



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION 1

1 CONGRESS STREET, SUITE 1100
BOSTON, MASSACHUSETTS 02114-2023

OFFICE OF THE
REGIONAL ADMINISTRATOR

July 14, 2004

Kenneth R. Sikora, Jr.
Federal Highway Administration
P.O. Box 568
Montpelier, Vermont 05601

RE: Final Environmental Impact Statement Route 9/100 Transportation Improvement Study
Wilmington and Dover, Windham County, Vermont EPA ERP Number FHW-B40087-VT

Dear Mr. Sikora:

The Environmental Protection Agency-New England Region (EPA) has reviewed the Federal Highway Administration's (FHWA)/Vermont Agency of Transportation's (VTrans) Final Environmental Impact Statement (FEIS) for the consideration of various alternatives to relieve congestion and functional deficiencies along Routes 9 and 100 in the Towns of Wilmington and Dover, Windham County, Vermont. We submit the following comments in accordance with our responsibilities under the National Environmental Policy Act (NEPA), Section 309 of the Clean Air Act, and Section 404 of the Clean Water Act.

The FEIS identifies the Castle Hill Bypass Alternative as the preferred alternative. This alternative involves the construction of 3.2 miles of new roadway, five new bridge structures and two new traffic signals--at the western and eastern ends of the new bypass.

EPA's comments on the Draft Environmental Impact Statement for this project in January 1999 identified general concerns about the proposed project and issues we believed should be addressed prior to the completion of the NEPA/Section 404 process. They specifically focused on how the proposed alternatives would help remedy identified traffic problems and how they could affect the natural and built environment, especially with respect to wetland resources, water supply, air quality and secondary growth impacts. This letter provides our comments on the discussion of these issues in the FEIS.

The FEIS explains that funds are not available to advance the project design work or initiate construction of the preferred alternative. As indicated in the FEIS, the lack of funds, in combination with the other two unresolved issues highlighted on page S-17 (lack of consensus at this time that the preferred alternative can be designated as the "least environmentally damaging practicable alternative" (LEDPA) and the lack of consensus at the local level about which alternative should be the preferred alternative), it may be some time before a Route 9/100 project is advanced for a permit under Section 404 of the Clean Water Act. Accordingly, the comments

617-918-1010

Internet Address (URL) • <http://www.epa.gov/region1>

Recycled/Recyclable • Printed with Vegetable Oil Based Inks on Recycled Paper (Minimum 30% Postconsumer)

we offer in the attachment to this letter are offered to help shape the Record of Decision (ROD) for the project and to assist you in identifying relevant information to support a future permit application.

We encourage VTrans and FHWA to closely monitor the transportation performance of any upgrades and other improvements in the project area in the meantime to better understand how these measures alleviate traffic flow and congestion problems in Wilmington. That understanding will be important when additional work is done to support a Section 404 permit application in the future. We appreciate the opportunity to provide comments on the FEIS. Please contact Timothy Timmermann of EPA's Office of Environmental Review at 617/918-1025 with any questions you may have about our comments or if you would like to discuss them in greater detail.

Sincerely,


Robert W. Varney
Regional Administrator

attachment

cc:

Gary DuBray, Project Manager, Vermont Agency of Transportation

Christine Godfrey, P.E., New England District U.S. Army Corps of Engineers

Martha Lefebvre, U.S. Army Corps of Engineers Vermont Project Office

Gina Campoli, Vermont Agency of Natural Resources

Bill Neidermyer, United States Fish and Wildlife Service

**Additional Detailed Comments Attachment to July 14, 2004 letter
from Robert W. Varney to Kenneth R. Sikora, Jr.
on the FEIS for the Route 9/100 Transportation Improvement Study in
Wilmington and Dover, Windham County, Vermont**

Wetland Issues

- Additional analysis of vernal pool resources in the project area may be warranted. While no vernal pools were identified during field reconnaissance within the new alignment corridor, species observed in the vicinity (northern spring peeper, spotted salamander, and wood frogs) indicate that the area likely supports vernal pools and that the preferred alignment could affect habitat important to the survival of local populations of these species. Amphibian and turtle populations that reside in the new proposed highway corridor are species particularly vulnerable to roadway construction simply because they are difficult to spot and rely on a variety of habitats for their subsistence. Biological surveys to identify breeding habitat and use by these species will likely be needed as part of the Section 404 permit process.
- More analysis of indirect and cumulative impacts to wetlands in the build corridor represented on table 3.9-2 appears warranted. The Castlehill alternative will neighbor wetland area #121, (22 acres of scrub shrub swamp), #119 (11 acres of forested wetland) and #117 (8 acres of scrub swamp). The preferred alignment does not directly impact these wetland areas, but these wetlands may be vulnerable to indirect and cumulative impacts due to their location in an undisturbed environmental setting. We expect that an analysis of indirect and cumulative impacts to these wetlands will be needed for the Section 404 review for the project. Also, the numbered wetlands identified on 4.9-1 (pg 4-34) for the direct impacts are not represented on table 3.9-2 (pg 3-59). The FEIS states that the wetland areas are small but this is not quantified.
- We note that the FEIS states that the preferred alignment is unlikely to necessitate an Individual Permit under Section 404 of the Clean Water Act because it would meet the conditions of the Programmatic General Permit (PGP) for Vermont. The VT PGP authorizes projects that will have minimal impacts to the aquatic environment. In this instance, based on the potential for direct, indirect and cumulative effects of the proposed three mile bypass, EPA will likely recommend to the Corps of Engineers that an Individual Permit be required.

