## Chapter 11:

## Mitigation

## A. INTRODUCTION

This chapter considers mitigation measures to address significant adverse impacts resulting from the Proposed Actions. As summarized in Chapter 5, "Transportation," the Proposed Actions have the potential to result in significant adverse impacts with respect to traffic, transit, and pedestrians. Potential mitigation measures for such impacts in these technical areas are identified below.

## PRINCIPAL CONCLUSIONS

## TRANSPORTATION

The Proposed Actions would result in potential significant adverse impacts to traffic, transit (bus), and pedestrians, as detailed below. No significant adverse impacts were identified for transit (subway), parking, and vehicular and pedestrian safety. Mitigation measures have been identified and will be further evaluated for the FEIS. If the identified mitigation measures are determined to be infeasible, the impacts would remain unmitigated. After the publication of the Draft Environmental Impact Statement (DEIS), DOT provided updated signal timings for the intersection of Metropolitan Avenue and Wythe Avenue, which have been incorporated into the No Action and With Action conditions analyses. Correspondingly, the mitigation measures (specifically the signal timing changes) recommended for this intersection in the DEIS have been updated for the FEIS.

## Traffic

As discussed in Chapter 5, "Transportation," traffic conditions were evaluated at 13 intersections for the weekday AM, midday, and PM peak hours. In the 2023 With Action condition, there would be the potential for significant adverse traffic impacts under 2020 *City Environmental Quality Review (CEQR) Technical Manual* criteria at five intersections during the weekday AM peak hour, four intersections during the weekday midday peak hour, and eight intersections during the weekday PM peak hour, as summarized in **Table 11-1**.

Three of the impacted intersections could be fully mitigated with the implementation of standard traffic mitigation measures (e.g., signal timing changes and lane restripings) including the intersections of Metropolitan Avenue and Wythe Avenue; Broadway and Kent Avenue; and South 5th Street and Kent Avenue. However, the significant adverse impacts at six intersections— Metropolitan Avenue and Kent Avenue; Metropolitan Avenue and Bedford Avenue; South 6th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue.

	Sui	mmary of Sig	nificant Adverse	Traffic Impacts						
Inters	section NR SR Street	Weekday AM	Weekday Midday	Weekday PM						
EB-WB Street	ND-3D Street	Feak Houl	Feak Houl	Feak Houl						
Metropolitan Avenue	Kent Avenue	NB-TR	NB-TR	NB-TR						
Metropolitan Avenue Wythe Avenue		WB-LT	WB-LT	WB-LT						
metropolitari / wende	wythe / wende	SB-LTR	SB-LTR	SB-LTR						
Metropolitan Avenue	Bedford Avenue			EB-LT						
South 6th Street	Wythe Avenue			SB-TR						
South 5th Street	Kent Avenue	NB-TR		NB-TR						
Broadway	Kent Avenue	WB-R								
Broadway	Wythe Avenue			SB-LTR						
South 5th Street	Wythe Avenue		EB-TR	EB-TR						
South 6th Street	Kent Avenue	WB-TR	WB-TR	WB-TR						
Total Impacted Intersections/Lane Groups 5/6 4/5 8/9										
Notes: L = Left Turn, T = Through, R = Right Turn, EB = Eastbound, WB = Westbound, NB = Northbound,										

Table 11-1 Summary of Significant Adverse Traffic Impacts

SB = Southbound

As discussed in Chapter 5, "Transportation," weekday AM and PM peak hour bus line-haul conditions were evaluated for the B32 and B62 buses. The line-haul analyses showed that the Proposed Actions would result in an increase in bus ridership that would exceed current bus capacity by up to three passengers on the northbound B32 during the weekday AM peak period and an increase in bus ridership that would exceed current bus capacity by up to one passenger on the northbound B62 during the weekday PM peak period in the 2023 With Action condition. These exceedances would constitute significant adverse impacts under *CEQR Technical Manual* criteria. Increases in service frequency of one bus an hour for the northbound B32 during the weekday AM peak hour and the northbound B62 during the weekday PM peak hour would fully mitigate the projected bus line-haul impacts.

Transit

The general policy of New York City Transit (NYCT) is to provide additional bus service where demand warrants, taking into account financial and operational constraints.

## Pedestrians

As discussed in Chapter 5, "Transportation," pedestrian conditions were evaluated at seven sidewalks, eight corners, and three crosswalks for the weekday AM, midday, and PM peak hours. In the 2023 With Action condition, the Proposed Actions would result in significant adverse pedestrian impacts at one sidewalk during the weekday midday and PM peak hours. This sidewalk impact could be fully mitigated by relocating the existing tree pit to the south segment of the same sidewalk.

