# TRAFFIC ENGINEERING EVALUATION

# PROPOSED RESIDENTIAL DEVELOPMENT 414 NEW YORK AVENUE BLOCK 1704, LOT 34 CITY OF JERSEY CITY HUDSON COUNTY, NEW JERSEY

# Prepared for:

GN Management Inc. 101 Hudson Street, Suite 21101 Jersey City, NJ 07302

# Prepared by:

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#### INTRODUCTION

The purpose of this Traffic Engineering Evaluation is to assess the traffic impacts associated with the redevelopment of the subject property known as Lots 34 in Block 1704 located at 414 New York Avenue in the City of Jersey City, Hudson County. The site has approximately 32 feet of frontage along the east side of New York Avenue. The site is in the R-1 One & Two Family Housing district and is currently occupied by a single-family residence. The proposal is to demolish the existing single-family home and construct a new building to include a total of 4 dwelling units of multifamily housing (mid-rise) in four stories, with 2 proposed on-site parking spaces.

### **EXISTING CONDITIONS**

The site is located on east side of New York Avenue. The site is currently occupied by a single-family residence. The surrounding properties generally consist of a mix of residential uses. The streets that serve the subject site are described as follows:

**New York Avenue** is a local street under the jurisdiction of the City of Jersey City, oriented in a southbound direction, from Paterson Plank Road to Ravine Avenue. There are sidewalks on both sides of the street. Parking is permitted on both sides of the street. There is a parking restriction for street cleaning posted "No Parking, 8 AM – 10 AM, Tuesday & Friday" on the west side and "Monday & Thursday" on the east side. Zone 16 Permit Parking is required on both sides of the street for parking over 4 hours. There is capacity for a total of approximately 34 on-street parking spaces on this block of New York Avenue. The statutory speed limit is 25 MPH.

North Street is categorized as a local street under the jurisdiction of the City of Jersey City. North Street is one-way, eastbound from Central Avenue to Palisade Avenue. Near the proposed site, North Street provides one travel lane with a bicycle lane on the north side of the street. There are sidewalks on both sides of the street. Parking is permitted on both sides of the street. There is a parking restriction for street cleaning posted "No Parking, 10 AM – Noon, Tuesday & Friday" on the south side and "Monday & Thursday" on the north side. Zone 16 Permit Parking is required on both sides of the street for parking over 4 hours. There is capacity for approximately 26 on-street parking spaces on the 2 blocks of North Avenue between Palisade Avenue and Webster Avenue. The statutory speed limit is 25 miles per hour (MPH).

**Congress Street** is a local street under the jurisdiction of the City of Jersey City, oriented in an east-west direction, between Central Avenue and Paterson Plank Road. There are sidewalks on both sides of the street. Parking is permitted on both sides of the street. There is a parking restriction for street cleaning posted "No Parking, 10 AM – Noon, Tuesday & Friday" on the north side and "Monday & Thursday" on the north side. Zone Permit Parking is required on both sides of the street for parking over 4 hours. There is capacity for approximately 24 onstreet parked cars between Webster Avenue and Palisade Avenue. The statutory speed limit is 25 MPH.

### Bicycle Master Plan 2019

Near the subject site, as of 9/30/2019, the <u>Let's Ride JC Bicycle Master Plan</u> shows bicycle lanes or shared bike paths on the streets of New York Avenue, Palisade Avenue, North Street, and Congress Street, which surround the subject site. There is a Citi Bike coral on Congress Street at Ogden Avenue.

#### Pedestrian Enhancement Plan 2018

Along Central Avenue, 5 blocks to the west of the subject site, there are intersections identified to be improved for walkability with signalization, crosswalk improvements, intersection treatments, curb extensions, bicycle facilities, transit connections, and streetscape treatments. However, there were no mention of such improvements along New York Avenue near the subject site.

### School Travel Plan 2019

Near the subject site, as of July 2019, the Jersey City School Travel Plan does not mention the intersections of New York Avenue with Congress Street or with North Street.

## Crashes (2012 to 2016)

Between the years 2012 and 2016, the <u>School Travel Plan</u> identifies 6 or less crashes involving pedestrians or involving bicycles at the intersections of New York Avenue with Congress Street, Palisade Avenue with Congress Street.

#### Vision Zero Action Plan

The <u>Vision Zero Action Plan</u>. February 2019 shows Congress Street, Central Avenue, and Paterson Plank Road as being in the High Injury Network.

### **Mass Transportation Options**

The Ninth Street/Congress Street Light Rail Station is a 4-minute/0.2-mile walk from the subject site. The number 84, 86, 87, 119, and 123 bus lines, with service between the subject site and Journal Square, Hoboken PATH, New York City, Christ Hospital, Newport Mall, Union City, stop on Palisade Avenue at North Street and at Congress Street. With the variety and frequency of mass transportation service during the peak commuting hours, as well as the variety of local commercial, retail, and entertainment options, this location provides adequate transportation infrastructure to not own a personal vehicle.

## **DEVELOPMENT PROPOSAL**

The proposed development consists of the construction of 4 units of multifamily housing (midrise) with 2 on-site parking spaces.

