



Illinois Department of Natural Resources

One Natural Resources Way Springfield, Illinois 62702-1271
www.dnr.illinois.gov

Bruce Rauner, Governor

Wayne A. Rosenthal, Director

Authorization for Incidental Take and Implementing Agreement

Pursuant to the Illinois Endangered Species Protection Act (Act) (520 ILCS 10/5.5) and the regulations adopted to implement the Act (17 Ill. Adm. Code 1080), authorization is hereby granted to the Chicago, Central & Pacific Railroad Company (hereinafter referred to as CCPRC) for the incidental take of the State-endangered Blanding's turtle (*Emydoidea blandingii*). The Illinois Department of Natural Resources (hereinafter referred to as Department) has determined that the taking is incidental to activities associated with the replacement of the Freeport Railroad Bridge over an oxbow lake historically formed by the Kishwaukee River in Winnebago County, Illinois. The project is located within the Deer Run Forest Preserve, managed by the Winnebago County Forest Preserve District (informally known as Forest Preserves of Winnebago County, hereinafter referred to as FPWC).

Procedural History

The Department received a conservation plan prepared by the Illinois Natural History Survey on behalf of CCPRC on February 25, 2016, as a request for authorization for the incidental take of Blanding's turtles. The Department requested additional information on March 21, 2016, to make the conservation plan complete as prescribed by Ill. Adm. Code 1080.10. That additional information was received by the Department on June 29 and September 1, 2016. The public notice period will be detailed under #6 of the Compliance section below.

Compliance with the Illinois Endangered Species Protection Act

The Act includes six criteria that must be satisfied for the authorization of incidental take of an endangered or threatened species. These criteria and the Department's determination for each are listed below.

1. The taking will not be the purpose of, but will only be incidental to, the carrying out of an otherwise lawful activity:

The stated and apparent purpose of this proposed action is the replacement of the Freeport Railroad Bridge over an oxbow lake historically formed by the Kishwaukee River in Winnebago County, Illinois. Bridge replacement activities include removal of the existing bridge structure, replacing a ballast deck timber trestle with a precast concrete ballast deck supported on steel H-piles, and minor earthwork for abutment improvement and stabilization. A temporary structure will be constructed to facilitate construction activities and removed after construction completion. Proposed actions include driving approximately 45 permanent and 32 temporary steel H-piles into lake substrate. In order to facilitate construction, the current embankment will be widened by 25 feet, and a

5000 ft² staging area will be cleared for material and equipment storage on the bank. The area of temporary impact to suitable Blanding's turtle habitat is estimated to be 0.02 acre. The area of permanent impact to Blanding's turtle habitat is estimated to be 0.001 acre. Total area of impact to suitable Blanding's turtle habitat is estimated to be **0.021 acre**.

Take of Blanding's turtles could occur as a result of being crushed by heavy equipment, sedimentation within and downstream of the project site, and other temporary disturbances during construction. The take of Blanding's turtles that could result from this project is not the purpose of CCPRC's activities, but is incidental to the carrying out of an otherwise lawful activity.

2. The parties to the conservation plan will, to the maximum extent practicable, minimize and mitigate the impact caused by the taking:

Proposed minimization and mitigation measures were included in CCPRC's conservation plan.

To meet the "maximum extent practicable" standard, additional minimization and/or mitigation measures may be required beyond those proposed by CCPRC, based on the life history needs of the Blanding's turtle. **All required minimization and mitigation measures are presented under the Authorization section below.**

3. The parties to the conservation plan will ensure that adequate funding for the conservation plan will be provided:

CCPRC states that they will be fully responsible for establishing and managing the financial assurance of the restoration, monitoring, and mitigation of the project area. Prior to the start of construction, CCPRC will provide a lump sum payment in full to FPWC to cover restoration management, monitoring, and mitigation measures. CCPRC understands that if any additional activities are planned at the facility that may affect Blanding's turtles, or other endangered or threatened species, coordination with the Department will be required.

4. Based on the best available scientific data, the Department has determined that the taking will not reduce the likelihood of survival or recovery of the endangered species or threatened species in the wild within the State of Illinois, the biotic community of which the species is a part, or the habitat essential to the species' existence in Illinois:

The **Blanding's turtle** is an Illinois State-endangered semi-aquatic turtle species. They can be found in water bodies such as creeks, marshes, and ponds that are adjacent to sandy upland areas. They spend most of their time in water, though they are known to sometimes leave the water to travel between ponds and for females to lay eggs. Blanding's turtles enter a period of dormancy during the winter, during which they remain buried in the muddy bottoms of deep marshes, backwater pools, and streams.

Blanding's turtles are long-lived, not reaching sexual maturity until 14-20 years of age. Mating likely occurs in April or early May, and nesting takes place from early June to early July. Eggs are typically laid in well-drained, sandy soil in a sunny upland area, and females may travel up to a mile over land to their nesting location. Clutch sizes are varied, ranging from 10-26 eggs per nest, and females only lay one clutch of eggs per year. Since nests are typically far from water, hatchlings must travel long distances after emerging from their nest, subjecting them to increased threat of predation, road mortality, and desiccation.

