

Indiana Department of Environmental Management Office of Water Quality **Wetlands Section**

Publication Date: March 31, 2024

Closing Date:

June 30, 2024

PUBLIC NOTICE

IDEM ID Number: 2024-294-30-EJW-A

Corps of Engineers ID Number: LRL-2023-00199-sjk

To all interested parties: This letter shall serve as a formal notice of the receipt of an application for a State Isolated Wetland Individual Permit by the Indiana Department of Environmental Management (IDEM). The purpose of the notice is to inform the public of active applications submitted for permits required under IC 13-18-22 and to solicit comments and information on any impacts to water quality related to the proposed project. IDEM will evaluate whether the project complies with Indiana's water quality standards as set forth at 327 IAC 2 and all applicable provisions of IC 13-18-22.

1. Applicant: Jennifer Sewell

> Archview Properties, LLC 10 W Carmel Drive, Suite 200

Carmel, IN 46032

Eric Ellingson 2. Agent:

Earth Source, Inc. 14921 Hand Road Fort Wayne, IN 46818

3. Project location: Latitude: 39.868284 Longitude: -85.919187

Approximately 0.20 miles Southwest of N 600 W and W 600 N intersection.

Hancock County

Forested, Class 3 Isolated Wetlands Section I and Section II. 4. Affected waterbody:

5. Project Description: The applicant proposes to grade and fill 0.29 acres of Wetland Section I and 0.32 acres of Wetland Section II for

the construction of a residential apartment complex, associated parking lots and roads, and utilities infrastructure. To mitigate for these impacts, the applicant proposes to purchase wetland credits at a 2.5:1 ratio for a total of 1.53 acres within the Upper White Service Area of IDNR's Indiana Stream and Wetland Mitigation Program.

Comment period: Any person or entity who wishes to submit comments or information relevant to the aforementioned project may

do so by the closing date noted above. Only comments or information related to water quality or potential impacts of the project on water quality can be considered by IDEM in the state isolated wetland permit review

process.

Public Hearing: Any person may submit a written request that a public hearing be held to consider issues related to water quality

in connection with the project detailed in this notice. The request for a hearing should be submitted within the comment period to be considered timely. The request should also state the reason for the public hearing as

specifically as possible to assist IDEM in determining whether a public hearing is warranted.

Additional information may be obtained from Evan White, Project Manager, at 317-671-6698 or by email at **Questions?**

> evwhite@idem.in.gov. Please address all correspondence to the project manager and reference the IDEM project identification number listed on this notice. Indicate if you wish to receive a copy of IDEM's final decision.

Written comments and inquiries may be forwarded to -

Indiana Department of Environmental Management

100 North Senate Avenue MC65-42 WQS IGCN 1255 Indianapolis, Indiana 46204-2251

FAX: 317/232-8406



APPLICATION FOR AUTHORIZATION TO DISCHARGE DREDGED OR FILL MATERIAL TO ISOLATED WETLANDS AND/OR **WATERS OF THE STATE**

State Form 51821 (R2 / 11-15)

Indiana Department of Environmental Management

- INSTRUCTIONS: 1. Read the instruction sheet before filling out this form.
 - 2. You must complete all applicable sections of this form

1. Applicant Information	2. Agent Information
Name of Applicant Archview Properties, LLC	Name of Agent Earth Source, Inc.
Mailing address (Street/ PO Box/ Rural Route, City, State, ZIP Code) 10 W Carmel Drive, Ste 200 Carmel, Indiana 46032	Mailing address (Street/ PO Box/ Rural Route, City, State, ZIP Code) 14921 Hand Road Fort Wayne, Indiana 46818
Daytime Telephone Number (317) 574-1600	Daytime Telephone Number 260-489-8511
Fax Number	Fax Number 260-489-8607
E-mail address (optional) jsewell@cityscaperesidential.com	E-mail address (optional) eric@earthsourceinc.net
Contact person (required) Jennifer Sewell	Contact person Eric P. Ellingson
	Tract Location
Hancock	Nearest city or town McCordsville
U.S.G.S. Quadrangle map name (<i>Topographic map</i>) Cumberland	Project street address (if applicable) W 600 N McCordsville, IN
Quarter Section 1	Township Range R5E
Type of aquatic resource(s) to be impacted (Attach Worksheet One.) Section I - Forested Wetland, 0.29 acre Section II - Forested Wetland, 0.32 acre	Project name or title (if applicable) Cityscape Broadacre
Other location descriptions or driving directions From Indianapolis, take I-70 east to exit 96 toward Mt Comfort Rd. 600 N and the project section is south of the intersection of W 600	
4. Project Purpose and Description	n (Use additional sheet(s) if required.)
Has any construction been started? ☑ Yes ☐ No	Anticipated start date (month, day, year)
If yes, how much work is completed? Trees outside of the wetlands have been removed.	
Purpose of project and overview of activities Cityscape Broadacre is proposing the construction of a residential roads and utilities. The applicant is requesting an Isolated Wetland isolated, Class III, forested wetland for the construction residential	Individual Permit (IWIP) for the regulated impact to 0.61 acres of
Approximately 912 cubic yards of clean dirt material will be placed clean dirt material will be placed in 0.32 acres of Section II.	in 0.29 acres of Section I and Approximately 2,255 cubic yards of
To mitigate, the applicant proposes to purchase 1.53 acres (2.5:1 Mitigation Program (IN SWMP) within the Upper White Watershed	

5. Avoidance, Minimization, and Mitigation Information: Applicants must answer all of the following questions (Use additional sheet(s) if necessary - provide a detailed response to all applicable questions.)

A. For projects with Class II isolated wetlands -

- 1. Is there a reasonable alternative to the proposed activity? Not Applicable
- 2. Is the proposed activity reasonably necessary or appropriate? Not Applicable
- B. For projects with Class III wetlands, adjacent wetlands, and/or streams, rivers, lakes or other water bodies -
 - Is there a practicable alternative to the proposed activity?
 There is no practicable alternative to the proposed impacts. The impacts proposed were those necessary to construct the internal roads, install utilities, and provide necessary housing to meet local demand.
 - Have practicable and appropriate steps to minimize impacts to water resources been taken?
 Approximately 2.03 acres of Class III, forested wetland of Section I will be avoided with the development. The impacts proposed were those necessary to construct the internal roads, install utilities, and provide necessary housing to meet local demand.

Describe all compensatory mitigation required for unavoidable impacts.

To mitigate for the impacts to 0.61 acres of isolated, Class III, forested wetland, the applicant proposes to purchase 1.53 acres (2.5:1 ratio) of wetland credit for the Upper White Service Area (HUC 8: 05120201) from the Indiana Stream and Wetland Mitigation Program (IN SWMP). Mitigation credits will be purchased prior to impacts, or within one year of the permit issuance, whichever comes first.

6. Drawing / Plan Requirements (Applicants must provide the following.)

- a. Top/aerial/overhead views of the project site showing existing conditions and proposed construction.
- b. Cross sectional view of areas of fill or alterations to streams and other waters.
- c. North arrow, scale, property boundaries
- d. Include wetland delineation boundary (if applicable). Label all wetlands (jurisdictional, isolated and exempt) as I-1, I-2, I-3, etc. and the mitigation areas as M-1, M-2, etc.
- e. Location of all surface waters, including wetlands, erosion control measures, existing and proposed structures, fill and excavation locations, disposal area for excavated material, including quantities, and wetland mitigation site (if applicable).
- f. Approximate water depths and bottom configurations (if applicable)

7. Supplemental Application Materials (Applicants must provide the following.)

- a. A wetland delineation of all wetlands on the project site (for projects with wetland impacts).
- b. At least three photographs of the project site. Indicate the photo locations on the project plans.
- c. If isolated wetlands are present, a letter from the Corps of Engineers verifying this statement.
- d. Wetland mitigation plan and monitoring report.
- e. Classification of all isolated wetlands on the tract (if isolated wetlands are present onsite).
- f. Copies of all applicable local permits and/or resolutions pertaining to the project or tract.
- g. Tract history (see instructions).

8. Additional information that MAY be required (IDEM will notify you if needed.)

- a. Erosion control and/or storm water management plans.
- b. Sediment analysis.
- c. Species surveys for fish, mussels, plants and threatened or endangered species.
- d. Stream habitat assessment.
- e. Any other information IDEM deems necessary to review the proposed project.

9. Permitting Requirements
a. Does this project require the issuance of a Department of the Army Section 404 Permit from the US Army Corps of Engineers? 🔲 Yes 📈 No If no, you do not need to answer Part b.
b. Have you applied for an Army Corps of Engineers Section 404 permit? Yes No If yes, please supply the Corps of Engineers ID Number, the Corps of Engineers District, the project manager, and a copy of any correspondence with the Corps. If no, contact the Army Corps of Engineers regarding the possible need for a permit application.
c. Have you applied for, received, or been denied a permit from the Department of Natural Resources for this project?
d. Have you applied for, received, or been denied any other federal, state, or local permits, variances, licenses, or certifications for this project? Yes No Please give the permit name, agency from which it was obtained, permit number, and date of issuance or denial. IDEM - 2023-403-30-GCW-A ACOE - LRL-2023-199-sjk

	10.	Adjoining Property	Owners and Addresses		
			which your project is located and the r	names and a	ddresses of other
persons (or entities) potentially affe	ctea by your	project. Use additional sn	Name		
Brown Family Farm			M&M 2020, LLC		
Address (number and street)			Address (number and street)		
5254 W 900 N	04-4-	7ID 0 - 4 -	2014 Martindale Dr	Ctata	ZIP Code
City McCordsville	State IN	ZIP Code 46055	Greenfield	State IN	46140
Name			Name	400	
Philip & Beverley Wils Address (number and street)	son		Russell & Shelley Hay Address (number and street)	yse	
5978 W 600 N			6277 W 600 N		
City	State	ZIP Code	City	State	ZIP Code
McCordsville	IN	46055	McCordsville	IN	46055
Name HR Brothers LLC			Name		
Address (number and street)			Address (number and street)		
13161 Glenside Drive					
City Fishers	State IN	ZIP Code 46037	City	State	ZIP Code
Name	1114	40037	Name		
Jennifer Whitaker			Ivanie		
Address (number and street)			Address (number and street)		
5860 W 600 N		717.0	0.0	01-1-	710.0
City McCordsville	State IN	ZIP Code 46055	City	State	ZIP Code
Name	., .	.3000	Name		
Travis Cohron					
Address (number and street)			Address (number and street)		
City	State	ZIP Code	City	State	ZIP Code
Fishers	IN	46040			
Name			Name		
Hancock County India Address (number and street)	ana		Address (number and street)		
111 American Legion	PI Suite	217	radios (number and sites)		
City	State	ZIP Code	City	State	ZIP Code
Greenfield	IN	46140			

11. Signature - Statement of Affirmation

I certify that I am familiar with the information contained in this application and, to the best of my knowledge and belief, such information is true and accurate. I certify that I have the authority to undertake and will undertake the activities as described in this application. I am aware that there are penalties for submitting false information. I understand that any changes in project design subsequent to IDEM's granting of authorization to discharge to a water of the state are not authorized and I may be subject to civil and criminal penalties for proceeding without proper authorization. I agree to allow representatives of the IDEM to enter and inspect the project site. I understand that the granting of other permits by local, state, or federal agencies does not release me from the requirement of obtaining the authorization requested herein before commencing the project.

Applicant's Signature:

Date:

(LOLT

rint Name:

AUTHORITED REPRESENTANCE

Worksheet – Summary of Onsite Water Resources and Project Impacts

A. Jurisdictional Wetlands (Existing Conditions)		Jurisdio	tional Wetla	nds (Proposed Impacts)		
Wetland Typ	e Size of wetland (acreage)		To be Impacted?	Acreage	Fill quantity (cys)	ATF
□EM □SS [□ FO	Not Applicable	☐ Yes ☐ No			
□EM □SS [] FO		☐ Yes ☐ No			
□EM □SS [] FO					
□EM □SS [] FO	FO				
□EM □SS [] FO		☐ Yes ☐ No			
□EM □SS [□ FO		☐ Yes ☐ No			
□EM □SS [] FO		☐ Yes ☐ No			
Not Applicable	Describe the type and composition and quantity (cubic yards) of material proposed to be dredged or excavated from wetlands on the project site:					
B Isolate	d Wetlands (F	Existing Conditions)	Isola	ted Wetland	s (Proposed Impacts)	
Wetland Class	Type	Size of wetland (acreage)	To be Impacted?	Acreage	Fill quantity (cys)	ATF
☑ 1 □2 ☑ 3	ZINF ZIF	Section I - 2.58 ac	☑ Yes □ No	0.29	912	No
□1 □2 ☑ 3	□NF ØF	Section II - 0.32 acre	☑ Yes □ No	0.32	2,255	No
□1 ☑2 □3	□NF ZF	Section III - 0.08 acre	☑ Yes □ No	0.08	Exempt	No
□1 ☑2 □3	□NF ØF	Section IV - 0.01 acre	☑ Yes □ No	0.01	Exempt	No
□1 □2 □3	□NF □F		☐ Yes ☐ No			
□1 □2 □3	□NF □F		☐ Yes ☐ No			
Clean dirt material		fill material to be placed in isolated	·	,	nm isolated wetlands on the project	site:
Describe the type and composition and quantity (cubic yards) of material proposed to be dredged or excavated from isolated wetlands on the project site: Not Applicable						
Stream name	C. Bridges and Stream Crossings - provide the following information for EACH structure (Use additional sheet(s) if required.) Stream name					
Not Applicable Description of impacts						
Not Applicable						
Length of upstream bank impacts: Left side: Not Applicable Right side: Not Applicable						
Length of downstrea	·	Left side: Not Ap	plicable	Right s	ide: Not Applicable	
Bank protection fill p	laced below the C	Ordinary High Water Mark:	Volume per runi		Applicable	
Bank protection fill placed below the Ordinary High Water Mark: Area of coverage: Not Applicable						

D. Bank Stabilization – provide the following information for EACH segment (Use additional sheet(s) if required.)
Water body name Not Applicable
Description of impacts Not Applicable
Length of shoreline or bank protection Not Applicable
Volume (cubic yards) of bank protection fill placed below the Ordinary High Water Mark per running foot Not Applicable
Area (square feet) of bank protection fill placed below the Ordinary High Water Mark Not Applicable
E. Stream Relocation Water body name
Not Applicable
Description of impacts Not Applicable
Length of existing channel to be relocated (linear feet)
Not Applicable
Length of new channel to be constructed (linear feet) Not Applicable
Existing channel to be backfilled? Type of relocation Piping Deen Dther:
Type of fill and volume (cubic yards) Not Applicable
F. Ones Water Fill
F. Open Water Fill Water body name
Not Applicable
Description of impacts Not Applicable
Notification
Area of water body to be filled (acres)
Not Applicable Type of fill and volume (cubic yards)
Not Applicable

Notes and Instructions for Authorization to Discharge Dredged or Fill Material to a State Regulated Wetland and/or Waters of the State Permit Application Form and Worksheet

Note to applicants:

This form is to be used by all persons who intend to discharge dredged or fill materials into wetlands, isolated wetlands, or any other water body regulated under state and federal law. Specifically, this form is to be used for the following:

- 1. Application for Section 401 Water Quality Certification for any project not covered by the Indiana Regional General Permit
- Application for a State Regulated Wetland Permit authorized under HEA 1798 and HEA 1277, excluding any activities authorized under any of the State Regulated Wetland General Permits

Consult the Office of Water Quality Web site for information on the types of authorizations and requirements for projects regulated under these laws.

http://www.in.gov/idem/wetlands/index.htm

Do not submit this form until you are familiar with the various authorizations and proper forms for obtaining these authorizations. An application submitted on the incorrect form may result in delays in processing.

