

Draft

Environmental Assessment (EA)

Fort Smith Regional Airport Runway 8-26 Extension

Fort Smith Regional Airport Commission Fort Smith, Arkansas

February 2, 2022

This Environmental Assessment becomes a Federal document when evaluated, signed, and dated by the Responsible Federal Aviation Administration (FAA) Official.

Responsible FAA Official

Date

Prepared by:



Runway 8-26 Extension

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Runway 8-26 Extension

1.0 Introduction and Background

The Fort Smith Regional Airport (FSM or Airport) is a public use airport that is owned and operated by the Fort Smith Regional Airport Commission (Commission) and serves general aviation, major commercial airlines, and military aircraft. The Airport is located on the east side of Fort Smith, Arkansas and situated between Interstate 540 (I-540), Rogers Avenue and Zero Street. A general location map of the Airport in relation to the city is shown in **Figure 1**. The Airport covers approximately 1,403 acres, has one primary use asphalt runway, a secondary runway, full parallel taxiways, ground support equipment, and one active concourse with three gates.

The Airport's 2020 Airport Master Plan Update (MPU) states that FSM will continue to accommodate commercial airline service, general aviation, and military-use through the 20-year planning period¹, which is considered to be 2038. FSM proposes to extend Runway 8-26 to support the project growth demands of the airport and is considered the Commission's Proposed Action. The Commission's Proposed Action and connected actions are described in detail in Section 3.

Due to magnetic declination, Runway 7-25 will be redesignated as Runway 8-26. The current expected chart date for this change is scheduled for January 27, 2022. Any reference to Runway 7-25 at FSM in this document or supporting documents shall also refer to Runway 8-26 at FSM.

In 2021, the Airport was notified that Ebbing Air National Guard Base was selected as the preferred location to provide support for an international military flying mission. All actions required for that mission are separate actions and environmental impacts for such are to be disclosed and discussed in the US Air Force's (USAF) Environmental Impact Statement (EIS).

This EA has been prepared per Federal Aviation Administration (FAA) Orders 5050.4B and 1050.1F, and the FAA Environmental Desk Reference for Airport Actions. A list of EA preparers is located in **Section 9**.

2.0 Purpose and Need

2.1 Purpose

The purpose of the Commission's Proposed Action is to extend Runway 8-26 by 1,300 feet to meet the Commission's forecasted commercial air carrier and general aviation needs by providing a 9,300-foot runway per Advisory Circular (AC) 150/5325-4B². All design and development associated with the Commission's Proposed Action, including connected actions identified in **Section 3**, would meet current FAA Airport Design Standards per AC 150/5300-13A, 14 Code of Federal Regulations (CFR) Part 77 airspace regulations, AC 150/5325-4B, and other appropriate FAA ACs. The Commission's Proposed Action and connected actions would be designed to be

¹ The final draft of the FSM Airport Master Plan Update was completed in April 2020.

² Runway specifications are found in FAA's Advisory Circular 150/5325-4B, *Runway Length Requirements for Airport Design*.

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compatible with commercial, general aviation, and military aircraft using the airport. The FAA's Federal Action includes approval of the ALP to reflect the Commission's Proposed Action.

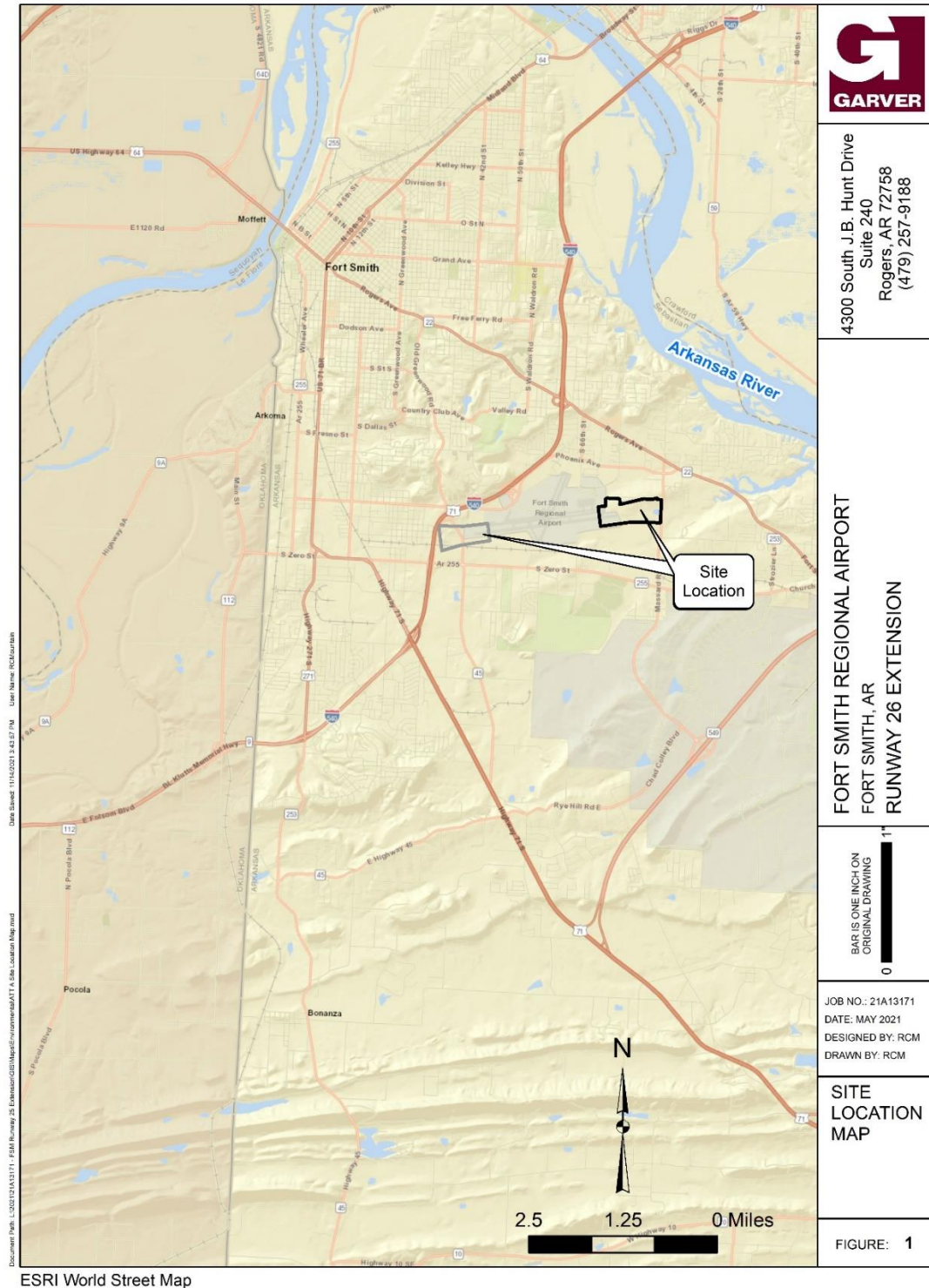


Figure 1: Site Location Map

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2.2 Need

The Commission's Proposed Action is needed to accommodate the current and the Commission's projected commercial air carrier and general aviation use of the airport by providing the design standard runway length, full parallel taxiway, and associated Navigational Aids (NAVAIDs). The future critical design aircraft identified in the MPU that regularly uses the airport is the Embraer EMB-175 and CRJ-900. However, larger commercial aircraft, including the Boeing 727 and 737 series, are anticipated to use the Airport, but not reach the regular use criteria of 500 annual operations as defined by FAA. As a result, funds received from Passenger Facility Charge (PFC) for commercial airline travel or the Airport Improvement Program (AIP) are not utilized in funding the Commission's Proposed Action, which will be entirely funded with local and state funds. According to FAA's "Noise Levels for US Certificated and Foreign Aircraft - 11/15/2001" (AC 36-1H), the 727 and 737 have the measured noise Effective Perceived Noise Level (EPNdB) ranges: 727 - Approach (AP) 95.4 -103.2; Take Off (TO) 80.3 - 102.4 737 - AP 96.1 - 103.8; TO 80.3 - 97.7. This information is being included to assist with future procedures planning, mitigate any potential noise impacts, and help prevent potential segmentation from occurring.

Existing Runway 8-26 is 8,017 feet in length and 150 feet in width. The 2020 FSM MPU recommended extending the runway based on current and forecasted needs. **Appendix A** includes the runway capacity section of the MPU for reference. These needs were based on takeoff lengths required for 90 to 100 percent loads, landing length requirements for wet runway conditions, and site conditions specific to FSM. A summary of Instrument Flight Rules (IFR) operational data from 2018-2020 for runway length critical aircraft is included in **Table 1**:

Table 1: Summary of Runway Length Critical Aircraft

Aircraft	Operations (2018-2020) From TFMSC Data
Boeing 727 Series	4
Boeing 737 Series	204
Gulfstream 100	18
Gulfstream IIB	24
Gulfstream 450	82
Gulfstream 550	18
Beech Jet 400A	1,323
Hawker 800	103
Citation Bravo	264
Citation III	18
Citation 560XL	1,440
Citation X	22
Total Operations	3,520

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Based on historical operations and forecasted growth of both commercial service and general aviation operations at FSM, the Master Plan Update recommended an extension to Runway 8-26 to a total length of at least 9,300-ft. This length would provide adequate takeoff and landing distance to most of the general aviation fleet during all conditions. This length would also provide adequate stage length for Boeing 737 takeoff operations at 90% useful load for the aircraft operating in either general aviation or commercial service conditions.

The following actions to be included as the Commission's Proposed Action of extending Runway 8-26 1,300 feet to the east are needed to comply with the airport development standards set forth by FAA for the safe and efficient operation of aircraft at the airport:

- Extension of Taxiway A is needed to provide a full parallel taxiway for the length of the proposed extension of Runway 26 as required for instrument approach procedures with low visibility minimums below one mile³ and recommended for all conditions.
- Relocation of the Runway Protection Zone (RPZ) associated with the proposed extension of Runway 26 is needed to satisfy FAA approach and departure RPZ requirements provided in AC 150/5300-13A.
- Easement acquisition of 0.53 acres of property is needed to accommodate the shifted RPZ and maintain full control of the RPZ.
- Security fence relocation is needed to maintain security of the airport and shifted RPZ.
- Relocation and upgrade of the Runway 26 glide slope (GS) antenna is needed to position the GS closer to the end of the proposed Runway 26 extension and within 400 feet of the centerline of the Runway.
- Relocation of the medium-intensity approach lighting system with runway alignment indicator lights (MALSR) is needed to keep the approach lighting system in the proposed Runway 26 extension approach path.
- Relocation of the precision approach path indicator (PAPI) lighting system is needed to position the PAPI within the runway safety area (RSA) and runway object free area (ROFA) in compliance with FAA airport design standards.
- Relocation of the east localizer (LOC) is needed to site it on the extended runway centerline outside the RSA between 1,000 feet and 2,000 feet beyond the end of the runway.
- Replacement of the west localizer (LOC) is needed due to an upgrade in the associated Runway 26 glideslope antenna.
- Relocation of the runway visibility range (RVR) sensor collocated with the relocated glideslope antenna.
- Amended approach procedures to update approaches based on the new runway end.
- Installation of a 200-foot blast pad at the end of Runway 26.

³ AC 150/5300-13A, Paragraph 405.

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The 2020 AMP identified the 1,300-foot extension of Runway 8-26 as Airside Alternative 1 and projected the extension to occur within the 20-year planning period on the Airport Layout Plan (ALP) to support the need for forecasted air carrier operations. The total runway length will be 9,317 feet. Achieving a minimum 9,300-foot runway will satisfy the Airport's need for future air carriers and general aviation operations. The Commission's Proposed Action is specifically identified and described in **Section 3.0**.

3.0 Alternatives

Two airside runway extension alternatives were considered in achieving the recommended runway length for Runway 8-26 as identified in the purpose and need. The two build alternatives considered in this EA are identified as Airside Alternative 1 and Airside Alternative 2 in the MPU. The No Action Alternative will not meet the purpose and need for the project; however, it was retained to satisfy the requirements of NEPA and maintain a baseline to allow for a comparison of impacts.

3.1 Airside Alternative 1 – Commission's Proposed Action

Airside Alternative 1 (Alternative 1) is considered the Commission's Proposed Action and includes an extension of Runway 8-26 a distance of 1,300-feet to the east. The existing runway width of 150 feet will be maintained. A 200-foot blast pad will also be constructed at the end of the extended runway according to FAA AC 150/5300-13A design standards. The improvements involved with this alternative are shown on **Figure 2**. Alternative 1 satisfies the objectives of the purpose and need by providing the required runway length, full parallel taxiway, and NAVAIDs required for safe and efficient use of the airport. The Commission's Proposed Action includes the following connected actions:

3.1.1 Taxiway A Extension

The proposed extension of Taxiway A will be designed to accommodate FAA separation distance requirements provided in AC 150/5300-13A for the safe and efficient maneuvering of aircraft in relation to the extended runway. This 1,300-foot taxiway extension will maintain the 75-foot width and provide for a full parallel taxiway required for instrument approach procedures with low visibility minimums below one mile for the extended Runway 8-26. Refer to **Figure 2** for the taxiway extension layout. This expansion will require clearing and grubbing of approximately 20 acres of existing airport maintained grassed area.

3.1.2 Runway Protection Zone Relocation

As a result of extending Runway 8-26 1,300 feet to the east, the RPZ is proposed to be relocated to comply with AC 150/5300-13A design standards and threshold siting surfaces. In order for the airport to control the entirety of the relocated RPZ, approximately 0.53 acres of residential property would be required from an adjacent landowner as a permanent easement along Louisville Street. This easement has not been acquired to date; however, the easement process

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with the City of Fort Smith has started. There are currently no developments in this portion of the property required for easement. The remaining RPZ is located entirely on airport property.

3.1.3 Obstruction Removal

Less than one acre of trees has been identified as obstructions to the 34:1 Threshold Siting Surface (TSS) and 50:1 Part 77 approach surface associated with the relocated Runway 26 threshold. These trees will be removed or trimmed accordingly.

3.1.4 Airport Operations Area (AOA) Security Fence

Removal of approximately 50 linear feet and installation of approximately 1,760 linear feet of AOA security fence and partial security fence is required for the relocation of the MALSR. The relocated AOA security fence will meet standard design and signage criteria identified in the current edition of FAA Advisory Circular 150/5370-10 *Standards for Specifying Construction of Airports*.

3.1.5 Land Conversion to Aeronautical Use

The entirety of the relocated RPZ, including an estimated 0.53 acres of a portion of residential property will be converted to aeronautical use in compliance with FAA standards.

