

Route 110-113 Rotary Interchange Study
Study Advisory Committee (SAC) Meeting Summary
Tuesday, October 24, 2006

Searles Building
3rd floor – Great Hall
41 Pleasant Street, Methuen
3:00 – 5:00 PM

In Attendance: *Committee Members or Designated Representatives:* Tony Komornick - MVPC, Frank DaSilva – Citizen Advisor, Beverly Woods - NMCOG, Colie Ryan – Citizen Advisor, Dennis DiZoglio - MBTA, Eleni Varitimos – Sen. Baddour’s Office, Joe Onorato – MassHighway District 4, LouAnn Gendro – Rep. Colleen Gary’s Office ***Study Team:*** Ethan Britland - OTP, Paul Nelson - OTP, George Gefrich - TranSystems, Joe Cahill - TranSystems, Jill Barrett - FHI, and Sudhir Murthy - Trafinfo.

Meeting Agenda:

- 1. Welcome and Introductions**
- 2. Review of Existing Conditions**
- 3. Summary of Future Conditions**
- 4. Issues Identification and Project Constraints**
- 5. Review of Base Alternatives: I-93 Corridor Study**
- 6. Public Informational Meeting / Other Business**

1. Welcome and Introductions

Ethan Britland of the Office of Transportation Planning and Project Manager of the study welcomed attendees. Ethan said the study team would present a brief summary of existing conditions, but the primary agenda for the meeting was to review projections of future conditions, what the study team has identified as issues and constraints and a review of the seven alternatives for improving the Route 110/113 Rotary Interchange identified in the I-93 Corridor Study. Ethan also said the team would be looking for input on the upcoming Public Informational Meeting scheduled on November 9th.

2. Review of Existing Conditions

George Gefrich, Project Manager of the study team reviewed existing conditions in the study area. The area is comprised of the Rte 110/113 Methuen Rotary and about a one-half mile east and west of the rotary in Methuen, including the I-93 on and off-ramps (Exit 46) and Route 113 from Route 38 in Dracut Center to the Methuen Rotary.

George said the study has examined physical conditions including the geometry of area roadways and intersections, traffic volumes, accident rates, level of service (operating conditions such as delays and safety) and environmental conditions. Currently a number of the unsignalized intersections and approaches to the rotary are at level “F” or failing and some locations of the study area, including the rotary, have crash rates higher than the statewide average.

The area is served by three transit routes and commuter rail and commuter lots. Approximately 800 parking spaces are available for use by park and ride or rail customers. Several thousand commuters use MBTA as indicated below:

- 4,700 Inbound Riders Daily on MBTA Haverhill Reading Line
- 1,350 Inbound Riders Daily From Haverhill, Bradford and Lawrence Stations
- 600 Inbound Riders Daily From Andover
- 4,700 Inbound Riders on MBTA Lowell Line 1,220 are From Lowell

The study team also reviewed existing land use and environmental conditions. The study area is largely a built environment with some wetlands and flood plain adjacent to the Merrimack River.

Approximately 800 new residential units are either projected or under construction in both Dracut and Methuen. The study team also identified several parcels, the majority in Dracut, which could be developed for industrial or commercial use.

3. Summary of Future Conditions

The study team used a travel demand model, called TransCAD to predict future traffic conditions in the study area. Sudhir Murthy explained how TransCAD models individuals and their families, using basic demographic characteristics such as age, marital status as well as levels of education, economic patterns of work and earnings. This information is used in a 4-step process to project travel by vehicles and transit within the study in the year 2025. The study team used a statewide travel demand model as well as elements of the Central Transportation Planning Staff (CTPS) regional model, and calibrated or adjusted it to reflect local conditions (project growth in employment, residential units). Analysis of the traffic volumes from the model indicated in the year 2026 congestion and delay in the study area would increase to a level where there would be queuing of vehicles throughout the rotary during peak travel times.