Applicants should also contact the Indiana Department of Natural Resources (DNR) regarding potential permit requirements associated with construction in a floodway or a public freshwater lake. You can reach the DNR Division of Water at (317) 232-4160 or toll free at (877) WATER-55.

Instructions for Completing the Application and Worksheet

Address all applications or questions to:

Indiana Department of Environmental Management
Office of Water Quality
Section 401 Water Quality Certification/State Isolated Wetlands Program
100 North Senate Ave.
Indianapolis, Indiana 46204

Telephone: (800) 451-6027 or (317) 233-8488

Print clearly or type.
Attach additional 8.5" x 11" sheets as necessary.

APPLICATION

Note: Some wetland activities may impact both U.S. navigable waters and state regulated isolated wetlands. In those situations, the project will require a Section 401 Water Quality Certification and Section 404 U.S. Corps of Engineers permit AND approval under the new State Isolated Wetland Regulatory Program. When IDEM receives an application that involves an activity that may impact both intrastate navigable waters and a state regulated wetland, current state law requires that we evaluate each activity using different authorities. IDEM will, at the request of an applicant, evaluate a project with multi-jurisdictional wetlands under the Section 401 certification framework and will provide one authorization for the project, applying the state regulated isolated wetlands law and federal Clean Water Act Section 401 authorities. If an applicant prefers that all IDEM approvals occur within one streamlined review process, a separate letter specifically requesting a combined review of the entire project should be submitted concurrently with the application.

Block 1 - Applicant Information

Provide your name, address, and telephone number. You MUST provide a contact name. For complex projects or projects with multiple contractors and responsible parties, designation of a single point of contact will speed up the review process and enable more timely responses to requests for information.

Block 2 - Agent Information

If you choose to be represented by an agent, provide the agent's address and telephone information. You are not required to have an agent.

Block 3 - Project Location

Provide specific information relating to the location of your proposed project. Provide accurate maps depicting the project location. Try to keep detail on maps to a minimum, focusing instead on the location of structures and associated water bodies. Consult the USGS Quadrangle maps for information on the quarter, section, township and range of the project. IDEM may require that you submit full size plans to supplement the 8 1/2" by 11" map sheets if the project is large or complex.

Block 4 - Project Purpose and Description

Provide the proposed or actual start date and the anticipated completion date. If you have started your project before obtaining authorization, you may be in violation of federal and/or state law. Give a narrative description of the proposed project. You should include any supplemental environmental reports, assessments, or other documents that explain or justify the proposed configuration of the project. Describe the purpose of the project (that is, what goal oroutcome will be met by the construction of the project).

Block 5 - Avoidance, Minimization, and Mitigation Information

You must describe possible alternatives to the proposed project that would avoid impacts to the aquatic resource that were considered during the project planning process. You must also describe ways to minimize impacts considered during the project planning process, including a description of how you plan to contain any dredged/excavated material to prevent re-entry into waterways or wetlands. Examples of alternatives include construction on the upland portions of the property; rerouting a roadway to avoid a wetland; or alternate design plans. Minimization of the impacts may decrease any mitigation requirements that might otherwise apply. Minimization may include reduction of the amount of dredging, filling, or vegetative clearing. For isolated wetlands only, enclosure of a copy of (1) a resolution of the executive of the county or municipality in which the wetland is located or (2) a permit or other approval from a local government entity having authority over the proposed use of the property on which the wetland is located; that includes a specific finding that the wetland activity is part of a legitimate use proposed by the applicant on the property, substitutes for the information required on avoidance and minimization.

Answer all the questions in detail, providing example, drawings, or other supporting information to illustrate the steps taken to consider alternatives. Provide reasons why various alternatives were or were not considered.

In general, all impacts to wetlands or other waters that require the use of this form will require some form of compensatory mitigation. A detailed description ofthe mitigation plan must be provided, including: the location of the mitigation site, the size and type of mitigation to be performed, the construction sequence ortiming of the mitigation, information on post construction monitoring, mitigation techniques, and success criteria of the mitigation site. A mitigation plan, with overview drawings, planting lists, cross sectional views, and other relevant information is recommended as a supplement to answer this question.

Block 6 - Drawing/Plan Requirements

You must submit drawings/plans that are on 8 1/2 by 11 inch sheets. Your project will be delayed if these materials are not submitted in the formats specified in the application.

Block 7 - Supplemental Application Materials

All projects involving impacts to wetlands must be accompanied by a wetland delineation using the procedures established in the U.S. Army Corps of Engineers Wetland Delineation Manual, Technical Report Y-87-1 (January 1987). This delineation must be approved or reviewed by the Corps of Engineers in order for IDEM to determine the impacts to water bodies associated with the project. DO NOT submit an application involving impacts to wetlands without a wetland delineation. For projects that involve impacts to isolated wetlands, a letter from the Corps of Engineers that specifically makes this determination must be provided or the application will not be processed. Submittal of photographs depicting the project site is highly encouraged. Photos must be clearly labeled with the direction of the shot, the area depicted, and notes on relevant features. A map depicting the location of photos on the project site is also useful and should be included whenever photos are submitted.

For project sites with isolated wetlands, a tract history is also required. This history provides information on all the wetlands on the site prior to January 1, 2004, and describes any and all activities within these wetlands, including impacts allowed to wetlands exempt from regulation under the various provisions of federal and state law. Direct questions regarding this requirement to IDEM staff for clarification.

Block 8 - Additional Information That May Be Required

You are not required to submit the information specified in this section unless directed to do so by IDEM. However, you may submit the information if you anticipate that such information will be required. For example, if you are aware of issues on the proposed project site which may impact water resources, such as the presence of contaminated soils or sediments, endangered species, well field protection areas, or previously permitted activities on the project site, information regarding these points must be submitted with the certification application.

Block 9 - Permitting Requirements

Provide information regarding your application to the Corps of Engineers. If you have not yet contacted the Corps of Engineers, you must do so as soon as possible (SEE BLOCK 7). Provide information regarding any other federal, state, or local permits, variances, licenses, or certifications required for your project. Please indicate whether they were approved, denied, or are pending.

Block 10 - Adjoining Property Owners and Addresses

List the names and addresses of landowners adjacent to the property on which your project is located. Adjacent property owners are persons who share property lines with your property. Inclusion of names and addresses of other persons (or entities) potentially affected by your project must include persons within your neighborhood, lake association, or in the general vicinity that may have an interest in your project. Consult with IDEM for further clarification.

Block 11 - Signature - Statement of Affirmation

You must sign and date the application. If the applicant is a corporation, a responsible person from that corporation must sign. No other signatures will be accepted. The application will not be processed without the appropriate signature.

WORKSHEET

Note: When calculating any type of impact, all areas that are affected by placement of fill, bank armoring, culverting, excavation, or any other activity must be counted. When calculating open water impact, all areas within lakes, rivers, streams and the like must be counted. This includes areas under new bridge piers, beaches, and boat ramps, as examples. The Ordinary High Water Mark means that line on the shore of a water body established by the fluctuations of water and indicated by physical characteristics such as clear, natural line impressed on the bank, shelving, changes in the character of soil, natural destruction of terrestrial vegetation, the presence of litter and debris, or other appropriate means that consider the characteristics of the surrounding areas.

- Fill out only the sections of this worksheet that apply to your project. -

Section A - Wetlands

This section is for wetlands determined to be under the jurisdiction of the U.S. Army Corps of Engineers (Corps) and that require a Section 404 permit as well as a Section 401 Water Quality Certification from IDEM. List the type of wetland as Emergent (EM), Scrub shrub (SS), or Forested (FO). "Emergent wetland" means a wetland characterized by erect, rooted, herbaceous hydrophytes, excluding mosses and lichens. "Scrub shrub wetland" means a wetland dominated by woody vegetation having a height greater than three and two-tenths (3.2) feet, and a stem diameter less than three (3) inches. This includes true shrubs, young trees, and trees and shrubs stunted by environmental conditions. "Forested wetland" means a wetland dominated by woody vegetation that has a diameter, at breast height, greater than three (3) inches, regardless of total height. The size of the wetland must be determined by conducting a wetland delineation consistent with the protocols established in the U.S. Army Corps of Engineers 1987 Wetland Delineation Manual. The applicant must list whether or not the wetland will be impacted, the acreage of the impact, and the quantity of fill to be discharged into the wetland. The applicant must identify whether or not this is an after-the-fact (ATF) permit. An ATF permit is for impacts to wetlands or other water bodies under the jurisdiction of IDEM that did not receive authorization before the impacts occurred. Additionally, the applicant must describe the type and composition of material proposed to be discharged or removed from the wetland.

Section B - Isolated Wetlands

This section is for wetlands the Corps has determined to be isolated and no longer under their jurisdiction. The Corps jurisdictional determination letter must be included with the application. Isolated wetlands are considered State Regulated Wetlands and proposed impacts to these wetlands will be reviewed pursuant to IC 13-18-22. The class of wetland must be determined by the definitions outlined in IC-13-11-2-25.8. This is determined by assessing the vegetation type,

hydrologic function, habitat functions, values of the wetland, and disturbances to the wetland. The applicant must determine the type of wetland by designating the wetland as either Non-Forested (NF) or Forested (F). The size of the wetland must be determined by conducting a wetland delineation consistent with the protocols established in the U.S. Army Corps of Engineers 1987 Wetland Delineation Manual. The applicant must list whether or not the wetland will be impacted, the acreage of the impact, and the quantity of fill to be discharged into the wetland. The applicant must identify whether or not this is an after-the- fact (ATF) permit. An ATF permit is for impacts to wetlands or other water bodies under the jurisdiction of IDEM that did not receive authorization before the impacts occurred. Additionally, the applicant must describe the type and composition of material proposed to be discharged or removed from the wetland.

Section C - Bridges and Stream Crossings

This section is for projects that impact streams in order to construct, maintain, or protect structures used to cross the stream. The applicant must list the name of the stream to be impacted by the proposed project. The stream name can be found on the USGS Topographic map. If the stream does not have a name, identify it as a tributary to the next stream or water body with a name. Describe the proposed impacts in detail. Include the lengths of bank impacts to both banks upstream and downstream. Determination of left and right banks is made in the following manner- at the point furthest upstream on the project site, face downstream - the left bank is on your left and the right bank is on your right. Identify the volume per running foot of material to be discharged below the Ordinary High Water Mark (OHWM). Identify the total area below the OHWM to receive a discharge of fill material.

Section D - Bank Stabilization

This section is for projects that discharge fill material in order to stabilize eroding land along streams, lakes, or other water bodies. The applicant must list the name of the water body to be impacted by the proposed project. The name of the water body can be found on the USGS Topographic map. If the water body does not have a name, identify it as a tributary to the next stream or water body with a name. Provide the length of shoreline or bank impact. Identify the volume per running foot of material to be discharged below the Ordinary High Water Mark (OHWM). Identify the total area below the OHWM to receive a discharge of fill material.

Section E - Stream Relocation

This section is for projects that propose to relocate a stream from its existing banks either by open channel construction or by stream piping. The applicant must list the name of the stream to be impacted by the proposed project. The stream name can be found on the USGS Topographic map. If the stream does not have a name, identify it as a tributary to the next stream or water body with a name. Describe the impacts to the stream. Provide the linear feet of existing channel to be relocated and the length of new channel to be constructed. The applicant must state whether the old channel is proposed to be filled and describe the type and quantity of fill to be used to fill the old channel. The applicant must also provide the type of relocation, new channel or piping.

Section F - Open Water Fill

This is for projects where the fill material extends beyond the edge of the shoreline into open water. Some examples include the filling of pit mines, borrow pits, and other land reclamation projects. Provide the name of the water body to be impacted. If the water body does not have a name, identify it as unnamed open water body. Describe the impacts to the water body including the area to be filled and the type and quantity of fill material to be discharged.

APPLICATION FOR:

ISOLATED WETLAND INDIVIDUAL PERMIT

CITYSCAPE BROADACRE

Prepared for:

ARCHVIEW PROPERTIES, LLC 10 W CARMEL DRIVE, STE 200 CARMEL, INDIANA 46032

Prepared by:



14921 Hand Road, Ft. Wayne, IN 46818 PH: (260) 489-8511 • Fax: (260) 489-8607

TABLE OF CONTENTS

1.0 EXECUTIVE SUMMARY	1
2.0 PROJECT INFORMATION	2
2.1 APPLICANT INFORMATION	2
2.2 PROJECT SUMMARY	2
3.0 AVOIDANCE, MINIMIZATION & MITIGATION	2
3.1 AVOIDANCE AND MINIMIZATION	2
3.2 MITIGATION	2
4.0 REGULATED IMPACT SUMMARY	3
4.1 SECTION I	3
4.2 SECTION II	3
5.0 STATE ENDANGERED AND THREATENED SPECIES	3
APPENDICES	
AGENCY CORRESPONDENCE IDNR – NATURAL HERITAGE DATA SITE PHOTOGRAPHS	APPENDIX A APPENDIX B APPENDIX C
GRAPHICS	
REGIONAL LOCATION MAP PROJECT LOCATION MAP NATIONAL WETLANDS INVENTORY MAP HANCOCK COUNTY SOIL SURVEY MAP WETLAND DELINEATION MAP WETLAND IMPACT MAP OVERALL EXISTING CONDITIONS EXHIBIT OVERALL GRADING AND DRAINAGE EXHIBIT WETLAND PROFILES EXHIBIT	C1 C2 C3 C4 C5 C6 EXHIBIT 1 EXHIBIT 2 EXHIBIT 3

ISOLATED WETLAND INDIVIDUAL APPLICATION CITYSCAPE BROADACRE: HANCOCK COUNTY, INDIANA

1.0 EXECUTIVE SUMMARY

Cityscape Broadacre is proposing the construction of a residential apartment complex, which includes apartment buildings, internal roads and utilities. The 19-acre project site is located in Section 1 of Buck Creek Township (Township 16 North, Range 5 East) of Hancock County, Indiana (Latitude: 39.868268°, Longitude: -85.919515°). The applicant is requesting an Isolated Wetland Individual Permit (IWIP) for the regulated impact to 0.61 acres of isolated, Class III, forested wetland for the construction residential apartment buildings and internal roads. To mitigate, the applicant proposes to purchase 1.53 acres (2.5:1 ratio) of mitigation credit from the Indiana Stream and Wetland Mitigation Program (IN SWMP) within the Upper White Watershed (HUC 8: 05120201).

