

DEPARTMENT OF THE ARMY PERMIT

Permittee: Indiana Department of Transportation

Permit Number: LRL-2010-729

Issuing Office: U.S. Army Engineer District, Louisville

NOTE: The term "you" and its derivatives, as used in this permit, means the permittee or any future transferee. The term "this office" refers to the appropriate district or division office of the Corps of Engineers having jurisdiction over the permitted activity or the appropriate official acting under the authority of the commanding officer.

You are authorized to perform work in accordance with the terms and conditions specified below.

Project Description: to install four new structures, replace four existing structures (712 lf) and relocate 2,135 lf of an unnamed tributary to Kelly West Ditch, resulting in the discharge of 1,155 cubic yards (cys) of fill material for Crossing 1. Additionally the applicant proposes to replace an existing structure (320 lf) and discharge fill material into 0.24 acre of open water associated with the East Fork of Wildcat Creek and 0.58 acre of an adjacent wetland. The project is located in Kokomo, Howard and Tipton Counties, Indiana (Des. No. 0800234). To compensate for these impacts, the applicant proposes offsite wetland mitigation that includes the construction of 1.4 acres of forested wetland at the Tudor Drain Mitigation Site. Onsite stream mitigation would be constructed through the relocation and stabilization of 2,240 lf of new stream channel. The remaining 1,032 lf of impacts would be mitigated for at the Preserve Riparian Restoration Site and the Wildcat Creek Log Jam Removal Site.

Project Location: The project is located on an unnamed tributary to Kelly West Ditch in Tipton County Indiana and along the East Fork of Wildcat Creek and its abutting wetland in Howard County Indiana.

Permit Conditions:

General Conditions:

1. The time limit for completing the authorized activity ends on **March 10, 2014**. If you find that you need more time to complete the authorized activity, submit your request for a time extension to this office for consideration at least one month before the above date is reached.
2. You must maintain the activity authorized by this permit in good condition and in conformance with the terms and conditions of this permit. You are not relieved of this requirement if you abandon the permitted activity, although you may make a good faith transfer to a third party in compliance with General Condition 4 below. Should you wish to cease to maintain the authorized activity or should you desire to abandon it without a good faith transfer, you must obtain a modification from this permit from this office, which may require restoration of the area.
3. If you discover any previously unknown historic or archeological remains while accomplishing the activity authorized by this permit, you must immediately notify this office of what you have found. We will initiate the Federal and state coordination required to determine if the remains warrant a recovery effort or if the site is eligible for listing in the National Register of Historic Places.
4. If you sell the property associated with this permit, you must obtain the signature of the new owner in the space provided and forward a copy of the permit to this office to validate the transfer of this authorization.
5. If a conditioned water quality certification has been issued for your project, you must comply with the conditions specified in the certification as special conditions to this permit. For your convenience, a copy of the certification is attached if it contains such conditions.

6. You must allow representatives from this office to inspect the authorized activity at any time deemed necessary to ensure that it is being or has been accomplished with the terms and conditions of your permit.

Special Conditions:

1. The permittee shall be responsible for constructing the following mitigation: 2,240 linear feet of new stream channel for the onsite relocation of Kelly West Ditch, construction of 1.4 acres of forested wetlands at the Tudor Drain mitigation site, and 1,032 linear feet of stream enhancement of preservation along Kokomo Creek and Wildcat Creek.
2. The permittee shall implement the mitigation according to the Stream Mitigation Proposal Sites #1 and #2, and the Wetland Mitigation Proposal, all dated January 9, 2009 as well as Stream Mitigation Proposal #3 dated October 2010. The stream and wetland mitigation shall be constructed within one year of the initiation of project construction.
3. The permittee shall monitor the mitigation sites annually for a period of five years. The permittee shall submit monitoring reports to the U.S. Army Corps of Engineers, Indianapolis Regulatory Office by December 31 every year of monitoring.
4. The permittee shall permanently protect the entire mitigation area through the implementation of the Corps approved deed restriction. A copy of the signed and recorded deed restriction for the mitigation area shall be submitted with the final monitoring report. The Corps shall be notified in writing prior to the transfer of the mitigation site to another entity or individual. Permanent protection shall transfer with the property.
5. The permittee shall limit tree clearing activities to only occur between October 1 and April 1 to avoid any impacts to the Indiana bat (*Myotis sodalis*).
6. The permittee's responsibility to complete the required compensatory mitigation as set forth in Special Condition 1 shall not be considered fulfilled until they have demonstrated compensatory mitigation project success and have received written verification of that success from the U.S. Army Corps of Engineers.

Further Information:

1. Congressional Authorities. You have been authorized to undertake the activity described above pursuant to:
 - () Section 10 of the Rivers and Harbors Act of 1899 (33 U.S.C. 403).
 - (X) Section 404 of the Clean Water Act (33 U.S.C. 1344).
 - () Section 103 of the Marine Protection, Research and Sanctuaries Act of 1972 (33 U.S.C. 1413).
2. Limits of this authorization.
 - a. This permit does not obviate the need to obtain other Federal, state, or local authorizations required by law.
 - b. This permit does not grant any property rights or exclusive privileges.
 - c. This permit does not authorize any injury to the property or rights of others.
 - d. This permit does not authorize interference with any existing or proposed Federal project.

3. Limits of Federal Liability. In issuing this permit, the Federal Government does not assume any liability for the following:

a. Damages to the permitted project or uses thereof as a result of other permitted or unpermitted activities or from natural causes.

b. Damages to the permitted project or uses thereof as a result of current or future activities undertaken by or on behalf of the United States in the public interest.

c. Damages to persons, property, or to other permitted or unpermitted activities or structures caused by the activity authorized by this permit.

d. Design or construction deficiencies associated with the permitted work.

e. Damage claims associated with any future modification, suspension, or revocation of this permit.

4. Reliance on Applicant's Data. The determination of this office that issuance of this permit is not contrary to the public interest was made in reliance on the information you provided.

