unty	Lake Rou	ute61 st Avenue/Marcella Boulevard	Des. No.	1902707		
CA	ATEGORICAL EXCI	FHWA-Indiana Environmental Docum LUSION / ENVIRONMENT GENERAL PROJECT INFORMATIO	ent AL ASSESSM N	ENT FORM		
Road	No./County:	61 st Avenue and Marcella Boulevard/L	ake County			
Desig	nation Number:	1902707				
Proje After c review	ect Description/Termini: completing this form, I conclude t /approve if Level 4 CE):	Intersection improvement/From the center point of the intersection of 61 st Avenue and Marcella Boulevard, the project will extend approximately 400 feet west and 750 feet east along 61 st Avenue, for a total project length of approximately 1,150 feet (0.22 mile), and for approximately 500 feet north and 500 feet south along Marcella Boulevard, for a total project length of 1,000 feet (0.19 mile).				
X	X Categorical Exclusion, Level 2 – The proposed action meets the criteria for Categorical Exclusion Mi Level 2 - table 1, CE Level Thresholds. Required Signatories: ESM (Environmental Scoping Manager)					
	Categorical Exclusion, Level 3 – The proposed action meets the criteria for Categorical Exclusion Manual Level 3 - table 1, CE Level Thresholds. Required Signatories: ESM, ES (Environmental Services Division)					
	Categorical Exclusion, Level 4 – The proposed action meets the criteria for Categorical Exclusion Manual Level 4 - table 1, CE Level Thresholds. Required Signatories: ESM, ES, FHWA					
	Environmental Assessme is necessary to determine the	nt (EA) – EAs require a separate FONSI he effects on the environment. Required	. Additional researc Signatories: ES, FHV	h and documentation WA		
Note: F located	For documents prepared by or for Env to release for public involvement or s	vironmental Services Division, it is not necessary for sign for approval.	or the ESM of the district	in which the project is		

Low orgin	ature Date	ES Signature	Date
	FHWA Signature	Date	_
Release for Public Inv	olvement		
N/A			01/28/2022
ESM Initials	Date	ES Initials	Date
Certification of Public	E Involvement	Involvement Date	
Note: Do not approve unti	l after Section 106 public involvem	ent and all other environmental	requirements have been satis
Note: Do not approve unti INDOT ES/District Env. Reviewer Signature:	l after Section 106 public involvem	ent and all other environmental Date:	requirements have been satis
Note: Do not approve unti INDOT ES/District Env. Reviewer Signature:	l after Section 106 public involvem E/EA Preparer: <u>Brittney Layton, M.A</u>	ent and all other environmental Date:	requirements have been satis

Form Version: June 2013 Attachment 2 _

County

Lake

Route 61st Avenue/Marcella Boulevard

Des. No.

1902707

Part I - PUBLIC INVOLVEMENT

Every Federal action requires some level of public involvement, providing for early and continuous opportunities throughout the project development process. The level of public involvement should be commensurate with the proposed action.

Does the project have a historic bridge processed under the Historic Bridges PA*? If No, then:

Opportunity for a Public Hearing Required?

Yes	No
	X
X	
Χ	

*A public hearing is required for all historic bridges processed under the Historic Bridges Programmatic Agreement between INDOT, FHWA, SHPO, and the ACHP.

Discuss what public involvement activities (legal notices, letters to affected property owners and residents (i.e. notice of entry), meetings, special purpose meetings, newspaper articles, etc.) have occurred for this project.

Remarks:	Notice of Entry letters were mailed to potentially affected property owners near the project area on June 6,
	2019 notifying them about the project and that individuals responsible for land surveying and field activities
	may be seen in the area. A sample copy of the Notice of Entry letter is included in Appendix G, page 1.

To meet the public involvement requirements of Section 106, a legal notice of FHWA's finding of "No Historic Properties Affected" was published in the *Times* (serving Lake County) on April 27, 2020, offering the public an opportunity to submit comments pursuant to 36 CFR 800.2(d), 800.3(e), and 800.6(a)(4). The text of the public notice and the affidavit of publication appear in Appendix D, pages 36 and 37. No public comments were received by the established deadline date of May 27, 2020. The project footprint has minimized since the legal notice was published; however, the project area is within the original footprint boundaries. There has been a reduction in the permanent right-of-way (ROW) acquisition amounts and an increase in the temporary ROW acquisition (see the *Right of Way* section of this CE document for more details).

The project will meet the minimum requirements described in the current *Indiana Department of Transportation (INDOT) Public Involvement Manual* which requires the project sponsor to offer the public an opportunity to submit comment and/or request a public hearing. Therefore, a legal notice will appear in a local publication contingent upon the release of this document for public involvement. This document will be revised after the public involvement requirements are fulfilled.

Public Controversy on Environmental Grounds

Will the project involve substantial controversy concerning community and/or natural resource impacts?

Yes No

Remarks: At this time, there is no substantial public controversy concerning impacts to the community or to natural resources.

Part II - General Project Identification, Description, and Design Information

Sponsor of the Project:	City of Hobart	INDOT I	District: LaPorte
Eunding Source (mark all that an	n/v): Federal X State	local X Other*	
*If other is selected, places inde			
n other is selected, please inder			
This is page 2 of 35 Project na	me: <u>61st Avenue/Marcella B</u>	vd. Intersection Improvement D	Date: January 13, 2022

Indiana	Department of	of Transportation
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County	Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707

PURPOSE AND NEED:

Describe the transportation problem that the project will address. The solution to the traffic problem should NOT be discussed in this section. (Refer to the CE Manual, Section IV.B.2. Purpose and Need)

Need:

The need for the project is due to congestion and the high rate of accidents at the intersection of 61st Avenue and Marcella Boulevard. Butler, Fairman and Seufert, Inc. (BF&S) collected traffic data for this intersection in the City of Hobart in 2021 (Appendix I, pages 15 to 42). The Average Daily Traffic (ADT) on 61st Avenue is projected to be 24,763 vehicles per day (v.p.d.) (in 2022) and 32,662 v.p.d. (in 2042). Marcella Boulevard is anticipated to have an ADT of 18,387 v.p.d. (in 2022) and 21,057 (in 2042). The expected increase in traffic volumes was calculated based on historical growth rates and the expected development of the vacant land in the project vicinity and surrounding area, specifically along 61st Avenue from Mississippi Street to Deep River Drive and south of 61st Avenue to 69th Avenue. The expected land uses include commercial, industrial, manufacturing, and residential development (as identified in the Operational Analysis Report, Appendix I, page 42).

An Operational Analysis Report was prepared by BF&S in 2021 for the intersection of 61st Avenue and Marcella Boulevard to evaluate the traffic operations and perform a capacity assessment. The standard parameter used to evaluate traffic operating conditions is referred to as the Level of Service (LOS). There are six LOS (A through F) which rank driving conditions from best to worst. The LOS for signalized intersections is defined in terms of control delay per vehicle, directly correlated to driver discomfort, frustration, fuel consumption, and lost travel time. The Operational Analysis indicated that the intersection of 61st Avenue and Marcella Boulevard currently has a LOS of C at the AM Peak Hour and a LOS of D at the PM Peak Hour. (Peak Hour is defined as the hour of the day when traffic volumes are the highest and is usually between 7 a.m. to 9 a.m. for AM Peak Hour and between 4 p.m. to 6 p.m. for PM Peak Hour.) By the design year (2042), with its current configuration, the intersection will have a LOS of C at the AM Peak Hour and a LOS of E at the PM Peak Hour.

Between 2016 to 2018, there were 58 recorded accidents at or near the intersection, which is one of the highest accident rates for an intersection within the City of Hobart according to the City's Engineering Department. The majority of these crashes (24 total) were rear-end collisions, followed closely by left-turn crashes (19 total). Out of these 58 crashes, nine resulted in injury. Excerpts from the Road Hazard Analysis Tool (RoadHAT Report), which provide more details on the types of crashes that occurred can be found in Appendix I, page 13.

Purpose:

The purpose of the project is to improve the LOS in the design year (2042) to a LOS of C, or better, during peak hours, while also reducing the severity of vehicular crashes at the intersection of 61^{st} Avenue and Marcella Boulevard.

PROJECT DESCRIPTION (PREFERRED ALTERNATIVE):							
County: Lake		Municipality:	City of Hobart				
Limits of Proposed Work	From the cen extend approv length of approver feet south along	ter point of 61 st Ave kimately 400 feet we roximately 1,150 feet ng Marcella Boulevar	nue intersection wit st and 750 feet east (0.22 mile), and for d, for a total project	h Marcella t along 61 st r approximat length of 1,0	Boulevard, Avenue, fo tely 500 fee 00 feet (0.1	the project will or a total project et north and 500 19 mile).	
Total Work Length:	0.41 Mil	e(s)	Total Work Area:	5.3	_ Acre(s)		
						Yes ¹	No
This is page 3 of 35 P	roject name:	61st Avenue/Marcella	a Blvd. Intersection Im	provement	Date:	January 13, 2022	

County	Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707			
Is an Interd	change Modification Study	/ Interchang	e Justification Study (IMS/IJS) requir	red?			Ī	X
If yes, whe	n did the FHWA grant a co	onditional ap	proval for this project?			Date:		

¹If an IMS or IJS is required; a copy of the approved CE/EA document must be submitted to the FHWA with a request for final approval of the IMS/IJS.

In the remarks box below, describe existing conditions, provide in detail the scope of work for the project, including the preferred alternative. Include a discussion of logical termini. Discuss any major issues for the project and how the project will improve safety or roadway deficiencies if these are issues.

Project Location

The project is positioned at the intersection of 61st Avenue and Marcella Boulevard, the center of which is approximately 0.19 mile east of the eastern I-65 interchange ramps. The project is also located in Sections 2 and 11, Township 35 North, Range 8 West of the United States Geological Survey (USGS) Gary Quadrangle, City of Hobart, Lake County, Indiana (Appendix B, page 3).

Existing Conditions

The intersection of 61st Avenue and Marcella Boulevard, approximately 0.19 mile east of the eastern I-65 interchange ramps, is controlled by a traffic signal.

The functional classification of 61^{st} Avenue is Principal Arterial. The posted speed limit is 30 miles per hour (mph). The roadway is mostly concrete with some asphalt present near the eastern terminus. The approach of 61^{st} Avenue consists of (4) 11-foot through lanes (two (2) eastbound (EB) lanes, and two (2) westbound (WB) lanes). Approaching the 61^{st} Avenue/Marcella Boulevard intersection along EB 61^{st} Avenue there is also one (1) 11-foot left turn lane and one (1) 11-foot right turn lane. Approaching the 61^{st} Avenue/Marcella Boulevard intersection, along WB 61^{st} Avenue there is one (1) 11-foot left turn lane. Curb and gutter exist on both sides of 61^{st} Avenue. There are no existing sidewalks throughout the majority of the project area; however, there is an approximately 6-foot-wide sidewalk located along the north side of 61^{st} Avenue starting approximately 160 feet from the eastern project terminus that continues east. Existing street lighting is present on the north side of 61^{st} Avenue east of Marcella Boulevard.

Marcella Boulevard, classified as a Minor Arterial, has an asphalt surface with a speed limit of 20 mph. Marcella Boulevard south of 61st Avenue consists of four (4) 12-foot through lanes (two (2) lanes in each direction) bordered on both sides by curb and gutters. Approaching the 61st Avenue/Marcella Boulevard intersection, along NB Marcella Boulevard, the west NB lane becomes a dedicated left turn lane while the east through lane permits a left turn, right turn, as well as forward movement through the intersection. Marcella Boulevard north of 61st Avenue has two (2) 12-foot lanes (one (1) SB lane and one (1) NB lane), bordered by curbs, and no sidewalks. North of 61st Avenue, Marcella Boulevard continues for approximately 240 feet and terminates at a parking lot entrance for a commercial facility.

The land use along the project area is primarily commercial, and also includes some agricultural and residential properties, as well as a small, forested lot (see Appendix B, page 5 for photo orientation map and pages 6 to 21 for photograph sheets).

Preferred Alternative

The project proposes to construct a roundabout at the intersection of 61st Avenue and Marcella Boulevard. The center of the roundabout will be located approximately 20 feet south of the center of the existing intersection in order to minimize impacts to surrounding properties and avoid any relocations. According to the INDOT 2013 Design Manual (Chapter 51-12), roundabouts reduce the severity of crashes, particularly left-turn head-on and angled crashes (Appendix I, page 14). The roundabout will have an overall diameter of approximately 200 feet. The lanes approaching the roundabout will be approximately 12-feet-wide and will vary between 12 feet and 17 feet entering and through the roundabout. The roundabout. A mountable curb and 10-foot-wide truck apron will be installed on the inside of the roundabout.

The lane configuration of the roundabout will include two (2) entering and two (2) exiting lanes on the east approach,

This is page 4 of 35 Project name:

oject name: <u>61st Avenue/Marcella Blvd. Intersection Improvement</u> Date: January 13, 2022

Indiana	Department	of Transportation
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County	Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707

two (2) entering and two (2) exiting lanes on the west approach, two (2) entering (the western lane being a dedicated left turn lane) and two (2) exiting lanes on the south approach, and one (1) entering and one (1) exiting lane on the north approach.

The approach along Marcella Boulevard to the south of 61st Avenue will consist of four (4) travel lanes: two (2) NB lanes where one (1) lane is a dedicated left turn lane from NB Marcella Boulevard to WB 61st Avenue, and the remaining are two (2) SB lanes. The approach along Marcella Boulevard to the north of 61st Avenue will consist of two (2) travel lanes: one (1) NB and one (1) SB. The approach along 61st Avenue both to the east and west of Marcella Boulevard will consist of four (4) travel lanes: two (2) WB lanes and two (2) EB lanes.

Up to eleven (11) driveways will be reconstructed as a part of this project. West of the intersection of 61st Avenue and Marcella Boulevard, two (2) driveways along the north side of 61st Avenue will be reconstructed. East of the intersection, four (4) driveways along the north side and one (1) driveway along the south side of 61st Avenue will be reconstructed. North of the intersection, one (1) driveway on each the east and west sides of Marcella Boulevard will be reconstructed. Additionally, south of the intersection along Marcella Boulevard, one (1) driveway along each the east and west side will be reconstructed. The maximum depth of excavation in the project area will be 10 feet.

New sidewalk will be installed along both sides of 61st Avenue east of Marcella Boulevard. The sidewalk along the north side of 61st Avenue will extend to the project's eastern terminus where the sidewalk will tie into already existing sidewalk. New sidewalk will be installed east of Marcella Boulevard, along the southside of 61st Avenue until approximately 200 feet east of Marcella Boulevard at the first commercial driveway. New sidewalk will additionally be installed along the west side of Marcella Boulevard south of 61st Avenue for approximately 175 feet until the southern project terminus. The width of the sidewalks will vary from 5 to 6 feet with a buffer up to 3-feet wide between the roadway curb and sidewalk. The new sidewalks will comply with American with Disabilities Act (ADA) standards. Additionally, ADA-compliant crosswalks will be installed on the north and east legs of the roundabout to provide for future pedestrian utilization.

Existing lighting will be replaced, and new additional lighting will be installed at the roundabout and throughout the project area. All new lighting will be downward-facing, full cut-off lighting. New lighting will be installed along all legs of the project as required and will be designed per Indiana Design Manual Chapter 502-4.02(09). Curb and gutter will be reconstructed throughout the project area. Storm sewer will be reconstructed to provide storm water runoff for the new intersection improvements by means of an enclosed storm sewer system. An enclosed outfall pipe will be installed to convey stormwater to an existing vegetated swale on the north side of the project area (Appendix B, pages 26 to 29). This vegetated swale will direct storm water to the floodplain of Turkey Creek, where Turkey Creek flows approximately 600 feet north of 61st Avenue. The project will not enter the floodplain. The stormwater system will have a filtration feature installed to remove sediment, floating debris, and free oils.

The project will require closure of the intersection and the institution of a detour, utilizing Mississippi Street, 69th Avenue, and Colorado Street. The detour will be approximately 4.2 miles in length, adding 3.2 miles to a through trip and 6.4 miles to a round trip (Appendix B, page 31). No properties will become inaccessible from this MOT plan. There is suitable bat habitat within the project area. Up to eight (8) trees will be cleared. Tree clearing will occur during the inactive season for bats.

The I-65 interchange is located approximately 1,200 feet west of Marcella Boulevard. This project will not significantly affect the I-65 interchange with queuing according to the Traffic Analysis Report. On page 20 of the report (Appendix I, page 38), it states, "The project will not have an adverse impact on the interchange through the 2042 design year."

From the center point of 61st Avenue intersection with Marcella Boulevard, the project will extend approximately 400 feet west and 750 feet east along 61st Avenue, for a total project length of 1,150 feet (0.22 mile), and for approximately 500 feet north and 500 feet south along Marcella Boulevard, for a total project length of 1,000 feet (0.19 mile). The project termini are logical because they allow for the construction of the roundabout approaches and splitter islands in addition to the transition of the project area back to the existing roadway conditions. The project has independent utility because it does not require any other projects in order to meet the stated purpose and need which is to improve the LOS in the design year (2042) to at least a LOS of C, while also reducing the severity of vehicular crashes of the intersection

This is page 5 of 35 Project name: 61st Avenue/Marcella Blvd. Intersection Improvement Date: January 13, 2022

County	Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707

of 61st Avenue and Marcella Boulevard.

OTHER ALTERNATIVES CONSIDERED:

Describe all discarded alternatives, including the Do-Nothing Alternative and an explanation of why each discarded alternative was not selected.

Alternative 1: Do-Nothing Alternative

The Do-Nothing Alternative would entail leaving the project area in its current condition. This alternative would eliminate construction costs and environmental impacts associated with construction. This alternative would not meet the purpose and need for the project, which is to improve the LOS and reduce the severity of accidents at this intersection. Therefore, this alternative was removed from further consideration.

Alternative 2: Alternate Roundabout Configuration 2

Alternative 2 would consist of constructing a roundabout at 61^{st} Avenue and Marcella Boulevard with the alignment shifted southwest of the existing intersection. The lane configuration included two (2) entering and exiting lanes on the east approach, three entering lanes (one (1) right turn, one (1) left turn lane, and one (1) shared left through lane) and two (2) exiting lanes on the west approach, and two (2) entering and two (2) exiting lanes on the south approach, and one (1) entering and one (1) exiting lane on the north approach. This alternative would meet the stated purpose and need of the project, which is to improve the expected design year LOS and reduce the severity of accidents; however, the configuration would cause a significant increase in ROW impacts, requiring the relocation of two (2) businesses. Therefore, this alternative was removed from further consideration.

Alternative 3: Alternate Roundabout Configuration 3

Alternative 3 would consist of constructing a roundabout at 61^{st} Avenue and Marcella Boulevard with the alignment shifted southwest of the existing intersection. The lane configuration included two (2) entering and two (2) exiting lanes on the east approach, three (3) entering lanes (one (1) right turn, one (1) left turn lane, and one (1) shared left-through lane) and two (2) exiting lanes on the west approach, and two (2) entering and two (2) exiting lanes on the south approach. The north leg of the roundabout included a single northbound exiting lane. Access to 61^{st} Avenue from the north side of 61^{st} Avenue would be via a new southbound single lane road located about 200 feet east of Marcella Boulevard. This alternative would meet the stated purpose and need of the project; however, the configuration would have significant ROW impacts that would require the relocation of one (1) business. This alternative would negatively impact the operation of the business (Wendy's) on the northeast quadrant and would also require a significant amount of ROW from the property east of Wendy's. This second property is currently being proposed as a gas station and the necessary ROW would impede the development. Therefore, this alternative was removed from further consideration.

Alternative 4: Alternate Roundabout Configuration 4

Alternate 4 would consist of constructing a roundabout at the intersection of 61st Avenue and Marcella Boulevard, slightly south of the existing intersection. The lane configuration included two (2) entering and three (3) exiting lanes on the east approach, three (3) entering lanes (one (1) right turn, one (1) left turn lane, and one (1) shared left through lane) and two (2) exiting lanes on the west approach, two (2) entering and two (2) exiting lanes on the south approach, and one (1) entering and one (1) exiting lane on the north approach. This alternative would meet the stated purpose and need of the project; however, the configuration would have significant ROW impacts. These impacts would require at a minimum the relocation of fuel tanks and possibly the gas station, itself, which are located in the southeast quadrant. Therefore, this alternative was removed from further consideration.

Alternative 5: Alternate Roundabout Configuration 5

Alternate 5 would consist of constructing a roundabout at 61^{st} Avenue and Marcella Boulevard, slightly south of the intersection. The lane configuration included three (3) entering lanes and two (2) exiting lanes on the east approach (one (1) shared right turn/through lane, one (1) shared left turn/through lane, and one (1) dedicated through lane), two (2) entering and three (3) exiting lanes on the west approach, two (2) entering and two (2) exiting lanes on the south approach, and one (1) entering and one (1) exiting lane on the north approach. This alternative would meet the stated purpose and need of the project; however, the configuration would have significant ROW impacts, including negative operational

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impacts to the business (Wendy's) on the northeast quadrant. Therefore, this alternative was removed from further consideration.

Alternative 6: Traffic Signal Upgrades and Added Turn Lanes

Alternative 6 would consist of traffic signal upgrades and added turn lanes at the intersection of 61st Avenue and Marcella Boulevard. A traffic signal would require lengthening of the turn lanes that would result in additional ROW impacts along the corridor. The added turn lanes would result in significant impacts to the Marathon Petroleum pipeline located along the south side of 61st Avenue resulting in an estimated reimbursable relocation cost of 2.5 million dollars. Upgraded traffic signals would not provide the same reduction in severity of accidents as would a roundabout. In addition, the City of Hobart Thoroughfare Plan indicates the city's desire to first consider roundabouts over traffic signals where roundabouts are feasible. Therefore, this alternative was removed from further consideration.

The Do Nothing Alternative is not feasible, prudent or practicable because (Mark all that apply):

It would not correct existing capacity deficiencies;

It would not correct existing safety hazards;

It would not correct the existing roadway geometric deficiencies;

It would not correct existing deteriorated conditions and maintenance problems; or

It would result in serious impacts to the motoring public and general welfare of the economy.

Other (Describe)

ROADWAY CHARACTER: 61st Avenue

Functional Classification: Current ADT: Design Hour Volume (DHV): Designed Speed (mph):	Principal 27, 763 2,875 40	Arterial VPD (2022) Truck Percentage Legal Speed (mp	Design e (%) h):	Year ADT: 4% 30	32,662	VPD (2042)
	Existing	g	Propos	ed		
Number of Lanes:	4	4-6 @ 11 feet	4	@ 12 to 17 fe	et	
Type of Lanes:	Through	n, left-turn, right-turn	Throug	gh, left-turn, ri	ght-turn	
Pavement Width:	55 to 66	ft.	48 to 94	ft.		
Shoulder Width:	n/a	ft.	n/a	ft.		
Median Width:	n/a	ft.	n/a	ft.		
Sidewalk Width:	n/a	ft.	5 to 6	ft.		
Splitter Island for Roundabout	n/a	ft.	4 to 26	ft.		
Setting:	Urban Level	Suburbar Rolling	י 📃	Rural Hilly		

County Lake	Route 61 st	Avenue/Marcella Boulevard	Des. No.	1902707
ROADWAY CHARACTE	R: Marcella Boulevard			
Functional Classification: Current ADT: Design Hour Volume (DHV) Designed Speed (mph):	Minor Arterial 18,387 VPD (2 1,642 Truck Perc 40 Legal Spece	019) Design Year ADT: entage (%) 4% ed (mph): 20	25,500	VPD (2042)
Newsland St		Proposed	· .	
Number of Lanes:	4 @ 12 feet	4 (<i>a</i>) 12 to 17 f	eet	
Type of Lanes:	I hrough, leπ-turn	I hrough, leπ-turn, r	ight-turn	
Should or Width:	48 II.	$\frac{48-94}{11}$		
Median Width:	$\frac{11/a}{n/a}$ ft	$\frac{11/a}{n/a}$ ft		
Sidewalk Width:	n/a ft	5 to 6 ft		
Splitter Island for Roundabo	out n/a ft.	$\frac{3 \text{ to } 3}{4 \text{ to } 26}$ ft.		
Setting:	X Urban Su	ourban Rural		
Topography:	A Level Ro	ling Hilly		
DESIGN CRITERIA FOR Structure/NBI Number(s):	BRIDGES: N/A	Sufficiency Rating	j: <u>N/A</u>	
	- • • • •	D	(Rating, Sour	rce of Information)
Bridgo Typo:		Proposed		
Number of Spans:	N/A N/A	N/A N/A		
Weight Restrictions:	N/A N/A	N/A ton]	
Height Restrictions:	N/A N/A	N/A ft.		
Curb to Curb Width:	N/A N/A	N/A ft.		
Outside to Outside Width:	N/A N/A	N/A ft.		
Shoulder Width:	N/A N/A	N/A ft.		
Length of Channel Work:	N/A	N/A ft.		
Describe bridges and a	structures; provide specific l	ocation information for small s	structures.	
Remarks: No bridge	es or small structures are loc	ated within the project area.		
		* *	N ₂ -	

Will the structure be rehabilitated or replaced as part of the project?

61st Avenue/Marcella Blvd. Intersection Improvement Date: January 13, 2022

X

County	Lake	Route	61st Avenue/Marcella Boulevard

1902707

MAINTENANCE OF TRAFFIC (MOT) DURING CONSTRUCTION:

	Yes		No
Is a temporary bridge proposed?			Х
Is a temporary roadway proposed?		[Χ
Will the project involve the use of a detour or require a ramp closure? (describe in remarks)	Χ	ſ	
Provisions will be made for access by local traffic and so posted.	Χ	ſ	
Provisions will be made for through-traffic dependent businesses.	Χ	ſ	
Provisions will be made to accommodate any local special events or festivals.		ĺ	Χ
Will the proposed MOT substantially change the environmental consequences of the action?		ĺ	Χ
Is there substantial controversy associated with the proposed method for MOT?		ĺ	Χ

Remarks: The MOT for the project will require an intersection closure and a detour for through traffic during construction. The detour will likely utilize Mississippi Street, 69th Avenue, and Colorado Street and will be approximately 4.2 miles long (Appendix B, page 31). This will add approximately 3.2 miles to a through trip and 6.4 miles to a round trip.

> The road closure is planned to last for approximately four (4) months. The City of Hobart Chamber of Commerce website's Festival Calendar was reviewed on October 4, 2021 by BF&S (http://cityofhobart.org/204/ Lakefront-Festival) and no community events will be disrupted by the proposed project. Therefore, no provisions or accommodations need to be made for local traffic from residents or businesses. The area is primarily urban with access to commercial businesses and residences near the project area. It is not anticipated that any businesses will be adversely impacted from the MOT. No properties will become inaccessible during the implementation of MOT.

> The closures/lane restrictions will pose a temporary inconvenience to traveling motorists (including school buses and emergency services); however, no significant delays are anticipated, and all inconveniences will cease upon project completion. Delays will occur during construction but will cease with project completion.

ESTIMATED PROJECT COST AND SCHEDULE:

Engineering*: \$ 516,840 (FY 2018) Right-of-Way: * \$ 2,500,000 (FY 2022) Construction: \$ 3,740,500 (FY 2023) *These phases are locally funded. Since they do not involve federal money, they are not required to be listed in the TIP/STIP.

Anticipated Start Date of Construction: Spring 2023
Date project incorporated into STIP July 31, 2020, Fiscal Year (FY) 2020-2024 Indiana STIP, Amendment A25 approved.
Is the project in an MPO Area? X
Name of MPO Northern Indiana Regional Planning Commission (NIRPC)
Location of Project in TIP FY 2020-2024 TIP, Amendments 20-00 & 20-07 (Appendix H, pages 1 to 2)
Date of incorporation by reference into the TIP August 22, 2019

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				-	
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RIGHT OF WAY:

	Amount	(acres)
Land Use Impacts	Permanent	Temporary
Residential	0.090	0.010
Commercial	0.960	0.90
Agricultural	0.000	0.000
Forest	0.000	0.000
Wetlands	0.000	0.000
Other:	0.000	0.000
Other:	0.000	0.000
TOTAL	1.050	0.910

Describe both Permanent and Temporary right-of-way and describe their current use. Typical and Maximum right-of-way widths (existing and proposed) should also be discussed. Any advance acquisition or reacquisition, either known or suspected, and there impacts on the environmental analysis should be discussed.

Remarks: The project requires approximately 1.05 acre of permanent ROW acquisition, which includes approximately 0.09 acre of residential land and 0.96 acre of commercial land. The project also requires approximately 0.91 acre of temporary ROW with 0.01 acre from residential land and 0.90 acre from commercial properties for grading and parking lot and driveway reconstruction.

The existing apparent ROW along 61st Avenue is 100 feet (50 feet north and south of the center line on average). The existing apparent ROW along Marcella Boulevard is 80 feet (40 feet east and west of the center line on average).

The maximum proposed ROW along 61st Avenue is approximately 180 feet (90 feet north and south of the center line). The maximum proposed ROW along Marcella Boulevard is 120 feet (60 feet east and west of the center line).

The original project scope called for approximately 3.0 acres of permanent ROW acquisition and 0.5 acre of temporary ROW acquisition. The project has had a reduction in the project footprint; however, the project area still remains within the original footprint. There has been a reduction in the overall permanent ROW amounts also, yet an increase in temporary ROW amounts due to the project design development and refinement.

If the scope of work or permanent or temporary ROW amounts change, the INDOT Environmental Services Division (ESD) and the INDOT District Environmental Section will be contacted immediately.

County

Lake

Route 61st Avenue/Marcella Boulevard

1902707

Des. No.

Part III - Identification and Evaluation of Impacts of the Proposed Action

		Presence	Impacts				
			Yes No				
treams, R ederal Wile tate Natura ationwide utstanding	ivers, Watercourses & Jurisdictional Ditches d and Scenic Rivers al, Scenic or Recreational Rivers Rivers Inventory (NRI) listed Rivers List for Indiana /aterways						
aviyable V	valci ways						
emarks:	Based on a desktop review, site visits on October 23, an area (Appendix B, page 4), and the water resource map in E, page 10) there are five (5) streams located within th Turkey Creek, present adjacent to the project area.	d 30, 2019, by BF& n the Red Flag Invest ne 0.5 mile search ra	S, the aerial map of the pro- tigation (RFI) report (Appen adius. There is one (1) strea				
	A Waters of the U.S. Determination / Wetland Delineation 18, 2019. Please refer to Appendix F for the U.S. Determ Turkey Creek, was identified within the study area. It construction area for this project. No impacts are expected were identified in the study area.	<i>n Report</i> was comple <i>nination / Wetland L</i> was determined the d. No other roadside	eted for the project on Decem Delineation Report. One strea at Turkey Creek is outside e ditches or unnamed tributar				
	According to the database administered by the Bureau o U.S. Fish and Wildlife Service (USFWS) and U.S. Forest this area of Lake County that are on the list of Wild, Scer the database administered by the NPS (https://www.np streams in this area of Lake County that are on the Nation that possess one or more "outstandingly remarkable" nature or regional significance.	of Land Management Service (<u>https://river</u> nic or Recreational R <u>ps.gov/orgs/1912/plar</u> wide Rivers Inventor ral or cultural values	t, National Park Service (NI rs.gov/), there are no stream livers. In addition, according <u>n-your-visit.htm</u>), there are ry which are free-flowing riv judged to be of more than lo				
	The proposed project includes reconstruction of curb and will be reconstructed to provide stormwater runoff for the storm sewer system to carry the water to the floodplain o enclosed storm sewer system will outlet at an existing v floodplain, and from the floodplain to Turkey Creek, whic (Appendix B, page 4). The outfall pipe that runs to the sediment, floating debris, and free oils. There will be n (OHWM) along Turkey Creek; therefore, no impacts are Due to the commercial nature of the surrounding proper vegetated swale will be incorporated into the design within	gutter throughout th intersection improve of Turkey Creek (App 'egetated swale whic th flows approximatel swale will have a file to work or fill below expected. The project erties, bioretention is the central landscap	the project area. The storm seriements by means of an enclo pendix B, pages 26 to 29). The will convey the water to by 600 feet north of 61 st Aven tration feature that will remove the ordinary high water m of the ordinary high water m of will not enter the floodpla s not reasonable. However we area of the roundabout.				
	Turkey Creek is listed as being impaired on the Indiana Department of Environmental Management (IDEM 303(d) List of Impaired Waterways for <i>Escherichia coli</i> (<i>E. coli</i> .) counts that exceed the state limit, impaired biotic communities, and low dissolved oxygen levels. However, Turkey Creek is approximately 225 fee north of the construction limits. Therefore, no impact is expected and there is no concern.						
	Early Coordination Early coordination letters were sent to the United States F 2019 and to the United States Army Corp of Engineers ((IDNR), and the Northern Indiana Regional Planning Con pages 1 to 2).	ish and Wildlife Serv USACE), Indiana De nmission (NIRPC) or	vice (USFWS) on December epartment of Natural Resour n January 2, 2020 (Appendix				

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 Project name:
 61st Avenue/Marcella Blvd. Intersection Improvement
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County	Lake	Route	61st Avenue/Marcel	a Boulevard	Des. No.	1902707		
	The USACE respon waters (Appendix C however, no request	ded on Februa C, pages 43 to was received.	ry 14, 2020 with no o 45). USACE stat	comments regar ed that addition	rding streams, river nal information wo	rs, or jurisdictional ould be requested;		
	IDEM was contacted generated see Apper any specific recomm	ed online via t ndix C, pages 3 nendations rega	heir roadway projec 5 to 41 for the IDEM rding the project.	t web form. T Online Roadwa	[°] he standard autom ay Letter. IDEM di	atic response was d not respond with		
	The USFWS responded on January 28, 2020 and stated that because the proposed project will have minor impacts on natural resources, and no federally endangered species are known to be present, the USFWS will not be providing a formal statement or commenting further (Appendix C, page 6).							
The IDNR responded on January 29, 2020 with recommendations to avoid or minimize impacts waterway, including not depositing or allowing demolition/construction materials or debris to fall or oth enter the waterway, and appropriately designing measures for controlling erosion and sediment to p sediment from entering the stream or leaving the construction site (Appendix C, pages 7 to 8).								
	The NIRPC responded on January 31, 2020 (Appendix C, page 42) with recommendations to avoid or minimize impacts to Turkey Creek, which has been included on the 303(d) List of Impaired Waterbodies for impaired biotic communities, low dissolved oxygen levels, and <i>E. coli</i> by IDEM. Further detail regarding NIRPC's recommendations is provided in the <i>Other Surface Waters</i> section of this document.							
	All applicable agend document.	cy recommenda	ations are included in	the Environme	ental Commitments	section of this CE		
Other Surfa Reservoirs Lakes Farm Ponds Detention B Storm Wate Other:	a ce Waters s asins r Management Facilitie	95		Presence	Impacts Yes No Impacts Impacts Impacts			
Remarks:	Based on a desktop area (Appendix B, p three (3) lakes locat to the project area.	review site vis page 4), and th ed within 0.5 n Therefore, no in	its on October 23, an e water resource map nile search radius. T npacts are expected.	nd 30, 2019, by o in the RFI rep nere are no surfa	BF&S, the aerial n port (Appendix E, p ace waters located y	hap of the project bage 10) there are within or adjacent		
	Early Coordination Early coordination letters were sent to the USFWS on December 31, 2019 and to the USACE, IDNR, and the NIRPC on January 2, 2020 (Appendix C, pages 1 to 2).							
	The USACE responded on February 14, 2020, with no comments regarding streams, rivers, or jurisdictional waters (Appendix C, pages 43 to 45). USACE stated that additional information would be requested; however, no request was received.							
	IDEM was contacted generated see Apper with any specific rec	ed online via t ndix C, pages commendations	heir roadway project 35 to 41 for the IDE regarding the projec	web form. The Month of the Mont	he standard automa lway Letter. IDEM ny specific IDEM co	atic response was I did not respond commitments.		
	The USFWS respon	ded on January	y 28, 2020, and state	d that because t	he proposed projec	t will have minor		

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 Project name:
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impacts on natural resources, and no federally endangered species are known to be present, the USFWS will not be commenting further (Appendix C, page 6).

The IDNR responded on January 29, 2020, with no specific recommendations to avoid or minimize impacts to surface waters (Appendix C, pages 7 to 8).

The NIRPC responded on January 31, 2020 (Appendix C, page 42) with recommendations to avoid or minimize impacts to Turkey Creek. Turkey Creek is listed as being impaired on the Indiana Department of Environmental Management (IDEM) 303(d) List of Impaired Waterways for Escherichia coli (E. coli.) counts that exceed the state limit, impaired biotic communities, and low dissolved oxygen levels. However, Turkey Creek is approximately 225 feet north of the construction limits. Therefore, no impact is expected and there is no concern. According to NIRPC, the project area is located in a catchment area identified as a Tier 1 Critical Area in the state-approved Deep River-Portage Burns Waterway Watershed Management Plan (2016). Data analysis conducted by NIRPC identified channel morphology and low dissolved oxygen levels as significant factors in explaining the impaired biotic communities. Furthermore, the analysis indicates that urban stormwater runoff is the primary contributor of oxygen demanding substances. As NIRPC has invested federal cost-share funding within the City of Hobart and upstream in the Town of Merrillville to begin rectifying this issue, given the opportunity presented with this project, NIRPC recommends that the roundabout incorporates bioretention in its design to reduce stormwater runoff volume, filter out oxygen demanding substances and reduce water temperatures. Bioretention has been identified as an appropriate best management practice to address these issues in transportation rights-of-way. Therefore, a bioswale will be incorporated within the limits of the roundabout design.

All applicable agency recommendations are included in the *Environmental Commitments* section of this CE document.

			Presence	Impacts	<u>s</u>
Wetlands			X	Yes	No X
Total wetland area:	0.62	acre(s)	Total wetland area impacted:	<u>0.00</u> acre(s	;)

(If a determination has not been made for non-isolated/isolated wetlands, fill in the total wetland area impacted above.)

Wetland No.	Classification	Total Size (Acres)	Impacted Acres	Comments
Wetland 1	PFO1C	0.62	0.00	This wetland habitat is dominated by common reed (<i>Phragmites australis</i>) and is not considered to be a high-quality habitat.

Documentation

Х

Х

ES Approval Dates

Not Appli	cable, L	PA Proje	ect
Not Appli	cable, L	PA Proje	ect
		0	

This is page 13 of 35 Project name:

USACE Isolated Waters Determination

Wetlands (*Mark all that apply*) Wetland Determination

Wetland Delineation

Mitigation Plan

		maiana			
County	Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707

Improvements that will not result in any wetland impacts are not practicable because such avoidance

would result in (Mark all that apply and explain):
 Substantial adverse impacts to adjacent homes, business or other improved properties;
 Substantially increased project costs;
 Unique engineering, traffic, maintenance, or safety problems;
 Substantial adverse social, economic, or environmental impacts, or
 The project not meeting the identified needs.

Measures to avoid, minimize, and mitigate wetland impacts need to be discussed in the remarks box.

Remarks: Based of the USFWS National Wetlands (NWI) review Inventory mapper on а (https://www.fws.gov/wetlands/data/Mapper.html), site visits on October 23 and 30, 2019 by BF&S, the USGS topographic map (Appendix B, page 3) and the RFI report (Appendix E), there are 12 wetlands mapped within the 0.5 search radius. There is one (1) palustrine wetland, located adjacent to the project area, at the northern terminus of the project area approximately 400 feet north of the 61st Avenue and Marcella Boulevard intersection.

A *Waters of the U.S. Determination/Wetland Delineation Report* was completed for the project on December 24, 2019 (Appendix F, pages 5 to 37). It was determined that one (1) wetland habitat (Wetland 1) was identified within the study area. The USACE makes all final determinations regarding jurisdiction.

Wetland 1

Wetland 1 was observed to be approximately 0.62 acre in size, bordered by Turkey Creek to the north and by steep slopes in all other directions. Wetland 1 is a palustrine, forested, broad-leaved deciduous, seasonally flooded wetland habitat. It is of poor quality due to the lack of biodiversity. A new stormwater outfall pipe will be constructed adjacent to this wetland (Appendix B, pages 4, and 26 to 29). The stormwater will be conveyed to Turkey Creek via an existing vegetated swale located between the project area and Turkey Creek. The outfall and associated riprap will be contained outside the limits of the wetland. Therefore, no impacts are expected.

Early Coordination

Early Coordination was sent to the USFWS on December 31, 2019, and the USACE and the IDNR on January 2, 2020 (Appendix C, pages 1 to 2).

The USACE responded on February 14, 2020, and did not make any comments pertinent to wetlands (Appendix C, pages 43 to 45).

The USFWS responded on January 28, 2020, and stated due to the proposed project having minor impacts on natural resources with no Federally endangered species known to be present, the U.S. Fish and Wildlife Service will not be providing a comment letter Appendix C, page 6).

The IDNR responded in a letter dated January 29, 2020, with recommendations to avoid or minimize impacts to wetlands (Appendix C, pages 7 to 8). Due to the presence or potential presence of wetland habitat on site, IDNR recommended contacting and coordinating with the IDEM 401 program and the USACE 404 program. Both agencies were contacted by the designer during the early coordination process, and their responses are included in Appendix C.

All applicable agency recommendations are included in the *Environmental Commitments* section of this CE document.

County _	LakeRoute61st Avenue/Marcella BoulevardDes. No.1902707						
Terrestrial Unique or H	Presence Impacts Habitat X X ligh Quality Habitat X X						
Use the rema	arks box to identify each type of habitat and the acres impacted (i.e. forested, grassland, farmland, lawn, etc).						
Remarks:	Based on a desktop review, a site visit on October 23 and 30, 2019 (see Appendix F, pages 1 to 4 for the Ecological Evaluation Form), the aerial map of the project area (Appendix B, page 4), the non-wetland terrestrial habitat within the project area consists primarily of mowed grass and ornamental plantings. A total of up to 0.68 acre of this habitat may be affected, including 0.22 acre in southwest quadrant of the project area, 0.24 acre in the southeast project area, and 0.03 acre in the northwest project area, and 0.19 acre in the northeast quadrant of the project area.						
	There are three (3) areas surrounding the project area that contain additional species. Along the west side of Marcella Boulevard, approximately 420 feet south of the 61 st Avenue/Marcella intersection there is an undeveloped field where teasel (<i>Dispacus fullonum</i>), goldenrod (<i>Solidago canadensis</i>), poison hemlock (<i>Conium maculatum</i>), and lady thumb (<i>Polygonum persicaria</i>) were observed. The proposed roadway will be adjacent to this area; however, this area will not be impacted by the project.						
	On the north side of 61 st Avenue, approximately 250 feet east of the 61 st Avenue/Marcella Boulevard intersection, there is a wooded habitat where the observed dominant species include box elder (<i>Acer negundo</i>), black walnut (<i>Juglans nigra</i>), mulberry (<i>Ulmus rubra</i>), goldenrod (<i>Solidago canadensis</i>), and grass (<i>Poa pratensis</i>).						
	The project is expected to impact a total of eight (8) trees due to the addition of sidewalks, including honey locust (<i>Gleditsia triacanthos</i>), common pear (<i>Pyrus communis</i>), eastern red cedar (<i>Juniperus virginiana</i>), Norway spruce (<i>Picea abies</i>), and silver maple (<i>Acer saccharinum</i>). Tree clearing will not occur between April 1 and September 30.						
	The habitats described above are not considered unique or high quality. Avoidance alternatives would not be practicable while still meeting the project purpose and need. Mitigation is not anticipated.						
	Early Coordination Early Coordination was sent to the USFWS on December 31, 2019, and the USACE and the IDNR on January 2, 2020.						
	The USACE responded on February 14, 2020, and did not include any comments regarding terrestrial habitats (Appendix C, pages 43 to 45).						
	The USFWS responded on January 28, 2020, and stated that because the proposed project will have minor impacts on natural resources, and no Federally endangered species are known to be present, the U.S. Fish and Wildlife Service will not be providing a comment letter (Appendix C, page 6).						
	The IDNR responded in a letter dated January 29, 2020, with recommendations to avoid or minimize impacts to terrestrial habitats (see Appendix C, pages 7 to 8), including the recommendation that no trees be cut that are suitable for Indiana bat or Northern long-eared bat (NLEB) roosting (greater than 3 inches diameter-at- breast height (dbh), living or dead, with loose hanging bark, or with cracks, crevices, or cavities) from April 1 through September 30. All applicable IDNR recommendations are included in the <i>Environmentat</i> <i>Commitments</i> section of this CE document.						

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Karst Is the pro Are karst	posed project located features located withir	within or adjao n or adjacent t	cent to the potential Karst Area of In o the footprint of the proposed proje	diana? ct?	Yes	No X X
	If yes, will the project i	impact any of t	these karst features?			

Use the remarks box to identify any karst features within the project area. (Karst investigation must comply with the Karst MOU, dated October 13, 1993)

Remarks: Based on a desktop review, the project is located outside the designated karst region of Indiana as outlined in the October 13, 1993 Memorandum of Understanding (MOU). According to the topo map of the project area (Appendix B, page 3), the RFI report (Appendix E), are no karst features identified within or adjacent to the project area. In the early coordination response, the Indiana Geological and Water Society's Survey (IGWS) did not indicate that karst features exist in the project area. The Environmental Assessment Report from the IGWS does indicate that there is high liquefaction potential, and a floodway within the project area. The IGWS report also indicated that the area also includes a high potential bedrock resource and a low potential sand and gravel resource. Lastly, the IGWS report indicates that there are no active or abandoned mineral resources extraction sites within the project area (see Appendix C, pages 9 to 11 for the IGWS report). These features will not be affected because maximum depth of excavation will be 10 feet. The response from IGWS has been communicated with the designer on January 3, 2020. No impacts are expected.



Remarks: Based on a desktop review and the RFI report (Appendix E), completed by BF&S on September 9, 2019, the IDNR Lake County Endangered, Threatened and Rare (ETR) Species List has been checked and is included in (Appendix E, pages 13 to 19). The highlighted species on the list reflect the federal and state identified ETR species located within the county. According to the IDNR early coordination response letter dated January 29, 2020 (Appendix C, pages 7 to 8), the Natural Heritage Program's Database has been checked and no plant or animal species listed as state or federally threatened, endangered, or rare have been reported to occur in the project vicinity.

Bats, Programmatic Informal Consultation - Not Likely to Adversely Affect

Project information was submitted through the USFWS's Information for Planning and Consultation (IPaC) portal, and an official species list was generated (Appendix C, pages 14 to 19). The project is within range of the federally endangered Indiana bat (*Myotis sodalis*) and the federally threatened NLEB (*Myotis septentrionalis*). No additional species were found within or adjacent to the project area other than the Indiana bat and northern long-eared bat.

The project qualifies for the *Range-wide Programmatic Informal Consultation for the Indiana bat and NLEB*, dated May 2016 (revised February 2018), between FHWA, Federal Railroad Administration (FRA), Federal Transit Administration (FTA), and USFWS. An effect determination key was completed on January 8, 2020, and based on the responses provided, the project was found to "*may affect, not likely to adversely affect*" the Indiana bat and/or the NLEB. INDOT reviewed and verified the effect finding on January 27, 2020 and requested USFWS's review of the finding (Appendix C, pages 20 to 34). No response was received from USFWS within the 14-day review period; therefore, it was concluded they concur with the finding. Avoidance and Mitigation Measures (AMMs) are included as firm commitments in the *Environmental*

This is page 16 of 35 Project name:

County Des. No. Lake Route 61st Avenue/Marcella Boulevard 1902707 Commitments section of this document. This precludes the need for further consultation on this project as required under Section 7 of the Endangered Species Act, as amended. If new information on endangered species at the site becomes available, or if project plans are changed, USFWS will be contacted for consultation. **SECTION B – OTHER RESOURCES** Impacts Presence **Drinking Water Resources** Yes No Wellhead Protection Area Public Water System(s) X Х Residential Well(s) Source Water Protection Area(s) Sole Source Aquifer (SSA) If a SSA is present, answer the following: Yes No Is the Project in the St. Joseph Aguifer System? Is the FHWA/EPA SSA MOU Applicable? Initial Groundwater Assessment Required? **Detailed Groundwater Assessment Required?** Remarks: **Sole Source Aquifer** The project is located in Lake County, which is not located within the area of the St. Joseph Sole Source Aquifer, the only legally designated sole source aquifer in the state of Indiana. Therefore, the FHWA/EPA Sole Source Aquifer Memorandum of Understanding (MOU) is not applicable to this project. Therefore, a detailed groundwater assessment is not needed, and no impacts are expected. Wellhead Protection Area and Source Water IDEM's Wellhead Proximity Determinator website (http://www.in.gov/idem/cleanwater/pages/wellhead/) was accessed on January 3, 2020 by BF&S. This project is not located within a Wellhead Protection Area or Source Water Area. No impacts are expected. Water Wells

The Indiana Department of Natural Resources Water Well Record Database website (<u>https://www.in.gov/dnr/water/3595.htm</u>) was accessed on January 6, 2020 by BF&S. The nearest well is mapped approximately 124 feet north of the project area. This well is outside the project area. Therefore, no impacts are expected. Should it be determined during the ROW that this well is affected, a cost to cure will likely be included in the appraisal to restore the wells.

Urban Area Boundary

Based on a desktop review of the INDOT MS4 website (<u>https://entapps.indot.in.gov/MS4/</u>) by BF&S on January 6, 2020. and the RFI report; this project is located in an Urban Area Boundary (UAB) location. An early coordination letter was sent to the MS4 Coordinator on January 3, 2020 by BF&S. The MS4 coordinator did not respond within the 30-day time frame.

Public Water System

Based on a desktop review, site visits on October 23 and 30, 2019 by BF&S, and the aerial map of the project area (Appendix B, page 4), this project is located where there is a public water system. If relocation is needed, services will be maintained with minimal shut down. An early coordination letter was sent to Indiana-American Water Company (IAWC) on June 11, 2019 (Appendix C, pages 46 to 47). IAWC

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responded on February 28, 2020, stating that they have a 16-inch watermain along 61st Avenue and a 12-inch watermain along Marcella Boulevard. Graphics provided by the utility show a possible conflict between the watermains and the project (Appendix C, pages 52 to 54). IAWC provided GIS mapping of their existing watermain locations within the vicinity of the project. (See the *Relocation of People, Businesses, & Farms* section of this CE Document for more information.)

	Presence	Impa	<u>cts</u>
Flood Plains		Yes	No
Longitudinal Encroachment			
Transverse Encroachment			
Project located within a regulated floodplain			
Homes located in floodplain within 1000' up/downstream from project			

Discuss impacts according to classification system described in the "Procedural Manual for Preparing Environmental Studies".

Remarks: The IDNR Indiana Floodway Information Portal website (<u>http://dnrmaps.dnr.in.gov/appsphp/fdms/</u>) was accessed on March 26, 2020 by BF&S. This project is not located in a regulatory floodplain as determined from approved IDNR floodplain maps (Appendix F, page 38). The northern terminus of the project (the storm sewer outfall) is located approximately 40 feet from the edge of the regulated flood plain. Therefore, it does not fall within the guidelines for the implementation of 23 CFR 650, 23 CFR 771, and 44 CFR. No impacts are expected.

The IDNR responded in a letter dated January 29, 2020, with recommendations to avoid or minimize impacts to terrestrial habitats (see Appendix C, pages 7 to 8), which may require formal approval for any proposal to construct, excavate, or fill in or on the floodway of Turkey Creek. Although an IDNR Construction in a Floodway (CIF) permit was stated as a possibility in the IDNR response, a CIF permit will not be required for this project due to the entire project, including the stormwater outfall, being located outside of the floodway boundary. No relocations of people, businesses, or farms will take place as a result of this project.

	Presence	Imp	acts
Farmland Agricultural Lands Prime Farmland (per NBCS)	X	Yes	No X
Total Points (from Section VII of CPA-106/AD-1006* */f 160 or greater, see CE Manual for guidance.	94		Α

See CE Manual for guidance to determine which NRCS form is appropriate for your project.

Remarks: Based on a desktop review, a site visit on October 23 and 30, 2019 by BF&S, the aerial map of the project area (Appendix B, page 4), there is land that meets the definition of farmland under the Farmland Protection Policy Act (FPPA) adjacent to the project area. The project will not convert any farmland for this project nor require and right-of-way acquisition from the farmland. An early coordination letter was sent on January 2, 2020, to Natural Resources Conservation Services (NRCS) (Appendix C, pages 1 to 2). During the early coordination process, it was indicated to the NRCS that up to 3.0 acres of farmland may be converted. However, the project will have a smaller footprint than originally anticipated. Therefore, no ROW from farmland will occur. Coordination with NRCS resulted in a score of 94 on the NRCS-CPA-106/AD 1006 Form (Appendix C, pages 12 to 13). NRCS's threshold score for significant impacts to farmland that result in the consideration of alternatives is 160. Since this project score is less than the threshold, no significant loss of prime, unique, statewide, or local important farmland will result from this project. No alternatives other than those previously discussed in this document will be investigated without reevaluating impacts to prime farmland.

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County	Lake	Route 61 ^s	Avenue/Marcella Boulevard	Des. No.	1902707
SECTION C	- CULTURAL RESOU	RCES			
Minor Projects F	A Clearance	Category T	ype INDOT Approva	I Dates	N/A] X
		Eligible and Resource	l/or Listed Present		
Results of Res	earch	Resource	<u>Tresent</u>		
Archaeology NRHP Buildings NRHP District(s NRHP Bridge(s)	s/Site(s)))				
Project Effect					
No Historic Prop	perties Affected X	No Adverse Documentatio	e Effect Adverse <u>n</u>	Effect	
Documentation	(mark all that apply)	<u>Prepared</u>	ES/FHWA Approval Date(s)	SHPO Approval Date(s)	
Historic Properti Historic Property Archaeological F Archaeological F	es Short Report / Report Records Check/ Review Phase la Survey Report	X	February 5, 2020	March 11, 2020	
Archaeological F Archaeological F Archaeological F APE, Eligibility a	Phase Ic Survey Report Phase II Investigation Rep Phase III Data Recovery and Effect Determination	ort	April 22, 2020	May 22, 2020	
Memorandum o	ntauon f Agreement (MOA)		MOA Signature Dates (Lis	st all signatories)	

Describe all efforts to document cultural resources, including a detailed summary of the Section 106 process, using the categories outlined in the remarks box. The completion of the Section 106 process requires that a Legal Notice be published in local newspapers. Please indicate the publication date, name of paper(s) and the comment period deadline. Likewise include any further Section 106 work which must be completed at a later date, such as mitigation or deep trenching.

Remarks:

Area of Potential Effect (APE)

The Area of Potential Effect (APE) includes the existing and proposed ROW, immediately adjacent properties, and those areas where a visual differentiation may occur between an existing structure and the project area. The APE is highly irregular, generally extending across the open farm fields to tree lines, properties, or changes in elevation which interrupt the viewsheds in an irregular cross shape around the intersection and approaches (Appendix D, page 1). The proposed alignment of the roundabout has been revised since completion of the Section 106 process, and is now closer to the existing intersection location. Therefore, the APE constitutes an adequate area to account for the project as currently proposed. Further coordination with the INDOT Cultural Resource Office (CRO) regarding the APE is not necessary.

Coordination with Consulting Parties

The Indiana State Historic Preservation Officer (SHPO) is considered an automatic consulting party. In addition, the following individuals/organizations were provided a copy of the Section 106 Early Coordination

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Consulting Party	Response
Indiana SHPO	January 8, 2020
Indiana Landmarks Northwest Field Office	No
Lake County Historian	No
Lake County Historical Society and Museum	No
Hobart Historical Society	No
Hobart Historic Preservation Commission	No
Northwestern Indiana Regional Planning	No
Commission	110
Lake County Commissioners	No
Lake County Highway Department	No
City of Hobart Mayor	No
Hobart City Council	No
Hobart Public Works Department	No
Eastern Shawnee Tribe of Oklahoma	No
Miami Tribe of Oklahoma	January 7, 2020
Peoria Tribe of Indians of Oklahoma	No
Pokagon Band of Potawatomi Indians	December 20, 201
Forest County Potawatomi Community	No

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Let

Route

The Pokagon Band of Potawatomi Indians by email on December 20, 2019 indicating they had determined there will be "No Historic Properties in Area of Potential Effect" and requesting contact if any archaeological resources are uncovered (Appendix D, page 22).

