



Transportation
Land Development
Energy

September 22, 2016

Mr. Brent Cross
Superintendent of Public Works
Village of Cayuga Heights
836 Hanshaw Road
Ithaca, NY 14850

Development Review – Corners Community Center
Medical Office Building

Dear Mr. Cross:

We have completed our review of the proposed Corners Community Center Medical Office Building project that is being considered for the area south of Hanshaw Road between Upland Road and Pleasant Grove Road. The development will consist of a 28,200 square foot (SF), two-story office building that will replace a 3,600 SF office building and a 1,700 SF bank. Access will be provided through three existing driveways on Upland Road and single driveways on Hanshaw Road and Pleasant Grove Road. In addition, the internal vehicular connection between the existing plaza and the Carriage House Apartments will be closed, however, a pedestrian connection will remain.

We have the following comments on the Traffic Impact Study (TIS) that was completed by SRF Associates, dated May 2016, with revisions in August and September 2016.

Traffic Volumes

The traffic volumes presented in the TIS accurately represent the existing conditions of roadway network. It was noted that in general the peak hours of traffic flow were from 7:45-8:45 AM and 4:30-5:30 PM, but this was not the case for every single study area intersection, which is typical. Many of the study area intersections have the peak hour this was identified, but there are a few intersections where the peak hours are different. Review of Figure 3 revealed that the volumes shown on this map are for the peak hour of each intersection and not necessarily for the peak hour times of 7:45-8:45 and 4:30-5:30, thereby presenting a worst case analysis as each intersection was analyzed for its peak hour.

We also reviewed the growth projections and it is our opinion that a more conservative growth rate should have been used. Review of NYSDOT provided data for North Triphammer Road and Pleasant Grove Road collected in 2011 and 2014 show growth rates of 2.3% per year for North Triphammer Road and 1.8% per year for Pleasant Grove Road. Given the discrepancy of these growth rates with one identified in the TIS (0.25% per year), a more conservative estimate of 1.0% per year would appear to be more appropriate.

Site Trip Generation and Distribution

We concur with the site trip generation and distribution of site traffic that is presented in the TIS. However, Figure 7R only shows 54 entering and 15 exiting vehicles during the AM peak hour and 66 exiting vehicles during the PM peak hour which is different than what is shown in Table 1 of the TIS. In addition we are unclear how the volumes of



entering and exiting traffic for existing and proposed volumes were calculated in paragraph 1 of page 4. We reviewed Figures 3 and 8R and arrived at different entering and exiting volumes. Finally, we are unclear how that traffic was re-distributed for the Carriage House Apartments due to the closure of the internal connection between the Plaza and the apartments. We tried following the tables provided in the appendix, however the redistribution of the apartment traffic appears to be in error. For example, during the AM peak hour, there is an additional 9 vehicles turning left out of the Carriage house entrance, however at the next intersection (Pleasant Grove Entrance) there are 9 less vehicles going through. A more clear explanation of this is necessary.

Capacity Analyses

We are unable to complete a full review of the capacity analyses as there are numerous worksheets for intersections that are missing. Hanshaw Road/N. Triphammer Road, East Upland Road/Triphammer Road/Hanshaw Road, Pleasant Grove Road/Hanshaw Road, and Pleasant Grove Road/Pleasant Grove Entrance all have their results reported, but there are no capacity analysis worksheets for these intersections to review, like the other study area intersections. In addition, the questions that we have regarding the traffic volumes could also impact the results of these analyses. In general, from what has been presented in the TIS, we offer the following comments:

- There are a number of study area intersection movements that either currently work very poorly or are projected to work even more poorly (LOS F). Additional traffic due to the proposed development will further exacerbate already poor operating conditions.
- The impact of having poor levels of service for any movement could create a safety issue as drivers that are forced to wait long periods of time, they become impatient and may accept smaller gaps in traffic than they normally would thereby increasing the chances for right angle accidents.
- Queuing information needs to be provided for all movements. We have a concern of how the proximity of the intersections of Pleasant Grove Road with Hanshaw Road and the Pleasant Grove Entrance are going to work given the poor levels of service. It is likely Pleasant Grove Road queues at the Hanshaw Road intersection are going to block the driveway thereby prohibiting traffic from exiting. It would be preferable to close this driveway completely and create a road between the proposed medical office building and the fire station that would connect with the Carriage House driveway.

Shared Parking Analysis

We have reviewed the shared parking analysis and we agree with the methodology that was used. In the total number of parking spaces that are provided for the existing (285 spaces) and proposed (298) conditions, does this include the Chemung Canal Bank, because it was noted that this land use was not included in the analysis. Also, in order to validate the shared parking model, the developer should have performed parking counts over the course of a couple of representative days to estimate existing parking usage and compare that information to what the model predicted for the existing conditions to estimate the confidence level of the model. The shared use parking model is based on national parking data and where local information is available, it should be utilized. In addition, this shared



parking analysis does not take into consideration other people that may be parking within the plaza that do not have any business there.

Site Plan Review

We have some concerns regarding the proposed site plan. It is good transportation planning practice to have cross vehicular access between adjacent parcels. This allows trips to occur without having to go out onto the main roadways. If it is possible, the applicant should keep the cross vehicular connection between the Carriage House Apartments and the proposed site. We also recommend removing the first six parking spaces on the south side of the parking lot adjacent to the East Upland Road South Driveway. The reason for this is that vehicles backing out of the parking spaces may come into conflict with drivers entering the driveway as entering drivers may not expect a vehicle backing into the driveway. In addition, a driver backing out of one of these parking spots may be more concerned with avoiding drivers entering the driveway and not see vehicles potentially exiting the parking lot directly behind them.

Finally, as discussed previously, consideration should be given to closing the Pleasant Grove Driveway closest to Hanshaw Road and have a new roadway run behind the proposed medical office building (similar to how it is today) and connect up to the parking lot. If this were completed and the cross connection re-established, then this would allow vehicles to enter and exit the plaza further away from Hanshaw Road.

If you have any questions or require clarification of these comments, please contact me.

Sincerely,
FISHER ASSOCIATES, P.E., L.S., L.A., D.P.C.

Timothy R. Faulkner, PE
Senior Transportation Manager