

FINDING OF NO SIGNIFICANT IMPACT
TENNESSEE VALLEY AUTHORITY
U. S. HIGHWAY (US) 64 IMPROVEMENTS BETWEEN FAYETTEVILLE AND
WINCHESTER

SECTION 26a APPROVAL FOR WIDENING OF A 4.179-SECTION OF STATE ROUTE
(SR) 15 (US 64) FROM THE LINCOLN COUNTY LINE TO NEAR SALEM-LEXIE ROAD
FRANKLIN COUNTY, TENNESSEE

Proposed Action and Need

On April 26, 2004, the Tennessee Department of Transportation (TDOT) submitted to the Tennessee Valley Authority (TVA) a request for approval of stream obstructions under Section 26a (of the TVA Act) needed to construct a 4.179-mile section of SR 15 (US 64) from the Lincoln County line to near Salem-Lexie Road in Franklin County, Tennessee. Locations needing Section 26a approval are:

- Station 122+05, Robinson Creek
- Station 149+04, unnamed tributary to Robinson Creek
- Station 207+36, unnamed tributary to Beans Creek
- Station 245+80, Beans Creek

The Section 26a review and approval is needed for the proposed channel relocation and alteration, bank stabilization, bridge replacements, and new culvert construction and/or replacements in this 4.179-mile section of SR 15 highway improvements. The specific locations and modifications are included in the TDOT application dated April 26, 2004, and addendum dated May 25, 2004, for utility relocations.

The above 4.179-mile project is part of a highway improvement plan for 31 miles of SR 15 (US 64) between the Fayetteville Bypass in Lincoln County to the Winchester Bypass in Franklin County, Tennessee. TDOT plans to widen the existing road to a four-lane highway between the respective bypasses in each county. The roadway construction would consist of four 12-foot directional travel lanes, 48-foot median with two at 12-foot outside shoulders and two at 6-foot inside shoulders. Upon completion, the TDOT SR 15 highway widening will act as an important four-lane connector between I-24 east of the project to I-65 west of the project. The improvements will accommodate future traffic demands while improving existing highway geometric and operational deficiencies.

The Federal Highway Administration (FHWA) and TDOT jointly prepared an Environmental Assessment (EA) dated June 8, 2000, and a Finding of No Significant Impact (FONSI) dated March 19, 2002, for the entire 31-mile improvement project. A copy of the FHWA/TDOT EA and FONSI are attached. Additional FHWA/TDOT Technical Studies, which were conducted prior to the EA preparation in order to review

the proposed project, are also attached. When TDOT Section 26a permit applications are received for additional highway sections, TVA will review this FONSI and EA to determine if the impacts are adequately assessed, and complete any appropriate additional environmental review.

Alternatives

TVA participated in the FHWA/TDOT EA preparation as a cooperating agency and provided comments to the draft EA on March 10, 1999, and to a preliminary FONSI on April 1, 2002. The United States Army Corps of Engineers (USACE) also was a cooperating agency for the EA preparation. The EA considered the "No build" and "Build" Alternatives in the original planning document. During project development and after public review, TDOT added an altered route (Alternative C) to a section that would utilize an existing rail route for the SR 15 highway, to avoid impacts to residences and businesses in the Belvidere Community.

Impacts Assessment

The FHWA/TDOT EA discusses that the entire 31-mile SR 15 (US 64) highway-widening project generally occurs along the existing highway alignment. However, throughout the proposed project length, the alignment shifts back and forth from north to south to avoid sensitive resources, such as a city park, historic properties, and fish hatchery property. Beginning in the Belvidere Community, the highway corridor would follow an abandoned railroad line in lieu of the existing roadway to avoid impacts to that community. The existing land use for the proposed project is a mix of residential/commercial, agricultural (pasture/field row crops and nursery areas), and forest. Land use would continue to be similar after completion of the project.

The primary stream sites of concern in the 31-mile highway widening project are the bridge sites across the Elk River (between river mile 99 and 100) and across Beans Creek. Both sites have relatively high quality aquatic habitats with stable banks and good canopy cover consisting of mature trees, shrubs, and herbaceous vegetation. TDOT has prepared a Biological Assessment dated November 1998, which evaluated potential impacts to mussel species from construction of the bridges. No mussels were found at the Beans Creek site and one federally listed species of concern was found at the Elk River site. To prevent impacts to any mussels, divers would survey the area prior to construction of the bridges and remove any observed federally listed mussels to safety. Additional mitigation measures at the bridge sites would include construction-related best management practices (BMPs) and techniques to maintain riparian vegetation.

