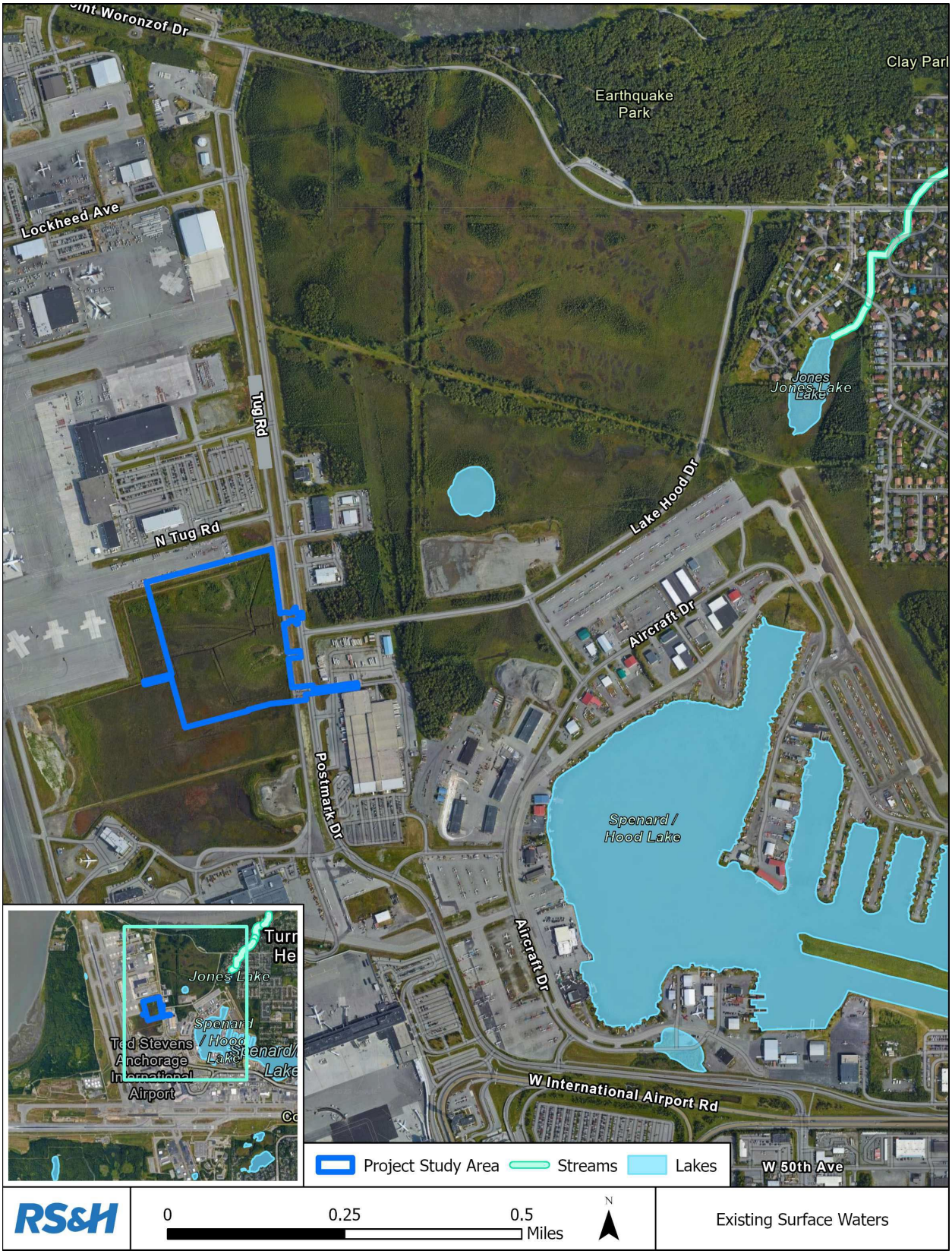
No Action Alternative

Under the No Action Alternative, the Proposed Action would not be implemented. FedEx would continue to operate their existing facilities and serve forecasted cargo operation demands. The No Action alternative would result in no changes to surface waters at or around the Airport. Therefore, no impacts to surface waters would occur with the No Action Alternative.

Proposed Action

There are no surface waters within the project study area or on Airport property. Therefore, the Proposed Action would not result in any direct changes to surface waters. However, the Proposed Action would increase the amount of impervious surfaces within the project study area by about 18.7 acres for the construction of the proposed FedEx facility and increase the amount and rate of stormwater runoff within the project study area. As identified in the EMP prepared for the Proposed Action (**Appendix E**), soil handling during construction would be conducted in a manner that prevents the release of contaminants to surface water and is protective of the water quality standards presented in the ADEC's 18 AAC 70 Water Quality

Figure 3-6 Existing Surface Waters



Standards regulations. Stormwater management procedures would be outlined in the project Stormwater Pollution Prevention Plan (SWPPP) and Erosion and Sediment Control Plan (ESCP) prepared by the Contractor. Additionally, as shown in **Figure 2-1**, the Proposed Action includes grassed swales and a detention basin in order to reduce stormwater runoff and reduce any potential effects to stormwater.

