

J. Traffic and Transportation

1. Introduction

A Traffic Impact Study has been prepared to evaluate the potential traffic impacts of the redevelopment of the former Harlem Valley Psychiatric Center (HVPC) property and an adjacent parcel (former Dykeman property) in the Town of Dover, New York on the surrounding roadway network. The following sections provide a summary description of the proposed Project and the tasks undertaken for the traffic impact analysis. The entire Traffic Impact Study can be found in the Appendix.

The proposed ~~p~~Project consists of a mix of residential, office and retail development, including 1,376 residential units and 245,500 s.f. of commercial space consisting of 75,000 s.f. of office space and 170,500 s.f. of retail space (including a grocery store). It is anticipated that the Project would be built in two phases, with multiple construction stages within each phase (1A, 1B, 1C, 2A, 2B, 2C).

a. ~~Initial Phase of Development~~

~~The initial phase of development is estimated~~Phase 1 is proposed to consist of approximately ~~506~~49 residential units (506 units to be developed on the west property and 43 units to be developed on the east property) and 200,000 s.f. of commercial space (79,500 sf on the west property and 120,500 sf on the east property).

b. Full Build-Out

The full development ~~will~~would consist of a total 506 residential units and 79,500 s.f. of commercial space on the west property, and ~~will~~would consist of a total of 870 residential units and 166,000 s.f. of commercial space on the east property. For analysis purposes, a 2020 Design Year was utilized with the full development evaluated.

2. Existing Conditions

a. Traffic Data Collection

(1) Physical Conditions

The site is primarily served by the NYS Route 22/55 Corridor with local access via Wheeler Road, Pleasant Ridge Road (C.R. 21), Hoags Corners Road (C.R.20)/West Dover Road (C.R. 20) and Hutchinson Avenue. The study area intersections are shown on Exhibits III.J-~~1~~2A and III.J-~~1~~2B.

(a) NYS Route 22 and Cricket Hill Road (C.R. 26)

Cricket Hill Road intersects with NYS Route 22 at an unsignalized intersection. The NYS Route 22 southbound approach consists of one lane in the form of a shared left/through lane and the NYS Route 22 northbound approach consists of one lane in the form of a shared through/right turn lane. The Cricket Hill Road westbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

(b) NYS Route 22 and Rural Avenue (North Leg)

Rural Avenue (North Leg) intersects with NYS Route 22 at an unsignalized intersection. The NYS Route 22 southbound approach consists of one lane in the form of a shared left/through lane and the NYS Route 22 northbound approach consists of one lane in the form of a shared through/right turn lane. The Rural Avenue (North Leg) westbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

(c) NYS Route 22 and Rural Avenue (South Leg)

Rural Avenue (South Leg) intersects with NYS Route 22 at an unsignalized intersection. The NYS Route 22 southbound approach consists of one lane in the form of a shared left/through lane and the NYS Route 22 northbound approach consists of one lane in the form of a shared through/right turn lane. The Rural Avenue (South Leg) westbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

(d) NYS Route 22 and Pleasant Ridge Road (C.R. 21)

Pleasant Ridge Road (C.R. 21) intersects with NYS Route 22 at a signalized intersection. All approaches to the intersection consist of one lane.

(e) NYS 22/55 Intersection

NYS Route 55 northbound splits with NYS Route 22 north of Wheeler Road and NYS Route 55 southbound joins NYS Route 22 south of Pleasant Ridge Road. NYS Route 55 southbound traffic enters the NYS Route 22 Corridor at an unsignalized intersection.

(f) NYS Route 22/55 and Wheeler Road

Wheeler Road intersects with NYS Route 22/55 a signalized intersection. All approaches to the intersection consist of one lane.

(g) NYS Route 22/55 and Furlong Road

Furlong Road intersects with NYS Route 22/55 at an unsignalized intersection. The NYS Route 22/55 southbound approach consists of one lane in the form of a shared left/through lane and the NYS Route 22/55 northbound approach consists of one lane in the form of a shared through/right turn lane. The Furlong Road westbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

(h) NYS Route 22/55 and Kitchen Corners Road (North Leg)

Kitchens Corners Road (North Leg) intersects with NYS Route 22/55 at an unsignalized intersection. The NYS Route 22/55 northbound approach consists of one lane in the form of a shared left/through lane and the NYS Route 22/55 southbound approach consists of one lane in the form of a shared through/right turn lane. The Kitchens Corners Road eastbound approach consists of one lane for left and right turn movements and is “stop”

sign controlled.

- (i) NYS Route 22/55 and Hurds Corner Road/Old Pawling Road/Kitchen Corners Road

Hurds Corner Road, Old Pawling Road, Kitchen Corners Road (South Leg) intersects with NYS Route 22/55 at an unsignalized intersection. All approaches to the intersection consists of one lane with the Hurds Corner Road, Old Pawling Road, Kitchen Corners Road approaches “stop” sign controlled.

- (j) NYS Route 22/55 and N. Quaker Hill Road (C.R. 68)

N. Quaker Hill Road intersects with NYS Route 22/55 at an unsignalized intersection. The NYS Route 22/55 southbound approach consists of one lane in the form of a shared left/through lane and the NYS Route 22/55 northbound approach consists of one lane in the form of a shared through/right turn lane. The N. Quaker Hill Road westbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

- (k) Pleasant Ridge Road (C.R. 21) and Hoags Corners Road (C.R. 20)

Hoags Corners Road intersects with Pleasant Ridge Road at an unsignalized intersection. The Pleasant Ridge Road westbound approach consists of one lane in the form of a shared left/through lane and the Pleasant Ridge Road eastbound approach consists of one lane in the form of a shared through/right turn lane. The Hoags Corners Road northbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

- (l) Hoags Corners Road (C.R. 20) and Wheeler Road

Wheeler Road intersects with Hoags Corners Road at an unsignalized intersection. The Hoags Corners Road southbound approach consists of one lane in the form of a shared left/through lane and the Hoags Corners Road northbound approach consists of one lane in the form of a shared through/right turn lane. The Wheeler Road westbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

- (m) West Dover Road (C.R. 20) and Old Pawling Road

Old Pawling Road intersects with West Dover Road at an unsignalized intersection. The West Dover Road southbound approach consists of one lane in the form of a shared left/through lane and the West Dover Road northbound approach consists of one lane in the form of a shared through/right turn lane. The Old Pawling Road westbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

(n) NYS Route 55 and Pleasant Ridge Road (C.R. 21)

Pleasant Ridge Road intersects with NYS Route 55 at an unsignalized intersection. The NYS Route 55 northbound approach consists of one lane in the form of a shared left/through lane and the NYS Route 55 southbound approach consists of one lane in the form of a shared through/right turn lane. The Pleasant Ridge Road eastbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

(o) NYS Route 55 and Hutchinson Avenue

Hutchinson Avenue intersects with NYS Route 55 at an unsignalized intersection. The NYS Route 55 southbound approach consists of one lane in the form of a shared left/through lane and the NYS Route 55 northbound approach consists of one lane in the form of a shared through/right turn lane. The Hutchinson Avenue westbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

(p) Hutchinson Avenue and Wheeler Road

Wheeler Road intersects Hutchinson Avenue at an unsignalized intersection. Hutchinson Avenue northbound approach consists of one lane in the form of a shared left/through lane and the Hutchinson Avenue southbound approach consists of one lane in the form of a shared through/right turn lane. The Wheeler Avenue eastbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

(q) Hutchinson Avenue and Johnson Hill Road

Johnson Hill Road intersects Hutchinson Avenue at an unsignalized intersection. The Hutchinson Avenue southbound approach consists of one lane in the form of a shared left/through lane and the Hutchinson Avenue northbound approach consists of one lane in the form of a shared through/right turn lane. The Johnson Hill Road westbound approach consists of one lane for left and right turn movements and is “stop” sign controlled.

(r) Wheeler Road and Harlem Valley Golf Club

The Harlem Valley Golf Club intersects Wheeler Road at an unsignalized intersection. The Wheeler Road eastbound approach consists of one lane in the form of a shared left/through lane and the Wheeler Road westbound approach consists of one lane in the form of a shared through/right turn lane. The Harlem Valley Golf Club (southbound approach) consists of one lane for left and right turn movements and is “stop” sign controlled.

(2) Automatic Traffic Recorder and Manual Traffic Counts

To establish the existing traffic volumes for the study area intersections, manual turning movement traffic counts were conducted during June 2008 when school was in session between the hours of 6:30 AM and 9:30 AM to determine the Weekday Peak AM Hour, between the hours of 3:30 PM and 6:30 PM to determine the Weekday Peak PM Hour and between the hours of 11:00 AM and 3:00 PM to determine the Saturday Peak Hour. As per the scope requirement for a seven-day study, machine counts were also conducted along NYS Route 22/55 in the vicinity of Wheeler Road from October 3, 2008 to October 10, 2008. In addition, NYSDOT count data was also referenced. Together this information was used to determine balance (where appropriate) the Year 2008 Existing Traffic Volumes for the Weekday Peak AM Highway Hour, Weekday Peak PM Highway Hour and Saturday Peak Hour for the following locations as per the Scoping Document.

The following key intersections were evaluated.