ISOLATED WETLAND INDIVIDUAL APPLICATION CITYSCAPE BROADACRE: HANCOCK COUNTY, INDIANA

2.0 PROJECT INFORMATION

2.1 Applicant Information

Applicant

Ms. Jennifer Sewell Archview Properties, LLC 10 W Carmel Drive, Ste 200 Carmel, Indiana 46032

voice (317) 574-1600

Agent

Mr. Eric P. Ellingson Earth Source Incorporated 14921 Hand Road Fort Wayne, Indiana 46818

voice (260) 489-8511 facsimile (260) 489-8607

2.2 Project Summary

Cityscape Broadacre is proposing the construction of a residential apartment complex, which includes apartment buildings, internal roads and utilities. The 19-acre project site is located in Section 1 of Buck Creek Township (Township 16 North, Range 5 East) of Hancock County, Indiana (Latitude: 39.868268°, Longitude: -85.919515°). The applicant is requesting an Isolated Wetland Individual Permit (IWIP) for the regulated impact to 0.61 acres of isolated, Class III, forested wetland for the construction residential apartment buildings and internal roads. To mitigate, the applicant proposes to purchase 1.53 acres (2.5:1 ratio) of mitigation credit from the Indiana Stream and Wetland Mitigation Program (IN SWMP) within the Upper White Watershed (HUC 8: 05120201).

3.0 AVOIDANCE, MINIMIZATION & MITIGATION

3.1 Avoidance and Minimization

Wetland Section I is 2.58 acres and the development will avoid 2.03 acres of the forested wetland. The applicant targeted impacts to the smaller isolated wetlands rather than the one larger wetland on the project site. The impacts proposed were those necessary to construct the internal roads, install utilities and provide necessary housing to meet local demand.

3.2 Mitigation

To mitigate for the impacts to 0.61 acres of isolated, Class III, forested wetland, the applicant proposes to purchase 1.53 acres (2.5:1 ratio) of wetland credit for the Upper White Service Area (HUC 8: 05120201) from the Indiana Stream and Wetland Mitigation Program (IN SWMP). Mitigation credits will be purchased prior to impacts, or within one year of the permit issuance, whichever comes first.

Earth•Source, Inc.

Page 2 of 3; (3/28/2024)

14921 Hand Road, Fort Wayne, IN 46818

PH: (260) 489-8511 FAX: (260) 489-8607

ISOLATED WETLAND INDIVIDUAL APPLICATION CITYSCAPE BROADACRE: HANCOCK COUNTY, INDIANA

4.0 REGULATED IMPACT SUMMARY

Table 1: Wetland Permit Permanent Impact Summary

Wetland	Cover-type	Class	Size (ac)	Impact (ac)	Fill (CYS)
Section I	Forested/Emergent	III/NA	2.58	0.55	_
	Forested	Ш	2.32	0.29	912
	Emergent-Cropland	NA	0.26	0.26	Exempt
Section II	Forested	Ш	0.32	0.32	2,255
		Regulated Total		0.61	3,167

4.1 Section I (reference attachments Exhibit 1, Exhibit 2, Exhibit 3)

Type of development:

Total area of wetland:

Total area of regulated impact:

Total proposed fill:

Residential
2.58 acre
0.55 acre
912 cubic yards

Approximately 912 cubic yards of clean dirt material will be placed in 0.29 acres of Class III, forested wetland for the construction of a residential apartment building and a detention basin. A total of 0.26 acres of cropland emergent wetland will be impacted with the development, but meet the definition of an exempt wetland under IC-13-18-22-1(d)(1) due to the development of cropland.

4.2 Section II (reference attachments Exhibit 1, Exhibit 2, Exhibit 3)

Type of development:

Total area of wetland:

Total area of regulated impact:

Total proposed fill:

Residential

0.32 acre

2,255 cubic yards

Approximately 2,255 cubic yards of clean dirt material will be placed in 0.32 acres of Class III, forested wetland (Section II) for the construction of two (2) residential apartment buildings, internal roads and utilities.

5.0 STATE ENDANGERED AND THREATENED SPECIES

According to correspondence with Taylor Davis Astle from the Indiana Natural Heritage Data Center on February 20, 2023, no threatened or endangered species or significant area were document within 0.5 mile of the project site (Appendix B).

APPENDIX A AGENCY CORRESPONDENCE

IDEM

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

100 N. Senate Avenue • Indianapolis, IN 46204

(800) 451-6027 • (317) 232-8603 • www.idem.IN.gov

Eric J. Holcomb

Governor

Brian C. Rockensuess

Commissioner

WATER OF THE STATE DETERMINATION

VIA ELECTRONIC MAIL:

PROJECT NO.: 2024-61-30-EJW-Q

PROJECT NAME: Broadacre

AUTHORITY: 327 IAC 17-1-3(13), 327 IAC 17-1-3(17)

DATE OF ISSUANCE: March 13, 2024

DATE OF EXPIRATION: January 18, 2029

APPROVED:

James Turner

Wetlands Section Chief

Surface Water and Operations

James B. Juner

Office of Water Quality

RESPONSIBLE PARTIES: James Thomas, Jr.

Archview Properties, LLC

10 West Carmel Drive, Suite 200

Carmel, IN 46032

DELINEATOR(S): Eric Ellingson

Earth Source, Inc. 14921 Hand Road Fort Wayne, IN 46818

AGENT(S): Ashlee Nichter

Earth Source, Inc. 14921 Hand Road Fort Wayne, IN 46818

DELINEATION DATE: July 13, 2022



IDEM No. 2024-61-30-EJW-Q, Broadacre Page 2

DATE REPORT RECEIVED: January 22, 2024

TRACT LOCATION: Hancock County

The project tract is approximately 27 acres in size and is located approximately 0.15 miles Southwest from W 600 N and N 600 W intersection in McCordsville.

USACE ID: LRL-2023-00199-sjk

CONCLUSIONS:

The Indiana Department of Environmental Management (IDEM) has reached the following conclusions about whether any Waters, as defined in 327 IAC 17-1-3(13), exist on the property. In accordance with 327 IAC 17-1-3(17) the department makes all isolated wetland determinations consistent with the Wetland Delineation Manual, Technical Report Y-87-1 of the United States Army Corps of Engineers.

SITE ID	ACRES	CLASS	FORESTED	EXEMPT	PERMIT NEEDED FOR PROPOSED ACTIVITY	AUTHORITY
Section I	2.58	3	Yes	No	Yes	N/A
Section II	0.32	3	Yes	No	Yes	N/A
Section III	0.08	2	Yes	Yes	No	IC-13-18-22- 1(b)(7)
Section IV	0.01	2	Yes	Yes	No	IC-13-18-22- 1(b)(7)

COMMENTS:

Wetlands Section I and Section II are forested, Class 3 isolated wetlands and support moderate habitat, moderate hydrology, and are within an undisturbed or minimally disturbed setting. Furthermore, wetlands Section I and Section II have inundation visible from aerial images before the documented logging activities took place. These wetlands are regulated wetlands under IC-13-18-22. Please be aware that to obtain permits to impact these wetlands, the impacts must comply with IC 13-18-22-5(B) and be without practical alternative and be accompanied by taking steps that are practicable and appropriate to minimize potential adverse impact on the aquatic ecosystem of the wetlands.

Wetlands Section III and Section IV are forested, Class 2 isolated wetlands. Although Section III and Section IV support moderate habitat, moderate hydrology, and are within an undisturbed or minimally disturbed setting, the micro-depressional areas were likely created by logging operations that impounded the area and altered drainage. Plant communities within Section III and Section IV represent a mixed upland/wetland landscape that supports the claims of hydrology impoundment from the logging operations.

The Indiana Code regulates some activities differently within isolated wetlands. This determination was made based on the activity as proposed in the materials submitted to IDEM. If the proposed activity changes, the determination above may no longer be accurate.

DISCLAIMER:

This determination is based upon the information provided in the above referenced delineation report and/or the above referenced field evaluation. This determination does not relieve the recipient from the responsibility of obtaining any permits or authorizations that may be required for this project or related activities from IDEM or any other agency or person. The project site and the associated construction may be subject to the Construction Stormwater General Permit (CSGP). The CSGP specifically addresses stormwater run-off and the pollutants associated with all land-disturbing activities of one acre or more. If applicable, permit coverage must be obtained prior to the initiation of land-disturbing activities. Please contact the IDEM Stormwater Program at Stormwat@idem.IN.gov or 317-233-1864 concerning obtaining permit coverage under the CSGP. You may also wish to contact the Indiana Department of Natural Resources at 317-232-4160, or toll free at 877-928-3755, concerning the possible requirement of a Natural Freshwater Lake or Construction in a Floodway Permit.

This determination does not:

- (1) authorize impacts or activities;
- (2) authorize any injury to persons or private property or invasion of other private rights, or any infringement of federal, state or local laws or regulations;
- (3) convey any property rights of any sort, or any exclusive privileges;
- (4) preempt any duty to obtain federal, state or local permits or authorizations required by law for the execution of the project or related activities; or
- (5) authorize changes in the plan design detailed in the application.

APPEALS PROCEDURES:

This decision may be appealed in accordance with IC 4-21.5, the Administrative Orders and Procedures Act. The steps that must be followed to qualify for review are:

- 1. You must petition for review in writing that states facts demonstrating that you are either the person to whom this decision is directed, a person who is aggrieved or adversely affected by the decision, or a person entitled to review under any law.
- 2. You must file the petition for review with the Office of Environmental Adjudication (OEA) at the following address:

Office of Environmental Adjudication 100 North Senate Avenue IGCN Room N103 Indianapolis, IN 46204

3. You must file the petition within eighteen (18) days of the mailing date of this decision. If the eighteenth day falls on a Saturday, Sunday, legal holiday, or other day that the OEA offices are closed during regular business hours, you may file the petition the next day that the OEA offices are open during regular business hours. The petition is deemed filed on the earliest of the following dates: the date it is personally delivered to OEA; the date that the envelope containing the petition is postmarked if it is mailed by United States mail; or, the date it is shown to have been deposited with a private carrier on the private carrier's receipt, if sent by private carrier.

Identifying the permit, decision, or other order for which you seek review by number, name of the responsible, location, or date of this notice will expedite review of the petition.

IDEM No. 2024-61-30-EJW-Q, Broadacre Page 5

Note that if a petition for review is granted pursuant to IC 4-21.5-3-7, the petitioner will, and any other person may, obtain notice of any prehearing conferences, preliminary hearings, hearings, stays, and any orders disposing of the proceedings by requesting copies of such notices from OEA.

If you have procedural or scheduling questions regarding your Petition for Administrative Review, additional information on the review process is available at the website of the Office of Environmental Adjudication at http://www.in.gov/oea.

If you have any questions about this determination, contact Evan White by phone at 317-671-6698 or by e-mail at EVWHite@idem.in.gov.

cc: Ashlee Nichter, Earth Source, Inc.

APPENDIX B IDNR – NATURAL HERITAGE DATA



Division of Nature Preserves 402 W. Washington St., Rm W267 Indianapolis, IN 46204-2739

February 20, 2023

Ashlee Nichter Earth Source, Inc. 14921 Hand Road Fort Wayne, IN 46818

Dear Ashlee Nichter:

I am responding to your request for information on the threatened or endangered (T&E) species, high quality natural communities, and natural areas for the Cityscape Broadacre Industrial Facility Development Project located within Hancock County, Indiana. The Indiana Natural Heritage Data Center has been checked and there are no T&E species or significant areas documented within 0.5 mile of the project area.

If you need a general environmental review of the project from DNR, you can submit the project information to Christie Stanifer, DNR Environmental Coordinator, at environmentalreview@dnr.in.gov (preferred) or send to the street address below. For more help or guidance contact Christie Stanifer at estanifer@dnr.in.gov.

Department of Natural Resources Environmental Review Division of Fish and Wildlife 402 W. Washington Street, Room W273 Indianapolis, IN 46204

The information I am providing does not preclude the requirement for further consultation with the U.S. Fish and Wildlife Service as required under Section 7 of the Endangered Species Act of 1973. If you have concerns about potential Endangered Species Act issues you should contact the Service at their Bloomington, Indiana office.

U.S. Fish and Wildlife Service 620 South Walker St. Bloomington, Indiana 47403-2121 (812)334-4261

Please note that the Indiana Natural Heritage Data Center relies on the observations of many individuals for our data. In most cases, the information is not the result of comprehensive field surveys conducted at particular sites. Therefore, our statement that there are no documented significant natural features at a site should not be interpreted to mean that the site does not support special plants or animals.

Due to the dynamic nature and sensitivity of the data, this information should not be used for any project other than that for which it was originally intended. It may be necessary for you to request updated material from us in order to base your planning decisions on the most current information.

Thank you for contacting the Indiana Natural Heritage Data Center. You may reach me at (317)233-2558 you have any questions or need additional information.

Sincerely,

Taylor Davis Astle

Indiana Natural Heritage Data Center

Taylor D. Hatle

Enclosure: Invoice

APPENDIX C SITE PHOTOGRAPHS

APPENDIX C CITYSCAPE BROADACRE: HANCOCK COUNTY, INDIANA



1. View of Section I near data point T1P3, 7/13/2022.



2. View south of Section I at data point T2P4, 7/13/2022.



3. View north towards Section I near data point T2P8, 11/15/2023.



4. View west towards Section II at data point T1P4, 3/21/2023.

Earth Source, Inc. 14921 Hand Road, Fort Wayne, IN 46818 (260) 489-8511 FAX (260) 489-8607

APPENDIX C CITYSCAPE BROADACRE: HANCOCK COUNTY, INDIANA



5. View west of Section II at data point T1P5, 3/21/2023.



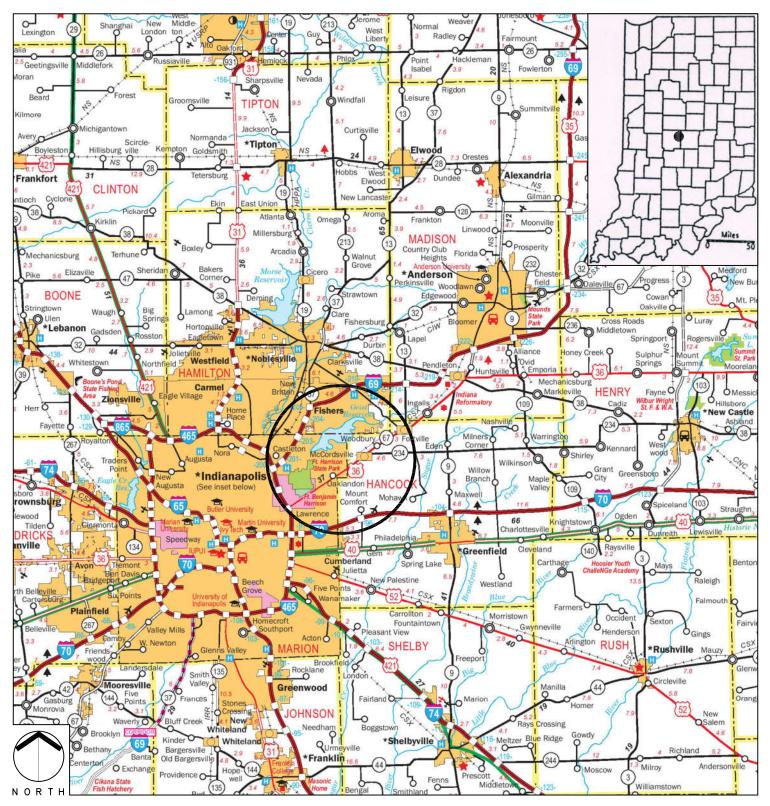
6. View east of Section II, 3/21/2023.