5. Reevaluation of Permit Decision. This office may reevaluate its decision on this permit at any time the circumstances warrant. Circumstances that could require a reevaluation include, but are not limited to, the following:

a. You fail to comply with the terms and conditions of this permit.

b. The information provided by you in support of your permit application proves to have been false, incomplete, or inaccurate (See 4 above).

c. Significant new information surfaces which this office did not consider in reaching the original public interest decision.

Such a reevaluation may result in a determination that it is appropriate to use the suspension, modification, and revocation procedures contained in 33 CFR 325.7 or enforcement procedures such as those contained in 33 CFR 326.4 and 326.5. The referenced enforcement procedures provide for the issuance of an administrative order requiring you to comply with the terms and conditions of your permit and for the initiation of legal action where appropriate. You will be required to pay for any corrective measure ordered by this office, and if you fail to comply with such directive, this office may in certain situations (such as those specified in 33 CFR 209.170) accomplish the corrective measures by contract or otherwise and bill you for the cost.

6. Extensions. General condition 1 establishes a time limit for the completion of the activity authorized by this permit. Unless there are circumstances requiring either a prompt completion of the authorized activity or a reevaluation of the public interest decision, the Corps will normally give you favorable consideration to a request for an extension of this time limit.

CELRL-OP-FN
Application LRL-2010-729-sam

MEMORANDUM FOR RECORD

SUBJECT: Department of the Army Environmental Assessment and Statement of Finding for Above-Numbered Permit Application

This document constitutes the Environmental Assessment, 404(b)(1) Guidelines Evaluation, Public Interest Review, and Statement of Findings.

1. Application as described in the public notice.

APPLICANT: Indiana Department of Transportation (INDOT)
WATERWAY & LOCATION: Unnamed tributary to Kelly West Ditch and East Fork of Wildcat Creek and its adjacent wetland in Howard County, Indiana.

LATITUDE & LONGITUDE: Latitude North: 40.3830
Longitude West: 86.1275

PROJECT PURPOSE

Basic: To construct two crossings of “waters of the U.S.” in support of a new bypass around Kokomo, Indiana .

Overall: To construct a U.S. Route 31 Bypass around Kokomo in Tipton and Howard Counties, Indiana to improve vehicle safety through the region, reduce travel time and congestion, and meet the needs of state and regional transportation plans.

Water Dependency Determination: The construction of the stream crossings is a water dependent activity.

PROPOSED WORK: The applicant proposes to install four new structures, replace four existing structures (712 linear feet) and relocate 2,135 linear feet (lf) of an unnamed tributary to Kelly West Ditch, resulting in the discharge of 1,155 cubic yards (cys) of fill material for crossing 1. Additionally the applicant proposes to replace an existing structure (320 lf) and discharge fill material into 0.24 acre of open water associated with the East Fork of Wildcat Creek and 0.58 acre of an adjacent wetland. The two crossings would have a combined impact of 3,167 lf of stream impact, 0.24 acre of open water impact and 0.58 acre of wetland impact. The proposed road would start south of the intersection of U.S. Route 31 and County Road 600 North and continue north around the east side of Kokomo, ending at the intersection of U.S. Route 31 and U.S. Route 35. The fill material would consist of clean earthen fill, limestone riprap, and concrete.

Avoidance and Minimization Information: Impacts to streams and wetlands were unavoidable considering the size of the proposed project, constructing a new, 4-lane divided highway.

SUBJECT: Department of the Army Environmental Assessment and Statement of Findings for the Above-Numbered Permit Application

The applicant prepared a Final Environmental Impact Statement (FEIS), approved on March 9, 2007, that evaluated 6 alternatives for the proposed project. A comparison of six alignments identified alternative "J Modified" as the preferred alternative in part because it required fewer impacts to wetlands (1.82 acres of jurisdictional wetlands vs. 2.72 acres for Alternative G).

Compensatory Mitigation: The applicant proposes offsite wetland mitigation that includes the construction of 1.4 acres of forested wetland at the Tudor Drain Mitigation Site. Onsite stream mitigation would be constructed through the relocation and stabilization of 2,240 lf of new stream channel. The remaining 1,032 lf of impacts would be mitigated for at the Preserve Riparian Restoration Site and the Wildcat Creek Log Jam Removal Site. The proposed mitigation is located within the same 8-digit HUC watershed (05120107) as the impact sites.

EXISTING CONDITIONS: Crossings 1 and 2 are located in a rural area just south of Kokomo, Indiana. Crossing 1 includes an intermittent stream that runs parallel to Tipton County Road 600 North. Bisected by U.S. Route 31, half of the proposed impacts are located east of U.S. 31 while the remaining half is on the west side of U.S. 31. The intermittent stream runs along the north side of CR 600 N west of U.S. Route 31. Just before it crosses U.S. 31, the stream crosses CR 600 North and then continues along the south side of the road, east of U.S. 31. Three businesses, a small residential community, and agricultural land characterize the area east of U.S. Route 31. The project corridor to the west of U.S. 31 includes a house along the south side of County Road 600 and pastureland to the north. The U.S. Department of Agriculture's Web Soil Survey characterizes the substrate composition for Crossing 1 as being Patton Silty Clay loam, and is considered "hydric" soil.

Crossing 2 is located along the County Line Road, approximately 1 mile east of U.S. Route 31. The East Fork of Wildcat Creek Crosses the County Line road from southeast to northwest. A 1.31 acre emergent wetland abuts the East Fork of Wildcat Creek south of County Line Road. The U.S. Department of Agriculture's Web Soil Survey characterizes the soil north of the County Line Road as being Miami Silt Loam and is considered "not hydric". The soil along the south side of County Line Road is characterized as Tuscola, till substratum and is identified as "not hydric" as well.

2. Authority.

- Section 10 of the Rivers and Harbors Act of 1899 (33 U.S.C. §403).
- Section 404 of the Clean Water Act (33 U.S.C. §1344).
- Section 103 of the Marine Protection, Research and Sanctuaries Act of 1972 (33 U.S.C. 1413).