1. NYS Route 22 and Cricket Hill Road (C.R. 26)
- 2a. NYS Route 22 and Rural Avenue (North Leg)
- 2b. NYS Route 22 and Rural Avenue (South Leg)
3. NYS Route 22 and Pleasant Ridge Road (C.R. 21)
4. NYS Route 22/55 Intersection
5. NYS Route 22/55 and Wheeler Road
6. NYS Route 22/55 and Furlong Road
7. NYS Route 22/55 and Kitchen Corners Road (North Leg)
8. NYS Route 22/55 and Hurds Corner Road/Old Pawling Road/Kitchen Corners Road (South Leg)
9. NYS Route 22/55 and N. Quaker Hill Road (C.R. 68)
10. Pleasant Ridge Road (C.R. 21) and Hoags Corners Road (C.R. 20)
11. Hoags Corners Road (C.R. 20) and Wheeler Road
12. West Dover Road (C.R. 20) and Old Pawling Road
13. NYS Route 55 and Pleasant Ridge Road (C.R. 21)
14. NYS Route 55 and Hutchinson Avenue
15. Hutchinson Avenue and Wheeler Road
16. Hutchinson Avenue and Johnson Hill Road
17. Wheeler Road and Harlem Valley Golf Club

Based on the above traffic count data (manual/machine), the existing peak hours are generally identified as follows:

- Weekday Peak AM Highway Hour - 6:30 AM to 7:30 AM
- Weekday Peak PM Highway Hour - 4:30 PM to 5:30 PM
- Saturday Peak Hour - 12:30 PM to 1:30 PM

(3) Existing 2008 Traffic Volumes

The resulting balanced Year 2008 Existing Traffic Volumes for each of the study area locations are shown on Exhibits III.J-23A, III.J-23B, III.J-34A, III.J-

34B, III.J-45A and III.J-45B for each of the peak hours, respectively. A copy of the traffic count data (manual/machine) including peak hours are contained in the Appendix.

b. Capacity Analysis

In order to determine existing and future traffic operating conditions at the study area intersections, it was necessary to perform capacity analyses. The capacity analyses were conducted utilizing the latest version of the Highway Capacity Software (HCS+ Version 5.3), which is based on the Highway Capacity Manual (HCM) procedures. A description of the analysis methodology utilized in this report can be found in the Traffic Impact Study included in the Appendix.

A narrative comparison of levels of service for the Existing, No Build, Build and Build with Other Development Traffic development scenarios can be found in the Traffic Impact Study in the Appendix of this DEIS and in Table III.J-32, below, which summarizes the results of the analysis for the Year 2008 Existing, Year 2020 No-Build and Year 2020 Build Traffic Volumes. Copies of the intersection capacity analysis are contained in Appendix “~~ED~~” of the Traffic Impact Study included in the Appendix.

3. Future without the Proposed Project

a. Background Traffic Growth

For the purposes of analysis, a Design Year of 2020 has been utilized to evaluate future traffic conditions. Based on ~~recent~~ NYSDOT AADT Traffic Volumes data, the background growth in the area is little to none. (A copy of the NYSDOT AADT Traffic Volumes (growth projections) is contained in Appendix “J” of the Traffic Impact Study.) However, a total background growth of 6 percent (0.5 percent per year) was utilized to develop the Year 2020 No-Build Traffic Volumes which are shown on Exhibits III.J-56A, III.J-56B, III.J-67A, III.J-67B, III.J-78A, and III.J-78B for each of the peak hours, respectively.

A list of other proposed/potential developments was provided by the Town. This included development in the Town of Dover, as well as the Towns of Pawling, Amenia and Pine Plains. Many of these projects are in the preliminary stage or have no timetable for construction. Inclusion of all of these projects would result in an inflated No-Build condition, which would show the proposed Project’s traffic as having less of an impact. The Applicant has chosen to evaluate the other developments as an Alternate Build Condition (as discussed in Section 4.d). The comparison of the No-Build Condition to the Build Condition with the Project would identify any needed improvements as a result of the Project. Comparison of the No-Build Condition to the Build Condition with Other Developments would identify any further improvement needed as a result of the other development traffic. ~~To account for other potential development traffic in the area, an alternate Build Condition (as discussed in Section 4.d) was evaluated.~~

b. Capacity Analysis

Table III.J-23 summarizes the results of the capacity analysis for the Year 2008 Existing, Year 2020 No-Build ~~and~~, Year 2020 Build, and Year 2020 Build with Other Developments Traffic Volumes. Copies of the intersection capacity analysis are contained in Appendix “ED” of the Traffic Impact Study included in the Appendix.

4. Potential Impacts of the Proposed Project

a. Trip Generation

To estimate the amount of traffic to be generated by the ~~proposed p~~Project during each of the peak hours, the Hourly Trip Generation Rates and Anticipated Site Generated Traffic Volumes were developed based on information published by the Institute of Transportation Engineers (ITE) as outlined in their report titled, “Trip Generation”, 8th Edition, 2008.

Table III.J-1 summarizes the ~~Initial Phase Trip Generation and III.J-2 summarizes the~~ Full Development Trip Generation (which was evaluated) for each of the peak hours.

**Table III.J-1
Initial Phase
Hourly Trip Generation Rates and Site Generated Traffic Volumes**

	ENTRY		EXIT		TOTAL	
	HTGR*	VOLUME	HTGR*	VOLUME	HTGR*	VOLUME
RESIDENTIAL (111 Single Family Lots) (1)						
WEEKDAY PEAK AM HIGHWAY HOUR	0.19	21	0.56	62	0.75	83
WEEKDAY PEAK PM HIGHWAY HOUR	0.64	71	0.37	41	1.01	112
SATURDAY PEAK HOUR	0.49	54	0.44	49	0.93	103
68 AGE RESTRICTED (3)						
WEEKDAY PEAK AM HIGHWAY HOUR	0.10	7	0.28	19	0.38	26
WEEKDAY PEAK PM HIGHWAY HOUR	0.32	22	0.18	12	0.50	34
SATURDAY PEAK HOUR	0.25	17	0.22	15	0.47	32
191 TOWNHOUSE/APARTMENT UNITS (2)						
WEEKDAY PEAK AM HIGHWAY HOUR	0.07	13	0.37	71	0.44	84
WEEKDAY PEAK PM HIGHWAY HOUR	0.35	67	0.17	32	0.52	99
SATURDAY PEAK HOUR	0.25	48	0.22	42	0.47	90
136 AGE RESTRICTED (3)						
WEEKDAY PEAK AM HIGHWAY HOUR	0.04	5	0.18	25	0.22	30
WEEKDAY PEAK PM HIGHWAY HOUR	0.18	24	0.08	11	0.26	35
SATURDAY PEAK HOUR	0.13	18	0.11	15	0.24	33
TOTAL - RESIDENTIAL						
WEEKDAY PEAK AM HIGHWAY HOUR	-----	46	-----	177	-----	223
WEEKDAY PEAK PM HIGHWAY HOUR	-----	184	-----	96	-----	280

	ENTRY		EXIT		TOTAL	
	HTGR*	VOLUME	HTGR*	VOLUME	HTGR*	VOLUME
SATURDAY PEAK HOUR	----	137	----	121	----	258
W/ 10% MASS TRANSIT CREDIT						
WEEKDAY PEAK AM HIGHWAY HOUR	----	42	----	159	----	201
WEEKDAY PEAK PM HIGHWAY HOUR	----	166	----	86	----	252
SATURDAY PEAK HOUR	----	123	----	109	----	232
COMMERCIAL						
75,000 S.F. OF OFFICE SPACE (4)						
WEEKDAY PEAK AM HIGHWAY HOUR	1.36	102	0.19	14	1.55	116
WEEKDAY PEAK PM HIGHWAY HOUR	0.25	19	1.24	93	1.49	112
SATURDAY PEAK HOUR	0.22	17	0.19	14	0.41	31
125,000 S.F. OF RETAIL SPACE (5)						
WEEKDAY PEAK AM HIGHWAY HOUR	0.61	76	0.39	49	1.00	125
WEEKDAY PEAK PM HIGHWAY HOUR	1.83	229	1.90	237	3.73	466
SATURDAY PEAK HOUR	2.54	317	2.35	294	4.89	611
TOTAL--COMMERCIAL						
WEEKDAY PEAK AM HIGHWAY HOUR	----	178	----	63	----	241
WEEKDAY PEAK PM HIGHWAY HOUR	----	248	----	330	----	578
SATURDAY PEAK HOUR	----	334	----	308	----	642
TOTAL--W/ 25% RETAIL PASS-BY CREDIT						
WEEKDAY PEAK AM HIGHWAY HOUR	----	159	----	44	----	203
WEEKDAY PEAK PM HIGHWAY HOUR	----	191	----	273	----	464
SATURDAY PEAK HOUR	----	255	----	229	----	484
TOTAL "NEW" TRIPS						
WEEKDAY PEAK AM HIGHWAY HOUR	----	201	----	203	----	404
WEEKDAY PEAK PM HIGHWAY HOUR	----	357	----	359	----	716
SATURDAY PEAK HOUR	----	378	----	338	----	716

1- BASED ON ITE LAND USE 210—AVERAGE SINGLE FAMILY RATES

2- BASED ON ITE LAND USE 230—AVERAGE TOWNHOUSE / CONDOMINIUM RATES

3- IN ORDER TO ACCOUNT FOR THE AGE RESTRICTED TYPE OF UNITS PROPOSED, A 50% REDUCTION OF THE "TYPICAL" RESIDENTIAL RATES WERE UTILIZED

