Traffic Impact Analysis

Prepared For

789 Hamilton Street
Tax Lots 6-15, Block 225
Township of Franklin
Somerset County, New Jersey

Prepared by:

A WZ ENGINEERING, INC.

Engineers . Scientists . Consultants 150 River Road, Suite B3, Montville, NJ 07045 Phone: 973.588.7080 Fax: 973.588.7079 www.awzengineering.com

August 10, 2020

Adnan A. Khan, P.E., C.M.E. New Jersey Professional Engineer License Number GE39812 AWZ Project No. 20-0203

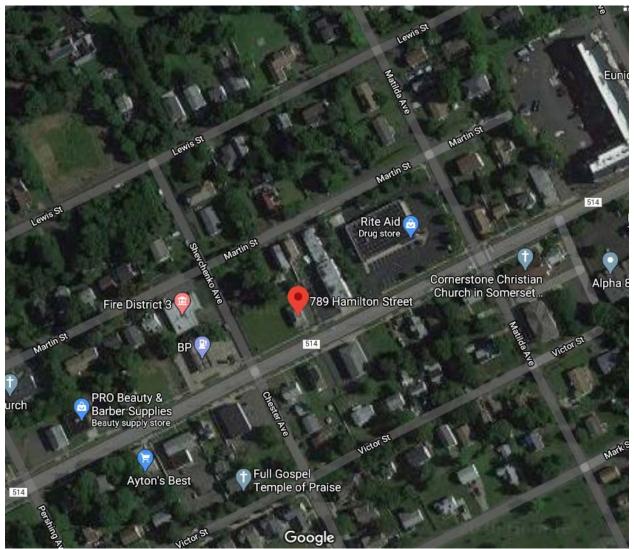
Table of Contents

1.0 Introduction	2
2.0 Existing Conditions	3
3.0 Proposed Conditions	3
4.0 Traffic Impact Analysis	3
4.1 Existing Site Traffic Volumes	
4.2 Proposed Site Traffic Volumes	4
5.0 Conclusion	5

1.0 INTRODUCTION

This limited traffic impact report has been prepared for the proposed construction of a 3-story mixed use building. The property is located at 789 Hamilton Street, in the HBD (Hamilton Street Business) District, located in the Township of Franklin, Somerset County, New Jersey. The subject site occupies Block 225, Lots 6 through 15 and measures approximately 0.57-acres in area.

The adjacent land uses and the properties across the street is a mixture of commercial and residential lots.



(Aerial View of the Property, Google Image)

The purpose of this study is to access the condition and anticipate the future traffic volume along the roadways in the site vicinity that would occur as a result of the proposed project. Additionally, this analysis examines the suitability of the site for the proposed land use based on a traffic engineering and safety evaluation. Therefore, the following information is included:

- A review of the existing roadways and traffic conditions in the vicinity of the site;
- An examination of the trips generated under existing conditions;
- Projection of future traffic volume;
- Findings and conclusions.

2.0 EXISTING CONDITIONS

The existing site comprises two residential 1-1/2-story frame dwellings, a frame garage, a shed, paved driveways, and concrete walks. The site is a corner lot with access/exit through Martin Street, Shevchenko Avenue, and Hamilton Street. Presently, there are two asphalt driveways, one of them faces Hamilton Street and the other one Shevchenko Avenue. Approximately 6 parking spaces are available on site.

3.0 PROPOSED CONDITIONS

The proposed project involves the construction of a 3-story commercial/residential building with a paved parking area. The ground floor consists of four retail stores, with a total floor area of 2,728 sf. The two upper levels comprises 25 residential units (9 one-bedroom, 16 two-bedroom). The current driveways will be eliminated and a new 24 feet wide paved entrance/exit driveway is to be constructed along Shevchenko Avenue. A total of 48 parking spaces, including 2 handicapped spaces, are proposed. The northern driving aisles allow only one-way traffic flow, while the eastern driving aisle allows two-way vehicular movement. A four feet wide concrete walkway is provided in front of the proposed structure for pedestrian circulation.

4.0 TRAFFIC IMPACT ANALYSIS

Following is the descriptions of the roadways in the area of interest:

<u>Hamilton Street (along the southerly side)</u>, also known as County Road 514, is a two way road that consists of one lane in each direction. The posted speed limit is 25 MPH within the vicinity of the site. According to the New Jersey Department of Transportation (NJDOT) classification, this is classified as Urban Minor Arterial road. On-street parking is allowed. Land use along Hamilton Street is a mixture of commercial and residential.

<u>Shevchenko Avenue (along the westerly side)</u> is a two way road that consists of one lane in each direction. The posted speed limit is 25 MPH within the vicinity of the site. According to the New Jersey Department of Transportation (NJDOT) classification, this is classified as a local road. On-street parking is allowed. Land use along Shevchenko Avenue is mainly residential.

<u>Martin Street (along the northerly side)</u> is a two way road that consists of one lane in each direction. The posted speed limit is 25 MPH within the vicinity of the site. According to the New Jersey Department of Transportation (NJDOT) classification, this is classified as a local road. On-street parking is allowed. Land use along Martin Street is mainly residential.

4.1 Existing Site Traffic Volumes

Due to on-going COVID-19 related travel and business restriction currently in effect, no traffic count was performed as part of this study. However, to approximate the current traffic conditions associated with the property, the trip generation rates provided by the *NJDOT Trip Generation Rates* for Land Use Code (LUC) 210 - Single Family Detached Dwelling is used. The table shown below provides the trip generation of the existing development and use of the site.

Table I Existing Trip Generation

Land Use	AM Peak Hour			PM Peak Hour			
	In	Out	Total	In	Out	Total	
Existing Dwellings	1	2	3	2	1	3	
Total of Existing Trips	1	2	3	2	1	3	

4.2 Proposed Site Traffic Volumes

To project the future traffic conditions associated with the proposed mixed commercial/residential use, the trip generation rates based on the *NJDOT Trip Generation Rates* for LUC 220 – Multifamily Housing (Low-Rise) and LUC 814 – Variety Store are used. Table II, shown below, provides the trip generation of the proposed development and use of the site.

Table II Proposed Trip Generation

Land Use	AM	Peak	Hour	PM Peak Hour		
	In	Out	Total	In	Out	Total
Proposed Multifamily Units	4	12	16	11	7	18
Proposed Variety Store	7	5	12	11	10	21
Total	11	17	28	22	17	39
Increase Differential	10	15	25	20	16	36

Even though based on the NJDOT *Trip Generation Rates* there will be an increase in vehicular movement, in and out of the site, due to the proposed uses, is our professional opinion that the project will not negatively affects the overall traffic flow within the site vicinity. As shown on the analysis above, the proposed peak rates do not constitute a major addition, thus no adverse effect is anticipated.

5.0 CONCLUSIONS

Based on the description above, it is our conclusion that the project will not affect the traffic movements and level of service of the adjacent roadways or the neighboring uses. Furthermore, access to the site will continue to be provided via the proposed 24 feet wide two-way driveway (along Shevchenko Avenue) and the internal circulation has been designed to provide a safe traffic movement. Therefore, in our professional opinion, the proposed development will not have any negative traffic impact to the area.