Final Environmental Assessment

Construction Of Crosswind Runway 7-25 and Ancillary Airport Improvements

Morris Municipal Airport
Morris, Illinois

April 2024

Prepared for:
Illinois Department of Transportation
Office of Intermodal Project Implementation (OIPI),
Aeronautics - Bureau of Airport Engineering

Prepared by:
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Chamlin Associates, Inc. for the City of Morris

MORRIS
ILLINOIS

ILLINOIS DEPARTMENT OF TRANSPORTATION
OFFICE OF INTERMODAL IMPLEMENTATION SYSTEM - AERONAUTICS
FINDING OF NO SIGNIFICANT IMPACT
MORRIS MUNICIPAL AIRPORT - MORRIS, ILLINOIS

PREAMBLE: This Finding has been prepared for proposed development items and associated actions at the **Morris Municipal Airport** to support existing and future airfield needs. Some of the proposed development items and associated actions have independent utility from each other. The Environmental Assessment (EA) examined the cumulative impacts of their implementation.

AUTHORITY: The State of Illinois, through its Department of Transportation, is a participating state under the FAA's State Block Grant Program. The FAA Reauthorization Act of 2018 authorized up to 20 states to participate in the program and Title 49 United States Code Section 47128 defines program requirements. As part of the signed State Block Agreement, Illinois has the authority to approve National Environmental Policy Act (NEPA) actions (EA and Categorical Exclusions). This document complies with that Act.

PROPOSED ACTION: A description of the proposed development items and associated actions. Evaluated in the attached EA, are as follows:

- Acquisition of 179.53 acres of land in fee simple title and 0.73 acres of avigation easements per the requirements of the Uniform Relocation and Real Property Assistance Act of 1970.
- Construct Runway 7-25, 3,500 feet long by 60 feet wide.
- Construct Taxiway B at 25 feet wide and 400 feet east of Runway 18-36 from Taxiway C to Runway 18 threshold.
- Construct/Relocate (includes pavement removal of existing Taxiway A3) and construct new Taxiway A3 at 25 feet wide from Taxiway B to Taxiway A.
- Construct Full-Length Parallel Taxiway "C" at 25 feet wide and 240 feet north of Runway 7-25. Install Medium Intensity Runway Lights (MIRL) on Runway 7-25.
- Install Medium Intensity Taxiway Lights (MITL) on all proposed taxiways.
- Install Precision Approach Path Indicator (PAPI) Lights to serve pilots on approach to both runway thresholds.
- Relocate the existing Lighted Windcone and Segmented Circle.
- Install a Wind Cone to serve pilots on approach to Runway 25.
- Install Runway End Identifier Lights (REIL) to serve pilots on approach to both of Runway 7-25 thresholds.
- Removal and/or trimming of trees for site clearing and obstruction removal within the FAR Part 77 Airport Imaginary Surfaces.

COMMITMENTS: The following commitments will be implemented by the City of Morris in the name of the Morris Municipal Airport as a condition of approval of the proposed development.

- As a habitat Commitment **"trees three (3) inches or greater in diameter at breast height will not be cleared from April 1st through September 30th to protect the Northern Long-Eared Bat and the Indiana Bat."**
- All contract documents concerning construction of the proposed airfield improvements shall incorporate, as appropriate, provisions of the Illinois Environmental Protection Agency (IEPA) "Standards and Specifications for Soil Erosion and Sediment Control" and FAA Advisory Circular 150/5370-10A "Standards for Specifying Construction of Airports". The guidelines will be used to avoid and/or reduce potential degradation of local air and water quality and will minimize impacts to surrounding homes and businesses.

DECISION: After careful and thorough consideration of the facts contained herein, the undersigned finds that:

- The proposed actions are consistent with existing national environmental policies and objectives as set forth in Section 101(a) of the National Environmental Policy Act of 1969 (NEPA)
- The proposed actions will not significantly affect the quality of the human environment or otherwise include any conditions requiring consultation pursuant to Section 102(2)(c) of NEPA.
- IDOT has approval authority, granted to the State through the FAA's State Block Program, to act on this NEPA action.

Having met all relevant requirements for environmental considerations and consultation, the proposed development/actions are authorized to be undertaken at such tune as other requirements have been met. These decisions are taken pursuant to 49 U.S.C. 40101 et. seq., and constitute an order of the Administrator which are subject to review by the courts of appeal of the United States in accordance with the provisions of Section 1006 of the Federal Aviation Act of 1958, as amended 49 U.S.C. 46110.

Approved: ✓

Disapproved: _____

05/24/20024

Clayton Stambaugh, Deputy Director
Illinois Department of Transportation
Office of Intermodal Implementation Office – Aeronautics

Date

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Chapter One

Purpose and Need

1.1 Introduction

The City of Morris, owner, and Sponsor of the Morris Municipal Airport (Airport or C09) is proposing to construct various airfield and landside improvement projects over the next several years, as included in the Airport's Capital Improvement Program (CIP). The City intends to implement proposed safety, capacity, and standards improvements to accommodate existing and projected aeronautical demand at the Airport. The City plans to apply for Federal financial assistance under the Airport Improvement Program, as authorized by the public law requirements of the FAA Reauthorization Act of 2018 to construct eligible portions of the proposed improvements. To receive Airport Layout Plan (ALP) approval and be eligible for Federal financial assistance, the City is required by the FAA to prepare an Environmental Assessment (EA) in conformance with the applicable sections of the FAA's Order 5050.4B, NEPA Implementing Instructions for Airport Actions and FAA Order 1050.1F, Environmental Impacts: Policies and Procedures. This EA has been prepared to provide information on the Proposed Action, evaluate reasonable and feasible alternatives, and identify, analyze, and disclose potential environmental consequences associated with the proposed development and, if required, mitigate potential environmental impacts.

1.2 Airport Ownership

The Airport is a publicly owned facility operated by the City of Morris. The City is a municipal corporation under the laws of the State of Illinois. C09 is operated as an office of the City.[1]

1.3 Airport Location

The Airport is located in Morris, Grundy County, Illinois, which is southwest of the Chicago metropolitan area. The Airport is located approximately 2.85 miles north of Interstate 80 and adjacent to Illinois Route 47. A map of the Airport within the State of Illinois and the vicinity of the Airport within the Morris area is depicted on Figure 1-1 - Location Map. C09 is situated in a rural portion of Grundy County. The Airport is within the corporate limits of the City of Morris. Figure 1-2 - Vicinity Map depicts the location of the existing Airport facilities.

1.4 Project Background

C09 is designated by the FAA as a "General Aviation Airport". The Airport serves the general aviation and corporate needs for Morris and Grundy County and is a major contributor to the local economy.[2] C09 has also been designated by the FAA as a "Local Airport."[3] A Local Airport is an airfield that "supplements local communities by providing access primarily to intrastate and some interstate markets".[4] Currently, C09 has primary Runway 18/36, that is 5,501 feet long by 75 feet wide. There is no crosswind runway. Runway 18/36 does not meet planning and design criteria for 95% wind coverage for Category A and B aircraft operators.

[1] https://morrisil.org/departments/#staff
[2] C09-Economic-Impact.pptx (live.com)
[3] Appendix B: Airport Listings of General Aviation Airports: A National Asset, May 2012 (faa.gov)
[4] General Aviation Airports: A National Asset (May 2012) (faa.gov)

Figure 1-1: Location Map

Figure 1-2: Vicinity Map

1.5 Purpose and Need

The following describes the purpose and need for the Proposed Action at C09 and identifies FAA regulations and policies for aviation safety. The purpose and need serve as the foundation for the identification of reasonable and feasible alternatives to the Proposed Action and the comparative evaluation of impacts. Except for the No Action Alternative, for an alternative to be considered viable and carried forward for detailed evaluation within the NEPA process, it must address the project purpose and need.

The **purpose** of this project is to address non-standard airfield facilities and existing insufficient wind coverage for Category A and B aircraft.

The **need** for the project is that the existing primary runway does not provide 95% wind coverage for Categories A and B aircraft.

1.6 Aviation Demand

As a part of the NEPA process, the baseline and forecast of aeronautical demand was developed for the following years of analysis that are evaluated in this EA.

- 2021: Existing Conditions (Baseline Year)
- 2026: Future Without Project ("No-Build")
- 2026: Future With Project "Build" (Proposed Action)

Construction of the Proposed Action is anticipated to be completed by 2025. The first complete year of aircraft operations is expected to be in 2026. Aeronautical demand is depicted in Table 1-1 and includes annual operations by aircraft category and fleet mix (aircraft type) and is based on the FAA approved forecasts contained in Appendix A - Forecast Working Paper - Morris Municipal Airport.

General Aviation activity levels and fleet mix projections that are specifically associated with the proposed project are assessed in this EA. Coordination with stakeholders such as corporate users, general aviation users, and the Airport helped determine the aeronautical demand levels provided to the FAA for forecast approval.

Table 1-1 - Aviation Demand Summary

Year	Aircraft Operations - No Build			Aircraft Operations - Build		
	Itinerant	Local	Total	Itinerant	Local	Total
2021 (Existing)	12,646	3,162	15,808	12,646	3,162	15,808
2022 (+1)	12,679	3,170	15,849	13,895	3,474	17,369
2023 (+2)	12,712	3,178	15,890	13,975	3,494	17,468
2024 (+3)	12,745	3,186	15,932	14,011	3,503	17,514
2025 (+4)	12,778	3,195	15,973	14,048	3,512	17,559
2026 (+5)	12,812	3,203	16,015	14,084	3,521	17,605
	CAGR 0.26%			**CAGR[1] 0.72%**		

Sources: Forecast Working Paper – Morris Municipal Airport; CMT Analysis. [1]CAGR represents a 20-year growth rate.

1.7 FAA Design Requirements

FAA Advisory Circular (AC) 150/5300-13B, Airport Design, identifies the standards that FAA has established for airfields to ensure operational safety. The Airport Reference Code (ARC) is a system developed by the FAA to relate airport design criteria to the operational and physical

characteristics of the aircraft that use an airport. The ARC has two components. The first component, depicted by a letter A through E, is the aircraft approach category and relates to certified aircraft approach speed. Based on FAA AC 150/5300-13A, aircraft are grouped into five approach speed categories:

- Category A: Approach speeds less than 91 knots
- Category B: Approach speed of 91 knots or more, but less than 121 knots
- Category C: Approach speed of 121 knots or more, but less than 141 knots
- Category D: Approach speed of 141 knots or more, but less than 166 knots
- Category E: Approach speed of 166 knots or more

Aircraft Approach Categories A and B typically include small piston engine aircraft and a limited number of smaller, commuter turboprops and business jets. Category C consists of business jets as well as commercial service regional and other commercial jet and propeller aircraft. Categories D and E include some business jet models and some high-performance smaller jets, as well as larger jet aircraft generally associated with wide-body commercial and/or military use. The second component of the ARC, depicted by a Roman numeral, is the airplane design group, which is categorized by wingspan and tail height.

The FAA defines a critical aircraft as the most demanding aircraft or a grouping of aircraft with similar characteristics with at least 500 annual operations a year.[5] The Forecast Working Paper identifies the proposed C09 crosswind critical aircraft for Runway 7/25 as the Cessna 172, which is a A-I (Small) design classification. C09 has insufficient crosswind coverage ($\geq$95%) as defined by FAA.

1.8 Requested State Actions

Actions by the State are required to obtain environmental approval and/or coordination of the proposed project. IDOT is responsible, under the FAA's State Block Grant Program, for ensuring compliance under NEPA for the Proposed Action. Outlined below is a list of actions necessary to develop the Proposed Action.

1.8.1 State Actions

Development at the Airport would require actions on the part of the following state and local agencies as identified below:

ILLINOIS DEPARTMENT OF TRANSPORTATION (IDOT) DIVISION OF AERONAUTICS

- Issue an environmental finding to allow approval of the Airport Layout Plan (ALP) for the Proposed Action under the State Block Grant Program

ILLINOIS HISTORIC PRESERVATION AGENCY - STATE HISTORIC PRESERVATION OFFICER (SHPO)

- Coordination pursuant to Section 106 of the National Historic Preservation Act of 1966 (NHPA)

ILLINOIS DEPARTMENT OF NATURAL RESOURCES (IDNR)

- Coordination regarding State-listed Threatened and/or Endangered Species protected under the Illinois Endangered Species Act.
- Coordination regarding wetlands protected under the *Illinois Interagency Wetland Act of 1989* (20 ILCS 830/).

[5] FAA Advisory Circular 150/5000-17, Critical Aircraft and Regular Use Determination

- Coordination with the Office of Water Resources for a Floodway/Floodplain Development Permit

ILLINOIS ENVIRONMENTAL PROTECTION AGENCY (IEPA)

- National Pollutant Discharge Elimination System (NPDES) Permits
- Individual Water Quality Certification under Section 401 of the *Clean Water Act*

Chapter Two
Alternatives

Federal guidelines require that all reasonable and feasible alternatives that might address the purpose and need of the project be considered. The examination of alternatives is of critical importance and serves to ensure that an alternative that might enhance or have a less detrimental effect on environmental quality has not been prematurely dismissed from consideration. This chapter provides a discussion of the alternatives that could meet the purpose and need for the Proposed Action as described in Chapter 1.

2.1 Alternatives

Reasonable and feasible alternatives to meet the purpose and need, including the No Action Alternative, have been identified and evaluated in this EA in accordance with NEPA, Council on Environmental Quality (CEQ) guidance, and FAA guidance and policies, including FAA Order 1050.1F and FAA Order 5050.4B. FAA Order 5050.4B specifically states: *"To select a preferred alternative under NEPA, the approving FAA official considers the environmental effects a proposed action and its reasonable alternatives would cause in meeting a defined purpose and need. During that process, the official also considers the safety, economic, technical, and engineering factors of those alternatives."*

2.1.1 No Action Alternative

CEQ Section 1502.14(d) indicates that *agencies shall include the evaluation of a no action alterative in any environmental analysis.* Under the No Action Alternative, C09 would maintain its existing airfield infrastructure and runway configuration, and would not address the non-standard design criteria, including the existing insufficient crosswind runway capability. This alternative would not meet the purpose and need.

2.1.2 Proposed Action Alternative

Based on CEQ and FAA guidance referenced above, detailed evaluations were limited to a range of reasonable and feasible alternatives that met the purpose and need, defined in Section 1.5. The Proposed Action includes addressing safety, economic, technical, and engineering factors and does satisfy the project Purpose and Need. See Exhibit 2-1.

- Acquisition of 179.53 acres of land in fee simple title and 0.73 acres of avigation easements the requirements of the Uniform Relocation and Real Property Assistance Act of 1970.
  - PIN # 02-15-200-005 - 136.94 acres in fee simple title.
  - PIN # 02-15-300-008 - 9.91 acres in fee simple title.
  - PIN # 02-15-200-003 - 14.35 acres in fee simple title.
  - PIN # 02-14-100-004 - 18.33 acres in fee simple title.
  - PIN # 02-14-100-002 - 0.73 acres in avigation easements.
- Construct Runway 7-25, 3,500 feet long by 60 feet wide.
- Construct Taxiway B at 25 feet wide and 400 feet east of Runway 18-36 from Taxiway C to Runway 18 threshold.
- Construct/Relocate (includes pavement removal of existing Taxiway A3) and construct new Taxiway A3 at 25 feet wide from Taxiway B to Taxiway A.
- Construct Full-Length Parallel Taxiway "C" at 25 feet wide and 240 feet north of Runway 7-25.
- Install Medium Intensity Runway Lights (MIRL) on Runway 7-25.
- Install Medium Intensity Taxiway Lights (MITL) on all proposed taxiways.

- Install Precision Approach Path Indicator (PAPI) Lights to serve pilots on approach to both runway thresholds.
- Relocate the existing Lighted Windcone and Segmented Circle.
- Install a Wind Cone to serve pilots on approach to Runway 25.
- Install Runway End Identifier Lights (REIL) to serve pilots on approach to Runway 7-25 thresholds.
- Removal and/or trimming of trees for site clearing and obstruction removal within the FAR Part 77 Airport Imaginary Surfaces.

2.2 Alternatives Eliminated from Further Consideration

The No Action Alternative and the Proposed Action Alternative are considered for further consideration. No alternatives have been eliminated from further consideration.

2.3 Alternatives Carried Forward

All alternatives have been carried forward for consideration.

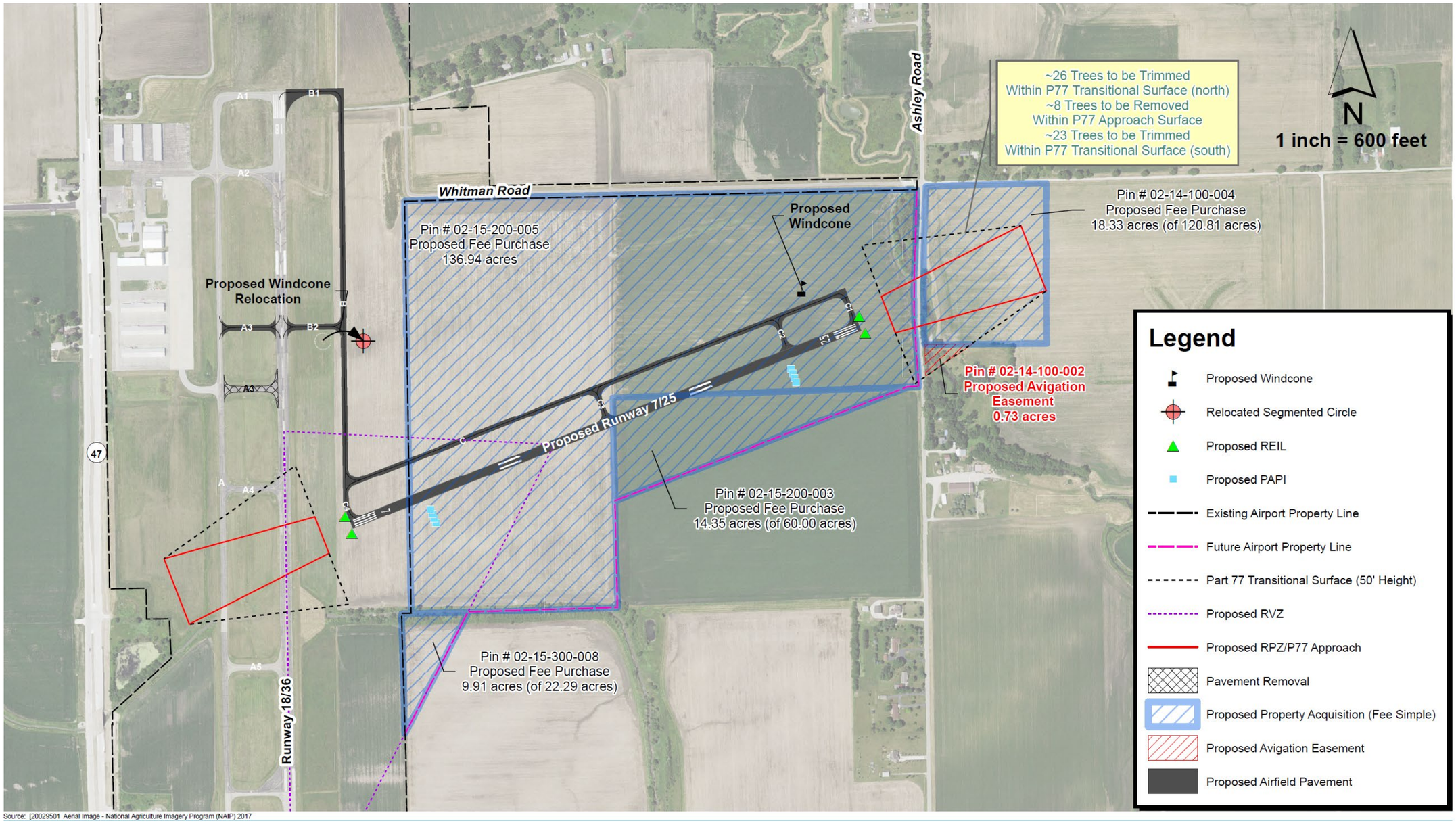
2.3.1 No Action Alternative

The No Action Alternative would not meet the project purpose and need. However, CEQ guidance and the FAA *Order 5050.4B, NEPA Implementing Instructions for Airport Acti*ons, prescribe the need to analyze and compare the No Action Alternative to the Proposed Action. Therefore, the No Action Alternative will be carried forward for further analysis.

2.3.2 Proposed Action Alternative

The Proposed Action Alternative addresses the purpose and need and will be carried forward for further analysis.

Figure 2-1: Proposed Action



Source: [20029501 Aerial Image - National Agriculture Imagery Program (NAIP) 2017

Sponsor's Proposed Action

Proposed Runway 7/25 3,500' x 60'

Chapter Three

Affected Environment and Environmental Consequences

3.1 Introduction

In accordance with FAA's environmental orders *5050.4B, NEPA Implementing Instructions for Airport Actions*, *JO 7400.2M, Procedures for Handing Airspace Matters* and *1050.1F, Environmental Impacts: Policies and Procedures*, the potential impacts of the projects associated with the No Action Alternative and Proposed Action are described in this chapter. This chapter includes a description of the existing conditions and potential impacts for the following environmental resource categories:

- Noise and Noise-Compatible Land Use
- Land Use
- Socioeconomics, Environmental Justice, and Children's Environmental Health and Safety Risks
- Air Quality
- Climate
- Water Resources
- Coastal Resources
- Farmlands
- Department of Transportation, Section 4(f) Lands
- Historical, Architectural, Archaeological, and Cultural Resources
- Biological Resources
- Natural Resources and Energy Supply
- Visual Effects
- Hazardous Materials, Solid Waste, and Pollution Prevention

3.2 Noise and Noise Compatible Land Use

3.2.1 General

Noise generated by the operation of aircraft is one of several factors included in airport operations. Specific types of human activity may be incompatible with certain levels of noise. For this reason, the influence of noise from aircraft operations on land surrounding airports requires careful study by the aviation community. A fundamental fact of noise that needs to be understood is sound. Sound is a physical phenomenon which affects people and things. The sound experienced in our everyday lives is a result of bodies or objects being vibrated.

This vibration causes a motion in the surrounding air resulting in a minute variation in atmospheric pressure called "sound pressure." This sound pressure forms the basis to measure sound and is usually expressed as a sound pressure level in decibels which are dimensionless units expressing logarithmically the ratio of two values (i.e., a measured quantity and a referenced value). A decibel (dB) is defined as ten times the logarithm (to the base 10) of a power or intensity ratio. Because of the logarithmic nature of the decibel scale, a sound pressure level of 60 dB corresponds to a pressure, not 60 times the reference pressure, but 1000 times the reference pressure.[6]

[6] Noise Control and Compatibility Planning for Airports, FAA AC 150/5020-1, August 5, 1983, Page 11.

Each aircraft noise "event" can be considered to begin when the noise level observed by the receiver increases above the background level and ends when the noise level returns to that of the background. Then for each aircraft operation, the maximum noise level occurring during the event may be measured and specified, using any of several noise rating scales. This maximum noise level is the first and simplest type of noise measure and is the "base" measure from which others may be determined.

When sound is measured in order to correlate to the reactions of people, it is necessary to use a measure which relates to the way human beings hear sound. This is accomplished electrically using a device called a "weighting network." One of these weighting networks was designated "A." A-weighted Sound Level has been found to correlate well with people's subjective judgment.

Different land uses have different sensitivities to noise. Individuals may each have different perceptions of what is an acceptable level of noise. The background or residual noise against which a specific noise is perceived varies both by location and by time of day. The location of the receiver (i.e., outdoor, indoor with windows open or closed) as well as the receiver's level of activity at a specific moment affects the perception of a noise as either interfering or non-intrusive. An accepted variation of the A-weighted Sound Level measurement tool is the day-night average sound level (DNL) as described below:

While people certainly respond to the noise of single events (particularly to the loudest single event in a series), the long-range effects of prolonged exposure to noise appear to best correlate with cumulative metrics. Such a unit provides a single number which is equivalent to the total noise exposure over a specified time period. Thus, cumulative noise units are based on both time and level. The Day-Night average sound level (DNL) specified as the noise metric for cumulative exposure under Federal Aviation Regulations (FAR) Part 150 is such a unit. Specifically, the DNL is the yearly average of the A-weighted sound level integrated over a 24-hour period. It also incorporates a 10-dB step function weighting to aircraft events between 10:00 p.m. and 7:00 a.m. to account for the increased annoyance of noise during the night hours.

Description and measurement of noise, which occurs at any given time (single event) may be read from a meter. As noted, the long-range effects of prolonged exposure to noise appear to best correlate with cumulative metrics. This type of measure provides a single number, which is equivalent to the total noise exposure over a specified time period. For aircraft noise, the FAA requires that the average annual DNL be found to determine noise compatibility planning.

METHODOLOGY

The analysis of noise exposure around C09 was prepared using the FAA's Aviation Environmental Design Tool (AEDT) Version 3d. Inputs to the AEDT include runway definition, number of aircraft operations during the time period evaluated, the types of aircraft flown, the time of day when they are flown, how frequently each runway is used for arriving and departing aircraft, and the routes of flight used when arriving to and departing from the runways. The AEDT calculates noise exposure for the area around an airport and outputs contours of noise exposure using the Day-Night Average Sound Level (DNL) metric. Noise exposure contours for the levels of 65, 70, and 75 DNL were calculated and represent average-annual day conditions.

NOISE ANALYSIS INPUT ASSUMPTIONS

The AEDT input assumptions are based on the existing and forecast aircraft operations and fleet mix as presented in Chapter 1.

RUNWAY END UTILIZATION

Average-annual day, runway end utilization was derived from review of the available data and in close coordination with the C09 management. This data provided the average annual daily runway use for each aircraft type during day and night periods at C09. **Table 3-1** lists the average daily operations by aircraft for the existing conditions. **Table 3-2** summarizes the percentage of

use by each aircraft category (departure or arrival), by runway end percentages and by time of day (day or night).

Table 3-1 – Average Daily Operations by Aircraft Type - Existing (2021) Condition

Aircraft Category	Aircraft Type	Arrivals		Departures		Total Operations
		Daytime	Nighttime	Daytime	Nighttime	
Jet	Cessna Citation CJ3	0.084	0.009	0.084	0.009	0.187
	Cessna Citation CJ4	0.042	0.005	0.042	0.005	0.094
	Cessna Citation Excel	0.013	0.001	0.013	0.001	0.029
	Cessna Citation Mustang	0.013	0.001	0.013	0.001	0.029
	Eclipse 500	0.013	0.001	0.013	0.001	0.029
Turboprop	Ayres Corporation S2R-G6	0.949	0.105	0.949	0.105	2.109
	Socata TBM9	0.015	0.002	0.015	0.002	0.033
	Beechcraft Super King Air 200	0.010	0.001	0.010	0.001	0.022
	Beechcraft Super King Air 350	0.005	0.001	0.005	0.001	0.011
	Cessna 414 Chancellor	0.005	0.001	0.005	0.001	0.011
Piston	Cessna 172 Skyhawk	7.762	0.862	7.762	0.862	17.249
	Van's Aircraft RV-8	0.267	0.030	0.267	0.030	0.594
	Bellanca 8KCAB	0.191	0.021	0.191	0.021	0.424
	Piper PA-28-180 Cherokee	0.191	0.021	0.191	0.021	0.424
	Aviat Aircraft Pitts S-2B	0.153	0.017	0.153	0.017	0.339
Rotor	Robinson Helicopter R44 II	0.032	0.004	0.032	0.004	0.072
Total Operations		9.745	1.082	9.745	1.082	21.654

Notes: Daytime Hours = 07:00AM to 09:59PM. Nighttime Hours = 10:00PM to 06:59AM.; Data Sources: TFMSC, OPSNET, CMT 2021. Due to rounding, total operations by aircraft type may not tally exactly.

Table 3-2 - Runway End Utilization - Existing (2021) Condition

Operation Category	Aircraft Category	Runway End Percent Usage	
		Runway 18	Runway 36
Daytime Arrivals	Jets	75.0%	25.0%
	Turboprops	75.0%	25.0%
	Props	75.0%	25.0%
Nighttime Arrivals	Jets	75.0%	25.0%
	Turboprops	75.0%	25.0%
	Props	75.0%	25.0%
Daytime Departures	Jets	75.0%	25.0%
	Turboprops	75.0%	25.0%
	Props	75.0%	25.0%
Nighttime Departures	Jets	75.0%	25.0%
	Turboprops	75.0%	25.0%
	Props	75.0%	25.0%

Notes: Daytime Hours = 07:00AM to 09:59PM. Nighttime Hours = 10:00PM to 06:59AM. Source: CMT 2022.

Additional noise model input assumptions, including runway definitions, aircraft operations, fleet mix, percentage of nighttime operations by aircraft type, aircraft trip lengths and operation profiles and flight tracks for the Existing (2021) Noise Contour, Future (2026) No Action Noise Contour and Future (2026) Proposed Action Noise Contour is presented in Appendix B, Morris Municipal Airport - AEDT Noise Report. The following sections present the results of the noise analysis and noise compatible land uses.

3.2.2 Affected Environment

EXISTING (2021) NOISE EXPOSURE CONTOUR

Figure 3-1 reflects the average-annual noise exposure contour at C09 during the Existing (2021) condition. Noise contours are presented for the 65, 70, and 75 DNL. DNL contours are a graphic representation of how the noise from C09's annual average daily aircraft operations are distributed over the surrounding area. DNL represents an average sound level over the course of an average annual day.

Table 3-3 summarizes the land areas within each noise contour level for the Existing (2020) Condition. The noise contour extends from the Airport along each extended runway centerline, reflecting the flight tracks used by all aircraft. The relative distance of a contour from the Airport along each route is a function of the frequency of use of each runway end for total aircraft arrivals and departures, the type of aircraft assigned to it, and the time of day of the flight.

Table 3-3- Existing (2021) Noise Exposure Contours Land Area

Contour Range	Total Land Area (acres)
DNL 65-70 dB	33
DNL 70-75 dB	12
DNL > 75 dB	4
Total	**49**

Source: CMT 2022.

All noise contours depicted in the figure are located on airport property.

NOISE COMPATIBLE LAND USE

The FAA has created guidelines regarding the compatibility of land use with various aircraft noise levels measured using the DNL metric. These guidelines are defined in 14 CFR Part 150. The land use compatibility table is contained in **Table 3-4**. These guidelines show the compatibility parameters for residential, public (schools, churches, nursing homes, hospitals, and libraries), commercial, institutional, and recreational land uses. All land uses exposed to noise levels below the DNL 65 dB noise contour are generally considered compatible with airport operations.

Figure 3-1 – Existing (2021) Noise Exposure Contours

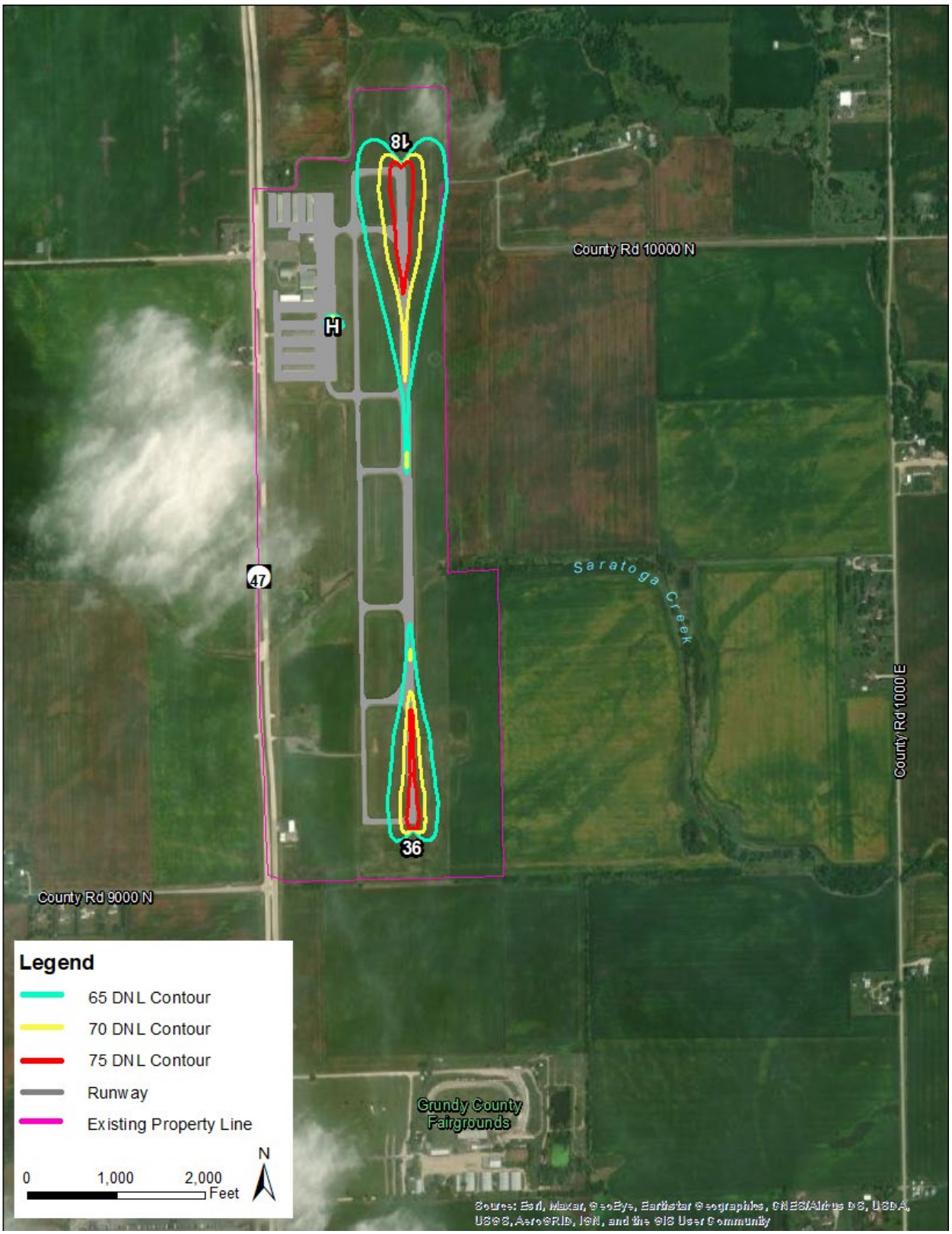


Table 3-4 - Land Uses Normally Compatible with Various Noise Levels						
Land Use	Yearly Day Night Average Sound Level (DNL) in Decibels					
	Below 65	65-70	70-75	75-80	80-85	Over 85
Residential						
Residential, other than mobile homes and transient lodgings	Y	N(1)	N(1)	N	N	N
Mobile home parks	Y	N	N	N	N	N
Transient lodgings	Y	N(1)	N(1)	N(1)	N	N
Public Use						
Schools	Y	N(1)	N(1)	N	N	N
Hospitals and nursing homes	Y	25	30	N	N	N
Churches, auditoriums, and concert halls	Y	25	30	N	N	N
Governmental services	Y	Y	25	30	N	N
Transportation	Y	Y	Y(2)	Y(3)	Y(4)	Y(4)
Parking	Y	Y	Y(2)	Y(3)	Y(4)	N
Commercial Use						
Offices, business and professional	Y	Y	25	30	N	N
Wholesale and retail—building materials, hardware, and farm equipment	Y	Y	Y(2)	Y(3)	Y(4)	N
Retail trade—general	Y	Y	25	30	N	N
Utilities	Y	Y	Y(2)	Y(3)	Y(4)	N
Communication	Y	Y	25	30	N	N
Manufacturing and Production						
Manufacturing, general	Y	Y	Y(2)	Y(3)	Y(4)	N
Photographic and optical	Y	Y	25	30	N	N
Agriculture (except livestock) and forestry	Y	Y(6)	Y(7)	Y(8)	Y(8)	Y(8)
Livestock farming and breeding	Y	Y(6)	Y(7)	N	N	N
Mining and fishing, resource production and extraction	Y	Y	Y	Y	Y	Y
Recreational						
Outdoor sports arenas and spectator sports	Y	Y(5)	Y(5)	N	N	N
Outdoor music shells, amphitheatres	Y	N	N	N	N	N
Nature exhibits and zoos	Y	Y	N	N	N	N
Amusements, parks, resorts, and camps	Y	Y	Y	N	N	N

Table 3-4 - Land Uses Normally Compatible with Various Noise Levels						
Land Use	Yearly Day Night Average Sound Level (DNL) in Decibels					
	Below 65	65-70	70-75	75-80	80-85	Over 85
Golf courses, riding stables and water recreation	Y	Y	25	30	N	N

(1) Where the community determines that residential or school uses must be allowed, measures to achieve outdoor to indoor Noise Level Reduction (NLR) of at least 25 dB and 30 dB should be incorporated into building codes and be considered in individual approvals. Normal residential construction can be expected to provide a NLR of 20 dB, thus, the reduction requirements are often stated as 5, 10 or 15 dB over standard construction and normally assume mechanical ventilation and closed windows year-round. However, the use of NLR criteria will not eliminate outdoor noise problems.
(2) Measures to achieve NLR 25 dB must be incorporated into the design and construction of portions of these buildings where the public is received, office areas, noise sensitive areas or where the normal noise level is low.
(3) Measures to achieve NLR of 30 dB must be incorporated into the design and construction of portions of these buildings where the public is received, office areas, noise sensitive areas or where the normal noise level is low.
(4) Measures to achieve NLR 35 dB must be incorporated into the design and construction of portions of these buildings where the public is received, office areas, noise sensitive areas or where the normal level is low.
(5) Land use compatible provided special sound reinforcement systems are installed.
(6) Residential buildings require an NLR of 25.
(7) Residential buildings require an NLR of 30.
(8) Residential buildings not permitted.

Notes:1. The designations contained in this table do not constitute a Federal determination that any use of land covered by the program is acceptable under Federal, State, or local law. The responsibility for determining the acceptable and permissible land uses and the relationship between specific properties and specific noise contours rests with the local authorities. FAA determinations under Part 150 are not intended to substitute Federally determined land uses for those determined to be appropriate by local authorities in response to locally determined needs and values in achieving noise compatible land uses.
2. SLUCM=Standard Land Use Coding Manual.
3. Y (Yes)=Land Use and related structures compatible without restrictions.
4. N (No)=Land Use and related structures are not compatible and should be prohibited.
5. NLR=Noise Level Reduction (outdoor to indoor) to be achieved through incorporation of noise attenuation into the design and construction of the structure.
6. 25, 30, or 35=Land use and related structures generally compatible; measures to achieve NLR of 25, 30, or 35 dB must be incorporated into design and construction of structure.
Source: 14 CFR Part 150, Airport Noise Compatibility Planning. December 18, 1984. Appendix A, Table 1.

There are no residences, public schools, churches, nursing homes, hospitals, or libraries within any of the existing condition contours.

3.2.3 Environmental Consequences

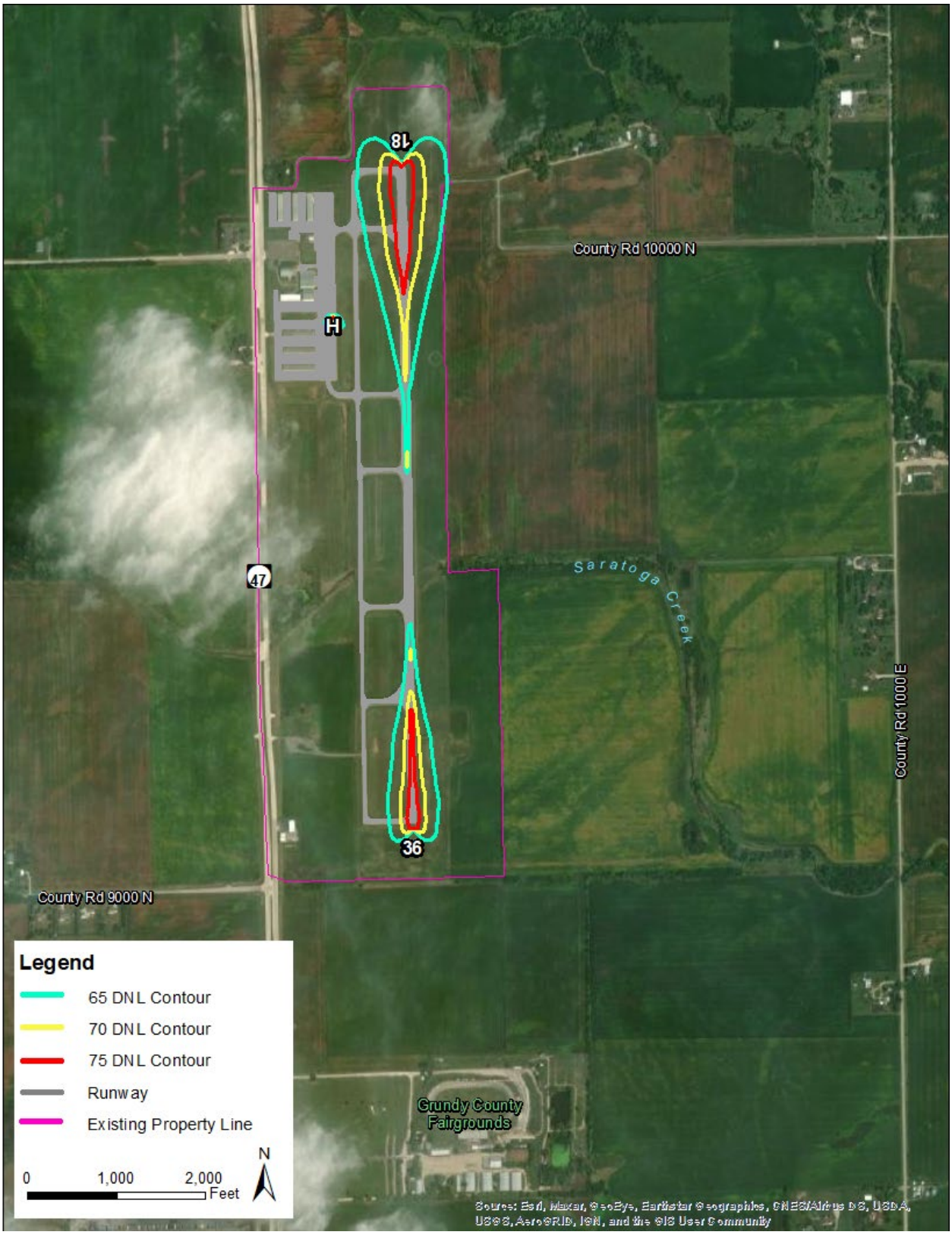
NO ACTION ALTERNATIVE

No changes to the runway configuration would occur under the No Action alternative, therefore, the runway layout discussed for the Existing Condition was also used to model the Future (2026) No Action Noise Exposure Contour. **Figure 3-2** reflects the average-annual noise exposure pattern at C09 during the Future (2026) No Action condition. Noise contours are presented for the 65, 70 and 75 DNL. **Table 3-5** summarizes the land areas within each noise contour level for the Future (2026) No Action.

Table 3-5 - Future (2026) No Action Noise Exposure Contours Land Area	
Contour Range	**Total Land Area (acres)**
DNL 65-70 dB	34
DNL 70-75 dB	12
DNL > 75 dB	4
Total	**50**

Source: CMT

Figure 3-2: Future (2026) No Action Noise Exposure Contours



NOISE COMPATIBLE LAND USE – NO ACTION ALTERNATIVE

As in the case for the existing noise conditions, there are no residences, public schools, churches, nursing homes, hospitals, or libraries within any of the contours for the Future No Action condition.

PROPOSED ACTION

FAA requires that a comparison of the Future Airport Conditions with the Proposed Action versus the Future Airport Conditions with No Action Alternative be conducted. To determine if the Proposed Action has a significant impact, FAA Order 1050.1F states that: "*The action would increase noise by DNL 1.5 dB or more for a noise sensitive area that is exposed to noise at or above the DNL 65 dB noise exposure level, or that will be exposed at or above the DNL 65 dB level due to a DNL 1.5 dB or greater increase, when compared to the no action alternative for the same timeframe.*"

The Future (2026) Proposed Action Noise Exposure Contour, showing 65, 70, and 75 DNL levels, is presented on **Figure 3-3**. The 65+ DNL of the Future (2027) Proposed Action Noise Exposure Contour encompasses approximately 56 acres.

The Future (2026) Proposed Action Noise Exposure Contour retains a similar shape as the Future (2026) No Action Noise Exposure Contour but is larger due to the increase in aircraft operations that would occur as a result of the implementation of the Proposed Action. The primary difference in the shape of the Future (2026) Proposed Action noise contour compared to the Future (2026) No Action noise contour is due to the crosswind runway being constructed to the east. **Table 3-6** summarizes the land areas within each noise contour level for the Future (2026) Proposed Action.

Table 3-6 – Estimated Land Area
Future (2026) Proposed Action Noise Exposure Contours

Contour Range	Total Land Area (acres)
DNL 65-70 dB	38
DNL 70-75 dB	13
DNL > 75 dB	5
Total	**56**

Source: CMT 2022.

NOISE COMPATIBLE LAND USE - PROPOSED ACTION

There are no residences, public schools, churches, nursing homes, hospitals, or libraries within the 65+ DNL of the Future (2026) Proposed Action noise contours.

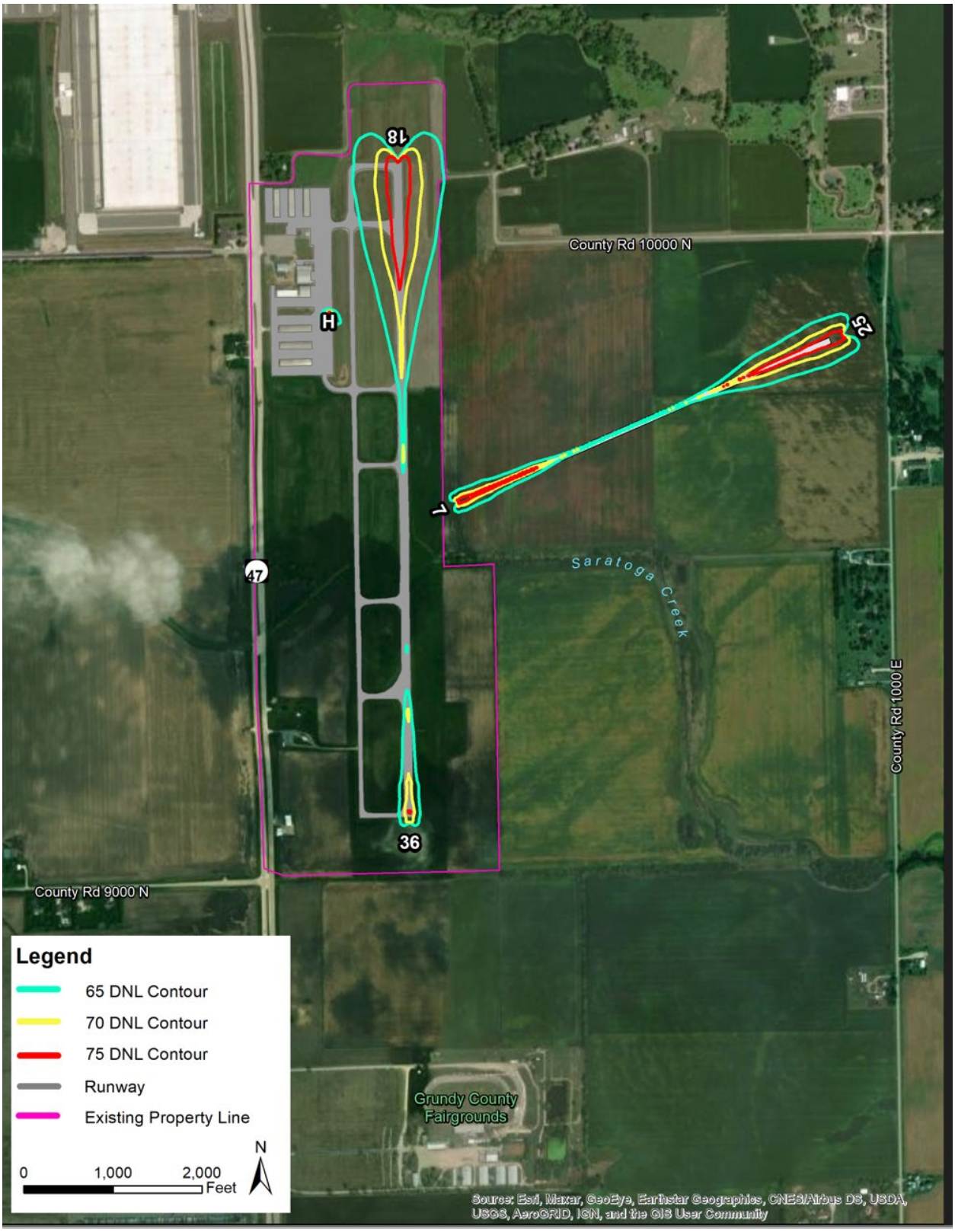
COMPARISON TO FEDERAL THRESHOLD OF SIGNIFICANCE

An aircraft noise impact would be considered significant if noncompatible land uses are newly exposed to DNL 65+ dB as a result of a Proposed Action Alternative or an increase of DNL 1.5 dB or more over a noncompatible land use within the DNL 65 dB contour is predicted when comparing the future (2026) No Action Alternative to the Proposed Action Alternative. For this analysis, there are no land uses that are incompatible with aircraft noise within the DNL 65+ dB contour with either the Future (2026) No Action Alternative or the Proposed Action Alternative. Therefore, no significant impacts are forecast to occur due to implementation of the Proposed Action Alternative.

3.2.4 Mitigation

Because no noise sensitive land uses would experience a DNL 1.5 dB increase at or above DNL 65 dB in 2026 as a result of the Proposed Action Alternative, no mitigation is required for the aircraft noise that is predicted to occur with the improvement to C09.

Figure 3-3: Future (2026) Proposed Action Noise Exposure Contours



3.3 Land Use

3.3.1 General

The previous section, Noise and Noise Compatible Land Use, focused specifically on potential land use impacts associated with aircraft noise. According to the FAA, thresholds of significance are primarily related to noise impacts and the 65 DNL noise contour. If noise sensitive land use within the 65 DNL contour is subject to a 1.5 DNL or greater increase in noise level, the impact is considered significant. Although the compatibility of existing and planned land uses within a proposed project area are normally associated with noise impacts, impacts of a Federal action may also affect land use compatibility in other ways like fee-simple acquisition/relocation, induced socioeconomic impacts, or impacts to land uses protected under Section 4(f).

Land use compatibility for airports also addresses issues related to navigational safety (e.g., encroaching structures and terrain), congregations of people, and wildlife attractants. It should be noted that Grundy County and the City of Morris do not have zoning restrictions to regulate and help protect off-airport land uses, or an airport overlay zone for C09. However, IDOT Aeronautics has enacted Airport Hazard Zoning Regulations that parity FAA's FAR Part 77 Surfaces.

Land use compatibility is also evaluated in terms of uses that may adversely affect safe airport operations, including potential wildlife attractants that may be in proximity to the airport's air operating areas. Advisory Circular (AC) 150/5200-33B, Hazardous Wildlife Attractants on or Near Airports, provides separation guidance for potential wildlife attractants. According to AC 150/5200-33B, waste disposal operations, water management facilities, wetlands, agricultural activities, and dredge spoil containment areas are considered incompatible if located near airports through the application of the following criteria:

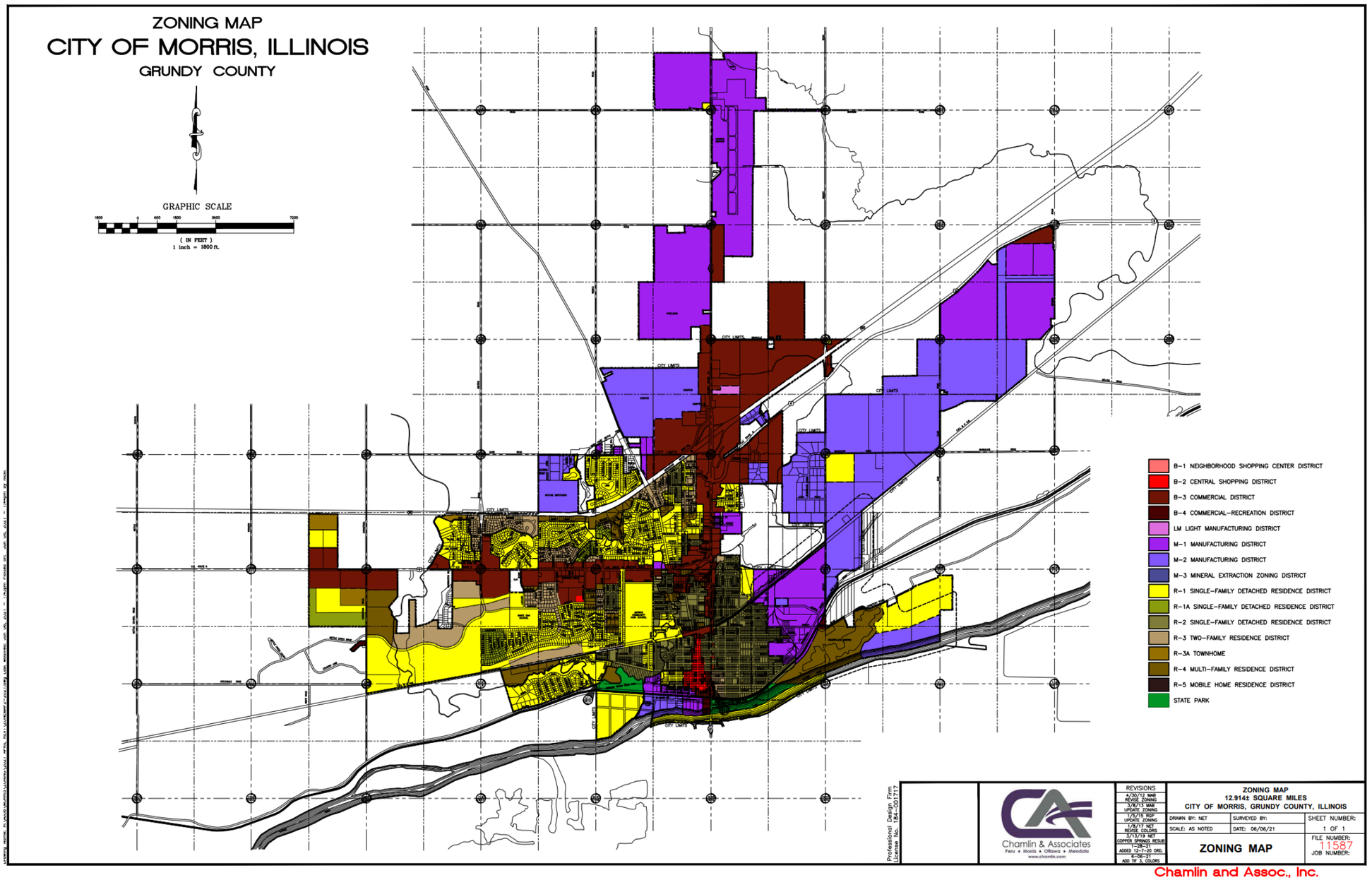
- within 10,000 feet of any Airport Operating Area (AOA) used or planned to be used by turbine-powered aircraft
- within 5,000 feet of any AOA used only by piston-powered aircraft
- within five miles of the farthest edge of the Airport's AOA that could cause hazardous wildlife movement into or across the approach or departure airspace

3.3.2 Affected Environment

C09 is a publicly owned airport, operated by the City of Morris and the existing airfield is located within the corporate limits of the City of Morris. The City of Morris's Zoning Map, depicted in Figure 3-4, shows C09 as zoned as M-1 - Manufacturing District. Residential areas located to the southeast of C09 are zoned as R2 - Single-family Residence (Minimum lot size 7,200 sf). There is one area zoned R5 - Limited General Residence (Minimum lot size 6,000) to the east of the airport and two separate areas zoned B2 - Community Shopping (Commercial).

The Republic Services Environtech Landfill, which is located approximately 3.5 miles southeast of C09 is closed. The next nearest landfill is located near Pontiac, IL approximately 35 miles southwest of Morris and outside the five-mile FAA threshold for consideration of aircraft bird interaction and outside the 10,000-foot incompatibility threshold.

Figure 3-4: City of Morris Zoning Map



Source: https://morrisil.org/wp-content/uploads/2021/11/zoning-map.pdf

3.3.3 Environmental Consequences

NO ACTION ALTERNATIVE

As part of the No Action Alternative, Runway 7/25 would not be constructed, and Runway 18/36 would remain in its current configuration. Lack of crosswind components would remain.

PROPOSED ACTION

Runway improvements associated with the Proposed Action would create a 65 DNL contour on at the Airport along the centerline of the proposed runway. To avoid land use incompatibilities, the Proposed Action would result in the acquisition of approximately 179.53 acres of land to protect the replacement runway's safety and object free areas and provide compatible land use within the RPZs. The acquisition would include 0 residences/businesses and it would also include approximately 0.73 acres of avigation easement.

As a result of these acquisitions, no incompatible land uses would fall within this new area affected by aircraft noise levels more than 65 DNL or greater. In addition, the relocated and extended RPZs would all be controlled by the airport as part of the Proposed Action. Further, aircraft noise from the proposed improvements, which would solely on airport property, would not significantly impact any parks, schools, churches, or other noise sensitive areas around the Airport.

Stormwater design would incorporate management techniques and wildlife hazard deterrents into design features to the extent practicable. The USDA, Wildlife Services recommends that any temporary or permanent open-water retention area be avoided, and that new water drainage should be below ground to avoid attracting any wildlife. If not underground, the drainage system should be designed to minimize any standing water and remove runoff. Any stormwater feature would be designed to drain within 48 hours of an event, in accordance with FAA AC 150/5200-33B.

3.3.4 Mitigation

Neither the Proposed Action nor the No Action Alternative would create any significant land use impacts associated with noise. Impacts and mitigation associated with the proposed property acquisition are discussed in Section 3.4. Storm water detention facilities should be designed, engineered, constructed, and maintained to minimize potential hazardous wildlife attractants. Any seeding required within the project would use the Illinois Standard Specifications for Construction of Airport, Division V, Item 901 – Seeding.[7]

3.4 Socioeconomic, Environmental Justice, and Children's Environmental Health and Safety Risks

3.4.1 General

The character of a community is largely determined by the people that live or work there. Associated factors that contribute to the characteristics of a community are business and labor markets, transportation systems, and utilities. The geography, geology, and climate of an area are also contributing factors. Any proposed action that affects individuals within a community is a social impact. The primary guidance document for this section is the "***Technical Guidance for Assessing Environmental Justice in Regulatory Analysis***".[8] by USEPA.

[7] https://idot.illinois.gov/assets/uploads/files/doing-business/manuals-guides-&-handbooks/aero/new%20spec%20book%20(effective%204-1-2012).pdf
[8] https://www.epa.gov/environmentaljustice/technical-guidance-assessing-environmental-justice-regulatory-analysis

This section evaluates potential socio-economic impacts that would result from the construction of the proposed projects. Additionally, this section presents the analysis of environmental justice and the potential impacts on children's environmental health and safety risks.

SOCIOECONOMICS

This section of the document evaluates the proposed project's effects on the social and economic characteristics of affected communities, specifically evaluating shifts in population, public service demands, roadway capacity, businesses, and economics. FAA *Order 1050.1F indicates that the principal social impacts to be considered are those associated with relocation or other community disruption, transportation, planned development, and employment*."[9] As noted in FAA Order 1050.1F, if acquisition of property or displacement of persons is involved, then 49 CFR Part 24, the Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970[10] (Uniform Act), must be implemented. In addition, FAA provides guidance in FAA Advisory Circular 150/5100-17[11] and FAA Order 5100.37B[12] for projects that require or involve land acquisition and relocation.

Factors to consider that may be applicable to socioeconomic resources, include, but are not limited to, the following:

- Inducing substantial economic growth in an area, either directly or indirectly (e.g., through establishing projects in an undeveloped area).
- Disrupting or dividing the physical arrangement of an established community.
- Causing extensive relocation when sufficient replacement housing is unavailable.
- Causing extensive relocation of community businesses that would cause severe economic hardship for affected communities.
- Disrupting local traffic patterns and substantially reducing the levels of service of roads serving an airport and its surrounding communities.
- Producing a substantial change in the community tax base.