3.10.3.3 Summary of Mitigations

By complying with required BMPs and the guidelines outlined in the SWPPP and ESCP, the Proposed Action is unlikely to cause significant impacts to surface water resources. Therefore, mitigation measures pertaining to surface water resources are not proposed.

3.10.4 Groundwater

3.10.4.1 Affected Environment

Groundwater is subsurface water that occupies the space between sand, clay, and rock formations. The term aquifer is used to describe the geologic layers that store and transmit groundwaters to wells, springs, and other water resources (FAA, 2020). The Airport's watershed covers approximately 5,000 acres and includes five sub-watersheds. Each of these sub-watersheds drain to a separate discharge point in Lake Spenard, Lake Hood, Knik Arm or Turnagain Arm (Alaska Department of Transportation and Public Facilities, 2023b).

3.10.4.2 Environmental Consequences

Significance Threshold

FAA Order 1050.1F establishes that an action's effect on groundwater would be significant if the action would:

1. Exceed groundwater quality standards established by Federal, state, local, and tribal regulatory agencies.
2. Contaminate an aquifer used for public water supply such that public health may be adversely affected.

No Action Alternative

Under the No Action Alternative, the Proposed Action would not be implemented. FedEx would continue to operate their existing facilities and serve forecasted cargo operation demands. The No Action Alternative would not result in any excavations in the saturated zone. Therefore, no impacts to groundwater would occur with the No Action Alternative.

Proposed Action

Construction of the Proposed Action would entail ground disturbing activities that may affect groundwater resources. The EMP (see **Appendix E**) outlines management practices that would be taken while handling groundwater. Groundwater generated during construction would be managed in accordance with the terms and conditions of the ADEC Excavation Dewatering Permit, AKG002000. A dewatering and best practices plan would be prepared by the Contractor and submitted to ADEC for approval prior to the start of dewatering. The plan would include details of the treatment system design and processes. The plan would also provide details regarding the collection of periodic sampling of post-treated water, which will include the

collection of at least two performance monitoring samples of effluent water during the active dewatering portions of the project. More information is provided in the EMP in **Appendix E**.

During operation, as shown in **Figure 2-1**, the Proposed Action includes grassed swales and a detention basin in order to reduce stormwater runoff and reduce any potential effects to stormwater. Annual water quality monitoring is currently conducted and would continue to be done in accordance with the APDES permit issued to ANC and would continue to occur beyond construction of the Proposed Action. Groundwater sampling in the Postmark Bog is conducted annually by DOT&PF. The number of samples and frequency of sampling may increase as more information is gathered about the extent of contamination within the area. The samples are analyzed for PFAS compounds and petroleum hydrocarbons. ADEC is notified if any samples exceed maximum contaminant levels for the targeted analytes. Samples are also collected by DOT&PF from the stormwater system to monitor for potential contamination.

3.10.4.3 Summary of Mitigations

By complying with the required terms and conditions of the ADEC Excavation Dewatering Permit and dewatering and best practices plan, the Proposed Action is unlikely to cause significant impacts to groundwater resources. Therefore, mitigation measures pertaining to groundwater resources are not proposed.

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4.0 CUMULATIVE IMPACTS

This section describes the potential cumulative effects of the No Action Alternative and the Proposed Action when considered with past, present, and reasonably foreseeable future actions within the cumulative study area (see **Table 4-1** and **Figure 4-1**). The cumulative study area was determined by evaluating the logical physical limits to potential indirect effects of the Proposed Action and then identifying the logical existing boundaries (i.e., water bodies, roadways) that can be used to present those boundaries.

Cumulative effects and their significance may result from individually minor but collectively significant actions that take place over a period of time (40 CFR 1508.7). In determining whether a proposed action will have a significant impact, an EA must include considerations of whether the action is related to other actions with individually insignificant but cumulatively significant impacts [40 CFR 1508.27(b)(7)].

As such, this cumulative impact analysis identifies and considers the effects of past, present, and reasonably foreseeable projects. Past actions are actions that occurred in the past and may warrant consideration in determining the environmental impacts of an action. Present actions are any other actions that are occurring in the same general time frame as the Proposed Action. Reasonably foreseeable future actions are actions that may affect projected impacts of a proposal and are not remote or speculative. The scope and extent of the analysis considers the project type, location, potential to impact resources, and current condition of potentially affected environmental resource impact categories.