The Miami Tribe of Oklahoma responded on January 7, 2020 indicating they wished to be a consulting party and stating they had no objections to the proposed project but noted the project area is within the aboriginal homelands of the Miami Tribe (Appendix D, page 23).

The SHPO responded on January 8, 2020 stating, they did not know any additional consulting parties who should be contacted (Appendix D, pages 24 to 25).

No other responses to the December 16, 2019 early coordination letter were received.

Archaeology

County

Lake

A Phase Ia archaeological reconnaissance was conducted by 106 Consulting, LLC on January 31, 2020. The archaeologist did not locate any archaeological sites within the project area. No further work was recommended in the resulting archaeological short report (ASR; Appendix D, pages 9 to 13). INDOT-CRO approved the ASR on February 5, 2020, and the ASR was sent to consulting parties on February 6, 2020 (Appendix D, pages 26 to 28).

The SHPO concurred with the ASR on March 11, 2020, stating in part, "we have not identified any currently known archaeological resources listed in or eligible for inclusion in the NRHP within the proposed project area as indicated in the report; and we concur with the opinion of the archaeologist, as expressed in the Indiana archaeological short report that no further archaeological investigations appear necessary at the proposed project area..." (Appendix D, pages 32 to 33). The SHPO also requested additional information about the proposed ROW acquisition to ensure the archaeological investigation covered a sufficient area. Comparison of the approximately 5.3-acre project ROW centered around the intersection to the 13.6-acre archaeological study limits centered around the same intersection confirmed that the former is contained within the latter (Appendix D, pages 32 to 33). Therefore, no additional archaeological study is needed.

This is page 20 of 35 Project name:

County Des. No. Lake Route 61st Avenue/Marcella Boulevard 1902707

Historic Properties

A site visit was conducted by a Division of Historic Preservation and Archaeology (DHPA)-qualified professional with BF&S on November 25, 2019. Information from the site visit and research regarding historic resources were compiled into a Historic Property Report (HPR; BF&S, February 2, 2020, Appendix D, page 7). The HPR did not recommended any properties eligible for the National Register.

The HPR was approved by the INDOT-CRO on February 5, 2020. The HPR was distributed to SHPO and consulting parties on February 6, 2020 (Appendix D, pages 29 to 30).

The SHPO responded on March 11, 2020, stating, in part, "we agree with the conclusions of the historic property report that there are no above-ground properties listed in or eligible for inclusion in the National Register of Historic Places ("NRHP") within the area of potential effects," (Appendix D, pages 32 to 33).

Since the cultural resources coordination that occurred with INDOT CRO and SHPO, the overall project footprint has been reduced in size and shape. However, as the coordination covered an area that entirely covered and incorporated the current project area, no additional coordination has occurred with either INDOT CRO or SHPO. The current project area does not extend beyond the originally investigated and approved APE. Therefore, no additional coordination was deemed necessary at this time.

Documentation Finding

INDOT, acting on FHWA's behalf, approved an 800.11(d) finding of "No historic properties affected" finding on April 22, 2020. The INDOT-approved finding was forwarded to consulting parties on the same day (Appendix D, pages 2 to 4). SHPO concurred with the finding in a letter dated May 22, 2020 (Appendix D, pages 34 to 35).

Public Involvement

A public notice regarding the APE and "No Historic Properties Affected" finding was published in The Times (serving northwest Indiana) on April 27, 2020 (Appendix D, page 36). No public comments were received by the established 30-day deadline date of May 27, 2020. Therefore, the Section 106 process has been completed and the FHWA's Section 106 responsibilities have been fulfilled.

SECTION D – SECTION 4(f) RESOURCES/ SECTION 6(f) RESOURCES

Section 4(f) Involvement (mark all that apply)



This is page 21 of 35 Project name:

County	Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707
Wildlife Nat Nat Sta Sta	& Waterfowl Refuges tional Wildlife Refuge tional Natural Landmark te Wildlife Area te Nature Preserve		Presence	Yes No	
	Programmatic Section 4(f)* "De minimis" Impact* Individual Section 4(f)		Evaluations Prepared	FHWA Approval date	
Historio Site	c Properties es eligible and/or listed on the	NRHP	Presence	<u>Use</u> Yes No	
	Programmatic Section 4(f)* "De minimis" Impact* Individual Section 4(f)		Evaluations Prepared	<u>FHWA</u> Approval date	
*FHWA a evaluatio	approval of the environmental n(s) discussed below.	document a	lso serves as approval of any Se	ection 4f Programma	tic and/or De minimis
Discuss	Programmatic Section 4(f) ar	nd "de minim	is" Section 4(f) impacts in the rea	marks box below. I	ndividual Section 4(f)

Discuss Programmatic Section 4(f) and "de minimis" Section 4(f) impacts in the remarks box below. Individual Section 4(f) documentation must be separate Draft and Final documents. For further discussions on Programmatic, "de minimis" and Individual Section 4(f) evaluations please refer to the "Procedural Manual for the Preparation of Environmental Studies". Discuss proposed alternatives that satisfy the requirements of Section 4(f).

Remarks: Section 4(f) of the U.S. Department of Transportation Act of 1966 prohibits the use of certain public and historic lands for federally funded transportation facilities unless there is no feasible and prudent alternative. The law applies to significant publicly owned parks, recreation areas, wildlife / waterfowl refuges, and NRHP eligible or listed historic properties regardless of ownership. Lands subject to this law are considered Section 4(f) resources.

Based on a desktop review, site visits on October 23 and 30, 2019 by BF&S, the aerial map of the project area (Appendix B, page 4), the Section 106 "No Historic Properties Affected" finding, and the RFI report (Appendix E) there are three (3) Section 4(f) resources located within the 0.5 mile search radius. There are no Section 4(f) resources within or adjacent to the project area. Therefore, no use is expected.

Section 6(f) Involvement	Presence	U	se
		Yes	No
Section 6(f) Property			

Discuss proposed alternatives that satisfy the requirements of Section 6(f). Discuss any Section 6(f) involvement.

Remarks:	The U.S. Land and Water Conservation Fund Act of 1965 established the Land and Water Conservation
	Fund (LWCF), which was created to preserve, develop, and assure accessibility to outdoor recreation
	resources. Section 6(f) of this Act prohibits conversion of lands purchased with LWCF monies to a non-
	recreation use.

This is page 22 of 35 Project name: 61 st Avenue/Marcella Blvd. Intersection Improvement	Date:	January 13, 2022
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County	Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707
	A review of 6 https://www.in.gov/in 2). None of these primpacts to 6(f) resource	(f) propert dot/2523.htm operties are loces as a result	ies on the INDOT's Envi revealed a total of 56 properties in ocated within or adjacent to the pro of this project.	ironmental Policy Lake County (Appe ject area. Therefore	webpage at ndix I, pages 1 to , there will be no
SECTION	E – Air Quality				
<u>Air C</u> Cor Is th If YI Lev Lev	Auality formity Status of the ne project in an air quality ES, then: Is the project in the most Is the project exempt from Is the project is NOT examples Is the project in the Is a hot spot analysis el of MSAT Analysis reconstruction El 1a X Level 1b	Project ty non-attainn of current MP(of conformity empt from con Transportatio is required (C quired?	nent or maintenance area? D TIP? ? nformity, then: n Plan (TP)? O/PM)? Level 3 Level 4	Yes No X X X X X X Level 5	
Remarks:	<u>STIP/TIP</u> This project is in Commission (NIRP INDOT Statewide 7 to 4). Attainment Status	cluded in th C) Transporta Transportatior	e Fiscal Year (FY) 2020-2024 N ation Improvement Program (TIP), A Improvement Program (STIP), Am	Northern Indiana R Amendment 20-07, a endment 20-25 (Apj	egional Planning nd the 2020-2024 bendix H, pages 1
	This project is locat 2015 8-Hour Ozono project's design con and the Transportat (SIP). Therefore, the <u>MSAT</u> This project is of a exempt under the C Toxics analysis is n	ed in Hobart e Standard (0 neept and sec ion Improver e conformity a type qualify lean Air Act ot required.	Township in Lake County, which is .070 ppm) according to the EPA (hope are accurately reflected in both nent Program (TIP) and both confor requirements of 40 CFR 93 have been ving as a categorical exclusion (Gra conformity rule under 40 CFR 93.1	s currently in a Non- https://www.epa.gov/ the NIRPC Transpo- form to the State Imp in met. pup 1) under 23 CF 26, and as such, a N	attainment for the green-book). The ritation Plan (TP) elementation Plan FR 771.117(c), or fobile Source Air
SECTION	F - NOISE				
Noise Is a noise ar	nalysis required in accor	dance with F	HWA regulations and INDOT's traffic	Y noise policy?	es No
ES Review	of Noise Analysis	No	Yes/ Date		
Remarks:	This project is a Type this action does not re	e III project. I quire a forma	n accordance with 23 CFR 772 and l noise analysis.	the INDOT Traffic	Noise Policy,
This is page	23 of 35 Project nan	ne: 61 st	Avenue/Marcella Blvd. Intersection Imp	rovement Date:	January 13, 2022

Yes

Х

Х

X

No

X X

County	Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707

SECTION G – COMMUNITY IMPACTS

Regional, Community & Neighborhood Factors

Will the proposed action comply with the local/regional development patterns for the area?
Will the proposed action result in substantial impacts to community cohesion?
Will the proposed action result in substantial impacts to local tax base or property values?
Will construction activities impact community events (festivals, fairs, etc.)?
Does the community have an approved transition plan?
If No, are steps being made to advance the community's transition plan?
Does the project comply with the transition plan? (explain in the remarks box)

Remarks: This project is not of regional significance and will not have a significant impact on community cohesion or property values. The City of Hobart's Event website was reviewed on October 4, 2021 by BF&S (<u>https://www.cityofhobart.org/index.aspx?nid=201/</u>) and it does not appear that any community events will be disrupted by the proposed project. No increase in local taxes will occur as a result of this project since all funds will come from the FHWA and established local accounts. The project does not divide a community or destroy any areas where the community hosts events.

The project will not change the land use or greatly affect the view shed of the area. Further, this project will provide a safe and improved structure allowing for continued mobility for motorists. Therefore, this project is not anticipated to have any substantial negative indirect or cumulative impacts to the area. The City of Hobart adopted an ADA transition plan, and this project will comply with ADA Transition Plan because all curb ramps installed as a part of this project will comply with ADA Accessibility standards.

A detour route that is approximately 4.2 miles (adding 3.2 miles to a through trip) will be instituted during the construction of the project and be coordinated with all emergency services such as police, fire, medical, etc. The detour will utilize Mississippi Street, 69th Avenue, and Colorado Street. The project sponsor will install signs at least two (2) weeks in advance of the project alerting motorists of the future detour and they will send notification at least two (2) weeks in advance of the project to the schools, police, fire, and emergency services in the area explaining the project and the MOT. There will be no permanent adverse effect to the established community.

	Yes	No
Indirect and Cumulative Impacts		
Will the proposed action result in substantial indirect or cumulative impacts?		Χ

Remarks: Indirect impacts are effects which are caused by the action and are later in time or farther removed in distance, but are still reasonably foreseeable. Indirect effects may include growth inducing effects and other effects related to induced changes in the pattern of land use, population density, or growth rate. Cumulative impacts affect the environment which result from the incremental impact of the action when added to other past, present, and reasonably foreseeable future actions regardless of what agency or person undertakes such actions.

The project will be constructed in an urban environment and will not alter local development patterns near the project area. It is not anticipated that the proposed project will result in substantial impacts to community cohesion, property values, or community events. The project will not restrict or prevent any future local development projects. The City of Hobart Chamber of Commerce website was reviewed on October 4, 2021 by BF&S (<u>https://www.cityofhobart.org/index.aspx?nid=201/</u>) and it does not appear that any community events will be disrupted by the proposed project. The project will not change the general land use of the area. The project will improve the flow of traffic at the 61st Avenue/Marcella intersection. Sidewalks will be replaced/installed providing ADA-compliant pedestrian facilities along the roadway.

This is page 24 of 35 Project name:

Indiana Department of Transportation									
County _	Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707				
Public Fac Will the pro private utilit and bicycle	ilities & Services posed action result in s ies, emergency service facilities? <i>Discuss ho</i>	substantial impa es, religious inst w the maintenal	acts on health and educational faciliti titutions, airports, public transportatic nce of traffic will affect public facilitie	es, public and [on or pedestrian s and services.	Yes No				
Remarks:	Based on a desktop review, site visits on October 23 and 30, 2019 by BF&S, the aerial map of the project area (Appendix B, page 4) and the RFI report (Appendix E) there are five (5) pipeline segments, three (3) recreational areas, one (1) trail segment, one (1) school, and three (3) managed lands located within the 0.5 mile of the project. There is one pipeline segment, a Marathon gas pipeline, that intersects the project area. There is a Marathon Gas Pipeline that runs along the south side of 61 st Avenue. The project designer intends to avoid relocation of the pipeline. However, coordination with the utility is ongoing to determine if relocation is necessary. See the "Relocation of People, Businesses, and Farms" section of this CE document for more information on utilities.								
	and will likely be in be responsible for oject. Relocation will he project has been document for more								
	Any other conflicts with utilities will co	with existing ut ntinue througho	ilities will continue to be identified out the project.	during the design	phase. Coordination				
	Early Coordination Early coordination letters were sent on December 31, 2019 to Hobart City Council, Hobart Director of Public Works, and the Hobart MS4 Coordinator (Appendix C, pages 1 to 2). Hobart officials did not respond to the early coordination letter.								
	A detour route will be provided during the construction of the project and be coordinated with all emergency services such as fire, police, medical, etc. (Appendix B, page 31). The project sponsor will install signs at least two (2) weeks in advance of the project alerting motorists of the future detour. The project sponsor will send notification two (2) weeks in advance to schools, police, fire, and emergency services in the area explaining the project and the MOT. These services will have full access to the road during construction activities and the detour route will be available to reduce or prevent impacts upon the public facilities and services. There will be no permanent adverse effect to the established community.								
	It is the responsibil two weeks prior to a	ity of the proje	ct sponsor to notify school corpora a that would block or limit access.	tions and emerge	ncy services at least				
Environme During the o Does the pr	two weeks prior to any construction that would block or limit access. Environmental Justice (EJ) (Presidential EO 12898) During the development of the project were EJ issues identified? Does the project require an EJ analysis?								

If YES, then:

Are any EJ populations located within the project area? Will the project result in adversely high or disproportionate impacts to EJ populations?

Remarks: Under FHWA Order 6640.23A, FHWA and the project sponsor, as a recipient of funding from FHWA, are responsible to ensure that their programs, policies, and activities do not have a disproportionately high and adverse effect on minority or low-income populations. Per the current INDOT Categorical Exclusion

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County

Route

Lake

e 61st Avenue/Marcella Boulevard

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Des. No.

Manual, an Environmental Justice (EJ) Analysis is required for any project that has two or more relocations or 0.5 acre of additional permanent right-of-way. The project will require more than 1.00 acre of permanent ROW acquisition. Therefore, an EJ Analysis is required.

Potential EJ impacts are detected by locating minority and low-income populations relative to a reference population to determine if populations of EJ concern exists and whether there could be disproportionately high and adverse impacts to them. The reference population may be a county, city or town and is called the community of comparison (COC). In this project, the COC includes Hobart and Ross Townships. The community that overlaps the project area is called the affected community (AC). In this project, the AC is Census Tract 422 and Census Tract 423. An AC has a population of concern for EJ if the population is more than 50% minority or low-income or if the low-income or minority population is 125% of the COC. Data from the American Community Survey 5-Year Estimates from 2013 to 2017 was obtained from the US Census Bureau Website (https://data.census.gov/cedsci/?g=0100000US&tid=ACSDP1Y2018.DP05) on February 16, 2020 by BF&S. The data collected for minority and low-income populations within the AC are summarized in the below table.

Table: Minority and Low-Income Data									
(American Community Survey, 5-year Estimates, 2013-2017)									
	COC – Hobart &	AC-1	AC-2						
	Ross Townships,	Census Tract 422	Census Tract 423						
	Lake County, Indiana								
Percent Minority	41.3%	24.7%	35.3%						
125% of COC	51.6%								
EJ Population of		No	No						
Concern		INO	INO						
Percent Low-Income	13.6%	5.2%	8.7%						
125% of COC	17.0%								
EJ Population of		No	No						
Concern		110	190						

AC-1, Census Tract 422 has a percent minority of 24.7% which is below 50% and is below the 125% COC threshold.

AC-2, Census Tract 423 has a percent minority of 35.3% which is below 50% and is below the 125% COC threshold. Therefore, both ACs do not contain minority populations of EJ concern.

AC-1, Census Tract 422 has a percent low-income of 5.2% which is below 50% and is below the 125% COC threshold.

AC-2, Census Tract 423 has a percent low-income of 8.7% which is below 50% and is below the 125% COC threshold. Therefore, both ACs do not contain low-income populations of EJ concern.

Conclusion

The census data sheets, map, and calculations can be found in Appendix I, pages 3 to 12. No further environmental justice analysis is warranted.

County	Lake	Route	61st Avenue/Marc	ella Boul	levard	Des. No		1902707	
Relocation o	Yes	Νο							
Will the proposed action result in the relocation of people, businesses or farms? Is a Business Information Survey (BIS) required? Is a Conceptual Stage Relocation Study (CSRS) required? Has utility relocation coordination been initiated for this project?							X	X X X	
Number of rel	locations: Resid	ences: 0	Businesses:	0	Farms:	0 0	Other:	0	

If a BIS or CSRS is required, discuss the results in the remarks box.

Remarks: During the Section 106 process, one potential commercial property relocation was being considered; however, as a result of additional plan development, it was determined that relocation of the property could be avoided.

Early Coordination

Early coordination letters were sent on June 11, 2019 to Buckeye Partners, Comcast Cable, TransCanada, Frontier Communications, Hobart Utilities, IAWC, Marathon Pipeline, LLC., MCI/Verizon, Merrillville Conservancy District, Merrillville Utilities, and NIPSCO Gas & Electric (Appendix C, pages 46 to 47).

TransCanada and Hobart Utilities did not respond.

MCI/Verizon, Merrillville Utilities, Buckeye responded stating that their respective companies had no utilities within the project area while Frontier, Merrillville Conservancy District, Marathon, Comcast Cable, IAWC, and NIPSCO Gas & Electric responded affirmatively that they had utilities within the project area, respectively. Due to the location of the utilities, relocations are anticipated for these utilities, except for the Marathon Pipeline.

Additional coordination with Comcast on February 7, 2020 identified that stating that they have overhead and underground utilities in conflict with the project (Appendix C, pages 48).

NIPSCO Gas & Electric responded on February 7, 2020, stating that they had gas mains that run east and west of Marcella Boulevard as well as abandoned gas lines along the north side 61st Avenue (Appendix C, pages 49 to 51).

IAWC responded on February 28, 2020, stating that they have a watermain in conflict with the project. In a previous response, IAWC 2019 stated that there is an existing 16-inch main along 61st Avenue and a 12-inch main along Marcella Boulevard. IAWC provided GIS mapping of their existing watermain locations within the vicinity of the project (Appendix C, pages 52 to 54).

Marathon Pipe Line, LLC. Responded on July 7, 2020, stating that they had a pipeline that ran south of 61st Avenue. Currently, the designer intends to work around the pipe; however, if relocation becomes necessary, the utility will be responsible for relocating the pipe, which would be a reimbursable expense.

While working around the gas pipeline, a 24-inch buffer, the "tolerance zone", will require hand digging. Heavy Equipment will not be operated over any section of the pipeline. Heavy equipment that must cross the pipeline will cross as near perpendicular as possible to the pipeline. No power digging will be performed within 50 feet of the side of pipeline unless a Marathon Pipe Line representative is present. All excavation work will comply with OSHA's excavation standards outlined in 29 CFR 1926.

No ripping of soil greater than 16 inches deep will occur until the exact position of the pipeline is known and not within three feet of the outer edge of any pipeline.

If a Marathon Pipe Line LLC pipeline is accidentally hit during excavation, work will be stopped immediately, and MPL's toll-free emergency phone number (1-833-675-1234) will be called and the location

County Lake Note 61 st Avenue/Marcella Boulevard Des. No. 1902/0/	County	Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707
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reported. Even a minor gouge, scrape, dent or crease to the pipeline or the coating may cause a future problem. An MPL representative will travel to the work site, inspect the pipeline and determine if any repairs are necessary.

If signs of a leak are detected or suspected, (i.e., a pool of liquid on the ground, a rainbow sheen on water, bubbling in wet or flooded areas, a dense white cloud or fog, discolored or dead vegetation, dirt or water being blown in the air, an unusual hissing or roaring noise, an unusual odor such as gasoline, oil, sulfur or a rotten egg smell), Marathon Pipe Line's toll-free emergency phone number (1-833-675-1234) will be called and the location reported immediately.

The utility companies will be responsible for completing a relocation plan and relocating any of their utilities in conflict with the project prior to the start of construction. To minimize disruption of services, it is anticipated that each utility will place and connect new utility lines in a new location within the proposed ROW to be acquired for the project before removing the existing lines that are in conflict with the project.

The designer will coordinate with Frontier, Merrillville Conservancy District, Comcast Cable, IAWC, and NIPSCO Gas & Electric throughout the project to address possible relocations. All applicable recommendations are included in the Environmental Commitments section of this CE document. Additional environmental documentation will be necessary if any utility conflicts result in a change in project scope or permanent or temporary ROW acquisition.

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SECTION H – HAZARDOUS MATERIALS & REGULATED SUBSTANCES

Documentation Hazardous Materials & Regulated Substances (Mark all that apply) **Red Flag Investigation** Phase I Environmental Site Assessment (Phase I ESA) Phase II Environmental Site Assessment (Phase II ESA) Design/Specifications for Remediation required? Yes/ Date No **ES Review of Investigations** Х

Include a summary of findings for each investigation.

Remarks: The RFI (see Appendix E) was completed on September 9, 2019 by BF&S. The RFI identified one (1) RCRA Generator/TSD site, three (3) underground storage tank sites, one (1) institutional control site, three (3) NPDES facilities, one (1) NPDES pipe, and six (6) leaking underground storage (LUST) sites mapped within 0.5 mile of the project area. Sites found within or adjacent to the project area include: one (1) institutional control site, two (2) UST sites, and five (5) LUST Sites.

Institutional Control Sites

The institutional control site, Speedway 6672, 4732 West 61st Avenue, Hobart, Indiana 46342, is located adjacent to the project area. An Environmental Restrictive Covenant (ERC) was placed on the property on April 2, 2013. The ERC specifically prohibits the use of groundwater and states that any removal, excavation, or disturbance of soil from the Real Estate must be conducted in accordance with all applicable requirements of IOSHA/OSHA, and soil that is removed, excavated or disturbed from the Real Estate must be managed and disposed of in accordance with all applicable federal and state laws and regulations. The project does not involve excavation or soil disturbance on the limits of this property. No impacts with regards to the ERC is expected. Coordination occurred with IDEM Petroleum Branch on September 11, 2020 (Appendix C, pages 55 to 58). If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release are observed (odors, staining, free product, sheen on water surface, etc.), IDEM will be contacted within 24

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Route 61st Avenue/Marcella Boulevard

1902707

Des. No.

hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.

UST Sites

Lake

Maris and Son Roofing Inc., 4400 West 61st Avenue, Hobart, Indiana 46342, is located adjacent to the project area. According to documents found on the IDEM Virtual File Cabinet (VFC), Maris and Sons Roofing submitted a closure request dated September 8, 1999 for one (1) 2,000 gallon underground tank which previously held gasoline, and for one (1) 2,000 gallon underground tank which previously held gasoline, and for one (1) 2,000 gallon underground tank which previously held diesel fuel. A letter from IDEM to Maris and Sons Roofing Inc., dated March 28, 2017, indicates that closure information for the two USTs is incomplete. The project will require a maximum excavation depth of 10 feet below ground surface across the southern limits of this property due to storm sewer system installation. BF&S Inc. coordinated with IDEM's Petroleum Branch regarding this site on September 11, 2020 (Appendix C, pages 57 to 60), which resulted in the following project commitment: If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release are observed (odors, staining, free product, sheen on water surface, etc.), IDEM must be contacted within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.

Thornton 303, 4717 West 61st Avenue, Hobart, Indiana 46342, is located adjacent to the project area. According to documents found in the IDEM VFC, this site has one (1) 20,000 gallon tank and one (1) 12,000 gallon tank holding gasoline, one (1) 12,000 tank holding E85, one (1) 6,000 gallon tank holding diesel, and one (1) 6,000 gallon tank holding K-1. While violations were noted during the inspection on May 4, 2017, a Return to Compliance Letter was issued on September 5, 2017. The project will require a maximum excavation depth of 2 feet across the western and northern sides of the property. No impact related to hazardous material concerns is expected.

LUST Sites

Speedway 6672, 4732 West 61st Avenue, Hobart, Indiana 46342, is located adjacent to the project area. According to documents found on the IDEM VFC, IDEM issued a No Further Action (NFA) Approval Determination Pursuant to Risk Integrated System of Closure (RISC) on August 5, 2013. Low levels of soil and groundwater contamination remain on the site. An ERC was placed on the property on March 21, 2013. The ERC specifically prohibits the use of groundwater and states that removal, excavation, or disturbance of soil from the property must be conducted in accordance with all applicable requirements of IOSHA/OSHA. Soil that is removed, excavated, or disturbed from the property must be managed and disposed of in accordance with all applicable federal and state laws and regulations. Additional coordination occurred with IDEM Petroleum Branch on September 11, 2020 (Appendix C, pages 55 to 58). If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release are observed (odors, staining, free product, sheen on water surface, etc.), IDEM will be contacted within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.

One Stop 238, 4716 West 61st Avenue, Hobart, Indiana, 46342, is adjacent to the project area. Two (2) points on the Hazardous Materials Map are associated with this location. According to documents found on the IDEM VFC, one (1) LUST Site is associated with this AI#. IDEM issued a NFA Determination Approval Pursuant to RISC Guidance on May 2, 2014. The Approval of NFA Status letter states that IDEM must be notified prior to excavation at this site. The project will require a maximum excavation depth of 10 feet across the southern and eastern sides of the property for storm sewer system installation. BF&S Inc. coordinated with IDEM's Petroleum Branch regarding this site on September 11, 2020, which resulted in the following project commitment (Appendix C, pages 55 to 58). If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release are observed (odors, staining, free product, sheen on water surface, etc.), IDEM must be contacted within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.

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Lake

Route 61st Avenue/Marcella Boulevard Des. No.

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Speedway/Sm #7575, 4733 West 61st Avenue, Hobart, Indiana, 46342, is located adjacent to the project area. According to documents found on the IDEM's VFC, IDEM issued an NFA Determination Pursuant to Remediation Closure Guide on March 15, 2018. The NFA Determination is based on unconditional closure for soil, groundwater, and vapor intrusion exposure. The project does not involve excavation or soil disturbance on the limits of this property. Additional coordination on this site between BF&S Inc. and IDEM's Petroleum Branch took place on September 11, 2020, which resulted in the following project commitment (Appendix C, pages 55 to 58). If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release are observed (odors, staining, free product, sheen on water surface, etc.), IDEM must be contacted within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.

Shaver Motors Inc., 1550 East 61st Avenue, Merrillville, Indiana, 46410, is located adjacent to the project area. According to documents found on the IDEM's VFC, IDEM issued a NFA Determination Pursuant to Remediation Closure Guide on March 30, 2016. Low levels of contamination exist in the area. The project does not involve excavation or soil disturbance on the limits of this property. Additional coordination on this site between BF&S Inc. and IDEM's Petroleum Branch took place on September 11, 2020, which resulted in the following project commitment (Appendix C, pages 55 to 58). If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release are observed (odors, staining, free product, sheen on water surface, etc.), IDEM must be contacted within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.

Amoco Ss 00554, 4720 West 61st Avenue, Hobart, Indiana 46342, is located adjacent to the project area. IDEM issued an Approval of NFA Status Letter pursuant to the 1994 IDEM Guidance on August 31, 2005. The Approval of NFA Status letter states that if construction activities occur on the site in areas where residual contamination remains, IDEM must be notified. Additional coordination on this site between BF&S Inc. and IDEM's Petroleum Branch took place on September 11, 2020, which resulted in the following project commitment (Appendix C, pages 55 to 58). If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release are observed (odors, staining, free product, sheen on water surface, etc.), IDEM must be contacted within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.

If a release is suspected or indicators that suggest a release are observed (odors, staining, free product, sheen on water surface, etc.), IDEM must be contacted within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point. If contamination is encountered, the material will be removed, transported, and disposed of properly in accordance with federal, state, and local guidance. Workers will be provided appropriate personal protective equipment (PPE) based on the particular types of contaminants present on site. All applicable IDEM recommendations are included in the *Environmental Commitments* section of this CE document.

		manunu	Department of Transport		
County	Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707
SECTION I	- PERMITS CHECKLI	ST			
Permits (ma	rk all that apply)		Likely Required		
Army Corps Indiv Natio Regi Pre- Othe Wetl Strea	of Engineers (404/Section idual Permit (IP) onwide Permit (NWP) onal General Permit (RGF Construction Notification (I er and Mitigation required am Mitigation required	on 10 Perm ?) PCN)	it)		
Sect Isola Rule Othe Weti Stre	ion 401 WQC ted Wetlands determinatio 5 er and Mitigation required am Mitigation required	on			
IDNR Con: Navi Lake Othe Mitig	struction in a Floodway gable Waterway Permit Preservation Permit r ation Required				
OS Coast G Others (Ple	uard Section 9 Bridge Pe ase discuss in the remai	ermit 'ks box bel	ow)		
Othe Mitig US Coast G Others (Ple Remarks:	ation Required uard Section 9 Bridge Pe ase discuss in the remain The area of disturbance f	ermit ks box be	low) ect is greater than one (1) acre; there	efore, a Rule 5 pern	nit is anticipat

As the entire project, including the stormwater outfall, is outside of the regulated floodway boundary, an IDNR Construction in a Floodway Permit will not be necessary.

Applicable recommendations provided by the USACE, and the IDNR are included in the *Environmental Commitments* section of this document. If permits are found to be necessary, the conditions of the permit will be requirements of the project and will supersede these recommendations.

It is the responsibility of the project sponsor to identify and obtain all required permits.

SECTION J- ENVIRONMENTAL COMMITMENTS

The following information should be provided below: List all commitments, name of agency/organization requesting the commitment(s), and indicating which are firm and which are for further consideration. The commitments should be numbered.

Remarks: FIRM COMMITMENTS

- 1. It is the responsibility of the project sponsor, City of Hobart, to notify school corporations and emergency services at least two (2) weeks prior to any construction that would block or limit access. (INDOT ESD)
- 2. If the scope of work changes or permanent and/or temporary rights-of-way amounts change, the INDOT- Environmental Services will be contacted immediately. (INDOT ESD and INDOT LaPorte District)

 This is page 31 of 35
 Project name:
 61st Avenue/Marcella Blvd. Intersection Improvement
 Date:
 January 13, 2022

County		Lake	Route	61 st Avenue/Marcella Bouleva	rd Des. No.	1902707
	3.	General AMM presumed bat h commitments, i	1: Ensure a abitat are av ncluding all	ll operators, employees, and ware of all FHWA/FRA/FTA applicable AMMs. (USFWS)	contractors working in a A (Transportation Agence)	areas of known or les) environmental
	4.	Lighting AMM (USFWS)	1: Direct to	emporary lighting away from	n suitable habitat during	the active season.
	5.	Lighting AMM facing, full cut- transportation a be as close to practicable. (US	2: When i off lens lig gencies usir 0 for all the SFWS)	nstalling new or replacing on hts (with same intensity or l ag the BUG system develope were ratings with a priority of	existing permanent light less for replacement light d by the Illuminating En f "uplight" of 0 and "bac	s, use downward- ting); or for those gineering Society, cklight" as low as
	6.	Tree Removal alignments) to a	AMM 1: Navoid tree re	Modify all phases/aspects of moval. (USFWS)	f the project (e.g. temp	orary work areas,
	7.	Tree Removal , when bats are r time of year roosting/foragin bats observed. (AMM 2: Ap not likely to within 100 ng habitat on USFWS, ID	pply time of year restrictions be present, or limit tree remo- feet of existing road/ re- travel corridors; visual eme NR)	(October 1 to March 30 oval to 10 or fewer trees ail surface and outside orgence survey must be o) for tree removal per project at any e of documented conducted with no
	8.	Tree Removal A that contractors colored flagging (USFWS)	AMM 3: En understand g/fencing pr	sure tree removal is limited t clearing limits and how they for to any tree clearing to ens	o that specified in projec are marked in the field sure contractors stay with	t plans and ensure (e.g., install bright in clearing limits).
	9.	Tree Removal suitable for roos of year. (USFW	AMM 4: D sting, or tree (S)	to not remove documented s within 0.25 miles of roosts,	Indiana bat or NLEB ro or documented foraging	oosts that are still habitat at any time
	10.	If excavation of Hobart, Indiana necessary. If a r product, sheen Remediation Se take at that poin	ccurs at or c 46342, pro release is sus on water sur ection can a at. (IDEM)	on the property of Maris and per handling, removal, and constructed or indicators that sugge face, etc.), contact IDEM with dvise on any additional steps	Son Roofing Inc., 4400 disposal of soil and/or gr gest a release observed (o thin 24 hours of discover the UST Owner or Ope	West 61 st Avenue, oundwater will be dors, staining, free y. The Petroleum rator may need to
	11.	If excavation of Indiana 46342, If a release is si sheen on water discovery. The or Operator may	proper hand proper hand uspected or r surface, e Petroleum i y need to tak	on the property of Speedwa ling, removal and disposal of indicators that suggest a rele- tc.) when working near this Remediation Section can adv te at that point. (IDEM)	ay 6672, 4732 West 61 ^s f soil and/or groundwater ase observed (odors, stai s site, contact IDEM w ise on any additional step	Avenue, Hobart, will be necessary. ning, free product, ithin 24 hours of os the UST Owner
	12.	If excavation oc 46342, proper l release is susper on water surfac Section can adv point. (IDEM)	ceurs at or or handling, re- cted or indic ce, etc.), con vise on any	n the property of One Stop 23 moval, and disposal of soil a ators that suggest a release of tact IDEM within 24 hours additional steps the UST Ov	38, 4716 West 61 st Avenu and/or groundwater will oserved (odors, staining, f of discovery. The Petro wner or Operator may no	e, Hobart, Indiana be necessary. If a ree product, sheen leum Remediation eed to take at that

 This is page 32 of 35
 Project name:
 61st Avenue/Marcella Blvd. Intersection Improvement
 Date:
 January 13, 2022

County		Lake	Route	61st Avenue/Ma	arcella Boulevard	Des. No.	1902707
	13.	If excavation Indiana, 463 necessary. If product, shee Remediation take at that p	occurs at or 6 42, proper 1 a release is su on on water su Section can a point. (IDEM)	on the property of nandling, remov ispected or indic urface, etc.), con- advise on any ac	of Speedway/Sm # al, and disposal ators that suggest a tact IDEM within 2 dditional steps the	7575, 4733 West 61 of soil and/or gro release observed (o 24 hours of discover UST Owner or Ope	st Avenue, Hobart, undwater will be dors, staining, free ry. The Petroleum erator may need to
	14.	If excavation Merrillville, be necessary free product, Petroleum Re need to take a	n occurs at Indiana, 4641 If a release i sheen on w emediation Se at that point.	or on the prop 0, proper handlin s suspected or in ater surface, etc ction can advise (IDEM)	erty of Shaver M ng, removal, and di adicators that sugge c.), contact IDEM on any additional s	lotors Inc., 1550 sposal of soil and/o est a release observe within 24 hours o steps the UST Owne	East 61 st Avenue, r groundwater will ed (odors, staining, f discovery. The er or Operator may
	15.	If excavation Indiana 4634 If a release is sheen on wa Remediation take at that po	a occurs at or 2, proper hand s suspected of ater surface, Section can a point. (IDEM)	on the property dling, removal, a indicators that etc.), contact I advise on any ac	y of Amoco Ss 00 and disposal of soil suggest a release of DEM within 24 h Iditional steps the	554, 4720 West 61 and/or groundwater bserved (odors, stai nours of discovery UST Owner or Ope	st Avenue, Hobart, will be necessary. ning, free product, The Petroleum erator may need to
	16.	If excavation 46342, proper release is sus on water sur Section can point. (IDEM	occurs at or o r handling, ro pected or indi face, etc.), co advise on any	on the property o emoval, and disp cators that sugge ontact IDEM wit additional step	f Thornton 303, 47 posal of soil and/o est a release observe thin 24 hours of di s the UST Owner	17 East 61st Avenue r groundwater will ed (odors, staining, iscovery. The Petro or Operator may n	e, Hobart, Indiana be necessary. If a free product, sheen leum Remediation eed to take at that
	17.	If contaminat in accordance protective eq LaPorte)	ion is encoun e with federal uipment (PPE	tered, the materi , state, and local) based on the p	al will be removed, guidance. Workers articular types of co	, transported, and di s will be provided ap ontaminants present	sposed of properly propriate personal on site. (INDOT-
	18.	The contract construction INDOT ESD	tor will be as needed. A immediately.	responsible for Any changes in j (INDOT)	coordination with project scope right	n the utilities prio -of-way or scope m	r to, and during, nust be reported to
	19.	While workin will require h Heavy equip pipeline. No Marathon Pi OSHA's exca	ng around the hand digging. ment that mu power digg pe Line (MP avation standa	gas pipeline, a Heavy Equipm st cross the pipe ing will be per L) representativ rds outlined in 2	24-inch buffer arou ent will not be ope eline will cross as formed within 50 re is present. All 9 CFR 1926. (Mar	and the pipeline, the rated over any section near perpendicular feet of the side of l excavation work rathon)	e "tolerance zone", on of the pipeline. as possible to the pipeline unless a will comply with
	20.	No ripping o known and n	f soil greater ot within three	than 16 inches of the oute	leep will occur unt r edge of any pipeli	til the exact position ine. (Marathon)	n of the pipeline is
	21.	If a Maratho immediately, location. Eve future proble determine if a	n Pipe Line I call MPL's en a minor go em. An MPL any repairs are	LLC (MPL) pipe toll-free emerg puge, scrape, de representative e necessary. (Ma	eline is accidentally ency phone numb nt or crease to the will travel to the arathon)	y hit during excava per (1-833-675-123 pipeline or the co work site, inspect	tion, stop working 4) and report the ating may cause a the pipeline and
L							

 This is page 33 of 35
 Project name:
 61st Avenue/Marcella Blvd. Intersection Improvement
 Date:
 January 13, 2022

County		Lake	Route	61st Avenue/Marcella Boulevard	Des. No.	1902707	
	22. If signs of a leak are detected or suspected, (i.e., a pool of liquid on the ground, a rainbow sheen on water, bubbling in wet or flooded areas, a dense white cloud or fog, discolored or dead vegetation, dirt or water being blown in the air, an unusual hissing or roaring noise, an unusual odor such as gasoline, oil, sulfur or a rotten egg smell), call MPL's toll-free emergency phone number (1-833-675-1234) and report the location immediately. (Marathon)						
	23.	The designer v District, Como possible reloc conflicts result right of way ac	gner will coordinate with Marathon Pipe Line, LLC., Frontier, Merrillville Conservanc Comcast Cable, IAWC, and NIPSCO Gas & Electric throughout the project to addres relocations. Additional environmental documentation will be necessary if any utilit result in an increase in project scope or the need for additional permanent or temporar vay acquisition. (INDOT)			ville Conservancy project to address sary if any utility nent or temporary	
	FOR FURTHER CONSIDERATION COMMITMENTS						
	24.	The Internatio artificial lighti needs it, be n (pointing down website to lear humans and wi	nal Dark-Sk ng on wildl o brighter t nward)". Th n more abo ildlife: <u>http:/</u>	ty Association (IDA) states that, t ife, "lighting should only be on w han necessary, minimize blue ligh e Division of Fish and Wildlife str ut selecting lighting fixtures the mi /darksky.org/lighting/lighting-basics	o minimize the needed, only then needed, only t emissions, [and] congly encourages nimize harmful eff <u>s/</u> . (IDNR)	egative impacts of light the area that be fully shielded visiting the IDA's ects of lighting on	
	25.	NIRPC recomi runoff volume,	mends that the the the the the the the the the th	he roundabout incorporate bioretent	ion in its design to luce water tempera	reduce stormwater tures. (NIRPC)	

County

Route 61st Avenue/Marcella Boulevard

Des. No.

SECTION K- EARLY COORDINATION

Lake

Please list the date coordination was sent and all agencies that were contacted as a part of the development of this Environmental Study. Also, include the date of their response or indicate that no response was received. INDOT and FHWA are automatically considered early coordination participants and should only be listed if a response is received.

Remarks: Early Coordination was sent for this project on December 31, 2019 and January 2, 2020 (see submittal correspondence in Appendix C, pages 1 to 2). A list of the resource agencies contacted is provided below, along with their response date (if applicable).

AGENCY	RESPONSE DATE
Indiana Department of Natural Resources	January 29, 2020
U.S. Fish and Wildlife Service	January 28, 2020
Indiana Geological Survey	January 3, 2020
INDOT Office of Aviation	No Response
National Park Service	No Response
USDA Natural Resources Conservation Service	January 22, 2020
INDOT Public Involvement Office	No Response
INDOT Office of Utilities and Railroad	January 3, 2020
Indiana Department of Environmental Management	January 6, 2020 (online)
U.S. Department of Housing and Urban Development	No Response
U.S. Army Corps of Engineers	February 14, 2020
Mayor of Hobart	No Response
Hobart MS4 Manager	No Response
Hobart City Council	No Response
Hobart Office of Public Works	No Response
Northwestern Indiana Regional Planning Commission	January 31, 2020
Indiana Geological Society	January 3, 2020

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Appendix A

INDOT Supporting Documentation

Categorical Exclusion Level Thresholds

	РСЕ	Level 1	Level 2	Level 3	Level 4 ¹
Section 106	Falls within guidelines of Minor Projects PA	"No Historic Properties Affected"	"No Adverse Effect"	-	"Adverse Effect" Or Historic Bridge involvement ²
Stream Impacts	No construction in waterways or water bodies	< 300 linear feet of stream impacts	\geq 300 linear feet of stream impacts	-	Individual 404 Permit
Wetland Impacts	No adverse impacts to wetlands	< 0.1 acre	-	< 1 acre	≥ 1 acre
Right-of-way ³	Property acquisition for preservation only or none	< 0.5 acre	≥ 0.5 acre	-	-
Relocations	None	-	-	< 5	≥ 5
Threatened/Endangered Species (Species Specific Programmatic for Indiana bat & northern long eared bat)	"No Effect", "Not likely to Adversely Affect" (Without AMMs ⁴ or with AMMs required for all projects ⁵)	"Not likely to Adversely Affect" (With any other AMMs)	-	"Likely to Adversely Affect"	Project does not fall under Species Specific Programmatic
Threatened/Endangered Species (Any other species)	Falls within guidelines of USFWS 2013 Interim Policy	"No Effect", ""Not likely to Adversely Affect"	-	-	"Likely to Adversely Affect"
Environmental Justice	No disproportionately high and adverse impacts	-	-	-	Potential ⁶
Sole Source Aquifer	Detailed Assessment Not Required	-	-	-	Detailed Assessment
Floodplain	No Substantial Impacts	-	-	-	Substantial Impacts
Coastal Zone Consistency	Consistent	-	-		Not Consistent
National Wild and Scenic River	Not Present	-	-	-	Present
New Alignment	None	-	-	-	Any
Section 4(f) Impacts	None	-	-	-	Any
Section 6(f) Impacts	None	-	-	-	Any
Added Through Lane	None	-	-	-	Any
Permanent Traffic Alteration	None	-	-	-	Any
Coast Guard Permit	None	-	-	-	Any
Noise Analysis Required	No	-	-	-	Yes
Air Quality Analysis Required	No	-	-	-	Y es'
Approval Level	Concurrence by INDOT District				
 District Env. Supervisor Env. Services Division FHWA 	Environmental or Environmental Services	Yes	Yes	Yes Yes	Yes Yes Yes

¹Coordinate with INDOT Environmental Services. INDOT will then coordinate with the appropriate FHWA Environmental Specialist.

²Any involvement with a bridge processed under the Historic Bridge Programmatic Agreement.

³Permanent and/or temporary right-of-way.

⁴AMMs = Avoidance and Mitigation Measures.

⁵AMMs determined by the IPAC decision key to be needed that are listed in the USFWS User's Guide for the Range-wide Programmatic Consultation for Indiana bat and Northern Iong-eared bat as "required for all projects"

for Indiana bat and Northern long-eared bat as "required for all projects". ⁶Potential for causing a disproportionately high and adverse impact.

⁷Hot Spot Analysis and/or MSAT Quantitative Emission Analysis.

*Substantial public or agency controversy may require a higher-level NEPA document.

Appendix B

Graphics







61st Ave and Marcella Blvd Intersection City of Hobart, Lake County, Indiana Section 2 & 11, Township 35N, Range 8W

Map Source: Indiana Map

Location Map



Project Location Map

61st Ave and Marcella Blvd Intersection City of Hobart Lake County, Indiana Des No. 1902707

Indiana Department of Transportation (INDOT), U.S. Census Bureau (USCB), Indiana Geographic Information Council (IGIC), UITS, Indiana Spatial Data Portal

2

3.5

0

0

1

1.75

4 mi

7 km





Butler Fairman Seufert



Feet

USGS Gary Quadrangle

61st Ave and Marcella Blvd Intersection City of Hobart, Lake County, Indiana Section 2 & 11, Township 35N, Range 8W Des No. 1902707





Legend

Project Area

Map Source: Indiana Geological Survey (IGS), IndianaMap, ArcGIS Online (ESRI) World Imagery.





Feet

Aerial Map 61st Ave and Marcella Blvd Intersection City of Hobart, Lake County, Indiana Des. No. 1902707

Photo Orientation Map



December 3, 2019

61st Avenue and Marcella Blvd. Intersection City of Hobart, Lake County, IN Des. No. 1902707



Indiana Spatial Data Portal, UITS, ESRI



Photo 1: Looking east along 61st Avenue from a location approximately 820 feet west of Marcella Boulevard.



Photo 2: Looking east along 61st Avenue from a location approximately 615 feet west of Marcella Boulevard.





Photo 3: Looking east along 61st Avenue from a location approximately 513 feet west of Marcella Boulevard.



Photo 4: Looking east along 61st Avenue from a location approximately 430 feet west of Marcella Boulevard.





Photo 5: Looking south across 61st Avenue from a location approximately 520 feet west of Marcella Boulevard.



Photo 6: Looking east along 61st Avenue from a location approximately 175 feet west of Marcella Boulevard





Photo 7: Looking west along 61st Avenue from a location approximately 175 feet west of Marcella Boulevard.



Photo 8: Looking south across 61st Avenue from a location approximately 110 feet west of Marcella Boulevard.





Photo 9: Looking north from a location approximately 100 feet west of Marcella Boulevard and 10 feet north of 61st Avenue



Photo 10: Looking north from a location approximately 100 feet west of Marcella Boulevard and 100 ft north of 61st Avenue.





Photo 11: Looking north from a location 100 feet west of Marcella Boulevard and 150 feet north of 61st Avenue.



Photo 12: Looking east from 100 feet west of Marcella Boulevard and 150 ft north of 61st Avenue.





Photo 13: Looking south from a location approximately 75 feet west of Marcella Boulevard and approximately 300 feet north of 61st Avenue.



Photo 14: Looking south along the commercial driveway, toward the project area and the 61st Avenue and Marcella Boulevard intersection from a location approximately 330 feet north of the 61st Avenue and Marcella intersection.





Photo 15: Looking south along Marcella Boulevard and across 61st Avenue.



Photo 16: Looking east along 61st Avenue from a location approximately 50 feet east of Marcella Boulevard.





Photo 17: Looking east along 61st Avenue from a location approximately 250 feet east of Marcella Boulevard.



Photo 18: Looking northeast from a location approximately 250 feet east of the 61st Avenue/ Marcella Boulevard intersection.





Photo 19: Looking north from a location approximately 250 feet east of the 61st Avenue/ Marcella Boulevard intersection.



Photo 20: Looking north away from 61st Avenue from a location appoximately180 feet east of Marcella Boulevard and 100 feet north of 61st Avenue. Wendy's parking lot is visible through the vegetation in the top left of the photo.





Photo 21: Looking east along 61st Avenue from a location approximately 350 feet east of Marcella Boulevard.



Photo 22: Looking west along 61st Avenue from a location approximately 350 feet east of Marcella Boulevard.





Photo 23: Looking east along 61st Avenue from a location approximately 540 feet east of Marcella Boulevard.



Photo 24: Looking east along 61st Avenue from a location approximately 760 feet east of Marcella Boulevard.





Photo 25: Looking west along 61st Avenue from a location approximately 745 feet east of Marcella Boulevard.



Photo 26: Looking south from a location approximately 10 feet south of 61st Avenue and approximately 745 feet east of Marcella Boulevard.





Photo 27: Looking west along 61st Avenue from approximately 300 feet east of the 61st Avenue/Marcella Boulevard intersection.



Photo 28: Looking south away from 61st Avenue from a location approximately 300 feet east of the 61st Avenue/Marcella Boulevard intersection.





Photo 29: Looking west along 61st Avenue and across Marcella Boulevard.



Photo 30: Looking east along 61st Avenue from a location approximately 50 feet east of Marcella Boulevard.





Photo 31: Looking south along Marcella Boulevard from a location approximately 10 feet south of 61st Avenue.



Photo 32: Looking south along Marcella Boulevard from a location approximately 35 feet south of 61st Avenue.



















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DETOUR MAP



61st Ave and Marcella Blvd Intersection City of Hobart, Lake County, Indiana Des No. 1902707



Detour Route

Indiana Department of Transportation (INDOT), U.S. Census Bureau (USCB), Indiana Geographic Information Council (IGIC), UITS, Indiana Spatial Data Portal Appendix C Early Coordination
December 31, 2019

Ms. Elizabeth McCloskey US Fish and Wildlife Service Northern Indiana Sub-office P.O. Box 2616 Chesterton, IN 46304-5716

> RE: Des. No. 1700678, 61st Avenue and Marcella Boulevard Roundabout, City of Hobart, Lake County, Indiana

Dear Ms. McCloskey:

Our firm has been retained by the City of Hobart to prepare an environmental study for the above-referenced project involving the construction of a round-about at the 61st Avenue/Marcella Boulevard intersection in the City of Hobart, Lake County, Indiana. Prior to the completion of our environmental studies, we are requesting technical assistance from your agency.

Please respond within 30 days so that the project may proceed as scheduled. If we have not received a response within 30 days, we will assume you have no comments you wish to contribute to the project scope and we will proceed with the environmental analysis. Project information and graphics are enclosed. If you have any questions, do not hesitate to contact this office.

Thank you for your consideration of this request.

Sincerely,

BUTLER, FAIRMAN and SEUFERT, INC.

Ryan Scott rscott@bfsengr.com

RS:sc

Enclosures:

Project Description State Map Quadrangle Map Aerial Map Photo Key Photo Pages National Wetlands Inventory Map Soils Map FEMA Map Lake County ETR Species List

Note: Attachments other than Project Description have been removed for space conservation. See Appendix B, E, and F.

CIVIL ENGINEERING SOLUTIONS FOR BETTER COMMUNITIES



Headquarters: 8450 Westfield Blvd., Suite 300 Indianapolis, IN 46240-5920 T 317.713.4615 F 317.713.4616 E bfs@BFSEngr.com www.BFSEngr.com

Branch Locations:

Fort Wayne Jeffersonville Lafayette Merrillville Plainfield

Founded 1961



CC:

Mr. Robert Dirks Federal Highway Administration 575 North Pennsylvania Street, Room 254 Indianapolis, Indiana 46204

Mr. Rickie Clark, Hearings Manager INDOT Office of Communications 100 North Senate Avenue, Room 642 Indianapolis, IN 46204

Mr. Cedric Diefenbaugh Environmental Manager INDOT Crawfordsville District 41 W. 300 N. Crawfordsville, IN 47933

Ms. Christie Stanifer, Environmental Coordinator Division of Water, Environmental Unit Indiana Department of Natural Resources 402 West Washington Street, W-264 Indianapolis, IN 46204-2641

Ms. Elizabeth McCloskey US Fish and Wildlife Service Northern Indiana Sub-office P.O. Box 2616 Chesterton, IN 46304-5716

Regional Environmental Officer U.S. Department of Housing & Urban Development 77 West Jackson Blvd. Suite 2608 Chicago, IL 60604

Mr. Hector Santiago National Park Service, Department of Interior 601 Riverfront Drive Omaha, NE 68102

Ms. Jane Hardisty, State Conservationist Natural Resources Conservation Service 6013 Lakeside Boulevard Indianapolis, IN 46278

Mr. Bill Plant Utilities and Railroad Administrator Indiana Department of Transportation 100 N. Senate Ave. IGCN 642 Indianapolis, IN 46204 Chicago District, Corps of Engineers Attn: Mr. Paul Leffler Chicago District, USACE 231 S. LaSalle St. Suite 1500 Chicago, IL 60604

Mr. Tim Kingsland MS4 Coordinator City of Hobart 414 Main Street Hobart, IN 46342

Mr. Ty Warner NIRPC Executive Director 6100 Southport Road Portage, IN 46368

Mr. John Dubach Director of Public Works 1840 E. State Road 130 Hobart, IN 46342

Mr. Dan Waldrop City of Hobart, City Council 414 Main Street Hobart, IN 46342

PROJECT DESCRIPTION 61st Avenue/Marcella Boulevard Intersection Project City of Hobart, Lake County, Indiana Des. No. 1902707

The City of Hobart, with funding from the Federal Highway Administration (FHWA), proposes a Roadway Improvement project to the intersection of 61st Avenue and Marcella Boulevard. Work would entail the construction of a roundabout.

The project is located 0.14 mile east of I-65, continuing approximately 0.27 mile west along 61st Ave; and from approximately 0.08 mile south of 61st Avenue/Marcella Boulevard and continuing along Marcella Boulevard approximately 0.14 mile north. The project is located in Sections 2 and 11, Township 35 North, Range 8 West of the United States Geological Survey (USGS) Gary, Indiana Quadrangle. This is a federal aid project.

The need for the project is due to congestion and the high rate of accidents at the 61st Avenue and Marcella Boulevard intersection. The City of Hobart's 2016 "Southwest Development Area Traffic Study" found the intersection of 61st Avenue and Marcella Boulevard to be not sufficient for accommodating increasing traffic volumes. The existing Level of Service (LOS) for this intersection is "C". The LOS is anticipated to be "F" in 2038 with the existing intersection configuration. Additionally, from 2016 to 2018 there were 58 recorded accidents at or near the intersection, which is one of the highest accident rates for an intersection within the City of Hobart according to the city's Engineering Department. The purpose of this project is to address the future LOS and reduce the number of accidents at the 61st Avenue and Marcella Boulevard intersection.