3. Scope of Analysis.

a. NEPA. *(Write an explanation of rationale in each section, as appropriate)*

(1) Factors.

- (i) Whether or not the regulated activity comprises "merely a link" in a corridor type project.

The NEPA Scope of Analysis includes jurisdictional "waters of the U.S." that would be filled, directly or indirectly, by the construction of each separate and complete crossing and the immediate adjacent riparian corridor. Each crossing would be a link in a corridor project.

- (ii) Whether there are aspects of the upland facility in the immediate vicinity of the regulated activity which affect the location and configuration of the regulated activity.

The proposed crossings are part of a proposed four-lane highway. The road in the immediate vicinity of the regulated activity was designed to avoid and minimize impacts to "waters of the U.S." to the greatest extent possible.

- (iii) The extent to which the entire project will be within the Corps jurisdiction.

The CWA does not provide the Corps legal authority to regulate interstate highway projects, such as the proposed U.S. 31 Kokomo Bypass, beyond the limits of the "waters of the U.S." The proposed construction of U.S. 31 Kokomo Bypass would include four separate and complete crossings of "waters of the U.S." In a letter dated January 11, 2011, the Corps of Engineers verified that two of these crossings, which impacted a total of 770 linear feet of stream and 0.47 acre of forested wetland, were eligible for Indiana Regional Permit (RGP) No. 1 with special conditions. The remaining two crossings have proposed impacts that exceed those allowed by RGP No. 1 and are being processed as a standard permit. The construction of the road in areas that would not require the placement of fill into "waters of the U.S." will not be within the Corps jurisdiction

- (iv) The extent of cumulative Federal control and responsibility.

Overall responsibility for the construction and approval of interstate highway projects is the responsibility of the Federal Highways Administration (FHWA). FHWA prepared an Environmental Impact Statement (EIS) in 2007 that evaluated the need for the proposed road and alternative corridors. A Record of Decision (ROD) was issued for the EIS that approved a build alternative (J Modified).

- (2) Determined scope.
 - Only within the footprint of the regulated activity within the delineated water.
 - Over entire property. *Explain.*

b. NHPA "Permit Area".

- (1) Tests. Activities outside the waters of the United States are/are not included because all of the following tests are/are not satisfied: Such activity would/would not occur but for the authorization of the work or structures within the waters of the United States; Such activity is/is not integrally related to the work or structures to be authorized within waters of the United States (or, conversely, the work or structures to be authorized must be essential to the completeness of the overall project or program); and Such activity is/is not directly associated (first order impact) with the work or structures to be authorized. *Explain.* The proposed crossings are part of a linear project that could have been designed to avoid placement of fill within "waters of the U.S." Appendix C of 33 CFR 325 states that for such projects, the "but for" test is not met by the entire project right-of-way. The APE is restricted to the permit area and any associated areas within a 100-foot buffer.
- (2) Determined scope. *Describe.* Impacts within a 100-foot buffer of each separate and complete crossing of a "water of the U.S." were considered in the NHPA "Permit Area."

c. ESA "Action Area".

- (1) Action area means all areas to be affected directly or indirectly by the Federal action and not merely the immediate area involved in the action.
- (2) Determined scope. Impacts within a 100-foot buffer of each separate and complete crossing of a "water of the U.S." were considered in the ESA "Action Area."

d. Public notice comments. NA

- (1) The public also provided comments at public hearing, public meeting, and/or *Explain.*

(2) Commentors and issues raised.

Name	Issue
U.S. Fish and Wildlife Service	Email dated 12/20/2010 – Recommend seasonal tree clearing restrictions for Indiana bats (no tree removal from April 1 through September 30)

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- (3) Site was/was not visited by the Corps to obtain information in addition to delineating jurisdiction. *Include dates and synopsis of information gathered if site was visited.* A site visit was conducted on January 19, 2011 by Corps staff and the applicant's agent. Crossing 1 is located at the intersection of U.S. Route 31 and County Road (CR) 600 North in Tipton County. The unnamed tributary to Kelly West Ditch runs along the north side of CR 600 N west of U.S. 31 and then crosses under CR 600 N to the south side before crossing U.S. Route 31. The unnamed tributary's primary function is storm water conveyance, collecting water from the adjacent roadway and the wastewater treatment plant. The proposed relocation would move the stream north on the west side of U.S. Route 31, and would cross the county road at the same location. To the east of U.S. Route 31, the new channel would be just south of the existing channel but north of the existing businesses and retention pond. The relocated channel would connect with the existing channel upstream of the wastewater treatment plant's outfall.

Crossing 2 is located along CR 700 North over the East Fork of Wildcat Creek. The channel north of CR 700 North has been dug out and made wider, creating an open water area. To the south of CR 700 North the channel may have been historically dug out similar to the north side; however over time, it has developed into an emergent wetland. The proposed crossing would replace the existing encapsulation with a new, much longer structure, fill in the open water area to the north of CR 700 and place fill into the emergent wetland.

- (4) Issues identified by the Corps. *Describe.* None
- (5) Issues/comments forwarded to the applicant. NA/Yes.
- (6) Applicant replied/provided views. NA/Yes.
- (7) The following comments are not discussed further in this document as they are outside the Corps purview. NA/ Yes *Explain.*

4. Alternatives Analysis.

- a. Basic and Overall Project Purpose (as stated by applicant and independent definition by Corps).

Same as Project Purpose in Paragraph 1.

Revised: *Insert revised project purpose here and explain why it was revised.*

- b. Water Dependency Determination:

Same as in Paragraph 1.

Revised: *Insert revised water dependency determination here if it has changed due to changing project purpose or new information.*

c. Applicant preferred alternative site and site configuration.

Same as Project Description in Paragraph 1.

