Draft Memorandum for the Record Boston Region Metropolitan Planning Organization Meeting

December 3, 2015 Meeting

10:05 AM – 11:05 AM, State Transportation Building, Conference Rooms 2&3, 10 Park Plaza, Boston, MA

David Mohler, Chair, representing Stephanie Pollack, Secretary and Chief Executive Officer, Massachusetts Department of Transportation (MassDOT)

Decisions

The Boston Region Metropolitan Planning Organization (MPO) agreed to the following:

- approve the work program for Freight Planning Support: FFY 2016
- approve the work program for Pedestrian Level-of-Service Metric Development
- approve the minutes of the MPO meeting of November 19

Meeting Agenda

1. Change to Agenda

Two action items on today's agenda were not taken up: the Draft Federal Fiscal Years (FFYs) 2016-20 Transportation Improvement Program (TIP) Amendment Two, and the Draft Long-Range Transportation Plan (LRTP), *Charting Progress to 2040*, Amendment One. These proposed amendments would have focused on the reallocation of funds from the *Green Line Extension (Phase 2)* project (the future extension from College Avenue to Route 16) to the *Green Line Extension (Phase 1)* project (the extension from Lechmere Station in Cambridge to Union Square in Somerville, and College Avenue in Medford).

2. Public Comments

There were none.

3. Chair's Report-David Mohler, MassDOT

There was none.

4. Committee Chairs' Reports

There were none.

5. Regional Transportation Advisory Council Report—Tegin Bennett, Advisory Council Chair

T. Bennett reported that the Advisory Council's Certification Documents Committee met on November 30 to discuss the proposed amendment to the TIP and LRTP regarding the *Green Line Extension* project (which is no longer on today's agenda).

6. Executive Director's Report—Karl Quackenbush, Executive Director, Central Transportation Planning Staff (CTPS)

K. Quackenbush announced that the State Transportation Improvement Program (STIP) and the MPO's air quality conformity determinations of its LRTP and TIP have been approved by the federal agencies.

He reminded members that there are seats open on the MPO's Congestion Management Committee. The Committee will meet next on December 17.

The Unified Planning Work Program (UPWP) Committee meeting has been delayed from December 17 until January.

7. Work Programs—Karl Quackenbush, Executive Director, Central Transportation Planning Staff (CTPS

K. Quackenbush introduced two new work programs, which members discussed and approved.

Freight Planning Support: FFY 2016

The work program for *Freight Planning Support: FFY 2016* is the third in a series of work programs implemented since the MPO approved a Freight Action Plan in 2013. The prior work programs focused on truck issues in the area of Beacham Street in Everett and on conducting truck counts in Boston's Seaport area to support ongoing planning efforts. This new work program involves actions intended to strengthen the MPO's freight planning capabilities and to position the MPO to conduct freight studies in the future.

The work program has four tasks. The first involves coordinating the MPO's freight planning efforts with those of stakeholders in the freight community. The MPO's freight project manager will become involved in forums to interact with stakeholders and to identify the freight community's issues, means for the MPO to help address those issues, and avenues for data gathering. The second task involves data gathering related to the issue of highway rest areas for truck drivers in the region, an issue highlighted in the Freight Action Plan. This task could lay the groundwork for a future study that could recommend new rest areas locations to MassDOT. The third task will identify weight-restricted bridges and their impact on trucking. This information could be used for future modeling analyses to determine the air quality and safety impacts of truck routings that might have been made more circuitous by the restricted bridges. The last task involves enriching the MPO's freight data sources, including obtaining vehicle flows for Interstate 90 prior to the conversion to all-electronic tolling.

Discussion

Ken Miller, Federal Highway Administration (FHWA), recommended federal resources that could be used for this project: truck parking data available as a result of Jason's Law and a national data set for freight travel time data.

A motion to approve the work program for *Freight Planning Support: FFY 2016* was made by the Metropolitan Area Planning Council (MAPC) (Eric Bourassa), and seconded by the MBTA Advisory Board (Paul Regan). The motion carried.

Pedestrian Level-of-Service Metric Development

Through the work program for *Pedestrian Level-of-Service Metric Development*, staff will develop pedestrian level-of-service metrics. Currently, the MPO staff does not have a system for objectively assigning level-of-service to pedestrian infrastructure. New level-of-service metrics will give the MPO staff the ability to compare locations, make projections about the impact of potential improvements on pedestrian infrastructure, and add a degree of rigor to the MPO's pedestrian planning.

The tasks in the work program include conducting a literature review of existing pedestrian level-of-service metrics, interviewing local and state entities to determine what pedestrian data are currently available, developing a plan for aggregating data, determining criteria for evaluating pedestrian facilities, and recommending next steps for applying pedestrian level-of-service metrics.

Discussion

A number of members voiced their enthusiasm about this work program.