ENVIRONMENTAL JUSTICE

Executive Order (EO) 12898, issued in 1994, requires each Federal agency to include environmental justice as part of its mission by identifying and addressing, as appropriate, disproportionately high, and adverse impacts of its programs, policies, and activities on minority and/or low-income populations. DOT Order 5610.2, Environmental Justice in Minority Populations and Low-Income Populations establishes how DOT, and its operating administrations would integrate EO 12898 with existing regulations and guidance. It states that it is the policy of DOT to promote the principles of environmental justice through the incorporation of those principles into existing agency programs, policies, and activities. The Order goes on to state it is DOT's policy to promote the principles of environmental justice by considering them during or as a part of the planning and decision-making processes in the development of programs, policies, and activities, using the principles of NEPA, Title VI, the Uniform Act, and other applicable DOT statutes, regulations, and guidance. This Order provides guidance related to environmental justice impacts as follows: A *"disproportionately high and adverse effect on minority and low-income populations" is defined as an adverse effect that: "(1) is predominantly borne by a minority population and/or low-income population; or (2) will be suffered by the minority population and/or low-income population and is appreciably more severe or greater in magnitude than the adverse effect that*

[9] FAA, Order 1050.1F, Desk Reference, July 2015, pg. 12-4
[10] Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970 (42 USC 4601et seq.) (PL 91-528 amended by the Surface Transportation and Uniform Relocation Act Amendments of 1987, PL 100-117).
[11] Federal Aviation Administration (FAA) Land Acquisition and Relocation Assistance for Airport Improvement Program Assisted Projects, Advisory Circular 5100-17, Change 7, July 10, 2017.
[12] Federal Aviation Administration (FAA) Land Acquisition and Relocation Assistance for Airport Projects, FAA Order 5100.37B, August 1, 2005.

will be suffered by the non-minority population and/or low-income population." The DOT Order also states that "[i]n making determinations regarding disproportionately high and adverse effects . . . mitigation and enhancement measures. . . and all offsetting benefits to the affected minority and low-income population may be taken into account . . ."

Disproportionately high and adverse human health or environmental effects on minority and low-income populations may represent a significant impact. Additional guidance provided in a document titled "*Promising Practices for EJ Methodologies in NEPA Reviews*"[13] (Promising Practices) was referenced for the specific steps used to identify minority and low-income populations presented in this EA.

CHILDREN'S HEALTH AND SAFETY RISK

Pursuant to *Executive Order 13045, Protection of Children from Environmental Health Risks and Safety Risks*, Federal agencies are directed, as appropriate and consistent with the agency's mission, to make it a high priority to identify and assess environmental health risks and safety risks that may disproportionately affect children. Environmental health and safety risks are defined as risks to health or safety that are attributable to products or substances that a child is likely to come in contact with or ingest. Disproportionate health and safety risks to children may represent a significant impact.

SURFACE TRANSPORTATION IMPROVEMENTS

IDOT Highways has previously approved an EA for the widening of Illinois Route 47. This effort was coordinated with the local communities, the Airport and constructed. The Airport's Sponsor's Proposed Action does not include any surface transportation improvements.

3.4.2 Affected Environment

Table 3-7 present demographic characteristics for the affected environment based on available geographic data from the U.S Census.[14] Because census geographies are used, the affected environment for this analysis differs from the project study area discussed in other sections of this chapter. The project study area includes the project construction limits and the proposed acquisition areas, including fee simple and avigation easement areas, included in the proposed action. The affected environment for this analysis includes the census tract for affected community characteristics presented in **Table 3-7,** that wholly contains the project study area. This census geographic area was selected for the affected environment because it represents the smallest geographical unit available in the U.S. Census 2016-2020 5-year American Community Survey, for each characteristic examined.

[13] Promising Practices for EJ Methodologies in NEPA Reviews, Report of the Federal Interagency Working Group on Environmental Justice & NEPA Committee, March 2016.
[14] U.S. Census website: https://www.census.gov/data.html

Table 3-7: Demographic Data, Population, And Income Characteristics		
Demographics	Community Of Comparison (COC): Grundy County, Illinois	Affected Community (AC) Census Tract 2 Grundy County, Illinois
Age Distribution Demographic Data		
Total Population Counted	50,798	6,967
Number Under 5 Years Old	3,084	437
Percentage Under 5 Years Old	6.1%	6.3%
Number Under 18 Years Old	12,818	1,938
Percentage Under 18 Years Old	25.2%	27.8%
Number 65 Years Old or Older	7,080	1,164
Percentage 65 Years Old or Older	13.9%	16.7%
Minority Analysis		
Total Population Counted	50,798	6,967
Number of Minority Individuals	7,252	1,017
Percentage of Minority Individuals	14.3%	14.6%
125% of COC	17.8%	AC < 125% COC
Minority EJ Population?		No
Poverty Analysis		
Total Population Counted	50,158	6,787
Number of Persons with Income Below Poverty	3,537	800
Percentage Persons with Income Below Poverty	7.1%	11.8%
125% of COC	8.8%	AC > 125% COC
EJ Population in Poverty?		Yes
Food Assistance Demographic Data		
Total Households Counted	20,071	2,700
Number of Households Receiving Assistance	1,844	324
Percentage of Households Receiving Assistance	9.2%	12.0%
125% of COC	11.5%	AC > 125% COC
EJ Population in Poverty (alternate measure)?		Yes

Source: U.S. Census, American Community Survey, 2016-2020 5 Year Period Estimate.

MINORITY AND LOW-INCOME POPULATION ANALYSIS

The *fifty percen*t and *meaningfully greater* analyses described in the **Promising Practices** document were used to identify minority populations in the affected environment. The meaningfully greater analysis requires a reference community. The purpose of comparing data for the reference community to that of the affected environment is to determine if there is a meaningfully greater minority population present within the affected environment when compared to the larger geographical area around the Airport.

The selected reference community is the County of Grundy. Data for the reference community is also presented in **Table 3-7**.

The meaningfully greater analysis requires comparison of the percentage of minorities residing within each of the affected environment's census blocks to the percentage of minority individuals residing in the reference community. A threshold is typically applied above which an affected minority population is meaningfully greater than that in the general population. For this analysis the threshold was set at 125% of the reference community's percentage of minority population.

The *Low-Income Threshold Criteria* analysis described in the **Promising Practices** document was used to identify low-income populations in the affected environment. Two indicators of poverty were examined: population poverty levels in comparison with the Census Bureau's poverty threshold and household poverty levels as indicated by receipt of Federal food assistance. **Table 3-7** presents the census data. Because no affected environment's census tract had levels of either poverty indicator that exceeded the reference community's levels, no low-income population was identified.

3.4.3 Environmental Consequences

NO ACTION ALTERNATIVE

The No Action Alternative does not require any land acquisition; business or residential relocations; altering any surface transportation facility; dividing or disrupting any established community; disrupting orderly, planned development; or creating an appreciable change in employment. Therefore, there would be no social impacts under the No Action Alternative.

PROPOSED ACTION

The Proposed Action would require the acquisition of approximately 179.53 acres of land in fee simple title and approximately 0.73 acres in avigation easement. The acquisition would not include the purchase of any residences and or non-agrarian businesses in fee simple and no residences and/or businesses in easement. The acquisition will purchase three farm operations. Any impacted owner, tenant, or business in the acquisition area would be afforded all appropriate rights established in the Uniform Act and by FAA guidance.

The Proposed Action would be consistent with orderly, planned development in the area. This development project would not disrupt traffic patterns, and or create temporary disruption in traffic flows due to construction. Access to existing businesses and residences would be maintained during construction. Sufficient roadway capacity exists on all roadways serving the Airport.

The project study area does not contain a minority population of concern because the affected community is not more than 50 percent minority, nor is the minority population meaningfully greater than Grundy County. Based on the information presented in Table 3-7, the project area does contain a significant low-income population. The Sponsor's Proposed Action does not include the acquisition and/or relocation of any homes, non-agrarian businesses, or structures. Landowners, including the present farming operations, have been notified by the City of Morris on the potential acquisition of their property through Scoping. Since the SPA does not include any housing relocation, there does not appear to have any disproportionate impact on low-income individuals. The project will conduct a meaningful involvement for low-income individuals through a concerted public involvement process. The public involvement will include placing the Environmental Assessment on the Airport's website, placement of copies of the EA in publicly accessible venues and continued dialogue with affected landowners. See Appendix F - Agency and Citizen Coordination.

The benefits of the proposed improvements include a temporary increase in employment in the construction sector proportionate to the construction projects. This increased temporary employment would result in a boost to local merchants/professionals from the sale of goods and

services and would result in positive growth and a temporary increase in the community tax base. The induced economic and employment effects likely to result from the Proposed Action are positive and consistent with local plans. Based on these factors, it is anticipated that the Proposed Action would not create any adverse socioeconomic impacts.

3.4.4 Mitigation

Neither the No Action Alternative nor the Proposed Action would produce significant socioeconomic impacts or health and safety risks to children, nor would either produce disproportionately high and adverse impacts to populations of environmental justice concern. The Proposed Action includes land acquisition and no disruption to established communities or planned development was identified. Further, any impacted owner, tenant, or business in the acquisition area would be afforded all appropriate rights established in the Uniform Act and by FAA guidance. No mitigation is required.

3.5 Air Quality

3.5.1 General

At the Federal level, under the Clean Air Act (CAA), the United States Environmental Protection Agency (EPA) establishes the guiding principles and policies for protecting air quality conditions in the study area (and throughout the nation). EPA's primary responsibility is to promulgate and update National Ambient Air Quality Standards (NAAQS)[15] which define outdoor levels of air pollutants that are considered safe for the health and welfare of the public. The EPA's other responsibilities include the approval of State Implementation Plans (SIPs), plans that detail how a State will comply with the CAA. The FAA is the primary agency involved in, and responsible for, ensuring that air quality impacts associated with proposed airport projects adhere to the reporting and disclosure requirements of NEPA as well as the General Conformity Rule of the CAA. The General Conformity Rule is applicable to non-highway projects that are Federally funded, licensed, permitted, or approved. The rule ensures that project-related air pollutant emissions do not contribute to the degradation of air quality conditions in an area.

The CAA requires the EPA to establish and periodically review NAAQS. There are NAAQS for six "criteria" air pollutants: carbon monoxide (CO), lead (Pb), nitrogen dioxide (NO_2), ozone (O_3), particulate matter (PM), and sulfur dioxide (SO_2). There are standards for two sizes of PM, $PM_{2.5}$ which are particles with a diameter of 2.5 microns or less and PM_{10} which are particles with a diameter of 10 microns or less. There are two sets of standards. Primary Standards provide protection for the health of the public and Secondary Standards provide public welfare protection. The NAAQS and their averaging periods are provided in **Table 3-8**.

[15] EPA, National Ambient Air Quality Standards (NAAQS) at https://www.epa.gov/criteria-air-pollutants/naaqs-table, September 2019.

Table 3-8: National Ambient Air Quality Standards					
Pollutant		Primary/ Secondary	Averaging Time	Standards	Form
Carbon Monoxide (CO)		Primary	8-hour	9 ppm	Not to be exceeded more than once per year
			1-hour	35 ppm	
Lead (Pb)		Primary and Secondary	Rolling 3-month average	0.15 µg/m^3 (1)	Not to be exceeded
Nitrogen Dioxide (NO_x)		Primary	1-hour	100 ppb	98th percentile of 1-hour daily maximum concentrations, averaged over 3 years
		Primary and Secondary	1 year	53 ppb (2)	Annual Mean
Ozone (O_3)		Primary and Secondary	8-hour	0.070 ppm (3)	Annual fourth-highest daily maximum 8-hr concentration, averaged over 3 years
Particulate Matter	$PM_{2.5}$	Primary	1 year	12.0 µg/m^3	Annual mean, averaged over 3 years
		Secondary	1 year	15.0 µg/m^3	Annual mean, averaged over 3 years
		Primary and Secondary	24-hour	35 µg/m^3	98th percentile, averaged over 3 years
	PM_{10}	Primary and Secondary	24-hour	150 µg/m^3	Not to be exceeded more than once per year on average over 3 years
Sulphur Dioxide (SO_2)		Primary	1-hour	75 ppb (4)	99th percentile of 1-hour daily maximum concentrations, averaged over 3 years
		Secondary	3-hour	0.5 ppm	Not to be exceeded more than once per year
(1) In areas designated nonattainment for the Pb standards prior to the promulgation of the current (2008) standards, and for which implementation plans to attain or maintain the current (2008) standards have not been submitted and approved, the previous standards (1.5 µg/m^3 as a calendar quarter average) also remain in effect.					
(2) The level of the annual NO2 standard is 0.053 ppm. It is shown here in terms of ppb for the purposes of clearer comparison to the 1-hour standard level.					
(3) Final rule signed October 1, 2015, and effective December 28, 2015. The previous (2008) O3 standards additionally remain in effect in some areas. Revocation of the previous (2008) O3 standards and transitioning to the current (2015) standards will be addressed in the implementation rule for the current standards.					
(4) The previous SO2 standards (0.14 ppm 24-hour and 0.03 ppm annual) will additionally remain in effect in certain areas: (1) any area for which it is not yet 1 year since the effective date of designation under the current (2010) standards, and (2)any area for which an implementation plan providing for attainment of the current (2010) standard has not been submitted and approved and which is designated nonattainment under the previous SO2 standards or is not meeting the requirements of a SIP call under the previous SO2 standards (40 CFR 50.4(3)).					

Notes:ppm is parts per million; ppb is parts per billion, and µg/m^3 is micrograms per cubic meter.
Source:EPA, https://www.epa.gov/criteria-air-pollutants/naaqs-table Accessed May 2018.

The EPA designates areas as having air pollutant levels that are either lower than or meeting the NAAQS or higher than the NAAQS. An area with measured pollutant concentrations which are lower/meeting the NAAQS is designated as an *attainment area* and an area with pollutant concentrations that exceed the NAAQS is designated as a *nonattainment area*. After air pollutant concentrations in a nonattainment area are reduced to levels that meet or are below the NAAQS, the EPA re-designates the area to be a *maintenance area* for a period of 20 years. An area is designated as unclassifiable when there is a lack of sufficient data to determine the status of a pollutant within the area.

To evaluate the interdependencies between air quality and noise the FAA developed the Aviation Environmental Design Tool (AEDT)[16]. AEDT is a software system that models aircraft performance in space and time to estimate fuel burn, emissions, and noise. AEDT is a comprehensive tool that provides information to FAA stakeholders on each of these specific environmental impacts. AEDT facilitates environmental review activities required under NEPA by consolidating the modeling of these environmental impacts in a single tool.

3.5.2 Affected Environment

C09 is located in Grundy County, Illinois. Based on air quality data, emissions and emissions-related data, meteorology, geography/topography, and jurisdictional boundaries, the EPA has designated Grundy County to be an attainment area for all NAAQS. The General Conformity Rule of the CAA prohibits Federal agencies (including the FAA) from permitting or funding non-highway projects that do not conform to a SIP. Because the Proposed Action is within Grundy County, an area designated as in attainment, a General Conformity applicability analysis is not required.

The CAA also contains a Transportation Conformity Rule that functions similar to the General Conformity Rule. The Transportation Conformity Rule restricts Federal funding to highway or transportation projects that do not conform to a SIP. As with General Conformity, Transportation Conformity regulations apply only to Federal actions located within a nonattainment or maintenance area. As noted, Grundy County is in attainment for all NAAQS. Because the Proposed Action would not be developed, funded, or approved by the Federal Highway Administration or the Federal Transit Administration, the Transportation Conformity regulations of the CAA do not apply to the Proposed Action.

Finally, the General Conformity Rule requirements, Section 102(2) of NEPA, also requires environmental review of Federally funded projects that have the potential to affect the environment irrespective of location (i.e., nonattainment/maintenance areas). The emission inventories presented, which disclose project-related emissions of criteria air pollutants and pollutant precursors, as well as Greenhouse Gases (GHGs), were prepared.

3.5.3 Environmental Consequences

This section presents and discusses the potential air quality impacts associated with the Proposed Action. For the analysis, the short-term criteria air pollutant and pollutant precursor emissions that would result from construction as well as long-term operational emissions that would result with the Proposed Action were derived. Detailed air quality modelling input assumptions are presented in Appendix C, Morris Municipal Airport - Air Quality and Climate Assessment.

CONSTRUCTION ACTIVITIES

Air pollutant emissions associated with construction activities are temporary and variable depending on project location, duration, and level of activity. These emissions occur predominantly in engine exhaust from the operation of construction equipment and vehicles at the site (e.g., scrapers, dozers, delivery trucks, etc.) and from transporting construction workers to and from the site. Additionally, fugitive dust emissions result from site preparation, land clearing, material handling, equipment movement on unpaved areas; and from evaporative emissions that occur during the application of asphalt paving.

The construction equipment typically utilized in airport projects is comprised both of on-road vehicles (i.e., on-road-licensed) and non-road equipment (i.e., off-road). The former category of vehicles is used for the transport and delivery of supplies, material, and equipment to and from

[16] AEDT 2d, at the time of the analysis, was the current release version of AEDT. Additional information on AEDT is available at https://aedt.faa.gov/.

the site and includes construction worker vehicles. The latter category of equipment is operated on-site for activities such as soil/material handling, site clearing and grubbing.

The Airport Construction Emissions Inventory Tool (ACEIT)[17] was used to estimate short-term construction emissions associated with the proposed improvements at C09. Project-specific details were used in the ACEIT to estimate construction activities and equipment/vehicle activity data (e.g., equipment mixes/operating times). Because the default emission factors used by ACEIT are outdated and do not reflect the emission rates from the EPA's MOtor Vehicle Emission Simulator (i.e., MOVES)[18] model, only activity data was extracted from ACEIT. Emission factors were then developed using MOVES, which provides emissions data for both on-road vehicles and off-road construction equipment. Fugitive dust emissions were calculated using emission factors within EPA's Compilation of Air Pollutant Emission Factors (AP-42)[19] and evaporative emissions were developed using EPA guidance on asphalt paving.[20]

Table 3-9 lists the construction activities that would be necessary to implement the Proposed Action. As also shown, the construction is assumed to begin in the year 2024 and continue through the year 2026. Further details on a construction schedule breakdown along with the type of equipment/vehicles and activity levels per year are provided in **Appendix C**.

Table 3-9: Construction Schedule and Activities

Construction Schedule	Construction Activities
2024-2026	Site Preparation
2024-2026	Corporate Hangar (10,000 ft^2)
2024-2026	Service Road
2024-2026	Auto Parking Lot
2024-2026	Construct Runway 7/25
2024-2026	Construct Parallel and Connecting Taxiway
2024-2026	General Aviation Apron

Source: CMT 2022

Estimates of CO, VOC, NOx, Sulfur Oxides (SOx), PM_{10} and $PM_{2.5}$ that would occur to construct the proposed improvements are provided in **Table 3-10**. As shown, it is anticipated that emissions of pollutants and pollutant precursors would be the greatest in 2025. Notably, the emission estimates are below the de minimis threshold of 100 tons per year (tons/year) for NOx or VOC.

Table 3-10: Construction Emissions Proposed Action Alternative (Short Tons Per Year)

Construction Emissions Year	CO	NOx	VOC	PM_{10}	$PM_{2.5}$	SOx	Pb
2024	10.5	10.7	40.6	3.3	0.8	<0.1	NA
2025	20.5	27.1	43.4	5.9	1.8	<0.1	NA

[17] TRB, ACRP Report 102, Guidance for Estimating Airport Construction Emissions, http://www.trb.org/ACRP/Blurbs/170234.aspx.
[18] EPA's MOVES2014a, at the time of the analysis, was the latest version of MOVES, which includes the NONROAD model. Additional information on MOVES2014a is available at https://www.epa.gov/moves/moves2014a-latest-version-motor-vehicle-emission-simulator-moves.
[19] EPA, Emissions Factors & AP-42, Compilation of Air Pollutant Emission Factors, http://www.epa.gov/ttn/chief/ap42/index.html#toc.
[20] EPA, Emission Inventory Improvement Program, Asphalt Paving, Chapter 17, Volume III, April 2001.

Table 3-10: Construction Emissions Proposed Action Alternative (Short Tons Per Year)							
Construction Emissions Year	CO	NOx	VOC	PM_{10}	$PM_{2.5}$	SOx	Pb
2026	10.6	16.2	2.8	3.0	1.0	<0.1	NA

Notes: CO - Carbon Monoxide, NO_x - Nitrogen Oxides, SO_x - Sulfur Oxides, $PM_{10/2.5}$ - Particulate Matter & VOC - Volatile Organic Compounds. Totals may reflect rounding. Source: CMT

OPERATIONAL EMISSIONS

The operational emissions inventory was prepared for aircraft, auxiliary power units (APUs), and ground support equipment (GSE). Emissions from motor vehicles were not considered in the analysis as the emissions from this source of pollutants would not change as a result of the Proposed Action. It is not anticipated that the number of airport-related employees will increase due to the Proposed Action. The aircraft, APU and GSE-related emissions were computed using the latest version of the FAA's AEDT.[21] The inventories were prepared for emissions of CO, NO_x, VOC, $PM_{10/2.5}$, SO_x and Pb.

Aircraft emissions were calculated for the Future (2026) No Action and Proposed Action. Similar to the noise analysis, the information concerning operating levels and aircraft fleet mix was based upon the Forecast Working Paper - Morris Municipal Airport (See **Appendix A**).

The No Action and Proposed Action conditions include 16,016 and 17,605 annual operations, respectively. The aircraft fleet mix was assumed to remain the same for both conditions. For the future Proposed Action, aircraft taxi times were adjusted to reflect the use of the primary runway and the new crosswind runway. **Table 3-11** summarizes the aircraft fleet mix and number of annual aircraft operations modeled in AEDT for the future year 2026 conditions.

Table 3-11: Year 2026 Aircraft Fleet Mix and Operations				
Aircraft Category	Aircraft Type	Number of Aircraft Operations		
		2021	2026	
			No Action Alternative	Proposed Action Alternative
Jet	Cessna Citation CJ3	137	138	142
	Cessna Citation CJ4	69	70	74
	Cessna Citation Excel	21	21	23
	Cessna Citation Mustang	21	21	23
	Eclipse 500	21	21	23
Turboprop	Ayres Corporation S2R-G6	1,540	1,560	1,715
	Socata TBM9	24	24	27
	Beechcraft Super King Air 200	16	16	17
	Beechcraft Super King Air 350	8	8	9
	Cessna 414 Chancellor	8	8	9
Piston	Cessna 172 Skyhawk	12,592	12,757	14,037
	Van's Aircraft RV-8	433	439	482

[21] AEDT 2d, at the time of the analysis, was the current release version of AEDT. Additional information on AEDT is available at: https://aedt.faa.gov/.

Table 3-11: Year 2026 Aircraft Fleet Mix and Operations				
Aircraft Category	Aircraft Type	Number of Aircraft Operations		
		2021	2026	
			No Action Alternative	Proposed Action Alternative
	Bellanca 8KCAB	310	314	345
	Piper PA-28-180 Cherokee	310	314	345
	Aviat Aircraft Pitts S-2B	248	251	276
Rotor	Robinson Helicopter R44 II	52	53	58
Total Operations		15,808	16,016	17,605

Source: Morris Municipal Airport Forecast Working Paper.

3.5.4 Mitigation

Neither the Proposed Action nor the No Action Alternative would result in any significant air quality impacts. Construction activities associated with the No Action and the Proposed Action would result in temporary emissions from construction equipment, trucks, and fugitive dust emissions from site demolition and earthwork. The impacts would occur only within the immediate vicinity of the construction sites and would be minimized through best management practices to reduce emissions, particularly fugitive particle emissions, during construction.

While the annual emissions from construction equipment would not equal or exceed the applicable *de minimis* thresholds defining insignificant and negligible emissions, the Proposed Action would result in a short-term increase of airborne fugitive dust emissions from vehicle movement and soil excavation in and around the construction site. All possible best management practices should be taken to reduce fugitive dust emissions by adhering to guidelines included in FAA *Advisory Circular (AC), Standards for Specifying Construction of Airports*.[22] Methods of controlling dust and other airborne particles could include, but may not be limited to, the following:

- Exposing the minimum area of erodible earth
- Applying temporary mulch with or without seeding
- Using water sprinkler trucks
- Using covered haul trucks
- Using dust palliatives or penetration asphalt on haul roads
- Using plastic sheet coverings

3.6 Climate

3.6.1 General

Research has shown that an increase in atmospheric GHG emissions is significantly affecting the Earth's climate. These conclusions are based upon a scientific record that includes substantial contributions from the United States Global Change Research Program (USGCRP), a program mandated by Congress in the Global Change Research Act to "*assist the Nation and the world to understand, assess, predict, and respond to human-induced and natural processes of global change*."[23]

[22] FAA Advisory Circular (AC)150/5370-10H, Standards for Specifying Construction of Airports, December 21, 2018.
[23] Global Change Research Act of 1990, Pub. L. 101–606, Sec. 103 (November 16, 1990), http://www.globalchange.gov.

In 2009, based primarily on the scientific assessments of the USGCRP, as well as the National Research Council (NRC) and the Intergovernmental Panel on Climate Change (IPCC), the EPA issued a finding that it was reasonable to assume that changes in our climate caused by elevated concentrations of GHG in the atmosphere endanger the public health and public welfare of current and future generations.[24] In 2015, EPA acknowledged more recent scientific assessments that "highlight the urgency of addressing the rising concentration of carbon dioxide (CO_2) in the atmosphere".[25]

The EPA and the FAA traditionally work within the standard-setting process of the International Civil Aviation Organization's (ICAO) Committee on Aviation Environmental Protection (CAEP) to establish international emission standards and related requirements, which individual nations may later adopt into domestic law. In February of 2016, ICAO/CAEP agreed on the first-ever international standards to regulate CO_2 emissions from aircraft. In July 2016, the EPA formally announced that GHG emissions from certain classes of aircraft engines contribute to climate change. In March of 2017, the ICAO Council adopted a new aircraft CO_2 emissions standard which will reduce the impact of aviation GHG emissions on the global climate.[26]

Although there are currently no Federal standards for aviation related GHG emissions, it is well-established that GHG emissions can affect climate. The CEQ has indicated that climate should be considered in NEPA analyses and in 2016 released the final guidance titled "*Final Guidance for Federal Departments and Agencies on Consideration of GHG Emissions and the Effects of Climate Change in NEPA Reviews*," for Federal agencies on how to consider the impacts of their actions on global climate change in their NEPA reviews, a Notice of Availability for which was published on August 5, 2016 (81 FR 51866). However, pursuant to Executive Order 13783 of March 28, 2017, "*Promoting Energy Independence and Economic Growth*," the final guidance was withdrawn effective April 5, 2017, for further consideration. Notably, on June 21, 2019, the CEQ submitted draft guidance titled "*Draft NEPA Guidance on Consideration of GHG Emissions*," to the Federal Register for publication and public comment. The public comment period was originally set to close on July 26, 2019, but was extended to August 26, 2019. If finalized, this guidance would replace the final guidance CEQ issued in August 2016.[27, 28].

The GHG emissions associated with the construction and operation of the Proposed Action are presented in **Table 3-12**. GHG emissions are presented in metric tons of CO_2 equivalent (CO_2e). As previously stated, there are no standards by which the emissions of GHG can be evaluated. Therefore, the estimates are provided for disclosure purposes only.

Table 3-12: Forecast (2024-2026) CO_2e Emissions (Metric Tons) Proposed Action

Year	Emission Sources		CO_2e
2024	Construction	Off & On Road Equipment/Vehicles	3,817
2025	Construction	Off & On Road Equipment/Vehicles	8,659

[24] Endangerment and Cause or Contribute Findings for Greenhouse Gases under Section 202(a) of the Clean Air Act, 74 Fed. Reg. 66496 (December 15, 2009).
[25] EPA, Final Rule for Carbon Pollution Emission Guidelines for Existing Stationary Sources Electric Utility Generating Units, 80 Fed. Reg. 64661, 64677 (October 23, 2015).
[26] ICAO, https://www.icao.int/Newsroom/Pages/ICAO-Council-adopts-new-CO2-emissions-standard-for-aircraft.aspx.
[27] Executive Office of the President of the U.S., Council on Environmental Quality Initiatives, Fact Sheet: CEQ'S Draft NEPA Guidance on Consideration of GHG Emissions, https://www.whitehouse.gov/wp-content/uploads/2017/11/20190724-FINAL-GHG-Guidance-Fact-Sheet-FR-Notice-Comment-Extension.pdf.
[28] Council on Environmental Quality, Draft National Environmental Policy Act Guidance on Consideration of Greenhouse Gas Emissions, [Docket No. CEQ-2019-0002], June 26, 2019. Available at: https://www.govinfo.gov/content/pkg/FR-2019-06-26/pdf/2019-13576.pdf.

Table 3-12: Forecast (2024-2026) CO_2e Emissions (Metric Tons) Proposed Action			
Year	**Emission Sources**		**CO_2e**
2026	Construction	Off & On Road Equipment/Vehicles	4,979
	Operation	Aircraft	381
		Motor Vehicles	341
		Total	6,409

Note: Construction emissions modelled using ACEIT and MOVES2014b modeling tools. Operational emissions modelled using AEDT 2d. Table reflects the change in operational emissions due to the proposed project only. Aircraft operations between 2021 and 2026 are anticipated to remain constant to 2021 emissions levels due to the ongoing construction of the Proposed Action.
Source: CMT, 2022.

3.6.2. Mitigation

The FAA has not identified specific factors to consider in making a significant determination for GHG emissions; therefore, no mitigation measures are required to mitigate the potential increase in GHGs attributed to the Proposed Action.

3.7 Water Resources

3.7.1 General

FAA *Order 1050.1F Desk Reference*, Chapter 14 defines water resources as the following: *"Water resources are surface waters and groundwater that are vital to society; they are important in providing drinking water and in supporting recreation, transportation and commerce, industry, agriculture, and aquatic ecosystems. Surface water, groundwater, floodplains, and wetlands do not function as separate and isolated components of the watershed, but rather as a single, integrated natural system."*

Wetlands, floodplains, surface water, groundwater, and wild and scenic rivers each need to be evaluated as parts of a whole to determine any potential impacts to the water resources relevant to a project. Besides being a basis for life, water is an essential component of many ecosystems. The chemical, physical, and biological characteristics of water determine its particular quality. The Federal Water Pollution Control Act, as amended by the Clean Water Act (CWA) of 1977, provides the authority to establish water quality standards, to control discharges into surface and subsurface waters, to develop waste treatment management plans and practices, and to issue permits for discharges of dredged or fill material. Documentation for this section is contained in Appendix D - Ecological Resource Report.

As contained in the Guidance Manual for the Preparation of NPDES Permit Applications for Storm Water Discharges Associated with Industrial Activity published by the USEPA, the Federal Water Pollution Act (also known as the CWA), as amended in 1977, requires NPDES permits for stormwater discharges associated with industrial activity.

WETLANDS

Wetlands, as defined in Federal Executive Order 11990 - Protection of Wetlands, are: *"…those areas that are inundated by surface or ground water with a frequency sufficient to support and under normal circumstances does or would support a prevalence of vegetative or aquatic life that requires saturated or seasonally saturated soil conditions for growth and reproduction. Wetlands generally include swamps, marshes, bogs, and similar areas such as sloughs, potholes, wet meadows, river overflows, mud flats and natural ponds."*

Wetlands also include estuarine areas, tidal overflows, and shallow lakes and ponds with emergent vegetation. Furthermore, the wetland ecosystem includes those areas that affect or are

affected by the wetland itself e.g., adjacent uplands or regions upstream and downstream. Areas covered with water for a short time such that there is no effect on moist soil vegetation are not included within the definition of wetlands, nor are the permanent waters of streams, reservoirs, and deep lakes. Three criteria are required for an area to be considered a wetland: hydrophytic vegetation, hydric soils, and wetland hydrology. The hydrophytic vegetation criterion is met when the dominant vegetation in an area is composed of 50 percent or more of species that are specifically adapted to living under waterlogged conditions. Hydric soils are soils that exhibit characteristics indicative of long-term saturated or inundated conditions. Wetland hydrology is present if an area sustains a level of soil saturation or inundation sufficient in duration to result in the dominance of hydrophytic vegetation. The term "Waters of the United States," as defined in 33 CFR Part 328, constitutes:

- All territorial seas and waters which are currently used, or were used in the past, or may be susceptible to use in interstate or foreign commerce, including waters which are subject to the ebb and flow of the tide.
- Tributaries.
- Lakes and ponds, and impoundments of jurisdictional waters.
- Adjacent wetlands.

FLOODPLAINS

Floodplains perform many important functions included in wildlife habitat, food chain support, nutrient retention and removal, and erosion control. Regulatory floodplains are those with a designated 100-year floodplain that are mapped on National Flood Insurance Rate Maps by the Federal Emergency Management Agency (FEMA). Longitudinal encroachment of transportation projects on designated floodplains requires a formal review under *Executive Order 11988, Floodplain Management*.

Executive Order 11988 directs Federal agencies to "take actions to reduce the risk of flood loss, minimize the impact of floods on human safety, health and welfare and restore and preserve the natural and beneficial value served by floodplains." *U.S. DOT Order 5650.2, Floodplain Management* and Protection contain procedures for implementing the Executive Order and establish a policy of avoiding actions within the 100-year floodplain. Floodplains are defined in *Executive Order 11988, Floodplain Management*, as: *"the lowland and relatively flat areas adjoining inland and coastal waters including flood prone areas of offshore islands, including at a minimum, that area subject to a one percent or greater chance of flooding in any given year;"* i.e., the area that would be inundated by a 100-year flood.

The National Flood Insurance Program (NFIP) criteria include minimum standards for adoption of floodplain management regulations by local communities enrolled in the program. In support of the NFIP, the Federal Insurance Administration publishes Flood Insurance Rate Maps, which delineate the limits of all floodplains and usually any floodways. In certain circumstances where no detailed flood studies were performed, the Flood Maps were created utilizing approximate methods. State and local governments may adopt floodplain management regulations that vary from those developed by NFIP, as long as they exceed the minimum standards developed by NFIP. The IDNR, Office of Water Resources (OWR) controls development within the floodway of a stream of a watershed with a tributary area of one square mile or greater, through their Part 700 regulations. OWR has developed standards that are more stringent than those required by NFIP.

SURFACE WATERS

Surface waters are identified by the visible presence of water on the surface. Common examples of surface waters would include streams, rivers, lakes, ponds, estuaries, and oceans.[29] FAA Order 1050.1F, Desk Reference describes potential direct impacts to surface waters as "permanent infrastructure, or temporary construction located on a surface water resource." FAA Order 1050.1F Desk Reference also describes potential indirect impacts as, "sedimentation or petro-chemical spills from construction activities."

GROUND WATER

FAA Order 1050.1F, Desk Reference, Section 14.4 defines groundwater as subsurface water that occupies the space between sand, clay, and rock formations. The term aquifer is used to describe the geologic layers that store or transmit groundwater, such as to wells, springs, and other water sources. The U.S. Environmental Protection Agency's National Sole Source Aquifer Database (last updated July 7, 2016) was reviewed; there are no sole source aquifers in Illinois.

WILD AND SCENIC RIVERS

The Wild and Scenic Rivers Act was created by congress to protect rivers with exceptionally natural, cultural, and recreational values. Section 7 of the Wild and Scenic Rivers Act prohibits Federal assistance to projects which would depreciate the value of a wild and scenic river. No wild or scenic rivers exist within the proposed project area; therefore, no impacts to these resources would occur due to the proposed project.

3.7.2 Affected Environment

WETLANDS

The project study area was investigated for the presence of regulated surface water resources. Wetland areas identified during the on-site investigation were delineated using standard protocols by the United States Army Corps of Engineers in the Corps of Engineers Wetlands Delineation Manual (1987) and 2010 Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Midwest Region and the United States Department of Agriculture National Food Security Act Manual (1994 and 1996).

A wetland survey was conducted on September 23, 2020, by CMT personnel. When evaluating the presence of wetlands, CMT personnel used the routine method presented in the 1987 Corps of Engineers Wetlands Delineation Manual and the Midwest Regional Supplement. In order for an area to be classified as a jurisdictional wetland, the area has to have dominance of hydrophytic vegetation, hydric soils and wetland hydrology and be an adjacent wetland as defined by the 2020 Navigable Waters Protection Rule. Routine Wetland Determination Data Forms were completed for both the wetland and upland data points, and are included in Appendix D.

The wetland boundaries were surveyed using a handheld GPS device with sub-meter accuracy. The wetland boundaries with the wetland and upland data point locations are found on the ecological resource and wetland delineation map in **Figure 3-5**, along with all published mapping and data.

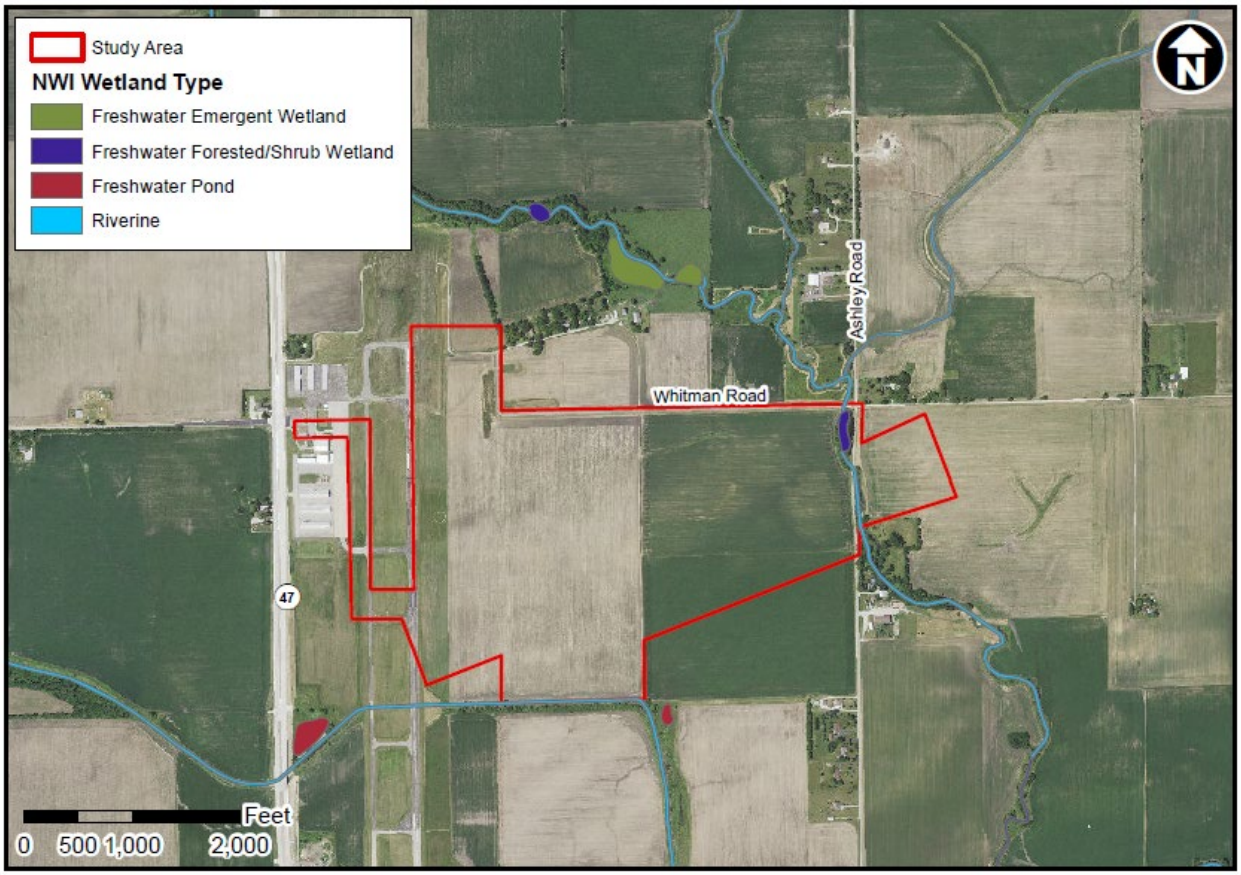
The ecological integrity of each wetland based on its plant species composition was completed using the Floristic Quality Index (FQI). The FQI forms and comprehensive plant species lists for each wetland are included in Appendix D.

[29] FAA Order 1050.1F Desk Reference, Section 14.3, July 2015, pg. 14-19.

REGULATED SURFACE WATERS - STREAMS

Streams were evaluated based on the definition of waters of the United States, which requires the presence of an ordinary high-water mark (OHWM) and ultimate connection to downstream

Figure 3-5: Wetland Map



Traditional Navigable Waters (TNW). The following USACE definitions for the three stream types were used:

Ephemeral Streams have flowing water only during and for a short duration after precipitation events in a typical year. Ephemeral stream beds are located above the water table year-round. Groundwater is not a source of water for the stream. Runoff from rainfall is the primary source of water for stream flow.

Intermittent Streams have flowing water during certain times of the year, when groundwater provides water for stream flow. During dry periods, intermittent streams may not have flowing water. Runoff from rainfall is a supplemental source of water for stream flow.

Perennial Streams have flowing water year-round during a typical year. The water table is located above the stream bed for most of the year. Groundwater is the primary source of water for stream flow. Runoff from rainfall is a supplemental source of water for stream flow.

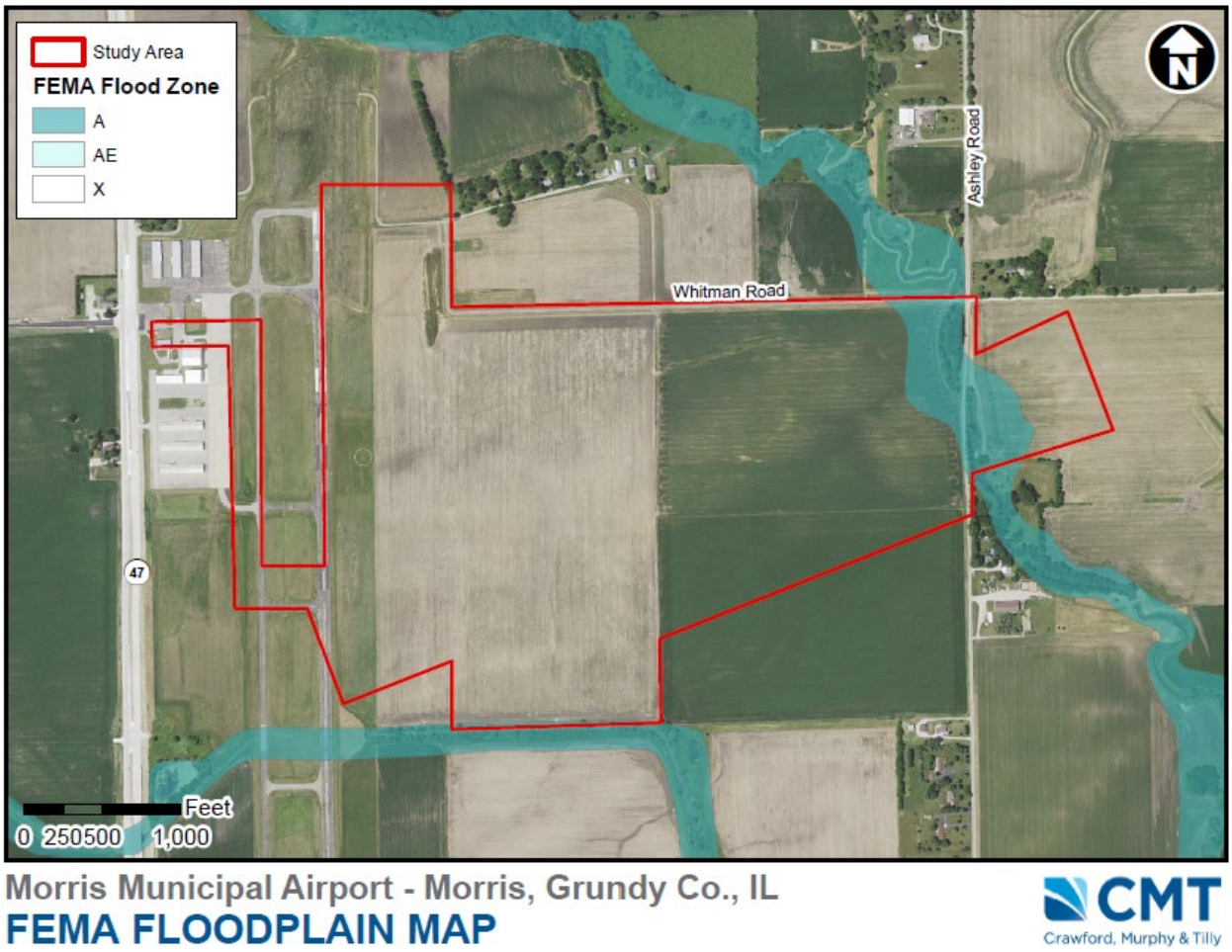
The determination of stream designation is based on an evaluation of the size of the watershed for each stream, the presence of flow during the on-site evaluation and the evidence observed of

the frequency of flow, and the presence of aquatic life. Valley Run Creek is located on the eastern portion of the project area.

FLOODPLAINS

Figure 3-6 depicts the limits of the 100-year floodplain and floodway in proximity of the Proposed Action based on the current FEMA Flood Insurance Rate Map for Valley Run Creek.

Figure 3-6: FEMA Floodplain Map



WILD AND SCENIC RIVERS

The National Wild and Scenic Rivers System was reviewed to determine the nearest Wild and Scenic River or a Study (Candidate) River in the vicinity of the Proposed Action. The nearest such river is the Middle Fork of the Vermilion River, located approximately 83 miles to the south, southeast. A 17-mile section of the Kishwaukee River from its confluence with the Rock River to Beaver Creek is listed on the Nationwide Rivers Inventory (NRI) as having outstanding scenic and recreational values. This NRI segment of the Kishwaukee River is located approximately 64 miles northwest of the Airport.

3.7.3 Environmental Consequences

NO ACTION ALTERNATIVE

The No Action Alternative assumes that no new facilities associated with the Proposed Action would be constructed. There would be no impacts to wetlands or floodplains, and there would be

no new impervious surfaces beyond those projects that have already received environmental approval and that would occur independent of the Proposed Action.

PROPOSED ACTION

Wetlands

Within the study area, Wetland A is a 0.65-acre emergent wetland located approximately 50 feet west of the existing taxiway. Based on the Native FQI (3.6) and Native Mean-C Value (1.8), the identified wetland is low quality and severely degraded. The wetland extends west and south beyond the study area and drains south through a stormwater drainage ditch to Saratoga Creek, which ultimately drains to the Illinois River, a Traditional Navigable Waterway (TNW). Based on the surface connection to a TNW, the wetland may be federally jurisdictional.

Two wetland determination data points were evaluated to determine whether or not the areas met the wetland criteria. Data point B1 exhibited hydrophytic vegetation and wetland hydrology but did not meet any hydric soil indicators. Data point C1 was located within an NWI mapped wetland; while the data point exhibited hydrophytic vegetation and wetland hydrology, it did not meet any hydric soil indicators. Details on the soil, hydrology, and dominant vegetation for each wetland and wetland determination point are provided on the Routine Wetland Determination Data Forms included in Appendix D, along with qualitative assessment data. Photographs of the wetland are provided in Appendix D.

The Proposed Action originally identified the construction of electrical conduit in the area where the wetland was discovered. Subsequently, the Proposed Action was revised to move the electrical conduit installation to the other site of Taxiway A and totally avoid the wetland area entirely. As part of the coordination with the Illinois Interagency Wetland Policy Act of 1989, a Wetland Impact Evaluation (WIE) was submitted to IDOT Bureau of Design and Environment. The WIE was approved for construction on October 3, 2022. See Appendix D.

Floodplains

Based on the FEMA floodplain map, project construction encroachment of the 100-year floodplain and floodway is not anticipated. The runway, taxiway, and navigation aid facility are not located within the 100-year floodplain. The Proposed Action does identify the trimming of certain vegetation within the floodplain but does not include removal of any tree root balls (structural) and does not include any filling in the floodplain or floodway.

All proposed stormwater management facilities required as part of the Proposed Action would be designed to accommodate the modified development as a part of the detailed design process. Proposed stormwater management facilities would be designed in compliance with and in coordination with state and local regulatory agencies, as required. All construction and stormwater permits would be secured in coordination with Federal, state, and local regulatory agencies.

Surface and Ground Water

Water quality can be adversely impacted by several means including construction activities, storm water discharges from impervious surfaces, accidental releases of hazardous substances, and maintenance activities. Potential construction impacts could include disturbance from earth-moving and grading and discharge of contaminants such as fuels and lubricating oils used for construction machinery.

The Proposed Action would add approximately 14± acres of impervious surfaces and includes construction of additional storm water detention facilities to accommodate the additional impervious surfaces. Proposed additional detention facilities would be coordinated with the Airport's Wildlife Management Plan and would drain within 48 hours or less.

Prior to construction of the proposed airfield improvements, a NPDES permit for storm water discharges associated with construction site activities would need to be secured from IEPA in

accordance with Paragraph (1.c) Construction Activity 40 CFR 122.26(b)(14). The project is not anticipated to change local surface water runoff patterns. During construction, storm water and silt runoff from project areas would be managed in accordance with the NPDES permit.

Wild and Scenic Rivers

The proposed project would not occur in or near any designated wild and scenic river area; there would be no impact on Wild and Scenic Rivers as a result of the proposed project.

3.7.4 Mitigation

No significant impacts to Wetlands and Wild and Scenic Rivers or NRI Rivers are anticipated under the No Action or the Proposed Action. Therefore, no mitigation would be required for these resources.

Proposed stormwater management facilities would be designed in coordination with state and local regulatory agencies, as required. Further, all construction and stormwater permits would be secured in coordination with Federal, state, and local regulatory agencies.

An erosion control plan would be developed based on the FAA's *Temporary Air and Water Pollution Soil Erosion and Siltation Control Standards for Specifying Construction on Airports (*change 10 to FAA *Advisory Circular (AC) 150/5370-10H)*. The erosion control plan would incorporate BMPs to minimize impacts to water quality during construction. Depending upon the evaluations and conclusions of the design process for the proposed project, these BMPs could include requirements for erosion control and temporary seeding of all exposed soils, segregation and protection of fuel supplies and hazardous materials, and other measures for the protection of surface and subsurface waters, including periodic meetings between the Airport, resident engineer/architect, and contractor to ensure compliance with the BMPs. These BMPs would be incorporated into the project construction specifications. The Airport's SWPPP would be updated in support of the NPDES permit. This SWPPP would apply to activities conducted by airport personnel and those tenants who choose to be included in the Airport's SWPPP (rather than implementing a separate SWPPP for specific tenant operations). Various permanent sediment control measures, including vegetated filter strips, rock riffles, and detention basins, would be evaluated as part of the design process.

3.8 Coastal Resources

3.8.1 General

Coastal resources include all-natural resources occurring within coastal waters and their adjacent shorelands. Coastal resources include islands, transitional and intertidal areas, salt marshes, wetlands, floodplains, estuaries, beaches, dunes, barrier islands, and coral reefs, as well as fish and wildlife and their respective habitats within these areas. Coastal resources include the coastlines of the Atlantic and Pacific oceans, the Great Lakes, and the Gulf of Mexico.

Several Federal statutes, regulations, and executive orders can be relevant to the protection of Coastal Resources. These include *Coastal Barrier Resources Act*;[30] the *Coastal Zone Management Act*;[31] the *National Marine Sanctuaries Act*;[32] *Executive Order 13089, Coral Reef Protection*;[33] and *Executive Order 13547, Stewardship of the Ocean, Our Coasts, and the Great Lakes*.[34] The *National Marine Sanctuaries A*ct and *Executive Order 13089, Coral Reef Protection*

[30] https://www.fws.gov/CBRA/
[31] https://coast.noaa.gov/czm/act/
[32] https://sanctuaries.noaa.gov/about/legislation/
[33] http://www.presidency.ucsb.edu/ws/index.php?pid=56122
[34] https://obamawhitehouse.archives.gov/the-press-office/executive-order-stewardship-ocean-our-coasts-and-great-lakes

are focused on oceanic areas, beyond the geographical region of the project area. *Executive Order 13547, Stewardship of the Ocean, Our Coasts, and the Great Lakes* is a Federal policy action, and the executive order has no implementing regulations or designated oversight agency.

The *Coastal Barrier Resources Act (CBRA) of 1982* was created to address problems caused by coastal barrier development. CBRA restricts most Federal expenditures and financial assistance that tend to encourage development, including Federal flood insurance, in the John H. Chafee Coastal Barrier Resource System (CBRS). Three important goals of CBRA are to:

- minimize loss of human life by discouraging development in high-risk areas.
- reduce wasteful expenditure of Federal resources.
- protect the natural resources associated with coastal barriers.

The Coastal Barrier Improvement Act (CBIA) of 1990 reauthorized the Coastal Barrier Resources Act and expanded the John H. Chafee Coastal Barrier Resources System by adding new units in Puerto Rico, the U.S. Virgin Islands, the Great Lakes, and enlarging some previously designated units along the Atlantic and Gulf coasts. The CBIA also designated a new category of lands called "otherwise protected areas" (OPAs). OPAs are based on areas established under Federal, state, or local law, or held by a qualified organization, primarily for wildlife refuge, sanctuary, recreational, or natural resource conservation purposes. Most of the land within OPAs is publicly held for conservation or recreational purposes; however, OPAs can contain private land held for conservation purposes, as well as private properties not held for conservation that are inholdings. The only Federal spending prohibition within OPAs is Federal flood insurance.

The Coastal Barrier Resources Reauthorization Act of 2000 reauthorized the Coastal Barrier Resources Act (CBRA) and directed the U.S. Fish and Wildlife Service to complete a Digital Mapping Pilot Project that includes digitally produced draft maps for up to 75 John H. Chafee Coastal Barrier Resources System areas and a report to Congress that describes the feasibility and costs for completing digital maps for all CBRS areas.

The Coastal Barrier Resources Reauthorization Act of 2005, signed into law on May 25, 2006, reauthorized the Coastal Barrier Resources Act and directed the U.S. Fish and Wildlife Service to finalize the Digital Mapping Pilot Project by:

- providing a public comment period for the draft maps created through the pilot project (covering approximately 10 percent of the entire Coastal Barrier Resources System, CBRS), and
- preparing a report to Congress that contains the final recommended digital maps and a summary of the comments received during the public comments period.

The 2005 Act also directed US Fish and Wildlife Service to create digital maps for the remainder of the CBRS. The US Fish and Wildlife Service's (USFWS) website was referenced to determine the location and/or existence of Federally designated Coastal Barriers in the project area. The USFWS Coastal Barrier Resources System mapper[35] indicated that there are no Coastal Barrier Resources units in Illinois.

The U.S. Congress recognized the importance of meeting the challenge of continued growth in the coastal zone by passing the Coastal Zone Management Act (CZMA) in 1972. This act, administered by the National Oceanic and Atmospheric Administration (NOAA), provides for the management of the nation's coastal resources, including the Great Lakes. The goal of the Act is

[35] https://www.fws.gov/CBRA/

to *"preserve, protect, develop, and where possible, to restore or enhance the resources of the nation's coastal zone."*

The CZMA outlines three national programs: the National Coastal Zone Management Program; the National Estuarine Research Reserve System; and the Coastal and Estuarine Land Conservation Program (CELCP). The National Coastal Zone Management Program aims to balance competing land and water issues through state and territorial coastal management programs, the reserves serve as field laboratories that provide a greater understanding of estuaries and how humans impact them. CELCP provides matching funds to state and local governments to purchase threatened coastal and estuarine lands or obtain conservation easements.

The Illinois Coastal Management Program (ICMP),[36] under the direction of the Illinois Department of Natural Resources, (IDNR) Office of Coastal Management, protects and manages the natural and cultural resources along the state's 63-mile stretch of Lake Michigan shoreline. Over the past one-hundred years the Illinois coast has undergone extensive change with hydrologic modifications, large industrial and transportation impacts, and the building of skyscrapers near the shoreline. Despite these changes, coastal resources still contain some of the richest, rarest, and most diverse plant and animal species and natural habitat areas in the state. Illinois' coastal zone has two components:

- The Lakeshore Boundary is based on the Lake Michigan watershed and is generally parallel to the Lake Michigan shoreline.
- The Inland Waterway Boundary includes Inland Waterway Corridors, which are select segments of the Chicago River system and select segments of the Little Calumet and Grand Calumet Rivers.

The ICPM was created in January 2012 with Federal approval from the National Oceanic Atmospheric Administration, Office of Ocean, and Coastal Resources Management. The ICMP focuses on the following program areas:

- Invasive species
- Habitat, ecosystems & natural area restoration
- Bio-accumulative toxins
- Sustainable development
- Non-point source pollution
- Data collection
- Public access and recreation
- Economic development

3.8.2 Affected Environment

The coastal zone boundary for the Illinois Coastal Management Program (ICMP) defines the land and water areas that are within the limits of this program. A lakeward coastal zone boundary for Illinois is the Illinois state line in Lake Michigan. This state line borders the open-water areas of Wisconsin on the north, Michigan on the east, and Indiana on the south. Approximately 1,500 square miles of lake and lake bottom are included within this area. The neighboring Lake Michigan states similarly include all the lake and lake bottom within their defined coastal zone boundaries. Illinois defines the coastal zone boundary with a focus strictly on the landscape. Specifically, the boundary is primarily based on the Lake Michigan watershed within Illinois. There is no provision made for political boundaries. However, because of the high degree of altered drainage, river engineering and urban development, some flexibility was required in using the watershed

[36] https://www.dnr.illinois.gov/cmp/Pages/default.aspx

approach. The Morris Municipal Airport is beyond the boundaries of the Illinois Coastal Management Program.

3.8.3 Environmental Consequences

NO ACTION ALTERNATIVE

The No Action Alternative assumes that no new facilities associated with the Proposed Action would be constructed. There would be no impacts to Coastal Zones and Coastal Zone Management Areas under the No Action Alternative.

PROPOSED ACTION

The Proposed Action is beyond the boundaries of the Illinois Coastal Management Program.

3.8.4 Mitigation

The Proposed Action is beyond the boundaries of the Illinois Coastal Management Program and therefore this section is not applicable.

3.9 Farmlands

3.9.1 General

Any airport development action funded under the Airport Improvement Program (AIP) or subject to FAA approval that would permanently convert an existing designated important farmland to a non-agricultural use is subject to FPPA coordination. Typical actions, which could involve such coordination include airside/landside expansion (new or expanded terminal and hangar facilities, new or extended runways and taxiways, airfield lighting, navigational aids, NAVAIDS, etc.); land acquisition for aviation-related use, new or relocated access roadways, remote parking facilities, and rental car lots, and any other actions that would result in important farmland conversion. FPPA does not apply to land already committed to "urban development or water storage" (i.e., airport developed areas), regardless of its importance as defined by NRCS.