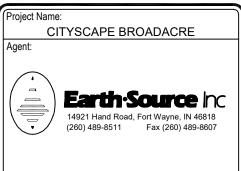


7. View east towards Section II from data point T1P6, 3/21/2023.

GRAPHICS

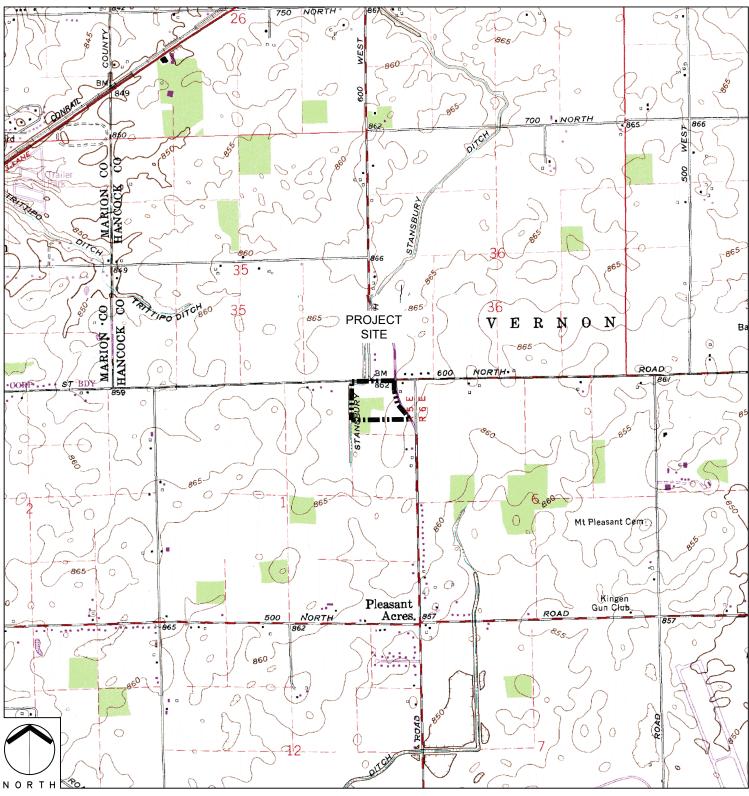
REGIONAL LOCATION MAP	C 1
PROJECT LOCATION MAP	C2
NATIONAL WETLANDS INVENTORY MAP	С3
HANCOCK COUNTY SOIL SURVEY MAP	C4
WETLAND DELINEATION MAP	C 5
WETLAND IMPACT MAP	C6
OVERALL EXISTING CONDITIONS EXHIBIT	EXHIBIT 1
OVERALL GRADING AND DRAINAGE EXHIBIT	EXHIBIT 2
WETI AND PROFILES EXHIBIT	FXHIRIT 3

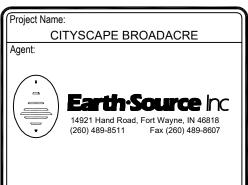


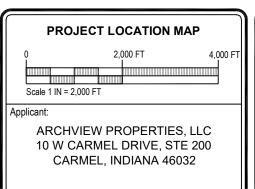




State:		County:	
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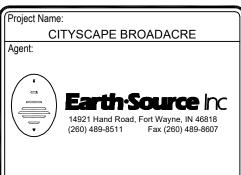


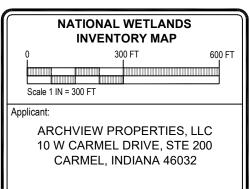




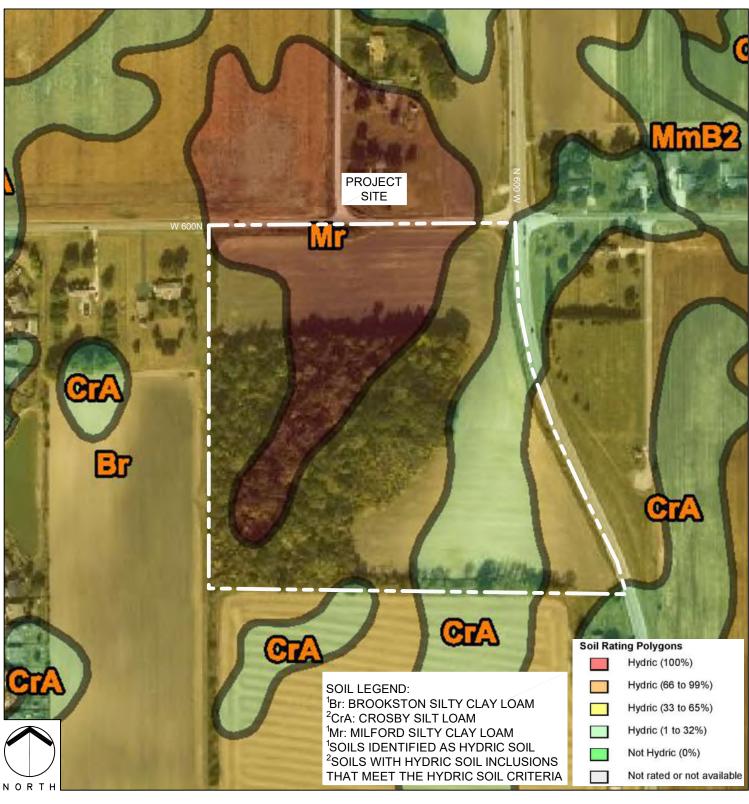
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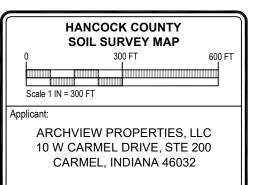




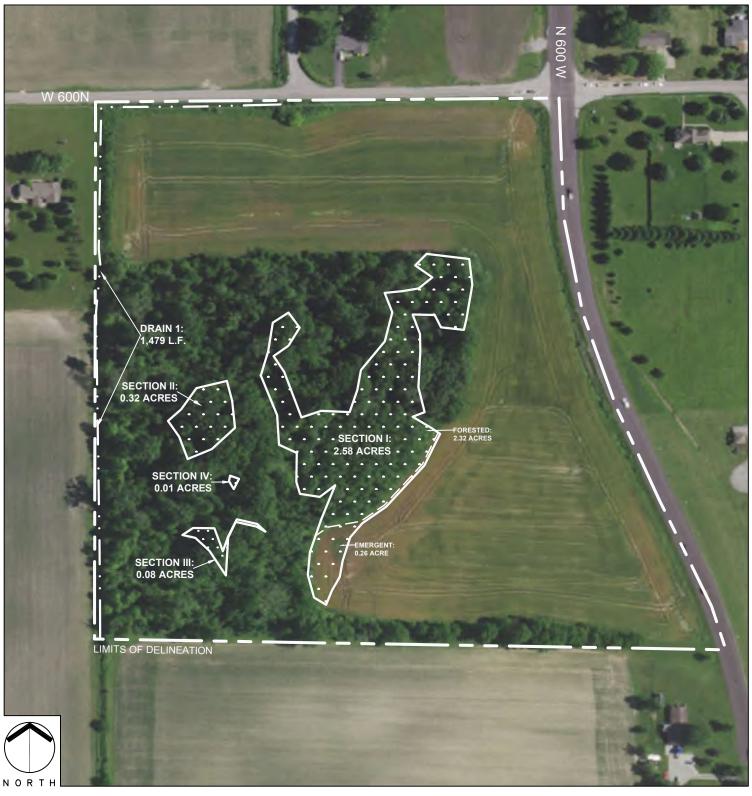
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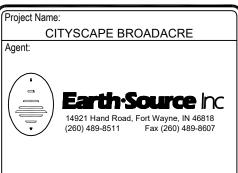


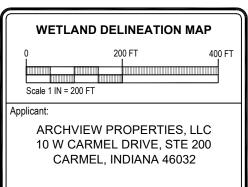




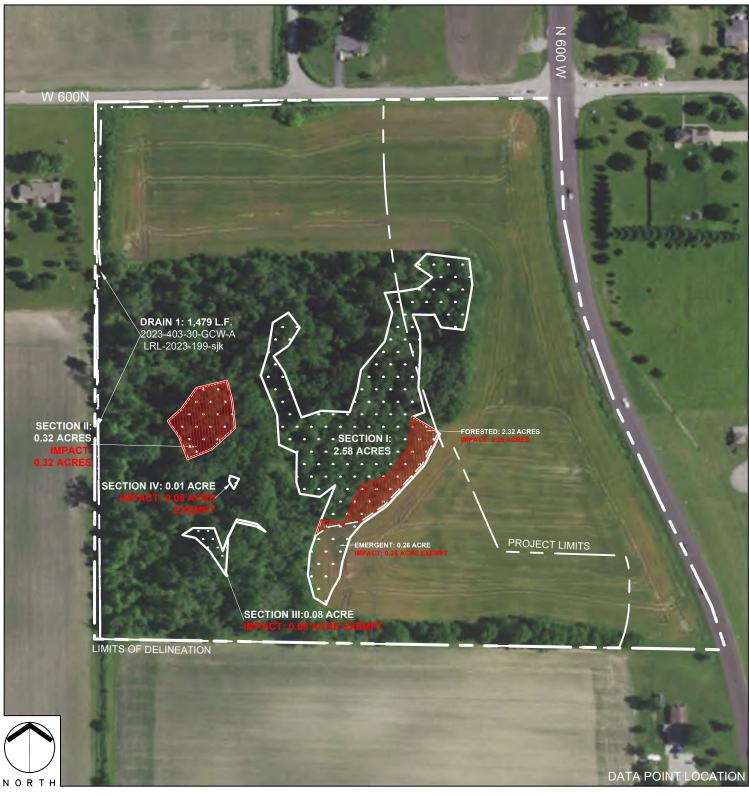
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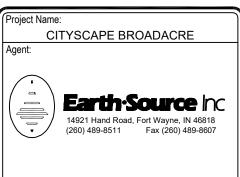


