

**State Route 15 (US 64)
Somerville Beltway
Fayette County Tennessee**

ENVIRONMENTAL ASSESSMENT

Submitted Pursuant to 42 U.S.C. 4332(2)(c) by the
U.S. Department of Transportation
Federal Highway Administration
And the
Tennessee Department of Transportation
Environmental Division

Cooperating Agency
US Army Corps of Engineers

Tennessee Valley Authority

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September 10, 2008

Date of Approval

For FHWA

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SUMMARY

Environmental Assessment

State Route 15 (US 64) Somerville Beltway Fayette County Tennessee

Project Description: The Build Alternative

For purposes of study for this Environmental Assessment, the proposed typical section will consist of four (4) @ 12' traffic lanes (two in each direction), two (2) @ twelve (12') foot outside shoulders with ditches and 6' inside shoulders; a 52 ft grass median within a three-hundred (300') foot minimum proposed right-of-way (actual right-of-way to be determined by slopes). A 60 MPH design speed is proposed throughout the project limits. Partial access control will be utilized in that the Right-of-Way will be fenced, appropriate intersections/interchanges are proposed at public road crossings. The necessary structures over area streams and watercourses will be designed to meet current standard.

Other Major Actions

No major actions are planned by any other governmental agency in the immediate area.

Environmental Impacts.

The primary adverse impacts are:

1. Conversion of 520 acres to non-agricultural use.
2. Fill of 9.06 acres of wetlands.
3. Temporary construction impacts and inconveniences.
4. Displacement of 12 residences, 1 non-profit and 1 business

The primary beneficial impacts are:

1. Ease of travel.
2. Connecting link in transportation system (SR 15) for the county and Region.
3. Connecting SR 15 to SR 76 with easier access to I- 40

Areas of controversy and unresolved Issues

There are no major areas of controversy or any substantial unresolved issues related to this proposed highway improvement.

Other Required Federal Actions

The Tennessee Department of Environment and Conservation, Division of Water Pollution Control Section 401 Water Quality Certification permit will be required. A Department of the Army permit may be required from the Corps of Engineers pursuant to Section 404 of the Clean Water Act for this highway project.

All construction projects disturbing over 1 acre of land require permits for Construction Activities pursuant to the National Pollutant Discharge Elimination System (NPDES) for the control of non-point pollution. An Aquatic Resource Alteration Permit (ARAP) may be required for construction of bridges and culverts associated with this project. TDOT will file for any other permits as may be required.

The proposed project will not affect any lands or properties protected under Section 4 (f) of the U.S. Department of Transportation Act of 1966 (as amended). No public parks or recreation lands, wildlife or waterfowl refuges, or known historical or archaeological sites of local, state or national significance, as listed in the National Register of Historic Places will be involved.

SAFETEA_LU Statute of Limitations

A Federal agency may publish a notice in the Federal Register pursuant to 23 USC §139(1) indicating that one or more Federal agencies have taken final action on permits, licenses, or approvals for a transportation project. If such a notice is published claims seeking judicial review of those Federal agency actions will be barred unless such claims are filed within 180 days after the date of publication of the notice, or within such shorter time period as is specified the Federal laws pursuant to which judicial review of the Federal agency action is allowed. If no notice is published, then the periods of time that are otherwise provided by the Federal laws governing such claims will apply.

Figure 1 Area Vicinity Map

Somerville Beltway



Legend

- Proposed Bypass (thick blue line)
- Interchange (yellow circle)
- Existing Roads (thin green line)
- Existing Highway (thick green line)



Map area as it is shown here in consultation.

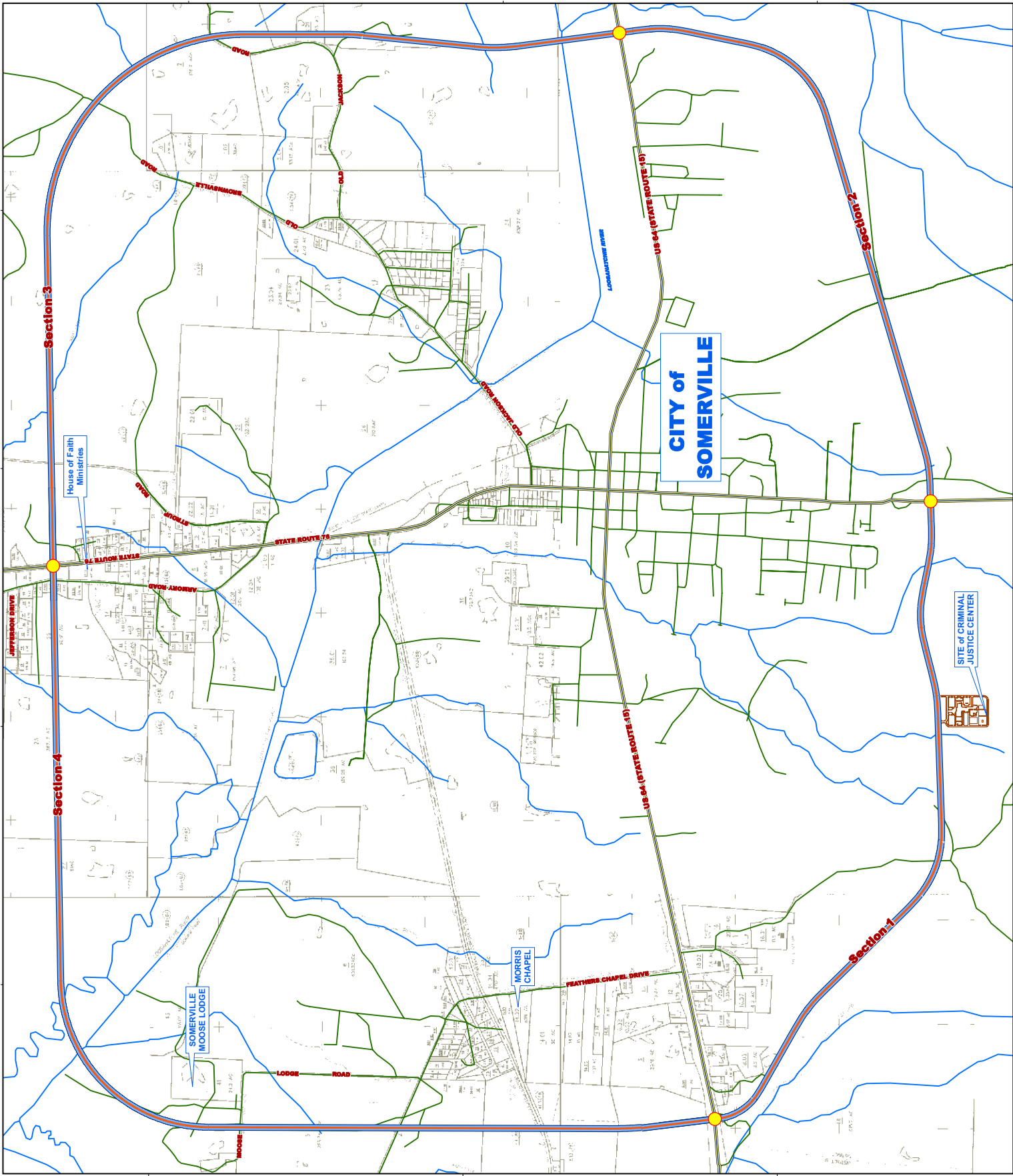


Figure 2 Project Location Map

WARNING THIS MAP REPRESENTS THE GENERAL LOCATION OF THE PROJECT. IT IS NOT INTENDED TO BE AN EXACT CENTERLINE THE ALTERNATIVE SHOWN IS NOT TO SCALE

Somerville Beltway



Legend

- Proposed Bypass
- Interchange
- Existing Roads
- Existing Highway



Map area that is shown here in context.

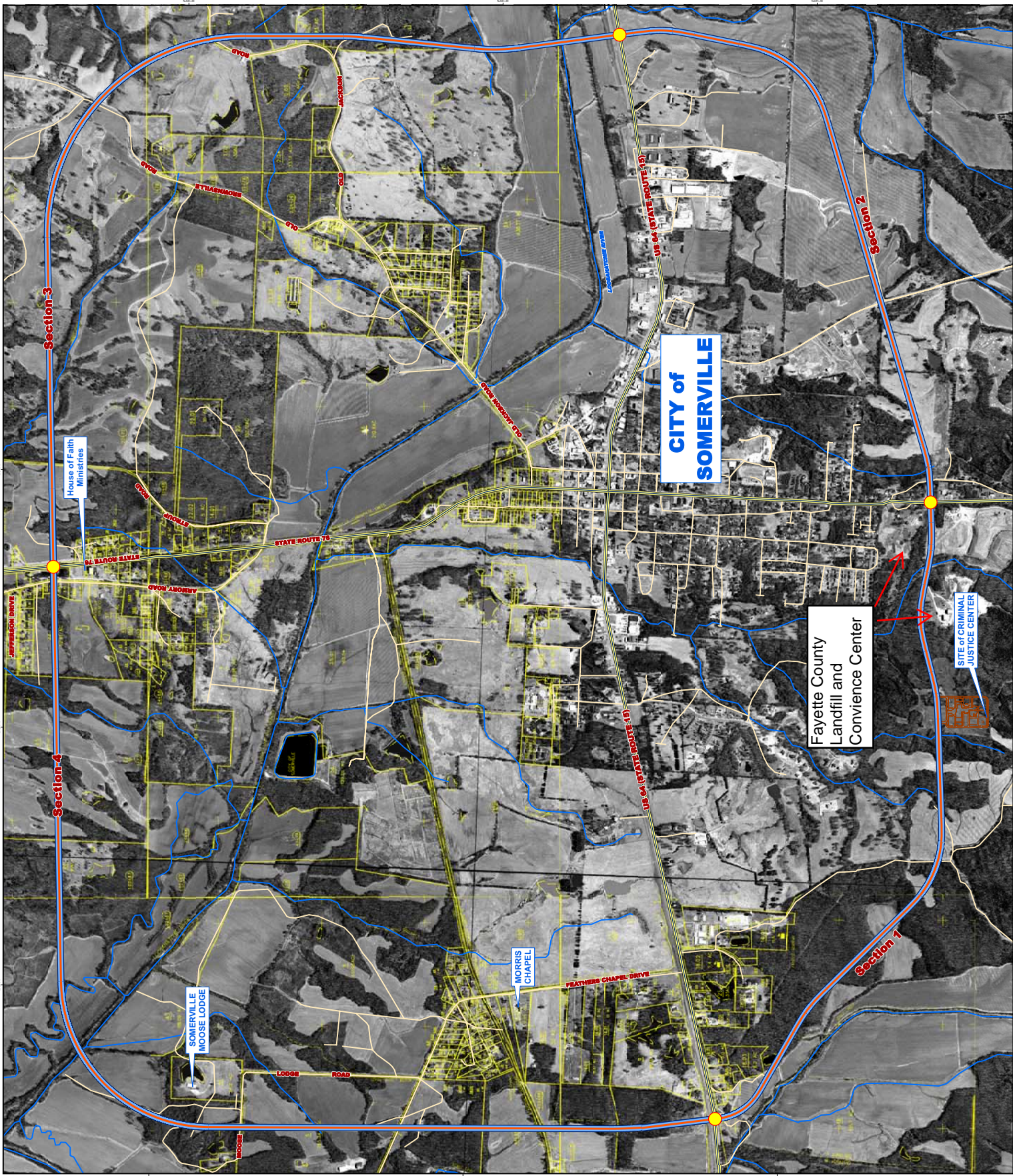
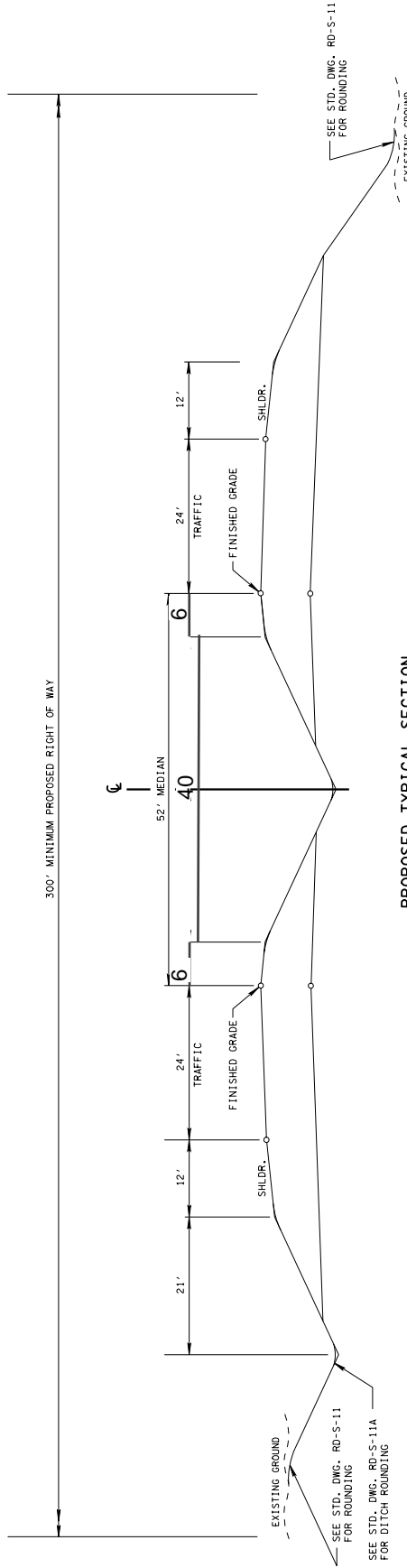