Table 4-1 Identified Past, Present, and Reasonably Foreseeable Future Actions

Project	Project Location	Project Description	Project Type	Construction Years
On Airport Projects[a/]				
FedEx Membrane Structure	Airport	Construct an approximately 43,000-square-foot, single-story, membrane fabric structure containing caster decking for package handling	Building	2023
Cargo and Cold Storage Facility	Airport	Construct an energy-efficient, climate-controlled air cargo warehouse facility and hardstand parking for cargo jets	Building	2024-2026
Runway 25R East Safety Improvements	Airport	Construct drainage improvements around the east RSA of Runway 7L/25R to meet FAA standards and prevent ponding east of the existing Tug Road.	Infrastructure	
Taxilanes E1, E3, E/G Intersection Reconstruction	Airport	Reconstruct Taxilanes E1, E3, and E/G intersections and modify existing storm drainage and adjust utilities, as necessary.	Infrastructure	
ANC Gates B4, B6, B7, B8, B9 Rehabilitation and Terminal Loop	Airport	Improve Gates B4, B6, B7, B8, and B9 with joint replacements, joint sealing, concrete repairs,		

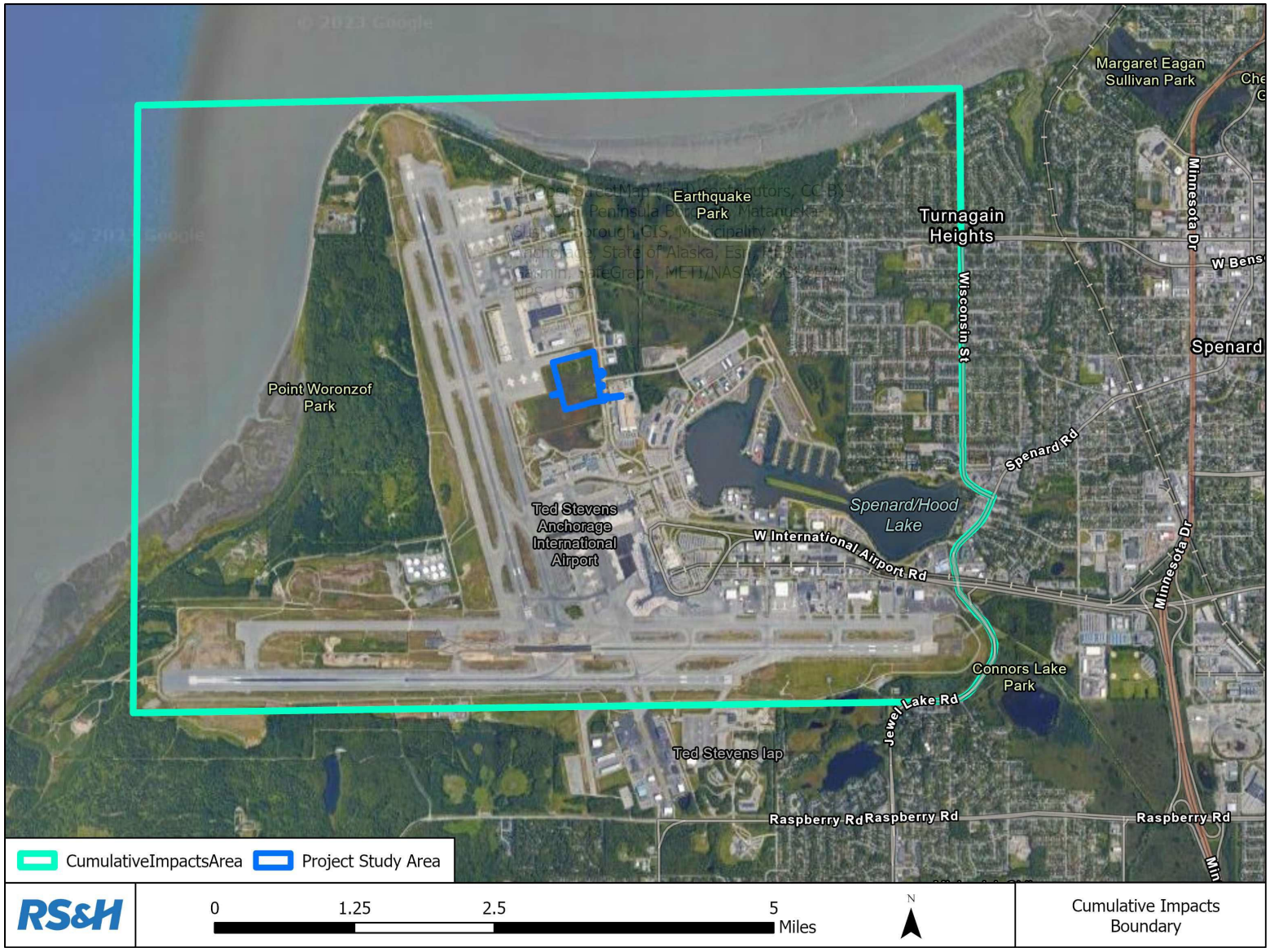
Road Improvements		and concrete handstand replacements.		
Taxilane S Improvements	Airport	Construct Improvements for Taxiway S		
FAA Taxilane Rehabilitation	Airport	Remove, replace, and restripe approximately 5,500 square yards of taxilane pavement	Infrastructure	
Taxiway K and Taxilane E Apron Rehabilitation	Airport	Rehabilitate the apron pavement north of Taxiway K and east of Taxilane E.	Infrastructure	
ANC RWY 7R/25L Joint Repair	Airport	Repair longitudinal joints in the structural section of Runway 7R/25L. There is about 160,000 feet of joints to repair.		
Turnagain Community				
Milky Way Dr Surface Rehab	Milky Way Drive from Aero Ave to Wisconsin St	Rehabilitate worn curbs and overlay the existing pavement along Milky Way Dr.	Infrastructure	No funding yet
Turnagain Parkway Surface Rehabilitation	Turnagain Parkway from Illiamna Ave to Northern Lights Boulevard	Rehabilitate or overlay the pavement along this collector road	Infrastructure	No funding yet
Northern Lights Boulevard Upgrade Phase IV	Northern Lights Boulevard from Postmark Drive to Nathaniel Court	Upgrade Northern Lights Boulevard into an arterial street.	Infrastructure	No work underway yet, but overlay work was recently completed.