3.1.6 Glideslope Antenna and RVR Relocation

The Runway 26 GS antenna would be upgraded and relocated as required for the new Runway 26 threshold and will be sited approximately 400 feet from the centerline of the runway. The areas around the GS antenna will be graded according to FAA standards. The RVR co-located with the current Runway 26 GS antenna will also be relocated.

3.1.7 MALSR Relocation

The existing MALSR would be relocated to be in the proposed Runway 26 extension approach path to achieve visibility minimums required for <3/4 statute mile approaches. MALSR light stations will extend 2,400 feet beyond the Runway 26 threshold and will be positioned every 200 feet.

3.1.8 PAPI Relocation

The Runway 26 PAPI system would be relocated within the new RSA; however, precise location will depend on siting factors determined during final design. Lights would be located 20-30 feet apart, 50-60 feet from the edge of the runway, and approximately 1,000 feet from the new Runway 26 threshold.

3.1.9 LOC Relocations

The East LOC (Runway 8 LOC) would be sited on the extended runway centerline outside the extended RSA, approximately 1,000 beyond the Runway 26 threshold. In addition, the West LOC

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(Runway 26 LOC) will be upgraded in its current position to match the equipment type of the proposed Runway 26 GS antenna.

3.1.10 Approaches

Runway 26 approach procedures will be amended and/or added to account for the extended runway as determined by AC 150/5300-13.

3.2 Commission's Proposed Action Construction Phasing

The Commission's Proposed Action is anticipated to be constructed in phases as outlined below:

- Runway 26 and Taxiway A Extension: 2nd Quarter 2022 – 1st Quarter 2023
- NAVAID Relocations: 3rd Quarter 2022 – 1st Quarter 2023
- Approach Flight Checks: 1st Quarter 2023
- Published Approaches: 2nd Quarter 2023

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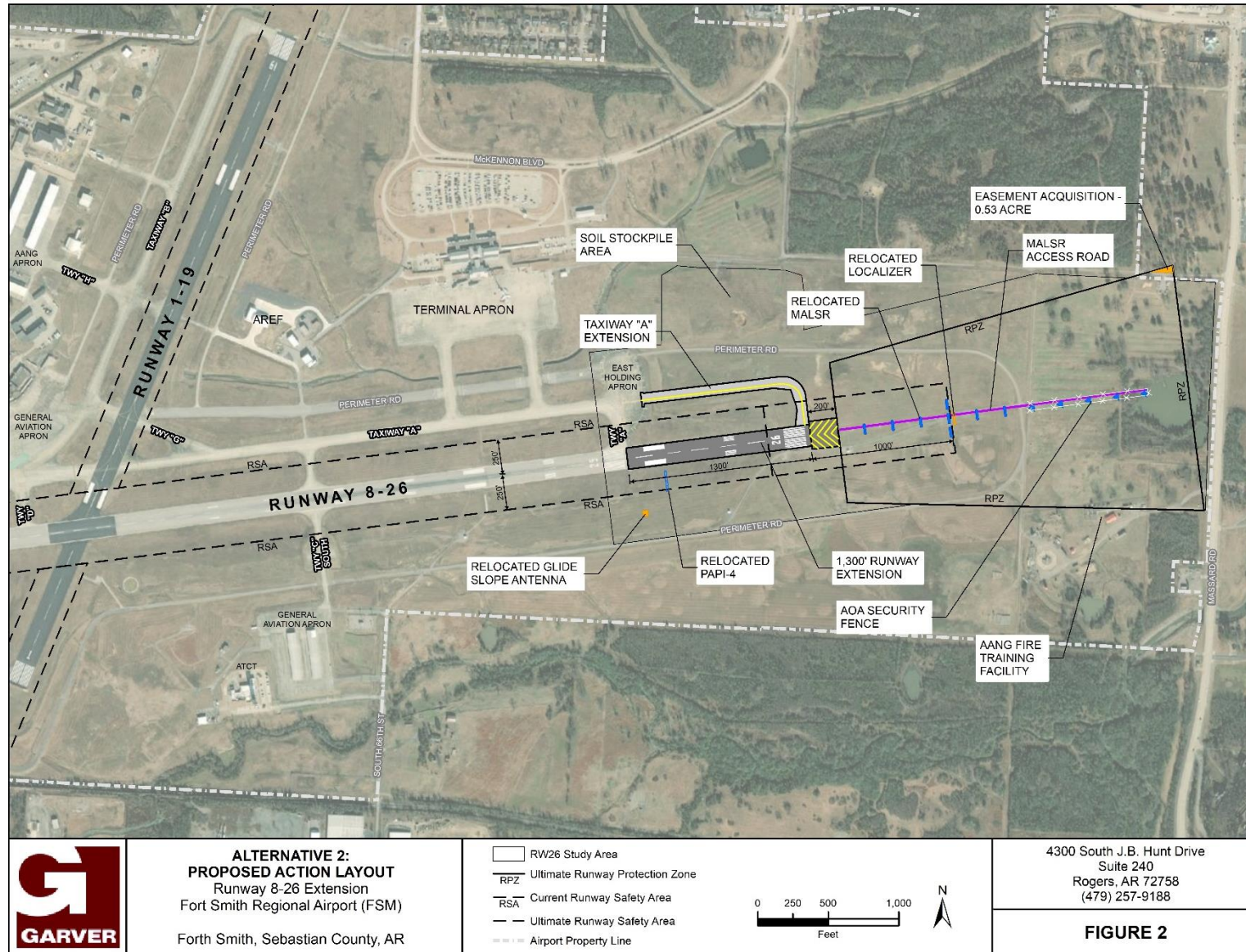


Figure 2: Commission's Proposed Action Overview

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3.3 Airside Alternative 2

Airside Alternative 2 (Alternative 2) includes an extension of Runway 8-26 a distance of 700 feet to the west in addition to 600 feet to the east, bringing the total extended runway length (both sides) to 1,300-ft. Improvements and connected actions involved with Alternative 2 are conceptually shown on **Figure 3**. The extension would result in a 9,317-foot long of runway. The eastward extension would have similar impacts as listed in Section 3.1, except for the land conversion, which would no longer be required as the RPZ would not extend beyond airport property.

The westward extension of Runway 8-26 would include similar relocations of NAVAIDS; however, the following differences are noted between the Commission's Proposed Action and Alternative 2.

- The RPZ would shift west approximately 700 linear feet and include easement acquisition of 17.15 acres of commercial and industrial property that would be converted to aeronautical use. This area includes property along Interstate 540 (I-540) and would then be uncontrolled.
- An estimated seven commercial/industrial structures and businesses would require relocation.
- Removal of approximately 615 linear feet and installation of approximately 1,015 linear feet of AOA security fence would be required for the relocation of the RPZ and to accommodate the conversion of additional land to aeronautical use.
- Rerouting of the perimeter service road outside of the RSA/ROFA.
- Relocation of the GS antenna and localizer.

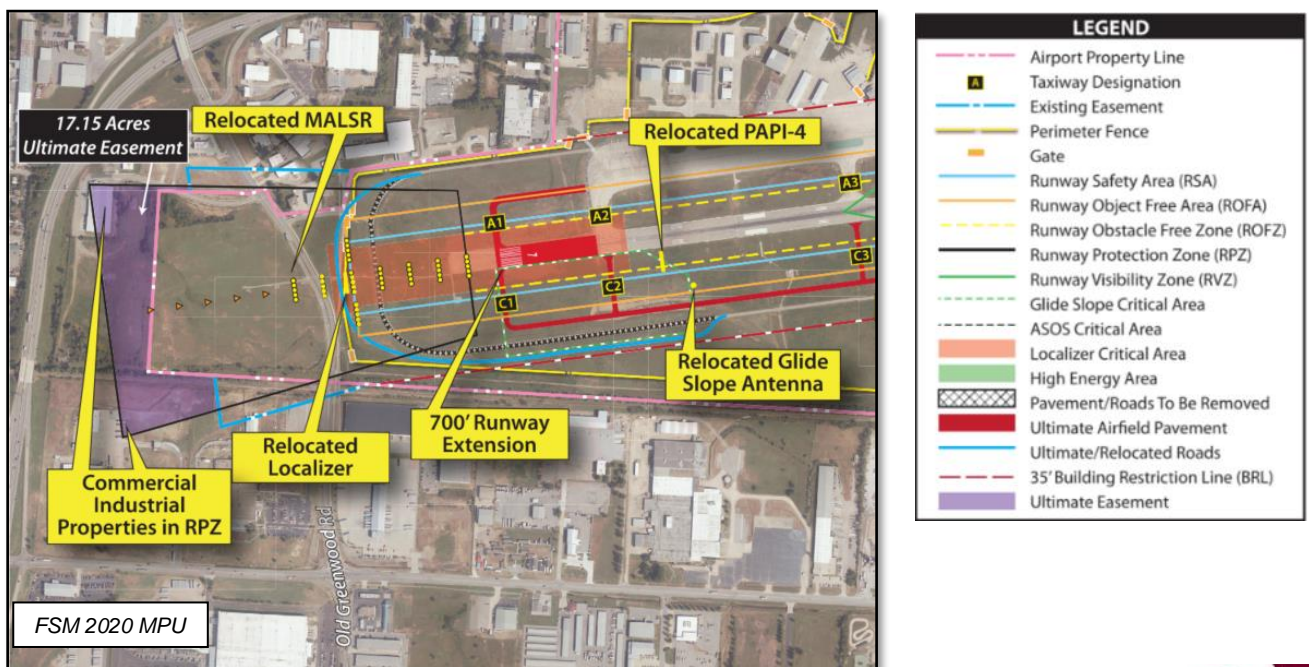


Figure 3: Alternative 2 MPU Conceptual Layout (West Extension)

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3.4 Initial Screening of Alternative 1 and Alternative 2 Improvements

Alternative 1, Alternative 2, and the No Action Alternative were evaluated in achieving the purpose and need of the Commission's Proposed Action. Potential impacts based on conceptual layouts and the MPU are summarized below and in **Table 2**.

Alternative 1 satisfies the objectives of the purpose and need by providing the required runway length, full parallel taxiway, and NAVAIDs required for safe and efficient use of the airport and is carried forward for further evaluation in this EA.

Alternative 2 also satisfies the purpose and need by providing the required runway length, full parallel taxiway, and NAVAIDS. Alternative 2 would require 16.62 more acres of easement acquisition, which would result in the removal of at least seven commercial businesses and seven structures. Partial land acquisition would be from industrial and commercial properties that could have higher likelihood of containing hazardous materials. Additionally, the airport perimeter road would need to be relocated around the proposed RPZ. Although Old Greenwood Road, a major arterial street, is located within the current RPZ, the 700-foot extension of Runway 8 to the west would place the road closer to the end of the runway. It is FAA guidance⁴ to not have public roadways within the RPZ. Alternative 2 was dismissed from consideration and not carried forward for further review in this document due to greater infrastructure and environmental impacts as described in this section.

The No Action Alternative will not meet the purpose and need for the project; however, it was retained to satisfy the requirements of NEPA and maintain a baseline to allow for a comparison of impacts.

Table 2: Alternatives Screening Matrix

Resource Impacts	Alternatives		
	No Action*	Alternative 1 (Runway 26 Extension)	Alternative 2 (Runway 8 & 26 Extensions)
Business Relocations	N/A	0	7
Public Roadway Located in RPZ		0	1
Structure Relocations		0	7
Tree Removal (acres)		1.6	0
Property Acquisition (acres)		0.53	17.15
Wetlands in Study Area (acres)		28.9	41.8
Meets Required Runway Length		Yes	Yes
Impacts are based on estimated likelihood of impacts from conceptual layouts.			

⁴ AC 150/5300-13A, Change 1. *Airport Design*, Paragraph 310.d.

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Based on the amount of impacts compared between Alternatives 1 and 2, the Commission's Proposed Action is Alternative 1, which is also the FAA's preferred alternative.

4.0 Affected Environment, Environmental Consequences, and Mitigation

4.1 Introduction

This section describes the existing environmental conditions within the study area for resources that could be affected by the Commission's Proposed Action. A site visit was conducted on June 4, 2021, to document the existing conditions and environmental resources within the study area. Resources were identified and impacts evaluated according to FAA Orders 1050.1F, 1050.1F Desk Reference, and 5050.4B. The No Action Alternative is retained to satisfy the requirements of NEPA and provide an environmental baseline for the build alternative. Agencies consulted during preparation of the EA also contributed to the evaluation of the potential effects on specific resources. The study area consists of approximately 160 acres in size and is described below in detail.

4.2 Study Area

Figure 4 shows the study area for the Commission's Proposed Action developed to adequately assess potential direct impacts incurred by the Commission's Proposed Action. The indirect study area is defined as the area in which visual effects could be observed and is included in the study area shown in **Figure 4**. The indirect/auditory study area also includes areas in which audible impacts could occur because of noise level increases as identified in **Section 5.12**.

The descriptions, photographs, and figures in this section depict current conditions within the study area and the areas that will be affected as the project moves forward through design and into construction. Photographs of the project site are included below. **Figure 4** shows the location where each photograph was taken.

