REEVALUATION of the PROGRAMMATIC BIOLOGICAL ASSESSMENT

for the

NEBRASKA BIOLOGICAL EVALUATION PROCESS

Prepared in support of the Programmatic Agreement between

Federal Highway Administration, Nebraska Division
Nebraska Department of Roads
US Fish and Wildlife Service
Nebraska Game and Parks Commission

2 December 2016

The Federal Highway Administration (FHWA) and the Nebraska Department of Roads (NDOR) are reevaluating the Programmatic Biological Assessment (PBA) for the Nebraska Biological Evaluation Process (Process) because five years have passed since the implementation of the Process and the associated Programmatic Agreement (PA), which expires in January 2017, is being considered for renewal. The PBA is the evaluation that documents the overall assessment of the potential effects to state and federally listed species within Nebraska from use of the Process, associated tools, and the implementation of the PA. This document is a reevaluation of the original PBA, which was submitted to the agencies on January 9, 2012, and concurred upon, by US Fish and Wildlife Service (USFWS) and Nebraska Game and Parks Commission (NGPC) on February 3, 2012 and February 6, 2012, respectively.

Background

The Process, and its supporting documents and tools, were prepared through over 30 interagency consultation meetings between FHWA, NDOR, USFWS, and NGPC. The tools that these agencies jointly developed were based on consideration of the life histories and ranges of the state and federally listed Endangered and Threatened species (E&T species) within Nebraska, federally designated critical habitat, known observation of the protected species (Natural Heritage Database records), potential impacts of construction from NDOR activities, and standardized reasonable conservation measures that would be implemented into a construction project in order to avoid and minimize potential impacts.

The Process was implemented by the signatory agencies as a pilot program between June 2009 to December 2011 with over 200 projects cleared through the streamlined process. The Process was fully implemented by the signatory agencies in January 2012, in accordance with a PA among the signatory agencies. Since that time, the signatory agencies have met annually to audit a random sample of projects reviewed using the Process and address any issues and changes that needed to be made based on the results of the audit. The PA expires in January 2017; therefore, the signatory agencies met in 2016 and reviewed the PA and the Process to address any updates and changes identified over the past five years.

Summary of Changes and Updates to the PA and the Process

<u>Changes to the PA</u>

The signatory agencies met in 2016, beginning in August, to review the PA stipulations and update, as needed. After review of the PA, it was determined that Section I(A) required additions. Based on the experience of the signatory agencies since the implementation of the Process, the following activities have been added under Section I(A) as exclusions to the Process with a *No Effect* determination categorically made for these activities (assuming no rare or unusual circumstances):

- Statewide pavement marking
- Statewide rumble strip, stripe, and bar installation
- Statewide installation or improvements to auto gates, cameras, and dynamic message signs (DMS), provided all work and trenching occur within the roadway hinge point.
- Statewide survey and staking
- Driving surface restoration/resurfacing activities occurring within the existing confines of the roadway and shoulders that is entirely within urbanized areas. This includes, but is not limited to: Armor coat, crack seal, fog seal, joint seal, milling and inlay, concrete

repair, joint repair, and paving existing shoulders. For roadway restoration/resurfacing activities that include bridge structures within the project limits, only bridge deck pavement restoration/resurfacing and rail removal/replacement is allowed with this programmatic "no effect" determination
- Curb work, sidewalk installation or repair, bike lane installation or repair, and multi-use pathway installation or repairs occurring entirely within urbanized areas
- Landscaping within urbanized areas
- Installation, repair or replacement of traffic signals, railroad crossing signals and lighting (including trenching or boring for utility connection) that occur entirely within urbanized areas

Several minor editorial changes were made to the PA, as well as the decision to audit a random sample of projects biennially, rather than annually.

Changes to the Process

Over the past five years, the signatory agencies have met annually to review the Process and make changes, as identified. The following changes have occurred:

- Language changes were made to the Sources of Impacts Definitions, Species Evaluation Parameters Form (SEP), Federal and State Listed Species Conservation Conditions (CCs), and the Overview of Effects and Required Conservation Conditions Form (OERCC) for clarification.
- Updates to the CCs, Effect Analysis Tables and the Federal Species Matrix and State Species Matrix (Matrix) were made as new information was received regarding American burying beetle and whooping crane.
- Activities were revised or deleted from the Checklist of NDOR Activities/Sources of Impacts. Updated species survey protocols were added or replaced outdated protocols.

In 2015, two new species, northern long-eared bat (*Myotis septentrionalis*) and rufa red knot (*Calidris canutus rufa*), were federally and state listed as threatened. These species were added to the Process when they were identified as candidate species for listing. Suitable habitat was identified for these species and appropriate questions were developed to be added to the SEP. Activities were reviewed and effect determinations made and added to the Matrix by the signatory agencies. Species specific conservation conditions were developed based on best available scientific information and the final 4(d) rule for northern long-eared bat and added to the CCs document in the Process. No conservation conditions were developed for rufa red knot because there is no known permanently occupied or breeding habitat for this species in Nebraska and this species is considered a casual migrant in the state, meaning they do not occur every year, rarely in large numbers, and typically are only observed in one location for less than 24-hours, as they migrate quickly from wintering habitats to breeding sites. Additionally, according to USFWS and NGPC, Nebraska does not provide an important stopover or migratory path for this species because it is located on the edge of the species migratory range.

Endanger and Threatened Species Review

FHWA and NDOR have conducted a review of the changes to the PA and the Process to determine if there is a change in the original affect determination concurred upon by the USFWS and NGPC for endangered and threatened species. This was done using Species

Evaluation Parameters and review of the changes to the PA and the Process. The species evaluated are those federal and state listed species in Nebraska. As of the date of this document, the species are those listed in Table 1.

Table 1
Nebraska E&T Species

Common Name	Scientific Name	Federal Status	State Status
American burying beetle	*Nicrophorus americanus*	Endangered	Endangered
American ginseng	*Panax quinquefolius*	--	Threatened
Black-footed ferret	*Mustela nigripes*	Endangered	Endangered
Blacknose shiner	*Notropis heterolepis*	--	Endangered
Blowout penstemon	*Penstemon haydenii*	Endangered	Endangered
Colorado butterfly plant	*Gaura neomexicana coloradensis*	Threatened	Endangered
Eskimo curlew	*Numenius borealis*	Endangered	Endangered
Finescale dace	*Phoxinus neogaeus*	--	Threatened
Gray wolf	*Canus lupus*	Endangered	Endangered
Interior least tern**	*Sternula antillarum athalassos*	Endangered	Endangered
Lake sturgeon	*Acipenser fulvescens*	--	Threatened
Massasauga	*Sistrurus catenatus*	--	Threatened
Mountain plover	*Charadrius montanus*	--	Threatened
Northern Long-eared bat	*Myotis septentrionalis*	Threatened	Threatened
Northern redbelly dace	*Phoxinus eos*	--	Threatened
Pallid sturgeon**	*Scaphirhynchus albus*	Endangered	Endangered
Piping plover**	*Charadrius melodus*	Threatened	Threatened
River otter	*Lutra Canadensis*	--	Threatened
Rufa red knot	*Calidris canutus rufa*	Threatened	Threatened
Salt Creek tiger beetle*	*Cicindela nevadica lincolniana*	Endangered	Endangered
Saltwort	*Salicornia rubra*	--	Endangered
Scaleshell mussel	*Leptodea leptodon*	Endangered	Endangered
Small white lady's slipper	*Cypripedium candidum*	--	Threatened
Southern flying squirrel	*Glaucomys volans*	--	Threatened
Sturgeon chub	*Macrhybopsis gelida*	--	Endangered
Swift fox	*Vulpes velox*	--	Endangered
Topeka shiner*	*Notropis topeka*	Endangered	Endangered
Ute ladies'-tresses	*Spiranthes diluvialis*	Threatened	Threatened
Western prairie fringed orchid**	*Platanthera praeclara*	Threatened	Threatened
Whooping crane* **	*Grus americana*	Endangered	Endangered

**Critical habitat also listed for this species.*
** Platte River species

Program Level Impact Evaluation of Process Implementation

As outlined in the original PBA, the conservation conditions developed as part of the Process follow a multi-tier approach. Since the original implementation of the Process in 2012, new conditions have been added to the (1) general conservation conditions that apply to all projects; (2) general conservation conditions for specific impacts/activities, as applicable; (3) conservation conditions that apply within the range of specific species; and (3) conservation conditions that apply according to the affect determinations in the Matrix. The addition of these conservation conditions further cover possible construction-related actions that might occur and put programmatic conditions in place to address these actions or new listed species. With the

inclusion of these updated conditions, the Process has continued to reduce the impacts of possible construction actions to a discountable level.

Proper implementation of the PA prevents adverse effects to species and designated critical habitat. Annual reviews of the Process have ensured that the commitments made in the PA are being implemented properly. These reviews have also verified that unanticipated impacts to species have not occurred through use of the Program.

Over the past five years, approximately 532 projects have been reviewed through the Process. Approximately 22% of these projects required individual consultation with the agencies due the Matrix identifying a "May Affect" determination for a species/critical habitat and less than 3% of these projects resulted in implementation of specially developed conservation conditions outside those available in the Process tools. No formal consultations were required during the past five years. This information indicates both that the tools are functioning as intended and the overall federal-aid transportation program continues to have a minimal impact to listed species/critical habitat.

The implementation of the PA, the general conservation conditions, and the general conditions that apply within certain species ranges act together to avoid and minimize species impacts on a program level. Based on the findings of the past five years of annual reviews, the implementation of the Process has not created cumulative or direct impact concerns at a program level.

Species Level Impact Evaluation of Process Implementation

This section summarizes the Program's impact to Nebraska E & T species by grouping like species into one assessment and assessing changes that have occurred to the PA and the Process. The species are grouped by aquatic species, plants, mammals, reptiles, birds, and insects.

AQUATIC SPECIES (FISH and MUSSEL)
Transportation projects may degrade water quality through roadway runoff or construction-related sedimentation/erosion. Bridge and culvert construction or rehabilitation efforts may affect aquatic species by impeding movement or altering stream flow. Continued proper implementation of the conservation conditions and NDOR Policies makes the risk of impacts to species, habitat, or water quality negligible and/or discountable. Through continued application of Clean Water Act Section 404 and 401 permitting requirements and implementation of Stormwater Pollution Prevention Plan (SWPPP) requirements, these types of effects to aquatic species are avoided, with the residual level of impact so low it cannot be measured.

Activities with a greater potential to impact aquatic species, such as channelization, bank stabilization, and work within channels, are still identified in the Matrix as "May Affect" activities and are addressed through project-specific consultation with the resource agencies.
When reviewing data from the past five years of project reviews, a very small percentage of transportation projects occur within suitable habitat or created actions that would potentially impact aquatic species. For example, only 14 of the 532 projects (approximately 2%) reviewed required further consultation with agencies because they were within suitable aquatic species habitat. Based on the annual review of the projects over the past five years, cumulative effects to aquatic species were not identified.

These factors demonstrate that the continued implementation of the Program may affect, but is not likely to adversely affect the listed aquatic species in Nebraska.

PLANTS

Transportation projects may directly impact plant species by harm to individual plants or the indirect modification of suitable habitat during construction through land use changes, ground disturbance, soil contamination, introduction of nonnative invasive plant species, and changes to the hydrology of an area. NDOR Policies and state laws require hydrologic studies and avoidance of substantial hydrologic changes during the design process. General conservation conditions implemented through the Process and the SWPPP requirements avoid soil contamination and introduction of nonnative invasive plant species. Direct mortality impacts to listed plants are avoided by implementation of Matrix conservation conditions requiring a survey to be conducted prior to ground disturbance activities in suitable habitat. If survey results are positive, further consultation is required. Surveying, documenting presence/absence, and consultation when presence is documented results in a negligible risk of impacts to individual plants.

When reviewing data from the past five years of project reviews, only 7 out of 532 projects required Individual Project Level Evaluation beyond the Matrix and of those 7, only 2 projects (less than 1% of all projects) identified protected species growing within the project limits. Impacts were avoided through development of specialized conservation conditions with agency consultation. The majority of transportation projects over the past five years within suitable plant habitat have been primarily asset preservation type projects. Based on a review of the past five years of projects, direct impacts, indirect impacts, and cumulative effects to plants were not identified.

These factors demonstrate that the continued implementation of the Program may affect, but is not likely to adversely affect the listed plant species in Nebraska.

MAMMALS

Transportation projects have the potential to directly impact mammals through mortality, or impacts to breeding, feeding, and sheltering. Indirect impacts may include modification of suitable habitat during construction through land use changes, impeding movements, modification of behavior, fragmentation of habitat, and hydrologic changes. Due to NDOR policies and state laws, hydrologic studies occur during the design process and substantial hydrologic changes are avoided. Direct impacts to listed mammals (other than ferrets and wolves) are avoided because the Matrix conservation conditions either require work outside of a species specific breeding season (bats summer maternity season) or a survey be conducted when ground disturbance or bridge work would occur within suitable habitat. If survey results are positive and presence is identified, further consultation is required prior to beginning construction. Avoiding critical breeding seasons, surveying, documenting presence/absence, and consultation when the species is present results in a negligible risk of impacts to individual mammals.

When going through the Process, actions with a greater potential to impact mammals, such as habitat fragmentation and activities that create barriers to movement, are identified as a “may affect” and are addressed through a project-specific consultation with the resource agencies. The activity of grading outside the hinge point originally required project-specific consultation for mammal species; however, after working through several projects requiring further consultation due to this activity, it was determined that survey for the species prior to ground disturbance

would sufficiently avoid adverse effects to all mammal species from this activity and it was downgraded in the Matrix to reflect this decision.

The black-footed ferret and gray wolf have no known permanently occupied or seasonally occupied habitats in Nebraska. Black-footed ferret historically occurred in large prairie dog towns; however, it is believed to be extirpated from the state of Nebraska. Adverse program affects to black-footed ferret are not anticipated because consultation is required if project activities occur within 5-miles of a current record of ferrets in the state and in an area of suitable habitat (large prairie dog complex). The main concern for the black-footed ferret is the destruction or fragmentation of potential reintroduction sites. Adverse program affects to gray wolf are not anticipated due to the extensive home range and transient nature of this species. Due to the linear nature of transportation projects, the main concern for adverse effects to the gray wolf is habitat fragmentation caused by new roadway corridors or the widening of existing roadways within their range. Any transportation actions that could lead to habitat fragmentation have been designated as “may affect,” requiring consultation.

When conducting annual reviews over the past five years, a higher than expected proportion of projects were originally determined Not Likely to Adversely Affect with the implementation of conservation conditions for river otter, based on the vague nature of the habitat question. The majority of these projects were asset preservation type projects; therefore, even though the frequency of river otter assessments was high, the actual impacts to river otter were low. After adjusting the habitat question to specify “within the range of the species,” this number of projects were decreased.

Based on the annual review of the projects over the past five years and updates to the Process documents to account for northern long-eared bat, direct impacts, indirect impacts and cumulative effects to mammals were not identified.

These factors demonstrate that the continued implementation of the Program may affect, but is not likely to adversely affect the listed mammal species in Nebraska.

<u>REPTILES (Massasauga)</u>
Transportation projects may directly impact massasauga through mortality of individuals, or impacts to breeding, feeding, and sheltering. Indirect impacts may include modification of suitable habitat during construction through land use changes, changes in hydrology, and impeding seasonal movement. Direct impacts to massasauga are avoided because the Matrix conservation conditions require a survey be conducted when ground disturbance would occur within suitable habitat prior to construction. If survey results indicate presence then further consultation is required. Projects within suitable massasauga habitat include additional conditions to modify erosion control strategies, and requirements for construction personnel to avoid harming snakes. Surveying for these species, requiring avoidance of snakes, and modifying erosion control practices reduce the risk of impacts to individuals. When going through the Process, actions with a greater potential to impact massasauga, such as activities that fragment habitat or directly take species are identified as a “may affect” determination and are addressed through a project-specific consultation with the resource agencies.

When reviewing projects over the past five years, very few projects occur within suitable habitat for massasauga. All of the projects located within suitable habitat were asset preservation type projects and no adverse impacts were documented from these activities. Based on review of these projects, no cumulative effects were identified.

These factors demonstrate that the continued implementation of the Program may affect, but is not likely to adversely affect massasauga in Nebraska.

BIRDS

Most of the listed bird species in Nebraska are closely tied to aquatic systems. Transportation projects can impact these aquatic-reliant species through harassment during construction activities, degradation of water quality due to roadway runoff, construction-related sedimentation/erosion, and changes in flow regimes. Impacts to upland nesting birds can result from direct mortality of individuals, or impacts to breeding, feeding, and sheltering. Indirect impacts may include modification of suitable habitat during construction through land use changes and changes in hydrology. Through application of Clean Water Act Section 404 and 401 permitting requirements, and implementation of SWPPP requirements, these types of effects to aquatic bird species are avoided, with the residual level of impact so low it cannot be measured.

When going through the Process, actions with a greater potential to impact bird species, such as channelization activities, bank stabilization, habitat fragmentation and work within channels, are identified as a “may affect” determination and are addressed through a project-specific consultation with the resource agencies. The activity of grading outside the hinge point originally required project-specific consultation for aquatic-reliant bird species; however, after working through several projects requiring further consultation due to this activity, it was determined that survey for the species prior to ground disturbance within suitable riverine habitat would sufficiently avoid adverse effects to these bird species from this activity and it was downgraded in the Matrix to reflect this decision. For most other activities, the conservation conditions are either to avoid the bird nesting or migration seasons, or follow survey protocols to determine if the species is present within the project area. If the species is present, consultation occurs and any activities with potential to disturb the species are halted until consultation is complete.

Eskimo curlew and rufa red knot have no known permanently occupied or seasonally occupied habitats in Nebraska. No sightings of eskimo curlew have been recorded in the Nebraska Natural Heritage Database since 1975 and this species is likely extinct throughout its range. Rufa red knot is a rare casual migrant in the State of Nebraska. This species typically migrates through very quickly and does not spend more than 24-hours in any one location. Impacts from transportation projects would be similar to those for other migrating aquatic-reliant bird species. Adverse program affects to either of these species are not anticipated due to the rare occurrence and transient nature of both of these species in Nebraska. If new information becomes available regarding species status, the Process will be reviewed and modified as necessary.

When reviewing the data from the past five years of project reviews, interior least terns, piping plovers, and whooping cranes were identified frequently for potential impacts because many roadways are close to, or cross, waterways. In addition, whooping cranes were identified frequently due to the large size of their migration corridor and the generalist nature of their use of stopover habitat. Based on best available science, the habitat question for whooping crane was revised over the past five years to better capture suitable stopover habitat. Because conservation conditions focus on avoidance of species when present, the potential for impacts on these types of projects are negligible. Since a main avoidance strategy involves following survey protocols prior to construction, survey protocol methodology was reviewed to determine

if the repetitive implementation of the protocol could impact these species. Because these surveys focus on visual searches for species, the potential to habituate birds to call surveys is non-existent. There is a slight potential for the visual presence of a person to flush a listed bird; however, best available science has demonstrated that interior least terns and piping plovers are very adaptable to human developments (such as sand and gravel mines and lakeshore housing developments) and have a high tolerance for human presence. Furthermore, requiring survey personnel to minimize visual and noise disturbances as part of the protocols reduces the potential to impact the listed bird species. Therefore, based on a review of the projects over the past five years, cumulative effects to these bird species from implementation of the Process were determined to be insignificant.

These factors demonstrate that the continued implementation of the Program may affect, but is not likely to adversely affect listed birds in Nebraska.

INSECTS

Transportation projects could cause direct mortality to individuals during construction or the indirect modification of suitable habitat to listed insect species through land use changes, ground disturbance, soil contamination, changes in soil character, and changes to the hydrologic regime of an area. Due to NDOR policies and state laws, hydrologic studies occur during the design process and substantial hydrologic changes are avoided. In addition, there are general conservation conditions implemented through the Process and SWPPP requirements to avoid soil contamination.

Direct impacts to American burying beetle are avoided through the implementation of mowing and carrion removal to make the active construction limits less attractive to this species. Originally, implemented protocol required trapping and relocating beetles from the construction area, but recent research found this method to potentially cause adverse impacts to the species; therefore, the use of this protocol was discontinued. Other recent research found that beetles preferred moist soils with suitable carrion present. By mowing and removal of carrion, the exposed soil dries to a level that is unsuitable for burial and the lack of carrion makes the construction zone less attractive to beetles looking for locations to bury. When reviewing data from the last five years, initially a high percentage of projects did occur within American burying beetle habitat that required further consultation, due to the large range of this species within the state; however, conservation conditions were revised to focus on avoiding impacts to the species. Additionally, the majority of projects are asset preservation type projects that have minimal amounts of soil disturbance, decreasing the chances of impacting this soil-dependent species.

For the Salt Creek tiger beetle and designated critical habitat, most project activities result in a “may affect” determination and require project consultation, because of the small amount and very localized nature of suitable habitat remaining and limited number of individuals remaining in the wild. When reviewing the data from the last five years, none of the transportation projects occurred within suitable Salt Creek tiger beetle habitat or critical habitat. Any projects that were located adjacent to suitable habitat had specially developed conservation conditions to avoid impacts to the species and the associated habitat.

Therefore, based on a review of the past five years of projects and changes in conservation conditions to better meet the needs of the species based on best available science, direct impacts, indirect impacts and cumulative effects to insect species were not identified.

These factors demonstrate that the continued implementation of the Program may affect, but is not likely to adversely affect listed insects in Nebraska.

Summary Determination for all Nebraska E & T Species

Implementation of the updated PA and use of the updated Nebraska Biological Evaluation Process May Affect, but is Not Likely to Adversely Affect federal and state listed endangered, threatened, and proposed species in Nebraska and their habitats.

The following agencies have reviewed this document, and agree with the recommended effect determinations:

For Nebraska Department of Roads

Signature	Printed Name	Title	Date
Melissa Marinovich	Melissa Marinovich	Hwy Biologist	12/14/16

For Federal Highway Administration

Signature	Printed Name	Title	Date
Scott H. Stapp	Scott H. Stapp	Digitally signed by Scott H. Stapp DN: cn=Scott H. Stapp, o=FHWA-NE, ou=Nebraska Division, email=scott.stapp@dot.gov, c=US Date: 2016.12.29 13:43:56 -06'00'	

AMERICAN BURYING BEETLE

Nicrophorus americanus
Federal Status: Endangered
Nebraska Status: Endangered

Photo by Doug Backlund

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since this species does not permanently occupy these locations and there are no elements of suitable habitat in these locations, there will be ***no effect*** on the species.	These activities occur in paved areas, areas previously disturbed by other activities related to the construction project, and generally in locations that do not support suitable habitat for the American Burying Beetle which are found in areas with little human development in prairie, forest edge and scrubland near Gothenburg, Brady, North Platte and the north-central grasslands of Nebraska. Since the species does not occur in the location of the activities, there will be ***no effect*** on the species.	Construction activities could impact the species through directly harming the animal, disturbing occupied or suitable habitat, or indirectly modifying habitat. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 2).	These bridge activities could result in materials falling from the bridge deck and debris removal which would impact the American Burying Beetle through directly harming the animal, disturbing occupied or suitable habitat, or indirectly modifying habitat. With implementation of the conservation condition, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 3)	Roadway lighting or night-time work with lights could disrupt nighttime activity of the American Burying Beetle by modifying breeding and/or foraging behaviors. With implementation of the conservation conditions, this activity ***may affect, but is not likely to adversely affect*** the species. (see Conservation Condition 4).	These activities ***may affect*** the species due to habitat modifications, direct takings, and/or habitat fragmentation and require consultation.
Asphalt Patching	NE	Ø					
Bank Stabilization	MA						
Barge Staging	NE		Ø				
Bridge Deck Repair	NE	Ø					
Bridge Deck Replacement	NLAA CC [3]						
Bridge Painting	NE	Ø					
Bridge Rail Repair/Replacement	NLAA CC [3]						
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC [2]			*			
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC [2]			*			
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA CC [2]			*			
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC [3]						
Bridge Superstructure New & Replacement - Intermittent	NLAA CC [3]						
Bridge Superstructure New & Replacement - Perennial	NLAA CC [3]						
Channel Grade Stabilization Structures	MA						
Channelization, Ephemeral	MA						
Channelization, Intermittent	MA						
Channelization, Perennial	MA						
Clearing and Grubbing--Non-woody Vegetation	NLAA CC [2]			*			
Clearing and Grubbing--Trees & Shrubs	NLAA CC [2]			*			
Cofferdams	NE	Ø					
Concrete Pavement Repair	NE	Ø					
Crack Sealing and Joint Sealing	NE	Ø					
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA CC [2]			*			
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA CC [2]			*			
Culvert New, Replacement, Extension, Repair - Perennial	NLAA CC [2]			*			
Curb & Flume	NLAA CC [2]			*			
Curb & Gutter	NE	Ø					
Detention Basin	MA						
De-watering	NE	Ø					
Drilled Shafts	NE	Ø					
Earth Shoulder Construction	NLAA CC [2]			*			
Erosion Control - Barriers	NLAA CC [2]			*			
Erosion Control - Erosion Checks	NE	Ø					
Erosion Control - Inlet/Outlet Protection	NLAA CC [2]			*			
Erosion Control - Mulching	NE	Ø					
Erosion Control - Rolled Erosion Control	NE	Ø					
Erosion Control - Slope Interruption	NE	Ø					
Erosion Control - Traps and Basins	NLAA CC [2]			*			
Erosion Control - Vegetation	NE	Ø					
Fencing	NLAA CC [2]			*			
Grading Within the Hinge Point	NLAA CC [2]			*			
Grading Outside the Hinge Point	MA or NLAA CC [2]			*			
Guardrail Repair with Soil Disturbance	NLAA CC [2]			*			
Guardrail Repair without Soil Disturbance	NE	Ø					
Habitat Fragmentation, Modification of Connectivity	MA		Ø				
Landscaping	NLAA CC [2]			*			
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	NLAA CC [2,4]			*			
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	NLAA CC [4]			*			
Microsurfacing	NE	Ø					
Milling and/or In-place Recycling	NE	Ø					
Nighttime work with Lights	NLAA CC [4]			*			
Noise Walls (Not in water/wetlands)	NLAA CC [2]			*			
Overpass	NLAA CC [2]			*			
Pavement Removal	NE	Ø					
Paving	NE	Ø					
Piers	NLAA CC [2]			*			
Pile Driving - Impact	NLAA CC [2]			*			
Pile Driving - Vibratory	NLAA CC [2]			*			
Pile/Pier Encasement	NLAA CC [2]			*			
Pipe Jacking & Casing	NLAA CC [2]			*			
Pre-watering	NLAA CC [2]			*			
Removal of Structures and Obstructions	NLAA CC [2]			*			
Replacing a Bridge with a Culvert	NLAA CC [2]			*			
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	Ø					
Retaining Walls (NOT IN Water/Wetlands)	NLAA CC [2]			*			
Rock or Gravel Surfacing	NE	Ø					
Shoo-fly	NLAA CC [2]			*			
Sidewalks and Bikeways	NE	Ø					
Signs with Soil Disturbance	NLAA CC [2]			*			
Signs without Soil Disturbance	NE	Ø					
Stream Channel Impact, Ephemeral	NLAA CC [2]			*			
Stream Channel Impact, Intermittent	NLAA CC [2]			*			
Stream Channel Impact, Perennial	NLAA CC [2]			*			
Temporary Crossing, Causeway, Work-Platform	NLAA CC [2]			*			
Trenched Widening	NLAA CC [2]			*			
Underground Utility Conduit	NLAA CC [2]			*			
Wetland Mitigation	MA						!