(4) BASED ON ITE LAND USE 710—AVERAGE OFFICE RATES

(5) BASED ON ITE LAND USE 820—AVERAGE SHOPPING CENTER RATES

Table III.J-21
Full Build-Out
Hourly Trip Generation Rates and Site Generated Traffic Volumes

	ENTRY		EXIT		TOTAL	
	HTGR*	VOLUME	HTGR*	VOLUME	HTGR*	VOLUME
RESIDENTIAL (272 Single Family Lots) (1)						
WEEKDAY PEAK AM HIGHWAY HOUR	0.19	52	0.56	152	0.75	204
WEEKDAY PEAK PM HIGHWAY HOUR	0.64	174	0.37	101	1.01	275
SATURDAY PEAK HOUR	0.49	133	0.44	120	0.93	253

	ENTRY		EXIT		TOTAL	
	HTGR*	VOLUME	HTGR*	VOLUME	HTGR*	VOLUME
182 AGE RESTRICTED (3)						
WEEKDAY PEAK AM HIGHWAY HOUR	0.10	18	0.28	51	0.38	69
WEEKDAY PEAK PM HIGHWAY HOUR	0.32	58	0.18	33	0.50	91
SATURDAY PEAK HOUR	0.25	46	0.22	40	0.47	86
666 TOWNHOUSE/APARTMENT UNITS (2)						
WEEKDAY PEAK AM HIGHWAY HOUR	0.07	47	0.37	246	0.44	293
WEEKDAY PEAK PM HIGHWAY HOUR	0.35	233	0.17	113	0.52	346
SATURDAY PEAK HOUR	0.25	167	0.22	146	0.47	313
256 AGE RESTRICTED (3)						
WEEKDAY PEAK AM HIGHWAY HOUR	0.04	10	0.18	46	0.22	56
WEEKDAY PEAK PM HIGHWAY HOUR	0.18	46	0.08	21	0.26	67
SATURDAY PEAK HOUR	0.13	33	0.11	28	0.24	61
TOTAL - RESIDENTIAL						
WEEKDAY PEAK AM HIGHWAY HOUR	-----	127	-----	495	-----	622
WEEKDAY PEAK PM HIGHWAY HOUR	-----	511	-----	268	-----	779
SATURDAY PEAK HOUR	-----	379	-----	334	-----	713
W/ 10% MASS TRANSIT CREDIT (4)						
WEEKDAY PEAK AM HIGHWAY HOUR	-----	114	-----	446	-----	560
WEEKDAY PEAK PM HIGHWAY HOUR	-----	460	-----	241	-----	701
SATURDAY PEAK HOUR	-----	341	-----	301	-----	642
COMMERCIAL						
75,000 S.F. OF OFFICE SPACE (45)						
WEEKDAY PEAK AM HIGHWAY HOUR	1.36	102	0.19	14	1.55	116
WEEKDAY PEAK PM HIGHWAY HOUR	0.25	19	1.24	93	1.49	112
SATURDAY PEAK HOUR	0.22	17	0.19	14	0.41	31
170,500 S.F. OF RETAIL SPACE (56)						
WEEKDAY PEAK AM HIGHWAY HOUR	0.61	104	0.39	67	1.00	171
WEEKDAY PEAK PM HIGHWAY HOUR	1.83	312	1.90	324	3.73	636
SATURDAY PEAK HOUR	2.54	433	2.35	401	4.89	834
TOTAL - COMMERCIAL						
WEEKDAY PEAK AM HIGHWAY HOUR	-----	206	-----	81	-----	287
WEEKDAY PEAK PM HIGHWAY HOUR	-----	331	-----	417	-----	748
SATURDAY PEAK HOUR	-----	450	-----	415	-----	865
TOTAL - W/ 25% RETAIL PASS-BY CREDIT (7)						
WEEKDAY PEAK AM HIGHWAY HOUR	-----	180	-----	55	-----	235
WEEKDAY PEAK PM HIGHWAY HOUR	-----	253	-----	339	-----	592
SATURDAY PEAK HOUR	-----	342	-----	307	-----	649
TOTAL "NEW" TRIPS						
WEEKDAY PEAK AM HIGHWAY HOUR	-----	294	-----	50176	-----	795
WEEKDAY PEAK PM HIGHWAY HOUR	-----	713	-----	580	-----	1293

	ENTRY		EXIT		TOTAL	
	HTGR*	VOLUME	HTGR*	VOLUME	HTGR*	VOLUME
SATURDAY PEAK HOUR	-----	683	-----	608	-----	1291

- (1) - ~~BASED ON ITE LAND USE 210 - AVERAGE SINGLE FAMILY RATES~~
 - (2) - ~~BASED ON ITE LAND USE 230 - AVERAGE TOWNHOUSE / CONDOMINIUM RATES~~
 - (3) - ~~IN ORDER TO ACCOUNT FOR THE AGE RESTRICTED TYPE OF UNITS PROPOSED, A 50% REDUCTION OF THE "TYPICAL" RESIDENTIAL RATES WERE UTILIZED. IF AVERAGE SENIOR HOUSING RATES WERE UTILIZED (ITE LAND USE 251 AND ITE LAND USE 252), THE TRIP GENERATION WOULD BE SOME 70-75% LESS THAN THE "TYPICAL" RATES USED ABOVE.~~
 - (4) - ~~BASED ON U.S. CENSUS JOURNEY TO WORK DATA, IT WAS DETERMINED THAT A 10% MASS TRANSIT CREDIT WAS APPROPRIATE~~
 - (5) - ~~BASED ON ITE LAND USE 710 - AVERAGE OFFICE RATES~~
 - (6) - ~~BASED ON ITE LAND USE 820 - AVERAGE SHOPPING CENTER RATES~~
 - (7) - ~~BASED ON NYSDOT CRITERIA, A 25% PASS-BY CREDIT IS CONSIDERED APPROPRIATE~~
- * ~~ITE AVERAGE TRIP RATES WERE UTILIZED TO PROVIDE A CONSISTENT TRIP RATE BETWEEN DEVELOPMENT STAGES. IN ADDITION, IT WAS DETERMINED THAT THE AVERAGE RATES WOULD BE APPROPRIATE IN LIEU OF ANY INTERPLAY CREDITS BETWEEN THE RESIDENTIAL, OFFICE AND RETAIL USES.~~

b. Arrival and Departure Distribution

As previously discussed, the ~~proposed p~~Project consists of a mix of residential, office and retail development. In order to assign the site generated traffic volumes to the roadway network for the residential, office and retail development areas, it was necessary to establish arrival/departure distributions. Based on a review of the existing traffic volumes and expected travel patterns, the following assignments were utilized.

(1) Residential

The residential trips were assigned with some 25 percent to/from the north (15 percent to/from NYS Route 22 and 10 percent to/from NYS Route 55), 65 percent to/from the south (NYS Route 22/55) and 10 percent to/from the west (5 percent to/from Pleasant Ridge Road, 5 percent to/from West Dover Road).

(2) Office

The office trips were assigned with some 25 percent to/from the north (15 percent to/from NYS Route 22 and 10 percent to/from NYS Route 55), 65 percent to/from the south (NYS Route 22/55) and 10 percent to/from the west (5 percent to/from Pleasant Ridge Road, 5 percent to/from West Dover Road).

(3) Retail

The retail trips were assigned with some 45 percent to/from the north (25 percent to/from NYS Route 22 and 20 percent to/from NYS Route 55), 40 percent to/from the south (NYS Route 22/55), 10 percent from the west (5 percent to/from Pleasant Ridge Road, 5 percent to/from West Dover Road) and 5 percent to/from the east (Johnson Hill Road).

The above distributions were assigned to each driveway for each development area.

c. Site Generated Traffic Volumes

The site generated traffic volumes for the proposed development were assigned to the roadway network based on the above referenced distribution patterns. The resulting

residential site generated traffic volumes are shown on Exhibits III.J-~~89~~A, III.J-~~89~~B, III.J-~~109~~A, III.J-~~910~~B and III.J-~~101~~A, III.J-~~101~~B and the commercial (office/retail) site generated traffic volumes are shown on Exhibits III.J-~~142~~A, III.J-~~142~~B, III.J-~~123~~A, III.J-~~123~~B and III.J-~~134~~A and III.J-~~134~~B for each of the peak hours. Additional site generated traffic volumes for the site driveways are contained in Appendix “G” of the Traffic Impact Study.

d. Year 2020 Build Traffic Volumes

The site generated traffic volumes were then added to the Year 2020 No-Build Traffic Volumes to obtain the Year 2020 Build Traffic Volumes (with the proposed development). The resulting Year 2020 Build Traffic Volumes are shown on Exhibits III.J-~~154~~A, III.J-~~145~~B, III.J-~~156~~A, III.J-~~156~~B, III.J-~~167~~A and III.J-~~167~~B for each of the peak hours, respectively.