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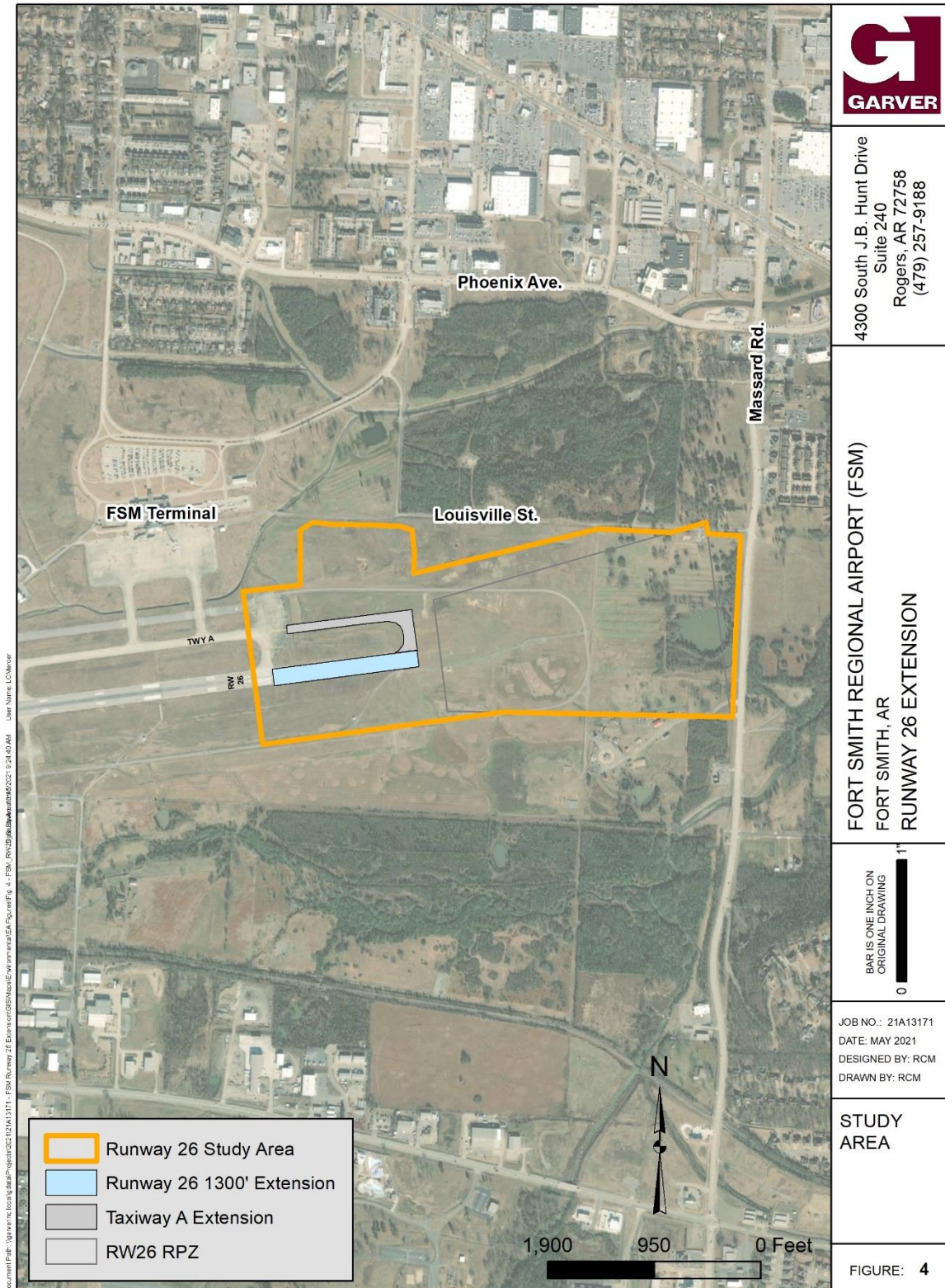
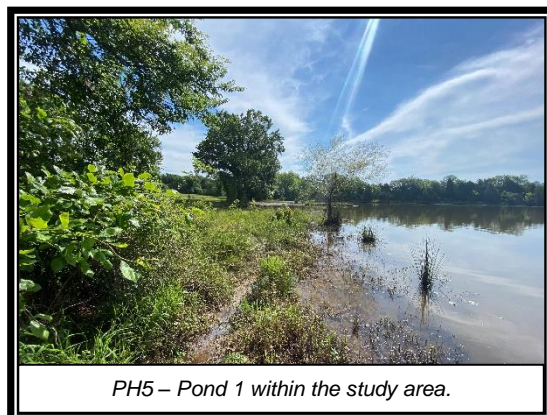
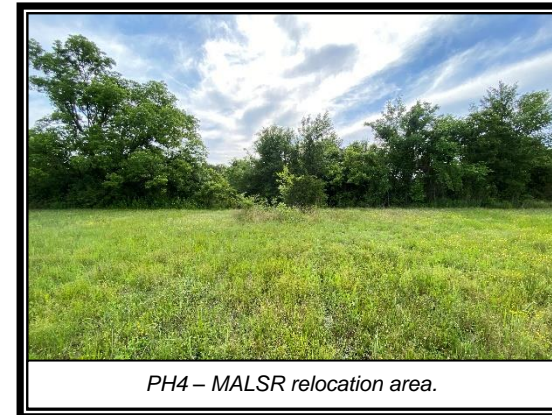
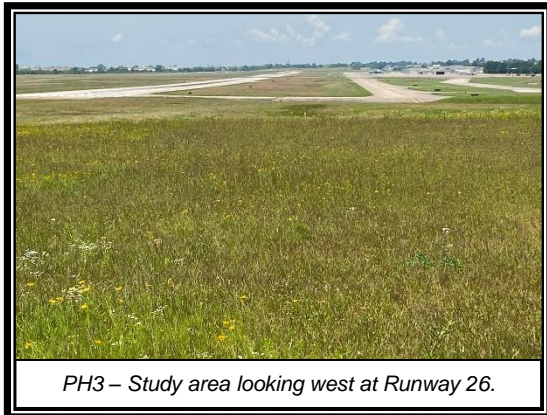
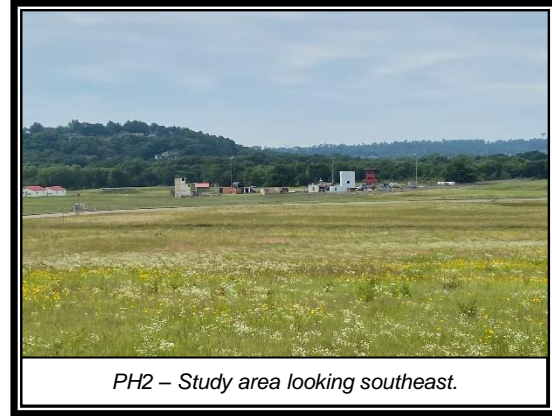
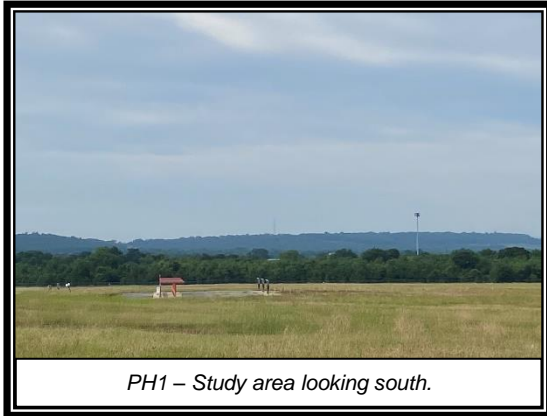


Figure 4: Study Area and Affected Environment Overview

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Runway 8-26 Extension**4.3 Impact Assessment**

Assessing impacts also includes documenting agency comments and concerns regarding agency-managed resources that may be affected by the project. In June and August 2021, letters were sent to applicable local, state, and federal agencies to assess the level of environmental consequences based on the purpose and need of the project.

This section describes the existing natural and social environmental resources that could be affected by or could affect the Commission's Proposed Action or the No Action Alternative. Only those specific resources relevant to potential impacts are described in detail. Resources potentially impacted by the Commission's Proposed Action and the No Action Alternatives are evaluated in this section in accordance with FAA Order 1050.1F. **Appendix B** contains agency correspondence.

4.4 Air Quality**4.4.1 Affected Environment**

The U.S. Environmental Protection Agency (EPA) developed the National Ambient Air Quality Standards (NAAQS) under the Clean Air Act (CAA) for the six most common air pollutants; carbon monoxide, nitrogen dioxide, ozone, particulate matter, sulfur dioxide, and lead. These pollutants are regulated by the EPA through human health-based (primary standards) and environmental-based (secondary standards) criteria. The NAAQS are applicable to all areas of the United States. Areas of the United States with poor air quality that have ambient concentrations of these criteria pollutants above the NAAQS are designated as "nonattainment areas". A nonattainment area is required to have an applicable State Implementation Plan (SIP) that sets mitigation measures and timelines to bring ambient concentrations of the criteria pollutants below the NAAQS. When ambient concentrations in a nonattainment area meet the NAAQS, the EPA designated the area as a "maintenance area" and the applicable SIP ensures that the ambient concentrations of criteria pollutants do not increase above the NAAQS again. With regard to aviation-related Federal actions planned to occur in a nonattainment or maintenance area, the proposed impacts to air quality must conform to the conditions of the applicable SIP. The EPA does not currently list Sebastian County as an area of nonattainment or maintenance for NAAQS.

4.4.2 Environmental Consequences**No Action Alternative**

The No Action Alternative would not directly or indirectly impact air quality as there would be no change the amount of aircraft activity, runway use patterns, taxi times or vehicles accessing the airport. Since the No Action alternative does not involve construction activities, no additional impacts to the air quality would be expected to occur.

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Commission's Proposed Action

- **Direct Impacts**
Exhibit 4-1 of FAA Order 1050.1F provides the FAA's significance threshold for Air Quality. A significant impact would occur if the Commission's Proposed Action would cause pollutant concentrations to exceed one or more of the NAAQS or if it were to increase the frequency or severity of any such existing violations. The Commission's Proposed Action will accommodate future aircraft activity, changes in runway use patterns, and taxi times. However, operational effects from ground access vehicles or aircraft emissions are expected to not rise to the level of significance. Temporary increases in emissions resulting from construction activities may occur for a limited period of time. The air quality impacts from construction would be limited to the project site and the immediate adjacent areas. Potential emissions from commercial and construction vehicles were calculated for the Commission's Proposed Action using proposed construction years, activities, and equipment. Results are provided in **Table 3**. The most common air pollutants generated from construction activities are carbon monoxide (CO), volatile organic compounds (VOCs), nitrous oxides (NOx) and particulate matter with a diameter of less than 10 microns (PM₁₀). Emissions for these pollutants were evaluated over a one-year period and compared to the US EPA de minimis thresholds for nonattainment areas.

Table 3: FSM Construction Air Emissions

Year	CO	VOCs	NOx	SOx	PM₁₀	PM_{2.5}
2022	3.24	1.62	6.29	0.03	5.12	0.75
2023	1.35	0.71	2.47	0.01	2.39	0.35
TOTAL	4.59	2.32	8.76	0.04	7.51	1.10

- **Indirect Impacts**
Indirect effects on air quality on and around the airport are anticipated based on projected growth of the Fort Smith area and are associated with construction and increased operations. Reviewing overall air quality data that is continually monitored by DEQ was conducted and the closest ambient air quality measurement station for any of the criteria air pollutants is in Roland, Oklahoma for PM 2.5.
- **Mitigation and BMPs**
Air quality effects resulting from the implementation of the Commission's Proposed Action or No Action Alternative are anticipated to be below threshold levels of significance.

4.5 Biological Resources

4.5.1 Affected Environment

The study area contains routinely mowed and maintained infield areas with a dominance of upland and wetland herbaceous grasses and forbs. Dominant tree and sapling species observed in the

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study area around two on-site ponds included winged elm (*Ulmus alata*), black cherry (*Prunus serotina*), Southern catalpa (*Catalpa bignonioides*), Chinese privet (*Ligustrum sinense*), Eastern red cedar (*Juniperus virginiana*), common persimmon (*Diospyros virginiana*), and Bradford pear (*Pyrus calleryana*). Dominant upland herbaceous species observed included goldenrod (*Solidago* spp.), blackberry (*Rubus* spp.), Chinese bushclover (*Lespedeza cuneata*), Buffalo grass (*Bouteloua dactyloides*), fescue (*Festuca arundinacea*), and daisy fleabane (*Erigeron strigosus*). Wetland plant species are identified in **Section 4.11**. The remainder of the study area contains fragmented forested wetlands and uplands, and two ponds, which are also described in more detail in **Section 4.11**. Overall, the ground disturbance study area provides limited biotic resources within the undisturbed herbaceous maintained airfield. The proposed soil stockpile area has a similar biological composition as the remaining study area.

Fish

Two ponds and one small, isolated pool under the perimeter road are the only hydrology features capable of providing habitat for fish species. The pool under the perimeter road is located within the limits of an ephemeral drainageway and is likely dry during certain seasons of the year. Biologist observations documented mosquito fish (*Gambusia affinis*) and perch species (*Lepomis* spp.) within the pool and large pond (Pond 1).

Wildlife

The presence of wildlife within the AOA security fence at FSM is likely diminished by the limited, monocultural nature of the maintained airfields presenting a lack of available, suitable habitat for many terrestrial species. The majority of available habitat consists of approximately 3.5 acres of mixed hardwood wetland and upland forest surrounded by some maintained grassland intersected by roads and a utility right-of-way. Wildlife which could be expected in the area include small mammals, birds, reptiles, amphibians, and terrestrial and aquatic invertebrates.

The indirect study area for assessing the affected environment for wildlife species considers auditory effects that reach farther out from the airport. Available wildlife habitat around the airport is also fragmented due to residential, commercial, and industrial developments.

Plants

The study area contains predominantly herbaceous vegetation with forested areas located on the east side and associated with forested wetlands. Dominant species within the study area are documented in **Section 4.11**. An estimated 32 acres of herbaceous and 3.5 acres of forested areas are present within the study area. The Arkansas Natural Heritage Commission (ANHC) was contacted regarding the occurrence of rare plants, outstanding natural communities, and other elements of special concern. ANHC indicated that a portion of the Commission's Proposed Action study area was historically mapped as prairie and locally known as Massard Prairie.

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Federal and State Listed Species

The United States Department of the Interior, Fish and Wildlife Service (USFWS), Arkansas Ecological Services Field Office was consulted early during the development of this document. Agency responses are located in **Appendix B**. The USFWS Information for Planning and Consultation (IPaC) on-line tool was used to identify potential habitat for six federally listed endangered, threatened and candidate species that may occur in or pass through the study area within Sebastian County and listed in **Table 3**. No critical habitats were identified within or near the study area. The study area for Biological Resources is the study area as shown in **Figure 5**, which also identifies suitable habitats.

The ANHC was contacted to identify the location of any known records for state species of concern within their Natural Diversity Database. Currently there are no state laws that protect state listed species in Arkansas. Only animal species identified as State Endangered are provided protection under the Arkansas Game and Fish Commission regulations (AGFC) *Regulation P1.01 Endangered Species List – Animals*, as adopted under Amendment 35 of the Constitution of the State of Arkansas. State listed plant species currently do not have the same protecting regulations. Three species, Geocarpon, opaque prairie sedge, and maple-leaf oak were identified as having state threatened or endangered status and are listed in **Table 4**. Many state-listed species have a status of “inventory element” that indicates the ANHC is conducting active inventory work on the species. No detailed habitat was described for species with inventory element status. Coordination with ANHC is provided in **Appendix B**.