Figure 3 Typical Cross - Section

TYPE	YEAR	PROJECT NO.	SHEET NO.
	2006		2



**PROPOSED TYPICAL SECTION
 TANGENT SECTION**
 (BASED ON STD. DWG. RD-TS-3A)

NOT TO SCALE

STATE OF TENNESSEE
 DEPARTMENT OF TRANSPORTATION

FAYETTE COUNTY
STATE ROUTE 460
SOMERVILLE
BY-PASS

Environmental Commitments

1. Comments from the NEPA Public Hearing, the Cooperating Agency, and other interested agencies, will be considered in the final environmental document. The final R.O.W. and construction plans must reflect the promises/decisions made by TDOT during the Public Hearing process. If for valid engineering reasons, compliance is impossible; the Environmental Division must be notified in writing to properly document the files. Public interest in this project continues.
2. As potential wetland mitigation sites are identified, the Department's mitigation plan will be coordinated with the appropriate permit and resource agencies. This plan will include wetland replacement in accordance with the current regulation but usually on a 2:1 ratio. If these sites are found to be unacceptable, the wetlands will be mitigated at an approved wetland bank site. The final decision in consultation with permit agencies will be made before application is made for a Section 404 Permit.
3. Effects on stream quality will be mitigated by replanting and maintaining vegetation, on the banks at the crossing sites, to stabilize and prevent erosion, to provide cover, and to reduce stream temperatures. Additional mitigation measures include constructing stream crossings during low flow periods, minimized road construction during fish spawning, and reseeded stream banks with native vegetation beneficial to wildlife immediately upon completion of the crossing
4. Stream channels requiring relocation will be replaced on-site to the extent possible, using techniques that will replace existing stream characteristics such as length, width, gradient, and tree canopy. Stream or water body impacts that cannot be mitigated on site, such as impacts of culverts over 200 feet, or impacts to springs or seeps which require rock fill to allow for movement of water underneath the roadway, will either be mitigated off-site by improving a degraded system or by making a comparable payment to an in-lieu-fee program which will perform such offsite mitigation under the direction of state and Federal regulatory and resource agencies.
5. The Department will conduct hydrological and geomorphologic surveys in the study areas of the wetland to determine and maintain their stability and quality during periods of construction
6. TDOT will maintain access to the Fayette County Convenience Center.
7. If previously undiscovered archaeological material is found during construction, all construction will cease in that area and the Tennessee Division of Archaeology and the recognized Native American tribes will be contacted so a representative can have the opportunity to examine and evaluate the material.

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CHAPTER 1 PURPOSE AND NEED

The Tennessee Department of Transportation (TDOT) is proposing to construct on new location a Beltway around the city of Somerville in Fayette County, Tennessee. The proposed project alignment is a result of a concerted effort to minimize adverse human and environmental impacts and to provide a facility able to serve transportation needs into the future. Local government has furnished TDOT with several resolutions providing input to the development of primary purposes and needs. Among these they asked TDOT to address as the purposes and needs for the project is truck traffic on SR 15 through the present town limits and on the court square (April 14, 1997 Resolution); “to relieve State Route 76 North and South inside the City Limits of Somerville and on State Route 15 (Highway 64) east and west through town, of the heavy dangerous high volume of traffic (the first (shorter) November 13, 1995 Resolution); and “the town of Somerville has a heavy traffic problem on State Route 76 South (also known as South Main) and on State Route 15 (Hwy. 64) east and west through town”, SR 76 south is a narrow thoroughfare that the City feels is “unsafe for the volume of traffic it is carrying, and that “Somerville Elementary School is on the east side of SR 76 South inside the City Limits” – the safety of the school children is a “grave concern” to the City (the second (longer) November 13, 1995 Resolution). A resolution from the Town of Somerville in April 1999 asked that TDOT plan for several access points for current planned development (the Criminal Justice Center) and future development (“Access point in the vicinity of existing Clark road. This location would provide access to an existing road as well as future development. The major road plan had already identified a possible future arterial in this general area which could connect to US. 64. Access point 2: between Clark road and state highway no. 76 this location would provide access for a future roadway extending northward to Kay drive. This would provide for future development and this future roadway has also already been identified in our major road plan”). TDOT has located the Criminal Justice Center on the current functional layouts and approximated for planning purposes the location for the two access point mentioned above. See Appendix A Agency Correspondence Letters of Local Support.

The primary goals of this project are to provide a highway facility that; (1) Is compatible with existing and planned land use activities adjacent to or nearby the new roadway, (2) Is able to

meet present and future traffic demands, (3) Provides local and regional motorists with improved connections to other major highways such as State Route 15 (US 64) and State Route 76 and (4) Improves regional mobility and highway safety. There were 184 accidents (2001-2003 last three years data is available) of which 55 resulted in injuries on SR 15 and SR 76 through Somerville. By diverting trips onto the bypass and reducing traffic congestion through Somerville the number of accidents should be reduced. The Area Vicinity Map (page iii) depicts the general location of the proposed project. For a detailed description of the “Build Alternative” see **Chapter 2 Alternatives** of this report.

Project Status

In 1994 this project was initiated at the request of city officials in Somerville who were concerned with the growing transportation problems along State Route 76 through town. They felt that improvements along the south to north traffic corridor were needed in order to correct the inadequate roadway geometrics and improve the potentially unsafe conditions created by the increasing traffic flow. Also a matter of concern is the number of trucks, which must traverse the downtown Court House Square where the turning radius is inadequate. Improving the existing route through town was determined to be unpractical due to the negative impact upon a large historical district south of the square in Somerville. An increase in the capacity through town would allow for a greater number of vehicles using highway which would increase the safety problems near Somerville Elementary School and for pedestrians around the square.

On April 12 1999, the board of mayor and aldermen of the town of Somerville passed a resolution, updating the town's major road plan to include the State Route 15 highway by-pass and to include four access points to the by-pass by Somerville's city streets.

In May 2005 TDOT formed a project team consisting of Federal, State and Local government agencies to begin the process of environmental review. The team held a field review in June 2005 and a public informational meeting in August 2005. The draft purpose and need statement was circulated to team members on June 26, 2006. The Draft Environmental Assessment was circulated to the team members in the spring of 2008.

System Linkage

The proposed project will be classified as a "Major Collector" on the statewide classification system. As an integral part of the overall State Route 15 redevelopment on the eastern and western side of the City of Somerville the proposed project will connect SR 15/US 64 east and west and with SR 76 to the north and south. State Route 15 is major carrier of commerce and persons from the western side of Memphis to near the Chattanooga, Tennessee area. State Route 15 is being developed as a regional transportation corridor. The existing two lane facility is being reconstructed as a multilane highway based on a four lane cross section. The Somerville Beltway is a final connecting link between the newly reconstructed State Route 15 from Memphis in the west and from Somerville east to Whiteville.

Capacity

The typical cross section for existing SR 15 through the Somerville Central Business District varies from +/-22 feet of pavement to +/-60 feet of pavement. It is classified as an Urban Principal Arterial. The projected 2010 traffic count has a high point of 16,360 vehicles per day, with a future projected count, (2030) of 23,400. This is a level of service F. The proposed bypass project will draw away some of the north – south traffic and thereby reduce this congestion. The traffic schematics on pages 7 and 8 show the reductions in traffic through the Somerville central business district with the implementation of the beltway project. SR 76 crosses the same area and has a similar cross section. For SR 76 south of town the projected traffic counts for the same time period are 11,640 and 15,130. Anticipated traffic volumes entering, leaving, and passing through the Somerville Beltway study area are projected to be the same with or without the proposed bypass. The forecasted increases in traffic volumes over the 20-year period further accentuate the necessity for a new facility.

The traffic flow condition of a highway is measured as a Level of Service (LOS) and is rated in descending order for A through F.

- Level A - Primarily free flow operations
- Level B - Reasonably free flow operations
- Level C - Stable operation, approaching a range in which small increases in flow will cause substantial deterioration in services.
- Level D - Borders on unstable flow
- Level E - Extremely unstable operations
- Level F - Forced or breakdown flow

The proposed project will operate at level of service "A" throughout its length. The Summary accident and traffic reports are included in the Agency Correspondence and Technical Studies Appendix, Traffic and Accidents. The complete study, which on file with TDOT, is published separately.

Figure 4 Level of Service

Level of Service (LOS):



LOS A



LOS B



LOS C



LOS D



LOS E



LOS F

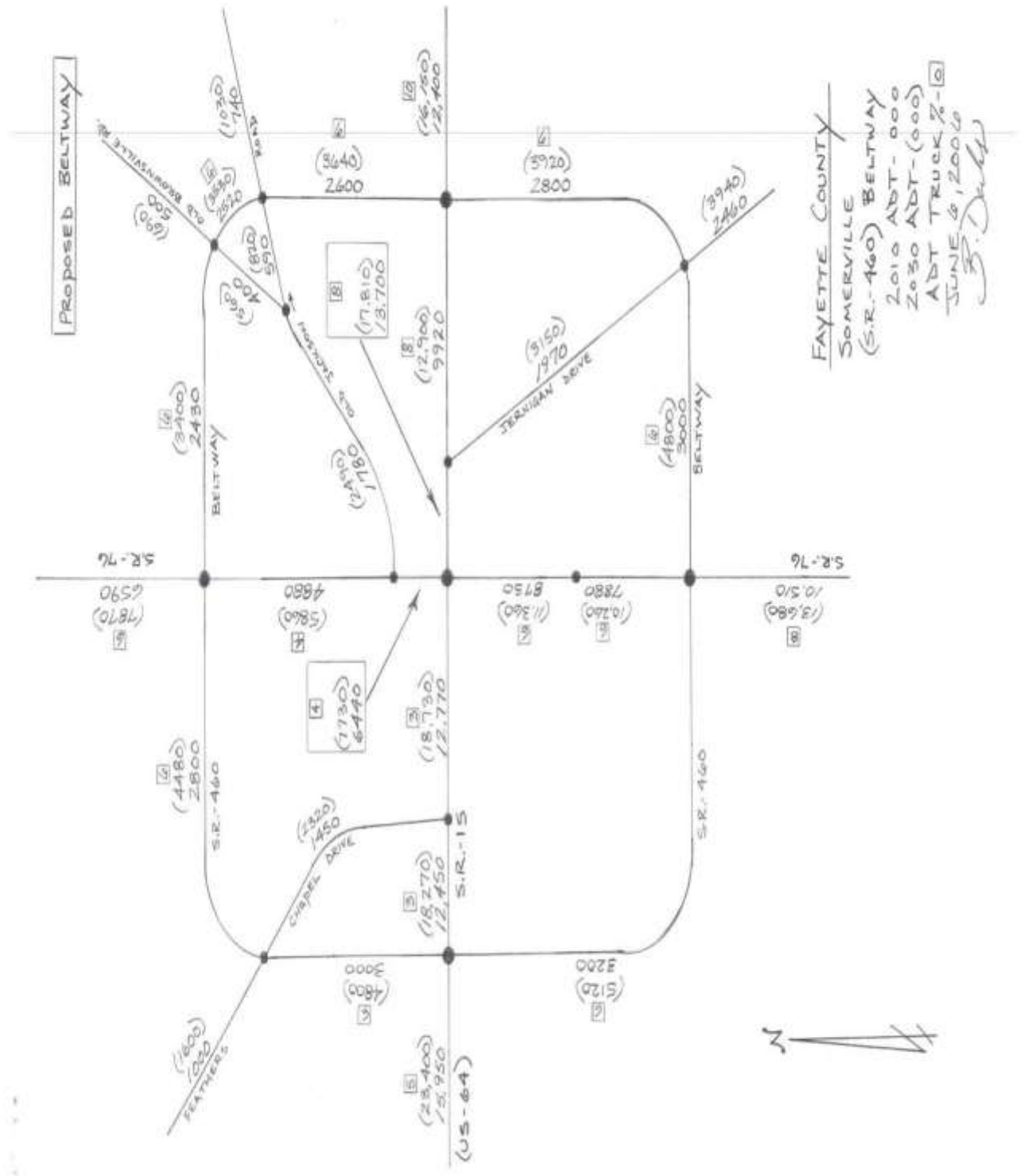
Safety

Last Three Years Of Available Safety Data (2001, 2002, 2003)