### TRIP GENERATION

According to the <u>Trip Generation Manual</u>, <u>11<sup>th</sup> Edition</u> published by the Institute of Transportation Engineers, "Multifamily Housing (Mid-Rise)" are located in rental buildings that have between three and ten levels (floors). Therefore, trip generation for the proposed 4 units of multifamily housing (mid-rise) was calculated using the current Institute of Transportation Engineers (ITE) <u>Trip Generation Manual</u>, <u>11<sup>th</sup> Edition</u> for the land use "Multifamily Housing (Mid-Rise)" in a dense multi-use urban setting/location within one-half mile of rail transit was used to account for the proximity of the Light Rail station. Table 1, Trip Generation Summary, tabulates the trip generation for the proposed 4 units of multifamily housing (mid-rise).

The route that pedestrians could take between the subject site and the Ninth Street/Congress Street Light Rail Station would be via New York Avenue to Congress Street, then cross Paterson Plank Road at the traffic signal. The proposed redevelopment is expected to generate 2 to 3 additional pedestrian trips over the existing single-family home. The proposed development is expected to generate 1 vehicular trip during the AM peak hour and 1 vehicular trip during the PM peak hour, like the existing single-family home. Therefore, in my professional opinion, the number of new pedestrian trips along the existing sidewalks and crossing the existing intersections would not have a significant impact.

According to <u>Transportation Impact Analysis for Site Development</u>, published by the Institute of Transportation Engineers (ITE), an increase of less than 100 vehicle trips would not change the level of service of the local street network nor appreciably increase the volume-to-capacity ratio of an intersection approach. Also, NJDOT Access Management Code considers a significant increase in trips greater than 100 peak hour trips AND greater than a 10 percent increase in previously anticipated daily trips. Therefore, the proposed development is not anticipated to significantly impact the operations of the local streets.

### SITE PLAN REVIEW

The parking requirement is zero parking spaces per unit, where the site is proposed with 2 parking spaces. No parking is required for lots 50 feet or less in width. Since 2 on-site parking spaces are proposed it is very likely that half of the potential residents of this proposed multifamily housing (mid-rise) building would own a vehicle. There is access to robust mass transportation services, shared-bicycles and bicycle lanes, as well as local shopping, dining, and entertainment options; therefore, those residents would not need to own a vehicle.

Rideshare vehicles, such as Uber or Lyft, would park in an available, on-street, parking space to pick-up or drop-off a passenger associated with the proposed multifamily housing at 414 New York Avenue.

#### **CONCLUSIONS**

Based upon our trip generation evaluation, it is our professional opinion that the proposed mixed-use, 4-unit, Multifamily Housing (Mid-Rise) with 2 on-site parking spaces would generate an insignificant number of vehicle trips and would not have a significant impact on traffic conditions during the weekday AM and PM peak commuter traffic hours.

The route that pedestrians could take between the subject site and the Ninth Street/Congress Street Light Rail Station would be New York Avenue to Congress Street, and cross at the traffic signal at Paterson Plank Road. The proposed development is expected to generate 2 to 3 pedestrian trips during the weekday AM or PM peak hours. The project is expected to generate 1 vehicular trip during each of the weekday AM and PM peak hours. Therefore, in my professional opinion, the increase in pedestrian trips along the existing sidewalks and crossing the existing intersections would not have a significant impact.

In conclusion, the development of this project would have no significant impact on the traffic operations of area roadways and intersections and would not have a significant impact on local parking conditions.

The foregoing is a true representation of my findings.

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Table 1 - Trip Generation Summary 414 New York Avenue, Jersey City, Hudson County, NJ

WEEKDAY

|  |         | A | <b>AM PEAK HOUR</b> | )UR   | P | <b>PM PEAK HOUR</b> | IOUR  |            |
|--|---------|---|---------------------|-------|---|---------------------|-------|------------|
| CODE LAND USE  | AMOUNT  | Z | OUT                 | TOTAL | Z | OUT                 | TOTAL | <b>1</b> L |
| EXISTING VEHICLE TRIPS                                   |         |   |                     |       |   |                     |       |            |
| 215 Single-Family Attached (Avg Rate)                    | 1 units | 0 | 1                   | 1     | 1 | 0                   | 1     |            |
| EXISTING PEDESTRIAN TRIPS                                |         |   |                     |       |   |                     |       |            |
| 215 Single-Family Attached (Avg Rate)                    | 1 units | 0 | 1                   | 1     | 1 | 0                   | 1     |            |
|  |         |   |                     |       |   |                     |       |            |
| PROPOSED VEHICLE TRIPS                                   |         |   |                     |       |   |                     |       |            |
| 221 Multifamily Housing (Mid-Rise)(Average)(Dense Urban) | 4 units | 0 | 1                   | 1     | 1 | 0                   | 1     |            |
| PROPOSED PEDESTRIAN TRIPS                                |         |   |                     |       |   |                     |       |            |
| 221 Multifamily Housing (Mid-Rise)(Average)(Dense Urban) | 4 units | 0 | 2                   | 2     | 1 | 1                   | 2     |            |
|  |         |   |                     |       |   |                     |       |            |

Source: Trip Generation, 11th Edition, published by the Institute of Transportation Engineers (ITE)