As discussed in Section 3.a, above, an Alternate Build Condition was also analyzed with other potential development traffic in the area. Based on conversations with the Town, the following developments were included:

- Country Squire, Dover Plains
- Lands of Furnia, Dover Plains
- Ketcham’s Corners, Dover Plains
- Stony Brook Estates, Dover Plains
- Wind Rose, Wingdale and Pawling
- Brady Brook Falls, Pawling
- Madison Woods, Pawling
- Deerfield Estates, Pawling
- Castagna Commerce Park, Pawling
- Silo Ridge and Depot Hill Farm, Amenia
- The Carvel Property, Pine Plains.

The resulting other development traffic volumes are shown on Exhibits III.J-~~178~~A, III.J-~~178~~B, III.J-~~189~~A, III.J-~~189~~B, III.J-~~1920~~A and III.J-~~1920~~B for each of the peak hours, respectively.

The resulting Year 2020 Build Traffic Volumes with other development traffic are shown on Exhibits III.J-~~201~~A, III.J-~~201~~B, III.J-~~242~~A, III.J-~~242~~B, III.J-~~223~~A and III.J-~~223~~B for each of the peak hours, respectively.

e. Capacity Analysis

Table III.J-~~32~~ summarizes the results of the analysis for the Year 2008 Existing, Year 2020 No-Build, ~~and~~ Year 2020 Build, and Year 2020 Build with Other Development Traffic Volumes. Figure III.J-24A shows the recommended improvements and Table III.J-3 summarizes these improvements. Copies of the intersection capacity analysis are contained in Appendix “~~DE~~” of the Traffic Impact Study included in the Appendix.

DRAFT

Table III.J-32
Level of Service Summary Table

LOCATION	YEAR 2008 EXISTING CONDITIONS			YEAR 2020 NO-BUILD CONDITIONS			YEAR 2020 BUILD CONDITIONS			W/ OTHER DEVELOPMENT TRAFFIC YEAR 2020 BUILD CONDITIONS		
	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY
	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR
NYS ROUTE 22 & CRICKET HILL ROAD (C.R. 26) UNSIGNALIZED MAJOR APPROACH SOUTHBOUND LEFT / THROUGH MINOR APPROACH WESTBOUND LEFT / RIGHT	A (8.0)	A (8.3)	A (7.9)	A (8.1)	A (8.3)	A (8.0)	A (8.3)	A (8.7)	A (8.4)	A (8.9)	A (9.8)	A (9.0)
	B (11.1)	B (11.5)	B (10.5)	B (11.3)	B (11.7)	B (10.6)	B (12.9)	C (16.3)	B (13.9)	C (16.5)	D (26.7)	C (19.9)
NYS ROUTE 22 & RURAL AVENUE (NORTH LEG) UNSIGNALIZED MAJOR APPROACH SOUTHBOUND LEFT / THROUGH MINOR APPROACH WESTBOUND LEFT / RIGHT	A (8.0)	A (8.3)	A (8.0)	A (8.1)	A (8.4)	A (8.0)	A (8.3)	A (8.8)	A (8.4)	A (8.8)	A (9.8)	A (9.1)
	B (10.7)	B (11.7)	B (10.6)	B (10.9)	B (12.0)	B (10.8)	B (11.9)	B (13.5)	B (12.1)	B (13.9)	C (18.2)	B (14.9)
NYS ROUTE 22 & RURAL AVENUE (SOUTH LEG) UNSIGNALIZED MAJOR APPROACH SOUTHBOUND LEFT / THROUGH MINOR APPROACH WESTBOUND LEFT / RIGHT	A (8.0)	A (8.4)	A (8.0)	A (8.1)	A (8.4)	A (8.1)	A (8.4)	A (8.9)	A (8.4)	A (8.9)	A (9.9)	A (9.1)
	B (14.6)	C (16.4)	B (14.7)	C (15.4)	C (17.3)	C (15.3)	C (18.4)	C (24.4)	C (21.4)	D (31.1)	F (51.3)	E (37.1)
MONITOR FOR SIGNALIZATION	-----	-----	-----	-----	-----	-----	-----	-----	-----	B [12.2]	B [15.0]	B [11.7]
-	-	-	-	-	-	-	-	-	-	-	-	-
<u>WESTBOUND LEFT/RIGHT</u>	-----	-----	-----	-----	-----	-----	-----	-----	-----	<u>C [23.8]</u>	<u>C [24.1]</u>	<u>C [23.6]</u>
<u>WESTBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	-----	-----	-----	<u>C [23.8]</u>	<u>C [24.1]</u>	<u>C [23.6]</u>
<u>NORTHBOUND THROUGH / RIGHT</u>	-----	-----	-----	-----	-----	-----	-----	-----	-----	<u>B [11.4]</u>	<u>B [16.6]</u>	<u>B [12.1]</u>
<u>NORTHBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	-----	-----	-----	<u>B [11.4]</u>	<u>B [16.6]</u>	<u>B [12.1]</u>
<u>SOUTHBOUND LEFT / THROUGH</u>	-----	-----	-----	-----	-----	-----	-----	-----	-----	<u>B [12.6]</u>	<u>B [12.6]</u>	<u>B [11.2]</u>
<u>SOUTHBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	-----	-----	-----	<u>B [12.6]</u>	<u>B [12.6]</u>	<u>B [11.2]</u>
<u>OVERALL INTERSECTION</u>	-----	-----	-----	-----	-----	-----	-----	-----	-----	<u>B [12.2]</u>	<u>B [15.0]</u>	<u>B [11.7]</u>

LOCATION	YEAR 2008 EXISTING CONDITIONS			YEAR 2020 NO-BUILD CONDITIONS			YEAR 2020 BUILD CONDITIONS			W/ OTHER DEVELOPMENT TRAFFIC		
	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY
	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR
NYS ROUTE 22 & PLEASANT RIDGE ROAD (C.R. 21) SIGNALIZED	-	-	-	-	-	-	W/ SIGNAL TIMING CHANGES			W/ SIGNAL TIMING CHANGES		
EASTBOUND LEFT / THROUGH / RIGHT	B [15.5]	B [14.8]	B [11.5]	B [15.6]	B [14.9]	B [11.6]	EB [28.7] ^{EB} [16.1]	BC [15.2] ^{BC} [26.8]	BC [27.4] ^{BC} [11.8]	B [32.2] ^B [16.8]	B [27.4] ^B [15.6]	B [28.2] ^B [12.2]
EASTBOUND APPROACH	B [15.5]	B [14.8]	B [11.5]	B [15.6]	B [14.9]	B [11.6]	EB [28.7] ^{EB} [16.1]	BC [15.2] ^{BC} [26.8]	BC [27.4] ^{BC} [11.8]	B [32.2] ^B [16.8]	B [27.4] ^B [15.6]	B [28.2] ^B [12.2]
WESTBOUND LEFT / THROUGH / RIGHT	B [14.8]	B [14.5]	B [11.1]	B [14.9]	B [14.6]	B [11.2]	BC [15.1] ^{BC} [26.5]	BC [14.7] ^{BC} [25.9]	BC [21.1] ^{BC} [36.4]	B [26.6] ^B [15.1]	B [26.2] ^B [14.9]	B [26.3] ^B [11.4]
WESTBOUND APPROACH	B [14.8]	B [14.5]	B [11.1]	B [14.9]	B [14.6]	B [11.2]	BC [26.5] ^{BC} [15.1]	BC [14.7] ^{BC} [25.9]	BC [11.3] ^{BC} [26.4]	B [26.6] ^B [15.1]	B [26.2] ^B [14.9]	B [26.3] ^B [11.4]
NORTHBOUND LEFT / THROUGH / RIGHT	A [8.9]	B [10.1]	B [12.5]	A [9.0]	B [10.3]	B [12.6]	A [9.5] ^A [8.6]	B [12.4] ^B [40.4]	BA [9.2] ^{BA} [14.5]	B [11.1] ^B [11.1]	C [28.8] ^C [15.8]	C [24.3] ^C [11.3]
NORTHBOUND APPROACH	A [8.9]	B [10.1]	B [12.5]	A [9.0]	B [10.3]	B [12.6]	A [9.5] ^A [8.6]	B [12.4] ^B [40.4]	BA [14.5] ^{BA} [9.2]	B [11.1] ^B [11.1]	C [28.8] ^C [15.8]	C [24.3] ^C [11.3]
SOUTHBOUND LEFT / THROUGH / RIGHT	B [10.3]	B [10.5]	B [13.3]	B [10.6]	B [10.9]	B [13.5]	BA [11.5] ^{BA} [9.9]	B [13.9] ^B [1.2]	B [17.7] ^B [70.0]	C [22.5] ^C [14.3]	C [31.9] ^C [16.5]	D [52.1] ^D [13.4]
SOUTHBOUND APPROACH	B [10.3]	B [10.5]	B [13.3]	B [10.6]	B [10.9]	B [13.5]	BA [9.9] ^{BA} [11.5]	B [13.9] ^B [1.2]	B [17.7] ^B [70.0]	C [22.5] ^C [14.3]	C [31.9] ^C [16.5]	D [52.1] ^D [13.4]
OVERALL INTERSECTION	B [11.5]	B [11.3]	B [12.4]	B [11.7]	B [11.6]	B [12.6]	B [12.2] ^B [14.9]	B [14.3] ^B [3.5]	B [15.0] ^B [4.2]	B [17.6] ^B [16.7]	C [27.6] ^C [18.0]	C [32.8] ^C [15.7]
<u>W/ SIGNAL TIMING CHANGES</u>												
<u>EASTBOUND LEFT / THROUGH / RIGHT</u>	-----	-----	-----	-----	-----	-----	C [28.7] ^C [28.7]	C [26.8] ^C [26.8]	C [27.4] ^C [27.4]	C [32.2] ^C [32.2]	C [27.4] ^C [27.4]	C [28.2] ^C [28.2]
<u>EASTBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	C [28.7] ^C [28.7]	C [26.8] ^C [26.8]	C [27.4] ^C [27.4]	C [32.2] ^C [32.2]	C [27.4] ^C [27.4]	C [28.2] ^C [28.2]
<u>WESTBOUND LEFT / THROUGH / RIGHT</u>	-----	-----	-----	-----	-----	-----	C [26.5] ^C [26.5]	C [25.9] ^C [25.9]	C [26.1] ^C [26.1]	C [26.6] ^C [26.6]	C [26.2] ^C [26.2]	C [26.3] ^C [26.3]
<u>WESTBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	C [26.5] ^C [26.5]	C [25.9] ^C [25.9]	C [26.1] ^C [26.1]	C [26.6] ^C [26.6]	C [26.2] ^C [26.2]	C [26.3] ^C [26.3]
<u>NORTHBOUND LEFT / THROUGH / RIGHT</u>	-----	-----	-----	-----	-----	-----	A [8.6] ^A [8.6]	B [10.4] ^B [10.4]	A [9.2] ^A [9.2]	A [9.7] ^A [9.7]	B [15.8] ^B [15.8]	B [11.3] ^B [11.3]
<u>NORTHBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	A [8.6] ^A [8.6]	B [10.4] ^B [10.4]	A [9.2] ^A [9.2]	A [9.7] ^A [9.7]	B [15.8] ^B [15.8]	B [11.3] ^B [11.3]
<u>SOUTHBOUND LEFT / THROUGH / RIGHT</u>	-----	-----	-----	-----	-----	-----	A [9.9] ^A [9.9]	B [11.2] ^B [11.2]	B [10.0] ^B [10.0]	B [14.3] ^B [14.3]	B [16.5] ^B [16.5]	B [13.4] ^B [13.4]
<u>SOUTHBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	A [9.9] ^A [9.9]	B [11.2] ^B [11.2]	B [10.0] ^B [10.0]	B [14.3] ^B [14.3]	B [16.5] ^B [16.5]	B [13.4] ^B [13.4]
<u>OVERALL INTERSECTION -</u>	-----	-----	-----	-----	-----	-----	B [14.9] ^B [14.9]	B [14.1] ^B [14.1]	B [14.2] ^B [14.2]	B [16.7] ^B [16.7]	B [18.0] ^B [18.0]	B [15.7] ^B [15.7]
NYS ROUTE 22/55 SPLIT UNSIGNALIZED WESTBOUND LEFT	C (24.7)	C (17.2)	B (14.3)	D (29.6)	C (18.5)	B (15.0)	F (58.8)	E (35.0)	D (26.2)	F (340.3)	F (149.9)	F (79.9)
MONITOR FOR SIGNALIZATION	-----	-----	-----	-----	-----	-----	B [17.1] ^B [17.1]	B [14.0] ^B [14.0]	B [13.8] ^B [13.8]	B [18.4] ^B [18.4]	B [17.9] ^B [17.9]	B [15.1] ^B [15.1]