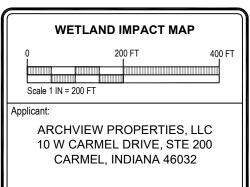




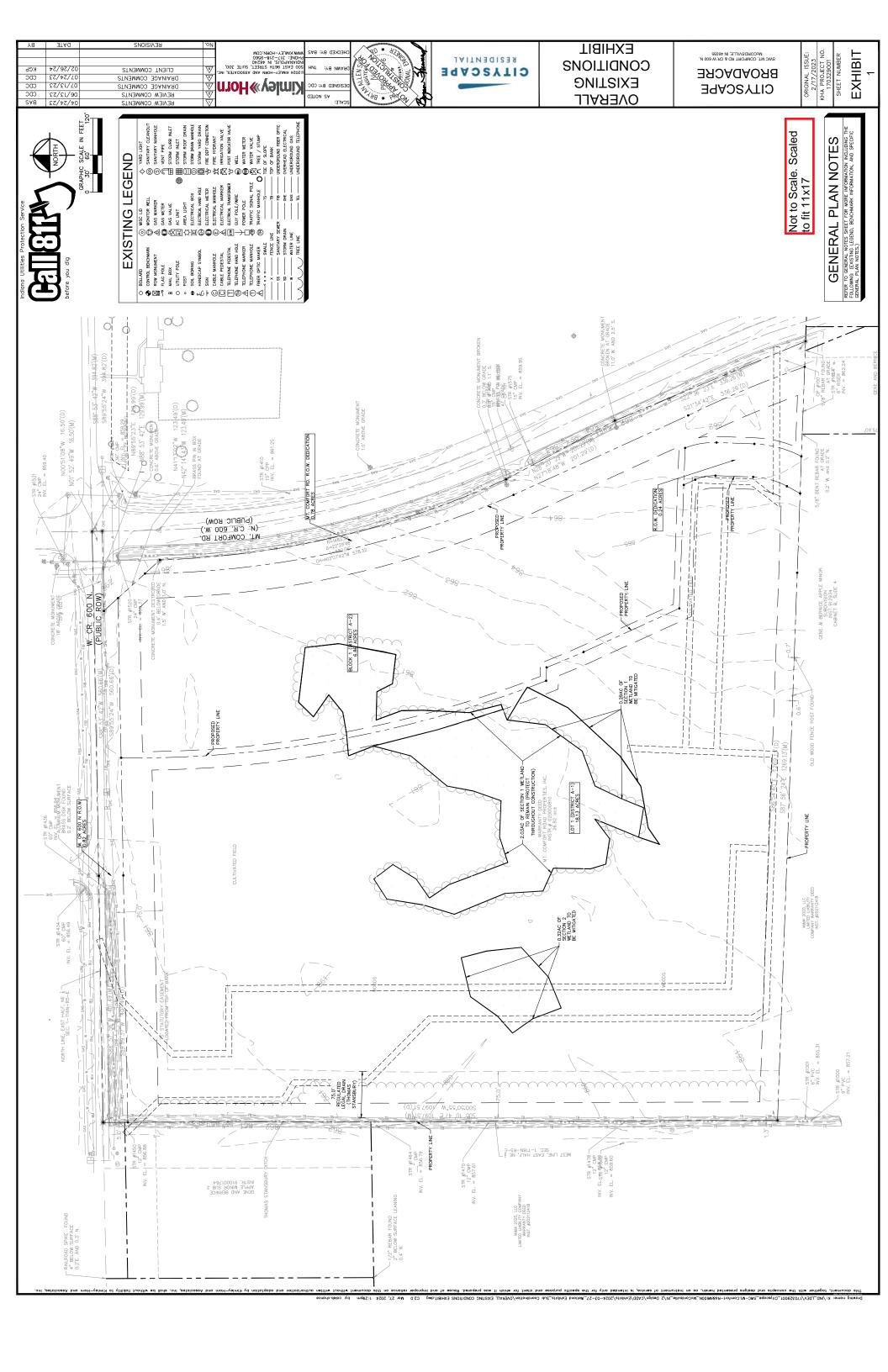
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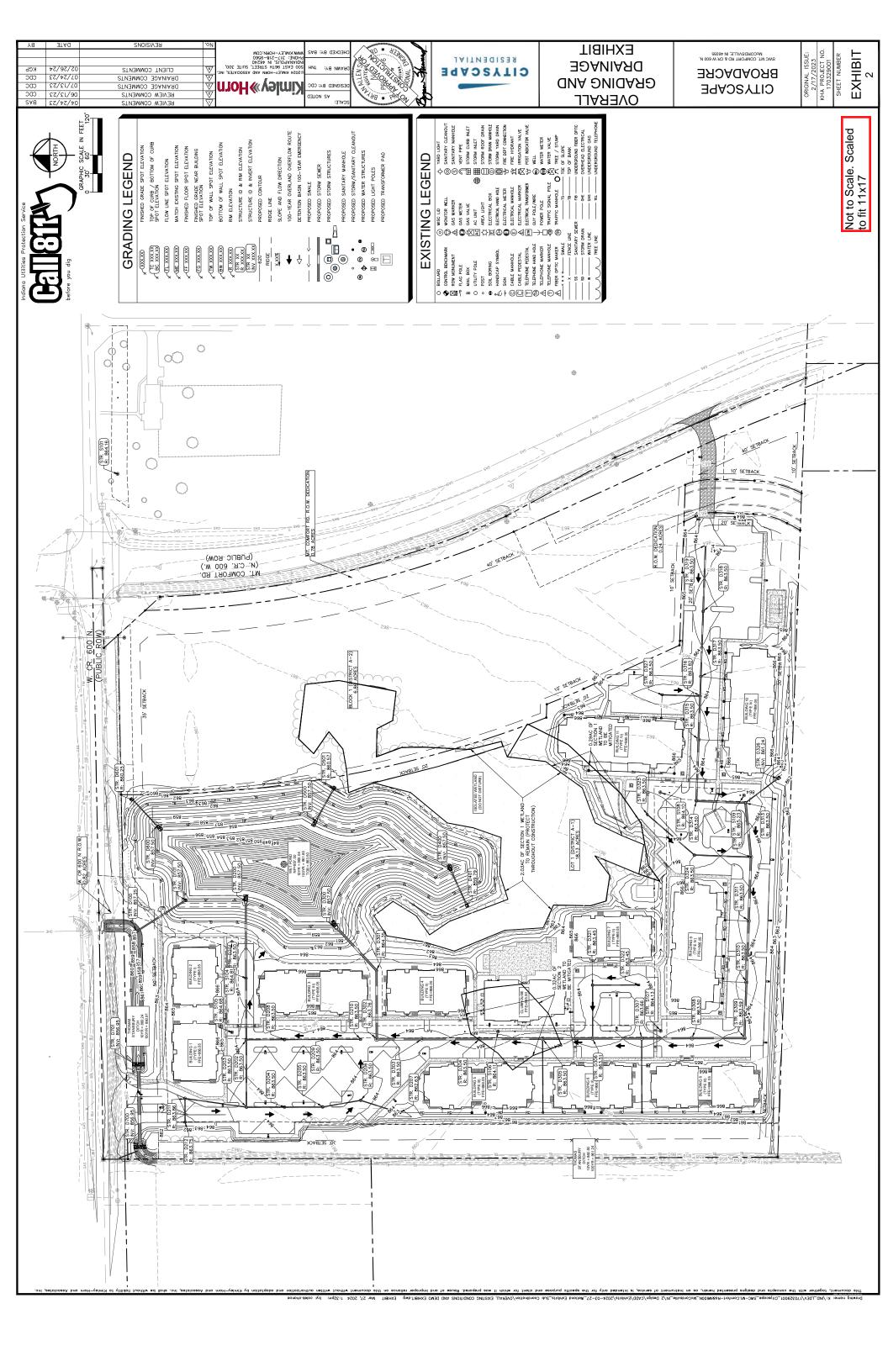






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EXHIBIT PROFILES METLAND



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PROPOSED CONTOUR RIDGE LINE

TOP OF WALL SPOT ELEVATION BOTTOM OF WALL SPOT ELEVATION

KCb CDC CDC CDC

02/26/24

52/51/70

DEVENDE COMMENTS
DEVENDE COMMENTS
DEVENDE COMMENTS

FINISHED GRADE SPOT ELEVATION TOP OF CURB / BOTTOM OF CURB SPOT ELEVATION

GRADING LEGEND

FLOW LINE SPOT ELEVATION MATCH EXISTING SPOT ELEVATION FINISHED FLOOR SPOT ELEVATION FINISHED GRADE NEAR BUILDING SPOT ELEVATION

* (F XXX.XX) X FG XXX.XX (TW XXX.XX)







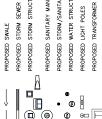




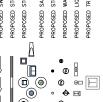


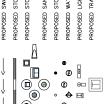


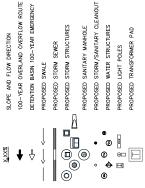


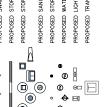


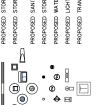






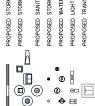


















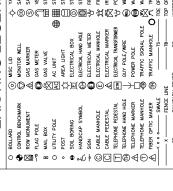
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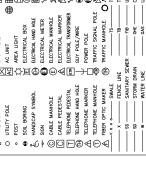
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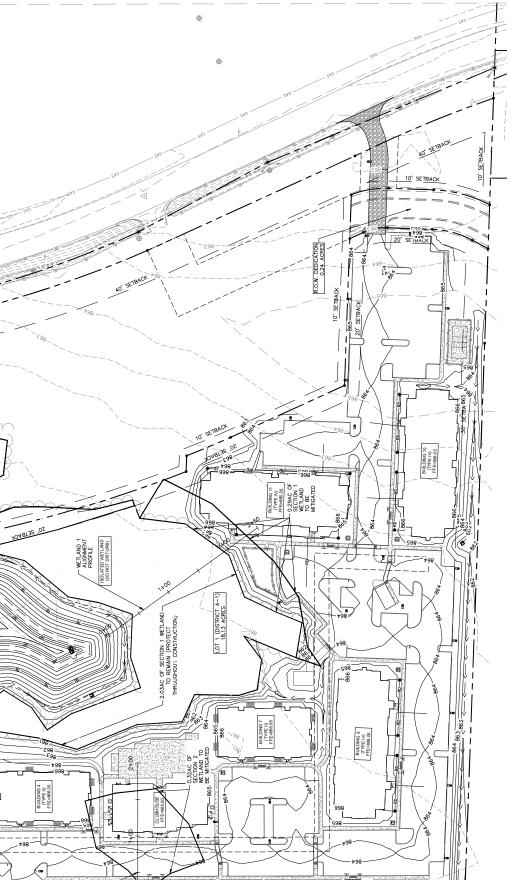


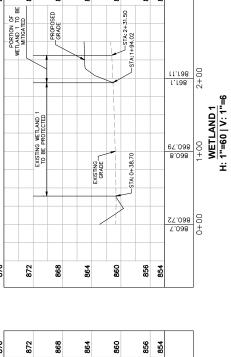






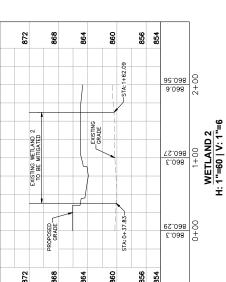






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LAND PLANNING - LANDSCAPE ARCHITECTURE CONSTRUCTED WETLANDS - WATERSHED ANALYSIS - HABITAT DESIGN WETLAND DELINEATION, MITIGATION AND MONITORING SECTION 10, 401 AND 404 PERMITTING

14921 Hand Road, Ft. Wayne, IN 46818 (260) 489-8511 FAX: (260) 489-8607



Mr. Evan White Indiana Department of Environmental Management 100 N. Senate Ave. Mail Code 65-42 Indianapolis, IN 46204-2251

April 1, 2024

re: TRANSMITTAL

Isolated Wetland Individual Permit - Application Cityscape Broadacre Hancock County, Indiana

Dear Mr. White:

Please find enclosed an Isolated Wetland Individual Permit application for Cityscape Broadacre. The project is located in McCordsville in Section 1 of Buck Creek Township (Township 16 North, Range 5 East) in Hancock County, Indiana. Archview Properties, LLC is proposing the construction of a residential apartment complex. The applicant is proposing to impact to 0.61 acres of forested, Class III wetland for the construction of apartment buildings, internal roads and utilities. To mitigate, the applicant proposes to purchase 1.53 acres (2.5:1 ratio) of mitigation credit from the Indiana Stream and Wetland Mitigation Program (IN SWMP) within the Upper White Watershed (HUC 8: 05120201).

Sincerely,

Earth Source Inc.,

Ashlee N. Nichter

Environmental Scientist

Enclosures



APPLICATION FOR AUTHORIZATION TO DISCHARGE DREDGED OR FILL MATERIAL TO ISOLATED WETLANDS AND/OR **WATERS OF THE STATE**

State Form 51821 (R2 / 11-15)

Indiana Department of Environmental Management

- INSTRUCTIONS: 1. Read the instruction sheet before filling out this form.
 - 2. You must complete all applicable sections of this form

1. Applicant Information	2. Agent Information		
Name of Applicant Archview Properties, LLC	Name of Agent Earth Source, Inc.		
Mailing address (Street/ PO Box/ Rural Route, City, State, ZIP Code) 10 W Carmel Drive, Ste 200 Carmel, Indiana 46032	Mailing address (Street/ PO Box/ Rural Route, City, State, ZIP Code) 14921 Hand Road Fort Wayne, Indiana 46818		
Daytime Telephone Number (317) 574-1600	Daytime Telephone Number 260-489-8511		
Fax Number	Fax Number 260-489-8607		
E-mail address (optional) jsewell@cityscaperesidential.com	E-mail address (optional) eric@earthsourceinc.net		
Contact person (required) Jennifer Sewell	Contact person Eric P. Ellingson		
	Tract Location		
Hancock	Nearest city or town McCordsville		
U.S.G.S. Quadrangle map name (<i>Topographic map</i>) Cumberland	Project street address (if applicable) W 600 N McCordsville, IN		
Quarter Section 1	Township Range R5E		
Type of aquatic resource(s) to be impacted (Attach Worksheet One.) Section I - Forested Wetland, 0.29 acre Section II - Forested Wetland, 0.32 acre	Project name or title (if applicable) Cityscape Broadacre		
Other location descriptions or driving directions From Indianapolis, take I-70 east to exit 96 toward Mt Comfort Rd. 600 N and the project section is south of the intersection of W 600			
4. Project Purpose and Description	n (Use additional sheet(s) if required.)		
Has any construction been started? ☑ Yes ☐ No	Anticipated start date (month, day, year)		
If yes, how much work is completed? Trees outside of the wetlands have been removed.			
Purpose of project and overview of activities Cityscape Broadacre is proposing the construction of a residential roads and utilities. The applicant is requesting an Isolated Wetland isolated, Class III, forested wetland for the construction residential	Individual Permit (IWIP) for the regulated impact to 0.61 acres of		
Approximately 912 cubic yards of clean dirt material will be placed in 0.29 acres of Section I and Approximately 2,255 cubic yards of clean dirt material will be placed in 0.32 acres of Section II.			
To mitigate, the applicant proposes to purchase 1.53 acres (2.5:1 Mitigation Program (IN SWMP) within the Upper White Watershed			

5. Avoidance, Minimization, and Mitigation Information: Applicants must answer all of the following questions (Use additional sheet(s) if necessary - provide a detailed response to all applicable questions.)

A. For projects with Class II isolated wetlands -

- 1. Is there a reasonable alternative to the proposed activity? Not Applicable
- 2. Is the proposed activity reasonably necessary or appropriate? Not Applicable
- B. For projects with Class III wetlands, adjacent wetlands, and/or streams, rivers, lakes or other water bodies -
 - Is there a practicable alternative to the proposed activity?
 There is no practicable alternative to the proposed impacts. The impacts proposed were those necessary to construct the internal roads, install utilities, and provide necessary housing to meet local demand.
 - Have practicable and appropriate steps to minimize impacts to water resources been taken?
 Approximately 2.03 acres of Class III, forested wetland of Section I will be avoided with the development. The impacts proposed were those necessary to construct the internal roads, install utilities, and provide necessary housing to meet local demand.

Describe all compensatory mitigation required for unavoidable impacts.

To mitigate for the impacts to 0.61 acres of isolated, Class III, forested wetland, the applicant proposes to purchase 1.53 acres (2.5:1 ratio) of wetland credit for the Upper White Service Area (HUC 8: 05120201) from the Indiana Stream and Wetland Mitigation Program (IN SWMP). Mitigation credits will be purchased prior to impacts, or within one year of the permit issuance, whichever comes first.

6. Drawing / Plan Requirements (Applicants must provide the following.)

- a. Top/aerial/overhead views of the project site showing existing conditions and proposed construction.
- b. Cross sectional view of areas of fill or alterations to streams and other waters.
- c. North arrow, scale, property boundaries
- d. Include wetland delineation boundary (if applicable). Label all wetlands (jurisdictional, isolated and exempt) as I-1, I-2, I-3, etc. and the mitigation areas as M-1, M-2, etc.
- e. Location of all surface waters, including wetlands, erosion control measures, existing and proposed structures, fill and excavation locations, disposal area for excavated material, including quantities, and wetland mitigation site (if applicable).
- f. Approximate water depths and bottom configurations (if applicable)

7. Supplemental Application Materials (Applicants must provide the following.)

- a. A wetland delineation of all wetlands on the project site (for projects with wetland impacts).
- b. At least three photographs of the project site. Indicate the photo locations on the project plans.
- c. If isolated wetlands are present, a letter from the Corps of Engineers verifying this statement.
- d. Wetland mitigation plan and monitoring report.
- e. Classification of all isolated wetlands on the tract (if isolated wetlands are present onsite).
- f. Copies of all applicable local permits and/or resolutions pertaining to the project or tract.
- g. Tract history (see instructions).

8. Additional information that MAY be required (IDEM will notify you if needed.)

- a. Erosion control and/or storm water management plans.
- b. Sediment analysis.
- c. Species surveys for fish, mussels, plants and threatened or endangered species.
- d. Stream habitat assessment.
- e. Any other information IDEM deems necessary to review the proposed project.