Three jurisdictional wetlands have been identified along the 31-mile project right-of-way, and a total of 4.5 acres of wetlands would be impacted. The wetland functional values appear to range from low to moderate. Mitigation needs for stream and wetland impacts of the project will be determined during permit reviews for each section; however, it is expected that current availability of on-site, in-lieu-of-fee, and wetland-banking options would reduce future stream and wetland impacts to insignificant levels.

The stream crossing and stream bank stabilization associated with widening the highway design of the roadway system are repetitive actions in the floodplain and would not increase pre-project flood elevations by more than 1 foot. Franklin County is a participant in the National Flood Insurance Program and this project would comply. Because impacts to floodplains have been minimized, and relocating a new roadway

improvements that avoid the floodplains would be much more costly and would not likely meet the purpose and need of the project, there is no practicable alternative to construction of the project across the floodplain of the Elk River and Beans Creek.

No known historical or archaeological sites of local, state, or national significance eligible for or listed in the National Register of Historic Places (NRHP) would be adversely affected by the proposed 31-mile roadway project.

Twenty-four properties in the 31-mile project area were identified with the potential to impact the project via hazardous materials—six sites were thought to possess either active or inactive underground storage tanks (USTs). TDOT has demonstrated the ability to handle UST sites in accordance with applicable regulations to minimize impacts on the environment.

The FHWA/TDOT EA identifies small temporary losses of property taxes to both counties but overall higher revenues from the highway improvements. Right-of-way acquisition in the 31-mile project area may require 9 businesses, 3 vacant commercial buildings, 2 nonprofit organizations, 40 single-family units, and 6 mobile homes. The local market would provide ample properties for relocation, and TDOT has established a relocation program to address the displaced. The project would have no substantial impact on air quality, and noise levels would not change significantly with the roadway improvements.

The pending Section 26a application for a 4.179-mile section of SR 15 (US 64) improvements would require five individual Aquatic Resource Alteration Permit (ARAP) reviews, and five locations would be evaluated for general ARAP permit approvals. Construction-related impacts from construction of bridges and culverts and riprap placement for stream bank stabilization at these sites would result in temporary impact to unnamed tributaries to Robinson Creek, and unnamed tributaries to Beans Creek and Branch Creek. With adherence to the condition contained within the State ARAP approvals, it is anticipated that the aquatic impacts will be insignificant. No wetlands have been identified in this 4.179-mile section currently under review and no threatened or endangered species are located within the 4.179-mile section.

Mitigation

In the FONSI for the 31-mile project, FHWA/TDOT committed to certain mitigation measures to minimize aquatic, stream, and wetland impacts. Special efforts will also be made by FHWA/TDOT to minimize impacts when removing the Elk River Bridge. Specific stream and wetland mitigation measures would be implemented for the 31-mile SR 15 (US 64) widening project as the necessary construction permits are processed for individual sections.

There are no wetland impacts in this 4.179-mile section of highway improvements currently under review, and 1,270 linear-feet of stream encapsulation/length loss impacts and 110-foot Class II Impact Category impacts identified as requiring mitigation. TDOT has proposed to pay \$248,600 to the In-Lieu Stream Mitigation Program and to plant trees along improved areas. TVA would require the use of standard BMPs to reduce water quality impacts to an insignificant level. No other mitigation measures have been identified as necessary to reduce project impacts to an insignificant level.

Future stream modifications on other sections would be mitigated by stream restoration actions taken by the Tennessee Stream Mitigation Program, and unavoidable wetland impacts would be compensated by either on-site restoration or purchase of credits from a wetland mitigation bank such as the nearby Coffee County Mitigation Bank, located in the same Highland Rim physiographic region. Use of compensatory mitigation from the stream mitigation program or purchase of credits from the wetland mitigation bank would ensure that any adverse impacts of the US 64 projects to streams and wetlands in the Highland Rim area would be insignificant.