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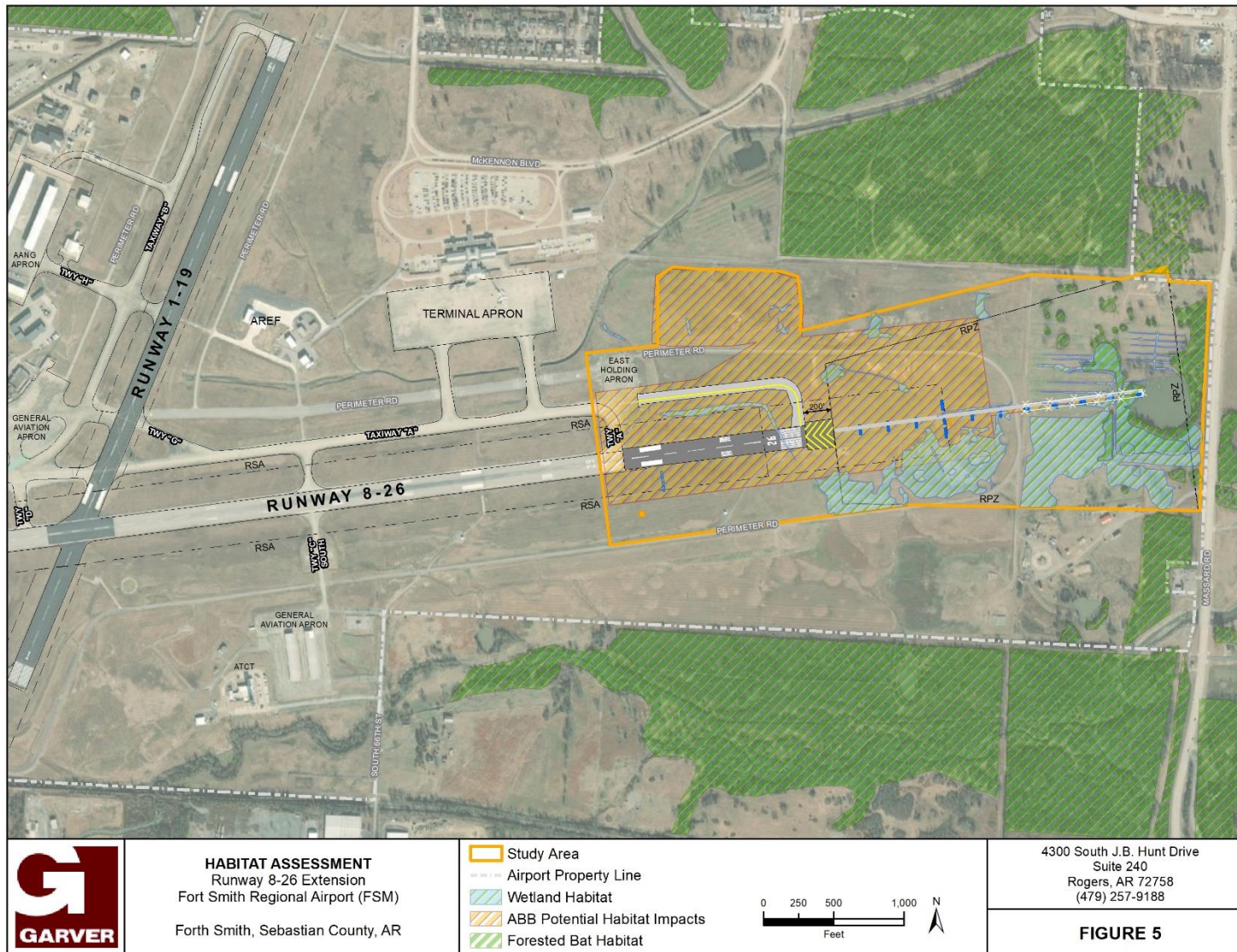


Figure 5: Habitat Overview

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Table 4: Federally Listed Species

Species*	Habitat Requirements	Habitat Present Within Ground Disturbance Study Area
Northern Long-eared Bat (<i>Myotis septentrionalis</i>) Threatened	In winter, Northern Long-eared bats use caves, mine portals, abandoned tunnels, protected sites along cliff lines and similar situations that afford protection from cold. They are easily overlooked as they often wedge themselves back into wall cracks.	The ground disturbance study area may contain trees suitable for roosting. Approximately 3.5 acres of suitable forested habitat is located within the study area. No caves or mine portals were observed in or near the project area.
Eastern Black Rail <i>Laterallus jamaicensis ssp. Jamaicensis</i> Threatened	Eastern black rail habitat can be tidally or non-tidally influenced, and range in salinity from salt to brackish to fresh. Tidal height and volume vary greatly between the Atlantic and Gulf coasts and therefore contribute to differences in salt marsh cover plants in the bird's habitat.	The on-site emergent wetlands are routinely mowed and therefore do not contain suitably dense vegetative cover within the study area. The Eastern black rail is likely a vagrant in Arkansas.
Piping Plover <i>Charadrius melodus</i> Threatened	Migratory stopover habitat includes sparsely vegetated sandy or gravelly shorelines and islands associated with the major river systems.	No sandbars, salt flats or mudflats are located within or adjacent to the study area.
Red Knot (<i>Calidris canutus rufa</i>) Threatened	Breeds on tundra; Migratory stopover habitat include mudflats on reservoirs, tidal flats, shores and beaches of reservoirs and coastal areas.	No mudflats or drawn down lakes are located within or adjacent to the study area.
American Burying Beetle (<i>Nicrophorus americanus</i>) Threatened	Utilizes undisturbed, mature oak-hickory forests with substantial litter layers and deep, loose soils, grasslands or bottomland forests. Carrion feeder.	With the exception of wetland areas and paved areas, the entire study area contains suitable grassland habitat for the ABB. Approximately 54 acres of native perennial vegetation occurs within the study area.
Geocarpon (<i>Geocarpon Minimum</i>) Threatened	Geocarpon prefers eroded areas in grasslands called "slicks" or "slickspots." Bare soil over sandstone, slicks are high in salinity and may be the remains of ancient Pleistocene lake beds.	No bare soil over sandstone with high salinity are located within the study area.

*USFWS IPaC Official Species List, November 2021.

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Table 5: State Listed Species

Species	Habitat Requirements	Habitat Present Within Ground Disturbance Study Area
Geocarpa (<i>Geocarpa Minimum</i>) State Threatened	Geocarpa prefers eroded areas in grasslands called "slicks" or "slickspots." Bare soil over sandstone, slicks are high in salinity and may be the remains of ancient Pleistocene lake beds.	No bare soil over sandstone with high salinity are located within the study area.
Opaque prairie sedge (<i>Carex opaca</i>) State Endangered	Low areas of prairies, roadside ditches, and poorly drained sites	Approximately 21.7 acres of emergent wetland habitat is located within the study area.
Maple-leaf oak (<i>Quercus acerifolia</i>) State Threatened	Maple-leaf oak is a rare species that is only known to grow in the wild in a few upland forest areas in the Ouachita mountains of west central Arkansas. It is a medium-sized deciduous tree of the Red Oak group.	No suitable habitat was observed within the study area.

Arkansas Natural Heritage Commission, July 2021.

4.5.2 Environmental Consequences

No Action Alternative

The No Action Alternative would not directly or indirectly impact fish, wildlife, or plant species within the study area.

Commission's Proposed Action

- Direct Impacts

The Commission's Proposed Action would directly affect approximately 0.13 acre of a pond that contains fish and other aquatic species common to ponds in the region. As the pond is currently turbid with no defined flow through it, minimal direct impacts from sedimentation would occur.

Direct impacts to approximately 1.8 acres of wooded areas will decrease available habitat for bat, bird, reptile, and mammal species. **Table 6** provides information on impact quantities for each federal and state listed species. Vegetation removal is consistent with the airport's Wildlife Hazard Management Plan (WHMP) in removing potential hazardous wildlife attractants on the airport in accordance with AC 150/5500-33C.

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Table 6: Impact Summary of Federal and State Listed Species

Species	Acres of Suitable Habitat Present within Ground Disturbance Study Area	Acres of Impact for Commission's Proposed Action
Northern Long-eared Bat*	3.5	1.8
Eastern Black Rail*	0	0
Piping Plover*	0	0
Red Knot*	0	0
American Burying Beetle*	53.9	34.5
Geocarpon	4.1	4.1
Opaque prairie sedge	21.7	21.7
Maple-leaf oak	0	0

*Federally listed threatened or endangered species.

The Commission's Proposed Action would have a May Affect Not Likely to Adversely Affect determination for the Eastern Black Rail, Piping Plover, and the Red Knot. An informal Section 7 consultation was completed for these species on November 16, 2021. USFWS concurred with the determination, and therefore no further consultation is required for these species (**Appendix B**). The proposed project would have a No Effect determination for the *Geocarpon minimum*. The Commission's Proposed Action would have a May Affect, Likely to Adversely Affect determination for the ABB. Approximately 34.5 acres of suitable ABB habitat would be disturbed by the Commission's Proposed Action and is shown on **Table 6**. This project complies with the final 4(d) rule with incidental take covered by the USFWS October 15, 2020, Intra-Service Programmatic Biological Opinion on the final 4(d) rule for the ABB addressing "Activities Excepted from Take Prohibitions" and complies with Section 7(a)(2) with respect to the ABB. No further consultation is required for the Commission's Proposed Action for this species. The Commission's Proposed Action would also have a Likely to Adversely Affect determination for the Northern Long-eared Bat. This project complies with the final 4(d) rule with incidental take covered by the USFWS January 5, 2016, Intra-Service Programmatic Biological Opinion on the final 4(d) rule for the NLEB addressing "Activities Excepted from Take Prohibitions" and thus, no further consultation is required for this species. Refer to **Appendix B** for USFWS coordination.

- Indirect Impacts

No indirect impacts are anticipated concerning federally or state listed threatened and endangered species. The expansion of noise levels generated as a result of the Commission's Proposed Action was considered in determining indirect effects on wildlife around the airport. Noise analysis results indicate the 65 dB day-night sound level (DNL) would expand only by approximately 17 acres surrounding the entire airport and dB levels within the expanded 65 dB DNL are only anticipated to increase one dB. The net increase in the expanded 65 dB DNL is anticipated to be 7 acres. As noted previously, much of the surrounding land contains fragmented

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wildlife habitat and thus, indirect effects of noise levels on area wildlife are anticipated to be minimal.

- Mitigation and BMPs

In compliance with the USFWS response, the use of water quality control measures to prevent sedimentation and water quality effects downstream of the Commission's Proposed Action is required. Mitigation for impacts to these aquatic resources is discussed in detail in **Section 4.15**. Best Management Practices (BMPs) will be installed prior to construction and maintained in accordance with the Airport's Industrial Stormwater Pollution Prevention Plan (SWPPP) per NPDES regulations, and in compliance with the anticipated Section 404, 401, and 402 permits. A construction SWPPP will be required prior to construction. Forested habitat clearing minimization and seasonal clearing restrictions are mitigation options that should be incorporated for habitat impacts.

4.6 Climate

Scientific research has determined that increasing concentrations of greenhouse gases (GHGs) in the atmosphere affects global climate. These GHGs include carbon dioxide, methane, nitrous oxide, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride. These emissions primarily result from anthropogenic sources including the combustion of fossil fuels. The Intergovernmental Panel on Climate Change (IPCC) estimates that aviation accounted for 4.1% of global transportation GHG emissions. The US EPA indicated that commercial aviation contributed 6.6% of total carbon dioxide emissions in 2013. It is uncertain the timing, magnitude, and location of aviation's impact to climate. However, minimizing GHG emissions and identifying potential future impacts of climate change are important to maintain a sustainable national airspace system.

4.6.1 Affected Environment

The Commission's Proposed Site would consist of a new runway. As a result, there will changes in vehicles accessing the airport, changes in aircraft, or changes in runway use or taxi times are expected to occur that would be expected to influence climate impacts from ground vehicles or aircrafts. The proposed construction and development activities are expected to include a temporary increase in GHG emissions; however, this increase will have minimal impacts to emissions of GHGs and any emissions of GHGs as a result of the proposed construction and development activities would be considered negligible compared to the annual U.S. emissions of GHG. Furthermore, the FAA has not established a significant threshold for climate. As such, emissions of GHGs would not be expected to have a significant impact on global climate change. The Proposed Action is not expected to increase issues related to flooding, erosion or temperature increase.

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4.6.2 Environmental Consequences

No Action Alternative

Since the No Action alternative does not involve construction activities, no new impacts to Climate would be expected to occur.

Commission's Proposed Action

- **Direct Impacts**
According to Exhibit 4-1 of FAA Order 1050.1F, the FAA has not established a significance threshold for Climate. Based on only a temporary influence on GHGs during construction, no significant environmental impacts are expected concerning climate.
- **Indirect Impacts**
As there are no significant direct environmental impacts expected concerning climate, indirect impacts are not anticipated.
- **Mitigation and BMPs**
No mitigation or BMPs are proposed as no direct or indirect climate impacts are anticipated.

4.7 Coastal Resources

The project is not located in or near coastal resources. Therefore, no coastal resources will be impacted by the Commission's Proposed Action or the No Action Alternative.

4.8 Department of Transportation, Section 4(f)

Section 4(f) of the Department of Transportation (USDOT) Act of 1966⁵ protects important public resources including public parks, recreation areas, wildlife, or waterfowl refuges of national, state, or local significance, and historic sites. Land and Water Conservation Funds (LWCF) can also be applied to park properties. The Secretary of Transportation may approve a transportation program or project requiring the use of land off a public park, recreation area, or wildlife or waterfowl refuge of national, state, or local significance, or land of a historic site of national, state, or local significance if there is no feasible alternative to using that land and the project includes planning to minimize harm resulting from the use.

4.8.1 Affected Environment

The Massard Road North Trail begins at Jackson Street near Phoenix Avenue north of the study area and extends south along the west side Massard Road to Zero Street. Approximately 1.4 miles of this existing multi-use trail is paved and used for both walking and biking.

⁵ Refer to 49 U.S.C. Section 303 for the US Department of Transportation Act of 1966.

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The Fort Smith Dog Park was previously located within the study area and operates under a Permissible Use Agreement from the airport to the city as a publicly accessible park, primarily utilized by dog owners. Amenities included picnic tables, enclosed areas for unleashed dogs, information stations/boards, a water station, and agility stations.

The indirect study area is considered the difference in the 65 DNL noise contour between the future No Action and future Commission's Proposed Action alternatives. Public recreational uses within the indirect study area include portions of a Massard Road North Trail.

No Action Alternative

- Direct Impacts

The No Action would not directly impact the use of the multi-use trail. As there are no additional recreational uses impacted by the noise contour expansion, no impacts to public recreational areas will occur.

Commission's Proposed Action

- Direct Impacts

There are no direct impacts associated with the Massard Road North Trail or with the Fort Smith Dog Park. The City of Fort Smith relocated the Fort Smith Dog Park under separate actions carried out by the city. The relocated dog park opened August 2021 at Chaffee Crossing. Therefore, no direct impacts to recreational features or public park will occur. Refer to **Appendix B** for correspondence received from the City of Fort Smith.