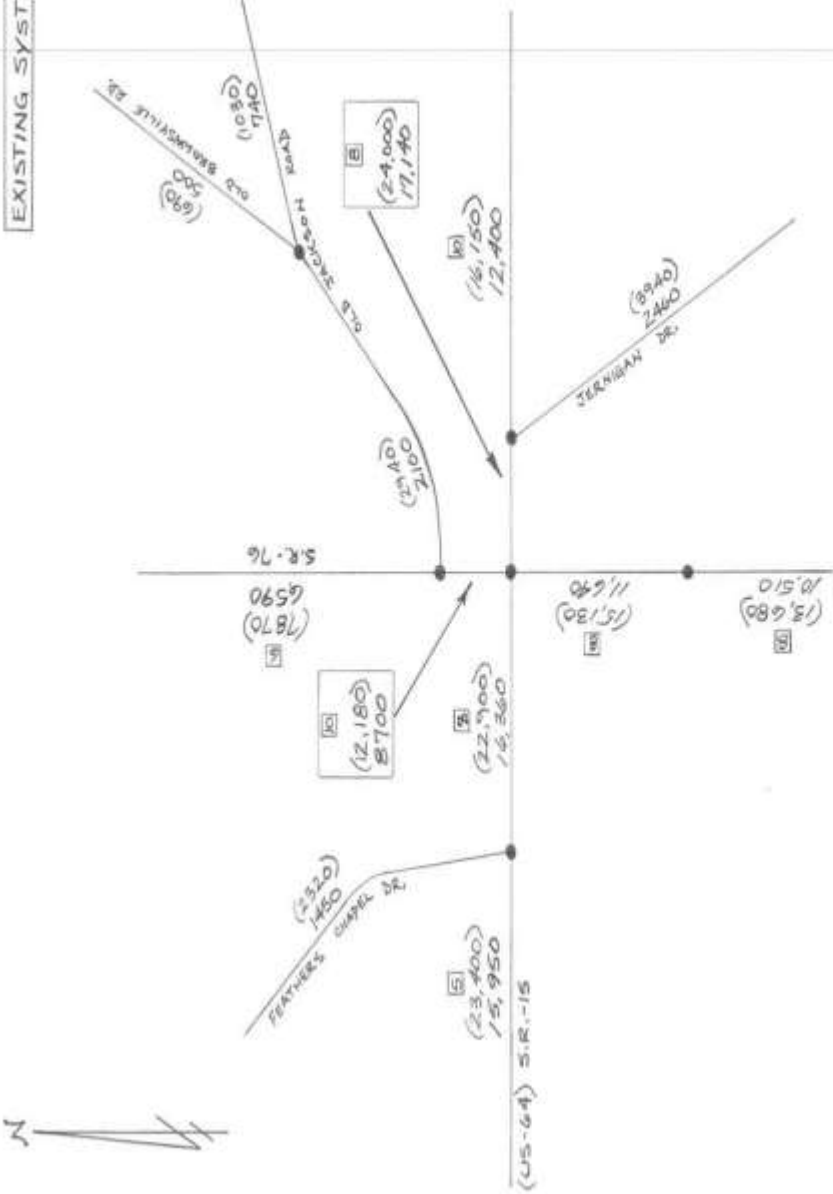
Beginning Point	Ending Point	Average ADT	Total Accidents	Fatal	Injury
Western Crossing Point along SR 15	Downtown Junction of SR 15 and SR 76	11,688 vehicle per day	93	1	29
Junction of SR 15 and SR 76	Near the Eastern Crossing Point Along SR 15	10,940 vehicles per day	41	0	13
SR 76 from the Northern Crossing Point	Downtown Junction of SR 76 and SR 15	10,940	17	0	7
SR 76 From Downtown Junction Of SR 76 / SR 15	Near the Junction of SR 76 and SR 59	5,810	33	0	6

As of October 2005

The existing system is at or in excess of capacity. Any reduction of the number of vehicles per day, especially the truck traffic will reduce the likelihood of accidents and increase the efficiency of the system.



EXISTING SYSTEM



FAYETTE COUNTY
 SOMERVILLE
 (S.R.-460) BELTWAY
 2010 ADT-000
 2030 ADT-(000)
 ADT TRUCK %-[E]
 JUNE 6, 2006
B. D. Duff

Bicycle and Pedestrian

According to the TDOT Design Division, sidewalks are not planned for this roadway improvement. The typical cross section of the proposed project calls for a paved shoulder, which though not specifically marked for this usage will allow for pedestrian and bicycle usage. (See Figure 3 ~ Typical Cross-Section).

Presently, this project is not part of any planned bicycle route or pedestrian greenway improvement. However, it is the policy of the Department of Transportation to routinely integrate bicycling and walking options into the transportation system as a means to improve mobility and safety of non-motorized traffic. This policy pertains to both bicycle and pedestrian facilities.

Local Support

Area residents, local civic and business organizations and their State legislative representatives, concerned with increasing traffic volumes passing through the City of Somerville, initiated this project. This project was in the 2008-2011 STIP for PE and Construction. This project has been included in the 2008 State Budget for preliminary development, environmental and location study

This project has had continuous support from local government since 1993. The concept has changed but the support for improvement has remained consistent. Both the Mayor of Somerville and the Mayor of Fayette County are participating members of the TDOT project team. Letters of support from their offices are included in the Agency Correspondence and Technical Studies Appendix, Agency Correspondence, Letters of Local Support.

Modal Interrelationships

The proposed project is nearby to the local regional airport, the Fayette County Airport, about 1.5 – 2 miles southwest of Somerville. The proposed route would make travel to the airport easier for travelers on SR 15 since they can bypass the central business district to the south to get there. As the location decision is made TDOT will coordinate with the airport authority concerning runway and flight safety. The project will be designed so as to accommodate bicycles.



Figure 5 Location of Fayette County Airport

CHAPTER 2 ALTERNATIVES

For the Build Alternative, refer to the Area Vicinity Map (page II) and the Project Location Map (page III) depicting the location for the proposed project. For purposes of preparing environmental resources analysis necessary for this study, TDOT has prepared a series of photographs depicting a preliminary location scheme. These photographs are in Annex I Functional Layout. These are not to be considered a location commitment by TDOT.

The Build Alternative

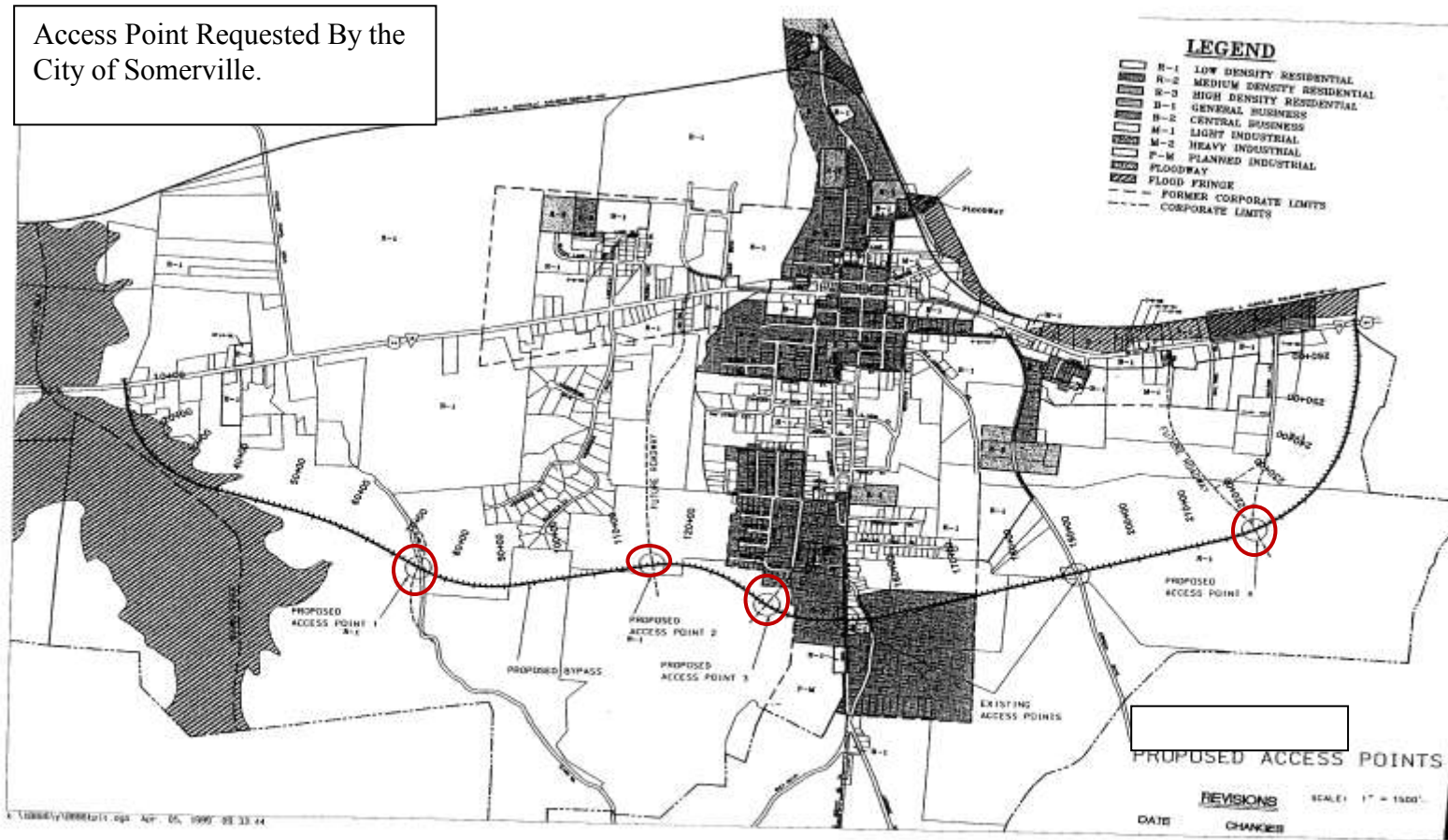
TDOT believes the proposed project has logical termini, independent utility, and does not restrict consideration of reasonable, foreseeable future transportation improvements. The proposed improvement will provide a beltway around the City of Somerville. For purposes of study for this Environmental Assessment, the proposed typical section will consist of four (4) @ 12' traffic lanes (two in each direction), two (2) @ twelve (12') foot outside shoulders with ditches and 6' inside shoulders; a 52 ft grass median within a three-hundred (300') foot minimum proposed right-of-way (actual right-of-way to be determined by slopes). A 60 MPH design speed is proposed throughout the project limits. Partial access control will be utilized in that the Right-of-Way will be fenced, appropriate intersections/interchanges are proposed at public road crossings. The necessary structures over area streams and watercourses will be designed to meet current standard.

The Section 1 of the proposed project begins west of the city on SR 15 with a grade separation interchange consisting of ramps connecting to SR 15 with the proposed Beltway, which bridges over the existing SR 15. The Beltway then moves south and east along Jones Creek, past the future local access point (connecting to the new Fayette County Justice Center) where it connects to SR 76 with a grade separation interchange. Section 1 is +2.63 miles long. Section 2 then moves east to an at grade intersection with Jernigan Drive, then turning slightly north , past Access Points 3 and 4 to a grade separation interchange with SR 15 east of the city. This interchange will have a loop ramp in the Northwest quadrant. Section 2 is +/- 2.35 miles long. Section 3 turns north cross the Loosahatchie River Canal on two parallel bridges, to an at grade intersection with Old Jackson Road, passes beside Canton Creek, to an at grade intersection with Old Brownsville Road, crossing Smart Creek on two structures, to a grade separation interchange with SR 76 North of the city. Section 3 is +/- 3.74 miles long. Section 4 then moves west and

south, again crossing the Loosahatchie River Canal on two parallel bridges, connects with Moose Lodge Road with an at grade intersection, an intersection with Feathers Chapel Road, and ending at SR 15 West of the city completing the circle. Section 4 is +/- 4.21 miles.