#### Summary

Measures to mitigate these potential significant adverse impacts are described below. The proposed traffic and pedestrian mitigation measures would be subject to approval by the New York City Department of Transportation (DOT) prior to implementation. If these measures are deemed infeasible by DOT and no alternative mitigation measures can be identified or if a recommended mitigation measure is not implemented, then the identified significant adverse traffic and/or pedestrian impacts would be unmitigated. The proposed traffic mitigation measures

entail signal timing changes and lane restripings—standard measures routinely implemented throughout the City and generally considered to be feasible. The mitigation for pedestrian conditions at the impacted sidewalk location consists of relocation of existing sidewalk obstructions (e.g., relocating existing tree pit); measures such as these are routinely implemented and are generally considered feasible. For the significant adverse bus line-haul impacts, reducing headways by increasing the number of buses for the impacted routes would mitigate the bus line-haul impacts; these measures are subject to NYCT's approval based on fiscal and operational constraints.

## **B. TRANSPORTATION**

## TRAFFIC

As discussed in Chapter 5, "Transportation," traffic conditions were evaluated at 13 intersections for the weekday AM, midday, and PM peak hours. The 2023 With Action condition analysis identified the potential for significant adverse traffic impacts at five intersections during the weekday AM peak hour, four intersections during the weekday midday peak hour, and eight intersections during the weekday PM peak hour. The potential significant adverse traffic impacts and their recommended mitigation measures are discussed below.

**Tables 11-2 to 11-4** itemize the recommended mitigation measures that address the identified impacts. With the implementation of these standard traffic mitigation measures (including signal timing changes and lane restripings), which are subject to review and approval by DOT, the significant adverse traffic impacts identified above could be fully mitigated for three intersections during the weekday AM peak hour, one intersection in the midday peak hour, and two intersections in the weekday PM peak hour. However, the significant adverse impacts at six intersections—Metropolitan Avenue and Kent Avenue; Metropolitan Avenue and Bedford Avenue; South 6th Street and Wythe Avenue; Broadway and Wythe Avenue; South 5th Street and Wythe Avenue; and South 6th Street and Kent Avenue—could not be mitigated.

## Table 11-2 Recommended Mitigation Measures Weekday AM Peak Hour

Intersection	No Action Signal Timing	Recommended Mitigation Measures	Recommended Signal Timing
Metropolitan Avenue and Kent Avenue	EB/WB: Green = 18 s NB: Green = 32 s	Unmitigated	No change from No Action
Metropolitan Avenue and Wythe Avenue	EB/WB: Green = 20 s SB: Green = 30 s	<ol> <li>Restripe the SB approach from one 5-foot Class II bike lane, one 11.5-foot shared left- turn/through/right-turn lane, and 7-foot curbside parking on both the east and west sides of the roadway to one 5-foot Class II bike lane, one 3.5 foot buffer, one 11-foot left- turn lane, and one 11-foot shared through/right-turn lane</li> <li>Change parking regulations on the east curb of SB approach to No Standing Anytime and on the west curb of SB approach to No Stopping Anytime.</li> <li>Shift three seconds of green time from the SB phase to the EB/WB phase.</li> </ol>	EB/WB: Green = 23 s SB: Green = 27 s
South 5th Street and Kent Avenue	EB: Green = 25 s NB: Green = 55 s	Shift three seconds of green time from the EB phase to the NB phase	EB: Green = 22 s NB: Green = 58 s
Broadway and Kent Avenue	NB: Green = 56 s EB/WB: Green = 24 s	Shift one second of green time from the NB phase to the EB/WB phase	NB: Green = 55 s EB/WB: Green = 25 s
South 6th Street and Kent Avenue	Unsignalized	Unmitigated	No change from No Action
Notes: EB = Eastbound; WB This table has been	= Westbound; NB = North updated for the FEIS.	bound; SB = Southbound	

## **Table 11-3**

# Recommended Mitigation Measures Weekday Midday Peak Hour

Intersection	No Action Signal Timing	Recommended Mitigation Measures	Recommended Signal Timing
Metropolitan Avenue and Kent Avenue	EB/WB: Green = 18 s NB: Green = 32 s	Unmitigated	No change from No Action
Metropolitan Avenue and Wythe Avenue	EB/WB: Green = 20 s SB: Green = 30 s	<ol> <li>Restripe the SB approach from one 5-foot Class II bike lane, one 11.5-foot shared left- turn/through/right-turn lane, and 7-foot curbside parking on both the east and west sides of the roadway to one 5-foot Class II bike lane, one 3.5 foot buffer, one 11-foot left-turn lane, and one 11- foot shared through/right-turn lane</li> <li>Change parking regulations on the east curb of SB approach to No Standing Anytime and on the west curb of SB approach to No Stopping Anytime.</li> <li>Shift three seconds of green time from SB phase to EB/WB phase</li> </ol>	EB/WB: Green = 23 s SB: Green = 27 s
South 5th Street and Wythe Avenue	Unsignalized	Unmitigated	No change from No Action
South 6th Street and Kent Avenue	Unsignalized	Unmitigated	No change from No Action
Notes: EB = Eastbound; WB This table has been	= Westbound; NB = No updated for the FEIS	orthbound; SB = Southbound	