The project proposes to construct a three-lane roundabout at the intersection of 61st Avenue and Marcella Boulevard. The roundabout may be offset slightly to the southwest of the existing intersection, pending further study. The roundabout will include two (2) east bound lanes entering and exiting the roundabout, two (2) west bound lanes entering and two (2) west bound lanes exiting the roundabout, a single south bound lane entering and two (2) south bound lanes exiting the roundabout and two (2) north bound left turn lanes and one (1) thru/left/right lane entering and a single north bound lane exiting the roundabout. The approach along Marcella Boulevard to the south of 61st Avenue would be widened to a maximum of five (5) travel lanes, three (3) northbound, including two (2) dedicated left turn lanes from northbound Marcella Boulevard to west bound 61st Avenue, and two (2) southbound lanes. The approach along Marcella Boulevard to the north of 61st Avenue would be widened to a maximum of two (2) travel lanes, one (1) northbound and one (1) southbound. Sidewalk will be installed along the north side to 61st Avenue for the length of the project area and will tie into existing sidewalk at the east end of the project area. Sidewalk will also be installed along the south side of 61st Avenue from Mississippi Street to Marcella Boulevard and will continue south along the west side of Marcella Boulevard for approximately 370 feet. Sidewalk will also be installed along select locations within the project area. The proposed sidewalk will be approximately 6 feet wide. Lighting will be installed at the roundabout. Existing lighting will be replaced throughout the project area with new LED lights which will

likely be Cobra LED downward-facing full cut-off lighting. The maximum depth of excavation in the project area will be 10 feet, including stormwater improvements. Curb and Gutter will be reconstructed throughout the project area. Storm sewer will be reconstructed to provide storm water runoff for the new intersection improvements by means of an enclosed storm sewer system to convey the stormwater to Turkey Creek, which is located approximately 730 feet north of the 61st Avenue/Marcella Boulevard. Approximately 3.0 acres of permanent and 0.5 acre of temporary right-of-way acquisition would be anticipated from commercial properties as well as agricultural and residential properties, along the entire project area. The project would require closure of the intersection and the institution of a detour, likely utilizing Mississippi Street, 69th Avenue, and Colorado Street.

Total Project Length:	Existing 	Proposed 0.27 mile
Right-of-Way: Permanent:	N/A	3.0 acre
Temporary:	N/A	0.5
Vertical Alignment:	level	No change
Horizontal Alignment: 61 st Avenue Marcella Boulevard	East/West North/South	No change No change
Land Use:	Commercial/Agricultural	No change

General Existing and Proposed Parameters

Channelization, Bank Shaping and In-Stream Work:

Based on a review of available maps, and observations made during the field investigation, there is a suspected emergent wetland within the floodplain of Turkey Creek north of the proposed intersection improvement. Due to limited plan development at this stage of the project, it is unknown at this time if impacts to waterways will occur as a result of stormwater outlet construction.

Temporary Runaround and Equipment Crossing: None

Design Speed: Posted Speed:	40 mph (61 st 40 mph (61 st	Avenue) Avenue)	40 mph (Marcella Boulevard 40 mph (Marcella Boulevard		
Average Daily Traffic Truck Traffic	(61 st Avenue)	8,126 (2019) 6.%	13,715 (2040)		
Average Daily Traffic (N Truck Traffic	Aarcela Boulevard)	8,126 (2019) 6.%	13,715 (2040)		

Existing and Proposed Roadway Design – 61st Avenue

	<u>Existing</u>	<u>Proposed</u>
Pavement Width:	60 ft.	64 ft
Number of Lanes:	5 @ 12 ft.	5 @ 12 ft.
Striped Median:	none	raised 2 foot median
		Splitter island 8-26 ft
Surface:	Asphalt	Asphalt
Shoulders:	None	None
Curb and gutter:	2 @ 2 ft.	2 @ 2ft 7in.
Sidewalk:	none	1 @ 6 ft.
Grass Buffer:	None	none.
Functional Classification:	Principal Arterial	Principal Arterial

Existing and Proposed Roadway Design – Marcella Boulevard

	Existing	<u>Proposed</u>
Pavement Width:	48 ft.	62 ft.
Number of Lanes:	4 @ 12 ft.	5 @ 12 ft.
Surface:	Asphalt	Asphalt
Shoulders:	None	None
Curb and gutter:	2 @ 2 ft.	2 @ 2ft 7in.
Sidewalk:	none	1 @ 5 ft.
Grass Buffer:	None	none
Functional Classification:	Minor Arterial	Minor Arterial

Proposed Roadway Design – Roundabout

The roundabout will have an inner diameter of approximately 104feet and will carry two lanes of traffic at any given point. The traffic lanes will be approximately 16 feet wide and have an approximately 2-foot wide curb and gutter. There will be a 10-foot truck apron.

Additional Design Parameters Unique to the Project:

Standard INDOT erosion control measures will be used.

From:	<u>McCloskey, Elizabeth</u>
To:	Jenni Lee
Subject:	Re: [EXTERNAL] Early Coordination Request: Des No 1902707, 61st Avenue and Marcella Boulevard Intersection Improvements
Date:	Tuesday, January 28, 2020 1:16:36 PM

Good afternoon, because the proposed project will have minor impacts on natural resources, and no Federally endangered species are known to be present, the U.S. Fish and Wildlife Service will not be providing a comment letter.

Thank you for contacting us.

Elizabeth McCloskey U.S. Fish and Wildlife Service Northern Indiana Suboffice Chesterton, Indiana

On Tue, Dec 31, 2019 at 1:13 PM Jenni Lee <<u>JLee@bfsengr.com</u>> wrote:

Dear Ms. McCloskey,

As you may know, our firm has been retained by the City of Hobart to prepare an environmental study for the project with Des No. 1902707, 61st Avenue and Marcella Boulevard Intersection Improvements. Please find attached a request for technical assistance from your agency. The attached contains additional project information, in addition to our request earlier today concerning lighting.

If there are any questions, please don't hesitate to let me know.

Respectfully,

Jenni Lee Environmental Scientist

Butler, Fairman & Seufert, Inc. 8450 Westfield Blvd., Suite 300 | Indianapolis, IN 46240-8302 | p 317-713-4615 | f 317-713-4616 JLee@bfsengr.com | www.BFSEngr.com

THIS IS NOT A PERMIT

State of Indiana DEPARTMENT OF NATURAL RESOURCES **Division of Fish and Wildlife** rly Coordination/Environmental Accessment

DNR #:	ER-22096	Request Received: January 2, 2020
Requestor:	Butler, Fairma Ryan L Scott 8450 Westfie Indianapolis,	an & Seufert Inc Id Boulevard, Suite 300 IN 46240
Project:		61st Avenue and Marcella Boulevard intersection roundabout construction, 0.14 mile east of I-65, City of Hobart; Des #1902707
County/Site in	nfo:	Lake
		The Indiana Department of Natural Resources has reviewed the above referenced project per your request. Our agency offers the following comments for your information and in accordance with the National Environmental Policy Act of 1969.
		If our agency has regulatory jurisdiction over the project, the recommendations contained in this letter may become requirements of any permit issued. If we do not have permitting authority, all recommendations are voluntary.
		*NOTE: This project is within the Lake Michigan Coastal Program's boundary; therefore it may be subject to Federal Consistency (FC) review. Please go to http://www.in.gov/dnr/lakemich/files/20070214-IR-312070085NRA.xml.pdf (Section III, pages 8-16) to see the federal activities that require a project to go through the FC process which is outlined at http://www.in.gov/dnr/lakemich/6041.htm.
Regulatory As	ssessment:	This proposal may require the formal approval of our agency pursuant to the Flood Control Act (IC 14-28-1) for any proposal to construct, excavate, or fill in or on the floodway of Turkey Creek. Please submit more detailed plans to the Division of Water' Technical Services Section if you are unsure whether or not a permit will be required.
Natural Herita	ige Database:	The Natural Heritage Program's data have been checked. To date, no plant or animal species listed as state or federally threatened, endangered, or rare have been reported to occur in the project vicinity.
Fish & Wildlife Comments:		Avoid and minimize impacts to fish, wildlife, and botanical resources to the greatest extent possible, and compensate for impacts. The following are recommendations that address potential impacts identified in the proposed project area:
		1) Riparian Habitat: We recommend a mitigation plan be developed (and submitted with the permit application, if required) for any unavoidable habitat impacts that will occur. The DNR's Floodway Habitat Mitigation guidelines (and plant lists) can be found online at: http://www.in.gov/legislative/iac/20190130-IR-312190041NRA.xml.pdf.
		Impacts to non-wetland forest of one (1) acre or more should be mitigated at a minimum 2:1 ratio. If less than one acre of non-wetland forest is removed in a rural setting, replacement should be at a 1:1 ratio based on area. Impacts to non-wetland forest under one (1) acre in an urban setting should be mitigated by planting five trees, at leas 2 inches in diameter-at-breast height (dbh), for each tree which is removed that is 10" dbh or greater (5:1 mitigation based on the number of large trees).
		2) Wetland Habitat: Due to the presence or potential presence of wetland habitat on site, we recommend contacting and coordinating with the Indiana Department of Environmental Management

State of Indiana DEPARTMENT OF NATURAL RESOURCES Division of Fish and Wildlife

Early Coordination/Environmental Assessment

(IDEM) 401 program and also the US Army Corps of Engineers (USACE) 404 program. Impacts to wetland habitat should be mitigated at the appropriate ratio according to the 1991 INDOT/IDNR/USFWS Memorandum of Understanding.

3) Lighting:

The International Dark-Sky Association (IDA) states that, to minimize the negative impacts of artificial lighting on wildlife, "lighting should only be on when needed, only light the area that needs it, be no brighter than necessary, minimize blue light emissions, [and] be fully shielded (pointing downward)". The Division of Fish and Wildlife strongly encourages visiting the IDA's website to learn more about selecting lighting fixtures that minimize the harmful effects of lighting on humans and wildlife: http://darksky.org/lighting/lighting-basics/.

The additional measures listed below should be implemented to avoid, minimize, or compensate for impacts to fish, wildlife, and botanical resources:

1. Revegetate all bare and disturbed areas within the project area using a mixture of grasses (excluding all varieties of tall fescue), sedges, and wildflowers native to Northern Indiana and specifically for stream bank/floodway stabilization purposes as soon as possible upon completion.

2. Do not cut any trees suitable for Indiana bat or Northern Long-eared bat roosting (greater than 5 inches dbh, living or dead, with loose hanging bark, or with cracks, crevices, or cavities) from April 1 through September 30.

 All excavated material must be properly spread or completely removed from the project site such that erosion and off-site sedimentation of the material is prevented.
 Do not deposit or allow demolition/construction materials or debris to fall or otherwise enter the waterway.

5. Appropriately designed measures for controlling erosion and sediment must be implemented to prevent sediment from entering the stream or leaving the construction site; maintain these measures until construction is complete and all disturbed areas are stabilized.

6. Seed and protect all disturbed streambanks and slopes not protected by other methods that are 3:1 or steeper with erosion control blankets that are heavy-duty, biodegradable, and net free or that use loose-woven / Leno-woven netting to minimize the entrapment and snaring of small-bodied wildlife such as snakes and turtles (follow manufacturer's recommendations for selection and installation); seed and apply mulch on all other disturbed areas.

7. Do not excavate or place fill in any riparian wetland.

Contact Staff:

Christie L. Stanifer, Environ. Coordinator, Fish & Wildlife Our agency appreciates this opportunity to be of service. Please contact the above staff member at (317) 232-4080 if we can be of further assistance.

Date: January 29, 2020

Christie L. Stanifer Environ. Coordinator Division of Fish and Wildlife



Organization and Project Information

Project ID:	6371
Des. ID:	1902707
Project Title:	61st Avenue and Marcella Boulevard Intersection Improvements
Name of Organization:	Butler, Fairman and Seufert, Inc.
Requested by:	Jennifer Lee

Environmental Assessment Report

1. Geological Hazards:

- High liquefaction potential
- Floodway

2. Mineral Resources:

- Bedrock Resource: High Potential
- Sand and Gravel Resource: Low Potential
- 3. Active or abandoned mineral resources extraction sites:
 - None documented in the area

*All map layers from Indiana Map (maps.indiana.edu)

DISCLAIMER:

This document was compiled by Indiana University, Indiana Geological Survey, using data believed to be accurate; however, a degree of error is inherent in all data. This product is distributed "AS-IS" without warranties of any kind, either expressed or implied, including but not limited to warranties of suitability to a particular purpose or use. No attempt has been made in either the design or production of these data and document to define the limits or jurisdiction of any federal, state, or local government. The data used to assemble this document are intended for use only at the published scale of the source data or smaller (see the metadata links below) and are for reference purposes only. They are not to be construed as a legal document or survey instrument. A detailed on-the-ground survey and historical analysis of a single site may differ from these data and this document.

This information was furnished by Indiana Geological Survey

Address: 420 N. Walnut St., Bloomington, IN 47404

Email: IGSEnvir@indiana.edu

Phone: 812 855-7428

Date: January 03, 2020



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Metadata:

- https://maps.indiana.edu/metadata/Geology/Seismic_Earthquake_Liquefaction_Potential.html
- https://maps.indiana.edu/metadata/Geology/Industrial_Minerals_Sand_Gravel_Resources.html
- https://maps.indiana.edu/metadata/Hydrology/Floodplains_FIRM.html
- https://maps.indiana.edu/metadata/Geology/Bedrock_Geology.html



January 22, 2020

Ryan L. Scott Butler, Fairman & Seufert 8450 Westfield Boulevard, Suite 300 Indianapolis, Indiana 46240

Dear Mr. Scott:

The proposed project to construct a roundabout at 61st Avenue and Marcella Boulevard in the City of Hobart, Lake County, Indiana, (Des No 1902707)) as referred to in your letter received December 31, 2019, will cause a conversion of prime farmland.

The attached packet of information is for your use competing Parts VI and VII of the AD-1006. After completion, the federal funding agency needs to forward one copy to NRCS for our records.

If you need additional information, please contact John Allen at 317-295-5859.

Sincerely,

JERRY RAYNOR Date: 2020.01.22 22:36:58 -05'00'

JERRY RAYNOR State Conservationist

Enclosures

U.S. DEPARTMENT OF AGRICULTURE FARMLAND CONVERSION IMPACT RATING							
PART I (To be completed by Federal Agency)		Date of Land Evaluation Request					
Name of Project DES 1902707		Federal Agency Involved					
Intersection Improvement Project, 61st Ave./Ma	ircella Bivd.	County and State					
Installation of a roundabout and other improve	monts	County and State	I aka C	ounty Indi	ono		
PART II (To be completed by NRCS)		Date Request Rec	Lake C	WRCS 1	ana 12/2020		
Does the site contain prime unique statewide or	r local important fa	armland? Ves No Acres Irrigated Average Farm Size					rm Size
(If no, the FPPA does not apply - do not comple	te additional parts	of this form). Yes 293 ac			c		
Major Crop(s)	Farmable Land i	n Govt. Jurisdiction	n	Amount of	f Farm	land As Defin	ned in FPPA
Corn	Acres: 266,57	6 % 82	2	Acres:	231,03	17	% 71
Name of Land Evaluation System Used LESA	Name of Local S	Site Assessment Sys	stem	Date Land	Evalu	ation Returne	ed by NRCS
PART III (To be completed by Federal Agency)				Alternative	Site Ra	ıting	
		Site A		Site B		Site C	Site D
A. Total Acres to Be Converted Directly		3.00					
B. Total Acres to Be Converted Indirectly		0.00					
C. Total Acres in Site		7.50					
PART IV (To be completed by NRCS) Land Evaluation	uation						
Information							
A. Total Acres Prime And Unique Farmland		0.13					
B. Total Acres Statewide And Local Important F	Farmland	0.00					
C. Percentage of Farmland in County Or Local Govt. Unit t	to Be Converted	<0.001					
D. Percentage Of Farmland In Govt. Jurisdiction With Same Or Hig	her Relative Value	54					
PART V (To be completed by NRCS) Land Evalua Relative Value of Farmland To Be Converted (so	ation Criterion cale of 0 to 100 Points)	80					
PART VI (To be completed by Federal Agency Maximum							
Site Assessment Criteria (These criteria are explained in 7 Points							
CFR 658.5 (b)							
1. Area In Nonurban Use 15		5					
2. Perimeter in Nonurban Use	10	3					
4. Protection Provided By State And Local	20	0					
4. Protection Provided By State And Local Government 20		0					
5 Distance From Urban Builtun Area	0	0					
6. Distance To Urban Support Services	0	0					
7. Size Of Present Farm Unit Compared To	Ŭ	0					
Average 10		4					
8. Creation Of Nonfarmable Farmland	25	0					
9. Availability Of Farm Support Services 5		0					
10. On-Farm Investments 20		2					
11. Effects Of Conversion On Farm Support							
Services 25		0					
12. Compatibility With Existing Agricultural Use 10		0					
TOTAL SITE ASSESSMENT POINTS 160		14					
PART VII (To be completed by Federal Agency)							
Relative Value of Farmland (From Part V) 100		80					
Total Site Assessment (From Part VI above or a							
local site assessment)	160	14					
TOTAL POINTS (Total of above 2 lines)	260	94					I
Site Selected	Data -fg 1 4	-			Was	A Local Site	Assessment
Site Selected:	Date of Selection	[]			Usec	ii res	INO
Reason for Selection:							



United States Department of the Interior

FISH AND WILDLIFE SERVICE Indiana Ecological Services Field Office 620 South Walker Street Bloomington, IN 47403-2121 Phone: (812) 334-4261 Fax: (812) 334-4273 http://www.fws.gov/midwest/Endangered/section7/s7process/step1.html



In Reply Refer To: March 02, 2020 Consultation Code: 03E12000-2020-SLI-0492 Event Code: 03E12000-2020-E-04340 Project Name: Des No. 1902707, 61st Avenue and Marcella Blvd. Intersection Improvements

Subject: Updated list of threatened and endangered species that may occur in your proposed project location, and/or may be affected by your proposed project

To Whom It May Concern:

The attached species list identifies any federally threatened, endangered, proposed and candidate species that may occur within the boundary of your proposed project or may be affected by your proposed project. The list also includes designated critical habitat if present within your proposed project area or affected by your project. This list is provided to you as the initial step of the consultation process required under section 7(c) of the Endangered Species Act, also referred to as Section 7 Consultation.

Section 7 of the Endangered Species Act of 1973 requires that actions authorized, funded, or carried out by Federal agencies not jeopardize federally threatened or endangered species or adversely modify designated critical habitat. To fulfill this mandate, Federal agencies (or their designated non-federal representative) must consult with the Service if they determine their project "may affect" listed species or critical habitat.

Under 50 CFR 402.12(e) (the regulations that implement Section 7 of the Endangered Species Act) the accuracy of this species list should be verified after 90 days. This verification can be completed formally or informally. You may verify the list by visiting the ECOS-IPaC website http://ecos.fws.gov/ipac/ at regular intervals during project planning and implementation and completing the same process you used to receive the attached list. As an alternative, you may contact this Ecological Services Field Office for updates.

Please use the species list provided and visit the U.S. Fish and Wildlife Service's Region 3 Section 7 Technical Assistance website at - <u>http://www.fws.gov/midwest/endangered/section7/</u><u>s7process/index.html</u>. This website contains step-by-step instructions which will help you determine if your project will have an adverse effect on listed species and will help lead you through the Section 7 process.

For all **wind energy projects** and **projects that include installing towers that use guy wires or are over 200 feet in height**, please contact this field office directly for assistance, even if no federally listed plants, animals or critical habitat are present within your proposed project or may be affected by your proposed project.

Although no longer protected under the Endangered Species Act, be aware that bald eagles are protected under the Bald and Golden Eagle Protection Act (16 U.S.C. 668 *et seq*.) and Migratory Bird Treaty Act (16 U.S.C. 703 *et seq*), as are golden eagles. Projects affecting these species may require measures to avoid harming eagles or may require a permit. If your project is near an eagle nest or winter roost area, see our Eagle Permits website at <u>http://www.fws.gov/midwest/</u><u>midwestbird/EaglePermits/index.html</u> to help you determine if you can avoid impacting eagles or if a permit may be necessary.

We appreciate your concern for threatened and endangered species. Please include the Consultation Tracking Number in the header of this letter with any request for consultation or correspondence about your project that you submit to our office.

Attachment(s):

Official Species List

Official Species List

This list is provided pursuant to Section 7 of the Endangered Species Act, and fulfills the requirement for Federal agencies to "request of the Secretary of the Interior information whether any species which is listed or proposed to be listed may be present in the area of a proposed action".

This species list is provided by:

Indiana Ecological Services Field Office 620 South Walker Street Bloomington, IN 47403-2121 (812) 334-4261

Project Summary

Consultation Code:	03E12000-2020-SLI-0492
Event Code:	03E12000-2020-E-04340
Project Name:	Des No. 1902707, 61st Avenue and Marcella Blvd. Intersection Improvements
Project Type:	TRANSPORTATION
Project Description:	The project is located 0.14 mile east of I-65, continuing approximately 0.27 mile west along 61st Ave; and from approximately 0.08 mile south of 61st Avenue/Marcella Boulevard and continuing along Marcella Boulevard approximately 0.14 mile north. The project is located in Sections 2 and 11, Township 35 North, Range 8 West of the United States Geological Survey (USGS) Gary, Indiana Quadrangle. This is a federal aid project.
	The need for the project is due to congestion and the high rate of accidents at the 61st Avenue and Marcella Boulevard intersection. The City of Hobart's 2016 "Southwest Development Area Traffic Study" found the intersection of 61st Avenue and Marcella Boulevard to be not sufficient for accommodating increasing traffic volumes. The existing Level of Service (LOS) for this intersection is "C". The LOS is anticipated to be "F" in 2038 with the existing intersection configuration. Additionally, from 2016 to 2018 there were 58 recorded accidents at or near the intersection, which is one of the highest accident rates for an intersection within the City of Hobart according to the city's Engineering Department. The purpose of this project is to address the future LOS and reduce the number of accidents at the 61st Avenue and Marcella Boulevard intersection. The project proposes to construct a three-lane roundabout at the intersection of 61st Avenue and Marcella Boulevard to the south of 61st Avenue and Marcella Boulevard to the south of 61st Avenue would be widened to a maximum of five (5) travel lanes, three (3) northbound, including two (2) dedicated left turn lanes from northbound Marcella Boulevard to the anthol of 61st Avenue would be widened to a maximum of two (2) travel lanes, one (1) northbound and one (1) southbound. Sidewalk, approximately 6-foot wide, will be installed and select locations within the project area. Lighting will be installed at the roundabout. Existing lighting will likely be

Cobra LED downward-facing full cut-off lighting. Curb and Gutter will be reconstructed throughout the project area. Storm sewer will be reconstructed to provide storm water runoff for the new intersection improvements by means of an enclosed storm sewer system to convey the stormwater to Turkey Creek, which is located approximately 730 feet north of the 61st Avenue/Marcella Boulevard. The maximum depth of excavation in the project area will be 10 feet. Approximately 3.0 acres of permanent and 0.5 acre of temporary right-of-way acquisition would be anticipated from commercial properties as well as agricultural and residential properties, along the entire project area. The project would require closure of the intersection and the institution of a detour, likely utilizing Mississippi Street, 69th Avenue, and Colorado Street. There is suitable bat habitat within the project area. Up to 20 trees may be cleared depending on the final design option chosen. Tree clearing will occur during the inactive season. The project is anticipated to be under construction for approximately one (1) year, commencing in spring 2021.

Project Location:

Approximate location of the project can be viewed in Google Maps: <u>https://www.google.com/maps/place/41.50690630160213N87.31422903801015W</u>



Counties: Lake, IN

Endangered Species Act Species

There is a total of 2 threatened, endangered, or candidate species on this species list.

Species on this list should be considered in an effects analysis for your project and could include species that exist in another geographic area. For example, certain fish may appear on the species list because a project could affect downstream species. Note that 1 of these species should be considered only under certain conditions.

IPaC does not display listed species or critical habitats under the sole jurisdiction of NOAA Fisheries¹, as USFWS does not have the authority to speak on behalf of NOAA and the Department of Commerce.

See the "Critical habitats" section below for those critical habitats that lie wholly or partially within your project area under this office's jurisdiction. Please contact the designated FWS office if you have questions.

1. <u>NOAA Fisheries</u>, also known as the National Marine Fisheries Service (NMFS), is an office of the National Oceanic and Atmospheric Administration within the Department of Commerce.

Mammals

NAME	STATUS
Indiana Bat <i>Myotis sodalis</i> There is final critical habitat for this species. Your location is outside the critical habitat. Species profile: <u>https://ecos.fws.gov/ecp/species/5949</u> Species survey guidelines: <u>https://ecos.fws.gov/ipac/guideline/survey/population/1/office/31440.pdf</u>	
 Northern Long-eared Bat <i>Myotis septentrionalis</i> No critical habitat has been designated for this species. This species only needs to be considered under the following conditions: Incidental take of the NLEB is not prohibited here. Federal agencies may consult using the 4(d) rule streamlined process. Transportation projects may consult using the programmatic process. See www.fws.gov/midwest/endangered/mammals/nleb/index.html Species profile: <u>https://ecos.fws.gov/ecp/species/9045</u> 	Threatened

Critical habitats

THERE ARE NO CRITICAL HABITATS WITHIN YOUR PROJECT AREA UNDER THIS OFFICE'S JURISDICTION.



United States Department of the Interior

FISH AND WILDLIFE SERVICE Indiana Ecological Services Field Office 620 South Walker Street Bloomington, IN 47403-2121 Phone: (812) 334-4261 Fax: (812) 334-4273 http://www.fws.gov/midwest/Endangered/section7/s7process/step1.html



In Reply Refer To: January 27, 2020 Consultation Code: 03E12000-2020-I-0492 Event Code: 03E12000-2020-E-02941 Project Name: Des No. 1902707, 61st Avenue and Marcella Blvd. Intersection Improvements

Subject: Concurrence verification letter for the 'Des No. 1902707, 61st Avenue and Marcella Blvd. Intersection Improvements' project under the revised February 5, 2018, FHWA, FRA, FTA Programmatic Biological Opinion for Transportation Projects within the Range of the Indiana Bat and Northern Long-eared Bat.

To whom it may concern:

The U.S. Fish and Wildlife Service (Service) has received your request to verify that the **Des No. 1902707, 61st Avenue and Marcella Blvd. Intersection Improvements** (Proposed Action) may rely on the concurrence provided in the February 5, 2018, FHWA, FRA, FTA Programmatic Biological Opinion for Transportation Projects within the Range of the Indiana Bat and Northern Long-eared Bat (PBO) to satisfy requirements under Section 7(a)(2) of the Endangered Species Act of 1973 (ESA) (87 Stat. 884, as amended; 16 U.S.C 1531 *et seq.*).

Based on the information you provided (Project Description shown below), you have determined that the Proposed Action is within the scope and adheres to the criteria of the PBO, including the adoption of applicable avoidance and minimization measures, and may affect, but is <u>not likely to</u> <u>adversely affect</u> (NLAA) the endangered Indiana bat (*Myotis sodalis*) and/or the threatened Northern long-eared bat (*Myotis septentrionalis*).

The Service has 14 calendar days to notify the lead Federal action agency or designated nonfederal representative if we determine that the Proposed Action does not meet the criteria for a NLAA determination under the PBO. If we do <u>not</u> notify the lead Federal action agency or designated non-federal representative within that timeframe, you may proceed with the Proposed Action under the terms of the NLAA concurrence provided in the PBO. This verification period allows Service Field Offices to apply local knowledge to implementation of the PBO, as we may identify a small subset of actions having impacts that were unanticipated. In such instances, Service Field Offices may request additional information that is necessary to verify inclusion of the proposed action under the PBO.

For Proposed Actions that include bridge/structure removal, replacement, and/or

maintenance activities: If your initial bridge/structure assessments failed to detect Indiana bats, but you later detect bats during construction, please submit the Post Assessment Discovery of Bats at Bridge/Structure Form (User Guide Appendix E) to this Service Office. In these instances, potential incidental take of Indiana bats may be exempted provided that the take is reported to the Service.

If the Proposed Action is modified, or new information reveals that it may affect the Indiana bat and/or Northern long-eared bat in a manner or to an extent not considered in the PBO, further review to conclude the requirements of ESA Section 7(a)(2) may be required. If the Proposed Action may affect any other federally-listed or proposed species, and/or any designated critical habitat, additional consultation between the lead Federal action agency and this Service Office is required. If the proposed action has the potential to take bald or golden eagles, additional coordination with the Service under the Bald and Golden Eagle Protection Act may also be required. In either of these circumstances, please contact this Service Office.

Project Description

The following project name and description was collected in IPaC as part of the endangered species review process.

Name

Des No. 1902707, 61st Avenue and Marcella Blvd. Intersection Improvements

Description

The project is located 0.14 mile east of I-65, continuing approximately 0.27 mile west along 61st Ave; and from approximately 0.08 mile south of 61st Avenue/Marcella Boulevard and continuing along Marcella Boulevard approximately 0.14 mile north. The project is located in Sections 2 and 11, Township 35 North, Range 8 West of the United States Geological Survey (USGS) Gary, Indiana Quadrangle. This is a federal aid project.

The need for the project is due to congestion and the high rate of accidents at the 61st Avenue and Marcella Boulevard intersection. The City of Hobart's 2016 "Southwest Development Area Traffic Study" found the intersection of 61st Avenue and Marcella Boulevard to be not sufficient for accommodating increasing traffic volumes. The existing Level of Service (LOS) for this intersection is "C". The LOS is anticipated to be "F" in 2038 with the existing intersection configuration. Additionally, from 2016 to 2018 there were 58 recorded accidents at or near the intersection, which is one of the highest accident rates for an intersection within the City of Hobart according to the city's Engineering Department. The purpose of this project is to address the future LOS and reduce the number of accidents at the 61st Avenue and Marcella Boulevard intersection.

The project proposes to construct a three-lane roundabout at the intersection of 61st Avenue and Marcella Boulevard. The roundabout may be offset slightly to the southwest of the existing intersection, pending further study. The approach along Marcella Boulevard to the south of 61st Avenue would be widened to a maximum of five (5) travel lanes, three (3) northbound, including two (2) dedicated left turn lanes from northbound Marcella Boulevard to westbound 61st Avenue, and two (2) southbound lanes. The approach along Marcella Boulevard to the north of 61st Avenue would be widened to a maximum of two (2) travel lanes, one (1) northbound and one (1) southbound. Sidewalk, approximately 6-foot wide, will be installed along select locations within the project area. Lighting will be installed at the roundabout. Existing lighting will be replaced throughout the project area. All installed lighting will likely be Cobra LED downward-facing full cut-off lighting. Curb and Gutter will be reconstructed throughout the project area. Storm sewer will be reconstructed to provide storm water runoff for the new intersection improvements by means of an enclosed storm sewer system to convey the stormwater to Turkey Creek, which is located approximately 730 feet north of the 61st Avenue/Marcella Boulevard. The maximum depth of excavation in the project area will be 10 feet. Approximately 3.0 acres of permanent and 0.5 acre of temporary right-of-way acquisition would be anticipated from commercial properties as well as agricultural and residential properties, along the entire project area. The project would require closure of the intersection and the institution of a detour, likely utilizing Mississippi Street, 69th Avenue, and Colorado Street. There is suitable bat habitat within the project area. Up to 20 trees may be cleared depending on the final design option chosen. Tree clearing will occur during the inactive season. The project is anticipated to be under construction for approximately one (1) year, commencing in spring 2021.

Determination Key Result

Based on your answers provided, this project(s) may affect, but is not likely to adversely affect the endangered Indiana bat and/or the threatened Northern long-eared bat, therefore, consultation with the U.S. Fish and Wildlife Service pursuant to Section 7(a)(2) of the Endangered Species Act of 1973 (ESA) (87 Stat. 884, as amended 16 U.S.C. 1531 *et seq.*) is required. However, also based on your answers provided, this project may rely on the concurrence provided in the revised February 5, 2018, FHWA, FRA, FTA Programmatic Biological Opinion for Transportation Projects within the Range of the Indiana Bat and Northern Long-eared Bat.

Qualification Interview

1. Is the project within the range of the Indiana bat^[1]?

[1] See Indiana bat species profile Automatically answered Yes

2. Is the project within the range of the Northern long-eared bat^[1]?

[1] See <u>Northern long-eared bat species profile</u> Automatically answered *Yes*

- 3. Which Federal Agency is the lead for the action?*A) Federal Highway Administration (FHWA)*
- 4. Are *all* project activities limited to non-construction^[1] activities only? (examples of non-construction activities include: bridge/abandoned structure assessments, surveys, planning and technical studies, property inspections, and property sales)

[1] Construction refers to activities involving ground disturbance, percussive noise, and/or lighting. No

5. Does the project include *any* activities that are **greater than** 300 feet from existing road/ rail surfaces^[1]?

[1] Road surface is defined as the actively used [e.g. motorized vehicles] driving surface and shoulders [may be pavement, gravel, etc.] and rail surface is defined as the edge of the actively used rail ballast. *No*

6. Does the project include *any* activities **within** 0.5 miles of a known Indiana bat and/or NLEB hibernaculum^[1]?

[1] For the purpose of this consultation, a hibernaculum is a site, most often a cave or mine, where bats hibernate during the winter (see suitable habitat), but could also include bridges and structures if bats are found to be hibernating there during the winter.

No

- 7. Is the project located **within** a karst area? *No*
- 8. Is there *any* suitable^[1] summer habitat for Indiana Bat or NLEB **within** the project action area^[2]? (includes any trees suitable for maternity, roosting, foraging, or travelling habitat)

[1] See the Service's <u>summer survey guidance</u> for our current definitions of suitable habitat.

[2] The action area is defined as all areas to be affected directly or indirectly by the Federal action and not merely the immediate area involved in the action (50 CFR Section 402.02). Further clarification is provided by the national consultation FAQs.

Yes

9. Will the project remove *any* suitable summer habitat^[1] and/or remove/trim any existing trees **within** suitable summer habitat?

[1] See the Service's <u>summer survey guidance</u> for our current definitions of suitable habitat. *Yes*

10. Will the project clear more than 20 acres of suitable habitat per 5-mile section of road/rail? *No*

11. Have presence/probable absence (P/A) summer surveys^{[1][2]} been conducted^{[3][4]} within the suitable habitat located within your project action area?

[1] See the Service's <u>summer survey guidance</u> for our current definitions of suitable habitat.

[2] Presence/probable absence summer surveys conducted within the fall swarming/spring emergence home range of a documented Indiana bat hibernaculum (contact local Service Field Office for appropriate distance from hibernacula) that result in a negative finding requires additional consultation with the local Service Field Office to determine if clearing of forested habitat is appropriate and/or if seasonal clearing restrictions are needed to avoid and minimize potential adverse effects on fall swarming and spring emerging Indiana bats.

[3] For projects within the range of either the Indiana bat or NLEB in which suitable habitat is present, and no bat surveys have been conducted, the transportation agency will assume presence of the appropriate species. This assumption of presence should be based upon the presence of suitable habitat and the capability of bats to occupy it because of their mobility.

[4] Negative presence/probable absence survey results obtained using the <u>summer survey guidance</u> are valid for a minimum of two years from the completion of the survey unless new information (e.g., other nearby surveys) suggest otherwise.

No

12. Does the project include activities **within documented Indiana bat habitat**^{[1][2]}?

[1] Documented roosting or foraging habitat – for the purposes of this consultation, we are considering documented habitat as that where Indiana bats and/or NLEB have actually been captured and tracked using (1) radio telemetry to roosts; (2) radio telemetry biangulation/triangulation to estimate foraging areas; or (3) foraging areas with repeated use documented using acoustics. Documented roosting habitat is also considered as suitable summer habitat within 0.25 miles of documented roosts.)

[2] For the purposes of this key, we are considering documented corridors as that where Indiana bats and/or NLEB have actually been captured and tracked to using (1) radio telemetry; or (2) treed corridors located directly between documented roosting and foraging habitat.

No

13. Will the removal or trimming of habitat or trees occur **within** suitable but **undocumented Indiana bat** roosting/foraging habitat or travel corridors?

Yes

- 14. What time of year will the removal or trimming of habitat or trees **within** suitable but **undocumented Indiana bat** roosting/foraging habitat or travel corridors occur^[1]?
 - [1] Coordinate with the local Service Field Office for appropriate dates.
 - B) During the inactive season

15. Does the project include activities **within documented NLEB habitat**^{[1][2]}?

[1] Documented roosting or foraging habitat – for the purposes of this consultation, we are considering documented habitat as that where Indiana bats and/or NLEB have actually been captured and tracked using (1) radio telemetry to roosts; (2) radio telemetry biangulation/triangulation to estimate foraging areas; or (3) foraging areas with repeated use documented using acoustics. Documented roosting habitat is also considered as suitable summer habitat within 0.25 miles of documented roosts.)

[2] For the purposes of this key, we are considering documented corridors as that where Indiana bats and/or NLEB have actually been captured and tracked to using (1) radio telemetry; or (2) treed corridors located directly between documented roosting and foraging habitat.

No

- 16. Will the removal or trimming of habitat or trees occur within suitable but undocumented NLEB roosting/foraging habitat or travel corridors? Yes
- 17. What time of year will the removal or trimming of habitat or trees **within** suitable but **undocumented NLEB** roosting/foraging habitat or travel corridors occur?

B) During the inactive season

- 18. Will *any* tree trimming or removal occur **within** 100 feet of existing road/rail surfaces? *Yes*
- 19. Will the tree removal alter *any* **documented** Indiana bat or NLEB roosts and/or alter any surrounding summer habitat **within** 0.25 mile of a documented roost? *No*
- 20. Will *any* tree trimming or removal occur **between** 100-300 feet of existing road/rail surfaces?

No

21. Are all trees that are being removed clearly demarcated?

Yes

22. Will the removal of habitat or the removal/trimming of trees include installing new or replacing existing **permanent** lighting?

Yes

- 23. Does the project include wetland or stream protection activities associated with compensatory wetland mitigation? *No*
- 24. Does the project include slash pile burning? *No*
- 25. Does the project include *any* bridge removal, replacement, and/or maintenance activities (e.g., any bridge repair, retrofit, maintenance, and/or rehabilitation work)? *No*
- 26. Does the project include the removal, replacement, and/or maintenance of *any* structure other than a bridge? (e.g., rest areas, offices, sheds, outbuildings, barns, parking garages, etc.)

No

- 27. Will the project involve the use of **temporary** lighting *during* the active season? *Yes*
- 28. Is there *any* suitable habitat **within** 1,000 feet of the location(s) where **temporary** lighting will be used?

Yes

- 29. Will the project install *any* new or replace any existing **permanent** lighting in addition to the lighting already indicated for habitat removal (including the removal or trimming of trees) or bridge/structure removal, replacement or maintenance activities? *Yes*
- 30. Is there *any* suitable habitat **within** 1,000 feet of the location(s) where **permanent** lighting (other than the lighting already indicated for habitat removal (including the removal or trimming of trees) or bridge/structure removal, replacement or maintenance activities) will be installed or replaced?

Yes

31. Does the project include percussives or other activities (**not including tree removal**/ **trimming or bridge/structure work**) that will increase noise levels above existing traffic/ background levels?

No

32. Are *all* project activities that are **not associated with** habitat removal, tree removal/ trimming, bridge and/or structure activities, temporary or permanent lighting, or use of percussives, limited to actions that DO NOT cause any additional stressors to the bat species?

Examples: lining roadways, unlighted signage, rail road crossing signals, signal lighting, and minor road repair such as asphalt fill of potholes, etc.

Yes

33. Will the project raise the road profile **above the tree canopy**?

No

34. Are the project activities that are not associated with habitat removal, tree removal/ trimming, bridge and/or structure activities, temporary or permanent lighting, or use of percussives consistent with a No Effect determination in this key?

Automatically answered

Yes, other project activities are limited to actions that DO NOT cause any additional stressors to the bat species as described in the BA/BO

35. Is the habitat removal portion of this project consistent with a Not Likely to Adversely Affect determination in this key?

Automatically answered

Yes, because the tree removal/trimming that occurs outside of the Indiana bat's active season occurs greater than 0.5 miles from the nearest hibernaculum, is less than 100 feet from the existing road/rail surface, includes clear demarcation of the trees that are to be removed, and does not alter documented roosts and/or surrounding summer habitat within 0.25 miles of a documented roost.

36. Is the habitat removal portion of this project consistent with a Not Likely to Adversely Affect determination in this key?

Automatically answered

Yes, because the tree removal/trimming that occurs outside of the NLEB's active season occurs greater than 0.5 miles from the nearest hibernaculum, is less than 100 feet from the existing road/rail surface, includes clear demarcation of the trees that are to be removed, and does not alter documented roosts and/or surrounding summer habitat within 0.25 miles of a documented roost.

37. General AMM 1

Will the project ensure *all* operators, employees, and contractors working in areas of known or presumed bat habitat are aware of *all* FHWA/FRA/FTA (Transportation Agencies) environmental commitments, including all applicable Avoidance and Minimization Measures?

Yes

38. Tree Removal AMM 1

Can *all* phases/aspects of the project (e.g., temporary work areas, alignments) be modified, to the extent practicable, to avoid tree removal^[1] in excess of what is required to implement the project safely?

Note: Tree Removal AMM 1 is a minimization measure, the full implementation of which may not always be practicable. Projects may still be NLAA as long as Tree Removal AMMs 2, 3, and 4 are implemented and LAA as long as Tree Removal AMMs 3, 5, 6, and 7 are implemented.

[1] The word "trees" as used in the AMMs refers to trees that are suitable habitat for each species within their range. See the USFWS' current summer survey guidance for our latest definitions of suitable habitat.

Yes

39. Tree Removal AMM 3

Can tree removal be limited to that specified in project plans and ensure that contractors understand clearing limits and how they are marked in the field (e.g., install bright colored flagging/fencing prior to any tree clearing to ensure contractors stay within clearing limits)?

Yes

40. Tree Removal AMM 4

Can the project avoid cutting down/removal of *all* (1) **documented**^[1] Indiana bat or NLEB roosts^[2] (that are still suitable for roosting), (2) trees **within** 0.25 miles of roosts, and (3) documented foraging habitat any time of year?

[1] The word documented means habitat where bats have actually been captured and/or tracked.

[2] Documented roosting or foraging habitat – for the purposes of this consultation, we are considering documented habitat as that where Indiana bats and/or NLEB have actually been captured and tracked using (1) radio telemetry to roosts; (2) radio telemetry biangulation/triangulation to estimate foraging areas; or (3) foraging areas with repeated use documented using acoustics. Documented roosting habitat is also considered as suitable summer habitat within 0.25 miles of documented roosts.)

41. Lighting AMM 2

Does the lead agency use the BUG (Backlight, Uplight, and Glare) system developed by the Illuminating Engineering Society^{[1][2]} to rate the amount of light emitted in unwanted directions?

[1] Refer to Fundamentals of Lighting - BUG Ratings

[2] Refer to The BUG System—A New Way To Control Stray Light

No

42. Lighting AMM 2

Will *all* **permanent** lighting used during removal of suitable habitat and/or the removal/ trimming of trees within suitable habitat use downward-facing, full cut-off^[1] lens lights (with same intensity or less for replacement lighting)?

[1] Refer to Luminaire classification for controlling stray light

Yes

43. Lighting AMM 2

Will *all* **permanent** lighting used during removal of suitable habitat and/or the removal/ trimming of trees within suitable habitat be directed away from *all* areas with suitable habitat?

Yes

44. Lighting AMM 1

Will *all* **temporary** lighting be directed away from suitable habitat during the active season?

Yes

45. Lighting AMM 2

Does the lead agency use the BUG (Backlight, Uplight, and Glare) system developed by the Illuminating Engineering Society^{[1][2]} to rate the amount of light emitted in unwanted directions?

[1] Refer to Fundamentals of Lighting - BUG Ratings

[2] Refer to The BUG System—A New Way To Control Stray Light

No

46. Lighting AMM 2

Will *all* **permanent** lighting (other than any lighting already indicated for tree clearing or bridge/structure removal, replacement or maintenance activities) use downward-facing, full cut-off^[1] lens lights (with same intensity or less for replacement lighting)?

[1] Refer to <u>Luminaire classification for controlling stray light</u> *Yes*

47. Lighting AMM 2

Will the **permanent** lighting (other than any lighting already indicated for tree clearing or bridge/structure removal, replacement or maintenance activities) be directed away from *all* areas with suitable habitat?

Yes

Project Questionnaire

1. Have you made a No Effect determination for *all* other species indicated on the FWS IPaC generated species list?

Yes

2. Have you made a May Affect determination for *any* other species on the FWS IPaC generated species list?

No

3. How many acres^[1] of trees are proposed for removal between 0-100 feet of the existing road/rail surface?

[1] If described as number of trees, multiply by 0.09 to convert to acreage and enter that number. 1.5

Avoidance And Minimization Measures (AMMs)

This determination key result includes the committment to implement the following Avoidance and Minimization Measures (AMMs):

GENERAL AMM 1

Ensure all operators, employees, and contractors working in areas of known or presumed bat habitat are aware of all FHWA/FRA/FTA (Transportation Agencies) environmental commitments, including all applicable AMMs.

LIGHTING AMM 1

Direct temporary lighting away from suitable habitat during the active season.

LIGHTING AMM 2

When installing new or replacing existing permanent lights, use downward-facing, full cut-off lens lights (with same intensity or less for replacement lighting); or for those transportation agencies using the BUG system developed by the Illuminating Engineering Society, be as close to 0 for all three ratings with a priority of "uplight" of 0 and "backlight" as low as practicable.

TREE REMOVAL AMM 1

Modify all phases/aspects of the project (e.g., temporary work areas, alignments) to avoid tree removal.

TREE REMOVAL AMM 2

Apply time of year restrictions for tree removal when bats are not likely to be present, or limit tree removal to 10 or fewer trees per project at any time of year within 100 feet of existing road/ rail surface and **outside of documented** roosting/foraging habitat or travel corridors; visual emergence survey must be conducted with no bats observed.

TREE REMOVAL AMM 3

Ensure tree removal is limited to that specified in project plans and ensure that contractors understand clearing limits and how they are marked in the field (e.g., install bright colored flagging/fencing prior to any tree clearing to ensure contractors stay within clearing limits).

TREE REMOVAL AMM 4

Do not remove **documented** Indiana bat or NLEB roosts that are still suitable for roosting, or trees within 0.25 miles of roosts, or

documented foraging habitat any time of year.

Determination Key Description: FHWA, FRA, FTA Programmatic Consultation For Transportation Projects Affecting NLEB Or Indiana Bat

This key was last updated in IPaC on December 02, 2019. Keys are subject to periodic revision.

This decision key is intended for projects/activities funded or authorized by the Federal Highway Administration (FHWA), Federal Railroad Administration (FRA), and/or Federal Transit Administration (FTA), which may require consultation with the U.S. Fish and Wildlife Service (Service) under Section 7 of the Endangered Species Act (ESA) for the endangered **Indiana bat** (*Myotis sodalis*) and the threatened **Northern long-eared bat** (NLEB) (*Myotis septentrionalis*).

This decision key should <u>only</u> be used to verify project applicability with the Service's <u>February</u> 5, 2018, FHWA, FRA, FTA Programmatic Biological Opinion for Transportation Projects. The programmatic biological opinion covers limited transportation activities that may affect either bat species, and addresses situations that are both likely and not likely to adversely affect either bat species. This decision key will assist in identifying the effect of a specific project/activity and applicability of the programmatic consultation. The programmatic biological opinion is <u>not</u> intended to cover all types of transportation actions. Activities outside the scope of the programmatic biological opinion, or that may affect ESA-listed species other than the Indiana bat or NLEB, or any designated critical habitat, may require additional ESA Section 7 consultation.

Indiana Department of Environmental Management

We Protect Hoosiers and Our Environment.

100 North Senate Avenue - Indianapolis, IN 46204 (800) 451-6027 - (317) 232-8603 - www.idem.IN.gov

City of Hobart Mayor Brian Snedecor 414 Main Street Hobart , IN 46342 Date

Butler, Fairman and Seufert, Inc. Jennifer Lee 8450 Westfield Blvd. Indianapolis , IN 46240

To Engineers and Consultants Proposing Roadway Construction Projects:

RE: The project proposes to construct a roundabout at the intersection of 61st Avenue and Marcella Boulevard. The approach along Marcella Boulevard to the north of 61st Avenue would be widened to one northbound and one southbound lane. Sidewalk will be installed along select locations. Lighting will be installed at the roundabout. Curb and Gutter will be reconstructed throughout the project area. Storm sewer will be reconstructed to provide storm water runoff for the new intersection improvements by means of an enclosed storm sewer system to convey the stormwater to Turkey Creek.

This letter from the Indiana Department of Environmental Management (IDEM) serves as a standardized response to enquiries inviting IDEM comments on roadway construction, reconstruction, or other improvement projects within existing roadway corridors when the proposed scope of the project is beneath the threshold requiring a formal National Environmental Policy Act-mandated Environmental Assessment or Environmental Impact Statement. As the letter attempts to address all roadway-related environmental topics of potential concern, it is possible that not every topic addressed in the letter will be applicable to your particular roadway project.

For additional information on specific roadway-related topics of interest, please visit the appropriate Web pages cited below, many of which provide contact information for persons within the various program areas who can answer questions not fully addressed in this letter. Also please be mindful that some environmental requirements may be subject to change and so each person intending to include a copy of this letter in their project documentation packet is advised to download the most recently revised version of the letter; found at: http://www.in.gov/idem/5283.htm (http://www.in.gov/idem/5283.htm).

To ensure that all environmentally-related issues are adequately addressed, IDEM recommends that you read this letter in its entirety, and consider each of the following issues as you move forward with the planning of your proposed roadway construction, reconstruction, or improvement project:

WATER AND BIOTIC QUALITY

1. Section 404 of the Clean Water Act requires that you obtain a permit from the U.S. Army Corps of Engineers (USACE) before discharging dredged or fill materials into any wetlands or other waters, such as rivers, lakes, streams, and ditches. Other activities regulated include the relocation, channelization, widening, or other such alteration of a stream, and the mechanical clearing (use of heavy construction equipment) of wetlands. Thus, as a project owner or sponsor, it is your responsibility to ensure that no wetlands are disturbed without the proper permit. Although you may initially refer to the U.S. Fish and Wildlife Service

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National Wetland Inventory maps as a means of identifying potential areas of concern, please be mindful that those maps do not depict jurisdictional wetlands regulated by the USACE or the Department of Environmental Management. A valid jurisdictional wetlands determination can only be made by the USACE, using the 1987 Wetland Delineation Manual.

USACE recommends that you have a consultant check to determine whether your project will abut, or lie within, a wetland area. To view a list of consultants that have requested to be included on a list posted by the USACE on their Web site, see USACE Permits and Public Notices

(http://www.lrl.usace.army.mil/orf/default.asp) (http://www.lrl.usace.army.mil/orf/default.asp (http://www.lrl.usace.army.mil/orf/default.asp)) and then click on "Information" from the menu on the righthand side of that page. Their "Consultant List" is the fourth entry down on the "Information" page. Please note that the USACE posts all consultants that request to appear on the list, and that inclusion of any particular consultant on the list does not represent an endorsement of that consultant by the USACE, or by IDEM.

Much of northern Indiana (Newton, Lake, Porter, LaPorte, St. Joseph, Elkhart, LaGrange, Steuben, and Dekalb counties; large portions of Jasper, Starke, Marshall, Noble, Allen, and Adams counties; and lesser portions of Benton, White, Pulaski, Kosciusko, and Wells counties) is served by the USACE District Office in Detroit (313-226-6812). The central and southern portions of the state (large portions of Benton, White, Pulaski, Kosciosko, and Wells counties; smaller portions of Jasper, Starke, Marshall , Noble, Allen, and Adams counties; and all other Indiana counties located in north-central, central, and southern Indiana) are served by the USACE Louisville District Office (502-315-6733).

Additional information on contacting these U.S. Army Corps of Engineers (USACE) District Offices, government agencies with jurisdiction over wetlands, and other water quality issues, can be found at http://www.in.gov/idem/4396.htm (http://www.in.gov/idem/4396.htm). IDEM recommends that impacts to wetlands and other water resources be avoided to the fullest extent.

- In the event a Section 404 wetlands permit is required from the USACE, you also must obtain a Section 401 Water Quality Certification from the IDEM Office of Water Quality Wetlands Program. To learn more about the Wetlands Program, visit: http://www.in.gov/idem/4384.htm (http://www.in.gov/idem/4384.htm).
- 3. If the USACE determines that a wetland or other water body is isolated and not subject to Clean Water Act regulation, it is still regulated by the state of Indiana . A State Isolated Wetland permit from IDEM's Office of Water Quality (OWQ) is required for any activity that results in the discharge of dredged or fill materials into isolated wetlands. To learn more about isolated wetlands, contact the OWQ Wetlands Program at 317-233-8488.
- 4. If your project will involve over a 0.5 acre of wetland impact, stream relocation, or other large-scale alterations to water bodies such as the creation of a dam or a water diversion, you should seek additional input from the OWQ Wetlands Program staff. Consult the Web at: http://www.in.gov/idem/4384.htm (http://www.in.gov/idem/4384.htm) for the appropriate staff contact to further discuss your project.
- 5. Work within the one-hundred year floodway of a given water body is regulated by the Department of Natural Resources, Division of Water. The Division issues permits for activities regulated under the follow statutes:
 - IC 14-26-2 Lakes Preservation Act 312 IAC 11
 - IC 14-26-5 Lowering of Ten Acre Lakes Act No related code
 - IC 14-28-1 Flood Control Act 310 IAC 6-1
 - IC 14-29-1 Navigable Waterways Act 312 IAC 6
 - IC 14-29-3 Sand and Gravel Permits Act 312 IAC 6
 - IC 14-29-4 Construction of Channels Act No related code
For information on these Indiana (statutory) Code and Indiana Administrative Code citations, see the DNR Web site at: http://www.in.gov/dnr/water/9451.htm (http://www.in.gov/dnr/water/9451.htm) . Contact the DNR Division of Water at 317-232-4160 for further information.

The physical disturbance of the stream and riparian vegetation, especially large trees overhanging any affected water bodies should be limited to only that which is absolutely necessary to complete the project. The shade provided by the large overhanging trees helps maintain proper stream temperatures and dissolved oxygen for aquatic life.

- 6. For projects involving construction activity (which includes clearing, grading, excavation and other land disturbing activities) that result in the disturbance of one (1), or more, acres of total land area, contact the Office of Water Quality Watershed Planning Branch (317/233-1864) regarding the need for of a Rule 5 Storm Water Runoff Permit. Visit the following Web page
 - http://www.in.gov/idem/4902.htm (http://www.in.gov/idem/4902.htm)

To obtain, and operate under, a Rule 5 permit you will first need to develop a Construction Plan (http://www.in.gov/idem/4917.htm#constreq (http://www.in.gov/idem/4917.htm#constreq)), and as described in 327 IAC 15-5-6.5 (http://www.in.gov/legislative/iac/T03270/A00150 [PDF] (http://www.in.gov/legislative/iac/T03270/A00150.PDF), pages 16 through 19). Before you may apply for a Rule 5 Permit, or begin construction, you must submit your Construction Plan to your county Soil and Water Conservation District (SWCD) (http://www.in.gov/isda/soil/contacts/map.html (http://www.in.gov/isda/soil/contacts/map.html)).

Upon receipt of the construction plan, personnel of the SWCD or the Indiana Department of Environmental Management will review the plan to determine if it meets the requirements of 327 IAC 15-5. Plans that are deemed deficient will require re-submittal. If the plan is sufficient you will be notified and instructed to submit the verification to IDEM as part of the Rule 5 Notice of Intent (NOI) submittal. Once construction begins, staff of the SWCD or Indiana Department of Environmental Management will perform inspections of activities at the site for compliance with the regulation.

Please be mindful that approximately 149 Municipal Separate Storm Sewer System (MS4) areas are now being established by various local governmental entities throughout the state as part of the implementation of Phase II federal storm water requirements. All of these MS4 areas will eventually take responsibility for Construction Plan review, inspection, and enforcement. As these MS4 areas obtain program approval from IDEM, they will be added to a list of MS4 areas posted on the IDEM Website at: http://www.in.gov/idem/4900.htm (http://www.in.gov/idem/4900.htm).

If your project is located in an IDEM-approved MS4 area, please contact the local MS4 program about meeting their storm water requirements. Once the MS4 approves the plan, the NOI can be submitted to IDEM.