Revised: *Explain any difference from Paragraph 1*

Criteria. Proposed impacts of fill material on “waters of the U.S.” including unnamed tributary to Kelly West Ditch, the East Fork of Wildcat Creek, their tributaries, open water and wetlands.

Issue	Measurement and/or constraint
<i>See Table Below</i>	

Water Resources	Resource Type	Impact (Linear feet)	Impact (Acres)
Crossing 1			
UNT to Kelly West Ditch (Relocation)	Perennial	2,135	0.65
UNT to Kelly West Ditch (Structures)	Perennial	712	0.09
Crossing 2			
East Fork Wildcat Creek (Structure)	Perennial	320	0.13
East Fork Wildcat Creek (Open Water)	Perennial	NA	0.24
Wetland SA-1	Emergent	NA	0.58

d. Off-site locations and configuration(s) for each. (e.g. alternatives located on property not currently owned by the applicant are not practicable under the Section 404(b)(1) Guidelines as this project is the construction or expansion of a single family home and attendant features, such as a driveway, garage, storage shed, or septic field; or the construction or expansion of a barn or other farm building; or the expansion of a small business facility; and involves discharges of dredged or fill material less than two acres into jurisdictional wetlands.)

Off-site locations and configurations

Description	Comparison to criteria
Alternative Analysis in EIS	See Below for discussion.

The Environmental Impact Statement’s alternative analysis included three separate screenings reviewing eight different highway alignments. The first phase of analysis eliminated Alternative A from further study due to not being able to meet the purpose and

need of the proposed project. The Phase 2 preliminary environmental screening eliminated four additional alternatives (Alternative B, C, D, and H) from further consideration due to their high environmental and cultural resources impacts. Three alternative routes, all in close proximity to each other were forwarded for a comprehensive review to identify potential impacts to the human and natural environment.

e. NA) Site selected for further analysis and why.

f. On-site configurations.

Description	Comparison to criteria
Alternative E	Included as one of the original eight alternatives, this alternative would avoid both Crossing 1 and Crossing 2.
Alternative F	Included as one of the original eight alternatives, this alternative would avoid both Crossing 1 and Crossing 2.
Alternative G	Included as one of the original eight alternatives, this alternative would result in the same impacts to Crossing 1 and Crossing 2
Alternative I	Identified during a public comment period, this Alternative would have the same impacts to Crossing 1 and Crossing 2
Alternative J	Identified during a public comment period, this Alternative would have the same impacts to Crossing 1 and Crossing 2
Alternative J Modified (Preferred Alternative)	Identified during a public comment period, this Alternative would have the same impacts to Crossing 1 and Crossing 2

g. Other alternatives not requiring a permit, including No Action.

Description	Comparison to criteria
No Action	The no action alternative would have no environmental or economic impacts; however, it would not meet the stated purpose and need of the proposed project and would conflict with local transportation plans.
Travel Demand Management (TDM)	This alternative would implement low-cost strategies to reduce travel demand and improve traffic (Carpooling, telecommuting, etc..). This alternative would require the implementation of vehicle tolls. Since U.S. Route 31 is not a fully access-controlled road system, implementation of a toll system would not be feasible. Phase 1 analysis indicated that this alternative would result in substandard intersections and would not be consistent with transportation plans.
Transportation System	This alternative would include the implementation of

Management (TSM)	carpool lanes, reversible lanes and turn restrictions, and signal coordinating. Phase I analysis indicated that this alternative would result in intersections below standard, result in higher vehicle accidents, would not improve travel time and would not be consistent with area transportation plans.
Mass Transit	This alternative would include the construction of public transit system (light rail or bussing). Phase I indicated that this alternative would not improve the existing layout of the transportation network, would not significantly decrease the congestion of the area, and would not be consistent with existing transportation plans.
Transportation Management	This alternative would combine aspects of TDM and TSM. Phase I analysis indicated that this alternative would still result in substandard intersections for safety and traffic congestion. Additionally, it would not be consistent with area transportation plans.

h. Alternatives not practicable or reasonable. *Describe/explain*

At the conclusion of the Phase III analysis, alternatives E, F, I, and J were deemed not practicable or reasonable. Alternatives E and F would result in high numbers of residential displacements and would have unacceptably high right-of-way acquisition costs. Similarly, Alternative I would result in an unacceptably high level of commercial displacements. Alternative J was eliminated because it failed to meet area transportation needs. To correct this, modifications were made, resulting in Alternative J Modified.

i. Least environmentally damaging practicable alternative. *Describe/explain*

Alternative J Modified was identified as the least environmentally damaging practicable alternative. This alternative combined portions of Alternative E, F and G, minimizing impacts to streams and wetlands while at the same time meeting the project's stated purpose and need and minimizing residential and commercial displacements.

5. Evaluation of the 404(b)(1) Guidelines. (NA)

a. Factual determinations.

Physical Substrate. <input type="checkbox"/> See Existing Conditions, paragraph 1
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<p><input checked="" type="checkbox"/> Construction of the two crossings would result in direct impacts to the substrate as fill would be placed into the "Waters of the U.S.," thereby completely covering the existing substrate.</p> <p>The earthen fill material would comply with INDOT's 2010 Standard Specifications, which require borrow material to be "free of substances that will form deleterious deposits, or produce toxic concentrations or combinations that may be harmful to human, animal, plant or aquatic life, or otherwise impair the designation uses of the stream or area."</p>
<p>Water circulation, fluctuation, and salinity.</p> <p><input checked="" type="checkbox"/> Addressed in the Water Quality Certification.</p> <p><input type="checkbox"/></p>
<p>Suspended particulate/turbidity.</p> <p><input checked="" type="checkbox"/> Turbidity controls in Water Quality Certification.</p> <p><input type="checkbox"/></p>
<p>Contaminant availability.</p> <p><input checked="" type="checkbox"/> General Condition requires clean fill.</p> <p><input type="checkbox"/></p>
<p>Aquatic ecosystem and organism.</p> <p><input checked="" type="checkbox"/> Wetland/wildlife evaluations, paragraphs 5, 6, 7 & 8.</p> <p><input type="checkbox"/></p>
<p>Proposed disposal site.</p> <p><input checked="" type="checkbox"/> Public interest, paragraph 7.</p> <p><input type="checkbox"/></p>
<p>Cumulative effects on the aquatic ecosystem.</p> <p><input checked="" type="checkbox"/> See Paragraph 7.e.</p> <p><input type="checkbox"/></p>
<p>Secondary effects on the aquatic ecosystem.</p> <p><input checked="" type="checkbox"/> See Paragraph 7.e.</p> <p><input type="checkbox"/></p>

b. Restrictions on discharges (230.10).