Local government has asked that TDOT consider four access points along the project corridor. Access point 1: in the vicinity of existing Clark Road. This location would provide access to an existing road as well as future development. The major road plan had already identified a possible future arterial in this general area which could connect to SR15. Access point 2: between Clark Road and SR 76. This location would provide access for a future roadway extending northward to Kay drive. This would provide for future development and this future roadway has also already been identified in our major road plan. Access point 3: approximately 1400 feet west of SR 76. This location would allow access for Somerville Street to be connected to the bypass. This would relieve some of the congestion on SR 76 because a significant amount of residential traffic could utilize Somerville Street as a collector to the by-pass. Access point 4: between Jernigan and SR 15. This access point can be located such that it can be used to either connect Dogwood lane to the by-pass or construct a new roadway which connects to Yates road. The major road plan also shows a future roadway in this general area. For purposes of this study TDOT has plotted an approximate location and noted these request.

Figure 6 Access Points



No Build Alternative

The "No-Build Alternative", as the name implies, denotes that only minor improvements, such as safety improvements and normal maintenance, would be made to the existing system. It would not have any impact on the physical environment of the immediate area nor cause any displacements. This alternative would do nothing to help relieve the areas of existing and future traffic problems. It will do nothing to provide for an improved transportation system for the county area. The TDOT's traffic studies show that State Route 15 and 76 will continue to experience an increase in traffic demands. The local traffic generators will continue to increase the traffic volumes on the system. As the traffic volumes increase, the difficulty of local and regional travelers in passing through the area and of gaining local access to necessary social, economic, and governmental facilities will increase.

Alternatives Previously Considered

No other build alternative is currently under study.

PROJECT DATA SUMMARY TABLE

State Route 15 (US 64)
Somerville Beltway
Somerville, Fayette County, Tennessee

Item	Build Alternative
Functional Class	Major Arterial
System Class	Statewide Highway System
Length	12.98 ± Miles
Projected ADT if built in 2010	2430 - 3000
Future ADT (2030)	3400 - 5120
% Trucks	6 %
Build Alternative	
Estimated Right-of-way Acquisition	520 Acres
Estimated Right-of-way Tracts Affected	53
Estimated Family Displacements	12
Estimated Business Displacements	1
Estimated Non-Profit Displacement	1
Estimated Right-of-way Cost	\$ 11,836,365
Estimated Utility Cost Local	\$ 125,600
Estimated Utility Cost State	\$ 1,598,100
Estimated Construction Cost	\$ 65,529,500
Estimated Preliminary Engineering Cost	<u>\$ 5,650,000</u>
Estimated Total Cost	\$ 84,739,565

CHAPTER 3 ENVIRONMENTAL CONSEQUENCES

This chapter will detail the probable social, economic, and environmental impacts of the proposed project and the mitigation measures, if required, for these impacts. It will discuss anticipated effects, including primary impacts (those which will result directly from construction) and secondary impacts (those which may be caused by changes in traffic patterns and accessibility through use of the completed facility).

The majority of the improvement will occur in agricultural lands except at the termini which will connect with the existing highway system. Some construction will occur in forested lands (small woodlots) and oldfields. Also affected by construction will be the aquatic resources as described in this Environmental Assessment.

The summary impact analysis reports are included in the Agency Correspondence and Technical Studies Appendix. The complete studies, which are on file with the TDOT Environmental Division, are published separately.

Land Use Impacts

The existing land use types in the project area may be described as agricultural-cropland, and low density residential. The density of residential land use types is greater at the existing road crossings. The access control aspect of the proposed project will allow for control of development along the corridor once the proposed project is completed. Connections to local and state highways are as described above. There will be no private driveway connections, but TDOT will work with property owners concerning access for farm machinery.

Construction of the proposed project should not interfere with or greatly alter area developmental patterns. The project, as proposed, is consistent with local and regional planning documents for the area and not in conflict with the long range planning activities of any local or regional planning authority.

Secondary impacts associated with the proposed improvement are increased pressure for development of vacant and agricultural land adjacent to the project corridor. Any growth from implementation of the proposed project should be adequately controlled by local government agencies.

Farmland Impacts

The Farmland Protection Policy Act of 1981 (FPPA) has as its purpose "to minimize the extent to which Federal programs contribute to the unnecessary and irreversible conversion of farmland to non-agricultural uses, and to insure that Federal programs are administered in a manner that, to the extent practicable, will be compatible with state and local government, and private programs and policies to protect farmland." The Build Alternative was evaluated in accordance with this act.

The proposed alignment crosses areas of agricultural use. As per regulations a Form 1006 was sent to the Natural Resource Conservation Service (NRCS) of the U.S. Department of Agriculture. The proposed project will convert to non-agricultural use for the Build Alternative 271 acres. This represents a conversion of 0.14% of the total farmland available in the county.

The Tennessee Department of Transportation weighed the assessment criteria for the build alternatives and assigned point values. The NRCS identified areas of prime and unique farmland and assigned a land evaluation point rating. The NRCS and the TDOT point values were combined to determine the total point value for the evaluation. When the total point value is 160 points or greater, other alternatives must be considered. The total point rating for the Build Alternative is 134. The Department, using guidelines stipulated by the FPPA, has determined that since the total point rating is below 160 points the land to be converted is due minimal consideration for protection and no additional sites need be evaluated.

There are no properties in the Wetland Reserve Program within the proposed corridor.

The NRCS correspondence and Farmland Conversion Rating Form are included in the Agency Correspondence and Technical Studies Appendix, Response to Initial Coordination.

The Social Impacts

The City of Somerville is a developing, middle size, urban area with some areas of a highway oriented commercial character along the existing arteries. There are still large areas of rural usage and non-incorporated communities in the county. Along the proposed project corridor, the land may now tend to become more residential and light commercial/industrial in character. This increase in residential and light commercial commitment of resources may be attributed to the increase in growth of the project area.

The proposed project will benefit the existing social structure of the project area by improving accessibility to the area. There are 12 residential displacements along the length of the

proposed project. There will be one businesses and one non-profit organizations displaced. The proposed project will not change neighborhood or community continuity or cohesion, nor be disruptive by splitting established neighborhoods.

Construction of the project will not adversely affect any health/education facility or any sanitation/water system. The relocation of any area utilities will be coordinated with the proper officials and agencies and in a timely manner so as to minimize or eliminate any disruption of service. The proposed improvement will be advantageous to the local communities by improvement of the safety and efficiency of travel and thus allowing easier access to public facilities and services. The improvement will aid fire, police, and ambulance responsiveness and help residents in securing the use of local schools, hospitals, and government offices. TDOT will provide sufficient notice of intent to acquire property and pay a fair market value for these properties.

Title VI

Environmental Justice and civil rights statutes provide opportunities to address the environmental effects on minority populations and low-income populations. Under Title VI, each Federal agency is required to ensure that no person on grounds of race, color, or national origin is excluded from participation in, denied the benefits of, or in any other way subjected to discrimination under any program or activity receiving Federal assistance.

It is TDOT's opinion that the proposed project will be in compliance with **Executive Order 12898** on Environmental Justice, Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations (EO 12898), dated February 11, 1994. EO 12898 requires Federal agencies to achieve environmental justice by identifying and addressing disproportionately high and adverse human health and environmental effects, including the interrelated social and economic effects of their programs, policies, and activities on minority populations and low-income populations in the United States.

In accordance with **Executive Order 12898**, this action was reviewed for disproportionately high and adverse human health or environmental effects on minority populations and low-income populations. This review was carried out using data from the Tennessee Department of Transportation Right-of-Way Division located in Region 4. Disproportionately high adverse impacts to low to middle income populations or minority populations are not anticipated. Based on the Conceptual Stage Relocation Plan (CSR) and the Environmental Assessment Page 18

TDOT Civil Rights review, it is concluded that this proposal is in conformity with **Executive Order 12898** “Environmental Justice” and therefore, no minority populations or low income populations will be disproportionately impacted by the construction of the proposed facility.

It is TDOT’s opinion that all people living in the project area will equally share in the opportunity to benefit from the proposed project and it will not disproportionately impact minority or low-income populations. At the appropriate time in project development TDOT will conduct a Public Hearing for the proposed project. This document has been reviewed by TDOT's Civil Rights Staff. It is TDOT's opinion that this document is in accordance with Title VI of the Civil Rights Act of 1964

The CSRP and the response from the TDOT Civil Right Staff are included in the Agency Correspondence and Technical Studies Appendix, Environmental Justice.

Displacements and Relocation

Displacements are a potential adverse environmental effect associated with any proposed project. A Conceptual Stage Relocation Plan (CSRP) was requested for this project to assess the effects of displacements on those affected and to determine the probability of a successful relocation. This report found that there will be 12 residential relocation associated with the proposed project. There were fifteen residences for sale in the area and four additional rentals. There were ten building lots for sale. The survey found that there were four residences for rent and two mobile homes.

There will be one non-profit relocation. The Fellowship Missionary Baptist Church will be relocated.

In order to minimize the unavoidable effects of Right-of-Way acquisition, the Tennessee Department of Transportation will carry out a Right-of-Way relocation program in accordance with the Tennessee Uniform Relocation Assistance Act of 1972 and the Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970 (Public Law 91-646). Relocation resources are available to all property owners without discrimination. The extended acquisition period will minimize potential relocation issues.

Economic Impacts

At the time of the field survey, it was determined that one business would be displaced. “Total Automotive” is an owner operated auto repair and body shop. There are other businesses

in the area that provide the same service. The overall economic effect on the area involved in this project should be favorable. The bypass and improved access to the downtown area should encourage further development. With the completion of the proposed project a minor tax loss will occur as land, formerly taxable is converted to highway use. This tax loss should be short-term in nature and development of the area will bring revenue to an equal or higher level.

Air Quality Impacts

Based upon the analyses of highway projects with similar meteorological conditions and/or traffic volumes, as well as a hypothetical screening analysis for a worst-case signalized intersection, the carbon monoxide levels of the subject project will be well below the National Ambient Air Quality Standard (NAAQS). The project is not predicted to result in a project specific air quality impact and, therefore, would not have a significant direct, indirect or cumulative air quality impact.

The proposed project could result in the generation of construction dust. This would be a temporary impact. It is not anticipated that the construction of the proposed project would occur simultaneously with other transportation projects in area.

The project is located outside the boundary of the Memphis area MPO, as found in the adopted *Memphis Area Metropolitan Planning Organization 2026 Long Range Transportation Plan And Conformity Determination For 2026 Long Range Transportation Plan.* Additionally, the plan states that the conformity determination is only for the Shelby County portion of the MPO planning area since the rest of MPO planning area, including the project in Fayette County, has never been classified as nonattainment for a transportation related pollutant. As a result, there are no federal actions or requirements to address regional conformity as a result of the proposed project.

A review of potential mobile source air toxics (MSAT) impact from this project indicate that under the build alternative in the design year (2030), it is expected there would be reduced MSAT emissions in the immediate area of the project, relative to the no build alternative, due to the reduced Vehicle Miles Traveled (VMT) associated with more direct routing, and due to EPA's MSAT reduction programs. On a regional basis, EPA's vehicle and fuel regulations, coupled with fleet turnover, will over time cause substantial reductions that, in almost all cases, will cause region-wide MSAT levels to be significantly lower than today. See the MSAT Appendix for more details.

Noise Impacts Evaluation

This noise study was designed and completed using guidance from 23 CFR, Part 772 and the Tennessee Department of Transportation guidelines on Traffic Noise Abatement in effect at the time. TDOT has since revised its noise policy and on April 21, 2005, FHWA approved the policy titled “*Tennessee Department of Transportation Guidelines for Highway Traffic Noise Abatement.*” The primary purpose of the policy revision was to clarify the policy and to adopt an alternative method for determining the reasonableness of noise abatement measures. Additional significant changes include a revision to the criteria to change “substantial increase” from 15 dBA down to 10 dBA and change the noise measurement standard from $L_{10}(1h)$, the noise level exceeded 10% of the time, to $L_{eq}(1h)$, a time-averaged sound level.

FHWA regulations contained in 23 CFR 772 require the following during the planning and design of a highway project:

- Identification of traffic noise impacts;
- Examination of potential mitigation measures;
- The incorporation of reasonable and feasible noise mitigation measures into the highway project; and
- Coordination with local officials to provide helpful information on compatible land use planning and control.

A typical TDOT highway traffic noise analysis includes seven basic steps:

- 1) Identify existing and potential noise sensitive areas within the study area.
- 2) Validate/confirm existing noise conditions through the use of computer modeling.
- 3) Determine future noise levels and the impact of future noise levels on sensitive land use activities for the given design year.
- 4) Compare existing and projected conditions to determine the projected impact on the surrounding area.
- 5) Identify and evaluate reasonable and feasible noise abatement measures for reducing noise where impacts are determined to occur.
- 6) Address potential concerns for noise occurring during construction and mitigate when possible.
- 7) Document public involvement activities as well as public concerns, comments and responses to public comments on project noise impacts and TDOT’s noise abatement strategies.

