

**TIM
MILLER
ASSOCIATES, INC.**

10 North Street, Cold Spring, New York 10516

Phone (845) 265-4400

Fax (845) 265-4418

October 26, 2022

Steve Dimovski
Dimovski Architecture
59 Kensico Road
Thornwood NY 10594
Via <steve@dimovskiarchitecture.com>

Re: Garden Lane Apartments - Transportation Study
Cortlandt Manor, Westchester County, NY

Dear: Mr. Dimovski:

This letter indicates low (10 trips or less in the peak hour) trip generation and 44 parking spaces as more than adequate parking for the proposed 20 apartment units off of Garden Lane in Yorktown, New York, as shown in Drawing SP-1 (Dimovski Architecture 9-6-2022).

Project Trip Generation

The proposed 20 residential units are contained on two floors establishing this as a low rise building based on the Institute of Transportation Engineers (ITE) classification (ITE Trip Generation Manual, 11th edition, 2021). The trip generation data is based on national pre-COVID studies. This location is more than one-half mile from an active railroad station and thereby is not considered as near a railroad station.

Table 1 shows the trip generation rates during the peak hours. Table 2 shows the trip generation during the peak hours for the 20 apartment units.

Garden Lane Apartments Trip Generation Rates				
Table 1				
Land Use {ITE Code}	Trip Rates *			
	Weekday			
	A.M. Peak Hour		P.M. Peak Hour	
	In Trips/Unit	Out Trips/Unit	In Trips/Unit	Out Trips/Unit
20 Multifamily Low Rise dwelling units (220) Not close to railroad station	0.096	0.304	0.321	0.189
* Hourly Trip Generation Rates from Institute of Transportation Engineers, <u>Trip Generation Manual</u> Volume 3, 11th edition, 2021.				

Garden Lane Apartments Trip Generation Table 2						
Land Uses {ITE Code}	Trips Generated					
	A.M. Peak Hour			P.M. Peak Hour		
	IN (Trips)	OUT (Trips)	Total Trips	IN (Trips)	OUT (Trips)	Total Trips
20 Multifamily Low Rise dwelling units (220) Not close to railroad station	2	6	8	6	4	10
See Table 2 for rates.						

The US Census Bureau keeps data on commuting to work. In Yorktown, 28.7 percent of the people leave for work in the peak hour 7 a.m. to 8 a.m. The time leaving for work is actually spread over a three hour period 6 a.m. to 9 a.m. accounting for 63.5 percent of work trips. (US Census Bureau 2019 5-year American Community Survey, S0802 “Means of Transportation to Work by Selected Characteristics”).

This level of trip generation falls within the range of New State Department of Environmental Conservation (NYSDEC) SEQR and ITE recommendations to not complete a capacity analysis for developments generating less than 100 vehicle trips in a peak hour, unless there is an existing congestion issue. In this case, the proposed development is projected to generate no more than ten percent of the 100 vehicle trips threshold for generally requiring a traffic study.

Parking Space Provision Suitability

ITE Parking Generation Manual, 5th edition, 2019 examines parking studies nationally to provide data for estimating parking demand for a proposed development. In this analysis we compare the Town of Yorktown zoning code requirements with ITE rates. The ITE rates are based on occupied dwelling units and bedroom counts. In addition, Census Bureau data on local vehicle ownership was reviewed to provide another source of data for potential parking demand for the Garden Lane Apartments project.

The Yorktown zoning code calls for 1.5 spaces per unit or 30 parking spaces. The proposed site plan provides 44 parking spaces including two accessible parking spaces. According to Drawing SP-1 (Dimovski Architecture 9-6-2022) 30 regular spaces and 14 visitor spaces are provided. Weekday parking generally peaks between 4 a.m. and 5 a.m. and 5 a.m. to 6 a.m. on Saturday according to studies in the Parking Generation Manual. These would typically be the peak parking times when residents would be at home and visitors would be at their own homes.

ITE treats both condominium developments and apartment buildings as multifamily dwelling units. There are however differences in management between the two. Apartment building management has greater control over resident parking by using rental agreements. Residents who abuse development parking rules can be more easily removed by management, and settle parking conflicts. It is much harder for Condominium Associations to manage parking conflicts with regard to vehicle ownership and visitors.

Using the Parking Generation Manual, the number of spaces were computed for weekday and Saturday using equation rates, average rates, and 85th percentile rates based on both the number of dwelling units and the number of bedrooms. In each analysis category, the number of parking spaces needed was below the 44 spaces provided. The ITE data had only one category where it was above the 30 parking spaces required by the zoning code (see Table 3). These values indicate that the parking requirements of the zoning code of 1.5 spaces per dwelling unit is sufficiently high to meet expected parking demand.