The decline of Blanding's turtle populations can be largely attributed to habitat loss and degradation, road and railroad mortality, and nest predation. With high levels of egg and juvenile mortality and low reproductive potential, Blanding's turtle populations have had difficulty recovering. There are several captive breeding programs for this species in Illinois making efforts to supplement the wild populations. Blanding's turtles are most often found in northern Illinois and sporadically found throughout the central part of the state. There are currently 89 extant Element Occurrence Records for Blanding's turtles in the Illinois Natural Heritage Database, located in 19 of 102 counties. The Department has 18 previously issued or pending Incidental Take Authorizations for Blanding's turtles. Previous projects included residential or commercial developments, highway and bridge construction, wind energy facilities, the construction of an athletic field, and the construction and maintenance of electrical lines. Mitigation actions required in previous authorizations included habitat restoration and management, the construction of artificial nesting berms, the placement of critical habitat into conservation easements, and monetary support of future Blanding's turtle research and habitat restoration. This is the first authorization granted for Blanding's turtles in Winnebago County.

In June 2015, personnel from the Illinois Natural History Survey conducted a survey for Blanding's turtles in the project area. No Blanding's turtles were captured in 52 trap-nights of sampling, but one adult Blanding's turtle was observed approximately 600 meters south-southwest of the impact area. The Illinois Natural Heritage Database contains records for Blanding's turtles both north and south of the bridge location suggesting there may be movement of individuals under the bridge.

Based on the amount of habitat impacted by this project, the number of known occurrences of the Blanding's turtle in Illinois, an assessment of the potential effect of this project on individual turtles in the project footprint, and the conservation measures included in this authorization for incidental take, the Department has concluded that the taking proposed herein will not reduce the likelihood of survival or recovery of the Blanding's turtle in the wild within the State of Illinois, the biotic community of which the species is a part, or the habitat essential to the species' existence in Illinois.

5. Any measures required under Section 5.5(b)(6) of the Act will be performed:

These measures are listed below under "Authorization." This authorization is, by definition, subject to those terms and conditions and the signature of a representative of CCPRC indicates their commitment to performing those measures.

6. The public has received notice of the application and has had the opportunity to comment before the Department made any decision regarding the application:

Public notice of CCPRC's request for authorization of incidental take was published in the *Breeze Courier* (official state newspaper) on September 8, 2016, and in the *Rockford Register* on September 8, 15, and 22, 2016. A copy of the conservation plan was deposited at the Cherry Valley Public Library District, where it was available for public review. The deadline for public comment was October 24, 2016. No comments were received from the public.

Authorization

It is the determination of the Department that the measures that will be implemented by CCPRC will adequately minimize and mitigate the anticipated taking of Blanding's turtle incidental to activities associated with the replacement of the Freeport Railroad Bridge over an oxbow lake historically formed by the Kishwaukee River in Winnebago County, Illinois. Further, the Department has concluded that the take authorized herein will not reduce the likelihood of survival or recovery of the Blanding's turtle in the wild within the State of Illinois, the biotic community of which the species is a part, or the habitat essential to the species' existence in Illinois.

All terms and conditions included in the aforementioned conservation plan submitted by CCPRC to the Department are incorporated into this agreement by reference and are made a part thereof.

Pursuant to Section 5.5 of the Illinois Endangered Species Protection Act [520 ILCS 10/5.5] and the Administrative Rules for the Incidental Taking of Endangered and Threatened Species [Ill. Adm. Code 1080.40(b)], this authorization is issued subject to the following terms and conditions, which may include additions or modifications to the minimization and mitigation measures proposed by CCPRC in the conservation plan:

1. This authorization is effective upon the signature of the Department and shall remain in effect for a period of **five (5) years** from the date of the Department signature, unless terminated by written agreement of both parties.

This authorization may be revoked pursuant to the Act and Ill. Adm. Code 1080.80(b) if the Department finds that CCPRC has failed to comply with any of these terms and conditions or has been responsible for the taking of Blanding's turtles beyond that which is incidental to activities associated with the replacement of the Freeport Railroad Bridge

over an oxbow lake historically formed by the Kishwaukee River in Winnebago County, Illinois.

2. The effective period of this authorization may be altered by mutual written agreement between CCPRC and the Department. The Illinois Endangered Species Protection Board shall be notified of any such alteration.

Any substantive changes, including but not limited to a change in the project footprint or a change in the State-listed species which could potentially be affected, will require that a new conservation plan be submitted to the Department to initiate the review and public notice process as required by the Act.