AMERICAN GINSENG

Panax quinquefolius
Federal Status: Not Listed
Nebraska Status: Threatened

Photo by Steve Nix, About Forestry

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck which does not support plant growth. Since these activities do not occur within suitable habitat for the American Ginseng, there will be ***no effect*** on the species.	These activities occur in paved areas, open water and bottomlands, areas previously disturbed by other construction activities, and generally in locations that do not support suitable habitat for the American Ginseng which occurs in oak-hickory forests. Since the activities do not occur in locations with suitable habitat, there will be ***no effect*** on the species.	Night-time work with lights does not directly Utilize or alter suitable habitat for the American Ginseng, and it does not directly or indirectly impact the species. Therefore, there will be ***no effect*** on the species.	These activities could disturb suitable habitat for the American Ginseng. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect the species*** (see Conservation Condition 1).	If these activities are restricted to the area between the hinge-points of the roadway, the activity will not occur in locations with suitable habitat for the American Ginseng because the area within the hinge point is non-natural ground with frequent disturbance. Work within the hinge point may proceed. If these activities occur outside the hinge-point, the activity could disturb suitable habitat. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).	These bridge activities could impact suitable habitat for American Ginseng, with possible effects of crushing plants or contaminating soils. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).	Habitat fragmentation could reduce the amount, size, or other aspect of habitat suitability for the American Ginseng. Reduction in habitat suitability ***may affect*** the species, and requires consultation.
Asphalt Patching	NE	Ø						
Bank Stabilization	NLAA CC[1]				*			
Barge Staging	NE		Ø					
Bridge Deck Repair	NLAA CC[2 or 1]				*			
Bridge Deck Replacement	NLAA CC[2 or 1]				*			
Bridge Painting	NLAA CC[2 or 1]				*			
Bridge Rail Repair/Replacement	NLAA CC[2 or 1]				*			
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC[1]				*			
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC[1]				*			
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA CC[2 or 1]				*			
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC[2 or 1]				*			
Bridge Superstructure New & Replacement - Intermittent	NLAA CC[2 or 1]				*			
Bridge Superstructure New & Replacement - Perennial	NLAA CC[2 or 1]				*			
Channel Grade Stabilization Structures	NLAA CC[1]				*			
Channelization, Ephemeral	NLAA CC[1]				*			
Channelization, Intermittent	NLAA CC[1]				*			
Channelization, Perennial	NLAA CC[1]				*			
Clearing and Grubbing - Non-woody Vegetation	NLAA CC[1]				*			
Clearing and Grubbing -Trees & Shrubs	NLAA CC[1]				*			
Cofferdams	NLAA CC[1]				*			
Concrete Pavement Repair	NE	Ø						
Crack Sealing and Joint Sealing	NE	Ø						
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA CC[1]				*			
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA CC[1]				*			
Culvert New, Replacement, Extension, Repair - Perennial	NLAA CC[1]				*			
Curb & Flume	NLAA CC[1]				*			
Curb & Gutter	NE							
Detention Basin	NLAA CC[1]				*			
De-watering	NE							
Drilled Shafts	NLAA CC[1]				*			
Earth Shoulder Construction	NLAA CC[1]				*			
Erosion Control - Barriers	NE							
Erosion Control - Erosion Checks	NE		Ø					
Erosion Control - Inlet/Outlet Protection	NE		Ø					
Erosion Control - Mulching	NE		Ø					
Erosion Control - Rolled Erosion Control	NE		Ø					
Erosion Control - Slope Interruption	NE		Ø					
Erosion Control - Traps and Basins	NE		Ø					
Erosion Control - Vegetation	NE		Ø					
Fencing	NLAA CC[1]				*			
Grading Within the Hinge Point	NLAA CC[1]				*			
Grading Outside the Hinge Point	NLAA CC[1]				*			
Guardrail Repair with Soil Disturbance	NLAA CC[1]				*			
Guardrail Repair without Soil Disturbance	NE		Ø					
Habitat Fragmentation, Modification of Connectivity	MA							!
Landscaping	NLAA CC[1]				*			
Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	NLAA CC[1]		Ø					
Lighting, Traffic & Pedestrian Signals, DMS w/o Soil Disturbance	NE							
Microsurfacing	NE		Ø					
Milling and/or In-place Recycling	NE		Ø					
Nighttime work with Lights	NE		Ø	Ø				
Noise Walls (Not in water/wetlands)	NLAA CC[1]				*			
Overpass	NLAA CC[1]				*			
Pavement Removal	NE		Ø					
Paving	NE		Ø					
Piers	NLAA CC[1]				*			
Pile Driving - Impact	NLAA CC[1 or 2]				*			
Pile Driving - Vibratory	NLAA CC[1 or 2]				*			
Pile/Pier Encasement	NLAA CC[1]				*			
Pipe Jacking & Casing	NLAA CC[1]				*			
Pre-watering	NLAA CC[1]				*			
Removal of Structures and Obstructions	NLAA CC[1]				*			
Replacing a Bridge with a Culvert	NE		Ø					
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NLAA CC[1]		Ø		*			
Retaining Walls (NOT IN Water/Wetlands)	NE		Ø					
Rock or Gravel Surfacing	NLAA CC[1]				*			
Shoo-fly	NE		Ø					
Sidewalks and Bikeways	NLAA CC[2]				*			
Signs with Soil Disturbance	NE		Ø					
Signs without Soil Disturbance	NLAA CC[1]				*			
Stream Channel Impact, Ephemeral	NLAA CC[1]				*			
Stream Channel Impact, Intermittent	NLAA CC[1]				*			
Stream Channel Impact, Perennial	NLAA CC[1]				*			
Temporary Crossing, Causeway, Work-Platform	NLAA CC[1]				*			
Trenched Widening	NLAA CC[1]				*			
Underground Utility Conduit	NLAA CC[1]		Ø		*			
Wetland Mitigation	NE							

BLACK-FOOTED FERRET

Federal Status: Endangered
Nebraska Status: Endangered

Photo by Jeff Vanuga, Corbis

EFFECTS and JUSTIFICATION

Effect Determination	ACTIVITIES	The scope of work for these activities is limited to the road surface/bridge deck. Since the Black-Footed Ferret does not permanently occupy these locations and there are no elements of suitable habitat in these locations, there will be ***no effect*** on the species.	These activities occur in streams and bottomlands, paved areas, urbanized locations, areas previously disturbed by other construction activities, and generally in locations that do not support suitable habitat for the Black-footed Ferret which is closely associated with prairie dogs, and found in short and mid-grass prairies. Since the species does not occur in the location of the activity, there will be ***no effect*** on the species.	These activities ***may affect*** the species due to habitat modifications, direct takings, lighting impacts, impacts to prey species, and/or habitat fragmentation and require consultation.
NE	Asphalt Patching	Ø		
MA	Bank Stabilization			!
NE	Barge Staging		Ø	
MA	Bridge Deck Repair	Ø		
MA	Bridge Deck Replacement		Ø	
NE	Bridge Painting		Ø	
NE	Bridge Rail Repair/Replacement	Ø		
MA	Bridge Substructure New, Replacement, or Repair - Ephemeral			!
MA	Bridge Substructure New, Replacement, or Repair - Intermittent			!
MA	Bridge Substructure New, Replacement, or Repair - Perennial			!
MA	Bridge Superstructure New & Replacement - Ephemeral			!
MA	Bridge Superstructure New & Replacement - Intermittent			!
MA	Bridge Superstructure New & Replacement - Perennial		Ø	!
MA	Channel Grade Stabilization Structures			
MA	Channelization, Ephemeral			!
MA	Channelization, Intermittent			!
MA	Channelization, Perennial			!
MA	Clearing and Grubbing - Non-woody Vegetation			!
MA	Clearing and Grubbing - Trees & Shrubs			!
NE	Cofferdams		Ø	
NE	Concrete Pavement Repair	Ø		
NE	Crack Sealing and Joint Sealing	Ø		
MA	Culvert New, Replacement, Extension, Repair - Ephemeral			!
MA	Culvert New, Replacement, Extension, Repair - Intermittent			!
MA	Culvert New, Replacement, Extension, Repair - Perennial			!
MA	Curb & Flume		Ø	
NE	Curb & Gutter			!
MA	Detention Basin		Ø	
NE	De-watering		Ø	
MA	Drilled Shafts		Ø	
MA	Earth Shoulder Construction		Ø	
NE	Erosion Control - Barriers		Ø	
NE	Erosion Control - Erosion Checks		Ø	
NE	Erosion Control - Inlet/Outlet Protection		Ø	
NE	Erosion Control - Mulching		Ø	
NE	Erosion Control - Rolled Erosion Control		Ø	
NE	Erosion Control - Slope Interruption		Ø	
NE	Erosion Control - Traps and Basins		Ø	
MA	Erosion Control - Vegetation		Ø	
MA	Fencing		Ø	!
MA	Grading Within the Hinge Point		Ø	!
MA	Grading Outside the Hinge Point		Ø	!
NE	Guardrail Repair with Soil Disturbance		Ø	
NE	Guardrail Repair without Soil Disturbance		Ø	
MA	Habitat Fragmentation, Modification of Connectivity			!
MA	Landscaping		Ø	!
MA	Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance		Ø	!
MA	Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance		Ø	!
NE	Microsurfacing		Ø	
NE	Milling and/or In-place Recycling		Ø	
MA	Nighttime work with Lights		Ø	!
MA	Noise Walls (Not in water/wetlands)		Ø	!
MA	Overpass		Ø	!
NE	Pavement Removal		Ø	
NE	Paving		Ø	
MA	Piers		Ø	!
MA	Pile Driving - Impact		Ø	!
MA	Pile Driving - Vibratory		Ø	!
MA	Pile/Pier Encasement		Ø	!
MA	Pipe Jacking & Casing		Ø	!
NE	Pre-watering		Ø	!
MA	Removal of Structures and Obstructions		Ø	!
MA	Replacing a Bridge with a Culvert		Ø	!
NE	Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal		Ø	!
MA	Retaining Walls (NOT IN Water/Wetlands)		Ø	!
NE	Rock or Gravel Surfacing		Ø	!
MA	Shoo-fly		Ø	!
NE	Sidewalks and Bikeways		Ø	!
NE	Signs with Soil Disturbance		Ø	!
NE	Signs without Soil Disturbance		Ø	!
MA	Stream Channel Impact, Ephemeral		Ø	!
MA	Stream Channel Impact, Intermittent		Ø	!
MA	Stream Channel Impact, Perennial		Ø	!
MA	Temporary Crossing, Causeway, Work-Platform		Ø	!
MA	Trenched Widening		Ø	!
MA	Underground Utility Conduit		Ø	!
MA	Wetland Mitigation		Ø	!

BLACKNOSE SHINER

Notropis heterolepis
Federal Status: Not Listed
Nebraska Status: Endangered

Photos by Carol Freeman

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since the Blacknosed Shiner does not occur in these locations, there will be ***no effect*** on the species.	These activities occur in paved areas, urbanized locations, uplands, large rivers, and generally in locations that do not support suitable habitat for the Blacknose Shiner which occurs in small freshwater creeks and shallow weedy areas of lakes and ponds in north-central Nebraska. Since the species does not occur in the location of the activities, there will be ***no effect*** on the species.	Night-time work with lights does not directly or indirectly impact this fish species. Therefore, there will be ***no effect*** on the species.	Construction of detention basins could result in erosion and sedimentation, and reduction in water quality for the Blacknose Shiner. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 1).	These bridge activities could result in materials falling from the bridge deck and impacting the Blacknose Shiner or its habitat. Therefore, this activity may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2)**.**	Ephemeral and intermittant channels may contain elements of suitable habitat within them. When the channel is dry, species will not be present, but channel modifications may convert suitable habitat characteristics of the channel to unsuitable habitat for use by the species when water is present. In addition, in-channel work may cause an increase in sedimentation or turbidity downstream of the site once water returns. Therefore, this activity may affect this species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 3)**.**	Blacknose Shiner utilizes shrubby overhangs along creek banks. Construction activities may destroy or remove this type of vegetation, which may affect species habitat. Landscaping and revegetation involves reestablishment of upland vegetation in areas disturbed by construction, and the type of plants used may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this ***activity may affect, but is not likely to adversely affect*** the species (see Conservation Condition 4)**.**	These activities could result in downstream erosion and sedimentation, and reduction in water quality for the Blacknose Shiner. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 5)**.**	These activities ***may affect*** the species due to habitat modifications, flow modifications, direct takings, and/or by increasing turbidity or sedimentation, and require consultation.
Asphalt Patching	NE	Ø							
Bank Stabilization	MA								
Barge Staging	NE		Ø						
Bridge Deck Repair	NLAA CC[2]								
Bridge Deck Replacement	NLAA CC[2]								
Bridge Painting	NLAA CC[2]								
Bridge Rail Repair/Replacement	NLAA CC[2]								
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC[3]				*		*	*	!
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC[3]				*		*	*	!
Bridge Substructure New, Replacement, or Repair - Perennial	MA								
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC[2]				*		*	*	!
Bridge Superstructure New & Replacement - Intermittent	NLAA CC[2]				*		*	*	!
Bridge Superstructure New & Replacement - Perennial	NLAA CC[2]				*		*	*	!
Channel Grade Stabilization Structures	MA								
Channelization, Ephemeral	MA								
Channelization, Intermittent	MA								
Channelization, Perennial	MA								
Clearing and Grubbing - Non-woody Vegetation	NLAA CC[3] or MA								
Clearing and Grubbing - Trees & Shrubs	NLAA CC[2] or MA								
Cofferdams	NLAA CC[3]								
Concrete Pavement Repair	NE	Ø							
Crack Sealing and Joint Sealing	NE	Ø							
Culvert New, Replacement, Extension, Repair - Ephemeral	MA								
Culvert New, Replacement, Extension, Repair - Intermittent	MA								
Culvert New, Replacement, Extension, Repair - Perennial	MA								
Curb & Flume	NE		Ø						
Curb & Gutter	NE		Ø						
Detention Basin	NLAA CC[1]					*			
De-watering	MA								
Drilled Shafts	MA								
Earth Shoulder Construction	NE		Ø						
Erosion Control - Barriers	NE		Ø						
Erosion Control - Erosion Checks	NE		Ø						
Erosion Control - Inlet/Outlet Protection	NE		Ø						
Erosion Control - Mulching	NE		Ø						
Erosion Control - Rolled Erosion Control	NE		Ø						
Erosion Control - Slope Interruption	NE		Ø						
Erosion Control - Traps and Basins	NE		Ø						
Erosion Control - Vegetation	NLAA CC[1]		Ø						
Fencing	NE		Ø						
Guardrail Repair with Soil Disturbance	NE		Ø						
Guardrail Repair without Soil Disturbance	NE		Ø						
Grading Within the Hinge Point	NE		Ø						
Grading Outside the Hinge Point	NLAA CC[2] or MA								
Habitat Fragmentation, Modification of Connectivity	MA								
Landscaping	NLAA CC[4]								
Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	NE		Ø						
Lighting, Traffic & Pedestrian Signals, DMS w/out Soil Disturbance	NE		Ø						
Microsurfacing	NE	Ø							
Milling and/or In-place Recycling	NE	Ø							
Nighttime work with Lights	NE			Ø					
Noise Walls (Not in water/wetlands)	NE		Ø						
Overpass	NE		Ø						
Pavement Removal	NE	Ø							
Paving	NE	Ø							
Piers	NLAA CC[2] or MA								
Pile Driving - Impact	MA								
Pile Driving - Vibratory	MA								
Pile/Pier Encasement	NLAA CC[3]								
Pipe Jacking & Casing	NLAA CC[3]								
Pre-watering	MA								
Removal of Structures and Obstructions	NLAA CC[3] or MA								
Replacing a Bridge with a Culvert	MA								
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	Ø							
Retaining Walls (NOT IN Water/Wetlands)	NE		Ø						
Rock or Gravel Surfacing	NE	Ø							
Shoo-fly	MA								
Sidewalks and Bikeways	NE		Ø						
Signs with Soil Disturbance	NE		Ø						
Signs without Soil Disturbance	NE		Ø						
Stream Channel Impact, Ephemeral	MA								
Stream Channel Impact, Intermittent	MA								
Stream Channel Impact, Perennial	MA								
Temporary Crossing, Causeway, Work-Platform	MA								
Trenched Widening	NE		Ø						
Underground Utility Conduit	NE		Ø						
Wetland Mitigation	MA								!

BLOWOUT PENSTEMON

Penstemon haydenii
Federal Status: Endangered
Nebraska Status: Endangered

Photo by Tim Griffin

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck which does not support plant growth. Since these activities do not occur within suitable habitat for the Blowout Penstemon, there will be ***no effect*** on the species.	These activities occur along stream courses and drainages, in paved areas, urbanized locations, areas previously disturbed by other construction activities, and/or generally in locations that do not support suitable habitat for the Blowout Penstemon which occurs in dry sandy blowouts. Since the activities do not occur in locations with suitable habitat, there will be ***no effect*** on the species.	Night-time work with lights does not directly utilize or alter suitable habitat for the Blowout Penstemon, and it does not directly or indirectly impact the species. Therefore, there will be ***no effect*** on the species.	These activities could disturb suitable habitat for the Blowout Penstemon. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect the species*** (see Conservation Condition 1).	These activities could indirectly affect the hydrology of the area and thereby affect the Blowout Penstemon. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 1).	These bridge activities could impact suitable habitat for Blowout Penstemon, with possible effects of crushing plants or contaminating soils. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).	Habitat fragmentation activities could reduce the amount, size, or other aspect of habitat suitability for the Blowout Penstemon. Reduction in habitat suitability ***may affect*** the species, and requires consultation.
Asphalt Patching	NE	Ø						
Bank Stabilization	NLAA CC[1]				*			
Barge Staging	NE		Ø					
Bridge Deck Repair	NLAA CC[2 or 1]				*			
Bridge Deck Replacement	NLAA CC[2 or 1]				*			
Bridge Painting	NLAA CC[2 or 1]				*			
Bridge Rail Repair/Replacement	NLAA CC[2 or 1]				*			
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC[1]				*			
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC[1]				*			
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA CC[2 or 1]				*			
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC[2 or 1]				*			
Bridge Superstructure New & Replacement - Intermittent	NLAA CC[2 or 1]				*			
Bridge Superstructure New & Replacement - Perennial	NLAA CC[2 or 1]				*			
Channel Grade Stabilization Structures	NE		Ø					
Channelization, Ephemeral	NLAA CC[1]				*			
Channelization, Intermittent	NLAA CC[1]				*			
Channelization, Perennial	NLAA CC[1]				*			
Clearing and Grubbing - Non-woody Vegetation	NLAA CC[1]				*			
Clearing and Grubbing - Trees & Shrubs	NLAA CC[1]				*			
Cofferdams	NE		Ø					
Concrete Pavement Repair	NE	Ø						
Crack Sealing and Joint Sealing	NE	Ø						
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA CC[1]				*			
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA CC[1]				*			
Culvert New, Replacement, Extension, Repair - Perennial	NLAA CC[1]				*			
Curb & Flume	NLAA CC[1]							
Curb & Gutter	NE		Ø					
Detention Basin	NLAACC[1]		Ø					
De-watering	NE							
Drilled Shafts	NE		Ø					
Earth Shoulder Construction	NLAA CC[1]				*			
Erosion Control - Barriers	NE							
Erosion Control - Erosion Checks	NE		Ø					
Erosion Control - Inlet/Outlet Protection	NE		Ø					
Erosion Control - Mulching	NE		Ø					
Erosion Control - Rolled Erosion Control	NE		Ø					
Erosion Control - Slope Interruption	NE		Ø					
Erosion Control - Traps and Basins	NE		Ø					
Erosion Control - Vegetation	NLAA CC[1]		Ø					
Fencing	NLAA CC[1]		Ø					
Grading Within the Hinge Point	NLAA CC[1]		Ø					
Grading Outside the Hinge Point	NLAA CC[1]		Ø					
Guardrail Repair with Soil Disturbance	NLAA CC[1]		Ø					
Guardrail Repair without Soil Disturbance	NE		Ø					
Habitat Fragmentation, Modification of Connectivity	MA		Ø					!
Landscaping	NLAA CC[1]		Ø					
Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturburbance	NLAA CC[1]		Ø					
Lighting, Traffic & Pedestrian Signals, DMS w/o Soil Disturbance	NE		Ø					
Microsurfacing	NE		Ø					
Milling and/or In-place Recycling	NE		Ø					
Nighttime work with Lights	NE		Ø	Ø				
Noise Walls (Not in water/wetlands)	NE		Ø					
Overpass	NLAA CC[1]		Ø		*			
Pavement Removal	NE		Ø					
Paving	NE		Ø					
Piers	NE		Ø					
Pile Driving - Impact	NLAA CC[1 or 2]		Ø		*			
Pile Driving - Vibratory	NLAA CC[1 or 2]		Ø		*			
Pile/Pier Encasement	NE		Ø					
Pipe Jacking & Casing	NLAA CC[1]		Ø		*			
Pre-watering	NE		Ø					
Removal of Structures and Obstructions	NLAA CC[1]		Ø		*			
Replacing a Bridge with a Culvert	NLAA CC[1]		Ø		*			
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE		Ø					
Retaining Walls (NOT IN Water/Wetlands)	NLAA CC[1]		Ø		*			
Rock or Gravel Surfacing	NE		Ø		*			
Shoo-fly	NLAA CC[1]		Ø		*			
Sidewalks and Bikeways	NE		Ø		*			
Signs with Soil Disturbance	NLAA CC[1]		Ø		*			
Signs without Soil Disturbance	NE		Ø		*			
Stream Channel Impact, Ephemeral	NLAA CC[1]		Ø		*			
Stream Channel Impact, Intermittent	NLAA CC[1]		Ø		*			
Stream Channel Impact, Perennial	NLAA CC[1]		Ø		*			
Temporary Crossing, Causeway, Work-Platform	NLAA CC[1]		Ø		*			
Trenched Widening	NLAA CC[1]		Ø		*			
Underground Utility Conduit	NLAA CC[1]		Ø		*			
Wetland Mitigation	NLAA CC[1]		Ø		*			

COLORADO BUTTERFLY PLANT

Gaura neomexicana coloradensis
Federal Status: Endangered
Nebraska Status: Endangered