Regardless of the size of your project, or which agency you work with to meet storm water requirements, IDEM recommends that appropriate structures and techniques be utilized both during the construction phase, and after completion of the project, to minimize the impacts associated with storm water runoff. The use of appropriate planning and site development and appropriate storm water quality measures are recommended to prevent soil from leaving the construction site during active land disturbance and for post construction water quality concerns. Information and assistance regarding storm water related to construction activities are available from the Soil and Water Conservation District (SWCD) offices in each county or from IDEM.

- 7. For projects involving impacts to fish and botanical resources, contact the Department of Natural Resources Division of Fish and Wildlife (317/232-4080) for addition project input.
- 8. For projects involving water main construction, water main extensions, and new public water supplies, contact the Office of Water Quality Drinking Water Branch (317-308-3299) regarding the need for permits.
- For projects involving effluent discharges to waters of the State of Indiana , contact the Office of Water Quality - Permits Branch (317-233-0468) regarding the need for a National Pollutant Discharge Elimination System (NPDES) permit.
- 10. For projects involving the construction of wastewater facilities and sewer lines, contact the Office of Water Quality Permits Branch (317-232-8675) regarding the need for permits.

AIR QUALITY

The above-noted project should be designed to minimize any impact on ambient air quality in, or near, the project area. The project must comply with all federal and state air pollution regulations. Consideration should be given to the following:

1. Regarding open burning, and disposing of organic debris generated by land clearing activities; some types of open burning are allowed (http://www.in.gov/idem/4148.htm (http://www.in.gov/idem/4148.htm)) under specific conditions. You also can seek an open burning variance from IDEM.

However, IDEM generally recommends that you take vegetative wastes to a registered yard waste composting facility or that the waste be chipped or shredded with composting on site (you must register with IDEM if more than 2,000 pounds is to be composted; contact 317/232-0066). The finished compost can then be used as a mulch or soil amendment. You also may bury any vegetative wastes (such as leaves, twigs, branches, limbs, tree trunks and stumps) onsite, although burying large quantities of such material can lead to subsidence problems, later on.

Reasonable precautions must be taken to minimize fugitive dust emissions from construction and demolition activities. For example, wetting the area with water, constructing wind barriers, or treating dusty areas with chemical stabilizers (such as calcium chloride or several other commercial products). Dirt tracked onto paved roads from unpaved areas should be minimized.

Additionally, if construction or demolition is conducted in a wooded area where blackbirds have roosted or abandoned buildings or building sections in which pigeons or bats have roosted for 3-5 years precautionary measures should be taken to avoid an outbreak of histoplasmosis. This disease is caused by the fungus Histoplasma capsulatum, which stems from bird or bat droppings that have accumulated in one area for 3-5 years. The spores from this fungus become airborne when the area is disturbed and can cause infections over an entire community downwind of the site. The area should be wetted down prior to cleanup or demolition of the project site. For more detailed information on histoplasmosis prevention and control, please contact the Acute Disease Control Division of the Indiana State Department of Health at (317) 233-7272.

2. The U.S. EPA and the Surgeon General recommend that people not have long-term exposure to radon at levels above 4 pCi/L. (For a county-by-county map of predicted radon levels in Indiana, visit: http://www.in.gov/idem/4145.htm (http://www.in.gov/idem/4145.htm).)

The U.S. EPA further recommends that all homes (and apartments within three stories of ground level) be tested for radon. If in-home radon levels are determined to be 4 pCi/L, or higher, EPA recommends a follow-up test. If the second test confirms that radon levels are 4 pCi/L, or higher, EPA recommends the installation

of radon-reduction measures. (For a list of qualified radon testers and radon mitigation (or reduction) specialists visit: http://www.in.gov/isdh/regsvcs/radhealth/pdfs/radon_testers_mitigators_list.pdf (http://www.in.gov/isdh/regsvcs/radhealth/pdfs/radon_testers_mitigators_list.pdf).) It also is recommended that radon reduction measures be built into all new homes, particularly in areas like Indiana that have moderate to high predicted radon levels.

To learn more about radon, radon risks, and ways to reduce exposure visit: http://www.in.gov/isdh/regsvcs/radhealth/radon.htm (http://www.in.gov/isdh/regsvcs/radhealth/radon.htm), http://www.in.gov/idem/4145.htm (http://www.in.gov/idem/4145.htm), or http://www.epa.gov/radon/index.html (http://www.epa.gov/radon/index.html).

3. With respect to asbestos removal: all facilities slated for renovation or demolition (except residential buildings that have (4) four or fewer dwelling units and which will not be used for commercial purposes) must be inspected by an Indiana-licensed asbestos inspector prior to the commencement of any renovation or demolition activities. If regulated asbestos-containing material (RACM) that may become airborne is found, any subsequent demolition, renovation, or asbestos removal activities must be performed in accordance with the proper notification and emission control requirements.

If no asbestos is found where a renovation activity will occur, or if the renovation involves removal of less than 260 linear feet of RACM off of pipes, less than 160 square feet of RACM off of other facility components, or less than 35 cubic feet of RACM off of all facility components, the owner or operator of the project does not need to notify IDEM before beginning the renovation activity.

For questions on asbestos demolition and renovation activities, you can also call IDEM's Lead/Asbestos section at 1-888-574-8150.

However, in all cases where a demolition activity will occur (even if no asbestos is found), the owner or operator must still notify IDEM 10 working days prior to the demolition, using the form found at http://www.in.gov/icpr/webfile/formsdiv/44593.pdf (http://www.in.gov/icpr/webfile/formsdiv/44593.pdf).

Anyone submitting a renovation/demolition notification form will be billed a notification fee based upon the amount of friable asbestos containing material to be removed or demolished. Projects that involve the removal of more than 2,600 linear feet of friable asbestos containing materials on pipes, or 1,600 square feet or 400 cubic feet of friable asbestos containing material on other facility components, will be billed a fee of \$150 per project; projects below these amounts will be billed a fee of \$50 per project. All notification remitters will be billed on a quarterly basis.

For more information about IDEM policy regarding asbestos removal and disposal, visit: http://www.in.gov/idem/4983.htm (http://www.in.gov/idem/4983.htm).

- 4. With respect to lead-based paint removal: IDEM encourages all efforts to minimize human exposure to lead-based paint chips and dust. IDEM is particularly concerned that young children exposed to lead can suffer from learning disabilities. Although lead-based paint abatement efforts are not mandatory, any abatement that is conducted within housing built before January 1, 1978, or a child-occupied facility is required to comply with all lead-based paint work practice standards, licensing and notification requirements. For more information about lead-based paint removal visit: http://www.in.gov/isdh/19131.htm (http://www.in.gov/isdh/19131.htm).
- 5. Ensure that asphalt paving plants are permitted and operate properly. The use of cutback asphalt, or asphalt emulsion containing more than seven percent (7%) oil distillate, is prohibited during the months April through October. See 326 IAC 8-5-2, Asphalt Paving Rule

(http://www.ai.org/legislative/iac/T03260/A00080.PDF (http://www.ai.org/legislative/iac/T03260/A00080.PDF)).

- 6. If your project involves the construction of a new source of air emissions or the modification of an existing source of air emissions or air pollution control equipment, it will need to be reviewed by the IDEM Office of Air Quality (OAQ). A registration or permit may be required under 326 IAC 2 (View at: www.ai.org/legislative/iac/t03260/a00020.pdf (http://www.ai.org/legislative/iac/t03260/a00020.pdf).) New sources that use or emit hazardous air pollutants may be subject to Section 112 of the Clean Air Act and corresponding state air regulations governing hazardous air pollutants.
- 7. For more information on air permits visit: http://www.in.gov/idem/4223.htm (http://www.in.gov/idem/4223.htm), or to initiate the IDEM air permitting process, please contact the Office of Air Quality Permit Reviewer of the Day at (317) 233-0178 or OAMPROD atdem.state.in.us.

LAND QUALITY

In order to maintain compliance with all applicable laws regarding contamination and/or proper waste disposal, IDEM recommends that:

- 1. If the site is found to contain any areas used to dispose of solid or hazardous waste, you need to contact the Office of Land Quality (OLQ)at 317-308-3103.
- 2. All solid wastes generated by the project, or removed from the project site, need to be taken to a properly permitted solid waste processing or disposal facility. For more information, visit http://www.in.gov/idem/4998.htm (http://www.in.gov/idem/4998.htm).
- 3. If any contaminated soils are discovered during this project, they may be subject to disposal as hazardous waste. Please contact the OLQ at 317-308-3103 to obtain information on proper disposal procedures.
- 4. If PCBs are found at this site, please contact the Industrial Waste Section of OLQ at 317-308-3103 for information regarding management of any PCB wastes from this site.
- 5. If there are any asbestos disposal issues related to this site, please contact the Industrial Waste Section of OLQ at 317-308-3103 for information regarding the management of asbestos wastes (Asbestos removal is addressed above, under Air Quality).
- 6. If the project involves the installation or removal of an underground storage tank, or involves contamination from an underground storage tank, you must contact the IDEM Underground Storage Tank program at 317/308-3039. See: http://www.in.gov/idem/4999.htm (http://www.in.gov/idem/4999.htm).

FINAL REMARKS

Should you need to obtain any environmental permits in association with this proposed project, please be mindful that IC 13-15-8 requires that you notify all adjoining property owners and/or occupants within ten days your submittal of each permit application. However, if you are seeking multiple permits, you can still meet the notification requirement with a single notice if all required permit applications are submitted with the same ten day period.

Should the scope of the proposed project be expanded to the extent that a National Environmental Policy Act Environmental Assessment (EA) or Environmental Impact Statement (EIS) is required, IDEM will actively participate in any early interagency coordination review of the project.

Meanwhile, please note that this letter does not constitute a permit, license, endorsement or any other form of approval on the part of the Indiana Department of Environmental Management regarding any project for which a copy of this letter is used. Also note that is it the responsibility of the project engineer or consultant using this letter to ensure that the most current draft of this document, which is located at http://www.in.gov/idem/5284.htm (http://www.in.gov/idem/5284.htm), is used.

Signature(s) of the Applicant

I acknowledge that the following proposed roadway project will be financed in part, or in whole, by public monies.

Project Description

The project proposes to construct a roundabout at the intersection of 61st Avenue and Marcella Boulevard. The approach along Marcella Boulevard to the north of 61st Avenue would be widened to one northbound and one southbound lane. Sidewalk will be installed along select locations. Lighting will be installed at the roundabout. Curb and Gutter will be reconstructed throughout the project area. Storm sewer will be reconstructed to provide storm water runoff for the new intersection improvements by means of an enclosed storm sewer system to convey the stormwater to Turkey Creek.

With my signature, I do hereby affirm that I have read the letter from the Indiana Department of Environment that appears directly above. In addition, I understand that in order to complete that project in which I am interested, with a minimum of impact to the environment, I must consider all the issues addressed in the aforementioned letter, and further, that I must obtain any required permits.

Signature of the INDOT
Project Engineer or Other Responsible Agent
Mayor Brian Snedecor
Date: January 6, 2020
Signature of the Jermin La

Jennifer Lee



6100 Southport Road Portage, Indiana 46368 (219) 763-6060 www.nirpc.org

January 31, 2020

Ryan Scott Butler, Fairman and Seufert, Inc. 8450 West Field Blvd., Suite 300 Indianapolis, IN 46240

Re: Des. No. 1902707, 61st Avenue and Marcella Boulevard Roundabout, City of Hobart, Lake County, Indiana

Dear Mr. Scott,

The referenced project is located in a catchment area identified as a Tier 1 Critical Area in the state approved Deep River-Portage Burns Waterway Watershed Management Plan (2016). The stretch of Turkey Creek in which the project area would discharge has been included on the 303(d) List of Impaired Waterbodies for impaired biotic communities, low dissolved oxygen levels and *E. coli* by the Indiana Department of Environmental Management. Data analysis conducted by NIRPC identified channel morphology and low dissolved oxygen levels as significant factors in explaining the impaired biotic communities. Furthermore, the analysis indicates that urban stormwater runoff is the primary contributor of oxygen demanding substances.

NIRPC has invested federal cost-share funding within the City of Hobart and upstream in the Town of Merrillville to begin rectifying this issue. Given the opportunity presented with this project, NIRPC recommends that the roundabout incorporate bioretention in its design to reduce stormwater runoff volume, filter out oxygen demanding substances and reduce water temperatures. Bioretention has been identified as an appropriate best management practice to address these issues in transportation rights-of-way.

An electronic copy of the Deep River-Burns Waterway Watershed Management Plan is available on NIRPC's website. Please do not hesitate to contact me if you should have any questions.

Sincerely,

Senior Water Resource Planner Northwestern Indiana Regional Planning Commission

CLASSIFICATION: UNCLASSIFIED

Hello Jenni,

Your project is important, the request number LRC-2020-00126 (Marcella Boulevard Project, Hobart, Lake County Indiana), (please reference this number in all future correspondence) has been forwarded to the Project Manager Paul Leffler for care and consideration.

Mr. Leffler will contact you soon, as possible, and if additional information is requested during the review of your submittal please email all documents directly to Paul.

The Regulatory Program is committed to protecting the Nation's aquatic resources and navigation capacity, while allowing reasonable development through fair and balanced decisions. Thank you for working with us to successfully achieve this mission. I encourage you to visit our website at:

http://www.lrc.usace.army.mil/Missions/Regulatory.aspx

I thank and appreciate you for all that you do.

Jeneen Harris LRC Administrative Support Assistant U.S. Army Corp of Engineers Regulatory Branch (TSD-R) 231 S. LaSalle Street Chicago, Illinois 60604 #312-846-5526

Be the one instead of the many.....

-----Original Message-----From: Jenni Lee [mailto:JLee@bfsengr.com] Sent: Wednesday, February 12, 2020 8:12 AM To: Harris, Jeneen CIV USARMY CELRC (USA) <Jeneen.Harris@usace.army.mil> Cc: Leffler, Paul M CIV USARMY CELRC (USA) <Paul.M.Leffler@usace.army.mil> Subject: [Non-DoD Source] RE: Early Coordination Request Des No 1902707 (UNCLASSIFIED)

Hello Janeen,

Please find the answers to the questions as requested below.

a) Project name:

Des No 1902707, 61st Avenue and Marcella Boulevard Intersection Improvements, City of Hobart, Lake County Indiana

b) Applicant/Requestor/Client Contact Information (Name, Address, Phone, Email):

Butler, Fairman, and Seufert, Inc. (BF&S),

Attn: Jenni Lee,

8450 Westfield Blvd. Suite 300,

Indianapolis, IN, 46240,

317-713-4615,

jlee@bfsengr.com

c) Latitude and Longitude (in decimal degrees) of the project area:

LAT 41.5072956 N, LONG -87.3141408 W

d) Location description (Address or Cross Streets, City, County, State):

The project is centered on the 61st Avenue and Marcella Boulevard intersection in the City of Hobart, Lake County, Indiana. The project is also located in Sections 2 and 11, Township 35 North, Range 8 West of the United States Geological Survey (USGS) Gary, Indiana Quadrangle.

e) Type of Request (Jurisdictional Determination, Pre-application Meeting, Regional / Nationwide / Individual Permit, No Permit Required Letter, etc):

Early Coordination Request

f) Is this request related to any previous Army Corps reviews? If so, please provide the Army Corps file number for that review.

No.

Jenni Lee Environmental Scientist

Butler, Fairman & Seufert, Inc. 8450 Westfield Blvd., Suite 300 | Indianapolis, IN 46240-8302 | p 317-713-4615 | f 317-713-4616 JLee@bfsengr.com <mailto:JLee@bfsengr.com> | <u>Blockedwww.BFSEngr.com</u>

<Blockedhttp://www.bfsengr.com/bptw.png>

CONFIDENTIALITY NOTICE: This Email and any attachments are confidential and may be protected by legal privilege. If you are not the intended recipient, be aware that any disclosure, copying, distribution, or use of this Email or any attachment is prohibited. If you have received this Email in error, please notify us immediately by returning it to the sender and delete this copy from your system. Thank you. Butler, Fairman & Seufert, Inc.

From: Harris, Jeneen CIV USARMY CELRC (USA) <Jeneen.Harris@usace.army.mil> Sent: Tuesday, February 11, 2020 3:11 PM To: Jenni Lee <JLee@bfsengr.com> Cc: Leffler, Paul M CIV USARMY CELRC (USA) <Paul.M.Leffler@usace.army.mil> Subject: RE: Early Coordination Request Des No 1902707 (UNCLASSIFIED) Importance: High

CLASSIFICATION: UNCLASSIFIED

Hello Jenni,

Please send the following information listed below to go forward with your project.

Our office is attempting to go paperless. So rather than mailing hardcopy applications, plans and other information please submit all new requests via email to CHICAGOREQUESTS@USACE.ARMY.MIL <mailto:CHICAGOREQUESTS@USACE.ARMY.MIL>. To assist us with this effort and to help expedite the processing of your request please provide the following information in the body of your email for ALL new requests:

a) Project name:

b) Applicant/Requestor/Client Contact Information (Name, Address, Phone, Email):

c) Latitude and Longitude (in decimal degrees) of the project area:

d) Location description (Address or Cross Streets, City, County, State):

e) Type of Request (Jurisdictional Determination, Pre-application Meeting, Regional / Nationwide / Individual Permit, No Permit Required Letter, etc):

f) Is this request related to any previous Army Corps reviews? If so, please provide the Army Corps file number for that review.

The Regulatory Program is committed to protecting the Nation's aquatic resources and navigation capacity, while allowing reasonable development through fair and balanced decisions. Thank you for working with us to successfully achieve this mission. I encourage you to visit our website at:

Blockedhttp://www.lrc.usace.army.mil/Missions/Regulatory.aspx

I thank and appreciate you for all that you do.

Jeneen Harris LRC Administrative Support Assistant U.S. Army Corp of Engineers Regulatory Branch (TSD-R) 231 S. LaSalle Street Chicago, Illinois 60604 #312-846-5526

Be the one instead of the many....

-----Original Message-----From: Jenni Lee [mailto:JLee@bfsengr.com] Sent: Friday, January 31, 2020 8:05 AM To: Chicago Requests <</br>

 Chicago Requests
 Chicago Requests@usace.army.mil

 Subject: [Non-DoD Source] FW: Early Coordination Request Des No 1902707

Dear Sirs,

Our firm has been retained by the City of Hobart to prepare an environmental study for the project with Des No 1902707. Please find attached a request for technical assistance from your agency.



Headquarters: 8450 Westfield Blvd., Suite 300 Indianapolis, IN 46240-5920 T 317.713.4615 F 317.713.4616 E bfs@BFSEngr.com www.BFSEngr.com Branch Locations: Ft. Wayne Lafayette Merrillville Plainfield South Bend Louisville



June 11, 2019

This letter is being sent to the following utility contacts:

- 1. Buckeye Partners encroachmentreviews@buckeye.com
- 2. Comcast Cable Larry Smith, Rhonda Dalton
- 3. TransCanada (Crossroads Pipeline Group) <u>US_Crossings@transcanada.com</u>
- 4. Frontier Communications utilitycordreq@ftr.com
- 5. Hobart Utilities Phil Gralik, MaLisa Cox
- 6. Indiana-American Water Co. inutilitycoordination@amwater.com
- 7. Marathon Petroleum Greg Newman
- 8. MCI / Verizon <u>investigations@verizon.com</u>
- 9. Merrillville Conservancy District Keith Scott
- 10. Merrillville Utilities Kevin Markle
- 11. NIPSCO Gas & Electric utilitycoordination@nisource.com

Subject: Initial Notice of Proposed Improvement Project Des. No. (TBD) – 61st Avenue & Marcella Blvd. Intersection Improvements

Our firm has been assigned the task of utility coordination for the project referenced above by the Indiana Department of Transportation & City of Hobart. In accordance with 105 IAC 13-3-1(c), this letter serves as your initial notice of the proposed improvement project Des. No. (TBD) project: 61st Avenue & Marcella Boulevard Intersection Improvements in Hobart, Lake County, Indiana.

In accordance with 105 IAC 13-3-1(c), the following information is provided. The dates listed in items (4) and (5) below are the currently scheduled dates.

(1) Name or route number:	61 st Avenue & Marcella Blvd.
(2) Geographical limits:	Along 61 st Avenue from Mississippi Street to approx. 800-feet
	east of Marcella Blvd & along Marcella Boulevard from 61 st
	Avenue south 400-feet
(3) General description of work:	Roundabout construction, storm sewer, sidewalks
(4) Date approved work plan will	TBD
be needed:	
(5) Letting Date:	December 7, 2022
(6) Name of designer and	Andrea Langille, BF&S E: <u>ALangille@BFSEngr.com</u>
contact information:	
(7) Major or minor project:	Minor

In accordance with 105 IAC 13-3-1(d), within 30 days after receiving the initial notice, the utility shall respond in writing with a:

(1) description of the type and location of its facilities within the geographical limits of the proposed improvement project (facility maps are helpful); or

(2) statement that the utility has no facilities within the geographical limits of the improvement project.(3) documentation of any reimbursable property interest your utility has within the geographical limits of the improvement project

Additionally, please provide us the name, telephone number, postal address and email address of the person selected as your designated contact for this project to expedite future communications. We will contact Indiana 811 and request locates for this project prior to our survey. If you would prefer to provide us location

information by some other means please contact this office to discuss.

If at any time throughout the duration of Utility Coordination to the end of Construction on this project your utility modifies, upgrades, relocates, abandons, or installs new or existing facilities please notify the Utility Coordinator at the contact information below.

Please send your response to Kevin A. Hintz, P.E., Butler, Fairman & Seufert, Inc., 8450 Westfield Blvd. Suite 300, Indianapolis, Indiana, 46240, P: (317) 713-4615, F: (317) 713-4616, <u>UC@BFSEngr.com</u>. Thank you for your attention to these matters.

Sincerely; Kervín /

Kevin A. Hintz, P.E. Utility Coordinator

Enclosure: Location Map KMZ Map File

Cc:

Andrea Langille, BF&S UC@BFSEngr.com

Brittney Layton

From:	Smith, Larry <larry_smith3@comcast.com></larry_smith3@comcast.com>
Sent:	Friday, February 7, 2020 4:06 PM
То:	Utility Coordination
Cc:	Kevin A. Hintz; Andrea Langille
Subject:	RE: Verification of Existing Facilities - 61st & Marcella Intersection Imp Des 1902707 - Hobart, Indiana
Attachments:	AEGIS Map 61st Marcella Hobart.xlsx
Categories:	Hintz Responded & Logged

Kevin, Andrea, Comcast has Overhead and underground Coaxial and Fiber Optic cables in conflict Attached is a (Confidential) overlay of what we have where. Light Blue is Fiber Optic cables Dark Blue and Pink is Coax Red line is on NIPSCO) poles. Green is Underground.

And most likely by the time we get to moving things I am confident there will be more!

When do you think we need to out of conflict???

Thanks again for all your help

Larry Smith Construction Specialist 16 W 84th Dr. Merrillville IN 46410 574-320-8203



From: Utility Coordination <UC@bfsengr.com>

Sent: Friday, February 7, 2020 12:04 PM

To: encroachmentreviews@buckeye.com; Smith, Larry <Larry_Smith3@cable.comcast.com>; Dalton, Rhonda (Contractor) <Rhonda_Dalton@comcast.com>; Buchanan, Alison <Alison.Buchanan@ftr.com>;

jacquely ne. by land@amwater.com; gcnewman@marathonpetroleum.com; lrmorris@marathonpetroleum.com; lrmorris@marathonpetroleum

kscott@mcdin.com; kmarkle@merrillville.in.gov; bgrochowski@nisource.com; OLopez@nisource.com; us_crossings@transcanada.com

Cc: Andrea Langille <ALangille@bfsengr.com>; Utility Coordination <UC@bfsengr.com>; Phillip Gralik <pgralik@cityofhobart.org>

Subject: [EXTERNAL] Verification of Existing Facilities - 61st & Marcella Intersection Imp. - Des 1902707 - Hobart, Indiana

All,

Brittney Layton

From:	OLopez@nisource.com
Sent:	Friday, February 7, 2020 4:41 PM
То:	Utility Coordination
Subject:	Re: Verification of Existing Facilities - 61st & Marcella Intersection Imp Des 1902707 - Hobart, Indiana
Attachments:	61st & Marcella mark up.pdf
Categories:	Hintz Responded & Logged

Kevin,

Please see attached marked-up print for corrected locations of both live gas main and abandoned gas mains in the area of Marcella Blvd and 61st Ave.

- •
- Abandoned 4" Steel Gas main marked in blue runs east to west along south side of 61st Ave from west of Mississippi continues east passed Marcella Blvd.
- Abandoned 2" Plastic Gas main marked in blue runs north from Abandoned Gas Main on South side of 61st Ave east of Mississippi St west of Marcella Blvd.
- Abandoned 3" Plastic Gas main marked in blue runs south from Abandoned Gas Main on south side of 61st Ave along east side of Mississippi St.
- Live 6" Plastic Gas main marked in green along side abandoned steel gas main east to west along south side of 61st Ave from Marcella Blvd
- Live 6" Plastic Gas main marked in green along west side of Marcella Blvd runs south from north side of 61st Ave
- Live 6" Plastic Gas main marked in green along north side of 61st Ave runs west from the west side of Marcella Blvd
- Live 2" Plastic Gas main marked in green north and south along east side of Mississippi St across 61st Ave, ties into 3" Plastic main south of 61st Ave
- Live 2" Plastic Gas main marked in green runs east of Marcella Blvd runs north from 6" Plastic Gas main.

If any questions feel free to contact me.

Thank you

Oscar Lopez | Gas Field Engineering | www.Nipsco.com Associate Field Engineer 1460 E 15th Avenue, Gary, IN 46402 Cell: 219-240-9912 | Colopez@nisource.com

From: Utility Coordination <UC@bfsengr.com>

To: "encroachmentreviews@buckeye.com" <encroachmentreviews@buckeye.com>, "Smith, Larry" <Larry_Smith3@comcast.com>, "rhonda_dalton@comcast.com" <rhonda_dalton@comcast.com>, "Buchanan, Alison" <Alison.Buchanan@ftr.com>, "jacquelyne.byland@amwater.com" <jacquelyne.byland@amwater.com>, "gcnewman@marathonpetroleum.com" <gcnewman@marathonpetroleum.com>, "Irmorris@marathonpetroleum.com" <Irmorris@marathonpetroleum.com>, "kscott@mcdin.com" <kscott@mcdin.com>, "kmarkle@merrillville.in.gov" <kmarkle@merrillville.in.gov>, "bgrochowski@nisource.com"
oBgrochowski@nisource.com>, "OLopez@nisource.com"



- GAS	MAIN ED GAS	Ma	G1st	Ave.
61st	t Ave. @ Marcella I	Blvd.		SCALE 1" = 50'
		Branch Location	INDIANA	BF&S PROJ. # 6371
IS, N. 46240-8302 13-4615 13-4616 gr.com	Butler Fairman Seuferr	LOUISVILLE LAFAYETTE MERRILLVILLE PLAINFIELD	502-593-1996 765-423-5602 219-769-2333 317-839-3242	

61st Ave. and Marcella Blvd. Intersection Improvement - Electric





153 Emerson Avenue Greenwood, IN 46143

MEMORANDUM

To: Kevin Hintz From: Ellen Dado Date: February 28, 2020 Re: Des No 1902707 – Utility Verification

Indiana-American Water has reviewed our distribution maps and the preliminary existing facilities.

Our main is not shown in the provided layout. Please find a detail with water main location and information on the next page.

I will be your primary contact for the project. Feel free to contact me with questions.

Thank You,

Ellen K. Dado

Ellen Dado Engineer 153 Emerson Avenue Greenwood, IN 46143 (317)504-9409 (317)743-9184 Ellen.dado@amwater.com



		→ →		61st Ave	
HE&T	G G G G	G G G G	C OHE&T	61st Ave	
				61st Ave	

IAW at Marcella and 61st



6/1/2020, 10:50:12 AM





Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/ Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community, Copyright nearmap 2015

From:	Scull, Jeff
То:	Brittney Layton; VEATCH, TIM
Subject:	RE: UST & LUST sites, Des. 1902707 61st Ave & Marcella Blvd
Date:	Friday, September 11, 2020 3:25:23 PM
Attachments:	image002.png
	image003.png
	image004.png
	image005.png
	image012.png
	image013.png
	image006.png
	image007.png

Brittney,

Your statement of "If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary" is correct. I would add that if you suspect a release, or you notice indicators that suggest a release (odors, staining, free product, sheen on water surface, etc.), please contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point. Thank You,

Jeff

COVID-19 Resources:

- Indiana State Dept. of Health (ISDH) COVID-19 Call Center: Call 877-826-0011 (available 8:00 am-5:00 pm daily).
- Anthem NurseLine: Call 800-337-4770 or visit the Anthem NurseLine online for a FREE symptom screening. Available to anyone with an Anthem health plan (this includes State of IN employees)
- Anthem Employee Assistance Program (EAP): Available to full-time state employees and their household members regardless of health plan participation. Call 800-223-7723 or visit anthemeap.com (enter State of Indiana) for crisis counseling, help finding child/elder care, legal/financial consultation and much more.





Please take two minutes and complete this brief surve



From: Brittney Layton <BLayton@bfsengr.com> Sent: Friday, September 11, 2020 1:43 PM To: VEATCH, TIM <TVEATCH@idem.IN.gov> Cc: Scull, Jeff <JScull@idem.IN.gov> Subject: RE: UST & LUST sites, Des. 1902707 61st Ave & Marcella Blvd **** This is an EXTERNAL email. Exercise caution. DO NOT open attachments or click links from unknown senders or unexpected email. ****

Thank you Jeff! I appreciate your thoroughness and quick response. For the UST's, does IDEM have any further recommendations or requirements beyond the commitment already listed (*If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary*)?

Good afternoon Tim,

(I'm combining two emails into one to avoid clogging your inboxes with multiple emails.) I hope you don't mind me adding two more sites that got left off the original email to Jeff (see below). Can you tell me if you concur with the commitments listed with each site (highlighted below)? Or does IDEM have any further recommendations/requirements for any of the six sites?

- Shaver Motors Inc., 1550 East 61st Avenue, Merrillville, Indiana, 46410, AI# 16054, is located adjacent to the project area. According to documents found on the IDEM's VFC, IDEM issued a No Further Action Determination pursuant to Remediation Closure Guide on March 30, 2016. Low levels of contamination exist in the area. If excavation occurs in this area, proper handling, removal and disposal of soil and/or groundwater will be necessary.
- Amoco Ss 00554, 4720 West 61st Avenue, Hobart, Indiana 46342, AI# 20846 is located adjacent to the project area. IDEM issued an Approval of No Further Action Status Letter pursuant to the 1994 IDEM Guidance on August 31, 2005. The Approval of No Further Action Status letter states that if construction activities occur on the site in areas where residual contamination remains, IDEM must be notified. According to the IDEM VFC this site operated as a gas station at this location pre-1980. In addition to petroleum contamination, it is likely that lead would be in the soil/groundwater. If excavation occurs in this area, it is likely that petroleum contamination will be encountered. Before proper removal and disposal of soil and/or groundwater, analysis for lead will be necessary. Coordination will be conducted with IDEM before further site activities occur.

Thank you!

Brittney Layton, M.A. Environmental Scientist

Butler, Fairman & Seufert, Inc. 8450 Westfield Blvd., Suite 300 | Indianapolis, IN 46240-8302 | p 317-713-4615 | f 317-713-4616 BLayton@bfsengr.com | www.BFSEngr.com



CONFIDENTIALITY NOTICE: This Email and any attachments are confidential and may be protected by legal privilege. If you are not the intended recipient, be aware that any disclosure, copying, distribution, or use of this Email or any From: Scull, Jeff <<u>JScull@idem.IN.gov</u>>

Sent: Friday, September 11, 2020 1:31 PM

To: Brittney Layton <<u>BLayton@bfsengr.com</u>>

Cc: VEATCH, TIM <<u>TVEATCH@idem.IN.gov</u>>

Subject: RE: UST & LUST sites, Des. 1902707 61st Ave & Marcella Blvd

Brittney,

After reviewing your questions on the email and the comments on the attached project plans I had a couple of comments. Gregory Viator is no longer with IDEM even though his name and contact information appears on the IDEM Regional Staff and Inspectors web page. Ironically he now works for INDOT in the LaPorte District. He may be contacted via email at: <u>mailto:gviator1@indot.in.gov</u>

IDEM keeps track of Underground Storage Tanks using a Facility Identification Number (FID). I have placed the FID number for each site on pages 2 & 3 of the attached project plans.

Your first bullet point about Maris and Sons Roofing, AI# 18304 FID 8777. Our database shows two tanks currently in use. The 3/29/1999 notification (VFC# 22656957) was a temporary closure (closed 1 year or less). The inspection reports indicate the tanks are no longer in use. There is a record showing a closure in-place approval letter from the Office of the State Fire Marshal (VFC# 67700115). Found no records of the in-place closure actually being performed. No permanent closure documentation for the facility has been submitted to IDEM.

Your second bullet point about an Amoco located at 61st Ave. & Mississippi St. AI# 51827 FID 20736. I believe that station was located near where the current Mc Donald's is. I couldn't find any VFC documents related to this site. Our database lists a 7/21/1990 proposed closure date for six tanks, and lists the closure ID as 10574. No record of any permanent closure documentation for the facility being submitted to IDEM.

The third and fourth bullet points could best be answered by the Section Chief of the Petroleum Remediation Section, Tim Veatch. I have included Tim on my reply. Tim's Contact information is: <u>TVEATCH@idem.IN.gov</u>. Tim can also provide information on reporting a suspected release to IDEM.

Speedway 6672 AI# 18619 has FID 15832, and One Stop 238 AI# 23972 has FID 19104.

Please let me know if you have any questions or need additional information.

Thank You, Jeff

COVID-19 Resources:

- Indiana State Dept. of Health (ISDH) COVID-19 Call Center: Call 877-826-0011 (available 8:00 am-5:00 pm daily).
- Anthem NurseLine: Call 800-337-4770 or visit the <u>Anthem NurseLine</u> online for a FREE symptom screening. Available to anyone with an Anthem health plan (this includes State of IN

employees)

• Anthem Employee Assistance Program (EAP): Available to full-time state employees and their household members regardless of health plan participation. Call 800-223-7723 or visit <u>anthemeap.com</u> (enter State of Indiana) for crisis counseling, help finding child/elder care, legal/financial consultation and much more.



Jeff Scull Environmental Manager Petroleum Branch | Office of Land Quality (317) 234-2955 • jscull@idem.IN.gov

Indiana Department of Environmental Management





From: Brittney Layton <<u>BLayton@bfsengr.com</u>>
Sent: Thursday, September 10, 2020 6:25 PM
To: gviator@idem.IN.gov; Scull, Jeff <<u>JScull@idem.IN.gov</u>>
Subject: UST & LUST sites, Des. 1902707 61st Ave & Marcella Blvd

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Good evening Gregory and Jeff,

I am making revisions to an Environmental Document, a CE. As part of that CE, there is a Red Flag Investigation with UST's on it that I was hoping you could advise me regarding the commitments and if any additional actions needed to be taken. My project is Des. No. 1902707, 61st Avenue & Marcella Boulevard Intersection Improvement in the City of Hobart, Lake County, IN. I have attached the project plans with notes about the project, included. Please let me know if I can answer any questions about the project or provide any other information.

- Maris and Son Roofing Incorporated (4400 West 61st Avenue, Hobart, Indiana 46342; AI#: 18304) is located adjacent to the project area. According to documents found on the IDEM VFC, Maris and Sons Roofing submitted a closure request for one (1) 2,000 gallon underground tank which previously held gasoline, and for one (1) 2,000 gallon underground tank which previously held diesel fuel dated September 8, 1999. A letter from IDEM to Maris and Sons Roofing Incorporated, dated March 28, 2017, indicates that closure information for the two USTs is incomplete. If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary.
- Amoco, 61st Avenue and Mississippi Street (Hobart, Indiana 46345; AI#: 51827)is located adjacent to the project area. No information was found regarding this site on the INDEM VFC. If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary.

Brittney Layton

From:	Newman, Gregory C. <gcnewman@marathonpetroleum.com></gcnewman@marathonpetroleum.com>
Sent:	Tuesday, July 7, 2020 8:36 AM
То:	Kevin A. Hintz
Subject:	RE: [EXTERNAL] FW: Verification of Existing Facilities - 61st & Marcella Intersection Imp. - Des 1902707 - Hobart, Indiana

Kevin,

Left you a VM as well but this is going to be the same response basically as the other one for Northwind Parkway. We will need to get a better look at the plans and check depth to see if we need to make any modifications to the pipeline. The pipeline is on the south side of 61st St. it was originally private easement.

Thanks,

Greg Newman Adv. Senior Right of Way Specialist Marathon Pipe Line LLC 20-C Industrial Drive Lexington, OH 44904 Office: 419-884-0800, X-236 Cell: 419-564-8826 Fax: 419-884-3717

From: Kevin A. Hintz <KHintz@bfsengr.com>
Sent: Monday, July 06, 2020 12:45 PM
To: Newman, Gregory C. <gcnewman@marathonpetroleum.com>
Cc: Andrea Langille <ALangille@bfsengr.com>; Utility Coordination <UC@bfsengr.com>
Subject: [EXTERNAL] FW: Verification of Existing Facilities - 61st & Marcella Intersection Imp. - Des 1902707 - Hobart, Indiana

Greg,

Here is the first of two projects we are awaiting confirmation from Marathon that you are involved, and would like to get any easements / figures / construction guidelines that you have.

I will send the second project (which is very close to this one) in a few minutes. Thank you,

Kevin A. Hintz, P.E. Utility and Railroad Coordinator

Butler, Fairman & Seufert, Inc. 8450 Westfield Blvd., Suite 300 | Indianapolis, IN 46240-8302 p (317) 713-4615 | f (317) 713-4616 | c (317) 213-5947 KHintz@bfsengr.com | www.BFSEngr.com

Utility Coordination: UC@BFSEngr.com Railroad Coordination: RR@BFSEngr.com

Appendix D Section 106 of the National Historic Preservation Act (NHPA)

FEDERAL HIGHWAY ADMINISTRATION'S SECTION 4(F) COMPLIANCE REQUIREMENTS (for historic properties) AND SECTION 106 FINDINGS AND DETERMINATIONS AREA OF POTENTIAL EFFECT ELIGIBILITY DETERMINATIONS EFFECT FINDING 61st AVENUE AND MARCELLA BOULEVARD INTERSECTION CITY OF HOBART, LAKE COUNTY, INDIANA DES. NO.: 1902707

AREA OF POTENTIAL EFFECTS (Pursuant to 36 CFR Section 800.4(a)(1))

The project is located at the intersection of 61st Avenue and Marcella Boulevard in Hobart and Ross Townships, City of Hobart, Lake County, Indiana. The Area of Potential Effects (APE) is an irregular cross shape around the intersection and approaches (Appendix B, B4). Approximately 3.0 acres of permanent and 0.5 acre of temporary right-of-way acquisition is anticipated.

ELIGIBILITY DETERMINATIONS

(Pursuant to 36 CFR 800.4(c)(2))

The APE does not contain any properties list in or eligible for listing in the National Register of Historic Places (National Register).

EFFECT FINDING

INDOT, acting on FHWA's behalf, has determined a "No Historic Properties Affected" finding is appropriate for this undertaking. INDOT respectfully requests the Indiana State Historic Preservation Officer provide written concurrence with the Section 106 determination of effect.

SECTION 4(F) COMPLIANCE REQUIREMENTS (for historic properties)

This undertaking will not convert property from any Section 4(f) historic property to a transportation use; the INDOT, acting on FHWA's behalf, has determined the appropriate Section 106 finding is "No Historic Properties Affected"; therefore no Section 4(f) evaluation is required.

Anuradha Kumar V.

Anuradha V. Kumar, for FHWA Manager INDOT Cultural Resources

04/22/2020

Approved Date

FEDERAL HIGHWAY ADMINISTRATION DOCUMENTATION OF SECTION 106 FINDING OF NO HISTORIC PROPERTIES AFFECTED SUBMITTED TO THE STATE HISTORIC PRESERVATION OFFICER PURSUANT TO 36 CFR Section 800.4(d)(1) 61ST AVENUE AND MARCELLA BOULEVARD INTERSECTION CITY OF HOBART, LAKE COUNTY, INDIANA DES. NO.: 1902707

1. DESCRIPTION OF THE UNDERTAKING

The City of Hobart, with funding from the Federal Highway Administration (FHWA) and administrative oversight from the Indiana Department of Transportation (INDOT), proposes to proceed with the 61st Avenue and Marcella Boulevard Project (Des. No. 1920707). Section 106 of the National Historic Preservation Act requires federal agencies to take into account the effects of their undertakings on historic properties. The federal involvement in the project is funding received from the FHWA.

The project is located at the intersection 61st Avenue and Marcella Boulevard, approximately 3.11 miles southwest of downtown Hobart, in Ross and Hobart Townships, Lake County, Indiana. It is on the USGS Gary Quadrangle, in Sections 2 and 11, Township 35 North, Range 8 West (Appendix B, B2).

The need for the project derives from the congestion and the high rate of accidents at the 61st Avenue and Marcella Boulevard intersection. The City of Hobart's 2016 "Southwest Development Area Traffic Study" found the intersection of 61st Avenue and Marcella Boulevard has an existing Level of Service (LOS) of "C". The LOS is anticipated to be "F" in 2038 with the existing intersection configuration. Additionally, from 2016 to 2018 there were 58 recorded accidents at or near the intersection, which is one of the highest accident rates for an intersection within the City of Hobart according to the Hobart Engineering Department. The purpose of this project is to address the future LOS and reduce the number of accidents at the 61st Avenue and Marcella Boulevard intersection.

The project proposes to construct a multi-lane roundabout at the intersection of 61st Avenue and Marcella Boulevard. The existing intersection is controlled by a traffic signal. The speed limit is 40 miles per hour. 61st Avenue is a principal arterial with four through-lanes and Marcella Boulevard is a minor arterial with four through-lanes.

The roundabout will be offset slightly to the south of the existing intersection. The roundabout will have an inner diameter of approximately 104 feet and will carry two 16-foot lanes of traffic with 2-foot wide curb and gutter. The roundabout will have a 10-foot truck apron (Appendix B, B7).

The roundabout will include two east bound and two westbound lanes entering and exiting the roundabout, one south bound lane entering and two south bound lanes exiting the roundabout, two north bound left turn lanes and one through/left/right lane entering and one north bound lane exiting the roundabout. The approach along Marcella Boulevard to the south of 61st Avenue will be widened to a maximum of five travel lanes, consisting of three northbound and two southbound lanes. The approach along Marcella Boulevard to the north of 61st Avenue will be widened to a maximum of two travel lanes, consisting of three northbound and two southbound lanes. The approach along Marcella Boulevard to the north of 61st Avenue will be widened to a maximum of two travel lanes, one northbound and one southbound. A 6-foot wide sidewalk will be installed along the north side of 61st Avenue for the length of the project area and tie into existing sidewalk at the east end of the project area. A 6-foot wide sidewalk will also be installed along the south side of 61st Avenue from Mississippi Street to Marcella Boulevard and continue at 5-feet wide along the west side of Marcella Boulevard. New streetlights will be installed on the roundabout. Existing lighting will be replaced throughout the project area with new LED lights. Curb and gutter will be reconstructed. Storm sewer will be reconstructed to handle storm water runoff for the new intersection improvements by means of an enclosed storm sewer system outletting to Turkey Creek, approximately 730 feet north of the intersection.

A detour using standard barricades and construction signs will be necessary. Approximately 3.0 acres of permanent and 0.5 acre of temporary right-of-way (ROW) acquisition from commercial, agricultural, and residential properties is anticipated. One relocation, in the southwest quadrant of the intersection, is possible.

Land use in the area is commercial, agricultural, and residential. The Area of Potential Effects (APE) includes the existing and proposed ROW, immediately adjacent properties, and those areas where a visual differentiation may occur between an existing structure and the project area. The APE is highly irregular, generally extending across the open farm fields to tree lines, properties, or changes in elevation which interrupt the viewsheds in an irregular cross shape around the intersection and approaches (Appendix B, B4).

2. EFFORTS TO IDENTIFY HISTORIC PROPERTIES

The National Register of Historic Places (National Register) and the Indiana Register of Historic Sites and Structures (State Register) were consulted. No listed properties were found within the APE.

The 1996 *Lake County Interim Report* and the Indiana State Historic Architectural and Archaeological Research Database (SHAARD) were checked by Butler, Fairman, & Seufert, Inc. (BF&S) on November 25, 2019. No previously surveyed properties were located. The Indiana Historic Bridge Inventory (IHBI) was consulted. No bridges listed in the IHBI were found within the APE. An Indiana Division of Historic Preservation and Archaeology (DHPA)-qualified professional with BF&S conducted a site visit on October 29, 2019. Information from the site visit and research regarding historic resources were compiled into a Historic Property Report (HPR; BF&S, February 2, 2020, Appendix C, C1-C2). The HPR did not recommend any properties eligible for the National Register. The HPR was approved by the Indiana Department of Transportation-Cultural Resources Office (INDOT-CRO) on February 5, 2019.

The Indiana State Historic Preservation Officer (SHPO) is considered an automatic consulting party, and an early coordination letter was sent on December 16, 2019. All potential CPs were invited to view the information on INSCOPE <u>http://erms.indot.in.gov/Section106Documents/</u>. In addition to the SHPO, the following individuals and organizations were sent an early coordination letter via email on December 16, 2019 (Appendix E, E1-E7):

Indiana Landmarks Northwest Field Office Lake County Historian Lake County Historical Society and Museum Hobart Historical Society Hobart Historic Preservation Commission Northwestern Indiana Regional Planning Commission Lake County Commissioners Lake County Highway Department City of Hobart Mayor Hobart City Council Hobart Public Works Department Eastern Shawnee Tribe of Oklahoma Miami Tribe of Oklahoma Peoria Tribe of Indians of Oklahoma Pokagon Band of Potawatomi Indians Forest County Potawatomi Community

The Pokagon Band of Potawatomi Indians responded on December 20, 2019, indicating they determined there will be "No Historic Properties in Area of Potential Effect" and requesting contact if any archaeological resources are uncovered (Appendix E, E8).

The Miami Tribe of Oklahoma responded on January 7, 2020, indicating they wished to be a consulting party and stating they had no objections to the proposed project, but noted the project area is within the aboriginal homelands of the Miami Tribe (Appendix E, E9).

The SHPO responded on January 8, 2020 stating, they did not know any additional consulting parties who should be contacted (Appendix E, E10-E11; DHPA No. 24796).

No other responses to the December 16, 2019 early coordination letter were received.

In regard to archaeology, a Phase Ia archaeological reconnaissance was conducted by 106 Consulting, LLC on January 31, 2020. The archaeologist did not locate any archaeological sites within the project area. No further work was recommended in the resulting archaeological short report (ASR; Appendix D, D1-D3). INDOT-CRO approved the ASR on February 5, 2020.

On February 6, 2020, copies of the HPR and ASR (Tribes only) were sent to the SHPO and participating consulting parties were given instructions how to view the reports on INSCOPE (Appendix E, E12-E16).

The Pokagon Band of Potawatomi Indians responded on February 13, 2020, repeating the contents of their December 20, 2019 letter (Appendix E, E17).

The SHPO responded on March 11, 2020 stating, in part, "we agree with the conclusions of the historic property report that there are no above-ground properties listed in or eligible for inclusion in the National Register of Historic Places ("NRHP") within the area of potential effects." The SHPO further stated, "we have not identified any currently known archaeological resources listed in or eligible for inclusion in the NRHP within the proposed project area as indicated in the report; and we concur with the opinion of the archaeologist, as expressed in the Indiana archaeological short report that no further archaeological investigations appear necessary at the proposed project area...." The SHPO also requested additional information about the proposed ROW acquisition to ensure the archaeological investigation covered a sufficient area (Appendix E, E18-E19). Comparison of the approximately 3.5-acre project ROW centered around the intersection to the 13.6-acre archaeological study limits centered around the same intersection (Appendix B, B8) confirms that the former is contained within the latter.

No other responses to the HPR and ASR were received.

3. BASIS FOR FINDING

A recommendation of "No Historic Properties Affected" is appropriate for this undertaking because there are no properties listed in, or eligible for listing in, the National Register within the APE.

A public notice of "No Historic Properties Affected" will be published in the *Times of Northwest Indiana*. A 30-day comment period will be given. This document will be revised, if necessary, after the public notice to reflect any comments received.

APPENDIX

Appendix A: Consulting Parties Appendix B: Graphics Appendix C: Historic Property Short Report Excerpts Appendix D: Archaeological Short Report Excerpts Appendix E: Correspondence

Section 106

APPENDIX C: Historic Property Report Excerpt

HISTORIC PROPERTY REPORT

61st Avenue and Marcella Boulevard City of Hobart, Hobart and Ross Townships, Lake County, Indiana Des. No.: 1902707





Elizabet Biggio Butler, Fairman & Seufert, Inc. 8450 Westfield Blvd., Suite 300 Indianapolis, IN 46240 (317) 713-4615 ebiggio@bfsengr.com February 5, 2020

National Register of Historic Places Eligibility Evaluations and Recommendations

Of the 18 properties within the APE, five properties will meet the 50-year age criteria at time of project letting (2022), while the remaining properties have not achieved significance within the past 50 years. The properties within the APE consist of commercial properties constructed between c. 1989 and 2016 and mid-twentieth century residential properties.

No properties within the APE were rated "notable" or "outstanding"; therefore no properties will be evaluated in-depth for National Register-eligibility. A table of the three "contributing" properties can be found in Appendix C. Non-contributing properties that have reached 50 years of age have been heavily altered and lack substantial design and material integrity.



Figure 2: APE Map (APE indicated in yellow)

Conclusions

The APE contains no properties listed in the National Register.

As a result of identification and evaluation efforts for this project, no properties are recommended eligible for listing in the National Register.

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APPENDIX D: Archaeological Short Report Excerpt

Archaeological Field Reconnaissance for the 61st Avenue & Marcella Boulevard Intersection (Des. 1902707) in Center Township, Lake County, Indiana

Prepared by:

Louis Bubb, MA

Submitted By:

Louis Bubb, MA Principal Investigator 106 Consulting LLC 4425 Redmont Avenue Deer Park, Ohio 45236-3138 (513) 620-6770 LouisBubb@Gmail.com

Prepared for:

Ms. Elizabet Biggio Butler, Fairman & Seufert, Inc. 8450 Westfield Blvd., Suite 300 Indianapolis, IN 46240-8302 (317) 713-4615

Lead Agency: Indiana Department of Transportation

January 31, 2020

Louis Bubb, MA, Principal Investigator Project #106C – 0437



Where applicable, the use of this form is recommended but not required by the Division of Historic Preservation and Archaeology.

Author: Louis Bubb, MA				
	Date (month, day, ye	ar): January 31,	2020]
Project Title: Archae 190270	ological Field Reconnaissance for th 7) in Center Township, Lake Count	e 61st Avenue a y, Indiana	& Marcella Boulevard Inte	rsection (Des.
	PROJECT	OVERVIEV	V	
Project Description:	The City of Hobart proposes to cor Avenue & Marcella Boulevard. Th Avenue would also be widened to a Marcella Boulevard to the north of travel lanes. Curb and gutter and st throughout the project area and an to Turkey Creek, approximately 73 sidewalks and new streetlights wou acres of permanent and 0.5 acres of	astruct a three-la e approach alon a maximum of f 61st Avenue we orm sewer infra enclosed storm 0 feet north of t ald also be instal f temporary righ	ine roundabout at the inters g Marcella Boulevard to the ive travel lanes while the a ould be widened to a maxin structure would be reconst sewer system would conver he intersection. Six (6)-foculed. The acquisition of app at-of-way is anticipated.	section of 61st he south of 61st pproach along mum of two ructed by storm water ot wide proximately 3.0
INDOT Designation	Number/ Contract Number: 190270	07	Project Number:	
DHPA Number:	ŀ	Approved DHPA	A Plan Number:	
Prepared For: Butler, Fairman & Seufert, Inc.				
Contact Person: Ms. Elizabet Biggio				
Address: 8450 Wes	tfield Blvd., Suite 300			
City: Indianapolis		State: IN	ZIP Code: 4624	40- 8302
Telephone Number:	(317) 839-3292	Email Addre	ess:	
Principal Investigator	r: Louis Bubb, MA			
Signature: Jouis of	9			
Company/Institution:	106 Consulting LLC			
Address: 4425 Redmont Avenue				
City: Deer Park		State: OH	ZIP Code: 4523	36-3138
Telephone Number:	(513) 620-6770	Email A	Address: louisbubb@gmai	l.com

No archaeological	sites were encountered	within the pr	oposed project	t area.
			- Frank - Frank - Jrak	

With no archaeological resources listed upon or eligible for inclusion to the National Register of Historic Places being located within or adjacent to the proposed project area, no further archaeological assessment seems warranted.

Comments: Project clearance is recommended.

In the unlikely event that unrecorded archaeological deposits are encountered, construction activities must cease in the vicinity and INDOT-CRO and DHPA contacted to determine the next appropriate actions. Similarly, if human remains are observed, any further disturbance must cease and INDOT-CRO and DHPA must be contacted.

Results

Archaeological records check has determined that the project area does not have the potential to contain
archaeological resources.
\square Archaeological records check has determined that the project area has the potential to contain archaeological resources.
Phase Ia reconnaissance has located no archaeological resources in the project area.
Phase Ia reconnaissance has identified landforms conducive to buried archaeological deposits.
Actual Area Surveyed hectares: 05.5 acres: 13.6
Comments:
Recommendation
The archaeological records check has determined that the project area has the potential to contain archaeological resources and a Phase Ia archaeological reconnaissance is recommended.
The archaeological records check has determined that the project area does not have the potential to contain archaeological resources and no further work is recommended before the project is allowed to proceed.
The Phase Ia archaeological reconnaissance has located no archaeological sites within the project area and it is recommended that the project be allowed to proceed as planned.
The Phase Ia archaeological reconnaissance has determined that the project area includes landforms which have the potential to contain buried archaeological deposits. It is recommended that Phase Ic archaeological subsurface reconnaissance be conducted before the project is allowed to proceed.
The Phase Ia archaeological reconnaissance has determined that the project area is within 100 feet of a cemetery and a Cemetery Development Plan is required per IC-14-21-1-26.5.
Cemetery Name: n/a
Other Recommendations/Commitments:
Pursuant to IC-14-21-1, if any archaeological artifacts or human remains are uncovered during construction, demolition, or earthmoving activities, state law (Indiana Code 14-21-1-27 and 29) requires that the discovery must be reported to the Department of Natural Resources within two (2) business days. In that event, please call (317) 232-1646.

Attachments

- Figure showing project location within Indiana.
- \boxtimes USGS topographic map showing the project area (1:24,000 scale).
- \boxtimes Aerial photograph showing the project area, land use and survey methods.
- Photographs of the project area.
- Project plans (*if available*)



Figure 1: The survey area (in red) on the 1992 1:24,000 Gary topographic quadrangle (USGS 1992). Inset shows the project location in Indiana.


Figure 2: Soils within and adjacent to the survey area (Soil Survey Staff 2020a). Inset shows the project location in Lake County.

Section 106

APPENDIX E: Correspondence



INDIANA DEPARTMENT OF TRANSPORTATION

100 North Senate Avenue Room N642 Indianapolis, Indiana 46204

PHONE: (317) 234-5168

Eric Holcomb, Governor Joe McGuinness, Commissioner

December 16, 2019

This letter was sent to the listed parties.

RE: 61st Avenue and Marcella Boulevard Intersection Project (Des. No. 1902707); City of Hobart, Lake County, IN

Dear Consulting Party (see attached list),

The City of Hobart, with funding from the Federal Highway Administration and administrative oversight from the Indiana Department of Transportation (INDOT), proposes to proceed with an intersection project at 61st Avenue and Marcella Boulevard, Des. No. 1902707. Butler, Fairman, & Seufert is under contract with the City of Hobart to advance the environmental documentation for the referenced project.