LOCATION	YEAR 2008 EXISTING CONDITIONS			YEAR 2020 NO-BUILD CONDITIONS			YEAR 2020 BUILD CONDITIONS			W/ OTHER DEVELOPMENT TRAFFIC		
	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY
	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR
WESTBOUND LEFT	-----	-----	-----	-----	-----	-----	C [28.2]	C [22.4]	C [22.9]	C [30.0]	C [22.5]	C [22.9]
WESTBOUND APPROACH	-----	-----	-----	-----	-----	-----	C [28.2]	C [22.4]	C [22.9]	C [30.0]	C [22.5]	C [22.9]
NORTHBOUND THROUGH	-----	-----	-----	-----	-----	-----	B [11.0]	B [13.1]	B [11.7]	B [12.3]	B [19.8]	B [14.2]
NORTHBOUND APPROACH	-----	-----	-----	-----	-----	-----	B [11.0]	B [13.1]	B [11.7]	B [12.3]	B [19.8]	B [14.2]
SOUTHBOUND THROUGH	-----	-----	-----	-----	-----	-----	B [11.9]	B [12.0]	B [11.5]	B [15.7]	B [14.1]	B [13.4]
SOUTHBOUND APPROACH	-----	-----	-----	-----	-----	-----	B [11.9]	B [12.0]	B [11.5]	B [15.7]	B [14.1]	B [13.4]
OVERALL INTERSECTION	-----	-----	-----	-----	-----	-----	B [17.1]	B [14.0]	B [13.8]	B [18.4]	B [17.9]	B [15.1]
NYS ROUTE 22/55 & WHEELER ROAD SIGNALIZED	-	-	-	-	-	-						
EASTBOUND LEFT / THROUGH / RIGHT	B [14.0]	B [14.1]	B [14.0]	B [14.0]	B [14.1]	B [14.1]	B [17.7]	C [32.2]	D [42.6]	B [17.7]	C [32.2]	D [42.6]
EASTBOUND APPROACH	B [14.0]	B [14.1]	B [14.0]	B [14.0]	B [14.1]	B [14.1]	B [17.7]	C [32.2]	D [42.6]	B [17.7]	C [32.2]	D [42.6]
WESTBOUND LEFT / THROUGH / RIGHT	B [13.6]	B [13.5]	B [13.5]	B [13.6]	B [13.5]	B [13.5]	B [14.4]	C [28.0]	C [20.1]	B [14.4]	C [28.0]	C [20.1]
WESTBOUND APPROACH	B [13.6]	B [13.5]	B [13.5]	B [13.6]	B [13.5]	B [13.5]	B [14.4]	C [28.0]	C [20.1]	B [14.4]	C [28.0]	C [20.1]
NORTHBOUND LEFT / THROUGH / RIGHT	A [9.4]	B [16.2]	B [11.3]	A [9.5]	B [18.4]	B [11.9]	B [13.8]	F [259.8]	F [162.6]	C [29.5]	F [472.2]	F [330.5]
NORTHBOUND APPROACH	A [9.4]	B [16.2]	B [11.3]	A [9.5]	B [18.4]	B [11.9]	B [13.8]	F [259.8]	F [162.6]	C [29.5]	F [472.2]	F [330.5]
SOUTHBOUND LEFT / THROUGH / RIGHT	B [17.3]	B [10.3]	B [10.0]	B [20.0]	B [10.6]	B [10.2]	D [39.4]	B [18.8]	B [19.3]	F [151.4]	D [54.8]	E [57.2]
SOUTHBOUND APPROACH	B [17.3]	B [10.3]	B [10.0]	B [20.0]	B [10.6]	B [10.2]	D [39.4]	B [18.8]	B [19.3]	F [151.4]	D [54.8]	E [57.2]
OVERALL INTERSECTION	B [14.9]	B [14.0]	B [11.0]	B [16.7]	B [15.4]	B [11.4]	C [27.2]	F [129.4]	F [80.3]	F [91.3]	F [247.8]	F [164.9]
W/ IMPROVEMENTS												
EASTBOUND LEFT	-----	-----	-----	-----	-----	-----	C [21.6]	C [23.5]	C [23.8]	C [21.6]	C [23.5]	C [23.8]
EASTBOUND THROUGH / RIGHT	-----	-----	-----	-----	-----	-----	C [23.1]	C [23.3]	C [24.0]	C [23.1]	C [23.3]	C [24.0]
EASTBOUND APPROACH	-----	-----	-----	-----	-----	-----	C [22.6]	C [23.4]	C [23.9]	C [22.6]	C [23.4]	C [23.9]
WESTBOUND LEFT	-----	-----	-----	-----	-----	-----	C [20.9]	C [24.3]	C [23.3]	C [20.9]	C [24.3]	C [23.3]
WESTBOUND THROUGH / RIGHT	-----	-----	-----	-----	-----	-----	C [20.6]	C [22.1]	C [21.9]	C [20.6]	C [22.1]	C [21.9]
WESTBOUND APPROACH	-----	-----	-----	-----	-----	-----	C [20.7]	C [23.3]	C [22.6]	C [20.7]	C [23.3]	C [22.6]
NORTHBOUND LEFT	-----	-----	-----	-----	-----	-----	B [10.9]	B [12.8]	B [12.4]	C [32.4]	B [17.7]	B [15.9]
NORTHBOUND THROUGH	-----	-----	-----	-----	-----	-----	B [10.8]	B [15.1]	B [11.8]	B [12.2]	C [30.0]	B [14.5]
NORTHBOUND RIGHT	-----	-----	-----	-----	-----	-----	A [9.6]	A [9.7]	A [9.8]	A [9.6]	A [9.7]	A [9.8]
NORTHBOUND APPROACH	-----	-----	-----	-----	-----	-----	B [10.6]	B [14.0]	B [11.7]	B [14.2]	C [26.1]	B [14.2]
SOUTHBOUND LEFT	-----	-----	-----	-----	-----	-----	A [9.5]	B [10.7]	B [10.2]	A [9.7]	D [44.1]	B [11.2]
SOUTHBOUND THROUGH	-----	-----	-----	-----	-----	-----	B [15.7]	B [11.5]	B [11.1]	C [32.6]	B [13.2]	B [12.6]
SOUTHBOUND RIGHT	-----	-----	-----	-----	-----	-----	A [9.6]	A [10.0]	B [10.1]	A [9.6]	A [10.0]	B [10.1]
SOUTHBOUND APPROACH	-----	-----	-----	-----	-----	-----	B [14.5]	B [11.0]	B [10.7]	C [29.3]	B [15.2]	B [11.9]