Photo by Georgia Doyle

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck which does not support plant growth. Since these activities do not occur within suitable habitat for the Colorado Butterfly Plant, there will be ***no effect*** on the species.	These activities occur in paved areas, open water, areas previously disturbed by other construction activities, and generally in locations that do not support suitable habitat for the Colorado Butterfly Plant which occurs in moist terraces adjacent to streams. Since the activities do not occur in locations with suitable habitat, there will be ***no effect*** on the species.	Night-time work with lights does not directly utilize or alter suitable habitat for the Colorado Butterfly Plant, and it does not directly or indirectly impact the species. Therefore, there will be ***no effect*** on the species.	These activities could disturb suitable habitat for the Colorado Butterfly Plant. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect the species*** (see Conservation Condition 1).	These activities could indirectly affect the hydrology of the area and thereby affect the Colorado Butterfly Plant. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 1).	These bridge activities could impact suitable habitat for Colorado Butterfly Plant, with possible effects of crushing plants or contaminating soils. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).	Habitat fragmentation activities could reduce the amount, size, or other aspect of habitat suitability for the Colorado Butterfly Plant. Reduction in habitat suitability ***may affect*** the species, and requires consultation.	Although an environmentally beneficial activity, if wetland mitigation occurs within suitable habitat for the Colorado Butterfly Plant, it could increase the water regime beyond the threshold level for the species. Since the activity ***may affect*** the species, consultation is required.
Asphalt Patching	NE	Ø							
Bank Stabilization	NLAA CC[1]				*				
Barge Staging	NE		Ø						
Bridge Deck Repair	NLAA CC[2 or 1]				*				
Bridge Deck Replacement	NLAA CC[2 or 1]				*				
Bridge Painting	NLAA CC[2 or 1]				*				
Bridge Rail Repair/Replacement	NLAA CC[2 or 1]				*				
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC[1]				*				
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC[1]				*				
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA CC[1]				*				
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC[2 or 1]				*				
Bridge Superstructure New & Replacement - Intermittent	NLAA CC[2 or 1]				*				
Bridge Superstructure New & Replacement - Perennial	NLAA CC[2 or 1]				*				
Channel Grade Stabilization Structures	NLAA CC[1]				*				
Channelization, Ephemeral	NLAA CC[1]				*				
Channelization, Intermittent	NLAA CC[1]				*				
Channelization, Perennial	NLAA CC[1]				*				
Clearing and Grubbing - Non-woody Vegetation	NLAA CC[1]				*				
Clearing and Grubbing - Trees & Shrubs	NLAA CC[1]				*				
Cofferdams	NLAA CC[1]				*				
Concrete Pavement Repair	NE	Ø							
Crack Sealing and Joint Sealing	NE	Ø							
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA CC[1]				*				
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA CC[1]				*				
Culvert New, Replacement, Extension, Repair - Perennial	NLAA CC[1]				*				
Curb & Flume	NLAA CC[1]		Ø						
Curb & Gutter	NE								
Detention Basin	NLAACC[1]				*	*			
De-watering	NLAA CC[1]				*				
Drilled Shafts	NE								
Earth Shoulder Construction	NLAA CC[1]				*				
Erosion Control - Barriers	NE								
Erosion Control - Erosion Checks	NE								
Erosion Control - Inlet/Outlet Protection	NLAA CC[1]				*				
Erosion Control - Mulching	NLAA CC[1]				*				
Erosion Control - Rolled Erosion Control	NE								
Erosion Control - Slope Interruption	NE								
Erosion Control - Traps and Basins	NE								
Erosion Control - Vegetation	NLAA CC[1]				*				
Fencing	NLAA CC[1]				*				
Grading Within the Hinge Point	NLAA CC[1]				*				
Grading Outside the Hinge Point	NLAA CC[1]				*				
Guardrail Repair with Soil Disturbance	NLAA CC[1]				*				
Guardrail Repair without Soil Disturbance	NE								
Habitat Fragmentation, Modification of Connectivity	MA							!	
Landscaping	NLAA CC[1]				*				
Lighting, Traffic & Pedestrain Signals, DMS w/ Soil Disturance	NLAA CC[1]				*				
Lighting, Traffic & Pedestrian Signals, DMS w/o Soil Disturbance	NE	Ø							
Microsurfacing	NE	Ø							
Milling and/or In-place Recycling	NE			Ø					
Nighttime work with Lights	NLAA CC[1]				*				
Noise Walls (Not in water/wetlands)	NLAA CC[1]				*				
Overpass	NLAA CC[1]				*				
Pavement Removal	NE	Ø							
Paving	NE	Ø							
Piers	NLAA CC[1]				*				
Pile Driving - Impact	NLAA CC[1or2]				*				
Pile Driving - Vibratory	NLAA CC[1or2]				*				
Pile/Pier Encasement	NLAA CC[1]				*				
Pipe Jacking & Casing	NLAA CC[1]				*				
Pre-watering	NLAA CC[1]				*				
Removal of Structures and Obstructions	NLAA CC[1]				*				
Replacing a Bridge with a Culvert	NLAA CC[1]				*				
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	Ø							
Retaining Walls (NOT IN Water/Wetlands)	NLAA CC[1]	Ø							
Rock or Gravel Surfacing	NE								
Shoo-fly	NLAA CC[1]				*				
Sidewalks and Bikeways	NE								
Signs with Soil Disturbance	NLAA CC[1]				*				
Signs without Soil Disturbance	NE								
Stream Channel Impact, Ephemeral	NLAA CC[1]				*				
Stream Channel Impact, Intermittent	NLAA CC[1]				*				
Stream Channel Impact, Perennial	NLAA CC[1]				*				
Temporary Crossing, Causeway, Work-Platform	NLAA CC[1]				*				
Trenched Widening	NLAA CC[1]				*				
Underground Utility Conduit	NLAA CC[1]				*				
Wetland Mitigation	MA								!

ESKIMO CURLEW

Numenius borealis
Federal Status: Endangered
Nebraska Status: Endangered

Photo by Gerrit Vyn

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since the Eskimo Curlew does not permanently occupy these locations and there are no elements of suitable habitat in these locations, there will be ***no effect*** on the species.	These activities occur in streams and bottomlands, paved areas, urbanized locations, areas previously disturbed by other construction activities, and generally in locations that do not support suitable habitat for the Eskimo Curlew which uses a variety of wetland and agricultural habitats, including newly tilled fields, burned prairies and marshes. Since the species does not occur in the location of the activity, there will be ***no effect*** on the species.	These activities ***may affect*** the species due to habitat modifications, direct takings, lighting impacts, and/or habitat fragmentation and require consultation.
Asphalt Patching	NE	Ø		
Bank Stabilization	MA		Ø	!
Barge Staging	NE			!
Bridge Deck Repair	MA		Ø	
Bridge Deck Replacement	NE		Ø	
Bridge Painting	NE		Ø	
Bridge Rail Repair/Replacement	NE	Ø		
Bridge Substructure New, Replacement, or Repair - Ephemeral	NE		Ø	
Bridge Substructure New, Replacement, or Repair - Intermittent	MA			!
Bridge Substructure New, Replacement, or Repair - Perennial	MA			!
Bridge Superstructure New & Replacement - Ephemeral	NE		Ø	
Bridge Superstructure New & Replacement - Intermittent	NE		Ø	
Bridge Superstructure New & Replacement - Perennial	NE		Ø	
Channel Grade Stabilization Structures	MA			!
Channelization, Ephemeral	NE		Ø	
Channelization, Intermittent	MA			!
Channelization, Perennial	MA			!
Clearing and Grubbing - Non-woody Vegetation	MA			!
Clearing and Grubbing - Trees & Shrubs	MA			!
Cofferdams	MA			!
Concrete Pavement Repair	MA			!
Crack Sealing and Joint Sealing	MA			!
Culvert New, Replacement, Extension, Repair - Ephemeral	NE			!
Culvert New, Replacement, Extension, Repair - Intermittent	MA		Ø	
Culvert New, Replacement, Extension, Repair - Perennial	MA		Ø	
Curb & Flume	NE		Ø	
Curb & Gutter	NE		Ø	
Detention Basin	MA			!
De-watering	MA			!
Drilled Shafts	MA			!
Earth Shoulder Construction	NE		Ø	
Erosion Control - Barriers	NE		Ø	
Erosion Control - Erosion Checks	NE		Ø	
Erosion Control - Inlet/Outlet Protection	NE		Ø	
Erosion Control - Mulching	MA		Ø	
Erosion Control - Post-Construction Erosion Control	NE		Ø	
Erosion Control - Rolled Erosion Control	NE		Ø	
Erosion Control - Slope Interruption	NE		Ø	
Erosion Control - Traps and Basins	NE		Ø	
Erosion Control - Vegetation	MA		Ø	
Fencing	MA			!
Grading Within the Hinge Point	NE		Ø	
Grading Outside the Hinge Point	MA		Ø	
Guardrail Repair with Soil Disturbance	MA		Ø	
Guardrail Repair without Soil Disturbance	MA		Ø	
Habitat Fragmentation, Modification of Connectivity	MA		Ø	
Landscaping	MA		Ø	
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	MA		Ø	
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	MA		Ø	
Microsurfacing	NE		Ø	
Milling and/or In-place Recycling	NE		Ø	
Nighttime work with Lights	MA		Ø	
Noise Walls (Not in water/wetlands)	MA		Ø	
Overpass	MA		Ø	
Pavement Removal	MA		Ø	
Paving	NE		Ø	
Piers	MA		Ø	
Pile Driving - Impact	MA		Ø	
Pile Driving - Vibratory	MA		Ø	
Pile/Pier Encasement	MA		Ø	
Pipe Jacking & Casing	NE		Ø	
Pre-watering	MA		Ø	
Removal of Structures and Obstructions	MA		Ø	
Replacing a Bridge with a Culvert	MA		Ø	
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE		Ø	
Retaining Walls (NOT IN Water/Wetlands)	MA		Ø	
Rock or Gravel Surfacing	NE		Ø	
Shoo-fly	MA		Ø	
Sidewalks and Bikeways	NE		Ø	
Signs with Soil Disturbance	MA		Ø	
Signs without Soil Disturbance	MA		Ø	
Stream Channel Impact, Ephemeral	NE		Ø	
Stream Channel Impact, Intermittent	MA		Ø	
Stream Channel Impact, Perennial	MA		Ø	
Temporary Crossing, Causeway, Work-Platform	MA		Ø	
Trenched Widening	NE		Ø	
Underground Utility Conduit	MA		Ø	
Wetland Mitigation	MA		Ø	

FINESCALE DACE

Phoxinus neogaeus
Federal Status: Not Listed
Nebraska Status: Threatened

Photo by DaeMin Kim

EFFECTS and JUSTIFICATION

ACTIVITIES	Asphalt Patching	Bank Stabilization	Barge Staging	Bridge Deck Repair	Bridge Deck Replacement	Bridge Painting	Bridge Rail Repair/Replacement	Bridge Substructure New, Replacement, or Repair - Ephemeral	Bridge Substructure New, Replacement, or Repair - Intermittent	Bridge Substructure New, Replacement, or Repair - Perennial	Bridge Superstructure New & Replacement - Ephemeral	Bridge Superstructure New & Replacement - Intermittent	Bridge Superstructure New & Replacement - Perennial	Channel Grade Stabilization Structures	Channelization, Ephemeral	Channelization, Intermittent	Channelization, Perennial	Clearing and Grubbing - Non-woody Vegetation	Clearing and Grubbing - Trees & Shrubs	Cofferdams	Concrete Pavement Repair	Crack Sealing and Joint Sealing	Culvert New, Replacement, Extension, Repair - Ephemeral	Culvert New, Replacement, Extension, Repair - Intermittent	Culvert New, Replacement, Extension, Repair - Perennial	Curb & Flume	Curb & Gutter	Detention Basin	De-watering	Drilled Shafts	Earth Shoulder Construction	Erosion Control - Barriers	Erosion Control - Erosion Checks	Erosion Control - Inlet/Outlet Protection	Erosion Control - Mulching	Erosion Control - Rolled Erosion Control	Erosion Control - Slope Interruption	Erosion Control - Traps and Basins	Erosion Control - Vegetation	Fencing	Grading Above the Hinge Point	Grading Below the Hinge Point	Guardrail Repair with Soil Disturbance	Guardrail Repair without Soil Disturbance	Habitat Fragmentation, Modification of Connectivity	Landscaping	Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	Lighting, Traffic & Pedestrian Signals, DMS w/out Soil Disturbance	Microsurfacing	Milling and/or In-place Recycling	Nighttime work with Lights	Noise Walls (Not in water/wetlands)	Overpass	Pavement Removal	Paving	Piers	Pile Driving - Impact	Pile Driving - Vibratory	Pile/Pier Encasement	Pipe Jacking & Casing	Pre-watering	Removal of Structures and Obstructions	Replacing a Bridge with a Culvert	Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	Retaining Walls (NOT IN Water/Wetlands)	Rock or Gravel Surfacing	Shoo-fly	Sidewalks and Bikeways	Signs with Soil Disturbance	Signs without Soil Disturbance	Stream Channel Impact, Ephemeral	Stream Channel Impact, Intermittent	Stream Channel Impact, Perennial	Temporary Crossing, Causeway, Work-Platform	Trenched Widening	Underground Utility Conduit	Wetland Mitigation
Effect Determination	NE	MA	NE	NLAA CC[2]	NLAA CC[2]	NLAA CC[2]	NLAA CC[2]	NLAA CC[3]	NLAA CC[3]	MA	NLAA CC[2]	NLAA CC[2]	NLAA CC[2]	MA	MA	MA	MA	NLAA CC[5] or MA	NLAA CC[5] or MA	NLAA CC[3]	NE	NE	MA	MA	MA	NE	NE	NLAA CC[1]	MA	MA	NE	NE	NE	NE	NE	NE	NE	NE	NLAACC[4]	NE	NE	NLAA CC[5] or MA	NE	NE	MA	NLAA CC[4]	NE	NE	NE	NE	NE	NE	NE	NE	NE	NLAA CC[5] or MA	MA	MA	NLAA CC[3]	NLAA CC[3]	MA	NLAA CC[5] or MA	MA	NE	NE	NE	MA	NE	NE	NE	MA	MA	MA	MA	NE	NE	MA
The scope of work for these activities is limited to the road surface/bridge deck. Since the Finescale Dace does not occur in these locations, there will be ***no effect*** on the species.	Ø																				Ø	Ø																											Ø	Ø				Ø	Ø									Ø		Ø											
These activities occur in paved areas, urbanized locations, uplands, large rivers, and generally in locations that do not support suitable habitat for the Finescale Dace which occurs in small freshwater creeks and shallow weedy areas of lakes and ponds in the central Sandhills of Nebraska. Since the species does not occur in the location of the activities, there will be ***no effect*** on the species.			Ø																							Ø	Ø				Ø	Ø	Ø	Ø	Ø	Ø	Ø	Ø		Ø	Ø		Ø	Ø			Ø	Ø				Ø	Ø												Ø			Ø	Ø	Ø					Ø	Ø	
Night-time work with lights does not directly or indirectly impact this fish species. Therefore, there will be ***no effect*** on the species.																																																			Ø																										
Construction of detention basins could result in erosion and sedimentation, and reduction in water quality for the Finescale Dace. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 1).																												*																																																	
These bridge activities could result in materials falling from the bridge deck and impacting the Finescale Dace or its habitat. Therefore, this activity may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).				*	*	*	*				*	*	*																																																																
Ephemeral and intermittant channels may contain elements of suitable habitat within them. When the channel is dry, species will not be present, but channel modifications may convert suitable habitat characteristics of the channel to unsuitable habitat for use by the species when water is present. In addition, in-channel work may cause an increase in sedimentation or turbidity downstream of the site once water returns. Therefore, this activity may affect this species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 3).								*	*											*																																							*	*																	
Finescale Dace utilizes shrubby overhangs along creek banks. Construction activities may destroy or remove this type of vegetation, which may affect species habitat. Landscaping and revegetation involves reestablishment of upland vegetation in areas disturbed by construction, and the type of plants used may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 4).																																							*							*																															
These activities could result in downstream erosion and sedimentation, and reduction in water quality for the Finescale Dace. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 5).																		*	*																							*														*						*															
These activities ***may affect*** the species due to habitat modifications, flow modifications, direct takings, and/or by increasing turbidity or sedimentation, and require consultation.		!								!				!	!	!	!	!	!				!	!	!				!	!												!			!											!	!	!			!	!	!				!				!	!	!	!			!

GRAY WOLF

Federal Status: Endangered
Nebraska Status: Endangered

Photo by Joel Sartore

ACTIVITIES	Effect Determination	EFFECTS and JUSTIFICATION
Asphalt Patching	NE	The scope of work for these activities is limited to the road surface/bridge deck. Since the Gray Wolf does not permanently occupy these locations and are no known permanent populations in the state, there will be ***no effect*** on the species.
Bank Stabilization	NE	Although these areas may be used as movement corridors, these types of activities may have a negligible, discountable, temporary restriction of movements during construction only. During construction, individual animals could continue movements avoiding the construction location. Because these types of activities do not modify large areas of natural habitats, do not impede movements, and because the species does not permanently occupy these areas, there will be ***no effect*** on the species.
Barge Staging	NE	These activities ***may affect*** the species due to habitat fragmentation and require consultation.
Bridge Deck Repair	NE	
Bridge Deck Replacement	NE	
Bridge Painting	NE	
Bridge Rail Repair/Replacement	NE	
Bridge Substructure New, Replacement, or Repair - Ephemeral	NE	
Bridge Substructure New, Replacement, or Repair - Intermittent	NE	
Bridge Substructure New, Replacement, or Repair - Perennial	NE	
Bridge Superstructure New & Replacement - Ephemeral	NE	
Bridge Superstructure New & Replacement - Intermittent	NE	
Bridge Superstructure New & Replacement - Perennial	NE	
Channel Grade Stabilization Structures	NE	
Channelization, Ephemeral	NE	
Channelization, Intermittent	NE	
Channelization, Perennial	NE	
Clearing and Grubbing - Non-woody Vegetation	NE	
Clearing and Grubbing - Trees & Shrubs	NE	
Cofferdams	NE	
Concrete Pavement Repair	NE	
Crack Sealing and Joint Sealing	NE	
Culvert New, Replacement, Extension, Repair - Ephemeral	NE	
Culvert New, Replacement, Extension, Repair - Intermittent	NE	
Culvert New,Replacement, Extension, Repair - Perennial	NE	
Curb & Flume	NE	
Curb & Gutter	NE	
Detention Basin	NE	
De-watering	NE	
Drilled Shafts	NE	
Earth Shoulder Construction	NE	
Erosion Control - Barriers	NE	
Erosion Control - Erosion Checks	NE	
Erosion Control - Inlet/Outlet Protection	NE	
Erosion Control - Mulching	NE	
Erosion Control - Rolled Erosion Control	NE	
Erosion Control - Slope Interruption	NE	
Erosion Control - Traps and Basins	NE	
Erosion Control - Vegetation	NE	
Fencing	NE	
Grading Within the Hinge Point	NE	
Grading Outside the Hinge Point	NE	
Guardrail Repair with Soil Disturbance	NE	
Guardrail Repair without Soil Disturbance	MA	
Habitat Fragmentation, Modification of Connectivity	NE	
Landscaping	NE	
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	NE	
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	NE	
Microsurfacing	NE	
Milling and/or In-place Recycling	NE	
Nighttime work with Lights	NE	
Noise Walls (Not in water/wetlands)	NE	
Overpass	NE	
Pavement Removal	NE	
Paving	NE	
Piers	NE	
Pile Driving - Impact	NE	
Pile Driving - Vibratory	NE	
Pile/Pier Encasement	NE	
Pipe Jacking & Casing	NE	
Pre-watering	NE	
Removal of Structures and Obstructions	NE	
Replacing a Bridge with a Culvert	NE	
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	
Retaining Walls (NOT IN Water/Wetlands)	NE	
Rock or Gravel Surfacing	NE	
Shoo-fly	NE	
Sidewalks and Bikeways	NE	
Signs with Soil Disturbance	NE	
Signs without Soil Disturbance	NE	
Stream Channel Impact, Ephemeral	NE	
Stream Channel Impact, Intermittent	NE	
Stream Channel Impact, Perennial	NE	
Temporary Crossing, Causeway, Work-Platform	NE	
Trenched Widening	NE	
Underground Utility Conduit	NE	
Wetland Mitigation	NE	

ACTIVITIES	The scope of work for these activities is limited to the road surface/bridge deck. Since the Gray Wolf does not permanently occupy these locations and are no known permanent populations in the state, there will be ***no effect*** on the species.	Although these areas may be used as movement corridors, these types of activities may have a negligible, discountable, temporary restriction of movements during construction only. During construction, individual animals could continue movements avoiding the construction location. Because these types of activities do not modify large areas of natural habitats, do not impede movements, and because the species does not permanently occupy these areas, there will be ***no effect*** on the species.	These activities ***may affect*** the species due to habitat fragmentation and require consultation.
Asphalt Patching	Ø		
Bank Stabilization		Ø	
Barge Staging	Ø	Ø	
Bridge Deck Repair			
Bridge Deck Replacement		Ø	
Bridge Painting		Ø	
Bridge Rail Repair/Replacement	Ø	Ø	
Bridge Substructure New, Replacement, or Repair - Ephemeral		Ø	
Bridge Substructure New, Replacement, or Repair - Intermittent		Ø	
Bridge Substructure New, Replacement, or Repair - Perennial		Ø	
Bridge Superstructure New & Replacement - Ephemeral		Ø	
Bridge Superstructure New & Replacement - Intermittent		Ø	
Bridge Superstructure New & Replacement - Perennial		Ø	
Channel Grade Stabilization Structures		Ø	
Channelization, Ephemeral		Ø	
Channelization, Intermittent			
Channelization, Perennial		Ø	
Clearing and Grubbing - Non-woody Vegetation		Ø	
Clearing and Grubbing - Trees & Shrubs		Ø	
Cofferdams		Ø	
Concrete Pavement Repair	Ø		
Crack Sealing and Joint Sealing	Ø		
Culvert New, Replacement, Extension, Repair - Ephemeral		Ø	
Culvert New, Replacement, Extension, Repair - Intermittent		Ø	
Culvert New,Replacement, Extension, Repair - Perennial		Ø	
Curb & Flume		Ø	
Curb & Gutter		Ø	
Detention Basin		Ø	
De-watering		Ø	
Drilled Shafts		Ø	
Earth Shoulder Construction		Ø	
Erosion Control - Barriers		Ø	
Erosion Control - Erosion Checks		Ø	
Erosion Control - Inlet/Outlet Protection		Ø	
Erosion Control - Mulching		Ø	
Erosion Control - Rolled Erosion Control		Ø	
Erosion Control - Slope Interruption		Ø	
Erosion Control - Traps and Basins		Ø	
Erosion Control - Vegetation		Ø	
Fencing		Ø	
Grading Within the Hinge Point		Ø	
Grading Outside the Hinge Point		Ø	
Guardrail Repair with Soil Disturbance		Ø	
Guardrail Repair without Soil Disturbance			!
Habitat Fragmentation, Modification of Connectivity			
Landscaping		Ø	
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance		Ø	
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance		Ø	
Microsurfacing	Ø		
Milling and/or In-place Recycling	Ø	Ø	
Nighttime work with Lights		Ø	
Noise Walls (Not in water/wetlands)		Ø	
Overpass		Ø	
Pavement Removal	Ø		
Paving	Ø	Ø	
Piers		Ø	
Pile Driving - Impact		Ø	
Pile Driving - Vibratory		Ø	
Pile/Pier Encasement		Ø	
Pipe Jacking & Casing		Ø	
Pre-watering		Ø	
Removal of Structures and Obstructions		Ø	
Replacing a Bridge with a Culvert		Ø	
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	Ø		
Retaining Walls (NOT IN Water/Wetlands)		Ø	
Rock or Gravel Surfacing	Ø		
Shoo-fly		Ø	
Sidewalks and Bikeways		Ø	
Signs with Soil Disturbance		Ø	
Signs without Soil Disturbance		Ø	
Stream Channel Impact, Ephemeral		Ø	
Stream Channel Impact, Intermittent		Ø	
Stream Channel Impact, Perennial		Ø	
Temporary Crossing, Causeway, Work-Platform		Ø	
Trenched Widening		Ø	
Underground Utility Conduit		Ø	
Wetland Mitigation		Ø	

INTERIOR LEAST TERN

Sternula antillarum athalassos

Federal Status: Endangered
Nebraska Status: Endangered

Photo by Gary Smyle, American Bird Conservancy

ACTIVITIES

EFFECTS and JUSTIFICATION

EFFECTS and JUSTIFICATION	Asphalt Patching	Bank Stabilization	Barge Staging	Bridge Deck Repair	Bridge Deck Replacement	Bridge Painting	Bridge Rail Repair/Replacement	Bridge Substructure New, Replacement, or Repair - Ephemeral	Bridge Substructure New, Replacement, or Repair - Intermittent	Bridge Substructure New, Replacement, or Repair - Perennial	Bridge Superstructure New & Replacement - Ephemeral	Bridge Superstructure New & Replacement - Intermittent	Bridge Superstructure New & Replacement - Perennial	Channel Grade Stabilization Structures	Channelization, Ephemeral	Channelization, Intermittent	Channelization, Perennial	Clearing and Grubbing - Non-woody Vegetation	Clearing and Grubbing - Trees & Shrubs	Cofferdams	Concrete Pavement Repair	Crack Sealing and Joint Sealing	Culvert New, Replacement, Extension, Repair - Ephemeral	Culvert New, Replacement, Extension, Repair - Intermittent	Culvert New, Replacement, Extension, Repair - Perennial	Curb & Flume	Curb & Gutter	Detention Basin	De-watering	Drilled Shafts	Earth Shoulder Construction	Erosion Control - Barriers	Erosion Control - Erosion Checks	Erosion Control - Inlet/Outlet Protection	Erosion Control - Mulching	Erosion Control - Rolled Erosion Control	Erosion Control - Slope Interruption	Erosion Control - Traps and Basins	Erosion Control - Vegetation	Fencing	Grading Within the Hinge Point	Grading Outside the Hinge Point	Guardrail Repair with Soil Disturbance	Guardrail Repair without Soil Disturbance	Habitat Fragmentation, Modification of Connectivity	Landscaping	Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	Microsurfacing	Milling and/or In-place Recycling	Nighttime work with Lights	Noise Walls (Not in water/wetlands)	Overpass	Pavement Removal	Paving	Piers	Pile Driving - Impact	Pile Driving - Vibratory	Pile/Pier Encasement	Pipe Jacking & Casing	Pre-watering	Removal of Structures and Obstructions	Replacing a Bridge with a Culvert	Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	Retaining Walls (NOT IN Water/Wetlands)	Rock or Gravel Surfacing	Shoo-fly	Sidewalks and Bikeways	Signs with Soil Disturbance	Signs without Soil Disturbance	Stream Channel Impact, Ephemeral	Stream Channel Impact, Intermittent	Stream Channel Impact, Perennial	Temporary Crossing, Causeway, Work-Platform	Trenched Widening	Underground Utility Conduit	Wetland Mitigation
Effect Determination	NE	MA	NLAA CC[3]	NLAA CC[1,2]	NLAA CC[1,2,3]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NE	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NE	NE	MA	NLAA CC[1,2]	NLAA CC[1,2]	NE	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2,4]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2,4]	NLAA CC[1,2]	NE	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	MA	NLAA CC[1,2,4]	NLAA CC[1,2]	NLAA CC[1,2]	NE	NE	NLAA CC[5]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NE	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NE	NLAA CC[1,2]	NE	NLAA CC[1,2]	NE	NLAA CC[1,2]	NE	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NLAA CC[1,2]	NE	NLAA CC[1,2]	MA
The scope of work for these activities is limited to the road surface/bridge deck. Since these activities do not occur within suitable habitat for the Interior Least Tern, there will be ***no effect*** on the species.	Ø																										Ø				Ø																		Ø	Ø					Ø									Ø		Ø											
These activities occur in paved areas, urbanized locations, and generally in locations that do not support suitable habitat for the Interior Least Tern which utilize dry, exposed sandbars or beach areas, mostly along the Platte and Missouri Rivers. Since these activities do not occur in locations with suitable habitat, there will be ***no effect*** on the species.																										Ø															Ø																											Ø		Ø					Ø		
Based on the location of this activity being within the confines of the roadway, known tolerance of the species to human activity/presence, and the short duration of the construction (approximately moves 1-mile per day, there will be ***no effect*** on the species																						Ø																																																							
These construction activities could occur during nesting season create noise or human disturbance that could impact the species through directly harming the animal, disturbing breeding or foraging behaviors, disturbing occupied or suitable habitat, or indirectly modifying habitat. With the implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Conditions 1, 2).				*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*		*	*	*				*	*		*	*	*	*	*	*	*	*	*		*	*	*		*	*	*				*	*	*		*	*	*	*	*	*	*	*		*		*		*	*	*	*	*	*		*	
River transport and placement of barge(s) within the river channel during nesting season creates noise or human disturbance that could impact the species through directly harming the animal, disturbing breeding or foraging behaviors, disturbing occupied or suitable habitat, or indirectly modifying habitat. With the implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 3).			*																																																																											
These activities involve reestablishment of vegetation in areas disturbed by construction. Establishment of non-native species, or species that are too tall, could alter habitat suitability for the Interior Least Tern which prefers open areas with wide visibility. With the implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 4).																																			*				*							*																																
Nighttime work with lights during the nesting season could impact the species through directly harming the animal, disturbing breeding behavior, disturbing occupied or suitable habitat, or indirectly modifying habitat. With the implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 5).																																																			*																										
These activities ***may affect*** the species due to habitat modifications, direct takings, and/or habitat fragmentation and require consultation.		!																										!																	!																																!