3. This authorization is non-transferable.
4. All personnel working in the vicinity of the project shall receive educational materials including species identification information, protected status of the species, and response protocol in place when Blanding's turtles are encountered, living or dead. A copy of the educational flyer shall be provided to the Department.
5. The Department reserves the right of entry by its staff or representatives to inspect species, potential habitat, and species management practices.
6. Biological consultants employed by CCPRC and/or staff of the FPWC shall hold the necessary permits for work with non-listed and listed species; these include an Illinois Department of Natural Resources (IDNR) Scientific Collection Permit and an IDNR Endangered Species Permit.
7. The Department shall be informed of any State-listed species sighting and provided location information (photograph, map, and GPS coordinates) within 48 hours of such sighting. The Department shall be notified immediately of the discovery of dead specimens and will provide guidance on preservation and disposition.
8. CCPRC shall notify the Department of the commencement and completion of the replacement of the Freeport Railroad Bridge. A project status report shall be submitted to the Department by January 1 following completion summarizing the implementation of minimization, mitigation, and restoration measures and evaluating the effectiveness of those measures and shall include a project photo log. The report shall also include a map and GPS coordinates of any listed species found within the project footprint including any relocations, description of any injuries or mortalities, and the disposition of any individuals that were injured or killed.

9. CCPRC shall conduct, or cause to be conducted, the following pre-construction or construction efforts:
 - a. Silt fencing shall be installed surrounding the construction area to prevent silt from entering the wetland and to exclude Blanding's turtles from the construction area. Fencing shall be inspected daily and regularly maintained.
 - b. Before and during silt fence placement, FPWC staff shall inspect the area for Blanding's turtles. During construction, the work site will be intermittently monitored for the species. Any Blanding's turtles found within or near the construction site shall be relocated to suitable habitat by permitted FPWC staff.
 - c. Erosion and sediment control measures shall be implemented in all areas affected by riparian activities. Disturbance of vegetation shall be minimized to prevent erosion and sedimentation. All disturbed areas shall be seeded or otherwise stabilized upon completion of construction activities.
 - d. Access to and from the construction site for all equipment, material, and construction personnel shall be via the existing railroad tracks. In the event that a vehicle cannot travel by rail, the vehicle shall be escorted by either CCPRC or FPWC staff walking in front of the vehicle to ensure no Blanding's turtle mortality.
 - e. The current timber-decked bridge shall be disassembled piece by piece and removed from the site to prevent the material from falling into the wetland.
 - f. All temporary fill and construction debris shall be removed from the site, along with the temporary bridge. No construction debris shall be placed in the wetland.
 - g. Once construction is complete, the site shall be regraded to pre-construction contours. All erosive substrates shall be stabilized through seeding or rip-rap.
10. CCPRC shall conduct, or cause to be conducted, post-construction monitoring efforts for Blanding's turtles on a monthly basis from April to October for the first two years following construction completion. FPWC shall provide reports to CCPRC. CCPRC shall compile results and submit them to the Department by January 1 of Year 1 and Year 2 following construction completion.

Between May 1 and July 1, during Year 2 following construction, CCPRC shall conduct, or cause to be conducted, a post-construction survey effort utilizing traps similar in scope to the pre-construction survey effort. A report containing methods, results, and discussions including maps and photos shall be provided to the Department within 90 days of completion of the survey effort.

11. Mitigation to the maximum extent practicable is required by the Act. Mitigation requirements for this authorization are described as follows:
 - a. Following construction completion, CCPRC shall convert 0.072 acre of the construction material storage area to native short-grass prairie habitat suitable for the Blanding's turtle. CCPRC will provide the labor required for this conversion valued at \$3,500.00. An additional \$600.00 shall be provided to FPWC for seeding and maintenance of the mitigation area.

- b. CCPRC will provide \$5,500.00 to FPWC to be used to purchase tracking equipment for Blanding's turtles in order to monitor the habitat use and facilitate further research on the population within the forest preserve. The donation shall also be used to purchase and erect interpretive and educational site/trail signage related to Blanding's turtle populations, habitats, and research.

Total conservation benefit to the species provided by mitigation is valued at **\$9,600.00**.

Mitigation valuations are based on the Department's best current understanding of the species life history needs, real estate values, and impact analysis relevant to the site's proposed conceptual design elements available at the time of review.

12. All reports, notifications, and other project documentation shall be submitted to:

Illinois Department of Natural Resources
Office of Resource Conservation
Endangered Species Program – Incidental Take Authorization Coordinator
One Natural Resource Way
Springfield, IL 62702-1271

(217)557-8243

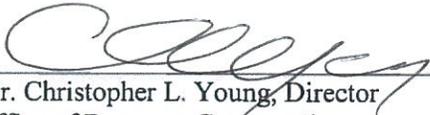
DNR.ITAcordinator@illinois.gov

The Department's Endangered Species Program shall provide all reports required under this agreement to the Illinois Endangered Species Protection Board and to the Department's Natural Heritage Database.

13. The CCPRC official identified below is authorized to execute this agreement. Execution by CCPRC indicates acceptance of all terms and conditions described in this authorization.
14. The execution of this agreement does not waive or excuse the responsibilities of CCPRC to comply with other Federal, State, or local regulations, including but not limited to obtaining any required permits for the execution of this project.

For the Illinois Department of Natural Resources:

For the Chicago, Central & Pacific Railroad Company:



Mr. Christopher L. Young, Director
Office of Resource Conservation



Mr. Alan S. Craine
Senior Manager, Structures

1/5/17

Date

1/4/17

Date