E. Bourassa remarked that typically when determining vehicular level-of-service, consideration is given to queue lengths and delays. He inquired as to what measures would be used in determining pedestrian level-of-service. K. Quackenbush noted that the volumes of pedestrians in some congested downtown areas may matter, but it is mainly safety and ease of passage, irrespective of the number of pedestrian users, that will be evaluated.

Richard Canale, At-Large Town of Lexington, suggested that a next step after developing pedestrian level-of-service metrics would be to develop bicycle level-ofservice metrics. He also noted the importance of developing metrics for pedestrian wait times at intersections for comparison to vehicle wait times. This data can be informative when optimizing traffic signal lights. K. Quackenbush agreed on both points.

T. Bennett expressed that the task for developing a plan for aggregating data is particularly important considering that the available Complete Streets level-of-service tools currently resort to defaults for lack of data.

Laura Wiener, At-Large Town of Arlington, also expressed support for developing better level-of-service tools. She remarked that a level-of-service analysis was done for the *Reconstruction of Massachusetts Avenue (Arlington)* project a couple of years ago, but that the tools available at the time were inadequate. She offered to share the study that the town's consultant prepared for that project.

Jim Gillooly, City of Boston, invited staff to talk with the staff of Boston's Active Transportation team as they conduct this work program. He also asked staff to provide a briefing to the MPO after the first task of the work program is completed. Then he discussed issues that arise during project design concerning the implications of designing smaller sidewalks to accommodate bicycle tracks. He noted that evaluations should take into account the pedestrian experience on more or less crowded sidewalks, as well as compliance to ADA standards. K. Quackenbush confirmed that those issues would be considered as part of the work program.

K. Miller remarked on a bicycle comfort index, which was part of the state's bicycle plan, as an example of a measure for determining level of comfort for users of a transportation facility. He suggested two measures that could be added to the second task of the work program: the presence of street/walkway lighting and presence of bicycle infrastructure. He then inquired about the relationship between this work program and the state's pedestrian plan. K. Quackenbush replied that staff will coordinate with MassDOT as they conduct this project.

Steve Olanoff, Three Rivers Interlocal Council (Town of Norwood), raised the issue of how to measure the negative aspects of the pedestrian experience – such as the lack of direct pathways from origins to destinations – when measuring level-of-service.

Ken Krause, Medford resident, expressed the importance of considering pedestrian level-of-service in the context of vehicle level-of-service as both are interrelated.

A motion to approve the work program for *Pedestrian Level-of-Service Metric Development* was made by MAPC (E. Bourassa), and seconded by the City of Boston (J. Gillooly). The motion carried.

8. MPO Meeting Minutes-Maureen Kelly, MPO Staff

A motion to approve the minutes of the meeting of November 19 was made by MAPC (E. Bourassa), and seconded by the MBTA Advisory Board (Paul Regan). The motion carried. The following members abstained: Massachusetts Port Authority (Hayes Morrison); Minuteman Advisory Group on Interlocal Coordination (Town of Bedford) (Richard Reed); and North Suburban Planning Council (City of Woburn) (Tina Cassidy).

9. Low-Cost Improvements to Freeway Bottleneck Locations: FFY 2015—Seth Asante, MPO Staff

S. Asante presented the results of the *Low-Cost Improvements to Freeway Bottleneck Locations: FFY 2015* study. This study is the third in a series of MPO studies that have recommended low-cost improvements to locations on the express highway system where there are bottlenecks that result in congestion.

Bottlenecks occur as a result of physical design constraints that prevent traffic from flowing as expected. They are characterized by upstream congestion and downstream free flow conditions that occur at a particular time and location repeatedly. According to FHWA, bottlenecks account for 40% of congestion on the express highway system. Bottlenecks occur at locations where traffic merges and diverges or where there are lane reductions, and at major interchanges with high volumes of traffic entering and weaving.

For this study, MPO and MassDOT Highway Division staff identified five potential candidate locations for this study, and selected two for further study. The first location was at Interstate 93 southbound between Interstate 95 and Montvale Avenue in Woburn and Stoneham. The second location was on Interstate 95 southbound at the Interstate 90 interchange in Weston. (Note: A previous MPO study recommended improvements to Interstate 95 northbound in this study area.)

At the Interstate 93 location, high volumes of traffic enter at Exit 37 and exit at Exit 36 to Montvale Avenue, slowing traffic on the mainline. There is a short deceleration lane at Exit 36, which is not designed to MassDOT's standards for length, which contributes to a high number of crashes where traffic diverges.

Staff proposed two alternatives to address the congestion and safety problems at this location. Alternative One would lengthen the deceleration lane to Exit 36 from 350 feet

to 1200 feet. Alternative Two, which staff recommends, would create an auxiliary lane between Exits 37 and 36. This option would improve traffic flow by taking merging and diverging traffic out of mainline and provide an exit only lane for Exit 36. Also, staff recommends constructing an emergency pullover or stopping area to address safety issues. The proposed improvements are expected to improve level-of-service from E to C or D and to reduce crashes by 30%.