LAKE STURGEON

Acipenser fulvescens
Federal Status: Not Listed
Nebraska Status: Threatened

Photo Zeb Hogan

EFFECTS and JUSTIFICATION

ACTIVITIES	Asphalt Patching	Bank Stabilization	Barge Staging	Bridge Deck Repair	Bridge Deck Replacement	Bridge Painting	Bridge Rail Repair/Replacement	Bridge Substructure New, Replacement, or Repair - Ephemeral	Bridge Substructure New, Replacement, or Repair - Intermittent	Bridge Substructure New, Replacement, or Repair - Perennial	Bridge Superstructure New & Replacement - Ephemeral	Bridge Superstructure New & Replacement - Intermittent	Bridge Superstructure New & Replacement - Perennial	Channel Grade Stabilization Structures	Channelization, Ephemeral	Channelization, Intermittent	Channelization, Perennial	Clearing and Grubbing - Non-woody Vegetation	Clearing and Grubbing - Trees & Shrubs	Cofferdams	Concrete Pavement Repair	Crack Sealing and Joint Sealing	Culvert New, Replacement, Extension, Repair - Ephemeral	Culvert New, Replacement, Extension, Repair - Intermittent	Culvert New, Replacement, Extension, Repair - Perennial	Curb & Flume	Curb & Gutter	Detention Basin	De-watering	Drilled Shafts	Earth Shoulder Construction	Erosion Control - Barriers	Erosion Control - Erosion Checks	Erosion Control - Inlet/Outlet Protection	Erosion Control - Mulching	Erosion Control - Rolled Erosion Control	Erosion Control - Slope Interruption	Erosion Control - Traps and Basins	Erosion Control - Vegetation	Fencing	Grading Within the Hinge Point	Grading Outside the Hinge Point	Guardrail Repair with Soil Disturbance	Guardrail Repair without Soil Disturbance	Habitat Fragmentation, Modification of Connectivity	Landscaping	Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	Lighting, Traffic & Pedestrian Signals, DMS w/out Soil Disturbance	Microsurfacing	Milling and/or In-place Recycling	Nighttime work with Lights	Noise Walls (Not in water/wetlands)	Overpass	Pavement Removal	Paving	Piers	Pile Driving - Impact	Pile Driving - Vibratory	Pile/Pier Encasement	Pipe Jacking & Casing	Pre-watering	Removal of Structures and Obstructions	Replacing a Bridge with a Culvert	Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	Retaining Walls (NOT IN Water/Wetlands)	Rock or Gravel Surfacing	Shoo-fly	Sidewalks and Bikeways	Signs with Soil Disturbance	Signs without Soil Disturbance	Stream Channel Impact, Ephemeral	Stream Channel Impact, Intermittent	Stream Channel Impact, Perennial	Temporary Crossing, Causeway, Work-Platform	Trenched Widening	Underground Utility Conduit	Wetland Mitigation
Effect Determination	NE	MA	NLAA CC[1]	NLAA CC[4]	NLAA CC[4]	NLAA CC[4]	NLAA CC[4]	NE	MA	MA	NLAA CC[4]	NLAA CC[4]	NLAA CC[4]	MA	NE	MA	MA	NLAA CC[7]	NLAA CC[7]	NLAA CC[1]	NE	NE	NE	MA	MA	NE	NE	NLAA CC[2]	NLAA CC[5]	NLAA CC[3, 5]	NE	NE	NE	NE	NE	NE	NE	NE	NE	NE	NE	NLAA CC[7] or MA	NE	NE	MA	NE	NE	NE	NE	NE	NE	NE	NE	NE	NE	NLAA CC[1, 7]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1, 5]	NLAA CC[1]	MA	NLAA CC[6, 7]	NE	NE	NE	NE	NLAA CC[6]	NE	NE	NE	NE	MA	MA	NLAA CC[1, 5, 6]	NE	NE	MA
The scope of work for these activities is limited to the road surface/bridge deck. Since the Lake Sturgeon does not occur in these locations, there will be ***no effect*** on the species.	Ø																				Ø	Ø																											Ø	Ø				Ø	Ø											Ø											
These activities occur in paved areas, urbanized locations, uplands, ephmeral streams, and generally in locations that do not support suitable habitat for the Lake Sturgeon which occurs in large silty rivers with a diversity of depths and velocities, and primarily in the Missouri and lower Platte Rivers in Nebraska. Since the species does not occur in the location of the activities, there will be ***no effect*** on the species.								Ø							Ø								Ø			Ø	Ø				Ø	Ø	Ø	Ø	Ø	Ø	Ø	Ø	Ø	Ø	Ø		Ø	Ø		Ø	Ø	Ø				Ø	Ø										Ø	Ø	Ø			Ø	Ø	Ø	Ø				Ø	Ø	
Night-time work with lights does not directly or indirectly impact this fish species. Therefore, there will be ***no effect*** on the species.																																																			Ø																										
Construction noise could disturb reproductive and foraging activities for the Lake Sturgeon due to both vibratory and acoustical impacts. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 1).			*																	*																																				*	*	*	*	*														*			
Construction of detention basins could result in erosion and sedimentation, and reduction in water quality for the Lake Sturgeon. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).																												*																																																	
Disposal of drill cuttings within the river channel could result in erosion, sedimentation, and turbidity, which could directly take species through suffocation of larval sturgeon. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 3).																														*																																																
These bridge activities could result in materials falling from the bridge deck and directly taking or indirectly altering or contaminating its habitat. Therefore, this activity may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 4).				*	*	*	*				*	*	*																																																																	
Discharge of water or spoil into the river channel could result in erosion, sedimentation, and turbidity, which could directly take species through suffocation of larval sturgeon. These types of activities could also degrade suitable habitat. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 5).																													*	*																													*															*			
Flow modifications or disturbances within the river channel could affect the amount and connectivity of suitable habitat for the Lake Sturgeon. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 6).																																																														*					*							*			
These activities could result in downstream erosion and sedimentation, and reduction in water quality in suitable habitat for the Lake Sturgeon. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect the species*** (see Conservation Condition 7).																		*	*																							*														*						*															
These activities ***may affect*** the species due to habitat modifications, flow modifications, direct takings, and/or by increasing sedimentation, and require consultation.		!							!	!				!		!	!							!	!																	!			!																!											!	!				!

MASSASAUGA

Sistrurus catenatus
Federal Status: Not Listed
Nebraska Status: Threatened

Photo by Jim Scharosch

ACTIVITIES

EFFECTS and JUSTIFICATION

EFFECTS and JUSTIFICATION	Asphalt Patching	Bank Stabilization	Barge Staging	Bridge Deck Repair	Bridge Deck Replacement	Bridge Painting	Bridge Rail Repair/Replacement	Bridge Substructure New, Replacement, or Repair - Ephemeral	Bridge Substructure New, Replacement, or Repair - Itermittent	Bridge Substructure New, Replacement, or Repair - Perennial	Bridge Superstructure New & Replacement - Ephemeral	Bridge Superstructure New & Replacement - Intermittent	Bridge Superstructure New & Replacement - Perennial	Channel Grade Stabilization Structures	Channelization, Ephemeral	Channelization, Intermittent	Channelization, Perennial	Clearing and Grubbing - Non-Woody Vegetation	Clearing and Grubbing - Trees & Shrubs	Cofferdams	Concrete Pavement Repair	Crack Sealing and Joint Sealing	Culvert New, Replacement, Extension, Repair - Ephemeral	Culvert New, Replacement, Extension, Repair - Intermittent	Culvert New, Replacement, Extension, Repair - Perennial	Curb & Flume	Curb & Gutter	Detention Basin	De-watering	Drilled Shafts	Earth Shoulder Construction	Erosion Control - Barriers	Erosion Control - Erosion Checks	Erosion Control - Inlet/Outlet Protection	Erosion Control - Mulching	Erosion Control - Rolled Erosion Control	Erosion Control - Slope Interruption	Erosion Control - Traps and Basins	Erosion Control - Vegetation	Fencing	Grading Within the Hinge Point	Grading Outside the Hinge Point	Guardrail Repair with Soil Disturbance	Guardrail Repair without Soil Disturbance	Habitat Fragmentation, Modification of Connectivity	Landscaping	Lighting, Traffic and Pedestrian Signals, Dynamic Message Signs w/	Lighting, Traffic and Pedestrian Signals, Dynamic Message Signs	Microsurfacing	Milling and/or In-place Recycling	Nighttime work with Lights	Noise Walls (Not in water/wetlands)	Overpass	Pavement Removal	Paving	Piers	Pile Driving - Impact	Pile Driving - Vibratory	Pile/Pier Encasement	Pipe Jacking & Casing	Pre-watering	Removal of Structures and Obstructions	Replacing a Bridge with a Culvert	Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	Retaining Walls (NOT IN Water/Wetlands)	Rock or Gravel Surfacing	Shoo-fly	Sidewalks and Bikeways	Signs with Soil Disturbance	Signs without Soil Disturbance	Stream Channel Impact, Ephemeral	Stream Channel Impact, Intermittent	Stream Channel Impact, Perennial	Temporary Crossing, Causeway, Work-Platform	Trenched Widening	Underground Utility Conduit	Wetland Mitigation
Effect Determination	NE	NLAA CC[1]	NE	NLAA CC[4 or 1]	NLAA CC[4 or 1]	NLAA CC[4 or 1]	NLAA CC[4 or 1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[4 or 1]	NLAA CC[4 or 1]	NLAA CC[4 or 1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NE	NE	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NE	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[2,3]	NLAA CC[2,3]	NLAA CC[2,3]	NLAA CC[1]	NLAA CC[2,3]	NLAA CC[2,3]	NLAA CC[2,3]	NLAA CC[1,2,3]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NE	MA	NLAA CC[1]	NLAA CC[1]	NE	NE	NE	NE	NLAA CC[1]	NLAA CC[1]	NE	NE	NLAA CC[1]	NLAA CC[4 or 1]	NLAA CC[4 or 1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NE	NLAA CC[1]	NE	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NE	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1]
The scope of work for these activities is limited to the road surface/bridge deck. Since the Massasauga does not permanently occupy these areas and they are not critical to the species life history, there will be ***no effect*** on the species if the general species conservation condition is followed (avoidance of snakes, Condition S7).	Ø																				Ø	Ø					Ø																						Ø	Ø				Ø	Ø									Ø		Ø											
These activities do not cause soil or vegetation disturbances. Since these activity types do not affect the species or its habitat (upland grasslands and moist areas such as wet meadows, marshland, and floodplains), there will be ***no effect*** on the species if the general species conservation condition is followed (Condition S7).			Ø																																									Ø				Ø			Ø																			Ø							
Construction activities could impact the species through directly harming the animal, disturbing occupied or suitable habitat, or indirectly modifying habitat. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 1).		*		*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*			*	*	*	*		*	*	*	*				*				*	*	*	*	*			*	*					*	*			*	*	*	*	*	*	*	*		*		*	*	*		*	*	*	*	*	*	*
Silt fencing could create a physical obstruction impeding movement of the Massasauga. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 2).																																*	*	*		*	*	*	*																																						
Net types of erosion control devices could entangle the Massasauga and result in direct take. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 3).																																*	*	*		*	*	*	*																																						
These activities could result in disturbance from human presence or in materials falling from the bridge deck and debris removal which would impact the Massasauga through directly harming the animal, disturbing occupied or suitable habitat, or indirectly modifying habitat. With implementation of the conservation conditions, the activity ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 4).				*	*	*	*				*	*	*																																												*	*																			
These activities ***may affect*** the species due to habitat modifications, direct takings, and/or habitat fragmentation and require consultation.																																													!																																

MOUNTAIN PLOVER

Charadrius montanus
Federal Status: Proposed Threatened
Nebraska Status: Threatened

Photo by Richard Ditch

EFFECTS and JUSTIFICATION

Effect Determination	ACTIVITIES	The scope of work for these activities is limited to the road surface/bridge deck. Since the Mountain Plover does not permanently occupy these locations and there are no elements of suitable habitat in these locations, there will be ***no effect*** on the species.	These activities occur in paved areas, urbanized locations, open water, and generally in locations that do not support suitable habitat for the Mountain Plover which inhabits arid shortgrass prairie, agricultural fields, areas of bare ground and prairie dog towns in the Kimball Grasslands and Panhandle Prairies of Nebraska. Since these activities do not occur in locations with suitable habitat, there will be ***no effect*** on the species.	These construction activities during nesting season create noise or human disturbance that could impact the species through directly harming the animal, disturbing breeding or foraging behaviors, disturbing occupied or suitable habitat, or indirectly modifying habitat. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 1).	Temporary or permanent lighting during the nesting season could impact the species through directly harming the animal, disturbing breeding behavior, disturbing occupied or suitable habitat, or indirectly modifying habitat. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 2).	Construction activities could create noise or disturbances for the species during construction/installation and impact the animal by disturbing breeding or foraging behaviors, or disturbing occupied habitat. Based on the short duration of activities and implementation of the conservation conditions , this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 3).	Survey and staking activities could create noise or disturbances within suitable habitat for the Mountain Plover that could impact the species through directly harming the animal, disturbing breeding or foraging behaviors, disturbing occupied or suitable habitat, or indirectly modifying habitat. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 4).	These activities ***may affect*** the species due to habitat modifications, direct takings, and/or habitat fragmentation and require consultation.
NE	Asphalt Patching	ø						
NLAA CC[1]	Bank Stabilization		ø					
NE	Barge Staging							
NLAA CC[1]	Bridge Deck Repair			*	*	*	*	
NLAA CC[1]	Bridge Deck Replacement			*	*	*	*	
NLAA CC[1]	Bridge Painting			*	*	*	*	
NLAA CC[1]	Bridge Rail Repair/Replacement			*	*	*	*	
NLAA CC[1]	Bridge Substructure New, Replacement, or Repair - Ephemeral			*	*	*	*	
NLAA CC[1]	Bridge Substructure New, Replacement, or Repair - Intermittent			*	*	*	*	
NLAA CC[1]	Bridge Substructure New, Replacement, or Repair - Perennial			*	*	*	*	
NLAA CC[1]	Bridge Superstructure New & Replacement - Ephemeral			*	*	*	*	
NLAA CC[1]	Bridge Superstructure New & Replacement - Intermittent			*	*	*	*	
NLAA CC[1]	Bridge Superstructure New & Replacement - Perennial			*	*	*	*	
NLAA CC[1]	Channel Grade Stabilization Structures			*	*	*	*	
NLAA CC[1]	Channelization, Ephemeral			*	*	*	*	
NLAA CC[1]	Channelization, Intermittent			*	*	*	*	
NLAA CC[1]	Channelization, Perennial			*	*	*	*	
NLAA CC[1]	Clearing and Grubbing - Non-woody Vegetation			*	*	*	*	
NLAA CC[1]	Clearing and Grubbing - Trees & Shrubs			*	*	*	*	
NLAA CC[1]	Cofferdams			*	*	*	*	
NLAA CC[1]	Concrete Pavement Repair			*	*	*	*	
NLAA CC[1]	Crack Sealing and Joint Sealing			*	*	*	*	
NLAA CC[1]	Culvert New, Replacement, Extension, Repair - Ephemeral			*	*	*	*	
NLAA CC[1]	Culvert New, Replacement, Extension, Repair - Intermittent			*	*	*	*	
NLAA CC[1]	Culvert New, Replacement, Extension, Repair - Perennial			*	*	*	*	
NLAA CC[1]	Curb & Flume			*	*	*	*	
NE	Curb & Gutter		ø					
NLAA CC[1]	Detention Basin			*	*	*	*	
NLAA CC[1]	De-watering			*	*	*	*	
NLAA CC[1]	Drilled Shafts			*	*	*	*	
NLAA CC[1]	Earth Shoulder Construction			*	*	*	*	
NLAA CC[1]	Erosion Control - Barriers			*	*	*	*	
NLAA CC[1]	Erosion Control - Erosion Checks			*	*	*	*	
NLAA CC[1]	Erosion Control - Inlet/Outlet Protection			*	*	*	*	
NLAA CC[1]	Erosion Control - Mulching			*	*	*	*	
NLAA CC[1]	Erosion Control - Post-Construction Erosion Control			*	*	*	*	
NLAA CC[1]	Erosion Control - Rolled Erosion Control			*	*	*	*	
NLAA CC[1]	Erosion Control - Slope Interruption			*	*	*	*	
NLAA CC[1]	Erosion Control - Traps and Basins			*	*	*	*	
NLAA CC[1]	Erosion Control - Vegetation			*	*	*	*	
NLAA CC[1]	Fencing			*	*	*	*	
NLAA CC[2]	Grading Within the Hinge Point					*		
MA	Grading Outside the Hinge Point							
NLAA CC[1]	Guardrail Repair with Soil Disturbance			*				
NE	Guardrail Repair without Soil Disturbance		ø					
MA	Habitat Fragmentation, Modification of Connectivity							
NLAA CC[1]	Landscaping			*	*	*		
NLAA CC[1,2]	Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance							
NLAA CC[1,2]	Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance							
NE	Microsurfacing		ø					
NLAA CC[2]	Milling and/or In-place Recycling				*			
NLAA CC[2]	Nighttime work with Lights					*		
NLAA CC[1]	Noise Walls (Not in water/wetlands)			*	*	*	*	
NLAA CC[1]	Overpass			*	*	*	*	
NLAA CC[1]	Pavement Removal			*	*	*	*	
NLAA CC[1]	Paving			*	*	*	*	
NLAA CC[1]	Piers			*	*	*	*	
NLAA CC[1]	Pile Driving - Impact			*	*	*	*	
NLAA CC[1]	Pile Driving - Vibratory			*	*	*	*	
NLAA CC[1]	Pile/Pier Encasement			*	*	*	*	
NLAA CC[1]	Pipe Jacking & Casing			*	*	*	*	
NLAA CC[1]	Pre-watering			*	*	*	*	
NLAA CC[1]	Removal of Structures and Obstructions			*	*	*	*	
NLAA CC[1]	Replacing a Bridge with a Culvert			*	*	*	*	
NLAA CC[2]	Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal			*	*	*	*	
NLAA CC[1]	Retaining Walls (NOT IN Water/Wetlands)			*	*	*	*	
NE	Rock or Gravel Surfacing							
NLAA CC[1]	Shoo-fly			*	*	*	*	
NLAA CC[1]	Sidewalks and Bikeways			*	*	*	*	
NLAA CC[1]	Signs with Soil Disturbance			*	*	*	*	
NE	Signs without Soil Disturbance		ø					
NLAA CC[1]	Stream Channel Impact, Ephemeral			*	*	*	*	
NLAA CC[1]	Stream Channel Impact, Intermittent			*	*	*	*	
NLAA CC[1]	Stream Channel Impact, Perennial			*	*	*	*	
NLAA CC[1]	Temporary Crossing, Causeway, Work-Platform			*	*	*	*	
NLAA CC[1]	Trenched Widening			*	*	*	*	
NLAA CC[1]	Underground Utility Conduit			*	*	*	*	
NLAA CC[1]	Wetland Mitigation			*	*	*	*	

NORTHERN LONG-EARED BAT

Federal Status: Threatened

Nebraska Status: Threatened

Photo by USFWS

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since the NLEB does not permanently occupy these areas and they are not critical to the species life history, there will be ***no effect*** on the species.	NLEB inhabit deciduous woodlands (connected to ≥ 5 acres in size) that have live/dead tree species or snags that exhibit peeling bark, crevices or hollows (Typically ≥ 6-inch dbh) . These construction activities occur in open water, paved areas, areas previously disturbed by recent project activities (which were assessed through the matrix process), and in locations that do not support suitable habitat. Since the species does not occur in the location of the activity, there will be ***no effect*** on the species.	Construction activities could create noise or disturbances for the species during construction/installation and impact the animal by disturbing breeding or foraging behaviors and causing direct harm to the species and or hibernacula. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 1 or Conservation Condition 2).	These activities **may affect** the species due to habitat modifications, direct takings, and/or habitat fragmentation and require consultation.
Asphalt Patching	NE	Ø			
Bank Stabilization	NE		Ø Ø		
Barge Staging	NE		Ø Ø		
Bridge Deck Repair	NE or NLAA CC 1 or 2	Ø		*	
Bridge Deck Replacement	NLAA CC 1 or 2			*	
Bridge Painting	NE	Ø			
Bridge Rail Repair/Replacement	NE	Ø			
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC 1 or 2			*	
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC 1 or 2			*	
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA CC 1 or 2			*	
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC 1 or 2			*	
Bridge Superstructure New & Replacement - Intermittent	NLAA CC 1 or 2			*	
Bridge Superstructure New & Replacement - Perennial	NLAA CC 1 or 2			*	
Channel Grade Stabilization Structures	NE		Ø Ø		
Channelization, Ephemeral	NE		Ø Ø		
Channelization, Intermittent	NE		Ø Ø		
Channelization, Perennial	NE		Ø Ø		
Clearing and Grubbing Non-woody Vegetation	NLAA CC 1 or 2 or MA			*	
Cofferdams	NE	Ø			
Concrete Pavement Repair	NE	Ø			
Crack Sealing and Joint Sealing	NE	Ø			
Culvert New, Replacement, Extension, Repair - Ephemeral	NE		Ø Ø		
Culvert New, Replacement, Extension, Repair - Intermittent	NE		Ø Ø		
Culvert New, Replacement, Extension, Repair - Perennial	NE		Ø Ø		
Curb & Flume	NE		Ø Ø		
Curb & Gutter	NE		Ø Ø		
Detention Basin	NE		Ø Ø		
De-watering	NE		Ø Ø		
Drilled Shafts	NE		Ø Ø		
Earth Shoulder Construction	NE		Ø Ø		
Erosion Control - Barriers	NE		Ø Ø		
Erosion Control - Erosion Checks	NE		Ø Ø		
Erosion Control - Inlet/Outlet Protection	NE		Ø Ø		
Erosion Control - Mulching	NE		Ø Ø		
Erosion Control - Rolled Erosion Control	NE		Ø Ø		
Erosion Control - Slope Interruption	NE		Ø Ø		
Erosion Control - Traps and Basins	NE		Ø Ø		
Erosion Control - Vegetation	NE		Ø Ø		
Fencing	NE		Ø Ø		
Grading Within the Hinge Point	NE		Ø Ø		
Grading Outside the Hinge Point	NE		Ø Ø		
Guardrail Repair with Soil Disturbance	NE		Ø Ø		
Guardrail Repair without Soil Disturbance	NE		Ø Ø		
Habitat Fragmentation, Modification of Connectivity	MA				!
Landscaping	NE		Ø Ø		
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	NE		Ø Ø		
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	NE		Ø Ø		
Microsurfacing	NE	Ø			
Milling and/or In-place Recycling	NE	Ø			
Nighttime work with Lights	NE		Ø Ø		
Noise Walls (Not in water/wetlands)	NE		Ø Ø		
Overpass	NE		Ø Ø		
Pavement Removal	NE		Ø Ø		
Paving	NE	Ø	Ø Ø		
Piers	NE		Ø Ø		
Pile Driving - Impact	NE		Ø Ø		
Pile Driving - Vibratory	NE		Ø Ø		
Pile/Pier Encasement	NE		Ø Ø		
Pipe Jacking & Casing	NE		Ø Ø		
Pre-watering	NE		Ø Ø		
Removal of Structures and Obstructions	NLAA CC 1 or 2			*	
Replacing a Bridge with a Culvert	NLAA CC 1 or 2			*	
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	Ø			
Retaining Walls (NOT IN Water/Wetlands)	NE		Ø Ø		
Rock or Gravel Surfacing	NE	Ø			
Shoo-fly	NE		Ø Ø		
Sidewalks and Bikeways	NE	Ø			
Signs with Soil Disturbance	NE		Ø Ø		
Signs without Soil Disturbance	NE		Ø Ø		
Stream Channel Impact, Ephemeral	NE		Ø Ø		
Stream Channel Impact, Intermittent	NE		Ø Ø		
Stream Channel Impact, Perennial	NE		Ø Ø		
Temporary Crossing, Causeway, Work-Platform	NE		Ø Ø		
Trenched Widening	NE		Ø Ø		
Underground Utility Conduit	NE		Ø Ø		
Wetland Mitigation	NE		Ø Ø		