This letter is part of the early coordination phase of the environmental review process requesting comments associated with this project. We are requesting comments from your area of expertise regarding any possible environmental effects associated with this project. Please use the above Des. Number and project description in your reply and your comments will be incorporated into the formal environmental study.

The proposed undertaking is at the intersection of 61st Avenue and Marcella Boulevard in Lake County, Indiana. The proposed project limits are approximately 0.08 miles south of the intersection of 61st Avenue and Marcella Boulevard, approximately 0.16 mile east of the intersection, approximately 0.14 mile north of the intersection, and Mississippi Street. It is within Hobart and Ross Townships, USGS Gary, Indiana Quadrangle, in Sections 2 and 11, Township 35 North, Range 8 West.

The need for the project is due to congestion and the high rate of accidents at the intersection of 61st Avenue and Marcella Boulevard. The City of Hobart's 2016 "Southwest Development Area Traffic Study" found the intersection of 61st Avenue and Marcella Boulevard had an existing Level of Service (LOS) of "C". The LOS is anticipated to be "F" in 2038 with the existing intersection configuration. Additionally, from 2016 to 2018 there were 58 recorded accidents at or near the intersection, which is one of the highest accident rates for an intersection within the City of Hobart according to the Hobart Engineering Department. The purpose of this project is to address the LOS and reduce the number of accidents at the 61st Avenue and Marcella Boulevard intersection.

The project proposes to construct a three-lane roundabout. The approaches along Marcella Boulevard would be widened to a maximum of five travel lanes, three northbound and two southbound. Excavation would be a maximum of 10 feet. A drainage outlet to Turkey Creek, north of the project area, may be installed.

Approximately 3.0 acres of permanent and 0.5 acre of temporary right-of-way acquisition would be anticipated. The project would require closure of the intersection and the institution of a detour, likely utilizing Mississippi Street, 69th Street, and Colorado Street.



Section 106 of the National Historic Preservation Act requires federal agencies to take into account the effects of their undertakings on historic and archaeological properties. In accordance with 36 CFR 800.2 (c), you are hereby requested to be a consulting party to participate in the Section 106 process. Entities that have been invited to participate in the Section 106 consultation process for this project are identified in the attached list. Per 36 CFR 800.3(f), we hereby request that the Indiana State Historic Preservation Officer (SHPO) notify this office if the SHPO staff is aware of any other parties that may be entitled to be consulting parties or should be contacted as potential consulting parties for the project.

The Section 106 process involves efforts to identify historic properties potentially affected by the undertaking, assess its effects and seek ways to avoid, minimize or mitigate any adverse effects on historic properties. For more information regarding the protection of historic resources, please see the Advisory Council on Historic Preservation's guide: *Protecting Historic Properties: A Citizen's Guide to Section 106 Review* available online at https://www.achp.gov/sites/default/files/documents/2017-01/CitizenGuide.pdf .

The Area of Potential Effects (APE) is the area in which the proposed project may cause alterations in the character or use of historic resources. At this time, no cultural resource investigations have occurred; however, the results of cultural resource identification and evaluation efforts, both above-ground and archaeological, will be forthcoming. Consulting parties will receive notification when these reports are completed.

Please review the information and comment within thirty (30) calendar days of receipt. If you indicate that you do not desire to be a consulting party, or if you do not respond, you will not be included on the list of consulting parties for this project. If we do not receive your response in the time allotted, the project will proceed consistent with the proposed design and you will not receive further information about the project unless the design changes.

All future responses regarding the proposed project should be forwarded to Butler, Fairman, & Seufert at the following address:

Elizabet Biggio Architectural Historian II Butler, Fairman, & Seufert, Inc. 8450 Westfield Boulevard, Suite 300 Indianapolis, IN 46240 ebiggio@bfsengr.com

Tribal contacts may contact Shaun Miller at smiller@indot.in.gov or 317-233-6795 or Michelle Allen at FHWA at michelle.allen@dot.gov or 317-226-7344.

Sincerely,

Anuradha V. Kumar, Manager Cultural Resources Office Environmental Services

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Enclosures:

Topographic Map



Distribution List:

Indiana State Historic Preservation Officer Indiana Landmarks Northwest Field Office Lake County Historian Lake County Historical Society and Museum Hobart Historical Society Hobart Historic Preservation Commission Northwestern Indiana Regional Planning Commission Lake County Commissioners Lake County Highway Department City of Hobart Mayor Hobart City Council Hobart Public Works Department Eastern Shawnee Tribe of Oklahoma Miami Tribe of Oklahoma Peoria Tribe of Indians of Oklahoma Pokagon Band of Potawatomi Indians Forest County Potawatomi Community



Elizabet Biggio

From:	Elizabet Biggio
Sent:	Monday, December 16, 2019 2:33 PM
То:	Slider, Chad (DNR); 'northwest@indianalandmarks.org'; 'bwoods_mhs@yahoo.com'; 'hobarthistory@gmail.com': 'cityplanner@cityofhobart.org': 'nirpc@nirpc.org':
	'mcrepay@comcast.net'; 'zemensx@lakecountyin.org';
	'mayorsnedecor@cityofhobart.org'; 'jhuddlestun@cityofhobart.org';
	'Imaggio@cityofhobart.org'; 'dave@davevinzant.com'; 'clerk-
	treasurer@cityofhobart.org';
Cc:	Ross, Anthony
Subject:	FHWA Project: Des. No. 1902707; Project Name and County, Indiana
Attachments:	61standMarcellaIntersection_Des1902707_SHPOSubmittalForm_2019-12-16.pdf
Categories:	Filed by Newforma

Des. No.: 1902707 **Project Description:** Intersection Improvement **Location:** 61st Avenue and Marcella Boulevard, City of Hobart, Lake County, IN

The City of Hobart, with funding from the Federal Highway Administration and administrative oversight from the Indiana Department of Transportation, proposes to proceed with an intersection improvement project at 61st Avenue and Marcella Boulevard (Des. No. 1902707).

Section 106 of the National Historic Preservation Act requires federal agencies to take into account the effects of their undertakings on historic properties. The following agencies/individuals are being invited to become consulting parties:

Indiana State Historic Preservation Officer Indiana Landmarks Northwest Field Office Lake County Historian Lake County Historical Society and Museum Hobart Historical Society Hobart Historic Preservation Commission Northwestern Indiana Regional Planning Commission Lake County Commissioners Lake County Highway Department City of Hobart Mayor Hobart City Council Hobart Public Works Department Eastern Shawnee Tribe of Oklahoma Miami Tribe of Oklahoma Peoria Tribe of Indians of Oklahoma Pokagon Band of Potawatomi Indians Forest County Potawatomi Community

This letter is part of the early coordination phase of the environmental review process requesting comments associated with this project. We are requesting comments from your area of expertise regarding any possible environmental effects associated with this project. Please use the above Des. Number and project description in your reply and your comments will be incorporated into the formal environmental study.

Please review the attached letter, which is also located in IN SCOPE at <u>http://erms.indot.in.gov/Section106Documents/</u> (the Des. No. is the most efficient search term, once in IN SCOPE), and respond with your comments on any historic resource impacts incurred as a result of this project so that an environmental report can be completed. We also welcome your related opinions and other input to be considered in the preparation of the environmental document. If a hard copy of the materials is needed, please respond to this email with your request within seven (7) days.

Consulting parties have thirty (30) calendar days from receipt of this information to review and provide comments. If we do not receive a response from an invited consulting party within the time allotted, the project will proceed consistent with the proposed design. Therefore, if we do not receive a response within thirty (30) days, your agency or organization will not receive any further information on the project unless the scope of work changes.

Tribal contacts may contact Shaun Miller at <u>smiller@indot.in.gov</u> or 317-233-6795 or Michelle Allen at FHWA at <u>michelle.allen@dot.gov</u> or 317-226-7344.

Thank you in advance for your input,

Elizabet Biggio Architectural Historian II

Butler, Fairman & Seufert, Inc. 8450 Westfield Blvd., Suite 300 | Indianapolis, IN 46240-8302 p (317) 713-4615 | f (317) 713-4616 EBiggio@bfsengr.com| www.BFSEngr.com

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Elizabet Biggio

From:	Ross, Anthony <aross3@indot.in.gov></aross3@indot.in.gov>
Sent:	Tuesday, December 17, 2019 7:50 AM
То:	thpo@estoo.net; 'dhunter@miamination.com'; lpappenfort@peoriatribe.com; Matthew
	Bussler (Matthew.Bussler@pokagonband-nsn.gov); michael.laronge@fcpotawatomi-
	nsn.gov
Cc:	Elizabet Biggio; Miller, Shaun (INDOT); Allen, Michelle (FHWA); Branigin, Susan; Kumar,
	Anuradha; Spiess, Jessica J; pgralik@cityofhobart.org
Subject:	FHWA Project: Des. No. 1902707; 61st and Marcella Boulevard Intersection, Lake
	County, Indiana
Attachments:	61stMarcella_Des1902707_ECL_2019-12-16.pdf

Des. No.: 1902707

Project Description: Intersection Improvement **Location:** 61st Avenue and Marcella Boulevard, City of Hobart, Lake County, IN

The City of Hobart, with funding from the Federal Highway Administration and administrative oversight from the Indiana Department of Transportation, proposes to proceed with an intersection improvement project at 61st Avenue and Marcella Boulevard (Des. No. 1902707).

Section 106 of the National Historic Preservation Act requires federal agencies to take into account the effects of their undertakings on historic properties. The following agencies/individuals are being invited to become consulting parties:

Indiana State Historic Preservation Officer Indiana Landmarks Northwest Field Office Lake County Historian Lake County Historical Society and Museum Hobart Historical Society Hobart Historic Preservation Commission Northwestern Indiana Regional Planning Commission Lake County Commissioners Lake County Highway Department City of Hobart Mayor Hobart City Council Hobart Public Works Department Eastern Shawnee Tribe of Oklahoma Miami Tribe of Oklahoma Peoria Tribe of Indians of Oklahoma Pokagon Band of Potawatomi Indians Forest County Potawatomi Community

This letter is part of the early coordination phase of the environmental review process requesting comments associated with this project. We are requesting comments from your area of expertise regarding any possible environmental effects associated with this project. Please use the above Des. Number and project description in your reply and your comments will be incorporated into the formal environmental study.

Please review the attached letter, which is also located in IN SCOPE at <u>http://erms.indot.in.gov/Section106Documents/</u> (the Des. No. is the most efficient search term, once in IN SCOPE), and respond with your comments on any historic resource impacts incurred as a result of this project so that an environmental report can be completed. We also

welcome your related opinions and other input to be considered in the preparation of the environmental document. If a hard copy of the materials is needed, please respond to this email with your request within seven (7) days.

Consulting parties have thirty (30) calendar days from receipt of this information to review and provide comments. If we do not receive a response from an invited consulting party within the time allotted, the project will proceed consistent with the proposed design. Therefore, if we do not receive a response within thirty (30) days, your agency or organization will not receive any further information on the project unless the scope of work changes.

Tribal contacts may contact Shaun Miller at <u>smiller@indot.in.gov</u> or 317-233-6795 or Michelle Allen at FHWA at <u>michelle.allen@dot.gov</u> or 317-226-7344.

Thank you in advance for your input,

Anthony Ross, Ph.D. LPA Program Administrator Cultural Resources Office Environmental Services 100 N. Senate Ave., Room N642-ES Indianapolis, IN 46204 Office: (317) 234-0142 Email: aross3@indot.in.gov



** Historic Property Report (HPR) guidelines can be found here



Pokégnek Bodéwadmik * Pokagon Band of Potawatomi Department of Language and Culture

59291 Indian Lake Road • Dowagiac, MI 49047 • www.PokagonBand-nsn.gov (269) 462-4316 • (269) 782-2499 fax

12/20/2019

Shaun Miller INDOT Phone: 317-233-6795 Email: <u>SMiller@indot.in.gov</u>

FHWA Project: Des. No. 1902707; 61st and Marcella Boulevard Intersection, Lake County, Indiana – City of Hobart

Dear Responsible Party:

Migwetth for contacting me regarding these projects. As THPO, I am responsible for handling Section 106 Consultations on behalf of the tribe. I am writing to inform you that after reviewing the details for the project referenced above, I have made the determination that there will be **No Historic Properties in Area of Potential Effects (APE)** significant to the Pokagon Band of Potawatomi Indians. However, if any archaeological resources are uncovered during this undertaking, please stop work and contact me immediately. Should you have any other questions, please don't hesitate to contact me at your earliest convenience.

Sincerely,

Matthe Bussler

Matthew J.N. Bussler Tribal Historic Preservation Officer Pokagon Band of Potawatomi Indians Office: (269) 462-4316 Cell: (269) 519-0838 Matthew.Bussler@Pokagonband-nsn.gov

A progressive community focused on culture and the most innovative opportunities for all of our citizens.



Miami Tribe of Oklahoma

3410 P St. NW, Miami, OK 74354 • P.O. Box 1326, Miami, OK 74355 Ph: (918) 541-1300 • Fax: (918) 542-7260 www.miamination.com



Via email: smiller@indot.IN.gov

January 7, 2020

Shaun Miller Archaeological Team Lead Cultural Resources Office, Indiana DOT 575 North Pennsylvania Street Indianapolis, IN 46204

Re: Des. No. 1902707 61st and Marcella Boulevard Intersection, Lake County, Indiana – Comments of the Miami Tribe of Oklahoma

Dear Mr. Miller:

Aya, kikwehsitoole – I show you respect. My name is Diane Hunter, and I am the Tribal Historic Preservation Officer for the Federally Recognized Miami Tribe of Oklahoma. In this capacity, I am the Miami Tribe's point of contact for all Section 106 issues.

The Miami Tribe offers no objection to the above-mentioned project at this time, as we are not currently aware of existing documentation directly linking a specific Miami cultural or historic site to the project site. However, as this project is within the aboriginal homelands of the Miami Tribe, if any human remains or Native American cultural items falling under the Native American Graves Protection and Repatriation Act (NAGPRA) or archaeological evidence is discovered during any phase of this project, the Miami Tribe requests immediate consultation with the entity of jurisdiction for the location of discovery. In such a case, please contact me at 918-541-8966 or by email at <u>dhunter@miamination.com</u> to initiate consultation.

The Miami Tribe accepts the invitation to serve as a consulting party to the proposed project. In my capacity as Tribal Historic Preservation Officer I am the point of contact for consultation.

Respectfully,

Diane Stunter

Diane Hunter Tribal Historic Preservation Officer



Indiana Department of Natural Resources

Eric Holcomb, Governor Cameron F. Clark, Director

Division of Historic Preservation & Archaeology · 402 W. Washington Street, W274 · Indianapolis, IN 46204-2739 Phone 317-232-1646 · Fax 317-232-0693 · dhpa@dnr.IN.gov · www.IN.gov/dnr/historic



January 8, 2020

Elizabet Biggio Architectural Historian II Butler, Fairman, & Seufert, Inc. 8450 Westfield Boulevard, Suite 300 Indianapolis, Indiana 46240

> Federal Agency: Indiana Department of Transportation ("INDOT"), on behalf of Federal Highway Administration, Indiana Division ("FHWA")

Re: Early coordination information concerning the 61st Avenue and Marcella Boulevard intersection project in Hobart, Lake County, Indiana (Des. No, 1902707; DHPA No. 24796)

Dear Ms. Biggio:

Pursuant to Section 106 of the National Historic Preservation Act of 1966, as amended (54 U.S.C. § 306108), implementing regulations at 36 C.F.R. Part 800, the "Programmatic Agreement Among the Federal Highway Administration, the Indiana Department of Transportation, the Indiana State Historic Preservation Officer, and the Advisory Council on Historic Preservation Regarding the Management and Preservation of Indiana's Historic Bridges" ("Indiana Historic Bridges PA"), and the "Programmatic Agreement (PA) Among the Federal Highway Administration, the Indiana Department of Transportation, the Advisory Council on Historic Preservation and the Indiana State Historic Preservation Officer Regarding the Implementation of the Federal Aid Highway Program In the State of Indiana," the staff of the Indiana State Historic Preservation Officer ("Indiana SHPO" or "INDNR-DHPA") has reviewed INDOT's December 16, 2019 early coordination letter, which we received with your review request submittal form on December 19, 2019 for the aforementioned project.

We are not aware of any parties who should be invited to participate in the Section 106 consultation on this federal undertaking, beyond those whom INDOT already has invited. In your next regular correspondence on this project, please advise us as to which of the invited consulting parties has accepted the invitation.

We look forward to reviewing the proposed area of potential effects and the reports on investigations of above-ground cultural resources and archaeological resources that the early coordination letter indicated will be forthcoming.

The Indiana SHPO staff's archaeological reviewer for this project is Wade T. Tharp, and the structures reviewer is Chad Slider. However, if you have a question about the Section 106 process, please contact initially the INDOT Cultural Resources staff members who are assigned to this project.

The DNR mission: Protect, enhance, preserve and wisely use natural, cultural and recreational resources for the benefit of Indiana's citizens through professional leadership, management and education.

www.DNR.IN.gov An Equal Opportunity Employer Elizabet Biggio January 8, 2020 Page 2

In all future correspondence about the the 61st Avenue and Marcella Boulevard intersection project in Hobart, Lake County, Indiana (Des. No. 1902707), please refer to DHPA No. 24796.

Very truly yours,

had W. Slidy

Beth K. McCord Deputy State Historic Preservation Officer

BKM:CWS:cws

emc: Anuradha Kumar, INDOT Shaun Miller, INDOT Susan Branigin, INDOT Shirley Clark, INDOT February 5, 2020

This letter was sent to the listed parties.

RE: 61st Avenue and Marcella Boulevard Intersection Project, Des. No. 1902707, DHPA #24769

Dear Consulting Party (see attached list),

The City of Hobart, with funding from the Federal Highway Administration (FHWA) and administrative oversight from the Indiana Department of Transportation (INDOT), proposes to proceed with an intersection project at 61st Avenue and Marcella Boulevard, Des. No. 1902707.

This letter is part of the Section 106 review process for this project. Section 106 of the National Historic Preservation Act requires federal agencies to take into account the effects of their undertakings on historic and archaeological properties. We are requesting comments from you regarding the possible effects of this project. Please use the above Des. Number and project description in your reply and your comments will be incorporated into the formal environmental study.

A Section 106 early coordination letter was distributed on December 16, 2019.

The proposed undertaking is on 61st Avenue and Marcella Boulevard from approximately 0.08 miles south of the intersection of 61st Avenue and Marcella Boulevard to approximately 0.14 mile north of the intersection and from approximately 0.16 mile east of the intersection to Mississippi Street in Lake County, Indiana. It is within Hobart and Ross Townships, USGS Gary, Indiana Quadrangle, in Sections 2 and 11, Township 35 North, Range 8 West.

The need for the project is due to the congestion and the high rate of accidents at the intersection of 61st Avenue and Marcella Boulevard. The City of Hobart's 2016 "Southwest Development Area Traffic Study" found the intersection of 61st Avenue and Marcella Boulevard had an existing Level of Service (LOS) of "C". The LOS is anticipated to be "F" in 2038 with the existing intersection configuration. Additionally, from 2016 to 2018 there were 58 recorded accidents at or near the intersection, which is one of the highest accident rates for an intersection within the City of Hobart according to the Hobart Engineering Department. The purpose of this project is to address the LOS and reduce the number of accidents at the 61st Avenue and Marcella Boulevard intersection.

The project proposes to construct a three-lane roundabout at the intersection of 61st Avenue and Marcella Boulevard. The roundabout may be offset slightly to the southwest of the existing intersection, pending further study. The roundabout would include two eastbound and two westbound lanes entering and exiting the roundabout, one south bound lane entering and two south bound lanes exiting the roundabout, two north bound left turn lanes and one thru/left/right lane entering and a single north bound lane exiting the roundabout. The

approach along Marcella Boulevard to the south of 61st Avenue would be widened to a maximum of five travel lanes, three northbound and two southbound. The approach along Marcella Boulevard to the north of 61st Avenue would be widened to a maximum of two travel lanes, one northbound and one southbound. Six (6)-foot wide concrete sidewalk would be installed along the north side of 61st Avenue for the length of the project area and tie into existing sidewalk at the east end of the project area. A 6-foot wide sidewalk would also be installed along the south side of 61st Avenue from Mississippi Street to Marcella Boulevard and continue south along the west side of Marcella Boulevard. New streetlights would be installed on the roundabout. Existing lighting would be replaced throughout the project area with new LED lights. Curb and gutter would be reconstructed. Storm sewer would be reconstructed to handle storm water runoff for the new intersection improvements by means of an enclosed storm sewer system outletting to Turkey Creek, approximately 730 feet north of the intersection.

Approximately 3.0 acres of permanent and 0.5 acre of temporary right-of-way acquisition would be anticipated. The project would require closure of the intersection and the institution of a detour, likely utilizing Mississippi Street, 62nd Avenue, 69th Street, and Colorado Street.

Butler, Fairman, & Seufert is under contract with the City of Hobart to advance the environmental documentation for the referenced project. 106 Consulting, LLC has been subcontracted to complete archaeological documentation for this project.

In accordance with 36 CFR 800.2 (c), you were invited to become a consulting party as part of the Section 106 process, or you are hereby invited to become a consulting party as part of the Section 106 process. Entities that have previously accepted consulting party status--as well as additional entities that are currently being invited to become consulting parties--are identified in the attached list.

The Section 106 process involves efforts to identify historic properties potentially affected by the undertaking, assess its effects and seek ways to avoid, minimize or mitigate any adverse effects on historic properties. For more information regarding the protection of historic resources, please see the Advisory Council on Historic Preservation's guide: Protecting Historic Properties: A Citizen's Guide to Section 106 Review available online at <u>https://www.achp.gov/sites/default/files/documents/2017-01/CitizenGuide.pdf</u>.

The Area of Potential Effects (APE) is the area in which the proposed project may cause alterations in the character or use of historic resources. The APE contains no resources listed in the National Register of Historic Places (NRHP).

A historian who meets the Secretary of the Interior's Professional Qualification Standards identified and evaluated above-ground resources within the APE for potential eligibility for the NRHP. As a result of the historic property identification and evaluation efforts, no properties were recommended eligible for listing in the NRHP.

With regard to archaeological resources, an archaeologist who meets the Secretary of the Interior's Professional Qualification Standards did not identify any archaeological sites within the project area. As a result of these efforts, no further work is recommended.

The Historic Property Report and Archaeological Short Report (Tribes only) are available for review in IN SCOPE at <u>https://erms.indot.in.gov/Section106Documents/</u> (the Des. No. is the most efficient search term, once in IN SCOPE). You are invited to review these documents and respond with comments on any historic resource impacts incurred as a result of this project so that an environmental report can be completed. We also welcome

your related opinions and other input to be considered in the preparation of the environmental document. If you prefer a hard copy of this material, please respond to this email with your request within seven (7) days.

Please review the information and comment within thirty (30) calendar days of receipt. If you indicate that you do not desire to be a consulting party or if you have not previously accepted consulting party status and you do not respond to this letter, you will not be included on the list of consulting parties for this project and will not receive further information about the project unless the design changes.

For questions concerning specific project details, you may contact Elizabet Biggio of Butler, Fairman, & Seufert, Inc. at 317-713-4615 or ebiggio@bfsengr.com. All future responses regarding the proposed project should be forwarded to Butler, Fairman, & Seufert, Inc. at the following address:

Elizabet Biggio Architectural Historian II Butler, Fairman, & Seufert, Inc. 8450 Westfield Boulevard, Suite 300 Indianapolis, IN 46240 <u>ebiggio@bfsengr.com</u>

Tribal contacts may contact Shaun Miller at smiller@indot.in.gov or 317-233-6795 or Michelle Allen at FHWA at michelle.allen@dot.gov or 317-226-7344.

Sincerely,

Anuradha V. Kumar, Manager Cultural Resources Office Environmental Services

Enclosures:

Historic Property Report Archaeological Short Report See Appendix C and Appendix D

Distribution List:

Indiana State Historic Preservation Officer Pokagon Band of Potawatomi Indians Miami Tribe of Oklahoma

From:	Elizabet Biggio
To:	Tharp, Wade; Slider, Chad (DNR)
Cc:	Ross, Anthony; "Coon, Matthew"; Jenni Lee; Andrea Langille
Subject:	FHWA Project: Des. No. 1902707; 61st Avenue and Marcella Boulevard Intersection
Date:	Thursday, February 6, 2020 8:16:58 AM

Des. No.: 1902707

Project Description: Intersection Improvement

Location: 61st Avenue and Marcella Boulevard, City of Hobart, Lake County, IN

The City of Hobart, with funding from the Federal Highway Administration and administrative oversight from the Indiana Department of Transportation, proposes to proceed with an intersection improvement project at 61st Avenue and Marcella Boulevard (Des. No. 1902707). The Section 106 Early Coordination Letter for this project was originally distributed on December 16, 2019.

As part of Section 106 of the National Historic Preservation Act, a Historic Property Report and an Archaeological Short Report (Tribes only) have been prepared and are ready for review and comment by consulting parties.

Please review this documentation located in IN SCOPE at <u>http://erms.indot.in.gov/Section106Documents/</u> (the Des. No. is the most efficient search term,

once in IN SCOPE), and respond with any comments that you may have. If a hard copy of the materials is needed, please respond to this email with your request within seven (7) days.

Consulting parties have thirty (30) calendar days from receipt of this information to review and provide comment. Tribal contacts may contact Shaun Miller at smiller@indot.in.gov or 317-233-6795 or Michelle Allen at FHWA at michelle.allen@dot.gov or 317-226-7344.

Thank you in advance for your input,

Elizabet Biggio Architectural Historian

Butler, Fairman & Seufert, Inc. 8450 Westfield Blvd., Suite 300 | Indianapolis, IN 46240-8302 | p 317-713-4615 | f 317-713-4616 EBiggio@bfsengr.com | www.BFSEngr.com



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From:	Ross, Anthony			
To:	<u>"dhunter@miamination.com";</u> Matthew Bussler (Matthew.Bussler@pokagonband-nsn.gov)			
Cc:	Coon, Matthew; Miller, Shaun (INDOT); Branigin, Susan; Elizabet Biggio; pgralik@cityofhobart.org; Spiess, Jessica J; Allen, Michelle (FHWA)			
Subject:	FHWA Project: Des. No. 1902707; 61st Avenue and Marcella Boulevard Intersection, Hobart, Lake Co., Indiana			
Date:	Thursday, February 6, 2020 1:29:14 PM			
Attachments:	image001.png image002.png image003.png image004.png image006.png			

Des. No.: 1902707

Project Description: Intersection Improvement

Location: 61st Avenue and Marcella Boulevard, City of Hobart, Lake County, IN

The City of Hobart, with funding from the Federal Highway Administration and administrative oversight from the Indiana Department of Transportation, proposes to proceed with an intersection improvement project at 61st Avenue and Marcella Boulevard (Des. No. 1902707). The Section 106 Early Coordination Letter for this project was originally distributed on December 16, 2019.

As part of Section 106 of the National Historic Preservation Act, a Historic Property Report and an Archaeological Short Report (Tribes only) have been prepared and are ready for review and comment by consulting parties.

Please review this documentation located in IN SCOPE at

<u>http://erms.indot.in.gov/Section106Documents/</u> (the Des. No. is the most efficient search term, once in IN SCOPE), and respond with any comments that you may have. If a hard copy of the materials is needed, please respond to this email with your request within seven (7) days.

Consulting parties have thirty (30) calendar days from receipt of this information to review and provide comment. Tribal contacts may contact Shaun Miller at <u>smiller@indot.in.gov</u> or 317-233-6795 or Michelle Allen at FHWA at <u>michelle.allen@dot.gov</u> or 317-226-7344.

Thank you in advance for your input,

Anthony Ross, Ph.D. LPA Program Administrator Cultural Resources Office Environmental Services 100 N. Senate Ave., Room N642-ES Indianapolis, IN 46204 Office: (317) 234-0142 Email: aross3@indot.in.gov





Pokégnek Bodéwadmik * Pokagon Band of Potawatomi Department of Language and Culture

59291 Indian Lake Road • Dowagiac, MI 49047 • www.PokagonBand-nsn.gov (269) 462-4316 • (269) 782-2499 fax

2/13/2020

Shaun Miller INDOT Phone: 317-233-6795 Email: <u>SMiller@indot.in.gov</u>

FHWA Project: Des. No. 1902707; 61st Avenue and Marcella Boulevard Intersection, Hobart, Lake Co., Indiana

Dear Responsible Party:

Migwetth for contacting me regarding these projects. As THPO, I am responsible for handling Section 106 Consultations on behalf of the tribe. I am writing to inform you that after reviewing the details for the project referenced above, I have made the determination that there will be **No Historic Properties in Area of Potential Effects (APE)** significant to the Pokagon Band of Potawatomi Indians. However, if any archaeological resources are uncovered during this undertaking, please stop work and contact me immediately. Should you have any other questions, please don't hesitate to contact me at your earliest convenience.

Sincerely,

Matthe Bussler

Matthew J.N. Bussler Tribal Historic Preservation Officer Pokagon Band of Potawatomi Indians Office: (269) 462-4316 Cell: (269) 519-0838 Matthew.Bussler@Pokagonband-nsn.gov



Eric Holcomb, Governor Cameron F. Clark, Director

Division of Historic Preservation & Archaeology · 402 W. Washington Street, W274 · Indianapolis, IN 46204-2739 Phone 317-232-1646 · Fax 317-232-0693 · dhpa@dnr.IN.gov · www.IN.gov/dnr/historic



March 11, 2020

Elizabet Biggio Architectural Historian II Butler, Fairman, & Seufert, Inc. 8450 Westfield Boulevard, Suite 300 Indianapolis, Indiana 46240

> Federal Agency: Indiana Department of Transportation ("INDOT"), on behalf of Federal Highway Administration, Indiana Division ("FHWA")

Re: Historic property report (Biggio, 2/5/2020), and Indiana archaeological short report (Bubb, 01/31/2020), concerning the 61st Avenue and Marcella Boulevard intersection project in the City of Hobart, Lake County, Indiana (Des. No. 1902707; DHPA No. 24796)

Dear Ms. Biggio:

Pursuant to Section 106 of the National Historic Preservation Act of 1966, as amended (54 U.S.C. § 306108), implementing regulations at 36 C.F.R. Part 800, the "Programmatic Agreement Among the Federal Highway Administration, the Indiana Department of Transportation, the Indiana State Historic Preservation Officer, and the Advisory Council on Historic Preservation Regarding the Management and Preservation of Indiana's Historic Bridges" ("Indiana Historic Bridges PA"), and the "Programmatic Agreement (PA) Among the Federal Highway Administration, the Indiana Department of Transportation, the Advisory Council on Historic Preservation of Historic Preservation Officer Regarding the Implementation of the Federal Aid Highway Program In the State of Indiana," the staff of the Indiana State Historic Preservation Officer ("Indiana SHPO" or "INDNR-DHPA") has reviewed INDOT's February 5, 2020, letter and the accompanying historic property report and Indiana archaeological short report, which we received on February 10, 2020, for the aforementioned project.

In regard to buildings and structures, we agree with the conclusions of the historic property report that there are no above-ground properties listed in or eligible for inclusion in the National Register of Historic Places ("NRHP") within the area of potential effects.

Additionally, in terms of potential impact on archaeological resources, based on the submitted information and the documentation available to the staff of the Indiana SHPO, we have not identified any currently known archaeological resources listed in or eligible for inclusion in the NRHP within of the proposed project area as indicated in the report; and we concur with the opinion of the archaeologist, as expressed in the Indiana archaeological short report (Bubb, 01/31/2020), that no further archaeological investigations appear necessary at the proposed project area as indicated in the report.

Furthermore, we note that, in the archaeological report's *PROJECT OVERVIEW* section, the author states, "The acquisition of approximately 3.0 acres of permanent and 0.5 acres of temporary right-of-way is anticipated." (These acquisitions also are mentioned both in your Review Request Submittal Form and in the INDOT's cover letter.) It will be helpful for us to complete our review if you would provide clarification about whether or not these areas of permanent right-of-way and of temporary right-of-way were included in the areas that were subjected to archaeological investigations.

If any prehistoric or historic archaeological artifacts or human remains are uncovered during construction, demolition, or earthmoving activities, state law (Indiana Code 14-21-1-27 and Indiana Code 14-21-1-29) requires that the discovery be reported to INDNR-DHPA within two (2) business days. In that event, please call (317) 232-1646. Be advised that adherence to Indiana Code 14-21-1-27 and

Elizabet Biggio March 11, 2020 Page 2

Indiana Code 14-21-1-29 does not obviate the need to adhere to applicable federal statutes and regulations, including but not limited to 36 C.F.R. Part 800.

The Indiana SHPO staff's archaeological reviewer for this project is Wade T. Tharp, and the structures reviewer is Chad Slider. However, if you have a question about the Section 106 process, please contact initially the INDOT Cultural Resources staff members who are assigned to this project.

In all future correspondence about the 61st Avenue and Marcella Boulevard intersection project in Hobart, Lake County, Indiana (Des. No. 1902707), please refer to DHPA No. 24796.

Very truly yours,

Beth K. McCord Deputy State Historic Preservation Officer

BKM;CWS;WTT;wtt

eme: Anuradha Kumar, INDOT Shaun Miller, INDOT Anthony Ross, INDOT Susan Branigin, INDOT Shirley Clark, INDOT Louis Bubb, 106 Consulting LLC.



Eric Holcomb, Governor Cameron F. Clark, Director

Division of Historic Preservation & Archaeology · 402 W. Washington Street, W274 · Indianapolis, IN 46204-2739 Phone 317-232-1646 · Fax 317-232-0693 · dhpa@dnr.IN.gov · www.IN.gov/dnr/historic



May 22, 2020

Elizabet Biggio Butler, Fairman & Seufert, Inc. 8450 Westfield Boulevard, Suite 300 Indianapolis, Indiana 46240

> Federal Agency: Indiana Department of Transportation ("INDOT"), on behalf of Federal Highway Administration ("FHWA")

> > Re: Indiana Department of Transportation's finding of "no historic properties affected" on behalf of the Federal Highway Administration concerning the 61st Avenue and Marcella Boulevard intersection project, Hobart, Lake County, Indiana (Des. No. 1902707; DHPA No. 23796)

Dear Ms. Biggio:

Pursuant to Section 106 of the National Historic Preservation Act of 1966, as amended (54 U.S.C. § 306108), 36 C.F.R. Part 800, and the "Programmatic Agreement (PA) Among the Federal Highway Administration, the Indiana Department of Transportation, the Advisory Council on Historic Preservation and the Indiana State Historic Preservation Officer Regarding the Implementation of the Federal Aid Highway Program In the State of Indiana," the staff of the Indiana State Historic Preservation Officer ("Indiana SHPO staff" or "INDNR-DHPA") has reviewed your April 22, 2020, review request submittal form, with the aforementioned finding and supporting documentation, all of which we received on April 22, 2020.

As previously indicated, regarding buildings and structures, we agree that there are no above-ground properties listed in or eligible for inclusion in the National Register of Historic Places ("NRHP") within the area of potential effects.

Additionally, in terms of potential impact on archaeological resources, based on the submitted information and the documentation available to the staff of the Indiana SHPO, we have not identified any currently known archaeological resources listed in or eligible for inclusion in the NRHP within the proposed project area; and we concur with the opinion of the archaeologist, as expressed in the Indiana archaeological short report (Bubb, 01/31/2020), that no further archaeological investigations appear necessary at the proposed project area as indicated in the report.

Furthermore, based on the submitted information and the documentation available to the staff of the Indiana SHPO, we have not identified any currently known archaeological resources listed in or eligible for inclusion in the NRHP within the additional portions of the proposed project area described in the report as, "approximately 3.0 acres of permanent and 0.5 acres of temporary right-of-way," that you anticipate will be required. However, this identification is subject to the ground-disturbing project-related activities remaining within areas disturbed by previous construction of a recent and non-historical nature. If archaeological deposits are encountered, then they will be evaluated regarding their eligibility for the NRHP in consultation with the staff of the Indiana SHPO. Please contact our office if such deposits are encountered. The archaeological recording must be done in accordance with the Secretary of the Interior's "Standards and Guidelines for Archaeology and Historic Preservation" (48 F.R. 44716) and a report of the archaeological documentation must be submitted to our office for review and comment.

The DNR mission: Protect, enhance, preserve and wisely use natural, cultural and recreational resources for the benefit of Indiana's citizens through professional leadership, management and education.

www.DNR.IN.gov An Equal Opportunity Employer Elizabet Biggio May 22, 2020 Page 2

If any prehistoric or historic archaeological artifacts or human remains are uncovered during construction, demolition, or earthmoving activities, state law (Indiana Code 14-21-1-27 and Indiana Code 14-21-1-29) requires that the discovery be reported to INDNR-DHPA within two (2) business days. In that event, please call (317) 232-1646. Be advised that adherence to Indiana Code 14-21-1-27 and Indiana Code 14-21-1-29 does not obviate the need to adhere to applicable federal statutes and regulations, including but not limited to 36 C.F.R. Part 800.

Accordingly, we concur with INDOT's Section 106 finding, on behalf of FHWA, of "no historic properties affected" for this federal undertaking.

The Indiana SHPO staff's archaeological reviewer for this project is Wade T. Tharp, and the structures reviewer is Chad Slider. However, if you have a question about the Section 106 process, please contact initially the INDOT Cultural Resources staff members who are assigned to this project.

In any future correspondence regarding the proposed 61st Avenue and Marcella Boulevard intersection project in Hobart, Lake County (Des. No. 1902707), please refer to DHPA No. 23796.

Very truly yours,

W. Shih

Beth K. McCord Deputy State Historic Preservation Officer

BKM:CWS:WTT:wtt

emc: Anuradha Kumar, INDOT Shaun Miller, INDOT Anthony Ross, INDOT Susan Branigin, INDOT Shirley Clark, INDOT Louis Bubb, 106 Consulting LLC Elizabet Biggio, Butler, Fairman & Seufert, Inc.

*** Proof of Publication ***

State of Indiana)) ss: Lake County)

Personally appeared before me, a notary public in and for said county and state, the undersigned <u>Nicolo</u> <u>MUS rouri</u> who, being duly sworn, says that She/he is Legal Clerk of the Northwest Indiana Times newspaper of general circulation printed and published in the English language in the Town of Munster in state and county afore-said, and that the printed matter attached hereto is a true copy, which was duly published in said paper for time(s), the date(s) of publication being as follows:

2070

BUTLER, FAIRMAN & SEUFERT, INC / LEGALS

8450 WESTFIELD BLVD, SUITE 300 INDIANAPOLIS IN 46240-8302

ORDER NUMBER 41442

HOCI

The undersigned further states that the Northwest Indiana Times newspaper maintains an Internet website, which is located at www.nwi.com website and that a copy of the above referenced printed matter was posted on such website on the date(s) of publication set forth above.

Nicole Muscari, Legal Clerk

By

Subscribed and sworn to before me this day of 2020

Notary Public

and the second second

My commission expires:

Section: Legals Category: 198 Legal - Lake County PUBLISHED ON: 04/27/2020

> TOTAL AD COST: FILED ON:

30.19 4/27/2020

DAWN RENEE HEILI Notary Public, State of Indiana Lake County

Commission #696125 My Commission Expires 01/31/25 Public Notice Des. No. 1902707

The City of Hobart is planning to undertake an intersection improvement project funded in part by the Federal Highway Administration (FHWA). The project is located at the intersection of 61st Avenue and Marcella Boulevard.

Under the preferred alternative, a roundabout will be constructed. The total project length is approximately 0.45 mile. Approximately 3.0 acres of permanent and 0.5 acre of temporary right-of-way acquisition is anticipated. Sidewalks and street-lighting will be installed.

The proposed action does not impact properties listed in or eligible for the National Register of Historic Places. The Indiana Department of Transportation (INDOT), on behalt of the FHWA, has issued a "No Historic Properties Affected" finding for the project due to the fact that no historic properties are present within the Area of Potential Effects (APE). In accordance with the National Historic Preservation Act, the views of the public are being sought regarding the effect of the proposed project on the historic elements as per 36 CFR 800.2(d), 800.3(e) and 800.6(a)(4). Pursuant to 36 CFR 800.4(d)(1), the documentation specified in 36 CFR 800. 11(d) is available for inspection at the office of Butler, Fairman, & Seufert, Inc. Additionally, this documentation can be viewed electronically by accessing INDOT's Section 106 document posting website IN SCOPE at http://erms.indot.in.gov /Section106Documents. This documentation serves as the basis for the "No Historic Properties Affected" finding. The views of the public on this effect finding are being sought. Please reply with any comments to Elizabet Biggio, Butler, Fairman, & Seufert, Inc., 9450 Westfield Bivd. Suite 300, Indianapolis, IN 46240, 317-713-4615, ebiggio@bfsengr.com no later than May 27, 2020. In accordance with the "Ameri-

In accordance with the "Americans with Disabilities Act", if you have a disability for which the City of Hobart needs to provide accessibility to the document(s), such as interpreters or readers, please contact the ADA Coordinator, Mike Hannigan, at 219-947-3407 or mhannigan@cityofhobart.org. 4/27 -41442 -hspaxip

Public Notice Des. No. 1902707

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In accordance with the "Americans with Disabilities Act", if you have a disability for which the City of Hobart needs to provide accessibility to the document(s), such as interpreters or readers, please contact the ADA Coordinator, Mike Hannigan, at 219-947-3407 or mhannigan@cityofhobart.org.

NOTE: The ROW and footprint of the project area has been reduced since the Public Notice was published and is within the original footprint. See *Right of Way* Section in the CE Document for more information.

Appendix E Red Flag Investigation and Hazardous Materials Investigations



Date: January 8, 2020 (updated September 11, 2020)

- To: BFS Project File 6371
- From: Brittney Layton Butler, Fairman and Seufert, Inc. 8450 Westfield Boulevard, Suite 300 Indianapolis, IN 46240 blayton@bfsengr.com
- Re: RED FLAG INVESTIGATION DES # 1902707, Local Project Intersection Improvements 61st Street/Marcella Boulevard Intersection City of Hobart, Lake County, Indiana

PROJECT DESCRIPTION

Headquarters:

8450 Westfield Blvd., Suite 300 Indianapolis, IN 46240-5920 T 317.713.4615 F 317.713.4616 E bfs@BFSEngr.com www.BFSEngr.com

Branch Locations:

Fort Wayne Jeffersonville Lafayette Merrillville Plainfield

Founded 1961



Brief Description of Project: The City of Hobart proposes improvement to the intersection of 61st Avenue and Marcella Boulevard, Des. Mo. 1902707. The proposed improvement limits are approximately 0.08 mile south of the intersection of 61st Avenue and Marcella Boulevard, 0.16 mile east of the intersection, and 0.14 mile north of the intersection, and Mississippi Street, in the City of Hobart, Lake County, Indiana. The total project length is approximately 0.27 mile. The project proposes to construct a three-lane roundabout at the intersection of 61st Avenue and Marcella Boulevard. The roundabout may be offset slightly to the southwest of the existing intersection, pending further study. The approach along Marcella Boulevard to the north of 61st Avenue would be widened to a maximum of two travel lanes, one northbound and one southbound. Six (6)-foot wide sidewalk would be installed along the north side of 61st Avenue for the length of the project area and tie into existing sidewalk at the east end of the project area. A 6-foot wide sidewalk would also be installed along the south side of 61st Avenue from Mississippi Street to Marcella Boulevard and continue south along the west side of Marcella Boulevard. New permanent lighting will be installed at the roundabout. Existing lighting will be replaced throughout the project area with new LED lights. Curb and gutter and storm sewer will be reconstructed throughout the project area. An enclosed storm sewer system would convey the stormwater to Turkey Creek, approximately 730 feet north of the intersection; however, the stormwater outlet will be above the ordinary high water mark.

Bridge and/or Culvert Project: Yes □ No ⊠

If this is a bridge project, is the bridge Historical? Yes \Box No \Box , Select \Box Non-Select \Box (Note: If the project involves a <u>historical</u> bridge, please include the bridge information in the Recommendations Section of the report).

Proposed right of way: Temporary \boxtimes # Acres <u>0.25</u> **Permanent** \boxtimes # Acres <u>1.5</u> **Type of excavation:** Excavation will occur to a depth of up to 10 feet over the project area. **Maintenance of traffic:** Traffic will be maintained throughout construction by utilizing a detour. **Work in waterway:** Yes \square No \boxtimes **Below ordinary high water mark:** Yes \square No \boxtimes **Any other factors influencing recommendations:** The project description is subject to additional changes as preliminary design progresses.

Infrastructure

Indicate the number of items of concern found within the 0.5 mile search radius. If there are no items, please indicate N/A:

Religious Facilities	1	Recreational Facilities	3	
Airports ¹	N/A	Pipelines	5	
Cemeteries	N/A	Railroads	N/A	
Hospitals	N/A	Trails	1	
Schools	1*	Managed Lands	3	

¹In order to complete the required airport review, a review of public airports within 3.8 miles (20,000 feet) is required.

Explanation:

Religious Facilities: One (1) religious facilities is located within the 0.5 mile search radius. The religious facility, Salvatorian Fathers Monastery, is mapped approximately 0.43 mile northwest of the project area. No impact is expected.

Recreational Facilities: Three (3) recreational facilities are mapped within the 0.5 mile search radius. The nearest recreational facility, Glenwood Park, is mapped approximately 0.27 mile northeast of the project area. No impact is expected.

Pipelines: Five (5) pipeline segments are mapped within the 0.5 mile search radius. One (1) pipeline segment, Marathon Pipe Line Co., crosses the project area. Coordination with Marathon Pipe Line Co. should occur.

Trails: One (1) trail segment is mapped within the 0.5 mile search radius. The trail segment, the Iowa Street segment, is a planned trail and is mapped approximately 0.25 mile east of the project area. No impact is expected.

Schools: Although not mapped on the GIS layer, one (1) school was identified within the 0.5 mile search radius. The facility, Montessori Academy In the Oaks, 2019 E 57th Ave, Hobart, IN 46342, is located approximately 0.44 mile northeast of the project area. No impact is expected.

Managed Lands: Three (3) managed lands are mapped within the 0.5 mile search radius. The nearest managed land, Turkey Creek, is mapped approximately 0.37 mile west of the project area. No impact is expected.

WATER RESOURCES TABLE AND SUMMARY

Water Resources Indicate the number of items of concern found within the 0.5 mile search radius. If there are no items, please indicate N/A:				
NWI - Points	N/A	Canal Routes – Historic	N/A	
Karst Springs	N/A	NWI – Wetlands	12	
Canal Structures – Historic	N/A	Lakes	3	
NPS NRI Listed	N/A	Floodplain – DFIRM	11	
NWI-Lines	2	Cave Entrance Density	N/A	
IDEM 303d Listed Streams and Lakes (Impaired)	d Listed Streams and 1 (es (Impaired)		N/A	
Rivers and Streams	5	Sinking-Stream Basins	N/A	

Explanation:

NWI – Wetlands: 12 wetland polygons are mapped within the 0.5 mile search radius. One (1) wetland polygon overlaps the project area. A Waters of the U.S. Report will be prepared and coordination with INDOT ES Ecology and Waterway Permitting will occur.

Lakes: Three (3) lake polygons are mapped within the 0.5 mile search radius. The nearest lake polygon is mapped 0.13 mile northwest of the project area. No impact is expected.

Floodplain – DFIRM: 11 floodplain polygons are mapped within the 0.5 mile search radius. The nearest floodplain overlaps the project area. Coordination with INDOT ES Ecology and Waterway Permitting will occur.

NWI – Lines: Two (2) NWI lines are mapped within the 0.5 mile search radius. The nearest NWI line is mapped approximately 0.21 mile northwest of the project area. No impact is expected.

IDEM 303d Listed Streams and Lakes (Impaired): One (1) impaired stream segment is mapped within the 0.5 mile search radius. The nearest Indiana Department of Environmental Management (IDEM) 303d listed stream, Turkey Creek, is mapped adjacent to the project area and is listed for *E.coli*. Workers who are working in or near water with *E. coli* should take care to wear appropriate personal protective equipment (PPE) observe proper hygiene behaviours, including regular hand washing, and limit personal exposure.

Rivers and Streams: Five (5) river and stream segments are mapped within the 0.5 mile search radius. The nearest stream segment, Turkey Creek, is mapped adjacent to the project area. Due to the proximity of Turkey Creek, it is likely that additional water resources, such as unnamed tributaries, regulated drains, wetlands, and roadside ditches are located in the project area. A Waters of the US Report will be prepared and coordination with INDOT Ecology and Waterway Permitting will occur.

URBANIZED AREA BOUNDARY SUMMARY

Urbanized Area Boundary (UAB): This project lies within the City of Hobart, IN UAB. Post construction Storm Water Quality Best Management Practices (BMPs) may need to be considered. An early coordination letter with topographic and aerial maps showing the project area should be sent to the City of Hobart MS4 Coordinator at 414 Main Street, Hobart, Indiana 46342.

MINING AND MINERAL EXPLORATION TABLE AND SUMMARY

Mining/Mineral Exploration Indicate the number of items of concern found within the 0.5 mile search radius. If there are no items, please indicate N/A:					
Petroleum Wells	N/A	Mineral Resources	N/A		
Mines – Surface	N/A	Mines – Underground	N/A		

Explanation:

No mining or mineral exploration resources were identified within the 0.5 mile search radius.

Hazardous Material Concerns

Indicate the number of items of concern found within the 0.5 mile search radius. If there are no items, please indicate N/A:

Superfund	N/A	Manufactured Gas Plant Sites	N/A
RCRA Generator/ TSD	1	Open Dump Waste Sites	N/A
RCRA Corrective Action Sites	N/A	Restricted Waste Sites	N/A
State Cleanup Sites	N/A	Waste Transfer Stations	N/A
Septage Waste Sites	N/A	Tire Waste Sites	N/A
Underground Storage Tank (UST) Sites	3	Confined Feeding Operations (CFO)	N/A
Voluntary Remediation Program	N/A	Brownfields	N/A
Construction Demolition Waste	N/A	Institutional Controls	1
Solid Waste Landfill	N/A	NPDES Facilities	3
Infectious/Medical Waste Sites	N/A	NPDES Pipe Locations	1
Leaking Underground Storage (LUST) Sites	6	Notice of Contamination Sites	N/A

Explanation:

RCRA Generator/TSD: One (1) RCRA Generator/TSD site is mapped within the 0.5 mile search radius. Shaver Motors Incorporated is mapped adjacent to the project area. According to a Hazardous Waste Handler Form dated March 17, 2014, found on the Indiana Department of Environmental Management (IDEM) Virtual File Cabinet (VFC), this site is a Small Quantity Generator. This site is also discussed under the Leaking Underground Storage (LUST) Site section. No impact is expected.

Underground Storage Tank (UST) Sites: Three (3) USTs are mapped within the 0.5 mile search radius. Three (3) USTs are adjacent to the project area.

- Maris and Son Roofing Inc., 4400 West 61st Avenue, Hobart, Indiana 46342, Al# 18304, is located adjacent to the project area. According to documents found on the IDEM VFC, Maris and Sons Roofing submitted a closure request for one (1) 2,000 gallon underground tank which previously held gasoline, and for one (1) 2,000 gallon underground tank which previously held diesel fuel dated September 8, 1999. A letter from IDEM to Maris and Sons Roofing Incorporated, dated March 28, 2017, indicates that closure information for the two USTs is incomplete. If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface, etc.), contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.
- Thornton 303, 4717 East 61st Avenue, Hobart, Indiana 46342, Al# 23528, is located adjacent to the project area. According to documents found in the IDEM VFC, this site has one (1) 20,000 gallon tank and one (1) 12,000 gallon tank holding gasoline, one (1) 12,000 tank holding E85, one (1) 6,000 gallon tank holding diesel, and one (1) 6,000 gallon tank holding K-1. While violations were noted during the inspection on May 4, 2017, a Return to Compliance Letter was issued on September 5, 2017. No impact is expected.

Institutional Controls: One (1) Institutional Control site is mapped within the 0.5 mile search radius. Speedway 6672, 4732 West 61st Avenue, Hobart, Indiana 46342, AI# 18619, is located adjacent to the project area. An Environmental Restrictive Covenant (ERC) was placed on the property on April 2, 2013. The ERC specifically prohibits the use of groundwater and states that any removal, excavation, or disturbance of soil from the Real Estate must be conducted in accordance with all applicable requirements of IOSHA/OSHA, and soil that is removed, excavated or disturbed from the Real Estate must be managed and disposed of in accordance with all applicable federal and state laws and regulations. The project will not encroach upon this property. No impact is expected.

*Note: This site is incorrectly identified in the VFC as "4732 East 61st Avenue. The correct site is 4732 West 61st Avenue.

NPDES Facilities: Three (3) NPDES Facilities are mapped within the 0.5 mile search radius. The nearest NPDES facility, Proposed parking lot – Lot 2B of Replat #5 North Wind Crossing, NPDES Permit #: INR10J150, is mapped approximately 0.46 mile southeast of the project area. No impact is expected.

NPDES Pipe Locations: One (1) NPDES Pipe is mapped within the 0.5mile search radius. The NPDES Pipe is mapped approximately 0.37 mile northeast of the project area. No impact is expected.

Leaking Underground Storage (LUST) Sites: Six (6) LUST sites are mapped within the 0.5 mile search radius. Five (5) LUST Sites overlap or are adjacent to the project area.

- Speedway 6672, 4732 West 61st Avenue, Hobart, Indiana 46342, Al# 18619, is located adjacent to the project area. Low levels of soil and groundwater contamination remain on the site. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface, etc.) when working near this site, contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.
- One Stop 238, 4716 W. 61st Avenue, Hobart, Indiana, 46342, AI# 23972, LUST Incident # 200805509, overlaps the project area. Two (2) points on the Hazardous Materials Map are associated with this location. According to documents found on the IDEM VFC, one (1) LUST Site is associated with this AI#. IDEM issued a No Further Action Determination Approval Pursuant to RISC Guidance on May 2, 2014. If excavation occurs at or on the property, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface, etc.), contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.
- Speedway/Sm #7575 (4733 West 61st Avenue, Hobart, Indiana, 46342; AI# 12377) overlaps the project area. According to documents found on the IDEM's VFC, IDEM issued an NFA Determination Pursuant to Remediation Closure Guide on March 15, 2018. The NFA Determination is based on unconditional closure for soil, groundwater, and vapor intrusion exposure. Additional coordination between BF&S Inc. and IDEM's Petroleum Branch took place on September 11, 2020, which resulted in the following project commitment. If excavation occurs at or on the property of Speedway/Sm #7575 (located at 4733 West 61st Avenue, Hobart, Indiana, 46342), proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface, etc.), contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.
- Shaver Motors Inc. (1550 East 61st Avenue, Merrillville, Indiana, 46410; Al# 16054) is located adjacent to the project area. According to documents found on the IDEM's VFC, IDEM issued a NFA Determination Pursuant to Remediation Closure Guide on March 30, 2016. Low levels of contamination exist in the area. If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary. Additional coordination on this site between BF&S Inc. and IDEM's Petroleum Branch took place on September 11, 2020, which resulted in the following project commitment. If excavation occurs at or on the property of Shaver Motors Inc. (located at 1550 East 61st Avenue, Merrillville, Indiana, 46410), proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface, etc.), contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.
- Amoco Ss 00554, 4720 West 61st Avenue, Hobart, Indiana 46342, AI# 20846 is located adjacent to the project area. IDEM issued an Approval of No Further Action Status Letter pursuant to the 1994 IDEM Guidance on August 31, 2005. The Approval of No Further Action Status letter states that if construction activities occur on the site in areas where residual contamination remains, IDEM must be notified. According to the IDEM VFC this site operated as a gas station at this location pre-1980. In addition to petroleum contamination, it is likely that lead would be in the soil/groundwater. If excavation occurs at or on the property, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface, etc.), contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.