/a/ The South Airpark Cargo Improvements Project is outside of the cumulative study area, so is not included in the above list.

4.1 CUMULATIVE IMPACTS TO RESOURCE AREAS

Only environmental categories in which effects could occur through construction or implementation of the Proposed Acton are considered when evaluating cumulative impacts. These include Air Quality; Climate; Hazardous Materials, Solid Waste, and Pollution Prevention; Natural Resources and Energy; Noise (construction only); and Water Resources. Resources that would not be affected by the Proposed Action are not included in the cumulative analysis as the Proposed Action would not contribute to any cumulative impact of these resources. The resources not affected include Biological Resources, operational Noise, and Visual Resources.

Figure 4-1 Cumulative Study Area



4.1.1 Air Quality

Construction of the cumulative projects would result in temporary impacts to air quality in the cumulative impact study area. During demolition and construction activities airport development projects, transportation projects, and other area development projects would generate temporary impacts to regional and local air quality. Generally, the current and proposed projects at ANC are related to airfield pavement rehabilitation, maintenance and joint repairs. Activities like these occur on a fairly regular basis at the Airport, and result in relatively minor amounts of vehicle exhaust and evaporative emissions. The foreseeable off-Airport cumulative projects could generate moderate amounts of construction-related air emissions individually, but the cumulative effect, if any, is not possible to calculate since the timing of these projects is unknown and construction emissions data is not readily available.

For foreseeable on-Airport cumulative projects, the Alaska Cargo and Cold Storage Project at ANC is located adjacent to the project study area and is anticipated to be under construction at the same time as the Proposed Action. While these projects would be under construction at the same time, the Proposed Action's contribution to cumulative air quality effects is not expected to be cumulatively considerable. This is because construction would occur in an area that is in attainment for all NAAQS pollutants and because the temporary, periodic impacts associated with construction would be minimized through the use of environmental controls (i.e., BMPs) that would reduce construction emissions. As such, emissions associated with construction of the Proposed Action would not cumulatively cause an exceedance of the NAAQS or contribute to an increase in frequency or severity of an existing NAAQS violation.

Operation of the Proposed Action would not be considered a "major source of air pollutants" and would not cause or create a reasonably foreseeable emission increase because the increase in operational efficiency would offset the limited increase in emissions due to the natural gas boilers in the new facility, so there would be no contribution to cumulative air quality impacts. ANC currently has a permit and reporting requirements with ADEC. Because there is a threshold for emissions at ANC, cumulative impacts are capped at an approved ADEC rate. Emissions associated with operation of the Proposed Action would not cumulatively cause an exceedance of the NAAQS or contribute to an increase in frequency or severity of an existing NAAQS violation. Cumulative impacts resulting from this project are negligible.

4.1.2 Climate

As described in **Section 3.5, Climate**, construction and operation of the Proposed Project would result in emissions of GHGs. FAA does not provide guidance for cumulative analysis for climate impacts. However, GHG impacts are cumulative in nature and the contributions of one project, or several geographically-related projects are negligible. The CEQ's current interim guidance on GHGs and climate change analysis indicates that "the analysis and public disclosure of cumulative effects can be accomplished by quantifying GHG emissions and providing context for understanding their effects …" (Council on Environmental Quality, 2023). The GHG emissions anticipated from the Proposed Action are disclosed in **Section 3.5.2.3**.