NORTHERN REDBELLY DACE

Phoxinus eos
Federal Status: Not Listed
Nebraska Status: Threatened

Photo by Konrad P. Schmidt

EFFECTS and JUSTIFICATION

ACTIVITIES	Asphalt Patching	Bank Stabilization	Barge Staging	Bridge Deck Repair	Bridge Deck Replacement	Bridge Painting	Bridge Rail Repair/Replacement	Bridge Substructure New, Replacement, or Repair - Ephemeral	Bridge Substructure New, Replacement, or Repair - Intermittent	Bridge Substructure New, Replacement, or Repair - Perennial	Bridge Superstructure New & Replacement - Ephemeral	Bridge Superstructure New & Replacement - Intermittent	Bridge Superstructure New & Replacement - Perennial	Channel Grade Stabilization Structures	Channelization, Ephemeral	Channelization, Intermittent	Channelization, Perennial	Clearing and Grubbing - Non-woody Vegetation	Clearing and Grubbing - Trees & Shrubs	Cofferdams	Concrete Pavement Repair	Crack Sealing and Joint Sealing	Culvert New,Replacement, Extension, Repair - Ephemeral	Culvert New, Replacement, Extension, Repair - Intermittent	Culvert New, Replacement, Extension, Repair - Perennial	Curb & Flume	Curb & Gutter	Detention Basin	De-watering	Drilled Shafts	Earth Shoulder Construction	Erosion Control - Barriers	Erosion Control - Erosion Checks	Erosion Control - Inlet/Outlet Protection	Erosion Control - Mulching	Erosion Control - Rolled Erosion Control	Erosion Control - Slope Interruption	Erosion Control - Traps and Basins	Erosion Control - Vegetation	Fencing	Grading Within the Hinge Point	Grading Outside the Hinge Point	Guardrail Repair with Soil Disturbance	Guardrail Repair without Soil Disturbance	Habitat Fragmentation, Modification of Connectivity	Landscaping	Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	Lighting, Traffic & Pedestrian Signals, DMS w/out Soil Disturbance	Microsurfacing	Milling and/or In-place Recycling	Nighttime work with Lights	Noise Walls (Not in water/wetlands)	Overpass	Pavement Removal	Paving	Piers	Pile Driving - Impact	Pile Driving - Vibratory	Pile/Pier Encasement	Pipe Jacking & Casing	Pre-watering	Removal of Structures and Obstructions	Replacing a Bridge with a Culvert	Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	Retaining Walls (NOT IN Water/Wetlands)	Rock or Gravel Surfacing	Shoo-fly	Sidewalks and Bikeways	Signs with Soil Disturbance	Signs without Soil Disturbance	Stream Channel Impact, Ephemeral	Stream Channel Impact, Intermittent	Stream Channel Impact, Perennial	Temporary Crossing, Causeway, Work-Platform	Trenched Widening	Underground Utility Conduit	Wetland Mitigation
Effect Determination	NE	MA	NE	NLAA CC[2]	NLAA CC[2]	NLAA CC[2]	NLAA CC[2]	NLAA CC[3]	NLAA CC[3]	MA	NLAA CC[2]	NLAA CC[2]	NLAA CC[2]	MA	MA	MA	MA	NLAA CC[5] or MA	NLAA CC[5] or MA	NLAA CC[3]	NE	NE	MA	MA	MA	NE	NE	NLAA CC[1]	MA	MA	NE	NE	NE	NE	NE	NE	NE	NE	NLAACC[4]	NE	NE	NLAA CC[5] or MA	NE	NE	MA	NLAA CC[4]	NE	NE	NE	NE	NE	NE	NE	NE	NE	NLAA CC[5] or MA	MA	MA	NLAA CC[3]	NLAA CC[3]	MA	NLAA CC[5] or MA	MA	NE	NE	NE	MA	NE	NE	NE	MA	MA	MA	MA	NE	NE	MA
The scope of work for these activities is limited to the road surface/bridge deck. Since the Northern Redbelly Dace does not occur in these locations, there will be ***no effect*** on the species.	Ø																				Ø	Ø																											Ø	Ø				Ø	Ø									Ø		Ø											
These activities occur in paved areas, urbanized locations, uplands, large rivers, and generally in locations that do not support suitable habitat for the Northern Redbelly Dace which occurs in clear cool water in small streams with adequate vegetation, slow to moderate current and silt or sand substrate. Since the species does not occur in the location of the activities, there will be ***no effect*** on the species.			Ø																							Ø	Ø				Ø	Ø	Ø	Ø	Ø	Ø	Ø	Ø		Ø	Ø		Ø	Ø			Ø	Ø				Ø	Ø												Ø			Ø	Ø	Ø					Ø	Ø	
Night-time work with lights does not directly or indirectly impact this fish species. Therefore, there will be ***no effect*** on the species.																																																			Ø																										
Construction of detention basins could result in erosion and sedimentation, and reduction in water quality for this fish species. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 1).																												*																																																	
These bridge activities could result in materials falling from the bridge deck and impacting the Northern Redbelly Dace or its habitat. Therefore, this activity may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).				*	*	*	*				*	*	*																																																																	
Ephemeral and intermittant channels may contain elements of suitable habitat within them. When the channel is dry, species will not be present, but channel modifications may convert suitable habitat characteristics of the channel to unsuitable habitat for use by the species when water is present. In addition, in-channel work may cause an increase in sedimentation or turbidity downstream of the site once water returns. Therefore, this activity may affect this species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 3).								*	*											*																																							*	*																		
Northern Redbelly Dace utilizes shrubby overhangs along creek banks. Construction activities may destroy or remove this type of vegetation, which may affect species habitat. Landscaping and revegetation involves reestablishment of upland vegetation in areas disturbed by construction, and the type of plants used may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 4).																																							*							*																															
These activities could result in downstream erosion and sedimentation, and reduction in water quality for this fish species. With implementation of conservation conditions, potential impacts will be minimized; therefore, therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 5).																		*	*																							*														*						*															
These activities ***may affect*** the species due to habitat modifications, flow modifications, direct takings, and/or by increasing turbidity or sedimentation, and require consultation.		!								!				!	!	!	!	!	!				!	!	!				!	!												!			!											!	!	!			!	!	!				!				!	!	!	!			!

PALLID STURGEON

Scaphirhynchus albus
Federal Status: Endangered
Nebraska Status: Endangered

Photo by Ken Bouc, Nebraska Game and Parks Commission

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since the Pallid Sturgeon does not occur in these locations, there will be ***no effect*** on the species.	These activities occur in paved areas, urbanized locations, uplands, ephmeral streams, and generally in locations that do not support suitable habitat for the Pallid Sturgeon which occurs in large silty rivers with a diversity of depths and velocities, and primarily in the Missouri and lower Platte Rivers in Nebraska. Since the species does not occur in the location of the activities, there will be ***no effect*** on the species.	Night-time work with lights does not directly or indirectly impact this fish species. Therefore, there will be ***no effect*** on the species.	Construction noise could disturb reproductive and foraging activities for the Pallid Sturgeon due to both vibratory and acoustical impacts. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 1).	Construction of detention basins could result in erosion and sedimentation, and reduction in water quality for the Pallid Sturgeon. With implementation of conservation conditions, potential impacts will be minimized; therefore, therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).	Disposal of drill cuttings within the river channel could result in erosion, sedimentation, and turbidity, which could directly take species through suffocation of larval sturgeon. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 3).	These bridge activities could result in materials falling from the bridge deck and directly taking or indirectly altering or contaminating its habitat. Therefore, this activity may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 4).	Discharge of water or spoil into the river channel could result in erosion, sedimentation, and turbidity, which could directly take species through suffocation of larval sturgeon. These types of activities could also degrade suitable habitat. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 5).	Flow modifications or disturbances within the river channel could affect the amount and connectivity of suitable habitat for the Pallid Sturgeon. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 6).	These activities could result in downstream erosion and sedimentation, and reduction in water quality in suitable habitat for the Pallid Sturgeon. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect the species*** (see Conservation Condition 7).	These activities ***may affect*** the species due to habitat modifications, flow modifications, direct takings, and/or by increasing sedimentation, and require consultation.
Asphalt Patching	NE	Ø										
Bank Stabilization	MA											
Barge Staging	NLAA CC[1]				*							
Bridge Deck Repair	NLAA CC[4]											
Bridge Deck Replacement	NLAA CC[4]											
Bridge Painting	NLAA CC[4]											
Bridge Rail Repair/Replacement	NLAA CC[4]											
Bridge Substructure New, Replacement, or Repair - Ephemeral	NE		Ø									
Bridge Substructure New, Replacement, or Repair - Intermittent	MA											
Bridge Substructure New, Replacement, or Repair - Perennial	MA											
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC[4]											
Bridge Superstructure New & Replacement - Intermittent	NLAA CC[4]											
Bridge Superstructure New & Replacement - Perennial	NLAA CC[4]											
Channel Grade Stabilization Structures	MA											
Channelization, Ephemeral	NE		Ø									
Channelization, Intermittent	MA											
Channelization, Perennial	MA											
Clearing and Grubbing - Non-woody Vegetation	NLAA CC[7]											
Clearing and Grubbing - Trees & Shrubs	NLAA CC[7]											
Cofferdams	NLAA CC[1]						*					
Concrete Pavement Repair	NE	Ø										
Crack Sealing and Joint Sealing	NE	Ø										
Culvert New, Replacement, Extension, Repair - Ephemeral	NE		Ø									
Culvert New, Replacement, Extension, Repair - Intermittent	MA											
Culvert New, Replacement, Extension, Repair - Perennial	MA											
Curb & Flume	NE		Ø									
Curb & Gutter	NE		Ø									
Detention Basin	NLAA CC[2]											
De-watering	NLAA CC[8]											
Drilled Shafts	NLAA CC[2,3]											
Earth Shoulder Construction	NE		Ø									
Erosion Control - Barriers	NE		Ø									
Erosion Control - Erosion Checks	NE		Ø									
Erosion Control - Inlet/Outlet Protection	NE		Ø									
Erosion Control - Mulching	NE		Ø									
Erosion Control - Rolled Erosion Control	NE		Ø									
Erosion Control - Slope Interruption	NE		Ø									
Erosion Control - Traps and Basins	NE		Ø									
Erosion Control - Vegetation	NE		Ø									
Fencing	NE		Ø									
Grading Within the Hinge Point	NE		Ø									
Grading Outside the Hinge Point	NLAA CC[7] or MA											
Guardrail Repair with Soil Disturbance	NE		Ø									
Guardrail Repair without Soil Disturbance	NE		Ø									
Habitat Fragmentation, Modification of Connectivity	MA											
Landscaping	NE		Ø									
Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	NE		Ø									
Lighting, Traffic & Pedestrian Signals, DMS w/out Soil Disturbance	NE		Ø									
Microsurfacing	NE	Ø										
Milling and/or In-place Recycling	NE	Ø										
Nighttime work with Lights	NE			Ø								
Noise Walls (Not in water/wetlands)	NE		Ø									
Overpass	NE		Ø									
Pavement Removal	NE	Ø										
Paving	NE	Ø										
Piers	NLAA CC[1,7]				*							
Pile Driving - Impact	NLAA CC[1]				*							
Pile Driving - Vibratory	NLAA CC[1]				*							
Pile/Pier Encasement	NLAA CC[1,5]				*							
Pipe Jacking & Casing	NLAA CC[1]				*							
Pre-watering	MA											
Removal of Structures and Obstructions	NLAA CC[6,7]											
Replacing a Bridge with a Culvert	NE		Ø									
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE		Ø									
Retaining Walls (NOT IN Water/Wetlands)	NE		Ø									
Rock or Gravel Surfacing	NE		Ø									
Shoo-fly	NLAA CC[6]	Ø										
Sidewalks and Bikeways	NE		Ø									
Signs with Soil Disturbance	NE		Ø									
Signs without Soil Disturbance	NE		Ø									
Stream Channel Impact, Ephemeral	NE		Ø									
Stream Channel Impact, Intermittent	MA											
Stream Channel Impact, Perennial	MA											
Temporary Crossing, Causeway, Work-Platform	NLAA CC[1,5,6]				*							
Trenched Widening	NE		Ø									
Underground Utility Conduit	NE		Ø									
Wetland Mitigation	MA											

PIPING PLOVER

Charadrius melodus
Federal Status: Threatened
Nebraska Status: Threatened

Photo by Bob Gress

EFFECTS and JUSTIFICATION	Asphalt Patching	Bank Stabilization	Barge Staging	Bridge Deck Repair	Bridge Deck Replacement	Bridge Painting	Bridge Rail Repair/Replacement	Bridge Substructure New, Replacement, or Repair - Ephemeral	Bridge Substructure New, Replacement, or Repair - Intermittent	Bridge Substructure New, Replacement, or Repair - Perennial	Bridge Superstructure New & Replacement - Ephemeral	Bridge Superstructure New & Replacement - Intermittent	Bridge Superstructure New & Replacement - Perennial	Channel Grade Stabilization Structures	Channelization, Ephemeral	Channelization, Intermittent	Channelization, Perennial	Clearing and Grubbing - Non-woody Vegetation	Clearing and Grubbing - Trees & Shrubs	Cofferdams	Concrete Pavement Repair	Crack Sealing and Joint Sealing	Culvert New, Replacement, Extension, Repair - Ephemeral	Culvert New, Replacement, Extension, Repair - Intermittent	Culvert New, Replacement, Extension, Repair - Perennial	Curb & Flume	Curb & Gutter	Detention Basin	De-watering	Drilled Shafts	Earth Shoulder Construction	Erosion Control - Barriers	Erosion Control - Erosion Checks	Erosion Control - Inlet/Outlet Protection	Erosion Control - Mulching	Erosion Control - Rolled Erosion Control	Erosion Control - Slope Interruption	Erosion Control - Traps and Basins	Erosion Control - Vegetation	Fencing	Grading Within the Hinge Point	Grading Outside the Hinge Point	Guardrail Repair with Soil Disturbance	Guardrail Repair without Soil Disturbance	Habitat Fragmentation, Modification of Connectivity	Landscaping	Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	Microsurfacing	Milling and/or In-place Recycling	Nighttime work with Lights	Noise Walls (Not in water/wetlands)	Overpass	Pavement Removal	Paving	Piers	Pile Driving - Impact	Pile Driving - Vibratory	Pile/Pier Encasement	Pipe Jacking & Casing	Pre-watering	Removal of Structures and Obstructions	Replacing a Bridge with a Culvert	Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	Retaining Walls (NOT IN Water/Wetlands)	Rock or Gravel Surfacing	Shoo-fly	Sidewalks and Bikeways	Signs with Soil Disturbance	Signs without Soil Disturbance	Stream Channel Impact, Ephemeral	Stream Channel Impact, Intermittent	Stream Channel Impact, Perennial	Temporary Crossing, Causeway, Work-Platform	Trenched Widening	Underground Utility Conduit	Wetland Mitigation
	NE	MA	NLAA CC [3]	NLAA CC [1,2]	NLAA CC [1,2,3]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NE	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NE	NE	MA	NLAA CC [1,2]	NLAA CC [1,2]	NE	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2,4]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2,4]	NLAA CC [1,2]	NE	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	MA	NLAA CC [1,2,4]	NLAA CC [1,2]	NLAA CC [1,2]	NE	NE	NLAA CC 5	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NE	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NE	NLAA CC [1,2]	NE	NLAA CC [1,2]	NE	NLAA CC [1,2]	NE	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NLAA CC [1,2]	NE	NLAA CC [1,2]	MA
The scope of work for these activities is limited to the road surface/bridge deck. Since these activities do not occur within suitable habitat for the Piping Plover, there will be ***no effect*** on the species.	Ø																										Ø				Ø																		Ø	Ø					Ø									Ø		Ø											
These activities occur in paved areas, urbanized locations, and generally in locations that do not support suitable habitat for the Piping Plover which utilize dry, exposed sandbars or beach areas, mostly along the Platte and Missouri Rivers. Since these activities do not occur in locations with suitable habitat, there will be ***no effect*** on the species.																										Ø															Ø																												Ø		Ø					Ø		
Based on the location of this activity being within the confines of the roadway, known tolerance of the species to human activity/presence, and the short duration of the construction (approximately moves 1-mile per day, there will be ***no effect*** on the species																						Ø																																																								
These construction activities could occur during nesting season create noise or human disturbance that could impact the species through directly harming the animal, disturbing breeding or foraging behaviors, disturbing occupied or suitable habitat, or indirectly modifying habitat. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Conditions 1, 2).				*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*				*	*		*	*	*	*	*	*	*	*	*		*	*	*		*	*	*				*	*	*		*	*	*	*	*	*	*	*		*		*		*		*	*	*	*		*	
River transport and placement of barge(s) within the river channel during nesting season creates noise or human disturbance that could impact the species through directly harming the animal, disturbing breeding or foraging behaviors, disturbing occupied or suitable habitat, or indirectly modifying habitat. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 3).			*																																																																									
These activities involve reestablishment of vegetation in areas disturbed by construction. Establishment of non-native species, or species that are too tall, could alter habitat suitability for the Piping Plover which prefers open areas with wide visibility. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 4).																																			*				*							*																																	
Nighttime work with lights during the nesting season could impact the species through directly harming the animal, disturbing breeding behavior, disturbing occupied or suitable habitat, or indirectly modifying habitat. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 5).																																																			*																										
These activities ***may affect*** the species, and require consultation.		!																										!																	!																																	!

RED KNOT

Calidris canutus rufa
Federal Status: Threatened
Nebraska Status: Threatened

Photo by USFWS

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since the Red Knot does not permanently occupy these locations and there are no elements of suitable habitat in these locations, there will be ***no effect*** on the species.	There is a slight possibility that these project activities may encounter migrating Red Knot during construction; however because of the ephemeral nature of this species, potential impacts are considered insignificant or dicountable and there is **not likely** to be an **adverse affect** on the species. ***NOTE** Because of the ephemeral nature of the occurrences of the species in the state of Nebraska, there are **no applicable conservation conditions at this time**.	These activities **may affect** the species due to habitat fragmentation and requires consultation.
Asphalt Patching	NE	Ø		
Bank Stabilization	NLAA		*	
Barge Staging	NLAA		*	
Bridge Deck Repair	NLAA		*	
Bridge Deck Replacement	NLAA		*	
Bridge Painting	NLAA		*	
Bridge Rail Repair/Replacement	NE	Ø		
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA		*	
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA		*	
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA		*	
Bridge Superstructure New & Replacement - Ephemeral	NLAA		*	
Bridge Superstructure New & Replacement - Intermittent	NLAA		*	
Bridge Superstructure New & Replacement - Perennial	NLAA		*	
Channel Grade Stabilization Structures	NLAA		*	
Channelization, Ephemeral	NLAA		*	
Channelization, Intermittent	NLAA		*	
Channelization, Perennial	NLAA		*	
Clearing and Grubbing-Non-woody Vegetation	NLAA		*	
Clearing and Grubbing-Trees & Shrubs	NLAA		*	
Cofferdams	NLAA		*	
Concrete Pavement Repair	NLAA		*	
Crack Sealing and Joint Sealing	NLAA		*	
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA		*	
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA		*	
Culvert New, Replacement, Extension, Repair - Perennial	NLAA		*	
Curb & Flume	NLAA		*	
Curb & Gutter	NLAA		*	
Detention Basin	NLAA		*	
De-watering	NLAA		*	
Drilled Shafts	NLAA		*	
Earth Shoulder Construction	NLAA		*	
Erosion Control - Barriers	NLAA		*	
Erosion Control - Erosion Checks	NLAA		*	
Erosion Control - Inlet/Outlet Protection	NLAA		*	
Erosion Control - Mulching	NLAA		*	
Erosion Control - Rolled Erosion Control	NLAA		*	
Erosion Control - Slope Interruption	NLAA		*	
Erosion Control - Traps and Basins	NLAA		*	
Erosion Control - Vegetation	NLAA		*	
Fencing	NLAA		*	
Grading Within the Hinge Point	NLAA		*	
Grading Outside the Hinge Point	NLAA		*	
Guardrail Repair with Soil Disturbance	NLAA		*	
Guardrail Repair without Soil Disturbance	NLAA		*	
Habitat Fragmentation, Modification of Connectivity	MA			!
Landscaping	NLAA		*	
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	NLAA		*	
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	NLAA		*	
Microsurfacing	NE	Ø		
Milling and/or In-place Recycling	NE	Ø		
Nighttime work with Lights	NLAA		*	
Noise Walls (Not in water/wetlands)	NLAA		*	
Overpass	NLAA		*	
Pavement Removal	NLAA		*	
Paving	NLAA	Ø		
Piers	NLAA		*	
Pile Driving - Impact	NLAA		*	
Pile Driving - Vibratory	NLAA		*	
Pile/Pier Encasement	NLAA		*	
Pipe Jacking & Casing	NLAA		*	
Pre-watering	NLAA		*	
Removal of Structures and Obstructions	NLAA		*	
Replacing a Bridge with a Culvert	NLAA		*	
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	Ø		
Retaining Walls (NOT IN Water/Wetlands)	NLAA		*	
Rock or Gravel Surfacing	NE	Ø		
Shoo-fly	NLAA		*	
Sidewalks and Bikeways	NLAA		*	
Signs with Soil Disturbance	NLAA		*	
Signs without Soil Disturbance	NLAA		*	
Stream Channel Impact, Ephemeral	NLAA		*	
Stream Channel Impact, Intermittent	NLAA		*	
Stream Channel Impact, Perennial	NLAA		*	
Temporary Crossing, Causeway, Work-Platform	NLAA		*	
Trenched Widening	NLAA		*	
Underground Utility Conduit	NLAA		*	
Wetland Mitigation	NLAA		*	

RIVER OTTER

Federal Status: Not Listed
Nebraska Status: Threatened

Photo by Nicole Duplaix

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since the River Otter does not permanently occupy these locations and there are no elements of suitable habitat in these locations, there will be ***no effect*** on the species.	River Otters are typically found in river, stream, lake, pond, backwater, and wetland habitats. These activities occur in paved areas, urbanized locations, areas previously disturbed by other construction activities, and generally in locations that do not support suitable habitat for the River Otter. Therefore, these activities will have ***no effect*** on the species.	Construction activities could create noise or disturbance which may disrupt River Otter denning and foraging activities. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversly affect*** the species (see Conservation Condition 1).	The area within the hinge-point of a roadway does not contain River Otter foraging and denning habitat. Impacts to River Otter from activities occurring within this area are considered negligable and discountable. Activities occuring outside the hinge-point could disturb River Otter denning and foraging. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversly affect*** the species (see Conservation Condition 2).	These bridge activities could result in materials falling from the bridge deck and disturbing the River Otter through directly harming the animal, impacting the animal by disturbing breeding or foraging behaviors, or indirectly modifying habitat by the falling debris and debris removal. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 3)	These activities ***may affect*** the species due to habitat fragmentation and/or the modification of habitat and impacts to connectivity, and require consultation.
Asphalt Patching	NE	Ø					
Bank Stabilization	MA						
Barge Staging	NLAA CC[1]						
Bridge Deck Repair	NLAA CC[3 or 2]						
Bridge Deck Replacement	NLAA CC[3 or 2]						
Bridge Painting	NLAA CC[3 or 2]						
Bridge Rail Repair/Replacement	NLAA CC[3 or 2]						
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC[1]			*	*	*	*
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC[1]			*	*	*	*
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA CC[1]			*	*	*	*
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC[3 or 2]						
Bridge Superstructure New & Replacement - Intermittent	NLAA CC[3 or 2]						
Bridge Superstructure New & Replacement - Perennial	NLAA CC[3 or 2]			*	*	*	*
Channel Grade Stabilization Structures	NLAA CC[1]			*	*	*	*
Channelization, Ephemeral	MA						
Channelization, Intermittent	MA						
Channelization, Perennial	MA						
Clearing and Grubbing - Non-woody Vegetation	NLAA CC[1]			*	*	*	*
Clearing and Grubbing - Trees & Shrubs	NLAA CC[1]			*	*	*	*
Cofferdams	NLAA CC[1]			*	*	*	*
Concrete Pavement Repair	NE	Ø					
Crack Sealing and Joint Sealing	NE	Ø					
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA CC[1]			*	*	*	*
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA CC[1]			*	*	*	*
Culvert New, Replacement, Extension, Repair - Perennial	NLAA CC[1]			*	*	*	*
Curb & Flume	NLAA CC[1]			*	*	*	*
Curb & Gutter	NE						
Detention Basin	NLAA CC[1]			*	*	*	*
De-watering	NLAA CC[1]			*	*	*	*
Drilled Shafts	NLAA CC[1]						
Earth Shoulder Construction	NLAA CC[2]						
Erosion Control - Barriers	NE						
Erosion Control - Erosion Checks	NE						
Erosion Control - Inlet/Outlet Protection	NE						
Erosion Control - Mulching	NE						
Erosion Control - Rolled Erosion Control	NE						
Erosion Control - Slope Interruption	NE						
Erosion Control - Traps and Basins	NE						
Erosion Control - Vegetation	NE						
Fencing	NLAA CC[1]			*	*	*	*
Grading Within the Hinge Point	NE						
Grading Outside the Hinge Point	NLAA CC[1]			*	*	*	*
Guardrail Repair with Soil Disturbance	NLAA CC[2]						
Guardrail Repair without Soil Disturbance	NE						
Habitat Fragmentation, Modification of Connectivity	MA						
Landscaping	NLAA CC[1]			*			
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	NLAA CC[2]			*			
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	NE	Ø					
Microsurfacing	NE	Ø					
Milling and/or In-place Recycling	NE	Ø					
Nighttime work with Lights	NE			*	*	*	*
Noise Walls (Not in water/wetlands)	NLAA CC[1]			*	*	*	*
Overpass	NLAA CC[1]			*	*	*	*
Pavement Removal	NE	Ø					
Paving	NE	Ø					
Piers	NLAA CC[1]			*	*	*	*
Pile Driving - Impact	NLAA CC[1]			*	*	*	*
Pile Driving - Vibratory	NLAA CC[1]			*	*	*	*
Pile/Pier Encasement	NLAA CC[1]			*	*	*	*
Pipe Jacking & Casing	NLAA CC[1]			*	*	*	*
Pre-watering	NLAA CC[1]			*	*	*	*
Removal of Structures and Obstructions	NLAA CC[1]			*	*	*	*
Replacing a Bridge with a Culvert	NE	Ø					
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NLAA CC[1]			*			
Retaining Walls (NOT IN Water/Wetlands)	NE	Ø					
Rock or Gravel Surfacing	NLAA CC[1]			*			
Shoo-fly	NLAA CC[1]			*			
Sidewalks and Bikeways	NE						
Signs with Soil Disturbance	NLAA CC[2]			*			
Signs without Soil Disturbance	NE						
Stream Channel Impact, Ephemeral	MA						
Stream Channel Impact, Intermittent	MA						
Stream Channel Impact, Perennial	MA						
Temporary Crossing, Causeway, Work-Platform	NLAA CC[1]			*	*	*	*
Trenched Widening	NE						
Underground Utility Conduit	NLAA CC[1]						
Wetland Mitigation	NLAA CC[1]						