Garden Lane Apartments Parking Spaces Needs				
Table 3				
Land Use {ITE Code}	Parking Rates* and Spaces***			
	Weekday		Saturday	
20 Multifamily Low Rise dwelling units (220) Not close to railroad station	Spaces/ Unit	Spaces	Spaces/ Unit	Spaces
Equation rates				
20 Occupied units	**	**	1.222	25
28 Bedroom	0.700	20	1.010.	29
Average Rates				
20 Occupied units	1.220	25	1.280	26
28 Bedroom	0.660	19	0.800	23
85th Percentile rates				
20 Occupied units	1.410	29	1.590	32
28 Bedroom	0.860	25	0.880	25
* Hourly Parking Generation Rates from Institute of Transportation Engineers, <u>Parking Generation Manual</u> , 5th edition, 2019.				
** Falls below expected values.				
*** Spaces rounded up to whole number.				

US Census data presented in Table 4 indicates actual vehicle ownership for renters in Yorktown at 1.2 vehicle per unit.

Tenure By Vehicle Available For Renter Occupied Dwellings	
Table 4	
Vehicles Available	Number Dwelling Units
0	331
1	1025
2	600
3	87
4 or more	0
Total	2043
Average Vehicle Ownership	1.2
US Census Bureau 5 –Year American Community Survey 2019, B25044, 'Tenure By Vehicle Available', Yorktown, NY.	

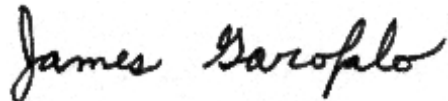
The US Census Bureau ownership data of 1.2 average vehicles per rental unit (Table 4) for 20 units, equates to 24 vehicles for the Garden Lane development. This estimate is consistent with the parking spaces peaks in Table 3.

The US Census data indicate that 28.7 percent of the development workers leave for work in the morning peak hour. This estimate would be 7 trips, indicating that the ITE estimate for 6 trips leaving in the peak hour in Table 2 is reasonable accurate.

Excluding the 331 units in the survey with no vehicles available, the estimated average vehicle ownership from Census would be at 1.45 vehicles per unit or 29 spaces, still consistent with Table 3 and still below the 1.5 spaces per dwelling unit (30 spaces) required by zoning. The estimated 8 vehicles exiting the site in the peak hours (Table 2) is well below the 100-vehicle threshold for a capacity analysis.