- Indirect Impacts

The 65 DNL noise level contour falling within portions of the trail system along Massard Road is projected to expand by approximately 75 linear feet total as a result of the anticipated increase in aircraft accommodated by the Commission's Proposed Action. Although the 65 DNL expansion would occur over the trail as shown in **Figure 6**, the expanded areas would not result in a ≥ 1.5 dB increase. Therefore, no public recreational facilities would be impacted by the Commission's Proposed Action. The Commission's Proposed Action does not rise to the level of constructive use⁶ of the Massard Road North Trail and will not harm the protected features, qualities, or activities that make the trail important for recreation under Section 4(f).

⁶ Constructive use include proximity impacts that substantially impairs the features or attributes of the property that qualify the property for protection as described further in 23 CFR Section 774.15.

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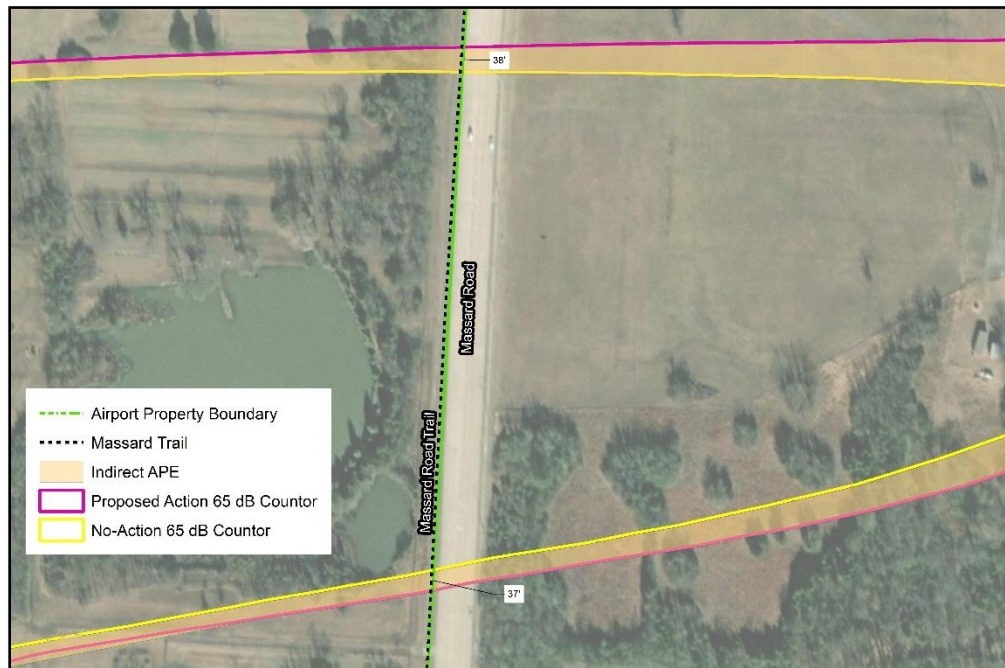


Figure 6: Section 4(f) Properties Overview

4.9 Farmlands

The Farmland Protection Policy Act (FPPA) regulates federal actions with the potential to convert farmlands to non-agricultural uses. The FPPA is intended to minimize the impact that federal programs have on the unnecessary and irreversible conversion of farmland to nonagricultural uses. It assures that, to the extent possible, federal programs are administered to be compatible with state and local units of government and with private programs and policies to protect farmland. There are three classes of farmland categorized based on soil types and are defined below:

- Prime Farmland – Farmland as designated by the USDA as having the best combination of physical and chemical characteristics for producing food, feed, forage, fiber, and oilseed crops which is currently available for use.
- Unique Farmland – Farmland other than prime farmland that has the combined conditions to produce sustained high-quality yields of specialty crops such as citrus, nuts, fruits, and vegetables when properly managed.
- Farmland of Statewide Importance – Farmland other than Prime or Unique Farmland that has a good combination of physical and chemical characteristics for the production of crops important to the agricultural economy of the state.

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The FPPA defers to local jurisdictions regarding the identification of areas to be identified as having the appropriate soil characteristics to be designated as prime, unique, or farmland of state or local importance.

4.9.1 Affected Environment

The study area contains approximately 15.7 acres of prime farmland as determined by mapping soil units according to the Natural Resources Conservation Service (NRCS) web soil survey (access December 2021). This area has been historically farmed for hay for at least one of the last five years.

No Action Alternative

The No Action Alternative will not include any changes to the airfield and therefore would not impact farmlands.

Commission's Proposed Action

- Direct Impacts
Part I and Part II of the NRCS Farmland Conversion Impact Rating Form (Form AD-1006) was completed and sent to the NRCS office in Fort Smith on December 17, 2021. The NRCS office has reviewed the Commission's Proposed Action to determine whether farmland impacts may occur. Analysis of the Commission's Proposed Action was completed January 18, 2022 when the USDA completed the Form 1006-AD indicating the project site is located within City of Fort Smith areas already committed to urban development and thus the site does not contain prime, unique, statewide, or local important farmland. **Appendix B** contains this determination from the USDA.
- Indirect Impacts
No indirect farmland effects are anticipated.

4.10 Hazardous Materials, Solid Waste, and Pollution Prevention

Federal actions require consideration of hazardous material, solid waste, and pollution prevention impacts in NEPA documentation. The Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) defines a hazardous material as any substance or material that has been determined to be capable of posing an unreasonable risk to health, safety, and property when transported in commerce. The term hazardous material includes both hazardous wastes and hazardous substances, as well as petroleum and natural gas substance and materials. The Resource Conservation and Recovery Act (RCRA) defines solid waste as any discarded material that meets specific regulatory requirements and can include items such as refuse, scrap metal, spent material, chemical-by-products, and sludge from industrial and municipal wastewater and water treatment plants. Pollution prevention describes methods used to avoid, prevent, or reduce pollutant discharges or emissions through strategies such as using fewer toxic inputs, redesigning products, altering manufacturing and maintenance processes, and conserving energy. The

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Commission's Proposed Action area was assessed for the presence of hazardous material, hazardous waste, and hazardous substances. If the Commission's Proposed Action would include generation of hazardous waste or the use of fuel storage tanks federal, state, and or local statutes and regulations may apply.

4.10.1 Affected Environment

The Arkansas Department of Environmental Quality's EnviroView tool and the Environmental Protection Agency's NEPAAssist tool was used to identify the location of any Superfund sites, hazardous waste generator facilities, or solid waste sites within or near the study area. No sites related to hazardous wastes were identified within the study area. The proposed easement acquisition parcel does not contain known hazardous materials, and none were identified during field reconnaissance.

Pollution Prevention

The airport accomplishes pollution prevention through the implementation of a site-specific industrial SWPPP and individual NPDES permit. The airport's individual NPDES permit and SWPPP have identified several potential pollution sources, some of which occur within or adjacent to the study area, such as aircraft anti-icing/deicing, aircraft fueling, aircraft lavatory services, building and grounds maintenance, cargo handling, chemical storage, construction areas, equipment cleaning/degreasing, equipment fueling, equipment storage, fuel storage, ground vehicle fueling, ground vehicle washing, pesticide/herbicide storage, runway anti-icing/deicing, and salt and sand storage and usage.

4.10.2 Environmental Consequences

No Action Alternative

Under the No Action Alternative, no impacts to hazardous materials, solid waste or hazardous waste are expected to occur. The Airport would continue to operate its facilities in compliance with the same regulations associated with transport, storage, and use of existing hazardous materials as it does today. No increase in stormwater runoff or pollution would be expected by the No Action Alternative. Deicing operations would continue to occur as they have, which have the potential to affect the streams within the study area in the event of a spill or if unrecovered fluid enters these streams.

Commission's Proposed Action

- Direct Impacts

The Commission's Proposed Action would have no direct impacts to known hazardous materials, solid waste, or hazardous waste sites. The Commission's Proposed Action would increase the amount of impervious pavement that would increase the volume of stormwater runoff that may contain sources of potential pollutants from vehicles and runway operations. No outfall modifications would occur as a result of the Commission's Proposed Action; however, on-site

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stormwater improvements will be designed so that the post-development flow is less than or equal to the pre-development flow.

Short-term and temporary impacts may occur as a result of construction activities for the Commission's Proposed Action and include the temporary increase of petroleum fuels on-site that are utilized by construction equipment.

During construction grading activities associated with the Commission's Proposed Action, the primary potential pollutant is sediment and silt entering storm water and receiving waters at the airport. This could affect biotic communities on airport property or downstream of the airport.

- Indirect Impacts

Potential indirect impacts could be associated with future increased fuel storage and other regulated substances due to increased aircraft capacity. Indirect impacts on the water quality of downstream environments are discussed in subsequent sections of this document.

- Mitigation and BMPs

Prior to initiating construction activities associated with the Commission's Proposed Action, the Airport will obtain permit coverage for construction activities. General construction best management practices (BMPs) including silt fences, check dams, herbaceous buffers, and other controls as appropriate will be incorporated into construction plans to help prevent erosion and protect water quality in compliance with local erosion and sediment control regulations. Construction BMPs for the Commission's Proposed Action will include designating specific areas for construction equipment staging, maintenance, and fueling. These areas will be designed to provide appropriate secondary containment and other control measures to avoid and/or minimize potential, inadvertent, releases of fuels, oils, and other contaminants to stormwater, soil, and groundwater within the project area. Wastes associated with construction and operations at the site will be handled in accordance with the Solid and Hazardous Waste Rules and Regulations of the state. This includes all materials that would be classified as solid and/or hazardous wastes. Any temporary fuel tanks or the temporary storage of other regulated materials will comply with federal, state, and local regulations.

If any hazardous materials are encountered on the site during excavation, they will be appropriately identified and properly disposed of in accordance with applicable regulations.

4.11 Historical, Architectural, Archeological, and Cultural Resources

The National Historic Preservation Act of 1966 requires that an initial review be made to determine if any properties are on, or eligible for inclusion in, the National Register of Historic Places (NRHP). In accordance with 40 CFR 1507.2, CEQ regulations, and Section 106 of the National Historic Preservation Act, and FAA Order 1050.1E Tribes were consulted through FAA on November 11, 2021.

Runway 8-26 Extension**4.11.1 Affected Environment**

The Project Area lies within the Arkansas Valley Plains subdivision of the Arkansas Valley ecoregion. Prior to the 19th century, uplands were dominated by a mix of forest, woodland, savanna, and prairie whereas floodplains and lower terraces were covered by bottomland deciduous forest. Today, less rugged upland areas have been cleared for pastureland or hay land. Poultry and livestock farming are important land uses. The Atoka Formation of Pennsylvania age underlies the project area. The Atoka Formation is a sequence of marine, mostly tan to gray silty sandstones and grayish-black shales. Predominant soil types include silt loam and sandy loam.

The study area contains areas higher in elevation mostly in the northern and central portions of the study area and lower in elevation mostly in the southern and eastern portions. The higher landforms contained little topsoil or bedrock present at the surface. The northern portion of the study area contained soils that were shallow and contained heavy yellowish red clay and slate deposits. These areas have been stripped at some point in the past and the topsoil removed. The lower areas in the southern and eastern portions of the study area contained a layer of alluvial soils over a dense, hydric gray clay.

A review of the Arkansas Historic Preservation Program (AHPP) geographic information system National Register and Survey Database and the Automated Management of Archeological Site Data in Arkansas (AMASDA) database managed by the Arkansas Archeological Survey was conducted to identify the location of any historic properties, as defined by 36 CFR 800.16(l)(1), within or proximal to the Project Area. No sites were identified in close proximity. Native American Tribes were consulted during the preparation of this EA. Responses from commenting Tribes are included in **Appendix B**.

4.11.2 Environmental Consequences

A Phase I Cultural Resources Survey (CRS) was conducted for the direct Area of Potential Affect (APE) where ground disturbance is proposed. The proposed soil stockpile area doesn't require ground disturbance and therefore a CRS was not required or performed. No historic or archaeological properties were identified within the direct APE. A review of the AMASDA database produced one previously recorded archeological site within a 1-mile radius of the Project Area. The site nearest the study area is located approximately 0.5 mi from its perimeter. Review of the indirect/auditory APE by SHPO regarding historic properties concurred that no historic properties affected. On August 11, 2021, the Arkansas Historic Preservation Program (AHPP) concurred with the finding of no historic properties affected pursuant to 36 CFR 800.4 (d)(1).

No Action Alternative

The No Action Alternative would not impact any historic or archaeological resources.

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Commission's Proposed Action

- Direct Impacts

The Commission's Proposed Action will have no direct impacts to historic or archaeological sites listed on or eligible for listing on the NRHP. Consultation with the State Historic Preservation Officer (SHPO) confirmed there are no historic properties affected due to direct impacts. A response letter was received from Ms. Jessica Cogburn, Section 106 Program Manager with SHPO, dated August 11, 2021 (**Appendix B**). Ms. Cogburn states that there is one previously recorded archeological site located near the APE, but it will not be affected by this undertaking. Comments from Tribal Historic Preservation Officers (THPO) and Tribal contacts indicated no concerns with the proposed project. Consultation letters and responses are located in **Appendix B**.

- Indirect Impacts

As there are no direct impacts associated with the Commission's Proposed Action, no indirect impacts are anticipated. The Commission's Proposed Action meets the criteria for a finding of No Historic Properties Affected as per 36 CFR 800.4 (d)(1). No additional cultural resources investigations are recommended for the proposed Project Area according to SHPO regarding the indirect or auditory APE.

- Mitigation and BMPs

If construction work uncovers buried archeological materials, work will be halted in the area of discovery and SHPO and the FAA will be immediately notified.

4.12 Land Use

4.12.1 Affected Environment

The direct study area is approximately 160 acres in size and is located entirely on airport-owned property with the exception of 0.53 acres located on an adjacent residential parcel which is encompassed by the adjusted RPZ. This parcel is located on the north side of Louisville Street and west of Massard Road.

The indirect or auditory study area includes approximately 16.8 acres of land located off-airport property (in addition to on-airport property) and lies over currently undeveloped fields and a residential neighborhood, Wellington Park. The undeveloped fields located between the residential neighborhood and Massard Road have been platted for development. However, specific development plans are not yet available for determining the type of land use proposed. The area has a future zoning designation of Commercial Neighborhood.

The Commission has full authority over the airport and holds the deeds to airport property. Development within the City of Fort Smith is governed by a Unified Development Ordinance (UDO), which promotes orderly growth of subdivisions, expansion of infrastructure, and public services. Within the Unified Development Code for Fort Smith, the Lot Dimensions Standard sets

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height limitations for development near the airport which can constitute a hazard or obstruction to safe air navigation landing or takeoff of aircraft near an airport is prohibited. In addition, Act 1278 passed by the Arkansas General Assembly places height restrictions on structures within 2,500 feet on either side of a runway centerline. Existing land use to the immediate north of the study area consists of industrial and single-family residential use, open vacant land to the south, and single-family residential land use to the east.