- (1) It has/has not been demonstrated in paragraph 5 that there are no practicable nor less damaging alternatives which could satisfy the project's basic purpose. The activity is/is not located in a special aquatic site (wetlands, sanctuaries, and refuges, mudflats, vegetated shallows, coral reefs, riffle & pool complexes). The activity does/does not need to be located in a special aquatic site to fulfill its basic purpose.
- (2) The proposed activity does/does not violate applicable State water quality standards or Section 307 prohibitions or effluent standards (based on information from the certifying agency that the Corps could proceed with a provisional determination). The proposed activity does/does not jeopardize the continued existence of federally

listed threatened or endangered species or affects their critical habitat. The proposed activity does/ does not violate the requirements of a federally designate marine sanctuary.

(3) The activity will/ will not cause or contribute to significant degradation of waters of the United States, including adverse effects on human health; life stages of aquatic organisms' ecosystem diversity, productivity and stability; and recreation, esthetic, and economic values.

(4) Appropriate and practicable steps have/ have not been taken to minimize potential adverse impacts of the discharge on the aquatic ecosystem (see Paragraph 8 for description of mitigative actions).

6. Public Interest Review: All public interest factors have been reviewed as summarized here. Both cumulative and secondary impacts on the public interest were considered. Public interest factors that have had additional information relevant to the decision are discussed in number 7.

				+ Beneficial effect
				0 Negligible effect
				- Adverse effect
				M Neutral as result of mitigative action
+	0	-	M	
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Conservation.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Economics.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Aesthetics.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	General environmental concerns.
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Wetlands.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Historic properties.
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Fish and wildlife values
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Flood hazards.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Floodplain values.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Land use.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Navigation.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Shore erosion and accretion.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Recreation.
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Water supply and conservation.
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Water quality.
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Energy needs.
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Safety.
<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	Food and fiber production.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Mineral needs.
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Considerations of property ownership.
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Needs and welfare of the people.

7. Effects, policies and other laws.

a. NA

Public Interest Factors. *(add factors that are relevant to specific project that you checked in number 6 above and add a discussion of that factor)*

Factor	Discussion
Conservation	This is not a factor associated with this activity.
Economics	Direct socio-economic impacts of the proposed crossings would include the loss of farm income due to the removal of farmland from production, project costs, increased employment during construction, and changes to local property tax base as a result of taking taxable property for public right-of-way. Socio-economic benefits associated with the improved highway access would go to the traveling public and commercial trucking companies and would be long-term.
Aesthetics	<p>The proposed crossings are located in rural settings adjacent to existing roadways. Temporary impacts would be associated with both crossings due to the placement of construction equipment, clearing of areas for construction, and constructing the new highway. These temporary impacts would be mitigated by limiting the vegetation clearing to the area in the construction limits and quick re-vegetation upon completion of construction.</p> <p>Crossing 1 is located at the intersection of U.S. Route 31 and County Road 600 North. The viewshed would be similar to the existing conditions ; however, there would be increased infrastructure due to the construction of a new interchange at the intersection of the two roads.</p> <p>Crossing 2 is located along a rural county road within eyesight of the existing U.S. Route 31. The proposed construction of Crossing 2 would convert the existing viewshed from local roads to a 4-lane divided highway. The proposed highway has been designed so that it is located as far as possible from the nearby residents. While construction activities would result in fill to forested wetlands to the south of County Road 600, the impacts have been minimized to leave as many trees and wetlands onsite to serve as a buffer.</p> <p>The effect on aesthetics is generally considered to be a</p>

	<p>matter of personal preference. However, the net effect is expected to be negligible.</p>
General Environmental Concern	<p>This is not a factor associated with this activity.</p>
Wetlands	<p>The proposed construction of Crossing 1 would not have an adverse impact on any wetlands.</p> <p>Construction of Crossing 2 would result in the discharge of fill material into 0.58 acre of a 1.31 acres emergent wetland. The existing wetland provides surface water storage and flood protection. This wetland would be expected to provide functions relating to nutrient transformations and processing, biomass accumulation, and decomposition. The wetlands also provide habitat for wildlife.</p> <p>Compensation for the wetland impacts would be provided through wetland creation at an offsite location in Howard County that is within the same 8-digit watershed. Approximately 1.16 acres of forested wetland would be constructed along Tudor train to compensate for the loss of 0.58 acre of emergent wetland.</p>
Historic Properties	<p>There are no known historic buildings, structures, districts or objects listed in or eligible for inclusion in the National Register of Historic Places within the area of the two proposed crossings.</p>
Fish and Wildlife Values	<p>Crossing 1 would result in the placement of fill into 2,847 linear feet of an unnamed tributary to Kelly West Ditch. This area provides habitat for fish and other aquatic species and provides a food sources for area birds and mammals. To mitigate this impact 2, 240 linear feet of new stream channel would be constructed adjacent to the existing stream channel.</p> <p>Crossing 2 would result in the discharge of fill into 320 linear feet of East Fork of Wildcat Creek, placement of fill into 0.24 acre of open water, and 0.58 acre of emergent wetland. These areas provide habitat for fish, birds, reptiles and mammals. Mitigation for open water and wetland loss would be accounted for through the construction of 1.40 acres of forested wetlands at the offsite Tudor Drain Mitigation site. Stream impacts would be mitigated at the Preserve Riparian Stream Restoration Site and the Wildcat Creek Log Jam Removal Site located in Howard County within the same 8-digit watershed.</p>