LOCATION	YEAR 2008 EXISTING CONDITIONS			YEAR 2020 NO-BUILD CONDITIONS			YEAR 2020 BUILD CONDITIONS			W/ OTHER DEVELOPMENT TRAFFIC		
	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY
	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR
OVERALL INTERSECTION	-----	-----	-----	-----	-----	-----	B [15.0]	B [15.8]	B [15.0]	C [23.5]	C [22.3]	B [15.9]
NYS ROUTE 22/55 & FURLONG ROAD UNSIGNALIZED												
<u>MAJOR APPROACH</u>												
SOUTHBOUND LEFT / THROUGH	A (7.7)	A (9.2)	A (8.5)	A (7.7)	A (9.3)	A (8.6)	A (8.2)	B (11.6)	B (10.1)	A (8.7)	B (13.6)	B (11.1)
<u>MINOR APPROACH</u>												
WESTBOUND LEFT / RIGHT	C (16.2)	C (17.4)	B (14.9)	C (17.3)	C (18.7)	C (15.6)	F (127.3)	F (217.7)	F (116.6)	F (476.0)	F (707.3)	F (375.5)
MONITOR FOR SIGNALIZATION	-----	-----	-----	-----	-----	-----	B [14.2]	C [25.4]	B [10.8]	C [29.1]	C [29.6]	B [14.8]
<u>WESTBOUND LEFT / RIGHT</u>	-----	-----	-----	-----	-----	-----	C [32.2]	C [30.0]	C [30.1]	C [32.2]	D [47.5]	C [30.2]
<u>WESTBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	C [32.2]	C [30.0]	C [30.1]	C [32.2]	D [47.5]	C [30.2]
<u>NORTHBOUND THROUGH / RIGHT</u>	-----	-----	-----	-----	-----	-----	A [6.7]	C [33.9]	B [13.1]	A [7.7]	D [41.7]	C [28.0]
<u>NORTHBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	A [6.7]	C [33.9]	B [13.1]	A [7.7]	D [41.7]	C [28.0]
<u>SOUTHBOUND LEFT / THROUGH</u>	-----	-----	-----	-----	-----	-----	B [13.4]	A [9.1]	A [8.9]	D [38.9]	A [5.5]	B [12.4]
<u>SOUTHBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	B [13.4]	A [9.1]	A [8.9]	D [38.9]	A [5.5]	B [12.4]
<u>OVERALL INTERSECTION</u>	-----	-----	-----	-----	-----	-----	B [14.2]	C [25.4]	B [12.8]	C [29.1]	C [29.6]	C [21.8]
NYS ROUTE 22/55 & KITCHEN CORNERS ROAD (NORTH LEG) UNSIGNALIZED												
<u>MAJOR APPROACH</u>												
NORTHBOUND LEFT / THROUGH	A (9.0)	A (8.0)	A (8.2)	A (9.2)	A (8.1)	A (8.3)	B (10.8)	A (9.2)	A (9.4)	B (12.2)	A (9.8)	B (10.1)
<u>MINOR APPROACH</u>												
EASTBOUND LEFT / RIGHT	*	*	*	*	*	*	*	*	*	*	*	*
NYS ROUTE 22/55 & HURDS CORNER ROAD / OLD PAWLING ROAD / KITCHEN CORNERS ROAD (SOUTH LEG) UNSIGNALIZED												

LOCATION	YEAR 2008 EXISTING CONDITIONS			YEAR 2020 NO-BUILD CONDITIONS			YEAR 2020 BUILD CONDITIONS			W/ OTHER DEVELOPMENT TRAFFIC		
	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY
	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR
MAJOR APPROACH												
NORTHBOUND LEFT / THROUGH / RIGHT	A (9.1)	A (8.1)	A (8.3)	A (9.2)	A (8.2)	A (8.4)	B (10.9)	A (9.4)	A (9.7)	B (12.4)	B (10.1)	B (10.4)
SOUTHBOUND LEFT / THROUGH / RIGHT	A (7.7)	A (9.0)	A (8.5)	A (7.7)	A (9.1)	A (8.6)	A (8.2)	B (11.2)	A (10.0)	A (8.6)	B (12.9)	B (10.9)
MINOR APPROACH												
WESTBOUND LEFT / THROUGH / RIGHT	C (17.2)	C (23.4)	C (20.7)	C (18.3)	D (25.6)	C (22.3)	E (48.8)	F (126.6)	F (84.5)	F (130.7)	F (448.6)	F (212.7)
EASTBOUND LEFT / THROUGH / RIGHT	C (16.9)	C (17.5)	B (14.4)	C (17.9)	C (18.3)	C (15.1)	E (36.1)	F (64.4)	E (35.9)	F (74.6)	F (267.6)	F (72.7)
MONITOR FOR SIGNALIZATION												
<u>EASTBOUND LEFT / THROUGH / RIGHT</u>	-----	-----	-----	-----	-----	-----	C [20.5]	C [31.7]	B [14.0]	C [22.7]	D [43.6]	B [17.1]
<u>EASTBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	C [28.4]	C [21.4]	C [28.2]	D [37.9]	D [36.6]	C [32.5]
<u>WESTBOUND LEFT / THROUGH / RIGHT</u>	-----	-----	-----	-----	-----	-----	C [28.4]	C [21.4]	C [28.2]	D [37.9]	D [36.6]	C [32.5]
<u>WESTBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	C [27.5]	C [21.1]	C [27.5]	D [36.1]	D [36.1]	C [31.6]
<u>NORTHBOUND LEFT / THROUGH / RIGHT</u>	-----	-----	-----	-----	-----	-----	A [6.9]	D [47.1]	B [16.8]	A [3.6]	E [66.4]	C [23.1]
<u>NORTHBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	A [6.9]	D [47.1]	B [16.8]	A [3.6]	E [66.4]	C [23.1]
<u>SOUTHBOUND LEFT / THROUGH / RIGHT</u>	-----	-----	-----	-----	-----	-----	C [25.4]	A [6.1]	A [9.7]	C [30.1]	A [5.0]	A [8.9]
<u>SOUTHBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	C [25.4]	A [6.1]	A [9.7]	C [30.1]	A [5.0]	A [8.9]
<u>OVERALL INTERSECTION</u>	-----	-----	-----	-----	-----	-----	C [20.5]	C [31.7]	B [14.0]	C [22.7]	D [43.6]	B [17.1]
NYS ROUTE 22/55 & NORTH QUAKER HILL ROAD (C.R. 68) UNSIGNALIZED												
MAJOR APPROACH												
SOUTHBOUND LEFT / THROUGH	A (7.8)	A (9.3)	A (8.7)	A (7.8)	A (9.5)	A (8.8)	A (8.3)	B (11.9)	B (10.4)	A (8.8)	B (14.0)	B (11.5)
MINOR APPROACH												
WESTBOUND LEFT / RIGHT	C (18.6)	C (20.2)	C (19.4)	C (20.2)	C (21.9)	C (21.0)	F (53.6)	F (79.7)	F (74.3)	F (165.5)	F (253.7)	F (201.6)
MONITOR FOR SIGNALIZATION												
<u>WESTBOUND LEFT / RIGHT</u>	-----	-----	-----	-----	-----	-----	C [25.7]	B [18.4]	B [13.5]	C [29.3]	D [37.2]	C [24.2]
<u>WESTBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	C [29.0]	C [32.8]	C [28.9]	D [39.2]	D [37.9]	C [28.9]
<u>NORTHBOUND THROUGH / RIGHT</u>	-----	-----	-----	-----	-----	-----	A [6.8]	C [24.5]	B [14.3]	A [3.5]	E [55.5]	C [30.0]
<u>NORTHBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	A [6.8]	C [24.5]	B [14.3]	A [3.5]	E [55.5]	C [30.0]
<u>SOUTHBOUND LEFT / THROUGH</u>	-----	-----	-----	-----	-----	-----	C [32.6]	A [6.8]	B [11.1]	D [39.4]	A [6.0]	B [17.0]
<u>SOUTHBOUND APPROACH</u>	-----	-----	-----	-----	-----	-----	C [32.6]	A [6.8]	B [11.1]	D [39.4]	A [6.0]	B [17.0]
<u>OVERALL INTERSECTION</u>	-----	-----	-----	-----	-----	-----	C [25.7]	B [18.4]	B [13.5]	C [29.3]	D [37.2]	C [24.2]