9. Permitting Requirements		
a. Does this project require the issuance of a Department of the Army Section 404 Permit from the US Army Corps of Engineers? 🔲 Yes 📈 No If no, you do not need to answer Part b.		
b. Have you applied for an Army Corps of Engineers Section 404 permit? Yes No If yes, please supply the Corps of Engineers ID Number, the Corps of Engineers District, the project manager, and a copy of any correspondence with the Corps. If no, contact the Army Corps of Engineers regarding the possible need for a permit application.		
c. Have you applied for, received, or been denied a permit from the Department of Natural Resources for this project? Yes No Please give the permit name, permit number, and date of application, issuance or denial.		
d. Have you applied for, received, or been denied any other federal, state, or local permits, variances, licenses, or certifications for this project? ☑ Yes □ No Please give the permit name, agency from which it was obtained, permit number, and date of issuance or denial. IDEM - 2023-403-30-GCW-A ACOE - LRL-2023-199-sjk		

	10.	Adjoining Property	Owners and Addresses		
			which your project is located and the r	names and a	ddresses of other
persons (or entities) potentially affe	ctea by your	project. Use additional sn	Name		
Brown Family Farm			M&M 2020, LLC		
Address (number and street)			Address (number and street)		
5254 W 900 N	04-4-	7ID 0 - 4 -	2014 Martindale Dr	Ctata	ZIP Code
City McCordsville	State IN	ZIP Code 46055	Greenfield	State IN	46140
Name			Name	400	
Philip & Beverley Wils Address (number and street)	son		Russell & Shelley Hay Address (number and street)	yse	
5978 W 600 N			6277 W 600 N		
City	State	ZIP Code	City	State	ZIP Code
McCordsville	IN	46055	McCordsville	IN	46055
Name HR Brothers LLC			Name		
Address (number and street)			Address (number and street)		
13161 Glenside Drive					
City Fishers	State IN	ZIP Code 46037	City	State	ZIP Code
Name	1114	40037	Name		
Jennifer Whitaker			Ivanie		
Address (number and street)			Address (number and street)		
5860 W 600 N		717.0	0.0	01-1-	710.0
City McCordsville	State IN	ZIP Code 46055	City	State	ZIP Code
Name	., .	.3000	Name		
Travis Cohron					
Address (number and street)			Address (number and street)		
City	State	ZIP Code	City	State	ZIP Code
Fishers	IN	46040			
Name			Name		
Hancock County India Address (number and street)	ana		Address (number and street)		
111 American Legion	PI Suite	217	radios (number and sites)		
City	State	ZIP Code	City	State	ZIP Code
Greenfield	IN	46140			

11. Signature - Statement of Affirmation

I certify that I am familiar with the information contained in this application and, to the best of my knowledge and belief, such information is true and accurate. I certify that I have the authority to undertake and will undertake the activities as described in this application. I am aware that there are penalties for submitting false information. I understand that any changes in project design subsequent to IDEM's granting of authorization to discharge to a water of the state are not authorized and I may be subject to civil and criminal penalties for proceeding without proper authorization. I agree to allow representatives of the IDEM to enter and inspect the project site. I understand that the granting of other permits by local, state, or federal agencies does not release me from the requirement of obtaining the authorization requested herein before commencing the project.

Applicant's Signature:

Date:

(LOLT

rint Name:

AUTHORITED REPRESENTANCE

Worksheet – Summary of Onsite Water Resources and Project Impacts

A. Jurisdictional Wetlands (Existing Conditions) Jurisdictional Wetlands (Proposed Impacts)						
Wetland Type Size of wetland (acreage)		To be Impacted?	Acreage	Fill quantity (cys)	ATF	
□EM □SS [□ FO Not Applicable		☐ Yes ☐ No			
□EM □SS [☐ Yes ☐ No			
□EM □SS [] FO		☐ Yes ☐ No			
□EM □SS [] FO		☐ Yes ☐ No			
□EM □SS [] FO		☐ Yes ☐ No			
□EM □SS [□ FO		☐ Yes ☐ No			
□EM □SS [] FO		☐ Yes ☐ No			
Not Applicable	Describe the type and composition and quantity (cubic yards) of material proposed to be dredged or excavated from wetlands on the project site:					
B Isolate	d Wetlands (F	Existing Conditions)	Isola	ted Wetland	s (Proposed Impacts)	
Wetland Class	Type	Size of wetland (acreage)	To be Impacted?	Acreage	Fill quantity (cys)	ATF
☑ 1 □2 ☑ 3	ZINF ZIF	Section I - 2.58 ac	☑ Yes □ No	0.29	912	No
□1 □2 ☑ 3	□NF ØF	Section II - 0.32 acre	☑ Yes □ No	0.32	2,255	No
□1 ☑2 □3	□NF ZF	Section III - 0.08 acre	☑ Yes □ No	0.08	Exempt	No
□1 ☑2 □3	□NF ØF	Section IV - 0.01 acre	☑ Yes □ No	0.01	Exempt	No
□1 □2 □3	□NF □F		☐ Yes ☐ No			
□1 □2 □3	□NF □F		☐ Yes ☐ No			
Describe the type and composition of fill material to be placed in isolated wetlands on the project site: Clean dirt material						
Describe the type and composition and quantity (cubic yards) of material proposed to be dredged or excavated from isolated wetlands on the project site: Not Applicable						
C. Bridges and Stream Crossings - provide the following information for EACH structure (Use additional sheet(s) if required.) Stream name						
Not Applicable Description of impacts						
Not Applicable						
Length of upstream		Left side: Not Ap	plicable	Right s	_{iide:} Not Applicable	
	Left side: Not Applicable Right side: Not Applicable					
Bank protection fill placed below the Ordinary High Water Mark: Volume per running foot: Not Applicable						
Bank protection fill placed below the Ordinary High Water Mark: Area of coverage: Not Applicable						

D. Bank Stabilization – provide the following information for EACH segment (Use additional sheet(s) if required.)
Water body name Not Applicable
Description of impacts Not Applicable
Length of shoreline or bank protection Not Applicable
Volume (cubic yards) of bank protection fill placed below the Ordinary High Water Mark per running foot Not Applicable
Area (square feet) of bank protection fill placed below the Ordinary High Water Mark Not Applicable
E. Stream Relocation Water body name
Not Applicable
Description of impacts Not Applicable
Length of existing channel to be relocated (linear feet)
Not Applicable
Length of new channel to be constructed (linear feet) Not Applicable
Existing channel to be backfilled? Type of relocation Piping Deen Dther:
Type of fill and volume (cubic yards) Not Applicable
F. Ones Water Fill
F. Open Water Fill Water body name
Not Applicable
Description of impacts Not Applicable
Notification
Area of water body to be filled (acres)
Not Applicable Type of fill and volume (cubic yards)
Not Applicable

Notes and Instructions for Authorization to Discharge Dredged or Fill Material to a State Regulated Wetland and/or Waters of the State Permit Application Form and Worksheet

Note to applicants:

This form is to be used by all persons who intend to discharge dredged or fill materials into wetlands, isolated wetlands, or any other water body regulated under state and federal law. Specifically, this form is to be used for the following:

- 1. Application for Section 401 Water Quality Certification for any project not covered by the Indiana Regional General Permit
- Application for a State Regulated Wetland Permit authorized under HEA 1798 and HEA 1277, excluding any activities authorized under any of the State Regulated Wetland General Permits

Consult the Office of Water Quality Web site for information on the types of authorizations and requirements for projects regulated under these laws.

http://www.in.gov/idem/wetlands/index.htm

Do not submit this form until you are familiar with the various authorizations and proper forms for obtaining these authorizations. An application submitted on the incorrect form may result in delays in processing.

Applicants should also contact the Indiana Department of Natural Resources (DNR) regarding potential permit requirements associated with construction in a floodway or a public freshwater lake. You can reach the DNR Division of Water at (317) 232-4160 or toll free at (877) WATER-55.

Instructions for Completing the Application and Worksheet

Address all applications or questions to:

Indiana Department of Environmental Management
Office of Water Quality
Section 401 Water Quality Certification/State Isolated Wetlands Program
100 North Senate Ave.
Indianapolis, Indiana 46204

Telephone: (800) 451-6027 or (317) 233-8488

Print clearly or type.
Attach additional 8.5" x 11" sheets as necessary.

APPLICATION

Note: Some wetland activities may impact both U.S. navigable waters and state regulated isolated wetlands. In those situations, the project will require a Section 401 Water Quality Certification and Section 404 U.S. Corps of Engineers permit AND approval under the new State Isolated Wetland Regulatory Program. When IDEM receives an application that involves an activity that may impact both intrastate navigable waters and a state regulated wetland, current state law requires that we evaluate each activity using different authorities. IDEM will, at the request of an applicant, evaluate a project with multi-jurisdictional wetlands under the Section 401 certification framework and will provide one authorization for the project, applying the state regulated isolated wetlands law and federal Clean Water Act Section 401 authorities. If an applicant prefers that all IDEM approvals occur within one streamlined review process, a separate letter specifically requesting a combined review of the entire project should be submitted concurrently with the application.

Block 1 - Applicant Information

Provide your name, address, and telephone number. You MUST provide a contact name. For complex projects or projects with multiple contractors and responsible parties, designation of a single point of contact will speed up the review process and enable more timely responses to requests for information.

Block 2 - Agent Information

If you choose to be represented by an agent, provide the agent's address and telephone information. You are not required to have an agent.

Block 3 - Project Location

Provide specific information relating to the location of your proposed project. Provide accurate maps depicting the project location. Try to keep detail on maps to a minimum, focusing instead on the location of structures and associated water bodies. Consult the USGS Quadrangle maps for information on the quarter, section, township and range of the project. IDEM may require that you submit full size plans to supplement the 8 1/2" by 11" map sheets if the project is large or complex.

Block 4 - Project Purpose and Description

Provide the proposed or actual start date and the anticipated completion date. If you have started your project before obtaining authorization, you may be in violation of federal and/or state law. Give a narrative description of the proposed project. You should include any supplemental environmental reports, assessments, or other documents that explain or justify the proposed configuration of the project. Describe the purpose of the project (that is, what goal oroutcome will be met by the construction of the project).

Block 5 - Avoidance, Minimization, and Mitigation Information

You must describe possible alternatives to the proposed project that would avoid impacts to the aquatic resource that were considered during the project planning process. You must also describe ways to minimize impacts considered during the project planning process, including a description of how you plan to contain any dredged/excavated material to prevent re-entry into waterways or wetlands. Examples of alternatives include construction on the upland portions of the property; rerouting a roadway to avoid a wetland; or alternate design plans. Minimization of the impacts may decrease any mitigation requirements that might otherwise apply. Minimization may include reduction of the amount of dredging, filling, or vegetative clearing. For isolated wetlands only, enclosure of a copy of (1) a resolution of the executive of the county or municipality in which the wetland is located or (2) a permit or other approval from a local government entity having authority over the proposed use of the property on which the wetland is located; that includes a specific finding that the wetland activity is part of a legitimate use proposed by the applicant on the property, substitutes for the information required on avoidance and minimization.

Answer all the questions in detail, providing example, drawings, or other supporting information to illustrate the steps taken to consider alternatives. Provide reasons why various alternatives were or were not considered.

In general, all impacts to wetlands or other waters that require the use of this form will require some form of compensatory mitigation. A detailed description ofthe mitigation plan must be provided, including: the location of the mitigation site, the size and type of mitigation to be performed, the construction sequence ortiming of the mitigation, information on post construction monitoring, mitigation techniques, and success criteria of the mitigation site. A mitigation plan, with overview drawings, planting lists, cross sectional views, and other relevant information is recommended as a supplement to answer this question.

Block 6 - Drawing/Plan Requirements

You must submit drawings/plans that are on 8 1/2 by 11 inch sheets. Your project will be delayed if these materials are not submitted in the formats specified in the application.

Block 7 - Supplemental Application Materials

All projects involving impacts to wetlands must be accompanied by a wetland delineation using the procedures established in the U.S. Army Corps of Engineers Wetland Delineation Manual, Technical Report Y-87-1 (January 1987). This delineation must be approved or reviewed by the Corps of Engineers in order for IDEM to determine the impacts to water bodies associated with the project. DO NOT submit an application involving impacts to wetlands without a wetland delineation. For projects that involve impacts to isolated wetlands, a letter from the Corps of Engineers that specifically makes this determination must be provided or the application will not be processed. Submittal of photographs depicting the project site is highly encouraged. Photos must be clearly labeled with the direction of the shot, the area depicted, and notes on relevant features. A map depicting the location of photos on the project site is also useful and should be included whenever photos are submitted.

For project sites with isolated wetlands, a tract history is also required. This history provides information on all the wetlands on the site prior to January 1, 2004, and describes any and all activities within these wetlands, including impacts allowed to wetlands exempt from regulation under the various provisions of federal and state law. Direct questions regarding this requirement to IDEM staff for clarification.

Block 8 - Additional Information That May Be Required

You are not required to submit the information specified in this section unless directed to do so by IDEM. However, you may submit the information if you anticipate that such information will be required. For example, if you are aware of issues on the proposed project site which may impact water resources, such as the presence of contaminated soils or sediments, endangered species, well field protection areas, or previously permitted activities on the project site, information regarding these points must be submitted with the certification application.

Block 9 - Permitting Requirements

Provide information regarding your application to the Corps of Engineers. If you have not yet contacted the Corps of Engineers, you must do so as soon as possible (SEE BLOCK 7). Provide information regarding any other federal, state, or local permits, variances, licenses, or certifications required for your project. Please indicate whether they were approved, denied, or are pending.

Block 10 - Adjoining Property Owners and Addresses

List the names and addresses of landowners adjacent to the property on which your project is located. Adjacent property owners are persons who share property lines with your property. Inclusion of names and addresses of other persons (or entities) potentially affected by your project must include persons within your neighborhood, lake association, or in the general vicinity that may have an interest in your project. Consult with IDEM for further clarification.

Block 11 - Signature - Statement of Affirmation

You must sign and date the application. If the applicant is a corporation, a responsible person from that corporation must sign. No other signatures will be accepted. The application will not be processed without the appropriate signature.

WORKSHEET

Note: When calculating any type of impact, all areas that are affected by placement of fill, bank armoring, culverting, excavation, or any other activity must be counted. When calculating open water impact, all areas within lakes, rivers, streams and the like must be counted. This includes areas under new bridge piers, beaches, and boat ramps, as examples. The Ordinary High Water Mark means that line on the shore of a water body established by the fluctuations of water and indicated by physical characteristics such as clear, natural line impressed on the bank, shelving, changes in the character of soil, natural destruction of terrestrial vegetation, the presence of litter and debris, or other appropriate means that consider the characteristics of the surrounding areas.