Public and Intergovernmental Review

In a letter dated September 15, 1998, the State Historic Preservation Officer (SHPO) stated that the project corridor would not adversely affect the Douglas Farm, the Isaac Gray House, the Shook Farm, and Peter Simmons House, which are eligible cultural resources for listing in the NRHP. In a letter dated January 14, 2002, the SHPO concurred after Phase II testing, that other archaeological resource locations identified within the project corridor were not eligible for listing in the NRHP. In a letter dated December 7, 1999, the SHPO concluded that Alternative AB would not adversely affect the Flintville Fish Hatchery and that Alternative AC would have no effect on this hatchery.

An October 7, 1998, letter from the U.S. Fish and Wildlife Service (USFWS) stated that the proposed project widening is not likely to adversely affect the Indiana and gray bats and that the requirements of Section 7 of the Endangered Species Act were fulfilled for these species. In a December 16, 1998 letter, USFWS also concurred that the project will not likely adversely affect the birdwing pearl mussel (*Conradilla caelata*), tubercled-blossom pearl mussel (*Epitoblasma torulosa torulosa*), yellow-blossom pearl mussel (*Epioblasma florentina florentina*), fine-rayed pigtoe (*Fusconia cuneolus*), cracking pearl mussel (*Hemistena lata*) and Cumberland monkeyface pearl mussel (*Quadrula intermedia*). The USFWS also concurred with a “not likely to adversely affect” determination for the shiny pigtoe mussel (*Fusconia edgariana*) with concurrence based on adherence to specific truss removal conditions for the Elk River Bridge and stringent erosion and sedimentation control measures.

TDOT held a series of public hearings to discuss the 31-mile SR 15 (US 64) widening project, including a public hearing on the proposed 4.179-mile section of this project at the National Guard Armory in Winchester, Tennessee, on August 10, 2000. The TDOT Design Division classified responses into 15 different items requiring analysis and disposition. These items have been addressed in TDOT correspondence dated December 8, 2000 (attached to the FHWA/TDOT FONSI).

TDOT submitted a request for ARAPs from the Tennessee Department of Environment and Conservation (TDEC) on April 26, 2004. The 4.179-mile section of SR 15 (US 64) improvements will require five individual ARAP reviews, and five locations will be evaluated for general ARAP approvals. TDEC issued the ARAP permit on February 10, 2005.

USACE has determined the improvements required within the 4.179-mile section currently under review meet their criteria for Nationwide Permits (personal communication, David Baldrige, USACE, July 30, 2004).

Conclusion and Findings

TVA has independently reviewed the impacts assessed in the FHWA/TDOT EA and determined that the scope, consideration of alternatives, and contents are appropriate and that the impacts on the environment have been adequately assessed. Based on this review, there are no significant adverse impacts, either individually or cumulatively, on the project impact area or its environment. TVA has evaluated the project for compliance with Executive Order 11988 on Floodplain Management and has determined that no practicable alternative to widening the highway along its existing alignment within the floodplain is available due to the associated cost of relocating a highway. No wetlands or threatened or endangered species have been identified in this 4.179-mile section of highway under review. No archaeological resources will be affected by the current undertaking. TVA has decided to adopt the FHWA/TDOT EA. The FHWA/TDOT FONSI incorporates commitments to review each section during final right-of-way and construction reevaluations for avoidance, minimization, or mitigation of adverse environmental impacts to aquatic resources to the greatest extent possible. The FHWA/TDOT EA and FONSI are attached and incorporated by reference.

Based on the FHWA/TDOT EA, we conclude that issuance of a Section 26a permit for the stream channelization/alterations, stream bank stabilization, bridge replacement, and new culverts and/or replacements described for the 4.179-mile section of SR 15 (US 64) in the TDOT April 26, 2004, application would not be a major federal action significantly affecting the environment. The FONSI is contingent upon successful implementation of TDOT's provisions for sediment and erosion control, on-site tree plantings, and purchase of credits in the In-Lieu Stream Mitigation Program, and TVA Section 26a standard conditions for water quality protection.

Harold M. Draper for

February 25, 2005

Jon M. Loney, Manager
NEPA Administration
Environmental Policy and Planning
Tennessee Valley Authority

Date Signed

Attachments

- FHWA/TDOT EA
- FHWA/TDOT FONSI
- FHWA/TDOT Technical Studies
- Aquatic Resource Alteration Permit