4. Issues Identification and Project Constraints

After reviewing existing and future conditions, a list of issues and constraints was developed by the study team.

ISSUES

Congestion and delay

- At both intersections immediately east and west of the rotary
- At side-street approaches at unsignalized intersections
- On the rotary causing backups/queuing onto I-93
- In AM peak queues on the rotary & Route 110 (Lowell Street) at entrance to I-93 southbound (by year 2026 queues projected to fill entire rotary)
- In PM peak I-93 northbound off-ramp has extremely long queues extending back to the highway (causes accidents)
- Detouring from 110 east to Riverside Drive (also affects access to park)
- Congestion degrades air quality

Safety

- High travel speeds on Route 113 west of the rotary
- School bus access on Route 113 west in the AM and PM provides potential conflicts with traffic volumes
- Truck usage to and from facilities in Dracut
- Rotary has higher rate of crashes than the statewide averages for unsignalized intersections
- Intersections at Lowell Street /N. Lowell Street and at Lowell Street/ Haverhill Street have higher than average crash rates

Area Growth

- Residential and business growth in Dracut will place higher demand on Route 113 west of the rotary

CONSTRAINTS

Existing Land Development

- Residential and commercial property in close proximity to existing interchange
- Specifically, large commercial building near the southbound I-93 off-ramp limits possible changes to ramp
- Narrow right-of-way on Route 113 west of the rotary, small setbacks of homes limit the ability to widen road without takings

Environmental

- 100-year and 500- year floodplains to the southwest of the rotary require permits and extensive analysis for displacement of floodwaters if any alternative alters the floodplain
- Wetlands permits and compensation/mitigation for drainage for affected areas would be required
- Impacts to a swamp west of the rotary and to an emergent wetland to the northeast and east of rotary
- Possible impacts to buffer areas of wetlands

5. Review of Base Alternatives: I-93 Corridor Study

Joe Cahill of TranSystems presented a review of the seven alternatives identified to improve the Route 110/113 rotary interchange as part of the prior I-93 Corridor Study. The pros and cons of each alternative were reviewed. Criteria used in the analysis included cost, community, environmental and visual impacts and whether the alternative improved traffic operations. The study team concluded, and the Study Advisory Committee concurred, that only alternatives 6 and 7 warranted further study. Alternatives 1-5 were eliminated because one or more of the following reasons. The alternative did not result in significant traffic improvement, was too costly, and/or required the building of stacked bridge structures that would have an unacceptable visual and noise impacts, and would also cause disruption during construction. While alternatives 6 and 7 will be studied further, the study team said that these alternatives may be modified and new alternatives could be developed as a result of the in-depth study that is now underway. George Gefrich emphasized alternatives will be developed through an iterative process, with a lot of public involvement throughout the process.

6. Public Informational Meeting

A Public Informational Meeting will be held at the Methuen City Hall on November 9 from 7-9 p.m. The SAC members suggested that the study team make it clear to the public in its public notification and at the start of the meeting that the purpose is to discuss the planning process and what has been done to date. Otherwise, the public may think that developed or prior alternatives will be discussed and may come to the meeting concerned and asking questions about the potential impact on their homes and community. The study team agreed to revise its meeting flyer and public notice accordingly. SAC members also thought it was important for the study team to let people know at the beginning of the Public Informational Meeting that this current study is the beginning of a multi-step process, and that there would be no major construction for several years.

Questions and Comments

There was much dialogue among the SAC members and study team members throughout the meeting. The following is a summary of the discussion that occurred during the two and a half hour meeting.

Q. I think you need to adjust your model (CORSIM traffic model) because it shows traffic from Rte 110 (eastbound) merging onto the rotary with traffic from Rte 113 (eastbound) near the I-93 southbound on-ramp. This does not happen when the Rte 113 signal is green. Traffic on Rte 110 stops and waits until traffic funneling from Rte 113 eastbound has entered the rotary. Will you adjust your model to reflect that?