LOCATION	YEAR 2008 EXISTING CONDITIONS			YEAR 2020 NO-BUILD CONDITIONS			YEAR 2020 BUILD CONDITIONS			W/ OTHER DEVELOPMENT TRAFFIC		
	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY
	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR
PLEASANT RIDGE ROAD (C.R. 21) & HOAGS CORNERS ROAD (C.R. 20) UNSIGNALIZED <u>MAJOR APPROACH</u> WESTBOUND LEFT / THROUGH <u>MINOR APPROACH</u> NORTHBOUND LEFT / RIGHT	A (7.6)	A (7.6)	A (7.5)	A (7.6)	A (7.7)	A (7.6)	A (7.6)	A (7.8)	A (7.7)	A (7.7)	A (7.9)	A (7.7)
HOAGS CORNERS ROAD (C.R. 20) & WHEELER ROAD UNSIGNALIZED <u>MAJOR APPROACH</u> SOUTHBOUND LEFT / THROUGH <u>MINOR APPROACH</u> WESTBOUND LEFT / RIGHT	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.6)	A (7.5)	A (7.5)	A (7.6)	A (7.6)
WEST DOVER ROAD (C.R. 20) & OLD PAWLING ROAD UNSIGNALIZED <u>MAJOR APPROACH</u> SOUTHBOUND LEFT / THROUGH <u>MINOR APPROACH</u> WESTBOUND LEFT / RIGHT	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.6)	A (7.5)	A (7.5)	A (7.6)	A (7.6)
NYS ROUTE 55 & PLEASANT RIDGE ROAD (C.R. 21) UNSIGNALIZED <u>MAJOR APPROACH</u> NORTHBOUND LEFT / THROUGH	A (8.6)	A (7.8)	A (7.9)	A (8.7)	A (7.8)	A (8.0)	A (8.8)	A (8.1)	A (8.3)	A (9.0)	A (8.2)	A (8.3)

LOCATION	YEAR 2008 EXISTING CONDITIONS			YEAR 2020 NO-BUILD CONDITIONS			YEAR 2020 BUILD CONDITIONS			W/ OTHER DEVELOPMENT TRAFFIC		
	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY
	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR
<u>MINOR APPROACH</u> EASTBOUND LEFT / RIGHT	B (14.2)	B (14.5)	B (13.5)	B (15.0)	C (15.3)	B (14.1)	C (17.9)	C (21.1)	C (19.6)	C (19.7)	C (23.3)	C (20.5)
NYS ROUTE 55 & HUTCHINSON AVENUE UNSIGNALIZED <u>MAJOR APPROACH</u> SOUTHBOUND LEFT / THROUGH <u>MINOR APPROACH</u>	A (7.5)	A (8.0)	A (7.8)	A (7.5)	A (8.0)	A (7.9)	A (7.6)	A (8.4)	A (8.2)	A (7.7)	A (8.4)	A (8.2)
WESTBOUND LEFT / RIGHT	A (8.9)	B (10.1)	A (9.7)	A (8.9)	B (10.2)	A (9.7)	A (9.3)	B (11.1)	B (10.5)	A (9.3)	B (11.3)	B (10.5)
HUTCHINSON AVENUE & WHEELER ROAD UNSIGNALIZED <u>MAJOR APPROACH</u> NORTHBOUND LEFT / THROUGH <u>MINOR APPROACH</u>	A (7.3)	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.7)	A (7.6)	A (7.7)	A (7.7)	A (7.6)	A (7.7)
EASTBOUND LEFT / RIGHT	A (8.5)	A (8.6)	A (8.6)	A (8.5)	A (8.6)	A (8.6)	A (9.6)	B (10.5)	B (10.4)	A (9.6)	B (10.5)	B (10.4)
HUTCHINSON AVENUE & JOHNSON HILL ROAD UNSIGNALIZED <u>MAJOR APPROACH</u> SOUTHBOUND LEFT / THROUGH <u>MINOR APPROACH</u>	A (7.3)	A (7.4)	A (7.4)	A (7.3)	A (7.5)	A (7.4)	A (7.4)	A (7.8)	A (7.7)	A (7.4)	A (7.8)	A (7.7)
WESTBOUND LEFT / RIGHT	A (8.9)	A (8.9)	A (8.8)	A (8.9)	A (9.0)	A (8.9)	A (9.5)	A (9.9)	A (9.5)	A (9.5)	A (9.9)	A (9.5)
WHEELER ROAD & HARLEM VALLEY GOLF CLUB UNSIGNALIZED <u>MAJOR APPROACH</u> EASTBOUND LEFT / THROUGH <u>MINOR APPROACH</u>	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.4)	A (7.6)	A (7.8)	A (7.7)	A (7.6)	A (7.8)	A (7.7)

LOCATION	YEAR 2008 EXISTING CONDITIONS			YEAR 2020 NO-BUILD CONDITIONS			YEAR 2020 BUILD CONDITIONS			W/ OTHER DEVELOPMENT TRAFFIC YEAR 2020 BUILD CONDITIONS		
	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY	WEEKDAY		SATURDAY
	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR	AM Peak Hour	PM Peak Hour	PEAK HOUR
SOUTHBOUND LEFT / RIGHT	A (9.0)	A (8.8)	A (9.0)	A (9.0)	A (8.8)	A (9.0)	A (9.9)	B (10.4)	B (10.2)	A (9.9)	B (10.4)	B (10.2)

DRAFT

f. Driveway Evaluation

An analysis of the site driveways was also conducted. The resulting volumes are shown on Exhibits III.J-235A, III.J-246A, III.J-257A, III.J-268A, III.J-279A and III.J-2830A for each of the peak hours. The resulting Levels of Service, and the driveway analyses are contained in Appendix “ED” of the Traffic Impact Study included in the Appendix. The final driveway locations are subject to final site plan approval and the driveway locations would be based on driveway function, as well as the provision of adequate sight distances.

g. Accident Data

Accident data was obtained from the New York State Department of Transportation Records Access Office at the study area intersections for the latest available three year period (~~January 2003~~July 1, 2005 through ~~December 2007~~June 30, 2008). A summary of this accident data and a copy of the NYSDOT Accident ~~Summary Tables and Accident~~ Reports are contained in Appendix “KE” of the Traffic Impact Study included in the Appendix.

As shown on the Accident Summary Table, there are no high accident locations. Based on a review of the Accident Reports, the accidents are typical types of accidents, such as rear-end accidents and turning accidents with apparent contributing factors such as failure to yield right of way and driver inattention/driver inexperience. As a result, it is not expected that this Project ~~will~~would have an impact on the accident rate on the area roadways.

h. Parking

The proposed neighborhood residential units are generally self-supporting in that the units supply spaces in garages that are generally setback from the front of the homes, tucked underneath for certain townhome and duplex configurations, or accessed from rear alleys. On-street parking is also provided along roadways in the neighborhood areas in order to provide space for visitors, consistent with traditional neighborhood design principles.

The commercial uses are concentrated in the Town Center and are served by surface parking areas located to the rear of the buildings. This configuration allows for a vibrant, active and pedestrian friendly downtown and is intended to provide an environment where visitors would park once and leave their car while potentially making visits to multiple businesses. Similar to municipal lots in established downtowns, usage of the lots would be shared by all of the businesses in the Town Center. The largest surface lots would be located to the south of Wheeler Road near the proposed grocery store. On-street parking would also be provided to supply additional parking for visitors to the Town Center and to encourage slower vehicle speeds. It is expected that Our Lady of Solace, and potentially Smith Hall, would receive periodic use for community events. The large surface lots proposed on the south side of Wheeler Road would be available to accommodate visitors for these uses, as well.

The projected parking needs of the Town Center components have been calculated using typical design standards of 4 spaces per 1,000 square feet for commercial uses, 3 spaces per 1,000 feet for community or amenity spaces, and 1.5 spaces per Main Street dwelling unit. As detailed on the parking configurations and parking space counts on the Site Plan Drawing Sheet SP-0.1, the total number of conveniently available parking in the Town Center exceeds the projected combined parking needs of 1,886 spaces. This calculation does not take a shared-parking credit, which is sometimes utilized to reduce projected parking demand for mixed-use projects with components anticipated to have differing peak parking time periods.

i. Circulation

Primary vehicular access to the western neighborhoods and the Town Center is anticipated to occur at the Route 22 and Wheeler Road intersection, which is proposed for improvement to accommodate additional turning lanes. There are two additional **p**Project entrances along Route 22 that may be used as access points for residents in those neighborhoods towards the northern or southern ends of the east side. Additional road network connections are available onto Pleasant Ridge Road and Hoags Corner Road on the west side, and to NYS Route 55 and eventually Route 22 south of the **p**Project **s**Site from Hutchinson Avenue on the east side.

Delivery vehicles would be anticipated to access the Town Center from the Route 22/Wheeler Road intersection. A loading area to service the potential grocery store is provided on the east side of the building and accessible from Wheeler Road (see Exhibit III.J-31A). Consistent with the function of traditional downtowns, most of the less intense loading activity for the smaller Main Street commercial uses would be anticipated to occur on-street. As the **p**Project is still at the conceptual site plan stage, the exact commercial tenants, and the timing and frequency of their deliveries, are unknown. However, it is anticipated that, with the exception of the grocery store, the Town Center buildings would generally accommodate and attract smaller offices, retailers, and restaurants which would be expected to receive deliveries via van and panel trucks, rather than tractor trailers.

