## Traffic Engineering Division



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From: Traffic Engineering Division To: Michael Verveer, 4<sup>th</sup> District Alder

Re: 100 W. Wilson Street Development Traffic Impacts and Mitigation

In response to neighborhood concerns raised by the nearby residents, Traffic Engineering has requested that the developer complete a Traffic Impact Analysis (TIA) study to better determine the impacts of their proposed development on the W. Wilson/S. Henry/S. Hamilton intersection. The site, as proposed, includes 206 dwelling units and 809 square feet of commercial space along with 229 vehicle parking stalls and 228 bicycle parking stalls. The current proposed commercial tenant is a local coffee shop without drive-thru access. Access to the site is proposed to be from two access points: one on W. Wilson Street, 125' from S. Hamilton Street; and another on S. Henry Street, 265' from W. Wilson Street. Both access points are proposed to provide connectivity to all underground parking stalls.

According to the results of the study, the proposed development is projected to result in a net increase of 845 daily trips. Of those 845 daily trips, 65 trips are anticipated during the AM Peak Hour while 60 trips are anticipated during the PM Peak Hour. The attached figures contain excerpts from the TIA that was completed by KL Engineering on behalf of the developer; "Exhibit 3" shows the existing peak traffic volumes from a City of Madison count from 2018, "Exhibit 8" shows the projected peak traffic volumes to be added by this development, and "Exhibit 9" shows the total traffic volumes anticipated (existing volumes + projected volumes). According to the analysis provided in the Traffic Impact Analysis, the new proposed development will result in minor increases to delays and queues at the W. Wilson/S. Henry/S. Hamilton intersection with no significant operational impacts anticipated. Queuing does not appear to be a controlling factor in the unique geometry associated with the south approaches.

Traffic Engineering mostly concurs with the analysis performed by KL Engineering, but also acknowledges some limitations of the study. While the unique geometry and complexity of the intersection was mentioned in the study, the report did not discuss geometric refinements that address increased motor vehicle use by the proposed development project. Also while the approved two-way bike lane on Wilson Street was included on the development site plan, it was not discussed in the TIA. Though we understand that the two-way bike lane is a corridor wide or an area wide issue that is much broader than the scope of this single development project and it may be unfair to hold the proposed development accountable for it, we do want to acknowledge the need to address these geometric considerations and Traffic Engineering is committed to work with the stakeholders to figure out how to best manage the complexity as the Wilson Street corridor

plan is implemented.

City staff have identified and discussed with the developer regarding the possibility of alterations to the W. Wilson/S. Henry/S. Hamilton intersection to better improve intersection operations, to help reduce confusion and to enhance safety. From these discussions, City staff has created a concept to improve intersection conditions for both pedestrians and vehicles, which is included in the exhibits. The proposed concept realigns and narrows the entrance of S. Henry Street to help simplify the intersection and reduce confusion by allowing S. Henry Street to operate as the side street for the northbound approach while also providing another pedestrian connection across the intersection. The realignment also reduce the likelihood of vehicles turning into S. Henry Street in error while trying to find an outlet to John Nolen Drive. City staff are working with the development team aiming to get these improvements made with the development project.

City staff have also reviewed the possibility of removing the S. Henry Street approach from the intersection, in the future, to allow S. Henry Street to become a private driveway at the sidewalk level and further improve the intersection. The removal of S. Henry Street would allow for a reduction in pavement, further simplify the intersection, and open up the possibility of increased public space. However, it may pose staging and delivery challenges and needs further review. The improvements that we hope to make with the development project set up the intersection for the possibility of this conversion at a future date if the city and the community chose to do so.

To further reduce the traffic impact of this project, Traffic Engineering will also work with the development team on transportation demand management and delivery management. Traffic Engineering is requesting the development to submit a Traffic Demand Management Plan and Commercial Delivery Plan to be reviewed and approved by Traffic Engineering, as part of the conditions for approval on the project.

Exhibit 3 S Hamilton St **NOT TO SCALE** SHENTYST WWilsonst (6) (8) S . (16) 455 10 A w wilson st SHENTYST S Hamilton St **LEGEND** XX = Weekday AM Peak (7:30 - 8:30 AM)(XX) = Weekday PM Peak (4:30 - 5:30 PM)<X,XXX> = Annual Average Daily Traffic = Traffic Signal = Stop Sign **Existing Traffic Volumes** 

Exhibit 8 S Hamilton St **NOT TO SCALE** SHENTST W Wilson St (Z) S (30) 30 Whilsonst SHENTYST S Hamilton St **LEGEND** = Weekday AM Peak (7:30-8:30 AM) XX(XX) = Weekday PM Peak (4:30-5:30 PM) **1** 5 = Traffic Signal = Stop Sign **Proposed New Trips** 