Impacts from Induced Growth

The preferred alternative would not provide any access to local streets other than at the intersections at either end, thus helping to minimize the potential for induced growth in the vicinity of the new roadway. Nevertheless, as the FEIS indicates, the bypass has the potential to cause businesses to locate at the two intersections and trigger other land use and socioeconomic impacts. We note that although the FEIS on page 4-47 references a number of studies suggesting that bypasses have neutral or positive effects on local businesses, not all studies have found such positive results. For example, a study by Srinivasan and Kockelman (Journal of Transportation Statistics, Volume 5, No. 1, 2002) of small and medium-size Texas communities found that the bypassed cities suffered a loss in per capita sales in the 4 sectors they studied (total retail sales, sales in gas stations, sales at eating and drinking places, and service receipts). Given that some potential exists for negative impacts from induced growth to occur to the environment as a result of the bypass we recommend that the ROD contain a commitment to the mitigation measures cited on page S-14.

Although we appreciate the community's concern about congestion and truck traffic in the village center, this is an expensive project (\$32.6 million, not including design, acquisition of ROW or mitigation) that will be accompanied by environmental impacts, and we are concerned that the investment will not lead to significant changes in transportation performance. For example, according to the FEIS, the Route 9/100N intersection would continue to operate in 2025 (the design year) at LOS F in the winter, and LOS E in the summer and fall. Route 9 east of Rt. 9/100N would operate at LOS E in both the winter and the summer, and the new roadway itself is expected to operate at LOS D in 2025 in the winter and E in the summer. Although the length of delay may lessen if the bypass is built, continued congestion may trigger a future demand either for a widening of the bypass or for a 'bypass around the bypass.' We recognize that the capacity of a two-lane, bi-directional roadway such as Route 9 is affected by a number of factors, as described on page 3-18. Nevertheless, given that the ideal capacity of a two-lane roadway is 2,800 passenger cars per hour, and given that total traffic volumes on Route 9 in 2025 even under a No-Action Alternative are expected to be less than 2,000 vehicles per hour during the Design Hour (page 4-3), we suggest that more consideration be given to whether the improvements described in the upgrade alternative should be pursued now. Although we recognize that these upgrade improvements do not fully meet the project purpose as a stand-alone alternative, they are less costly financially and environmentally than a bypass, and would provide benefits to the road system regardless of whether the bypass is constructed.

Road Salt

Page S-12 of the FEIS indicates that use of deicing chemicals will be in accordance with the VTrans Smart Salting policy, which requires the application of only as much material as is deemed necessary to achieve safe conditions. The FEIS also indicates that drainage issues will be studied during final design. We support the VTrans policy and recommend that VTrans and FHWA work with the Vermont Agency of Natural Resources to test streams to determine if there

are existing problems which the project could exacerbate and that should be addressed. Moreover, the ROD for the Chittenden County Circumferential Highway Project contains a commitment by VTrans and FHWA to undertake a statewide study of roadway deicing to evaluate the potential for road salt runoff to impact waterways. We encourage VTrans to apply the results of the roadway deicing study being conducted in connection with the Circumferential Highway to help determine what actions need to be taken to address contamination of waterways by chloride and other deicing chemicals for the Route 9/100 project.

Air Quality Construction Mitigation

We commend the measures that VTrans will take to control fugitive dust emissions during construction. These measures include wetting exposed ground surfaces, mulching and seeding exposed areas, cleaning paved roadways, and scheduling construction to minimize the amount and duration of exposed earth. It is important to note, however, that the fine particle emissions from the diesel construction equipment that will be used on the project are a serious public health problem, especially in the areas immediately adjacent to where they are released. They pose a significant health risk because they can pass through the nose and throat and lodge themselves in the lungs. These fine particles can then cause lung damage; and EPA has characterized diesel exhaust as a likely carcinogen. Given these public health concerns, EPA strongly recommends that measures be implemented to reduce fine particle emissions from diesel exhaust associated with construction. We recommend that VTrans include requirements for diesel retrofits and/or the use of cleaner diesel fuel in their construction contracts for this project. The inclusion of these requirements in contracts for the project will help reduce construction related impacts on adjacent communities.

Similar requirements have also been included in the contracts by the Connecticut Department of Transportation (ConnDOT) for its Connecticut Clean Air Construction Initiative on the I-95 New Haven Harbor Crossing Corridor Improvement Program in New Haven. Briefly summarized, the ConnDOT program requires all contractors and sub-contractors with diesel-powered construction equipment with engine horsepower (HP) ratings of 60 HP and above, that are on the project or assigned to the contract in excess of 30 days are required to have emission control devices (such as oxidation catalysts installed on the exhaust of the diesel engine) and/or use clean fuels (such as PuriNOx). In addition, vehicle idling is generally limited to three minutes for delivery and dump trucks and other diesel-powered equipment. The Massachusetts Highway Department and the Massachusetts Bay Transportation Authority (MBTA) also now include similar retrofit requirements in all of their construction contracts.

We encourage FHWA to commit to require equivalent construction mitigation for the Route 9/100 project in the ROD and that VTrans include contract specifications requiring construction vehicle retrofits and/or the use of cleaner fuels. EPA is willing to assist VTrans in developing and implementing these requirements.

Other issues

- We note that the FEIS explains on page 9-2 that “VTrans and FHWA have prepared a Reevaluation as required by FHWA’s NEPA regulations and have determined that a Supplemental DEIS is not warranted....” It would have been helpful if the FEIS included a copy of the reevaluation to directly support the decision-making with respect to this process issue.
- Also, at a recent public meeting, citizens of Wilmington expressed concerns relative to the noise generated as a result of the trucks accelerating up a 5% grade up hill (new bypass route) and the adverse effects on air quality from idling trucks at the two new intersections. The ROD should identify how these specific concerns were addressed.