SALT CREEK TIGER BEETLE

Cicindela nevadica lincolniana
Federal Status: Endangered
Nebraska Status: Endangered

Photo by Robert Becker

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since this species does not permanently occupy these locations and there are no elements of suitable habitat in these locations, there will be ***no effect*** on the species.	These activities do not cause soil or vegetation disturbances. Since these activity types do not affect the species' habitat (which includes wet, un-vegetated mudflats or salt flats, and internal drainages and associated tributaries of Salt Creek and Little Salt Creek in Nebraska) or the species and does not change the existing habitat conditions, there will be ***no effect*** on the species.	These bridge activities could result in materials falling from the bridge deck and debris removal which would impact the Salt Creek Tiger Beetle through directly harming the animal, impacting the animal by disturbing breeding or foraging behaviors, or indirectly modifying habitat. With implementation of the conservation condition, the activity ***may affect, but is not likely to adversely affect*** the species. (see Conservation Condition 1)	These activities ***may affect*** the species due to habitat modifications, direct takings, nighttime lighting impacts, and/or habitat fragmentation and require consultation.
Asphalt Patching	NE	Ø			
Bank Stabilization	MA				!
Barge Staging	NE		Ø		
Bridge Deck Repair	NLAA CC[1]			*	
Bridge Deck Replacement	MA				!
Bridge Painting	NLAA CC[1]			*	
Bridge Rail Repair/Replacement	NLAA CC[1]			*	
Bridge Substructure New, Replacement, or Repair - Ephemeral	MA				!
Bridge Substructure New, Replacement, or Repair - Intermittent	MA				!
Bridge Substructure New, Replacement, or Repair - Perennial	MA				!
Bridge Superstructure New & Replacement - Ephemeral	MA				!
Bridge Superstructure New & Replacement - Intermittent	MA				!
Bridge Superstructure New & Replacement - Perennial	MA				!
Channel Grade Stabilization Structures	MA				!
Channelization, Ephemeral	MA				!
Channelization, Intermittent	MA				!
Channelization, Perennial	MA				!
Clearing and Grubbing - Non-woody Vegetation	MA				!
Clearing and Grubbing - Trees & Shrubs	MA				!
Cofferdams	MA				!
Concrete Pavement Repair	NE	Ø			
Crack Sealing and Joint Sealing	NE	Ø			
Culvert New, Replacement, Extension, Repair - Ephemeral	MA				!
Culvert New, Replacement, Extension, Repair - Intermittent	MA				!
Culvert New, Replacement, Extension, Repair - Perennial	MA				!
Curb & Flume	MA				!
Curb & Gutter	MA				!
Detention Basin	MA				!
De-watering	MA				!
Drilled Shafts	MA				!
Earth Shoulder Construction	MA				!
Erosion Control - Barriers	MA				!
Erosion Control - Erosion Checks	MA				!
Erosion Control - Inlet/Outlet Protection	MA				!
Erosion Control - Mulching	MA				!
Erosion Control - Rolled Erosion Control	MA				!
Erosion Control - Slope Interruption	MA				!
Erosion Control - Traps and Basins	MA				!
Erosion Control - Vegetation	MA				!
Fencing	MA				!
Grading Within the Hinge Point	MA				!
Grading Outside the Hinge Point	MA				!
Guardrail Repair with Soil Disturbance	MA				!
Guardrail Repair without Soil Disturbance	NE		Ø		
Habitat Fragmentation, Modification of Connectivity	MA				!
Landscaping	MA				!
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	MA				!
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	MA				!
Microsurfacing	NE	Ø			
Milling and/or In-place Recycling	NE	Ø			
Nighttime work with Lights	MA				!
Noise Walls (Not in water/wetlands)	MA				!
Overpass	MA				!
Pavement Removal	NE	Ø			
Paving	NE	Ø			
Piers	MA				!
Pile Driving - Impact	MA				!
Pile Driving - Vibratory	MA				!
Pile/Pier Encasement	MA				!
Pipe Jacking & Casing	MA				!
Pre-watering	MA				!
Removal of Structures and Obstructions	MA				!
Replacing a Bridge with a Culvert	MA				!
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	Ø			
Retaining Walls (NOT IN Water/Wetlands)	MA				!
Rock or Gravel Surfacing	NE	Ø			
Shoo-fly	MA				!
Sidewalks and Bikeways	MA				!
Signs with Soil Disturbance	MA				!
Signs without Soil Disturbance	NE	Ø			
Stream Channel Impact, Ephemeral	MA				!
Stream Channel Impact, Intermittent	MA				!
Stream Channel Impact, Perennial	MA				!
Temporary Crossing, Causeway, Work-Platform	MA				!
Trenched Widening	MA				!
Underground Utility Conduit	MA				!
Wetland Mitigation	MA				!

SALT CREEK TIGER BEETLE (Critical Habitat)

Cicindela nevadica lincolniana
Federal Status Endangered
Nebraska Status: Endangered

Photo by Robert Becker

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since these locations do not contain primary constituent elements of critical habitat, these activities will have ***no effect*** to designated critical habitat.	These activities do not cause soil or vegetation disturbances. Since these activity types do not affect primary constituent elements of critical habitat, there will be ***no effect*** to designated critical habitat.	These bridge activities could result in materials falling from the bridge deck and debris removal which would impact Salt Creek Tiger Beetle critical habitat through directly or indirectly modifying habitat. With implementation of the conservation condition, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 1)	These activities ***may affect*** the species due to habitat modifications, nighttime lighting impacts, and/or habitat fragmentation and require consultation.
Asphalt Patching	NE	Ø			
Bank Stabilization	MA				!
Barge Staging	NE		Ø		
Bridge Deck Repair	NLAA CC[1]			*	
Bridge Deck Replacement	MA				!
Bridge Painting	NLAA CC[1]			*	
Bridge Rail Repair/Replacement	NLAA CC[1]			*	
Bridge Substructure New, Replacement, or Repair - Ephemeral	MA				!
Bridge Substructure New, Replacement, or Repair - Intermittent	MA				!
Bridge Substructure New, Replacement, or Repair - Perennial	MA				!
Bridge Superstructure New & Replacement - Ephemeral	MA				!
Bridge Superstructure New & Replacement - Intermittent	MA				!
Bridge Superstructure New & Replacement - Perennial	MA				!
Channel Grade Stabilization Structures	MA				!
Channelization, Ephemeral	MA				!
Channelization, Intermittent	MA				!
Channelization, Perennial	MA				!
Clearing and Grubbing - Non-woody Vegetation	MA				!
Clearing and Grubbing - Trees & Shrubs	MA				!
Cofferdams	MA				!
Concrete Pavement Repair	NE	Ø			
Crack Sealing and Joint Sealing	NE	Ø			
Culvert New, Replacement, Extension, Repair - Ephemeral	MA				!
Culvert New, Replacement, Extension, Repair - Intermittent	MA				!
Culvert New, Replacement, Extension, Repair - Perennial	MA				!
Curb & Flume	MA				!
Curb & Gutter	MA				!
Detention Basin	MA				!
De-watering	MA				!
Drilled Shafts	MA				!
Earth Shoulder Construction	MA				!
Erosion Control - Barriers	MA				!
Erosion Control - Erosion Checks	MA				!
Erosion Control - Inlet/Outlet Protection	MA				!
Erosion Control - Mulching	MA				!
Erosion Control - Rolled Erosion Control	MA				!
Erosion Control - Slope Interruption	MA				!
Erosion Control - Traps and Basins	MA				!
Erosion Control - Vegetation	MA				!
Fencing	MA				!
Grading Within the Hinge Point	MA				!
Grading Outside the Hinge Point	MA				!
Guardrail Repair with Soil Disturbance	MA				!
Guardrail Repair without Soil Disturbance	NE		Ø		
Habitat Fragmentation, Modification of Connectivity	MA				!
Landscaping	MA				!
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	MA				!
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	MA				!
Microsurfacing	NE	Ø			
Milling and/or In-place Recycling	NE	Ø			
Nighttime work with Lights	MA				!
Noise Walls (Not in water/wetlands)	MA				!
Overpass	MA				!
Pavement Removal	NE	Ø			
Paving	NE	Ø			
Piers	MA				!
Pile Driving - Impact	MA				!
Pile Driving - Vibratory	MA				!
Pile/Pier Encasement	MA				!
Pipe Jacking & Casing	MA				!
Pre-watering	MA				!
Removal of Structures and Obstructions	MA				!
Replacing a Bridge with a Culvert	MA				!
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE		Ø		
Retaining Walls (NOT IN Water/Wetlands)	MA				!
Rock or Gravel Surfacing	NE		Ø		
Shoo-fly	MA				!
Sidewalks and Bikeways	MA				!
Signs with Soil Disturbance	MA				!
Signs without Soil Disturbance	NE		Ø		
Stream Channel Impact, Ephemeral	MA				!
Stream Channel Impact, Intermittent	MA				!
Stream Channel Impact, Perennial	MA				!
Temporary Crossing, Causeway, Work-Platform	MA				!
Trenched Widening	MA				!
Underground Utility Conduit	MA				!
Wetland Mitigation	MA				!

SALTWORT

Salicornia rubra
Federal Status: Not Listed
Nebraska Status: Endangered

Photo by Chris Helzer, The Nature Conservancy

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck which does not support plant growth. Since these activities do not occur within suitable habitat for the Saltwort, there will be ***no effect*** on the species.	These activities occur in paved areas, open water, areas previously disturbed by other construction activities, and generally in locations that do not support suitable habitat for the Saltwort which occurs on salt flats of saline meadows in wet, clayey, highly saline soils. Since the activities do not occur in locations with suitable habitat, there will be ***no effect*** on the species.	Night-time work with lights does not directly utilize or alter suitable habitat for the Saltwort, and it does not directly or indirectly impact the species. Therefore, there will be ***no effect*** on the species.	These bridge activities could impact suitable habitat for the Saltwort, with the possible effects of crushing the plants or contaminating the soils. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 1).	These activities occur in salt flats, saline wetlands, or saline soils. Since the project area could support suitable habitat for the Saltwort, the activities ***may affect*** the species, and require consultation.
Asphalt Patching	NE	Ø				
Bank Stabilization	MA					!
Barge Staging	NE					
Bridge Deck Repair	NLAA CC[1]				*	
Bridge Deck Replacement	NLAA CC[1]				*	
Bridge Painting	NLAA CC[1]				*	
Bridge Rail Repair/Replacement	NLAA CC[1]				*	
Bridge Substructure New, Replacement, or Repair - Ephemeral	MA					!
Bridge Substructure New, Replacement, or Repair - Intermittent	MA					!
Bridge Substructure New, Replacement, or Repair - Perennial	MA					!
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC[1]				*	
Bridge Superstructure New & Replacement - Intermittent	NLAA CC[1]				*	
Bridge Superstructure New & Replacement - Perennial	NLAA CC[1]				*	
Channel Grade Stabilization Structures	MA					!
Channelization, Ephemeral	MA					!
Channelization, Intermittent	MA					!
Channelization, Perennial	MA					!
Clearing and Grubbing - Non-woody Vegetation	MA					!
Clearing and Grubbing - Trees & Shrubs	MA					!
Cofferdams	MA					!
Concrete Pavement Repair	NE	Ø				
Crack Sealing and Joint Sealing	NE	Ø				
Culvert New, Replacement, Extension, Repair - Ephemeral	MA					!
Culvert New, Replacement, Extension, Repair - Intermittent	MA					!
Culvert New, Replacement, Extension, Repair - Perennial	MA					!
Curb & Flume	MA					!
Curb & Gutter	MA					!
Detention Basin	MA					!
De-watering	MA					!
Drilled Shafts	MA					!
Earth Shoulder Construction	MA					!
Erosion Control - Barriers	MA					!
Erosion Control - Erosion Checks	MA					!
Erosion Control - Inlet/Outlet Protection	MA					!
Erosion Control - Mulching	MA					!
Erosion Control - Rolled Erosion Control	MA					!
Erosion Control - Slope Interruption	MA					!
Erosion Control - Traps and Basins	MA					!
Erosion Control - Vegetation	MA					!
Fencing	MA					!
Grading Within the Hinge Point	MA					!
Grading Outside the Hinge Point	MA					!
Guardrail Repair with Soil Disturbance	MA					!
Guardrail Repair without Soil Disturbance	NE		Ø			
Habitat Fragmentation, Modification of Connectivity	MA					!
Landscaping	MA					!
Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	MA					!
Lighting, Traffic & Pedestrian Signals, DMS w/o Soil Disturbance	NE		Ø			
Microsurfacing	NE		Ø			
Milling and/or In-place Recycling	NE		Ø			
Nighttime work with Lights	NE			Ø		
Noise Walls (Not in water/wetlands)	MA					!
Overpass	MA					!
Pavement Removal	NE		Ø			
Paving	NE		Ø			
Piers	MA					!
Pile Driving - Impact	MA					!
Pile Driving - Vibratory	MA					!
Pile/Pier Encasement	MA					!
Pipe Jacking & Casing	MA					!
Pre-watering	MA					!
Removal of Structures and Obstructions	MA					!
Replacing a Bridge with a Culvert	MA					!
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE		Ø			
Retaining Walls (NOT IN Water/Wetlands)	MA					!
Rock or Gravel Surfacing	NE		Ø			
Shoo-fly	MA					!
Sidewalks and Bikeways	MA					!
Signs with Soil Disturbance	MA					!
Signs without Soil Disturbance	NE				Ø	
Stream Channel Impact, Ephemeral	MA					!
Stream Channel Impact, Intermittent	MA					!
Stream Channel Impact, Perennial	MA					!
Temporary Crossing, Causeway, Work-Platform	MA					!
Trenched Widening	MA					!
Underground Utility Conduit	MA					!
Wetland Mitigation	MA					!

SCALESHELL MUSSEL

Leptodea leptodon
Federal Status: Endangered
Nebraska Status: Endangered

Photo by Dr. M.C. Barnhart

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since Scaleshell Mussel does not occur in these locations, there will be ***no effect*** on the species.	These activities occur in uplands and ephemeral streams, and generally in locations that do not support suitable habitat for the Scaleshell Mussel which occurs in medium to large unpolluted rivers with mud, sand or gravel substrate, and in the upper reach of the Missouri River in Nebraska . Since the species does not occur in the location of the activities, there will be ***no effect*** on the species.	These construction activities could physically disturb the Scaleshell Mussel by causing erosion and sedimentation, and suffocation; therefore these activities may affect the species. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 1).	These construction activities could result in erosion and sedimentation, and suffocation of the Scaleshell Mussel, therefore these activities may affect the species. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 2).	Barges and other equipment used in water can carry invasive aquatic species, including the Zebra Mussel which can starve and suffocate the Scaleshell Mussel by attaching to its shell in large numbers. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 3).	These bridge activities could result in materials falling from the bridge deck and directly taking the species or indirectly altering or contaminating habitat. Therefore, this activity may affect the species. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 4).	Discharge of water or spoil into the river channel could result in erosion and sedimentation, and suffocation of the Scaleshell Mussel. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 5).	These activities ***may affect*** critical habitat due to habitat modifications, flow modifications, direct takings, and/or by increasing turbidity or sedimentation, and require consultation.
Asphalt Patching	NE	Ø						
Bank Stabilization	MA							
Barge Staging	NLAA CC [1,3]			*				
Bridge Deck Repair	NLAA CC [4]							
Bridge Deck Replacement	NLAA CC [4]							
Bridge Painting	NLAA CC [4]							
Bridge Rail Repair/Replacement	NLAA CC [4]							
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC [2,4]							
Bridge Substructure New, Replacement, or Repair - Itermittent	MA							
Bridge Substructure New, Replacement, or Repair - Perennial	MA							
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC [2, 4]							
Bridge Superstructure New & Replacement - Intermittent	NLAA CC [2, 4]							
Bridge Superstructure New & Replacement - Perennial	MA							
Channel Grade Stabilization Structures	MA							
Channelization, Ephemeral	NLAA CC [2]							
Channelization, Intermittent	MA							
Channelization, Perennial	MA							
Clearing and Grubbing - Non-woody Vegetation	NE							
Clearing and Grubbing - Trees & Shrubs	NE							
Cofferdams	NLAA CC [1,3, 5]							
Concrete Pavement Repair	NE							
Crack Sealing and Joint Sealing	NE							
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA CC [2]							
Culvert New, Replacement, Extension, Repair - Intermittent	MA							
Culvert New, Replacement, Extension, Repair - Perennial	MA							
Curb & Flume	NE							
Curb & Gutter	NE							
Detention Basin	NLAA CC [2]							
De-watering	NLAA CC [1,5]							
Drilled Shafts	NLAA CC [1,5]							
Earth Shoulder Construction	NE							
Erosion Control - Barriers	NE							
Erosion Control - Erosion Checks	NE							
Erosion Control - Inlet/Outlet Protection	NE							
Erosion Control - Mulching	NE							
Erosion Control - Rolled Erosion Control	NE							
Erosion Control - Slope Interruption	NE							
Erosion Control - Traps and Basins	NE							
Erosion Control - Vegetation	NE							
Fencing	NE							
Grading Within the Hinge Point	NE							
Grading Outside the Hinge Point	NLAA CC [1]							
Guardrail Repair with Soil Disturbance	NE							
Guardrail Repair without Soil Disturbance	NE							
Habitat Fragmentation, Modification of Connectivity	MA							
Landscaping	NE							
Lighting, Traffic and Pedestrian Signals, Dynamic Message Signs w/	NE							
Lighting, Traffic and Pedestrian Signals, Dynamic Message Signs	NE							
Microsurfacing	NE	Ø						
Milling and/or In-place Recycling	NE	Ø						
Nightime work with Lights	NE							
Noise Walls (Not in water/wetlands)	NE							
Overpass	NE							
Pavement Removal	NE	Ø						
Paving	NE	Ø						
Piers	NLAA CC [1,2,3,5]							
Pile Driving - Impact	NLAA CC [1,3]							
Pile Driving - Vibratory	NLAA CC [1,3]							
Pile/Pier Encasement	NLAA CC [1,2,3,5]							
Pipe Jacking & Casing	NE							
Pre-watering	MA							
Removal of Structures and Obstructions	NLAA CC [1,2,3]							
Replacing a Bridge with a Culvert	MA							
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	Ø						
Retaining Walls (NOT IN Water/Wetlands)	NE							
Rock or Gravel Surfacing	NE	Ø						
Shoo-fly	MA							
Sidewalks and Bikeways	NE							
Signs with Soil Disturbance	NE							
Signs without Soil Disturbance	NE							
Stream Channel Impact, Ephemeral	NLAA CC [2]							
Stream Channel Impact, Intermittent	MA							
Stream Channel Impact, Perennial	MA							
Temporary Crossing, Causeway, Work-Platform	NLAA CC [1,2,3, 5]							
Trenched Widening	NE							
Underground Utility Conduit	NE							
Wetland Mitigation	NLAA CC [1]							

SMALL WHITE LADY'S SLIPPER

Cypripedium candidum
Federal Status: Not Listed
Nebraska Status: Threatened

Photo by Eugene Reimer

ACTIVITIES

EFFECTS and JUSTIFICATION

Activities	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck which does not support plant growth. Since these activities do not occur within suitable habitat for the Small White Lady's Slipper, there will be ***no effect*** on the species.	These activities occur in open water, paved areas, urbanized locations, areas previously disturbed by other construction activities, and generally in locations that do not support suitable habitat for the Small White Lady's Slipper which occurs in moist prairies and sedge meadows. Since the activities do not occur in locations with suitable habitat, there will be ***no effect*** on the species.	Night-time work with lights does not directly utilize or alter suitable habitat for the Small White Lady's Slipper, and it does not directly or indirectly impact the species. Therefore, there will be ***no effect*** on the species.	These activities could disturb suitable habitat for the Small White Lady's Slipper. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect the species*** (see Conservation Condition 1).	These activities could indirectly affect the hydrology of the area and thereby affect the Small White Lady's Slipper. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 1).	These bridge activities could impact suitable habitat for Small White Lady's Slipper, with the possible effects of crushing plants or contaminating soils. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).	Habitat fragmentation activities could reduce the amount, size, or other aspect of habitat suitability for the Small White Lady's Slipper. Reduction in habitat suitability ***may affect*** the species, and requires consultation.
Asphalt Patching	NE	Ø						
Bank Stabilization	NLAA CC [1]				*			
Barge Staging	NE		Ø					
Bridge Deck Repair	NLAA CC [2] or [1]				*		*	
Bridge Deck Replacement	NLAA CC [2] or [1]				*		*	
Bridge Painting	NLAA CC [2] or [1]				*		*	
Bridge Rail Repair/Replacement	NLAA CC [2] or [1]				*		*	
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC [1]				*			
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC [1]				*			
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA CC [1]				*			
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC [2] or [1]				*		*	
Bridge Superstructure New & Replacement - Intermittent	NLAA CC [2] or [1]				*		*	
Bridge Superstructure New & Replacement - Perennial	NLAA CC [2] or [1]				*		*	
Channel Grade Stabilization Structures	NLAA CC [1]				*			
Channelization, Ephemeral	NLAA CC [1]				*			
Channelization, Intermittent	NLAA CC [1]				*			
Channelization, Perennial	NLAA CC [1]				*			
Clearing and Grubbing - Non-woody Vegetation	NLAA CC [1]				*			
Clearing and Grubbing - Trees & Shrubs	NLAA CC [1]				*			
Cofferdams	NLAA CC [1]				*			
Concrete Pavement Repair	NE	Ø						
Crack Sealing and Joint Sealing	NE	Ø						
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA CC [1]				*			
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA CC [1]				*			
Culvert New, Replacement, Extension, Repair - Perennial	NLAA CC [1]				*			
Curb & Flume	NLAA CC [1]				*			
Curb & Gutter	NE		Ø					
Detention Basin	NLAA CC [1]					*		
De-watering	NLAA CC [1]				*			
Drilled Shafts	NE		Ø					
Earth Shoulder Construction	NLAA CC [1]				*			
Erosion Control - Barriers	NE		Ø					
Erosion Control - Erosion Checks	NE		Ø					
Erosion Control - Inlet/Outlet Protection	NE		Ø					
Erosion Control - Mulching	NLAA CC [1]				*			
Erosion Control - Rolled Erosion Control	NE		Ø					
Erosion Control - Slope Interruption	NE		Ø					
Erosion Control - Traps and Basins	NE		Ø					
Erosion Control - Vegetation	NLAA CC [1]				*			
Fencing	NLAA CC [1]				*			
Grading Within the Hinge Point	NLAA CC [1]				*			
Grading Outside the Hinge Point	NLAA CC [1]				*			
Guardrail Repair with Soil Disturbance	NLAA CC [1]				*			
Guardrail Repair without Soil Disturbance	NE		Ø					
Habitat Fragmentation, Modification of Connectivity	MA							!
Landscaping	NLAA CC [1]				*			
Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	NLAA CC [1]				*			
Lighting, Traffic & Pedestrian Signals, DMS w/o Soil Disturbance	NE		Ø					
Microsurfacing	NE	Ø						
Milling and/or In-place Recycling	NE	Ø						
Nighttime work with Lights	NE			Ø				
Noise Walls (Not in water/wetlands)	NLAA CC [1]				*			
Overpass	NLAA CC [1]				*			
Pavement Removal	NE	Ø						
Paving	NE	Ø						
Piers	NLAA CC [1]				*			
Pile Driving - Impact	NLAA CC [1or2]				*		*	
Pile Driving - Vibratory	NLAA CC [1or2]				*		*	
Pile/Pier Encasement	NLAA CC [1]				*			
Pipe Jacking & Casing	NLAA CC [1]				*			
Pre-watering	NLAA CC [1]				*			
Removal of Structures and Obstructions	NLAA CC [1]				*			
Replacing a Bridge with a Culvert	NLAA CC [1]				*			
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	Ø						
Retaining Walls (NOT IN Water/Wetlands)	NLAA CC [1]				*			
Rock or Gravel Surfacing	NE	Ø						
Shoo-fly	NLAA CC [1]				*			
Sidewalks and Bikeways	NE		Ø					
Signs with Soil Disturbance	NLAA CC [1]				*			
Signs without Soil Disturbance	NE		Ø					
Stream Channel Impact, Ephemeral	NLAA CC [1]				*			
Stream Channel Impact, Intermittent	NLAA CC [1]				*			
Stream Channel Impact, Perennial	NLAA CC [1]				*			
Temporary Crossing, Causeway, Work-Platform	NLAA CC [1]				*			
Trenched Widening	NLAA CC [1]				*			
Underground Utility Conduit	NLAA CC [1]				*			
Wetland Mitigation	NLAA CC [1]				*			