For disclosure purposes, the adjacent Alaska Cargo and Cold Storage Project estimates that construction would result in 969 metric tons of CO_2 emissions over the two-year construction period, which is equivalent to the energy use of 122 homes for one year. The Proposed Action has estimated 2,473.74 metric tons of CO_2 emissions over the two-year construction period, which is equivalent to the energy use of 312 homes for one year. Combined the two projects

would result in 3,442.74 CO_2 emissions over two years, which is equivalent to the energy use of 434 homes for one year.

Relating to operational GHG emissions, the Alaska Cargo and Cold Storage Project has identified GHG emissions related to jet emissions, which would not increase as a result of the Proposed Action, and refrigeration emissions, which would not occur under the Proposed Action. Therefore, the Proposed Action's contribution to GHG impacts is not cumulatively considerable.

4.1.3 Hazardous Materials, Solid Waste, and Pollution Prevention

Construction and operation of the Proposed Action and cumulative projects would adhere to all applicable federal, State, and local environmental laws and regulations. It is assumed that past projects complied with the relevant laws and regulations and no release of hazardous materials, pollution, or solid waste occurred. Reasonably foreseeable projects would also be required to adhere to all applicable federal, State, and local environmental laws. As discussed in **Section 3.6, Hazardous Materials, Solid Waste, and Pollution Prevention**, compliance with the EMP and existing federal, State, and local regulations pertaining to hazardous materials and human health and safety would ensure that there would be no impacts as a result of the Proposed Action. Because the site is contaminated with PFAS/PFOS, the EMP details the plan to treat contaminated water and materials before it is allowed to move offsite. The Alaska Cargo and Cold Storage Project also has an approved EMP that includes treating contaminated soil and water at the site. Annual water quality monitoring is currently conducted and would continue to be done in accordance with the APDES permit issued to ANC and would continue to occur beyond construction of the Proposed Action. Groundwater sampling in the Postmark Bog is conducted annually by DOT&PF. The number of samples and frequency of sampling may increase as more information is gathered about the extent of contamination within the area. The samples are analyzed for PFAS compounds and petroleum hydrocarbons. ADEC is notified if any samples exceed maximum contaminant levels for the targeted analytes. Samples are also collected by DOT&PF from the stormwater system to monitor for potential contamination. Therefore, as both the Proposed Action and the Alaska Cargo and Cold Storage Project would comply with their respective EMPs and the Proposed Action would reduce the existing contamination through the treatment of onsite groundwater, no cumulative impacts would occur regarding hazardous materials, pollution prevention, and solid waste.

4.1.4 Natural Resources and Energy

The Proposed Action would use commonly available natural resources during construction. None of the building materials that would be employed by the Proposed Action or any of the cumulative projects is considered to be unusual or in short supply. The Proposed Action would not generate excessive demands on local energy supplies. The demands for natural resources and use of the local energy supply, when considered with past, present, and reasonably foreseeable development projects, are not expected to have substantial cumulative natural resource and energy supply-related impacts.

4.1.5 Noise (Construction)

The Proposed Action would not result in an increase in operational activity and the proposed facility is located adjacent to the existing facility. Therefore, the Proposed Action would not contribute to cumulative operational noise impacts, including traffic, and only construction noise is addressed in this section.

Because construction of the Proposed Action would occur at the same time as construction of the Alaska Cargo and Cold Storage Project, there is potential for cumulative construction noise to reach levels above those level associated with construction of the Proposed Action. However, construction noise is temporary in nature and is subject to the Anchorage Noise Control Ordinance (AMC 15.70), which identifies a construction sound level limit of 80 dB within a residential property boundary or within a noise-sensitive zone during any one hour of the identified daily period, depending on season. If construction noise levels are higher than anticipated or occur outside of identified daily periods, AMC 15.70 requires a Noise Permit that could include conditions that the Municipality of Anchorage determines to be appropriate. Therefore, due to the distance to the closest noise-sensitive land use (residential use approximately 0.9 mile or 4,616 feet away), even with both projects running construction equipment at the same time (refer to **Section 3.8.2.3** for a discussion on noise attenuation), it is unlikely that construction noise would reach 80 dB within a residential property boundary and cumulative impacts related to construction noise would not be cumulatively considerable.

4.1.6 Water Resources

4.1.6.1 Wetlands

The Proposed Action would affect 14.32 acres of depressional wetlands, which will be mitigated for through the purchase of compensatory mitigation bank credits. The Alaska Cargo and Cold Storage Project at ANC would affect approximately 21.6 acres of wetlands within the Postmark Bog. A USACE Individual Permit was obtained for the Alaska Cargo and Cold Storage Project and requires the project sponsor to obtain 23.965 wetland credits.