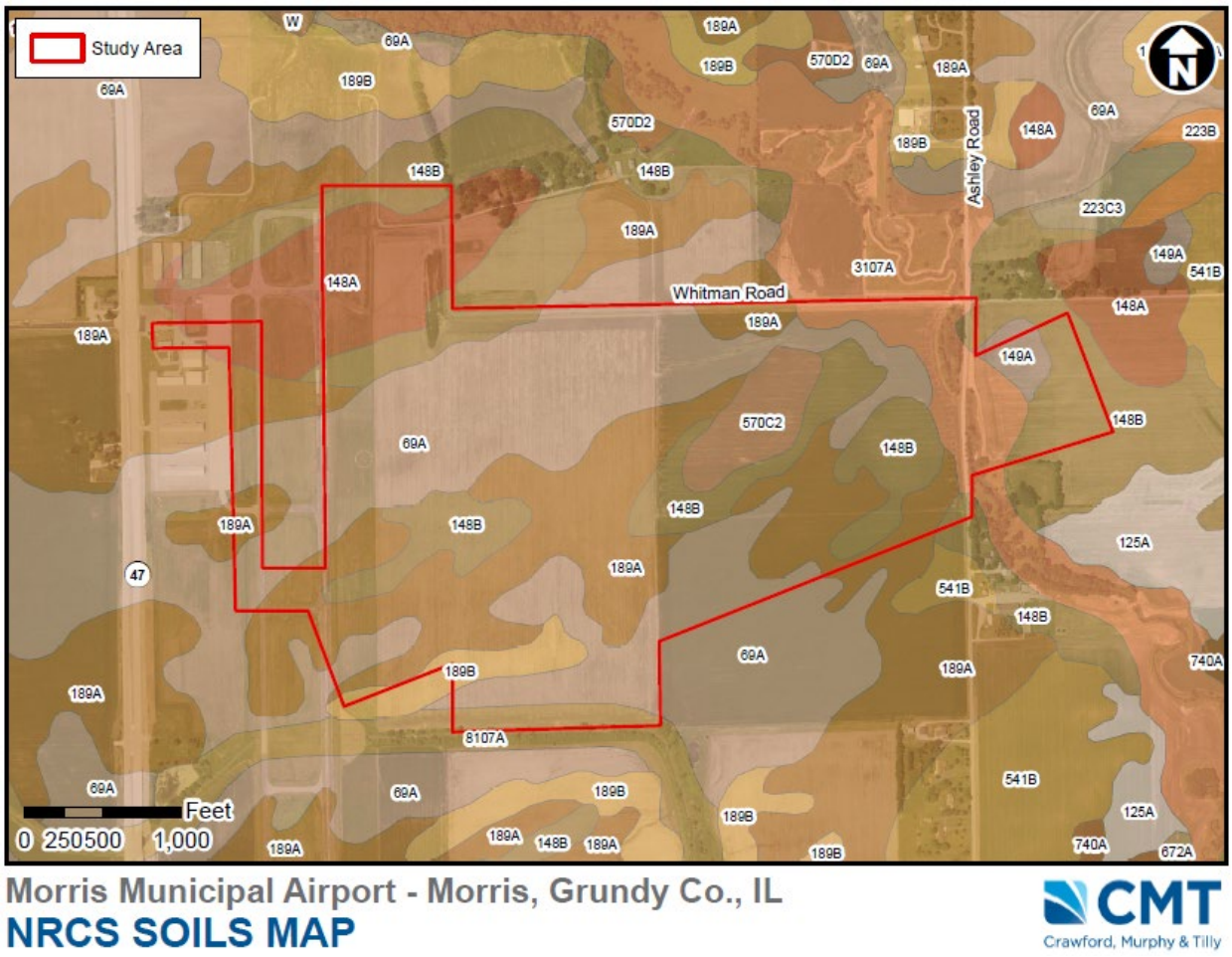
3.9.2 Affected Environment

The Morris Municipal Airport is located approximately 3.0 miles north of Interstate 80 and adjacent to Illinois 47. The Airport is within an agrarian area but is within the corporate limits of the City of Morris. Several large storage buildings are being constructed along Illinois Route 47, including one directly across from the Airport. The Grundy County Soil Survey and hydric soil list indicates the following soils are present within the study area and are depicted on **Figure 3-7**:

- 69A Milford silty clay loam, 0 to 2 percent slopes, hydric
- 148A Proctor silt loam, 0 to 2 percent slopes, not hydric
- 148B Proctor silt loam, 2 to 5 percent slopes, not hydric
- 149A Brenton silt loam, 0 to 2 percent slopes, hydric
- 189A Martinton silt loam, 0 to 2 percent slopes, hydric
- 189B Martinton silt loam, 2 to 4 percent slopes, hydric
- 570C2 Martinsville loam, 4 to 6 percent slopes, eroded, not hydric
- 3107A Sawmill silty clay loam, heavy till plain, 0 to 2 percent slopes, frequently flooded, hydric
- 8107A Sawmill silty clay loam, 0 to 2 percent slopes, occasionally flooded, hydric

NRCS's Farmland Protection Policy Act and its implementing regulations (7 CFR § 657.5) define prime, unique, statewide, and locally important farmlands: Prime farmland is land having the best combination of physical and chemical characteristics for producing food, feed, fiber, forage, oilseed, and other agricultural crops with minimal use of fuel, fertilizer, pesticides, or products.

Figure 3-7: NRCS Soils Map



Unique farmland is land used for producing high-value food and fiber crops. It has the special combination of soil quality, location, growing season, and moisture necessary to produce high quality crops or high yields of crops. Statewide and locally important farmland is land that has been designated as "important" by either a state government (state Secretary of Agriculture or higher office), by county commissioners or by an equivalent elected body. The Federal Farmland Protection Act (FFPA) has delegated to the Illinois Department of Agriculture (IDOA), the responsibilities of promulgating FFPA. Under the Illinois Farmland Act, lands within either the corporate limits of a municipalities or within the 1.5-mile extraterritorial zoning limits of a municipal corporation, conversion of farmland is exempt from FPPA.

3.9.3 Environmental Consequences

NO ACTION ALTERNATIVE

The No Action Alternative assumes that no new land associated with the Proposed Action would be purchased. There would be no impact to Farmlands under the No Action Alternative.

PROPOSED ACTION

The Proposed Action includes the purchase of approximately 179 acres that is in agricultural pursuits. The land is adjacent to the existing Morris Municipal Airport, which is within the corporate limits of the City of Morris. The land is also within the 1.5-mile extraterritorial zoning limits of the City of Morris and is exempt from FFPA.

3.9.4 Mitigation

There are no farmland impacts and therefore there is no mitigation required.

3.10 Historical, Architectural, Archaeological, and Cultural Resources

3.10.1 General

In accordance with FAA *Order 1050.1F, Environmental Impacts: Policies and Procedures*, this EA includes an investigation of impacts due to Federal undertakings upon areas of historic, architectural, archaeological, and cultural significance. The purpose of this section is to document compliance with the *National Historic Preservation Act of 1966* as amended (NHPA) by identifying historic properties within the Area of Potential Effect (APE), including a description of the probable impact of the alternatives under consideration on these resources.

3.10.2 Affected Environment

It is the FAA's responsibility to define the APE in consultation with the SHPO/THPO (see 36 CFR § 800.4(a)). "*The APE is "the geographic area or areas within which an undertaking may directly or indirectly cause alterations in the character or use of historic properties, if any such properties exist. [The APE] is influenced by the scale and nature of an undertaking and may be different for different kinds of effects caused by the undertaking*" (see 36 CFR § 800.16(d)). Note that the APE is delineated based on the undertaking's potential effects, not on the location of historic properties. The APE must include all direct and reasonably foreseeable indirect effects but does not have to be one contiguous area."[37]

The FAA, in consultation with consulting parties, must identify historic properties that are either in, or eligible for listing in, the NRHP as set forth in 36 CFR § 800.4(b). Not all resources are known, and the FAA is expected to make a good faith effort to carry out appropriate identification efforts, which may include background research, consultation, oral history interviews, and field surveys. Identification efforts can vary greatly depending on the scope of 1050.1F Desk Reference (v2) February 2020 Historical, Architectural, Archeological, and Cultural Resources (last updated 2/2020) 8-13 the undertaking and its potential effects. The scope of the undertaking may also help in deciding whether a cultural resources contractor is necessary to assist in properly identifying, documenting, and evaluating historic properties and other cultural resources.

A review of known archaeological resources and land-use patterns and was conducted by the Illinois State Archaeological Survey (ISAS).[38] ISAS is a part of the University of Illinois' Prairie Research Institutes and is under contract with IDOT to conduct surveys statewide. Also included was a *Historic Structures Review* report. The *Historic Structures Review* photographically documented on-airport and off-airport structures that were within the APE. IDOT's "*Photographing Historic Structures: Guidelines and Photo Logs*"[39] report was used in the creation of the *Historic Structures Review* report. See Appendix E -Attachment E-5 - Off-Airport Structure Log and Appendix E - Attachment E-6 - Historic Structures Review-Airport Buildings and Airport Landscaping Views.

The NHPA requires that the Lead Federal agency, FAA, consult with the SHPO. As such, consultation was initiated with the SHPO to inform them of the scope of the undertaking and to

[37] https://www.faa.gov/sites/faa.gov/files/about/office_org/headquarters_offices/apl/8-historical-architectural.pdf
[38] https://www.isas.illinois.edu/
[39] https://idot.illinois.gov/Assets/uploads/files/Transportation-System/Manuals-Guides-&-Handbooks/Highways/Environment/IDOT%20Guidance%20Photographing%20Historic%20Structures.pdf

provide ongoing opportunities for informal and formal review of the project's potential effect on historic resources.

3.10.3 Environmental Consequences

NO ACTION ALTERNATIVE

The No Action Alternative assumes that there would be no construction of any facilities or any ground disturbance beyond those projects that have already received environmental approval and that would occur independent of the Proposed Action. No impacts to archaeological, architectural, historic, or cultural resources would be anticipated under this alternative.

PROPOSED ACTION

Section 106 Findings

IDOT, in coordination with the FAA, has made a finding of "No Adverse Effect." The Illinois State Historic Preservation Officer (SHPO) stated that the project meets the Secretary of the Interior's "*Standards for Rehabilitation and Guidelines for Rehabilitating Historic Buildings*". SHPO also stated they concur in a Finding of No Adverse Effect to properties eligible for the National Register of Historic Places pursuant to 36 CFR 800. These documents are contained in Appendix E.

Tribal Coordination

Submission of the Environmental Survey Request (ESR) submittal to IDOT-BDE, automatically triggered IDOT's Project Notification System (PNS) for tribal notification. PNS is a statewide digital transportation project information distribution system that was created by the Information Technology and Communication Services, College of Agricultural, Consumer and Environmental Sciences and the ISAS at the University of Illinois with the financial support of IDOT. It is designed to facilitate early access to proposed IDOT construction projects by interested parties including tribal representatives, preservation planners, the State Historic Preservation Office, IDOT personnel, and transportation archaeologists. This early notification system is intended to maintain and enhance the efficiency and quality of IDOT's cultural resource investigations, protection, and preservation programs as carried out under state and Federal law and regulations by providing a mechanism for early input by various stakeholders during the initial planning process.

Through the PNS, early notification of proposed projects requiring survey and investigation is relayed to ISAS through the digital conveyance of an Environment Survey Request from the Chief Archaeologist, Environment Section, Bureau of Design and Environment, IDOT, Springfield. These documents contain basic preliminary engineering data on the project. Within 48 hours this information is transferred into a password protected, user-friendly database format. ISAS adds information on the locations of known mortuary sites and prepares maps showing the project location. When this data set is uploaded into the PNS by ISAS's Statewide Survey, an e-mail notification is automatically generated to tribal parties who have expressed an interest in the project or county. This e-mail directs them to the new project information packet and provides a digital mechanism for them to comment on the project and to send questions concerning it directly to IDOT. As additional information on survey results and State Historic Preservation Officer (SHPO) comments are obtained they are also added to the system.

The Morris Municipal Airport Crosswind Runway Program project was distributed and offered for review through the PNS. Tribal parties who have expressed an interest through the PNS in the County of Grundy were offered an opportunity to comment. No Tribal Historic Preservation Officers commented or raised objections to the project.

3.10.4 Mitigation/Commitments

The Illinois State Historic Preservation Officer (SHPO) concurred with the no effect determination on January 12, 2023. Therefore, no mitigation or commitments are required.

3.11 Department of Transportation Section 4(f) Lands

3.11.1 General

Section 4(f) of the *Department of Transportation Act of 1966* (DOT Act) currently codified as 49 USC Section 303(c), [hereinafter referred to as Section 4(f)], provides for the protection of certain publicly owned lands. These lands include public parks, recreation areas, or wildlife and waterfowl refuges of national, state, or local significance. In addition, Section 4(f) applies to all historic sites of national state, or local significance, regardless of whether these sites are publicly owned or open to the public. Typically, Section 4(f) protects only historic or archeological properties that are on, or eligible for inclusion on, the National Register of Historic Places (NRHP).

Programs or projects that are developed with Federal funding or require a Federal action, which adversely affect or use Section 4(f) lands, will not be approved unless there are no prudent and feasible alternatives to their use, and such programs include all planning to minimize harm. An airport development project can create adverse impacts on Section 4(f) lands through acquisition of all or a portion of Section 4(f) land, increased noise impacts, and increased surface traffic impacts.

If it is determined that an action would involve a Section 4(f) resource, then the lead Federal agency, in this case the FAA, is required to prepare a Section 4(f) Evaluation. This evaluation can be included within the NEPA document for that project or issued in a separate document, referred to as a Section 4(f) Evaluation. FAA may also make a *de minimis* impact determination with respect to a physical use of Section 4(f) property if, after considering any measures to minimize harm, the result is either:

- a determination that the project would not adversely affect the activities, features, or attributes qualifying a park, recreation area, or wildlife or waterfowl refuge for protection under Section 4(f); or
- a Section 106 finding of no adverse effect or no historic properties affected.

In addition to lands identified under Section 4(f), other lands funded by the Land and Water Conservation Fund Act of 1966 (LAWCON) (Section 6(f)), Pittman-Robertson and Dingell-Johnson moneys must be considered. When proposed improvements affect lands purchased or developed using LAWCON funds, as administered by the U.S. Department of the Interior (USDOI), changes in use to those lands may only be made with the prior approval of the Secretary of the Interior. Also, converted properties must be replaced by substitute properties of at least equal fair market value and of reasonably equivalent location and usefulness.

3.11.2 Affected Environment

The Proposed Action will purchase privately-owned land that is in active cultivation. The property to be purchased is not considered Section 4(f) property. No known grant funded parks or recreational areas, including those funded with: LAWCON Funds (Land and Water Conservation Fund Act of 1965); Pittman-Robertson (Federal Aid in Wildlife Restoration Act of 1937); or Dingell-Johnson (Federal Aid in Sport Fish Restoration Act of 1950) funds would be affected by the Proposed Action. Further, there are no NRHP-listed or eligible property and no known historic sites or archaeological resources of national, state, or local significance that would be impacted by the Proposed Action. The nearest parks to the Airport are listed in **Table 3-13**.

Table 3-13: Nearest Parks To The Morris Municipal Airport			
Park Name	Owner	Direction From Airport	Distance From Airport
William G. Stratton State Park	IDNR	South	5.25 Miles
Channahon State Park	IDNR	East	9.95 Miles
Chapin Park	City of Morris	South	4.64 Miles
Lions Park	City of Morris	South	4.05 Miles

Source: CMT

3.11.3 Environmental Consequences

NO ACTION ALTERNATIVE

The No Action Alternative would not impact any publicly owned park recreation area, or wildlife or waterfowl refuge of national, state, or local significance, or land of an historic site of national, state, or local significance.

PROPOSED ACTION

The Proposed Action would not impact any publicly owned park recreation area, or wildlife or waterfowl refuge of national, state, or local significance, or land of an historic site of national, state, or local significance.

3.11.4 Mitigation

The No Action Alternative would not impact any publicly owned park recreation area, or wildlife or waterfowl refuge of national, state, or local significance, or land of an historic site of national, state, or local significance. The No Action Alternative would not create any impacts to public lands identified under Section 4(f), including lands funded with LAWCON (Section 6(f)), Pittman-Robertson and Dingell-Johnson moneys, or historic or archeological properties that are on, or eligible for inclusion on, the National Register of Historic Places (NRHP).

The Proposed Action would not impact any publicly owned park recreation area, or wildlife or waterfowl refuge of national, state, or local significance, or land of an historic site of national, state, or local significance. The Proposed Action would not create any impacts to public lands identified under Section 4(f), including lands funded with LAWCON (Section 6(f)), Pittman-Robertson and Dingell-Johnson moneys, or historic or archeological properties that are on, or eligible for inclusion on, the National Register of Historic Places (NRHP). In the Proposed Action scenario, all significant noise contours remain on Airport property. Therefore, the Proposed Action would not require mitigation.

3.12 Biological Resources

3.12.1 General

For purposes of this EA, the term, biological resources, refers to various types of flora and fauna, as well as habitat types that would support these species. This section also addresses Federally listed and state listed threatened or endangered species and their habitats.

The term “endangered species” means any member of the animal kingdom (mammal, fish, or bird) or plant kingdom (seeds, roots, etc.) that is in danger of extinction throughout all or a significant portion of its range. “Threatened species” refers to those members of the animal kingdom or plant kingdom, which are likely to become endangered within the foreseeable future. Section 7 of the *Endangered Species Act of 1973* requires each Federal agency that carries out, permits, licenses, funds, or otherwise authorizes activities that may affect a listed species must

consult with the US Fish and Wildlife Service to ensure that its actions are not likely to jeopardize the continued existence of any listed species.[40]

Further, Paragraph 341 of the *Illinois Endangered Species Protection Act of 1972* requires all agencies of state and local governments to further the purposes of this Act by: *…evaluating whether actions authorized, funded, or carried out by them are likely to jeopardize the continued existence of Illinois listed endangered and threatened species or are likely to result in the destruction or adverse modification of the designated essential habitat of such species, which policy shall be enforceable only by writ of mandamus.*

3.12.2 Affected Environment

FEDERAL STATUS

The project study area was observed for suitable threatened and endangered species habitat. The habitats present were searched for suitability and the presence of species. The known or historic range of federally endangered or threatened species within the study area was determined by reviewing the United States Fish and Wildlife Service (USFWS) Illinois County Distribution of Federally Threatened, Endangered, and Candidate Species dated October 29, 2021, and the USFWS Information for Planning and Consultation (IPaC) species (completed by IDOT BDE) list generated for the project area. The list contains the endangered, threatened, proposed and candidate species and proposed and designated critical habitat that may be present within or in the vicinity of the proposed improvement. The following species are listed: Indiana Bat (Ibat) (Myotis sodalis), Northern long-eared bat (NLEB) (Myotis septentrionalis), Tricolored Bat (Perimyotis subflavus), Salamander mussel (Simpsonaias ambigua), Sheepnose mussel (Plethobasus cyphyus), Scaleshell mussel (Leptodea leptodon) and Eastern prairie fringed orchid (Platanthera leucophaea). No proposed or designated critical habitat is listed.

STATE STATUS

An Environmental Survey Request (ESR) was submitted to IDOT. The results of the ESR are contained in an IDOT memo dated March 19, 2024, contained in Appendix D. Based on consultation with the Illinois Natural Heritage Database, it was determined that there is no record of State-listed threatened or endangered species. The database identified an Illinois Natural Area Inventory Site (INAI), Valley Run which is located in the eastern portions of the project site. No in-stream work will be conducted in Valley Run. Also, there are no dedicated Illinois Nature Preserves, or registered Land and Water reserves in the vicinity of the project location. Consultation under Part 1075 (State Endangered Species Act) was terminated. A Wetland Identification Evaluation (WIE) was submitted and indicated that the project will avoid all wetlands. Consultation under Part 1090 (State Wetland Act) was terminated.

The NLAA Concurrence Verification Letter for the *Programmatic Biological Opinion for Transportation Projects with the Range of the Indiana Bat and Northern Long-eared Bat*, dated October 29, 2021, was issued by USFWS, and is contained in Appendix D - Ecological Resources Report. USFWS provided direction and guidance on Federally, threatened, endangered, proposed and candidate species that could occur within the boundaries of the proposed airport development. Procuring the list from USFWS is the initial step of a potential consultation process under Section 7c of the Endangered Species Act. The official list includes:

- Indiana Bat *Myotis sodalis* (Endangered)
- Northern Long-eared Bat *Myotis septentrionalis* (Threatened)

[40] Section 7(a)(2) of the Endangered Species Act of 1973.

There are no designated critical habitats within the project study area. This includes potential zone for the Rusty Patched Bumble Bee (Bombus affinis). USFWS concurred that the project "may affect, not likely to adversely affect the above referenced species. See letter dated March 18, 2024, in Appendix D.

None of the wetlands had a native FQI score of 20 or greater or a Native Mean C of 3.5 or greater, and therefore Eastern prairie fringed orchid is likely not present. One tree within the study area was identified as a potential roost tree for the northern long eared and Indiana bats was identified. Additional suitable habitat and a wooded riparian corridor was observed along Valley Run and Saratoga Creek within the study area. Valley Run did not exhibit a stable channel with a sand/gravel substrate and good water quality; therefore, it does not provide appropriate habitat for the Scaleshell. No grassland or prairie habitats were observed within the study area; therefore, appropriate habitat for the rattlesnake-master borer moth is not present.

3.12.3 Environmental Consequences

NO ACTION ALTERNATIVE

The No Action Alternative assumes that there would be no construction of any facilities at the airport to address the purpose and need. No impacts to any biological resources would be expected under this alternative.

PROPOSED ACTION

The project study area contains one stream (Valley Run) and one (1) wetland. Wetland A is severely degraded and low quality, located within a stormwater drainage ditch, exhibiting a surface water connection to a Traditionally Navigable Waterways (TNW). The wetland may be federally jurisdictional. Valley Run is a perennial stream of fair habitat quality that ultimately flows to the Illinois River, a TNW.

Wetlands and other surface water resources that are considered waters of the U.S. are subject to regulation under Section 404 of the Clean Water Act (CWA) and the jurisdictional regulatory authority lies with the U.S. Army Corps of Engineers (USACE). In addition, the state of Illinois regulates isolated wetlands through the Interagency Wetland Policy Act (IWPA), and counties, townships and municipalities may have local zoning authority over certain types of wetlands and waterways.

3.12.4 Mitigation, Commitments and/or Conservation Measures

NO ACTION ALTERNATIVE

This alternative is not anticipated to create any significant impacts to biological resources. The Proposed Action has been designed to avoid impacts to the identified endangered species and wetlands and is not anticipated to have significant impacts to any biological resources. Therefore, no mitigation measures are required.

PROPOSED ACTION

Within IPaC there is the NLEB-Ibat determination key. IDOT used the key to determine applicability of the project with the USFWS revised programmatic biological opinion for transportation projects dated 02-02-2023 and to assess what effect the project would have on NLEB or Ibat. IDOT completed an IPaC qualification interview and determined that the project is not within the scope of the programmatic biological opinion. The project has gone through formal consultation and is not likely to adversely affect the NLEB or Ibat provided the following conservation measure(s) are implemented by the project sponsor:

- Trees three (3) inches or greater in diameter at breast height will not be cleared from April 1st through September 30th.
- Coordination with the USFWS has been conducted and it has been determined that 2.2 acres of tree mitigation shall be required.

Tree species suitable for bats shall be planted. Several options are available to accomplish the tree mitigation including:

- Planting trees at local municipal parks
- Planting trees on local conservation property (State, Federal, Other)
- Set up an Intergovernmental Agreement with IDNR Division of Forestry to have trees planted on IDNR property
- USFWS in Lieu Fee programs for Bats

The Airport Sponsor is bound by FAA Grant Assurances to follow the requirements contained in FAA Advisory Circular 150/5200-33C, Hazardous Wildlife Attractants on or near Airports. For airports serving turbine-powered aircraft, which the Airport does accommodate, FAA recommends a separation distance of 10,000 feet from the airport to the hazardous wildlife attractant, in this case the trees. The location of the tree conservation measure will be subject to adherence to the above-referenced Advisory Circular.

3.13 Natural Resources and Energy Supply

3.13.1 General

Sources of energy originate from fossil fuels (coal, oil, gas, etc.), nuclear power (uranium) and renewable elements (wood, sun, wind, water, etc.). Natural resources refer to the various forms of wealth supplied by nature including the sources of energy listed above.

3.13.2 Affected Environment

Demands for energy required to operate facilities at C09 include electricity and natural gas. Electricity is the primary source of energy used to light and cool the airport buildings and related structures. Lighting for runways and navigational aids for aircraft also uses electricity as its energy source. Commonwealth Edison is the major supplier of electricity to the Airport. There are no known gas lines or other major utilities within the project area.

3.13.3 Environmental Consequences

NO ACTION ALTERNATIVE

The No Action Alternative assumes that there would be no construction of any facilities at the airport to address the purpose and need. No impacts to energy supply and natural resources would be expected under the No Action Alternative.

PROPOSED ACTION

During the construction of the Proposed Action, items such as concrete, asphalt, crushed stone, fuel oil, and gasoline would be used. All materials needed for construction may be purchased from area firms or manufacturers who specialize in these materials. The proposed project would not involve the use of any unusual materials or of those in short supply.

The Proposed Action would require small increases in levels of electricity and natural resource consumption during construction and operation; however, these increases would be negligible in nature and not induce any significant impact the surrounding community. The proposed action would result in a minor increase in electrical demand as a result of the additional runway/taxiway pavement lighting associated with the new Runway 7/25. The additional runway lighting would not utilize a significant amount of electrical energy. The minor increased electrical demand associated with the Proposed Action is not considered to be significant to local electrical supply.

The consumption of potable water associated with the project is not expected to differ from the No Action Alternative even with the small increase in aircraft activity. The number of people and passengers moving through the facility after the runway is constructed would increase slightly as

the expected increase in operations between build and no-build. Therefore, no substantial impacts to water supply systems are expected.

Since the new runway would be constructed as part of the Proposed Action, all aircraft will have slightly longer taxi distances versus to today. Aircraft based on the western portion of the airport will be closer to the new runway and will have slightly longer taxi distances. The construction activities associated with the project would also require the use of fuels for construction equipment, asphalt pavements, and the excavation/import of any fill material required. However, the additional fuel consumption associated with construction activities would not result in demands for fuel that would exceed available or future supply capacity. No significant impacts to energy generation or natural resources availability would be anticipated under the Proposed Action.

3.13.4 Mitigation

No significant impacts to energy supply and natural resources in short supply would be expected under the No Action Alternative or the Proposed Action. Therefore, no mitigation would be required.

3.14 Visual Effects

3.14.1 General

FAA *Order 1050.1F Desk Reference*, Section 13, states that *"visual effects deal broadly with the extent to which the proposed action or alternative(s) would either: 1) produce light emissions that create annoyance or interfere with activities; or 2) contrast with, or detract from, the visual resources and/or the visual character of the existing environment."*

3.14.2 Affected Environment

LIGHT EMISSIONS

Light emissions include any light that emanates from a light source into the surrounding environment. Examples of sources of light emissions include airfield and apron flood lighting, navigational aids, terminal lighting, parking facility lighting, roadway lighting, safety lighting on launch pads, additional lighting to support nighttime commercial space launches, and light generated from such launches. Glare is a type of light emission that occurs when light is reflected off a surface (e.g., window glass, solar panels, or reflective building surfaces).

VISUAL RESOURCES AND VISUAL CHARACTER

Visual resources include buildings, sites, traditional cultural properties, and other natural or manmade landscape features that are visually important or have unique characteristics. Visual resources may include structures or objects that obscure or block other landscape features. In addition, visual resources can include the cohesive collection of various individual visual resources that can be viewed at once or in concert from the area surrounding the site of the proposed action or alternative(s). In unique circumstances, the nighttime sky may be considered a visual resource.

Visual character refers to the overall visual makeup of the existing environment where the proposed action and alternative(s) would be located. For example, areas in close proximity to densely populated areas generally have a visual character that could be defined as urban, whereas less developed areas could have a visual character defined by the surrounding landscape features, such as open grass fields, forests, mountains, or deserts, etc.

3.14.3 Environmental Consequences

NO ACTION ALTERNATIVE

The No Action Alternative assumes that there would be no construction of any facilities at the airport to address the purpose and need. No significant changes in the visual character of the project area are anticipated as a result of the No Action Alternative.

PROPOSED ACTION

The Proposed Action includes the construction of crosswind Runway 7/25. The following is a list of items associated with the Proposed Action that will produce light:

- Install Medium Intensity Runway Lights (MIRL) on Crosswind Runway 7/25.
- Install Medium Intensity Taxiway Lights (MITL) on several new taxiways.
- Install Runway End Identifier Lights (REIL) beyond the thresholds of Runway 7/25.
- Install Precision Approach Path Indicators to serve both thresholds of Runway 7/25.

The Proposed Action, located in rural area southwest of the Chicago metropolitan region, is not located in an area valued for “dark skies” and is subject to numerous ambient light sources that are not airport created. The Proposed Action will produce light emissions very similar to the existing airport operation.

3.14.4 Mitigation

The No Action Alternative assumes that there would be no construction of any facilities at the Airport to address the purpose and need. No visual impacts would be expected under this alternative. The FAA has not identified a level of significance threshold for visual effects. There are no special purpose laws or requirements for visual effects. No mitigation is required.

3.15 Hazardous Materials, Solid Waste, and Pollution Prevention

3.15.1 General

Hazardous Waste is a general term relating to spills, dumping, and releases of substances that could threaten human and animal life. To identify these materials and protect the environment from harmful interaction with hazardous wastes, Federal laws and regulations have been enacted, including the following: *Comprehensive Environmental Response, Compensation and Liability Act* (CERCLA) and the *Resource Conservation and Recovery Act* (RCRA). CERCLA prescribes a very specific process for the investigation and cleanup of sites listed on the National Priorities List (NPL), also referred to as Superfund sites. RCRA is the public law that creates the framework for the proper management of hazardous and non-hazardous solid waste. As a method of protection for the citizens of the State of Illinois, several state laws and reporting regulations have also been passed including the *Illinois Environmental Protection Act*, State Priority List, Leaking Underground Storage Tank (LUST) List, and the Underground Storage Tank (UST) Facilities List.

Hazardous waste impacts are typically associated with the current or future use, transfer, or generation of hazardous material within the limits of the proposed improvements or the acquisition of properties that contain hazardous materials. Environmental concerns related to solid waste disposal range from adequate landfills for normal urban trash and garbage to the safe disposal of industrial waste.

3.15.2 Affected Environment

A review of on-line environmental databases was conducted to identify sites and facilities located in the proposed project areas that may be of environmental concern from both site contamination

and a NEPA perspective. The review included various on-line databases maintained by the USEPA.[41]

The National Priorities List (NPL) contains the most serious uncontrolled or abandoned hazardous waste sites throughout the United States. Based on a review of available on-line resources, the nearest site to C09 is the now closed Republic Services Environtech Landfill just east of Morris. The nearest active landfill is located at the Livingston Landfill near Pontiac, Illinois. The RCRA on-line database lists facilities that store, generate, transport, treat, and dispose of hazardous wastes. This database records facilities that generate large or small quantities of hazardous wastes or are conditionally exempt generators. Reviewing the RCRA on-line database there do not appear to be any sites listed.

3.15.3 Environmental Consequences

NO ACTION ALTERNATIVE

The No Action Alternative assumes that there would be no construction of facilities at the Airport beyond those projects that have already received environmental approval and that would occur independent of the Proposed Action. No hazardous waste or solid waste impacts are expected under this alternative.

PROPOSED ACTION

Based upon the review of Federal and State environmental regulatory agency databases and the observations recorded during a field inspection of the project area, no areas of concern show the potential to encounter hazardous materials or contaminated subsurface media within the proposed construction area. All proposed land acquisition would undergo Phase I Environmental Due Diligence Audits, pursuant to FAA Order 1050.19C, before the property is acquired fee simple.

Solid waste generated from the operation of the C09 would increase slightly due to future growth; however, levels of additional daily waste because of the proposed improvements are not expected to be significant. Solid waste would be generated from the construction of the proposed runway and taxiway improvements; however, waste would be transported and disposed of as directed by the appropriate authorities. Typically, solid waste generated by airfield facilities (runways, taxiways, and ramps) is not significant. A review of the 2020 Illinois Landfill Disposal Capacity Report[42] indicated that any solid waste generated from construction is not anticipated to create capacity problems at the local landfill. Presently the landfill has a life expectancy of 19.6 years.

C09 currently uses a variety of hazardous materials, such as vehicle and aviation fuels and solvents, which could be released to the environment from a spill, ground support equipment accident, etc. The Airport addresses pollution prevention through stormwater management, proper storage and handling of hazardous materials, and best management practices for maintenance activities. C09 currently has an approved NPDES general permit and an airport-wide Storm Water Pollution Prevention Plan (SWPPP). During design, there would be a construction specific SWPPP that would be completed and approved prior to construction.

3.15.4 Mitigation

Neither the Proposed Action nor the No Action Alternative would be anticipated to create any significant solid or hazardous waste impacts. Therefore, no mitigation measures would be required.

[41] https://www.epa.gov/nepa/nepassist
[42] https://www2.illinois.gov/epa/topics/waste-management/landfills/landfill-capacity/Documents/landfill-capacity-report-2020.pdf

Chapter Four

Agency and Citizen Coordination

4.1 Introduction

FAA Order 1050.1F, *Environmental Impacts: Policies and Procedures*, states that: *"NEPA and the CEQ Regulations, in describing the public involvement process, require Federal agencies to consider environmental information in their decision-making process; solicit appropriate information from the public; fully assess and disclose potential environmental impacts resulting from the proposed action and alternatives; and provide the public with this information and allow it to comment on these findings."*

4.2 Scoping

In preparing an EA, FAA can solicit input from the public and Federal, State and Local resource agencies through a scoping process. For this EA, letters were sent on March 30, 2023, to potential **Cooperating agencies**. **Cooperating Agencies** are Federal, state, or local municipal entities that may have jurisdiction by law and/or possess special expertise with respect to one or more environmental resources that could be impacted by the Proposed Action. Many of these agencies have been a source of data in the preparation of this document. Cooperating Agencies that were contacted by FAA are listed below:

- US Environmental Protection Agency (EPA)
- US Federal Emergency Management Agency (FEMA)
- US DOT, Federal Highways Administration (FHWA)
- US DOI, Fish and Wildlife Service (USFWS)
- US Army, Corps of Engineers (USACE)
- Illinois Department of Natural Resources (IDNR)
- Illinois Environmental Protection Agency (IEPA)

Two Agencies formally declined participation as **Cooperating Agencies**, USFWS and USCOE. All other contacted agencies did not respond. The City of Morris notified all **Landowners** within the Study Area of the proposed development on June 20, 2022. Copies of all scoping documents are contained in Appendix F.

4.3 Public Involvement

The primary method of public involvement and solicitation of comments is through the Public Hearing process. A 30-day Notice for a Public Hearing was placed into the **Morris Herald-News**, a secular newspaper of general circulation in the Morris and Grundy County area. A copy of the Public Hearing Notice is included in **Appendix F.**

A Public Hearing and co-located Airport Open House was jointly held on March 5, 2024, from 10:00AM to 12:00PM Central Time in the City of Morris' Municipal Services Building located at 700 North Division Street, Morris, IL. The facility is compliant with the Americans With Disabilities Act (ADA). Representatives from the Airport and the preparers of the Draft Environmental Assessment were available to answer questions from the public at the Airport Open House. Verbal and written comments for the public record were recorded in the Public Hearing room. A Public Hearing Officer officiated the public hearing and a court reporter took verbal testimony from the Public. A complete public hearing transcript and responses to comments received during the Public Hearing process is included in **Appendix F**.

During the 30-day public hearing notice period and for 15 days following the Public Hearing, the Draft Environmental Assessment was made available to the public for review at the following public locations, during normal business hours:

Morris Municipal Airport
9980 North Route 47
Morris, IL 60450

City of Morris
700 North Division Street
Morris IL 60450

The Draft Environmental Assessment was also made available for review and download on the Airport's website: https://morrisil.org/morris-airport/. The public was given the options to provide comments verbally or in writing at the Public Hearing and/or provide written comments after the Public Hearing at the following address.

Airport Environmental Assessment Comments
Morris Municipal Airport
9980 North Route 47
Morris, IL 60450

Comments for the Public Record were required to be received by Close of Business, 5:00PM, March 22, 2024, at the Airport's physical address listed above. All comments received and associated responses are incorporated into Appendix F.

Chapter Five

Mitigation, Commitments and Conservation Measures

5.1 Introduction

As defined in the CEQ Regulations at 40 CFR § 1508.20, mitigation includes avoiding the impact; minimizing the impact; rectifying the impact by repairing, rehabilitating, or restoring the environment; reducing or eliminating the impact over time by preservation and maintenance operations during the life of the action; and compensating for the impact by replacing or providing substitute resources.

Mitigation and other conditions described in an FAA NEPA document and "*committed to*" in an FAA approval action, must be implemented and/or monitored by the FAA or another appropriate entity that has committed to implementing and/or monitoring mitigation.[43] Proposed changes in, or deletion of, a mitigation measure that was included as a condition of approval of the final EIS must be reviewed by the same FAA Line of Business that reviewed the final NEPA document and be approved and signed by the approving official. The FAA ensures implementation of such mitigation measures through special conditions, funding agreements, contract specifications, directives, other review or implementation procedures, and other appropriate follow-up actions in accordance with 40 CFR § 1505.3, CEQ Regulations.

5.2 Commitments

The following are the commitments that will be implemented as part of the Proposed Action, if approved.

1. Trees three (3) inches or greater in diameter at breast height will not be cleared from April 1st through September 30th.
2. Coordination with the USFWS has been conducted and it has been determined that 2.2 acres of tree mitigation shall be required.

[43] FAA Order 1050.1F, "Environmental Impacts: Policies and Procedures.

Chapter Six

References and Document Preparers

6.1 Reference Documents

The following is a list of some of the advisory circulars, orders, and guidance documents used in the preparation of the EA.

- 14 CFR Part 139.337. Wildlife Hazard Management.
- 14 CFR Part 151. Federal Aid to Airports.
- 14 CFR Part 152. Airport Aid Program.
- 14 CFR, Part 157. Notice of Construction, Alteration, Activation and Deactivation of Airports.
- 33 CFR Part 328. Definitions of Waters of the US.
- 40 CFR Part 122.26. Storm Water Discharges. (applicable to State NPDES Programs, see §123.25.
- 40 CFR 1502.22. Incomplete or unavailable information.
- 40 CFR Part 1508.7. Cumulative impact.
- 40 CFR § 50. National Primary and Secondary Ambient Air Quality Standards
- 20 Illinois Compiled Statutes (ILCS) 830/1-1, et seq. The Interagency Wetland Policy Act of 1989.
- 415 Illinois Compiled Statutes (ILCS) 5/. Environmental Protection Act.
- 520 Illinois Compiled Statutes (ILCS) 10/1, et seq. Illinois Endangered Species Protection Act.
- 16 U.S.C. 470(f), et seq. The National Historic Preservation Act (NHPA) of 1966. (P.L. 102-575, as amended through 1992).
- 16 U.S.C. 661-667e. March 10, 1934. Fish and Wildlife Coordination Act of 1934.
- 16 U.S.C. App. 2151, 2153-56, et seq. December 28, 1973. Endangered Species Act of 1973. (P.L. 93-205, amended in 1978).
- 33 U.S.C. 1251-1377. Clean Water Act (CWA) of 1977. (P.L. 95-217 amended by the Federal Water Pollution Control Act of 2002, P.L. 107-303).
- 42 U.S.C. 4321, et seq. The National Environmental Policy Act (NEPA), 1969. (P.L. 91-190).
- 42 U.S.C. 4341. Council on Environmental Quality (CEQ) Regulations. (Section 1502.14d).
- 42 U.S.C. 4601 et seq. January 2, 1971. Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970. (P.L. 91-646 amended by the Surface Transportation and Uniform Relocation Act Amendments of 1987, P.L. 100-117).
- 42 U.S.C. 6901-6992k. The Resource Conservation and Recovery Act (RCRA) of 1976.
- 42 U.S.C. 7401 et. seq. December 31, 1970. The Clean Air Act of 1970. (P.L. 91-604).
- 54 U.S.C. Ch. 2003: Land and Water Conservation Fund.
- Department of Transportation (DOT) Act of 1966, Section 4(f) was amended and codified in 49 U.S.C. Section 303(c).
- Department of Transportation (DOT). May 2, 2012. Order 5610.2a, Environmental Justice in Minority Populations and Low-Income Populations.
- Department of Transportation (DOT). April 23, 1979. Order 5650.2, Floodplain Management and Protection.
- Executive Order 11988. May 24, 1977. Floodplain Management.
- Executive Order 11990. May 24, 1977. Protection of Wetlands.
- Executive Order 12372. July 14, 1982. Intergovernmental Review of Federal Programs.
- Executive Order 12898. February 11, 1994. Federal Actions to Address Environmental Justice in Minority Population and Low-Income Populations.

- Executive Order 13045. April 21, 1997. Protection of Children from Environmental Health Risks and Safety Risks.
- Federal Aviation Act of 1958, (P.L. 85-726) [Recodified at 49 U.S.C. – "Aviation Programs," § 40101 et seq.]
- Federal Aviation Administration (FAA) Land Acquisition and Relocation Assistance for Airport Improvement Program Assisted Projects, Advisory Circular 5100-17, Change 7, July 10, 2017.Federal Aviation Administration (FAA) Land Acquisition and Relocation Assistance for Airport Projects, FAA Order 5100.37B, August 1, 2005.
- Federal Aviation Administration (FAA). April 28, 2006. Order 5050.4B, National Environmental Policy Act (NEPA) Implementing Instructions for Airport Actions.
- Federal Aviation Administration (FAA). August 28, 2007. Advisory Circular 150/5200-33B, Hazardous Wildlife Attractants on or near Airports.
- Federal Aviation Administration (FAA). December 21, 2018. Advisory Circular 150/5370-10H, Standards for Specifying Construction of Airports.
- Federal Aviation Administration (FAA). Effective July 16, 2015. Order 1050.1F, Environmental Impacts: Policies and Procedures.
- Federal Aviation Administration (FAA). October 5, 2018. FAA Reauthorization Act of 2018 (Public Law (P.L.) 115-254).
- Federal Emergency Management Agency (FEMA). National Flood Insurance Program.
- Illinois Department of Transportation (IDOT). Division of Aeronautics. April 1, 2012. Standard Specifications for Construction of Airports.
- Intergovernmental Panel on Climate Change, Climate Change 2014 Synthesis Report.
- U.S. Census, American Community Survey, 2013-2017 5-Year Period Estimate.
- U.S. Census, 2020 Decennial Census, DEC ReCitying Data.
- U.S. Environmental Protection Agency (USEPA). March 2016. Promising Practices for EJ Methodologies in NEPA Reviews.

6.2 Document Preparers

Crawford, Murphy & Tilly, Inc. prepared the C09 EA for Chamlin Associates on behalf of the City of Morris. The following from Crawford, Murphy & Tilly, Inc. prepared text and exhibits: Heather Lacey, Alexandra Zelles, Jennifer Miller, Derek Snyder, Boyd Nowicki (Exhibits); and Terry Schaddel.

6.3 List of Abbreviations

ABBREVIATIONS	
ACEIT	Airport Construction Emissions Inventory Tool
AEDT	Aviation Environmental Design Tool
AIP	Airport Improvement Program
ALP	Airport Layout Plan
AOA	Airport Operating Area
APE	Area of Potential Effect
ARC	Airport Reference Code
BDE	IDOT Bureau of Design and Environment
C09	Morris Municipal Airport
CAA	Clean Air Act
CAEP	Committee on Aviation Environmental Protection
CAGR	Compound Annual Growth Rate
CBIA	Coastal Barrier Improvement Act
CBRA	Coastal Barrier Resources Act

ABBREVIATIONS	
CEQ	President's Council on Environmental Quality
CERCLA	Comprehensive Environmental Response, Compensation and Liability Act
CIP	Capital Improvement Program
CO	Carbon Monoxide
CWA	Clean Water Act of 1970
CZMA	Coastal Zone Management Act
DNL	Day-Night Noise Level
DOT	US Department of Transportation
EA	Environmental Assessment
FAA	Federal Aviation Administration
FAR	Federal Aviation Regulations
FEMA	Federal Emergency Management Agency
FFPA	Federal Farmland Protection Act
FHWA	US DOT, Federal Highways Administration
FQI	Floristic Quality Index
GHG	Green House Gases
ICAO	International Civil Aviation Organization
ICMP	Illinois Coastal Management Program
IDNR	Illinois Department of Natural Resources
IDOA	Illinois Department of Agriculture
IDOT	Illinois Department of Transportation
IEPA	Illinois Environmental Protection Agency
IPCC	Intergovernmental Panel on Climate Change
LAWCON	Land and Water Conservation Fund Act of 1966
MIRL	Medium Intensity Runway Lights
MITL	Medium Intensity Taxiway Lights
NAAQS	National Ambient Air Quality Standards
NEPA	National Environmental Policy Act of 1970
NFIP	National Flood Insurance Program
NHPA	National Historic Preservation Act of 1966
NO_2	Nitrogen Dioxide
NOAA	National Oceanic and Atmospheric Administration
NPDES	National Pollution Discharge Elimination System
NPL	National Priorities List
NRCS	Natural Resources Conservation Service
O_3	Ozone
OHWM	Ordinary High-Water Mark
OPA	Otherwise Protected Areas
OWR	IDNR-Office of Water Resources
PAPI	Precision Approach Path Indicator Lights
Pb	Lead
PM	Particulate Matter
PNS	IDOT Project Notification System
RCRA	Resource Conservation and Recovery Act
REIL	Runway End Identifier Lights
SHPO	State Historic Preservation Officer
SIP	State Implementation Plan

ABBREVIATIONS	
SO_2	Sulfur Dioxide
SWPPP	Storm Water Pollution Prevention Plan
THPO	Tribal Historic Preservation Officer
TNW	Traditional Navigable Waters
USACE	US Army Corps of Engineers
USDOI	US Department of the Interior
USEPA	US Environmental Protection Agency
USFWS	US Fish and Wildlife Service
USGCRP	United States Global Change Research Program
WIE	Wetland Impact Evaluation

APPENDIX A

Forecast Working Paper

Morris Municipal Airport

PREPARED BY CMT, INC FOR CHAMLIN & ASSOCIATES

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INTRODUCTION

The Morris Municipal Airport (C09 or Airport) is located in Grundy County Illinois, 62 miles southwest of the Chicago Metropolitan area. C09 is listed in the Federal Aviation Administration's (FAA) National Plan of Integrated Airport Systems (NPIAS) as a local, public use, general aviation (GA) airport. The Airport is owned and operated by the City of Morris (City or Sponsor), which is located within the Chicago-Naperville-Joliet Metropolitan Statistical Area. C09 provides general aviation and corporate aviation services to the surrounding communities.

Airport staff have received user input and complaints that the existing runway alignment at C09 does not adequately provide sufficient crosswind capabilities for the majority of its users. During times of aircraft crosswind components being exceeded, planes have had to divert to other airports. These diversions have a direct impact on the aircraft user and the Airport. The approved Airport Layout Plan (ALP) depicts a crosswind runway that would alleviate these crosswind constraints and provide additional wind coverage to landing aircraft. While it is not anticipated that a crosswind runway would generate a large amount of additional aircraft operations, it will generate new flight patterns, which would require environmental evaluation.

One of the preliminary stages of developing a new crosswind runway requires an airport environmental review process, known as an Environmental Assessment (EA). The EA, which follows the prescribed guidance within the National Environmental Policy Act (NEPA), provides FAA a report that will be used to evaluate potential environmental impacts of constructing a crosswind runway at C09. A forecast of aeronautical activity is required to determine if the project will develop any noise or air quality impact.

This Forecast Working Paper (FWP) will serve as the foundation of the noise and air quality analysis of the EA. The FWP will review and forecast aircraft operations, based aircraft, and fleet mix, as well as identify the critical aircraft.

PURPOSE AND NEED

C09 is a single runway airport; Runway 18-36 has a length of 5,501-feet and a width of 75-feet. Runway 18-36 has a non-precision RNAV (GPS) instrument approach procedure to both runway ends, as well as a VOR approach procedure. There are seven T-hangars and two community hangars on the Airport. There are 59 based aircraft at C09, comprising of 56 piston aircraft, one turbo-prop aircraft, one jet aircraft, and one helicopter[1].

The majority of aircraft operations and based aircraft at C09 are conducted by Aircraft Approach Category (AAC) and Airplane Design Group (ADG) A-I and B-I aircraft. These types of aircraft are subject to a 10.5-knot crosswind component. This means that when the crosswind component (wind direction and speed) is exceeded, the aircraft cannot land or depart.

FAA Advisory Circular 150/5300-13A (AC 13A), *Airport Design*, Change 1, Appendix 2 Wind Analysis, Paragraph 302(c)(3) states: *"A crosswind runway is recommended when the primary runway orientation*

[1] National Based Aircraft Inventory (NBAI)

provides less than 95.0 percent wind coverage." **Table 1** lists the results from the wind analysis conducted in December 2021 utilizing the FAA approved wind analysis tool, which shows that existing Runway 18-36 does not provide sufficient wind coverage (95%).

Table 1: C09 Wind Analysis

Runway	All Weather			IFR		
	10.5 Knots	13.0 Knots	16.0 Knots	10.5 Knots	13.0 Knots	16.0 Knots
Runway 18/36	89.97%	93.59%	97.13%	91.18%	94.44%	97.78%

Source: FAA Airport Data and Information Portal (ADIP)

FORECAST FOR NEPA

A forecast of aeronautical activity is required for the NEPA process. Unlike a forecast for an airport master plan, a forecast for NEPA purposes will allow an environmental analysis to be completed to determine the effects of a project on the environment. As previously stated, the projections made within this FWP will be used in the EA to analyze environmental impacts regarding aircraft noise and air quality. An analysis of the existing condition will compare the environmental impacts of a "build" versus "no build" scenario. Each comparison will evaluate the impact of aircraft operations at a +5-year horizon under both a "build" and "no build" scenario. Under the "build" scenario, the developed crosswind runway project would create different flight patterns and increase aircraft operations. Therefore, an analysis to evaluate environmental review for an additional runway is needed. Conversely, environmental resource impacts will also be evaluated under the "no build" scenario, which evaluates impacts if the crosswind runway project was not developed.

This FWP will review existing aircraft operations categorized by AAC and ADG, forecast future annual operations and based aircraft under the "build" and "no build" scenarios, and define a critical aircraft for a potential crosswind runway based on FAA guidance.

FORECAST PROCESS

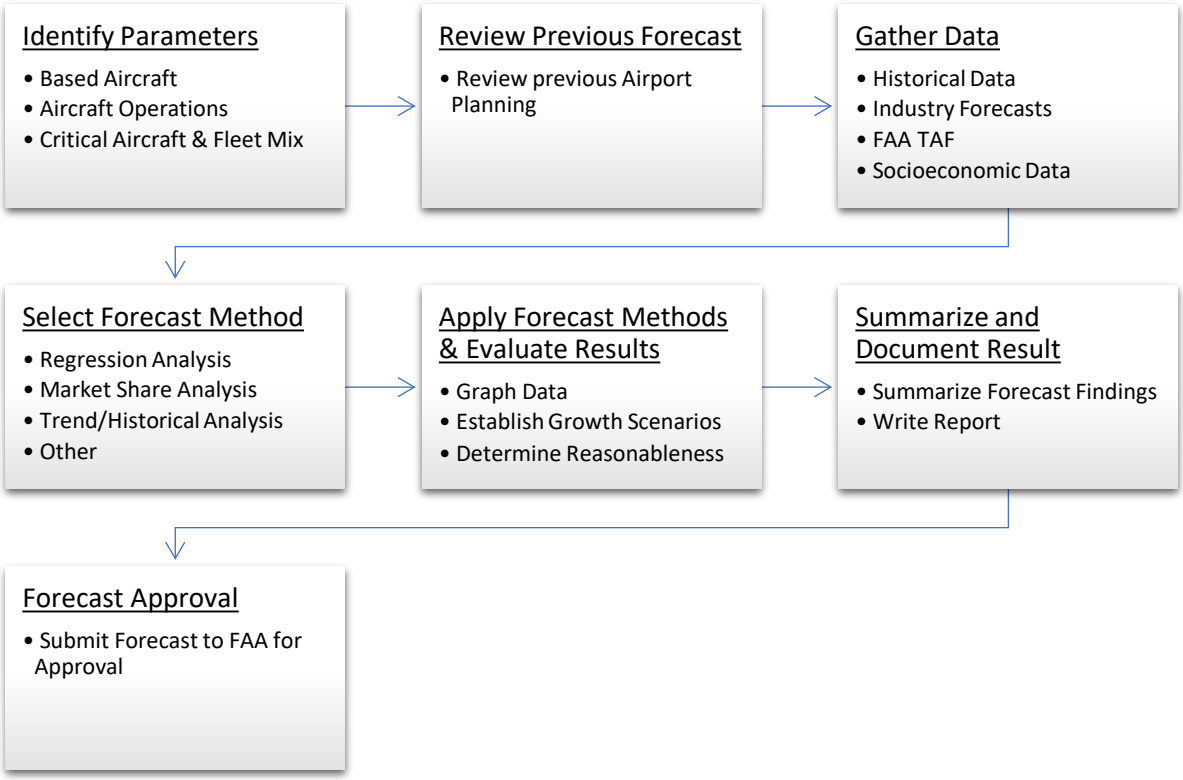
Whether the forecast of aeronautical activity will be used for a master plan or NEPA action, many of the elements of the forecast development process remain the same. The forecast process used in this FWP is based on guidance from FAA AC 150-5070-6B (AC 6B), *Airport Master Plans* Change 2 and FAA's Office of Aviation Policy and Plans 2001 report *Forecasting Aviation Activity by Airport* to identify the key components and steps used in the forecasting process. Two accepted philosophies on aviation forecasting include:

1. That aviation activity itself and the use of historical performance trends are alone sufficient to project future activity.

2. That economic, social, and technological factors are presumed to influence future aviation demand.

A balanced approach between the two philosophies is needed when creating the forecast. Irrespective of the approach used in a forecast, the size of the airport or scope of the study, the framework, or process, is often the same. **Figure 1** depicts a flowchart that lists the entire forecasting development process.

Figure 1: The Forecast Process



Source: Forecasting Aviation Activity by Airport Report

FACTORS AFFECTING DEMAND

Forecasting activities at an airport requires analyzing data at all levels (local, state, and national). FAA AC 6B states some of the factors that go into the analysis of the forecast include:

- Economic Characteristics
- Demographic Characteristics
- Income
- Aviation Related Factors

Currently, the most apparent factor affecting demand across most industries, is the global COVID-19 pandemic. While the impacts of the pandemic are certainly taking a toll on aviation, certain sectors of aviation have actually experienced growth during the pandemic. In addition to COVID-19, there are also local, national, and global factors that could also affect aeronautical activity at C09.

COVID-19

The COVID-19 global pandemic has impacted the aviation industry around the world. Nearly all facets of the aviation industry have experienced unprecedented operational and economic impacts from COVID-19 beginning in early 2020. While the outbreak of COVID-19 slowly began spreading across the world throughout January and February of 2020 it was not until March 2020 that the United States saw a sharp increase in the total number of confirmed COVID-19 cases. The impacts of the COVID-19 pandemic have been exhibited differently from aviation sector to sector, and from one airport to another. Airports that rely completely on commercial passenger traffic in non-leisure destinations have been impacted the most, while many general aviation airports have had minimal to no impact in activity. Some have even experienced significant growth.

When evaluating economic indicators at the time of global crises over the past few decades COVID-19 is unique in it's time the economy has taken to rebound. While still in the middle of the recovery cycle of the global pandemic, indicators such as the unemployment rate spiked at the initial onset of the pandemic, but sharply decreased, trending down to pre-COVID-19 levels. Another indicator that can measure how the United States is progressing through the recovery cycle is the housing market. The housing market has been on the rise prior to COVID-19, however, over the past 12-months (summer 2020 through summer 2021) the housing market has experienced exponential growth. It is not uncommon to have houses on the market for single digit day durations. Additionally, price per square foot growth has accelerated during the pandemic. Comparatively, looking back to events such as September 11, 2001, and the Great Recession of 2008-2009, the time it took the economy to recover was slow and drawn out over several years. Within the COVID-19 pandemic timeline, there have been "blips" for when confirmed cases and deaths have spiked, and the economy has reacted differently to each spike. Initial spikes experienced longer recovery times while the economy has responded quite differently to more recent spikes. Much of this is likely due to the rollout of the vaccines. There is still much to learn on how long the overall recovery period will take and how the economy will respond if there are any future setbacks or spikes.

National Influences

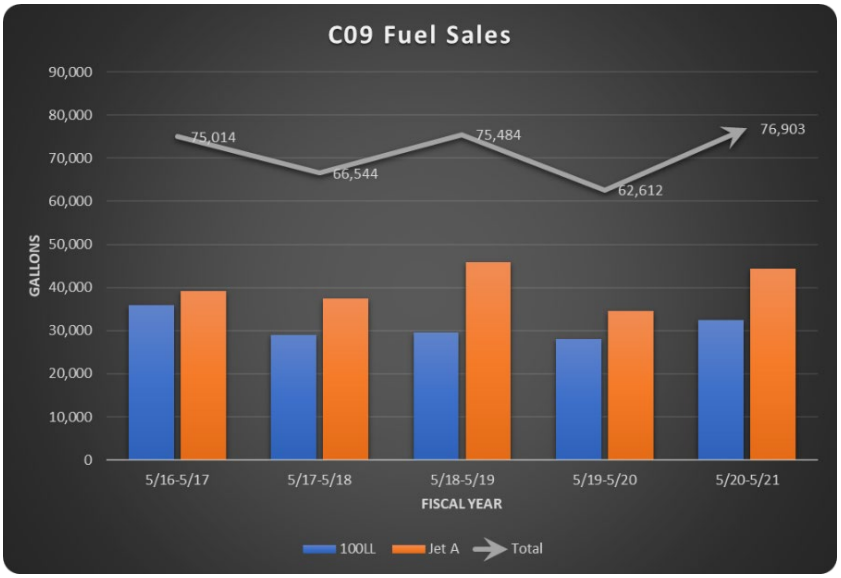
Historically, the performance of the aviation industry has similarly followed the trend of the U.S. economy. Gross Domestic Product (GDP) is a widely accepted measurement of a nation's economy. The FAA Aerospace Forecast for Fiscal Years 2021-2041 presents a forecast showing U.S. GDP growth of 2.4% Compound Annual Growth Rate (CAGR) over the planning period. This GDP forecast appears to represent a healthy economic outlook over the planning period. However, due to the occurrence of COVID-19, it is expected that a slower GDP growth will occur, which will affect the growth of the aviation sector.

In addition to the national economy's influence on the aviation industry, the pilot shortage in the U.S. could also potentially effect aviation across the country (this effect will not likely be as significant as expected due to COVID-19). Industry and trade group's publications, forecasts and outlooks have nearly all referred to and acknowledged the pilot shortage in the U.S. It is unknown the level of impact this will have on U.S. aviation. Additionally, any new or modified regulatory policies could further impact the aviation industry.

Local Influence

A good measure of a local economy includes a review of economic and socioeconomic indicators. As of this report writing, data that included 2021 was not available from the paid economic reporting resources. Therefore, alternative indicators were evaluated. A true indicator, at nearly any airport, that could be used to measure the overall aeronautical health of an airport is fuel sales. Five fiscal years of fuel sales records from C09 are depicted in **Figure 2**. As shown, from May 2020 through May 2021, fuel sales have surpassed any of the prior year's fuel sales. This fiscal year represents the height of the COVID-19 pandemic and suggests that aeronautical activity at C09 has increased throughout the pandemic.

Figure 2: C09 Historic Fuel Sales



Source: Morris Municipal Airport

GENERAL AVIATION OPERATIONS FORECAST

To determine the environmental noise and air quality impacts of comparing the "build" and "no build" scenarios, it is necessary to analyze and project aircraft operations for both scenarios. This section will examine the various resources used for analyzing and projecting the aircraft operations forecast. Additionally, an itinerant and local operations forecast will be projected. While the planning horizon for the FWP is 20 years, the projections shown in this report will reflect the needs of the NEPA documentation, which evaluate environmental impacts at the +5-year horizon.

Historical Activity

Forecasting aeronautical activity at an airport should include a review of historical data and previous forecasts. There are no known locally prepared forecasts to review. However, FAA Terminal Area Forecast (TAF) and FAA Traffic Flow Management System Counts (TFMSC) were evaluated regarding historical data.

The Terminal Area Forecast (TAF) is the official FAA forecast of aviation activity for U.S. airports. It contains active airports in the NPIAS including FAA-towered airports, Federal contract-towered airports, non-

federal towered airports, and non-towered airports. Forecasts are prepared for major users of the National Airspace System including air carrier, air taxi/commuter, general aviation, and military. The forecasts are prepared to meet the budget and planning needs of the FAA and provide information for use by state and local authorities, the aviation industry, and the public.[2]

The most recently published TAF is shown in **Table 2**. Depicted is a 20-year historical activity measure as well as FAA's 20-year future projections at C09. As shown, all 20-year future projections, as well as the past 13-years of historical data, show the same number of operations in each category year over year.

