TRAFFIC IMPACT ANALYSIS REVIEW MEMO

Date:November 5, 2020 (Comments Date). October 29, 2020 (Resubmittal)Subject:Anclote Harbor Apartments Traffic Impact Analysis (TIA) Review Comments
City of Tarpon Springs, Florida
American Project No: 5169367

American Consulting staff reviewed the subject TIA and offer the following comments. Also see attached redlines.

Comment 1: In the Preliminary Development Plan (PDP-01), indicate the directional U turn arrows in the two turn lanes and site driveways.

Response: Figure 9 in the report has been updated to indicate the directional U turn arrows and includes the site plan to clarify the access to/from the site.

<u>Response Comment</u>: Response accepted. The Preliminary Development Plan (PDP-01) was not updated but Figure 9 is sufficient.

Comment 2: Keep City and Reviewer informed on the status of the FDOT Approval of Permit Plans for the NB right turn lane into the site, and the offset median U turn lanes. Provide a copy of any plans that are provided to FDOT, to the City.

Response: Another pre-application meeting was held with the FDOT staff on October 8, 2020. FDOT will review the plans in detail with the submittal of a driveway permit. During the pre-application meeting, FDOT agreed the offset left-turn lanes should be provided for access to/from the site. FDOT noted they reviewed other locations for offset left-turn lanes and generally found the turn lanes to be safer compared to full median openings.

<u>Response Comment:</u> Ongoing, continue to keep City informed on the status of the FDOT Approval of Permit Plans for the NB right turn lane into the site, and the offset median U turn lanes. In the design phase it will be important to evaluate the vertical sight distance of the U turn south of the development driveway due to the existing vertical curve of the roadway on US-19.

Comment 3: On Page 3, reference was made to Highway Capacity Software (HCS). Synchro software was used (per Appendices), not Highway Capacity Software. Revise verbiage in the report.

Response: Synchro software was used to provide results which are based upon the latest Highway Capacity Manual. The report has been updated to reference Synchro software.

Response Comment: Response accepted.

Comment 4: General Comment on Figures. Dodecanese Blvd is a WB extension of Live Oak St., and ties in at Alt US 19 north of the Live Oak St./Alt US 19 intersection. Please show it correctly in all Figures.

Response: Dodecanese Boulevard was analyzed in the analysis. The figures show the intersection of Alt US 19 & Dodecanese Boulevard as it is the signalized intersection (which provides access to Live Oak Street) and the project traffic is anticipated to utilize this intersection. The figures are not drawn to scale and indicate the general location of the intersection.

<u>Response Comment:</u> Noted that the figures are not to scale, but Figures 3, 5, 7 and 10 do not match the other figure geometry for Spruce Street and Dodecanese Blvd. The geometry should be consistent among all Figures.

Comment 5: Comments on Figure 2,

- a. Live Oak St. southbound through shows 63%, whereas Spruce Street southbound traffic shows 65%. Please clarify.
- b. The Traffic Distribution at the Live Oak St/Alt US 19 does not add up at the adjacent intersections of Live Oak St/US 19 and Spruce St/US 19. Also there is 2% distribution in N-S Direction where are they leading to? Please confirm.

Response: The southbound volume was updated to include only 2% of traffic making the southbound right-turn movement at US 19 & Spruce Street.

As the comment requested, the project distribution was updated at Live Oak Street & Alternative US 19 to remove the northbound project traffic.

<u>Response Comment:</u> Responses accepted.

Comment 6: Comments on Figure 3,

- a. Traffic volumes from Beckett Way/US 19 Intersection add up to 12 vehicles for SB direction. Figure 3 shows 13 vehicles. Please confirm.
- b. Traffic volumes from Beckett Way/US 19 Intersection add up to 37 vehicles for NB direction. Figure 3 shows 38 vehicles. Please confirm.
- c. See Traffic Distribution Percentages comments from Figure 2, which would affect Figure 3.

Response: The project traffic volumes have been updated. The volumes were generally rounded based upon the distribution percentage.

Response Comment: Responses accepted, all volumes seem to add up correctly.

Comment 7: Comments on Figure 4,

- a. Traffic volumes from Beckett Way/US 19 Intersection add up to 37 vehicles for SB direction. Figure 4 shows 38 vehicles. Please confirm.
- b. The traffic volumes do not add up the driveway volumes which is 70 vehicles. Please confirm.
- c. Traffic volumes for SB approach at Live Oak St/US 19 Intersection show 45 vehicles for SB direction, whereas upstream it is 46 vehicles per Figure 4. Please confirm.
- d. See previous comment on Traffic Distribution Figure. The traffic assignment on Figure 4, at the Live Oak St/Dodecanese Blvd does not add up at the adjacent intersections of Live Oak St/US 19 and Spruce St/US 19. Also there is traffic volumes along N-S Direction, where are they leading to? Please confirm.