- Fill out only the sections of this worksheet that apply to your project. -

Section A - Wetlands

This section is for wetlands determined to be under the jurisdiction of the U.S. Army Corps of Engineers (Corps) and that require a Section 404 permit as well as a Section 401 Water Quality Certification from IDEM. List the type of wetland as Emergent (EM), Scrub shrub (SS), or Forested (FO). "Emergent wetland" means a wetland characterized by erect, rooted, herbaceous hydrophytes, excluding mosses and lichens. "Scrub shrub wetland" means a wetland dominated by woody vegetation having a height greater than three and two-tenths (3.2) feet, and a stem diameter less than three (3) inches. This includes true shrubs, young trees, and trees and shrubs stunted by environmental conditions. "Forested wetland" means a wetland dominated by woody vegetation that has a diameter, at breast height, greater than three (3) inches, regardless of total height. The size of the wetland must be determined by conducting a wetland delineation consistent with the protocols established in the U.S. Army Corps of Engineers 1987 Wetland Delineation Manual. The applicant must list whether or not the wetland will be impacted, the acreage of the impact, and the quantity of fill to be discharged into the wetland. The applicant must identify whether or not this is an after-the-fact (ATF) permit. An ATF permit is for impacts to wetlands or other water bodies under the jurisdiction of IDEM that did not receive authorization before the impacts occurred. Additionally, the applicant must describe the type and composition of material proposed to be discharged or removed from the wetland.

Section B - Isolated Wetlands

This section is for wetlands the Corps has determined to be isolated and no longer under their jurisdiction. The Corps jurisdictional determination letter must be included with the application. Isolated wetlands are considered State Regulated Wetlands and proposed impacts to these wetlands will be reviewed pursuant to IC 13-18-22. The class of wetland must be determined by the definitions outlined in IC-13-11-2-25.8. This is determined by assessing the vegetation type,

hydrologic function, habitat functions, values of the wetland, and disturbances to the wetland. The applicant must determine the type of wetland by designating the wetland as either Non-Forested (NF) or Forested (F). The size of the wetland must be determined by conducting a wetland delineation consistent with the protocols established in the U.S. Army Corps of Engineers 1987 Wetland Delineation Manual. The applicant must list whether or not the wetland will be impacted, the acreage of the impact, and the quantity of fill to be discharged into the wetland. The applicant must identify whether or not this is an after-the- fact (ATF) permit. An ATF permit is for impacts to wetlands or other water bodies under the jurisdiction of IDEM that did not receive authorization before the impacts occurred. Additionally, the applicant must describe the type and composition of material proposed to be discharged or removed from the wetland.

Section C - Bridges and Stream Crossings

This section is for projects that impact streams in order to construct, maintain, or protect structures used to cross the stream. The applicant must list the name of the stream to be impacted by the proposed project. The stream name can be found on the USGS Topographic map. If the stream does not have a name, identify it as a tributary to the next stream or water body with a name. Describe the proposed impacts in detail. Include the lengths of bank impacts to both banks upstream and downstream. Determination of left and right banks is made in the following manner- at the point furthest upstream on the project site, face downstream - the left bank is on your left and the right bank is on your right. Identify the volume per running foot of material to be discharged below the Ordinary High Water Mark (OHWM). Identify the total area below the OHWM to receive a discharge of fill material.

Section D - Bank Stabilization

This section is for projects that discharge fill material in order to stabilize eroding land along streams, lakes, or other water bodies. The applicant must list the name of the water body to be impacted by the proposed project. The name of the water body can be found on the USGS Topographic map. If the water body does not have a name, identify it as a tributary to the next stream or water body with a name. Provide the length of shoreline or bank impact. Identify the volume per running foot of material to be discharged below the Ordinary High Water Mark (OHWM). Identify the total area below the OHWM to receive a discharge of fill material.

Section E - Stream Relocation

This section is for projects that propose to relocate a stream from its existing banks either by open channel construction or by stream piping. The applicant must list the name of the stream to be impacted by the proposed project. The stream name can be found on the USGS Topographic map. If the stream does not have a name, identify it as a tributary to the next stream or water body with a name. Describe the impacts to the stream. Provide the linear feet of existing channel to be relocated and the length of new channel to be constructed. The applicant must state whether the old channel is proposed to be filled and describe the type and quantity of fill to be used to fill the old channel. The applicant must also provide the type of relocation, new channel or piping.

Section F - Open Water Fill

This is for projects where the fill material extends beyond the edge of the shoreline into open water. Some examples include the filling of pit mines, borrow pits, and other land reclamation projects. Provide the name of the water body to be impacted. If the water body does not have a name, identify it as unnamed open water body. Describe the impacts to the water body including the area to be filled and the type and quantity of fill material to be discharged.

WETLAND DELINEATION REPORT

CITYSCAPE McCORDSVILLE SWC WEST 600 NORTH (REVISED 1/11/2024)

Prepared for:

KIMLEY-HORN 250 EAST 96TH STREET, SUITE 580 INDIANAPOLIS, INDIANA 46240

Prepared by:



14921 Hand Road, Ft. Wayne, IN 46818 PH: (260) 489-8511 • Fax: (260) 489-8607

TABLE OF CONTENTS

EXECUTIVE SUMMARY	1
INTRODUCTION	2
METHODOLOGY	2
WETLAND DELINEATION SUMMARY	3
WETLANDS AND OTHER WATERS	3
CONCLUSIONS AND RECOMMENDATIONS	7
SUMMARY OF ACRONYMS AND REFERENCES	9
APPENDICES	
DATA FORMS SITE PHOTOGRAPHS "TYPICAL YEAR" PRECIPITATION DATA	APPENDIX A APPENDIX B APPENDIX C
DELINEATION GRAPHICS	
REGIONAL LOCATION MAP PROJECT LOCATION MAP NATIONAL WETLANDS INVENTORY MAP HANCOCK COUNTY SOIL SURVEY MAP 2020 AERIAL PHOTOGRAPH MAP WETLAND DELINEATION MAP	C1 C2 C3 C4 C5 C6

EXECUTIVE SUMMARY

A wetland delineation for the 27-acre Cityscape McCordsville site in located in the southwest corner of CR West 600 North (Hancock County, Indiana) was initiated on 13 July 2022, 21 March 2023 and completed on 15 November 2023. The wetland delineation was performed using the routine on-site determination method as set forth by the 1987 Corps of Engineers Wetlands Delineation Manual and Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Midwest Region (Version 2.0).

Under Sections 404 and 401 of the Clean Water Act, the Army Corps of Engineers (ACOE) and/or the Indiana Department of Environmental Management (IDEM) have jurisdiction over waters of the United States. This includes wetlands and other waters with an identifiable connection to interstate commerce. Wetlands not regulated under Section 401 and 404 of the Clean Water Act are regulated by the State of Indiana under IC 13-18-22. Any activity that involves the placement of fill and/or excavation within these jurisdictional areas may require notification and authorization of the appropriate regulatory agency. Jurisdictional status of waters identified within this report is based on **Earth Source**, Inc.'s interpretation and understanding of the definition and scope of waters of the United States protected under the Clean Water Act and related communications with ACOE Division and District personnel.

As illustrated by the attached wetland delineation plan (C6), a total of 1,479 linear feet of open drain and 2.99 acres of isolated wetland were identified within the project limits (Table 1).

TABLE 1. SUMMARY OF WATER RESOURCES

Wetland	Size	Description
Drain 1	1,479 linear feet	Stansbury Ditch
Section I	2.58 acre	Forested/Emergent Wetland, Isolated
Section II	0.32 acre	Forested Wetland, Isolated
Section III	0.08 acre	Forested Wetland, Isolated
Section IV	0.01 acre	Forested Wetland, Isolated

INTRODUCTION

A wetland delineation for the 27-acre Cityscape McCordsville site in located in the southwest corner of CR West 600 North (Hancock County, Indiana) was initiated on 13 July 2022, 21 March 2023 and completed on 15 November 2023 (limits of delineation noted on attached plans C2 – C7). Site conditions were ranged from partly cloudy and 80°F to clear and 45°F. Ground conditions were unobscured. The project is located in Section 1 of Buck Creek Township, Township 16 North, Range 05 East, Hancock County, Indiana (Latitude: 39.868585°, Longitude: -85.918767°, WGS 84). The wetland delineation was performed using the routine on-site determination method as set forth by 1987 Corps of Engineers Wetlands Delineation Manual and Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Midwest Region (Version 2.0).

METHODOLOGY

Four (4) transects were set perpendicular to the baseline and modified to encompass all areas and community types within the site boundary. Data stations included areas identified by soils data, the U.S. Fish and Wildlife Service (FWS) National Wetland Inventory, and Aerial Photography as potential wetlands. Soil, hydrology, and vegetation data were collected for each cover type encountered.

The three criteria required for the determination of an area to be a wetland are 1) Hydric Soils, 2) Wetland Hydrology, and 3) Dominance of Hydrophytic Vegetation. Hydric Soils criteria are met with a hydric soils listing and/or the presence of Histosols (organic soils peat or muck), a histic epipedon, or reduced mineral soils with low matrix chroma of 2 or less with mottles, or with a matrix chroma of 1 without mottles, or gleyed soils, and/or the presence of other hydric soil indicators such as an aquic or peraguic moisture regime, ponding or a water table near the surface for at least one week during the growing season. Wetland Hydrology criteria are met or assumed by the presence of inundation or saturated soils and/or the confirmed presence of hydrologic field indicators such as water marks, debris deposits or morphological plant adaptations to life in anaerobic soil conditions. Hydrophytic Vegetation is a plant adapted to life in permanently or periodically inundated or saturated soil conditions. Wetland vegetation is characterized as an obligate, facultative wetland, or facultative species dependent upon the frequency these species are found in wetlands. The Hydrophytic Vegetation criterion is met when, upon identification of the dominant plant species in each stratum or layer of the plant community, a dominance (greater than 50 percent) of obligate, facultative wetland or facultative species is indicated. The hydrophytic vegetation criterion was based upon persistent vegetation. In order for an area to be determined as a wetland, all three criteria must be positively identified.

In order for an area to be subject to federal regulation, all three wetland criteria must be positively identified, and the area must meet the definition of *waters of the United States* found at 33 CFR 328.3 (a).

WETLAND DELINEATION SUMMARY

Four (4) isolated wetlands and one (1) legal drain were identified within the limits of the site. The wetland delineation was performed using the routine on-site determination method as set forth by 1987 Corps of Engineers Wetlands Delineation Manual and Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Midwest Region (Version 2.0). Based on the three 30-day periods preceding the wetland delineation, the delineation was conducted in a "Normal" year compared to the precipitation totals from the preceding 30 years. A discussion of the delineated water resources found on the site is presented below.

Waters of the United States

DRAIN 1: Drain 1 is an open, ephemeral/intermittent to upper perennial drain identified as Stansbury Ditch. The drain begins along CR W600N at a culvert outfall as an ephemeral/intermittent roadside drain with no apparent Ordinary High Water Mark (OHWM). The drainage feature parallels CR W600N as a road side drain, separated from the road by guardrail and near vertical slope to a v-notch swale. The ephemeral/intermittent drainage feature continues to the east and south along the property line to a culvert outfall. At this point the drain develops clear OHWM. The OHWM was determined in the field by the presence of a definitive bed and bank, scour and benching. The drain is classified as a Riverine, Intermittent/Upper Perennial, Streambed (R4/3SB) system (Cowardin 1979). As illustrated by the attached wetland delineation plan (C6), the delineated on-site length is 1,479 linear feet, with 703 linear feet of ephemeral/intermittent with no OHWM and 776 linear feet of upper perennial with OHWM. Data points from within Drain 1 may be found in Appendix A: Data Forms T1P0 and T1P0A.

Isolated Wetlands

Four (4) isolated wetlands were identified within the limits of the site. The wetlands delineated on-site do not have a discernable surface water connection to other waters of the United States and do not appear to meet the definition of waters of the United States as defined by 33 CFR 328.3 (a) and consistent with the SWANCC and Rapanos decisions. For isolated, intrastate, non-navigable waters, ACOE jurisdiction may be possible if their use, degradation, or destruction could affect interstate commerce as described in 33 CFR 328.3 (a) (i)-(iii).

SECTION I: Section I is a, forested and emergent wetland. The wetland is charged by drainage from the adjacent upland and rainfall. The woods were previously logged and the wetland is intersected by logging trails. The wetland extends east into the agricultural field where farming has occurred with limiting success. This section is classified as a Palustrine, Forested, Deciduous, Emergent Temporarily Flooded, Farmed (PFO1/EMAf) system (Cowardin 1979). As illustrated by the attached wetland delineation plan (C6), the delineated area is 2.58 acres. Below is a typical data point taken from within Section I (Appendix A: Data Forms T1P3, T2P4, T2P5 and T2P8).

Hydric Soil: This area is listed by the Hancock County Soil Survey as Brookston silty clay loam and Milford silty clay loam. The Brookston and Milford series are listed as hydric or may have hydric soil inclusions that meet the hydric soil criteria per the Natural Resources

Earth Source, Inc.

Page 3 of 9; (Revised 1/11/2024)

14921 Hand Road, Fort Wayne, IN 46818

Conservation Service, United States Department of Agriculture, State Hydric Soils List. The observed soil was silty clay loam with matrix color at ten (10) inches below the surface from 10YR 4/1 with 5% redox concentrations of 10YR 4/6 (Munsell Soil Color, 1992). The hydric soil criterion is by the presence of hydric soil indicators: depleted below dark surface (A11) and depleted matrix (F3).

Hydrology: Visual observations of hydrology were not observed within the wetland. Primary indicators of hydrology, as defined by TRY-87-1 and Midwest Regional Supplement, included sparsely vegetated concave surface (B8) and water-stained leaves (B9). Secondary indicators of wetland hydrology, as defined by TRY-87-1 and Midwest Regional Supplement, included Geomorphic Position (D2) and Fac-Neutral Test (D5). The wetland hydrology criterion is met by the presence of primary and secondary indicators.

Vegetation: The wetland vegetation criterion is met with greater than 50% of the dominant plant species across all strata are rated OBL, FACW, or FAC or prevalence index of 3.0 or less if hydric soils and hydrology indicators are present unless disturbed or problematic. Dominant species from each stratum were determined by the "50/20 rule" and are marked with an asterisk (*). Below is the vegetation data from T1P3 (Appendix A) that represents a typical data point for the wetland community type. The herbaceous stratum was absent.

Tree Stratum Species List (30-ft radius):

Silver Maple*	Acer saccharinum	FACW
Eastern Cottonwood*	Populus deltoides	FAC
American Elm*	Ulmus americana	FACW

Sapling/Shrub Stratum Species List (15-ft radius):

Northern Spicebush* Lindera benzoin FACW

The total number of dominant species across all strata was four (4) for this data point. The percent of dominant species that are OBL, FACW, or FAC is 100%. Hydrophytic vegetation indicator is met by dominance test.

SECTION II: Section II is an isolated forested wetland located within a wood lot. The wetland is charged by drainage from the adjacent upland and rainfall. The woods were previously logged and the wetland appears to be affected by impoundment due to logging operations. This section is classified as a Palustrine, Forested, Deciduous, Temporarily Flooded (PFO1A) system (Cowardin 1979). As illustrated by the attached wetland delineation plan (C6), the delineated area is 0.32 acres. Below is a typical data point taken from within Section II (Appendix A: Data Forms T1P5).