[2] FAA Website, Aviation Forecasts - *Terminal Area Forecast (TAF),* www.FAA.gov

Table 2: FAA Terminal Area Forecast

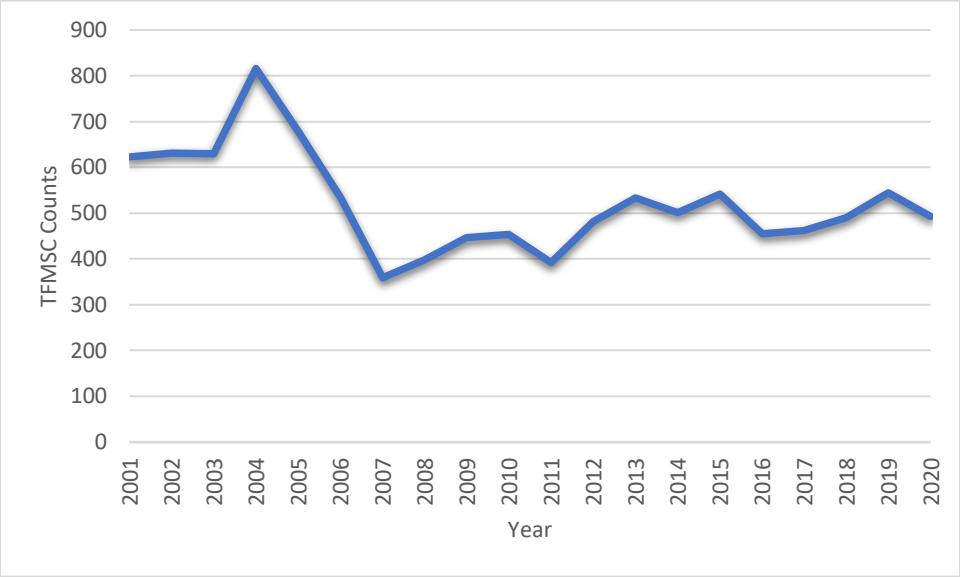
	Itinerant Operations					Local Operations			
Fiscal Year	Air Carrier	Air Taxi & Commuter	GA	Military	Total	Civil	Military	Total	Total
2001	0	1,000	25,100	300	26,400	21,000	0	21,000	47,400
2002	0	1,224	22,041	367	23,632	18,367	0	18,367	41,999
2003	0	1,224	22,041	367	23,632	18,367	0	18,367	41,999
2004	0	1,224	22,041	367	23,632	18,367	0	18,367	41,999
2005	0	1,224	22,041	367	23,632	18,367	0	18,367	41,999
2006	0	1,224	22,041	367	23,632	18,367	0	18,367	41,999
2007	0	1,224	22,041	367	23,632	18,367	0	18,367	41,999
2008	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2009	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2010	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2011	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2012	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2013	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2014	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2015	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2016	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2017	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2018	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2019	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2020*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2021*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2022*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2023*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2024*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2025*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2026*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2027*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2028*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2029*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2030*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2031*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2032*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2033*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2034*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2035*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2036*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2037*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2038*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2039*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2040*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300
2041*	0	1,000	22,000	300	23,300	19,000	0	19,000	42,300

Source: FAA TAF, Issued May 2021

FAA's TFMSC is designed to provide information on traffic counts by airport or by city pair for various data groupings such as aircraft type or by hour of the day. It includes data for flights that fly under Instrument Flight Rules (IFR) and are captured by the FAA's enroute computers. Most VFR and some non-enroute IFR traffic are excluded[3].

TFMSC data is generally a good measure of IFR traffic counts at an airport. **Figure 3** shows the TFMSC traffic counts that are published on FAA's Operations and Performance website.

Figure 3: FAA Historical TFMSC Data



Source: FAA TFMSC (2021)

Establishing Baseline Year

The proposed forecast of aeronautical activity at C09 will evaluate the "build" and "no build" scenarios. As previously stated, under the "build" scenario, aircraft operations are not anticipated to greatly increase, rather, continue to grow at the rate of the "no build" scenario and also be able to accommodate aircraft operations that would normally not have been able to land due to exceeding aircraft crosswind components.

These forecast projections are predicated on utilizing the year 2021 as the baseline year. To establish a baseline in the year 2021, a sample of the most recent aircraft operations data was used to develop annual operations counts. To facilitate establishing a baseline year activity count, this forecast utilized General Audio Recording Device (GARD) data to determine actual operations numbers. In 2020, the State of Illinois Department of Transportation (IDOT) installed a GARD system at C09 to capture aircraft operations counts. The most recent available data at the time of this writing was March, April, and May of 2021. The GARD data for C09 indicated there were 3,952 operations over this three-month span. This

[3] FAA Operations & Performance Website; TFMSC

three-month sample data was assumed to be a representation of quarterly operations counts and was extrapolated to ascertain the baseline year 2021 of having 15,808 annual aircraft operations.

With the annual aircraft operations defined for 2021, a further breakdown of the data was completed to determine the number of Visual Flight Rules (VFR) and IFR operations. FAA's TFMSC data was obtained for the same months as the GARD data to determine the IFR traffic counts. During March, April, and May of 2021, the TFMSC data showed there to be 600 IFR operations at C09. Therefore, the baseline year identified a total of 15,808 aircraft operations, 15,208 of which were conducted by VFR operations and 600 by IFR operations. This revealed a large discrepancy in the number of annual aircraft operations reported by the FAA TAF (42,300 operations).

It should be noted that while this FWP was under review by IDOT, additional GARD data become available and was provided by IDOT. The additional data was analyzed and found to be consistent with the sample of GARD data that was used to establish the baseline year operations count.

No Build Scenario Forecast

The "no build" forecast scenario used an FAA accepted methodology known as a market share analysis. In a market share analysis, local forecasts are a market share (percentage) of a larger aggregate forecast. Historical market shares are calculated and used as a basis for projecting future market shares.

In efforts to make this forecast as practical as possible, the market share analysis only evaluated airports of similar size and category as C09 for the larger "aggregate." Using the FAA NPIAS, airports within the state of Illinois that were publicly owned, whose role was identified by NPIAS as "local" and were further categorized as "GA" were obtained from the TAF. This resulted in obtaining historical and forecasted data from the TAF for 36 airports within Illinois. The 36 airports included:

06C 1C5 1H2 1H8 2H0 3LF 3MY AJG C09 C15 C56 C73 C75 CTK CUL DKB DNV ENL EZI FEP GBG GRE HSB IJX IKK JOT LWV MQB MVN OLY PJY PNT RPJ RSV SAR SQI

The TAF data showed, that on average, over the past 10-years that C09 accommodated 5.6% of all 36 airport's total operations. This market share percentage was assumed to remain constant and was applied to the 36 airports collective operations projections. The growth rate established in the market share analysis was then applied to the 2021 baseline year operations counts (15,808), rather than apply it to the TAF's 2021 operations count (42,300). This yielded a 0.26% Compounded Annual Growth Rate (CAGR) When this CAGR was applied to the 2021 baseline year starting point of the forecast (15,808) it resulted in 16,015 operations in the +5-year horizon of the forecast. This projection constitutes the "no build" scenario, and the projections are shown in **Table 3**.

Table 3: No Build Scenario, +5 Year Projections

Horizon	Year	Operations
Baseline	2021	15,808
+1	2022	15,849
+2	2023	15,890
+3	2024	15,932
+4	2025	15,973
+5	2026	16,015
	CAGR	**0.26%**

Source: CMT Analysis (2021)

Build Scenario Forecast

The "build" scenario forecast assumes that a crosswind runway will be developed at C09. As previously stated, this development is not anticipated to generate significant additional operations, but rather accommodate aircraft that would not be able to utilize the primary Runway 18/36 during high wind conditions when an aircraft's crosswind component is exceeded.

The "build" scenario was assembled using the "no build" scenario as the foundation and layering in additional operations that otherwise potentially would have not been able to use C09 due to wind conditions. The results from the wind analysis conducted in 2021 were used to approximate the percent of time each specific AAC and ADG of each aircraft would be unable to use Runway 18/36. The percent of time an operation was unable to use Runway 18/36 was assumed to be able to be accommodated by the crosswind runway.

This yielded a 0.72% CAGR over the 20-Year forecast period and resulted in 17,605 operations in the +5-year horizon of the forecast. This projection constitutes the "no build" scenario, and the projections are shown in **Table 4**.

Table 4: Build Scenario, +5 Year Projections

Horizon	Year	Operations
Baseline	2021	15,808
+1	2022	17,369
+2	2023	17,468
+3	2024	17,514
+4	2025	17,559
+5	2026	17,605
	CAGR [1]	**0.72%**

[1] *CAGR represents 20-year growth rate*

Source: CMT Analysis (2021)

Itinerant vs. Local Forecast

To determine the ratio of local to itinerant operations at C09, existing operational fleet mix data and TFMSC data was analyzed. The analysis indicated that approximately 80-percent of total operations at C09 were itinerant, and 20-percent were local. Based on information obtained through discussions with Airport staff, it is assumed that this ration is likely to continue into the future in both the "build" and "no build" scenarios. Therefore, this average was applied to the baseline projections. **Table 5** presents the itinerant and local operations mix for both the "build" and "no build" scenarios.

Table 5: Itinerant vs Local Projections

Year	No Build			Build		
	Itinerant	Local	Total	Itinerant	Local	Total
2021 *(Existing)*	12,646	3,162	15,808	12,646	3,162	15,808
2022 *(+1)*	12,679	3,170	15,849	13,895	3,474	17,369
2023 *(+2)*	12,712	3,178	15,890	13,975	3,494	17,468
2024 *(+3)*	12,745	3,186	15,932	14,011	3,503	17,514
2025 *(+4)*	12,778	3,195	15,973	14,048	3,512	17,559
2026 *(+5)*	12,812	3,203	16,015	14,084	3,521	17,605

Source: CMT Analysis (2021)

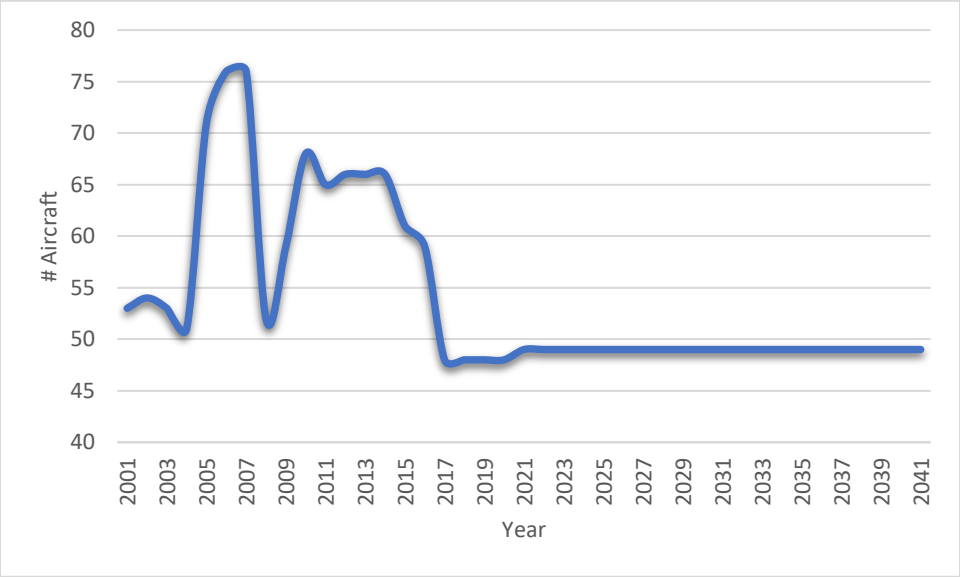
GENERAL AVIATION BASED AIRCRAFT FORECAST

While the count of based aircraft alone does not create an environmental impact, the operations performed by the based aircraft do. Therefore, for the purposes of NEPA evaluation, a based aircraft forecast was also developed.

Historical Activity

Forecasting aeronautical activity at an airport should include a review of historical data and previous forecasts. There are no known locally prepared forecasts to review. The only available data that shows historical based aircraft counts is the FAA TAF. **Figure 4** depicts the based aircraft counts as recorded on the FAA's May 2021 TAF. It should be noted that projected based aircraft counts remain constant at 49 based aircraft.

Figure 4 Historical & Projected C09 Based Aircraft (TAF)



Source: FAA TAF Issued May 2021

Establishing Baseline Year

To establish a baseline year for based aircraft counts the National Based Aircraft Inventory (NBAI), was utilized. According to the "Validated" based aircraft count, C09 has 59 based aircraft, categorized as 56 Piston, one Turbo Prop, one Jet and one Helicopter based at C09. This represents an additional 10 aircraft from what is shown on the May 2021 TAF (which shows 49 based aircraft). For the purposes of this based aircraft forecast the NBAI based aircraft numbers will be used.

Forecast Scenarios

The aircraft operations forecast developed growth rates for the "build" and "no build" scenarios. For the based aircraft forecast it is assumed that the based aircraft counts will remain unchanged in both scenarios. Therefore, the based aircraft forecast will be the same in both the "build" and "no build" scenarios.

The based aircraft forecast used the same market share methodology as the operations forecast. Rather than determine the C09 historical market share of aircraft operations, the percentage of based aircraft of the larger aggregate (same 36 airports) was determined using the FAA TAF. Historically, C09 accommodated 4.0%, 4.1%, 4.7%, and 4.4% of the 36 airport's based aircraft at the 3, 5, 10 and 20-year thresholds, respectively. These percentages were applied to the TAF's based aircraft forecast, and it was determined that the 5-year average growth rate most realistically mirrored current based aircraft counts at C09. Using the 5-year average of 4.5% of future shares, this yielded a CAGR of 0.41% and 64 based aircraft at the 20-year planning horizon. **Table 6** shows the based aircraft projections at the +5-year planning horizon (applicable to both the "build" and "no build" scenarios).

Table 6: Build Scenario, +5 Year Projections

Horizon	Year	Based Aircraft
Baseline	2021	59
+1	2022	59
+2	2023	59
+3	2024	59
+4	2025	60
+5	2026	60
	CAGR	**0.41%**

Source: CMT Analysis (2021)

Based Aircraft Fleet Mix Forecast

The based aircraft fleet mix forecast identifies the type of aircraft that are projected to be based at C09 over the planning period. Discussion with Airport staff indicates that there is no reason to assume a change in the fleet mix over the planning period. Therefore, the existing fleet mix percentage is assumed to remain constant. **Table 7** presents the based aircraft fleet mix forecast.

Table 7: Based Aircraft Fleet Mix, +5 Year Projections

Horizon	Year	Piston	Turbo Prop	Jet	Helicopter	TOTAL
Baseline	2021	56	1	1	1	59
+1	2022	56	1	1	1	59
+2	2023	56	1	1	1	59
+3	2024	56	1	1	1	59
+4	2025	57	1	1	1	60
+5	2026	57	1	1	1	60

Source: CMT Analysis (2021)

CRITICAL AIRCRAFT

An important element of any aviation demand forecast is the determination of the appropriate level of facility planning needed to accommodate existing and anticipated aviation demand. This is accomplished by identifying the most demanding aircraft, or grouping of aircraft, that makes regular use of an airport, known as the critical aircraft. Regular use is defined by the FAA as 500 annual operations.

As part of the NEPA analysis, it is necessary to project runway utilization by aircraft type, by time of day, and by operation type (arrival or departure). Additionally, this projection is required for both the “build” and “no build” scenarios. A summary of these operations projections, grouped by the number of AAC and ADG, is shown in **Table 8**, which can then be used to determine the critical aircraft of the runways, in both scenarios.

Table 8: Operations By AAC & ADG

AAC	ADG	Baseline Year	No Build (+5)	Build (+5)	
		Runway 18/36	Runway 18/36	Runway 18/36	Runway 7/25
A	I	13,958	14,142	11,669	3,890
B	I	133	134	11	37
B	II Sm	1,504	1,524	1,257	419
B	II	181	183	143	48
C	II	32	32	25	8
Total Operations		**15,808**	**16,015**	**13,204**	**4,401**

Red text indicates regular use threshold (500 operations) exceeded by highest AAC/ADG
Source: CMT Analysis (2021).

The operations data was further evaluated and identified an aircraft, for each runway and scenario, that exceeded the 500 annual operation thresholds. The critical aircraft that exceeded 500 annual operations for each runway and scenario is presented in **Table 9.** As shown in the table, Runway 18/36 remains a B-II Small critical aircraft in all scenarios (existing, "build" and "no build") with the Aerotractor AT-602 exceeding 500 operations and being the critical aircraft. In the "build" scenario, the critical aircraft for Runway 7/25 would be the Cessna C-172.

Table 9: Critical Aircraft Identification

Scenario	Existing	No Build	Build	
Runway	Runway 18/36	Runway 18/36	Runway 18/36	Runway 7/25
AAC/ADG	B-II small	B-II small	B-II small	A-I
Critical AC	Aerotractor AT-602	Aerotractor AT-602	Aerotractor AT-602	Cessna 172
Annual Ops	1,488	1,507	1,244	3,112

Source: CMT Analysis (2021)

FORECAST SUMMARY

Table 10 presents a summary of the operations and based aircraft projections at the +5-year planning horizon that were developed for this FWP.

Table 10: FWP Summary

Year	Aircraft Operations - No Build			Aircraft Operations - Build		
	Itinerant	Local	Total	Itinerant	Local	Total
2021 (Existing)	12,646	3,162	15,808	12,646	3,162	15,808
2022 (+1)	12,679	3,170	15,849	13,895	3,474	17,369
2023 (+2)	12,712	3,178	15,890	13,975	3,494	17,468
2024 (+3)	12,745	3,186	15,932	14,011	3,503	17,514
2025 (+4)	12,778	3,195	15,973	14,048	3,512	17,559
2026 (+5)	12,812	3,203	16,015	14,084	3,521	17,605
		CAGR	**0.26%**		**CAGR [1]**	**0.72%**

[1] CAGR represents 20-year growth rate

Year	Based Aircraft[1]				
	Piston	Turbo Prop	Jet	Helicopter	TOTAL
2021 (Existing)	56	1	1	1	59
2022 (+1)	56	1	1	1	59
2023 (+2)	56	1	1	1	59
2024 (+3)	56	1	1	1	59
2025 (+4)	57	1	1	1	60
2026 (+5)	57	1	1	1	60
				CAGR	**0.41%**

[1] *Based aircraft forecast is the same for both the "build" and "no build" scenarios.*

Runway	Critical Aircraft		
	Existing	No Build	Build
18/36	Air Tractor AT- 602 B-II Small *(MTOW 12,500 lbs)*	Air Tractor AT- 602 B-II Small *(MTOW 12,500 lbs)*	Air Tractor AT- 602 B-II Small *(MTOW 12,500 lbs)*
7/25	N/A	N/A	Cessna C172 - A-I *(MTOW 2,550 lbs)*

Source: CMT Analysis (2021)

APPENDIX B

AEDT NOISE REPORT

Morris Municipal Airport-James R. Washburn Field

Abstract

Documentation of Input Parameters for C09's Environmental Assessment's Aircraft Noise Assessment for Construction of a Crosswind Runway
May 24, 2022

MORRIS, ILLINOIS

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INTRODUCTION

A requirement of the National Environmental Policy Act (NEPA), for Federally funded programs, is to examine all facets of potential impacts caused by a Sponsor's Proposed Action. In determining impacts associated with airport improvements, the Federal Aviation Administration (FAA) has prepared two main guidance documents. FAA Order 1050.1F - Environmental Impacts: Policies and Procedures and FAA Order 5050.4B - NEPA Implementing Instructions For Airport Actions. These documents provide guidance in preparing environmental reviews and include specific direction on the assessment of potential aircraft noise impacts. To provide a more consistent review of airport improvement projects as they may impact noise, FAA has authored the Aviation Environmental Design Tool (AEDT). As noted on the AEDT website:

> *"AEDT is a software system that models aircraft performance in space and time to estimate fuel consumption, emissions, noise, and air quality consequences. AEDT is a comprehensive tool that provides information to FAA stakeholders on each of these specific environmental impacts. AEDT facilitates environmental review activities required under NEPA by consolidating the modeling of these environmental impacts in a single tool."*

The aircraft noise analysis for the assessment of a proposed crosswind runway at Morris Municipal Airport - James R. Washburn Field (C09) was developed using AEDT Version 3d, the version of the computer model when the noise analysis was initiated. Since that time, the FAA released Version 3e of AEDT. A review of the release notes with update to the model indicates that the aircraft noise results prepared with Version 3e would be the same as those prepared with Version 3d (i.e., there were no updates to the database of information for C09 or the aircraft operating or forecast to operate at the airport). Numerous input parameters are needed to execute the AEDT model. Airport configuration, aircraft operations by type, frequency and time of day all are used in the model. This report will define the input parameters used in this analysis and the noise exposure results.

NOISE METRICS

Sound is energy transferred through the air that our ears detect as small changes in air pressure. The more energy put into making a sound, the louder it will be. Noise is sound that is unwanted. Some sounds, like a distant train whistle, can be a pleasant sound for some, while being considered noise by others. Other sounds, like a neighbor's barking dog in the middle of the night, are more universally found to be annoying. Even sounds that are pleasant at one volume can become noise to us as they get louder. Noise, then, has both an objective, physical component; as well as a subjective component that takes account of a person's individual perception, or reaction, to a sound. The decibel (dB) is the unit used to measure the intensity of a sound.[1]

The human ear hears sound pressures over a wide range. Decibels, which are measured on a *logarithmic* scale, correspond to the way our ears interpret sound pressure levels. The human ear also responds to different pitches or frequencies of sound differently. We are less able to hear low frequencies like the rumble of thunder but hear high frequencies like the cry of a baby more strongly. To account for differences in how people respond to sound, the "A-weighted" scale (dBA) is used. This scale most closely approximates the relative loudness of sounds in air as perceived by the human ear and provides a more useful way to evaluate the effect of noise exposure on humans by focusing on those parts of the frequency

[1] Selected Reprint of https://www.faa.gov/regulations_policies/policy_guidance/noise/basics/

spectrum where we hear most. The A-weighted sound level has been adopted by the FAA as the accepted measure to consider aircraft noise.

The day-night average sound level (DNL) noise metric is used to reflect a person's cumulative exposure to sound over a 24-hour period, expressed as the noise level for the average day of the year on the basis of annual aircraft operations. The DNL noise metric provides a mechanism to describe the effects of environmental noise in a simple and uniform way. DNL is the standard noise metric used for all FAA studies of aviation noise exposure in airport communities. DNL considers both the amount of noise from each aircraft operation as well as the total number of operations throughout the day. The FAA, and other federal agencies, use DNL as the primary measure of noise impact because: it correlates well with the results of attitudinal surveys regarding noise; and it accounts for an increased sensitivity to noise at night by increasing each noise event that occurs during nighttime hours (i.e., 10:00 pm to 6:59 am) by 10 dBA.

Noise levels can be computed at individual locations of interest, but to show how noise can vary over extended areas, noise metric results like DNL are often drawn on maps in terms of lines connecting points of the same decibel (dBA). Similar to topographical maps showing the elevation of terrain in an area, these noise "contours" are useful for comparing aircraft noise exposure throughout an airport community. The shape of noise contours depends on many factors but are influenced by things like whether more arriving or departing aircraft are flying over an area.

FAA NOISE COMPATIBLE LAND USE GUIDELINES

The FAA has created guidelines regarding the compatibility of land uses with various aircraft noise levels measured using the DNL metric. These guidelines are defined in Appendix A to Title 14, Part 150 of the Code of Federal Regulations (14 CFR 150). The land use compatibility table from 14 CFR 150 is reproduced in **Table 1**. These guidelines show the compatibility parameters for residential, public (schools, churches, nursing homes, hospitals, and libraries), commercial, institutional, and recreational land uses. All land uses exposed to aircraft noise levels less than DNL 65 dB are considered compatible with airport operations.

Table 1 - FAA Land Use Compatibility Guidelines

Land Use	Yearly Day Night Average Sound Level (DNL) In Decibels					
	Below 65	65-70	70-75	75-80	80-85	Over 85
Residential						
Residential, other than mobile homes and transient lodgings	Y	N[(1)]	N[(1)]	N	N	N
Mobile home parks	Y	N	N	N	N	N
Transient lodgings	Y	N[(1)]	N[(1)]	N	N	N
Public Use						
Schools	Y	N[(1)]	N[(1)]	N	N	N
Hospitals and Nursing Homes	Y	25	30	N	N	N
Churches, Auditoriums and Concert Halls	Y	25	30	N	N	N
Government Services	Y	Y	25	30	N	N
Transportation	Y	Y	Y[(2)]	Y[(3)]	Y[(4)]	Y[(4)]
Parking	Y	Y	Y[(2)]	Y[(3)]	Y[(4)]	N
Commercial Use						
Offices, Businesses and Professional	Y	Y	25	30	N	N

Table 1 - FAA Land Use Compatibility Guidelines						
Land Use	Yearly Day Night Average Sound Level (DNL) In Decibels					
	Below 65	65-70	70-75	75-80	80-85	Over 85
Wholesale and Retail – Building Materials, Hardware and Farm Equipment	Y	Y	Y(2)	Y(3)	Y(4)	N
Retail Trade - General	Y	Y	25	30	N	N
Utilities	Y	Y	Y(2)	Y(3)	Y(4)	N
Communications	Y	Y	25	30	N	N
Manufacturing and Production						
Manufacturing, General	Y	Y	Y(2)	Y(3)	Y(4)	N
Photographic and Optical	Y	Y	25	30	N	N
Agricultural (except livestock) and Forestry	Y	Y(6)	Y(7)	Y(8)	Y(8)	Y(8)
Livestock farming and breeding	Y	Y(6)	Y(7)	N	N	N
Mining and Fishing, Resource Production and Extraction	Y	Y	Y	Y	Y	Y
Recreational						
Outdoor Sports Arenas and Spectator Sports	Y	Y(5)	Y(5)	N	N	N
Outdoor Music Shells, Amphitheaters	Y	N	N	N	N	N
Nature Exhibits and Zoos	Y	Y	N	N	N	N
Amusements, Parks, Resorts and Camps	Y	Y	Y	N	N	N
Golf Courses, Riding Stables and Water Recreation	Y	Y	25	30	N	N

(1) Where the community determines that residential or school uses must be allowed, measures to achieve outdoor to indoor Noise Level Reduction (NLR) of at least 25 dB and 30 dB should be incorporated into building codes and be considered in individual approvals. Normal residential construction can be expected to provide a NLR of 20 dB, thus, the reduction requirements are often stated as 5, 10 or 15 dB over standard construction and normally assume mechanical ventilation and closed windows year-round. However, the use of NLR criteria will not eliminate outdoor noise problems.

(2) Measures to achieve NLR 25 dB must be incorporated into the design and construction of portions of these buildings where the public is received, office areas, noise sensitive areas or where the normal noise level is low.

(3) Measures to achieve NLR of 30 dB must be incorporated into the design and construction of portions of these buildings where the public is received, office areas, noise sensitive areas or where the normal noise level is low.

(4) Measures to achieve NLR 35 dB must be incorporated into the design and construction of portions of these buildings where the public is received, office areas, noise sensitive areas or where the normal level is low.

(5) Land use compatible provided special sound reinforcement systems are installed.

(6) Residential buildings require an NLR of 25.

(7) Residential buildings require an NLR of 30.

(8) Residential buildings not permitted.

Notes:

1. The designations contained in this table do not constitute a Federal determination that any use of land covered by the program is acceptable under Federal, State, or local law. The responsibility for determining the acceptable and permissible land uses and the relationship between specific properties and specific noise contours rests with the local authorities. FAA determinations under Part 150 are not intended to substitute federally determined land uses for those determined to be appropriate by local authorities in response to locally determined needs and values in achieving noise compatible land uses.
2. SLUCM=Standard Land Use Coding Manual.
3. Y (Yes)=Land Use and related structures compatible without restrictions.
4. N (No)=Land Use and related structures are not compatible and should be prohibited.
5. NLR=Noise Level Reduction (outdoor to indoor) to be achieved through incorporation of noise attenuation into the design and construction of the structure.
6. 25, 30, or 35=Land use and related structures generally compatible; measures to achieve NLR of 25, 30, or 35 dB must be incorporated into design and construction of structure.

Source: 14 C.F.R. § 150 Airport Noise Compatibility Planning, Appendix A, Table 1.

METHODOLOGY

Existing (2021) Condition

Runway Definition

Currently, C09 has one runway, Runway 18/36. **Table 2** provides the dimensions of the runway and **Exhibit 1** depicts the current Airport Layout and the Sponsor's Proposed Action.

Table 2 - Airfield Runway Dimensions - Existing (2021) Condition

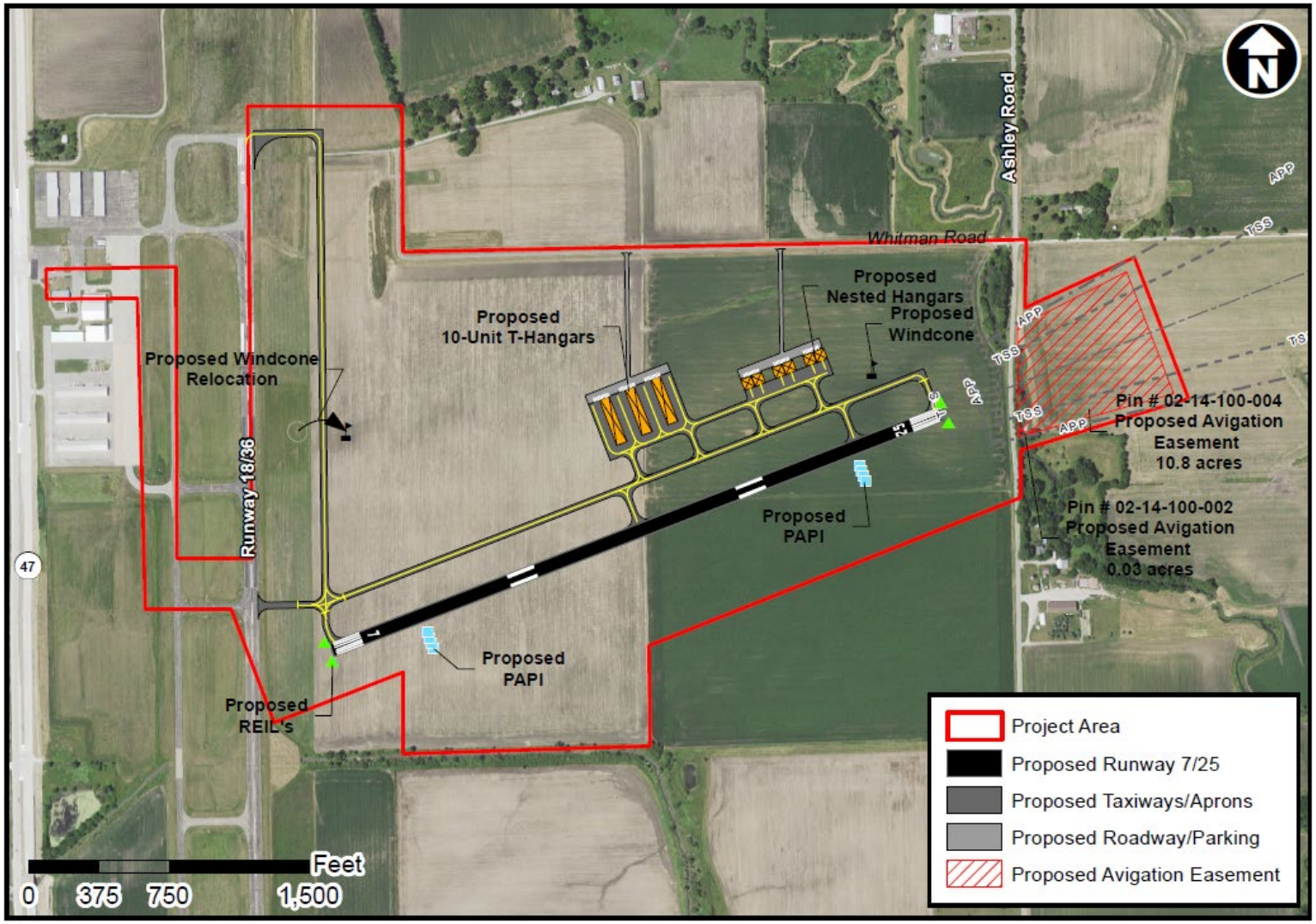
Runway Numerals	Runway Length (ft)	Runway Width (ft)
18/36	5,501	75

Source: CMT 2021.

Number of Operations and Fleet Mix

To calculate the DNL contours for C09, the average number of daily arrivals and departures by aircraft type was prepared for input into the AEDT. Aircraft operations information was collected from the Airport's General Audio Recording Device (GARD) for the most recent three-month period of March-May of 2021. This three-month period was assumed to be representative of an average quarter and the yearly operation totals were extrapolated from the quarterly total. The FAA TAF was used to establish the split of IFR and VRF operations for the same three-month period. Comparison of the data revealed a large delta between the total operations recorded by the GARD and the FAA's TAF. To resolve this additional GARD data was obtained from the airport and it was found to compare favorably to the original three-month survey period, therefore establishing the accuracy of the GARD operations counts. Data was queried for C09 for the period of calendar Year 2021. This was the most recent operational data available at the time modeling started. The modeled Existing (2021) Condition annual operations are 15,808. **Table 3** shows the average daily operations by aircraft type. Appendix A references full name of aircraft type.

Exhibit 1 - Airport Layout/Sponsor's Proposed Action



Source: CMT 2022.

Table 3 - Average Daily Operations by Aircraft Type - Existing (2021) Condition						
Aircraft Category	Aircraft Type	Arrivals		Departures		Total Operations
		Daytime	Nighttime	Daytime	Nighttime	
Jet	Cessna Citation CJ3	0.084	0.009	0.084	0.009	0.187
	Cessna Citation CJ4	0.042	0.005	0.042	0.005	0.094
	Cessna Citation Excel	0.013	0.001	0.013	0.001	0.029
	Cessna Citation Mustang	0.013	0.001	0.013	0.001	0.029
	Eclipse 500	0.013	0.001	0.013	0.001	0.029
Turboprop	Ayres Corporation S2R-G6	0.949	0.105	0.949	0.105	2.109
	Socata TBM9	0.015	0.002	0.015	0.002	0.033
	Beechcraft Super King Air 200	0.010	0.001	0.010	0.001	0.022
	Beechcraft Super King Air 350	0.005	0.001	0.005	0.001	0.011
	Cessna 414 Chancellor	0.005	0.001	0.005	0.001	0.011
Piston	Cessna 172 Skyhawk	7.762	0.862	7.762	0.862	17.249
	Van's Aircraft RV-8	0.267	0.030	0.267	0.030	0.594
	Bellanca 8KCAB	0.191	0.021	0.191	0.021	0.424
	Piper PA-28-180 Cherokee	0.191	0.021	0.191	0.021	0.424
	Aviat Aircraft Pitts S-2B	0.153	0.017	0.153	0.017	0.339
Rotor	Robinson Helicopter R44 II	0.032	0.004	0.032	0.004	0.072
Total Operations		9.745	1.082	9.745	1.082	21.654

Notes: Daytime Hours = 07:00AM to 09:59PM. Nighttime Hours = 10:00PM to 06:59AM.; Data Sources: TFMSC, OPSNET, CMT 2021. Due to rounding, total operations by aircraft type may not tally exactly

Runway End Utilization

The average annual daily runway use for each aircraft type during day and night periods at C09 is provided in **Table 4.**

Table 4 - Runway End Utilization - Existing (2021) Condition			
Operation Category	**Aircraft Category**	**Runway End Percent Usage**	
		Runway 18	**Runway 36**
Daytime Arrivals	Jets	75.0%	25.0%
	Turboprops	75.0%	25.0%
	Props	75.0%	25.0%
Nighttime Arrivals	Jets	75.0%	25.0%
	Turboprops	75.0%	25.0%
	Props	75.0%	25.0%
Daytime Departures	Jets	75.0%	25.0%
	Turboprops	75.0%	25.0%
	Props	75.0%	25.0%
Nighttime Departures	Jets	75.0%	25.0%
	Turboprops	75.0%	25.0%
	Props	75.0%	25.0%

Notes: Daytime Hours = 07:00AM to 09:59PM. Nighttime Hours = 10:00PM to 06:59AM
Source: CMT 2022.

Flight Tracks

The Existing (2021) Condition flight tracks utilized by itinerant departure operations were modeled with all fixed wing aircraft (jets, turboprops, and props) following a straight-out path from the runway. All fixed wing aircraft arrivals were also modeled flying a straight-in path to the runway. Presently, Runways 18, and 36 have a standard airport left-hand traffic pattern. **Table 5** provides the modeled departure flight track utilization percentages. **Exhibits 2 and 3** illustrate the Existing (2021) Condition and Future (2026) No Action Alternative modeled flight tracks.

Table 5 – Departure Flight Track Utilization – Existing (2021) Condition

Runway End	Track ID	Jets	Turboprops	Props	Helicopters
18	DEFAULT_18_D	100%	100%	100%	0%
36	DEFAULT_36_D	100%	100%	100%	0%
H1	H1_Dep	0%	0%	0%	100%

Source: CMT 2022.

Exhibit 2 - Existing (2021) and Future (2026) No Action Modeled Flight Tracks – North Flow

Source: CMT 2022.

Exhibit 3 - Existing (2021) and Future (2026) No Action Modeled Flight Tracks – South Flow

Source: CMT 2022.

Existing Noise Exposure Contour

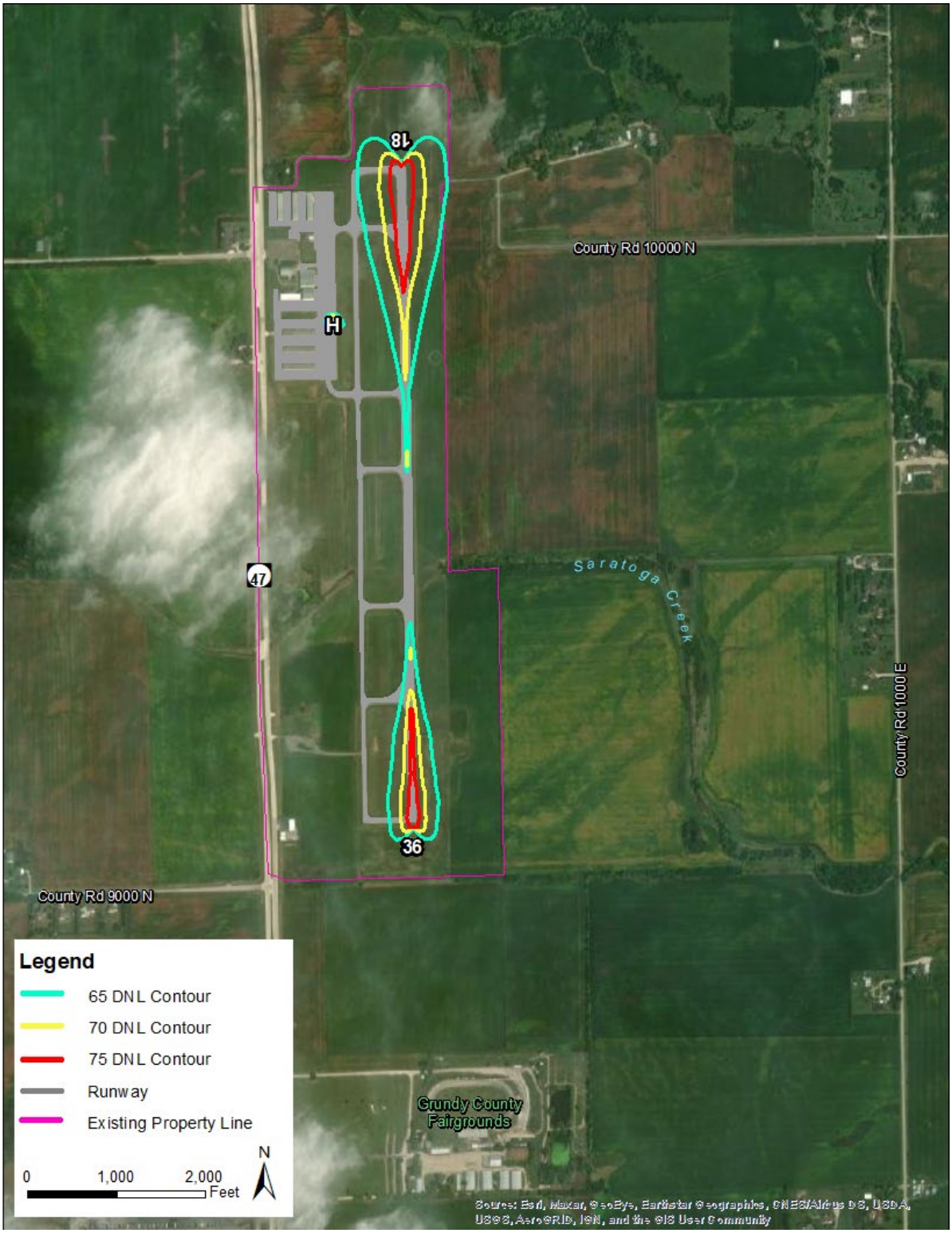
Exhibit 4 depicts the Existing (2021) Condition DNL 65-75 dB contours. **Table 6** summarizes the land areas within each DNL contour interval. The distance and area of a DNL contour is a function of the number of aircraft that use a runway for aircraft arrivals or departures, the type of aircraft used on the flight tracks, and the expected time of day of the aircraft operation. As shown on **Exhibit 4**, the limits of the DNL 65+ dB contours remain almost exclusively within the existing airport property boundary. There are no residences or other non-compatible uses within DNL 65+ dB contours.

Table 6- Existing (2021) Noise Exposure Contours Land Area

Contour Range	Total Land Area (acres)
DNL 65-70 dB	33
DNL 70-75 dB	12
DNL > 75 dB	4
Total	49

Source: CMT 2022.

Exhibit 4 - Existing (2021) Noise Exposure Contours



Source: CMT 2022.

Future (2026) No Action Alternative

Runway Definition

No changes to the runway configuration are expected at Morris Municipal Airport (C09) for the future No Action Alternative, therefore, the runway layout for the Existing Condition was assumed.

Number of Operations and Fleet Mix

The Future (2026) No Action Alternative aircraft operations by aircraft category, operation type, and time of day are provided in **Table 7**. As shown, it is forecast that there would be 16,016 annual operations or an average of roughly 44 operations per day.

Table 7 - Average Daily Operations by Aircraft Type - Future (2026) No Action Condition

Aircraft Category	Aircraft Type	Arrivals		Departures		Total Operations
		Daytime	Nighttime	Daytime	Nighttime	
Jet	Cessna Citation CJ3	0.085	0.009	0.085	0.009	0.190
	Cessna Citation CJ4	0.043	0.005	0.043	0.005	0.095
	Cessna Citation Excel	0.013	0.001	0.013	0.001	0.029
	Cessna Citation Mustang	0.013	0.001	0.013	0.001	0.029
	Eclipse 500	0.013	0.001	0.013	0.001	0.029
Turboprop	Ayres Corporation S2R-G6	0.962	0.107	0.962	0.107	2.137
	Socata TBM9	0.015	0.002	0.015	0.002	0.033
	Beechcraft Super King Air 200	0.010	0.001	0.010	0.001	0.022
	Beechcraft Super King Air 350	0.005	0.001	0.005	0.001	0.011
	Cessna 414 Chancellor	0.005	0.001	0.005	0.001	0.011
Piston	Cessna 172 Skyhawk	7.864	0.874	7.864	0.874	17.475
	Van's Aircraft RV-8	0.271	0.030	0.271	0.030	0.601
	Bellanca 8KCAB	0.193	0.021	0.193	0.021	0.430
	Piper PA-28-180 Cherokee	0.193	0.021	0.193	0.021	0.430
	Aviat Aircraft Pitts S-2B	0.155	0.017	0.155	0.017	0.344
Rotor	Robinson Helicopter R44 II	0.033	0.004	0.033	0.004	0.073
Total		9.873	1.096	9.873	1.096	21.938

Notes: Daytime Hours = 07:00AM to 09:59PM. Nighttime Hours = 10:00PM to 06:59AM.; Refer to Appendix A for full name of aircraft type
Source: CMT 2022.

Runway End Utilization

The Future (2026) No Action Alternative runway end utilization percentages were also assumed to be the same as the Existing (2021) condition (see Table 4).

Flight Tracks

There would be no airfield improvements with the Future (2026) No Action Alternative. Therefore, the modeled flight tracks and flight track utilization percentages are the same assumptions as used in the Existing (2021) Condition.

No Action Noise Exposure Contour

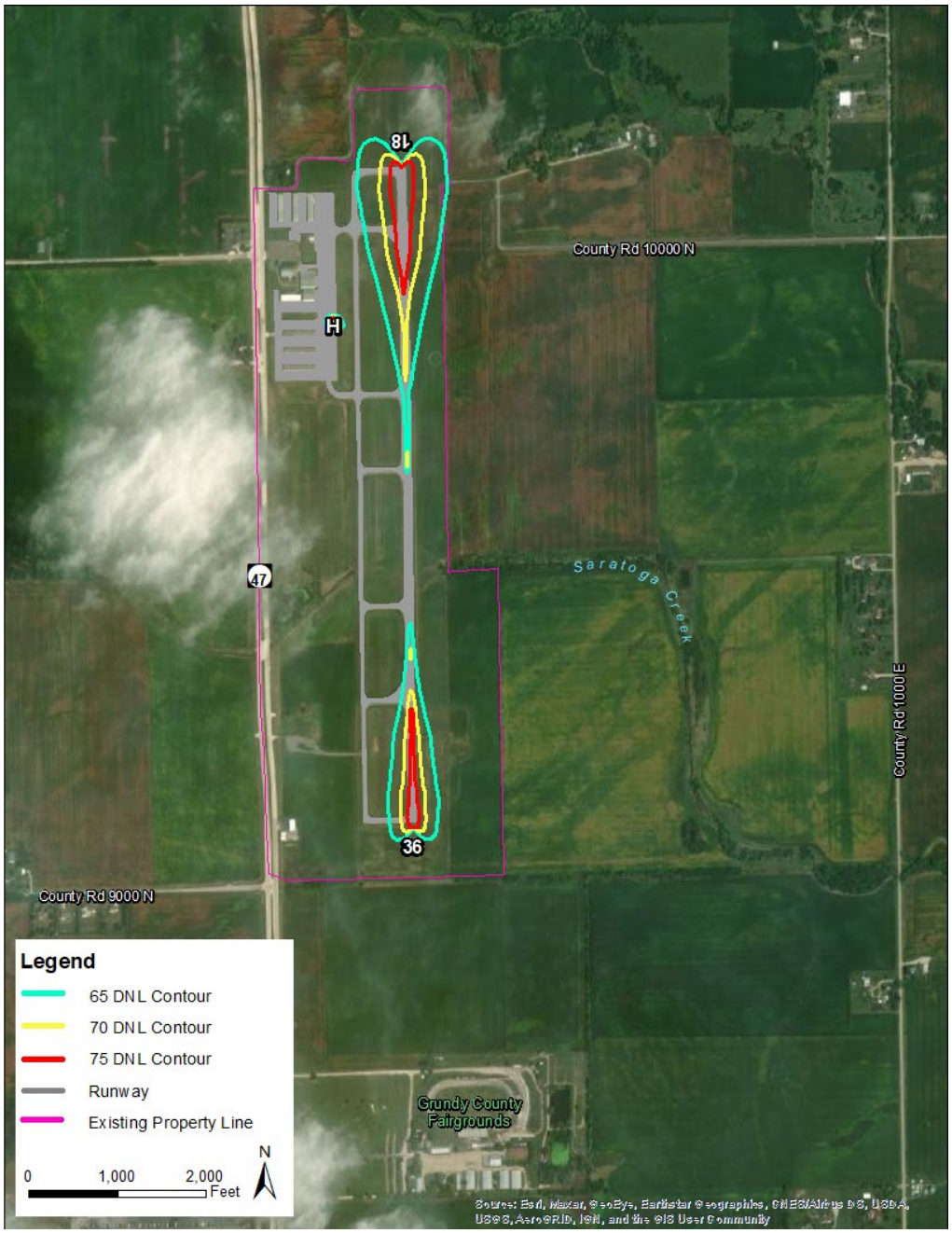
Exhibit 5 depicts the Future (2026) No Action Alternative DNL 65-75 dB contours. **Table 8** summarizes the land areas within each contour interval. As shown, the limits of the DNL 65+ dB contours remain almost entirely within the existing airport property boundary. Additionally, there are no residences or other non-compatible uses within the contours.

Table 8 - Future (2026) No Action Noise Exposure Contours Land Area

Contour Range	Total Land Area (acres)
DNL 65-70 dB	34
DNL 70-75 dB	12
DNL > 75 dB	4
Total	50

Source: CMT 2022.

Exhibit 5 - Future (2026) No Action Alternative Noise Exposure Contours



Source: CMT 2022.

Future (2026) Proposed Action Alternative

Runway Definition

The Sponsor's Proposed Action is the construction and operation of a new crosswind runway (Runway 7/25). **Table 9** provides the dimensions of the existing and Proposed Action runway.

Table 9 - Airfield Runway Dimensions - Future (2027) Proposed Action Condition

Runway Numerals	Runway Length (ft)	Runway Width (ft)
18/36	5,501	75
7/25	3,501	75

Source: CMT 2022.

Number of Operations and Fleet Mix

Table 10 provides a summary of the average daily operations and fleet mix for the Future (2026) Proposed Action Alternative, by aircraft type, operational data, and time of day. Notably, in the future with the Proposed Action Alternative, the number of annual and average daily operations is forecast to increase approximately 9 percent when compared to future conditions with the No Action Alternative (an increase to 17,605 annual operations and 48 average daily operations).

Table 10 - Average Daily Operations by Aircraft Type - Future (2026) Proposed Action Condition

Aircraft Category	Aircraft Type	Arrivals		Departures		Total Operations
		Daytime	Nighttime	Daytime	Nighttime	
Jet	Cessna Citation CJ3	0.088	0.010	0.088	0.010	0.195
	Cessna Citation CJ4	0.046	0.005	0.046	0.005	0.101
	Cessna Citation Mustang	0.014	0.002	0.014	0.002	0.032
	Eclipse 500	0.014	0.002	0.014	0.002	0.032
	Raytheon Premier 1	0.014	0.002	0.014	0.002	0.032
Turboprop	Ayres Corporation S2R-G6	1.057	0.117	1.057	0.117	2.349
	Socata TBM9	0.016	0.002	0.016	0.002	0.037
	Beechcraft Super King Air 200	0.011	0.001	0.011	0.001	0.024
	Cessna 414 Chancellor	0.005	0.001	0.005	0.001	0.012
	Beechcraft Super King Air 350	0.005	0.001	0.005	0.001	0.012
Piston	Cessna 172 Skyhawk	8.653	0.961	8.653	0.961	19.229
	Van's Aircraft RV-8	0.297	0.033	0.297	0.033	0.661
	Bellanca 8KCAB	0.212	0.024	0.212	0.024	0.472
	Piper PA-28-180 Cherokee	0.212	0.024	0.212	0.024	0.472
	Aviat Aircraft Pitts S-2B	0.170	0.019	0.170	0.019	0.378
Rotor	Robinson Helicopter R44 II	0.036	0.004	0.036	0.004	0.080
Total		10.85	1.208	10.85	1.208	24.116

Source: CMT 2022.

Runway End Utilization

Table 11 summarizes the percentage of use by each aircraft category on each of the runway ends at C09 during the daytime (7:00am to 9:59pm) and nighttime (10:00pm to 6:59am) for the Future (2026) Proposed Action Alternative.

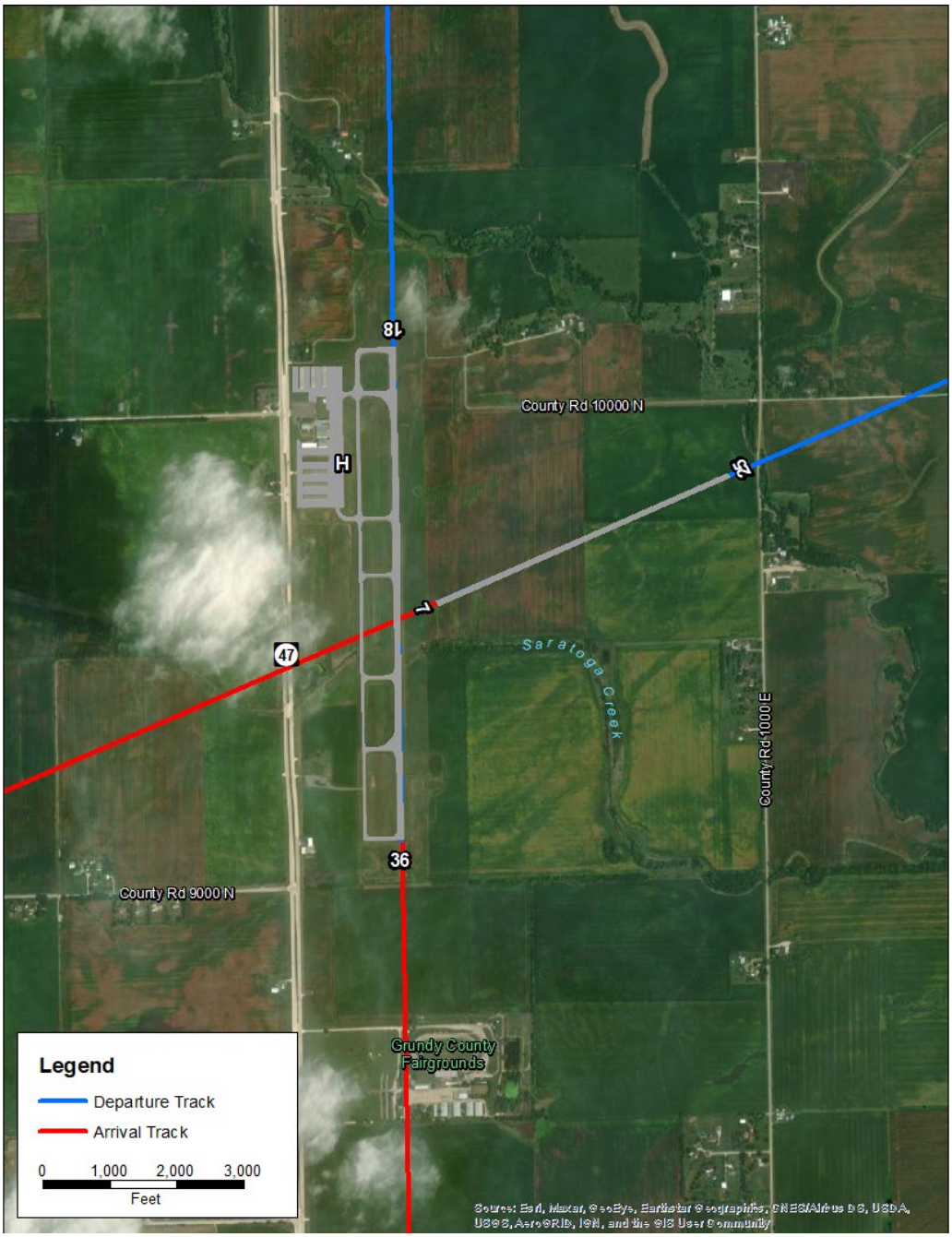
Table 11 – Runway End Utilization – Future (2026) Proposed Action Alternative					
Operation Category	**Aircraft Category**	**Runway End Percent Usage**			
		Runway 18	**Runway 36**	**Runway 7**	**Runway 25**
Daytime Arrivals	Jets	70.0%	5.0%	5.0%	20.0%
	Turboprops	70.0%	5.0%	5.0%	20.0%
	Props	70.0%	5.0%	5.0%	20.0%
Nighttime Arrivals	Jets	70.0%	5.0%	5.0%	20.0%
	Turboprops	70.0%	5.0%	5.0%	20.0%
	Props	70.0%	5.0%	5.0%	20.0%
Daytime Departures	Jets	70.0%	5.0%	5.0%	20.0%
	Turboprops	70.0%	5.0%	5.0%	20.0%
	Props	70.0%	5.0%	5.0%	20.0%
Nighttime Departures	Jets	70.0%	5.0%	5.0%	20.0%
	Turboprops	70.0%	5.0%	5.0%	20.0%
	Props	70.0%	5.0%	5.0%	20.0%

Source: CMT 2022.

Flight Tracks

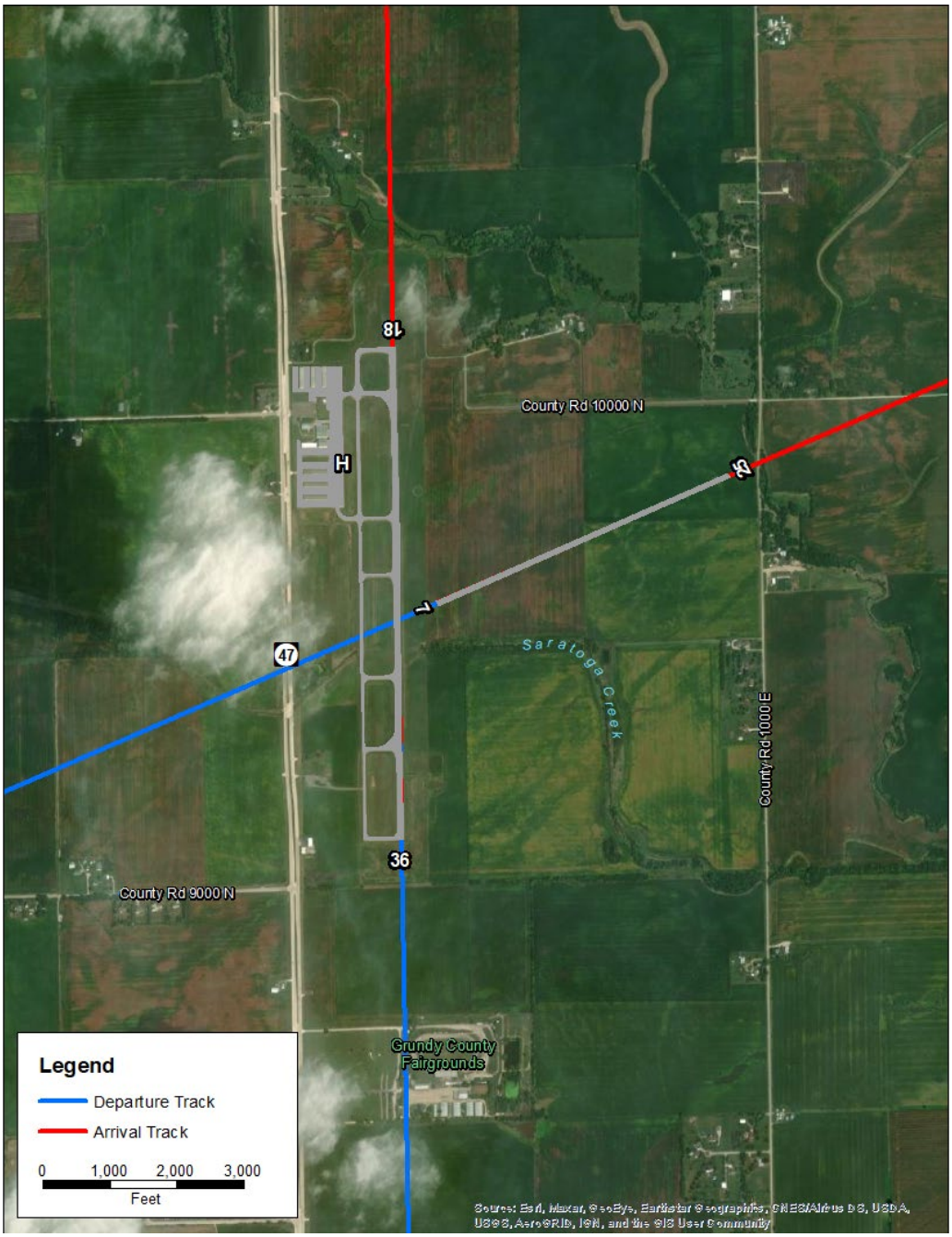
The arrival and departure flight tracks from the new crosswind Runway 7/25 were assumed to be straight in/out, the same as the existing Runway 18/36. **Exhibits 6** and **7** depict the modeled Future (2026) Proposed Action Alternative flight tracks.

Exhibit 6 - Future (2026) Proposed Action Modeled Flight Tracks – North Flow



Source: CMT 2022.

Exhibit 7 - Future (2026) Proposed Action Modeled Flight Tracks – South Flow



Source: CMT 2022.