ECOLOGICAL INFORMATION SUMMARY

The Lake County listing of the Indiana Natural Heritage Data Center information on endangered, threatened, or rare (ETR) species and high quality natural communities is attached with ETR species highlighted. A preliminary review of the Indiana Natural Heritage Database by INDOT Environmental Services did indicate the presence of ETR species. Coordination with USFWS and IDNR will occur.

A review of the USFWS database did not indicate the presence of endangered bat species in or within 0.5 mile of the project area. The project is located in a commercial area surrounded by commercial properties and some farm fields. The range-wide programmatic consultation for the Indiana bat and Northern long-eared bat will be completed according to "Using the USFWS's IPaC System for Listed Bat Consultation for INDOT Projects".

RECOMMENDATIONS SECTION

INFRASTRUCTURE:

Pipelines: One (1) pipeline segment, Marathon Pipe Line Co., crosses the project area Coordination with Marathon Pipe Line Co. should occur.

WATER RESOURCES:

The presence of the following water resources will require the preparation of a Waters of the U.S. Report and coordination with INDOT ES Ecology and Waterway Permitting:

- One (1) wetland polygon overlaps the project area.
- One (1) floodplain overlaps the project area. (coordination only)
- One (1) stream is mapped adjacent to the project area.

One (1) IDEM Listed 303d Stream is mapped adjacent to the project area and is listed for *E.coli*. Workers who are working in or near water with *E. coli* should take care to wear appropriate personal protective equipment (PPE) observe proper hygiene behaviours, including regular hand washing, and limit personal exposure.

URBANIZED AREA BOUNDARY: This project lies within the City of Hobart, IN UAB. Post construction Storm Water Quality Best Management Practices (BMPs) may need to be considered. An early coordination letter with topographic and aerial maps showing the project area should be sent to the City of Hobart MS4 Coordinator at 414 Main Street, Hobart, Indiana 46342.

MINING /MINERAL EXPLORATION: N/A

HAZMAT CONCERNS:

UST Sites: Maris and Son Roofing Incorporated, 4400 West 61st Avenue, Hobart, Indiana 46342, Al# 18304, is located adjacent to the project area. According to documents found on the IDEM VFC, Maris and Sons Roofing submitted a closure request for one (1) 2,000 gallon underground tank which previously held gasoline, and for one (1) 2,000 gallon underground tank which previously held gasoline, and for one (1) 2,000 gallon underground tank which previously held gasoline, and for one (1) 2,000 gallon underground tank which previously held diesel fuel dated September 8, 1999. A letter from IDEM to Maris and Sons Roofing Incorporated, dated March 28, 2017, indicates that closure information for the two USTs is incomplete. If excavation occurs in this area, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface, etc.), contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.

LUST Sites:

• If excavation occurs at or on the property of Speedway 6672 (located at 4732 W. 61st Avenue, Hobart, Indiana 46342), proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface,

etc.), contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.

- If excavation occurs at or on the property of One Stop 238 (located at 4716 W. 61st Avenue, Hobart, Indiana 46342), proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface, etc.), contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.
- If excavation occurs at or on the property of Speedway/Sm #7575 (located at 4733 West 61st Avenue, Hobart, Indiana, 46342), proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface, etc.), contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.
- If excavation occurs at or on the property of Shaver Motors Inc. (located at 1550 East 61st Avenue, Merrillville, Indiana, 46410), proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface, etc.), contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.
- Amoco Ss 00554, 4720 West 61st Avenue, Hobart, Indiana 46342, AI# 20846 is located adjacent to the project area. IDEM issued an Approval of No Further Action Status Letter pursuant to the 1994 IDEM Guidance on August 31, 2005. The Approval of No Further Action Status letter states that if construction activities occur on the site in areas where residual contamination remains, IDEM must be notified. According to the IDEM VFC this site operated as a gas station at this location pre-1980. In addition to petroleum contamination, it is likely that lead would be in the soil/groundwater. If excavation occurs at or on the property, proper handling, removal, and disposal of soil and/or groundwater will be necessary. If a release is suspected or indicators that suggest a release observed (odors, staining, free product, sheen on water surface, etc.), contact IDEM within 24 hours of discovery. The Petroleum Remediation Section can advise on any additional steps the UST Owner or Operator may need to take at that point.

ECOLOGICAL INFORMATION:

Coordination with USFWS and IDNR will occur. The range-wide programmatic consultation for the Indiana bat and Northern long-eared bat will be completed according to "Using the USFWS's IPaC System for Listed Bat Consultation for INDOT Projects".

Prepared by: Brittney Layton Environmental Scientist Butler, Fairman and Seufert, Inc.

Graphics:

A map for each report section with a 0.5 mile search radius buffer around all project area(s) showing all items identified as possible items of concern is attached. If there is not a section map included, please change the YES to N/A:

SITE LOCATION: YES

INFRASTRUCTURE: YES

WATER RESOURCES: YES

URBANIZED AREA BOUNDARY: YES

MINING/MINERAL EXPLORATION: N/A

HAZMAT CONCERNS: YES

Red Flag Investigation - Infrastructure 61st Ave and Marcella Blvd Intersection Des. No. 1902707, Intersection Improvement Lake County, Indiana





Sources: 0.15 0.075 0 0.15 Non Orthophotography Miles

<u>Data</u> - Obtained from the State of Indiana Geographical Information Office Library

<u>**Orthophotography**</u> - Obtained from Indiana Map Framework Data (www.indianamap.org)

Map Projection: UTM Zone 16 N Map Datum: NAD83

This map is intended to serve as an aid in graphic representation only. This information is not warranted for accuracy or other purposes.



Red Flag Investigation - Water Resources 61st Ave and Marcella Blvd Intersection Des. No. 1902707, Intersection Improvement Lake County, Indiana





Sources: 0.15 0.075 0 0.15 Miles Miles Miles Miles Miles

Non Orthophotography

<u>Data</u> - Obtained from the State of Indiana Geographical Information Office Library

Orthophotography - Obtained from Indiana Map Framework Data

(www.indianamap.org)

Map Projection: UTM Zone 16 N Map Datum: NAD83

This map is intended to serve as an aid in graphic representation only. This information is not warranted for accuracy or other purposes.


Red Flag Investigation - Urbanized Area Boundary 61st Ave and Marcella Blvd Intersection Des. No. 1902707, Intersection Improvement Lake County, Indiana







This map is intended to serve as an aid in graphic representation only. This information is not warranted for accuracy or other purposes.



Red Flag Investigation - Hazardous Materials 61st Ave and Marcella Blvd Intersection Des. No. 1902707, Intersection Improvement Lake County, Indiana





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- **RCRA** Corrective Action Sites
- **Confined Feeding Operation**
- Notice_Of_Contamination _____
- **Construction/Demolition Site** \diamond
- Infectious/Medical Waste Site
 - Leaking Underground Storage Tank
- Manufactured Gas Plant
- LE **NPDES** Facilites
- NPDES Pipe Locations
 - **Open Dump Waste Site**

0.15 0.075 0 0.15 Miles

This map is intended to serve as an aid in graphic representation only. This information is not warranted for accuracy or other purposes.



Sources:

Non Orthophotography

Data - Obtained from the State of Indiana Geographical Information Office Library Orthophotography - Obtained from Indiana Map Framework Data (www.indianamap.org) Map Projection: UTM Zone 16 N Map Datum: NAD83 E12

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surveys.

Indiana County Endangered, Threatened and Rare Species List County: Lake



Species Name	Common Name	FED	STATE	GRANK	SRANK
Mollusk: Bivalvia (Mussels)	<u>Charman</u>	IF	SE	G3	SI
Vonustaconcha ollinsiformis	Sheepnose	LE	SE	G4	S1 S2
	Ellipse		3 5C	04	52
Insect: Coleoptera (Beetles) <mark>Nicrophorus americanus</mark>	American Burying Beetle	LE	SX	G2G3	SX
Insect: Homoptera Bruchomorpha dorsata			SR	GNR	<u>\$2</u>
Bruchomorpha extensa	The Long-nosed Elephant Hop	ner	SR	GNR	S2S3
Bruchomorpha oculata	The Long hosed Elephant Hop	per	SR	GNR	SNR
Chlorotettix fallax	Aleafhonner		SR	GNR	S1S2
Cicadula straminea	A Leamopper		ST	GNR	S1S2
Cosmotettix bilineatus	Two-lined cosmotettiv		ST	GNR	S1S2
Dorvdiella kansana	Two mied cosmoletux		SR	GNR	S2S3
Flexamia pyrops	The Long-nose Three-awn		ST	GNR	S1
-lexamia reflexus	Indiangrass Flexamia		ST	GNR	S1S2
Graminella mohri			SR	GNR	S1
_aevicephalus acus	aleafhopper		SR	GNR	S1S2
imotettix divaricatus			ST	GNR	SNR
Mesamia nigridorsum	A Leafhopper		SR	GNR	S2S3
Paraphilaenus parallelus	A Spittle Bug		ST	GNR	S 1
Paraphlepsius lobatus			ST	GNR	S 2
Paraphlepsius maculosus	Peppered Paraphlepsius Leafhopper		ST	GNR	S1S2
Philaenarcys killa	Great Lakes dune spittlebug		SR	GNR	S2S3
Polyamia caperata	Little Bluestem Polyamia		SR	GNR	S2
Polyamia herbida	The Prairie Panic Grass Leafhopper		ST	GNR	S2
Prairiana kansana	The Kansas Prairie Leafhopper	•	SE	GNR	S1
Prosapia ignipectus	Red-legged Spittle Bug		SR	G4	S2
nsect: Hymenoptera Bombus affinis	Rusty-natched Rumble Ree	LE	SE	Gl	S 1
Dolichoderus plagiatus	Rubly publica Bulliole Bee			G5	S2
Formica glacialis				G5	S2
_asius flavus				G5	S2
asius minutus				GNR	S1
asius speculiventris				GNR	S1
Ayrmica lobifrons				G5	S1
Solenopsis texana texana				GNRTNR	S1
nsect. Lenidonters (Buttarflias & Moths)					
Acleris semipurpurana	Oak Leaftier Moth		SR	GNR	SNR

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Indiana County Endangered, Threatened and Rare Species List County: Lake

Species Name	Common Name	FED	STATE	GRANK	SRANK
Acronicta dactylina	Fingered Dagger Moth		SR	G5	SNR
Acronicta funeralis	Funerary Dagger Moth		SR	G5	SNR
Aethes patricia			SE	G3G4	S1
Agrotis stigmosa	Spotted Dart Moth		ST	G4	S1S2
Agrotis vetusta	Old Man Dart		SR	G5	S2
Ancylis semiovana			SR	GNR	S2S3
Apamea burgessi	A Noctuid Moth		ST	G4	S1
Apamea indocilis	The Spastic Apamea			G5	S1S3
Apamea nigrior	Black-dashed Apamea		SR	G5	S2S3
Apantesis virguncula	Little Virgin Tiger Moth		SR	G5	S1S2
Atrytonopsis hianna	Dusted Skipper		SR	G4G5	S2S3
Boloria selene myrina	Silver-bordered Fritillary		SR	G5T5	S2S3
Capis curvata	Curved Halter Moth		ST	G5	S2S3
Capsula laeta	Red Sedge Borer		ST	G4	S1S2
Caradrina meralis	The Rare Sand Quaker		ST	G5	S2
Catocala antinympha	The Sweet Fern Underwing		SE	G5	S1
Catocala gracilis	Graceful Underwing		SR	G5	S2S3
Catocala praeclara	Praeclara Underwing		SR	G5	S2S3
Coenochroa illibella	Dune Panic Grass Moth		SR	GNR	S2S3
Crambus bidens	Forked Grass-veneer		SR	GNR	SNR
Cyclophora pendulinaria	Sweetfern Geometer		SR	G5	SNR
Cycnia collaris				G4	S2S3
Dargida rubripennis	The Pink Streak		ST	G3G4	S1
Dichagyris acclivis	A Noctuid Moth		ST	G4G5	S2
Dichagyris grotei	Grote's Black-tipped Quaker		ST	G4	S2
Dichomeris aleatrix	Aleatrix dichomeris			GNR	S1S2
Digrammia eremiata	The Goat's Rue Looper		SR	G4	S2S3
Digrammia mellistrigata	A Geometrid Moth		SR	G5	SNR
Erynnis lucilius	Columbine Duskywing		SE	G5	SH
Erynnis martialis	Mottled Duskywing		WL	G3	S 3
Erynnis persius persius	Persius Duskywing		SE	G5T1T3	S1
Euchloe olympia	Olympia Marble		SR	G5	S2S3
Eucoptocnemis fimbriaris	Fringed Dart		ST	G4	S1
Eucosma bilineana			SR	GNR	S1S2
Eucosma bipunctella	A Moth		SR	GNR	S1S2
Eucosma giganteana	Giant Eucosma		SR	GNR	S1S2
Eucosma ochroterminana	Buff-tipped Eucosma		SR	GNR	SNR
Eucosma olivaceana	Olivaceous Eucosma		SR	GNR	S1S2
Eucosma striatana	Striated Eucosma		SR	GNR	SNR
Eucosma umbrastriana			SR	GNR	SNR

Indiana Natural Heritage Data CenterFed:LE = Endangered; LT = Threatened; C = candidate; PDL = proposed for delistingDivision of Nature PreservesState:SE = state endangered; ST = state threatened; SR = state rare; SSC = state species of special concern;Indiana Department of Natural ResourcesState:SE = state endangered; ST = state threatened; SR = state rare; SSC = state species of special concern;This data is not the result of comprehensive countySX = state extirpated; SG = state significant; WL = watch listGRANK:Global Heritage Rank: G1 = critically imperiled globally; G2 = imperiled globally; G3 = rare or uncommonglobally; G4 = widespread and abundant globally but with long term concerns; G5 = widespread and abundantglobally; G? = unranked; GX = extinct; Q = uncertain rank; T = taxonomic subunit rank

SRANK: State Heritage Rank: S1 = critically imperiled in state; S2 = imperiled in state; S3 = rare or uncommon in state;
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Indiana County Endangered, Threatened and Rare Species List County: Lake

Species Name	Common Name	FED	STATE	GRANK	SRANK
Euphyes bimacula	Two-spotted Skipper		ST	G4	<u>S1S2</u>
Fagitana littera	The Marsh Fern Moth		ST	G4	S1S2
Feltia manifesta	The Record Keeper Moth		SR	G4	S3S4
Gabara subnivosella	A Noctuid Moth		SR	G4	S1S2
Glaucopsyche lygdamus couperi	Silvery Blue		SE	G5T5	SH
Grammia figurata	The Figured Grammia		SR	G5	S2S3
Grammia phyllira	The Sand Barrens Grammia		SR	G4	S2S3
Hadena capsularis	The Starry Campion Capsule Moth		SR	G5	S1S2
Hadena ectypa	The Starry Campion Moth		ST	G3G4	S1S3
Hemaris gracilis	The Blueberry Clearwing Sphinx		SR	G3G4	S1S2
Hesperia leonardus	Leonard's Skipper		SR	G5	S2S3
Hesperia ottoe	Ottoe Skipper		SE	G3G4	S1
Hypenodes caducus	Large Hypenodes		SR	GNR	SNR
Hyperaeschra georgica	A Prominent Moth			G5	S2
Hypocoena inquinata	Tufted Sedge Moth		ST	GNR	S1S2
lodopepla u-album	White-eyed Borer Moth		SR	G5	S2
Lemmeria digitalis	Fingered Lemmeria		SR	G4	S1S2
Lesmone detrahens	Detracted Owlet		SR	G5	S2
Lethe eurydice eurydice	Eyed Brown		WL	G5T4	S3
Leucania amygdalina	Salt Marsh Wainscot		SR	GNR	S2
Leucania inermis	Unarmed Wainscot		SR	G5	S2S3
Leucania multilinea	Many-lined Wainscot		SR	G5	S1S2
Lycaeides melissa samuelis	Karner Blue	LE	SX	G5T2	SX
Lycaena dione	Gray Copper		SX	G5	SX
Lycaena helloides	Purplish Copper		SR	G5	S2S3
Macaria multilineata	Many-lined Angle		SR	G4	SNR
Macrochilo absorptalis	Slant-lined Owlet		SR	G4G5	S2S3
Macrochilo hypocritalis	Twin-dotted Macrochilo		SR	G4	S2
Macrochilo Iouisiana	Louisiana Macrochilo		ST	G4	S1S2
Melanomma auricinctaria	Huckleberry Eye-spot Moth		SR	G4	S2S3
Melipotis jucunda	Merry Melipotis Moth		SR	G5	S1S3
Meropleon ambifusca	Newman's Brocade		ST	G3G4	S1S2
Meropleon diversicolor	Multicolored Sedgeminer		SR	G5	S2S3
Metanema determinata	Dark Metanema		SR	GNR	SNR
Metanema inatomaria	Pale Metanema		SR	G5	SNR
Metarranthis apiciaria	Barrens Metarranthis Moth		SE	G1G3	SH
Neodactria murellus	Prairie Sedge Moth		ST	GNR	S1
Nola cilicoides	Blurry-patched Nola Moth		SR	G5	SNR
Notodonta scitipennis	Finned-willow Prominent		ST	G5	S1S2

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Indiana Department of Natural Resources		SX = state extirpated; $SG =$ state significant; $WL =$ watch list
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surveys.		globally; G4 = widespread and abundant globally but with long term concerns; G5 = widespread and abundant
		globally; G? = unranked; GX = extinct; Q = uncertain rank; T = taxonomic subunit rank
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Indiana County Endangered, Threatened and Rare Species List County: Lake

Species Name	Common Name	FED	STATE	GRANK	SRANK
Odontosia elegans	Elegant Prominent		SR	G5	S1S2
Oligia obtusa	A Noctuid Moth		SE	G4	S1
Pangrapta decoralis	The Multicolored Huckleberry Moth		ST	G5	S2
Papaipema beeriana	Beer's Blazing Star Borer Moth		ST	G2G3	S1S3
Papaipema cerina	Golden Borer Moth		ST	G2G4	S1
Papaipema leucostigma	Columbine Borer		ST	G4G5	S1S2
Papaipema lysimachiae	The St. John'Swort Borer Moth		SR	G4G5	S1S3
Papaipema maritima	The Giant Sunflower Borer Moth		ST	G3	S2
Papaipema pterisii	Bracken Borer Moth		WL	G5	SNR
Papaipema rigida	Rigid Sunflower Borer Moth		SR	G4G5	S2S3
Papaipema sciata	The Culver's Root Borer		ST	G3	S1S2
Papaipema silphii	Silphium Borer Moth		ST	G3G4	S2
Papaipema speciosissima	The Royal Fern Borer Moth		ST	G4	S2S3
Parasa indetermina	Stinging Rose Caterpillar Moth		SR	G4	S1S2
Pelochrista albiguttana	A Moth		SR	GNR	SNR
Peoria gemmatella	Gemmed Cordgrass Borer		SR	GNR	S1
Peoria tetradella			SR	GNR	SNR
Photedes enervata	The Many-lined Cordgrass Moth		ST	G4	S1
Photedes includens	The Included Cordgrass Borer		ST	G4	S1
Photedes inops	Spartina Borer Moth		SR	G3G4	S2S3
Photedes panatela	Northern Cordgrass Borer		ST	GNR	S1
Phytometra ernestinana	Ernestine's Moth		SE	G4	S1
Poanes massasoit	Mulberry Wing Skipper			G4	S3S4
Poanes viator viator	Big Broad-winged Skipper		ST	G5T4	S2
Polites mystic	Long Dash Skipper			G5	S3S4
Polygonia progne	Gray Comma		SR	G5	S2S3
Ponometia binocula	Prairie Tarachidia			GNR	S1S2
Problema byssus	Bunchgrass Skipper		ST	G3G4	S1S2
Protorthodes incincta	Saturn quaker		SR	GNR	S2
Pygarctia spraguei	Sprague's Pygartic		SR	G5	S1S2
Pyrausta laticlavia	The Southern Purple Mint Moth		SR	GNR	S1S2
Pyrrhia aurantiago	False-foxglove Sun Moth		ST	G3G4	S1S2
Resapamea stipata	The Four-lined Cordgrass Borer		SE	G4	S1
Schinia indiana	Phlox Moth		SE	G2G4	S1
Schinia sanguinea	Bleeding Flower Moth			G4	S2S3
Schinia septentrionalis	Northern Flower Moth		SR	G3G4	S2S3
Scirpophaga perstrialis	Reed-boring Crambid Moth		SR	GNR	SNR
Sitochroa dasconalis	Pearly Indigo Borer		ST	GNR	S1S2
Sonia fulminana			SR	GNR	S1S2

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Indiana County Endangered, Threatened and Rare Species List County: Lake

Species Name	Common Name	FED	STATE	GRANK	SRANK
Speyeria idalia	Regal Fritillary	С	SE	G3	S1S2
Sphinx luscitiosa	The Luscious Willow Sphinx		SR	G4G5	S1S2
Spilosoma latipennis	The Red-legged Tussock Moth		SR	G4	S2S3
Sympistis riparia	The Dune Oncocnemis Moth		ST	G4	S1S2
Tricholita notata	Marked Noctuid		ST	G5	S1S2
Zomaria interruptolineana	Broken-lined Zomaria		SR	GNR	SNR
Insect: Odonata (Dragonflies & Damselflies) Somatochlora hineana	Hine's Emerald	LE	SX	G2G3	SX
Sympetrum semicinctum	Band-winged Meadowhawk		SR	G5	S2S3
Insect: Orthoptera Chloealtis conspersa	Sprinkled Locust		SR	G5	S2S3
Conocephalus saltans	Prairie Meadow Katydid		SR	G5	S1S2
Hesperotettix viridis pratensis	A Grasshopper		SR	G5T5	S1S2
Melanoplus fasciatus	Huckleberry Spur-throat		SR	G5	S2
Melanoplus keeleri luridus	Keeler's Spur-throated Grasshopper		SR	G5T5	S1S2
Neoconocephalus nebrascensis	Nebraska Conehead		SR	GNR	S1S2
Orphulella pelidna	Spotted-wing Grasshopper		SR	G5	S1S2
Pardalophora phoenicoptera	Orange-winged Grasshopper		SR	G5	S1S2
Paroxya atlantica	A Grasshopper		ST	GU	S1S2
Phoetaliotes nebrascensis	Large-headed Grasshopper		ST	G5	S1
Psinidia fenestralis	Sand Locust		SR	G5	S1S2
Trimerotropis maritima	Seaside Grasshopper		ST	G5	<u>S2</u>
Fish					
Acipenser fulvescens	Lake Sturgeon		SE	G3G4	S1
Ichthyomyzon fossor	Northern Brook Lamprey		SE	G4	S1
Rhinichthys cataractae	Longnose Dace		SSC	G5	S2
Amphibian Acris blanchardi			880	C5	S.4
	Blanchard's Cricket Frog		55C	G5	S7 S2
Necturus maculosus	Common mudpuppy		SSC	G5	S2 S2
Rentile	common march abb)				
Clemmys guttata	Spotted Turtle	C	SE	G5	S2
Clonophis kirtlandii	Kirtland's Snake		SE	G2	S2
Emydoidea blandingii	Blanding's Turtle	С	SE	G4	<u>S2</u>
Opheodrys vernalis	Smooth Green Snake		SE	G5	<u>S2</u>
Sistrurus catenatus	Eastern Massasauga	LT	SE	G3	S2
Terrapene carolina carolina	Eastern Box Turtle		SSC	G5T5	S 3
Terrapene ornata ornata	Ornate Box Turtle		SE	G5T5	S1

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Division of Nature Preserves	State:	SE = state endangered; ST = state threatened; SR = state rare; SSC = state species of special concern;
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This data is not the result of comprehensive county	GRANK:	Global Heritage Rank: G1 = critically imperiled globally; G2 = imperiled globally; G3 = rare or uncommon
surveys.		globally; G4 = widespread and abundant globally but with long term concerns; G5 = widespread and abundant
		globally; G? = unranked; GX = extinct; Q = uncertain rank; T = taxonomic subunit rank
	SRANK:	State Heritage Rank: S1 = critically imperiled in state; S2 = imperiled in state; S3 = rare or uncommon in state;
		C4 = widespread and shyndart in state but with lang terms concerns SC = state significants SU = historical in

NK: State Heritage Rank: S1 = critically imperiled in state; S2 = imperiled in state; S3 = rare or uncommon in state; G4 = widespread and abundant in state but with long term concern; SG = state significant; SH = historical in state; SX = state extirpated; B = breeding status; S? = unranked; SNR = unranked; SNA = nonbreeding status unranked

Indiana County Endangered, Threatened and Rare Species List County: Lake

Species Name		Common Name	FED	STATE	GRANK	SRANK
Thamnophis proximus proximus		Western Ribbon Snake		SSC	G5T5	83
Thamnophis radix		Plains Garter Snake		SSC	G5	S4
Bird						
Ammodramus henslowii		Henslow's Sparrow		SE	G4	S3B
Anas clypeata		Northern Shoveler			G5	SHB
Ardea alba		Great Egret		SSC	G5	S1B
Bartramia longicauda		Upland Sandpiper		SE	G5	S3B
Botaurus lentiginosus		American Bittern		SE	G5	S2B
Buteo platypterus		Broad-winged Hawk		SSC	G5	S3B
Certhia americana		Brown Creeper			G5	S2B
Charadrius melodus		Piping Plover	LE	SE	G3	SXB
Chlidonias niger		Black Tern		SE	G4G5	S1B
Chordelles minor		Common Nighthawk		SSC	G5	S4B
Cistothorus palustris		Marsh Wren		SE	G5	S3B
Cistothorus platensis		Sedge Wren		SE	G5	S3B
		Trumpeter Swan		SE	G4	SIB
Euphagus cyanocephalus		Brewer's Blackbird			G5	SHB,SIN
Falco peregrinus		Peregrine Falcon		SSC	G4	S2B
Gallinula galeata		Common gallinule		SE	G5	S3B
Grus canadensis		Sandhill Crane		SSC	GS	S2B,S1N
Hallaeetus leucocephalus		Bald Eagle		SSC	GS	S2
Hydroprogne caspia		Caspian Tern		~~~	G5	SIB
		Least Bittern		SE	GS	S3B
		Loggerhead Shrike		SE	G4	S3B
		Black Rail		SE	G3G4	SHB
		Black-and-white Warbler		SSC	GS	SIS2B
Nyctanassa violacea		Yellow-crowned Night-heron		SE	GS	S2B
Nycticorax nycticorax		Black-crowned Night-heron		SE	G	SIB
Pandion nallaetus		Osprey		SSC	GS	SIB
		Wilson's Phalarope		SSC	GS	SHB
		King Rail		SE	G4	SIB
		Virginia Rail		SE	C5	S3B
		American Woodcock		SSC	G	54B
		Greater Yellowlegs		SSC	G5	S3M
		Solitary Sandpiper		SSC	GS	S3M
Yenthesenholus venthesenholus		Barn Owl		SE	C5	S1D
Xanthocephalus xanthocephalus		Yellow-headed Blackbird		SE	63	SIB
Mammal Lasiurus borealis		Eastorn Dad D-t		880	G3G4	S/1
		Eastern Ked Bat		22C 22C	G3G4	54 S1
		Hoary Bat		220	0304	54
Indiana Natural Heritage Data Center Division of Nature Preserves Indiana Department of Natural Resources This data is not the result of comprehensive county surveys.	Fed: State: GRANK: SRANK [.]	LE = Endangered; LT = Threatened; C = ca SE = state endangered; ST = state threatened SX = state extirpated; SG = state significan Global Heritage Rank: G1 = critically imper globally; G4 = widespread and abundant gl globally; G? = unranked; GX = extinct; Q State Heritage Rank: S1 = critically imperiate	andidate; PDL = sd; SR = state ran it; WL = watch li rriled globally; C obally but with = uncertain rank led in state: S2 =	proposed for re; SSC = sta ist G2 = imperile long term co c; T = taxono imperiled in	r delisting ate species of sp ed globally; G3 ncerns; G5 = w mic subunit ran n state: S3 = rar	ecial concern; = rare or uncommon idespread and abundant ik e or uncommon in state

NK: State Heritage Rank: S1 = critically imperiled in state; S2 = imperiled in state; S3 = rare or uncommon in state; G4 = widespread and abundant in state but with long term concern; SG = state significant; SH = historical in state; SX = state extirpated; B = breeding status; S? = unranked; SNR = unranked; SNA = nonbreeding status unranked

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Indiana County Endangered, Threatened and Rare Species List County: Lake

Species Name	Common Name	FED	STATE	GRANK	SRANK
Myotis lucifugus	Little Brown Bat	С	SE	G3	S2
Myotis septentrionalis	Northern Long Eared Bat	LT	SE	G1G2	S2S3
Reithrodontomys megalotis	Western Harvest Mouse			G5	S2
Spermophilus franklinii	Franklin's Ground Squirrel		SE	G5	S2
Taxidea taxus	American Badger		SSC	G5	S2
Vascular Plant					
Agalinis auriculata	Earleaf Foxglove		ST	G3	S2
Agalinis gattingeri	Roundstem Foxglove		SR	G4	S3
Agalinis skinneriana	Pale False Foxglove		ST	G3G4	S2
Alnus incana ssp. rugosa	Speckled Alder		WL	G5T5	S3
Amelanchier humilis	Running Serviceberry		SE	G5	<u>S1</u>
Androsace occidentalis	Western Rockjasmine		ST	G5	S2
Aralia hispida	Bristly Sarsaparilla		SE	G5	S1
Arctostaphylos uva-ursi	Bearberry		SR	G5	<mark>S</mark> 3
Arethusa bulbosa	Swamp-pink		SX	G5	SX
Aristida intermedia	Slim-spike Three-awn Grass		WL	GNR	S3
Aristida tuberculosa	Seabeach Needlegrass		SR	G5	S 3
Asclepias meadii	Mead's Milkweed	LT	SRE	G2	SX
Aureolaria grandiflora var. pulchra	Large-flower False-foxglove		SX	G4G5T4T5	SX
Baptisia bracteata var. leucophaea	Cream Wild-indigo		WL	G4G5T4T5	S3
Baptisia tinctoria	Yellow Wild-indigo		WL	G5	S3
Betula papyrifera	Paper Birch		SR	G5	S 3
Betula populifolia	Gray Birch		WL	G5	S1
Bidens beckii	Beck Water-marigold		SE	G5	S1
Botrychium matricariifolium	Chamomile Grape-fern		SR	G5	S 3
Botrychium simplex	Least Grape-fern		SE	G5	S1
Buchnera americana	Bluehearts		SE	G5?	S1
Calopogon oklahomensis	Oklahoma grass-pink		SX	G3	SX
Carex aurea	Golden-fruited Sedge		SR	G5	S 3
Carex bebbii	Bebb's Sedge		SR	G5	S 3
Carex brunnescens	Brownish Sedge		ST	G5	S 2
Carex conoidea	Prairie Gray Sedge		ST	G5	S2
Carex crawei	Crawe Sedge		ST	G5	S 2
Carex cumulata	Clustered Sedge		SE	G4G5	S1
Carex eburnea	Ebony Sedge		SR	G5	S 3
Carex echinata	Little Prickly Sedge		SE	G5	S1
Carex garberi	Elk Sedge		SE	G5	S1
Carex limosa	Mud Sedge		SE	G5	S1
Carex richardsonii	Richardson Sedge		ST	G5	S2
Carex seorsa	Weak Stellate Sedge		SR	G5	S 3

Indiana Natural Heritage Data Center	Fed:	LE = Endangered; LT = Threatened; C = candidate; PDL = proposed for delisting
Division of Nature Preserves	State:	SE = state endangered; $ST =$ state threatened; $SR =$ state rare; $SSC =$ state species of special concern;
Indiana Department of Natural Resources		SX = state extirpated; $SG =$ state significant; $WL =$ watch list
This data is not the result of comprehensive county	GRANK:	Global Heritage Rank: G1 = critically imperiled globally; G2 = imperiled globally; G3 = rare or uncommon
surveys.		globally; G4 = widespread and abundant globally but with long term concerns; G5 = widespread and abundant
		globally; G? = unranked; GX = extinct; Q = uncertain rank; T = taxonomic subunit rank
	SRANK:	State Heritage Rank: $S1 = critically$ imperiled in state: $S2 = imperiled$ in state: $S3 = rare or uncommon in state:$

ANK: State Heritage Rank: S1 = critically imperiled in state; S2 = imperiled in state; S3 = rare or uncommon in state; G4 = widespread and abundant in state but with long term concern; SG = state significant; SH = historical in state; SX = state extirpated; B = breeding status; S? = unranked; SNR = unranked; SNA = nonbreeding status unranked Appendix F Ecological and Water Resources

ECOLOGICAL EVALUATION FORM

Road: <u>61st Ave and Marcella Blvd. Hobart, IN</u> Des. No: <u>NIRPC1600451</u> Project No: <u>6371</u> County: <u>Lake</u> Project Description: New Round-About

 Natural Region and Section:
 Northwestern Morainal Natural Region, Chicago Lake Plain Section

 8-Digit Watershed:
 04040001
 USGS Quadrangle:
 Gary_
 Soil Survey Map Sheet __online____

RIGHT-OF-WAY BY LAND USE TYPE

Permanent Right-of-way				
Land Use Type	R/W (ac)			
Commercial	1.65			
Industrial				
Residential				
Agricultural	0.2			
Wooded				
Total Perm R/W	1.85			

Temporary Right-of-way					
Land Use Type	R/W (ac)				
Commercial	0.5				
Industrial					
Residential					
Agricultural					
Wooded					
Total Temp R/W	0.5				

Is the project located in an urban or a rural setting? _Urban_____

Is land use in the project changing? Yes No If yes, explain: _This project will convert commercial land use to transportation land use ______

QUADRANT DESCRIPTION

Northeast	commercial	
Northwest	<u>commercial</u>	
Southeast	commercial	
Southwest	commercial	

STREAM INFORMATION- N/A

	Width		Depth			Maximu	m Depth
Bank Full Channel							
Ordinary High Water Mark							
Substrate Material: (circle one Flow Velocity: (circle one) Does the stream contain riffle Does the stream contain mear Is channel work proposed as p	e) silt stagna /pool comple ders within to part of this pr	sand ant slow exes? Yes the proposed right-o roject? Yes	No f-way? No	gravel moderate Yes No If yes, describe:	loos swi	se rock ft	bedrock rapid
Is aquatic flora present? Ye	s No	If yes, please list	:				
Is aquatic fauna present? Ye	s No	If yes, please list	:				
Comments:							
	· · · · · · · · · · · · · · · · · · ·					· · · · · · · · · · · · · · · · · · ·	

TERRAIN

Immediate Area: Extended Area: Depressed Depressed Flat Flat Gently Rolling Gently Rolling Rolling Rolling

Hilly Hilly

TERRESTRIAL WILDLIFE – None observed Fauna Observed or Indicated

Family ¹	Common Name	Scientific Name	Indication ²

¹Mammal, Bird, Reptile, or Amphibian ²Observed Animal, Tracks, Scat, Homes, and/or Markings

Dominant Flora Observed

Strata ¹	Common Name	Scientific Name	Wetland Indicator ²	Location ³
Overstory	Box elder	Acer negundo	FAC	Upland
Overstory	Black Walnut	Juglans nigra	FACU	Upland
Understory	Green ash	Fraxinus	FACW	Upland
		pennsylvanica		
Understory	Elm	Ulmus rubra	FAC	Upland
Understory	Mulberry	Morus rubra	FACU	Upland
Herbaceous	Teasel	Dipsacus fullonum	FACU	Upland
Herbaceous	Goldenrod	Solidago canadensis	FACU	Upland
Herbaceous	Poison hemlock	Conium maculatum	FACW	Upland
Herbaceous	Lady thumb	Polygonum persicaria	FACW	Upland
Herbaceous	Milkweed	Asclepias syriaca	FACU	Upland
Herbaceous	Chicory	Cichorium intybus	FACU	Upland
Herbaceous	Queen Anne's Lace	Daucus carota	UPL	Upland
Herbaceous	Plantain	Plantago major	FAC	Upland
Herbaceous	Daisy fleabane	Erigeron annuus	FACU	Upland
Herbaceous	Ragweed	Ambrosia trifida	FAC	Upland
Herbaceous	Giant sunflower	Helianthus giganteus	FACW	Upland
Understory	Green ash	Fraxinus	FACW	Floodplain
		pennsylvanica		
Understory	Common reed	Phragmites australis	FACW	Floodplain
Understory	Reed canary grass	Phalaris arundinacea	FACW	Floodplain
Understory	Cattails	Typha angustifolia	OBL	Floodplain

¹Overstory, Understory, Vine, or Herbaceous

²UPL, FACU-, FACU, FACU+, FAC-, FAC, FAC+, FACW-, FACW, FACW+, or OBL ³Floodplain, Depression, or Upland

SOILS INFORMATION

Abbreviation	Soil Name	Soil Texture	Drainage Class ¹	Hydric Soil Status ²	Location ³
De	Del Rey	Silt loam	SWPD	HI (6%)	Within project area, all but the southeast
					quadrant
Вр	Borrow Pits	Na	Na	Na	Within project area, southeast quadrant

¹ED-Excessively Drained, WD-Well Drained, MWD-Moderately Well Drained, SWPD-Somewhat Poorly Drained, PD-Poorly Drained, VPD-Very Poorly Drained

²H-Hydric Soil, HI-Contains Hydric Inclusions, NH-Non-Hydric

³Floodplain, Depression, or Upland

ENDANGERED AND THREATENED SPECIES

Is this project located within the range of any Federally Endangered or Threatened Species? Yes No If yes, please list below.

Common Name	Scientific Name	Status	Confirmed Occurrences Nearby?	Suitable Habitat Present
Indiana bat	Myotis sodalis	Е	No	Yes No
Northern long-eared bat	Myotis septentrionalis	Т	No	Yes No
				Yes No
				Yes No
				Yes No

Will any of the above listed species be impacted by the planned improvements? Yes No

NATURAL AREAS

Are there any natural areas located within 5 miles of the project area? Yes No If yes, please list below.

Property Name	Ownership	Proximity to Project
Oak Ridge Prairie County Park	Lake County Parks and Recreation	3.1 miles west
Oak Savannah Trail	Lake County Parks and Recreation	2.7 miles northwest
Hobart Marsh	DNR Nature Preserves	0.8 miles north
Mac Jay Lake	Izaak Walton League	1.5 miles north
Hidden Prairie	Shirley Heinze	2.0 miles north
McCloskey's Burr Oak Savanna	DNR Nature Preserves	1.8 miles north
Greiner Nature Preserve	Shirley Heinze	2.2 miles northeast
Hobart Prairie Grove	NPS	0.9 miles northeast
Deep River County Park	Lake County Park Board	3.1 miles southeast

Will any of the above listed properties be impacted by the planned improvements? Yes No

WETLAND INFORMATION

Are wetlands mapped within or adjacent to project limits? Yes No

If yes, please list below.

Wetla	and Type	Abbreviation	Location within Project	Co	nfirn	ned in Field?
Freshwater	Forested/Shrub	PFO1C	Approximately 0.01 mile north of the	Yes	No	Undetermined
Wetland			project area			
				Yes	No	Undetermined
				Yes	No	Undetermined
				Yes	No	Undetermined
				Yes	No	Undetermined
				Yes	No	Undetermined
				Yes	No	Undetermined
				Yes	No	Undetermined

Were any of the following wetland indicators observed in or adjacent to project limits?

	Yes	<u>No</u>	Location within Project
Standing Water		_X	
Saturated Soil		_X	
Depressional Areas		X	
Water Marks on Trees		_X	
Drift Lines		_X	
Fluted Tree Trunks/Roots		_X	
Sediment Deposits		_X	

Water Stained Leaves	Х	
Other	X	There is an area with FACW and OBL species located in a low area
in the floodplain of Turkey Cre	ek. This is at the nor	thern edge of the potential project area.
Is there a potential for impacts Comments:	to jurisdictional wetla	ands as a result of the planned improvements? Yes No
GENERAL PROJECT	<u>COMMENTS</u>	

Performed by: <u>Jennifer Lee</u> Date: <u>10/23 & 30/2019</u>

Waters of the U.S. Determination Report



Photo taken on September 25, 2019; looking east toward the outlet of Culvert No. 1 and Wetland 1.

Butler, Fairman & Seufert, Inc.

8450 Westfield Blvd., Suite 300 Indianapolis, IN 46240 (317) 713-4615 www.bfsengr.com December 18, 2019



Prepared By: Jennifer Lee INVESTIGATION FOR THE CITY OF HOBART 61ST AVENUE AND MARCELLA BOULEVARD INTERSECTION IMPROVEMENT 0.3 MILE EAST OF THE I-65/61ST AVENUE INTERCHANGE CITY OF HOBART, LAKE COUNTY, INDIANA DES NO. 1902707 "Waters of the U.S." determination within the study limits for the project.

"WATERS OF THE U.S." DETERMINATION REPORT

61st Avenue and Marcella Boulevard Intersection Improvements 0.14 mile east of I-65 and 61st Avenue Interchange in the City of Hobart, Lake County, Indiana Des No. 1902707 Prepared By: Jennifer Lee, <u>jlee@bfsengr.com</u>, 317-713-4615 Butler, Fairman & Seufert, Inc. December 18, 2019

Dates of Field Investigation: October 23 and 30, 2019

Project Location: The project is located on 61st Avenue, starting 0.14 miles east of I-65, continuing approximately 0.27 miles west along 61st Ave; and from approximately 0.08 miles south of 61st Avenue/Marcella Boulevard, continuing along Marcella Boulevard approximately 0.14 mile north. The project is also located in Sections 2 and 11, Township 35 North, Range 8 West of the United States Geological Survey (USGS) Gary, Indiana Quadrangle (see page 12).

LAT 41.5072956 N, LONG -87.3141408 W (61st Avenue/Marcella Boulevard intersection, center of study area)

Project Description:

The City of Hobart, with funding from the Federal Highway Administration (FHWA), proposes a Roadway Improvement project to the intersection of 61st Avenue and Marcella Boulevard. Work would entail the construction of a roundabout. This is a federal aid project.

The need for the project is due to the accident rate and congestion at 61st Avenue and Marcella Boulevard. From 2016 to 2018, there were 58 accidents at the intersection. The City of Hobart's 2016 "Southwest Development Area Traffic Study" found the intersection of 61st Avenue and Marcella Boulevard is not sufficient for accommodating increasing traffic volumes. The purpose of this project is to decrease the crash rate and expand the capacity of the intersection of 61st Avenue and Marcella Boulevard.

The project proposes to construct a three-lane roundabout at the intersection of 61st Avenue and Marcella Boulevard. The roundabout may be offset slightly to the southwest of the existing intersection, pending further study. The roundabout will include two (2) east bound lanes entering and exiting the roundabout, two (2) west bound lanes entering and two (2) west bound lanes exiting the roundabout, a one (1) lane south bound lane entering and two (2) south bound lanes exiting the roundabout and two (2) north bound left turn lanes and one (1) thru/left/right lane entering and a single north bound lane exiting the roundabout. The approach along Marcella Boulevard to the south of 61st Avenue would be widened to a maximum of five (5) travel lanes, three (3) northbound, including two (2) southbound lanes. The approach along Marcella Boulevard to the north of 61st Avenue, and two (2) southbound lanes. The approach along Marcella Boulevard to the north of 61st Avenue would be widened to a maximum of two (2) travel lanes, one (1) northbound and one (1) southbound. Sidewalks, will be installed in select locations throughout the project area. Lighting will be installed on the roundabout. Existing lighting will be replaced with LED lights. All new lighting will likely be Cobra LED downward facing full cut off lighting. Excavation would be a maximum of 10 feet deep. Curb and Gutter will be reconstructed throughout the project area. This project proposes to install an enclosed storm sewers

system to convey the stormwater to Turkey Creek, which is located approximately 730 feet north of the 61st Avenue/Marcella Boulevard. Approximately 3.0 acres of permanent and 0.5 acre of temporary right-of-way acquisition would be anticipated from select commercial properties within the project area. However, the exact ROW required by the project is yet to be determined.

DESKTOP RECONNAISSANCE

Site(s) Background:

Prior to the field investigation, several reference materials were consulted to gain information about the site. The USGS Demotte, IN Quadrangle Map (page 12) and Light Detection and Ranging (LiDAR) Map (pages 14) were used to determine contours of the site and locate any water bodies in the area, as well as to provide a legal description of the area. The Natural Resources Conservation Service (NRCS) Web Soil Survey website¹ for Lake County, Indiana (pages 15-17) was consulted to determine if the project area contained any soils listed in either the *Hydric Soils of the United States* manual or the state list of hydric soils publication, along with a description of characteristics displayed by the mapped soil types of the area. The United States Fish and Wildlife (USFWS) National Wetlands Inventory (NWI) map was used to find and classify any previously cataloged wetlands in the project area (page 18). The Federal Emergency Management Agency's (FEMA) floodplain map was consulted to gain an understanding of historic flood locations and frequency (page 19). All of this information provided a background for the hydrologic regime of the area.

Soils:

According to the NRCS Web Soil Survey¹ for Lake County, Indiana, the project area has mapped soil types with hydric inclusions (pages 15-17). The following soil types are mapped within the proposed project limits:

Soil Map Summary Table

Soil Name	Map Abbreviation	Hydric Range
Del Rey Silt Loam	De	Hydric (1-32%)
Borrow Pits	Вр	Unranked
Milford-Palms-Wallkill complex	Mt	Hydric (100%)
Milford Silty Clay Loam 0 to 2% slopes	Mr	Hydric (65-99%)

The results of the soil mapping indicate that soils in the project area may have sufficient hydrology to be considered hydric according to the criteria used by the NRCS under the definition of hydric soils².

¹ <u>https://websoilsurvey.nrcs.usda.gov/app/WebSoilSurvey.aspx</u>

² <u>https://www.nrcs.usda.gov/wps/portal/nrcs/detailfull/pr/soils/?cid=nrcs141p2_037283</u>

National Wetland Inventory (NWI) Information:

According to the NWI website³, the following wetlands are mapped within or near the project area (page 18).

Wetland/Water Feature	Classification (per	Size (acres)	Location (approximate)	
Туре	Cowardin et. al.)			
Freshwater	PFO1C	32.61	Mapped 1300 feet northwest of	
Forested/Shrub Wetland			the project's northern terminus.	
			No impact is expected.	
Riverine	R2UBH	2.48	Mapped approximately 755 feet	
			north of the western terminus of	
			the project area. No impact is	
			expected.	
Riverine	R5UBH	0.09	Mapped approximately 1030 feet	
			northwest of the western terminus	
			of the project area. No impact is	
			expected.	
Freshwater	PFO1C	52.47	Mapped within the study area, 420	
Forested/Shrub			feet north of the 61 st	
Wetland			Avenue/Marcella	
			Boulevard intersection.	
Riverine	R5UBH	0.21	Mapped approximately 1200 feet	
			north of the project's western	
			terminus. No impact is expected.	
Freshwater	PEM1A	1.52	Mapped approximately 600 feet	
Emergent Wetland			south of the southern terminus of	
			the project area. No impact is	
			expected.	
Freshwater	PEM1A	1.04	Mapped approximately 650	
Emergent Wetland			southwest of the project's southern	
			terminus. No impact is expected.	
Freshwater	PEM1A	1.29	Mapped approximately 700 feet	
Emergent Wetland			south of the projects southern	
			terminus. No impact is expected.	
Freshwater	PEM1C	1.51	Mapped approximately 710 feet	
Emergent Wetland			southeast of the project's southern	
			terminus. No impact is expected.	
Freshwater Emergent	PEM1C	2.//	Mapped approximately 1240 feet	
Wetland			southwest of the project's southern	
			terminus. No impact is expected.	

The results of the NWI mapping indicates that one (1) water resource, a 52.47-acre Freshwater Forested/Shrub Wetland, is mapped partially within the study area.

³ <u>https://fwsprimary.wim.usgs.gov/wetlands/apps/wetlands-mapper/</u>

Hydrologic Unit Code (HUC): 040400010505, Deep River-Portage Burns Waterway

Attached documents:

- * Maps (Project Location: State, Quadrangle, Water Resources Aerial, LiDAR, NRCS Soils, NWI, and FEMA FIRM)
- * Photographs with orientation map
- * Wetland Data Sheets
- * Preliminary Jurisdictional Determination Form and Table

FIELD RECONNAISSANCE

The footprint of the investigation consisted of the area that has the potential to be impacted based on the provided design scenario. The area of investigation was evaluated for the presence or absence of wetlands and waterways. Approximately 18.85 acres were investigated. The study area includes an area surrounding 61st Avenue from 630 feet east of I-65 and continuing east for approximately 1,780 feet. Measuring west to east, to the north of the center line along 61st avenue, the study area includes the area 80 feet north of 61st Avenue and continuing east for 850 feet, 575 feet north of 61st Avenue for the next 396 feet in the eastern direction, then 60 feet north of 61st Avenue to the eastern terminus of the project area. Measuring west to east, to the south of the center line along 61st Avenue, the study area includes the area 120 feet south for 565 feet, 880 feet south of 61st avenue for the next 435 feet in the eastward direction, then 55 feet south of 61st Avenue to the eastern terminus of the project area. The study area consisted of a commercial landscape immediately east of an interstate interchange. The area was investigated by walking transects east to west within the study limits for the project and looking for any visual evidence of waterway or wetland characteristics. All areas mapped as wetlands on the USFWS NWI map were investigated. Sampling points, also referred to as data points, were taken where wetland characteristics were observed during field reconnaissance. Sampling points were paired with a sampling point outside the potential wetland area to support the location of the wetland boundary. Any drainage features that display a defined channel and ordinary high-water mark (OHWM) were considered potentially jurisdictional streams. Any water features that did not meet these criteria were not considered as streams.

Stream Feature Discussion:

According to the NWI, the nearest stream feature is mapped approximately 40 feet north of the study area and is known as Turkey Creek. No impact to Turkey Creek is expected. No stream features were found within the study area during field reconnaissance.

Wetland Feature Discussion:

One (1) suspected palustrine wetland feature was investigated within the study limits.

Suspected Wetland 1:

AN area suspected to be a Wetland is located in the central northern portion of the study area and is included within a 52.47 acre mapped freshwater forested/shrub wetland habitat which is classified by the NWI inventory as a palustrine, forested, broad-leaved deciduous, and seasonally flooded (PFO1C) wetland. The suspected wetland was observed to be approximately 0.62 acre in size and located in the floodplain, along Turkey Creek, surrounded on three sides by steep slopes.

Two (2) data points were collected; one (1) wetland data point labeled Data Point 1A (pages 50-51) and one (1) non-wetland data point, labeled Data Point 1B (pages 52-53). The soil type mapped at both data point locations is Del Rey Silt Loam. Del Rey Silt Loam is considered non-hydric; however, also included in this soil mapping unit are 5% Bono and 5% Milford soils which are both considered to be hydric.

Data Point 1A was taken in on a slope, approximately 2 feet above the average elevation of the suspected wetland and approximately 125 feet south of Turkey Creek. See page 13 and 21 for a map of the location of Data Point 1A. The soil profile found at Data Point 1A is consistent with the wetland soil indicator known as "Depleted Matrix" (F3). The soil profile included the following findings: At a depth of 0 to 5.5 inches the soil matrix is dark greyish brown (10YR 4/2) with no redox features, and a silty clay texture. At a depth of 5.5 to 16 inches 98% of the soil matrix is pale brown (10YR 6/3) and 2% of the matrix is strong brown (7.5YR 5/6) with a clay texture. A typical pedon of the Del Rey series is dark greyish brown (10YR 4/2) silt loam, moderate fine and medium granular structure; friable; many fine roots; with an abrupt smooth boundary from 0-4 inches. From 4 to 9 inches it is light brownish grey (10YR 6/2) silt loam; moderate thin and medium platy structure; friable; many fine roots; with an abrupt smooth boundary. From 9 to 12 inches it is brown (10YR 5/3) silty clay loam; strong fine subangular blocky structure; firm; common fine roots; many distinct grayish brown (10YR 5/2) clay films on faces of peds and many distinct pale brown (10YR 6/3) (dry), clay depletions on faces of peds; with a clear smooth boundary. From 12 - 25 inches it is light brownish gray (2.5Y 6/2) silty clay; strong fine and medium subangular blocky structure; firm; common fine roots; many distinct gravish brown (10YR 5/2) clay films on faces of peds; few fine prominent yellowish brown (10YR 5/8) masses of oxidized iron in the matrix; with a clear smooth boundary.

The soil found at Data Point 1A has the same matrix color as these soils at the surface (10YR 4/2); however, this layer is 0 to 5.5 inches in depth rather that 0 to 4 inches in the typical pedon of Del Rey soil. The texture of the sample at this depth is silty clay rather than the texture of a typical pedon which is silt loam at this depth. The soil found at Data Point 1A from 5.5 to 16 inches has a pale brown matrix (10YR 6/3) which is similar to the typical pedon of Del Rey which is light brownish grey (10YR 6/2). At Data Point 1A, the water table was located at a depth of 10 inches with saturation present at a depth of 9 inches. The hydrology in the area is likely supported by the high water table in connection with Turkey Creek. The vegetation within the data point area consisted of a dominant hydrophytic plant community with a tree stratum with 10% cover of *Ulmus rubra*; a sapling/shrub stratum with 5% each *Fraxinus pennsylvanica* and *Acer saccharinum*; an herb stratum with 90% *Phragmites australis*, and 5% each *Toxicodendron radicans* and *Taraxacum officinalle*, and a woody vine stratum of 10% *Vitis riparia*. Data Point 1A passed the Dominance Test with a result of 100%. Therefore, Data Point 1A was determined to be a wetland data point (see pages 42, 43, 46, and 48 for photos of Wetland 1, pages 43-45 for photos of Data Point 1A, and pages 50-51 for the data point 1A data sheet).

Data Point 1B was taken at the top of the slope, in a grassy area where the slope is <1%, approximately 125 feet south of Turkey Creek and approximately 14 feet east of Data Point 1A. See page 13 for a map of the location of Data Point 1B. The soil at Data Point 1B exhibits the following findings: At a depth of 0 – 8.5 inches, a matrix color of very dark grey (10YR 3/1) with no redox features and a silty clay texture. At a depth of 8.5-16 inches, the matrix is approximately 50% pale brown (10YR 6/3) and 50% yellowish brown (10YR 5/8), with a clay texture. The soil at Data Point 1B does not meet any indicators for hydric soils. The soil at sample site 1B does not closely match a typical pedon of Del Rey series. It may be the result of roadway fill or from prior disturbance. No indicators of wetland hydrology were observed at Data Point 1B. The vegetation community consisted of 50% *Poa pratensis* (FAC), 30% *Lamium*

purpureum (UPL), 20% *Trifolium pretense* (FACU), and 10% *Taraxacum officinale* (FACU). Therefore, the plant community does not pass the dominance test for a hydrophytic plant community. Additionally, the Prevalence Index is 3.82, indicating non-hydrophytic plant community. Since the sample site does not have wetland hydrology, a hydrophytic plant community, or hydric soil, Data Point 1B was determined to be a non-wetland data point (see page 44-48 for photos of Data Point 1B, and pages 52-53 for the Data Point 1B data sheet).

The suspected wetland area was confirmed as a wetland and named Wetland 1. The boundary for Wetland 1 was determined by using the combination of change of elevation and change in plant community from a primarily *Phragmites australis* community to a primarily *Poa pratensis* community. Suspected Wetland 1 is rectangular shaped. See page 13 for a map of Wetland 1.