USACE identified the geographic scope for the wetlands cumulative effects assessment is within the city of Anchorage, specifically the area immediately surrounding the Proposed Action, including the Airport and the Turnagain Arm residential neighborhood, commercial, and institutional developments to the west of the Airport which are encompassed by a portion the Knik Arm-Frontal Cook Inlet Watershed. These areas all drain to the same area of Cook Inlet. The geographic scope was not chosen to be the entire Knik Arm-Frontal Cook Inlet Watershed, as that watershed is over 200,000 acres in size and includes all of Cook Inlet and lands across Cook Inlet. Assessing cumulative impacts at such a large scope would serve to dilute the Proposed Action's cumulative impacts.[4] Combined, the Proposed Action and the Alaska Cargo and Cold Storage Project would permanently fill in 36.02 acres of wetlands, which constitutes the majority of the subject wetland.

The Proposed Action would add cumulatively to the area of developed land and impervious surface within the city of Anchorage. Increases in impervious surface would directly increase urban runoff pollutant contribution, and without the wetland's ability to store runoff, such runoff could potentially reach Cook Inlet faster. However, the Proposed Action would not be expected to result in an increase in development of the area, as the directly surrounding area has almost been maximally developed.

While the cumulative loss of Postmark Bog wetlands could be considered cumulatively considerable, as previously mentioned, the wetland investigation (**Appendix D**) concluded the following: (1) the wetlands can no longer be considered in an "undisturbed" state and past

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[4] Department of the Army Environmental Assessment and Statement of Findings for the Above-Referenced Standard Individual Permit Application; CEPOA-RD (File Number, POA-2021- 00209).

permitted dredging, contamination of the water, and surrounding developments have not only reduced system connectivity but also severely affected the value to wildlife and the surrounding ecosystems; (2) the contamination and location of the Postmark Bog at the Airport both severely reduces the safety of preserving the area for migratory bird habitat; (3) the area is actively managed to reduce bird activity in the area; and (4) the water quality has been significantly reduced as it is considered part of a large area-wide PFAS plume. Additionally, the Proposed Action includes remediation of the PFAS contamination on the site as well as grassed swales and a detention basin in order to reduce stormwater runoff. Further, USACE, as the jurisdictional regulatory agency, has determined that the purchase of mitigation credits would offset the impact and that the incremental contribution of the Proposed Action to cumulative impacts are not significant. Therefore, the cumulative impact of the Proposed Action on wetlands would not be cumulatively considerable.

Other regional projects may also affect wetland resources in the region. However, until specific project plans are known, it is not possible to quantify the specific cumulative effects on wetlands from the Proposed Action combined with the other projects in the cumulative project list. USACE requires mitigation for unavoidable impacts to jurisdictional wetlands and would require any of the projects in the cumulative project list to offset the loss of wetlands.

4.1.6.2 Surface Water and Groundwater

Construction and operation of the Proposed Action would have the potential for water quality issues such as increased surface runoff, downstream erosion, and potential discharges of pollutants, such as accidental spills. However, as identified in the EMP prepared for the Proposed Action (**Appendix E**), soil handling during construction would be conducted in a manner that prevents the release of contaminants to surface water and is protective of the water quality standards presented in the ADEC's 18 AAC 70 Water Quality Standards regulations. Stormwater management procedures would be outlined in the project SWPPP and ESCP prepared by the Contractor. Groundwater generated during construction would be managed in accordance with the terms and conditions of the ADEC Excavation Dewatering Permit, AKG002000. A dewatering and best practices plan would be prepared by the Contractor and submitted to ADEC for approval prior to the start of dewatering. The plan would include details of the treatment system design and processes. The plan would also provide details regarding the collection of periodic sampling of post-treated water, which will include the collection of at least two performance monitoring samples of effluent water during the active dewatering portions of the project. The Alaska Cargo and Cold Storage Project also has an approved EMP that includes soil handling, stormwater management, and groundwater management procedures at the site.

In terms of long-term groundwater contamination management, annual water quality monitoring is currently conducted and would continue to be done in accordance with the APDES permit issued to ANC and would continue to occur beyond construction of the Proposed Action. Groundwater sampling in the Postmark Bog is conducted annually by DOT&PF. The number of samples and frequency of sampling may increase as more information is gathered about the extent of contamination within the area. The samples are analyzed for PFAS compounds and petroleum hydrocarbons. ADEC is notified if any samples exceed maximum contaminant levels for the targeted analytes. Samples are also collected by DOT&PF from the stormwater system to monitor for potential contamination. Additionally, required water quality and stormwater BMPs were followed for past projects, and reasonably foreseeable projects would implement the same

practices to minimize potential for water quality impacts; therefore, no cumulative impacts would occur.