Proposed Action Noise Exposure Contour

Exhibit 8 depicts the Future (2026) Proposed Action Alternative DNL 65+ contours. As shown, the Future (2026) Proposed Action Noise Exposure Contour lobe for Runway 18-36 is very similar in shape to the Future (2026) No Action Noise Exposure Contours; with the addition of a new lobe on Runway 7-25. However, even with the addition of a second lobe the DNL 65 dB contour does not extend beyond the proposed new airport property line. **Table 12** summarizes the land areas within each DNL noise contour interval for the Future (2026) Proposed Action Alternative. As shown, the total area within the 65 DNL and greater contour is approximately 56 acres, an increase of 6 acres over the Future (2026) No Build Condition. The difference in areas between the Future (2026) Proposed Action Noise Exposure Contours and the Future (2026) No Action Noise Exposure Contours are shown in **Table 13**. Finally, there are no residences or other non-compatible uses within the Future (2026) Proposed Action Alternative DNL 65 dB+ contour.

Table 12 - Future (2026) Proposed Action Noise Exposure Contours Land Area

Contour Range	Total Land Area (acres)
DNL 65-70 dB	38
DNL 70-75 dB	13
DNL > 75 dB	5
Total	56

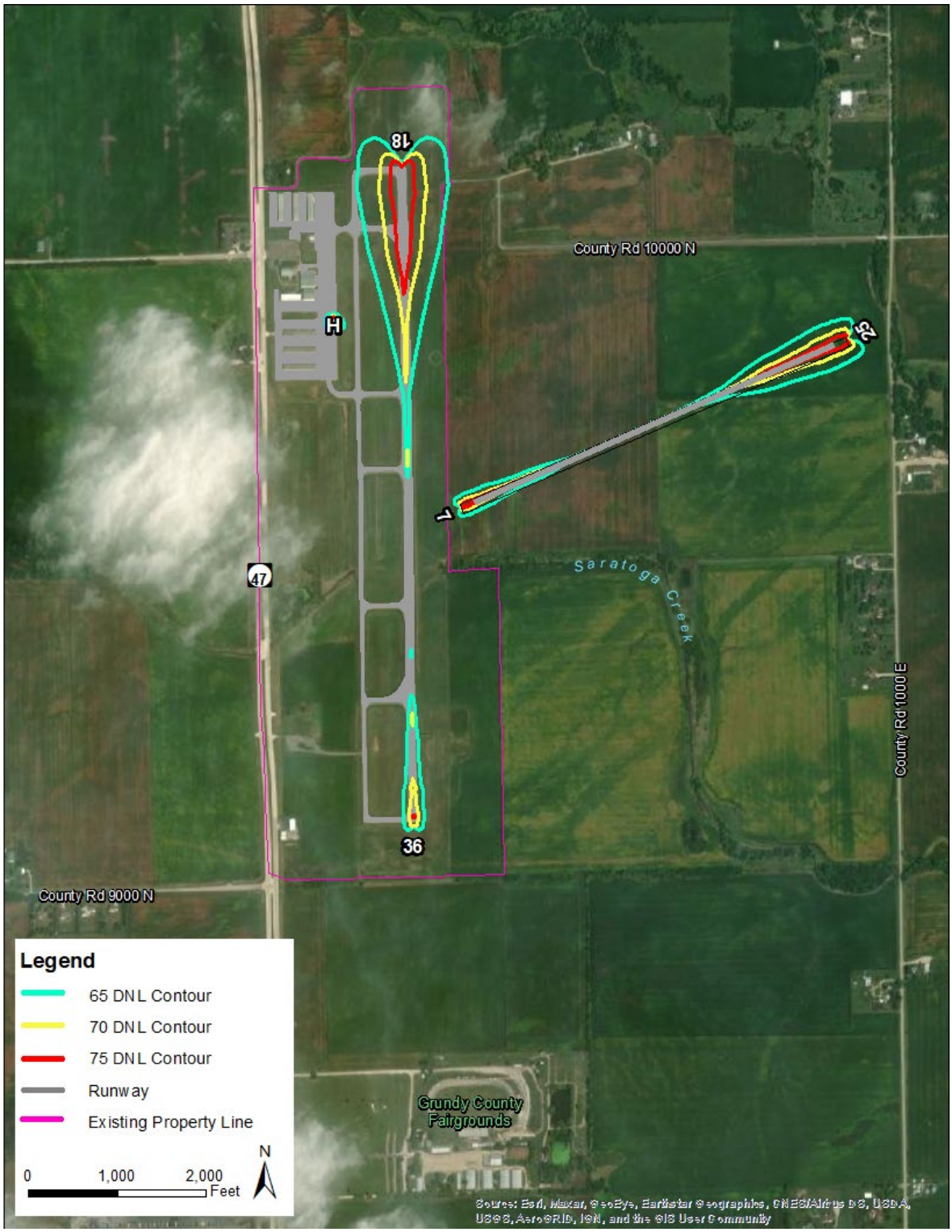
Source: CMT 2022.

Table 13 - Future (2026) Proposed Action Noise Exposure Contour Area and the Future (2026) No Action Noise Exposure Contour Area Comparison

Contour Range	2026 No Action (Acres)	2026 Proposed Action (Acres)	Variance (Acres)
DNL 65-70 dB	34	38	+4
DNL 70-75 dB	12	13	+1
DNL > 75 dB	4	5	+1
Total	50	56	+6

Source: CMT 2022.

Exhibit 8 - Future (2026) Proposed Action Noise Exposure Contours



Source: CMT 2022.

SIGNIFICANCE THRESHOLD

An aircraft noise impact would be considered significant if noncompatible land uses are newly exposed to DNL 65+ dB as a result of a Proposed Action Alternative or an increase of DNL 1.5 dB or more over a noncompatible land use within the DNL 65 dB contour is predicted when comparing the future (2026) No Action Alternative to the Proposed Action Alternative. For this analysis, there are no land uses that are incompatible with aircraft noise within the DNL 65+ dB contour with either the Future (2026) No Action Alternative or the Proposed Action Alternative. Therefore, no significant impacts are forecast to occur due to implementation of the Proposed Action Alternative.

MITIGATION

Because no noise sensitive land uses would experience a DNL 1.5 dB increase at or above DNL 65 dB in 2026 as a result of the Proposed Action Alternative, no mitigation is required for the aircraft noise that is predicted to occur with the improvement to C09.

APPENDIX

Appendix A: Full name of aircraft type

ID	Aircraft Name
B350	Beechcraft Super King Air 350
BE20	Beechcraft Super King Air 200
BL8	Super Decathlon
C14T	Cessna Turbo Star 414
C172	Cessna 172 Skyhawk
C25B	Cessna Citation CJ3
C25C	Cessna Citation CJ4
C510	Cessna Citation Mustang
C56X	Cessna Citation Excel
EA50	Eclipse 500
P28A	Piper PA-28-180 Cherokee
PRM1	Raytheon Premier 1
PTS2	Aviat Aircraft Pitts S-2B
R44	Robinson R-44 II Raven
RV8	Van's Aircraft RV-8
SS2T	Ayres S2R-G6 Turbo Thrush
TBM9	Socata TBM 900

APPENDIX C

AIR QUALITY/CLIMATE ASSESSMENT

Morris Municipal Airport - James R. Washburn Field

Documentation of Input Parameters for C09's Environmental Assessment's Aircraft Air Quality and Climate Assessment for Construction of a Crosswind Runway
June 22, 2022

MORRIS, ILLINOIS

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INTRODUCTION

A requirement of the National Environmental Policy Act of 1970, for Federally funded programs, is to examine all facets of potential impacts caused by a Sponsor's Proposed Action. In determining impacts associated with airport improvements, the Federal Aviation Administration (FAA) has prepared two main guidance documents. FAA Order 1050.1F – *Environmental Impacts: Policies and Procedures* and FAA Order 5050.4B – *National Environmental Policy Act (NEPA) Implementing Instructions For Airport Actions*. These documents provide guidance in preparing environmental reviews and includes specific direction on air quality and noise impacts. To provide a more consistent review of air quality and noise documentation of a NEPA action, FAA has designed the Aviation Environmental Design Tool (AEDT). As noted on the AEDT website:

> *"AEDT is a software system that models aircraft performance in space and time to estimate fuel consumption, emissions, noise, and air quality consequences. AEDT is a comprehensive tool that provides information to FAA stakeholders on each of these specific environmental impacts. AEDT facilitates environmental review activities required under NEPA by consolidating the modeling of these environmental impacts in a single tool."*

Numerous input parameters are needed in running the AEDT model. Airport configuration, aircraft operations by type, frequency and time of day all used in the model. This report provides the results of an assessment for air quality and climate environmental impact categories identified in the guidance documents that are relevant to the Proposed Action (Crosswind Runway 7-25) at Morris Municipal Airport - James R. Washburn Field (C09).

METHODOLOGY

The Proposed Action is forecast to change the number of aircraft operations and change the aircraft taxi distances to/from the airport's arrival/departure building and hangars. An increase in motor vehicle activity associated with the increase in aircraft operations would also result from the improvement. For this reason, the air pollutant, pollutant precursor, and greenhouse gas (GHG) emission estimates presented in this report were prepared for these two sources (i.e., aircraft and motor vehicles). Emissions associated with the construction activities that would be necessary to implement the Proposed Action were also prepared.

Aircraft emissions were derived using Version 3d of the FAA's Aviation Environmental Design Tool[1] (AEDT). AEDT is a software system that models aircraft performance in space and time to estimate fuel consumption, emissions, noise, and air quality consequences. Motor vehicle emissions were derived using Version 3 of U.S. Environmental Protection Agency's (USEPA's) Motor Vehicle Emission Simulator[2] (MOVES) modeling system and estimates of vehicle-miles-traveled (VMT). Version 1.0 of the Transportation Research Board's (TRB's) Airport Construction Emissions Inventory Tool (ACEIT)[3] was used to estimate emissions associated with the required construction activity. Project-specific details were used in the ACEIT to estimate construction activities and equipment/vehicle activity data (e.g., equipment mixes/operating times). Notably, the emission factors used by ACEIT are outdated. As such, the

[1] FAA, Aviation Environmental Design Tool, https://AEDT.FAA.gov
[2] USEPA, Motor Vehicle Emission Simulator, https://www.epa.gov/moves/latest-version-motor-vehicle-emission-simulator-moves
[3] TRB, ACRP Report 102, Guidance for Estimating Airport Construction Emissions, http://www.trb.org/ACRP/Blurbs/170234.aspx.

construction equipment-related emission rates were obtained from MOVES model. Finally, construction-related fugitive dust emissions were calculated using emission factors from USEPA's Compilation of Air Pollutant Emission Factors (AP-42)[4] and evaporative emissions were developed using USEPA guidance for asphalt paving.[5]

The parameters required to execute AEDT include the number of aircraft operations by type of aircraft, the type of engine(s) installed on the aircraft, and aircraft taxi-in/taxi-out times. The number of aircraft operations in the year 2021 (the existing condition) and the forecast number of operations by aircraft type in the year 2026 (the opening year of the Proposed Action) are provided in **Table 1**. AEDT-default engines were assumed for each listed aircraft type. For the existing condition, aircraft taxi-in/out times were obtained from FAA's Aviation System Performance Metrics (ASPM).[6] For the year 2021, the ASPM data indicates that the average taxi-in, taxi-out and delay time per aircraft landing-takeoff cycle (i.e., one arrival and one departure) was 15.5 minutes at C09. This time was assumed for the evaluation of the No Action Alternative in the year 2026. For the Proposed Action Alternative, the forecast percent use of the crosswind runway (25 percent of the operations), as well as taxi times derived using the proposed locations of the runway ends and an assumed aircraft taxi speed of 20 miles-per-hour were used to adjust the ASPM data to reflect the average taxi-in/taxi-out delay time with the Proposed Action. Based on the forecast percent use of the crosswind runway and the other assumptions, the average taxi in/out time with the Proposed Action is forecast to increase from 15.5 minutes to 16.6 minutes.

Table 1 – Existing and Forecast Aircraft Operations

Aircraft Category	Aircraft Type	Number of Aircraft Operations		
		2021	2026	
			No Action Alternative	Proposed Action Alternative
Jet	Cessna Citation CJ3	137	138	142
	Cessna Citation CJ4	69	70	74
	Cessna Citation Excel	21	21	23
	Cessna Citation Mustang	21	21	23
	Eclipse 500	21	21	23
Turboprop	Ayres Corporation S2R-G6	1,540	1,560	1,715
	Socata TBM9	24	24	27
	Beechcraft Super King Air 200	16	16	17
	Beechcraft Super King Air 350	8	8	9
	Cessna 414 Chancellor	8	8	9
Piston	Cessna 172 Skyhawk	12,592	12,757	14,037
	Van's Aircraft RV-8	433	439	482
	Bellanca 8KCAB	310	314	345
	Piper PA-28-180 Cherokee	310	314	345
	Aviat Aircraft Pitts S-2B	248	251	276
Rotor	Robinson Helicopter R44 II	52	53	58

[4] USEPA, Emissions Factors & AP-42, Compilation of Air Pollutant Emission Factors, http://www.epa.gov/ttn/chief/ap42/index.html#toc.
[5] USEPA, Emission Inventory Improvement Program, Asphalt Paving, Chapter 17, Volume III, April 2001.
[6] FAA, Aviation System Performance Metrics, https://ASPM.FAA.gov

Table 1 – Existing and Forecast Aircraft Operations				
Aircraft Category	Aircraft Type	Number of Aircraft Operations		
		2021	2026	
			No Action Alternative	Proposed Action Alternative
Total Operations		15,808	16,016	17,605

As previously stated, emissions from motor vehicles were computed using MOVES and estimates of VMT. VMT estimates were derived using yearly trip generation rates based on the number of aircraft operations per year and alternative that were obtained from the Institute of Transportation Engineers (ITE) Trip Generation Manual.[7] The rates are provided in **Table 2**. A weighted round trip distance of 36 miles to/from C09 was derived assuming 10 percent of the trips are to/from the City of Morris (3 miles from C09), 45 percent of the trips are to/from the City of Joliet (18 miles from C09), and the remaining 45 percent are to/from the City of Ottawa (22 miles from C09). To be conservative, the MOVES default national database that is specific to Grundy County (meteorological, speed distribution, vehicle age distribution, etc.) was used and the evaluated roadways assumed to be urban unrestricted access roadways.

Table 2 – Existing and Forecast Motor Vehicle Trips			
Year	Alternative	Number of Annual Aircraft Operations	Number of Annual Motor Vehicle Trips
2021	Existing	15,808	31,142
2026	No Action	16,016	31,552
	Proposed Action	17,605	34,682

REGULATORY FRAMEWORK AND EXISTING CONDITIONS

This section describes the regulatory framework that drives the need for the air quality and climate assessments, summarizes existing air quality and climate conditions (i.e., the affected environment) within the study area, and provides emissions estimates for the existing level of aircraft operations and existing airfield at C09.

Air Quality

The USEPA creates the guiding principles and policies for protecting air quality conditions throughout the nation. The agency's primary responsibility is to promulgate and update National Ambient Air Quality Standards (NAAQS) which define outdoor levels of air pollutants that are considered safe for the health and welfare of the public.[8] The USEPA's other responsibilities include the approval of State Implementation Plans (SIPs), plans that detail how a state intends to comply with the NAAQS when air pollutant concentrations/levels exceed one or more of standards.

For proposed airport projects, the FAA is responsible for ensuring that the reporting and disclosure requirements of the NEPA and the Clean Air Act (CAA) are met. In areas designated by the USEPA to be *nonattainment* or *maintenance* for a NAAQS, the CAA has two rules for which projects must comply--the

[7] ITE, Trip Generation, 8th Edition.
[8] USEPA, NAAQS Table | US EPA, June 2022.https://www.epa.gov/criteria-air-pollutants/naaqs-table

Transportation Conformity Rule and the General Conformity Rule. The Transportation Conformity Rule is applicable to transportation plans for motor vehicles and rail, transportation improvement programs, and projects funded or approved by the Federal Highway Administration or the Federal Transit Administration. The General Conformity Rule is applicable to all other actions funded or approved by the federal government, including actions by the FAA.

At the state level, the Illinois Environmental Protection Agency (IEPA) is responsible for enforcing the CAA including compliance with the NAAQS, issuance of air emission source permits, monitoring of air quality conditions, and preparing the Illinois SIP.

There are NAAQS for six "criteria" air pollutants: carbon monoxide (CO), nitrogen dioxide (NO_2), ozone (O_3), particulate matter (PM), sulfur dioxide (SO_2), and lead (Pb). There are standards for two sizes of PM, $PM_{2.5}$ which are particles with a diameter of 2.5 microns or less and PM_{10} which are particles with a diameter of 10 microns or less. There are two sets of NAAQS. Primary standards provide protection for the health of the public and secondary standards provide public welfare protection. The NAAQS are listed in **Table 3**.

Table 3 – National Ambient Air Quality Standards

Pollutant		Primary/ Secondary	Averaging Period	Standards	Form
CO		Primary	8-hour	9 ppm	Not to be exceeded more than once per year
			1-hour	35 ppm	
NO_2		Primary	1-hour	100 ppb	98th percentile of 1-hour daily maximum concentrations, averaged over 3 years
		Primary & Secondary	1 year	53 ppb(1)	Annual mean
O_3		Primary & Secondary	8-hour	0.070 ppm	Annual fourth-highest daily maximum 8-hour concentration, averaged over 3 years
PM	$PM_{2.5}$	Primary	1 year	12 µg/m^3	Annual mean, averaged over 3 years
		Secondary	1 year	15 µg/m^3	Annual mean, averaged over 3 years
		Primary & Secondary	24-hour	35 µg/m^3	98th percentile, averaged over 3 years
	PM_{10}	Primary & Secondary	24-hour	150 µg/m^3	Not to be exceeded more than once per year on average over 3 years
SO_2		Primary	1-hour	75 ppb	99th percentile of 1-hour daily maximum concentrations, averaged over 3 years
		Secondary	3-hour	0.5 ppm	Not to be exceeded more than once per year
Pb		Primary & Secondary	Rolling 3-month average	0.15 µg/m^3	Not to be exceeded

Notes: ppb = parts per billion, ppm = parts per million, and µg/m^3 = micrograms per cubic meter of air.
(1) The level of the annual NO_2 standard is 0.053 ppm. It is shown here in terms of ppb for the purposes of comparison to the 1-hour standard level.

Source: EPA, National Ambient Air Quality Standards (NAAQS) at https://www.epa.gov/criteria-air-pollutants/naaqs-table, April 2022.

An area with measured pollutant concentrations which are lower/meeting the NAAQS is designated by the USEPA to be an *attainment area*. An area with pollutant concentrations that exceed the NAAQS is designated to be a *nonattainment area*. Once air pollutant concentrations in a nonattainment area reduce to levels that meet or are below the NAAQS, the USEPA re-designates an area to be *maintenance* for a

period of 20 years. Some areas are designated to be *unclassifiable* if there is insufficient monitoring data to determine the status of a pollutant.

Based on data obtained from air pollutant monitoring stations located within the airshed, emissions and emissions-related data, meteorology, geography/topography, and jurisdictional boundaries, Grundy County is currently designated by the USEPA to be an attainment area for all the NAAQS. Therefore, the CAA SIP conformity requirements are not applicable to the proposed C09 improvements.

Existing Air Pollutant and Pollutant Precursor Emissions

Estimates of the existing levels of airport-operational emissions of CO, nitrogen oxides (NO_x), as a surrogate for NO_2 and a precursor to the air pollutant O_3, volatile organic compounds (VOC), also a precursor to O_3, PM, sulfur oxides (SO_x), as a surrogate for SO_2, and lead (Pb) are provided in **Table 4.** As shown, depending on the pollutant or pollutant precursor, total emissions are estimated to have ranged from less than 0.1 ton to 72.1 tons in 2021.

Table 4 – Existing (2021) Air Pollutant/Pollutant Precursor Emissions (Short Tons)

Source	Aircraft Operational Mode(s)	CO	NO_x	VOC	PM_{10}	$PM_{2.5}$	SO_x	Pb
Aircraft	Startup and Taxi-Out	5.9	<0.1	0.4	<0.1	<0.1	<0.1	<0.1
	Takeoff	24.5	0.2	0.2	<0.1	<0.1	<0.1	<0.1
	Arrival	34.5	0.3	0.3	<0.1	<0.1	<0.1	<0.1
	Taxi-In	2.9	<0.1	0.2	<0.1	<0.1	<0.1	<0.1
	Total Aircraft	67.8	0.5	1.1	0.1	0.1	0.1	<0.1
Motor Vehicles		4.3	0.2	0.1	0.1	0.1	<0.1	NA
Total		72.1	0.7	1.2	0.2	0.2	0.1	<0.1

Note: Values are rounded.
NA = Not applicable
Source: CMT, Inc. June 2022

Climate

Research has shown that increased atmospheric GHG emissions are significantly affecting the Earth's climate. These conclusions are based on a scientific record that includes substantial contributions from the United States Global Change Research Program (USGCRP), a program mandated by Congress in the Global Change Research Act to "assist the Nation and the world to understand, assess, predict, and respond to human-induced and natural processes of global change."[9] In 2009, based primarily on the scientific assessments of the USGCRP, the National Research Council, and the Intergovernmental Panel on Climate Change (IPCC), the USEPA issued a finding deeming it reasonable to assume that changes in climate caused by elevated concentrations of GHG in the atmosphere endanger the health and welfare of current and future generations.[10] By the summer of 2016, the USEPA acknowledged that scientific assessments by that time "highlight the urgency of addressing the rising concentration of carbon dioxide

[9] Global Change Research Act of 1990, Pub. L. 101–606, Sec. 103 (November 16, 1990), http://www.globalchange.gov.
[10] Endangerment and Cause or Contribute Findings for Greenhouse Gases under Section 202(a) of the Clean Air Act, 74 Fed. Reg. 66496 (December 15, 2009).

(CO_2) in the atmosphere" and formally announced that GHG emissions from certain classes of aircraft engines contribute to climate change.[11, 12]

Although there are no federal standards for aviation related GHG emissions, it is well established that GHG emissions affect climate.[13] In 2016, the Council on Environmental Quality (CEQ)[14] issued the "Final Guidance for Federal Departments and Agencies on Consideration of Greenhouse Gas Emissions and the Effects of Climate Change in National Environmental Policy Act Reviews", which served as the Federal government's official GHG guidance protocol for NEPA analyses. However, in 2017 this guidance was withdrawn for further consideration pursuant to Executive Order (E.O.) 13783, *Promoting Energy Independence and Economic Growth.* Furthermore, in 2019 the CEQ published a draft guidance on how NEPA analysis and documentation should address GHG emissions. However, pursuant to E.O. 13990 of February 2021, *Protecting Public Health and the Environment and Restoring Science to Tackle the Climate Crisis*, the CEQ rescinded its 2019 draft and is currently reviewing, for revisions and updates, the original 2016 Final Guidance.

Following procedures detailed in FAA's 1050.1F Desk Reference, FAA's policy is that GHG emissions should be quantified in a NEPA document when there is a reason to quantify emissions for air quality purposes or when changes in the amount of aircraft fuel used are computed/reported. The FAA does not have a threshold of significance for climate, and thus, the information presented in this section and further in the environmental consequences section of this report are for information purposes.

GHG emissions are presented in metric tons of CO_2 equivalent (CO_2e) using Global Warming Potential (GWP) values of 1 for CO_2, 28 for CH_4, and 265 for N_2O (based on a 100 year period) as presented in the IPCC's Fifth Assessment Report (AR5). CO_2e values are units of measurement that are used to standardise the cimate effects of the different GHGs. Estimates of the existing level of aircraft and motor vehicle related GHG emissions are provided in **Table 5**.

Table 5 – Existing (2021) GHG Emissions (Metric Tons)

Source	CO_2e
Aircraft	299
Motor Vehicles	387
Total	686

PROPOSED ACTION ASSESSMENT

The following sections of this report present and describe the predicted change in air pollutant, pollutant precursor, and GHG emissions predicted to occur with the Proposed Action at C09.

[11] EPA, Final Rule for Carbon Pollution Emission Guidelines for Existing Stationary Sources Electric Utility Generating Units, 80 Fed. Reg. 64661, 64677 (October 23, 2015).

[12] EPA finalized findings that GHG emissions from certain classes of engines used in aircraft contribute to the air pollution that causes climate change endangering public health and welfare under section 231(a) of the Clean Air Act.

[13] FAA, An Environmental Desk Reference for Airport Actions, October 2007, https://www.faa.gov/airports/environmental/environmental_desk_ref/.

[14] The CEQ oversees Federal agency National Environmental Policy Act (NEPA) implementation and develops and recommends national policies to the President that promote the improvement of environmental quality and meet the Nation's goals.

Air Quality

No Action Alternative

Estimates of the airport-operational emissions of CO, NO_x, VOC, PM, SO_x, and Pb for the future condition (year 2027) with the No Action Alternative are provided in **Table 6.** As shown, depending on the pollutant or pollutant precursor, total emissions are estimated to range from less than 0.1 ton to 72.2 tons.

Table 6 – Forecast (2026) Air Pollutant/Pollutant Precursor Emissions: No Action Alternative (Short Tons)

Source	Aircraft Operational Mode(s)	CO	NO_x	VOC	PM_{10}	$PM_{2.5}$	SO_x	Pb
Aircraft	Startup and Taxi-Out	6.0	<0.1	0.5	<0.1	<0.1	<0.1	<0.1
	Takeoff	24.8	0.2	0.2	<0.1	<0.1	<0.1	<0.1
	Arrival	34.9	0.3	0.3	<0.1	<0.1	<0.1	<0.1
	Taxi-In	3.0	<0.1	0.2	<0.1	<0.1	<0.1	<0.1
	Total	68.7	0.5	1.1	0.1	0.1	0.1	<0.1
Motor Vehicles	N/A	3.5	0.1	0.1	0.1	<0.1	<0.1	NA
Total		72.2	0.6	1.2	0.2	0.1	0.1	<0.1

Note: Values are rounded. NA = Not applicable
Source: Crawford, Murphy & Tilly, Inc. June 2022.

Proposed Action Alternative

Construction Emissions

The construction-related air pollutant/pollutant precursor emissions resulting from the construction activities required to implement the Proposed Action would be temporary and variable depending on project location, duration and level of activity. These emissions occur predominantly from the engine of construction equipment and vehicles at the site (e.g., scrapers, dozers, delivery trucks, etc.) and from transporting construction workers to and from the site. Fugitive dust emissions resulting from site preparation, land clearing, material handling, equipment movement on unpaved areas; and from evaporative emissions that occur during the application of asphalt paving would also occur.

The construction equipment typically utilized in airport projects is comprised both of on-road vehicles (i.e., on-road-licensed) and non-road equipment (i.e., off-road). The former category of vehicles are used for the transport and delivery of supplies, material and equipment to and from the site and includes construction worker vehicles. The latter category is operated on-site for activities such as soil/material handling, site clearing, and grubbing.

Table 7 lists the construction activities that would be necessary to implement the Proposed Action at C09. As also shown, the construction is assumed to begin in the year 2021 and continue through the year 2026.

Table 7 – Construction Schedule and Activities	
Timeframe	**Proposed Action Alternative Component/Construction Activity**
2024-2026	- Site Preparation - 10,000 square foot hangar - Service Road - Open At-Grade Parking Lot - Runway - Taxiways - General Aviation Apron

Source: Crawford, Murphy & Tilly, Inc. June 2022.

Estimates of the construction-related emissions resulting from implementation of the Proposed Action are provided in **Table 8**. As shown, it is anticipated that total pollutant and pollutant precursor emissions would be the greatest in 2025.

Table 8 – Construction Emissions: Proposed Action Alternative (Short Tons)							
Year	**CO**	**NO_x**	**VOC**	**PM_{10}**	**$PM_{2.5}$**	**SO_x**	**Pb**
2024	10.5	10.7	40.6	3.3	0.8	<0.1	NA
2025	20.5	27.1	43.4	5.9	1.8	<0.1	NA
2026	10.6	16.2	2.8	3.0	1.0	<0.1	NA

Note: Values are rounded. NA = Not applicable
Source: Crawford, Murphy & Tilly, Inc. June 2022.

Operational Emissions

Estimates of the airport-operational emissions of CO, NO_x, VOC, PM, SO_x and Pb for the future condition (year 2027) with the Proposed Action Alternative are provided in **Table 9**. As shown, As shown, depending on the pollutant, total emissions are estimated to range from less than 0.1 ton to 79.2 tons. For comparative purposes, the total emissions estimated to occur due to construction activities to implement the Proposed Action Alternative and emissions estimates for the No Action Alternative are also provided in **Table 9**. As shown, in the year 2026, due to construction activities, an increase in aircraft operations, changes in aircraft taxi distance/time, and an increase in motor vehicle trips to and from the Airport, emissions are estimated to increase from less than 0.1 ton to 16.2 tons depending on the air pollutant or pollutant precursor.

Table 9 – Forecast (2026) Air Pollutant/Pollutant Precursor Emissions: Proposed Action Alternative (Short Tons)								
Source	**Aircraft Operational Mode(s)**	**CO**	**NO_x**	**VOC**	**PM_{10}**	**$PM_{2.5}$**	**SO_x**	**Pb**
Aircraft	Startup and Taxi-Out	6.5	<0.1	0.5	<0.1	<0.1	<0.1	<0.1
	Takeoff	27.2	0.2	0.2	<0.1	<0.1	<0.1	<0.1
	Arrival	38.4	0.3	0.3	<0.1	<0.1	<0.1	<0.1
	Taxi-In	3.2	<0.1	0.2	<0.1	<0.1	<0.1	<0.1
	Total	75.4	0.6	1.2	0.1	0.1	0.1	<0.1
Motor Vehicles	N/A	3.8	0.1	0.1	0.1	<0.1	<0.1	NA
Total		79.2	0.7	1.3	0.2	0.1	0.1	<0.1

Table 9 – Forecast (2026) Air Pollutant/Pollutant Precursor Emissions: Proposed Action Alternative (Short Tons)								
Source	**Aircraft Operational Mode(s)**	**CO**	**NO_x**	**VOC**	**PM_{10}**	**$PM_{2.5}$**	**SO_x**	**Pb**
Total Construction and Operational Emissions with Proposed Action Alternative		89.8	16.9	4.1	3.2	1.1	0.1	<0.1
Total Operational Emissions with No Action Alternative		72.2	0.6	1.2	0.2	0.1	0.1	<0.1
Change in Emissions With Proposed Action Alternative		10.6	16.2	2.8	3.0	1.0	<0.1	<0.1

Note: Values are rounded. NA = Not applicable. Source: CMT, Inc. June 2022

Climate

No Action Alternative

Estimates of the airport operational GHG emissions with the No Action Alternative are provided in **Table 10**.

Table 10 – Forecast (2026) CO_2e Emissions: No Action Alternative (Metric Tons)	
Source	**CO_2e**
Aircraft	303
Motor Vehicles	346
Total	649

Source: CMT, Inc. June 2022

Proposed Action Alternative

Estimates of the airport operational GHG emissions with the Proposed Action Alternative are provided in **Table 11**. As shown, with the Proposed Action the increase in CO_2e emissions is forecast to be the greatest in 2025. Notably, because there are no standards by which the change in emissions of GHG can be evaluated, these estimates are provided for disclosure purposes only.

Table 11 – Forecast (2024-2026) CO_2e Emissions: Proposed Action Alternative (Metric Tons)			
Year	**Source(s)**		**CO_2e**
2024	Construction	Off-and On-Road Equipment/Vehicles	3,817
2025	Construction	Off-and On-Road Equipment/Vehicles	8,659
2026	Construction	Off-and On-Road Equipment/Vehicles	4,979
	Operation	Aircraft	334
		Motor Vehicles	381
		Total	6,409

Source: CMT, Inc. June 2022.

APPENDIX D

RUNWAY 7/25 MORRIS MUNICIPAL AIRPORT – JAMES R. WASHBURN FIELD

Ecological Resource Report

CMT PROJECT: 20029501.00

Date: September 28, 2020

PREPARED FOR:
CITY OF MORRIS
700 N. DIVISION STREET
MORRIS, IL 60540

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APPENDICES

1.0 INTRODUCTION

This ecological resource report has been prepared at the request of the City of Morris. The purpose of this report is to describe the wetlands and other potentially regulated surface water resources located within the proposed Runway 7/25 project area at Morris Municipal Airport-James R. Washburn Field in Morris, Grundy County, Illinois. The report also provides a review of the potential habitat available for federally threatened or endangered species listed within or near the project area.

1.1 SITE DESCRIPTION

The Morris Municipal Airport-James R. Washburn Field (C09) is located approximately 4 miles north of the central business district of the City of Morris in Grundy County, Illinois. It is situated along State Route 47, approximately 2.7 miles north of Interstate 80, as shown below in Figure 1.

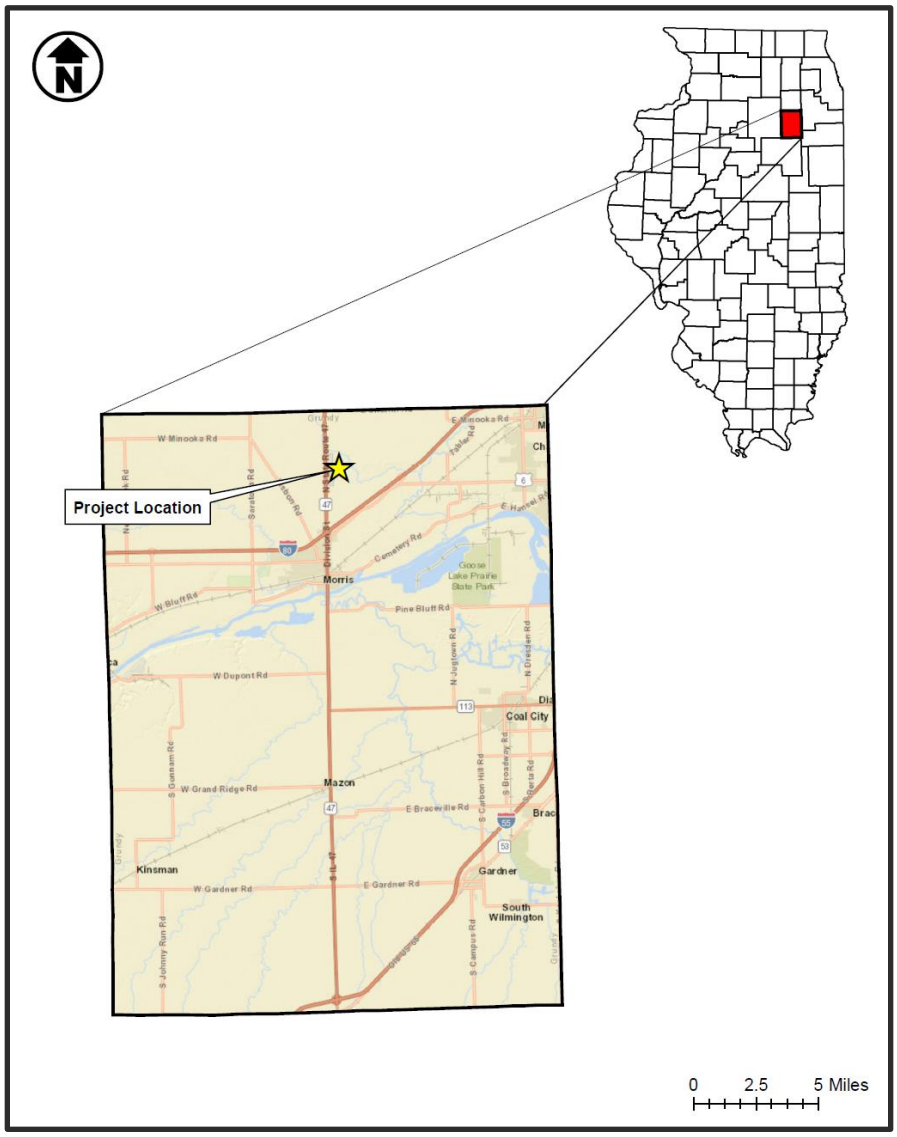

FIGURE 1 – SITE LOCATION

The study area for this investigation includes the airport property and adjacent farmland that will be acquired by the City of Morris for construction of the proposed runway, taxiways, and hangars. The study area is shown below in Figure 2.

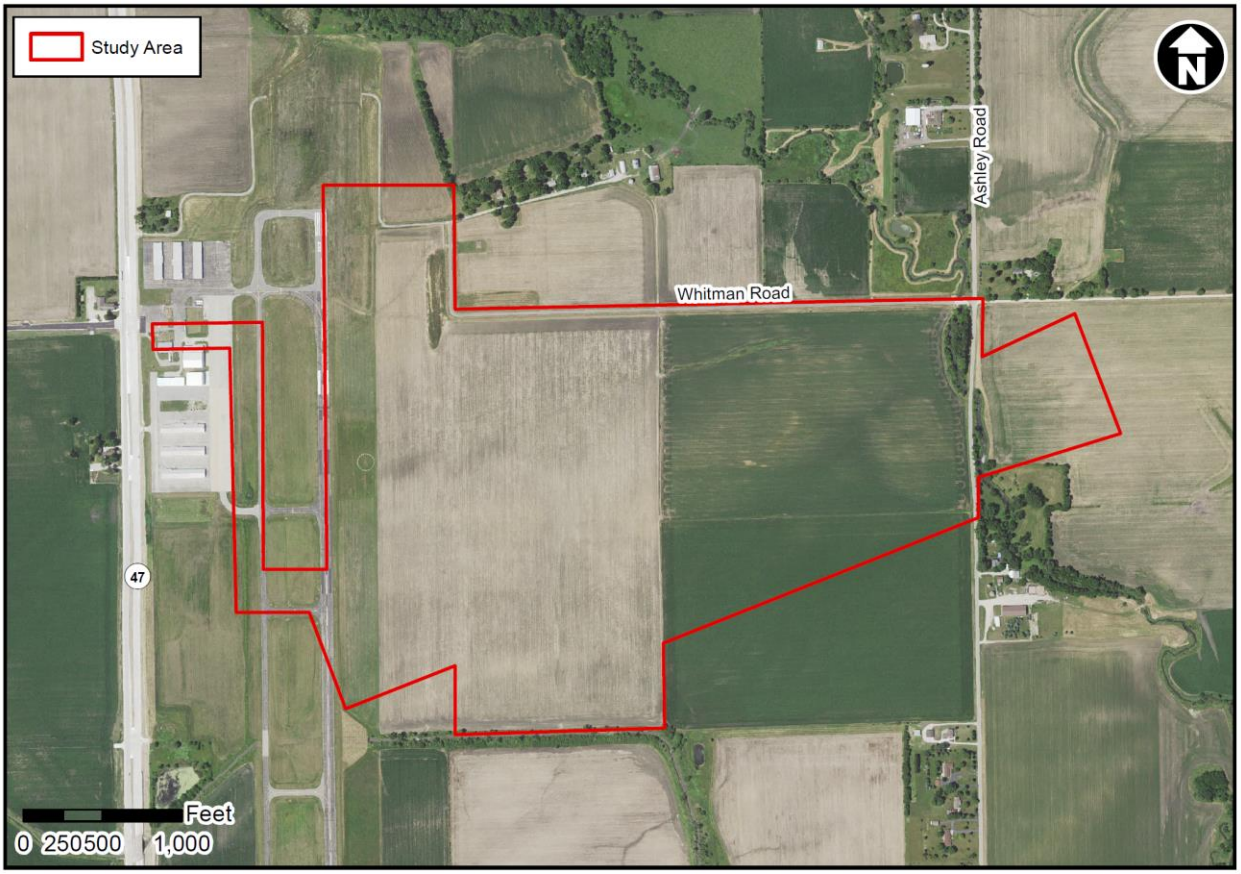

FIGURE 2 – PROJECT STUDY AREA

2.0 METHODOLOGY

A site visit to evaluate the presence of ecological resources was completed on September 23, 2020. The on-site evaluation of the study area was conducted by Alexandra Zelles and Patrick VerHalen. Alex is a certified ecologist with eight years of experience conducting ecological investigations including wetland delineations and qualitative assessments of terrestrial and aquatic systems throughout the Midwest. Alex holds a B.S. degree in Environmental Studies-Ecological Restoration from Northland College and a M.S. in Biological Sciences-Ecology from Wright State University. Patrick is a soil scientist with 8.5 years of experience conducting wetland delineations in Illinois. He is certified by Lake County (Illinois) as a certified wetland delineator and holds a B.S. degree in Meteorology and a M.S. degree in Geography from Northern Illinois University.

2.1 WETLANDS

When evaluating for the presence of wetlands, CMT personnel used the routine method presented in the 1987 Corps of Engineers Wetlands Delineation Manual and the Midwest Regional Supplement. In order for an area to be classified as a jurisdictional wetland, the area has to have a dominance of hydrophytic vegetation, hydric soils and wetland hydrology and be an adjacent wetland as defined by the 2020 Navigable Waters Protection Rule. Routine Wetland Determination Data Forms were completed for both the wetland and upland data points, and are included in Appendix B.

The wetland boundaries were surveyed using a handheld GPS device with sub-meter accuracy. The wetland boundaries with the wetland and upland data point locations are found on the ecological resource and wetland delineation map in Appendix A, along with all published mapping and data.

The ecological integrity of each wetland based on its plant species composition was completed using the Floristic Quality Index (FQI). The FQI forms and comprehensive plant species lists for each wetland are included in Appendix B.

2.2 STREAMS

Streams were evaluated based on the definition of waters of the United States, which requires the presence of an ordinary high water mark (OHWM) and ultimate connection to downstream Traditional Navigable Waters (TNW).

The following USACE definitions for the three streams types were used:

> **Ephemeral streams** have flowing water only during and for a short duration after, precipitation events in a typical year. Ephemeral stream beds are located above the water table year-round. Groundwater is not a source of water for the stream. Runoff from rainfall is the primary source of water for stream flow.
>
> **Intermittent streams** have flowing water during certain times of the year, when groundwater provides water for stream flow. During dry periods, intermittent streams may not have flowing water. Runoff from rainfall is a supplemental source of water for stream flow.
>
> **Perennial Streams** have flowing water year-round during a typical year. The water table is located above the stream bed for most of the year. Groundwater is the primary source of water for stream flow. Runoff from rainfall is a supplemental source of water for stream flow.

The determination of stream designation is based on an evaluation of the size of the watershed for each stream, the presence of flow during the on-site evaluation and the evidence observed of the frequency of flow, and the presence of aquatic life.

2.3 THREATENED AND ENDANGERED SPECIES

The project study area was observed for suitable threatened and endangered species habitat. The habitats present were searched for suitability and the presence of species. The known or historic range of federally endangered or threatened species within the study area was determined by reviewing the United States Fish and Wildlife Service (USFWS) Illinois County

Distribution of Federally Threatened, Endangered, and Candidate Species dated May 9, 2017 and the USFWS Information for Planning and Consultation (IPaC) species list generated for the project area.

3.0 RESULTS

The Ecological Resources Map provided in Appendix A depicts the location of identified resources on an aerial photograph. Data forms and FQI results are provided in Appendix B. Photographs of each wetland are provided in Appendix C.

3.1 SITE DESCRIPTION

The project study area is primarily covered in turf grass and agricultural row crop field and is surrounded by existing taxiways, runway, and agricultural fields. This area has been disturbed by development of the airport, which has been in operation since the mid-1950s, and surrounding agricultural land use.

3.2 PUBLISHED INFORMATION

The study area is located within the Upper Illinois watershed (8-digit Hydrologic Unit Code (HUC) 07120005) and the Collins Run sub-watershed (12-digit HUC 071200050105).

The Grundy County Soil Survey and hydric soil list indicates the following soils are present within the study area:

- 69A – Milford silty clay loam, 0 to 2 percent slopes, hydric
- 148A – Proctor silt loam, 0 to 2 percent slopes, not hydric
- 148B – Proctor silt loam, 2 to 5 percent slopes, not hydric
- 149A – Brenton silt loam, 0 to 2 percent slopes, hydric
- 189A – Martinton silt loam, 0 to 2 percent slopes, hydric
- 189B – Martinton silt loam, 2 to 4 percent slopes, hydric
- 570C2 – Martinsville loam, 4 to 6 percent slopes, eroded, not hydric
- 3107A – Sawmill silty clay loam, heavy till plain, 0 to 2 percent slopes, frequently flooded, hydric
- 8107A – Sawmill silty clay loam, 0 to 2 percent slopes, occasionally flooded, hydric

According to the Federal Emergency Management Agency (FEMA) Flood Insurance Rate Map (FIRM), the study area is located within FEMA Flood Zone A, which corresponds to areas subject to inundation by the 1%annual-chance flood event generally determined using approximate methodologies. The National Wetland Inventory map indicates that two riverine wetlands and one freshwater forested/shrub wetland are located within or adjacent to the study area. The National Wetlands Inventory and USGS topographic maps indicate that two streams are located within or adjacent to the project study area. USGS StreamStats shows seven stream and/or drainageway features within the study area.

Copies of the USGS topographic map, National Wetland Inventory map, FEMA floodplain map, 12-digit HUC watershed map, and relevant portions of the Grundy County Soil Survey are included in Appendix A.

3.3 WETLANDS

One (1) emergent wetland was identified within the project study area, as shown below in Figure 3.

Within the study area, Wetland A is a 0.65-acre emergent wetland located approximately 50 feet west of the existing taxiway. Based on the Native FQI (3.6) and Native Mean-C Value (1.8), the identified wetland is low quality and severely degraded. The wetland extends west and south beyond the study area and drains south through a stormwater drainage ditch to Saratoga Creek, which ultimately drains to the Illinois River, a Traditional Navigable Waterway (TNW). Based on the surface connection to a TNW, the wetland may be federally jurisdictional. The wetland location is shown on the Ecological Resources Map in Appendix A.

Two wetland determination data points were evaluated to determine whether or not the areas met the wetland criteria. Data point B1 exhibited hydrophytic vegetation and wetland hydrology but did not meet any hydric soil indicators. Data point C1 was located within an NWI mapped wetland; while the data point exhibited hydrophytic vegetation and wetland hydrology, it did not meet any hydric soil indicators. Details on the soil, hydrology and dominant vegetation for each wetland and wetland determination point are provided on the Routine Wetland Determination Data Forms included in Appendix B, along with qualitative assessment data. Photographs of the wetland are provided in Appendix C.

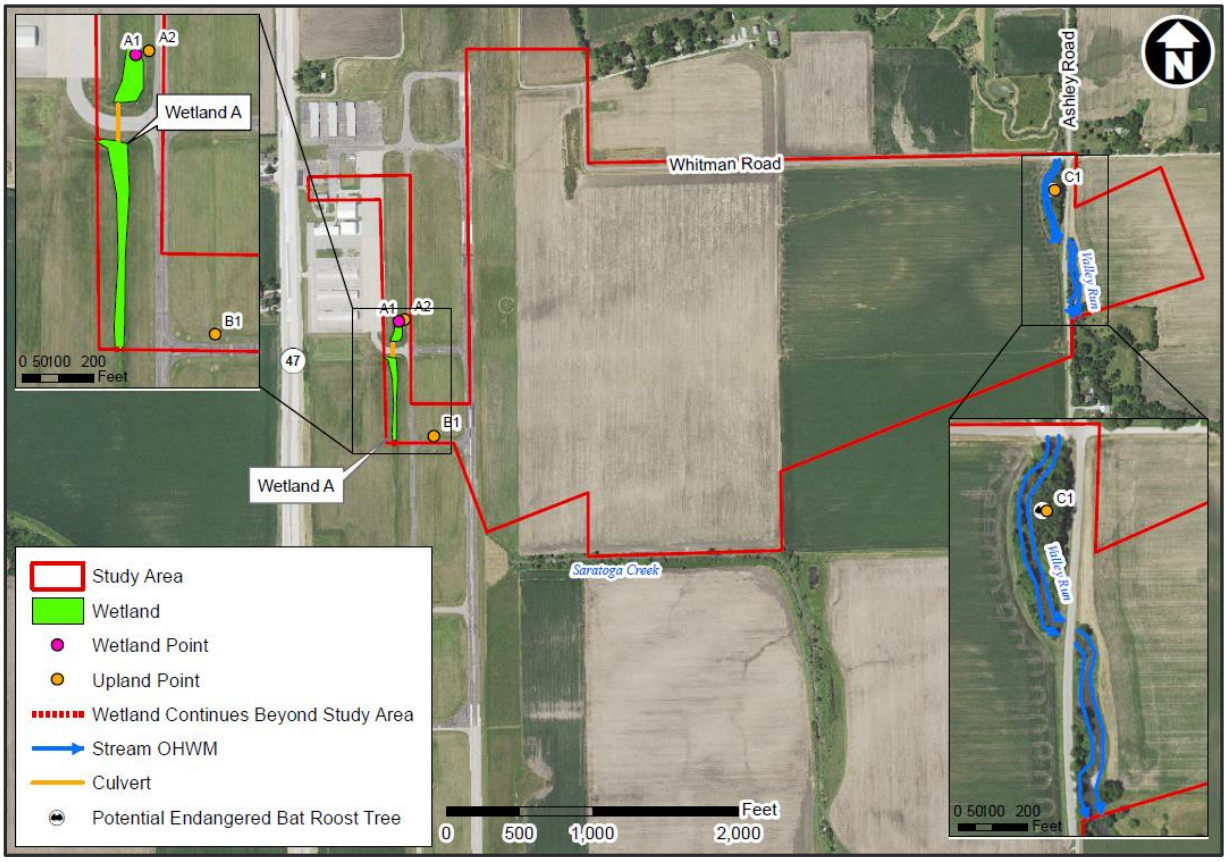

FIGURE 3 – ECOLOGICAL RESOURCES

3.4 STREAMS

One (1) stream was identified within the eastern portion of the project study area. A summary of the stream data is provided in the table below. The stream location is shown on the Ecological Resources Map in Appendix A. The Ohio Environmental Protection Agency (OEPA) Qualitative Habitat Evaluation Index (QHEI) Form is included in Appendix B, and stream photographs are included in Appendix C.

Stream Name	**Valley Run**
Location	Along Ashley Road (Lat: 41.430464, Long: -88.404095)
Receiving Waters	Collins Run > Aux Sable Creek > Illinois River (TNW)
USACE Flow Characteristics	Relatively Permanent Water (seasonal)
Flow Regime	Perennial
National Wetland Inventory Code	Riverine
USGS 12 Digit HUC	071200050105 (Collins Run)
USGS StreamStats Drainage Area (SQ MI)	13.8
Riffles/Pools observed?	Yes
Dominant Substrate	Silt and sand
Linear Feet within Study Area	1,218 (11.2 acres)
Mussel shell material observed?	No
Biologically Significant Stream (IDNR)?	No
Stream Integrity/Diversity Rating	Not Rated
QHEI Score & Classification	49; fair habitat quality

Saratoga Creek is located adjacent to the south of the project study area; the project will not impact this waterway. Drainageways shown on USGS StreamStats were not observed during the site visit, as they are likely captured by agricultural drainage tile.

3.5 NON-JURISDICTIONAL DITCHES

One (1) non-jurisdictional ditch, or drainageway, was observed within the study area. The ditch drained into and drained Wetland A to the south, providing connection to a downstream TNW. This drainageway lacked an OHWM, was vegetated, and is not anticipated to have flowing water for three consecutive months.

3.6 PONDS OR OTHER SURFACE WATERS

No ponds or other surface waters were identified within or adjacent to the project study area.

3.6 THREATENED AND ENDANGERED SPECIES

According to the USFWS Illinois County Distribution of Federally Threatened, Endangered, and Candidate Species dated May 9, 2017 and the IPaC species list, the project is located within the known or historic range of the following federally endangered or threatened species:

- Indiana bat (*Myotis sodalis*), endangered
- Northern long-eared bat (*Myotis septentrionalis*), threatened
- Scaleshell (*Leptodea leptodon*), endangered
- Rattlesnake-master borer moth (*Papaipema eryngii*), candidate
- Eastern prairie fringed orchid (*Plantanthera leucophaea*), threatened

There are no designated critical habitats within the project study area.

None of the wetlands had a native FQI score of 20 or greater or a Native Mean C of 3.5 or greater, and therefore Eastern prairie fringed orchid is likely not present. One tree within the study area was identified as a potential roost tree for the northern long-eared and Indiana bats was identified. Additional suitable habitat and a wooded riparian corridor was observed along Valley Run and Saratoga Creek within the study area. Valley Run did not exhibit a stable channel with a sand/gravel substrate and good water quality; therefore, it does not provide appropriate habitat for the scaleshell. No grassland or prairie habitats were observed within the study area; therefore, appropriate habitat for the rattlesnake-master borer moth is not present.

4.0 CONCLUSIONS

The project study area contains one stream (Valley Run) and one (1) wetland totaling approximately 11.9 acres of water resources. Wetland A is severely degraded and low quality, located within a stormwater drainage ditch, exhibiting a surface water connection to a TNW. The wetland may be federally jurisdictional. Valley Run is a perennial stream of fair habitat quality that ultimately flows to the Illinois River, a TNW.

Wetlands and other surface water resources that are considered waters of the U.S. are subject to regulation under Section 404 of the Clean Water Act (CWA) and the jurisdictional regulatory authority lies with the U.S. Army Corps of Engineers (USACE). In addition, the state of Illinois regulates isolated wetlands through the Interagency Wetland Policy Act (IWPA), and counties, townships and municipalities may have local zoning authority over certain types of wetlands and waterways.

No critical habitat for federally threatened or endangered species is located within the project study area. Portions of the project study area provide suitable habitat for the Indiana and Northern long-eared bat.

5.0 REFERENCES

The following references were consulted during the investigation:

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- United States Department of Agriculture (USDA) Midwestern wetland flora: Field office guide to plant species. USDA Soil Conservation Service, Midwest National Technical Center, Lincoln, Nebraska. Jamestown, ND: Northern Prairie Wildlife Research Center Home Page. http://www.npwrc.usgs.gov/resource/othrdata/plntguid/plntguid.htm (Version 16JUL97).
- United States Geological Survey (USGS): The National Map. (available online at http://nationalmap.usgs.gov/index.html). Reston, VA 20192 USA.
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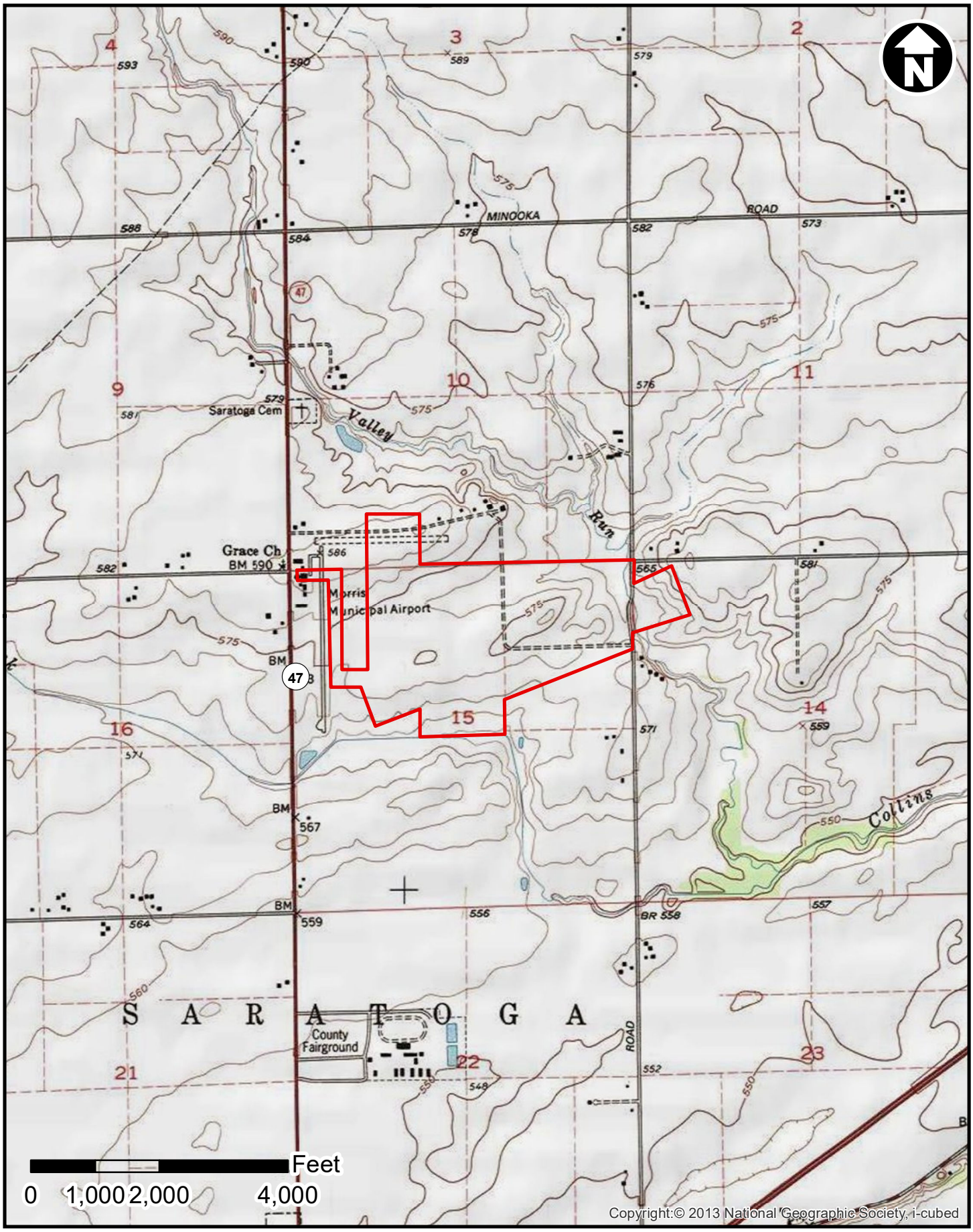
Runway 7/25 – Morris Municipal Airport

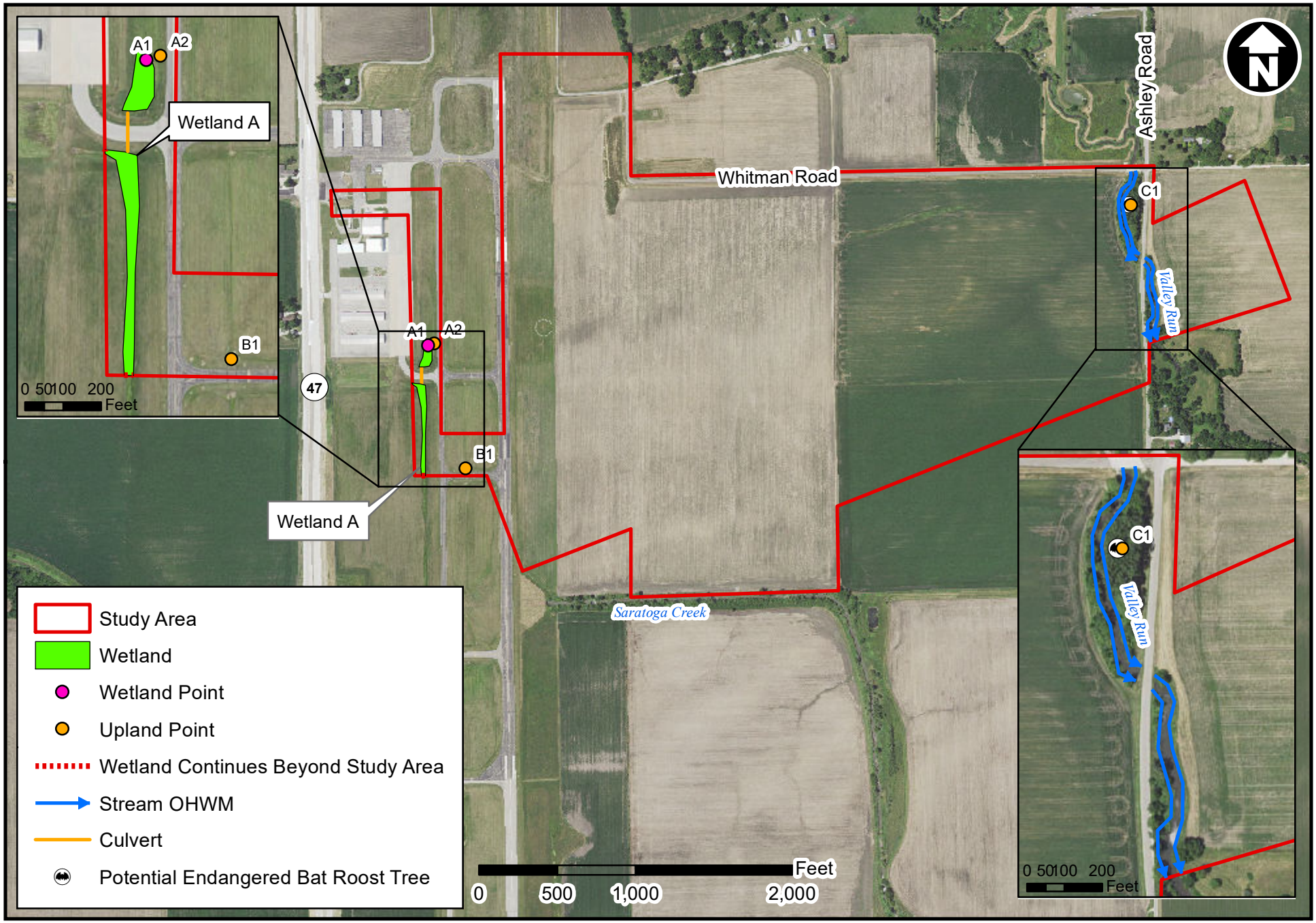
APPENDIX A: MAPPING



Morris Municipal Airport - Morris, Grundy Co.