Field reconnaissance and map review was undertaken to identify and classify noise-sensitive receptor locations. Representative locations were selected for analysis at outdoor (exterior) areas where frequent human use occurs. TDOT policy also requires that these locations should also include development that has been designed, planned and programmed, (i.e., platted and filed with the County Recorder) before the date of the environmental document approval. Phone calls to the Fayette County Planning and Development Office and the Town of Somerville

indicated that they were not aware of any new residential development that might be affected by the proposed bypass.

There are approximately 100 dwelling units in the project area that are in close proximity to the proposed bypass. Additionally, there are several businesses, churches and the proposed Fayette County Jail. Furthermore, much of the land use in close proximity to the bypass is open space, with forested areas throughout. There are zero (0) receptors that have existing exterior noise levels approaching or exceeding the Federal Highway Administration (FHWA) 23 CFR Part 772 Noise Abatement Criteria Levels (NAC). Generally, for the Design year 2030 No-Build Alternative, the peak Leq noise levels from highway traffic at the receptors are predicted to minimally increase (0-2 dBA) over the existing year even though the total daily traffic volume has increased. Generally, those receptors that are located away from the heavier traveled ways in the region, such as US 64 and SR 76, have a 0 dBA increase from traffic noise. Only those receptors located near to the major arterials had a predicted increase of 1-2 dBA as a result of increased traffic noise. Nevertheless, similar to the existing condition, the predicted number of highway traffic noise impact is also expected to be zero (0) for the Design Year No-Build Alternative. For the Design Year Build Alternative, the predicted highway traffic noise impact is also expected to be zero (0). **There are no receptors that meet the NAC criteria and the greatest increase over existing condition is predicted to be 6 dBA.** The primary reasons why there are no impacts according to TDOT policy include the relatively low design year bypass volumes (“low” as they relate to noise) and the distances from the proposed bypass.

FHWA and TDOT specifies several types of mitigation to be studied for areas warranting noise abatement consideration such as traffic management measures, changes in horizontal and vertical roadway alignment, sound insulation for public institutions, additional land acquisition for noise abatement features, and noise barriers. **Since there are no impacts according to TDOT policy, no further analysis is warranted.** This preliminary noise analysis was performed without detailed plans and profiles. During any subsequent engineering or environmental analysis phase, modifications and detailed plans may change the results of the preliminary analysis. TDOT will revisit the noise analysis if there is likelihood that impacts could occur based on the plans. The preliminary analysis assumed a condition that is worse than is likely to occur. Since profiles and cut and fill areas are not yet developed, the elevation relationship of the receptors to the roadway was assumed to be the same, except for where bridge overpasses could be estimated. Additionally,

the preliminary analysis included no tree zones, terrain shielding, building row shielding, and bridge parapets in the noise prediction model, essentially creating an unabated direct noise line of sight between the traffic noise and the receptors. As mentioned, even with this worst-case approach, there were no impacts according to TDOT policy. Had there been a preliminary impact, then those features, where applicable, would have been added to the model and rerun for an updated result.

The Summary Air and Noise reports are included in the Agency Correspondence and Technical Studies Appendix, Air and Noise. The complete study, which on file with TDOT, is published separately.

Mitigation of Construction Noise Impacts

Construction procedures shall be governed by the Standard Specifications for Road and Bridge Construction as issued by TDOT and as amended by the most recent applicable supplements. The contractor will be bound by Section 107.01 of the Standard Specifications to observe any noise ordinance in effect within the project limits. Detoured traffic shall be routed during construction so as to cause the least practicable noise impacts upon residential and noises sensitive areas.

Visual Impacts

The proposed project will have an effect on the aesthetic quality of the project area due to the loss of trees and greenery for Right-of-Way purposes. The majority of this loss will occur in undeveloped/vacant/agricultural land. Appropriate measures will be taken to design the facility to blend into the surrounding terrain as much as possible. The view from the road will reflect typical scenery of this area of west Tennessee.

Energy Impacts

The fuel used during construction will be an "indirect" energy impact. Fuel used to transport vehicles on the improved facility is considered to be a "direct" energy impact. Vehicles operating on the improved conditions of the proposed system will be able to operate under more energy efficient conditions.

Construction Impacts

Adverse impacts from construction are primarily short-term in duration or exist only during construction periods. Some construction inconveniences such as noise, dust, traffic conflicts, etc., are unavoidable.

In order to minimize possible detrimental effects due to siltation, soil erosion, or possible pollution of area watercourses, the construction contractors will be required to comply with the special provisions of Tennessee Department of Transportation Standard Specifications for Road and Bridge Construction. These provisions implement the requirements of the Federal Highway Administration's Federal-Aid Policy Guide, Subchapter G part 650b. Contractors will be required to conduct and schedule operations according to these provisions. In addition, disruption to utility services will be minimized as it is the standard policy of the Tennessee Department of Transportation to coordinate all utility relocations with the affected utility companies. Furthermore, TDOT will coordinate with local government during the construction phase so that detoured traffic will be routed as to be the least disruptive to the community.

Any action taken on open burning would be in accordance with Chapter IV, "Open Burning", of the Tennessee Air Pollution Control Regulations. Furthermore, the specifications regarding air pollution control (Section 107.21) will also be followed. The regulations on fugitive dust will also be in accordance with Chapter VIII, "Fugitive Dust". The general contractor and all asphalt plants, quarry operations, etc., connected with the project will be required to have a valid operating permit from the Tennessee Air Pollution Control Division or to obtain an exception from the regulations through board action.

Hazardous Material Impacts

Spills on highways are a potential source of water quality degradation and a possible public health hazard. The Tennessee Emergency Management Agency (TEMA) has the responsibility and authority for coordination of all state and local agencies during accidents involving hazardous materials. The TEMA has demonstrated its ability to effectively manage such incidents.

The TDEC-UST database and EPA's Enviromapper Service were reviewed for hazardous materials sites along this project. There are several registered UST's in the area. There are three known hazardous materials sites in the general area, according to Enviromapper (Maps are in the appendix). Once final ROW plans are known, more specific hazardous materials studies can be

conducted. The Tennessee Department of Environment and Conservation has asked TDOT maintain access to the Fayette County Landfill and the Fayette County Convenience Center. TDOT is aware of the location (see below) and will continue to provide access to these sites.

Figure 7 Fayette Convenience Center



The Tennessee Department of Transportation has demonstrated its ability to deal with petroleum and other special waste sites to minimize impacts on the environments. When the preliminary plans are completed, the assessment of the sites noted above will be reviewed to determine the right of way requirements. If still necessary, a hazardous material study including intrusion testing of all sites where Right-of-Way is required and are suspected or believed to contain petroleum or hazardous material will be conducted in the project area. In the event hazardous substances/wastes are encountered within the proposed Right-of-Way, their disposition shall be subject to the applicable sections of the Federal Resource Conservation and Recovery Act, as amended; the Comprehensive Environmental Response, Compensation, and Liability Act, as amended; and the Tennessee Hazardous Waste Management Act of 1983.

The Hazardous Material report is included in the Agency Correspondence and Technical Studies Appendix, Hazardous Material.

Ecological Impacts

For purposes of the ecology study for this project a corridor of approximately 250' either side of the assumed center line was investigated (Form G maps are in the appendix). The proposed project will cause some short and long-term adverse impacts to aquatic (e.g., streams and wetlands) and terrestrial (vegetation, wildlife) habitat. Overall, these project impacts are expected to be fairly minor. The primary long and short-term impacts to streams in the project corridor are at the crossing point. An estimated 9.10 acres of wetlands in twenty sites would be filled as a result of the proposed project.

Additional Right of Way necessary for the bypass will result in the unavoidable (long-term) loss of wildlife habitat in forest and old field/pasture areas. There will also be some direct short-term impact on wildlife, i.e., temporary displacement, due to actual roadway construction activities, such as blasting, land clearing, and earth moving. Overall, however, the quantity of wildlife habitat in the study area is relatively small, and the quality appears to be marginal (no unique or high quality wildlife habitat). The direct long-term impacts, therefore, appear to be minimal.

The project is not anticipated to adversely affect any federally or state-listed threatened or endangered species. No federally-listed species or critical habitats were identified by any resource agencies during consultation. The US Fish and Wildlife Service have responded that the requirements of Section 7c of the Endangered Species Act of 1973 had been fulfilled for this project. The letter and the Summary of the Ecological Study Report are included in the Agency Correspondence and Technical Studies Appendix, Technical Studies Summary Reports, Ecology. The complete Ecological Impact Study is on file with the Tennessee Department of Transportation Environmental Division and is published separately.

Water Quality and Water Body Modification Impacts

The project has been located, and the chosen alternative will be designed, to avoid major impacts to waters of the state to the extent practicable. Efforts to further minimize impacts will continue throughout the design, permitting, and construction processes. Unavoidable impacts will be mitigated as required by applicable laws and regulations. Mitigation is discussed further in the

sections applying to streams and wetlands. In an effort to minimize sedimentation impacts, erosion and sediment control plans will be included in the project construction plans. TDOT will also implement its Standard Specifications for Road and Bridge Construction, which includes erosion and sediment control standards for use during construction. The State of Tennessee sets water quality criteria for waters of the state; these standards must be met during the construction of the highway.

Streams, Springs, and Seeps and other Water bodies

Streams, springs, seeps, impoundments and other watercourses and water bodies which are known at this time to be potentially affected by the project alternatives are listed in Table 2 of the Ecology Report. The determinations as to which are waters of the State and/or of the U.S. have not been confirmed by Tennessee Department of Environment and Conservation and the USA Corps of Engineers. All aquatic impacts identified as project development continues will be avoided, minimized, or mitigated to the extent possible, and incorporated into the permitting.

The project will affect fifty-five stream/spring/seep sites. It is difficult to determine the exact impact type at these sites with present level of project development information; therefore the information in Table 2 represents the anticipated worst-case impact, with the assumption that these impacts will be reduced, where possible, during further project design. It appears that thirty-eight of the channels will be crossed, and four may be rechanneled. All of the streams and the wet weather conveyances which will be crossed by the proposed project will require fill material needed for bridges, culverts, and/or pipes. This will result in some unavoidable sedimentation and channel disturbance during construction and some minor long-term loss of aquatic habitat in the streams. These impacts are expected to be minor, however, since most stream crossings in the project Right of Way are relatively short sections. Most anticipated disturbances to the streams will be short-term, provided that proper erosion and sedimentation control structures are utilized and maintained throughout the construction phase

Mitigation: Stream channels requiring relocation will be replaced on-site to the extent possible, using techniques that will replace existing stream characteristics such as length, width, gradient, and tree canopy. Stream or water body impacts that cannot be mitigated on site, such as impacts of culverts over 200 feet, or impacts to springs or seeps which require rock fill to allow for movement of water underneath the roadway, will either be mitigated off-site by improving a

degraded system or by making a comparable payment to an in-lieu-fee program which will perform such offsite mitigation under the direction of state and Federal regulatory and resource agencies.

Wetland Impacts

Approximately 9.10 acres of potential wetlands have been identified at twenty sites within or near the anticipated project limits. Wetland functions are shown in Table 3 of the Ecology Summary Report. In a letter dated October 31, 2005 the U.S. Fish and Wildlife Service states that information available to the service indicates that wetlands exist in the vicinity of the proposed project based on National Wetland Inventory Maps Mason and Somerville, Tennessee.

Impacts for each of the twenty sites are shown in Table 3 of the Ecology Summary Report. Wetlands shown within the ROW were assumed to be directly impacted. During project design, good faith efforts will be made to avoid or minimize impacts to as many of these sites as possible.

Although culverts will be placed to equalize the water flow in the entire wetland areas remaining outside the road bed, the drainage patterns in the wetland may be affected, and could result in localized changes in water levels and vegetation patterns. Efforts will be made during further project design to minimize these effects.

Avoidance of Wetland Impacts

The alignment can be adjusted to further reduce the amount of wetlands required. Moving the current proposed alignment in Section 1 to the south (near SR-76) could save up to 0.8 acres. Moving the alignment in Section 3 to the east would save approximately 0.16 acres. The proposed alignment could be moved in Section 4 to the north (near SR-76) and to the east (near Feathers Chapel Road) to save approximately 2.60 acres. However in order to be implemented these savings would have to be balanced against the impacts to other resource areas, alignment and placement of intersections with other state local roads, possible noise impacts, or increased displacements.

Minimization

During project design, further efforts will be made to minimize impacts to wetlands remaining outside the right-of-way, and to reduce changes in drainage patterns and water levels.