Hydric Soil: This area is listed by the Hancock County Soil Survey as Brookston silty clay loam and Milford silty clay loam. The Brookston and Milford series are listed as hydric or may have hydric soil inclusions that meet the hydric soil criteria per the Natural Resources Conservation Service, United States Department of Agriculture, State Hydric Soils List. The observed soil was silty clay loam with matrix color at ten (10) inches below the surface from 10YR 4/1 with 3% redox concentrations of 10YR 4/6 (Munsell Soil Color, 1992). The hydric soil criterion is by the presence of hydric soil indicators: depleted below dark surface (A11) and depleted matrix (F3).

Earth Source, Inc.

Page 4 of 9; (Revised 1/11/2024)

14921 Hand Road. Fort Wayne, IN 46818 PH: (260) 489-8511 FAX: (260) 489-8607

Hydrology: Visual observations of hydrology were inundation and soil saturation in spring 2023. Primary indicators of hydrology, as defined by TRY-87-1 and Midwest Regional Supplement, included sparsely vegetated concave surface (B8). Secondary indicators of wetland hydrology, as defined by TRY-87-1 and Midwest Regional Supplement, included Geomorphic Position (D2) and Fac-Neutral Test (D5). The wetland hydrology criterion is met by the presence of primary and secondary indicators.

Vegetation: The wetland vegetation criterion is met with greater than 50% of the dominant plant species across all strata are rated OBL, FACW, or FAC or prevalence index of 3.0 or less if hydric soils and hydrology indicators are present unless disturbed or problematic. Dominant species from each stratum were determined by the "50/20 rule" and are marked with an asterisk (*). Below is the vegetation data from T1P5 (Appendix A) that represents a typical data point for the wetland community type.

Tree Stratum Species List (30-ft radius):

Eastern Cottonwood* FAC Populus deltoides

Sapling/Shrub Stratum Species List (15-ft radius):

Northern Spicebush* Lindera benzoin FACW

Herbaceous Stratum Species List (5-ft radius):

Hairy-Fruit Sedge* Carex trichocarpa OBL Sweet Wood-Reed* Cinna arundinacea **FACW**

The total number of dominant species across all strata was four (4) for this data point. The percent of dominant species that are OBL, FACW, or FAC is 100%. Hydrophytic vegetation indicator is met by dominance test.

SECTION III: Section III is an isolated forested wetland located within a wood lot. The wetland is charged by drainage from the adjacent upland and rainfall. The woods were previously logged and the wetland appears to be affected by impoundment due to logging operations. This section is classified as a Palustrine, Forested, Deciduous, Temporarily Flooded (PFO1A) system (Cowardin 1979). As illustrated by the attached wetland delineation plan (C6), the delineated area is 0.08 acres. Below is a typical data point taken from within Section III (Appendix A: Data Forms T1P7 and T1P11).

Hydric Soil: This area is listed by the Hancock County Soil Survey as Brookston silty clay loam and Milford silty clay loam. The Brookston and Milford series are listed as hydric or may have hydric soil inclusions that meet the hydric soil criteria per the Natural Resources Conservation Service, United States Department of Agriculture, State Hydric Soils List. The observed soil was silty clay loam with matrix color at ten (10) inches below the surface from 10YR 4/1 with 5 % redox concentrations of 10YR 4/6 (Munsell Soil Color, 1992). The hydric soil criterion is by the presence of hydric soil indicators: depleted below dark surface (A11) and depleted matrix (F3).

Hydrology: Visual observations of hydrology were not observed. Primary indicators of hydrology, as defined by TRY-87-1 and Midwest Regional Supplement were absent. Secondary indicators of wetland hydrology, as defined by TRY-87-1 and Midwest Regional Supplement, included Geomorphic Position (D2) and Fac-Neutral Test (D5). The wetland hydrology criterion is met by the presence of two (2) secondary indicators. Earth Source, Inc.

Page 5 of 9; (Revised 1/11/2024)

14921 Hand Road, Fort Wayne, IN 46818

Vegetation: The wetland vegetation criterion is met with greater than 50% of the dominant plant species across all strata are rated OBL, FACW, or FAC or prevalence index of 3.0 or less if hydric soils and hydrology indicators are present unless disturbed or problematic. Dominant species from each stratum were determined by the "50/20 rule" and are marked with an asterisk (*). Below is the vegetation data from T1P7 (Appendix A) that represents a typical data point for the wetland community type.

Tree Stratum Species List (30-ft radius):

Eastern Cottonwood* Populus deltoides FAC
Pin Oak* Quercus palustris FACW

Sapling/Shrub Stratum Species List (15-ft radius):

Northern Spicebush* Lindera benzoin FACW
Twinsisters* Lonicera tatarica FACU

Herbaceous Stratum Species List (5-ft radius):

Lakebank Sedge*Carex lacustrisOBLVirginia SpringbeautyClaytonia virginicaFACUPurple Winter-CreeperEuonymus fortuneiUPL

The total number of dominant species across all strata was five (5) for this data point. The percent of dominant species that are OBL, FACW, or FAC is 80%. Hydrophytic vegetation indicator is met by dominance test.

SECTION IV: Section IV is an isolated forested wetland located within a wood lot. The wetland is charged by drainage from the adjacent upland and rainfall. The woods were previously logged and the wetland appears to be affected by impoundment due to logging operations. This section is classified as a Palustrine, Forested, Deciduous, Temporarily Flooded (PFO1A) system (Cowardin 1979). As illustrated by the attached wetland delineation plan (C6), the delineated area is 0.01 acres. Below is a typical data point taken from within Section IV (Appendix A: Data Forms T1P8).

Hydric Soil: This area is listed by the Hancock County Soil Survey as Milford silty clay loam. The Milford series are listed as hydric or may have hydric soil inclusions that meet the hydric soil criteria per the Natural Resources Conservation Service, United States Department of Agriculture, State Hydric Soils List. The observed soil was silty clay loam with matrix color at ten (10) inches below the surface from 10YR 4/1 with 3% redox concentrations of 10YR 4/6 (Munsell Soil Color, 1992). The hydric soil criterion is by the presence of hydric soil indicators: depleted below dark surface (A11) and depleted matrix (F3).

Hydrology: Visual observations of hydrology were not observed. Primary indicators of hydrology, as defined by TRY-87-1 and Midwest Regional Supplement were absent. Secondary indicators of wetland hydrology, as defined by TRY-87-1 and Midwest Regional Supplement, included Geomorphic Position (D2) and Fac-Neutral Test (D5). The wetland hydrology criterion is met by the presence of two (2) secondary indicators.

Vegetation: The wetland vegetation criterion is met with greater than 50% of the dominant plant species across all strata are rated OBL, FACW, or FAC or prevalence index of 3.0 **Earth Source,** Inc.

Page 6 of 9; (Revised 1/11/2024)

14921 Hand Road, Fort Wayne, IN 46818

or less if hydric soils and hydrology indicators are present unless disturbed or problematic. Dominant species from each stratum were determined by the "50/20 rule" and are marked with an asterisk (*). Below is the vegetation data from T1P8 (Appendix A) that represents a typical data point for the wetland community type.

Tree Stratum Species List (30-ft radius):

American Elm* Ulmus americana FACW

Sapling/Shrub Stratum Species List (15-ft radius):

Northern Spicebush* Lindera benzoin FACW Rambler Rose* Rosa multiflora FACU

Herbaceous Stratum Species List (5-ft radius):

Lakebank Sedge* Carex lacustris OBL

The total number of dominant species across all strata was four (4) for this data point. The percent of dominant species that are OBL, FACW, or FAC is 75%. Hydrophytic vegetation indicator is met by dominance test.

CONCLUSIONS AND RECOMMENDATIONS

In Indiana, waters of the United States, including wetlands, are subject to regulation by the Army Corps of Engineers (ACOE) and/or the Indiana Department of Environmental Management (IDEM). Under Sections 404 and 401 of the Clean Water Act, the ACOE and/or the IDEM have jurisdiction over any activity that involves the placement of fill into, and/or excavation of, a delineated water of the United States. Wetlands located adjacent to waters of the United States or that have a connection to interstate commerce are considered waters of the United States. The jurisdictional status of the delineated areas was determined based upon Earth Source's interpretation of 1987 Corps of Engineers Wetlands Delineation Manual (TRY-87-1). The ACOE is the regulatory authority with regard to wetlands or other waters of the United States. Waters not regulated under Section 401 and 404 of the Clean Water Act are regulated by the State of Indiana under IC 13-18-22.

Drain 1 (Stansbury Ditch) is a Jurisdictional water of the United States. Generally, impacts (fill and/or drainage) to federally and state regulated wetland areas will require notification and authorization through the ACOE and IDEM. In general, if impacts are limited to less than 0.5-acre of a stream channel and/or acre of headwater wetlands or other waters of the United States, the project may qualify for authorization under the Regional or Nationwide General Permit Program (RGP & NWP). Impact limitations vary with the specific RGP and NWP application and project type. The general permit program is a simplified process that provides for general permits within a 45 to 60-day time frame. Impacts to greater than 0.5-acre of stream channel and/or headwater wetland may require an Individual Permit. The Individual permit process requires a more intensive and lengthy review of the project, practical alternatives analysis, 30-day public notice period, and potential public hearing. The average Individual Permit process will run 4 to 6 months. In either case, permitted impacts will require mitigation or replacement, generally at a ratio greater than that of the area impacted. Normal mitigation ratios are 2:1 replacement for impacts to emergent wetlands; 3:1 for scrub/shrub wetlands; and 4:1 for forested impacts. Impacts to less than 0.03 acre and 300 linear feet of stream channel and/or 0.1 acre of Earth Source, Inc. Page 7 of 9; (Revised 1/11/2024)

14921 Hand Road, Fort Wayne, IN 46818

wetland typically will not require mitigation but involve submittal of notification to the agencies at least 30 days prior to project initiation.

Sections I, II, III and IV appear to be isolated wetlands. In order for a wetland to be classified as isolated an approved jurisdictional determination must be provided by the ACOE. Wetland "Class" must be approved by IDEM and typically, a notice of exemption is to be filed with IDEM. Exempt isolated wetlands are "Class I" wetlands and "Class II" wetlands described as the following and may limited to the larger of: 1) the acreage of an individual isolated "Class II" wetland delineated as three-eighths (3/8) acre or less; 2) sixty percent (60%) of the cumulative acreage of all individual isolated "Class II" wetlands delineated as three-eighths (3/8) acre or less. "Exempt" waters of the State (isolated wetlands), typically will not require mitigation but involve submittal of notification to the agencies at least 15 days prior to project initiation. A permit is not required for dredge and fill activities in a "Class II" wetland that is 1) located within the boundaries of a municipality and 2) has a delineated area of not more than three-fourths (3/4) acre. Impacts to "Class II" wetlands that meet these criteria typically will not require mitigation, but involve submittal of notification to the agencies prior to project initiation. For isolated wetlands, impacts to "Class III" wetlands will require an Individual Permit. Non-exempt "Class II" wetlands may qualify for the general permit program analogous to those allowed under the RGP and NWP for minimal impacts, or otherwise requires an Individual Permit. Compensatory mitigation shall be provided in accordance with the following Table 2:

 Table 2. Isolated Wetland Compensatory Mitigation Ratios

Wetland Class	Replacement Class	On-site and In- Lieu Fee Ratio	Off-site Ratio
Class II	Class II or III	1.5 to 1 Non-forested	2 to 1 Non-forested
		2 to 1 Forested	2.5 to 1 Forested
Class III	Class III	2 to 1 Non-forested	2.5 to 1 Non-forested
		2.5 to 1 Forested	3 to 1 Forested

Compensatory mitigation ratios may be lowered to 1 to 1 if the mitigation is completed before the initiation of the wetland activity. Also, exempt isolated wetlands may be used to provide compensatory mitigation for wetlands activities in state regulated wetlands.

SUMMARY OF ACRONYMS AND REFERENCES

Indicator Status Acronyms:

OBL (Obligate Wetland). Occur almost always in wetlands.

FACW (Facultative Wetland). Usually occur in wetlands.

FAC (Facultative). Likely to occur in wetlands or uplands.

FACU (Facultative Upland). Usually occur in uplands.

UPL (Obligate Upland). Occur almost always in uplands.

N/I (No Indicator). Indicator status unavailable.

References

- Britton, Nathaniel L. and Addison Brown. 1970. *An Illustrated Flora of the Northern United States and Canada*. Dover Publication, Inc. New York, New York.
- Cowardin, Lewis M., et al. 1979. *Classifications of Wetlands and Deepwater Habitats of the United States.* U.S. Fish and Wildlife Service, Office of Biological Services, Washington D.C. Publ. No. FWS/OBS-79/31.
- Deam, Charles C. 1940. *Flora of Indiana*. Department of Conservation, Division of Forestry. Indianapolis, Indiana.
- Deters, Jason. 2020. Antecedent Precipitation Tool Version 1.0. U.S. Army Corps of Engineers.
- Environmental Laboratory. 1987. *Corps of Engineers Wetland Delineation Manual*. U.S. Army Engineer Waterways Experiment Station, Vicksburg, MS. Tech. Rpt. Y-87-1.
- Fassett, Norman C. 1957. *Manual of Aquatic Plants*. 2nd ed. The University of Wisconsin Press. Madison, Wisconsin.
- Gleason, Henry and Arthur Cronquist. 1991. *Manual of Vascular Plants of the Northeastern United States and Adjacent Canada*. New York Botanical Garden. Bronx, New York.
- Hitchcock, A.S. 1971. *Manual of Grasses of the United States*. Dover Publication, Inc. New York, NY
- Lichvar, Robert W. 2012. *The National Wetland Plant List*. ERDC/CRREL TR-12-11.Hanover, NH: Cold Regions Research and Engineering Laboratory. U.S. Army Engineer Research and Development Center.
- Munsell Color. 1992. *Munsell Soil Color Charts*. Macbeth Division of Kollmorgen Corporation, Baltimore, MD.
- Natural Resources Conservation Service, United States Department of Agriculture. Web Soil Survey. Available online. Accessed April 20, 2022.
- Newcomb, Lawrence. 1977. *Newcomb's Wildflower Guide*. Little, Brown and Company. New York, New York.
- Reed, Porter B. 1988. *National List of Plants Species that Occur in Wetlands: North Central (Region 3)*. U.S. Fish and Wildlife Service, Washington D.C. Biol. Rpt. 88(26.3).
- Swink, Floyd and Gerould Wilhelm. 1994. *Plants of the Chicago Region*. The Morton Arboretum. Lisle, Illinois.
- U.S. Army Corps of Engineers. 2010. Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Midwest Region (Version 2.0), ed. J.S. Wakeley, R.W. Lichvar, and C.V. Noble. ERDC/EL TR-10-16. Vicksburg, MS: U.S. Army Engineer Research and Development Center.

Earth Source, Inc.

Page 9 of 9; (Revised 1/11/2024)

14921 Hand Road, Fort Wayne, IN 46818