STURGEON CHUB

Macrhybopsis gelida
Federal Status: Not Listed
Nebraska Status: Endangered

Photo by David Ostendorf

ACTIVITIES

EFFECTS and JUSTIFICATION

EFFECTS and JUSTIFICATION	Asphalt Patching	Bank Stabilization	Barge Staging	Bridge Deck Repair	Bridge Deck Replacement	Bridge Painting	Bridge Rail Repair/Replacement	Bridge Substructure New, Replacement, or Repair - Ephemeral	Bridge Substructure New, Replacement, or Repair - Intermittent	Bridge Substructure New, Replacement, or Repair - Perennial	Bridge Superstructure New & Replacement - Ephemeral	Bridge Superstructure New & Replacement - Intermittent	Bridge Superstructure New & Replacement - Perennial	Channel Grade Stabilization Structures	Channelization, Ephemeral	Channelization, Intermittent	Channelization, Perennial	Clearing and Grubbing - Non-woody Vegetation	Clearing and Grubbing - Trees & Shrubs	Cofferdams	Concrete Pavement Repair	Crack Sealing and Joint Sealing	Culvert New, Replacement, Extension, Repair - Ephemeral	Culvert New, Replacement, Extension, Repair - Intermittent	Culvert New, Replacement, Extension, Repair - Perennial	Curb & Flume	Curb & Gutter	Detention Basin	De-watering	Drilled Shafts	Earth Shoulder Construction	Erosion Control - Barriers	Erosion Control - Erosion Checks	Erosion Control - Inlet/Outlet Protection	Erosion Control - Mulching	Erosion Control - Rolled Erosion Control	Erosion Control - Slope Interruption	Erosion Control - Traps and Basins	Erosion Control - Vegetation	Fencing	Grading Within the Hinge Point	Grading Outside the Hinge Point	Guardrail Repair with Soil Disturbance	Guardrail Repair without Soil Disturbance	Habitat Fragmentation, Modification of Connectivity	Landscaping	Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	Lighting, Traffic & Pedestrian Signals, DMS w/out Soil Disturbance	Microsurfacing	Milling and/or In-place Recycling	Nighttime work with Lights	Noise Walls (Not in water/wetlands)	Overpass	Pavement Removal	Paving	Piers	Pile Driving - Impact	Pile Driving - Vibratory	Pile/Pier Encasement	Pipe Jacking & Casing	Pre-watering	Removal of Structures and Obstructions	Replacing a Bridge with a Culvert	Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	Retaining Walls (NOT IN Water/Wetlands)	Rock or Gravel Surfacing	Shoo-fly	Sidewalks and Bikeways	Signs with Soil Disturbance	Signs without Soil Disturbance	Stream Channel Impact, Ephemeral	Stream Channel Impact, Intermittent	Stream Channel Impact, Perennial	Temporary Crossing, Causeway, Work-Platform	Trenched Widening	Underground Utility Conduit	Wetland Mitigation
Effect Determination	NE	MA	NLAA CC[1]	NLAA CC[4]	NLAA CC[4]	NLAA CC[4]	NLAA CC[4]	NE	MA	MA	NLAA CC[4]	NLAA CC[4]	NLAA CC[4]	MA	NE	MA	MA	NLAA CC[7]	NLAA CC[7]	NLAA CC[1]	NE	NE	NE	MA	MA	NE	NE	NLAA CC[2]	NLAA CC[5]	NLAA CC[3,5]	NE	NE	NE	NE	NE	NE	NE	NE	NE	NE	NE	NLAA CC[7] or MA	NE	NE	MA	NE	NE	NE	NE	NE	NE	NE	NE	NE	NE	NLAA CC[1,7]	NLAA CC[1]	NLAA CC[1]	NLAA CC[1,5]	NLAA CC[1]	MA	NLAA CC[6,7]	NE	NE	NE	NE	NLAA CC[6]	NE	NE	NE	NE	MA	MA	NLAA CC[1,5,6]	NE	NE	MA
The scope of work for these activities is limited to the road surface/bridge deck. Since the Sturgeon Chub does not occur in these locations, there will be ***no effect*** on the species.	Ø																				Ø	Ø																											Ø	Ø				Ø	Ø											Ø											
These activities occur in paved areas, urbanized locations, uplands, ephmeral streams, and generally in locations that do not support suitable habitat for the Sturgeon Chub which occurs in large silty rivers with a diversity of depths and velocities, and primarily in the Missouri and lower Platte Rivers in Nebraska. Since the species does not occur in the location of the activities, there will be ***no effect*** on the species.								Ø							Ø								Ø			Ø	Ø				Ø	Ø	Ø	Ø	Ø	Ø	Ø	Ø	Ø	Ø	Ø		Ø	Ø		Ø	Ø	Ø				Ø	Ø										Ø	Ø	Ø			Ø	Ø	Ø	Ø				Ø	Ø	
Night-time work with lights does not directly or indirectly impact this fish species. Therefore, there will be ***no effect*** on the species.																																																			Ø																										
Construction noise could disturb reproductive and foraging activities for the Sturgeon Chub due to both vibratory and acoustical impacts. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 1).			*																	*																																				*	*	*	*	*														*			
Construction of detention basins could result in erosion and sedimentation, and reduction in water quality for the Sturgeon Chub. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).																												*																																																	
Disposal of drill cuttings within the river channel could result in erosion, sedimentation, and turbidity, which could directly take species through suffocation of larval sturgeon. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 3).																														*																																														
These bridge activities could result in materials falling from the bridge deck and directly taking or indirectly altering or contaminating its habitat. Therefore, this activity may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 4).				*	*	*	*				*	*	*																																																																
Discharge of water or spoil into the river channel could result in erosion, sedimentation, and turbidity, which could directly take species through suffocation of larval sturgeon. These types of activities could also degrade suitable habitat. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 5).																													*	*																													*														*			
Flow modifications or disturbances within the river channel could affect the amount and connectivity of suitable habitat for the Pallid Sturgeon. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 6).																																																														*					*							*			
These activities could result in downstream erosion and sedimentation, and reduction in water quality in suitable habitat for the Sturgeon Chub. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect the species*** (see Conservation Condition 7).																		*	*																							*														*						*															
These activities ***may affect*** the species due to habitat modifications, flow modifications, direct takings, and/or by increasing sedimentation, and require consultation.		!							!	!				!		!	!							!	!																	!			!																!											!	!				!

SOUTHERN FLYING SQUIRREL

Federal Status: Not Listed
Nebraska Status: Threatened

Photo by Michael Patrikeev

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since the Southern Flying Squirrel does not permanently occupy these areas and they are not critical to the species life history, there will be ***no effect*** on the species.	The Southern Flying Squirrel is found in hardwood forests along the Missouri River in Nebraska. These activities occur in streams and bottomlands, paved areas, urbanized locations, areas previously disturbed by other construction activities, and generally in locations that do not support suitable habitat. Since the species does not occur in the location of the activity, there will be ***no effect*** on the species.	Construction activities could create noise or human disturbances for the Southern Flying Squirrel, which may cause them to abandon their denning cavities. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 1).	These activities involve reestablishment of vegetation in areas disturbed by construction, which could alter the habitat structure and species composition. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 2).	Roadway lighting or night-time work with lights could create disrupt night-time activities for the Southern Flying Squirrel. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 3).	These activities ***may affect*** the species due to habitat modifications, direct takings, and/or habitat fragmentation and require consultation.
Asphalt Patching	NE	Ø					
Bank Stabilization	NE		Ø				
Barge Staging	NE		Ø				
Bridge Deck Repair							
Bridge Deck Replacement	NLAA CC [1]			*			
Bridge Painting	NE						
Bridge Rail Repair/Replacement	NE		Ø				
Bridge Substructure New, Replacement, or Repair - Ephemeral							
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC [1]			*			
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA CC [1]			*			
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC [1]			*			
Bridge Superstructure New & Replacement - Intermittent							
Bridge Superstructure New & Replacement - Perennial	NLAA CC [1]			*			
Channel Grade Stabilization Structures	NE		Ø				
Channelization, Ephemeral	NE		Ø				
Channelization, Intermittent							
Channelization, Perennial	NE		Ø				
Clearing and Grubbing - Non-woody Vegetation	NE		Ø				
Clearing and Grubbing - Trees & Shrubs	MA		Ø				
Cofferdams	NE		Ø				
Concrete Pavement Repair							
Crack Sealing and Joint Sealing	NLAA CC [1]			*			
Culvert New, Replacement, Extension, Repair - Ephemeral	NE		Ø				
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA CC [1]			*			
Culvert New, Replacement, Extension, Repair - Perennial							
Curb & Flume	NLAA CC [1]			*			
Curb & Gutter	NE		Ø				
Detention Basin	NE		Ø				
De-watering							
Drilled Shafts	NE		Ø				
Earth Shoulder Construction	NLAA CC [1]			*			
Erosion Control - Barriers	NE		Ø				
Erosion Control - Erosion Checks							
Erosion Control - Inlet/Outlet Protection	NE		Ø				
Erosion Control - Mulching	NE		Ø				
Erosion Control - Rolled Erosion Control							
Erosion Control - Slope Interruption	NE		Ø				
Erosion Control - Traps and Basins	NE		Ø				
Erosion Control - Vegetation	NE		Ø				
Fencing							
Grading Within the Hinge Point	NLAA CC [1]			*			
Grading Outside the Hinge Point	NE		Ø				
Guardrail Repair with Soil Disturbance	MA		Ø				
Guardrail Repair without Soil Disturbance							
Habitat Fragmentation, Modification of Connectivity	NE		Ø				
Landscaping	NLAA CC [2]			*			
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	NLAA CC [1,3]			*			
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance							
Microsurfacing	NE		Ø				
Milling and/or In-place Recycling	NE		Ø				
Nighttime work with Lights	NLAA CC [3]			*			
Noise Walls (Not in water/wetlands)							
Overpass	NLAA CC [1]			*			
Pavement Removal	MA		Ø				
Paving							
Piers	NLAA CC [1]			*			
Pile Driving - Impact	NLAA CC [1]			*			
Pile Driving - Vibratory	NLAA CC [1]			*			
Pile/Pier Encasement							
Pipe Jacking & Casing	NLAA CC [1]			*			
Pre-watering	NE		Ø				
Removal of Structures and Obstructions	NE		Ø				
Replacing a Bridge with a Culvert							
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE		Ø				
Retaining Walls (NOT IN Water/Wetlands)	NE		Ø				
Rock or Gravel Surfacing	NE		Ø				
Shoo-fly							
Sidewalks and Bikeways	NLAA CC [1]			*			
Signs with Soil Disturbance	NE		Ø				
Signs without Soil Disturbance	NE		Ø				
Stream Channel Impact, Ephemeral							
Stream Channel Impact, Intermittent	NE		Ø				
Stream Channel Impact, Perennial	NE		Ø				
Temporary Crossing, Causeway, Work-Platform							
Trenched Widening	NE		Ø				
Underground Utility Conduit	NE		Ø				
Wetland Mitigation	NE		Ø				

SWIFT FOX

Federal Status: Not Listed
Nebraska Status: Endangered

Photo by Greg Lasley

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since the Swift fox does not permanently occupy these areas and they are not critical to the species life history, there will be ***no effect*** on the species.	Swift Fox inhabit shortgrass prairies and build their dens or occupy existing dens in loose soils on open prairies, along fences, or in tilled fields. These activities occur in open water, paved areas, areas previously disturbed by recent project activities (which were assessed through the matrix process), and in locations that do not support suitable habitat. Since the species does not occur in the location of the activity, there will be ***no effect*** on the species.	Construction activities could impact the species through directly harming the animal, impacting the animal by disturbing breeding or foraging behaviors, disturbance of occupied or suitable unoccupied dens, or indirectly modifying habitat. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 1).	Construction activities could create noise or disturbances for the species during construction/installation and impact the animal by disturbing breeding or foraging behaviors, or disturbing occupied dens. Based on the short duration of the activity and implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 2).	These activities ***may affect*** the species due to habitat modifications, direct takings, habitat fragmentation, and/or impacts to movement and to visual vantage points and require consultation.
Asphalt Patching	NE	Ø				
Bank Stabilization	NLAA CC [1]			*		
Barge Staging	NE		Ø			
Bridge Deck Repair	NE	Ø				
Bridge Deck Replacement	NE	Ø				
Bridge Painting	NE	Ø				
Bridge Rail Repair/Replacement	NE	Ø				
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC [1]			*		
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC [1]			*		
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA CC [1]			*		
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC [1]			*		
Bridge Superstructure New & Replacement - Intermittent	NLAA CC [1]			*		
Bridge Superstructure New & Replacement - Perennial	NLAA CC [1]			*		
Channel Grade Stabilization Structures	NLAA CC [1]			*		
Channelization, Ephemeral	NLAA CC [1]			*		
Channelization, Intermittent	NLAA CC [1]			*		
Channelization, Perennial	NLAA CC [1]			*		
Clearing and Grubbing - Non-woody Vegetation	NLAA CC [1]			*		
Clearing and Grubbing - Trees & Shrubs	NLAA CC [1]			*		
Cofferdams	NE	Ø				
Concrete Pavement Repair	NE	Ø				
Crack Sealing and Joint Sealing	NE	Ø				
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA CC [1]			*		
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA CC [1]			*		
Culvert New, Replacement, Extension, Repair - Perennial	NLAA CC [1]			*		
Curb & Flume	NLAA CC [1]			*		
Curb & Gutter	NE	Ø				
Detention Basin	NLAA CC [1]			*		
De-watering	NE	Ø				
Drilled Shafts	NLAA CC [1]			*		
Earth Shoulder Construction	NLAA CC [1]			*		
Erosion Control - Barriers	NE	Ø				
Erosion Control - Erosion Checks	NE	Ø				
Erosion Control - Inlet/Outlet Protection	NE	Ø				
Erosion Control - Mulching	NE	Ø				
Erosion Control - Rolled Erosion Control	NE	Ø				
Erosion Control - Slope Interruption	NE	Ø				
Erosion Control - Traps and Basins	NE	Ø				
Erosion Control - Vegetation	NE	Ø				
Fencing	MA	Ø				!
Grading Within the Hinge Point	NLAA CC [1]			*		
Grading Outside the Hinge Point	NLAA CC [1]			*		
Guardrail Repair with Soil Disturbance	NLAA CC [1]			*		
Guardrail Repair without Soil Disturbance	NE	Ø				
Habitat Fragmentation, Modification of Connectivity	MA	Ø				!
Landscaping	NLAA CC [1]			*		
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	NLAA CC [1]			*		
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	NE	Ø				
Microsurfacing	NE	Ø				
Milling and/or In-place Recycling	NE	Ø				
Nighttime work with Lights	NLAA CC [1]			*		
Noise Walls (Not in water/wetlands)	MA	Ø				!
Overpass	NLAA CC [1]			*		
Pavement Removal	NE	Ø				
Paving	NE	Ø				
Piers	NLAA CC [1]			*		
Pile Driving - Impact	NLAA CC [1]			*		
Pile Driving - Vibratory	NLAA CC [1]			*		
Pile/Pier Encasement	NLAA CC [1]			*		
Pipe Jacking & Casing	NLAA CC [1]			*		
Pre-watering	NLAA CC [1]			*		
Removal of Structures and Obstructions	NLAA CC [1]			*		
Replacing a Bridge with a Culvert	NLAA CC [1]			*		
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	Ø				
Retaining Walls (NOT IN Water/Wetlands)	NLAA CC [1]			*		
Rock or Gravel Surfacing	NE	Ø				
Shoo-fly	NLAA CC [1]			*		
Sidewalks and Bikeways	NE	Ø				
Signs with Soil Disturbance	NLAA CC [2]				*	
Signs without Soil Disturbance	NE	Ø				
Stream Channel Impact, Ephemeral	NLAA CC [1]			*		
Stream Channel Impact, Intermittent	NLAA CC [1]			*		
Stream Channel Impact, Perennial	NLAA CC [1]			*		
Temporary Crossing, Causeway, Work-Platform	NLAA CC [1]			*		
Trenched Widening	NE	Ø				
Underground Utility Conduit	NLAA CC [1]			*		
Wetland Mitigation	NLAA CC [1]			*		

TOPEKA SHINER

Notropis topeka
Federal Status: Endangered
Nebraska Status: Endangered

Photo from Kansas DW & P

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since the Topeka Shiner does not occur in these locations, there will be ***no effect*** on the species.	These activities occur in paved areas, urbanized locations, uplands, large rivers, and generally in locations that do not support suitable habitat for the Topeka Shiner which occurs in small quiet clear prairie creeks or spring-fed pools in larger streams, in Cherry County wetlands and North Loup landscapes in Nebraska. Since the species does not occur in the location of the activities, there will be ***no effect*** on the species.	Night-time work with lights does not directly or indirectly impact this fish species. Therefore, there will be ***no effect*** on the species.	Construction of detention basins could result in erosion and sedimentation, and reduction in water quality for the Topeka Shiner. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 1)**.**	These bridge activities could result in materials falling from the bridge deck and impacting the Topeka Shiner or its habitat. Therefore, this activity may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2)**.**	Topeka Shiner utilizes shrubby overhangs along creek banks. Construction activities may destroy or remove this type of vegetation, which may affect species habitat. Landscaping and revegetation involves reestablishment of upland vegetation in areas disturbed by construction, and the type of plants used may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affec*** t the species (see Conservation Condition 3).	These activities ***may affect*** the species due to habitat modifications, flow modifications, direct takings, and/or by increasing turbidity or sedimentation, and require consultation.
Asphalt Patching	NE	Ø						
Bank Stabilization	MA							
Barge Staging	NE		Ø					
Bridge Deck Repair	NLAA CC[2]							
Bridge Deck Replacement	MA							
Bridge Painting	NLAA CC[2]							
Bridge Rail Repair/Replacement	NLAA CC[2]							
Bridge Substructure New, Replacement, or Repair - Ephemeral	MA							
Bridge Substructure New, Replacement, or Repair - Intermittent	MA							
Bridge Substructure New, Replacement, or Repair - Perennial	MA							
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC[2]							
Bridge Superstructure New & Replacement - Intermittent	NLAA CC[2]							
Bridge Superstructure New & Replacement - Perennial	NLAA CC[2]							
Channel Grade Stabilization Structures	MA							
Channelization, Ephemeral	MA							
Channelization, Intermittent	MA							
Channelization, Perennial	MA							
Clearing and Grubbing - Non-woody Vegetation	MA							
Clearing and Grubbing - Trees & Shrubs	MA							
Cofferdams	MA							
Concrete Pavement Repair	NE	Ø						
Crack Sealing and Joint Sealing	NE	Ø						
Culvert New, Replacement, Extension, Repair - Ephemeral	MA							
Culvert New, Replacement, Extension, Repair - Intermittent	MA							
Culvert New, Replacement, Extension, Repair - Perennial	MA							
Curb & Flume	NE		Ø					
Curb & Gutter	NE		Ø					
Detention Basin	NLAA CC[1]		Ø		*			
De-watering	MA							
Drilled Shafts	MA							
Earth Shoulder Construction	NE		Ø					
Erosion Control - Barriers	NE		Ø					
Erosion Control - Erosion Checks	NE		Ø					
Erosion Control - Inlet/Outlet Protection	NE		Ø					
Erosion Control - Mulching	NE		Ø					
Erosion Control - Rolled Erosion Control	NE		Ø					
Erosion Control - Slope Interruption	NE		Ø					
Erosion Control - Traps and Basins	NE		Ø					
Erosion Control - Vegetation	NLAA CC3		Ø					
Fencing	NE		Ø					
Grading Within the Hinge Point	NE		Ø					
Grading Outside the Hinge Point	MA		Ø					
Guardrail Repair with Soil Disturbance	NE		Ø					
Guardrail Repair without Soil Disturbance	NE		Ø					
Habitat Fragmentation, Modification of Connectivity	MA		Ø					
Landscaping	NE		Ø					
Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	NE		Ø					
Lighting, Traffic & Pedestrian Signals, DMS w/out Soil Disturbance	NE		Ø					
Microsurfacing	NE		Ø					
Milling and/or In-place Recycling	NE		Ø					
Nighttime work with Lights	NE		Ø	Ø				
Noise Walls (Not in water/wetlands)	NE		Ø					
Overpass	NE		Ø					
Pavement Removal	NE		Ø					
Paving	NE		Ø					
Piers	MA		Ø					
Pile Driving - Impact	MA		Ø					
Pile Driving - Vibratory	MA		Ø					
Pile/Pier Encasement	MA		Ø					
Pipe Jacking & Casing	MA		Ø					
Pre-watering	MA		Ø					
Removal of Structures and Obstructions	MA		Ø					
Replacing a Bridge with a Culvert	NE		Ø					
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE		Ø					
Retaining Walls (NOT IN Water/Wetlands)	NE		Ø					
Rock or Gravel Surfacing	NE		Ø					
Shoo-fly	MA		Ø					
Sidewalks and Bikeways	NE		Ø					
Signs with Soil Disturbance	NE		Ø					
Signs without Soil Disturbance	NE		Ø					
Stream Channel Impact, Ephemeral	MA		Ø					
Stream Channel Impact, Intermittent	MA		Ø					
Stream Channel Impact, Perennial	MA		Ø					
Temporary Crossing, Causeway, Work-Platform	MA		Ø					
Trenched Widening	NE		Ø					
Underground Utility Conduit	NE		Ø					
Wetland Mitigation	MA		Ø					

TOPEKA SHINER (Critical Habitat)

Notropis topeka
Federal Status: Endangered
Nebraska Status: Endangered

Photo by Garold Sneegas

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck. Since the Topeka Shiner critical habitat does not occur in these locations, there will be ***no effect*** on the critical habitat	These activities occur in paved areas, urbanized locations, uplands, large rivers, and generally in locations that do not support suitable habitat for the Topeka Shiner, which occurs in small quiet clear prairie creeks or spring-fed pools in larger streams, in Cherry County wetlands and North Loup landscapes in Nebraska. Since these areas are considered unsuitable habitat within the overall boundaries of critical habitat, actions within these areas will have ***no effect*** on the critical habitat.	Night-time work with lights does not directly or indirectly impact this species critical habitat. Therefore, there will be ***no effect*** on the critical habitat.	Construction of detention basins could result in erosion and sedimentation, and reduction in water quality within critical habitat. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the critical habitat (see Conservation Condition 1)**.**	These bridge activities could result in materials falling from the bridge deck and impacting or modifying critical habitat. Therefore, this activity may affect the critical habitat. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversey affect*** the critical habitat (see Conservation Condition 2)**.**	Topeka Shiner utilizes shrubby overhangs along creek banks. Construction activities may destroy or remove this type of vegetation, which may affect species habitat. Landscaping and revegetation involves reestablishment of upland vegetation in areas disturbed by construction, and the type of plants used may affect the species. With implementation of conservation conditions, potential impacts will be minimized; therefore, this activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 3).	These activities may affect critical habitat due to habitat modifications, flow modifications, direct takings, and/or by increasing turbidity or sedimentation, and require consultation.
Asphalt Patching	NE							
Bank Stabilization	MA							
Barge Staging	NE							
Bridge Deck Repair	NLAA CC[2]							
Bridge Deck Replacement	MA							
Bridge Painting	NLAA CC[2]							
Bridge Rail Repair/Replacement	NLAA CC[2]							
Bridge Substructure New, Replacement, or Repair - Ephemeral	MA							
Bridge Substructure New, Replacement, or Repair - Intermittent	MA							
Bridge Substructure New, Replacement, or Repair - Perennial	MA							
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC[2]							
Bridge Superstructure New & Replacement - Intermittent	NLAA CC[2]							
Bridge Superstructure New & Replacement - Perennial	NLAA CC[2]							
Channel Grade Stabilization Structures	MA							
Channelization, Ephemeral	MA							
Channelization, Intermittent	MA							
Channelization, Perennial	MA							
Clearing and Grubbing - Non-woody Vegetation	MA							
Clearing and Grubbing - Trees & Shrubs	MA							
Cofferdams	MA							
Concrete Pavement Repair	NE	Ø						
Crack Sealing and Joint Sealing	NE	Ø						
Culvert New, Replacement, Extension, Repair - Ephemeral	MA							
Culvert New, Replacement, Extension, Repair - Intermittent	MA							
Culvert New, Replacement, Extension, Repair - Perennial	MA							
Curb & Flume	NE							
Curb & Gutter	NE							
Detention Basin	NLAA CC[1]							
De-watering	MA							
Drilled Shafts	MA							
Earth Shoulder Construction	NE							
Erosion Control - Barriers	NE							
Erosion Control - Erosion Checks	NE							
Erosion Control - Inlet/Outlet Protection	NE							
Erosion Control - Mulching	NE							
Erosion Control - Rolled Erosion Control	NE							
Erosion Control - Slope Interruption	NE							
Erosion Control - Traps and Basins	NE							
Erosion Control - Vegetation	NLAA CC[3]							
Fencing	NE							
Grading Within the Hinge Point	NE							
Grading Outside the Hinge Point	MA							
Guardrail Repair with Soil Disturbance	NE							
Guardrail Repair without Soil Disturbance	NE							
Habitat Fragmentation, Modification of Connectivity	MA							
Landscaping	NE							
Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	NE							
Lighting, Traffic & Pedestrian Signals, DMS w/out Soil Disturbance	NE							
Microsurfacing	NE	Ø						
Milling and/or In-place Recycling	NE	Ø						
Nighttime work with Lights	NE							
Noise Walls (Not in water/wetlands)	NE							
Overpass	NE							
Pavement Removal	NE	Ø						
Paving	NE	Ø						
Piers	MA							
Pile Driving - Impact	MA							
Pile Driving - Vibratory	MA							
Pile/Pier Encasement	MA							
Pipe Jacking & Casing	MA							
Pre-watering	MA							
Removal of Structures and Obstructions	MA							
Replacing a Bridge with a Culvert	MA							
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	Ø						
Retaining Walls (NOT IN Water/Wetlands)	NE	Ø						
Rock or Gravel Surfacing	NE							
Shoo-fly	MA							
Sidewalks and Bikeways	NE							
Signs with Soil Disturbance	NE							
Signs without Soil Disturbance	NE							
Stream Channel Impact, Ephemeral	MA							
Stream Channel Impact, Intermittent	MA							
Stream Channel Impact, Perennial	MA							
Temporary Crossing, Causeway, Work-Platform	MA							
Trenched Widening	NE							
Underground Utility Conduit	NE							
Wetland Mitigation	MA							