- e. Traffic volumes for SB approach at Live Oak St/US 19 Intersection show 44 vehicles for SB direction, whereas downstream at Spruce St., it is 45 vehicles per Figure 4. Please confirm.
- f. Traffic volumes for SB approach at Spruce St/US 19 Intersection show 41 vehicles for SB direction, whereas downstream at E Tarpon Ave., it is 42 vehicles per Figure 4. Please confirm.

Response: The project traffic volumes have been updated. The volumes were generally rounded based upon the distribution percentage.

Response Comment: Responses accepted, all volumes seem to add up correctly.

Comment 8: Typical Comment - Determine if comments on Figures 2 through 4, would affect the traffic volumes shown in Figures 5 through 8, and Figures 10, 11.

Response: The project and total traffic volumes were updated based upon the comments.

Response Comment: Response accepted.

Comment 9: Typical Comment - Add link volumes on Figures 5 through 8 between all Study Intersections.

Response: The volumes are summarized in the table in the report for the roadway analysis section.

Roadway volumes exiting one study area intersection may not be equivalent to the entering intersection turning movement volumes at the next intersection due to driveway locations between study intersections or minor fluctuations in travel patterns between time periods. To evaluate the study roadway segment based upon typical roadway conditions, volumes for the study roadway segment were determined as the average of entering and exiting vehicles from adjacent street intersections during the a.m. and p.m. peak hours.

Response Comment: Response accepted.

Comment 10: Comments on Figure 10, 11-

- a. For SB traffic at US 19/Live Oak St., traffic volumes adds up to 3720 at the intersection, whereas upstream volumes shows a lower number 3693. Please confirm why the discrepancy?
- b. For NB traffic between US 19/Live Oak St., traffic volumes adds up to 1481 at the intersection, whereas downstream volumes shows a lower number 1417. Please confirm why the discrepancy?

Response: Traffic volumes fluctuate due to the driveway openings between the study area intersections. The median opening was estimated based upon the volumes collected at the intersection of US 19 & Live Oak Street.

Roadway volumes exiting one study area intersection may not be equivalent to the entering intersection turning movement volumes at the next intersection due to driveway locations between study intersections or minor fluctuations in travel patterns between time periods.

Response Comment: Responses accepted.

Comment 11: Page 22, Study Roadway Segments are anticipated to operate at LOS E. Would FDOT be okay with allowing the Applicant not to pay any impact fees for traffic added by the subject project and other future projects contributing to worsen the LOS to E? LOS D is the acceptable criteria. Please indicate in the narrative that FDOT would accept it for reasons described by Kimley Horn in last discussion with reviewer.

Response: The analysis will be reviewed by FDOT as part of the Driveway Permit Application process. FDOT is focused on operational and safety improvements. The applicant will coordinate with the FDOT as previously discussed with the City and the reviewer.

As stated in the City of Tarpon Springs Mobility Management section § 122.11.01, "In 2013, the Pinellas County Metropolitan Planning Organization approved the Pinellas County Mobility Plan Report. The intent of the Mobility Plan is to replace local transportation concurrency management programs with a system that provides local governments with the means to manage the traffic impacts of development projects without requiring developers to meet adopted level of service standards."

The updated analysis will be provided to FDOT for their review to receive approval for the FDOT Driveway Permit. The applicant does not propose to widen US 19 and it is our understanding that there are not any planned roadway widenings for the adjacent section of US 19. Instead, as stated in the City of Tarpon Springs Mobility Management section § 122.11.03, "Transportation management plans are required for development applications seeking to utilize transportation management strategies/improvements to address their development impacts."

<u>Response Comment:</u> There is still no discussion in the text that explains or describes the roadway segments that are forecasted to operate at LOS E or F. Some segments in Table 2 and Table 3 have Year 2022 Total Peak Hour Traffic Volumes that will exceed adopted LOS D Service Volumes and these should be noted in the study.

Comment 12: Tables 2 and 3, comments-

- a. Based on comments made on Figure 2 (Project Traffic Distribution Percentages). Confirm if Project Traffic Assignment, Peak Hour values, Project % Service Volumes, etc. in Table 3 will change and update the table.
- b. Last Column under Table, should be LOS D Capacity. It was shown correctly before in the last submittal. Please change it back to LOS D. Update the last column to say YES where applicable, on any roadway segments that exceeds LOS D Service Volumes, which is the acceptable LOS. LOS E and F are unacceptable.