At the second location on Interstate 95, a high volume of traffic enters and exits Interstate 95 to and from Interstate 90. With only one lane serving that traffic, there is not enough capacity. Also, a short deceleration and acceleration lane causes merging and diverging, which slows the mainline traffic. It also causes queues on the Interstate 90 ramp connectors and a high number of crashes.

Alternatives for addressing this bottleneck include creating an exit-only ramp from Interstate 95 to Interstate 90, potentially with a two-lane exit ramp. (An alternative, if a two-lane exit ramp is not feasible, is to create a shared through and exit lane.) Also, the through traffic lanes could be reduced from four to three lanes between the entrance and exit ramps to allow for an auxiliary lane for entering traffic.

Discussion

Jay Monty, At-Large City of Everett, asked if staff has any statistics indicating how the already implemented improvements on Interstate 95 northbound have performed in terms of safety and level-of-service. S. Asante replied that staff has not done an analysis of the northbound lane.

J. Gillooly asked for a cost estimate for implementing the new recommendations. S. Asante reported that the improvements for Interstate 93 location in Woburn and Stoneham are estimated to cost between \$300,000 and \$500,000. The improvements for Interstate 95 in Weston are estimated to cost \$50,000 for lane restriping and adding signage.

Regarding the Interstate 93 location, K. Miller asked if there are any environmental constraints associated with the building of an emergency pullover or stopping area. S. Asante replied that there is ample room to construct the pullover area and there is currently a shoulder that is 12-13 feet wide.

T. Cassidy thanked staff for conducting the study. She expressed appreciation for staff's efforts to identify ways to improve level-of-service, particularly in the case of the Interstate 93 location given that a project to improve the interchange of Interstates 93 and 95 in Woburn was removed from the Long-Range Transportation Plan.

S. Olanoff remarked that it appears that some of the recommendations from the Interstate 95 in Weston study have already been implemented by MassDOT. S. Asante explained that some of the recommendations are being implemented as part of a bridge construction project at the Weston location, but they are not permanent yet. MassDOT is assessing the improvements, which appear to be working well. MassDOT is requesting FHWA's approval for making the improvements permanent.

10.Members Items

K. Miller remarked on the federal Fixing America's Surface Transportation (FAST) Act. The passage of this act will allow for a 5% increase in funding levels in FFY 2016, which will amount to about \$30 million in federal funding to Massachusetts (about \$37 million with the state match). Funding levels will be 2-2.5% higher in subsequent years of the five-year legislation. There will also be significant changes to funding categories.

D. Mohler asked the MPO staff to provide a summary of the FAST Act at a future meeting.

Members also discussed the scheduling of the next meeting that the MPO will hold outside of Boston. They agreed that the MPO will hold a meeting on the South Shore in the spring.

11. Adjourn

Attendance

Members	Representatives and Alternates
At-Large City (City of Everett)	Jay Monty
At-Large City (City of Newton)	David Koses
At-Large Town (Town of Arlington)	Laura Wiener
At-Large Town (Town of Lexington)	Richard Canale
City of Boston (Boston Redevelopment Authority)	Lara Mérida
City of Boston (Boston Transportation Department)	Jim Gillooly
	Tom Kadzis
Federal Highway Administration	Ken Miller
Inner Core Committee (City of Somerville)	Tom Bent
Massachusetts Department of Transportation	David Mohler
Massachusetts Highway Division	John Romano
Massachusetts Port Authority	Hayes Morrison
MBTA	Janice Ramsay
MBTA Advisory Board	Paul Regan
Metropolitan Area Planning Council	Eric Bourassa
MetroWest Regional Collaborative (Town of Framingham)	Dennis Giombetti
Minuteman Advisory Group on Interlocal Coordination (Town of Bedford)	Richard Reed
North Suburban Planning Council (City of Woburn)	Tina Cassidy
Regional Transportation Advisory Council	Tegin Bennett
South West Advisory Planning Committee	Dennis Crowley
Three Rivers Interlocal Council (Town of Norwood/Neponset Valley Chamber of Commerce)	Tom O'Rourke

Other Attendees	Affiliation
Mike Connolly	Cambridge
Ken Krause	Medford resident
Rafael Mares	Conservation Law Foundation
Britteny Montgomery	Massachusetts Institute of Technology
Steve Olanoff	Three Rivers Interlocal Council (Town of
	Norwood)
Bryan Pounds	MassDOT Office of Transportation Planning

Constance Raphael	MassDOT District 4
Brad Rawson	City of Somerville
Mark Sanborn	Regional Transportation Advisory Council
Ellie Spring	Office of State Representative Denise
	Garlick
Edward Starr	Arlington Transportation Advisory
	Committee
Clodagh Stoker-Long	City of Medford

MPO Staff/Central Transportation Planning Staff

Karl Quackenbush, Executive Director Robin Mannion, Deputy Executive Director

Mark Abbott Seth Asante Lourenço Dantas David Fargen Bruce Kaplan Maureen Kelly Anne McGahan Elizabeth Moore Scott Peterson Sean Pfalzer Alicia Wilson