5.0 CONCLUSION

The impacts associated with the FedEx ANCA Facility have been discussed and analyzed throughout this EA and it has been determined that there would be no significant impacts as a result of this project. A Finding of No Significant Impact (FONSI) will be prepared. Wetland mitigation credits will be purchased to account for impacts to wetlands. No other mitigation is required.

5.1 SUMMARY TABLE OF ENVIRONMENTAL IMPACTS

Table 5-1 Summary Table of Environmental Impacts

Environmental Resource	Proposed Action	No Action
Air Quality	The Proposed Action is not expected to result in an exceedance of any air quality pollutants based on NAAQS standards. Due to the temporary nature of construction and the size of the Proposed Action, the Proposed Action would not result in significant air quality impacts.	None
Biological Resources	None. The Proposed Action would not affect any endangered or threatened species	None
Climate	Based on the USEPA diesel fuel emissions factor, the estimated CO_2 emissions from construction of the Proposed Action would be 2,474 metric tons over the duration of construction which is approximately two years. This is equivalent to the energy use of 156 homes for each year, or 312 homes total. Based on the facility's estimated energy usage, it would produce 1,144 metric tons of CO_2 per year. The global social cost from the increase in GHG emissions related to construction of the Proposed Action ranges from $19,932 to $100,995 in a given year, depending on year and discount rate used. The global social cost from the increase in GHG emissions related to operation of the Proposed Action ranges from $16,217 to $91,745 in a given year, depending on year and discount rate used. This is not expected to be a significant effect to climate.	None
Hazardous Materials, Solid Waste, and Pollution Prevention	Implementation of BMPs and continued annual monitoring of groundwater from Postmark Bog would reduce and avoid impacts to hazardous materials, solid waste, and pollution prevention.	None
Natural Resources and Energy	Construction and operation would not require the use of any rare materials that are in short supply. Construction would temporarily increase the consumption of energy and natural resources in the form of fuel, lubricants, and other construction materials necessary to	None

	build the proposed facility; however, all materials needed are readily available and could be met by existing resources. The temporary increase in demand for these resources would not represent a significant impact to natural resources or energy supply. Once in operation, the energy demands would not exceed available or future energy supplies.	
Noise	Construction would result in varying levels of noise generation subject to change based on the construction intensity and distance to a given receptor. However, due to distance from sensitive receptors, the noise level would not likely be perceptible over typical ambient noise levels of the Airport. The Proposed Action would not change airfield configurations, runway uses, flight patterns, or aircraft operations at the Airport. Additionally, the Proposed Action would not result in changes to local traffic patterns or result in additional traffic. Therefore, operation of the Proposed Action would have no effect on noise setting at the Airport.	None
Visual Resources	None. The Proposed Action would not create annoyance or interfere with normal activities from light emissions or affect the visual character of the area due to the light emissions. The Proposed Action would not result in viewshed changes for residents or a community off-Airport property.	None
Wetlands	The Proposed Action would affect 14.32 acres of depressional wetlands within the project study area	None
Floodplains	None. The Proposed Action would not occur within any existing floodplain	None
Surface Water	There are no surface waters within the project study area or on Airport property. The Proposed Action would increase the amount of impervious surfaces within the project study area by about 18.7 acres and increase the amount and rate of stormwater runoff within the project study area. Soil handling during construction would be conducted in a manner that prevents the release of contaminants to surface water and is protective of the water quality standards presented in the ADEC's 18 AAC 70 Water Quality Standards regulations. Stormwater management procedures would be outlined in the project SWPPP and ESCP prepared by the Contractor. Additionally, the Proposed Action includes grassed swales and a detention basin in order to reduce stormwater runoff and reduce any potential effects to stormwater.	None

Groundwater	Construction of the Proposed Action would entail ground disturbing activities that may affect groundwater resources. The EMP (see Appendix E) outlines management practices that would be taken while handling groundwater. Groundwater generated during construction would be managed in accordance with the terms and conditions of the ADEC Excavation Dewatering Permit, AKG002000. A dewatering and best practices plan would be prepared by the Contractor and submitted to ADEC for approval prior to the start of dewatering. Groundwater from Postmark Bog would continue to be monitored annually.	None

5.2 SUMMARY OF MITIGATION MEASURES

Mitigation measures are necessary to minimize impacts to wetlands. The following mitigation measure will be implemented to account for the loss of 14.32 acres of depressional wetlands due to the construction and implementation of the Proposed Action:

- The Airport currently holds 8.563 compensatory mitigation credits within the Airport's Klatt Bog wetland band and proposes using the available credits as mitigation for the Proposed Action. An additional 4.092 wetland compensatory mitigation credits will be purchased from Portage Reserve Mitigation Bank (Alaska Railroad).
- As required by ADEC, an EMP has been prepared that consists of a construction mitigation plan outlining guidelines and BMPs relating to the handling of potentially contaminated soil, groundwater, and surface water that could be encountered during construction (see **Appendix E**). Implementation of these BMPs would reduce and avoid impacts to hazardous materials, solid waste, and pollution prevention and no additional mitigation measures are proposed.