UTE LADIES'-TRESSES

Spiranthes diluvialis
Federal Status: Threatened
Nebraska Status: Threatened

Photo by Teresa Prendusi

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck which does not support plant growth. Since these activities do not occur within suitable habitat for the Ute Ladies'-Tresses, there will be ***no effect*** on the species.	These activities occur in open water, paved areas, urbanized locations, areas previously disturbed by other construction activities, and generally in locations that do not support suitable habitat for the Ute Ladies'-Tresses which occurs in sub-irrigated, somewhat alkaline, wet meadows. Since the activities do not occur in locations with suitable habitat, there will be ***no effect*** on the species.	Night-time work with lights does not directly utilize or alter suitable habitat for the Ute Ladies'-Tresses, and it does not directly or indirectly impact the species. Therefore, there will be ***no effect*** on the species.	These activities could disturb suitable habitat for the Ute Ladies'-Tresses. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 1).	These activities could indirectly affect the hydrology of the area and thereby affect the Ute Ladies'-Tresses. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 1).	If these activities are restricted to the area between the hinge-points of the roadway, the activity will not occur in locations with suitable habitat for the Ute Ladies'-Tresses, because the area within the hinge-point is non-natural ground with frequent disturbance. Work within the hinge-point may proceed. If these activities occur outside the hinge-point, the activity could disturb suitable habitat. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).	These bridge activities could impact suitable habitat for Ute Ladies'-Tresses, with the possible effects of crushing plants or contaminating soils. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 3).	Habitat fragmentation activities could reduce the amount, size, or other aspect of habitat suitability for the Ute Ladies'-Tresses. Reduction in habitat suitability ***may affect*** the species, and requires consultation.
Asphalt Patching	NE	Ø							
Bank Stabilization	NLAA CC[1]		Ø						
Barge Staging	NE								
Bridge Deck Repair	NLAA CC[3 or 1]				*				
Bridge Deck Replacement	NLAA CC[3 or 1]				*				
Bridge Painting	NLAA CC[3 or 1]				*				
Bridge Rail Repair/Replacement	NLAA CC[3 or 1]				*				
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC[1]				*				
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC[1]				*				
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA CC[1]				*				
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC[3 or 1]				*				
Bridge Superstructure New & Replacement - Intermittent	NLAA CC[3 or 1]				*				
Bridge Superstructure New & Replacement - Perennial	NLAA CC[3 or 1]				*				
Channel Grade Stabilization Structures	NLAA CC[1]				*				
Channelization, Ephemeral	NLAA CC[1]				*				
Channelization, Intermittent	NLAA CC[1]				*				
Channelization, Perennial	NLAA CC[1]				*				
Clearing and Grubbing - Non-woody Vegetation	NLAA CC[1]				*				
Clearing and Grubbing - Trees & Shrubs	NLAA CC[1]				*				
Cofferdams	NLAA CC[1]				*				
Concrete Pavement Repair	NE	Ø							
Crack Sealing and Joint Sealing	NE	Ø							
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA CC[1]				*				
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA CC[1]				*				
Culvert New, Replacement, Extension, Repair - Perennial	NLAA CC[1]				*				
Curb & Flume	NLAA CC[1]				*				
Curb & Gutter	NE								
Detention Basin	NLAACC[1]				*	*			
De-watering	NLAA CC[1]				*				
Drilled Shafts	NE								
Earth Shoulder Construction	NLAA CC[2]						*		
Erosion Control - Barriers	NE								
Erosion Control - Erosion Checks	NE								
Erosion Control - Inlet/Outlet Protection	NE								
Erosion Control - Mulching	NLAA CC[1]				*				
Erosion Control - Rolled Erosion Control	NE								
Erosion Control - Slope Interruption	NE								
Erosion Control - Traps and Basins	NE								
Erosion Control - Vegetation	NLAA CC[1]				*				
Fencing	NLAA CC[1]				*				
Grading Above the Hinge Point	NLAA CC[1]				*				
Grading Below the Hinge Point	NLAA CC[1]				*				
Guardrail Repair with Soil Disturbance	NLAA CC[2]				*				
Guardrail Repair without Soil Disturbance	NE								
Habitat Fragmentation, Modification of Connectivity	MA								!
Landscaping	NLAA CC[1]				*				
Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	NLAA CC[2]				*				
Lighting, Traffic & Pedestrian Signals, DMS w/o Soil Disturbance	NE								
Microsurfacing	NE	Ø							
Milling and/or In-place Recycling	NE	Ø							
Nighttime work with Lights	NE			Ø					
Noise Walls (Not in water/wetlands)	NLAA CC[1]				*				
Overpass	NLAA CC[2]				*				
Pavement Removal	NE	Ø							
Paving	NE	Ø							
Piers	NLAA CC[1]				*				
Pile Driving - Impact	NLAA CC[3 or 3]				*				
Pile Driving - Vibratory	NLAA CC[1]				*				
Pile/Pier Encasement	NLAA CC[1]				*				
Pipe Jacking & Casing	NLAA CC[1]				*				
Pre-watering	NLAA CC[1]				*				
Removal of Structures and Obstructions	NLAA CC[1]				*				
Replacing a Bridge with a Culvert	NE	Ø							
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NLAA CC[1]				*				
Retaining Walls (NOT IN Water/Wetlands)	NE	Ø							
Rock or Gravel Surfacing	NLAA CC[1]				*				
Shoo-fly	NE	Ø							
Sidewalks and Bikeways	NLAA CC[2]				*				
Signs with Soil Disturbance	NE	Ø							
Signs without Soil Disturbance	NLAA CC[1]				*				
Stream Channel Impact, Ephemeral	NLAA CC[1]				*				
Stream Channel Impact, Intermittent	NLAA CC[1]				*				
Stream Channel Impact, Perennial	NLAA CC[1]				*				
Temporary Crossing, Causeway, Work-Platform	NLAA CC[1]				*				
Trenched Widening	NE	Ø							
Underground Utility Conduit	NLAA CC[1]				*				
Wetland Mitigation	NLAA CC[2]				*				

WESTERN PRAIRIE-FRINGED ORCHID

Platanthera praeclara
Federal Status: Threatened
Nebraska Status: Threatened

Photo by J. Challey

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck which does not support plant growth. Since these activities do not occur within suitable habitat for the Western Prairie-Fringed Orchid, there will be ***no effect*** on the species.	These activities occur in open water, paved areas, urbanized locations, areas previously disturbed by other construction activities, and generally in locations that do not support suitable habitat for the Western Prairie-Fringed Orchid which occurs in wet to somewhat drier native prairies. Since the activities do not occur in locations with suitable habitat, there will be ***no effect*** on the species.	Night-time work with lights does not directly utilize or alter suitable habitat for the Western Prairie-Fringed Orchid, and it does not directly or indirectly impact the species. Therefore, there will be ***no effect*** on the species.	These activities could disturb suitable habitat for the Western Prairie-Fringed Orchid. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 1).	These activities could indirectly affect the hydrology of the area and thereby affect the Western Prairie Fringed Orchid. With implementation of conservation conditions, potential impacts will be minimized; therefore, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 1).	These bridge activities could impact suitable habitat for Western Prairie-Fringed Orchid, with the possible effects of crushing plants or contaminating soils. With implementation of conservation conditions, potential impacts will be minimized; therefore, the activity ***may affect, but is not likely to adversely affect*** the species (see Conservation Condition 2).	Habitat fragmentation activities could reduce the amount, size, or other aspect of habitat suitability for the Western Prairie-Fringed Orchid. Reduction in habitat suitability ***may affect*** the species, and requires consultation.
Asphalt Patching	NE	Ø						
Bank Stabilization	NLAA CC[1]							
Barge Staging	NE							
Bridge Deck Repair	NLAA CC[2 or 1]		Ø		*			
Bridge Deck Replacement	NLAA CC[2 or 1]				*			
Bridge Painting	NLAA CC[2 or 1]				*			
Bridge Rail Repair/Replacement	NLAA CC[2 or 1]				*			
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC[1]				*			
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC[1]				*			
Bridge Substructure New, Replacement, or Repair - Perennial	NLAA CC[1]				*			
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC[2 or 1]				*			
Bridge Superstructure New & Replacement - Intermittent	NLAA CC[2 or 1]				*			
Bridge Superstructure New & Replacement - Perennial	NLAA CC[2 or 1]				*			
Channel Grade Stabilization Structures	NLAA CC[1]				*			
Channelization, Ephemeral	NLAA CC[1]				*			
Channelization, Intermittent	NLAA CC[1]				*			
Channelization, Perennial	NLAA CC[1]				*			
Clearing and Grubbing - Non-woody Vegetation	NLAA CC[1]				*			
Clearing and Grubbing - Trees & Shrubs	NLAA CC[1]				*			
Cofferdams	NLAA CC[1]				*			
Concrete Pavement Repair	NE	Ø						
Crack Sealing and Joint Sealing	NE	Ø						
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA CC[1]				*			
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA CC[1]				*			
Culvert New, Replacement, Extension, Repair - Perennial	NLAA CC[1]				*			
Curb & Flume	NLAA CC[1]				*			
Curb & Gutter	NE		Ø					
Detention Basin	NLAA CC[1]				*			
De-watering	NLAA CC[1]				*			
Drilled Shafts	NE							
Earth Shoulder Construction	NLAA CC[1]		Ø		*			
Erosion Control - Barriers	NE				*			
Erosion Control - Erosion Checks	NE		Ø		*			
Erosion Control - Inlet/Outlet Protection	NLAA CC[1]		Ø		*			
Erosion Control - Mulching	NLAA CC[1]		Ø		*			
Erosion Control - Rolled Erosion Control	NE		Ø		*			
Erosion Control - Slope Interruption	NE		Ø		*			
Erosion Control - Traps and Basins	NE		Ø		*			
Erosion Control - Vegetation	NLAA CC[1]		Ø		*			
Fencing	NLAA CC[1]		Ø		*			
Grading Within the Hinge Point	NLAA CC[1]		Ø		*			
Grading Outside the Hinge Point	NLAA CC[1]		Ø		*			
Guardrail Repair with Soil Disturbance	NLAA CC[1]		Ø		*			
Guardrail Repair without Soil Disturbance	NE		Ø		*			
Habitat Fragmentation, Modification of Connectivity	MA		Ø		*			!
Landscaping	NLAA CC[1]		Ø		*			
Lighting, Traffic & Pedestrian Signals, DMS w/ Soil Disturbance	NLAA CC[1]		Ø		*			
Lighting, Traffic & Pedestrian Signals, DMS w/o Soil Disturbance	NE		Ø		*			
Microsurfacing	NE		Ø		*			
Milling and/or In-place Recycling	NE		Ø		*			
Nighttime work with Lights	NE		Ø		*			
Noise Walls (Not in water/wetlands)	NLAA CC[1]		Ø		*			
Overpass	NLAA CC[1]		Ø		*			
Pavement Removal	NE		Ø		*			
Paving	NE		Ø		*			
Piers	NLAA CC[1]		Ø		*			
Pile Driving - Impact	NLAA CC[1 or 2]		Ø		*			
Pile Driving - Vibratory	NLAA CC[1 or 2]		Ø		*			
Pile/Pier Encasement	NLAA CC[1]		Ø		*			
Pipe Jacking & Casing	NLAA CC[1]		Ø		*			
Pre-watering	NLAA CC[1]		Ø		*			
Removal of Structures and Obstructions	NLAA CC[1]		Ø		*			
Replacing a Bridge with a Culvert	NLAA CC[1]		Ø		*			
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE		Ø		*			
Retaining Walls (NOT IN Water/Wetlands)	NLAA CC[1]		Ø		*			
Rock or Gravel Surfacing	NE		Ø		*			
Shoo-fly	NLAA CC[1]		Ø		*			
Sidewalks and Bikeways	NE		Ø		*			
Signs with Soil Disturbance	NLAA CC[1]		Ø		*			
Signs without Soil Disturbance	NE		Ø		*			
Stream Channel Impact, Ephemeral	NLAA CC[1]		Ø		*			
Stream Channel Impact, Intermittent	NLAA CC[1]		Ø		*			
Stream Channel Impact, Perennial	NLAA CC[1]		Ø		*			
Temporary Crossing, Causeway, Work-Platform	NLAA CC[1]		Ø		*			
Trenched Widening	NLAA CC[1]		Ø		*			
Underground Utility Conduit	NLAA CC[1]		Ø		*			
Wetland Mitigation	NLAA CC[1]		Ø		*			

WHOOPING CRANE

Grus americana
Federal Status: Endangered
Nebraska Status: Endangered

Photo by Brian E. Small

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	These project activities are limited to the road surface and either occur in urbanized areas, are of short duration, and/or do not involve a significant on-ground human presence. Therefore, there will be ***no effect*** on the species.	These construction activities may occur during migratory seasons, creating noise or human disturbance that could impact the species through directly harming the animal, disturbing staging, roosting or foraging behaviors, disturbing occupied or suitable habitat, or indirectly modifying habitat. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Conditions 1 or 2).	These activities involve reestablishment of vegetation in areas disturbed by construction. The establishment of non-native species, or species that are too tall, could alter habitat suitability for the Whoopong Crane, which prefers open areas with wide visibility. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect the species*** (see Conservation Condition 3).	These activities ***may affect*** the species due to habitat modifications, direct takings, and/or habitat fragmentation and require consultation.
Asphalt Patching	NLAA CC 1 or 2		*		
Bank Stabilization	MA				!
Barge Staging	MA				!
Bridge Deck Repair	NLAA CC 1 or 2		*		
Bridge Deck Replacement	NLAA CC 1 or 2		*		
Bridge Painting	NLAA CC 1 or 2		*		
Bridge Rail Repair/Replacement	NLAA CC 1 or 2		*		
Bridge Substructure New, Replacement, or Repair - Ephemeral	NLAA CC 1 or 2		*		
Bridge Substructure New, Replacement, or Repair - Intermittent	NLAA CC 1 or 2		*		
Bridge Substructure New, Replacement, or Repair - Perennial	MA				
Bridge Superstructure New & Replacement - Ephemeral	NLAA CC 1 or 2		*		
Bridge Superstructure New & Replacement - Intermittent	NLAA CC 1 or 2		*		
Bridge Superstructure New & Replacement - Perennial	NLAA CC 1 or 2		*		
Channel Grade Stabilization Structures	NLAA CC 1 or 2		*		
Channelization, Ephemeral	NLAA CC 1 or 2		*		
Channelization, Intermittent	NLAA CC 1 or 2		*		
Channelization, Perennial	NLAA CC 1 or 2		*		
Clearing and Grubbing - Non-woody Vegetation	NLAA CC 1 or 2		*		
Clearing and Grubbing Trees & Shrubs	NLAA CC 1 or 2		*		
Cofferdams	NLAA CC 1 or 2		*		
Concrete Pavement Repair	NLAA CC 1 or 2		*		
Crack Sealing and Joint Sealing	NLAA CC 1 or 2		*		
Culvert New, Replacement, Extension, Repair - Ephemeral	NLAA CC 1 or 2		*		
Culvert New, Replacement, Extension, Repair - Intermittent	NLAA CC 1 or 2		*		
Culvert New, Replacement, Extension, Repair - Perennial	NLAA CC 1 or 2		*		
Curb & Flume	NLAA CC 1 or 2		*		
Curb & Gutter	NE	Ø			
Detention Basin	MA				!
De-watering	NLAA CC 1 or 2		*		
Drilled Shafts	NLAA CC 1 or 2		*		
Earth Shoulder Construction	NLAA CC 1 or 2		*		
Erosion Control - Barriers	NLAA CC 1 or 2		*		
Erosion Control - Erosion Checks	NLAA CC 1 or 2		*		
Erosion Control - Inlet/Outlet Protection	NLAA CC 1 or 2		*		
Erosion Control - Mulching	NLAA CC (1 or 2) plus 3		*	*	
Erosion Control - Rolled Erosion Control	NLAA CC 1 or 2		*		
Erosion Control - Slope Interruption	NLAA CC 1 or 2		*		
Erosion Control - Traps and Basins	NLAA CC 1 or 2		*		
Erosion Control - Vegetation	NLAA CC (1 or 2) plus 3		*	*	
Fencing	NLAA CC 1 or 2		*		
Grading Within the Hinge Point	NLAA CC 1 or 2		*		
Grading Outside the Hinge Point	NLAA CC 1 or 2		*		
Guardrail Repair with Soil Disturbance	NLAA CC 1 or 2		*		
Guardrail Repair without Soil Disturbance	NLAA CC 1 or 2		*		
Habitat Fragmentation, Modification of Connectivity	MA				!
Landscaping	NLAA CC (1 or 2) plus 3		*	*	
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	NLAA CC 1 or 2		*		
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	NLAA CC 1 or 2		*		
Microsurfacing	NLAA CC 1 or 2		*		
Milling and/or In-place Recycling	NLAA CC 1 or 2		*		
Nighttime work with Lights	MA				!
Noise Walls (Not in water/wetlands)	NLAA CC 1 or 2		*		
Overpass	NLAA CC 1 or 2		*		
Pavement Removal	NLAA CC 1 or 2		*		
Paving	NLAA CC 1 or 2		*		
Piers	NLAA CC 1 or 2		*		
Pile Driving - Impact	NLAA CC 1 or 2		*		
Pile Driving - Vibratory	NLAA CC 1 or 2		*		
Pile/Pier Encasement	NLAA CC 1 or 2		*		
Pipe Jacking & Casing	NLAA CC 1 or 2		*		
Pre-watering	NLAA CC 1 or 2		*		
Removal of Structures and Obstructions	NLAA CC 1 or 2		*		
Replacing a Bridge with a Culvert	NLAA CC 1 or 2		*		
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NLAA CC 1 or 2		*		
Retaining Walls (NOT IN Water/Wetlands)	NLAA CC 1 or 2		*		
Rock or Gravel Surfacing	NE	Ø			
Shoo-fly	NLAA CC 1 or 2		*		
Sidewalks and Bikeways	NLAA CC 1 or 2		*		
Signs with Soil Disturbance	NLAA CC 1 or 2		*		
Signs without Soil Disturbance	NLAA CC 1 or 2		*		
Stream Channel Impact, Ephemeral	NLAA CC 1 or 2		*		
Stream Channel Impact, Intermittent	NLAA CC 1 or 2		*		
Stream Channel Impact, Perennial	NLAA CC 1 or 2		*		
Temporary Crossing, Causeway, Work-Platform	NLAA CC 1 or 2		*		
Trenched Widening	NLAA CC 1 or 2		*		
Underground Utility Conduit	NLAA CC 1 or 2		*		
Wetland Mitigation	MA				!

WHOOPING CRANE (Critical Habitat)

Grus americana
Federal Status: Endangered
Nebraska Status: Endangered

Photo by Brian E. Small

EFFECTS and JUSTIFICATION

ACTIVITIES	Effect Determination	The scope of work for these activities is limited to the road surface/bridge deck, paved areas, and/or urbanized locations and generate temporary, minor levels of noise, which would not impact the functionality or intended conservation role of critical habitat. In addition, these activity areas do not contain primary constituent elements of critical habitat. Therefore, these activities will have ***no effect*** to designated critical habitat.	These construction activities could create noise or human disturbance during construction which may impact the primary constituent elements of critical habitat if the work occurs during the migration season. These activities, conducted outside the migration season, would not impact the functionality or intended conservation role of the critical habitat. With implementation of the conservation conditions, these activities ***may affect, but are not likely to affect*** designated critical habitat (see Conservation Condition 1).	These bridge activities could result in materials falling from the bridge deck and debris removal which would impact Whooping Crane critical habitat through directly or indirectly modifying habitat. With implementation of the conservation conditions, the activity ***may affect, but is not likely to adversely affect*** designated critical habitat (see Conservation Condition 2).	These activities involve reestablishment of vegetation in areas disturbed by construction. The establishment of non-native species, or species that are too tall, could alter habitat suitability for the Whoopong Crane, which prefers open areas with wide visibility. With implementation of the conservation conditions, these activities ***may affect, but are not likely to adversely affect*** the species (see Conservation Condition 3)	These activities ***may affect*** the species due to habitat modifications, nighttime lighting impacts, and/or habitat fragmentation and require consultation
Asphalt Patching	NE	Ø				
Bank Stabilization	MA					
Barge Staging	MA					!
Bridge Deck Repair	NLAA CC[2]		*	*		!
Bridge Deck Replacement	NLAA CC[2]		*	*		
Bridge Painting	NLAA CC[2]		*	*		
Bridge Rail Repair/Replacement	NLAA CC[2]		*	*		
Bridge Substructure New, Replacement, or Repair - Ephemeral	MA					!
Bridge Substructure New, Replacement, or Repair - Intermittent	MA					!
Bridge Substructure New, Replacement, or Repair - Perennial	MA					!
Bridge Superstructure New & Replacement - Ephemeral	MA					!
Bridge Superstructure New & Replacement - Intermittent	MA					!
Bridge Superstructure New & Replacement - Perennial	MA					!
Channel Grade Stabilization Structures	MA					!
Channelization, Ephemeral	MA					!
Channelization, Intermittent	MA					!
Channelization, Perennial	MA					!
Clearing and Grubbing - Non-woody Vegetation	MA					!
Clearing and Grubbing - Trees & Shrubs	MA					!
Cofferdams	MA					!
Concrete Pavement Repair	NLAA CC[1]		*			
Crack Sealing and Joint Sealing	NE	Ø				
Culvert New, Replacement, Extension, Repair - Ephemeral	MA					!
Culvert New, Replacement, Extension, Repair - Intermittent	MA					!
Culvert New, Replacement, Extension, Repair - Perennial	MA					!
Curb & Flume	NE	Ø				
Curb & Gutter	NE	Ø				
Detention Basin	MA					!
De-watering	MA					!
Drilled Shafts	MA					!
Earth Shoulder Construction	MA					!
Erosion Control - Barriers	NE	Ø				
Erosion Control - Erosion Checks	NE	Ø				
Erosion Control - Inlet/Outlet Protection	NE	Ø				
Erosion Control - Mulching	NLAA CC 3		*			
Erosion Control - Rolled Erosion Control	NE	Ø				
Erosion Control - Slope Interruption	NE	Ø				
Erosion Control - Traps and Basins	NE	Ø				
Erosion Control - Vegetation	NLAA CC[1 plus 3]		*		*	
Fencing	NLAA CC[1 plus 3]		*		*	
Grading Within the Hinge Point	NE	Ø				
Grading Outside the Hinge Point	MA					!
Guardrail Repair with Soil Disturbance	NE	Ø				
Guardrail Repair without Soil Disturbance	NE	Ø				
Habitat Fragmentation, Modification of Connectivity	MA					!
Landscaping	NLAA CC[1 plus 3]		*		*	
Lighting, Traffic and Pedestrian Signals, DMS w/ Soil Disturbance	MA					!
Lighting, Traffic and Pedestrian Signals, DMS w/out Soil Disturbance	MA					!
Microsurfacing	NE	Ø				
Milling and/or In-place Recycling	NE	Ø				
Nighttime work with Lights	MA					!
Noise Walls (Not in water/wetlands)	MA					!
Overpass	MA					!
Pavement Removal	NE	Ø				
Paving	NE	Ø				
Piers	MA					
Pile Driving - Impact	MA					!
Pile Driving - Vibratory	MA					!
Pile/Pier Encasement	NE	Ø				!
Pipe Jacking & Casing	MA					!
Pre-watering	NLAA CC[1]		*	*		
Removal of Structures and Obstructions	NLAA CC[1 plus 3]		*	*		
Replacing a Bridge with a Culvert	MA					!
Resurfacing-Fog/Slurry Seal, Armor Coat/Chip Seal	NE	Ø				
Retaining Walls (NOT IN Water/Wetlands)	MA					!
Rock or Gravel Surfacing	NE	Ø				
Shoo-fly	NLAA CC[1 plus 3]		*			
Sidewalks and Bikeways	NE	Ø				
Signs with Soil Disturbance	NE	Ø				
Signs without Soil Disturbance	NE	Ø				
Stream Channel Impact, Ephemeral	MA					!
Stream Channel Impact, Intermittent	MA					!
Stream Channel Impact, Perennial	MA					!
Temporary Crossing, Causeway, Work-Platform	MA					!
Trenched Widening	NE	Ø				
Underground Utility Conduit	NLAA CC[1 plus 3]			*		
Wetland Mitigation	MA					!