

MEMORANDUM

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Date: November 10, 2023 Project #: 29311.008  
To: Diana Spriggs, P.E.  
Regulatory Division Director  
City of Port St. Lucie Public Works Dept.  
121 SW Port St. Lucie Blvd, Building B  
Port St. Lucie, FL 34984  
From: Kok Wan Mah, P.E.  
Project: Wilson Groves  
Subject: Traffic Analysis Technical Review

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A Traffic Analysis was conducted to support the Map H Amendment for the proposed Wilson Groves project. The site is approximately 2,500 acres located north of the Martin County Line and west of the Riverland DRI.

The density and intensity of land uses is not proposed to be changed. However, Map H is being revised to reallocate the location of land uses, which potentially will change the impacts on the roadways within and adjacent to the development. The Applicant has been asked to provide a traffic analysis to evaluate and document these changes.

Kittelison & Associates, Inc. (KAI) has reviewed the Traffic Analysis prepared by O'Rourke Engineering & Planning, Inc. that is dated November 7, 2023.

In summary, I am in agreement with the findings of the supplemental traffic analysis that we requested as part of the Map H amendment. The objective was to identify any deficiencies on the roadway segments internal to the site as a result of the changes in the locations of the mixed-use portions of the development. Since the land use densities and intensities have not changed, the resulting trip generation is comparable to the approved WATS 3.0 study. The minor changes are a result of updating to the 11th edition and changes to the internal capture and intrazonal trips from the changes in land use intensities within each parcel. In fact, the trip generation decreased slightly for daily, AM, and PM peak-hours. The reassignment of trips does not result in any capacity deficiencies on the roadway segments internal to the site.

However, there are three concerns that I'd like to bring to the City's attention:

- 1) In the revised Map H, Parcel C includes 183 acres of residential. The traffic analysis shows 1,477 single family residential units. This would result in 8.03 DU per gross acre. This seems very high for single family density. In comparison, Parcel D includes 227 acres with 1,925 multi-family units, resulting in a density of 8.48 DU per gross acre. The other single family parcels do not exceed 3.56 DU per gross acre. When I asked Susan at O'Rourke Engineering & Planning about this, she responded that single family units are permitted in the mixed-use portion of the parcel. This then

- begs the question of why not designate the entire project as MXD? It also blurs the line of where and how much mixed-use will be in each parcel, though this is broken down in the traffic analysis.
- 2) The peak-hour peak-direction capacities of the roadway segments on Table 4 do not correspond to capacities in the FDOT generalized tables. Again, when I asked Susan about this, she stated that they are consistent with capacities used in WATS 3.0h. A check against the capacities used in the traffic study dated March 2022 show that the volumes are consistent. So while I don't find fault in the use of these capacities, they do seem higher than the generalized volumes.
  - 3) It is not certain what vested traffic was included in the analysis of future buildout conditions. However, what is presented is consistent with the previously approved traffic study. With the level of development and entitlements that have been ongoing in this area, City staff should consider any future request for Map H amendment should require an up-to-date traffic study that accounts for the changes, approvals, and improvements that have been entitled and funded in the area.

We appreciate the opportunity to provide these comments to the City of Port St. Lucie. If you have any questions or concerns, please contact me at [kmah@kittelson.com](mailto:kmah@kittelson.com) or 407.373.1127.