4.12.2 Environmental Consequences**No Action Alternative**

- Direct and Indirect Impacts

The No Action Alternative will result in no land use changes. Any expansion of the 65 dB DNL contour would not hinder land uses identified in those areas.

Commission's Proposed Action

- Direct Impacts

All elements of the Commission's Proposed Action are located on airport-owned property except for 0.53 acres located within an adjacent residential parcel. Easement acquisition of the 0.53 acres, as shown in **Figure 7**, will be a direct land use impact associated with the Commission's Proposed Action. Easement acquisition is required for maintaining control of the relocated RPZ. No other direct land use changes are anticipated.

- Indirect Impacts

Expansion of the 2028 future Commission's Proposed Action 65 dB DNL contour includes potential noise expansion of the 65 DNL over 15 residences located within the Wellington Park neighborhood, particularly along S. 88th Street, S. 89 Street, and Meandering Way. However, all ≥ 1.5 dB increases would remain on airport-owned property and result in no significant impacts to the residences of the neighborhood. Additionally, 56 residential housing units currently hearing 65 dB sound levels will experience a decrease in sound levels as a result of the Commission's Proposed Action. Land use changes are not anticipated as a result of the Commission's Proposed Action. No conflicts in land use planning are anticipated according to the City of Fort Smith's GIS Viewer (<https://fsm-ar.maps.arcgis.com/>).

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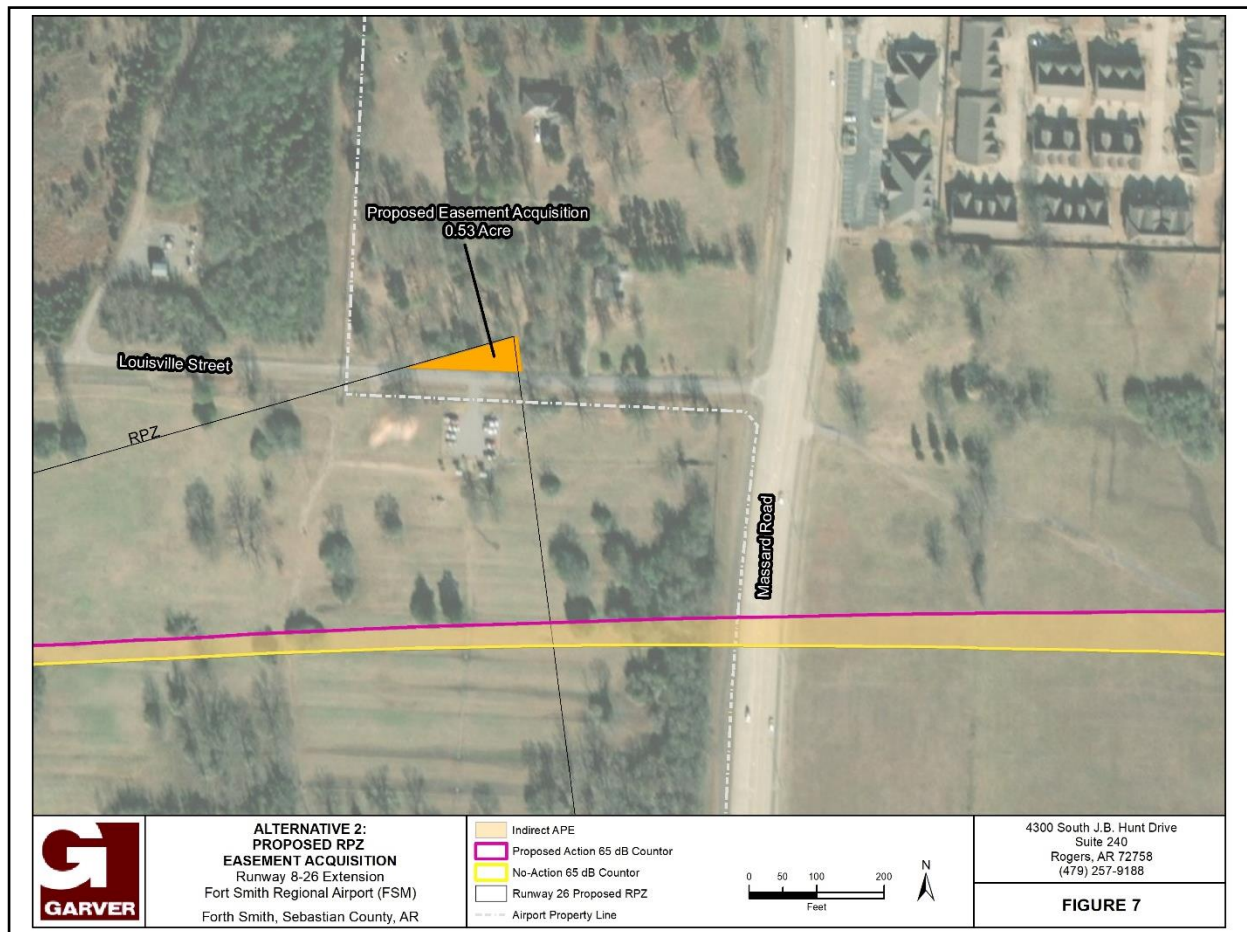


Figure 7: Proposed RPZ Easement Acquisition

4.13 Natural Resources and Energy

This section provides an evaluation of the consumption of natural resources such as fuel, water, wood, asphalt, aggregate, and other construction material supplies as well as energy supply effects.

4.13.1 Affected Environment

The airport receives electricity and natural gas from local franchise utility, and water and sewer services from the City of Fort Smith. Natural resources such as water, asphalt, and aggregate that would be utilized are located onsite and/or would be provided for the project. The study area contains NAVAIDs that are supplied with electricity from the airport. The study area contains a gentle sloping hill side that would provide excess amounts of soils.

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4.13.2 Environmental Consequences

FAA Order 1050.1F Exhibit 4-1 shows that FAA has not established a significance threshold for this impact category. However, a factor to consider is if the action would have the potential to cause demand to exceed available or future supplies of these resources.

No Action Alternative

- Direct and Indirect Impacts

The No Action Alternative would not change the future supply of natural resources or energy demands at the airport.

Commission's Proposed Action

- Direct Impacts

Potential increased energy demands as a result of providing lighting for the extended runway and taxiway are anticipated to be met by local energy suppliers. Aviation fuel and consumable materials are not considered to be scarce and increased usage of these resources would be met by current and/or future suppliers. Terminal facility capacity increases are not anticipated as a result of the Commission's Proposed Action.

- Indirect Impact

Indirect effects associated with the Commission's Proposed Action are also anticipated to be met by local energy and utility providers as the population of the region increases.

4.14 Noise and Noise-Compatible Land Use

The FAA provides federal compatible land use guidelines for several land uses as a function of DNL (day-night average sound level) values. The DNL represents a 24-hour A-weighted noise dose and includes an adjustment for nighttime noise (from 10pm to 7am) of an additional 10 decibels (dB). FAA Order 5050.4B defines a noise sensitive area as "*an area where noise interferes with the area's typical activities or its uses*". Noise sensitive areas typically include residential homes, educational institutions, health care facilities, religious structures and sites, parks, recreational areas, areas with wilderness characteristics, wildlife refuges, and cultural and historical sites. FAA orders 1050.1F and 5050.4B define a significant noise impact as one which would occur if the Commission's Proposed Action would cause noise-sensitive areas to experience an increase in noise of 1.5 dB or more at or above the 65 DNL noise contour when compared to a No Action Alternative for the same time frame.

Based on the Harris Miller Miller and Hanson, Inc. (HMMH) study completed for the Commission's Proposed Action, the forecast year of 2028 was used to analyze impacts in the future condition and assumed that operations would continue to increase based on the MPU baseline scenario levels (HMMH, 2021). The noise analysis incorporated passenger air carrier, cargo air carrier, general aviation, and military operations in the fleet mix used to complete the modeling. Noise contours were generated using the FAA-approved Aviation Environmental Design Tool (AEDT)

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and the U.S. Department of Defense (DoD)'s NOISEMAP software for determining potential noise-related impacts to the surrounding land uses. These contours were developed based on the yearly DNL sound levels for which FAA measures noise impacts. The FAA considers a ≤ 65 DNL noise level as acceptable for residential developments per 14 CFR Part 150.

A detailed noise analysis was completed in October 2021 by HMMH that included modeling existing conditions (year 2019), design year (2023) No Action Alternative and Commission's Proposed Action, and future (2028) No Action Alternative and Commission's Proposed Action to document potential land use impacts related to noise levels associated with the Commission's Proposed Action. Noise exposure maps (NEMs) developed showing the differentials between the No Action Alternative and the Commission's Proposed Action depicted three levels of contours ranging from 75 DNL to 60 DNL to document potential off-airport noise impacts to surrounding properties. The noise analysis and NEMs are located in **Appendix D**.

4.14.1 Affected Environment

Wellington Park, a residential neighborhood, located on S. 88th Street, S. 89th Street, and Meandering Way is located east of the airport and within the indirect or auditory study area. Three places of worship (Temple Baptist Church, Southside Christian Church, and Vineyard Community Church) are also located in close proximity to the indirect or auditory APE.

Massard Road North Trail, a public multi-use trail, is located within the indirect or auditory study area. The indirect study area is considered the difference in the 65 DNL noise contour between the No Action and Commission's Proposed Action alternatives as shown in **Figure 8**. The trail is owned and maintained by the City of Fort Smith.

The currently undeveloped fields between Wellington Park and Massard Road have been platted and zoned as Commercial Neighborhood; however, specific lots and development types have not been determined as of the date of this document.

4.14.2 Environmental Consequences

No Action Alternative

The No Action Alternative was determined to represent projected operation increases through modeling year 2028. Future noise conditions around the airport will change slightly in the No Action condition as a direct result of population increases and future airport use demands; however, operations would be constrained to the existing gate capacity and airfield configuration.

Commission's Proposed Action

- Direct Impacts

Results of the noise analysis can be found in **Appendix D**, which indicate that an additional 66 acres would be exposed to the 65 DNL as compared to the existing conditions, including areas located within the airport property. The shift in Runway 26 of 1,300 feet also shifts the 65 DNL

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contour further east resulting in the addition of 15 residences within the 65 DNL contour related to the Commission's Proposed Action. However, these residences will not experience increases of ≥ 1.5 dB as a result of the Commission's Proposed Action and are therefore not significantly impacted by noise. All noise increases of 1.5 dB or greater as a result of the Commission's Proposed Action are located within existing airport property.

The 15 residences newly added to the 65 DNL area due to the Commission's Proposed Action while not significantly impacted would be considered noncompatible with aircraft noise and may be eligible for future mitigation. The FAA's Part 150 program is a voluntary program designed to help airports address noncompatible land use. If the Proposed Action was implemented, the airport will update the Part 150 study and develop a mitigation program for noncompatible land uses. The airport would need to verify the number and types of housing units and their acoustical eligibility prior to implementing mitigation. In order to be eligible for sound insulation, the interior noise levels of the units must be at DNL 45 dB or above.

An estimated 75 linear-foot expansion of the 65 DNL contour over the Massard Road North Trail is anticipated but will not experience increases of ≥ 1.5 dB and are therefore not considered impacted. The Commission's Proposed Action does not rise to the level of constructive use⁷ of the Massard Road North Trail and will not harm the protected features, qualities, or activities that make the park important for recreation under Section 4(f).

- Indirect Impacts

As documented in the noise analysis, "Roadway noise from Interstate 540 or Massard Road combined with the aircraft noise documented in this report may result in noise levels higher than indicated by the DNL contours in areas close to the roadway" (HMMH, 2021). The cumulative effects of aviation-related noise generated by the Commission's Proposed Action and these surrounding highways is not anticipated to cause an incompatible land use. Additionally, Massard Road is located further away from sensitive noise receivers where overlap of the 65 DNL may occur.

- Mitigation and BMPs

The 15 residences newly added to the 65 DNL area due to the Proposed Action while not significantly impacted would be considered noncompatible with aircraft noise and may be eligible for future mitigation. The FAA's Part 150 program is a voluntary program designed to help airports address noncompatible land use. If the Proposed Action was implemented, the airport will update the Part 150 study and develop a mitigation program for noncompatible land uses which could include sound insulation. The airport would need to verify the number and types of housing units and their acoustical eligibility prior to implementing mitigation. In order to be eligible for sound insulation, the interior noise levels of the units must be at DNL 45 dB or above.

⁷ Constructive use include proximity impacts that substantially impairs the features or attributes of the property that qualify the property for protection as described further in 23 CFR Section 774.15.