Mitigation

Mitigation is required for all wetland impacts which do not meet requirements for general Aquatic Resource Alterations Permits (State of Tennessee), or for certain Nationwide Section 404

permits (U. S. Army Corps of Engineers). The minimum replacement ratio for wetlands is 2:1, and may be higher depending on hydro geomorphic analyses or if optimum mitigation sites are unavailable. The first option for any substantial replacement mitigation is onsite (near the project, and within the watershed). The mitigation option most favored by regulatory agencies is that of restoration of a former wetland. Enhancement of an existing but degraded wetland may also be an option, but higher replacement ratios are generally required. Both the site selection and the mitigation, when proposed, will be subject to the approval of regulatory agencies. In the event that no acceptable mitigation site can be obtained locally, the regulatory agencies may allow mitigation further away, or allow use of credits in a mitigation bank.

Exact position relative to the project, wetland boundary, and exact total size can only be determined after verification by the U.S. Army Corps of Engineers (USACOE), which is responsible for the final wetland determination and permitting.

Upon receipt of the appropriate project plans TDOT will prepare a proposed mitigation plan, which will be coordinated with the appropriate permit and resource agencies. This plan will include wetland replacement in accordance with the current regulation but usually on a 2:1 ratio. If this plan is found to be unacceptable, the wetlands will be mitigated at an approved wetland bank site. The final decision, in consultation with permit agencies, will be made before application is made for a Section 404 Permit.

Threatened and Endangered Species

Pertinent resource agencies, such as the Tennessee Department of Environment and Conservation (TDEC) and U.S. Fish and Wildlife Service (USFWS) were contacted for information on protected (threatened and endangered) species. The USFWS responded in a letter dated October 31, 2005 concerning the project. They indicated that they have no record of federally-listed or proposed endangered or threatened species occurring within the project impact area and that the requirements of Section 7c of the Endangered Species Act of 1973 had been fulfilled for this project. The letter and the Summary of the Ecological Study Report are included in the Agency Correspondence and Technical Studies Appendix, Technical Studies Summary Reports, Ecology. The complete Ecological Impact Study is on file with the Tennessee Department of Transportation Environmental Division and is published separately.

Floodplain Impacts

The project will cross several blue line streams and their floodplains where beneficial floodplain values for aquatic and/or terrestrial wildlife can be found. Floodplains moderate the flow of floods, improve water quality, provide areas for groundwater recharge, and provide habitat for plants and animals. Crossing of the stream channels and their associated floodplains, however, will be at perpendicular angles (or nearly so) which will minimize any impacts. Given the small amount of affected floodplain area expected from construction of this proposed project versus the overall size of the streams and their associated floodplains, it is not anticipated that the beneficial floodplain values in the study area will be adversely impacted.

In accordance with 23 CFR 650, there is no significant encroachment of flood plains that would involve (1) a significant potential for interruption or termination of a transportation facility which is needed for emergency vehicles or provides a community's only evacuation route; (2) a significant risk; or (3) a significant adverse impact on natural and beneficial flood plain values.

General Permits

Upon receipt of the appropriate project plans TDOT will prepare a proposed mitigation plan, which will be coordinated with the appropriate permit and resource agencies. This plan will include wetland replacement in accordance with the current regulation but usually on a 2:1 ratio. If this plan is found to be unacceptable, the wetlands will be mitigated at an approved wetland bank site. The final decision, in consultation with permit agencies, will be made before application is made for a Section 404 Permit.

Probable permits required for this project include those issued under Section 404 and 401 of the Clean Water Act of 1972 (amended) and also include Aquatic Resource Alteration Permits (ARAP). Section 404 provides the Secretary of the Army, acting through the Chief of Engineers (U.S. Army Corps of Engineers), the power to issue wetland permits. The Tennessee Department of Environment and Conservation, Division of Water Pollution Control is responsible for the issuance of Section 401 Water Quality Certification and ARAPs.

The alteration of any stream below headwaters and of most wetlands requires a permit from the U. S. Corps of Engineers. A Department of the Army permit may be required from the Corps of Engineers pursuant to Section 404 of the Clean Water Act for this highway project. All stream and wetland alterations in the state of Tennessee require permits or certifications from the Tennessee Department of Environment and Conservation. All construction projects disturbing

over 1 acre of land require permits for Construction Activities pursuant to the National Pollutant Discharge Elimination System for the control of non-point pollution. An Aquatic Resource Alteration Permit (ARAP) may be required for construction of bridges and culverts associated with this project.

The Department will conduct hydrological and geomorphologic surveys in the study areas of the wetland to determine and maintain their stability and quality during periods of construction.

Channelization - Fish and Wildlife Coordination Act of 1958

Some minor channel changes are anticipated for water conveyance devices and major stream crossings. Any channel change requirements developed in the final plans will require TDOT to make application for the appropriate mitigation and water quality permits.

The adverse impacts to the aquatic environment resulting from channelization would include: increases in sediment loading; disruption of bottom substrates and associated benthic macroinvertebrate communities; and short-term adverse impacts to fishes occupying affected stream reaches. Minor shifts in the proposed alignment and the use of best management practices would minimize the adverse effects of channelization.

The removal of riparian trees, as a consequence of channelization, directly increases the amount of sunlight on these stream sections. Increased sunlight subsequently raises the water temperature in the channelized portions of the stream as well as downstream from the affected area. Depending upon the amount of increase in water temperature, aquatic communities, such as plankton, benthic macroinvertebrates, and fishes, could be altered and/or degraded. These adverse effects would be most likely to occur in pristine or previously undisturbed streams. Since development, livestock operations, and pasture/agricultural activities have degraded most of the streams in the project area, it would be unlikely that the necessary channelization would substantially affect streams and aquatic resources.

Wildlife Habitat Impacts

Much of the land in the project corridor has been disturbed at one time or another. About fifty-six percent of the project has been disturbed by agricultural practices such as row crops (corn, soybeans, and cotton) and pasture. Forested areas or shrub/scrub thickets also make up about forty-one percent of the project area. The remaining three percent is comprised of habitat in earlier stages of succession; or industrial, commercial, and residential lands which have limited

habitat values. Plant communities found in the area are characteristic of communities formed over Loess and Alluvial deposits. The upland forested communities are dominated by oaks, hickories, and pines. Sweetgums, red maples, and bald cypresses are widespread in old-field and floodplain habitats in the area. Both upland and floodplain forested habitats provide food cover, and nesting opportunities for numerous small mammals, including rabbits, squirrels, and other rodents, as well as numerous reptiles, native birds, and insects. Old-field habitats in various stages of succession are also useful to many types of wildlife. These areas are most often dominated by grasses and legumes, blackberries, and young cedars. The industrial, commercial, and residential lands generally have limited wildlife value, as they are usually paved or mowed, except for undisturbed vegetation along fencerows or boundaries.

The loss of approximately 271 acres of forested and oldfield habitat is one of the larger impacts of the project. There will be direct long-term adverse impacts when productive forests and old-field areas are converted to roadway. Mortality of individual wildlife may occur both during construction and highway operation. Although roadway mortality is generally not believed to significantly affect animal populations under normal conditions, if the population is experiencing other sources of stress (disease, habitat degradation or elimination, etc.), then traffic-related mortality can contribute to the demise of the population. Highway noise can affect the utilization of habitats by wildlife. Since this is a rural project and is not located near other state and local highways, noise is not already a factor within existing habitats. After project construction, areas that remain undisturbed within highway rights of way, will, over time, provide some degree of refuge for local wildlife as the surrounding areas continue to urbanize and habitats are destroyed.

The plant communities found along the project corridor serve as shelter, nesting, and foraging habitat for numerous species of wildlife. Loss of habitat initially displaces animals from the area, forcing them to concentrate into a smaller area, which causes over-utilization of the habitat. This ultimately lowers the carrying capacity of the remaining habitat and is manifested in some species as becoming more susceptible to disease, predation, and starvation.

In a rural area such as this, the amount of forested habitat and old-field habitat is still abundant. Most of the area around the project corridor is not expected to be developed for residential, commercial, and industrial uses due to the fact that most of the area is crop land or forest surrounded by crop land.

Construction of the proposed project will require several acres of scrub upland mixed hardwoods that occur along hedge row property lines and in fence rows that are scattered throughout most of its length of the proposed alignment. Construction will also acquire several acres of oldfield type habitat in all stages of succession forming edge effects between the row crops and the hedgerows. These areas would not be considered prime wildlife habitat due to the fact that they are so discontinuous from one area to the next. They are more or less the result of poor farming practices and are subject to clearing. Mitigation in-kind would not be practical under subjected conditions.

Cultural Resources Impacts

The proposed project will not affect any lands or properties protected under Section 4 (f) of the U.S. Department of Transportation Act of 1966 (as amended). No public parks or recreation lands, wildlife or waterfowl refuges, or known historical or archaeological sites of local, state or national significance, as listed in the National Register of Historic Places will be involved.

On 23 June 2006, TDOT wrote to nine Native American tribes or representatives asking each for information regarding the project and if they would like to participate in the Section 106 review process as a consulting party. To date, TDOT has received no responses.

Augustine Asbury, Alabama-Quassarte Tribal Town
Virginia “Gingy” Nail, The Chickasaw Nation
Charles D. Enyart, Eastern Shawnee Tribe of Oklahoma
Gary Bucktrot, Kialegee Tribal Town
Joyce Bear, Muscogee (Creek) Nation
Carrie Wilson, Quapaw Tribe of Oklahoma
Rebecca Hawkins, Shawnee Tribe
Charles Coleman, Thlopthlocco Tribal Town
Lisa Stopp, United Keetoowah Band of Cherokee Indians

The TDOT summary impact assessment study for all of the Cultural Resources Impact areas and the State Historic Preservation Officer letters of concurrence are in the Agency Correspondence and Technical Studies Appendix, Technical Studies Summary Reports. The complete studies are on file with TDOT.

Archaeological Impacts

For purposes of the Archaeology investigation a 300 foot study corridor was assumed. Pursuant to compliance with Section 106 of the National Historic Preservation Act and

implementing regulations 36 CFR 800, a Phase I survey was undertaken to identify National Register listed, eligible, or potentially eligible archaeological sites within the impact zone of the proposed project. In preparation for conducting a field study of the project, a search of the site survey files and other resources available at the Tennessee Department of Environment and Conservation Division of Archaeology and at the Tennessee Historical Commission was conducted. Additionally, a review of the local and regional historical and archaeological literature was undertaken to identify important historical contexts for the study area. The subsequent field survey included a complete pedestrian inspection of the proposed project with surface collecting in areas of adequately exposed ground surface and shovel testing where the ground surface was obscured by vegetation. Finally a geomorphologic assessment was undertaken to identify locations where archaeological resources might be buried and consequently go undetected by minimally invasive inspection procedures.

Fieldwork for the project area north of SR 15 was conducted from July 23 to August 8, and August 21, 2007. The survey identified 13 sites within or adjacent to the project area, six of which were assigned state site numbers (40FY447 to 40FY452). Three sites are prehistoric or have prehistoric components, and four have historic components (pre-1933) represented. Site 40FY450 has a standing structure present. Sites 40FY447, 40FY448, 40FY449, 40FY450, 40FY451 and 40FY452 have low research potential and are recommended not eligible for National Register listing. No further archaeological work is recommended at these sites, and the project should be allowed to proceed as planned. The remaining seven sites, identified only by their field numbers, represent twentieth century occupations and were not assigned state archaeological site numbers by the Tennessee Division of Archaeology. They are not considered eligible for the National Register.

In June, 1999 the area south of SR 15 was investigated beginning at the elevated ground surfaces near Jones Creek. This area was closely examined and found to be disturbed by a multitude of possible impacts, including: agriculture, erosion, landfill activities, general grading and clearing, as well as previous roadway construction including stockpiling and borrow activities. No evidence was found for eligible cultural resources. The cultivated fields were surveyed in June 1999. No cultural material was observed or recovered, excepting the usual modern glass and aluminum fragments. No shovel testing was conducted in the wooded area due to the slopes encountered. Also in June, 1999 the extreme eastern end of the Area of Potential

Effect was surveyed. The proposed alignment centerline was staked, and the northeastern 7200ft, from SR-15 to small east-west drainage, was tilled and partially planted in corn. No cultural material was recovered or observed in that section. However, approximately 400' at the northern end had less than 40% surface visibility, and that section was re-surveyed in March, 2000 with better surface visibility. The Area of Potential Effect was again visited in July, 1999 when the next 2,500' section had been cultivated, then having 100% surface visibility. No cultural material was recovered or observed in that section, although three isolated finds (chert debitage) were recovered on the slope approximately 300' west of the Area of Potential Effect. The remaining area from near Bennett's Creek to Jernigan Road was surveyed in August, 1999. A pedestrian survey encountered no cultural material or resources. The final section from SR-76 to Jernigan Road was twice surveyed, August, 1999 and March, 2000 and again no cultural material or resources were identified. Along the west side of SR-76 there is a deeply sunken roadbed, which was the 19th century road from Somerville to Bolivar. A narrow flat area along the east side of SR-76 was closely surveyed for 19th century resources, but none were found within the Area of Potential Effect corridor. East of that roadway there occurs a steep valley with the eastern side of the next ridge beginning a rolling descent to Jernigan Road. That final area of investigation was highly eroded pasture land with sparse grass cover, being negative for cultural materials. The survey of the corridor of the Somerville By-Pass encountered no archaeological resources, and there is little likelihood of undetected *in situ* archaeological deposits within the Area of Potential Effect.