As detailed in Section II, Description of Proposed Action, and the Design Guidelines, the Project's internal circulation network provides an efficient, integrated pedestrian and vehicular environment. The network employs a variety of different road types designed to function appropriately for their differing uses and that are scaled in order to be compatible with the differing characters of their surroundings. These range from the more intense "Main Street" collector along Wheeler Road, which includes two travel lanes, two parking lanes, curbing and wide sidewalks and provides service to the mixed-use downtown core, to narrower, rural residential roads that provide access to less intense residential areas.

As indicated on Exhibit II-13, the Project includes a comprehensive pedestrian network. Sidewalks are provided throughout the Town Center and most of the residential neighborhoods and hamlets. The exceptions are the more rural

neighborhoods, where the roads have been designed with rural residential standards (e.g., narrower travel lanes, swales rather than curbing.) Extensive street tree plantings would also be provided to further reinforce the pedestrian nature of the area and direct sidewalk connections from the inner residential neighborhoods to the Town Center would be available. On the west side of the Project, trails have also been proposed linking the neighborhoods. These paths are envisioned to provide both bicycle and pedestrian access. On the east side of the Project, in addition to the sidewalks along the internal roads, a trail connecting to the Appalachian Trail and a nature walk/trail providing a linkage to Boyce Park are also provided.

j. Public Transportation

The ~~p~~Project ~~s~~Site is traversed by the Metro-North Harlem line, a commuter rail service, with the Harlem Valley/Wingdale station located in the heart of the ~~p~~Project at the intersection of NYS Route 22 and Wheeler Road. Travel time from the Harlem Valley/Wingdale station to White Plains is just over one hour and express service available during peak travel hours to Grand Central Station in Midtown Manhattan is 1¾ hours. Current weekday rail service consists of 13 southbound trains, including four during the morning peak commute period, and 14 northbound trains, with five during the afternoon peak commute period. The site also receives very limited service from the Dutchess County LOOP bus system.

The majority of the ~~p~~Project dwellings (935) are within the 10-minute walk radius of the railroad station. This is consistent with transit-oriented design principles, which encourage denser development around mass transit. It is also possible that the ~~p~~Project would employ a neighborhood shuttle to further facilitate access to the station from outlying housing sites. Representatives from Metro-North have expressed a desire for approximately 275 spaces to meet their projected future demands for parking at the station. The conceptual site plan currently includes approximately 295 spaces to the south of the Power Plant to accommodate potential station needs. See Exhibit II-17, Railroad Station Area Detail. It is anticipated that these spaces and the associated maintenance responsibilities would be transferred to Metro-North.

5. Mitigation

The ~~p~~Project proposes a reconstruction of the Route 22/Wheeler Road intersection to accommodate additional turning lanes, as well as signal timing changes at the Route 22/Pleasant Ridge Road intersection. As summarized in the table above, the ~~p~~Project ~~w~~would ~~n~~not significantly affect the roadway system in the vicinity of the site with these proposed improvements. At a few locations, the calculations indicate that operating conditions by 2020 for some movements may include LOS E and F. These locations include:

- Route 22 and Rural Avenue (south leg)
- Route 22/55 Split
- Route 22/55 and Furlong Road
- Route 22/55 and Hurds Corner Road/Old Pawling Road

- Route 22/55 and North Quaker Hill Road

For these locations, monitoring for signalization is recommended since the modeled traffic volumes from regional growth and the specific projects identified for the No-Build may not be realized. –Additionally, volumes on the side roads are relatively modest compared to the traffic on Route 22, and it may be difficult to meet warrants that would justify a traffic signal. The analyses indicate that if these future volumes are realized, with signalization, these intersections would all operate at acceptable conditions.

It is not uncommon for the side road approach for unsignalized intersections to operate with delays while the major road operates at better Levels of Service. Since the Levels of Service are based on future traffic projections, the Applicant proposes to monitor these intersections at the end of Phase 2. If Traffic Signal Warrants are met, they would be forwarded to the NYSDOT. Based on future traffic projections, it appears that Traffic Signal Warrants won't be met based on the side road peak hour volumes for the : Route 22 and Rural Avenue (south leg); Route 22/55 and Hurds Corner Road/Old Pawling Road; and Route 22/55 and North Quaker Hill Road intersections. Based on the projected side road peak hour volumes, it appears that Traffic Signal Warrants could be met for the Route 22/55 split, and the Route 22/55 and Furlong Road intersection.

In addition, as indicated in the analysis, with the exception of the turning lane improvements to the NYS Route 22/55 and Wheeler Road intersection, -there is no need to widen NYS Route 22 to a multi-lane roadway within the Project Area. However, at certain locations there may be a need for turning lanes and/or signalization. South of the Project Area, especially just north of I-84, there is currently a need for a multi-lane roadway. ~~This is under study by t~~The New York State Department of Transportation (NYSDOT) has a preliminary design underway for NYS Route 22 between I-84 and County Route 65 (PIN # 8130.64) scheduled in 2015. A Design Report has not yet been started. Since the NYSDOT is an involved agency in this Project, the traffic information relating to this Project as well as the other developments in the area can be used by the NYSDOT in their study.

Sensitivity Analysis of NYS Route 22/55 and Wheeler Road

Based on the results of the capacity analysis for the full development, the Applicant is proposing separate left turn lanes and separate right turn lanes on both the NYS Route 22/55 northbound and southbound approaches, as well as separate left turn lanes on both the Wheeler Road eastbound and westbound approaches. It is anticipated that these improvements would be built during Phase 1.

A sensitivity analysis was conducted at the NYS Route 22/55 and Wheeler Road intersection for development Stage 1A (approximately 214 residential units and 80,000 square feet of retail development on the west property) to determine if the above improvements are required for this preliminary stage of development.

Based on the results of the analysis, and as shown on the Level of Service Summary provided in Table III.J-3, the existing intersection can accommodate the Stage 1A

development prior to the above improvements being constructed. Therefore, these improvements would be put in place prior to the start of Stage 1B. The resulting traffic volumes, trip generation, Level of Service Summary Table and Capacity Analysis for the sensitivity analysis are contained in Appendix “F” of the Traffic Impact Study

DRAFT

Table III.J-3
Summary of Improvements

<u>LOCATION</u>	<u>YEAR 2020 NO-BUILD CONDITIONS</u>	<u>YEAR 2020 BUILD CONDITIONS</u>	<u>YEAR 2020 BUILD CONDITIONS</u>
<u>NYS ROUTE 22 & CRICKET HILL ROAD (C.R. 26)</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>
<u>NYS ROUTE 22 & RURAL AVENUE (NORTH LEG)</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>
<u>NYS ROUTE 22 & RURAL AVENUE (SOUTH LEG)</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>MONITOR FOR SIGNALIZATION (2)</u>
<u>NYS ROUTE 22 & PLEASANT RIDGE ROAD (C.R. 21)</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>SIGNAL TIMING CHANGES (1)</u>	<u>SIGNAL TIMING CHANGES (1)</u>
<u>NYS ROUTE 22/55 SPLIT</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>MONITOR FOR SIGNALIZATION (2)</u>	<u>MONITOR FOR SIGNALIZATION (2)</u>
<u>NYS ROUTE 22/55 & WHEELER ROAD</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>TURNING LANE IMPROVEMENTS (3)</u>	<u>TURNING LANE IMPROVEMENTS (3)</u>
<u>NYS ROUTE 22/55 & FURLONG ROAD</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>MONITOR FOR SIGNALIZATION (2)</u>	<u>MONITOR FOR SIGNALIZATION (2)</u>
<u>NYS ROUTE 22/55 & KITCHEN CORNERS ROAD (NORTH LEG)</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>
<u>NYS ROUTE 22/55 & HURDS CORNER ROAD / OLD PAWLING ROAD / KITCHEN CORNERS ROAD (SOUTH LEG)</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>MONITOR FOR SIGNALIZATION (2)</u>	<u>MONITOR FOR SIGNALIZATION (2)</u>
<u>NYS ROUTE 22/55 & NORTH QUAKER HILL ROAD (C.R. 68)</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>MONITOR FOR SIGNALIZATION (2)</u>	<u>MONITOR FOR SIGNALIZATION (2)</u>
<u>PLEASANT RIDGE ROAD (C.R. 21) & HOAGS CORNERS ROAD (C.R. 20)</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>
<u>HOAGS CORNERS ROAD (C.R. 20) & WHEELER ROAD</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>
<u>WEST DOVER ROAD (C.R. 20) & OLD PAWLING ROAD</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>
<u>NYS ROUTE 55 & PLEASANT RIDGE ROAD (C.R. 21)</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>
<u>NYS ROUTE 55 & HUTCHINSON AVENUE</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>
<u>HUTCHINSON AVENUE & WHEELER ROAD</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>
<u>HUTCHINSON AVENUE & JOHNSON HILL ROAD</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>
<u>WHEELER ROAD & HARLEM VALLEY GOLF CLUB</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>	<u>NO IMPROVEMENTS REQUIRED</u>

(1) With Signal Timing Changes

(2) Since the Levels of Service are based on future traffic projections, the Applicant proposes to monitor this intersection at the end of Phase 2. If Traffic Signal Warrants are met, they would be forwarded to NYSDOT.

(3) In order to improve the operation of this intersection, the Applicant is proposing separate left turn lanes and separate right turn lanes on both the NYS Route 22/55 northbound and southbound approaches, as well as separate left turn lanes on both the Wheeler Road eastbound and westbound approaches.