Wetland 1 is of poor quality due to the lack of diversity of plant species present in the wetland. Since Wetland 1 is adjacent to Turkey Creek; Turkey Creek flows into Deep River in Hobart, Indiana; Deep River flows into Little Calumet River in New Chicago, Indiana; and Little Calumet River flows into Lake Michigan; therefore Suspected Wetland 1 should be considered jurisdictional under A6 of 40 CFR 230.3 *"All waters adjacent to a water identified as waters which are currently used, were used in the past, or may be susceptible to use in interstate or foreign commerce, all tributaries of those waters, and those waters including wetlands, ponds, lakes, oxbows, impoundments, and similar waters".*

Data Point Summary Table

<u>Data Point</u>	Lat/Long	Vegetation	<u>Soils</u>	<u>Hydrology</u>	<u>Wetland</u>
1A	41.5087136 N;	Yes	Yes	Yes	Yes
	-87.3141996 W				
1B	41.5087316 N;	No	No	No	No
	-87.3141514				

Wetland Summary Table

Wetland	<u>Photos</u>	Lat/Long	Type	Total Area	<u>Quality</u>	<u>Likely a water</u>
<u>Name</u>				(acres)		of the US?
Wetland 1	41-48,	41.5087136N,	Emergent	0.62	Poor	Yes
	54	- 87.3141996				

Open Water Discussion:

According to the NWI wetlands mapper website (<u>https://fwsprimary.wim.usgs.gov/wetlands/apps/wetlands-mapper/</u>), There are no open water features mapped within 0.5 mile of the study area. No open water features were observed within the project area during the site reconnaissance. Therefore, no open water features were investigated during field reconnaissance.

Conclusion and Recommendations:

Field observations identified one (1) wetland habitat within the study area. According to the NWI wetlands mapper website (<u>https://fwsprimary.wim.usgs.gov/wetlands/apps/wetlands-mapper/</u>), Wetland 1 is mapped as a part of a larger wetland that is 52.47 acres in size and is mapped as a palustrine, forested, broad-leaved deciduous, seasonally flooded wetland habitat. During site reconnaissance Wetland 1 was observed to be approximately 0.62 acre in size, bordered by Turkey Creek to the north and by >100% slopes in all other directions. This wetland is likely a "Waters of the U.S." Every effort should be taken to avoid and minimize impacts to this wetland. If impacts are necessary, then mitigation may be required. The INDOT Environmental Services Division should be contacted immediately if impacts will occur. The final determination of jurisdictional waters is ultimately made by the U.S. Army Corps of Engineers. This report is our best judgment based on the guidelines set forth by the Corps.

Acknowledgement:

This waters determination has been prepared based on the best available information, interpreted in the light of the investigator's training, experience and professional judgement in conformance with the 1987 Corps of Engineers Wetlands Delineation Manual, the appropriate regional supplement, the USACE Jurisdictional Determination Form Instructional Guidebook, and other appropriate agency guidelines.

Jennifer Lee Environmental Scientist, Butler, Fairman, & Seufert, Inc.

Supporting Documentation:	Page Number(s)
State Map	11
USGS Gary, Indiana Quadrangle Map	12
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Natural Resources Conservation Service Soils Map	15 – 17
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NOTE: State Map, USGS Quad Map, the ETR List, and a portion of the Photosheets which did not depict wetland features were removed for space conservation. See Appendix B for Maps and photos of the project site and Appendix E for the Lake County ETR List.

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Water Resources Map



December 13, 2019

Study areaData Point 1AData Point 1B

61st Ave and Marcella Blvd Intersection Improvements City of Hobart, Lake County, Indiana Des No. 1902707



F15



Study area

Des No. 1902707



USDA Natural Resources Conservation Service Web Soil Survey National Cooperative Soil Survey 6/7/2019

MAP LEGEND		MAP INFORMATION
Area of Interest (AOI) Area of Interest (A	OI) Stony Spot	The soil surveys that comprise your AOI were mapped at 1:15,800.
Soils Soil Map Unit Pol	rgons	Warning: Soil Map may not be valid at this scale.
Soil Map Unit Line	s Wet Spot	misunderstanding of the detail of mapping and accuracy of line placement. The maps do not show the small areas of
Soil Map Unit Poir Special Point Features	Special Line Features	contrasting soils that could have been shown at a more det scale.
OBIOWOUT	Water Features	Please rely on the har scale on each man sheet for man
Borrow Pit	Streams and Canals	measurements.
💥 Clay Spot	Transportation ++++ Rails	Source of Map: Natural Resources Conservation Service
Closed Depressio	n 🗾 🗾 Interstate Highways	Coordinate System: Web Mercator (EPSG:3857)
💥 Gravel Pit	US Routes	Maps from the Web Soil Survey are based on the Web Mer
Gravelly Spot	对 Major Roads	projection, which preserves direction and shape but distorts
🔇 Landfill	Local Roads	Albers equal-area conic projection, should be used if more
👗 🛛 Lava Flow	Background	accurate calculations of distance or area are required.
Marsh or swamp	Aerial Photography	This product is generated from the USDA-NRCS certified d of the version date(s) listed below.
Miscellaneous Wa	ter Approximate Project Area	Soil Survey Area: Lake County, Indiana Survey Area Data: Version 21, Sep 7, 2018
Perennial Water		Soil map units are labeled (as space allows) for map scales
Rock Outcrop		1:50,000 or larger.
Saline Spot		Date(s) aerial images were photographed: Mar 13, 2012– 28, 2012
Sandy Spot		The orthophoto or other base map on which the soil lines w
Severely Eroded	Spot	compiled and digitized probably differs from the background
Sinkhole		shifting of map unit boundaries maps. As a result, some minor
Slide or Slip		
jø Sodic Spot		



Map Unit Legend

Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
Вр	Borrow pits	14.8	13.5%
De	Del Rey silt loam	70.4	64.0%
Mr	Milford silty clay loam, 0 to 2 percent slopes	6.6	6.0%
Mt	Milford-Palms-Wallkill complex	14.9	13.6%
OzaB	Ozaukee silt loam, 2 to 6 percent slopes	3.2	2.9%
Totals for Area of Interest		110.1	100.0%



U.S. Fish and Wildlife Service National Wetlands Inventory

61st Ave and Marcella Blvd Intersection Improvements City of Hobart, Lake County, Indiana Des No. 1902707



June 7, 2019

Wetlands

- Estuarine and Marine Deepwater
- Estuarine and Marine Wetland
- Approximate Project Area
- Freshwater Forested/Shrub Wetland Freshwater Pond

Freshwater Emergent Wetland

Lake Other Riverine This map is for general reference only. The US Fish and Wildlife Service is not responsible for the accuracy or currentness of the base data shown on this map. All wetlands related data should be used in accordance with the layer metadata found on the Wetlands Mapper web site.





Photo Orientation Map, Photos 1 - 40



December 3, 2019

- Study Area
- # Photo Location
- Photo Direction



61st Ave and Marcella Blvd Intersection Improvements City of Hobart, Lake County, Indiana Des No. 1902707

Photo Orientation Map, Photos 41-55



December 6, 2019

- Data Point 1A and location of soil sample 1A (photo no. 44)
- Data Point 1 Band location of soil sample 1B (photo no. 49)



- Location of photo no. 48 looking west and location of photo no. 53 looking east
- Photo Location #
- Photo Direction

61st Ave and Marcella Blvd Intersection Improvements City of Hobart, Lake County, Indiana Des No. 1902707

Study Area



Photo 41: Looking west from a location approximately 560 feet north of the 61st Avenue/ Marcella Boulevard intersection looking toward the wetland which is at a lower elevation.



Photo 42: Looking south from a location approximately 560 feet north of the 61st Avenue/ Marcella Boulevard intersection. The wetland is to the west top right in the photos, and its boundary is along the steep slope at the center of the photograph.



61st Avenue/Marcella Boulevard Intersection Project City of Hobart, Lake County, Indiana Des. No. 1902707



Photo 43: Looking west from a location approximately 540 feet north of the 61st Avenue/ Marcella Boulevard intersection, noting the change in elevation from upland at the higher elevation and the wetland at the lower elevation. Wetland vegetation is visible, as it grows along the slope.



Photo 44: Looking towards the soil sample for Data Point 1A.



61st Avenue/Marcella Boulevard Intersection Project City of Hobart, Lake County, Indiana Des. No. 1902707



Photo 45: Looking east toward Data Point 1A.



Approximate slope line

Photo 46: Looking south toward Data Point 1A.



Data Point 1A

> 61st Avenue/Marcella Boulevard Intersection Project City of Hobart, Lake County, Indiana Des. No. 1902707


Photo 47: Looking north toward data Point 1A.



Photo 48: Looking west (downslope) toward Data Point 1A.





Photo 49: Looking toward the soil sample for Data Point 1B.



Photo 50: Looking west toward Data Point 1B





Photo 51: Looking north toward Data Point 1B.



Photo 52: Looking south toward Data Point 1B.





Photo 53: Looking east toward Data Point 1B.



Photo 54: Looking west, toward tWetland 1 from a location approximately 575 feet south of the 61st Avenue/Marcella Boulevard intersection.



WETLAND DETERMINATION DATA FORM – Midwest Region

Project/Site: 61st Avenue and Marcela Blvd.	City/County: City of Hobart, Lake County	Sampling Date: 10/30/2019
Applicant/Owner: City of Hobart	State: IN	Sampling Point: <u>1A</u>
Investigator(s): Jennifer Lee	Section, Township, Range: Sec. 2, Twp 35N,	Range 8W
Landform (hillslope, terrace, etc.): hillslope	Local relief (concave, convex, none):	none
Slope (%): 10% Lat: 41.5087136	Long:87.3141996	Datum: UTM17N NAD83
Soil Map Unit Name: Del Rey silt Ioam	NWI classific	ation: PFO1C
Are climatic / hydrologic conditions on the site typical for this time of ye	ear? Yes X No (If no, explain in R	emarks.)
Are Vegetation <u>no</u> , Soil <u>no</u> , or Hydrology <u>no</u> significantly	disturbed? Are "Normal Circumstances" p	oresent? Yes 🔀 No
Are Vegetation <u>no</u> , Soil <u>no</u> , or Hydrology <u>no</u> naturally pr	oblematic? (If needed, explain any answe	rs in Remarks.)

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

Hydrophytic Vegetation Present?	Yes X No		
Hydric Soil Present?	Yes X No	Is the Sampled Area	. <i>.</i>
Wetland Hydrology Present?	Yes X No	within a Wetland?	Yes X No
Demonstra			

Remarks:

Data Point 1A was taken in on a slope, approximately 2 feet above the average elevation of the suspected wetland and approximately 125 feet south of Turkey Creek. See page 13 for a map of the location of Data Point 1A.

VEGETATION - Use scientific names of plants.

20 feet rediue	Absolute	Dominant	Indicator	Dominance Test worksheet:
Tree Stratum (Plot size: 50 1001 radius)	% Cover	Species?	Status	Number of Dominant Species
_{1.} Ulmus rubra		yes	FAC	That Are OBL, FACW, or FAC: _3(A)
2.				
2				Total Number of Dominant
S				Species Across All Strata: (B)
4				Percent of Dominant Species
5				That Are OBL, FACW, or FAC: 100% (A/B)
15 fact redive	10	= Total Co	ver	
Sapling/Shrub Stratum (Plot size: 15 1001 radius)				Prevalence Index worksheet:
1. Acer saccharinum	5	no	FACW	Total % Cover of: Multiply by:
2. Fraxinus pennsylvanica	5	no	FACW	OBL species x 1 =
3.				FACW species x 2 =
4				FAC species x 3 =
5				FACIL species x 4 =
5	10			
Herb Stratum (Plot size, 5 foot radius	10	= Total Co	ver	
Phragmites autralis	90	ves	FACW	Column Totals: (A) (B)
a Taraxacum officinale	5	<u></u>	FACIL	Prevalence Index = $B/A =$
Z. Taraxadam omondica Tavicodendron radicans	- 5			
			FAC	Hydrophytic vegetation indicators:
4				1 - Rapid Test for Hydrophytic Vegetation
5				<u>x</u> 2 - Dominance Test is >50%
6				3 - Prevalence Index is ≤3.0 ¹
7				4 - Morphological Adaptations ¹ (Provide supporting
8				data in Remarks or on a separate sheet)
0				Problematic Hydrophytic Vegetation ¹ (Explain)
9				
10				¹ Indicators of hydric soil and wetland hydrology must
15 foot radius	100	= Total Co	ver	be present, unless disturbed or problematic.
Woody Vine Stratum (Plot size: 10 1000 rudius)				
1. Vitis riparia	10	yes	FACW	Hydrophytic
2				Vegetation
		= Total Co	ver	Present? Yes <u>No</u>
Remarks: (Include photo numbers here or on a separate s	sheet.)			
See pages 44.48 for photos of Data Daint 14				
See pages 44-40 for photos of Data Point TA				

SOIL

Profile Desc	cription: (Describe	to the dep	th needed to docur	nent the	indicator	or confirr	m the absence of	f indicators.)		
Depth	Matrix		Redo	x Feature	s		_	_		
(inches)	Color (moist)	%	Color (moist)	%	Type'	_Loc ²		Remarks		
0-5.5	10YR 4/2	100					slity clay			
5.5-16	10 YR 6/3	98	7.5 YR 5/5	2	<u>C</u>	<u>M</u>	clay			
					·					
					·					
¹ Type: C=C	oncentration, D=De	pletion, RM	=Reduced Matrix, M	S=Maske	d Sand Gr	ains.	² Location:	PL=Pore Lining, M=Matrix.		
Hydric Soil	Indicators:						Indicators for	or Problematic Hydric Soils':		
Histosol	(A1)		Sandy (Gleyed Ma	atrix (S4)		Coast Pr	rairie Redox (A16)		
Histic E	pipedon (A2)		Sandy F	Redox (St) 26)		Dark Su	flace (S7)		
Hydroge	ISTIC (A3) on Sulfide (A4)		Stripped	a Matrix (a Mucky Mi	50) neral (F1)		Iron-Mar	Iganese Masses (F12)		
Stratifie	d Lavers (A5)		Loamy	Gleved M	atrix (F2)		Other (E	xplain in Remarks)		
2 cm Mi	uck (A10)		X Deplete	d Matrix (F3)					
Deplete	d Below Dark Surfa	ce (A11)	Redox I	Dark Surfa	ace (F6)					
Thick D	ark Surface (A12)		Deplete	d Dark Su	urface (F7)	³ Indicators o	f hydrophytic vegetation and		
Sandy N	Aucky Mineral (S1)		Redox I	Depressio	ons (F8)		wetland I	nydrology must be present,		
5 cm Mi	ucky Peat or Peat (S						unless d	isturbed or problematic.		
Tune	Layer (II observed)									
Donth (in	abaa);						Hydric Soil P	resent? Yes <u>×</u> No		
Depth (inches):										
Remarks:										
The soil	profile found at D	ata Point	1A is consistent w	ith the w	etland s	oil indica	itor known as "[Depleted Matrix" (F3).		
	GY									
Wetland Hy	drology Indicators									
Primary Indi	cators (minimum of	one is requi	red: check all that ar	volv)			Secondary	Indicators (minimum of two required)		
Surface	Water (A1)	one is requi	Water-Sta	ined Leav			<u>Surface</u>	a Soil Cracks (B6)		
X High W	ter Table (Δ2)			una (B13	(D9)		Ourlat	age Patterns (B10)		
X Saturati	on (A3)		True Aqua	tic Plants	(B14)		Drv-S	eason Water Table (C2)		
Water M	larks (B1)		Hvdrogen	Sulfide O	dor (C1)		Cravfi	sh Burrows (C8)		
Sedime	nt Deposits (B2)		Oxidized F	Rhizosphe	eres on Liv	ing Roots	(C3) Satura	ation Visible on Aerial Imagery (C9)		
Drift De	posits (B3)		Presence	of Reduce	ed Iron (C4	4)	Stunte	ed or Stressed Plants (D1)		
Algal Ma	at or Crust (B4)		Recent Iro	n Reduct	ion in Tille	d Soils (C	6) Geom	orphic Position (D2)		
Iron Dep	posits (B5)		Thin Muck	Surface	(C7)		<u>X</u> FAC-N	Neutral Test (D5)		
Inundati	on Visible on Aerial	Imagery (B	7) Gauge or	Well Data	(D9)					
Sparsel	y Vegetated Concav	e Surface (B8) Other (Exp	olain in Re	emarks)					
Field Obser	vations:									
Surface Wat	er Present?	/es	No X Depth (in	ches):		_				
Water Table	Present?	res_X_	No Depth (in	ches): <u>10</u>)	_				
Saturation P	resent?	res X	No Depth (in	ches): <u>9</u>		_ Wet	land Hydrology I	Present? Yes 🗙 No		
(Includes ca Describe Re	pillary tringe) corded Data (stream	n daude m	onitoring well aerial	nhotos n	revious ins	pections)	if available.			
		gaage, m	autoring won, autoria	p.10100, pl	eriede inc	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	,			
Remarke										
Kenidika.										
The hydr	ology in the area	is likely s	upported by the hi	gh wate	r table in	connect	tion with Turkey	/ Creek.		

WETLAND DETERMINATION DATA FORM – Midwest Region

Project/Site: 61st Avenue and Marcela Blvd.	City/County: City of Hoba	rt, Lake County	Sampling Date: 1	0/30/2019
Applicant/Owner: City of Hobart		State: IN	Sampling Point: 1	В
Investigator(s): Jennifer Lee	Section, Township, Range:	Sec. 2, Twp 35N,	, Range 8W	
Landform (hillslope, terrace, etc.): hillslope	Local relief (cond	ave, convex, none):	none	
Slope (%): 10% Lat: 41.5087316	Long: -87.3141514		Datum: UTM17N	NAD83
Soil Map Unit Name: Del Rey silt Ioam		NWI classific	ation: PFO1C	
Are climatic / hydrologic conditions on the site typical for this time of ye	ear? Yes X No	_ (If no, explain in R	emarks.)	
Are Vegetation <u>no</u> , Soil <u>no</u> , or Hydrology <u>no</u> significantly	disturbed? Are "Norm	nal Circumstances" p	present? Yes <u>×</u>	No
Are Vegetation <u>no</u> , Soil <u>no</u> , or Hydrology <u>no</u> naturally pr	oblematic? (If needed	l, explain any answe	rs in Remarks.)	

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

Hydrophytic Vegetation Present? Hydric Soil Present? Wetland Hydrology Present?	Yes No X Yes No X Yes No X	Is the Sampled Area within a Wetland?	Yes NoNo
Remarks:			

VEGETATION – Use scientific names of plants.

Tree Stratum (Plot size: 10 ft. X 8 ft) % Cover Species? Status
1. None observed
2.
3.
4.
A.
5
Sapling/Shrub Stratum (Plot size: 35 ft x 8 ft) = Total Cover Prevalence Index worksheet: 1. None observed OBL species x 1 = 3 FACW species x 2 = 4
Saping/Shrub Stratum (Plot size:)
1. None observed
2.
3.
4 FAC species 50 x 3 = 150
5 FACU species 30 x 4 = 120
= Total Cover UPI species 30 x 5 = 150
Herb Stratum (Plot size: 5 foot radius)
1 Poa pratensis 50 yes FAC
$\frac{1}{2}$ Lamium purpureum $\frac{30}{30}$ ves UPI Prevalence Index = B/A = 3.82
2. Trifolium pratense 20 no FACU Hydrophytic Vegetation Indicators:
Taraxacum officinale To no EACU
5
6 3 - Prevalence Index is ≤3.0'
7 4 - Morphological Adaptations ¹ (Provide supporting
8. data in Remarks or on a separate sheet)
g Problematic Hydrophytic Vegetation ¹ (Explain)
10
110 Indicators of hydric soil and wetland hydrology must
Woody Vine Stratum (Plot size: 35 ft x 8 ft)
A None observed
1. None observed Hydrophytic
2 Vegetation Present? Yes No X
= Total Cover
Remarks: (Include photo numbers here or on a separate sheet.)
The sample area is a narrow area at the top of the slope. See page 49-53 for photos of Data Point 1B.

SOIL

Profile Desc	ription: (Describe	to the de	pth needed to docu	ment the	indicator	or confirm	m the absence of indicators.)							
Depth	Matrix		Redo	x Featur	es									
(inches)	Color (moist)	%	Color (moist)	%_	Type ¹	_Loc ²	Texture Remarks							
0-8.5	10YR 43/1	100					silty clay							
5.5-16	10 YR 6/3	50	10 YR 5/8	50	<u>C</u>	Μ	clay							
							·							
——							·							
——														
¹ Type: C=Co	oncentration, D=Dep	pletion, RN	I=Reduced Matrix, M	S=Maske	d Sand Gr	ains.	² Location: PL=Pore Lining, M=Matrix.							
Hydric Soil	Indicators:						Indicators for Problematic Hydric Soils ³ :							
Histosol	(A1)		Sandy	Gleyed M	latrix (S4)		Coast Prairie Redox (A16)							
Histic Ep	pipedon (A2)		Sandy I	Redox (S	5)		Dark Surface (S7)							
Black Hi	stic (A3)		Strippe	d Matrix (S6)		Iron-Manganese Masses (F12)							
Hydroge	n Sulfide (A4)		Loamy	Mucky M	ineral (F1)		Very Shallow Dark Surface (TF12)							
Stratified	d Layers (A5)		Loamy	Gleyed N	latrix (F2)		Other (Explain in Remarks)							
2 cm Mu	ıck (A10)		Deplete	ed Matrix	(F3)									
Depleted	d Below Dark Surfac	e (A11)	Redox	Dark Sur	face (F6)									
Thick Da	ark Surface (A12)		Deplete	d Dark S	urface (F7)	³ Indicators of hydrophytic vegetation and							
Sandy M	lucky Mineral (S1)		 Redox	Depressi	ons (F8)	,	wetland hydrology must be present.							
5 cm Mu	icky Peat or Peat (S	3)	_				unless disturbed or problematic.							
Restrictive I	Layer (if observed)	:												
Туре:								\checkmark						
Depth (ind	ches):						Hydric Soil Present? Yes No	<u>^</u>						
Remarks:														
Data Poin	t 1B was taken a	t the top	of the slope in a d	Iracev a	roa whor	a the clor	ne is $< 1\%$ approximately 125 feet south of							
	eek and annrovir	nately 1/	feet east of Data	Point 1 <i>I</i>		ne 13 foi	r a man of the location of Data Point 1R							
Data Poin	t 1R did not evhib	hatery 14	dicators for hydric	enile	occ pa	90 10 10								
		n any in		30113.										

HYDROLOGY

Wetland Hydrology Indicators:	
Primary Indicators (minimum of one is required; check all that apply)	Secondary Indicators (minimum of two required)
	 Surface Soil Cracks (B6) Drainage Patterns (B10) Dry-Season Water Table (C2) Crayfish Burrows (C8) Roots (C3) Saturation Visible on Aerial Imagery (C9) Stunted or Stressed Plants (D1) oils (C6) Geomorphic Position (D2) FAC-Neutral Test (D5)
Field Observations:	
Surface Water Present? Yes No X Depth (inches):	
Water Table Present? Yes <u>No X</u> Depth (inches):	
Saturation Present? Yes No X Depth (inches): (includes capillary fringe)	Wetland Hydrology Present? Yes No
Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspec	ctions), if available:
Remarks:	
Indicators of hydrology at Data Point 1B were not observed.	

PRELIMINARY JURISDICTIONAL DETERMINATION (PJD) FORM

BACKGROUND INFORMATION

A. REPORT COMPLETION DATE FOR PJD: December 16, 2019

B. NAME AND ADDRESS OF PERSON REQUESTING PJD:

Jennifer Lee, Butler, Fairman, and Seufert, Inc. 8450 Westfield Blvd. Suite 300, Indianapolis, IN 46240; 317-713-4615; jlee@bfsengr.com

C. DISTRICT OFFICE, FILE NAME, AND NUMBER:

D. PROJECT LOCATION(S) AND BACKGROUND INFORMATION:

Intersection Improvements for 61st Avenue/Marcella Boulevard including roundabout construction; City of Hobart, Lake County, Indiana; Des No. 1902707

(USE THE TABLE BELOW TO DOCUMENT MULTIPLE AQUATIC RESOURCES AND/OR AQUATIC RESOURCES AT DIFFERENT SITES)

State:IndianaCounty/parish/borough:JasperCity:HobartCenter coordinates of site (lat/long in degree decimal format):Long.: -87.314485 WCity:Hobart

Universal Transverse Mercator: NAD83 Zone 17N

Name of nearest waterbody: Turkey Creek

E. REVIEW PERFORMED FOR SITE EVALUATION (CHECK ALL THAT APPLY): Office (Desk) Determination Date:

Field Determination Date(s):

TABLE OF AQUATIC RESOURCES IN REVIEW AREA WHICH "MAY BE" SUBJECT TO REGULATORY JURISTICTION

Site number	Latitude (decimal degrees)	Longitude (decimal degrees)	Estimated amount of aquatic resource in review area (acreage and linear feet, if applicable)	Type of aquatic resource (i.e., wetland vs. non- wetland waters)	Geographic authority to which the aquatic resource "may be" subject (i.e., Section 404 or Section 10/404)
Wetland 1	41.5087719 N	-87.314485 W	0.62 acre	Wetland	Section 404

- The Corps of Engineers believes that there may be jurisdictional aquatic resources in the review area, and the requestor of this PJD is hereby advised of his or her option to request and obtain an approved JD (AJD) for that review area based on an informed decision after having discussed the various types of JDs and their characteristics and circumstances when they may be appropriate.
- 2. In any circumstance where a permit applicant obtains an individual permit, or a Nationwide General Permit (NWP) or other general permit verification requiring "preconstruction notification" (PCN), or requests verification for a non-reporting NWP or other general permit, and the permit applicant has not requested an AJD for the activity, the permit applicant is hereby made aware that: (1) the permit applicant has elected to seek a permit authorization based on a PJD, which does not make an official determination of jurisdictional aquatic resources; (2) the applicant has the option to request an AJD before accepting the terms and conditions of the permit authorization, and that basing a permit authorization on an AJD could possibly result in less compensatory mitigation being required or different special conditions; (3) the applicant has the right to request an individual permit rather than accepting the terms and conditions of the NWP or other general permit authorization; (4) the applicant can accept a permit authorization and thereby agree to comply with all the terms and conditions of that permit, including whatever mitigation requirements the Corps has determined to be necessary; (5) undertaking any activity in reliance upon the subject permit authorization without requesting an AJD constitutes the applicant's acceptance of the use of the PJD; (6) accepting a permit authorization (e.g., signing a proffered individual permit) or undertaking any activity in reliance on any form of Corps permit authorization based on a PJD constitutes agreement that all aquatic resources in the review area affected in any way by that activity will be treated as jurisdictional, and waives any challenge to such jurisdiction in any administrative or judicial compliance or enforcement action, or in any administrative appeal or in any Federal court; and (7) whether the applicant elects to use either an AJD or a PJD, the JD will be processed as soon as practicable. Further, an AJD, a proffered individual permit (and all terms and conditions contained therein), or individual permit denial can be administratively appealed pursuant to 33 C.F.R. Part 331. If, during an administrative appeal, it becomes appropriate to make an official determination whether geographic jurisdiction exists over aquatic resources in the review area, or to provide an official delineation of jurisdictional aquatic resources in the review area, the Corps will provide an AJD to accomplish that result, as soon as is practicable. This PJD finds that there "may be" waters of the U.S. and/or that there "may be" navigable waters of the U.S. on the subject review area, and identifies all aquatic features in the review area that could be affected by the proposed activity, based on the following information:

SUPPORTING DATA. Data reviewed for PJD (check all that apply)

Checked items should be included in subject file. Appropriately reference sources below where indicated for all checked items:

 \underline{X} Maps, plans, plots or plat submitted by or on behalf of the PJD requestor:

Map: See Waters of the U.S. Determination Report

Data sheets prepared/submitted by or on behalf of the PJD requestor. Office concurs with data sheets/delineation report.

Office does not concur with data sheets/delineation report. Rationale:

Data sheets prepared by the Corps:_____

Corps navigable waters' study:

U.S. Geological Survey Hydrologic Atlas:_____ USGS NHD data.

USGS 8 and 12 digit HUC maps.

- X U.S. Geological Survey map(s). Cite scale & quad name: USGS Gary Quadrangle, scale as noted
- X Natural Resources Conservation Service Soil Survey. Citation: <u>Lake County Soil Survey</u>
- <u>X</u> National wetlands inventory map(s). Cite name: <u>City of Hobart, Lake County, Indiana</u>
 State/local wetland inventory map(s):
- <u>X</u> FEMA/FIRM maps: FEMA Panel Nos. 18089C0164E, 18089C0168E

Photographs: Aerial (Name & Date): 2011 Orthophotography (leaves on)

or Other (Name & Date): <u>Site photos, October 23 and 30, 2019</u>

Previous determination(s). File no. and date of response letter:_____.

Other information (please specify):

IMPORTANT NOTE: The information recorded on this form has not necessarily been verified by the Corps and should not be relied upon for later jurisdictional determinations.

Signature and date of Regulatory staff member completing PJD

Jommer Lec, 12/16/2019

Signature and date of person requesting PJD

(REQUIRED, unless obtaining the signature is impracticable)¹

¹ Districts may establish timeframes for requestor to return signed PJD forms. If the requestor does not respond within the established time frame, the district may presume concurrence and no additional follow up is necessary prior to finalizing an action.



Appendix G Public Involvement

June 6, 2019

NOTICE OF SURVEY

This letter was sent to the attached property owners:

RE: Improvements to the Intersection of 61st Avenue and Marcella Boulevard, City of Hobart, Lake County, Indiana

Dear Property Owner(s):

The City of Hobart has selected Butler, Fairman and Seufert, Inc., to survey and design the referenced project. Courthouse records show that you are a property owner within the limits of the area where data will be collected for the project survey. It may be necessary for our employees to enter your property to complete this work. If you have sold this property, or it is occupied by someone else, please let us know the name and address of the new owner or current occupant so we can contact them about the survey.

At this stage, we generally do not know what effect, if any, our project can eventually have on your property. If we determine later that your property is involved, we will contact you with additional information.

The survey work will include mapping the location of features such as trees, buildings, fences and drives, and obtaining ground elevations. The survey is needed for the proper planning and design of this project. Please be assured of our sincere desire to cause you as little inconvenience as possible during this survey. If problems do occur, please contact our field crew or contact me at the telephone number or address shown above or the included e-mail address.

Should you have questions concerning the survey, contact me at the telephone number or address shown above or the included e-mail address.

Sincerely,

BUTLER, FAIRMAN and SEUFERT, INC.

Mark W. Neal, P.S. mneal@bfsengr.com

Appendix H

Air Quality

2020-2024 Transportation Improvement Program

Group 1 projects

Des #	Project type	LPA / Transit	Project	Final	Fund			PF				ROW				c	N or Transit			2020		2021		2022		2023	2024 informational	I otal cos	st	Notes
		operator	accomption			Total		Federal	Match	Тс	otal	Federal	Match	n T	Fotal	Fe	deral	Match					federa	l amount p	ogramm	ed only				
1401034	Roadway safety	Hobart	Colorado St, N of US 30; Line of Sight Corrections	2018- 2021 TIP project	HSIP	\$		\$-	\$	- \$	-	\$-	\$	- 5	\$81	16,500 \$	734,850	\$	81,650	\$	734,850							\$	816,500	
1173430	Pavement rehabilitation, or reconstruction	Portage	Central Ave. reconstruction from Lake/Porter Co. Line to Willowcreek Road	2018- 2021 TIP project	STBG	\$	-	\$-	\$	- \$	250,000	\$ 200,00	0 \$ 5	50,000 \$	\$ 2,60	00,000 \$	2,080,000	\$	520,000			\$	200,000	\$ 2,0	080,000			\$2,	850,000	
1601158	Roadway safety	Crown Point	109th Ave & Iowa St.	2018- 2021 TIP proiect	HSIP	S		\$-	\$	- \$	-	\$-	\$	- \$	\$ 1,42	23,125 \$	1,138,500	s	284,625			\$	1,138,500					\$1,	423,125	
1802973	Pavement rehabilitation, or reconstruction	Gary	15th Ave; I-65 to MLK Dr.; including Michigan St. & Texas St.	2018- 2021 TIP project	STBG	\$	-	\$-	\$	- \$		\$-	\$	- 5	\$ 3,75	\$0,000	3,000,000	s	750,000							\$ 3,000,000		\$3,	750,000	
1382010	Pavement rehabilitation, or reconstruction	Portage	Samuelson Rd; Centeral Ave to Portage Ave	2018- 2021 TIP project	STBG	\$	-	\$-	\$	- \$	-	\$ -	\$	- 5	\$ 3,75	50,000 \$	3,000,000	\$	750,000							\$ 3,000,000		\$3,	750,000	
Need DE #	S Roadway safety	Crown Point	Roundabout at 113th and US 231	86	HSIP	\$	-		\$	- \$		\$-	\$	- \$	\$ 1,12	25,000 \$	972,500	\$	192,500					\$ 9	972,500			\$1,	125,000	Pending HSIP eligibility determination. City agrees to additional \$40,000
Need DE	Intersection congestion improvements	Hammond	Michigan Ave and Indianapolis Blvd intersection improvements; includes turn lanes and pedestrian crossings and signal modernization	86	CMAQ	S	-		\$	- \$	-	\$-	\$	- \$	\$ 34	15,000 \$	276,000	\$	69,000							\$ 276,000		\$	345,000	Pending CMAQ eligibility determination
Need DE #	Pavement rehabilitation, or reconstruction	Hammond	Kennedy Ave stree diet; including pedestrian bump- outs	t 85	STBG	S	-		\$	- \$		\$-	S	- \$	\$ 4,02	25,000 \$	3,220,000	s	805,000								\$ 3,220,000	\$4,	025,000	
Need DE #	Intersection congestion improvements	Valparaiso	Roundabout at the intersection of Campbell St and Lincoln Ave and a tunnel underneath RR to connect new city development and transit facility	81	CMAQ	\$	-		\$	- \$	1,750,000	\$ 1,400,00	0 \$ 35	50,000 \$	\$ 23,62	\$	14,125,000	\$9	9,500,000								\$ 1,400,000	\$ 25,	375,000	CN in NWI 2050 Plan, 2025-2030 time band
Need DE #	Bridge replacement, rehabilitation, or	Portage	Replace RR bridge over Samuelson Re	d 72	HSIP	s	-		\$	- \$	-	\$-	\$	- 5	\$ 11,68	\$5,000	2,458,092	\$9	9,226,908							\$ 2,458,092		\$ 11,	685,000	Pending HSIP eligibility determination
Need DE #	Intersection congestion improvements	Hobart	Roundabout at Marcella and 61 St	63	CMAQ	S	•		\$	- \$	-	\$-	\$	- १	\$ 3,74	40,500 \$	2,992,400	S	748,100							\$ 2,992,400		\$3,	740,500	Pending CMAQ eligibility determination
#	- Rodoway Salety	Gary	facilities at the intersection of 5th Ave and Bigger St	02			,	¢ _0,001	ľ	,		Ť	ľ		• •		012,010	ľ	10,120	Ψ	20,001	¥	012,010					Ŷ	100,110	r chang rick cligibility actermination
Need DE #	S Roadway safety	Cedar Lake	Add pedestrian facilities at the intersection of 133rd Ave and King Dr	56	HSIP	S	-		\$	- \$	-	\$-	\$	- \$	\$ 62	26,903 \$	564,213	\$	62,690			\$	564,213					\$	626,903	Pending HSIP eligibility determination
Not selected	Pavement rehabilitation, or reconstruction	Hammond	Roadway reconstruction on Summer St between Columbia Ave and Indianapolis Blvd	86		S	-		Ş	- \$		\$ -	S	- 4	\$ 6,75	50,000 \$	5,163,500	\$ 1	1,586,500									\$6,	750,000	

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Project Overview Funding History Amendment History

<< Go Back

2 20-07 2020 LOCAL ROUNDABOUT HOBART - 615T AVE & MARCELLA DR PROGRAMMED	VERSION		PUBLIC DESCRIPTION	STATUS	APPROVAL DATE
	2	20-07 2020 LOCAL	ROUNDABOUT HOBART - 61ST AVE & MARCELLA DR	PROGRAMMED	
I 20-00 2020 TP ROUNDABOUT HOBART - 61ST AVE & MARCELLA DR PROGRAMMED 8/22/19	1	20-00 2020 TIP	ROUNDABOUT HOBART - 61ST AVE & MARCELLA DR	PROGRAMMED	8/22/19

HOME ABOUT NIRPC HOT TOPICS (NEWS) TRANSPORTATION HUMAN & ECONOMIC RESOURCES

EVENTS GROWTH & CONSERVATION ENVIRONMENT & GREEN INFRASTRUCTURE STEWARDSHIP & GOVERNANCE STAFF EMAIL STAFF INTRANET STAFF PORTAL TERMS & CONDITIONS

Indiana Department of Transportation (IND T)

State Preservation and Local Initiated Projects FY 2020 - 2024

S	SPONSOR	CONTR	STIP	ROUTE	WORK TYPE	LOCATION	DISTRICT	MILES	FEDERAL	Total Cost of	PROGRAM	PHASE	FEDERAL	MATCH	2020	2021	2022	2023	2024
		ACT#/	NAME						CATEGORY	Project*									
		LEAD																	
		DES																	
Hamm	nond	42619 /	A 25	ST 1024	Road Rehabilitation (3	Summer St (Phase 1) from	LaPorte	.5	STBG	\$6,750,000.00	Northwest Indiana	CN	\$3,300,000.00	\$0.00				\$3,300,000.00	
		1902700			R/4R Standards)	Columbia Ave to Willis Ave					MPO								
						1													

Comments:Adding C	CN funds in F	23 in the	amount of	\$6,750,000.00. NIRPC	Amendment 20-11 dated 05-21-2020 A	Q exempted 04/29	9/2020											
Hobart	42620 / 1902707	A 25	ST 1039	Intersection Improvement, Roundabout	Intersection Improvement Roundabout on 61st Ave	LaPorte	.03	STBG	\$3,740,500.00	Local Funds	CN	\$0.00	\$748,100.00				\$748,100.00	
										Northwest Indiana MPO	CN	\$2,992,400.00	\$0.00				\$2,992,400.00	
Performance Measu	ire Impacted:	Safety																
Comments:Adding C	CN funds in F	/23 in the	amount of	\$3,740,500.00. NIRPC	Amendment 20-11 dated 05/21/2020 A	QC exempted 04/2	29/2020											
Gary	42650 / 1902830	M 06	ST 1055	Intersection Improvement	5th Ave and Bigger St Pedestrian Improvements	LaPorte	C	STBG	\$460,626.00	Local Funds	PE	\$0.00	\$6,490.20	\$6,490.20				
						•	·		·	Local Funds	CN	\$0.00	\$85,635.00		\$85,635.00			
										Northwest Indiana MPO	PE	\$25,960.80	\$0.00	\$25,960.80				
										Northwest Indiana MPO	CN	\$342,540.00	\$0.00		\$342,540.00			
Performance Measu	ire Impacted:	Safety									1	11	1		L I			
Comments:Add PE	Phase in FY2) for \$32,4	51. Add C	N Phase in FY21 for \$4	28,175. NIRPC Admin Mod 20 - 4.3 De	cember												
Gary	42650 / 1902830	M 11	ST 1055	Intersection Improvement	5th Ave and Bigger St Pedestrian Improvements	LaPorte	C	STBG	\$428,175.00	Local Funds	CN	\$0.00	\$0.00		(\$85,635.00)	\$85,635.00		
				1	1				I	Northwest Indiana MPO	CN	\$0.00	\$0.00		(\$342,540.00)	\$342,540.00		
Performance Measu	ire Impacted:	Safety																
Comments:Moving (CN fund from	FY21 to F	Y22 in the	amount of \$428,175 Pe	er NIRPC June Admin Mod													
Gary	42650 / 1902830	M 33	ST 1055	Intersection Improvement	5th Ave and Bigger St Pedestrian Improvements	LaPorte	o) Safety	\$413,051.00	Northwest Indiana MPO	CN	\$17,125.00	\$0.00			(\$342,540.00)	\$359,665.00	
		1		1	1	1		1	1	Local Funds	CN	\$0.00	-\$64,700.00			(\$85,635.00)	\$20,935.00	
Performance Measu	ire Impacted:	Safety								l		II			ļļ			
Comments:Per NIR	PC July Admir	1 Mod Mov	ring CN fur	ds from FY22 to FY23	in the amount of \$380,600.00 and cha	nging the funding to	HSIP											
Cedar Lake	42681 / 2000023	M 07	ST 1055	Intersection Improvement	133rd & King Dr. Intersection Improvement	LaPorte	0	STBG	\$705,266.00	Northwest Indiana MPO	CN	\$564,213.00	\$0.00		\$564,213.00			
	1			1	1	1				Local Funds	CN	\$0.00	\$141,053.00		\$141,053.00			
Performance Measu	ire Impacted:	Safety									1							
Comments:Adding C	CN funds in th	e amount	of \$705,26	6 in FY21 Per NIRPC A	dmin Mod 6.1 dated 01/31/2020. The	project was in NIRP	PC FY2020-2024	TIP that was incor	porated by reference or	n 08-22-2019								

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*Estimated Costs left to Complete Project column is for costs that may extend beyond the four years of a STIP. This column is not fiscally constrained and is for information purposes.

Indiana Department of Transportation (INDOT)

State Preservation and Loca	Initiated Projects EV	2020 - 2024
State Freservation and Loca	I IIIIIIaleu FIOJECIS FI	2020 - 2024

SPONSOR	CONTR ACT # / LEAD DES	STIP NAME	ROUTE	WORK TYPE	LOCATION	DISTRICT	MILES	FEDERAL CATEGORY	Estimated Cost left to Complete Project*	PROGRAM	PHASE	FEDERAL	МАТСН	2020
Indiana Department of Transportation	42453 / 1900054	A 25	US 30	HMA Overlay Minor Structural	US30 From SR 55 to 0.39mi W of I-65	LaPorte	1.68	NHPP	\$12,080,157.00	Toll Lease Amendment Proceeds	PE	\$0.00	\$1,468,800.00	
Comments:NIRPC R	esolution 20	-11 Amen	dment #5 P	age 14, Approved 5/21/20	Amend FY21 PE, FY23 CN and FY2	24 PE AQC Exempt 4/2	9/20.							
Indiana Department of Transportation	42458 / 1900186	A 25	SR 53	Pavement Replacement	SR 53 from US 20 (4th Ave) to 0.22mi N of US 20	LaPorte	.01	STBG	\$1,173,582.00	Road Construction	CN	\$478,865.60	\$119,716.40	
							•			Toll Lease Amendment Proceeds	CN	\$0.00	\$100,000.00	
										Road Consulting	PE	\$60,000.00	\$15,000.00	
										Toll Lease Amendment Proceeds	PE	\$0.00	\$400,000.00	
Comments:NIRPC R	esolution 20	-11 Amen	dment #5 P	age 16, Approved 5/21/20	Amend FY21 PE, FY23 CN and FY2	24 PE AQC Exempt 4/2	9/20.							
Hammond	42619 / 1902700	A 25	ST 1024	Road Rehabilitation (3 R/4R Standards)	Summer St (Phase 1) from Columbia Ave to Willis Ave	LaPorte	.5	STBG	\$6,750,000.00	Local Funds	CN	\$0.00	\$3,450,000.00	
	•	1								Northwest Indiana MPO	CN	\$3,300,000.00	\$0.00	
Comments:Adding C	N funds in F	Y23 in the	amount of	\$6,750,000.00. NIRPC Ar	nendment 20-11 dated 05-21-2020 A	Q exempted 04/29/202	20							
Hobart	42620 / 1902707	A 25	ST 1039	Intersection Improvement, Roundabout	Intersection Improvement Roundabout on 61st Ave	LaPorte	.03	STBG	\$3,740,500.00	Local Funds	CN	\$0.00	\$748,100.00	
	•		•				•		-	Northwest Indiana MPO	CN	\$2,992,400.00	\$0.00	
Comments:Adding C	N funds in F	Y23 in the	amount of	\$3,740,500.00. NIRPC Ar	nendment 20-11 dated 05/21/2020 A	QC exempted 04/29/20)20						I	
Lake County Total Federal: \$31	1.915.036 5	51	Match :\$	13,722,895.13	2020:	2021: \$4 31:	3.227.64	2022:		2023: \$10 7	30,500,00	2024:	\$30,594,204.00	

2021	2022	2023	2024
\$1,468,800.00			

		\$598,582.00
	\$100,000.00	
		\$75,000.00
\$400,000.00		

	\$3,450,000.00	
	\$3,300,000.00	

	\$748,100.00	
	\$2,992,400.00	

Appendix I Additional Studies

SECTION 6(f) PROPERTIES IN LAKE COUNTY

GRANT ELEMENT TITLE	GRANT SPONSER	FISCAL YEAR
EDWARD C. DOWLING PARK	HAMMOND PARK BOARD	1967
TOLLESTON PARK SWIMMING POOL	GARY PARK BOARD	1966
HOMESTEAD PARK	HIGHLAND PARK BOARD	1968
WADSWORTH PARK	GRIFFITH PARK BOARD	1970
RIVERVIEW COMMUNITY PARK	EAST GARY PARK BOARD	1973
MEADOWS PARK DEVELOPMENT	HIGHLAND PARK BOARD	1975
BLUEBIRD PARK	MUNSTER PARK BOARD	1976
LAKE VIEW PARK ADDN	HOBART PK & REC BD	1978
MUNSTER COMMUNITY PARK	MUNSTER PARK BOARD	1978
WOLF LAKE PICNIC AREA & RESTROOMS	HAMMOND PARK BOARD	1983
OAK RIDGE PRAIRIE IMPROVEMENTS	LAKE COUNTY PARK BOARD	1990
MARQUETTE PARK IMPROVEMENTS	GARY PARK BOARD	1992
PAVESE PARK EXPANSION AND REDEVELOPMENT	HOBART PARK BOARD	2002
CENTENNIAL PARK PHASE II	MUNSTER PARK BOARD	2002
TEIBEL NATURE PARK	SCHERERVILLE PARK BOARD	2014
SOUTHRIDGE PARK ACQUISITION	HIGHLAND PARK BOARD	1969
WADSWORTH PARK	GRIFFITH PARK BOARD	1970
MEADOWS PARK ACQUISITION	HIGHLAND PARK BOARD	1974
HATCHER PARK	GARY PARK BOARD	1975
LIBERTY PARK	LOWELL PARK BOARD	1976
WOLF LAKE BEACH DEVELOPMENT	HAMMOND PARK BOARD	1978
JACKSON PARK RENOVATION	GARY PARK BOARD	1979
D/CENTENNIAL PLAZA AND TRAIL	HAMMOND PARK BOARD	1984
DEEP RIVER COUNTY PARK	LAKE COUNTY PARK BOARD	1987
HOBART LAKEFRONT DEVELOPMENT	HOBART PARK BOARD	1988
HOBART LAKEFRONT DEVELOPMENT PH II	HOBART PARK BOARD	1993
WOLF LAKE PARK SOUTH	HAMMOND PARK BOARD	2002
LOWELL SPORTS PARK COMPLEX	LOWELL PARK BOARD	2002
DEEP RIVER PARK	LAKE COUNTY PARK BOARD	2015
WASHINGTON PARK SWIMMING POOL	GARY PARK BOARD	1966
SHEPPARD PARK	HIGHLAND PARK BOARD	1971
GRAND LAKE RECREATION AREA	EAST GARY PARK BOARD	1972
NORTHGATE PARK	DYER PARK BOARD	1973
HOWE PARK	GARY PARK BOARD	1974
HARRISON PARK TENNIS COURT LIGHTING	HAMMOND PARK BOARD	1975
RIDGEWAY PARK	MUNSTER PARK BOARD	1975
HOOSIER PRAIRIE ACQUISITION	DEPT. OF NATURAL RESOURCES	1976
HARRISON PARK RENOVATION	HAMMOND PARK BOARD	1980
MAIN SQUARE PARK	HIGHLAND PARK BOARD	1980
D/GIBSON WOODS/SHELL OIL ACQ.	LAKE COUNTY PARK BOARD	1981
LAKE ETTA DEVELOPMENT	LAKE COUNTY PARK BOARD	1984
CITY BALL PARK	HOBART PARK BOARD	2003
SCHERWOOD PARK	SCHERERVILLE PARK BOARD	2005
OAK RIDGE PRAIRIE COUNTY PARK	LAKE COUNTY PARK BOARD	2014

Source: Land and Water Conservation Fund website (https://www.lwcfcoalition.com/map-of-lwcf)

SECTION 6(f) PROPERTIES IN LAKE COUNTY

GRANT ELEMENT TITLE	GRANT SPONSER	FISCAL YEAR
LEROY SITE ACQ.	LAKE COUNTY PARK BOARD	1970
ELLENDALE PARK	HIGHLAND PARK BOARD	1970
SUNNYSIDE PARK	EAST CHICAGO PARK BOARD	1974
DOWLING PARK TENNIS COURT LIGHTING	HAMMOND PARK BOARD	1975
MAYWOOD PARK ANNEX	HAMMOND PARK BOARD	1975
D/PHEASANT HILLS PARK	DYER PARK BOARD	1977
WOLF LAKE LAND ACQ	HAMMOND PARK BOARD	1976
NEW CHICAGO CENTENNIAL PK	NEW CHICAGO PARK BOARD	1976
PARK SITE NO 31 ACQ	LAKE COUNTY PARK BOARD	1977
M.C. BENNETT PARK	GARY PARK BOARD	1978
LEMON LAKE COUNTY PARK DEVELOPMENT	LAKE COUNTY PARK BOARD	1980
MARQUETTE PARK IMPROVEMENTS	GARY PARK BOARD	1985

Jenni Lee

From:	Fair, Terri <tfair@indot.in.gov></tfair@indot.in.gov>
Sent:	Wednesday, March 18, 2020 3:29 PM
То:	Jenni Lee
Cc:	Miller, Brandon; Spiess, Jessica J
Subject:	FW: Possible Environmental Justice effect Des No 1902707
Attachments:	EJ analysis figure_Des no 1902707_61st&Marcella_using Ross & Hobart Twps as COC.xls;
	aff reports Results from Census page Des No 1902707 61&Marcella.pdf

Hi Jenni,

We concur that the project doesn't identify any EJ areas of concern based on the revised COC and AC analysis.

Best, Terri Fair *NEPA Specialist* 100 North Senate Ave., Room N642-ES Indianapolis, IN 46204 Office: (317) 232-0680 Email: <u>tfair@indot.in.gov</u>



To ensure that all NEPA documents are submitted appropriately in ERMS to the NEPA Document Review Unit, please be sure to include the following:

- 1. The document type (CE/EA/EIS/PCE for ITS/Noise Analysis/ECF/AI/NTF/Bat Language) within the subject line and the body of the text.
- 2. State in the body of the email who the document is intended for based on the CE Manual
 - a. PCE and State projects that are a CE-2 or lower to the appropriate district environmental supervisor/team lead
 - b. LPA and State projects that are a CE-3 and above or EA/EIS to the INDOT ESD Document Team Lead at Central Office.
 - c. Specify the name and email address of the recipient who should get the final document (e.g. Brandon Miller, NEPA Document Team Lead at Central Office; email: <u>bramiller1@indot.in.gov</u>)

From: Jenni Lee <<u>JLee@bfsengr.com</u>>
Sent: Sunday, March 01, 2020 8:53 AM
To: Fair, Terri <<u>TFair@indot.IN.gov</u>>; <u>bmiller@indot.in.gov</u>
Subject: FW: Possible Environmental Justice effect Des No 1902707

**** This is an EXTERNAL email. Exercise caution. DO NOT open attachments or click links from unknown senders or unexpected email. ****

Please find the new analysis attached.

Thanks,

Table 1: Minority and Low-Income Data (American Community Survey 5-Year Estimates, 2013-2017)				
	COC	AC1	AC2	
	Hobart and			
	Ross			
	Townships,			
	Lake			
	County,	Census Tract	Census Tract	
	Indiana	422	423	
LOW-INCOME				
Population for whom poverty status is determined: Total	84,705	6,417	6,712	
Income in the past 12 months below poverty level	11,524	333	586	
Percent Low-income	13.6%	5.2%	8.7%	
125 Percent of COC	17.0%	AC <125% COC	AC <125% COC	
Potential Low-income EJ Impact?		No	No	
MINORITY				
Total population: Total	84,459	6,586	6,712	
Total population: Not Hispanic or Latino	72,201	5,444	5,819	
Total population: Not Hispanic or Latino; White alone	49,595	4,962	4,341	
Total population: Not Hispanic or Latino; Black or African American alone	19,356	125	1,283	
Total population: Not Hispanic or Latino; American Indian and Alaska Nativ	267	94	0	
Total population: Not Hispanic or Latino; Asian alone	932	95	133	
Total population: Not Hispanic or Latino; Native Hawaiian and Other Pacifi	16	0	7	
Total population: Not Hispanic or Latino; Some other race alone	12	0	0	
Total population: Not Hispanic or Latino; Two or more races	2,023	168	55	
Total population: Hispanic or Latino	14,258	1,142	893	
Total population: Hispanic or Latino; White alone	7,419	461	743	
Total population: Hispanic or Latino; Black or African American alone	607	178	34	
Total population: Hispanic or Latino; American Indian and Alaska Native al	184	39	0	
Total population: Hispanic or Latino; Asian alone	19	0	0	
Total population: Native Hawaiian and Other Pacific Islander alone	0	0	0	
Total population: Hispanic or Latino; Some other race alone	4,934	464	0	
Total population: Hispanic or Latino; Two or more races	1,095	0	44	
Number Non-white/minority	34,864	1,624	2,371	
Percent Non-white/Minority	41.3%	24.7%	35.3%	
125 Percent of COC	51.6%	AC <125% COC	AC <125% COC	
Potential Minority EJ Impact?		No	No	

U.S. Census Bureau



B03002

HISPANIC OR LATINO ORIGIN BY RACE

Universe: Total population 2013-2017 American Community Survey 5-Year Estimates

Supporting documentation on code lists, subject definitions, data accuracy, and statistical testing can be found on the American Community Survey website in the Technical Documentation section.

Sample size and data quality measures (including coverage rates, allocation rates, and response rates) can be found on the American Community Survey website in the Methodology section.

Although the American Community Survey (ACS) produces population, demographic and housing unit estimates, it is the Census Bureau's Population Estimates Program that produces and disseminates the official estimates of the population for the nation, states, counties, cities, and towns and estimates of housing units for states and counties.