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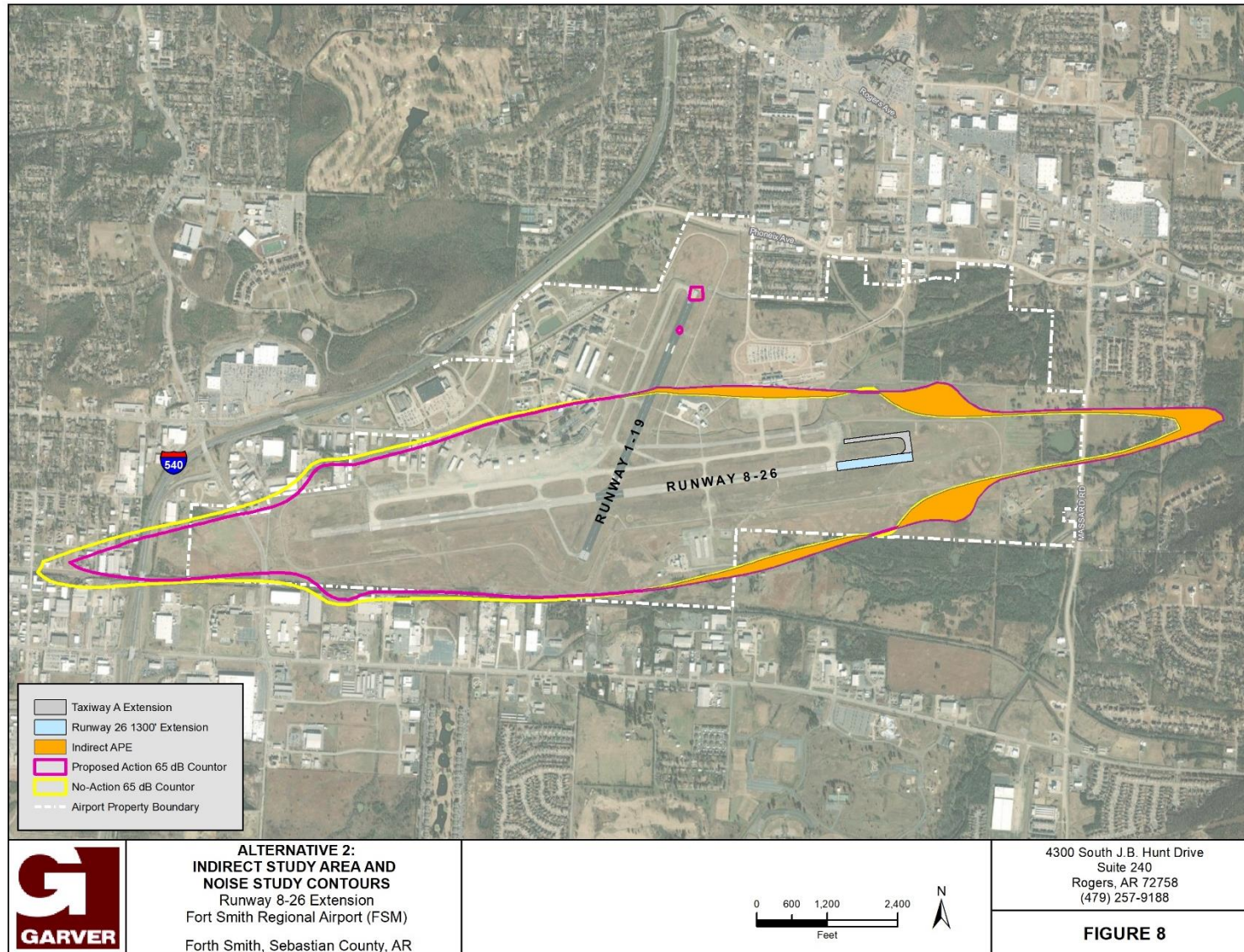


Figure 8: Indirect Study Area and Noise Study Contours

Runway 8-26 Extension**4.15 Socioeconomics, Environmental Justice, and Children's Health and Safety Risks**

FAA Order 1050.1F, describes the socioeconomic impacts associated with relocation or other community disruption, transportation, planned development, and employment. This evaluation includes effects on Environmental Justice (EJ) and children's health and safety. As directed by EO 12898, the demographic profile of the surrounding area is considered with regards to EJ concerns.

EO 13045 pertains to "Protection of Children for Environmental Health and Safety Risks", April 21, 1997. This mandate requires that federal agencies are to identify and assess environmental health and safety risks that may affect children. EO 13045 states that to the extent permitted by law and appropriate, each federal agency shall make it a high priority to identify and assess environmental health risks and safety risks that may disproportionately affect children and ensure that its policies, programs, activities, and standards address disproportionate risks to children that result from environmental health risks or safety risks.

4.15.1 Affected Environment

The study area used for the Commission's Proposed Action included areas under consideration within the study area and auditory indirect study area. Portions of one residential parcel is located within the study area as shown in **Figure 7**.

An Environmental Justice (EJ) review was performed in accordance with EO 12898. The EJ review was intended to identify and address any disproportionately high and adverse effects to low-income or minority populations within the study area. A low-income population was defined as a census block group whose median household income is at or below the 2021 Department of Health and Human Services (HHS) poverty guidelines for a family of three, which is \$21,960. A family of three was selected as a conservative estimate because the average household size of owner occupied, and renter occupied units was approximately 2.3 people in Sebastian County. A high minority population, for the purposes of this study, was defined as a population equal to or greater than 50 percent of the total population.

According to the 2019 American Community Survey 5-year estimates obtained from the U.S. Census Bureau, the off-airport indirect study area does not contain low-income (**Figure 9**) or minority populations. The median household income for the census block groups in the study area range from \$30,192 to \$54,111, all above the 2021 HHS poverty guideline. The minority population within the census block groups in the study area is approximately 37 percent of the total population. This percentage is slightly lower than for the City of Fort Smith (41 percent), but higher than Sebastian County (30 percent) and the State of Arkansas (28 percent). The percentage of the population within the study area that speaks English less than very well ranges from 2-6 percent.

An evaluation of the child population in the study area was performed in accordance with EO 13045. The evaluation was intended to analyze proposed activities for any environmental health or safety risks that may disproportionately affect children. According to the U.S. EPA's

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Environmental Justice Screening and Mapping Tool, approximately 23-34% percent of the total population in the study area is under 18 years old, which is comparable to the City of Fort Smith (34%) and Sebastian County (24%). The closest school facility is located approximately 1 mile northwest of the airport.

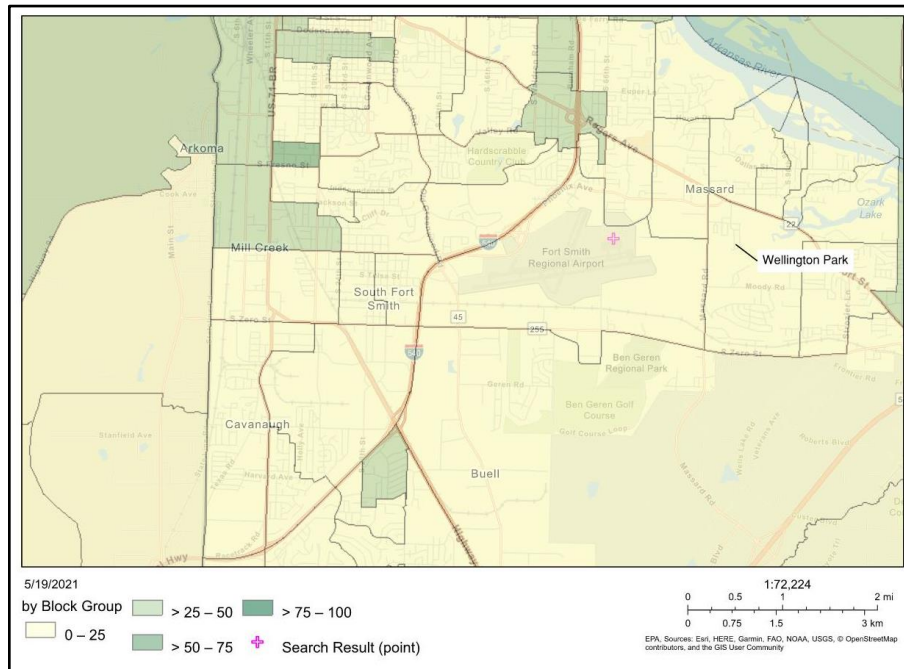


Figure 9: EJ Screen – Percent Households Below Poverty Level

4.15.2 Environmental Consequences

No Action Alternative

As a result of population growth and increasing enplanements, airport revenues would increase accordingly. However, the potential for increased revenue would be limited due to no improvements provided by the No Action Alternative. The No Action Alternative would not adversely impact EJ populations or the health and safety of children.

Commission's Proposed Action

- Direct Impacts

FSM's expansion is in alignment with future growth for the Fort Smith economy. The Commission's Proposed Action will help to accommodate the forecasted increase in enplanements and total passengers, thus reducing potential passenger and airport congestion. Traffic patterns will continue to independently experience increased volumes on area roadways as a result of population growth of the area. The Commission's Proposed Action is not anticipated to directly impact traffic patterns.

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An estimated 0.53 acres (requiring no displacements) of one residential parcel located north of Louisville Street would be required for establishing the proposed RPZ. No other direct effects on residential/business acquisition or relocations, disruptions in established communities or planned developments, or children's environmental health and safety are anticipated as a result of the Commission's Proposed Action. Based on the analysis, no disproportionately high or adverse impacts to EJ populations are anticipated as a result of the Commission's Proposed Action.

Due to the proposed project's location within the airfield of a regional airport, direct access to children is highly unlikely. Regardless, children would be restricted at or near the construction areas. All construction areas would be restricted on a short-term basis from general public access. Based on the analysis, the Commission's Proposed Action is not anticipated to create safety risks to children or to adversely impact children's health.

- Indirect Impacts

There are no business or residential relocations, or rezoning required by the Commission's Proposed Action. Potential noise-induced indirect noise impacts to 15 residences located in the Wellington Park neighborhood are anticipated; however, these parcels are located outside of the ≥ 1.5 dB noise level increase within the 65 DNL contour. Refer to **Section 4.14** for discussion on noise mitigation.

- Mitigation and BMPs

No noise mitigation measures are required for the residences falling inside the expanded 65 DNL. During construction, the Airport will require contractors to develop a traffic management plan to minimize potential impacts to FSM customers and aircraft operations. Any mitigation resulting from noise impacts is discussed in the noise section (**Section 4.14**).

4.16 Visual Effects

4.16.1 Affected Environment

The location of the Commission's Proposed Action places improvements well inside the airport's property boundary and over 0.4-mile from a potentially sensitive receptor. The properties surrounding the study area are commercial, industrial, and residential neighborhoods east of Massard Road. The airport is illuminated by lights from various sources on the airside and landside in compliance with FAA standards for security, apron flood lighting, obstruction clearance, and navigation lighting. According to FAA Order 1050.1F, Order 1050.1F Environmental Desk Reference, and Order 5050.4B, light emissions and the visual character of the Proposed Action was evaluated. There are currently no special purpose laws or requirements for visual effects.

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4.16.2 Environmental Consequences

No Action Alternative

The No Action Alternative would not change the existing visual character or have any additional light emission impacts.

Commission's Proposed Action

- **Direct Impacts**

The Commission's Proposed Action would produce additional light emissions associated with NAVIADs lighting. Although the visual landscape of the airport as viewed from the existing Runway 26 end would change, no sensitive receptors would be impacted within the viewshed of the Commission's Proposed Action and the project's visual resources will be compatible with the existing visual character of the study area.

The overall setting of the airfield would not change drastically; therefore, no impacts to aircraft operations are anticipated. Temporary and additional safety lighting during construction is anticipated and will comply with design plans as developed.

- **Indirect Impacts**

The existing light emissions are not anticipated to contribute substantially to the indirect nature of light emissions experienced surrounding the airport. The Commission's Proposed Action may increase overall light emissions from the airport as a whole; however, the Commission's Proposed Action alone would not contribute to impacts to sensitive off-airport receptors, including wildlife species due to the already illuminated nature of the surrounding area.

- **Mitigation and BMPs**

Existing and future lighting fixtures at the airport will comply with FAA standards in AC 150/5345-53 so as to not create adverse lighting conditions to aircraft and off-airport sensitive receptors. Proposed lighting and fixtures will be designed to current FAA and airport standards. As the Commission's Proposed Action is compatible with the visual character and resources within the study area, no additional mitigation is proposed.

4.17 Water Resources

4.17.1 Affected Environment

Water resources are surface waters and groundwater that are important in providing drinking water and in supporting recreation, transportation and commerce, industry, agriculture, and aquatic ecosystems. The study area was assessed for the presence of any wetlands, surface water resources, floodplains, and groundwater resources as these components function in concert as a single integrated system. Federal statutes or executive orders provide the framework to regulate potential impacts to surface water, groundwater, and wetlands. The following provides a list of statutes, regulations and executive orders established to protect these resources:

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- Executive Order 11990, Protection of Wetlands.
- EO 11988 – Floodplain management.
- Rivers and Harbors Act of 1899.
- The Clean Water Act.
- Section 401 of the Clean Water Act (CWA) requires that for any federally permitted project that may result in a discharge into water of the United States, a water quality certification be issued to ensure that the discharge complies with applicable water quality requirements.
- Section 402 forms the National Pollutant Discharge Elimination System (NPDES), which regulates pollutant discharges, including stormwater, into waters of the United States. NPDES permits set specific discharge limits for point-source pollutants and outline special conditions and requirements for projects to reduce water quality impacts. Permits require that projects be designed to protect waters of the United States. Construction projects that will disturb more than one acre of land must comply with the requirements of the NPDES.
- Section 404 regulates discharges of dredged or fill materials from construction activities into waters of the United States, including wetlands. Section 404 requires a permit before dredged or fill material may be discharged into waters of the United States.
- Fish and Wildlife Coordination Act (FWCA)

These statutes prevent/minimize the loss of wetlands, control discharges and pollution sources, establish water quality standards, protect drinking water systems, and protect aquifers and other sensitive ecological areas.

Surface Water

Two ephemeral streams were identified in the study area (**Figure 10**). The western ephemeral drain (OW-1) flows southward from the perimeter road that was likely created by the airport to divert rainwater flow. The eastern ephemeral drain (OW-2) flows to the southeast from the southern edge of the perimeter road. This drain is located between two roadways and may connect upgradient wetlands to downstream environments. However, it is likely a depressional area that holds water after precipitation.

Two ponds comprising 6.71 acres of open water habitat are also located within the study area (P-1 and P-2 as shown in **Figure 10**). These ponds appear to drain to the southeast to Massard Creek located offsite. These two ponds have berms on the downstream sides and are located adjacent to Massard Road. Fish species observed in Pond 1 included sunfish (*Lepomis* species), mosquitofish (*Gambusia affinis*), and minnow species (*Cyprinidea* species).

Wetlands

Five wetlands were identified within the study area and shown on **Figure 10**. This included predominantly palustrine emergent/herbaceous wetlands and one palustrine forested wetland. Dominant herbaceous species identified included fox sedge (*Carex vulpinoidea*), Needle-Pod rush (*Juncus scirpoides*), hairy buttercup (*Ranunculus sardous*), bottlebrush sedge (*Carex comosa*), and spike rush (*Eleocharis palustris*). Dominant woody wetland species observed

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included green ash (*Fraxinus pennsylvanica*), and slippery elm (*Ulmus rubra*). Additionally, two ponds, Pond 1, and Pond 2, were identified. Pond 1 is 3.33 acres and Pond 2 is 0.38 acres. A total of 21.0 acres of wetlands (W-2, W-3a and W-3b) and 3.71 acres of ponds (P-1 and P-2) are considered jurisdictional according to the most recent USACE guidance utilizing the pre-2015 waters of the US rule.

Floodplains

No FEMA-mapped floodplains or floodways are present with the study area. The closest floodplain is located approximately 800 feet south of the study area associated with Massard Creek.

Groundwater

The Commission's Proposed Action area is underlain by the Pennsylvania aged McAlester Formation. The McAlester Formation is predominately dark gray to grayish-black shale and contains minor amounts of medium-gray siltstone and light-to medium gray very silty fine-grained sandstone to light gray very fine-grained sandstone (Haley and Hendricks, 1968). Lake Fort Smith, located in Mountainburg within the Frog Bayou Watershed, serves as a primary water source for the City of Fort Smith. No public water supplies or sole source aquifers were identified in the study area.