	Overall, impacts to Fish and Wildlife values would be mitigated through the construction of both on-site and off-site mitigation.
Flood Hazards	<p>Crossing 1 would not have an impact to flood hazards of the surrounding area because it is outside the floodplain. A portion of the work associated with Crossing 2 (north side of County Road 500 South) would be within a floodplain; however the work is exempt from floodway/floodplain permitting by the Indiana Department of Natural Resources. Crossing 2 is exempt because it qualifies as a rural crossing in a watershed that is less than 50 square miles.</p> <p>Construction of the two crossings would not adversely impact the flood hazards of the surrounding area.</p>
Floodplain Values	Floodplain values would not be adversely impacted with this activity.
Land use	The proposed project would be consistent with future land use for the area. The two crossings are adjacent to existing roadways, requiring small amounts of additional agricultural lands to be obtained. While small amounts of land would be converted from agriculture, the proposed work is consistent with long-range transportation and area development plans. Therefore, there would not be an adverse impact to surrounding land use.
Navigation	This is not a factor associated with this activity.
Shore erosion and accretion	No adverse effect to erosion and accretion rates or patterns is expected from any of the crossings. Erosion control measures would be implemented on the worksites to protect the waterways from receiving increased sedimentation from the work area.
Recreation	The proposed construction of the two crossings would not adversely impact recreational activities. There are no recreational areas within the area of the two proposed crossings.
Water Supply and Conservation	The proposed project would not adversely impact any public drinking water wells. The proposed crossings would impact private drinking water wells adjacent to the crossings. These private wells would be capped according to Indiana State Regulations and new drinking water wells drilled to supply water to the residence. If a new drinking water well cannot be supplied, the home would be purchased and relocation assistance provided to the landowner.

<p>Water Quality</p>	<p>Construction of the two crossings would result in the relocation of 2,135 lf of stream, 1,032 lf of stream encapsulation, and the discharge of fill into 0.24 acre of open water and 0.58 acre of adjacent wetlands. While best management practices would be incorporated to minimize temporary impacts associated with the stream relocation and construction, the encapsulation and discharge of fill into open water and wetlands would result in a permanent loss. This loss would limit the streams ability to filter out nutrients and sediment, thereby, adversely impacting water quality. To mitigate these impacts, the applicant has proposed the creation of wetlands at an offsite mitigation location adjacent to Tudor Drain. The applicant also proposed to mitigate the stream impact through the onsite construction of 2,240 lf of new stream channel and 1,032 lf of mitigation at the offsite Preserve Riparian Stream Restoration Site and the Wildcat Creek Log Jam Removal Site.</p>
<p>Energy Needs</p>	<p>The proposed project would result in a temporary increase in energy consumption due to construction activities. These impacts would be short-term and would be at a level commensurate with other construction activities of this type. It is expected that the construction of the proposed U.S. 31 bypass would result in long term marginal increase in regional energy consumption. This is due to higher average daily traffic on the divided highway driving at higher speeds, compared to the congested roadways. This marginal increase is expected to be offset due to reducing the vehicular stopping and slowing conditions presently found on U.S. 31 through Kokomo.</p>
<p>Safety</p>	<p>The proposed crossings are a part of a larger project that would improve safety by reducing the vehicle miles traveled and reducing the number of automobile accidents. The proposed road construction would remove congestion from clogged arterial streets, allowing vehicles to travel through the region on a divided, limited access, four-lane highway. While crashes would still occur on the new highway, state-wide average crash rates show that urban principal roadways (proposed action) have lower crash rates than urban minor arterials and two-lane collector streets. Therefore, the proposed project should have a long-term positive impact on vehicle safety within the project area.</p>
<p>Food and Fiber Production</p>	<p>The proposed crossings would have an adverse impact on food and fiber production since existing agricultural lands</p>

	would be taken out of production to construct the crossings. Impacts to agricultural lands were unavoidable and were minimized as the crossings are partially located in existing right-of-ways, following property lines to avoid/minimize severances, and providing access to parcels that would otherwise be landlocked. The impacts would be permanent.
Mineral Needs	The project would have no impacts on mineral needs.
Consideration of Property Owners	<p>The two crossings are a part of the larger U.S. 31 Bypass construction project in Kokomo, In. Properties adjacent to the two crossings as well as additional properties along the entire corridor would be adversely impacted.</p> <p>Approximately 9 businesses and 75 residences would be displaced due to the new U.S. 31 Bypass. Homes and businesses would be relocated according to the Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970, as amended. Assistance in finding a new residence, relocation costs, and compensation for property would be provided.</p> <p>The adjoining property owners were mailed a copy of the public notice to provide an opportunity for comment. No comments were received. Adjoining property owners should not be adversely affected by the proposed crossings.</p>
Needs and welfare of the people	The public and private need for the proposed project is to provide improved regional accessibility and Interstate and international movement of freight. The proposal would provide employment during construction and after for maintenance of the proposed crossings. Indirectly, the changes in land use due to development induced by improved access are expected to yield an increase in business and employment.

b. Endangered Species Act. NA

The proposed project:

(1) Will not affect these threatened or endangered species:

Any/ . Explain.

(2) May affect, but is not likely to adversely affect:

Species: Indiana bat (*Myotis sodalis*). Explain. Email correspondence from U.S. Fish and Wildlife indicate that there would be no impact to the Indiana bat (*Myotis sodalis*); however seasonal tree clearing restrictions should be incorporated into the permit.