Response: Acknowledged. There is no defined unacceptable LOS for the roadway segment based upon the City of Tarpon Springs code. The analysis will be discussed with FDOT as US 19 is under FDOT jurisdiction.

<u>Response Comment:</u> See 2nd Comment to response provided in comment 11. Roadway segment analysis should note which segments are forecasted to exceed LOS D threshold volumes provided in the table.

Comment 13: Page 25 comment, Tables 4 and 5 too -

- a. Previous comment not implemented. In addition to V/C ratios, add LOS for each of movements and overall intersection LOS and corresponding delay in vehicles/second. Mention if LOS D thresholds can be met with any countermeasures to improve the operation of the movements/overall intersection. When would the improvements be needed and who will address operational improvements? Revise narrative under Intersection Analysis, and corresponding Table 4.
- b. General Comment for Tables 4 and 5 Confirm if any of the previous comments made on the Figures would change any of the V/C ratios listed. Also include LOS.
- c. Previous comment not implemented. It was discussed during comment resolution meeting that the general public and council members do not understand what V/C ratio is. Previous comment "Include a LOS chart with LOS A thru F with corresponding delays so City staff and laymen can understand the operations. Also include the thresholds for V/C (volume/capacity) ratio (such as what is acceptable and what is failure), so it is easily understandable to City council and anyone reviewing this report."

Response: Additional language has been added to explain v/c ratio and acceptable thresholds. This comment was discussed with the City and reviewer previously. LOS was not included in the analysis as it is not a standard required to be upheld due to the Pinellas MPO Mobility Plan Report.

As stated in the City of Tarpon Springs Mobility Management section § 122.11.01, "In 2013, the Pinellas County Metropolitan Planning Organization approved the Pinellas County Mobility Plan Report. The intent of the Mobility Plan is to replace local transportation concurrency management programs with a system that provides local governments with the means to manage the traffic impacts of development projects without requiring developers to meet adopted level of service standards."

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<u>Response Comment</u>: Volume over capacity results give a small insight to how traffic operations will be impacted due to the development. The current tables provided do not clearly convey the impact to study intersections due to the future development traffic. Overall intersection delay (in seconds per vehicle) increases due to 2022 total traffic volumes when compared to 2022 background traffic volumes should be provided. Reviewer had to search appendices for this information which was time consuming.

Comment 14: Table 6 Comments -

a. Revise NBL to NB U Turn, and SBL to SB U Turn.

Response: Acknowledged. This has been updated in the report.

Response Comment: Response accepted.

Comment 15: Page 31 Comment-

a. The Parking Waiver requested by Applicant for Parking is 46 spaces. Work with City of Tarpon Springs on this waiver. This may encourage parking outside community when events occur in the clubhouse or any guests are having parties. Clarify where would overflow parking be accommodated?

Response: The applicant is working with the City on the waiver. There is sufficient parking provided on site to accommodate the residents and guests; the waiver is requested for the club house space as residents can park on site and then use the pedestrian paths to access the club house.

Response Comment: Response accepted.

Comment 16: Page 32, Multimodal Comment-

a. Since, this is a requirement for Applicant to make Multi-modal improvements. Can it be made contingent upon Applicant to provide Design Construction Plans to City/FDOT and applicant pay for Construction of the same concurrently with the proposed development. A more detailed review will be done by City's Consultant of the Design Plans.

Response: The applicant has detailed the multimodal improvements they are proposing in the report. The multi-modal improvements have been approved in concept by the City. Additional details will be provided with the final design plan (SDP).

Response Comment: Response accepted.

Comment 17: Page 35, Conclusion –

a. As part of the Conclusion, summarize all Recommendations of what the Applicant will provide?

Response: Acknowledged. This has been updated in the report.

Response Comment: Response accepted.

New Comment 18: Introduction - According to the City of Tarpon Springs Mobility Management section § 122.11.04 (C) this project is a tier 1 project generating between 51 and 300 new peak hour trips not a tier 2 project.

New Comment 19: Table 2 in the last column the header reads "Year 2022 Total PM Peak-Hour Traffic Volume" when it should read "Year 2022 Total AM Peak-Hour Traffic Volume".

For any questions or concerns, please call Patricia at the City to coordinate a meeting if required with Consultant reviewer.