A. *Yes, we will.*

Q. There is an industrial complex in Methuen with road access in Dracut that might expand; will the study team verify its impact?

A. *Yes, we will*

Q. There is a safety problem for traffic exiting from the I-93 southbound off-ramp onto Rte 113 westbound. It's difficult for drivers to see what's happening at the rotary at the end of the ramp because there is a bend and dip in the road and vegetation obscuring sightlines. It's a hot spot on the rotary for accidents.

A. *Perhaps this can be viewed as an area for short-term improvement, in addition to long-term improvements.*

Comment: Don't ignore what might be a long-term trend of more people working in New Hampshire as employment opportunities increase there.

Q. Does the CORSIM model account for the high percentage of trucks on Rte 113 in Dracut?

A. *We know the percentage of trucks on the road is 13-14% and has been taken into account.*

Comment: Route 113 is trying to function as both a neighborhood and a state route and has no shoulders.

Q. What's the impact of people finding alternative routes to access I-93 such as Pelham Street if traffic on the rotary gets as bad as projected?

A. *People undoubtedly will try to find other routes to avoid traffic, and to a certain extent this has been accounted for in the travel demand model.*

Comment: Since the extra travel lane was added, there has been a dramatic increase of people driving in the breakdown lane on the I-93 bridge over the Merrimack River. Cars are being hit on the right hand side. This is an area that needs short term help.

Q. Have you checked for the presence of hazardous materials, especially in Dracut?

A. *So far we've documented the state list of known contaminated sites. When the project moves to a detailed environmental review stage, a more in-depth look at hazardous materials will be done.*

Q. When will this study be done?

A. *The most current expected completion date is June 2007*

Q. Are there funds available to implement improvements?

A. *There are no funds tied directly to this study but there are funds earmarked for High Priority Projects (HPP funds) for which this project will qualify. However, the process for programming and funding any improvements is via the regional Transportation Improvement Program.*

Q. How soon will we see the first bulldozer?

A. *Any major construction improvements recommended by this study will also have to go through the environmental, design, and if necessary ROW processes. So the typical timeline for long-term improvements is 5 to 10 years.*

Q. Would you begin the Public Informational Meeting with a timetable for implementing improvements because people are concerned about their future?

A. *Yes, we will.*

Written Comments submitted by SAC members

SAC members were asked to write down additional thoughts on comment forms for consideration by the study team. At the conclusion of the meeting the following was submitted.

1. Modifications for Existing Issues

- Traffic exiting from I-93 southbound to 110/113 rotary has difficulty seeing traffic in already in the rotary, and is exiting at a high rate of speed and must either enter the rotary or turn right. The road dips down here at that right bend and faces a possible red light entering 110. This is a real

danger area. A warning light could be put in immediately on the exit ramp from Rte 93 southbound coming down towards Rte 113 where there is a blind corner

- Impact of truck volumes on operations within the rotary
- Potential new development at Burger King on Haverhill Street. Potential discussion of adding light at Forest/Haverhill Street – potential for horrible back up into the rotary if light is red, heading out of the rotary, down Haverhill Street.

2. New Issues

- Noise. There are a lot of homes that are very close to the rotary. Noise must be an issue and should be addressed in some form.
- Noise impacts of truck traffic on residences along Rte 113 (a complaint that the town has received from several residents). Something that will need to be further considered in light of any proposed future improvements.
- Route 113 and Tyler Street
- Back up onto Rte 113 from I-93 north – there is a blind corner.
- By the year 2025 congestion on the rotary will result in alternative routes being used, possibly Pelham St/I-93.
- General timeline on all studies prior to possible construction?
- Exiting off I-93 at exit 46 northbound should be two lanes exiting at peak periods (right travel lane and breakdown lane) but people are driving in the shoulder too so really there are 3 lanes exiting, causing accidents and additional congestion.