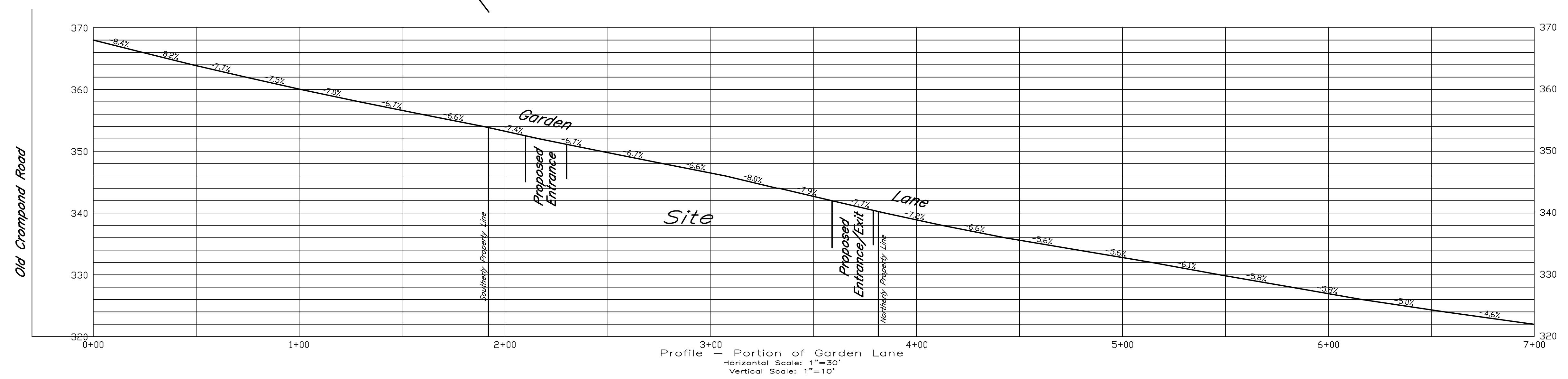
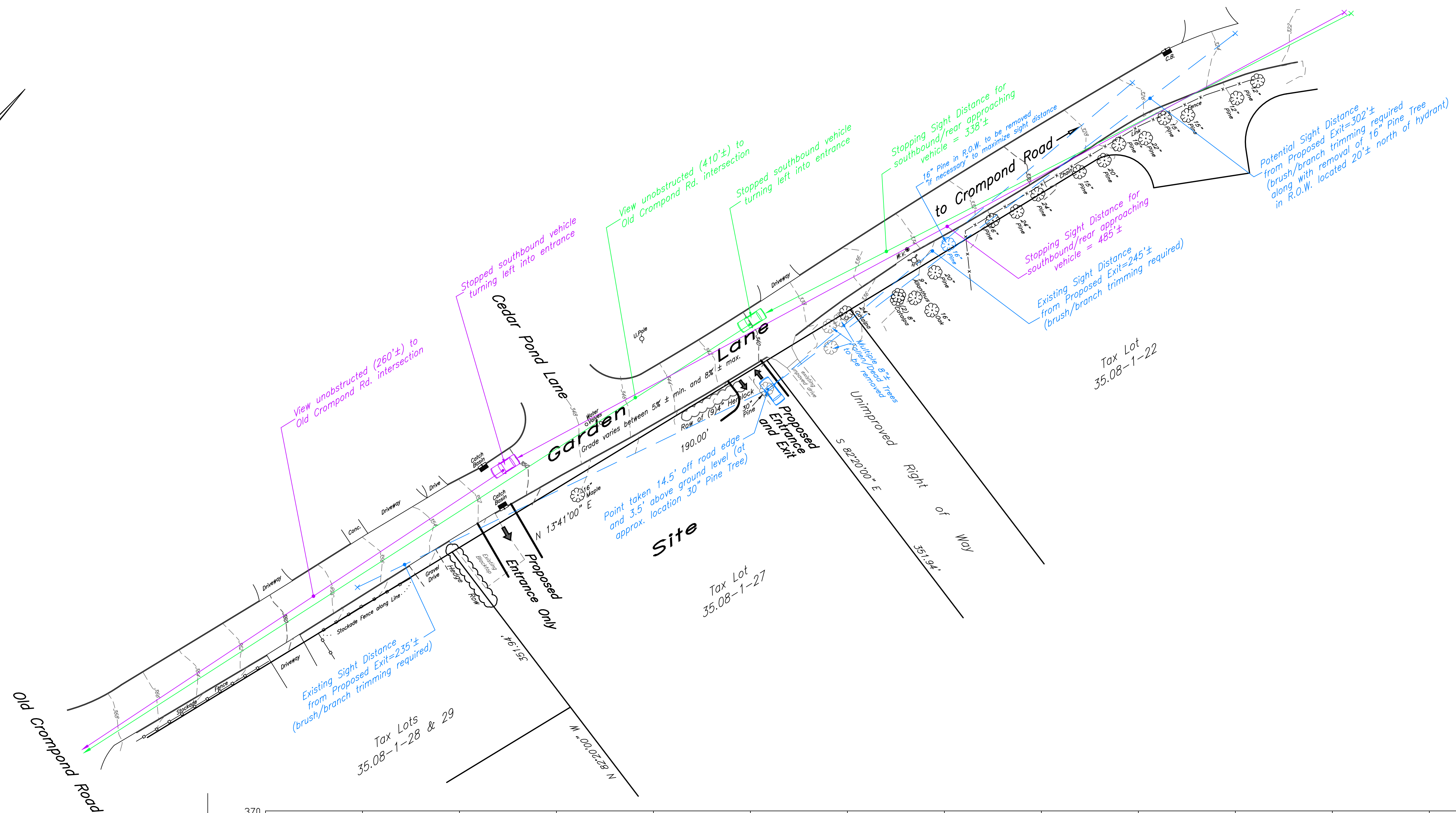
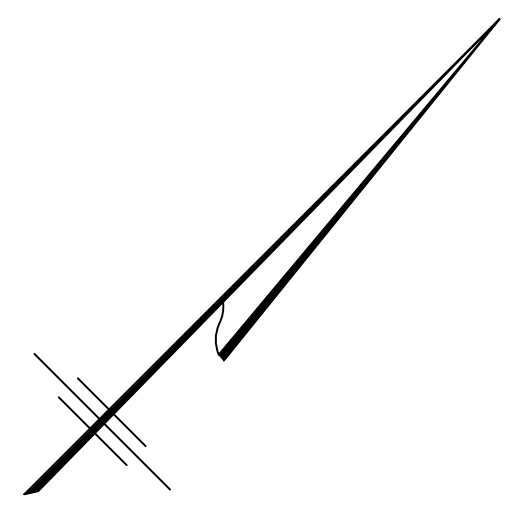
In summary, multiple sources of data indicate that the proposed 44 parking spaces at the Garden Lane Apartments are more than necessary for the development and the trip generation is below the threshold for further analysis. If there are further questions regarding trip generation and parking space suitability, please let me know.

Sincerely,

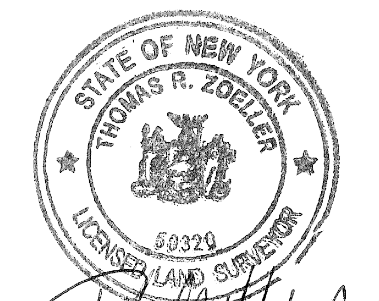


James A, Garofalo, AICP CTP
Director of the Transportation Division
TIM MILLER ASSOCIATES, INC.

C: Mr. Gino LaVerghetta



Route & Sight Distance Survey
 prepared for
Garden Lane Development LLC
 in the Town of
Yorktown
 Westchester County, N.Y.
 Scale 1"=30' Dec. 22, 2022
 Revised Jan. 4, 2023 for revised driveway locations, sight distances and road profile
 Revised Jan. 23, 2023 for revised driveway access locations and sight lines



Thomas R. Zogger
 Ward Carpenter Engineers, Inc.
 76 Mamaroneck Avenue
 White Plains, N.Y. 10601