USGS TOPOGRAPHIC MAP - LISBON, IL QUADRANGLE

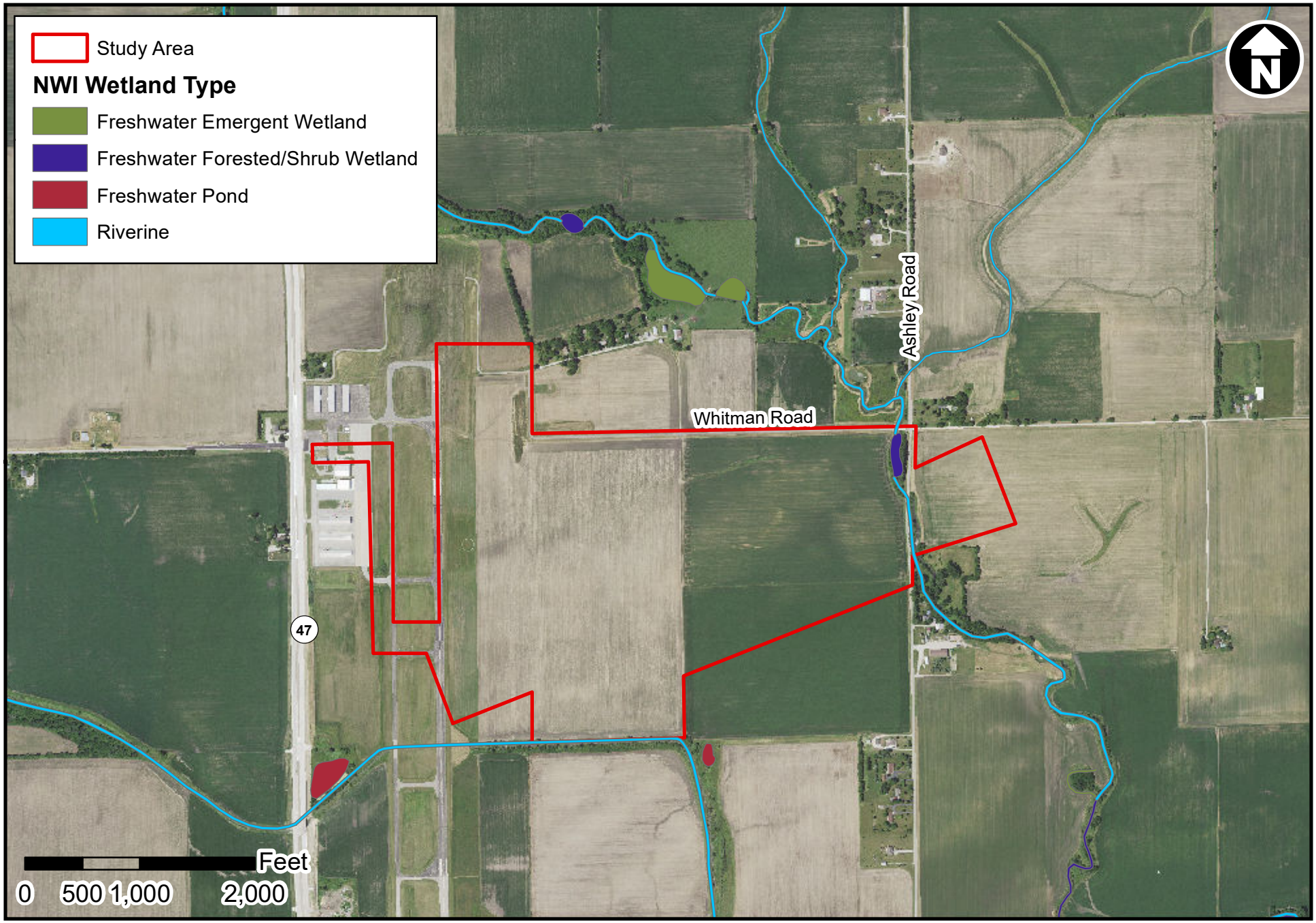
CMT
Crawford, Murphy & Tilly



Morris Municipal Airport - Morris, Grundy Co., IL

ECOLOGICAL RESOURCES MAP

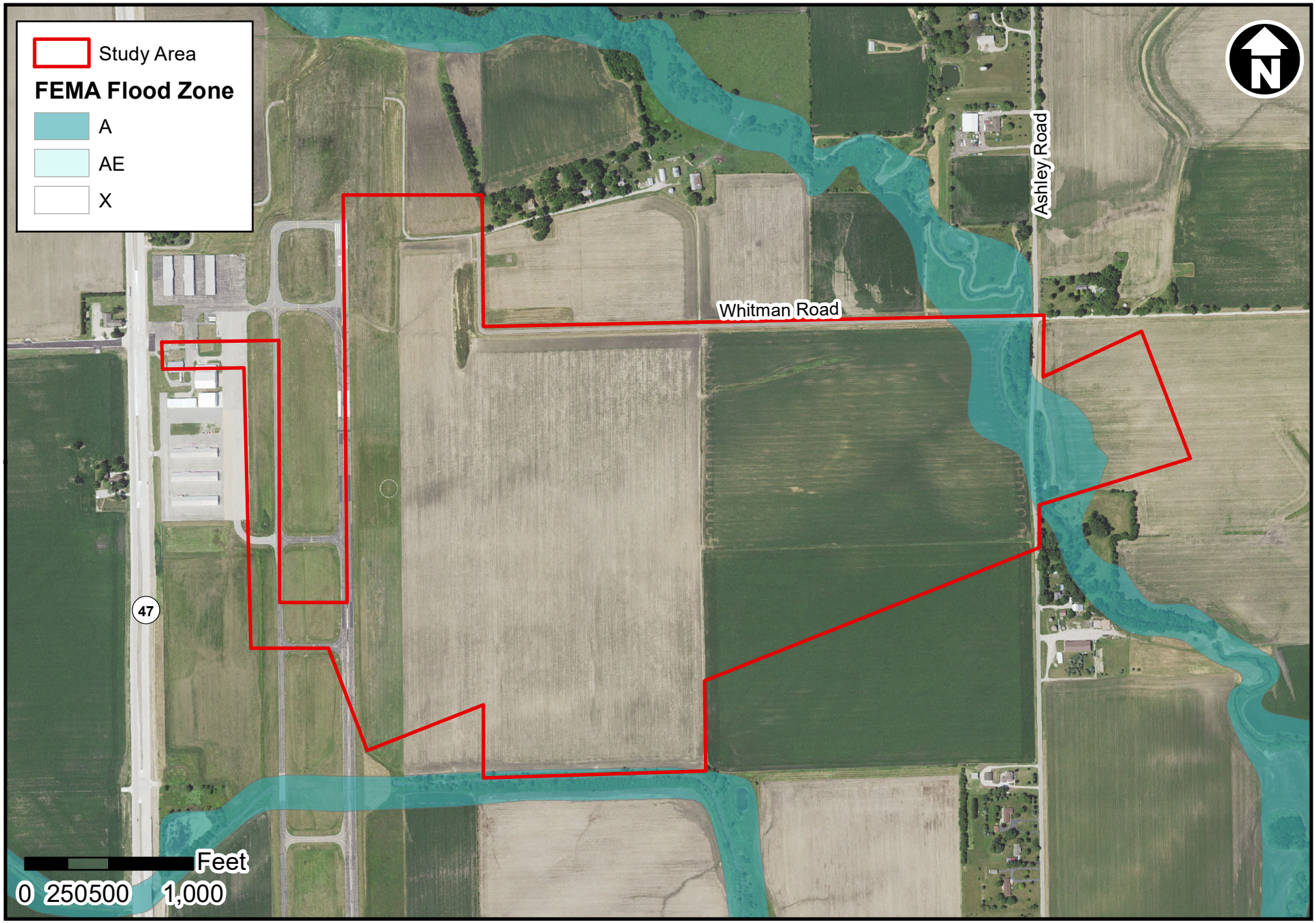
CMT
Crawford, Murphy & Tilly



Morris Municipal Airport - Morris, Grundy Co., IL

NATIONAL WETLAND INVENTORY MAP

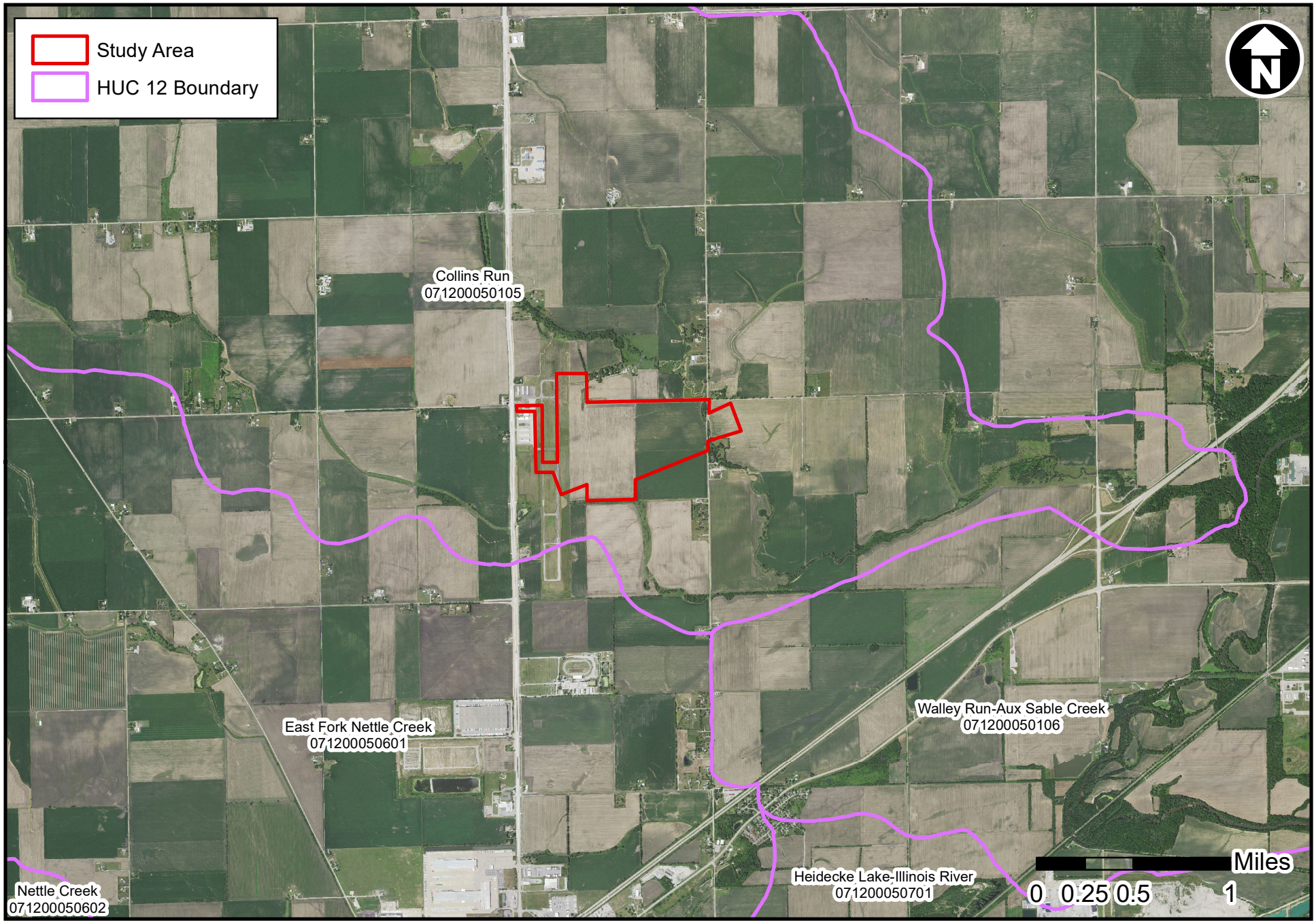
CMT
Crawford, Murphy & Tilly



Morris Municipal Airport - Morris, Grundy Co., IL

FEMA FLOODPLAIN MAP

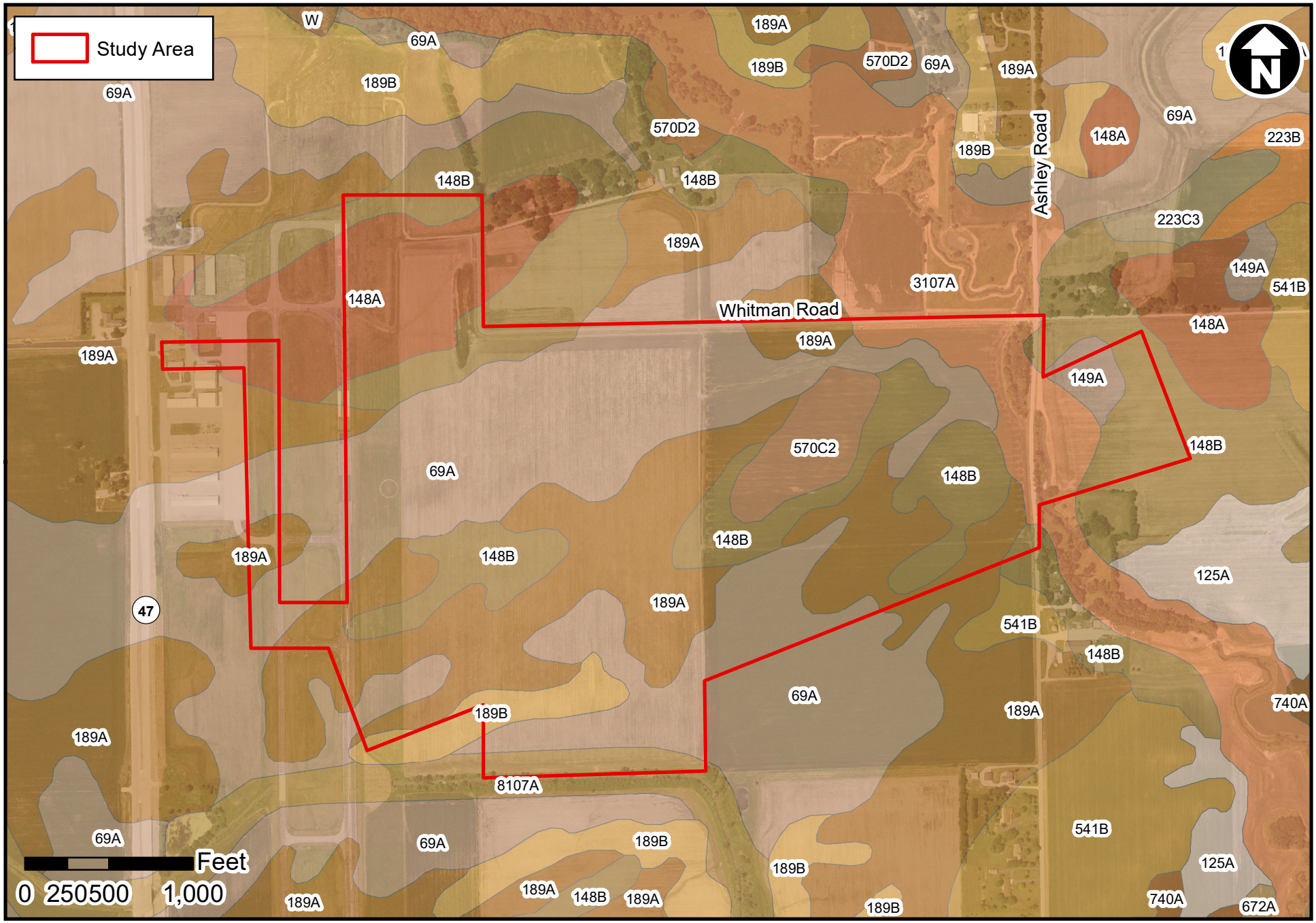
CMT
Crawford, Murphy & Tilly



Morris Municipal Airport - Morris, Grundy Co., IL

12-DIGIT HYDROLOGIC UNIT CODE MAP

CMT
Crawford, Murphy & Tilly



Morris Municipal Airport - Morris, Grundy Co., IL

NRCS SOILS MAP

CMT
Crawford, Murphy & Tilly

Map Unit Description (Brief, Generated)

The map units delineated on the detailed soil maps in a soil survey represent the soils or miscellaneous areas in the survey area. The map unit descriptions in this report, along with the maps, provide information on the composition of map units and properties of their components.

A map unit delineation on a soil map represents an area dominated by one or more major kinds of soil or miscellaneous areas. A map unit is identified and named according to the taxonomic classification of the dominant soils. Within a taxonomic class there are precisely defined limits for the properties of the soils. On the landscape, however, the soils are natural phenomena, and they have the characteristic variability of all natural phenomena. Thus, the range of some observed properties may extend beyond the limits defined for a taxonomic class. Areas of soils of a single taxonomic class rarely, if ever, can be mapped without including areas of other taxonomic classes. Consequently, every map unit is made up of the soils or miscellaneous areas for which it is named and some minor components that belong to taxonomic classes other than those of the major soils.

The Map Unit Description (Brief, Generated) report displays a generated description of the major soils that occur in a map unit. Descriptions of non-soil (miscellaneous areas) and minor map unit components are not included. This description is generated from the underlying soil attribute data.

Additional information about the map units described in this report is available in other Soil Data Mart reports, which give properties of the soils and the limitations, capabilities, and potentials for many uses. Also, the narratives that accompany the Soil Data Mart reports define some of the properties included in the map unit descriptions.

Report—Map Unit Description (Brief, Generated)

Grundy County, Illinois

Map Unit: 69A—Milford silty clay loam, 0 to 2 percent slopes

Component: Milford, drained (93%)

The Milford, drained component makes up 93 percent of the map unit. Slopes are 0 to 2 percent. This component is on lake plains on plains. The parent material consists of clayey lacustrine deposits. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is poorly drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is high. This soil is not flooded. It is frequently ponded. A seasonal zone of water saturation is at 6 inches during January, February, March, April, May. Organic matter content in the surface horizon is about 5 percent. This component is in the R110XY008IL Wet Glacial Drift Upland Prairie ecological site. Nonirrigated land capability classification is 2w. This soil meets hydric criteria.

Component: Peotone, drained (5%)

Generated brief soil descriptions are created for major soil components. The Peotone, drained soil is a minor component.

Component: Urban land (1%)

Generated brief soil descriptions are created for major soil components. The Urban land soil is a minor component.

Component: Orthents, clayey (1%)

Generated brief soil descriptions are created for major soil components. The Orthents, clayey soil is a minor component.

Map Unit: 148A—Proctor silt loam, 0 to 2 percent slopes

Component: Proctor (95%)

The Proctor component makes up 95 percent of the map unit. Slopes are 0 to 2 percent. This component is on outwash plains on plains. The parent material consists of loess over stratified loamy outwash. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is well drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is low. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches. Organic matter content in the surface horizon is about 4 percent. This component is in the R108AY012IL Outwash Prairie ecological site. Nonirrigated land capability classification is 1. This soil does not meet hydric criteria. There are no saline horizons within 30 inches of the soil surface.

Component: Brenton (5%)

Generated brief soil descriptions are created for major soil components. The Brenton soil is a minor component.

Map Unit: 148B—Proctor silt loam, 2 to 5 percent slopes

Component: Proctor (95%)

The Proctor component makes up 95 percent of the map unit. Slopes are 2 to 5 percent. This component is on outwash plains on plains. The parent material consists of loess over stratified loamy outwash. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is well drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is low. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches. Organic matter content in the surface horizon is about 4 percent. This component is in the R108AY012IL Outwash Prairie ecological site. Nonirrigated land capability classification is 2e. This soil does not meet hydric criteria. There are no saline horizons within 30 inches of the soil surface.

Component: Brenton (5%)

Generated brief soil descriptions are created for major soil components. The Brenton soil is a minor component.

Map Unit: 149A—Brenton silt loam, 0 to 2 percent slopes

Component: Brenton (97%)

The Brenton component makes up 97 percent of the map unit. Slopes are 0 to 2 percent. This component is on outwash plains on plains. The parent material consists of loess over stratified loamy outwash. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is somewhat poorly drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is moderate. This soil is not flooded. It is not ponded. A seasonal zone of water saturation is at 18 inches during January, February, March, April, May. Organic matter content in the surface horizon is about 4 percent. This component is in the R111DY020IN Outwash Prairie, Wet Outwash Mollisol ecological site. Nonirrigated land capability classification is 1. This soil does not meet hydric criteria. There are no saline horizons within 30 inches of the soil surface.

Component: Drummer, drained (3%)

Generated brief soil descriptions are created for major soil components. The Drummer, drained soil is a minor component.

Map Unit: 189A—Martinton silt loam, 0 to 2 percent slopes

Component: Martinton (92%)

The Martinton component makes up 92 percent of the map unit. Slopes are 0 to 2 percent. This component is on lake plains. The parent material consists of lacustrine deposits. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is somewhat poorly drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is high. This soil is not flooded. It is not ponded. A seasonal zone of water saturation is at 18 inches during January, February, March, April, May. Organic matter content in the surface horizon is about 5 percent. This component is in the R110XY007IL Moist Glacial Drift Upland Prairie ecological site. Nonirrigated land capability classification is 1. This soil does not meet hydric criteria. The calcium carbonate equivalent within 40 inches, typically, does not exceed 18 percent.

Component: Milford (4%)

Generated brief soil descriptions are created for major soil components. The Milford soil is a minor component.

Component: Urban land (2%)

Generated brief soil descriptions are created for major soil components. The Urban land soil is a minor component.

Component: Orthents, clayey (2%)

Generated brief soil descriptions are created for major soil components. The Orthents, clayey soil is a minor component.

Map Unit: 189B—Martinton silt loam, 2 to 4 percent slopes

Component: Martinton (93%)

The Martinton component makes up 93 percent of the map unit. Slopes are 2 to 4 percent. This component is on lake plains. The parent material consists of lacustrine deposits. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is somewhat poorly drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is moderate. This soil is not flooded. It is not ponded. A seasonal zone of water saturation is at 18 inches during January, February, March, April, May. Organic matter content in the surface horizon is about 5 percent. This component is in the R110XY007IL Moist Glacial Drift Upland Prairie ecological site. Nonirrigated land capability classification is 2e. This soil does not meet hydric criteria. The calcium carbonate equivalent within 40 inches, typically, does not exceed 18 percent.

Component: Milford (4%)

Generated brief soil descriptions are created for major soil components. The Milford soil is a minor component.

Component: Ashkum (3%)

Generated brief soil descriptions are created for major soil components. The Ashkum soil is a minor component.

Map Unit: 570C2—Martinsville loam, 4 to 6 percent slopes, eroded

Component: Martinsville (92%)

The Martinsville component makes up 92 percent of the map unit. Slopes are 4 to 6 percent. This component is on stream terraces. The parent material consists of Outwash. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is well drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is moderate. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches. Organic matter content in the surface horizon is about 2 percent. This component is in the F110XY011IL Dry Glacial Drift Upland Forest ecological site. Nonirrigated land capability classification is 2e. This soil does not meet hydric criteria.

Map Unit: 3107A—Sawmill silty clay loam, heavy till plain, 0 to 2 percent slopes, frequently flooded

Component: Sawmill, heavy till plain, frequently flooded (95%)

The Sawmill, heavy till plain, frequently flooded component makes up 95 percent of the map unit. Slopes are 0 to 2 percent. This component is on flood plains on till plains. The parent material consists of alluvium. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is poorly drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is moderate. This soil is frequently flooded. It is frequently ponded. A seasonal zone of water saturation is at 6 inches during January, February, March, April, May. Organic matter content in the surface horizon is about 3 percent. This component is in the R110XY027IL Ponded Floodplain Marsh ecological site. Nonirrigated land capability classification is 3w. This soil meets hydric criteria. There are no saline horizons within 30 inches of the soil surface.

Component: Millington, heavy till plain, frequently flooded (5%)

Generated brief soil descriptions are created for major soil components. The Millington, heavy till plain, frequently flooded soil is a minor component.

Map Unit: 8107A—Sawmill silty clay loam, 0 to 2 percent slopes, occasionally flooded

Component: Sawmill, occasionally flooded (92%)

The Sawmill, occasionally flooded component makes up 92 percent of the map unit. Slopes are 0 to 2 percent. This component is on flood plains, till plains. The parent material consists of alluvium. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is poorly drained. Water movement in the most restrictive layer is moderately high. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is moderate. This soil is occasionally flooded. It is frequently ponded. A seasonal zone of water saturation is at 6 inches during January, February, March, April, May. Organic matter content in the surface horizon is about 3 percent. This component is in the R115CY016IL Ponded Floodplain Marsh, Wet Loamy Floodplain Forest Acer Saccharinum-populus Deltoides/vitis Riparia-parthenocissus Quinquefolia/pilea Pumila-laportea C (silver Maple-eastern Cottonwood/riverbank Grape-virginia Creeper/canadian Clearweed-canadian Woodne ecological site. Nonirrigated land capability classification is 2w. This soil meets hydric criteria. There are no saline horizons within 30 inches of the soil surface.

Component: Lawson, occasionally flooded (4%)

Generated brief soil descriptions are created for major soil components. The Lawson, occasionally flooded soil is a minor component.

Component: Radford, occasionally flooded (2%)

Generated brief soil descriptions are created for major soil components. The Radford, occasionally flooded soil is a minor component.

Component: Ross, occasionally flooded (2%)

Generated brief soil descriptions are created for major soil components. The Ross, occasionally flooded soil is a minor component.

Data Source Information

Soil Survey Area: Grundy County, Illinois
Survey Area Data: Version 15, May 29, 2020

Runway 7/25 – Morris Municipal Airport

APPENDIX B: DATA FORMS

WETLAND DETERMINATION DATA FORM – Midwest Region

Project/Site: Morris Municipal Airport | City/County: Morris/Grundy | Sampling Date: 9/23/2020

Applicant/Owner: City of Morris | State: IL | Sampling Point: A1

Investigator(s): Patrick VerHalen & Alex Zelles, CMT | Section, Township, Range: S14, T34N, R7E

Landform (hillside, terrace, etc.): Ditch depression | Local relief (concave, convex, none): Concave

Slope (%): 2 | Lat: 41.427530 | Long: -88.420460 | Datum: NAD 83

Soil Map Unit Name: 69A - Milford silty clay loam, 0 to 2 percent slopes | NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No ____ (If no, explain in Remarks.)

Are Vegetation ____, Soil ____, or Hydrology ____ significantly disturbed? Are "Normal Circumstances" present? Yes X No ____

Are Vegetation ____, Soil ____, or Hydrology ____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes X	No ____	**Is the Sampled Area within a Wetland?** **Yes** X **No** ____
Hydric Soil Present?	Yes X	No ____	
Wetland Hydrology Present?	Yes X	No ____	

Remarks:
Wetland continues west and south beyond study area within stormwater management ditch feature. Drains to Saratoga Creek.

VEGETATION – Use scientific names of plants.

Tree Stratum (Plot size: 30')	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
5.			
	____ =Total Cover		
Sapling/Shrub Stratum (Plot size: 15')			
1.			
2.			
3.			
4.			
5.			
	____ =Total Cover		
Herb Stratum (Plot size: 5')			
1. *Typha angustifolia*	50	Yes	OBL
2. *Echinochloa crus-galli*	40	Yes	FACW
3. *Cyperus esculentus*	10	No	FACW
4.			
5.			
6.			
7.			
8.			
9.			
10.			
	100 =Total Cover		
Woody Vine Stratum (Plot size: 15')			
1.			
2.			
	____ =Total Cover		

Dominance Test worksheet:

Number of Dominant Species That Are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 2 (B)

Percent of Dominant Species That Are OBL, FACW, or FAC: 100.0% (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:	
OBL species	50	x 1 =	50
FACW species	50	x 2 =	100
FAC species	0	x 3 =	0
FACU species	0	x 4 =	0
UPL species	0	x 5 =	0
Column Totals:	100 (A)		150 (B)

Prevalence Index = B/A = 1.50

Hydrophytic Vegetation Indicators:

____ 1 - Rapid Test for Hydrophytic Vegetation

X 2 - Dominance Test is >50%

X 3 - Prevalence Index is ≤3.0[1]

____ 4 - Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)

____ Problematic Hydrophytic Vegetation[1] (Explain)

[1]Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? **Yes** X **No** ____

Remarks: (Include photo numbers here or on a separate sheet.)

SOIL

Sampling Point: A1

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth	Matrix		Redox Features					
(inches)	Color (moist)	%	Color (moist)	%	Type[1]	Loc[2]	Texture	Remarks
0-2	10YR 2/2	100					Muck	
2-7	2.5Y 2.5/1	100	10YR 5/6	2	C	PL	Loamy/Clayey	Prominent redox concentrations
7-8	5Y 4/1	100					Loamy/Clayey	
8-24	10YR 2/1	100					Loamy/Clayey	
24-27	5Y 4/1	100	5Y 6/4	2	C	PL	Loamy/Clayey	Distinct redox concentrations

[1]Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains. [2]Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators:

- ___ Histosol (A1)
- ___ Histic Epipedon (A2)
- ___ Black Histic (A3)
- ___ Hydrogen Sulfide (A4)
- ___ Stratified Layers (A5)
- ___ 2 cm Muck (A10)
- ___ Depleted Below Dark Surface (A11)
- ___ Thick Dark Surface (A12)
- ___ Sandy Mucky Mineral (S1)
- ___ 5 cm Mucky Peat or Peat (S3)
- ___ Sandy Gleyed Matrix (S4)
- ___ Sandy Redox (S5)
- ___ Stripped Matrix (S6)
- ___ Dark Surface (S7)
- ___ Loamy Mucky Mineral (F1)
- ___ Loamy Gleyed Matrix (F2)
- ___ Depleted Matrix (F3)
- X Redox Dark Surface (F6)
- ___ Depleted Dark Surface (F7)
- ___ Redox Depressions (F8)

Indicators for Problematic Hydric Soils[3]:

- ? Coast Prairie Redox (A16)
- ___ Iron-Manganese Masses (F12)
- ___ Red Parent Material (F21)
- ___ Very Shallow Dark Surface (F22)
- ___ Other (Explain in Remarks)

[3]Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed):

Type: ___

Depth (inches): ___

Hydric Soil Present? **Yes** X **No** ___

Remarks:

This data form is revised from Midwest Regional Supplement Version 2.0 to include the NRCS Field Indicators of Hydric Soils, Version 7.0, 2015 Errata. (http://www.nrcs.usda.gov/Internet/FSE_DOCUMENTS/nrcs142p2_051293.docx)

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one is required; check all that apply)

- ___ Surface Water (A1)
- ___ High Water Table (A2)
- ___ Saturation (A3)
- ___ Water Marks (B1)
- ___ Sediment Deposits (B2)
- ___ Drift Deposits (B3)
- X Algal Mat or Crust (B4)
- ___ Iron Deposits (B5)
- ___ Inundation Visible on Aerial Imagery (B7)
- ___ Sparsely Vegetated Concave Surface (B8)
- ___ Water-Stained Leaves (B9)
- ___ Aquatic Fauna (B13)
- ___ True Aquatic Plants (B14)
- ___ Hydrogen Sulfide Odor (C1)
- ___ Oxidized Rhizospheres on Living Roots (C3)
- ___ Presence of Reduced Iron (C4)
- ___ Recent Iron Reduction in Tilled Soils (C6)
- ___ Thin Muck Surface (C7)
- ___ Gauge or Well Data (D9)
- ___ Other (Explain in Remarks)

Secondary Indicators (minimum of two required)

- ___ Surface Soil Cracks (B6)
- ___ Drainage Patterns (B10)
- ___ Dry-Season Water Table (C2)
- X Crayfish Burrows (C8)
- X Saturation Visible on Aerial Imagery (C9)
- ___ Stunted or Stressed Plants (D1)
- ___ Geomorphic Position (D2)
- X FAC-Neutral Test (D5)

Field Observations:

Surface Water Present?	Yes ___	No X	Depth (inches): ___
Water Table Present?	Yes ___	No X	Depth (inches): ___
Saturation Present? (includes capillary fringe)	Yes ___	No X	Depth (inches): ___

Wetland Hydrology Present? **Yes** X **No** ___

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

Stormwater management feature - ditch depression. Drainage continues south to Saratoga Creek.

WETLAND DETERMINATION DATA FORM – Midwest Region

Project/Site: Morris Municipal Airport | City/County: Morris/Grundy | Sampling Date: 9/23/2020

Applicant/Owner: City of Morris | State: IL | Sampling Point: A2

Investigator(s): Patrick VerHalen & Alex Zelles, CMT | Section, Township, Range: S14, T34N, R7E

Landform (hillside, terrace, etc.): Ditch depression | Local relief (concave, convex, none): Concave

Slope (%): 2 | Lat: 41.427543 | Long: -88.420357 | Datum: NAD 83

Soil Map Unit Name: 69A - Milford silty clay loam, 0 to 2 percent slopes | NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No ____ (If no, explain in Remarks.)

Are Vegetation ____, Soil ____, or Hydrology ____ significantly disturbed? Are "Normal Circumstances" present? Yes X No ____

Are Vegetation ____, Soil ____, or Hydrology ____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes ____	No X	**Is the Sampled Area within a Wetland?** Yes ____ No X
Hydric Soil Present?	Yes X	No ____	
Wetland Hydrology Present?	Yes ____	No X	

Remarks:

VEGETATION – Use scientific names of plants.

Tree Stratum (Plot size: 30')	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
5.			
	=Total Cover		
Sapling/Shrub Stratum (Plot size: 15')			
1.			
2.			
3.			
4.			
5.			
	=Total Cover		
Herb Stratum (Plot size: 5')			
1. *Setaria pumila*	40	Yes	FAC
2. *Trifolium repens*	40	Yes	FACU
3. *Plantago lanceolata*	20	Yes	FACU
4.			
5.			
6.			
7.			
8.			
9.			
10.			
	100 =Total Cover		
Woody Vine Stratum (Plot size: 15')			
1.			
2.			
	=Total Cover		

Dominance Test worksheet:

Number of Dominant Species That Are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 3 (B)

Percent of Dominant Species That Are OBL, FACW, or FAC: 33.3% (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:	
OBL species	0	x 1 =	0
FACW species	0	x 2 =	0
FAC species	40	x 3 =	120
FACU species	60	x 4 =	240
UPL species	0	x 5 =	0
Column Totals:	100 (A)		360 (B)

Prevalence Index = B/A = 3.60

Hydrophytic Vegetation Indicators:

____ 1 - Rapid Test for Hydrophytic Vegetation

____ 2 - Dominance Test is >50%

____ 3 - Prevalence Index is ≤3.0[1]

____ 4 - Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)

____ Problematic Hydrophytic Vegetation[1] (Explain)

[1]Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes ____ No X

Remarks: (Include photo numbers here or on a separate sheet.)

SOIL

Sampling Point: A2

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth	Matrix		Redox Features					
(inches)	Color (moist)	%	Color (moist)	%	Type[1]	Loc[2]	Texture	Remarks
0-3	10YR 3/2	100					Loamy/Clayey	Silty clay; 1% CF
3-9	10YR 2/1	100	10YR 5/2	5	D	M	Loamy/Clayey	Silty clay
			10YR 5/8	2	C	M		Prominent redox concentrations
9-16	2.5Y 5/4	95	7.5YR 5/6	2	C	M	Loamy/Clayey	Prominent redox concentrations
			10YR 4/2	2	D	M		
16-24	10YR 2/1	40					Loamy/Clayey	Silty clay
	10YR 4/4	30						

[1]Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains. [2]Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators:

- ___ Histosol (A1)
- ___ Histic Epipedon (A2)
- ___ Black Histic (A3)
- ___ Hydrogen Sulfide (A4)
- ___ Stratified Layers (A5)
- ___ 2 cm Muck (A10)
- ___ Depleted Below Dark Surface (A11)
- ___ Thick Dark Surface (A12)
- ___ Sandy Mucky Mineral (S1)
- ___ 5 cm Mucky Peat or Peat (S3)
- ___ Sandy Gleyed Matrix (S4)
- ___ Sandy Redox (S5)
- ___ Stripped Matrix (S6)
- ___ Dark Surface (S7)
- ___ Loamy Mucky Mineral (F1)
- ___ Loamy Gleyed Matrix (F2)
- ___ Depleted Matrix (F3)
- X Redox Dark Surface (F6)
- ___ Depleted Dark Surface (F7)
- ___ Redox Depressions (F8)

Indicators for Problematic Hydric Soils[3]:

- ___ Coast Prairie Redox (A16)
- ___ Iron-Manganese Masses (F12)
- ___ Red Parent Material (F21)
- ___ Very Shallow Dark Surface (F22)
- ___ Other (Explain in Remarks)

[3]Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed):

Type: _____

Depth (inches): _____

Hydric Soil Present? **Yes** X **No** ___

Remarks:

This data form is revised from Midwest Regional Supplement Version 2.0 to include the NRCS Field Indicators of Hydric Soils, Version 7.0, 2015 Errata. (http://www.nrcs.usda.gov/Internet/FSE_DOCUMENTS/nrcs142p2_051293.docx)

16-24" - Third matrix color (10YR 5/1; 30%; silty clay)

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one is required; check all that apply)

- ___ Surface Water (A1)
- ___ High Water Table (A2)
- ___ Saturation (A3)
- ___ Water Marks (B1)
- ___ Sediment Deposits (B2)
- ___ Drift Deposits (B3)
- ___ Algal Mat or Crust (B4)
- ___ Iron Deposits (B5)
- ___ Inundation Visible on Aerial Imagery (B7)
- ___ Sparsely Vegetated Concave Surface (B8)
- ___ Water-Stained Leaves (B9)
- ___ Aquatic Fauna (B13)
- ___ True Aquatic Plants (B14)
- ___ Hydrogen Sulfide Odor (C1)
- ___ Oxidized Rhizospheres on Living Roots (C3)
- ___ Presence of Reduced Iron (C4)
- ___ Recent Iron Reduction in Tilled Soils (C6)
- ___ Thin Muck Surface (C7)
- ___ Gauge or Well Data (D9)
- ___ Other (Explain in Remarks)

Secondary Indicators (minimum of two required)

- ___ Surface Soil Cracks (B6)
- ___ Drainage Patterns (B10)
- ___ Dry-Season Water Table (C2)
- ___ Crayfish Burrows (C8)
- ___ Saturation Visible on Aerial Imagery (C9)
- ___ Stunted or Stressed Plants (D1)
- ___ Geomorphic Position (D2)
- ___ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes ___ No X Depth (inches): ___

Water Table Present? Yes ___ No X Depth (inches): ___

Saturation Present? Yes ___ No X Depth (inches): ___

(includes capillary fringe)

Wetland Hydrology Present? **Yes** ___ **No** X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM – Midwest Region

Project/Site: Morris Municipal Airport City/County: Morris/Grundy Sampling Date: 9/23/2020

Applicant/Owner: City of Morris State: IL Sampling Point: B1

Investigator(s): Patrick VerHalen & Alex Zelles, CMT Section, Township, Range: S14, T34N, R7E

Landform (hillside, terrace, etc.): Ditch depression Local relief (concave, convex, none): Concave

Slope (%): 2 Lat: 41.425486 Long: -88.419615 Datum: NAD 83

Soil Map Unit Name: 189A - Martinton silt loam, 0 to 2 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No ____ (If no, explain in Remarks.)

Are Vegetation ____, Soil ____, or Hydrology ____ significantly disturbed? Are "Normal Circumstances" present? Yes X No ____

Are Vegetation ____, Soil ____, or Hydrology ____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes X	No ____	**Is the Sampled Area within a Wetland?** **Yes** ____ **No** X
Hydric Soil Present?	Yes ____	No X	
Wetland Hydrology Present?	Yes X	No ____	

Remarks:

VEGETATION – Use scientific names of plants.

Tree Stratum (Plot size: 30')	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
5.			
	____ =Total Cover		
Sapling/Shrub Stratum (Plot size: 15')			
1.			
2.			
3.			
4.			
5.			
	____ =Total Cover		
Herb Stratum (Plot size: 5')			
1. *Setaria pumila*	60	Yes	FAC
2. *Persicaria maculosa*	40	Yes	FACW
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
	100 =Total Cover		
Woody Vine Stratum (Plot size: 15')			
1.			
2.			
	____ =Total Cover		

Dominance Test worksheet:

Number of Dominant Species That Are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 2 (B)

Percent of Dominant Species That Are OBL, FACW, or FAC: 100.0% (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:	
OBL species	0	x 1 =	0
FACW species	40	x 2 =	80
FAC species	60	x 3 =	180
FACU species	0	x 4 =	0
UPL species	0	x 5 =	0
Column Totals:	100 (A)		260 (B)

Prevalence Index = B/A = 2.60

Hydrophytic Vegetation Indicators:

____ 1 - Rapid Test for Hydrophytic Vegetation

X 2 - Dominance Test is >50%

____ 3 - Prevalence Index is ≤3.0[1]

____ 4 - Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)

____ Problematic Hydrophytic Vegetation[1] (Explain)

[1]Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? **Yes** X **No** ____

Remarks: (Include photo numbers here or on a separate sheet.)

SOIL

Sampling Point: B1

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth	Matrix		Redox Features					
(inches)	Color (moist)	%	Color (moist)	%	Type[1]	Loc[2]	Texture	Remarks
0-13	10YR 2/2	80					Loamy/Clayey	Silty clay, 3% CF
	10YR 4/3	20						
13-18	10YR 5/4	100	10YR 4/3	1	D	M	Loamy/Clayey	Very compacted, 5% CF
			10YR 5/6	1	C	PL		Distinct redox concentrations

[1]Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains.

[2]Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators:

- ___ Histosol (A1)
- ___ Histic Epipedon (A2)
- ___ Black Histic (A3)
- ___ Hydrogen Sulfide (A4)
- ___ Stratified Layers (A5)
- ___ 2 cm Muck (A10)
- ___ Depleted Below Dark Surface (A11)
- ___ Thick Dark Surface (A12)
- ___ Sandy Mucky Mineral (S1)
- ___ 5 cm Mucky Peat or Peat (S3)
- ___ Sandy Gleyed Matrix (S4)
- ___ Sandy Redox (S5)
- ___ Stripped Matrix (S6)
- ___ Dark Surface (S7)
- ___ Loamy Mucky Mineral (F1)
- ___ Loamy Gleyed Matrix (F2)
- ___ Depleted Matrix (F3)
- ___ Redox Dark Surface (F6)
- ___ Depleted Dark Surface (F7)
- ___ Redox Depressions (F8)

Indicators for Problematic Hydric Soils[3]:

- ___ Coast Prairie Redox (A16)
- ___ Iron-Manganese Masses (F12)
- ___ Red Parent Material (F21)
- ___ Very Shallow Dark Surface (F22)
- ___ Other (Explain in Remarks)

[3]Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed):

Type: _____

Depth (inches): _____

Hydric Soil Present? **Yes** ___ **No** X

Remarks:

This data form is revised from Midwest Regional Supplement Version 2.0 to include the NRCS Field Indicators of Hydric Soils, Version 7.0, 2015 Errata. (http://www.nrcs.usda.gov/Internet/FSE_DOCUMENTS/nrcs142p2_051293.docx)

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one is required; check all that apply)

- ___ Surface Water (A1)
- ___ High Water Table (A2)
- ___ Saturation (A3)
- ___ Water Marks (B1)
- ___ Sediment Deposits (B2)
- ___ Drift Deposits (B3)
- ___ Algal Mat or Crust (B4)
- ___ Iron Deposits (B5)
- ___ Inundation Visible on Aerial Imagery (B7)
- ___ Sparsely Vegetated Concave Surface (B8)
- ___ Water-Stained Leaves (B9)
- ___ Aquatic Fauna (B13)
- ___ True Aquatic Plants (B14)
- ___ Hydrogen Sulfide Odor (C1)
- ___ Oxidized Rhizospheres on Living Roots (C3)
- ___ Presence of Reduced Iron (C4)
- ___ Recent Iron Reduction in Tilled Soils (C6)
- ___ Thin Muck Surface (C7)
- ___ Gauge or Well Data (D9)
- ___ Other (Explain in Remarks)

Secondary Indicators (minimum of two required)

- ___ Surface Soil Cracks (B6)
- ___ Drainage Patterns (B10)
- ___ Dry-Season Water Table (C2)
- ___ Crayfish Burrows (C8)
- ___ Saturation Visible on Aerial Imagery (C9)
- ___ Stunted or Stressed Plants (D1)
- X Geomorphic Position (D2)
- X FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes ___ No X Depth (inches): ___

Water Table Present? Yes ___ No X Depth (inches): ___

Saturation Present? (includes capillary fringe) Yes ___ No X Depth (inches): ___

Wetland Hydrology Present? **Yes** X **No** ___

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

Inlet to culvert, drains through stormwater drainage ditch to Saratoga Creek

WETLAND DETERMINATION DATA FORM – Midwest Region

Project/Site: Morris Municipal Airport | City/County: Morris/Grundy | Sampling Date: 9/23/2020

Applicant/Owner: City of Morris | State: IL | Sampling Point: C1

Investigator(s): Patrick VerHalen & Alex Zelles, CMT | Section, Township, Range: S14, T34N, R7E

Landform (hillside, terrace, etc.): Floodplain terrace | Local relief (concave, convex, none): None

Slope (%): 0 | Lat: 41.430091 | Long: -88.404112 | Datum: NAD 83

Soil Map Unit Name: 3107A - Sawmill silty clay loam, heavy till plain, 0 to 2 percent slopes, frequently flooded | NWI classification: PF01

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No ____ (If no, explain in Remarks.)

Are Vegetation ____, Soil ____, or Hydrology ____ significantly disturbed? Are "Normal Circumstances" present? Yes X No ____

Are Vegetation ____, Soil ____, or Hydrology ____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes X	No ____	**Is the Sampled Area within a Wetland?** Yes ____ No X
Hydric Soil Present?	Yes ____	No X	
Wetland Hydrology Present?	Yes X	No ____	

Remarks:
Located within Valley Run floodplain.

VEGETATION – Use scientific names of plants.

Tree Stratum (Plot size: 30')	Absolute % Cover	Dominant Species?	Indicator Status
1. *Populus deltoides*	60	Yes	FAC
2. *Celtis occidentalis*	10	No	FAC
3. *Ulmus rubra*	10	No	FAC
4.			
5.			
	80	=Total Cover	
Sapling/Shrub Stratum (Plot size: 15')			
1. *Sambucus nigra*	20	Yes	FAC
2. *Acer negundo*	5	Yes	FAC
3.			
4.			
5.			
	25	=Total Cover	
Herb Stratum (Plot size: 5')			
1. *Bidens bipinnata*	10	Yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
	10	=Total Cover	
Woody Vine Stratum (Plot size: 15')			
1. *Parthenocissus quinquefolia*	75	Yes	FACU
2. *Toxcodendron radicans*	5	No	
	80	=Total Cover	

Dominance Test worksheet:

Number of Dominant Species That Are OBL, FACW, or FAC: 4 (A)

Total Number of Dominant Species Across All Strata: 5 (B)

Percent of Dominant Species That Are OBL, FACW, or FAC: 80.0% (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:	
OBL species	0	x 1 =	0
FACW species	0	x 2 =	0
FAC species	115	x 3 =	345
FACU species	75	x 4 =	300
UPL species	0	x 5 =	0
Column Totals:	190 (A)		645 (B)

Prevalence Index = B/A = 3.39

Hydrophytic Vegetation Indicators:

____ 1 - Rapid Test for Hydrophytic Vegetation

X 2 - Dominance Test is >50%

____ 3 - Prevalence Index is ≤3.0[1]

____ 4 - Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)

____ Problematic Hydrophytic Vegetation[1] (Explain)

[1]Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes X No ____

Remarks: (Include photo numbers here or on a separate sheet.)

SOIL

Sampling Point: C1

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix Color (moist)	Matrix %	Redox Features Color (moist)	Redox Features %	Type[1]	Loc[2]	Texture	Remarks
0-20	10YR 2/2	100					Loamy/Clayey	

[1]Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains.

[2]Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators:

- ___ Histosol (A1)
- ___ Histic Epipedon (A2)
- ___ Black Histic (A3)
- ___ Hydrogen Sulfide (A4)
- ___ Stratified Layers (A5)
- ___ 2 cm Muck (A10)
- ___ Depleted Below Dark Surface (A11)
- ___ Thick Dark Surface (A12)
- ___ Sandy Mucky Mineral (S1)
- ___ 5 cm Mucky Peat or Peat (S3)
- ___ Sandy Gleyed Matrix (S4)
- ___ Sandy Redox (S5)
- ___ Stripped Matrix (S6)
- ___ Dark Surface (S7)
- ___ Loamy Mucky Mineral (F1)
- ___ Loamy Gleyed Matrix (F2)
- ___ Depleted Matrix (F3)
- ___ Redox Dark Surface (F6)
- ___ Depleted Dark Surface (F7)
- ___ Redox Depressions (F8)

Indicators for Problematic Hydric Soils[3]:

- ___ Coast Prairie Redox (A16)
- ___ Iron-Manganese Masses (F12)
- ___ Red Parent Material (F21)
- ___ Very Shallow Dark Surface (F22)
- ___ Other (Explain in Remarks)

[3]Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed):

Type: ___

Depth (inches): ___

Hydric Soil Present? **Yes** ___ **No** X

Remarks:

This data form is revised from Midwest Regional Supplement Version 2.0 to include the NRCS Field Indicators of Hydric Soils, Version 7.0, 2015 Errata. (http://www.nrcs.usda.gov/Internet/FSE_DOCUMENTS/nrcs142p2_051293.docx)

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one is required; check all that apply)

- ___ Surface Water (A1)
- ___ High Water Table (A2)
- ___ Saturation (A3)
- X Water Marks (B1)
- ___ Sediment Deposits (B2)
- ___ Drift Deposits (B3)
- ___ Algal Mat or Crust (B4)
- ___ Iron Deposits (B5)
- ___ Inundation Visible on Aerial Imagery (B7)
- ___ Sparsely Vegetated Concave Surface (B8)
- ___ Water-Stained Leaves (B9)
- ___ Aquatic Fauna (B13)
- ___ True Aquatic Plants (B14)
- ___ Hydrogen Sulfide Odor (C1)
- ___ Oxidized Rhizospheres on Living Roots (C3)
- ___ Presence of Reduced Iron (C4)
- ___ Recent Iron Reduction in Tilled Soils (C6)
- ___ Thin Muck Surface (C7)
- ___ Gauge or Well Data (D9)
- ___ Other (Explain in Remarks)

Secondary Indicators (minimum of two required)

- ___ Surface Soil Cracks (B6)
- ___ Drainage Patterns (B10)
- ___ Dry-Season Water Table (C2)
- ___ Crayfish Burrows (C8)
- ___ Saturation Visible on Aerial Imagery (C9)
- ___ Stunted or Stressed Plants (D1)
- ___ Geomorphic Position (D2)
- ___ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present?	Yes ___	No X	Depth (inches): ___
Water Table Present?	Yes ___	No X	Depth (inches): ___
Saturation Present? (includes capillary fringe)	Yes ___	No X	Depth (inches): ___

Wetland Hydrology Present? **Yes** X **No** ___

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

Located within Valley Run floodplain; extremely faint water marks, and minor evidence of sediment deposition.

Inventory Assessment

Edit This Inventory | Download Report | Done

Wetland A

» Date & Location:

2020-09-23
Morris Airport - C09
Morris
Grundy, IL, USA

» FQA Database:

Region: **Illinois**
Year Published: **2020**
Description:
Illinois 1997 list with family names (edited by C. Benda)

» Details:

Practitioner: **Alex Zelles**
Latitude: 41.427530
Longitude: -88.420460
Weather Notes: 80F, sunny
Duration Notes:
Community Type Notes:
Other Notes:
This assessment is **private** (viewable only by you).

» Conservatism-Based Metrics:

Total Mean C: **0.7**
Native Mean C: **1.8**
Total FQI: **2.2**
Native FQI: **3.6**
Adjusted FQI: **11.4**
% C value 0: **70%**
% C value 1-3: **30%**
% C value 4-6: **0%**
% C value 7-10: **0%**
Native Tree Mean C: **3**
Native Shrub Mean C: **n/a**
Native Herbaceous Mean C: **1.3**

» Species Richness:

Total Species: **10**
Native Species: **4 (40%)**
Non-native Species: **6 (60%)**

» Species Wetness:

Mean Wetness: **-2.1**
Native Mean Wetness: **-4.3**

» Physiognomy Metrics:

Tree: **1 (10%)**
Shrub: **0 (0%)**
Vine: **0 (0%)**
Forb: **4 (40%)**
Grass: **3 (30%)**
Sedge: **2 (20%)**
Rush: **0 (0%)**
Fern: **0 (0%)**
Bryophyte: **0 (0%)**

» Duration Metrics:

Annual: **3 (30%)**
Perennial: **7 (70%)**
Biennial: **0 (0%)**

Native Annual: **0 (0%)**
Native Perennial: **4 (40%)**
Native Biennial: **0 (0%)**

» Species:

Scientific Name	Family	Acronym	Native?	C	W	Physiognomy	Duration	Common Name
Cirsium arvense	Asteraceae	CIRARV	non-native	0	3	forb	perennial	field thistle

Cyperus esculentus	Cyperaceae	CYPESC	native	0	-3	sedge	perennial	field nut sedge
Echinochloa crusgalli	Poaceae	ECHCRU	non-native	0	-3	grass	annual	barnyard grass
Eleocharis erythropoda	Cyperaceae	ELEERY	native	3	-5	sedge	perennial	red-rooted spike rush
Phragmites australis	Poaceae	PHRAUS	native	1	-4	grass	perennial	common reed
Polygonum persicaria	Polygonaceae	POLPER	non-native	0	-3	forb	annual	ladys thumb
Rumex crispus	Polygonaceae	RUMCRP	non-native	0	-1	forb	perennial	curly dock
Salix nigra	Salicaceae	SALNIG	native	3	-5	tree	perennial	black willow
Setaria viridis	Poaceae	SETVIV	non-native	0	5	grass	annual	green foxtail
Typha angustifolia	Typhaceae	TYPANG	non-native	0	-5	forb	perennial	narrow-leaved cattail

Ohio EPA — Qualitative Habitat Evaluation Index and Use Assessment Field Sheet

QHEI Score: 49

Stream & Location: Valley Run — Morris Municipal Airport
RM: _ _ _._ **Date:** 9 / 23 / 20
Scorers Full Name & Affiliation: Alex Zelles, CMT
River Code: _ _ _-_ _ _-_ _ _ **STORET #:** _ _ _ _ _ _ **Lat./ Long.:** (NAD 83 - decimal °) 41 . 430464 / 88 . 404095 **Office verified location** ■

1] SUBSTRATE
Check *ONLY* **Two** substrate *TYPE BOXES*; estimate % or note every type present

BEST TYPES	POOL	RIFFLE	OTHER TYPES	POOL	RIFFLE
☐ ☐ BLDR /SLABS [10]	0%	0%	☐ ☐ HARDPAN [4]	0%	0%
☐ ☐ BOULDER [9]	0%	0%	☐ ☐ DETRITUS [3]	0%	0%
☐ ☐ COBBLE [8]	0%	50%	☐ ☐ MUCK [2]	0%	0%
☐ ☐ GRAVEL [7]	0%	40%	☐ ■ SILT [2]	60%	0%
☐ ■ SAND [6]	40%	10%	☐ ☐ ARTIFICIAL [0]	0%	0%
☐ ☐ BEDROCK [5]	0%	0%			

(Score natural substrates; ignore sludge from point-sources)

NUMBER OF BEST TYPES: ☐ 4 or more [2] ■ 3 or less [0]

Comments

Check ONE (*Or 2 & average*)

ORIGIN
- ■ LIMESTONE [1]
- ☐ TILLS [1]
- ☐ WETLANDS [0]
- ☐ HARDPAN [0]
- ☐ SANDSTONE [0]
- ☐ RIP/RAP [0]
- ☐ LACUSTURINE [0]
- ☐ SHALE [-1]
- ☐ COAL FINES [-2]

QUALITY

SILT
- ☐ HEAVY [-2]
- ■ MODERATE [-1]
- ☐ NORMAL [0]
- ☐ FREE [1]

EMBEDDEDNESS
- ☐ EXTENSIVE [-2]
- ■ MODERATE [-1]
- ☐ NORMAL [0]
- ☐ NONE [1]

Substrate 8.0 — *Maximum 20*

2] INSTREAM COVER
Indicate presence 0 to 3: **0**-Absent; **1**-Very small amounts or if more common of marginal quality; **2**-Moderate amounts, but not of highest quality or in small amounts of highest quality; **3**-Highest quality in moderate or greater amounts (e.g., very large boulders in deep or fast water, large diameter log that is stable, well developed rootwad in deep / fast water, or deep, well-defined, functional pools.

- ____ UNDERCUT BANKS [1]
- ____ OVERHANGING VEGETATION [1]
- ____ SHALLOWS (IN SLOW WATER) [1]
- ____ ROOTMATS [1]
- ____ POOLS > 70cm [2]
- ____ ROOTWADS [1]
- ____ BOULDERS [1]
- 1 OXBOWS, BACKWATERS [1]
- 1 AQUATIC MACROPHYTES [1]
- 1 LOGS OR WOODY DEBRIS [1]

AMOUNT Check ONE (*Or 2 & average*)
- ☐ EXTENSIVE >75% [11]
- ☐ MODERATE 25-75% [7]
- ■ SPARSE 5-<25% [3]
- ☐ NEARLY ABSENT <5% [1]

Comments
Beaver dam has formed backwater behind and riffle in front

Cover 6.0 — *Maximum 20*

3] CHANNEL MORPHOLOGY
Check ONE in each category (*Or 2 & average*)

SINUOSITY	DEVELOPMENT	CHANNELIZATION	STABILITY
☐ HIGH [4]	☐ EXCELLENT [7]	☐ NONE [6]	☐ HIGH [3]
■ MODERATE [3]	☐ GOOD [5]	☐ RECOVERED [4]	■ MODERATE [2]
☐ LOW [2]	■ FAIR [3]	■ RECOVERING [3]	☐ LOW [1]
☐ NONE [1]	☐ POOR [1]	☐ RECENT OR NO RECOVERY [1]	

Comments

Channel 11 — *Maximum 20*

4] BANK EROSION AND RIPARIAN ZONE
Check **ONE** in each category for ***EACH BANK*** (*Or 2 per bank & average*)

River right looking downstream

EROSION (L R)
- ☐ ☐ NONE / LITTLE [3]
- ☑ ■ MODERATE [2]
- ☐ ☐ HEAVY / SEVERE [1]

RIPARIAN WIDTH (L R)
- ☐ ☐ WIDE > 50m [4]
- ☐ ☐ MODERATE 10-50m [3]
- ☑ ■ NARROW 5-10m [2]
- ☐ ☐ VERY NARROW < 5m [1]
- ☐ ☐ NONE [0]

FLOOD PLAIN QUALITY (L R)
- ☑ ☐ FOREST, SWAMP [3]
- ☐ ☐ SHRUB OR OLD FIELD [2]
- ☐ ☐ RESIDENTIAL, PARK, NEW FIELD [1]
- ☐ ☐ FENCED PASTURE [1]
- ☐ ■ OPEN PASTURE, ROWCROP [0]
- ☐ ☐ CONSERVATION TILLAGE [1]
- ☐ ☐ URBAN OR INDUSTRIAL [0]
- ☐ ☐ MINING / CONSTRUCTION [0]

Indicate predominant land use(s) past 100m riparian.