If previously undiscovered archaeological material is found during construction, all construction will cease in that area and the Tennessee Division of Archaeology and the recognized Native American tribes will be contacted so a representative can have the opportunity to examine and evaluate the material

Historical Impacts

In compliance with Section 106 of the National Historic Preservation Act of 1966, as amended, staff historians surveyed the area of potential environmental impact for this project in compliance with 36 CFR 800 regulations. The purpose of this survey was to identify any resources either included in or potentially eligible for inclusion in the National Register of Historic Places (eligibility criteria are set forth in 36 CFR 60.4). The area surveyed included land needed for additional right-of-way as well as areas that might possibly be affected by changes in

air quality, noise levels, setting, and land use. The United States Department of Transportation Act of 1966 requires the assessment of the applicability of Section 4(f).

A TDOT consultant surveyed the area of potential effect in 1996 for a proposed bypass extending around Somerville to the south. The consultant identified one district listed on the National Register of Historic Places, the Somerville Historic District, as outside the area of potential effect. For the assessment, the consultant surveyed an additional 41 properties and it was his opinion none were eligible for the National Register.

In July 2006 historians from the Tennessee Department of Transportation (TDOT) surveyed an area of potential effect north of SR 15 as well as the previously surveyed areas. The historians inventoried several additional properties. It is the opinion of TDOT none of the properties are eligible for the National Register.

It is the opinion of TDOT that the project, as presently designed, will have no effect on any architectural or historical resources included in or eligible for inclusion in the National Register of Historic Places and that there will be no Section 4(f) use of a historic property.

Indirect and Cumulative Impacts

This section presents a discussion of the project's potential indirect and cumulative impacts. Direct effects, as outlined in 40 CFR 1508.8, are those, that are "caused by the action and occur at the same time and place." Indirect effects are those that are "caused by the action and are later in time or farther removed in distance, but are still reasonably foreseeable."

Cumulative impacts are those that result from past, present, and reasonably foreseeable future actions, combined with the potential impacts of this project. A cumulative effect assessment looks at the collective impacts posed by individual land use plans and projects. Cumulative impacts can result from individually minor, but collectively substantial impacts taking place over a period of time.

Cumulative impacts to resources in the project area may result from residential, commercial, industrial, and highway development, as well as from agricultural development and the conversion to more intensive types of agricultural cultivation. These land use activities can degrade habitat and species diversity through consequences such as displacement and fragmentation of habitats and populations, alteration of hydrology, contamination, erosion, sedimentation, disruption of migration corridors, changes in water quality, and introduction or

promotion of predators. They can also contribute to potential community impacts identified for the project, such as traffic patterns, housing availability, and employment.

The analysis of indirect effects associated with the proposed Build Alternative began with the identification of the area resources that have the potential to be adversely affected by construction of the proposed project. In the previous sections of this chapter, resources in the study area have been identified and a determination has been made regarding the potential for adverse effects on those resources as a result of this proposed action. Those resources are land use, farmland, wetlands, and streams.

Land Use

The completion of this project will result in an improvement to the existing highway system with respect to improved travel convenience, mobility and access. This may result in expanded growth in the project area. The indirect impacts are increased growth potential and the continued spread of residential, commercial, and other economic development on vacant land both adjacent to and near to the existing SR 15, and SR 76.

As discussed in the land use section above this resource is characterized as undeveloped land, farmland with a few residences and out buildings. Population and employment growth have been the primary factors for change in the study area. Much of this is supported by the improvement and upgrading of SR 15 (US 64) the major east west connector. SR 76 now provides easy access to Interstate 40.

The improvement of the local highway system will increase access to local and regional resources. This improvement may facilitate development because access to the large amount of vacant properties within the study corridor will be improved. In the reasonably foreseeable future, land use changes are anticipated to follow the established trend of converting open vacant land to low-density residential and small business use. This trend may be accelerated as a result of the Build Alternative.

Cumulative impacts in the study area will be more directly aligned with residential - development. Based upon current land development trends in the study area, development will continue in the corridor as long as there are large, open space tracts available for development. Land use changes, along with the proposed Build Alternative, influence indirect and cumulative impacts on various environmental resources in the study area. These changes can occur to both the

natural and physical environment. The following discussion addresses indirect and cumulative impacts from both the proposed Build Alternative and the resulting land use changes.

Farmland

Indirect Impacts to farmlands within the study area are a result of changes in land use and improved accessibility to much of West Tennessee. With considerable improvement to the region's transportation system it has experienced sustained population growth, which in turn has increased demand for additional residential housing in the area. This demand for more residential housing has resulted in the conversion of farmland to residential development. This has resulted in cumulative impacts to farmland over the past two decades. The economic base within the study corridor has also consequently changed from agricultural to commercial/residential use. The increased value of farmland has prompted the sale of land for residential development. Cumulative impacts associated with the study area will include further loss of farmland to residential and commercial development, a trend that will continue even under the No Build Alternative

Terrestrial Habitats

The indirect and cumulative effect associated with the conversion of land from agricultural to residential and commercial development is the change in the terrestrial habitat within the study area. Continued growth within the study area has increased demand for additional residential development, which has resulted in the continued loss of habitat for native plants and animals indigenous to the study area. The loss of native habitat through the conversion of farmland to residential development will occur whether the No-Build Alternative or the Build Alternative is selected. The Build Alternative will accelerate development activities and ultimately the loss of native habitat. In addition to loss of habitat through changes of land use, indirect and cumulative effects would also involve the continued spread of invasive and exotic species associated with residential development.

Wetlands, Waterbodies and Floodplains.

The Build Alternative will involve an estimated total of 9.10 acres of wetlands. Loss of wetlands and the ecology they support continues to be an area of concern for TDOT. The

cumulative impact is lessened by the low quality and dispersion of these wetlands. The farmed wetland areas will continue to be farmed even with the No Build Alternative.

The project will affect fifty-five stream/spring/seep sites. The conveyances necessary to cross these will impact floodplain habitat. The project will alter existing habitat through the construction of water conveyance systems at the locations where blue line tributaries are crossed. The project will result in either longitudinal or traverse encroachment into these floodplains. Encroachment will be in the form of fill placement. It is anticipated that the project will not increase the base flood elevations upstream or downstream of the proposed fill. Impacts will be quantitatively described in a Hydraulic Submittal to TDOT and an application for a CLOMR. The analysis will be used to document that there is or isn't a foreseeable change in flood elevations on each tributary. Changes in flood elevations resulting from land use changes are currently foreseeable due to the demands of urban expansion. This trend is expected to continue regardless of which alternative had been selected (No-Build or Build Alternative). The Build Alternative will accelerate development activities and will ultimately result in minor changes in the floodplain.

Project Impacts Table

	AS DESCRIBED IN THE EA AND SHOWN AT THE PUBLIC HEARING
Land Required	520 Acres
Displacements	12 Residences 1 Non Profit 1 Business
Farmland	271 acres, 0.14% of the total farmland available in the county
Air Quality	No Significant Impact
Noise Impacts	None of the sensitive receptors will experience levels at or approaching the noise abatement criteria
Water Quality	
Wetlands	9.10 Acres
Major Waterbody Modifications	Thirty-eight water channels will be crossed, and four may be rechanneled
Threatened and Endangered Species	Section 7c of the Endangered Species Act of 1973 USFWS Letter dated October 31, 2005
Flood Plains	It is not anticipated that the beneficial floodplain values in the study area will be adversely impacted
General Permits	1. Section 404 and 401 of the <u>Clean Water Act of 1972</u> 2. <u>National Pollutant Discharge Elimination System</u>

	AS DESCRIBED IN THE EA AND SHOWN AT THE PUBLIC HEARING
	3. Aquatic Resource Alteration Permit
Archaeology	The survey of the corridor of the Somerville Beltway encountered no archaeological resources, and there is little likelihood of undetected <i>in situ</i> archaeological deposits within the Area of Potential Effect. SHPO letter dated January 28, 2008
Historic Preservation	No effect on any architectural or historical resources included in or eligible for inclusion in the National Register of Historic Places and that there will be no Section 4(f) use of a historic property, SHPO letter August 11, 2006
Section 106 Review	June 23, 2006

CHAPTER 4 PUBLIC INVOLVEMENT

Initial Coordination

Agency

As part of the scoping process The Tennessee Department of Transportation, on September 30, 2005 notified sixty appropriate federal, state, and local planning and resource management agencies by letter of the proposed project. They were asked to comment, within their special area of expertise, upon any possible environmental, economic, or social impacts in order that any areas of specific concern could be taken into account during the development of the environmental and location studies. A list of these agencies follows, as well as a summary of the comments received (11 responses) and the disposition of those comments.

Native American

Pursuant to 36 CFR 800, consultation letters have been sent to; the United Southern and Eastern Tribe; the United Keetoowah Band Of Cherokee; the Chickasaw Nation; Cherokee Nation of Oklahoma; the Seminole Nation of Oklahoma; the Muscogee (Creek) Nation; the Choctaw Nation of Oklahoma; the Quapaw Tribe of Oklahoma; the Eastern Band of Cherokee Indians ~ Qualla Boundary; and the Eastern Shawnee Tribe of Oklahoma. Summaries and tribal dispositions are shown on the following pages. The response letters are in the Agency Correspondence and Technical Studies Appendix, Responses to Initial Coordination, of this document.

LIST OF AGENCIES TO WHICH THE INITIAL COORDINATION WAS SENT

TYPE OF AGENCY		RESPONSE
FEDERAL		
FEDERAL	Chief Environmental Assessment Office EIS Review Section Environmental Protection Agency	
FEDERAL	Environmental Manager Environmental Policy and Planning Tennessee Valley Authority	X
Federal	Project Manger Land Management Office Tennessee Valley Authority	
FEDERAL	Project Manager Regulatory Functions Branch (ORNOP-F) U.S. Army Corps of Engineers Nashville, TN 37214-2660	X
FEDERAL	State Conservationist Natural Resources Conservation Service	X
FEDERAL	Coordinator National Oceanic & Atmospheric Administration U.S. Department of Commerce	
FEDERAL	District Engineer Regulatory Functions Branch Memphis District U.S. Army Corps of Engineers U.S. Department of Defense	X
FEDERAL	U.S. Fish and Wildlife Service U.S. Department of the Interior	X
FEDERAL	District Chief Water Resources Division U.S. Geological Survey U.S. Department of the Interior	
FEDERAL	Office of Environmental Affairs U.S. Geological Survey U.S. Department of the Interior	

FEDERAL

Director Office of Environmental Policy and Compliance
U.S. Department of the Interior

FEDERAL

Director Office of Planning and Compliance
National Park Service
U.S. Department of the Interior

FEDERAL

Director Office of Surface Mining
U.S. Department of the Interior

HISTORICAL

HISTORICAL

John Babb Chapter
Daughters of the American Revolution

HISTORICAL

Henry County Historian
Henry County Historical Society

HISTORICAL

United Southern and Eastern Tribes
711 Stewarts Ferry Pike
Nashville, TN 37214

LOCAL

LOCAL

Supt. of Highways
Paris, TN 38242

LOCAL

Office of the Mayor
Paris, Tennessee 38242

LOCAL

County Executive
Henry County Government

NATIVE AMERICAN TRIBAL NATIONS

Native American Nation - Tribe

Research and Policy Analyst
Cherokee Nation of Oklahoma

Native American Nation - Tribe

Cultural Resources Director
Chickasaw Nation

Native American Nation - Tribe
Chief
Choctaw Nation of Oklahoma

Native American Nation – Tribe X
Chief
Eastern Shawnee Tribe of Oklahoma

Native American Nation - Tribe X
Cultural Research Specialist
Muscogee (Creek) Nation

Native American Nation - Tribe
Historic Preservation Specialist
Seminole Nation of Oklahoma

Native American Nation - Tribe
Chief
United Keetoowah Band Of Cherokee

PRIVATE

PRIVATE
Tennessee State Chapter
Sierra Club

PRIVATE
Tennessee Conservation League
Nashville, TN 37209-3257

PRIVATE
Tennessee Environmental Council
Nashville, TN 37228-1587

PRIVATE
Tennessee Trails Association
Nashville, TN 37204

STATE

STATE
Deputy State Historic Preservation Officer X
Tennessee Historical Commission
Clover Bottom Mansion

State
Executive Director West Tennessee Section
Tennessee State Planning Office

STATE
NEPA Contact

	Tennessee Wildlife Resources Agency Ellington Agricultural Center	
STATE	Office of the Commissioner NEPA Contact TN Department of Agriculture	
STATE	Facilities Construction Specialist Accountability and Assessment Division TN Department of Education	
STATE	Director of Special Projects TDECD NEPA Contact TN Dept. of Economic & Community Development	
STATE	Director Division of Solid/Hazardous Waste Management TN Dept. of Environment & Conservation	
STATE	Director Division of Air Pollution Control TN Dept. of Environment & Conservation	X
STATE	Director Division of Ground Water Protection TN Dept. of Environment & Conservation	
STATE	Director Division of Water Supply TN Dept. of Environment & Conservation	
STATE	Director Division of Water Pollution Control TN Dept. of Environment & Conservation	X
STATE	Director Division of Natural Heritage TN Dept. of Environment & Conservation	X
STATE	Environmental Policy Office TN Dept. of Environment & Conservation	

Summary/Disposition of Initial Coordination Replies

Federal Agencies

Tennessee Valley Authority

“From the project description it appears that there would be no TVA approvals or other involvement with this project. However, a TVA transmission line crosses the corridor being evaluated, and if it appear that TVA transmission lines are affected, please contact us for consideration as a cooperating agency.”