- (3) Will/ Will not adversely modify designated critical habitat for the
Explain.
- (4) Is/ Is not likely to jeopardize the continued existence of the
Explain.
- (5) The Services concurred/ provided a Biological Opinion(s). *Explain.*
- c. Essential Fish Habitat. Adverse impacts to Essential Fish Habitat will/ will not result from the proposed project. *Explain.* There is no Essential Fish Habitat within the project area.
- d. Historic Properties. The proposed project will/ will not have any affect on any sites listed, or eligible for listing, in the National Register of Historic Places, or otherwise of national, state, or local significance based on letter from SHPO/
Explain. In a letter dated February 14, 2007, to U.S. Federal Highway Administration (FHWA), the Indiana State Historic Preservation Office concurred with the U.S. FHWA's finding that no historic properties within the area of potential effect will be adversely affected by the proposed project.
- e. Cumulative & Secondary Impacts. The geographic area for this assessment is the Wildcat Creek watershed.
- (1) Baseline. Approximately 0.42% of the watershed area is wetland. There are also approximately 689 stream miles contained within the watershed comprised of 3% perennial, 23% intermittent, and 74% ephemeral tributaries. Corps permits for the period 2006-2011 authorized the fill of 4.2 acres and 13,093 linear feet of stream. The projection is that authorizations will continue at the current rate/ increase/ because of continued development in and around Kokomo and the U.S. 31 Corridor. There are no natural resources issues of particular concern [from Corps & non-Corps activities].
- (2) Context. The proposed project is typical of/ a precedent/ very large compared to/ other activities in the watershed. Developments similar to the proposal have occurred since the construction of the existing U.S. Route 31. Future conditions are expected to be similar to existing conditions (i.e. agricultural production, future population growth, and the expansion of Kokomo). Besides Corps authorized projects, other activities include maintenance of agricultural fields, city development, and parks and recreation development. Resulting natural resource changes and stresses include conversion of woods, streams and wetlands for agricultural and city development.
- (3) Mitigation and Monitoring. The project affects the following key issue(s):

Construction of the two crossings would result in the placement of fill into 3,167 linear feet of stream, 0.24 acre of open water and 0.58 acre of adjacent wetlands. The magnitude of the proposed effect is approximately 0.03% of the total wetland area within the watershed would be impacted by the proposed project. Avoidance and minimization methods include the preparation an Environmental Impact Statement that evaluated multiple alternative routes for the proposed new highway. Final design work further modified the project to limit the amount of fill being discharged to a "waters of the U.S." Avoidance and minimization resulted in the proposed impacts, compared with the other alignments and designs that had more than 4 acres of additional wetland impacts and 2,000 linear feet of additional stream impacts. Compensatory mitigation, namely the proposed wetland and stream monitoring described herein would result in the construction of 1.4 acres of forested wetlands adjacent to the Tudor Drain, construction of 2,240 linear feet of new stream channel, and preservation and stream enhancement along 1,032 linear feet of Kokomo Creek and Wildcat Creek. The proposed mitigation sites are part of larger mitigation sites designed to mitigate these impacts as well as those impacts associated with Phase II construction of U.S. Route 31 bypass, approved June 3, 2009 under LRL-2004-112-sam.

Expand this section commensurate with the level of impact and appropriate level of existing and reasonably foreseeable watershed stress to aquatic resources.

- f. Corps Wetland Policy. Based on the public interest review herein, the beneficial effects of the project outweigh the detrimental impacts of the project.
 - g. (NA) Water Quality Certification under Section 401 of the Clean Water Act has/has not yet been issued by /State/Commonwealth.
 - h. Coastal Zone Management (CZM) consistency/permit: Issuance of a State permit certifies that the project is consistent with the CZM plan. There is no evidence or indication that the project is inconsistent with their CZM plan.
 - i. Other authorizations.
 - j. (NA) Significant Issues of Overriding National Importance. *Explain.*
8. Compensation and other mitigation actions.
- a. Compensatory Mitigation
 - (1) Is compensatory mitigation required? yes no [If "no," do not complete the rest of this section]
 - (2) Is the impact in the service area of an approved mitigation bank? yes no
 - (i) Does the mitigation bank have appropriate number and resource type of

credits available? yes no

(3) Is the impact in the service area of an approved in-lieu fee program?
 yes no

(i) Does the in-lieu fee program have appropriate number and resource type of credits available? yes no

(4) Check the selected compensatory mitigation option(s):

mitigation bank credits

in-lieu fee program credits

permittee-responsible mitigation under a watershed approach

permittee-responsible mitigation, on-site and in-kind

permittee-responsible mitigation, off-site and out-of-kind

(5) If a selected compensatory mitigation option deviates from the order of the options presented in §332.3(b)(2)-(6), explain why the selected compensatory mitigation option is environmentally preferable. Address the criteria provided in §332.3(a)(1) (i.e., the likelihood for ecological success and sustainability, the location of the compensation site relative to the impact site and their significance within the watershed, and the costs of the compensatory mitigation project): The selected mitigation does not deviate from the order of options as presented in 33 CFR 332.3 (b)(2)-(6). There are no mitigation banks or in-lieu fee programs within 8-digit watershed. Additionally, a watershed management plan for the Wildcat Creek watershed has not been prepared. Permittee-responsible in-kind onsite stream mitigation was selected for impacts associated with the relocation of Kelly West Ditch. In-kind, offsite stream mitigation and out-of-kind, offsite wetland mitigation were selected due to the scope of the project and the availability of suitable areas for mitigation. The offsite wetland mitigation already has hydric soils present, receives hydrology from Tudor Drain and the surrounding overland surface flow, and is located adjacent to an existing wetland mitigation site. The development of a forested mitigation site adjacent to an existing mitigation site would create a larger forested wetland complex and would provide higher quality wetland and habitat with more functional values than the wetland that is proposed to be impacted. In a county dominated by agriculture, the forested wetland complex would provide important habitat for wildlife and provide critical water quality functions.

(6) Other Mitigative Actions: Additional mitigation measures are not required

9. General evaluation criteria under the public interest review. We considered the following within this document:

a. The relative extent of the public and private need for the proposed structure or work.

(e.g. Public benefits include employment opportunities and a potential increase in the local tax base. Private benefits include land use and economic return on the property; for transportation projects benefits include safety, capacity and congestion issues.)