Comments
Flashy storm flow due to surrounding ag use

Riparian 7.0 — *Maximum 10*

5] POOL / GLIDE AND RIFFLE / RUN QUALITY

MAXIMUM DEPTH Check **ONE** (*ONLY!*)
- ☐ > 1m [6]
- ■ 0.7-<1m [4]
- ☐ 0.4-<0.7m [2]
- ☐ 0.2-<0.4m [1]
- ☐ < 0.2m [0]

CHANNEL WIDTH Check ONE (*Or 2 & average*)
- ☐ POOL WIDTH > RIFFLE WIDTH [2]
- ■ POOL WIDTH = RIFFLE WIDTH [1]
- ☐ POOL WIDTH < RIFFLE WIDTH [0]

CURRENT VELOCITY Check ALL that apply
- ☐ TORRENTIAL [-1]
- ☐ VERY FAST [1]
- ☐ FAST [1]
- ☐ MODERATE [1]
- ■ SLOW [1]
- ☐ INTERSTITIAL [-1]
- ☐ INTERMITTENT [-2]
- ☐ EDDIES [1]

Indicate for reach - pools and riffles.

Recreation Potential
Primary Contact
Secondary Contact
(circle one and comment on back)

Comments

Pool / Current 6.0 — *Maximum 12*

Indicate for functional riffles; Best areas must be large enough to support a population of riffle-obligate species: Check ONE (*Or 2 & average*). ☐ NO RIFFLE [metric=0]

RIFFLE DEPTH
- ☐ BEST AREAS > 10cm [2]
- ■ BEST AREAS 5-10cm [1]
- ☐ BEST AREAS < 5cm [metric=0]

RUN DEPTH
- ☐ MAXIMUM > 50cm [2]
- ■ MAXIMUM < 50cm [1]

RIFFLE / RUN SUBSTRATE
- ☐ STABLE (e.g., Cobble, Boulder) [2]
- ■ MOD. STABLE (e.g., Large Gravel) [1]
- ☐ UNSTABLE (e.g., Fine Gravel, Sand) [0]

RIFFLE / RUN EMBEDDEDNESS
- ☐ NONE [2]
- ■ LOW [1]
- ☐ MODERATE [0]
- ☐ EXTENSIVE [-1]

Comments

Riffle / Run 4.0 — *Maximum 8*

6] GRADIENT (8 ft/mi)
DRAINAGE AREA (13.8 mi²)

- ☐ VERY LOW - LOW [2-4]
- ■ MODERATE [6-10]
- ☐ HIGH - VERY HIGH [10-6]

%POOL: 10% %GLIDE: 75%
%RUN: 10% %RIFFLE: 5%

Gradient 7 — *Maximum 10*

A] SAMPLED REACH

Check ALL that apply

METHOD

- [ ] BOAT
- [x] WADE
- [ ] L. LINE
- [ ] OTHER

DISTANCE

- [ ] 0.5 Km
- [ ] 0.2 Km
- [ ] 0.15 Km
- [ ] 0.12 Km
- [ ] OTHER

356 meters

STAGE

1st -sample pass-	2nd
[ ] HIGH	[ ]
[ ] UP	[ ]
[ ] NORMAL	[ ]
[x] LOW	[ ]
[ ] DRY	[ ]

CLARITY

1st --sample pass--	2nd
[x] < 20 cm	[ ]
[ ] 20-<40 cm	[ ]
[ ] 40-70 cm	[ ]
[ ] > 70 cm/ CTB	[ ]
[ ] SECCHI DEPTH	[ ]

1st pass _____ cm

2nd _____ cm

CANOPY

- [ ] > 85%- OPEN
- [x] 55%-<85%
- [ ] 30%-<55%
- [ ] 10%-<30%
- [ ] <10%- CLOSED

Comment RE: Reach consistency/ Is reach typical of steam?, *Recreation/* Observed - Inferred, *Other/* Sampling observations, Concerns, Access directions, etc.

Sediment and nutrient input from adjacent and surrounding agricultural fields.

B] AESTHETICS

- [ ] NUISANCE ALGAE
- [ ] INVASIVE MACROPHYTES
- [ ] EXCESS TURBIDITY
- [ ] DISCOLORATION
- [ ] FOAM / SCUM
- [ ] OIL SHEEN
- [ ] TRASH / LITTER
- [ ] NUISANCE ODOR
- [ ] SLUDGE DEPOSITS
- [ ] CSOs/SSOs/OUTFALLS

C] RECREATION

	AREA	DEPTH
POOL:	[ ] >100ft²	[ ] >3ft

D] MAINTENANCE

Circle some & *COMMENT*

PUBLIC / PRIVATE / BOTH / NA
ACTIVE / HISTORIC / BOTH / NA
YOUNG-SUCCESSION-OLD
SPRAY / SNAG / REMOVED
MODIFIED / DIPPED OUT / NA
LEVEED / ONE SIDED
RELOCATED / CUTOFFS
MOVING-BEDLOAD-STABLE
ARMOURED / SLUMPS
ISLANDS / SCOURED
IMPOUNDED / DESICCATED
FLOOD CONTROL / DRAINAGE

E] ISSUES

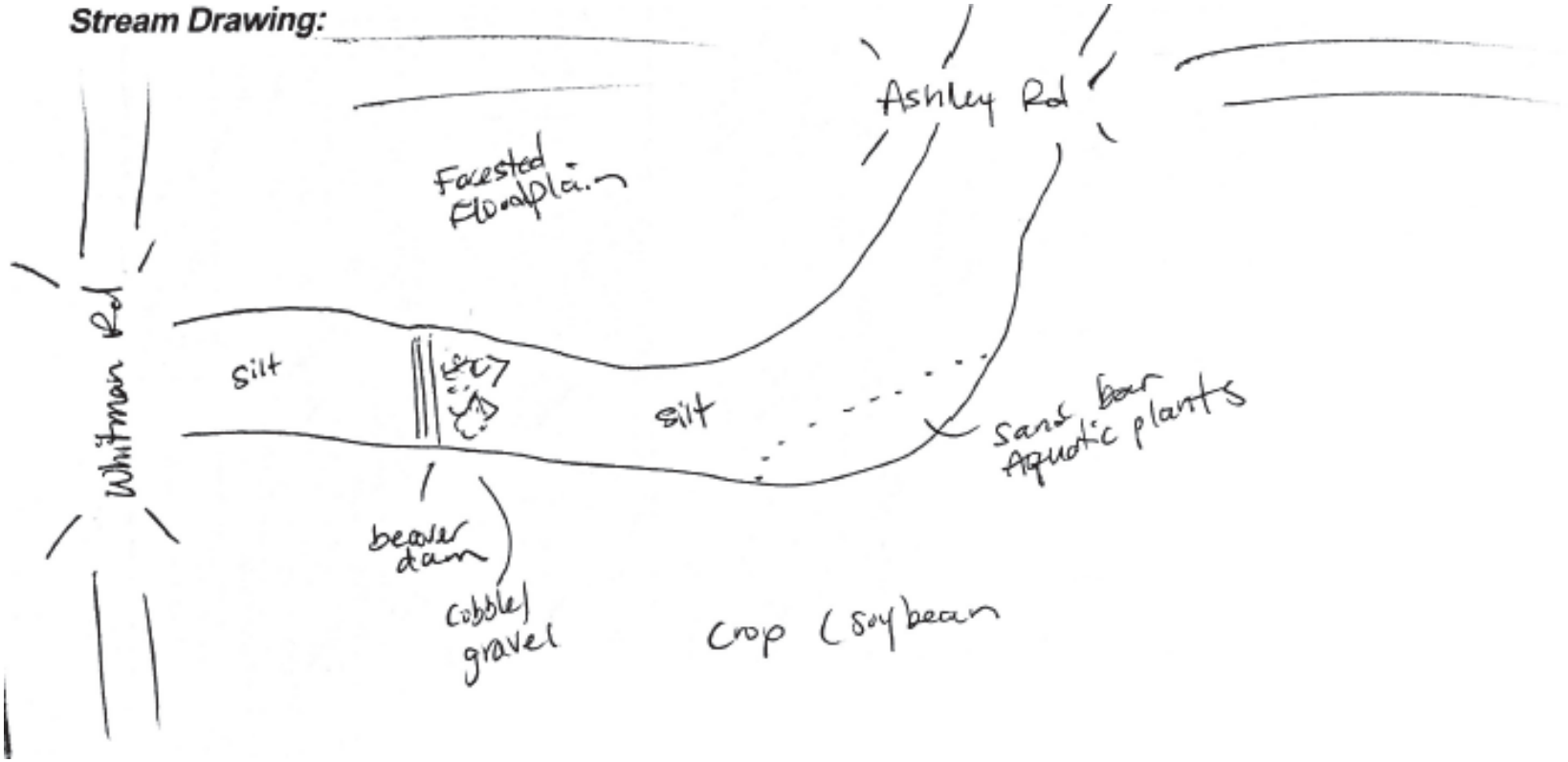
WWTP / CSO / NPDES / INDUSTRY
HARDENED / URBAN / DIRT&GRIME
CONTAMINATED / LANDFILL
BMPs-CONSTRUCTION-SEDIMENT
LOGGING / IRRIGATION / COOLING
BANK / EROSION / SURFACE
FALSE BANK / MANURE / LAGOON
WASH H_20 / TILE / H_20 TABLE
ACID / MINE / QUARRY / FLOW
NATURAL / WETLAND / STAGNANT
PARK / GOLF / LAWN / HOME
ATMOSPHERE / DATA PAUCITY

F] MEASUREMENTS

- $\bar{x}$ width
- $\bar{x}$ depth
- max. depth
- $\bar{x}$ bankfull width
- bankfull $\bar{x}$ depth
- W/D ratio
- bankfull max. depth
- floodprone x^2 width
- entrench. ratio

Legacy Tree:

Stream Drawing:



Runway 7/25 – Morris Municipal Airport

APPENDIX C: PHOTOGRAPHS

1. View west through northern portion of Wetland A.

2. View south through northern portion of Wetland A.

3. View north through northern portion of Wetland A.

4. View north through southern portion of Wetland A.

5. View upstream of Valley Run toward Whitman Road bridge.

6. View downstream of Valley Run from Whitman Road bridge.

7. View of beaver dam within Valley Run.

8. View downstream of Valley Run below beaver dam.

9. View downstream of Valley Run towards Ashley Road.

10. View downstream of Valley Run from Ashley Road.

11. Potential endangered bat roost tree with cavities at top (dead cottonwood; 15” dbh).

12. Representative wooded riparian corridor habitat.

May 19, 2022

Richard Borus
Illinois Department of Transportation
Division of Aeronautics
1 Langhorne Bond Drive
Springfield, IL 62707

RE: WETLAND IMPACT EVALUATION FOR MORRIS AIRPORT RUNWAY 7/25 PROJECT (SEQUENCE # 24334)

Dear Mr. Borus,

Below is information for a Wetland Impact Evaluation (WIE) for the Morris Airport Runway 7/25 project located in Morris, Grundy County, Illinois.

An Approved Jurisdictional Determination (AJD) from the U.S. Corps of Engineers has not been completed.

District: 3
Requesting Agency: Aeronautics

1. **Does this project have wetland impacts?** No **Type:** N/A
2. **Identify each wetland site being affected and acreage from each expected to be converted to other use(s).** No wetlands will be impacted by the project.
3. **Briefly describe the measures considered to avoid and minimize adverse impacts to the wetlands:** Reasonable alternatives are being evaluated in accordance with NEPA. The project has avoided impacts to Wetland A by shifting electrical utilities to the east of the existing Taxiway.
4. **Summarize briefly why there are no practicable alternatives to the use of the wetland(s):** The project has avoided impacts to Wetland A.
5. **Mitigation site:** N/A
6. **Mitigation basin:** N/A

A wetland impact exhibit and the wetland delineation report are attached. Please contact me at (630) 907-7072 or via email at azelles@cmtengr.com if you have any questions or need any additional information.

Most Sincerely,

CRAWFORD, MURPHY & TILLY, INC.

Alexandra M. Zelles, CSE
Environmental Scientist

WETLANDS IMPACT EVALUATION

(/environment/wieinstructions.pdf)

Note: Internet Explorer 5.0 (or higher) Browser required for submittal. Javascript must be enabled.

Submittal Date: 5/19/2022 **Sequence No.:** 24334 **District:** 3 **Requesting Agency:**

1. Does the project have wetland impacts? No **Type:**

2. Identify each wetland site being affected and acreage from each expected to be converted to other use(s).

Wetland Impacts and Mitigation Required Add Site

Site No.	Type	T&E	Nature Preserve	Natural Area	Essential Habitat	Size(acres)	Acres of Impact

3. Briefly describe the measures considered to avoid and minimize adverse impacts to the wetlands:

Reasonable alternatives are being evaluated in accordance with NEPA. The project has avoided impacts to Wetland A by shifting electrical utilities to the east of the existing Taxiway.

4. Summarize briefly why there are no practicable alternatives to the use of the wetland(s):

The project has avoided impacts to Wetland A.

5. Mitigation site: Don't Know

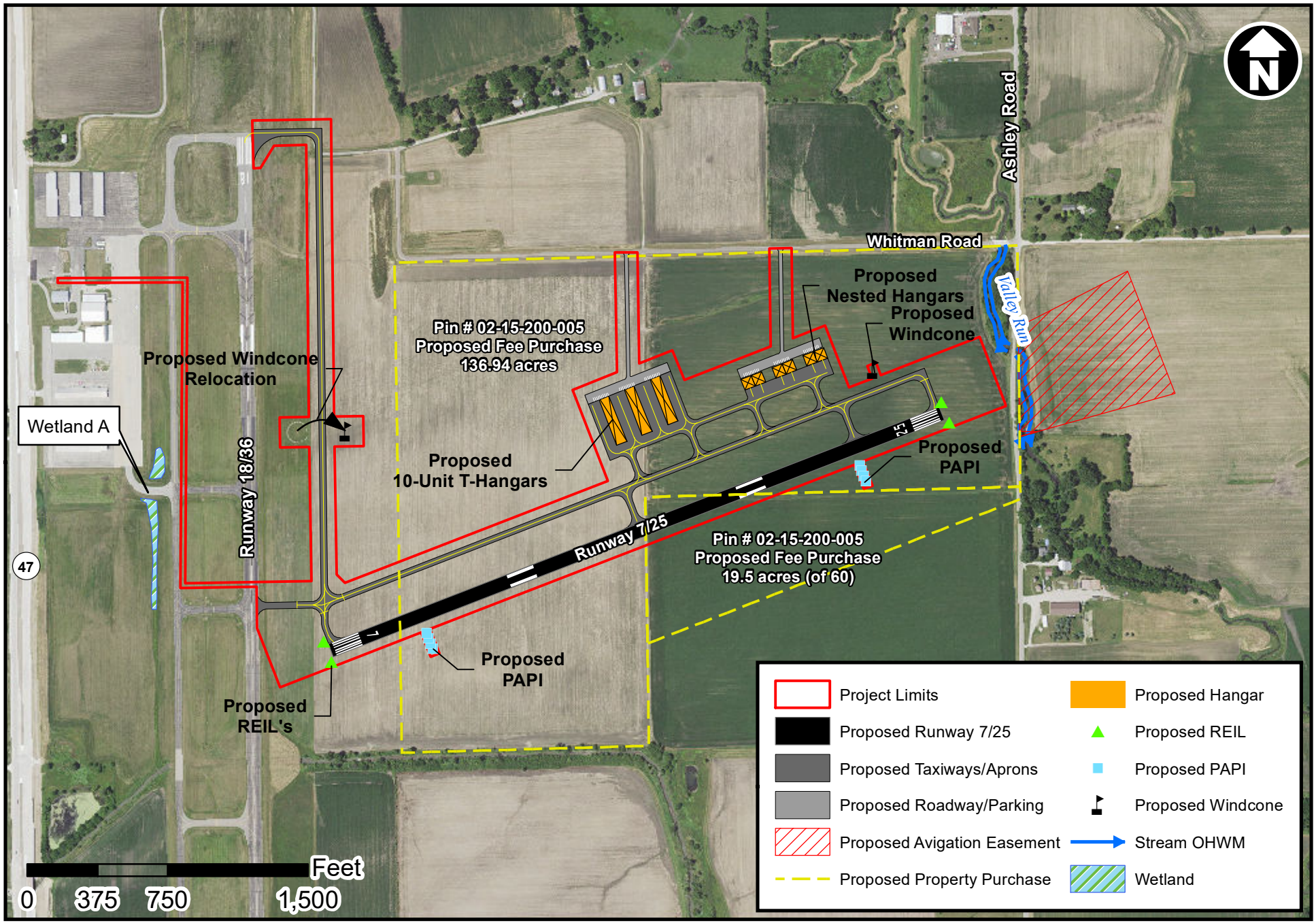
6. Mitigation basin: Don't Know

7. Local Contact Person: Richard Borus, P.E. **Telephone #:** (217) 785 - 0056 **ext.**
Title: Section Chief **E-Mail:** Richard.Borus@illinois.gov
Company: IDOT Division of Aeronautics

8. Additional Information: **Memo By:** Alexandra Zelles, CMT **Submitted By:** Alexandra Zelles, CMT

The project impacts exhibit and Wetland Delineation Report are attached separately via FileTransfer. The project will have no wetland impacts.

ESR Home Page | Clear Form | Submit Form



Morris Municipal Airport-James R. Washburn Field

Wetlands Impact Evaluation & Sponsor's Proposed Action (SPA) Exhibit

CMT
Crawford, Murphy & Tilly

Wetlands

Submittal Date: 10/01/2021 **Sequence No:** 24334
District: 3 **Requesting Agency:** Aero **Project No:**
Contract #: **Job No.:**
Counties: Grundy
Route: **Marked:** IL 47
Street: **Section:**
Municipality(ies): Morris **Project Length:** 1.4484 **km** 0.9 **miles**
FromTo (At): CR 10000N (Whitman Road) - Morris Municipal Airport
Quadrangle: Lisbon **Township-Range-Section:** T34N-R7E-S10, 14, 15
Anticipated Design Approval: 04/15/2022 **Cleared for Design Approval:** 10/03/2022
Cleared for Letting: 10/03/2022 **Mitigation:**

Wetland Impacts Evaluation

Submittal Date:	05/19/2022	**Submitted By:**	
Does the project have wetland impacts?	No	**Type:**	
Briefly describe the measures considered to avoid and minimize adverse impacts to the wetlands:	Reasonable alternatives are being evaluated in accordance with NEPA. The project has avoided impacts to Wetland A by shifting electrical utilities to the east of the existing Taxiway.		
Summarize briefly why there are no practicable alternatives to the use of the wetland(s):	The project has avoided impacts to Wetland A.		
Wetland mitigation is being proposed:		☑ **Reviewed**	

Memo Date:	05/19/2022	**Memo By:**	Alexandra Zelles, CMT
Memo:	The project impacts exhibit and Wetland Delineation Report are attached separately via FileTransfer. The project will have no wetland impacts.		

Wetland Impacts and Mitigation Required

Borus, Richard A

To: Hamer, Vincent
Subject: RE: Wetland Impact Evaluation for Seq 24334

From: Hamer, Vincent <Vincent.Hamer@illinois.gov>
Sent: Monday, October 3, 2022 8:45 AM
To: Borus, Richard A <Richard.Borus@illinois.gov>
Subject: RE: Wetland Impact Evaluation for Seq 24334

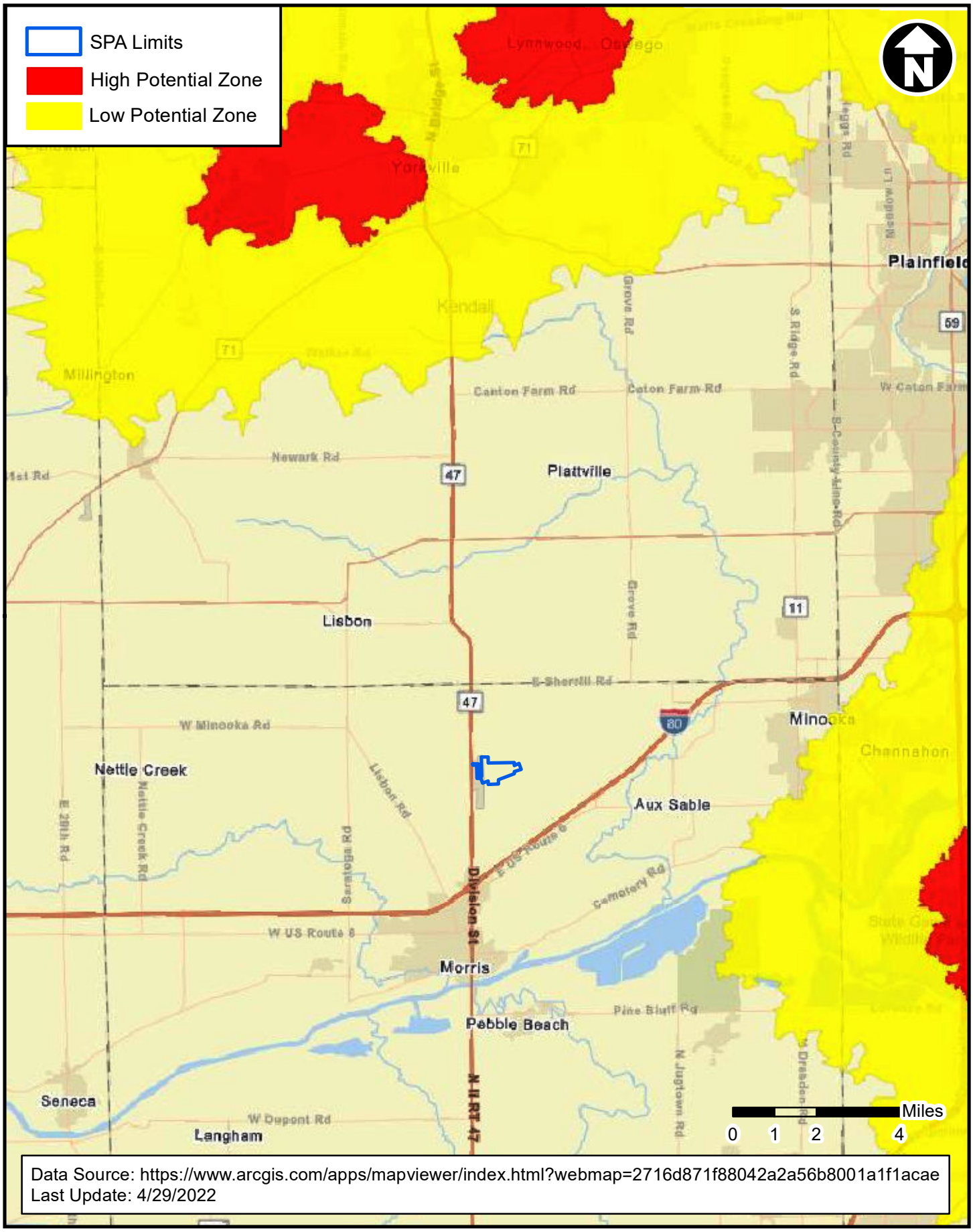
Thanks Rick.

This project is cleared for construction.

Vince

Vince:
The following attachment is regarding a WIE requested for the Morris Municipal Airport corresponding to project **C09-5011: Construct Crosswind Runway 7/25.** The original ESR sequence number is #24334 on this project. The WIE was accepted in the PMA database and attached to the ESR. The attached report should have all the information you need. Please let me know if there's anything additional they need to submit for review. Thanks.

Richard A. Borus, P.E.
Acting Bureau Chief of Airport Engineering
Section Chief - Airport Programming, Planning, & Environment
I.D.O.T. Div. of Aeronautics
Work: (217) 785-0056
Cell: (217) 993-2126
Richard.Borus@illinois.gov



Data Source: https://www.arcgis.com/apps/mapviewer/index.html?webmap=2716d871f88042a2a56b8001a1f1acae
Last Update: 4/29/2022

Morris Municipal Airport - Morris, Grundy Co., IL

RUSTY PATCHED BUMBLE BEE MAP

CMT
Crawford, Murphy & Tilly

United States Department of the Interior

FISH AND WILDLIFE SERVICE
Illinois-Iowa Ecological Services Field Office
Illinois & Iowa Ecological Services Field Office
1511 47th Ave
Moline, IL 61265-7022
Phone: (309) 757-5800 Fax: (309) 757-5807

In Reply Refer To:
Consultation code: 03E18000-2022-I-0177
Event Code: 03E18000-2022-E-00469
Project Name: 24334

October 29, 2021

Subject: Concurrence verification letter for the '24334' project under the revised February 5, 2018, FHWA, FRA, FTA Programmatic Biological Opinion for Transportation Projects within the Range of the Indiana Bat and Northern Long-eared Bat.

To whom it may concern:

The U.S. Fish and Wildlife Service (Service) has received your request to verify that the **24334** (Proposed Action) may rely on the concurrence provided in the February 5, 2018, FHWA, FRA, FTA Programmatic Biological Opinion for Transportation Projects within the Range of the Indiana Bat and Northern Long-eared Bat (PBO) to satisfy requirements under Section 7(a)(2) of the Endangered Species Act of 1973 (ESA) (87 Stat. 884, as amended; 16 U.S.C 1531 *et seq.*).

Based on the information you provided (Project Description shown below), you have determined that the Proposed Action is within the scope and adheres to the criteria of the PBO, including the adoption of applicable avoidance and minimization measures, and may affect, but is not likely to adversely affect (NLAA) the endangered Indiana bat (*Myotis sodalis*) and/or the threatened Northern long-eared bat (*Myotis septentrionalis*).

The Service has 14 calendar days to notify the lead Federal action agency or designated non-federal representative if we determine that the Proposed Action does not meet the criteria for a NLAA determination under the PBO. If we do not notify the lead Federal action agency or designated non-federal representative within that timeframe, you may proceed with the Proposed Action under the terms of the NLAA concurrence provided in the PBO. This verification period allows Service Field Offices to apply local knowledge to implementation of the PBO, as we may identify a small subset of actions having impacts that were unanticipated. In such instances, Service Field Offices may request additional information that is necessary to verify inclusion of the proposed action under the PBO.

For Proposed Actions that include bridge/structure removal, replacement, and/or maintenance activities: If your initial bridge/structure assessments failed to detect Indiana bats, but you later detect bats during construction, please submit the Post Assessment Discovery of Bats at Bridge/Structure Form (User Guide Appendix E) to this Service Office. In these instances, potential incidental take of Indiana bats may be exempted provided that the take is reported to the Service.

If the Proposed Action is modified, or new information reveals that it may affect the Indiana bat and/or Northern long-eared bat in a manner or to an extent not considered in the PBO, further review to conclude the requirements of ESA Section 7(a)(2) may be required. If the Proposed Action may affect any other federally-listed or proposed species, and/or any designated critical habitat, additional consultation between the lead Federal action agency and this Service Office is required. If the proposed action has the potential to take bald or golden eagles, additional coordination with the Service under the Bald and Golden Eagle Protection Act may also be required. In either of these circumstances, please contact this Service Office.

The following species may occur in your project area and **are not** covered by this determination:

- Eastern Prairie Fringed Orchid *Platanthera leucophaea* Threatened
- Monarch Butterfly *Danaus plexippus* Candidate
- Scaleshell Mussel *Leptodea leptodon* Endangered

Project Description

The following project name and description was collected in IPaC as part of the endangered species review process.

Name

24334

Description

Morris Airport
T34N/R7E/S10
Grundy County
Seq. #24334

The proposed project involves construction of new runway (Crosswind Runway 7/25), including land acquisition and navigation easements east of Runway 18-36. The project will also include construction of Taxiway C.

There will be 167 acres of land acquisition. There will not be in-stream work. There will be an undetermined amount of tree removal. Land cover in the vicinity of the proposed improvement is primarily agricultural land.

Determination Key Result

Based on your answers provided, this project(s) may affect, but is not likely to adversely affect the endangered Indiana bat and/or the threatened Northern long-eared bat, therefore, consultation with the U.S. Fish and Wildlife Service pursuant to Section 7(a)(2) of the Endangered Species Act of 1973 (ESA) (87 Stat. 884, as amended 16 U.S.C. 1531 *et seq.*) is required. However, also based on your answers provided, this project may rely on the concurrence provided in the revised February 5, 2018, FHWA, FRA, FTA Programmatic Biological Opinion for Transportation Projects within the Range of the Indiana Bat and Northern Long-eared Bat.

Qualification Interview

1. Is the project within the range of the Indiana bat[1]?

   [1] See Indiana bat species profile

   Automatically answered
   Yes

2. Is the project within the range of the Northern long-eared bat[1]?

   [1] See Northern long-eared bat species profile

   Automatically answered
   Yes

3. Which Federal Agency is the lead for the action?

   A) Federal Highway Administration (FHWA)

4. Are *all* project activities limited to non-construction[1] activities only? (examples of non-construction activities include: bridge/abandoned structure assessments, surveys, planning and technical studies, property inspections, and property sales)

   [1] Construction refers to activities involving ground disturbance, percussive noise, and/or lighting.

   No

5. Does the project include *any* activities that are **greater than** 300 feet from existing road/rail surfaces[1]?

   [1] Road surface is defined as the actively used [e.g. motorized vehicles] driving surface and shoulders [may be pavement, gravel, etc.] and rail surface is defined as the edge of the actively used rail ballast.

   No

6. Does the project include *any* activities **within** 0.5 miles of a known Indiana bat and/or NLEB hibernaculum[1]?

   [1] For the purpose of this consultation, a hibernaculum is a site, most often a cave or mine, where bats hibernate during the winter (see suitable habitat), but could also include bridges and structures if bats are found to be hibernating there during the winter.

   No

7. Is the project located **within** a karst area?

   No

8. Is there *any* suitable[1] summer habitat for Indiana Bat or NLEB **within** the project action area[2]? (includes any trees suitable for maternity, roosting, foraging, or travelling habitat)

   [1] See the Service's summer survey guidance for our current definitions of suitable habitat.

   [2] The action area is defined as all areas to be affected directly or indirectly by the Federal action and not merely the immediate area involved in the action (50 CFR Section 402.02). Further clarification is provided by the national consultation FAQs.

   Yes

9. Will the project remove *any* suitable summer habitat[1] and/or remove/trim any existing trees **within** suitable summer habitat?

   [1] See the Service's summer survey guidance for our current definitions of suitable habitat.

   Yes

10. Will the project clear more than 20 acres of suitable habitat per 5-mile section of road/rail?

    No

11. Have presence/probable absence (P/A) summer surveys[1][2] been conducted[3][4] **within** the suitable habitat located within your project action area?

    [1] See the Service's summer survey guidance for our current definitions of suitable habitat.

    [2] Presence/probable absence summer surveys conducted within the fall swarming/spring emergence home range of a documented Indiana bat hibernaculum (contact local Service Field Office for appropriate distance from hibernacula) that result in a negative finding requires additional consultation with the local Service Field Office to determine if clearing of forested habitat is appropriate and/or if seasonal clearing restrictions are needed to avoid and minimize potential adverse effects on fall swarming and spring emerging Indiana bats.

    [3] For projects within the range of either the Indiana bat or NLEB in which suitable habitat is present, and no bat surveys have been conducted, the transportation agency will assume presence of the appropriate species. This assumption of presence should be based upon the presence of suitable habitat and the capability of bats to occupy it because of their mobility.

    [4] Negative presence/probable absence survey results obtained using the summer survey guidance are valid for a minimum of two years from the completion of the survey unless new information (e.g., other nearby surveys) suggest otherwise.

    No

12. Does the project include activities **within documented Indiana bat habitat**[1][2]?

    [1] Documented roosting or foraging habitat – for the purposes of this consultation, we are considering documented habitat as that where Indiana bats and/or NLEB have actually been captured and tracked using (1) radio telemetry to roosts; (2) radio telemetry biangulation/triangulation to estimate foraging areas; or (3) foraging areas with repeated use documented using acoustics. Documented roosting habitat is also considered as suitable summer habitat within 0.25 miles of documented roosts.)

    [2] For the purposes of this key, we are considering documented corridors as that where Indiana bats and/or NLEB have actually been captured and tracked to using (1) radio telemetry; or (2) treed corridors located directly between documented roosting and foraging habitat.

    No

13. Will the removal or trimming of habitat or trees occur **within** suitable but **undocumented Indiana bat** roosting/foraging habitat or travel corridors?

    Yes

14. What time of year will the removal or trimming of habitat or trees **within** suitable but **undocumented Indiana bat** roosting/foraging habitat or travel corridors occur[1]?

    [1] Coordinate with the local Service Field Office for appropriate dates.

    B) During the inactive season

15. Does the project include activities **within documented NLEB habitat**[1][2]?

    [1] Documented roosting or foraging habitat – for the purposes of this consultation, we are considering documented habitat as that where Indiana bats and/or NLEB have actually been captured and tracked using (1) radio telemetry to roosts; (2) radio telemetry biangulation/triangulation to estimate foraging areas; or (3) foraging areas with repeated use documented using acoustics. Documented roosting habitat is also considered as suitable summer habitat within 0.25 miles of documented roosts.)

    [2] For the purposes of this key, we are considering documented corridors as that where Indiana bats and/or NLEB have actually been captured and tracked to using (1) radio telemetry; or (2) treed corridors located directly between documented roosting and foraging habitat.

    No

16. Will the removal or trimming of habitat or trees occur **within** suitable but **undocumented NLEB** roosting/foraging habitat or travel corridors?

    Yes

17. What time of year will the removal or trimming of habitat or trees **within** suitable but **undocumented NLEB** roosting/foraging habitat or travel corridors occur?

    B) During the inactive season

18. Will *any* tree trimming or removal occur **within** 100 feet of existing road/rail surfaces?

    Yes

19. Will *any* tree trimming or removal occur **between** 100-300 feet of existing road/rail surfaces?

    No

20. Are *all* trees that are being removed clearly demarcated?

    Yes

21. Will the removal of habitat or the removal/trimming of trees include installing new or replacing existing **permanent** lighting?

    No

22. Does the project include wetland or stream protection activities associated with compensatory wetland mitigation?

    No

23. Does the project include slash pile burning?

    No

24. Does the project include *any* bridge removal, replacement, and/or maintenance activities (e.g., any bridge repair, retrofit, maintenance, and/or rehabilitation work)?

    No

25. Does the project include the removal, replacement, and/or maintenance of *any* structure other than a bridge? (e.g., rest areas, offices, sheds, outbuildings, barns, parking garages, etc.)

    No

26. Will the project involve the use of **temporary** lighting *during* the active season?

    No

27. Will the project install new or replace existing **permanent** lighting?

    No

28. Does the project include percussives or other activities (**not including tree removal/ trimming or bridge/structure work**) that will increase noise levels above existing traffic/ background levels?

    No

29. Are *all* project activities that are **not associated with** habitat removal, tree removal/ trimming, bridge and/or structure activities, temporary or permanent lighting, or use of percussives, limited to actions that DO NOT cause any additional stressors to the bat species?

    Examples: lining roadways, unlighted signage , rail road crossing signals, signal lighting, and minor road repair such as asphalt fill of potholes, etc.

    Yes

30. Will the project raise the road profile **above the tree canopy**?

    No

31. Are the project activities that are not associated with habitat removal, tree removal/ trimming, bridge and/or structure activities, temporary or permanent lighting, or use of percussives consistent with a No Effect determination in this key?

    Automatically answered
    Yes, other project activities are limited to actions that DO NOT cause any additional stressors to the bat species as described in the BA/BO

32. Is the habitat removal portion of this project consistent with a Not Likely to Adversely Affect determination in this key?

    Automatically answered
    Yes, because the tree removal/trimming that occurs outside of the Indiana bat's active season occurs greater than 0.5 miles from the nearest hibernaculum, is less than 100 feet from the existing road/rail surface, includes clear demarcation of the trees that are to be removed, and does not alter documented roosts and/or surrounding summer habitat within 0.25 miles of a documented roost.

33. Is the habitat removal portion of this project consistent with a Not Likely to Adversely Affect determination in this key?

    Automatically answered
    Yes, because the tree removal/trimming that occurs outside of the NLEB's active season occurs greater than 0.5 miles from the nearest hibernaculum, is less than 100 feet from the existing road/rail surface, includes clear demarcation of the trees that are to be removed, and does not alter documented roosts and/or surrounding summer habitat within 0.25 miles of a documented roost.

34. **General AMM 1**
    Will the project ensure *all* operators, employees, and contractors working in areas of known or presumed bat habitat are aware of *all* FHWA/FRA/FTA (Transportation Agencies) environmental commitments, including all applicable Avoidance and Minimization Measures?

    Yes

35. **Tree Removal AMM 1**
    Can *all* phases/aspects of the project (e.g., temporary work areas, alignments) be modified, to the extent practicable, to avoid tree removal[1] in excess of what is required to implement the project safely?

    Note: Tree Removal AMM 1 is a minimization measure, the full implementation of which may not always be practicable. Projects may still be NLAA as long as Tree Removal AMMs 2, 3, and 4 are implemented and LAA as long as Tree Removal AMMs 3, 5, 6, and 7 are implemented.

    [1] The word “trees” as used in the AMMs refers to trees that are suitable habitat for each species within their range. See the USFWS’ current summer survey guidance for our latest definitions of suitable habitat.

    Yes

36. **Tree Removal AMM 3**
    Can tree removal be limited to that specified in project plans and ensure that contractors understand clearing limits and how they are marked in the field (e.g., install bright colored flagging/fencing prior to any tree clearing to ensure contractors stay within clearing limits)?

    Yes

37. **Tree Removal AMM 4**
    Can the project avoid cutting down/removal of *all* (1) **documented**[1] Indiana bat or NLEB roosts[2] (that are still suitable for roosting), (2) trees **within** 0.25 miles of roosts, and (3) documented foraging habitat any time of year?

    [1] The word documented means habitat where bats have actually been captured and/or tracked.

    [2] Documented roosting or foraging habitat – for the purposes of this consultation, we are considering documented habitat as that where Indiana bats and/or NLEB have actually been captured and tracked using (1) radio telemetry to roosts; (2) radio telemetry biangulation/triangulation to estimate foraging areas; or (3) foraging areas with repeated use documented using acoustics. Documented roosting habitat is also considered as suitable summer habitat within 0.25 miles of documented roosts.)

    Yes

Project Questionnaire

1. Have you made a No Effect determination for *all* other species indicated on the FWS IPaC generated species list?

   Yes

2. Have you made a May Affect determination for *any* other species on the FWS IPaC generated species list?

   No

3. How many acres[1] of trees are proposed for removal between 0-100 feet of the existing road/rail surface?

   [1] If described as number of trees, multiply by 0.09 to convert to acreage and enter that number.

   2.2

Avoidance And Minimization Measures (AMMs)

This determination key result includes the committment to implement the following Avoidance and Minimization Measures (AMMs):

TREE REMOVAL AMM 2

Apply time of year restrictions for tree removal when bats are not likely to be present, or limit tree removal to 10 or fewer trees per project at any time of year within 100 feet of existing road/ rail surface and **outside of documented** roosting/foraging habitat or travel corridors; visual emergence survey must be conducted with no bats observed.

TREE REMOVAL AMM 3

Ensure tree removal is limited to that specified in project plans and ensure that contractors understand clearing limits and how they are marked in the field (e.g., install bright colored flagging/fencing prior to any tree clearing to ensure contractors stay within clearing limits).

TREE REMOVAL AMM 4

Do not remove **documented** Indiana bat or NLEB roosts that are still suitable for roosting, or trees within 0.25 miles of roosts, or
documented foraging habitat any time of year.

GENERAL AMM 1

Ensure all operators, employees, and contractors working in areas of known or presumed bat habitat are aware of all FHWA/FRA/FTA (Transportation Agencies) environmental commitments, including all applicable AMMs.

TREE REMOVAL AMM 1

Modify all phases/aspects of the project (e.g., temporary work areas, alignments) to avoid tree removal.

Determination Key Description: FHWA, FRA, FTA Programmatic Consultation For Transportation Projects Affecting NLEB Or Indiana Bat

This key was last updated in IPaC on April 22, 2021. Keys are subject to periodic revision.

This decision key is intended for projects/activities funded or authorized by the Federal Highway Administration (FHWA), Federal Railroad Administration (FRA), and/or Federal Transit Administration (FTA), which may require consultation with the U.S. Fish and Wildlife Service (Service) under Section 7 of the Endangered Species Act (ESA) for the endangered **Indiana bat** (*Myotis sodalis*) and the threatened **Northern long-eared bat** (NLEB) (*Myotis septentrionalis*).

This decision key should only be used to verify project applicability with the Service's February 5, 2018, FHWA, FRA, FTA Programmatic Biological Opinion for Transportation Projects. The programmatic biological opinion covers limited transportation activities that may affect either bat species, and addresses situations that are both likely and not likely to adversely affect either bat species. This decision key will assist in identifying the effect of a specific project/activity and applicability of the programmatic consultation. The programmatic biological opinion is not intended to cover all types of transportation actions. Activities outside the scope of the programmatic biological opinion, or that may affect ESA-listed species other than the Indiana bat or NLEB, or any designated critical habitat, may require additional ESA Section 7 consultation.

United States Department of the Interior

US FISH AND WILDLIFE SERVICE
Chicago Ecological Services Field Office
230 South Dearborn Street, Suite 2938
Chicago, IL 60604

IN REPLY REFER TO:
FWS/AES-CIFO/

March 18, 2024

Vincent Hamer
Ecological Resource Specialist
Illinois Department of Transportation
Bureau of Design and Environment
2300 South Dirksen Parkway
Springfield, Illinois 62764

Dear Mr. Hamer:

We have reviewed the information resubmitted on February 29, 2024, by the Illinois Department of Transportation requesting concurrence with your determination that the Morris Airport runway construction project, may affect, but is not likely to adversely affect the northern long-eared bat (*Myotis septentrionalis*) and the Indiana bat (*Myotis sodalis*). Based on the information provided, we concur with your determination of "may affect, not likely to adversely affect" for the northern long-eared bat and Indiana bat.

Thank you for the opportunity to provide comments. This letter provides comment under the authority of, and in accordance with, the Endangered Species Act of 1973 (87 Stat. 884, as amended; 16 U.S.C. 1531 et seq.).

Sincerely,

Shawn Cirton
U.S. Fish and Wildlife Service
Chicago Illinois Field Office
230 South Dearborn Street, Suite 2938
Chicago, IL 60604
(847)366-2345

Illinois Department of Transportation

Memorandum

To:	John Obrien	Attn: Viraj Perera
From:	Jack A. Elston	By: Shawn Wilcoxson
Subject:	Natural Resources Review	Shawn Wilcoxson
Date:	March 19, 2024	

Morris Airport
T34N/R7E/S10
Grundy County
Seq. #24334

The proposed project involves construction of new runway (Crosswind Runway 7/25), including land acquisition and navigation easements east of Runway 18-36. The project will also include construction of Taxiway C.

There will be 167 acres of land acquisition. There will not be in-stream work. There will be 2.2 acres of tree removal required. Land cover in the vicinity of the proposed improvement is primarily agricultural land.

Review for Illinois Endangered Species Protection and Illinois Natural Areas Preservation – Part 1075

The Illinois Natural Heritage Database contains no record of State-listed threatened or endangered species. The database does indicate an Illinois Natural Area Inventory site, Valley Run which occurs on the eastern portion of the project limits. It has been confirmed by the project sponsor on 10/19/21 that no in-stream work will occur in Valley Run INAI. There are no dedicated Illinois Nature Preserves, or registered Land and Water Reserves in the vicinity of the project location. **Therefore, consultation under Part 1075 is terminated**.

This review for compliance with 17 Ill. Adm. Code Part 1075 is valid for two years unless new information becomes available that was not previously considered; the proposed improvement is modified; or additional species, essential habitat, or Natural Areas are identified in the vicinity. If the proposed improvement has not been implemented within two years of the date of this memorandum, or any of the above listed conditions develop, a new review will be necessary.

Review for Illinois Interagency Wetland Policy Act – Part 1090

A WIE was submitted to this office on 05/19/2022. The WIE indicates all wetlands will be avoided. This project is cleared for construction with respect to wetlands. **Therefore, the wetland review under Part 1090 is terminated**.

Review for Endangered Species Act - Section 7

The proposed improvement was reviewed in fulfillment of our obligation under Section 7(a)2 of the Endangered Species Act. Our review included use of the US Fish and Wildlife Service's (USFWS) Information for Planning and Conservation (IPaC) web-based review tool. Through IPaC, an official species list was generated. The list contains the endangered, threatened, proposed and candidate species and proposed and designated critical habitat that may be present within or in the vicinity of the proposed improvement. The following species are listed: Indiana bat (Ibat), northern long-eared bat (NLEB), Tricolored bat, salamander mussel, sheepnose mussel, scaleshell mussel and eastern prairie fringed orchid. No proposed or designated critical habitat is listed. Under 50 CFR 402.12(e), **the accuracy of the species list is limited to 90 days**.

Within IPaC there is the NLEB-Ibat determination key. We used the key to determine applicability of the project with the USFWS revised programmatic biological opinion for transportation projects dated 02-02-2023 and to assess what effect the project would have on NLEB or Ibat. We completed an IPaC qualification interview and determined that the project is not within the scope of the programmatic biological opinion. The project has gone through formal consultation and is not likely to adversely affect the NLEB or Ibat provided the following conservation measure is implemented by the project sponsor:

1) **trees three (3) inches or greater in diameter at breast height will not be cleared April 1 through September 30**.

2)Coordination with the USFWS has been conducted and it has been determined that 2.2 acres of tree mitigation shall be required.

Tree species suitable for bats shall be planted. The airport may choose to accomplish tree mitigation by the following:

- **Planting trees at a local municipality park(s)**
- **Planting trees on local conservation property (state, federal, other)**
- **Set up an Intergovernmental Agreement with IDNR Division of Forestry to have trees planted on IDNR property**
- **USFWS In Lieu Fee program for Bats**

If using the USFWS range-wide in lieu fee program sponsored by The Conservation Fund, the transportation agency shall send notification to the Program Coordinator, Lauri Lindquist (269-426-8825) via IbatILFCoordinator@conservationfund.org, as well as to the local Service Field Office in order to begin the mitigation process.

Should the proposed improvement be modified or new information indicate listed or proposed species may be affected, consultation or additional coordination should be initiated.

VH

APPENDIX E

Illinois Department of Transportation

Memorandum

To:	William Eves	Attn:	John O'Brien
From:	Jack Elston	By:	Joseph Galloy
Subject:	Cultural Resource Concurrence		
Date:	January 13, 2023		

Grundy County
Morris
Morris Municipal Airport
IL 47
Runway Construction
IDOT Sequence # 24334
SHPO Log # 019093022

IDOT, in coordination with FAA, has made a finding of "No Adverse Effect." Attached is a letter from the Illinois State Historic Preservation Officer (SHPO) indicating that the project as proposed meets the Secretary of the Interior's "Standards for Rehabilitation and Guidelines for Rehabilitating Historic Buildings" (Standards), and that they concur in our finding of no adverse effect to properties listed on or potentially eligible for the National Register of Historic Places pursuant to 36 CFR 800.

This completes the Section 106 process and no further cultural resource coordination should be required. If the proposed project is modified or new information indicates that historic properties may be affected, additional coordination with BDE Cultural Resources should be initiated.

Joseph M. Galloy, PhD, RPA
Cultural Resources Unit Manager
Bureau of Design & Environment

JG:el
Attachment

ILLINOIS DEPARTMENT OF NATURAL RESOURCES

Illinois Department of
Natural Resources

One Natural Resources Way Springfield, Illinois 62702-1271
www.dnr.illinois.gov

JB Pritzker, Governor
Colleen Callahan, Director

Grundy County
Morris
New Construction, Runway - Morris Municipal Airport
9980 N. IL Route 47; Sites: 11GR102, 11GR103, 11GR104, 11GR105, 11GR106, 11GR107, 11GR119, 11GR120, 11GR479, 11GR480, 11GR481; Sect. 10, T34N/R7E, Sect. 14, T34N/R7E, Sect. 5, T34N/R7E; Brick I-House, 530 E. Whitman Rd., Collins Farm, 570 E. Whitman Rd., Grace Lutheran Church, 10025 N. IL-47
IDOT Seq #-24334, IDOT/ISAS#-22023
SHPO Log #019093022

January 12, 2023

Joseph Galloy
Illinois Department of Transportation
Bureau of Design and Environment
2300 S. Dirksen Parkway
Springfield, IL 62764

Dear Dr. Galloy:

Thank you for your submission of the proposed runway construction project at the Morris Municipal Airport in Morris, Illinois, which we received on September 30, 2022. Our comments are required by Section 106 of the National Historic Preservation Act of 1966, as amended, 54 U.S.C. § 306108 (Act), and its implementing regulations (36 CFR Part 800).

We concur with the established Area of Potential Effect (APE) and the inventory of historic properties within the APE. The APE includes properties eligible for listing on the National Register of Historic Places (NRHP):

1. **Brick I-House, 530 E. Whitman Rd., Morris. Eligible for listing on the NRHP under Criterion C, for Architecture, with a local level of significance. The period of significance would be the structure's original date of construction.**
2. **Collins Farm, 570 E. Whitman Rd., Morris. Eligible for listing on the NRHP under Criterion A, for Agriculture, and under Criterion C, for Architecture, with a local level of significance. The period of significance would span the dates of construction of the farm's structures.**
3. **Grace Lutheran Church, 10025 N. IL-47, Morris. Eligible for listing on the NRHP under Criterion C, for Architecture, with a local level of significance. The period of significance would be the structure's original date of construction.**

Additionally, our staff have determined that no historic archaeological properties are known to exist within the APE. However, if any archaeological materials are discovered during construction, this office must be notified. This letter is not a clearance for purposes of the Illinois Human Skeletal Remains Protection Act (20

ILCS 3440).

The proposed project meets the Secretary of the Interior's "Standards for Rehabilitation and Guidelines for Rehabilitating Historic Buildings" and will not adversely affect the historic properties within the APE. The project as proposed may proceed.

If the project's scope of work changes from that which has been submitted to and approved by this office, you must email those changes to SHPO.Review@Illinois.gov and to Darius Bryjka (Darius.Bryjka@Illinois.gov) for review and comment. Failure to submit project changes for review and comment may result in an adverse effect determination pursuant to the Act.

If you have any further questions, please contact Rita Baker, Cultural Resources Manager, at 217/785-4998 or at Rita.E.Baker@illinois.gov.

Sincerely,

Carey L. Mayer

Carey L. Mayer , AIA
Deputy State Historic
Preservation Officer

APPENDIX F

Agency and Citizen Coordination

Federal Guidance Regarding Public Participation

The Federal Aviation Administration (FAA) has published public participation guidance in Order 5050.4B[1], National Environmental Policy Act (NEPA) Implementing Instructions for Airport Actions, Paragraph 400. It states: *"Like many infrastructure projects, most airport development triggers public interest, especially in those areas that would sustain development-related environmental impacts. It is through this public participation that Federal agencies disclose information about the proposed action, reasonable alternatives, and expected environmental effects. This participation also provides the Federal decision maker with information about issues most important to the public that the proposed action and its reasonable alternative(s) would affect."*

FAA published a community involvement policy (FAA-EE-90-03)[2] in August 1990 and it recognized community involvement is an essential part of environment decisions. The policy identified the following goals and tasks regarding community involvement:

- Provide active, early, and continuous public involvement and reasonable public access to information that accurately describes a proposed project and its environmental effects.
- Ask for and consider public input on plans, proposals, alternatives, impacts, and mitigation.
- Use public involvement techniques designed to meet the needs of different interest groups and individuals.
- Promote an active public role to lessen potentially adverse community reaction to agency actions needed for safe, efficient aviation.

FAA guidance in being compliant, through Grant Assurance that came with the past use of airport Improvement Funds (AIP), requires that the City of Morris (City), owner, and operator of the Morris Municipal Airport (Airport or C09) must afford the public an opportunity for a hearing under 49 USC 47106(c)(1)(A)(i). In addition, the Airport Sponsor (Airport) must certify to the USDOT Secretary that is has afforded the public an opportunity to consider a project's economic, social, and environmental effects of its action. For disclosure the Proposed Action is being funded with State and City monies. No Federal funds are anticipated to be used.

In addition to NEPA, airport projects may trigger other public participation requirements of various special purpose laws. For example, Executive Orders on Floodplains and Wetlands, 11988 and 11990, respectively, and regulations addressing National Register-listed or eligible historic properties at 36 CFR Part 800 require an opportunity for public review of actions that could affect those resources. It is not anticipated that the Sponsor's Proposed Action could impact resources considered under special purpose laws such as wetland, floodplains, and stream impacts.

Therefore, the City, owner, and operator of the Airport) intends to fulfill each of the above referenced FAA policy tenets by conducting a Public Hearing. A public hearing allows agencies and the public, who have an interest in a proposed Federal action, to gather information about a proposed action and other issues. A hearing provides the public a location to discuss an action's potential economic, social, and environmental effects. Public hearings also provide occasions to

[1] https://www.faa.gov/airports/resources/publications/orders/environmental_5050_4/media/chapter4.pdf
[2] https://www.marchjpa.com/documents/docs_forms/airport_docs/articles/communityinvolvement.pdf

consult with local governments and planning agencies and discuss an action's reasonable consistency with the community's proposed planning objectives.

Early Project Coordination

As per FAA's guidance above, the Airport's Crosswind Runway program initiated early coordination with the following groups:

- Cooperating Agencies
- Property Owners Within the Study Area

Several agencies were invited by the FAA to become **Cooperating Agencies** on the C09 Environmental Assessment. These agencies were asked to participate due to their agency's jurisdiction by law, and/or their special expertise, with respect to one or more environmental resources likely to be addressed in the EA. The agencies were informed that certain environmental resources such as wetlands, floodplains, habitat for threatened and/or endangered species and streams could be impacted by the Sponsor's Proposed Action. Cooperating Agencies were told that they would not be expected to write, and/or otherwise produce, any portion of the forthcoming EA. However, the agency would be requested to conduct early and timely reviews of a Preliminary Draft EA documentation in advance of publication of the Draft EA for public review. A copy of the generic Draft Cooperating Agency letter and the list of agencies notified is contained in **Attachment F-1**.

The Sponsor's Proposed Action will acquire parcels of land from private landowners. **Property Owners**, as identified on Grundy County Geographic Information System (GIS)[3] Tax Parcel Address Information, were notified in writing by the City of Morris that their property has been identified in the study area. The correspondence noted that there are many steps to be taken before the airport project is approved or disapproved. The landowner recipient was informed that the environmental assessment is a public process that will define the project in specific terms, explain potential environment impacts, define potential environmental mitigation actions, and solicit comments on the project from all members of the Public through an open public involvement process. Copies of the Property Owner letters are contained in **Attachment F-2**.

Another step of the early project coordination process was to directly determine if any **Residents** were living in the study area who may not have been notified through the letters to Property Owners. It was determined that properties proposed for acquisition and development did not include any residents and there are no structures to be purchased. Contacting Residents is therefore not applicable.

Project Website

To fulfill the Public Involvement requirements of the NEPA process and to continue the City of Morris' goal of transparency, a link was added to the City's Airport Website that provided the public the following information for review and download:

- Draft Environmental Assessment (PDF)
- Appendix A - Forecast of Aeronautical Activity (PDF)
- Appendix B - AEDT Noise (PDF)
- Appendix C - Air Quality and Climate Assessment (PDF)
- Appendix D - Ecological Resources (PDF)

[3] https://maps.grundyco.org/webappbuilder/propertyviewer/

- Appendix E - Cultural Resources (PDF)
- Appendix F - Agency and Citizen Coordination (PDF)
- Notice of Public Hearing (PDF)

The Airport's Website is the primary conduit to provide airport users and could be used by the Public to download the Draft Environmental Assessment (DEA) for review.

Draft Environmental Assessment Report Download

An Environmental Assessment, as stated by the President's Council on Environmental Quality (CEQ), "*is a 'concise document' that takes a 'hard look' at expected environmental effects of a proposed action*". FAA may prepare an EA on any action at any time to assist agency (FAA) planning and decision making (40 CFR 1501.3(b)). The responsible FAA official uses the EA to meet the requirements of this Order (5050.4B) and NEPA as the basis for recommending the issuance of a Finding of No Significant Impact (FONSI) or the preparation of an environmental impact statement (EIS). FAA requires an EA to unconditionally approve an Airport Layout Plan (ALP) or a request to use AIP funds or a PFC to finance a project.

The DEA is the primary document that reviews the Sponsor's Proposed Action's impacts and shares those results with the Public. The DEA is also the document of record that is reviewed by Federal, State and Local agencies. An Environmental Assessment report includes: a Purpose and Need Chapter; an Alternatives Chapter; an Affected Environment and Environmental Consequences Chapter; Agency and Citizen Coordination Chapter; and a References Chapter.

Draft Environmental Assessment Report Viewing Locations

The DEA is available for public download through the links listed above. Paper copies of the Draft Environmental Assessment were made available for public viewing during normal business hours at the following locations:

Morris Municipal Airport **9980 North Illinois State Route 47** **Morris, IL 60450**	**City of Morris** **700 North Division Street** **Morris, IL 60450**

Printing of the DEA was minimized to reduce the usage of paper and for the project to strive for sustainability.

Public Hearing Notice

The City of Morris determined that it was appropriate to conduct a Public Hearing for the Crosswind Runway 5-23 DEA. The Airport desired to solicit public comments in a formal setting on the Sponsor's Proposed Action and to address the public coordination requirements of Special Use Laws. The official notification of the time, date and virtual location of the Public Hearing was published in a "Notice of Public Hearing." This notice appeared more than 30 days before the date of the hearing. The Notice of Public Hearing included all of the following as defined in FAA Order 5050.4B[4], Paragraph 406.b(1)-(4):

- The information discussed in paragraphs 404.a(1) – (4).
  - Statement of Sponsor's Intent to undertake the Proposed Action.
  - Concise description of the Proposed Action.

[4] https://www.faa.gov/airports/resources/publications/orders/environmental_5050_4/

  - Concise statement of the hearing's purpose is to address the Proposed Action's potential economic, social, environmental and the project's consistency with the goals and objectives of local planning agencies.
  - Location and times where the DEA are available for public review and must be available at least 30 days before the hearing occurs.
- The hearing's date, time, and location.
- Based on information in the draft EA or EIS available for public review (see paragraph 404.a(4), a list of potentially affected environmental resources.
- A statement that interested parties should send written comments to the sponsor or FAA within the 10-day period following the date the hearing occurs or by the end of the NEPA document comment period, whichever is later.

The Notice of a Public Hearing was published twice (January 31, 2024, and February 14, 2024) in the Morris Herald-News, a local secular newspaper of general circulation. A Publisher's Certification of Publication is included in **Attachment F-3**.

Public Hearing

A Public Hearing and co-located Airport Open House was held on March 5, 2024, from 10:00AM to 12:00PM Central Time at the City of Morris Municipal Services Building located at 700 North Division Street, Morris, IL 60450. The facility is compliant with the Americans With Disabilities Act (ADA).

Representatives from the Airport and preparers of the DEA were available to answer questions from the public in the Airport Open House room. Verbal and written comments from the public were taken in Public Hearing Room. A Public Hearing Officer officiated the hearing and a court reporter transcribed verbal testimony from the Public. A complete Public Hearing Transcript, including exhibits and responses to comments received during the public hearing are included in **Attachment F-4**.