DISPOSITION: TVA is a Cooperating Agency

United State Department of Agriculture Soil Conservation Service.

Completed Form 1006 revealed that total 520 acres to include 425 (0.01% of the county total) acres of prime farmland are involved.

DISPOSITION: The loss of these acres will not adversely impact the overall amount of farmland available in the study area.

United States Department of the Army Memphis District Corps of Engineers

The Corps of Engineers is a cooperating agency for this project.

Under Section 404 of the Clean Water Act, the Corps of Engineers regulates the discharge of dredged or fill material into waters of the United States. Based on a cursory review of the drawings that were included with your letter and a site visit earlier this year, waters of the U.S. appear to be located within the proposed alignment; therefore, this project would likely require a Department of the Army permit prior to construction. The type of permit required (and therefore the level of review by the Corps of Engineers prior to a permitting decision) will depend on the type and extent of impacts to waters of the United States.

We will be available to serve as a Cooperating Agency during the development of the environmental document for this project. We will also be available to review the proposed alignments and provide determinations regarding the presence of any jurisdictional areas (wetlands or other waters of the U.S.) within these alignments. Finally, we will be able to provide guidance regarding the documentation of avoidance and minimization of impacts to waters of the U.S. and the preparation of an alternatives analysis so that the final environmental document contains sufficient information to justify a permitting decision under the 404(b)(1) Guidelines for Specification of Disposal Sites for Dredged or Fill Material.

DISPOSITION: See the appropriate section on the Environmental Assessment above for a general discussion of wetlands and permitting required by COE. The Draft EA will be circulated to COE for comment. After a location decision is made TDOT will circulate a final environmental document which if the Corps area of concern is still within the footprint, will in more detail address COE's concerns. Corps response to the draft EA review will be included under a separate heading.

United States Department of the Interior
Fish and Wildlife Service

DOI made several comments concerning the location and types of wetlands and for erosion and sediment control measures to be used during the construction process. "...However, based on the best information available at this time, we believe that the requirements of Section 7 of the endangered Species Act of 1973, as amended, are fulfilled. Obligations under Section 7 of the Act must be reconsidered if (1) new information reveals impacts of the proposed action that may affect listed species or critical habitat in a manner not previously considered, (2) the proposed action is subsequently modified to include activities which were not considered during this consultation, or (3) new species are listed or critical habitat designated that might be affected by the proposed action."

DISPOSITION: TDOT will keep USFWS informed on changes to the project location and the development of new information. TDOT will comply with all necessary and prudent erosion control measures. The Department will prepare the necessary wetland mitigation and avoidance plans when and if required. The Department has conducted a search of the proposed project area for endangered species. The result of the search is included in this report.

State Agencies

TN Department of Environment and Conservation
Tennessee Historical Commission

"... Considering available information, we find that the project as currently proposed MAY AFFECT PROPERTIES THAT ARE ELIGIBLE FOR LISTING IN THE NATIONAL REGISTER OF HISTORIC PLACES. You should continue consultation with our office, designated consulting parties and invite them to participate in consultation, and provide us with appropriate survey documentation for review and comment... We appreciate your cooperation."

DISPOSITION: See the Cultural Resources Section above.

TN Department of Environment and Conservation
Division of Ground Water Protection

"The Division of Ground Water Protection regulates all aspects of the subsurface sewage disposal (SSD) program in the state of Tennessee..."

Regarding thereferenced project, the Division....anticipates that it is likely the project may impact existing SSD systems that are located along the route proposed..."

DISPOSITION: TDOT will closely coordinate the local government to ensure that all SSD lines are properly surveyed, marked, and if they cannot be avoided, safely moved with little or no disruption in service.

TN Department of Environment and Conservation

Division of Water Supply

Ground Water Management Section

The Division of Water Supply appreciates the opportunity to provide water supply information in the furtherance of Department of Transportation projects. The proposed beltway is more than a mile beyond the wellhead protection area (based on 10 year time of travel modeling) at its closest point. It does not appear that the project is likely to cause any sort of impact on the City of Somerville's wellfield. I have enclosed a map of Somerville's wellhead protection area.

It should be noted that a considerable portion of the area where the beltway will be put in is on private wells (map attached). The aquifer of concern in the area is an unconfined portion of the Memphis Sand aquifer and is vulnerable to spillage of petroleum products such as diesel fuel, particularly in the case of private wells, which tend to be at shallow depths (less than 100 feet). The contractor needs to be vigilant in any storage and filling of diesel fuel, etc. during construction activities as spillage could result in contamination of nearby private wells.

DISPOSITION: See the appropriate sections of the Environmental Assessment. All contractors will be made aware of TDEC DWS GWMS concerns.

TN Department of Environment and Conservation

Division of Solid Waste Management

The Division of Solid Waste Management in the Memphis Field Office has reviewed your letter. While there are no known hazardous waste site located in the study area there are solid waste sites.

1. Fayette County Landfill (SNL 24-0079). This site is located immediately south of the proposed alignment of section 1 just west of SR 76. This is a closed class I landfill.
2. Fayette County Convenience Center (CCC 24-0344). This site is located south of the proposed alignment of section 1 just west of the Fayette County Landfill.

The proposed alignment of section one would appear to cut the access road between the Fayette County landfill and the Convenience Center. The Landfill serves as the access control point for the Convenience Center. As the Convenience Center is the only legal open to the public waste disposal facility, adequate access should be maintained.

While there are no registered hazardous waste facilities within or immediately adjacent to the proposed alignment, there are probably several conditionally exempt small quantity generators. These would include automobile maintenance facilities and farm equipment maintenance facilities, both commercial and private.

DISPOSITION: See the Hazardous Material section of the EA. Access to the Convenience Center will be maintained.

Tennessee Department of Environment and Conservation
Air Pollution Control Division

The Division of Air Pollution Control has reviewed your project summary for the proposed State Route 15 (US 64), Fayette County, Tennessee. This project is in an area designated as attainment/unclassified for the National Ambient Air Quality Standards (NAAQS), so a Conformity determination is not required.

This agency's other interests, above what would be addressed through the standard NEPA process, concerns the control of fugitive dust and equipment exhaust emissions during the construction phase, and the assurance that any structures requiring demolition are asbestos free, as per the requirements of Chapter 1200-3-11, Hazardous Materials. I would also like to point out that the open burning regulations have changed dramatically. Before burning any wood waste, please refer to Chapter 1200-3-4, Open Burning rules at: <http://www.state.tn.us/environment/air.htm> under the regulations link. We also suggest contacting other applicable regulatory agencies.

We appreciate the chance to comment on this, and we would also appreciate the chance to review the Environmental Impact Statement when it becomes available.

DISIPOTION: See appropriate section of the EA. TDOT will afford all interested agencies the opportunity to comment on the EA.

Tennessee Department of Agriculture

“A review of the...project has been completed, and the conclusion is that this project will not impact any programs or plans of the department at this time. We encourage you to plan the erosion prevention and sediment control aspects of this project carefully, as the soils in the project area are some of the most highly erosive in Tennessee. Stream cross should likewise be designed so as to not exacerbate stream channel erosion.”

DISPOSITION: Due caution for erosion prevention, sediment control and stream crossings will be given to the design of this project.

Tennessee Wildlife Resources Agency

“Our current concerns are potential environmental impacts associated with potential stream impacts, floodplain impacts, and potential wetland impacts that may occur do to the construction of this project. We also have concerns regarding potential impacts to the state listed in-need-of-management species the northern madtom (*Noturus stigmosus*) which has been found where the Loosahatchie River by crossed by Highway 76 and may occur at other locations on the Loosahatchie River and its tributaries that will be crossed by the proposed beltway. We encourage continued consultation with our agency in future phases of this project to further reduce impacts to fish and wildlife resources.”

DISPOSITION: See appropriate sections of the EA. TDOT will continue to consulate with TWRA in the development of this project.

Tennessee Economic and Community Development
Office of Special Projects,

I am unaware of any adverse effects this project would cause; however, I have included a copy of our site package on the Somerville Corporate Park for your information. This private property has potential for industrial uses, but is presently undeveloped. The proposed Beltway of State Route 15 could make the site more attractive. Thank you for the opportunity to comment on this proposed project.

Native American Nation – Tribe

United Keetoowah Band of Cherokee

“...in Oklahoma has no objection to the referenced project. However, if any remains, artifacts or other items are inadvertently discovered, please cease construction immediately and contact us....”

DISPOSITION: Should any remains or artifacts be found, TDOT will take all appropriate actions.

Public Meeting

July 2, 1996 Project area south of SR 15

Summary of Public Meeting

Proposed Somerville By-Pass

From U.S. 64 (State Route 15) West of Somerville to U.S. 64 East of Somerville and to State Route 76 North of Somerville, Fayette County, Tennessee

The subject meeting was held in the auditorium of the Chickasaw Electric Cooperative in Somerville on Tuesday July 2, 1996. The purpose of the meeting was to gather comments from the public concerning the development of the subject route. A summary of the comments are as follows;

Attendance: There were a total of 46 signatures on the attendants list.

Comments: A total of 18 comments were received orally and by comment cards.

3 comments supported the project as presented.

8 comments supported the project only if it were re-aligned

2 comments supported the project only if the Alternative B alignment was followed in Section 2.

5 comments opposed the project.

A majority of the comments received supported the project but only conditionally. Most were opposed to its location near Fayette Academy on its west end and thought the alignment should be moved further out from town. Others thought a northern by-pass would serve the community better.

November 4, 1997 Project Area South of SR 15

Summary of Public Meeting

Proposed Somerville By-Pass, from U.S. 64 (State Route 15) west of Somerville to U.S. 64 (State Route 15) east of Somerville, Fayette County, Tennessee

The subject meeting was held at the Chickasaw Electric Cooperative in Somerville, Tennessee on November 4, 1997 from 5:00 to 7:00 PM. The purpose of the meeting was to gather comments from the public concerning the design and alignment of the subject route. A summary of the meeting is as follows;

Attendance: There were a total of 37 signatures on the attendants list.

Comments: A total of 30 comments were received orally and by comment cards.

9 of the comments supported the project.

5 of the comments supported the project if built to an alternate alignment

2 of the comments opposed the project.

2 of the comments wanted a reduced cross section to two lanes

August 25, 2005 Somerville Beltway

Public Information Meeting For The Somerville Beltway
Somerville, Fayette County, Tennessee

The subject meeting was held at the Fayette County Courthouse in Somerville, Tennessee on August 25, 2005 from 5:00 to 7:00 PM. The purpose of the meeting was to gather comments from the public concerning the design and alignment of the subject route. A summary of the meeting is as follows;

- A total of 94 persons signed in.
- Four comment cards were received.
- Oral comments focused on the location of the roadway.

Design Public Hearing

December 13, 2001

TDOT Design Division held Highway Design Public Hearing on the 13th day of December, 2001 in the cafeteria of the Fayette Academy, 15090 Highway 64, Somerville, Tennessee, to discuss project no. 24092-1 201 -04, SR-15 (US-64, Somerville Bypass) from SR-15 (US-64) near Jones Creek west of Somerville to SR-15 (US-64) near Bennett's Creek east of Somerville, in Fayette County

Twenty-nine persons signed the attendance register and eight comment cards were received. The comments concerned the location of the project.

Agency Correspondence and Technical Studies Appendix

NOTE: Due to the volume of the technical studies a summary is herein provided. The complete studies are published under a separate cover and are available on request.