	Hobart township, Lake County, Indiana		Ross township, Lake County, Indiana		Census Tract 422, Lake County, Indiana
	Estimate	Margin of Error	Estimate	Margin of Error	Estimate
Total:	38,561	+/-207	47,898	+/-42	6,586
Not Hispanic or Latino:	30,904	+/-619	41,297	+/-748	5,444
White alone	28,173	+/-605	21,422	+/-843	4,962
Black or African American alone	1,441	+/-360	17,915	+/-793	125
American Indian and Alaska Native alone	192	+/-123	75	+/-50	94
Asian alone	240	+/-123	692	+/-289	95
Native Hawaiian and Other Pacific Islander alone	3	+/-10	13	+/-24	0
Some other race alone	12	+/-20	0	+/-24	0
Two or more races:	843	+/-371	1,180	+/-339	168
Two races including Some other race	32	+/-38	134	+/-144	5
Two races excluding Some other race, and three or more races	811	+/-369	1,046	+/-310	163
Hispanic or Latino:	7,657	+/-617	6,601	+/-747	1,142
White alone	4,657	+/-626	2,762	+/-582	461
Black or African American alone	187	+/-271	420	+/-301	178
American Indian and Alaska Native alone	141	+/-165	43	+/-66	39
Asian alone	0	+/-24	19	+/-30	0
Native Hawaiian and Other Pacific Islander alone	0	+/-24	0	+/-24	0
Some other race alone	2,205	+/-608	2,729	+/-667	464
Two or more races:	467	+/-247	628	+/-285	0
Two races including Some other race	431	+/-245	403	+/-247	0
Two races excluding Some other race, and three or more races	36	+/-33	225	+/-153	0

	Census Tract Census Tract 423, Lake County, Census Tract 4 422, Lake Indiana In County, Indiana		Census Tract 423, Lake County, Indiana		03, Lake County, na
	Margin of Error	Estimate	Margin of Error	Estimate	Margin of Error
Total:	+/-360	6,712	+/-484	4,157	+/-384
Not Hispanic or Latino:	+/-376	5,819	+/-480	3,650	+/-407
White alone	+/-424	4,341	+/-450	861	+/-203
Black or African American alone	+/-81	1,283	+/-199	2,743	+/-406
American Indian and Alaska Native alone	+/-113	0	+/-16	12	+/-21
Asian alone	+/-95	133	+/-131	0	+/-11
Native Hawaiian and Other Pacific Islander alone	+/-16	7	+/-15	0	+/-11
Some other race alone	+/-16	0	+/-16	0	+/-11
Two or more races:	+/-129	55	+/-86	34	+/-30
Two races including Some other race	+/-10	0	+/-16	11	+/-17
Two races excluding Some other race, and three or more races	+/-131	55	+/-86	23	+/-26
Hispanic or Latino:	+/-164	893	+/-222	507	+/-278
White alone	+/-196	743	+/-225	178	+/-160
Black or African American alone	+/-270	34	+/-49	127	+/-201
American Indian and Alaska Native alone	+/-43	0	+/-16	0	+/-11
Asian alone	+/-16	0	+/-16	0	+/-11
Native Hawaiian and Other Pacific Islander alone	+/-16	0	+/-16	0	+/-11
Some other race alone	+/-328	72	+/-64	186	+/-144
Two or more races:	+/-16	44	+/-62	16	+/-19
Two races including Some other race	+/-16	35	+/-60	8	+/-12
Two races excluding Some other race, and three or more races	+/-16	9	+/-18	8	+/-13

Data are based on a sample and are subject to sampling variability. The degree of uncertainty for an estimate arising from sampling variability is represented through the use of a margin of error. The value shown here is the 90 percent margin of error. The margin of error can be interpreted roughly as providing a 90 percent probability that the interval defined by the estimate minus the margin of error and the estimate plus the margin of error (the lower and upper confidence bounds) contains the true value. In addition to sampling variability, the ACS estimates are subject to nonsampling error (for a discussion of nonsampling variability, see Accuracy of the Data). The effect of nonsampling error is not represented in these tables.

While the 2013-2017 American Community Survey (ACS) data generally reflect the February 2013 Office of Management and Budget (OMB) definitions of metropolitan and micropolitan statistical areas; in certain instances the names, codes, and boundaries of the principal cities shown in ACS tables may differ from the OMB definitions due to differences in the effective dates of the geographic entities.

Estimates of urban and rural populations, housing units, and characteristics reflect boundaries of urban areas defined based on Census 2010 data. As a result, data for urban and rural areas from the ACS do not necessarily reflect the results of ongoing urbanization.

Source: U.S. Census Bureau, 2013-2017 American Community Survey 5-Year Estimates

Explanation of Symbols:

1. An '**' entry in the margin of error column indicates that either no sample observations or too few sample observations were available to compute a standard error and thus the margin of error. A statistical test is not appropriate.

2. An '-' entry in the estimate column indicates that either no sample observations or too few sample observations were available to compute an estimate, or a ratio of medians cannot be calculated because one or both of the median estimates falls in the lowest interval or upper interval of an open-ended distribution.

3. An '-' following a median estimate means the median falls in the lowest interval of an open-ended distribution.

4. An '+' following a median estimate means the median falls in the upper interval of an open-ended distribution.

5. An '***' entry in the margin of error column indicates that the median falls in the lowest interval or upper interval of an open-ended distribution. A statistical test is not appropriate.

6. An '*****' entry in the margin of error column indicates that the estimate is controlled. A statistical test for sampling variability is not appropriate.

7. An 'N' entry in the estimate and margin of error columns indicates that data for this geographic area cannot be displayed because the number of sample cases is too small.

8. An '(X)' means that the estimate is not applicable or not available.



B17001

POVERTY STATUS IN THE PAST 12 MONTHS BY SEX BY AGE Universe: Population for whom poverty status is determined 2013-2017 American Community Survey 5-Year Estimates

Supporting documentation on code lists, subject definitions, data accuracy, and statistical testing can be found on the American Community Survey website in the Technical Documentation section.

Sample size and data quality measures (including coverage rates, allocation rates, and response rates) can be found on the American Community Survey website in the Methodology section.

Although the American Community Survey (ACS) produces population, demographic and housing unit estimates, it is the Census Bureau's Population Estimates Program that produces and disseminates the official estimates of the population for the nation, states, counties, cities, and towns and estimates of housing units for states and counties.

	Hobart township, Lake County, Indiana		Ross township, Lake County, Indiana		Census Tract 422, Lake County, Indiana
	Estimate	Margin of Error	Estimate	Margin of Error	Estimate
Total:	38,249	+/-247	46,456	+/-263	6,417
Income in the past 12 months below poverty level:	6,348	+/-982	5,176	+/-1,022	333
Male:	3,126	+/-557	2,153	+/-468	138
Under 5 years	223	+/-97	198	+/-137	30
5 years	95	+/-87	38	+/-51	0
6 to 11 years	639	+/-198	365	+/-171	0
12 to 14 years	470	+/-228	231	+/-166	12
15 years	41	+/-34	0	+/-24	0
16 and 17 years	46	+/-39	54	+/-50	0
18 to 24 years	397	+/-186	88	+/-60	15
25 to 34 years	232	+/-103	303	+/-148	4
35 to 44 years	347	+/-123	270	+/-130	0
45 to 54 years	205	+/-114	79	+/-48	13
55 to 64 years	207	+/-113	296	+/-143	0
65 to 74 years	92	+/-55	72	+/-52	0
75 years and over	132	+/-72	159	+/-81	64
Female:	3,222	+/-529	3,023	+/-627	195
Under 5 years	251	+/-147	91	+/-89	0
5 years	90	+/-102	125	+/-104	0
6 to 11 years	343	+/-180	599	+/-250	0
12 to 14 years	136	+/-90	180	+/-113	0
15 years	24	+/-26	65	+/-66	0
16 and 17 years	85	+/-70	78	+/-70	0
18 to 24 years	314	+/-135	117	+/-79	50
25 to 34 years	662	+/-168	458	+/-172	14
35 to 44 years	352	+/-125	404	+/-186	2
45 to 54 years	314	+/-116	265	+/-119	31
55 to 64 years	314	+/-106	277	+/-120	18
65 to 74 years	149	+/-68	206	+/-115	17
75 years and over	188	+/-98	158	+/-91	63
Income in the past 12 months at or above poverty level:	31,901	+/-977	41,280	+/-1,016	6,084
Male:	15,529	+/-645	19,806	+/-713	2,668

	Hobart township, Lake County, Indiana		Ross township, Lake County, Indiana		Census Tract 422, Lake County, Indiana
	Estimate	Margin of Error	Estimate	Margin of Error	Estimate
Under 5 years	926	+/-192	996	+/-230	196
5 years	173	+/-82	102	+/-86	0
6 to 11 years	1,118	+/-252	1,456	+/-276	149
12 to 14 years	532	+/-206	614	+/-160	81
15 years	207	+/-94	256	+/-122	36
16 and 17 years	244	+/-87	524	+/-151	49
18 to 24 years	1,028	+/-234	1,905	+/-424	132
25 to 34 years	2,275	+/-321	2,511	+/-422	536
35 to 44 years	2,328	+/-309	2,904	+/-416	267
45 to 54 years	1,994	+/-284	2,446	+/-317	438
55 to 64 years	2,374	+/-263	2,986	+/-271	271
65 to 74 years	1,437	+/-204	1,795	+/-277	368
75 years and over	893	+/-164	1,311	+/-216	145
Female:	16,372	+/-716	21,474	+/-740	3,416
Under 5 years	1,021	+/-266	802	+/-215	297
5 years	189	+/-93	410	+/-189	71
6 to 11 years	1,380	+/-257	1,459	+/-276	260
12 to 14 years	492	+/-176	938	+/-275	58
15 years	294	+/-127	210	+/-101	43
16 and 17 years	386	+/-178	554	+/-171	66
18 to 24 years	1,173	+/-274	1,383	+/-308	375
25 to 34 years	1,964	+/-277	2,927	+/-434	364
35 to 44 years	2,356	+/-326	2,877	+/-399	467
45 to 54 years	2,079	+/-262	2,902	+/-331	395
55 to 64 years	2,377	+/-267	3,284	+/-335	412
65 to 74 years	1,592	+/-246	1,878	+/-238	351
75 years and over	1,069	+/-221	1,850	+/-305	257

	Census Tract 422, Lake County, Indiana	Census Tract 423, Lake County, Indiana		Census Tract 424.03, Lake Cou Indiana	
	Margin of Error	Estimate	Margin of Error	Estimate	Margin of Error
Total:	+/-348	6,712	+/-484	4,140	+/-384
Income in the past 12 months below poverty level:	+/-169	586	+/-330	734	+/-302
Male:	+/-96	312	+/-195	373	+/-157
Under 5 years	+/-49	80	+/-97	54	+/-58
5 years	+/-16	30	+/-49	8	+/-12
6 to 11 years	+/-16	0	+/-16	72	+/-73
12 to 14 years	+/-22	0	+/-16	25	+/-40
15 years	+/-16	0	+/-16	0	+/-11
16 and 17 years	+/-16	0	+/-16	20	+/-24
18 to 24 years	+/-28	0	+/-16	11	+/-18
25 to 34 years	+/-8	38	+/-43	50	+/-55
35 to 44 years	+/-16	69	+/-68	57	+/-55
45 to 54 years	+/-24	18	+/-24	10	+/-17
55 to 64 years	+/-16	58	+/-82	34	+/-32
65 to 74 years	+/-16	0	+/-16	7	+/-13
75 years and over	+/-51	19	+/-30	25	+/-39
Female:	+/-104	274	+/-178	361	+/-180
Under 5 years	+/-16	57	+/-69	0	+/-11
5 years	+/-16	0	+/-16	0	+/-11
6 to 11 years	+/-16	0	+/-16	58	+/-50
12 to 14 years	+/-16	0	+/-16	22	+/-34
15 years	+/-16	0	+/-16	0	+/-11
16 and 17 years	+/-16	25	+/-39	0	+/-11
18 to 24 years	+/-47	0	+/-16	47	+/-60
25 to 34 years	+/-22	58	+/-71	65	+/-66
35 to 44 years	+/-12	50	+/-58	42	+/-44
45 to 54 years	+/-38	28	+/-31	40	+/-35
55 to 64 years	+/-29	20	+/-25	68	+/-46
65 to 74 years	+/-28	36	+/-41	8	+/-13
75 years and over	+/-51	0	+/-16	11	+/-12
Income in the past 12 months at or above poverty level:	+/-392	6,126	+/-483	3,406	+/-463
Male:	+/-255	2,886	+/-316	1,621	+/-298
Under 5 years	+/-98	195	+/-101	101	+/-65
5 years	+/-16	26	+/-47	28	+/-42
6 to 11 years	+/-100	175	+/-92	148	+/-85
12 to 14 years	+/-61	119	+/-99	82	+/-57
15 years	+/-37	16	+/-31	37	+/-35
16 and 17 years	+/-35	57	+/-57	19	+/-22
18 to 24 years	+/-89	130	+/-82	146	+/-95
25 to 34 years	+/-152	287	+/-127	177	+/-104
35 to 44 years	+/-102	487	+/-131	211	+/-102
45 to 54 years	+/-155	352	+/-107	205	+/-71
55 to 64 years	+/-109	485	+/-112	208	+/-69
65 to 74 years	+/-105	295	+/-118	117	+/-46
75 years and over	+/-96	262	+/-80	142	+/-56
Female:	+/-336	3,240	+/-287	1,785	+/-270
Under 5 years	+/-176	113	+/-76	83	+/-53
5 years	+/-78	78	+/-89	76	+/-62
6 to 11 years	+/-123	179	+/-89	62	+/-41
12 to 14 years	+/-69	60	+/-56	22	+/-23
15 years	+/-48	15	+/-24	0	+/-11
16 and 17 years	+/-64	146	+/-103	90	+/-65
18 to 24 years	+/-187	286	+/-119	158	+/-96
25 to 34 years	+/-141	371	+/-151	248	+/-111
35 to 44 years	+/-165	460	+/-175	205	+/-89
45 to 54 years	+/-146	359	+/-114	249	+/-74
55 to 64 years	+/-158	590	+/-154	314	+/-93
65 to 74 years	+/-145	345	+/-103	201	+/-56

	Census Tract 422, Lake County, Indiana	ensus Tract Census Tract 423, 422, Lake Indian unty. Indiana		Census Tract 424.03, Lake County, Indiana	
	Margin of Error	Estimate	Margin of Error	Estimate	Margin of Error
75 years and over	+/-100	238	+/-101	77	+/-42

Data are based on a sample and are subject to sampling variability. The degree of uncertainty for an estimate arising from sampling variability is represented through the use of a margin of error. The value shown here is the 90 percent margin of error. The margin of error can be interpreted roughly as providing a 90 percent probability that the interval defined by the estimate minus the margin of error and the estimate plus the margin of error (the lower and upper confidence bounds) contains the true value. In addition to sampling variability, the ACS estimates are subject to nonsampling error (for a discussion of nonsampling variability, see Accuracy of the Data). The effect of nonsampling error is not represented in these tables.

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Estimates of urban and rural populations, housing units, and characteristics reflect boundaries of urban areas defined based on Census 2010 data. As a result, data for urban and rural areas from the ACS do not necessarily reflect the results of ongoing urbanization.

Source: U.S. Census Bureau, 2013-2017 American Community Survey 5-Year Estimates

Explanation of Symbols:

1. An '**' entry in the margin of error column indicates that either no sample observations or too few sample observations were available to compute a standard error and thus the margin of error. A statistical test is not appropriate.

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5. An '***' entry in the margin of error column indicates that the median falls in the lowest interval or upper interval of an open-ended distribution. A statistical test is not appropriate.

An '*****' entry in the margin of error column indicates that the estimate is controlled. A statistical test for sampling variability is not appropriate.
 An 'N' entry in the estimate and margin of error columns indicates that data for this geographic area cannot be displayed because the number of sample cases is too small.

8. An '(X)' means that the estimate is not applicable or not available.



FactFinder

EJ 6371 City of Hobart as reference community



Legend

Your Selections

2017 boundaries were used to map 'Your Selections' **Selection Results**

No Legend

2017 Boundaries
Census Tract

Place



EJ 6371 City of Hobart as reference community

FactFinder (



Legend

Your Selections

2017 boundaries were used to map 'Your Selections' **Selection Results**

No Legend

2017 Boundaries



Place

Fatal and Incapacitating Injury Crashes

Property Damage Only Crashes

All Crashes

Index of Crash Cost

Index of Crash Frequency

Non-Incapacitating and Possible Injury Crashes

First Year with Crash Data (уууу)	2016
Last Year with Crash Data (уууу)	2018
Number of Crashes (crash/period)	
Fatal and Incapacitating Injury Crashes	4
Non-Incapacitating and Possible Injury Crashes	5
Property Damage Only Crashes	49
Route or Road Type	City Arterial Intersection
Average Crash Costs (\$)	
Fatal and Incapacitating Injury Crashes	1840100
Non-Incapacitating and Possible Injury Crashes	393200
Property Damage Only Crashes	40200
Crash Cost Year (yyyy)	2017
OUTPUT	
Expected Crash Frequency (crash/year)	

RoadHAT 4D Index of Crash Frequency and Cost - Form F1					
	Settings: Indiana	local settings	Version: Vers	sion 4.1	
	Location	61st and Marcella Intersection			
	GIS				
	Post				
	Analyst	ALR			
	Date		12/21	/2021	

file:///C:/Users/arittman/AppData/Local/Temp/fqkghgpz.3du/reportmx169.htm

Location

GIS Post Analyst

Date

INPUT

Road Facility Type

Busiest Road AADT (veh/day)

Crossing Road AADT (veh/day)

Page 1/2

24763

18387

0.736

1.03

7.10

8.87

0.96

0.92

City Arterial Intersection

Version: Version 4.1

61st and Marcella Intersection

ALR

12/21/2021

	RoadHAT 4D	Index of Crach	Fraguency and Cost - Form E1
12/:	22/21, 2:48 PM <mark>EXCERPT TAK</mark>	EN FROM 12/22/2021	RoadHatReport ROADHAT REPORT

Settings: Indiana local settings

Excerpt from Indiana Design Manual, Chapter 51-12, Page 101

Implementation of a roundabout can be beneficial to the traveling public in a number of situations. The following identifies some of the most common locations or applications where installation of a roundabout can be advantageous. However, the designer or other decision-maker should recognize that this list is general and will not apply to every situation. There are useful applications of a roundabout that are not included below. The applications shown below may not always be appropriate. Site-specific analysis of roundabout feasibility should be conducted at each individual location, as follows.

- 1. <u>High-Speed Rural Intersection</u>. Studies and experience show that a roundabout is an exceptional safety countermeasure at this type of location. Other states that have installed roundabouts at such locations have reported reductions in total crashes, injury crashes, and fatal crashes. This is consistent with the experiences of other countries.
- 2. <u>Intersection with Crash History</u>. Studies and experience show that a roundabout can provide reductions in injury crashes and fatal crashes. The specific types of crashes which can be reduced include left-turn head-on and angled crashes.
- 3. <u>Intersection with Traffic-Operational Problems.</u> A properly designed roundabout can be effective in eliminating congestion and delays.
- 4. <u>Closely-Spaced Intersections</u>. A roundabout can eliminate traffic queuing from one intersection into another. It can also eliminate problems related to coordination of traffic-signal timing between closely-spaced intersections.
- 5. <u>Intersection Near a Structure</u>. A roundabout most often does not require as many approach lanes as a signalized intersection for vehicle storage. Where a bridge structure is located near an intersection, installing a roundabout can allow the use of a shorter or narrower bridge structure, resulting in significant cost savings. The most common situation is at a freeway interchange.
- 6. <u>Freeway Interchange</u>. A roundabout can be beneficial at the ramp terminals of a freeway interchange. Random spacing of vehicles exiting a roundabout can be beneficial as they merge from an on-ramp into the stream of traffic of a freeway mainline. This is similar to the effect achieved through ramp metering in a congested urban area.
- 7. <u>As a Part of an Access-Management Program</u>. Since a roundabout can accommodate Uturns, it can be implemented as a part of an overall access management plan, especially at an intersection that displays other characteristics that make a roundabout desirable, such as crash problems or traffic-operational problems. For this situation, a roundabout can function as a median turnaround.

Operational Analysis Proposed Roundabout at 61st Avenue / Marcella Boulevard Intersection

DES # 1902707

Hobart, Indiana



December 22, 2021

Prepared for

City of Hobart 414 Main Street Hobart, IN 46342



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Introduction

This *Operational Analysis* has been prepared by Butler, Fairman & Seufert, Inc (BF&S) for the City of Hobart to analyze how a roundabout would operate at the intersection of 61st Avenue and Marcella Boulevard in current and future years compared to the existing signalized intersection. This analysis of the proposed roundabout will satisfy the required planning documentation on INDOT's Roundabout Design Checklist ⁱ for DES # 1902707. The checklist requires a forecast of traffic for 10 and 20 years after construction, a capacity analysis of the roundabout in both the 10- and 20-year scenarios to ensure Level of Service (LOS) thresholds will be met, and a queue analysis to ensure anticipated queues do not block nearby driveways and intersections. Beyond the typical roundabout checklist items, BF&S performed queue analysis and corridor analysis of 61st Avenue near the I-65 interchange to ensure there are no negative impacts to the I-65 interchange.

Executive Summary

The existing signalized intersection is expected to operate at a Level of Service F by 2042 (20 year forecast). Two roundabout configurations were analyzed along with an upgraded traffic signal condition with added turn lanes. It is expected that both roundabout alternatives will operate at a LOS A in 2042 while the proposed traffic signal configuration is expected to operate at a LOS C in 2042.

The benefit cost ratio calculations for the various alternatives also indicated that Alternative 1 2-lane roundabout had the highest ratio at 7.22. Alternative 2 -3-lane roundabout benefit cost ratio was 5.62 while Alternative 3-the traffic signal benefit cost ratio was 1.54.

The following conclusions have been made for the 61st Avenue / Marcella Boulevard proposed two-lane roundabout:

- Traffic data has been forecasted for both 10 years and 20 years after construction.
- Capacity analysis indicates that LOS thresholds will be met 10 years after construction.
- Capacity analysis indicates that LOS thresholds will be met 20 years after construction.



- Queue analysis indicates that expected queue lengths will not block nearby driveways or intersections 10 years after construction.
- Queue analysis indicates that expected queue lengths will not block nearby driveways or intersections 20 years after construction.

Alternative 1, the proposed 2-lane Roundabout provides the best level of services for the forecast periods and has the lowest cost and best benefit cost ratio and is recommended at this location. The intersection analysis along with the additional corridor analysis were reviewed with INDOT. The corridor analysis concluded that with the proposed intersection treatment and projected traffic volumes there is not expected to be any negative impacts to the I-65 interchange that is adjacent to the project location and the corridor is expected to function at an acceptable level and will not cause unfavorable queueing. The corridor analysis indicated potential for longer PM Peak hour queuing along the local roadway network south and east of the intersection if traffic projections change. The area will continue to be monitored by City of Hobart as development continues to progress and the 61st Avenue corridor develops. If future traffic volumes vary from what was projected, INDOT has requested that the City of Hobart consider a future remediation to install a center median along 61st Avenue to eliminate left turns off or on to 61st Avenue between the interchange and Marcella Boulevard.

Scope of Traffic Analysis

The scope of this traffic analysis was mutually determined by the City and BF&S. The following provides a brief summary of the analysis' scope:

- 1. Perform a peak-hour turning movement count at the intersection of 61st Avenue and Marcella Boulevard.
- 2. Forecast the 10-year and 20-year horizon traffic volumes at the intersection of 61st Avenue and Marcella Boulevard based on:
 - Peak hour turning movement count at the intersection of 61st Avenue and Marcella Boulevard (conducted 11/2021)
 - Anticipated development vacant parcels in surrounding area



- Annual background growth of traffic not associated with the development of adjacent vacant parcels (using NIRPC area growth rate)
- 3. Perform a traffic capacity analysis and vehicle queue length analysis at the intersection of 61st Avenue and Marcella Boulevard for the following traffic volume scenarios:
 - Existing Condition Analysis
 - Scenario 1 10-Year Horizon Traffic
 - Scenario 2 20-Year Horizon Traffic

Location and Existing Conditions

The project location is at the intersection of 61st Avenue and Marcella Boulevard in Hobart, Indiana, approximately 0.29 mile east of I-65 as shown in **Figure 1** in **Appendix A**. The following briefly summarizes the existing conditions of the roadway network as shown in **Figure 2** in **Appendix A**:

- 1. <u>61st AVENUE</u> is a 4-lane roadway that connects the east and west sides of Hobart. The posted speed limit in the vicinity of the site is 30 mph. 61st Avenue is currently designated as an arterial roadway by the City of Hobart and a principal arterial by INDOTⁱⁱ.
- <u>MARCELLA BOULEVARD</u> is a 4-lane roadway, south of 61st Avenue, with a posted speed limit of 20 mph. Marcella Boulevard provides access to industrial and commercial developments, and becomes Mississippi Street farther to the south. Marcella Boulevard is designated as an arterial roadway by the City of Hobart and as a minor arterial by INDOTⁱⁱ. North of 61st Avenue, Marcella Boulevard is a local roadway serving a few commercial properties.
- 3. <u>61st AVENUE AND MARCELLA BOULEVARD</u> The intersection is controlled by a traffic signal. The existing intersection geometrics, as shown on **Figure 2**, are as follows:
 - *Eastbound approach (61st Avenue)* two through lanes, a left-turn lane, and a right-turn lane.
 - *Westbound approach (61st Avenue)* two through lanes and a left-turn lane.
 - *Northbound approach (Marcella Boulevard)* a left-turn lane and a shared left/through/right-turn lane.
 - Southbound approach (Marcella Boulevard) a shared left/through/right-turn lane.



Alternatives

Numerous alternative configurations/layouts were reviewed for this intersection considering impacts on traffic and other impacts such as right-of-way, utility and cost. The three alternatives included in this report are as follows:

Alternative 1: Two-Lane Roundabout

Alternative 2: Three-Lane Roundabout on 61st Avenue

Alternative 3: Traffic Signal

Alternative 1 is a two-lane roundabout. Two lanes entering and two lanes exiting the roundabout are proposed for the eastern leg and western leg of 61st Avenue with outer lane width of 17ft and inner lane width of 15 ft. The south leg of Marcella Boulevard will have two entering lanes and two exiting lanes with outer lane width of 17ft and inner lane width of 15 ft, while the north leg of Marcella Boulevard will have one entering and one exiting lane with lane width of 16 ft. Therefore, the roundabout will have two circulating lanes with total width of 32 ft. The lane configuration of the alternative 1 is shown in **Appendix A** as **Figure 3**.

Alternative 2 is a multilane roundabout. Three lanes entering and two lanes exiting the roundabout are proposed for the eastern leg of 61st Avenue, while two entering lanes and three exiting lanes are proposed on the western leg of 61st Avenue. The south leg of Marcella Boulevard will have two entering lanes and two exiting lane, while the north leg of Marcella Boulevard will have one entering and one exiting lane. Therefore, the roundabout will have two circulating lanes with the exception of the segment between the east leg of 61st Avenue and the west leg of 61st Avenue where there will be three lanes. The lane configuration of the alternative 2 is shown in **Appendix A** as **Figure 4**.

Alternative 3 is a signalized intersection. This alternative was considered for comparison. The City of Hobart Thoroughfare Plan indicates the city's desire to first consider roundabouts over traffic signals where feasible. Alternative 2 includes improving the intersection added lanes at the intersection along with a traffic signal. This configuration includes one dedicated left turn lane, one dedicated right turn lane and three through lanes for the eastbound movement on 61st Avenue;



two dedicated left turn lanes, one dedicated right turn lane and three through lanes for westbound movement on 61st Avenue; two dedicated left turn lanes, one through lane for northbound movements on Marcella Blvd and one lane for all movements on southbound Marcella Blvd movements. The lane configuration of the alternative 3 is shown in **Appendix A** as **Figure 5**.

Peak Hours for Analysis

The term "peak hour" is described as the hour of the day when the traffic volumes are the highest. The remaining hours of the day typically experience traffic volumes equal to or less than those during the peak hour. Therefore, intersection and roadway improvements that accommodate the peak hour traffic should accommodate the traffic operations of the remaining hours of the day. The peak hours for an urban roadway network are associated with the morning and evening work commutes, commonly referred to by the general public as the "rush hours". These peak hours are usually one hour between 7 and 9 A.M., one hour between 4 and 6 P.M., both occurring on a typical weekday (Tuesday through Thursday).

Existing and Horizon Year Traffic Data

COLLECTED TRAFFIC DATA

Peak hour intersection counts were collected by BF&S at the intersection of 61st Avenue and Marcella Boulevard and of 61st Avenue and Liverpool Road. Traffic volumes were obtained on November 16, 2021 at these two intersections. **Figure 6** in **Appendix A** summarizes the peak hour volumes while the raw traffic data is provided in **Appendix B**.

YEAR 2032 AND YEAR 2042 HORIZON TRAFFIC VOLUMES

A review of the existing zoning map and existing conditions of surrounding land parcels was completed. For the purposes of this analysis, assumptions were made for the anticipated development of some vacant parcels within the study area. The vacant parcels to be developed and their expected land uses / intensity were identified based on the Hobart Southwest Development Area Traffic Study, in conjunction with discussions with City officials. The land uses anticipated for the background development include single-family residential and industrial. Only a subset of



the total background growth from the Southwest Development Area Traffic Study was included in this analysis. The parcels that were included were either under construction, actively being developed, or were expected to be developed by the City with some certainty. **Figure 7** in **Appendix A** is a map of the background parcels, identifying the parcels which were included.

In addition to the background developments, general traffic growth not associated with particular development projects was also included. This general traffic growth rate was obtained from the Northwestern Indiana Regional Planning Commission (NIRPC) 2050 NIRPC model. The current 2017 NIRPC Model and projected 2050 NIRPC Model data is presented in **Table 1**. Note that this growth rate was applied only to the turning movement count data and was not applied to the trip generation estimates for the background developments.

	2017 NIRPC	2050 NIRPC	GROWTH RATE
SEGMENT	MODEL	Model	NIRPC MODEL
61st Ave East Leg	6770	7483	0.304%
61st Ave West Leg	13432	14797	0.294%
Marcella Blvd South Leg	8761	9575	0.270%
Area Growth Rate	28963	31855	0.289%

Table 1 – Growth Rates from NIRPC Model for 61st Ave & Marcella Blvd

Generated Traffic using ITE Trip Generation Report

The *ITE Trip Generation Report*ⁱⁱⁱ is considered to be the most comprehensive source for estimating the traffic trip ends generated by a wide variety of different land uses. A trip end is defined as either the starting or ending point of a vehicle trip. In other words, one (1) trip end is equal to one (1) vehicle that <u>either</u> enters or exits a proposed development site. One (1) vehicle that <u>both</u> enters and exits the site is considered to be two (2) trip ends. The trip end data provided by the *ITE Report* is based on historical traffic counts that were collected at existing driveway approaches of different land use types and for different development sizes. The *ITE Report* provides statistical best fit curve equations and average rates of the historical data that can be used



for estimating the trip ends of similar land uses. The *ITE Trip Generation Report* was used to estimate the anticipated future generated trips for the adjacent land parcels.

Generated Traffic Trip Ends for Background Development Parcels

ITE LAND USES

The background development land parcels are expected to be developed as either singlefamily residential or industrial type land uses. **Table 2** lists the size, anticipated land use, and trip generation details for each background development parcel. The year expected refers to the earliest analysis scenario for which each parcel is expected to be open. **Figure 7** shows the parcels and their anticipated land use for developments that are included as a part of this analysis.

EXTERNAL AND INTERNAL TRIPS

Table 2 lists the typical weekday A.M. and P.M. peak hour generated trip ends that are estimated for each ITE land use of the background development land parcels. The trip data was estimated using the methodologies of the *ITE Trip Generation Report*. The data provided by the *ITE Report* estimates the generated trips from the land uses as if they each were developed as individual sites. These are referred to as "external trips" since each trip end uses the external public roadway system. Mixed-use developments also have "internal trips," trips only using the internal roadway system of the site in order to access the other land uses. The *ITE Trip Generation Handbook* provides a methodology to account for the internal trip reductions that can occur between the retail, residential and office uses of a mixed-use site. No internal trip reduction was applied to the background developments, however. Industrial land uses generally do not have significant internal trips, nor do residential uses (unless they are part of a cohesive mixed-use development).

PASS-BY TRIPS

The trip data estimated by the *ITE Report* are referred to as "non-pass-by" trips. These trips are made by vehicles that specifically travel to and from a proposed site. Hence, non-pass-by trips are new trips generated by the proposed site that are added to the adjacent roadway



network. "Pass-by" trips are made by vehicles that are already travelling on the adjacent roadway network that enter the site's access drives directly (without first diverting to another roadway), utilize the site, and then return back to the adjacent roadways. These trips are <u>not</u> new trips that are added to the adjacent roadway network. A significant portion of the trips for retail land uses are pass-by trips. Other land use types have little to no pass-by trips. Therefore, no reduction for pass-by trips has been made for this analysis.



					ITE Land			Т	rip Ge	neratio	n	
Year	Parcel	Future Land Use	Size(Acres)	ITE Land Use	Use Assumed Size	AM	Peak Ho	our	PM	Peak Ho	our	
Expected	#				Code		Total	Enter	Exit	Total	Enter	Exit
2022	4	Residential		Single-Family Housing(DU)	210	71	53	13	40	70	44	26
2022	6	Residential		Single-Family Housing(DU)	210	55	41	10	31	54	34	20
2022	11	Residential		Single-Family Housing(DU)	210	24 (Half Built)	18	4	14	24	15	9
2022	7	Services		Gasoline/Service Station with Convenient Market	945	12 Fueling Positions	150	76	74	168	86	82
2022	8	Services		Coffee/Donut Shop with Drive Through Window	937	1,500	133	68	65	65	32	33
2042	16	Office / Warehouse		Office / Warehouse (SF)	710 / 150	109,083 / 2,072,573	479	380	99	519	126	393
2042	17	Industrial Park / Warehouse		Industrial Park / Warehouse (SF)	130 / 150	934,200 / 1,098,000	531	424	107	534	121	413
2042	27	Manufacturing Warehouse	132	Warehousing(SF)	150	1,150,000	196	151	45	219	59	160
2032	28	Manufacturing Warehouse	104	Warehousing(SF)	150	906,000	154	119	35	172	46	126
2022	32A	Industrial Park		Industrial Park (SF)	130	280,800	112	91	21	112	23	89
2032	32B	Industrial Park		Industrial Park (SF)	130	280,800	112	91	21	112	23	89

Table 2 – Background Development Trip Generation



Distribution and Assignment of Adjacent Land Parcel Generated Traffic

The *Applicant's Guide to Traffic Impact Studies^{iv}* describes the "distribution and assignment" process as the next step after estimating the generated trips from a proposed development site. This step involves "distributing" the generated trips from the parcel to the different driveways (access points) of the proposed site and then "assigning" the distributed trips to each traffic movement of the study area intersections. The typical methods used to distribute and assign the trips are as follows:

- 1. A review of the existing travel patterns indicated by the existing traffic data.
- 2. The use of aerial photos and a site visit to determine the most probable origin and destination facilities that will travel to and from the proposed development and the travel routes that will be taken.

The distribution and assignment is then represented by the percentage of the development site's generated trips that are anticipated for the traffic movements at the study area intersection. **Figure 8 series in Appendix A** shows the distribution and assignment percentages for the generated trips from each land use of the background development parcels.

Background Development Parcels Generated Traffic Volumes

The generated trips for the background development parcels as listed in **Table 2** were applied to the distribution and assignment percentages shown on the **Figure 8** series to determine the generated traffic volumes at the study area intersection shown in the **Figure 9** series. **Figures 10 and 11** in **Appendix A** show the resulting generated peak hour traffic volumes.

Traffic Volume Figures and Analysis Scenarios

The total adjacent land parcel generated traffic volumes shown on the **Figure 9** series are added to the existing and background volumes to determine the total traffic volumes in the horizon year. The following summarizes all of the traffic volume figures and the corresponding analysis scenarios:



- Figure 6 Peak Hour Existing Traffic
- Figure 8 Series Development parcel traffic distributions
- Figure 9 Series Development parcel traffic volumes
- Figure 10 Year 2032 Horizon Traffic, NIRPC growth rate to 2032 and background developments opening by 2032 (Scenario 1)
- Figure 11 Year 2042 Horizon Traffic, NIRPC growth rate to 2042 and background developments opening by 2042 (Scenario 2)

Date		NBL	NBT	NBR	EBL	EBT	EBR	SBL	SBT	SBR	WBL	WBT	WBR
2022	AM Peak	237	2	121	18	357	304	4	3	22	264	473	0
2022	PM Peak	531	23	329	29	513	453	6	7	22	275	433	3
2022	AM Peak	258	2	129	53	409	369	4	3	56	281	516	0
2032	PM Peak	601	24	349	46	561	480	6	7	40	289	496	3
2042	AM Peak	265	2	173	53	665	378	4	3	56	300	596	0
2042	PM Peak	617	24	373	47	657	494	6	7	40	338	758	3

Table 3 – Traffic Volume Summary – 61st Ave. and Marcella Blvd.

Traffic Analysis

HCM CAPACITY ANALYSIS

A capacity analysis of an intersection is performed in order to determine its level-of-service (LOS). The 2010 Highway Capacity Manual (2010 HCM)^v provides a detailed set of procedures used to perform the capacity analysis of an intersection. The traffic volumes, number of lanes along each of the intersection's approaches, the traffic control and in the case of signalized intersections, traffic signal timing, are all components used when performing a capacity analysis. The LOS for an intersection is primarily based on the delay (in seconds) that a typical vehicle would experience at the intersection. **Table 4** summarizes the range of delays as listed in the 2010 HCM that are associated with each LOS letter for signalized and un-signalized intersections. Unsignalized intersections. According to the INDOT Design Manual^{vi}, LOS "D" is the minimum required standard, while LOS "C" is desired.



	DELAY RANGE (SEC	ONDS PER VEHICLE)
LOS	SIGNALIZED	Un-signalized (Stop sign or Roundabout)
А	0 - 10	0 - 10
В	> 10 - 20	> 10 - 15
С	> 20 - 35	> 15 - 25
D	> 35 - 55	> 25 - 35
E	> 55 - 80	> 35 - 50
F	> 80	> 50

Table 4 – Level of Service Descriptions for Intersections

EXISTING TRAFFIC SIGNAL ANALYSIS

A capacity analysis was performed for the study area intersection for each of the traffic volumes using Synchrol1 for the existing and proposed traffic signal for each of the scenarios and Sidra 8 for the roundabout alternatives. The full results of the analysis can be found in **Appendix** C while **Table 5** summarizes the resulting LOS for the existing 61st Avenue / Marcella Boulevard intersection and **Table 6** for the three Alternative intersection configurations.

	LEVEL OF Service AM	LEVEL OF Service PM
2022	С	D
2032	С	D(1 Approach F)
2042	С	E(2 Approaches F)

Table 5 – Existing Condition Level of Service Summary

ROUNDABOUT CAPACITY ANALYSIS

The capacity of a roundabout is dependent on the "critical headway" and "follow-up headway". The critical headway is the minimum time gap that is needed between vehicles in the circulating lane before drivers along a roundabout approach would feel comfortable entering the roundabout. The follow-up headway is the minimum time gap between successive vehicles that enter the roundabout from a given approach. Drivers who are more familiar (e.g. more experienced) with a particular roundabout (or roundabouts in general) are more inclined to use smaller time gaps for both the critical headway and follow-up headway than drivers who are less



familiar. Therefore, the capacity of roundabouts can vary depending on how familiar or experienced the drivers are with a particular roundabout or roundabouts in general.

The 2010 HCM is the first edition to include capacity equations for roundabouts based on observed values of critical headways and follow-up headways within the United States. However, the following is an excerpt from chapter 21, page 6 of the 2010 HCM:

The capacity model given above reflects observations made at U.S. roundabouts in 2003. As noted previously, it is probable that U.S. roundabout capacity will increase to some degree with increased driver familiarity. In addition, communities with higher densities of roundabouts or generally more aggressive drivers may experience higher capacities. Therefore, local calibration of the capacity models is recommended to best reflect local driver behavior.

Chapter 33 - Roundabouts: Supplemental of the 2010 HCM (available online) provides an alternative set of critical and follow-up headways for both single lane and multilane roundabouts that are more representative of familiar drivers. Therefore, it can be assumed that the critical and follow-up headways listed in chapter 21 of the 2010 HCM represent unfamiliar drivers (e.g. less familiar or less aggressive) while the chapter 33 headways represent familiar drivers (e.g. more aggressive).

It is anticipated that the capacity of a new roundabout immediately after it is opened to traffic is best represented by the unfamiliar driver parameters. However, the capacity of the new roundabout will improve over time as drivers become more familiar and enter the roundabout using smaller time gaps. This typically takes from a couple of months up to a year, all depending on how quickly the drivers adapt to the roundabout. For this analysis, the capacity and queue length analysis is being performed for the 10-year and 20-year horizons, at which point it can be expected that drivers will be familiar and comfortable with the roundabout. Therefore, the capacity analysis has been performed for the 61st Avenue / Marcella Boulevard roundabout using the familiar driver parameters.

A capacity analysis was performed for the study area intersection for each traffic volume scenario using the *Sidra Intersection*^{vii} software program. The *Sidra Intersection* program and its methodologies were chosen over the HCM 2010 methodology due to its comprehensiveness for



analyzing roundabouts. The analysis was conducted using the Sidra criteria as recommended in the INDOT Intersection Traffic Analysis Procedures^{viii} (WSDOT roundabout analysis method). The full results of the analysis can be found in **Appendix C** while **Table 6** summarizes the resulting LOS / delay for the 61^{st} Avenue / Marcella Boulevard Alternative intersection configurations.

	LEVEL OF SERVICE 2042 AM	LEVEL OF Service 2042 PM
Alternative 1-2 lane RAB	А	А
Alternative 2- 3 Lane RAB	Α	А
Alternative 3- Traffic Signal	С	D

Table 6 – Alternatives Level of Service Summary for 2042

QUEUE LENGTH ANALYSIS

The *Sidra Intersection* capacity analysis results for the preferred Alternative 1 are shown in **Table 7** and **Appendix C** also provide an estimate of the peak hour vehicle queue lengths expected to be observed at the intersection after background development of surrounding land parcels for the preferred alternative (alternative 1). The following summarizes the results:

- The maximum queue length along the northbound approach of the intersection of 61st Avenue and Marcella Boulevard is anticipated to be less than four vehicles in 2042. Future access points along Marcella Boulevard on this approach should be spaced far enough from the intersection to avoid the expected queues.
- The maximum queue length along the southbound approach is anticipated to be less than one vehicle in 2042. Any future access points along this approach should be spaced to accommodate these anticipated queues.
- The maximum queue length along the eastbound approach is anticipated to be less than four vehicles in 2042. Any future access points along this approach should be spaced to accommodate these anticipated queues.



- 4. The maximum queue length along the westbound approach is anticipated to be less than four vehicles 2042. Any future access points along this approach should be spaced to accommodate these anticipated queues
- 5. These queue lengths should not cause any significant traffic backups or delays at the intersection.
- 6. The queue length analysis indicates that the expected queue lengths will not block nearby driveways or intersections 20 years after construction.



Table 7 – LOS Results for 61st Avenue / Marcella Boulevard Alternative 1- 2-Lane RAB

			LOS, VEHICLE DELAY (SECONDS PER VEHICLE) AND 95% BACK OF QUEUE								
			YEAR 20 3	32 - SCENARIO 1			YEAR 2042 - SCENARIO 2				
APPROACH		AVERAGE	LEVEL	VOLUME TO	95% BACK	AVERAGE	LEVEL	VOLUME	95% BACK		
(ROADWAY)	MOVEMENT	DELAY	OF	CAPACITY	OF QUEUE	DELAY	OF	ТО	OF QUEUE		
(ROAD WAT)		(SECONDS)	SERVICE	RATIO (V/C)	DISTANCE	(SECONDS)	SERVICE	CAPACITY	DISTANCE		
					(FT)			RATIO	(FT)		
								(V/C)			
				A.M. PEAK HC	UR						
Northbound	Left / Through /	6 6 500	٨	0.176	1830	68 500	Δ	0.224	25.1 ft		
(Marcella Blvd.)	Right	0.0 sec	A	0.170	18.3 ft	0.8 Sec	A	0.224	23.1 It		
Southbound	Left / Through /	12 500	۸	0.075	65 ft	15 sec	۸	0.079	73ft		
(Marcella Blvd.)	Right	4.2 800	A	0.075	0.5 ft	4.5 800	A	0.079	7.5 It		
Eastbound	Left / Through /	3.1 sec	۸	0.350	45.0 ft	3 2 590	٨	0.469	60 3 ft		
(61^{st} Ave.)	Right	5.1 See	А	0.330	45.0 It	5.2 800	A	0.409	09.5 ft		
Westbound	Left / Through /	4 2 sec	Δ	0 331	34.6 ft	4 2 sec	Δ	0 377	43.0 ft		
(61^{st} Ave.)	Right	7.2 300	Л	0.551	54.0 ft	7.2 300	Λ	0.577	45.0 ft		
Interse	ction	4.2 sec	Α	0.350	45.0 ft	4.2 sec	Α	0.469	69.3 ftt		
				P.M. PEAK HO	UR						
Northbound	Left / Through /	75.000	٨	0.480	72 0 0	<u>9</u> 1 coo	٨	0.524	90 C A		
(Marcella Blvd.	Right	7.5 sec	A	0.480	72.0 II	8.1 sec	A	0.334	89.0 II		
Southbound	Left / Through /	57.000	٨	0.076	7 0 0	71.000	٨	0.004	10.0.0		
(Marcella Blvd.)	Right	5.7 sec	A	0.070	7.9 II	7.1 sec	A	0.094	10.9 It		
Eastbound	Left / Through /	3 2 500	٨	0.469	72 8 ft	37 590	٨	0.541	06 1 ft		
(61 st Ave.)	Right	5.2 800	А	0.407	/2.0 It	3.7 800	A	0.341	70.1 It		
Westbound	Left / Through /	5.2 sec	Δ	0 303	49.6 ft	5.8 sec	Δ	0 563	03 3 ft		
(61 st Ave.)	Right	5.2 800	Л	0.395	49.0 ft	5.0 500	Л	0.303	75.5 It		
Interse	ction	5.3 sec	Α	0.480	72.8 ft	5.8 sec	Α	0.563	96.1		

Note: The roundabout geometrics include lane configurations on each approach for both scenarios. A simplified conceptual drawing of the basic roundabout configuration is illustrated in Figure 3 in Appendix A.



Table 8 – LOS Results for 61st Avenue / Marcella Boulevard Alternative 2- 3-Lane RAB

			LOS,	VEHICLE DELAY	(SECONDS PER	VEHICLE) AND 95% BACK OF QUEUE				
			YEAR 20 .	32 - SCENARIO 1			YEAR 2042 - SCENARIO 2			
		AVERAGE	LEVEL	VOLUME TO	95% BACK	AVERAGE	LEVEL	VOLUME	95% BACK	
$(\mathbf{D}_{\mathbf{O}} \wedge \mathbf{D}_{\mathbf{W}} \wedge \mathbf{V})$	MOVEMENT	DELAY	OF	CAPACITY	OF QUEUE	DELAY	OF	ТО	OF QUEUE	
(NOADWAY)		(SECONDS)	SERVICE	RATIO (V/C)	DISTANCE	(SECONDS)	SERVICE	CAPACITY	DISTANCE	
					(FT)			RATIO	(FT)	
								(V/C)		
				A.M. PEAK HC	OUR					
Northbound	Left / Through /	()	•	0.172	1708			0.219	245.9	
(Marcella Blvd.)	Right	6.4 sec	А	0.172	1/.9 π	6.6 sec	А	0.218	24.5 π	
Southbound	Left / Through /	4.7	•	0.097	(0.8	5.0		0.001	768	
(Marcella Blvd.)	Right	4. / sec	А	0.080	6.9 II	5.0 sec	А	0.091	7.0 Il	
Eastbound	Left / Through /	2.0	•	0.240	42 7 8	2.1		0.466	(708	
(61 st Ave.)	Right	5.0 sec	А	0.349	43.7 Il	5.1 sec	А	0.400	67.0 II	
Westbound	Left / Through /	4.2 500	٨	0.107	10.5 ft	4.1.500	Δ	0.224	22 8 ft	
$(61^{st} Ave.)$	Right	4.2 sec	A	0.197	19.5 H	4.1 sec	A	0.224	23.8 ft	
Interse	ction	4.2 sec	Α	0.349	43.7 ft	4.1 sec	Α	0.466	67.0 ft	
				P.M. PEAK HC	UR					
Northbound	Left / Through /	7 3 500	٨	0.470	60.2 ft	7.8 500	٨	0.510	857ft	
(Marcella Blvd.	Right	7.5 860	A	0.470	09.2 II	7.8 SEC	A	0.319	83.7 It	
Southbound	Left / Through /	62 500	٨	0.088	8 7 ft	6.0 522		0.100	06#	
(Marcella Blvd.)	Right	0.2 sec	A	0.088	0.2 II	0.9 sec	A	0.100	9.0 II	
Eastbound	Left / Through /	3.1 sec	Δ	0.468	70.8 ft	3.6 sec	Δ	0.536	91 9 ft	
(61^{st} Ave.)	Right	5.1 sec	A	0.408	70.8 It	5.0 sec	A	0.550	91.9 lt	
Westbound	Left / Through /	4 9 sec	Δ	0.231	28.7.ft	4.8 sec	Δ	0 342	44 4 ft	
(61 st Ave.)	Right	7.7 300	Л	0.231	20.7 It	T.0 SCC	Л	0.342	77.7 11	
Interse	ction	5.1 sec	Α	0.470	70.8 ft	5.3 sec	Α	0.536	91.9 ft	

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Table 9 – LOS Results for 61st Avenue / Marcella Boulevard Alternative 3- Traffic Signal

			LOS, VEHICLE DELAY (SECONDS PER VEHICLE) AND 95% BACK OF QUEUE								
			YEAR 203	32 - SCENARIO 1		YEAR 2042 - SCENARIO 2					
APPROACH (ROADWAY)	MOVEMENT	AVERAGE DELAY (SECONDS)	LEVEL OF Service	VOLUME TO CAPACITY RATIO (V/C) MAX	95% BACK OF QUEUE DISTANCE (FT)	AVERAGE DELAY (SECONDS)	LEVEL OF SERVICE	VOLUME TO CAPACITY RATIO (V/C)	95% BACK of Queue Distance (FT)		
				A.M. PEAK HC	UR						
Northbound (Marcella Blvd.)	Left / Through / Right	44.8 sec	D	0.63	-	44.6 sec	D	0.64	-		
Southbound (Marcella Blvd.)	Left / Through / Right	48.6 sec	D	0.13	-	48.7 sec	D	0.20	-		
Eastbound (61 st Ave.)	Left / Through / Right	21.1 sec	С	0.31	-	29.1 sec	С	0.60	-		
Westbound (61 st Ave.)	Left / Through / Right	12.4 sec	В	0.58	-	15.2 sec	В	0.71	-		
Interse	ction	24.1 sec	С	0.58	-	27.8 sec	c	0.68	-		
				P.M. PEAK HO	UR						
Northbound (Marcella Blvd.	Left / Through / Right	48.1 sec	D	0.84	-	57.9 sec	Е	0.94	-		
Southbound (Marcella Blvd.)	Left / Through / Right	59.2 sec	Е	0.16	-	59.1 sec	Е	0.16	-		
Eastbound (61 st Ave.)	Left / Through / Right	21.2 sec	С	0.55	-	26.4 sec	С	0.72	-		
Westbound (61 st Ave.)	Left / Through / Right	19.4 sec	В	0.69	-	24.5 sec	С	0.55	-		
Interse	ction	31.2 sec	С	0.73	-	36.5 sec	D	0.80	-		

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Safety Analysis

Crash data spanning from January 2016 through December 2018 for the 61st Avenue and Marcella Blvd intersection was provided by the City of Hobart. The crash data was reviewed and analyzed utilizing RoadHAT 4.1 to determine the index of crash frequency (Icf), the index of crash cost (Icc) and the benefit-cost ratio. The index of crash frequency (Icf) and the index of crash cost (Icc) quantify the volume and severity of crashes at a given location. A value above zero indicates a concern – values above 1.0 indicate serious safety concerns. A total of 58 crashes took place within the intersection. See **Appendix D** for RoadHAT analysis results. A summary of the crash statistics is provided below in **Table 10**.

Table 10 – 61st Avenue and Marcella Blvd Intersection Crash History Summary

INTERSECTION CRASH HISTORY (2016-2018)								
Icc	0.02	Total Number of Crashes	58					
	0.92	Number of Fatal and Incapacitating Crashes	4					
Icf	0.06	Number of Non-Incapacitating Crashes	5					
	0.90	Number of Property Damage Only Crashes	49					

Preliminary Construction Cost estimates as well as right-of-way cost estimates were completed for the purpose of evaluating the Benefit-Cost Ratios for the three alternatives. A summary of estimate costs can be found below in **Table 11** while cost estimate calculations can be found in Appendix D.

Table 11 – Estimated Construction Costs

	Alternative 1 2 Lane RAB	Alternative 2 3 Lane RAB	Alternative 3 Traffic Signal
Construction Cost	\$3,212,000	\$3,741,000	\$2,763,000
Right-of-Way	\$2,600,000	\$3,400,000	\$2,000,000
Utility Relocation	\$150,000	\$150,000	\$2,500,000
Total Est. Cost	\$5,962,000	\$7,291,000	\$7,263,000

For the Benefit Cost Analysis the same crash reduction factor from Roadhat was used for each roundabout alternative even though it is understood the a three lane roundabout would see



more crashes than a two lane roundabout. A summary of estimate Benefit-Cost Ratios can be found in **Table 12** and worksheets can be found in **Appendix D**.

BENEFIT-COST RATIO				
Alternative 1-2 lane RAB	7.22			
Alternative 2- 3 Lane RAB	5.62			
Alternative 3- Traffic Signal	1.54			

Table 12 – 61st Avenue and Marcella Blvd Intersection Benefit-Cost Ratio

Additional Corridor Analysis

Additional correspondence related to the proposed intersection improvements took place with various members of INDOT, the City of Hobart and BF&S. The focus of the discussions was a concern over potential impacts a proposed roundabout at 61st Avenue and Marcella Boulevard would have at the interchange at 61st Avenue and I-65. The nearest ramp at I-65 is located 1200 feet west of Marcella Boulevard. After several discussions and some alternate analysis of the corridor, it was determined that a proposed roundabout would not have an adverse impact on the interchange through the 2042 design year. The final model utilized, was a Synchro 11 model that included the full interchange, the intersections of 61st Avenue with both Marcella Blvd. and Liverpool Road, and the intersection of 62nd Avenue and Marcella Blvd. Multiple meetings to discuss this model occurred and the conclusion was that the Alternative 1 roundabout will function at an acceptable level for the corridor and will not cause unfavorable queueing. The area will continue to be monitored by City of Hobart as development continues to progress and the 61st Avenue corridor develops. If future traffic volumes vary from what was projected, INDOT has requested that the City of Hobart consider a future remediation to install a center median along 61st Avenue to eliminate left turns off or on to 61st Avenue between the interchange and Marcella Boulevard. Below is a screenshot of the model utilized for the corridor.





Conclusions and Recommendations

The three Alternatives included in this study each yield acceptable results related to the Capacity Analysis. Alternative 1, the proposed 2-lane Roundabout provides the best level of services for the forecast periods and has the lowest cost and best benefit cost ratio. Therefore, Alternative 1 is recommended as the preferred intersection improvement treatment.

61st Avenue & Marcella Boulevard Roundabout Alternative 1

In order to satisfy the *Roundabout Design Checklist*, traffic was forecast for both 10 years and 20 years after construction of the proposed roundabout. A capacity analysis was performed, including existing traffic, general traffic growth based on the NIRPC model, and anticipated background traffic resulting from future development of surrounding land parcels. This intersection will operate at LOS "A" during the peak hours of 2032 horizon year. In the 2042 horizon year the intersection is expected to operate at LOS "A" during the AM peak hour and LOS "A" during the PM peak hour. Each approach and movement at the roundabout will operate at a satisfactory level of service both 10 and 20 years after construction.



Queue Analysis and Future Access Points

The queue length analysis indicates that the expected queue lengths will not block nearby driveways or intersections 20 years after construction.



Documented References

ⁱ Indiana Department of Transportation (INDOT) Design Memorandum 13-10, Roundabout Design Checklist, Indiana Department of Transportation (INDOT), April 2013.

ⁱⁱ INDOT Functional Classification Map for Lake County, Indiana Department of Transportation (INDOT) website, obtained September 2020.

ⁱⁱⁱ ITE Trip Generation Report, 10th Edition, Institute of Transportation Engineers (ITE), 2017.

^{iv} *INDOT's Applicant's Guide to Traffic Impact Studies*, Purdue University on behalf of the Indiana Department of Transportation (INDOT), June 1993.

v 2010 Highway Capacity Manual (HCM), Transportation Research Board (TRB), December 2010.

vi Indiana Design Manual, Figure 53-7, INDOT, 2013.

vii Sidra Intersection (version 6.0.1.3703), Akcelik and Associates Pty Ltd, copyright 2000-2013.

^{viii} Indiana Department of Transportation (INDOT) Intersection Traffic Analysis Procedures, Indiana Department of Transportation (INDOT), September 2018.

ix Synchro Version 10.1, build 2, revision 20 (10.1.2.20), Trafficware, copyright 1993-2017.

^xIndiana Department of Transportation (INDOT) Access Management Guide, Indiana Department of Transportation (INDOT), 2009





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