ATTACHMENT F-1

U.S. Department
of Transportation
Federal Aviation Administration

Great Lakes Region
Illinois, Indiana, Michigan,
Minnesota, North Dakota,
Ohio, South Dakota,
Wisconsin

Chicago Airports District Office
2300 Devon Avenue
Des Plaines, Illinois 60018

February 1, 2023

Chief – Regulatory Branch
illinoismoregulatory@usace.army.mil
US Department of the Army
Rock Island District, Corps of Engineers
1500 Rock Island Drive
Rock Island, IL 61201

RE: Morris Municipal Airport
Morris, Illinois
Environmental Assessment for Crosswind Runway 7-25
Program Notification and Cooperating Agency Invitation Letter

To Whom It May Concern:

The City of Morris, owner, and Sponsor of the Morris Municipal Airport (C09), is proposing to construct a general aviation crosswind runway and various airfield and landside improvement projects over the next several years, as depicted on the attached Sponsor's Proposed Action Exhibit. A list of proposed development items is also included in Attachment 1. An Environmental Assessment (EA) is being prepared to evaluate the potential impacts of the proposed development in compliance with National Environmental Policy Act (NEPA) and other special purpose laws and regulations.

The purpose of this letter is to offer your agency the opportunity to serve as a Cooperating Agency with the FAA, within the context of the forthcoming EA. As described in the Council on Environmental Quality Regulations (40 CFR 1501.8), it appears that your agency may have jurisdiction by law, and/or possesses special expertise, with respect to one or more environmental resources likely to be addressed in the EA. It is anticipated that certain environmental resources such as wetlands, floodplains, habitat for threatened and/or endangered species and streams could be impacted by the proposed action. In providing a decision on Cooperating Agency status, your agency would not be expected to write, and/or otherwise produce, any portion of the forthcoming EA. However, in this role, your agency would be requested to conduct early and timely reviews of a Preliminary Draft EA documentation in advance of publication of the Draft EA for public review.

Regardless of your decision concerning Cooperating Agency status, we anticipate coordinating with your office as the EA progresses, particularly with respect to resources under your agency's jurisdiction and expertise. As a part of the early agency coordination process, we are also seeking any comments on potential environmental concerns with the proposed improvements at C09 that should be addressed as a part of the EA.

We would appreciate your agency's decision regarding Cooperating Agency status within 30 days following receipt of this letter. If you have any questions regarding the project, please contact me at Bobb.Beauchamp@faa.gov or (847) 294-7364.

Sincerely,

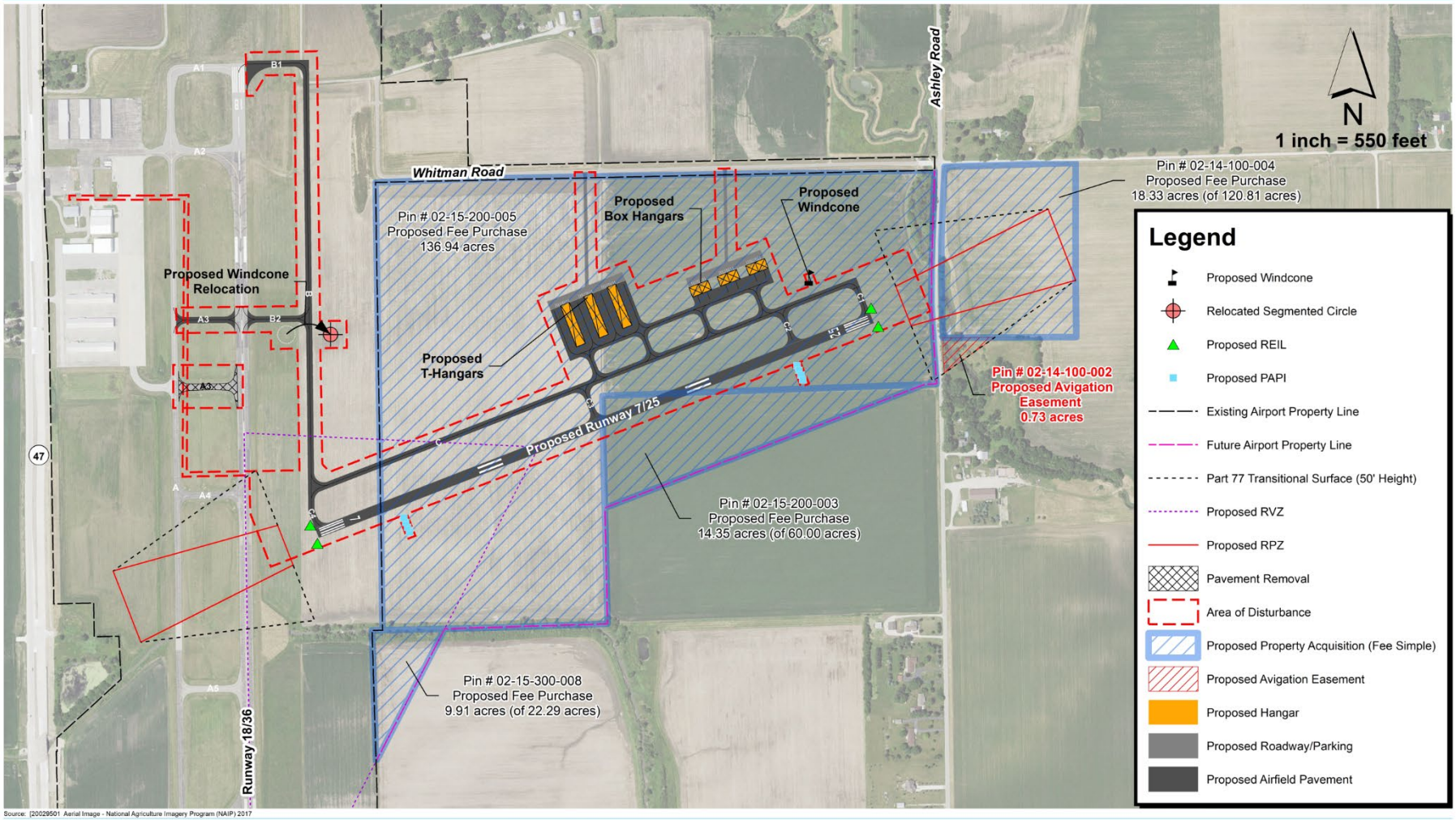
Bobb Beauchamp
Environmental Protection Specialist
Chicago Airports District Office
Federal Aviation Administration

Cc: Casey McCollom, Chamlin Associates
Terry Schaddel, CMT

ATTACHMENT 1

Sponsor's Proposed Action Development List

- Acquisition of 179.53 acres of land in fee simple title and 0.73 acres of avigation easements the requirements of the Uniform Relocation and Real Property Assistance Act of 1970.
- Construct Runway 7-25, 3,500 feet long by 60 feet wide.
- Construct Taxiway B at 25 feet wide and 400 feet east of Runway 18-36 from Taxiway C to Runway 18 threshold.
- Construct/Relocate (includes pavement removal of existing Taxiway A3) and construct new Taxiway A3 at 25 feet wide from Taxiway B to Taxiway A.
- Construct Full-Length Parallel Taxiway "C" at 25 feet wide and 240 feet north of Runway 7-25.
- Install Medium Intensity Runway Lights (MIRL) on Runway 7-25.
- Install Medium Intensity Taxiway Lights (MITL) on all proposed taxiways.
- Install Precision Approach Path Indicator (PAPI) Lights to serve pilots on approach to both runway thresholds.
- Relocate the existing Lighted Windcone and Segmented Circle.
- Install a Wind Cone to serve pilots on approach to Runway 25.
- Install Runway End Identifier Lights (REIL) to serve pilots on approach to both Runway 7-25 thresholds.
- Construct Box Hangars north of the proposed Runway 7-25.
- Construct T-Hangars north of the proposed Runway 7-25.
- Construct Access Roadway(s) from Whitman Road to new hangar developments.
- Removal of approximately twenty+ trees for site clearing and obstruction removal within the FAR Part 77 Airport Imaginary Surfaces.



Source: [20029501 Aerial Image - National Agriculture Imagery Program (NAIP) 2017

Sponsor's Proposed Action

Proposed Runway 7/25 3,500' x 60'

ATTACHMENT F-2

CITY OF MORRIS

700 N. Division Street
Morris, IL 60450
Phone (815) 942-0103
Fax (815) 942-0216

Chris Brown, Mayor
Lori Werden, City Clerk
Terri Kief, City Treasurer

June 20, 2022

Shea Properties LLC
Post Office Box 500
Nevada, IA, 50201

RE: Morris Municipal Airport
Morris, Illinois
Environmental Assessment for the Replacement Runway 5-23 Program
Landowner Notification Letter – PIN 02-14-100-004 -Avigation Easements

To Whom It May Concern:

The City of Morris, owner, and Sponsor of the Morris Municipal Airport (C09), is proposing to construct a general aviation crosswind runway and various airfield and landside improvement projects over the next several years, as depicted on the attached Sponsor's Proposed Action Exhibit. A list of proposed development items is also included in Attachment 1. An Environmental Assessment (EA) is being prepared to evaluate the potential impacts of the proposed development in compliance with National Environmental Policy Act (NEPA) and other special purpose laws and regulations.

The purpose of this letter is to officially notify the landowner that the property at this address has been identified as being in the proposed Project Area. This letter is being sent to the owner of the property registered in the Grundy County Geographic Information System's Tax Parcel Information. Please note that there are many steps for this proposed project. These documents will define the proposed project, explain potential environment impacts of the proposed project, and note possible mitigation actions for the proposed project, if required.

Please direct any comments and/or questions on the proposed project to the contact below:

Casey McCollom, Civil Engineer
Chamlin and Associates, Inc.
221 West Washington Street
Morris, IL 60450
(815) 942-1402

Sincerely,

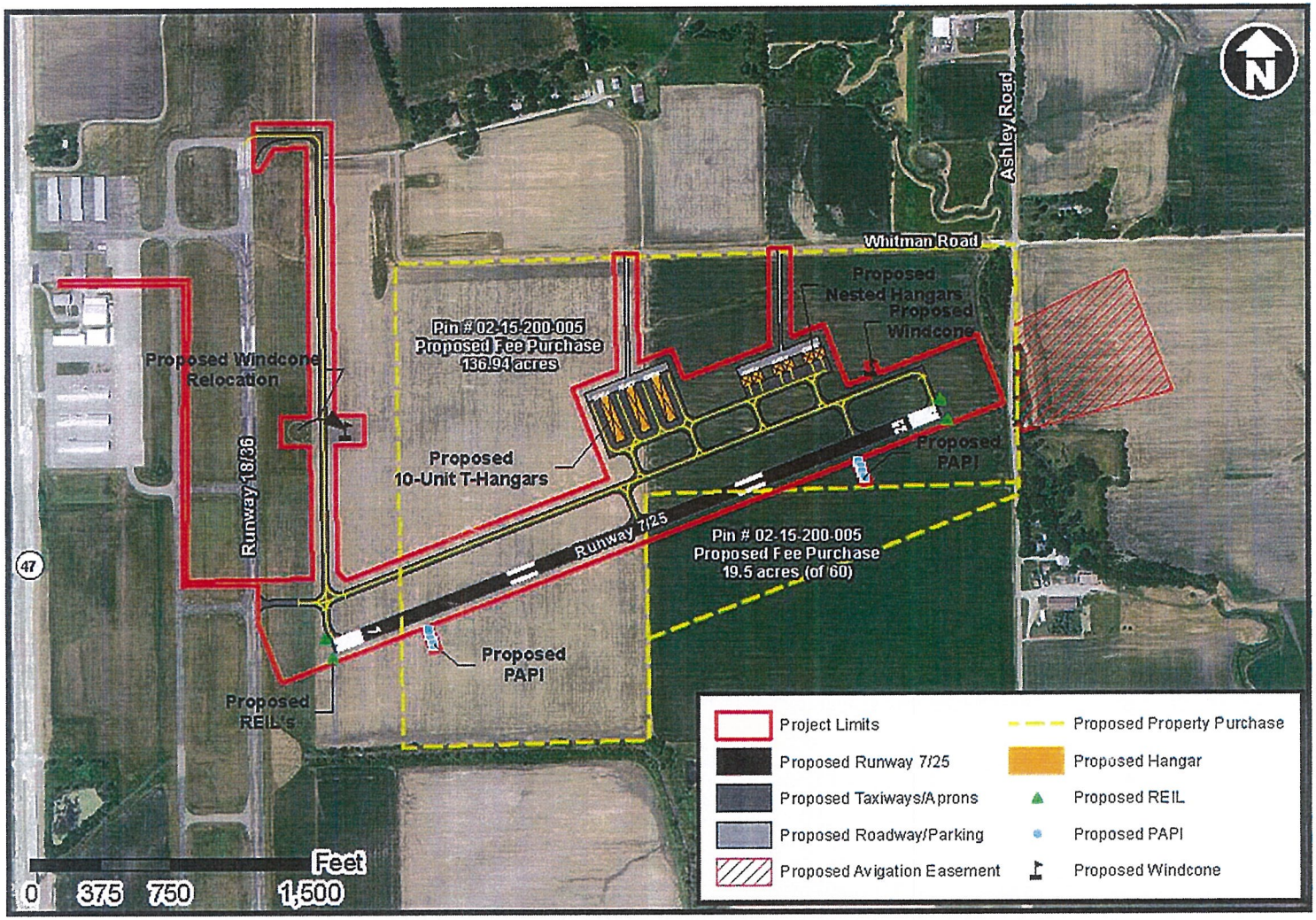
Chris Brown
Mayor, City of Morris

cc: Jeff Vogen, Morris Municipal Airport
Terry Schaddel, CMT
Casey McCollom, Civil Engineer

ATTACHMENT 1

Sponsor's Proposed Action Development List

- Acquisition of 158 acres of land in fee simple title and 10.83 acres of avigation easements.
- Construct Runway 7-25, 3,500 feet long by 60 feet wide.
- Construct Parallel Taxiway "C" at 25 feet width.
- Install Medium Intensity Runway Lights (MIRL) on Runway 7-25.
- Install Medium Intensity Taxiway Lights (MITL) on all proposed taxiways.
- Install Precision Approach Path Indicator (PAPI) Lights to serve pilots on approach to both runway thresholds.
- Relocate the existing wind indicator.
- Install wind cone adjacent to the threshold of Runway 25.
- Install Runway End Identifier Lights (REIL) to serve pilots on approach to both runway thresholds.
- Construction of partial parallel Taxiway "B" from Taxiway "C" to the threshold of Runway 18.
- Construct connecting Taxiway "B4" from Taxiway "C" to Runway 18-36.
- Construct Nested Hangars north of the proposed Runway 7-25.
- Construct 10-Unit T-Hangars north of the proposed Runway 7-25.
- Construct Access Roadway(s) from Extended Whitman Road to new hangar developments.



Morris Municipal Airport-James R. Washburn Field

Sponsor's Proposed Action (SPA) Map

CMT
Crawford, Murphy & Tilly

CITY OF MORRIS

700 N. Division Street
Morris, IL 60450
Phone (815) 942-0103
Fax (815) 942-0216

Chris Brown, Mayor
Lori Werden, City Clerk
Terri Kief, City Treasurer

June 20, 2022

Elva C. Thoeming
1815 Creek Drive
Morris, IL, 60450

RE: Morris Municipal Airport
Morris, Illinois
Environmental Assessment for the Replacement Runway 5-23 Program
Landowner Notification Letter – PIN 02-15-200-005

Dear Ms. Thoeming:

The City of Morris, owner, and Sponsor of the Morris Municipal Airport (C09), is proposing to construct a general aviation crosswind runway and various airfield and landside improvement projects over the next several years, as depicted on the attached Sponsor's Proposed Action Exhibit. A list of proposed development items is also included in Attachment 1. An Environmental Assessment (EA) is being prepared to evaluate the potential impacts of the proposed development in compliance with National Environmental Policy Act (NEPA) and other special purpose laws and regulations.

The purpose of this letter is to officially notify the landowner that the property at this address has been identified as being in the proposed Project Area. This letter is being sent to the owner of the property registered in the Grundy County Geographic Information System's Tax Parcel Information. Please note that there are many steps for this proposed project. These documents will define the proposed project, explain potential environment impacts of the proposed project, and note possible mitigation actions for the proposed project, if required.

Please direct any comments and/or questions on the proposed project to the contact below:

Casey McCollom, Civil Engineer
Chamlin and Associates, Inc.
221 West Washington Street
Morris, IL 60450
(815) 942-1402

Sincerely,

Chris Brown
Mayor, City of Morris

cc: Jeff Vogen, Morris Municipal Airport
Terry Schaddel, CMT
Casey McCollom, Civil Engineer

ATTACHMENT 1

Sponsor's Proposed Action Development List

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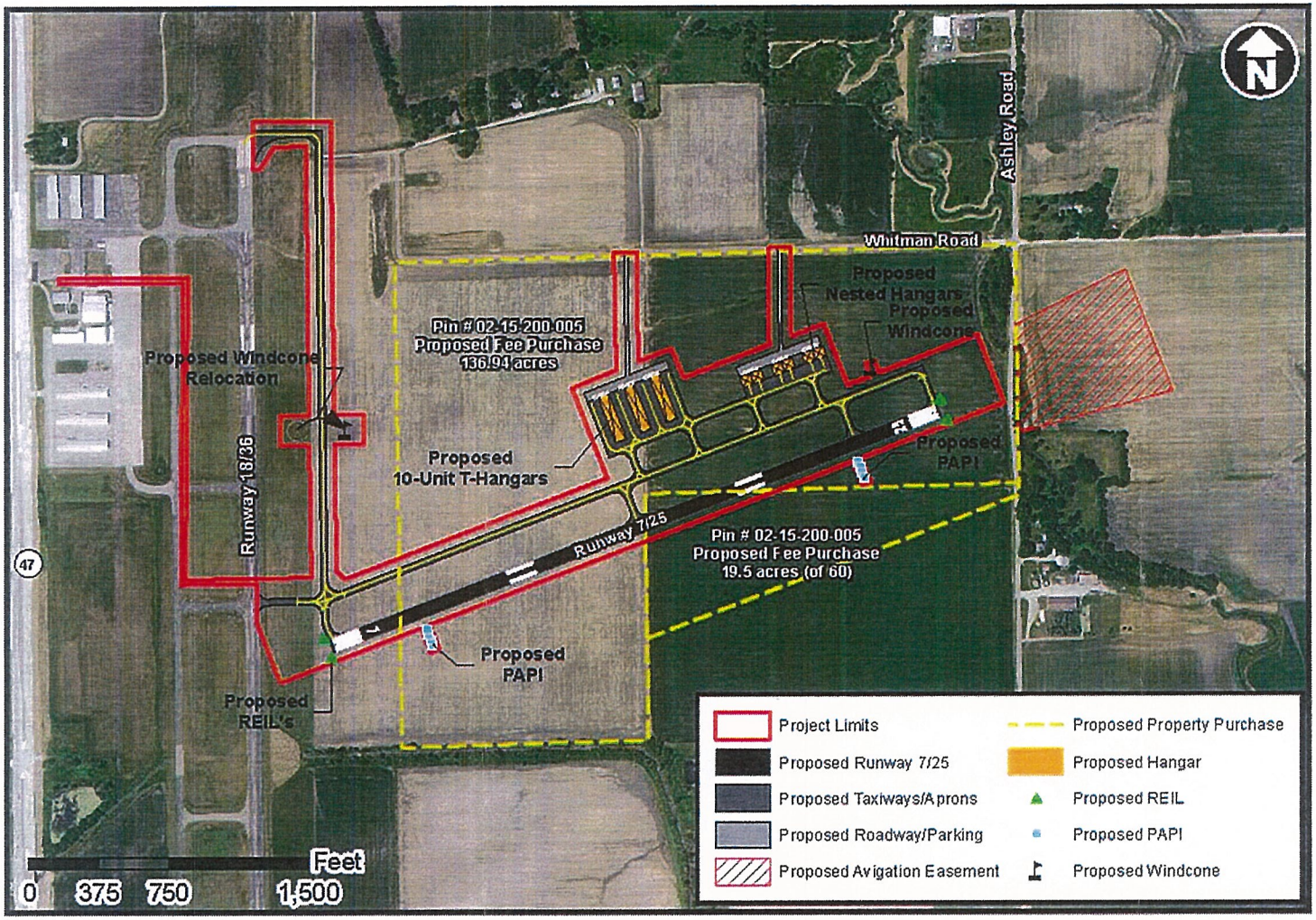
- Install Medium Intensity Runway Lights (MIRL) on Runway 7-25.
- Install Medium Intensity Taxiway Lights (MITL) on all proposed taxiways.
- Install Precision Approach Path Indicator (PAPI) Lights to serve pilots on approach to both runway thresholds.
- Relocate the existing wind indicator.
- Install wind cone adjacent to the threshold of Runway 25.
- Install Runway End Identifier Lights (REIL) to serve pilots on approach to both runway thresholds.
- Construction of partial parallel Taxiway "B" from Taxiway "C" to the threshold of Runway 18.
- Construct connecting Taxiway "B4" from Taxiway "C" to Runway 18-36.
- Construct Nested Hangars north of the proposed Runway 7-25.
- Construct 10-Unit T-Hangars north of the proposed Runway 7-25.
- Construct Access Roadway(s) from Extended Whitman Road to new hangar developments.



Morris Municipal Airport-James R. Washburn Field

Sponsor's Proposed Action (SPA) Map

CMT
Crawford, Murphy & Tilly

CITY OF MORRIS

700 N. Division Street
Morris, IL 60450
Phone (815) 942-0103
Fax (815) 942-0216

Chris Brown, Mayor
Lori Werden, City Clerk
Terri Kief, City Treasurer

June 20, 2022

Helen Trotter
c/o Deborah Steffes
10150 N. Brown Road
Morris, IL, 60450

RE: Morris Municipal Airport
Morris, Illinois
Environmental Assessment for the Replacement Runway 5-23 Program
Landowner Notification Letter – PIN 02-15-200-003

Dear Ms. Trotter:

The City of Morris, owner, and Sponsor of the Morris Municipal Airport (C09), is proposing to construct a general aviation crosswind runway and various airfield and landside improvement projects over the next several years, as depicted on the attached Sponsor's Proposed Action Exhibit. A list of proposed development items is also included in Attachment 1. An Environmental Assessment (EA) is being prepared to evaluate the potential impacts of the proposed development in compliance with National Environmental Policy Act (NEPA) and other special purpose laws and regulations.

The purpose of this letter is to officially notify the landowner that the property at this address has been identified as being in the proposed Project Area. This letter is being sent to the owner of the property registered in the Grundy County Geographic Information System's Tax Parcel Information. Please note that there are many steps for this proposed project. These documents will define the proposed project, explain potential environment impacts of the proposed project, and note possible mitigation actions for the proposed project, if required.

Please direct any comments and/or questions on the proposed project to the contact below:

Casey McCollom, Civil Engineer
Chamlin and Associates, Inc.
221 West Washington Street
Morris, IL 60450
(815) 942-1402

Sincerely,

Chris Brown
Mayor, City of Morris

cc: Jeff Vogen, Morris Municipal Airport
Terry Schaddel, CMT
Casey McCollom, Civil Engineer

ATTACHMENT 1

Sponsor's Proposed Action Development List

- Acquisition of 158 acres of land in fee simple title and 10.83 acres of avigation easements.
- Construct Runway 7-25, 3,500 feet long by 60 feet wide.
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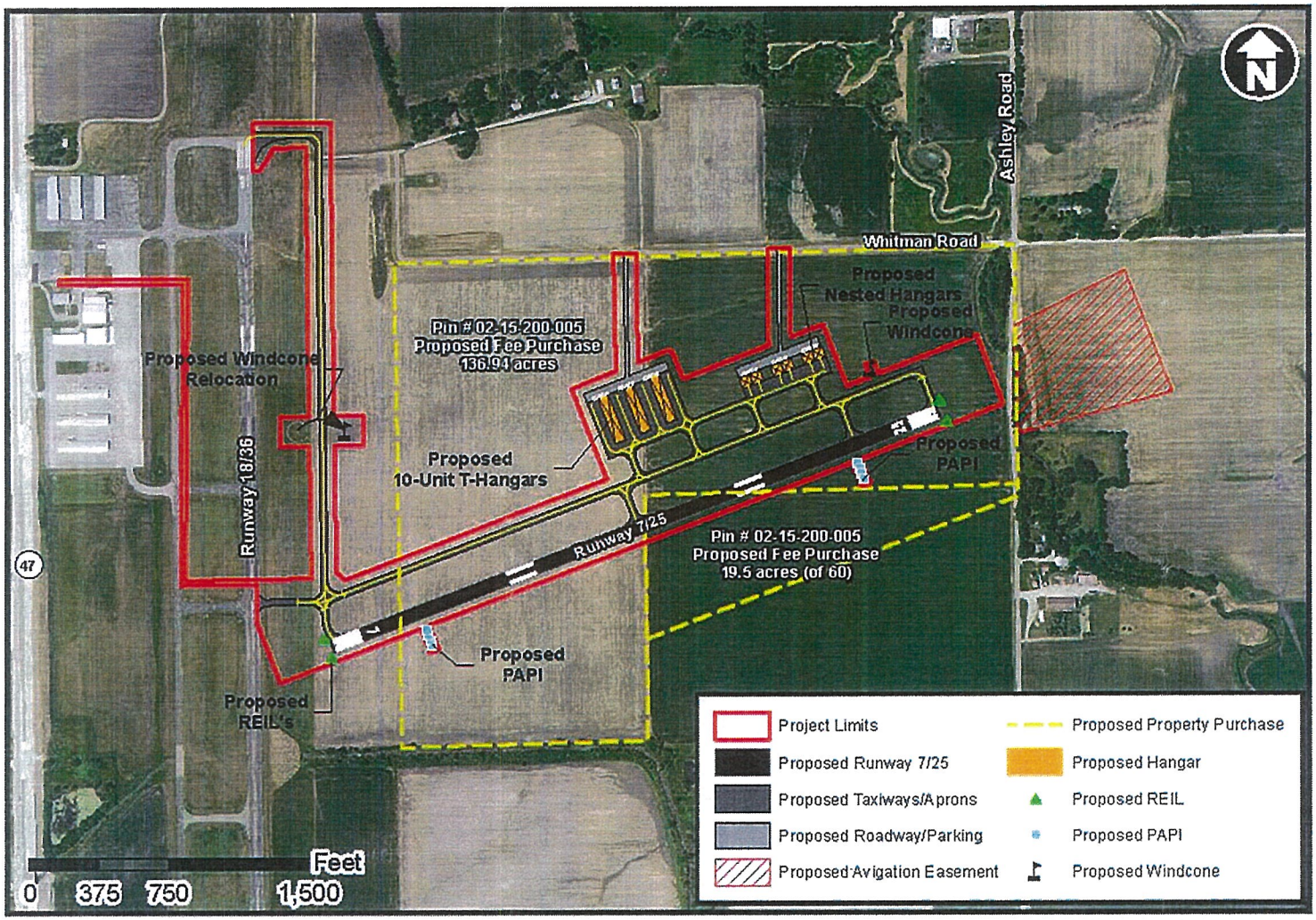
- Relocate the existing wind indicator.
- Install wind cone adjacent to the threshold of Runway 25.
- Install Runway End Identifier Lights (REIL) to serve pilots on approach to both runway thresholds.
- Construction of partial parallel Taxiway "B" from Taxiway "C" to the threshold of Runway 18.
- Construct connecting Taxiway "B4" from Taxiway "C" to Runway 18-36.
- Construct Nested Hangars north of the proposed Runway 7-25.
- Construct 10-Unit T-Hangars north of the proposed Runway 7-25.
- Construct Access Roadway(s) from Extended Whitman Road to new hangar developments.



Morris Municipal Airport-James R. Washburn Field

Sponsor's Proposed Action (SPA) Map

CMT
Crawford, Murphy & Tilly

ATTACHMENT F-3

SHAW MEDIA
EST. 1851
PO BOX 250
CRYSTAL LAKE IL 60039-0250
(815)459-4040

ORDER CONFIRMATION

Salesperson: PHIL HARTMAN Printed at 01/25/24 14:43 by phart-sm

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Acct #: 10056870 Ad #: 2139699 Status: New

CITY OF MORRIS
ATTN LORI WERDEN
700 N DIVISION ST
MORRIS IL 60450

Start: 01/31/2024 Stop: 02/14/2024
Times Ord: 2 Times Run: ***
CLEG 2.00 X 80.00 Words: 590
Total CLEG 160.00
Class: C8100 PUBLIC NOTICES
Rate: LEGAL Cost: 412.30
Affidavits: 1
Ad Descrpt: MORRIS AIRPORT HEARING

Contact: LORI WERDEN
Phone: (815)942-4026
Fax#:
Email: cityclerk@morrisil.org
Agency:

Descr Cont: 2139699
Given by: LORI MARTIN
P.O. #:
Created: phart 01/25/24 14:38
Last Changed: phart 01/25/24 14:43

URL: _____

Source: _____ Section: _____ Page: __
Camera Ready: N Group: LEGALS AdType: _____
Misc: _____
Proof: __ _____ Pickup Date: _____ Ad#: _____
Delivery Instr: _____ Pickup Src: _____
Changes: None __ Copy __ _____ Art __ Size __ Copy Chg Every Run __
Coupon: __ Color: _____ Gang Ad #: _____
Ad Copy Method: _____
Special Instr: _____

COMMENTS:
COPIED from AD 2126182

PUB	ZONE	EDT	TP	RUN DATES
MPC	CL	97	S	01/31 02/14
WMM	CL	99	S	01/31
APNW	CL	97	S	01/31

(CONTINUED ON NEXT PAGE)

SHAW MEDIA
EST. 1851
PO BOX 250
CRYSTAL LAKE IL 60039-0250
(815)459-4040

ORDER CONFIRMATION (CONTINUED)

Salesperson: PHIL HARTMAN Printed at 01/25/24 14:43 by phart-sm

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Acct #: 10056870 Ad #: 2139699 Status: New

PUBLIC NOTICE

Legal Notice Of Availability Of A Draft Environmental Assessment (DEA) & Notice Of A Public Open House/Workshop & Public Hearing, Morris Municipal Airport (C09), Morris, Il

The City of Morris, owner, Sponsor, and operator of the Morris Municipal Airport, intends to submit to the Federal Aviation Administration a request for National Environmental Policy Act (NEPA) approval in constructing the following development items:

Acquisition of 179.53 acres of land in fee simple title and 0.73 acres of avigation easements per the requirements of the Uniform Relocation and Real Property Assistance Act of 1970.

Construct Runway 7-25, 3,500 feet long by 60 feet wide. Construct Taxiway B at 25 feet wide and 400 feet east of Runway 18-36 from Taxiway C to Runway 18 threshold. Construct/Relocate (includes pavement removal of existing Taxiway A3) and construct new Taxiway A3 at 25 feet wide from Taxiway B to Taxiway A.

Construct Full-Length Parallel Taxiway "C" at 25 feet wide and 240 feet north of Runway 7-25. Install Medium Intensity Runway Lights (MIRL) on Runway 7-25.

Install Medium Intensity Taxiway Lights (MITL) on all proposed taxiways.

Install Precision Approach Path Indicator (PAPI) Lights to serve pilots on approach to both runway thresholds.

Relocate the existing Lighted Windcone and Segmented Circle.

Install a Wind Cone to serve pilots on approach to Runway 25.

Install Runway End Identifier Lights (REIL) to serve pilots on approach to both of Runway 7-25 thresholds.

Removal and/or trimming of trees for site clearing and obstruction removal within the FAR Part 77 Airport Imaginary Surfaces.

A DEA has been prepared, which summarizes anticipated environmental effects of the Airport Development. A paper copy of the DEA is available for review at the following public locations:

Morris Municipal Airport, 9980 North Illinois State Route 47, Morris, IL 60450; City of Morris, 700 North Division Street, Morris, IL 60450.

An electronic copy of the DEA is available for review and downloading at the following website link: https://morrisil.org/morris-airport/. A Public Open House Workshop and Public Hearing will be held concurrently at the Morris City Hall located at 700 North Division Street, Morris, Illinois on March 5, 2024, from 10AM to 12PM.

The purpose of this hearing is to consider the social, economic, and environmental effects of the proposed developments and their consistency with the goals and objectives of area planning agencies. Representatives from the Airport and DEA preparers will be available to answer questions from the public at the Airport Open House. No formal project presentations will be made. Written materials provided at the Workshop/Hearing areas will be available in English and all facilities are compliant with the Americans With Disabilities Act. If other special assistance is necessary, please contact Casey McCollom, Chamlin and Associates, at (815) 942-1402. All special assistance requests must be made no later than 4PM Central on March 1, 2024.

Comments for the record may be given at the Public Hearing. A Public Hearing Officer will officiate the hearing and a court reporter will take verbal testimony from the Public. Written comments can be provided to the Hearing Officer in the Public Hearing area; placed in a Comment Box in the Public Hearing area; or sent via USPS mail to the Chamlin using the pre-addressed Comments Sheets.

All comments on the DEA will be accepted, if postmarked by and/or physically received at Chamlin by 5PM Central and/or Close of Business, on March 22, 2024. A complete public hearing transcript and responses to comments received will be included in the Final EA.

(Morris Herald-News Jan. 31 and Feb. 14, 2024) 2139699

ATTACHMENT F-4

STATE OF ILLINOIS)
) SS.
COUNTY OF GRUNDY)

IN THE MATTER OF:

MORRIS MUNICIPAL AIRPORT

CROSSWIND RUNWAY 7-25

Public Hearing, taken before Belinda A. Harr, CSR, on March 5, 2024, at 10:00 a.m., at 700 N. Division Street, Morris, Illinois.

PRESENT:

MAHONEY, SILVERMAN & CROSS, LLC, by
MR. DAVID J. SILVERMAN, Hearing Officer
822 Infantry Drive
Joliet, IL 60435
(815) 730-9500
dsilverman@msclawfirm.com

MR. SILVERMAN: By the clock on the wall it's 10:00 a.m. My name is David Silverman. I'm the Hearing Officer for the Morris Municipal Airport's Public Hearing, and I hereby open this Public Hearing. The date is March 5, 2024, and the time is 10:00 a.m. Next to me is our court reporter, Belinda Harr, who will be making a transcript of these proceedings.

Morris Municipal Airport is pursuing the development of a crosswind runway 07-25 and other ancillary airfield facilities. Federal approval of the development requires the preparation of an environmental assessment.

Copies of a draft environmental assessment have been made available for over 30 days at the City Hall and airport offices and is on the airport's project website. The draft environmental assessment will continue to be available for review at those same locations for the next 15 days.

As part of the environmental assessment process, public outreach is required. One part of the public outreach will be conducted through today's public hearing. The purpose of this public hearing is to consider the social, economic, and environmental effects of the proposed developments and

their consistency with the goals and objectives of area planning agencies.

I have been asked by the Airport to enter into the record a copy of the Public Hearing Notice published January 31, 2024, in the Morris Herald, a secular newspaper of general circulation in the Morris-Grundy area. The Public Hearing Notice includes a transcript of the sponsor's proposed actions.

Today's public hearing process consists of two areas. Next-door in the City Council chambers an open house public information workshop is underway that provides exhibits, copies of the draft environmental assessment, and areas to prepare written testimony for submission. Airport staff and preparers of the draft environmental assessment are available to answer questions. Today in this public hearing area it is my responsibility to receive oral testimony regarding the environmental assessment.

For those who want to give oral testimony I ask that you please fill out a public hearing queuing form at the desk outside this room. Based upon the submitted form, I will call you on a first-come first-serve basis. If there is a large

number of oral testimony requests, I have the authority to limit your testimony to three minutes.

Please note the questions made during oral testimony will not be answered in this public hearing room. Questions can be directed to staff next-door in the open house and workshop room.

If you want to provide written testimony, please use the forms and give them to the court reporter for inclusion in the record.

Comments can be made on the proposed action today at this public hearing and/or in writing until 15 days after this hearing on March 20 of 2024. Comments received after this date will not be considered on the record. Are there any questions?

We will start the oral testimony when the first witness appears, and we will ask them to come forward and give testimony, state their full name, spell their last name, and be sworn by the court reporter.

I would like to enter right now three exhibits into the record which are written comments. Exhibit No. 1 are the written comments of Gary Wills, W-I-L-L-S. Exhibit No. 2 are the written comments of Tom Wills, and Exhibit 3 are the written comments of

Bill Klott, K-L-O-T-T. We can go off the record for a second.

(Off the record.)

(Sworn.)

MAYOR CHRIS BROWN,

Having been first duly sworn, testified as follows:

MR. SILVERMAN: Would you state your name please?

MAYOR BROWN: Sure. My name is Chris Brown.

MR. SILVERMAN: And your position?

MAYOR BROWN: I am the mayor of the City of Morris.

MR. SILVERMAN: And I understand you have some testimony to provide today?

MAYOR BROWN: Yes, I do.

MR. SILVERMAN: The court reporter will be taking down your testimony so please make sure that you speak slowly so she can get it all accurately taken down.

MAYOR BROWN: All right. Are we ready? Okay. So the impact that this will have to the Morris and the greater area of Morris is going to be truly unbelievable with this new crosswind. We are extremely excited and proud to have received 11.7 million dollars

from the State with funds and grants to be able to help with this process, but truly the impact for the area will be unbelievable. It will allow us to expand. It will allow planes that normally couldn't land in a high-wind propensity to be able to land and fuel or hang out until it's time or safe to leave. But it's going to be great on the industries in and around the area with Costco and Procter & Gamble, and then we have Brisbin Road that has expanded. And we believe that the opportunity that it's going to provide with the expansion for some of these other corporate industries to land in that area is going to be even better with what's coming.

MR. SILVERMAN: Thank you.

(Sworn.)

NANCY NORTON,

having been first duly sworn, testified as follows:

MR. SILVERMAN: Would you state your name please?

MS. NORTON: Nancy Norton.

MR. SILVERMAN: And, Ms. Norton, the court reporter will be taking down your testimony today so if you could make sure you speak clearly and slowly so she gets all of your words. Thank you.

MS. NORTON: Thank you for the chance to speak. I'm Nancy Norton, president and CEO of the Grundy Economic Development Council. I'm here today to give my enthusiastic support for the expansion of the Morris Airport facility. Transportation and connectivity are crucial to successful economic development, and the airport is an important part of that equation.

The Grundy Economic Development Council plays an important role in the attraction of new business and the retention of existing business, and a robust airport is fundamental to our success.

The GEDC receives many inquiries from potential manufacturers and businesses that want to locate in our community. Many of the RFIs we receive ask for local air connectivity, and we are fortunate to be able to include this asset in our package of attributes available in Grundy County. In fact, we've had many site selectors fly into the airport and also use the airport for helicopter rides to review potential sites.

Further, existing companies frequently use the airport for executive visits to local facilities. This ability to have a satellite or additional offices and still be easily accessible to

corporate headquarters and employees has been a very big benefit.

Finally, the non-corporate jet traffic is robust. The airport is used for recreational flyers, crop dusters, folks that fly our vast transmission line system, customers for Ritchie Brothers auction, and much more. These bring in dollars, jobs, and general commerce to our area.

For this and many years, the expansion of the airport will be a big plus for our entire region.

MR. SILVERMAN: Thank you, Ms. Norton.

(Sworn.)

DOMINIC FLAMINI,

having been first duly sworn, testified as follows:

MR. SILVERMAN: State your name please.

MR. FLAMINI: My name is to Dominic Flamini.

MR. SILVERMAN: And, Dominic, are you employed by the City or do you utilize the airport?

MR. FLAMINI: I utilize the airport. I'm a tenant. I have been a tenant for several years. I grew up out in the area. We have been visiting Morris airport with my dad in airplanes since I was a little kid. So I've seen it from, you know, back in the days

when there was a restaurant there and the apple pie and the chili. We all -- everybody flew in there, and at that time they did have, I think, the grass east/west runway if I remember right.

Okay. There's -- I guess my thoughts on the east/west runway are there's -- I fly high-performance biplanes and there's a lot of times because of only having the north/south runway I'm limited to when I can fly.

And, also, you know, it's -- it's also a safety thing, I think, because some of the flight schools -- well, definitely, Lewis. They come in a lot. They're always in the pattern a lot. And sometimes when the prevailing winds are prevailing a crosswind, they sometimes just kind of go any way that they end up going which isn't, you know, the City's issue, but it is also a -- from a safety standpoint if there was an east/west, they would be not having to fight that crosswind like that.

And then, also, just from a -- you know, a monetary standpoint, I know a lot of friends that I fly with and that are at other airports don't come in for gas on windy days because they're worried about the crosswind. And I guess that's it.

MR. SILVERMAN: Okay. Thank you.

(Sworn.)

JOHN LIMBACH,

having been first duly sworn, testified as follows:

MR. SILVERMAN: Would you state your name, please?

MR. LIMBACH: John Limbach, L-I-M-B-A-C-H.

MR. SILVERMAN: Okay.

MR. LIMBACH: I'm from Morris. I have a plane out at the airport.

MR. SILVERMAN: Okay. Well, thank you. Just provide the testimony. The court reporter will take it down, and it will become part of the official record.

MR. LIMBACH: Well, I strongly believe that a crosswind landing strip is needed. The type of plane I fly is extremely vulnerable to crosswinds because of its nature, and so there are many, many days where I can't fly at the airport because we don't have a crosswind landing area option open. Or if I go up and the winds change too much or pick up too much, I've got to divert to go find another airport to go to and then get tied down there, and it becomes kind of cumbersome because the timeline then stretches out to extreme or my plane will sit outside for a couple of days until

the wind changes a different direction. And, well, I pay to have a hangar so I want to have a hangar.

So having a crosswind runway would be an asset. I can see that that would be a bonus for the airport as well as for different traffic of the corporate jets and stuff that may or may not come through there. We get Costco coming through there all the time, and they -- they've commented that our runway is a little narrow for their insurance reasons but -- for what they're flying, but to have another option to land on another strip that's suitable for their needs, that would be a bonus for them then.

And, also, a safety factor. We don't want to have an airplane off in the -- off in the grass inadvertently. So safety is worth a lot so -- as well as our reputation, you know.

MR. SILVERMAN: Anything else?

MR. LIMBACH: Other than maintenance. Just making sure maintenance is always taken care of no matter what we have. So that's always a good thing to make sure we keep up on so it doesn't get away from us. And I think they're doing a fairly good job at it now, so.

MR. SILVERMAN: Well, thank you for your

testimony, and if you have anything else you think of, you're welcome to come back and add to it.

MR. LIMBACH: Okay. Thank you much.

(Sworn.)

PETER DECRAENE,

having been first duly sworn, testified as follows:

MR. SILVERMAN: Good morning. Would you state your name please?

MR. DECRAENE: Peter Decraene.

MR. SILVERMAN: Would you spell your last name, please, Peter?

MR. DECRAENE: D-E-C-R-A-E-N-E.

MR. SILVERMAN: I understand you would like to provide some public comment or testimony today --

MR. DECRAENE: Sure.

MR. SILVERMAN: -- with regard to the airport expansion. Do you have any particular interest in the airport?

MR. DECRAENE: I was a tenant at the airport. I live in Shorewood. Joliet is five minutes from my house. So at one point a hangar became available and I moved over to Joliet, but I'm interested in moving back out here.

MR. SILVERMAN: Good. Okay. Please provide

your testimony.

MR. DECRAENE: I just thought that -- well, I'm here actually representing EAA Chapter 95.

MR. SILVERMAN: EAA?

MR. DECRAENE: Uh-huh, Experimental Aircraft Association. And anytime we can get a crosswind runway it's a wonderful thing. I have a crosswind runway available to me at Joliet and most of the airports that I fly in and out of on a regular basis, and, you know, the weather is always a factor for us. We fly small airplanes, and the winds are a part of that weather. So having a crosswind available gives us more opportunities to fly.

MR. SILVERMAN: Anything else?

MR. DECRAENE: No. I was -- you know, I was talking to Jeff earlier and I was just wondering what the timeline was. He kind of filled me in on that, that there's the hopeful timeline and then the realistic timeline.

MR. SILVERMAN: All right.

(Sworn.)

MEGAN BORCHERS,

having been first duly sworn, testified as follows:

MR. SILVERMAN: Okay. State your name please.

MS. BORCHERS: My name is Megan Borchers.

MR. SILVERMAN: Would you spell your last name please?

MS. BORCHERS: Sure. It's B, as in boy, O-R-C-H-E-R-S.

MR. SILVERMAN: Okay. The court reporter will be taking your testimony so make sure that you speak slowly and she'll get it all into the record. So go ahead and provide any testimony that you would like.

MS. BORCHERS: I would just like to talk about, you know, our favor from a LyondellBasell perspective. We're a global corporation in Morris on Route 6, and we have personally used the airport a handful of times, I think two to three last year when I did my research. And that is where our corporate executives from Houston, Texas, come in, and they're able to visit our Morris, Illinois, plant. They can bypass the city of Chicago going through, you know, Chicago airports in order to come directly into Morris. It allows them to spend more time at the Morris plant with local leadership and to be able to really utilize to the best of their ability their times and stay longer, quite frankly, because they don't have to go through Chicago to get back home to Houston. So for us it has been

very instrumental. I know myself personally I grew up in this area. This is home for me, and I have had a relationship with the local airport for many years. I was a waitress in high school and my sister mowed the yard back in one of our first jobs. So it's very near and dear to us. So to see growth and improvement from that perspective is very exciting.

I will say from a LyondellBasell perspective again we have had two to three visits with executives last year where they flew into Morris. I personally have overseen -- our CEO at the time came through our Morris Airport. I was able to greet him pretty much off the runway, and I worked with the staff at the Morris Airport to kind of track the flight to understand when that was going to come in and to be, you know, prepared with cars and vehicles from a logistics standpoint to get them over to our facility.

So overall it's been a really great experience working through with Morris Airport and we're certainly in favor of any sort of expansion that could help promote the future growth of the airport.

MR. SILVERMAN: Anything else?

MS. BORCHERS: No.

MR. SILVERMAN: Thank you very much.

MS. BORCHERS: Thank you. I appreciate your time.

MR. SILVERMAN: Thank you. Next.

(Sworn.)

HERB WYETH

having been first duly sworn, testified as follows:

MR. SILVERMAN: Would you state your name please?

MR. WYETH: Herb Wyeth.

MR. SILVERMAN: Would you spell your last name, please?

MR. WYETH: W-Y-E-T-H.

MR. SILVERMAN: And the court reporter will be taking down your testimony so please make sure that you speak slowly so that she can get it all down into the record. And, Mr. Wyeth, go ahead with your testimony.

MR. WYETH: Yes. I'm Herb Wyeth, and I'm First Ward Alderman and also head of the airport committee, and we have been working very hard to get the crosswind runway for a long time. I have only been involved in the last three years, but it's been just great to get the outpouring positive from the community about having that and just makes it more accessible to airplanes and jets to our community and our businesses and what we

have to offer Morris. It's really going to open up a lot of opportunity. And just the presence and the talk of it right now is even very positive. Being an alderman, I hear quite a bit of things, but everything has been positive. Every -- and getting the grant for it really has been the push that really allowed us to move forward. It's been a slow process, but at the end of the day it's really going to be very valuable to the community.

MR. SILVERMAN: Okay. Thank you. Anything else you would like to add?

MR. WYETH: No, that's it.

MR. SILVERMAN: All right. Thank you very much for your testimony.

(Sworn.)

TOM ELLIS,

having been first duly sworn, testified as follows:

MR. SILVERMAN: All right. Good morning. Would you state your name please?

MR. ELLIS: Tom Ellis.

MR. SILVERMAN: Would you spell your last name for us, please?

MR. ELLIS: E-L-L-I-S.

MR. SILVERMAN: And the court reporter will be

taking down your testimony, Mr. Ellis, so make sure that you speak slowly so she can get all of your testimony into the record.

MR. ELLIS: Sure.

MR. SILVERMAN: So the floor is yours. Please provide any testimony you would like.

MR. ELLIS: Okay. So my relevance to the airport is I grew up at the airport. There used to be a house just north from 1977. So I've experienced all types of airport operations when there used to be an east/west runway, and once that was removed from development we started witnessing a lot of crashes due to people overshooting the runways because of the winds or just blown off the runways because now it just became a north/south runway and they were still trying to land. So an additional option for an east/west runway, I think, would do away with a lot of those runway incidents and/or diversions.

So I'm a pilot myself now, and a lot of times with -- the winds in the morning might not be too high, but in the afternoon we have to divert to another airport and then get rides back or shuttle to the airplanes, you know, after the fact. So it's not very convenient. We go to Joliet or Lewis at the time.

So that's pretty much what I know. I mean, that's our farm over there, and it's just farmland. My aunt still lives there but, yeah.

MR. SILVERMAN: Okay. Well, thank you so much for your testimony. If you think of anything else you would like to add in, stop back and see us.

MR. ELLIS: Yeah, sure.

MR. SILVERMAN: At this time I'll introduce into the record Exhibit No. 4 which is a document consisting of four pages of an order of confirmation from Shaw Media and a public notice with respect to this public hearing and open house today. So that will be entered into and part of the record.

(Sworn.)

JEFF VOGEN,

having been first duly sworn, testified as follows:

MR. SILVERMAN: The first thing I would ask for you to do is state your name, please.

MR. VOGEN: Jeff Vogen.

MR. SILVERMAN: And, Mr. Vogen, would you spell your last name for the court reporter, please?

MR. VOGEN: V, as in Victor, O-G-E-N.

MR. SILVERMAN: And she'll be taking down your testimony today so make sure that you speak slowly and

clearly so that she can accurately record the testimony. Go ahead. The floor is yours, please.

MR. VOGEN: With the crosswind runway I think it's a wonderful idea. Number one, first and foremost, with me being the airport manager, it's a safety issue. And everybody is aware of the winds we get around here. Each airplane has a crosswind component which means they cannot fly or not fly safely. With this new runway that opens that up to 365 days a year of safe flying.

And, number two, it will relieve the pressure off of our north/south runway which will always be our primary runway. For the corporate jets and everything else coming in there, it keeps the little ones away from them and out of the traffic area. Short and to the point.

MR. SILVERMAN: All right. Well, thank you. If you have any further testimony you would like to add, please come back and see us, and we thank you for your testimony.

(Sworn.)

JULIE WILKINSON,

having been first duly sworn, testified as follows:

MR. SILVERMAN: Will you state your name for

the record, please?

MS. WILKINSON: Julie Wilkinson.

MR. SILVERMAN: Julie, the court reporter will be taking down all of your testimony today so please speak slowly and clearly so that she can get everything correct.

MS. WILKINSON: Okay. My name is Julie Wilkinson, and I am the Business Development Director for the City of Morris. The Morris Municipal Airport generates a significant economic impact for Morris. The airport is a key feature when attracting and retaining corporate businesses and their suppliers to our area. It is also used by dignitaries and other leaders seeking efficient passage to Morris and nearby communities outside of the Chicago airport system.

In addition to corporate aviation, recreational flying and agricultural spraying take place at our local airport. These uses directly generate tax revenue for the City and draw visitors to patronize businesses in our community supporting their payroll. By expanding the facility's capabilities, the community will see an increase in economic output to its benefit.

MR. SILVERMAN: Anything else you would like to

add?

MS. WILKINSON: That is all.

MR. SILVERMAN: All right. Thank you for your testimony today.

MS. WILKINSON: Okay. Thank you.

MR. SILVERMAN: The published time for the public hearing was from 10:00 a.m. to 12:00 p.m. Central time. The time is now 12:00 p.m. There are no further requests to give oral testimony, and I hereby close this public hearing.

I have been asked by the Morris Municipal Airport to thank our hosts for this event, the City of Morris and, specifically, the staff here. They have been extremely accommodating and helpful. Thank you. And thank you to the public for your participation. Have a good day. The hearing is closed.

(Which were all the proceedings had in this matter.)

STATE OF ILLINOIS)
)
COUNTY OF GRUNDY)

I, Belinda A. Harr, CSR NO. 84-003215, do hereby certify that the above proceedings of the Public Hearing on the 5th day of March, 2024, in the matter of In Re Morris Municipal Airport Crosswind Runway 7-25 were reported stenographically by me and reduced to typewriting under my personal direction; and that the foregoing is a true and correct transcript of the proceedings.

IN WITNESS WHEREOF I have hereunto set my hand this 19th day of March, 2024.

Belinda A. Harr

BELINDA A. HARR
Certified Shorthand Reporter

To the City of Morris,

I have been a pilot for the past 30 years solely based at Morris Municipal Airport. I am a private pilot with a tailwheel endorsement who has flown a Cessna 140 and RV 7 over those years, continuing to fly my RV 7 to this day. While the north/south runway at Morris has been great, an east/west runway would be ideal to have due to the prominent winds that we get at the airport. This ensures safety to not only tailwheel pilots, but all pilots, as it is safer to land directly into the wind instead of having a crosswind. I am in favor of a newly create east/west runway at the Morris Airport.

Thank you,

Gary Wills

To the City of Morris,

I am a private pilot with about 175 hours total time, along with a tailwheel endorsement. I have been at the Morris Airport for about a year and a half now with my own airplane but have been coming here with my father since I was a little kid. Having an additional east/west runway would make the airport a much safer environment for all pilots. It seems more often than not, there is a strong east/west wind, rather than a north/south wind which the current runway serves. With flying small, general aviation aircraft, landing into the wind is crucial, as there demonstrated crosswind components are not that high. I am in favor of having a new east/west runway at the Morris Airport and think it would be beneficial to the general aviation community.

Thank you,

Tom Wills

2-16-24

TO WHOM IT MAY CONCERN,

MY NAME IS BILL KLOTT (HANGAR 32). I HAVE BEEN BASED AT THE MORRIS AIRPORT FOR 20 YEARS. I HAVE MANY HOURS OF FLIGHT TIME, MOSTLY FROM THE MORRIS AIRPORT.

I BELEVE THAT A CROSS RUNWAY WOULD BE VERY BENEFICIAL TO OUR AIRPORT IN THAT MORE PILOTS WOULD USE OUR AIRPORT AND THEREFORE INCREASING FUEL SALES AND JUST VISITING OUR AIRPORT.

WINDS AT MORRIS ARE RREDOMINANTLY FROM THE WEST, SOUTHWEST AND NORTHWEST. MAKING A CROSSWIND LANDING MORE DIFFICULT. THE CROSS WIND RUNWAY WOULD MAKE OUR AIRPORT MORE USABLE UNDER WINDY CONDITIONS. AND MAKE OUR AIRPORT SAFER.

THANKFULLY YOURS
Bill Klott

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EST. 1851
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(815)459-4040

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700 N DIVISION ST
MORRIS IL 60450

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Times Ord: 2 — Times Run: ***
CLEG 2.00 X 80.00 — Words: 590
Total CLEG 160.00
Class: C8100 PUBLIC NOTICES
Rate: LEGAL — Cost: 412.30
Affidavits: 1
Ad Descrpt: MORRIS AIRPORT HEARING
Descr Cont: 2139699
Given by: LORI MARTIN
P.O. #:
Created: phart 01/25/24 14:38
Last Changed: phart 01/25/24 14:43

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Phone: (815)942-4026
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APNW	CL	97	S	01/31

(CONTINUED ON NEXT PAGE)

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(815)459-4040

ORDER CONFIRMATION (CONTINUED)

Salesperson: PHIL HARTMAN Printed at 01/25/24 14:43 by phart-sm

Acct #: 10056870 Ad #: 2139699 Status: New

PUBLIC NOTICE

Legal Notice Of Availability Of A Draft Environmental Assessment (DEA) & Notice Of A Public Open House/Workshop & Public Hearing, Morris Municipal Airport (C09), Morris, Il

The City of Morris, owner, Sponsor, and operator of the Morris Municipal Airport, intends to submit to the Federal Aviation Administration a request for National Environmental Policy Act (NEPA) approval in constructing the following development items:

Acquisition of 179.53 acres of land in fee simple title and 0.73 acres of avigation easements per the requirements of the Uniform Relocation and Real Property Assistance Act of 1970.

Construct Runway 7-25, 3,500 feet long by 60 feet wide. Construct Taxiway B at 25 feet wide and 400 feet east of Runway 18-36 from Taxiway C to Runway 18 threshold. Construct/Relocate (includes pavement removal of existing Taxiway A3) and construct new Taxiway A3 at 25 feet wide from Taxiway B to Taxiway A.

Construct Full-Length Parallel Taxiway "C" at 25 feet wide and 240 feet north of Runway 7-25. Install Medium Intensity Runway Lights (MIRL) on Runway 7-25.

Install Medium Intensity Taxiway Lights (MITL) on all proposed taxiways.

Install Precision Approach Path Indicator (PAPI) Lights to serve pilots on approach to both runway thresholds.

Relocate the existing Lighted Windcone and Segmented Circle.

Install a Wind Cone to serve pilots on approach to Runway 25.

Install Runway End Identifier Lights (REIL) to serve pilots on approach to both of Runway 7-25 thresholds.

Removal and/or trimming of trees for site clearing and obstruction removal within the FAR Part 77 Airport Imaginary Surfaces.

A DEA has been prepared, which summarizes anticipated environmental effects of the Airport Development. A paper copy of the DEA is available for review at the following public locations:

Morris Municipal Airport, 9980 North Illinois State Route 47, Morris, IL 60450; City of Morris, 700 North Division Street, Morris, IL 60450.

An electronic copy of the DEA is available for review and downloading at the following website link: https://morrisil.org/morris-airport/. A Public Open House Workshop and Public Hearing will be held concurrently at the Morris City Hall located at 700 North Division Street, Morris, Illinois on March 5, 2024, from 10AM to 12PM.

The purpose of this hearing is to consider the social, economic, and environmental effects of the proposed developments and their consistency with the goals and objectives of area planning agencies. Representatives from the Airport and DEA preparers will be available to answer questions from the public at the Airport Open House. No formal project presentations will be made. Written materials provided at the Workshop/Hearing areas will be available in English and all facilities are compliant with the Americans With Disabilities Act. If other special assistance is necessary, please contact Casey McCollom, Chamlin and Associates, at (815) 942-1402. All special assistance requests must be made no later than 4PM Central on March 1, 2024.

Comments for the record may be given at the Public Hearing. A Public Hearing Officer will officiate the hearing and a court reporter will take verbal testimony from the Public. Written comments can be provided to the Hearing Officer in the Public Hearing area; placed in a Comment Box in the Public Hearing area; or sent via USPS mail to the Chamlin using the pre-addressed Comments Sheets.

All comments on the DEA will be accepted, if postmarked by and/or physically received at Chamlin by 5PM Central and/or Close of Business, on March 22, 2024. A complete public hearing transcript and responses to comments received will be included in the Final EA.

(Morris Herald-News Jan. 31 and Feb. 14, 2024)
2139699

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MORRIS EA PUBLIC COMMENTS REVIEW SPREADSHEET

#	Verbal/Written	Commentor	Respresenting	Any Enviromental Comments	Comment Action	FEA Revision Actions
1	Verbal Comment	Chris Brown	Mayor of Morris, Illlinois	No Environmental Comments	Comments Noted	No Revision to FEA
2	Verbal Comment	Nancy Norton	President/CEO Grundy County Economic Development Council	No Environmental Comments	Comments Noted	No Revision to FEA
3	Verbal Comment	Dominic Flamini	Airport User and Tenant	No Environmental Comments	Comments Noted	No Revision to FEA
4	Verbal Comment	John Limbach	Airport User and Tenant	No Environmental Comments	Comments Noted	No Revision to FEA
5	Verbal Comment	Peter Decraene	Airport User/Representing EAA Chapter 95	No Environmental Comments	Comments Noted	No Revision to FEA
6	Verbal Comment	Megan Borchers	Local Business Airport Users	No Environmental Comments	Comments Noted	No Revision to FEA
7	Verbal Comment	Herb Wyeth	City of Morris First Ward Alderman	No Environmental Comments	Comments Noted	No Revision to FEA
8	Verbal Comment	Tom Ellis	Pilot/Development Will Provided Added Safety	No Environmental Comments	Comments Noted	No Revision to FEA
9	Verbal Comment	Jeff Vogen	Airport Manager/Safety	No Environmental Comments	Comments Noted	No Revision to FEA
10	Verbal Comment	Julie Wilkerson	City of Morris Business Development Director	No Environmental Comments	Comments Noted	No Revision to FEA
11	Written Comment	Gary Wills	Pilot/Safety	No Environmental Comments	Comments Noted	No Revision to FEA
12	Written Comment	Tom Wills	Pilot/Tenant/User/Safety	No Environmental Comments	Comments Noted	No Revision to FEA
13	Written Comment	Bill Klott	Pilot/Tenant/User/Safety	No Environmental Comments	Comments Noted	No Revision to FEA
14	Written Comment	Public Hearing Notice	Notice	N/A	N/A	N/A