Explain.

The proposed crossings would advance the U.S. 31 Bypass project, which is necessary to reduce congestion on arterial streets and improve safety. Future growth surveys indicate the continued growth of the community. Traffic studies indicate that many of the arterial roads are either failing or will be failing in the future when it comes to vehicle accidents. The proposed U.S. 31 Bypass would provide a four-lane highway around the eastern side of Kokomo, thereby removing traffic from already congested arterial streets.

- b. There are no unresolved conflicts as to resource use.
- c. The extent and permanence of the beneficial and/or detrimental effects, which the proposed work is likely to have on the public, and private uses to which the area is suited. Detrimental impacts are expected to be minimal although they would be permanent in the construction area. The beneficial effects associated with utilization of the property would be permanent. *Explain:* The proposed crossings are located adjacent to existing roadways. These areas would be converted to public highway. The proposed crossings include 0.58 acre of wetland, 0.24 acre of open water and 3,167 lf of stream impacts. To offset the wetland and stream losses, the applicant proposes to construct an offsite mitigation area, onsite stream enhancement, and offsite stream enhancement, restoration and preservation.

10. Determinations.

- a. Public Hearing Request: NA

I have reviewed and evaluated the requests for a public hearing. There is sufficient information available to evaluate the proposed project; therefore, the requests for a public hearing are denied.

- b. Section 176(c) of the Clean Air Act General Conformity Rule Review: The proposed permit action has been analyzed for conformity applicability pursuant to regulations implementing Section 176(c) of the Clean Air Act. It has been determined that the activities proposed under this permit will not exceed de minimis levels of direct or indirect emissions of a criteria pollutant or its precursors and are exempted by 40 CFR Part 93.153. Any later indirect emissions are generally not within the Corps' continuing program responsibility and generally cannot be practicably controlled by the Corps. For these reasons a conformity determination is not required for this permit action.
- c. Relevant Presidential Executive Orders.

- (1) EO 13175, Consultation with Indian Tribes, Alaska Natives, and Native

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Hawaiians. This action has no substantial direct effect on one or more Indian tribes. *Explain*, Received no response to the public notice from any Native American tribes. .

- (2) EO 11988, Floodplain Management. Not in a floodplain. (Alternatives to location within the floodplain, minimization, and compensation of the effects were considered above.)
- (3) EO 12898, Environmental Justice. In accordance with Title III of the Civil Right Act of 1964 and Executive Order 12898, it has been determined that the project would not directly or through contractual or other arrangements, use criteria, methods, or practices that discriminate on the basis of race, color, or national origin nor would it have a disproportionate effect on minority or low-income communities.
- (4) EO 13112, Invasive Species.
 There were no invasive species issues involved.
 The evaluation above included invasive species concerns in the analysis of impacts at the project site and associated compensatory mitigation projects.
 Through special conditions, the permittee will be required to control the introduction and spread of exotic species.
- (5) EO 13212 and 13302, Energy Supply and Availability. The project was not one that will increase the production, transmission, or conservation of energy, or strengthen pipeline safety. (The review was expedited and/or other actions were taken to the extent permitted by law and regulation to accelerate completion of this energy-related (including pipeline safety) project while maintaining safety, public health, and environmental protections.)

b. Finding of No Significant Impact (FONSI). Having reviewed the information provided by the applicant and all interested parties and an assessment of the environmental impacts, I find that this permit action will not have a significant impact on the quality of the human environment. Therefore, an Environmental Impact Statement will not be required.

c. Compliance with 404(b)(1) guidelines. NA

Having completed the evaluation in paragraph 5, I have determined that the proposed discharge complies/ does not comply with the 404(b)(1) guidelines.

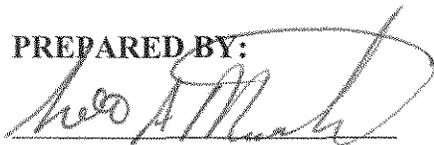
d. Public Interest Determination: I find that issuance of a Department of the Army permit is not/ is contrary to the public interest, if properly conditioned. Therefore, I have decided to issue the requested Department of the Army permit subject to all Standard Conditions and the following Special Conditions:

1. The permittee shall be responsible for constructing the following mitigation: 2,240

linear feet of new stream channel for the onsite relocation of Kelly West Ditch, construction of 1.4 acres of forested wetlands at the Tudor Drain mitigation site, and 1,032 linear feet of stream enhancement of preservation along Kokomo Creek and Wildcat Creek.

2. The permittee shall implement the mitigation according to the Stream Mitigation Proposal Sites #1 and #2, and the Wetland Mitigation Proposal, all dated January 9, 2009 as well as Stream Mitigation Proposal #3 dated October 2010. The stream and wetland mitigation shall be constructed within one year of the initiation of project construction.
3. The permittee shall monitor the mitigation sites annually for a period of five years. The permittee shall submit monitoring reports to the U.S. Army Corps of Engineers, Indianapolis Regulatory Office by December 31 every year of monitoring.
4. The permittee shall permanently protect the entire mitigation area through the implementation of the Corps approved deed restriction. A copy of the signed and recorded deed restriction for the mitigation area shall be submitted with the final monitoring report. The Corps shall be notified in writing prior to the transfer of the mitigation site to another entity or individual. Permanent protection shall transfer with the property.
5. The permittee shall limit tree clearing activities to only occur between October 1 and April 1 to avoid any impacts to the Indiana bat (*Myotis sodalis*).
6. The permittee's responsibility to complete the required compensatory mitigation as set forth in Special Condition 1 shall not be considered fulfilled until they have demonstrated compensatory mitigation project success and have received written verification of that success from the U.S. Army Corps of Engineers.

PREPARED BY:



Date: 3/16/11

Scott A. Matthews
Project Manager
Indianapolis Regulatory Office

APPROVED BY:



Date: 3/10/11

Greg McKay
Chief, North Section
Regulatory Branch