



Date: October 26, 2012

To: Nora Loughnane, Town Planner

From: Kien Y. Ho, P.E., PTOE
Greg E. Lucas, P.E., PTOE

BETA Project #: 4410

Subject: University Station Peer Review

The purpose of this memorandum is to provide review comments for the October 2nd, 2012 Preliminary Traffic Impact Assessment submission made by the Proponent in connection with the University Station Development Project.

Documents reviewed included the following:

University Station - Preliminary Traffic Impact Assessment, dated October 2, 2012

Project Trip Generation

1. We concur with the separation of land uses between supermarket and retail/restaurant.
2. Please explain why the trips generated by 610,000 sf of retail/restaurant were proportioned from the 750,000 sf of retail/restaurant/supermarket space rather than using a direct calculation of trips generated by 610,000 sf determined using LUC 820, Shopping Center. Using a direct calculation of trips generated by 610,000 sf would be more conservative, as seen in the table below.

	750,000 sf Proportion	610,000 sf		Change
		EQ	Rate	
Wkdy	20463	21999	26193	1,536
Wkdy AM Street	610	448	610	0
Wkdy PM Street	1996	2137	2275	141
Saturday	26742	28868	30482	2,126
Saturday Site Peak	2582	2776	2983	194

Note: Wkday AM Street used the Average Rate because R² was less than 0.75.

3. Transit Mode Share, Residential – We concur with using survey data related to the Norwood site; however, the percentages related to the increased frequency of trains should be proportioned directly according to the peak period. This results in a 15% increase for the PM peak period – 11% for the Norwood site, factored by 1.4 (7 trains at Westwood vs. 5 at Norwood in the PM peak period).



4. Transit Mode Share, Residential – The transit mode share assumptions should not be applied to the senior housing portion of the residential component. While this has a negligible effect on total trips, we request that this assumption be verified
5. Transit Mode Share- Office. We concur with the overall assumptions regarding office transit mode share. However, with regard to the CTPS memorandum, indicating that approximately half of all transit trips arriving at Route 128 Station in the morning are from Boston, we note this is true of TMA shuttle passengers only, not of all transit trips (bus, train) arriving at the station. Please clarify or amend this statement accordingly.

Trip Distribution

1. The TIA states that the I-95 northbound off-ramp to Dedham Street is assumed to be complete within the 2022 horizon year. Please include figures illustrating the scope of the 2022 improvements to be implemented by MassDOT. Also, the Trip Distribution figures illustrating the impact of the 2022 improvements on trip distribution should be provided for review.

Traffic Operations Analysis

1. Please clarify how the 0.5% growth rate was determined.
2. The TIA includes re-occupancy of office space and industrial use in the project area. In addition, the Proponent should include a review of projects within the regional study area that may impact the study area in the 2017 and 2022 horizon years.
3. Additional background growth projects at 315 University Avenue and on Allied Drive in Dedham have been identified by the Town of Westwood and should be included in the No Build network.
4. No Existing or 2017/2022 No Build analysis results have been included for review. We anticipate that these will be included in the formal TIAS.
5. It appears that queuing will exceed available storage for the University Avenue NB LT at Blue Hill Drive and the Dedham Street WB LT at University Avenue. The effect of this queue spillover should be analyzed and discussed, specifically the effect of the University Avenue NB queue on the intersection at Rosemont Road and other site drive intersections.

Conceptual Improvement Plan

1. Figure 1 shows modifications to access of the CBRE Building bounded by Blue Hill Drive, University Avenue and I-95/Route 128. Specifically, the introduction of a median and the construction of a new driveway onto University Avenue opposite the Route 128 station garage access will reallocate existing trips both entering the parking lot from I-95 SB and exiting the parking lot bound for I-95 NB. This trip reallocation should be detailed and included in the analysis of the University Avenue/Blue Hill Drive intersection. Additionally, analysis should be included for the unsignalized intersection created by this new driveway, University Avenue and the Route 128 Station garage access, including traffic signal warrant analysis.

2. The existing I-95 overpass is immediately north of the new driveway proposed on University Avenue. Will the overpass create a sight obstruction for exiting vehicles?
3. It is understood that the narrow connector between Whitewood Road and the Blue Hill Drive West cul-de-sac is proposed for emergency access only. How will access be restricted for other vehicles?

Attachment A – Trip Generation Calculations

1. Rates for LUC 252 Wkdy AM and PM Street Peak rates are incorrect. This does not impact overall trips, as equations were used rather than rates for these scenarios. Please verify.

Miscellaneous Other

1. A preliminary review of the study area intersections to be included in the TIAS reveals that several key ramp movements are not included. Analysis of ramps and weaving movements for the I-95/I-93 interchange and weaving movements on I-95 between the University Avenue ramps and the I-95 SB off-ramp at the I-95/I-93 interchange should be included in the study area. The northern half intersections of the East Street rotary at East Street and Allied Drive should also be included.
 2. No parking generation or Traffic Demand Management (TDM) program was included in the preliminary TIA. The Proponent should detail the parking requirements of the project, the number of proposed spaces by land use, and any TDM programs or assumptions that are included in the Project.
 3. Relative to project build out, at what stage are the intersections at Canton Street and Blue Hill Drive improved. For example, prior to or as part of Phase 1 or later.
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