4.17.2 Environmental Consequences

No Action Alternative

No impacts to wetlands, surface waters, downstream floodplains, or groundwater will occur as a result of the No Action Alternative.

Commission's Proposed Action

Surface Water

- **Direct Impacts**

Approximately 257 linear feet of two ephemeral streams identified in the study area will be impacted as a result of the Commission's Proposed Action due to cut and fill activities required to establish minimum FAA design grades associated with the taxiway extension and RSA grading. Approximately 0.13 acre of Pond 1 will be impacted as a result of fill to establish the maintenance access road and MALSR siting. As a result of the interconnectedness of the surface water features with wetlands and other downstream waters of the United States, impacts to surface water will be viewed as a cumulative impact and requires issuance of a Section 404 Individual permit according to USACE guidelines and impact thresholds.

- **Indirect Impacts**

Temporary indirect impacts could affect downstream portions of Massard Creek if sediment-laden water resulting from erosion during grading activities traveled off-site during construction. The

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Commission's Proposed Action will not alter the airport's current drainage system or change outfall locations. No other construction-related impacts to groundwater are anticipated as a result of the Commission's Proposed Action.

Wetlands

- Direct Impacts

The Commission's Proposed Action is anticipated to fill approximately 4.43 acres of emergent wetlands and 0.09 acres of forested wetlands within the direct study area as identified in **Table 6**. Potential impacts to water quality resulting from stormwater runoff during construction were also assessed. Temporary, short-term impacts to surface waters within the disturbed areas may occur from stormwater runoff during construction. These impacts, which may occur as a result of increased sedimentation and siltation resulting from land disturbance, may temporarily decrease water quality. However, these impacts are not anticipated to be significant as BMP measures and provisions and specifications of FAA Advisory Circular 150/5370-10F *Standards for Specifying Construction of Airports* will be implemented to avoid and/or minimize adverse construction activities. The appropriate Section 401 water quality certification shall be obtained in conjunction with the required Section 404 permit. No other construction-related impacts to groundwater are anticipated as a result of the Commission's Proposed Action.

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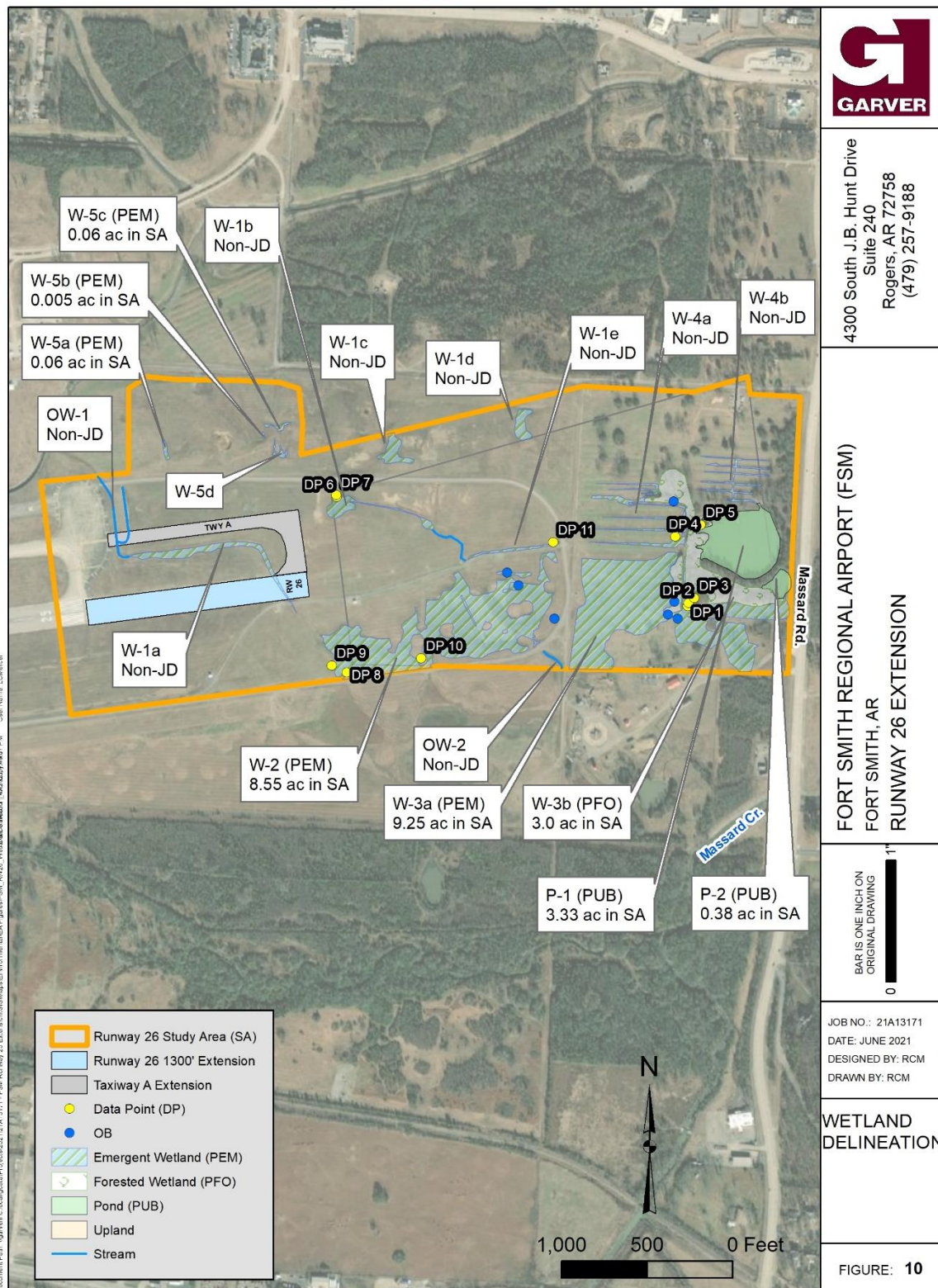


Figure 10: Wetland Delineation Overview

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Table 7: Wetland Impacts Summary

Feature No.	Cowardin Classification	Acreage within Study Area	Acreage Impacted
W-1a	PEM1C	0.77	0.77
W-1b	PEM1C	0.47	0.47
W-1c	PEM1C	0.36	0.19
W-1d	PEM1C	0.29	0
W-1e	PEM1C	0.15	0.12
W-2	PEM1C	8.55	2.33
W-3a	PEM1C	9.25	0
W-3b	PFO1C	3.45	0.09
W-4a	PEM1Ed	0.76	0.11
W-4b	PEM1Ed	0.37	0
W-5a	PEM1C	0.06	0.06
W-5b	PEM1C	0.1	0.1
W-5c	PEM1C	0.06	0.06
W-5d	PEM1C	0.06	0.06
P-1	PUBHh	3.33	0.13
P-2	PUBHh	0.38	0
TOTALS:		28.41 acres	4.49 acres

Groundwater

- Direct Impacts

The Commission's Proposed Action is not expected to directly impact any public drinking water supplies, public water supply wells, or groundwater resources.

- Indirect Impacts

Indirect impacts to groundwater are not anticipated as no direct impacts to groundwater sources have been identified. Construction of the Commission's Proposed Action would have minimal impacts on groundwater quality. Construction of the runway extension would increase the amount of impervious cover within the local watershed which would reduce the amount the infiltration of recharge to the underlying aquifer. However, because of the remaining amount of undeveloped land in the local watershed available for groundwater recharge, the Commission's Proposed Action would have negligible effect on recharge.

Decreases in surface water quality may not necessarily result in groundwater impact. Additionally, the implementation of local, state, and federal regulatory programs to protect water quality will help prevent and/or reduce potential impacts.

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- Mitigation and BMPs

Surface Waters and Wetlands

The Commission's Proposed Action will be subject to regulatory programs such as Sections 401 and 404 of the CWA which protect surface waters by requiring improvements to meet water quality standards. Additionally, as the Commission's Proposed Action cannot fully avoid alterations to waters, comprehensive mitigation to provide replacement of lost aquatic resource benefits will be required. To mitigate for wetland and stream loss, FSM proposes to purchase wetland and stream credits from a USACE-approved compensatory mitigation bank or in-lieu-fee (ILF) area, and/or complete off-site permittee responsible mitigation in order to satisfy mitigation requirements determined by the USACE during the permitting process. It is anticipated that all wetland and stream impacts can be mitigated and therefore would not be considered significantly adverse.

The appropriate Section 401 water quality certification shall be obtained in conjunction with the required Section 404 permit.

Operational BMP measures and provisions and specifications of FAA AC 150/5370-10F *Standards for Specifying Construction of Airports* will be implemented to avoid and/or minimize adverse construction activities. Additionally, as required by the CWA Section 402 NPDES permitting process, a SWPPP for the Commission's Proposed Action will be developed and implemented. General construction BMPs (including silt fences, check dams, and other controls as appropriate) will be incorporated into construction plans to help prevent erosion, protect water quality, and ultimately to minimize potential impacts to surface water resulting from storm water runoff. In addition, BMPs will require measures to prevent or minimize the potential release of contaminants into surface waters, provide swift response to accidental spills, and define acceptable on-site storage of fuel and lubricants.

Floodplains

There are no floodplains located within the Commission's Proposed Action study area. Overall, the project will be designed to minimize adverse impacts to the downstream floodplain's natural and beneficial values.

4.18 Wild and Scenic Rivers**4.18.1 Affected Environment**

There are no wild and scenic rivers present in or near the study area. The closest wild and scenic river to the project is the Mulberry River which is located several miles to the northeast in a separate Hydrologic Unit Code (HUC) 8 watershed as defined by USGS.

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4.18.2 Environmental Consequences

No Action Alternative

- Direct and Indirect Impacts

The No Action Alternative will not impact any wild and scenic rivers.

Commission's Proposed Action

- Direct and Indirect Impacts

The Commission's Proposed Action will not impact any wild and scenic rivers.

5.0 Scoping and Public Involvement

5.1 Section Overview

This section explains the steps taken to correspond with agencies and the public during the completion of this EA. A list of agencies that were contacted is included in **Section 5.2** and the public notification process is provided in **Section 5.3**. In June and August 2021, scoping letters were sent to applicable local, state, and federal agencies to assess the level of environmental consequences based on the purpose and need of the project. Comments that were received from resource agencies are included in **Appendix B**.

5.2 Agency Scoping

The intent of the agency and tribal coordination is to solicit input early in the process regarding potential environmental, cultural, and archeological resources which could be impacted by the Commission's Proposed Action. The below-listed agencies and Native American Tribes were consulted during the preparation of this EA. All agency coordination is provided in **Appendix B**.

Agencies Consulted and Dates of Consultation:

- U.S. Army Corps of Engineers (USACE) – Response received September 21, 2021
- U.S. Fish and Wildlife Service (USFWS) – Response received August 16, 2021
- Arkansas Division of Environmental Quality – Response received June 29, 2021
- Arkansas Department of Health – Response pending
- Arkansas Natural Heritage Commission (ANHC) – Response received August 11, 2021
- Arkansas Department of Parks, Heritage and Tourism – Response pending
- City of Fort Smith – Response Received August 13, 2021

Tribes Consulted (Initial Tribal Consultation occurred November 2, 2021):

- | | |
|------------------------------|-----------------|
| • Caddo Nation | • Osage Nation |
| • Cherokee Nation | • Shawnee Tribe |
| • Choctaw Nation of Oklahoma | • Quapaw Nation |
| • Muscogee (Creek) Nation | |

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5.3 Draft Environmental Assessment Public Notification and Distribution

The draft Environmental Assessment was completed in September 2021 and was prepared for public review and comment prior to advertising a notice of opportunity to request a Public Hearing. On February 6, 2022, the Airport opened the public comment period by placing advertisements on their website (flyfsm.com) and in the Southwest Times Record, a newspaper of general circulation throughout Fort Smith and Sebastian County, Arkansas. A copy of the advertisement and affidavit of publication are included in **Appendix H**. Hardcopies of the draft EA were made available for the public to review until March 11, 2022, at the Airport Terminal Building. Opportunities were provided to the public to respond to the EA via letter, email, website comment response, or by telephone.

_____ public comments were received and therefore a public hearing will not be held. Update based on agency responses here. This correspondence can be found in **Appendix H**.

6.0 Commitments

- The airport will comply with all federal, state, and local development regulations, Executive Orders and permitting requirements.
- The airport will complete and maintain a construction Stormwater Pollution Prevention Plan and associated Best Management Practices throughout the duration of disturbance activities.
- The airport will update the existing Multi-Sector General SWPPP.
- Mitigation wetland and stream credits will be determined and purchased prior to impacts to jurisdictional areas.
- The airport will complete Part 150 updates.

7.0 Mitigation

- Wetland and stream mitigation is required for unavoidable impacts to wetlands and streams. Wetland credits in the amount of 42.5 credits will be purchased by FSM to compensate for these impacts through the Section 404 permit process.
- BMPs such as silt fence, rolled fiber barriers, ditch checks, erosion control matting, and other standard practices will be implemented according to the construction SWPPP and NPDES permit.

8.0 Required Permits

- A National Pollutant Discharge Elimination System (NPDES) construction stormwater discharge permit.
- A Section 404 Individual Permit will be obtained.
- Individual Section 401 water quality certification will be obtained.

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9.0 List of Preparers

The individuals listed in the below tables assisted in the preparation of this EA. Resumes of each are provided in **Appendix I**.

Garver, LLC

Personnel	Degree	Years of Experience
Adam White	B.S. Civil Engineering	15
Ryan Mountain	B.S. Fisheries and Wildlife Management	22
Cassie Schmidt	B.S. Zoology, M.S. Biology	8
Colby Marshall	B.S. Biology	10
Bill McAbee	B.S. Wildlife Ecology/Management, M.S. Biology	23
Michele Lopez	B.S. Biology	21
David Bednar, Jr.	B.S. Geology, M.S. Earth Sciences	32

Harris Miller Miller & Hanson Inc. (HMMH)

Personnel	Degree	Years of Experience
Katherine Larson	B.A. Mathematics and Education M.S. Applied Mathematics	11
Robert Mentzer	B.S. Meteorology	31
Joseph Czech	B.S. Aerospace Engineering	33

Flat Earth Archeology

Personnel	Degree	Years of Experience
Chris Branam	A.B. D History Ph.D., M.A. Anthropology, B.A. Anthropology	22

10.0 References

Executive Order (EO) 11990, Protection of Wetlands. May 24, 1977. 42 FR 26961, 3 CFR, 1977 Comp., p. 121.

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- USGS. ESRI. 7.5 minute, 1:24,000 scale Fort Smith South, Arkansas. Topographic Quadrangle Map.