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6.0 LIST OF AGENCIES CONTACTED

The consultation process includes notifying agencies, organizations, and individuals of various documents that are being produced during the EA process. The following tables list the agencies, organizations, and individuals that received the NOP and will receive notification of the publication of the Draft EA.

6.1 FEDERAL AGENCIES

Table 6-1 lists the federal agencies consulted as part of the EA process.

Table 6-1
Federal Agencies Consulted

Agency	Contact Person	Division
U.S. Army Corps of Engineers	Roberta Budnik	Alaska District
U.S. Fish and Wildlife Service	Sara Boario	Alaska Region
U.S. Environmental Protection Agency	Casey Sixkiller	Region 10

6.2 TRIBAL CONSULTATION

Table 6-2 lists the tribes consulted as part of the EA process.

Table 6-2
Tribes Consulted

Tribe	Contact
Chickaloon Native Village	Chief Harrison
Eklutna Native Village	President Leggett
Knik Tribal Council	Megan Pierce

6.3 STATE OF ALASKA AGENCIES

Table 6-3 lists the state agencies consulted as part of the EA process.

Table 6-3
State Agencies Consulted

State Agency	Contact Person	Division
Alaska Legislature	Matt Claman, Senator	District H
Alaska Legislature	Jennifer Armstrong, Representative	District 16
Alaska Department of Commerce, Community, and Economic Development	Julie Sande, Commissioner	
Alaska Department of Environmental Conservation	Sam Kito	Division of Water
Alaska Department of Environmental Conservation	Robert Burgess	Contaminated Sites Program

State Agency	Contact Person	Division
Alaska Department of Environmental Conservation	Willow Weimer	Division of Water
Alaska Department of Environmental Conservation	James Rypkema	Division of Water
Alaska Department of Environmental Conservation	Jason Brune, Commissioner	

6.4 LOCAL ELECTED REPRESENTATIVES

Table 6-4 lists the local representatives consulted as part of the EA process.

Table 6-4
Local Representatives Consulted

Name	Position
Dave Bronson	Mayor
Suzanne LaFrance	Chair
Christopher Constant	Vice Chair
Kameron Perez-Verdia	District 3 Assembly Member
Austin Quinn-Davidson	District 3 Assembly Member
Jason Mellerstig	Sand Lake Chair, Anchorage Community Council
Meg Mielke	Spenard Chair, Anchorage Community Council
Anna Brawley	Turnagain President (former), Anchorage Community Council
Cathy Gleason	Vice President and Acting President, Turnagain Community Council

6.5 OTHER PUBLIC / PRIVATE ENTITIES

Table 6-5 lists other public / private entities consulted as part of the EA process.

Table 6-5
Other Public / Private Entities Consulted

Organization	Contact Person	Position
Anchorage Community Development Authority	Mike Robbins	Executive Director
Alaska Municipal League	Nils Andreassen	Executive Director
Anchorage Chamber of Commerce	Bruce Bustamante	President / CEO
Visit Anchorage	Julie Saupe	President / CEO
Anchorage Economic Development Corporation (AEDC)	Bill Popp	President / CEO
Federation of Community Councils	Gretchen Stoddard	Manager

7.0 LIST OF PREPARERS

The following section presents the list of agencies, firms, and individuals that were primarily responsible for the preparation of this EA. The list of individuals includes their name, location, education, years of experience, and primary responsibility or role during preparation of the EA.

7.1.1 Federal Aviation Administration

The FAA is the lead agency for the preparation of this EA. Responsibility for review and approval of this EA rests with the FAA. The following FAA Staff Members were involved in the preparation of this EA.

Kristi Ponozzo, Environmental Protection Specialist, Alaskan Regional Airports Division

7.1.2 Ted Stevens Anchorage International Airport

Teri Lindseth, Deputy Airport Director

John Johansen, Engineering, Environmental & Planning Manager

Tom Johnston, Environmental Program Manager

Kenton Curtis, Environmental Specialist

7.1.3 Principal Preparers

Responsibility for preparation of this EA rests with FedEx Express. Listed below are the persons responsible for the preparation of this EA.

7.1.3.1 FedEx Express

Steven Zebovitz, P.E., Chief International Environmental Project Engineer

Haden Campbell, P.E., Chief Engineer Environmental Management

7.1.3.2 RS&H, Inc.

Dave Full, AICP, Project Manager, Environmental

Karin Bouler, Deputy Project Manager, Environmental

Audrey Hsu, Environmental and GIS

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