## Table 11-4 Recommended Mitigation Measures Weekday PM Peak Hour

Intersection	No Action Signal Timing	Recommended Mitigation Measures	Recommended Signal Timing
Metropolitan Avenue and Kent Avenue	EB/WB: Green = 18 s NB: Green = 32 s	Unmitigated	No change from No Action
Metropolitan Avenue and Wythe Avenue	EB/WB: Green = 20 s SB: Green = 30 s	<ol> <li>Restripe the SB approach from one 5-foot Class II bike lane, one 11.5-foot shared left- turn/through/right-turn lane, and 7-foot curbside parking on both the east and west sides of the roadway to one 5-foot Class II bike lane, one 3.5 foot buffer, one 11-foot left-turn lane, and one 11- foot shared through/right-turn lane</li> <li>Change parking regulations on the east curb of SB approach to No Standing Anytime and on the west curb of SB approach to No Stopping Anytime.</li> <li>Shift two seconds of green time from SB phase to EB/WB phase</li> </ol>	EB/WB: Green = 22 s SB: Green = 28 s
Metropolitan Avenue and Bedford Avenue	EB/WB: Green = 25 s NB: Green = 25 s	Unmitigated	No change from No Action
South 6th Street and Wythe Avenue	WB: Green = 31 s SB: Green = 49 s	Unmitigated	No change from No Action
South 5th Street and Kent Avenue	EB: Green = 25 s NB: Green = 55 s	Shift one second of green time from the EB phase to the NB phase	EB: Green = 24 s NB: Green = 56 s
Broadway and Wythe Avenue	EB/WB: Green = 31 s SB: Green = 49 s	Unmitigated	No change from No Action
South 5th Street and Wythe Avenue	Unsignalized	Unmitigated	No change from No Action
South 6th Street and Kent Avenue	Unsignalized	Unmitigated	No change from No Action
Notes: EB = Eastbound; WB This table has been	= Westbound; NB = No updated for the FEIS.	rthbound; SB = Southbound	

**Tables 11-5 to 11-10** compare the levels of service (LOS) and lane group delays for the impacted intersections under the 2023 No Action, With Action, and Mitigation conditions for the three analysis peak hours.

# Table 11-5 2023 No Action, With Action, and Mitigation Conditions Level of Service Analysis Weekday AM Peak Hour—Signalized Intersections

Weekday AM												
		No Ac	tion			With A	ction			Mitigat	ion	
	Lane	v/c	Delay		Lane	v/c	Delay		Lane	v/c	Delay	
Intersection	Group	Ratio	(sec)	LOS	Group	Ratio	(sec)	LOS	Group	Ratio	(sec)	LOS
			Metr	ropolit	an Avenu	e and K	ent Ave	nue				
Eastbound	LT	0.08	15.4	В	LT	0.08	15.4	В				
Westbound	TR	0.48	17.4	В	TR	0.63	18.3	В				
Northbound	L	0.01	6.6	Α	( L '	0.02	6.7	Α	Į	Unmitiga	ated	
	TR	1.12	87.1	F	TR	1.17	105.7	F+				
	Interse	ection	72.1	E	Interse	ection	83.3	F				
			Metre	opolita	n Avenue	and W	ythe Ave	enue				
Eastbound	TR	0.56	12.0	В	TR	0.58	11.2	В	TR	0.51	8.6	A
Westbound	LT	1.04	84.3	F	LT	1.28	167.3	F+	LT	1.07	82.4	F
Southbound	LTR	1.05	66.3	E	LTR	1.09	78.9	E+	L	0.24	11.3	В
1 1									TR	0.77	22.7	С
	Interse	ection	59.2	E	Interse	ection	90.6	F	Interse	ection	36.0	D
			S	outh 51	th Street :	and Ken	nt Avenu	e				
Eastbound	LT	0.09	24.5	С	LT '	0.09	24.5	С	LT	0.11	26.9	С
Northbound	TR	1.10	71.2	E	TR	1.18	101.2	F+	TR	1.12	74.0	E
	Interse	ection	69.2	E	Interse	ection	98.1	F	Interse	ection	72.1	E
				Broa	dway and	Kent A	venue					
Eastbound	LR	0.00	0.0	A	LR	0.00	0.0	A	LR	0.00	0.0	A
Westbound	R	0.98	82.4	F	R	1.02	92.7	F+	R	0.97	80.6	F
Northbound	L	0.01	6.5	А	( L '	0.01	6.5	Α	L	0.01	6.9	Α
1 1	TR	0.85	24.0	С	TR	0.93	34.1	С	TR	0.95	37.8	D
	С	Interse	ection	48.7	D	Interse	ection	48.4	D			
Notes:												
L = Left Turn, T :	= Through	n, R = Ri	ght Turn	, LOS =	= Level of	Service						
+ Denotes a sigr	nificant ad	lverse tra	affic impa	act.								
This table has t	been upd	ated for	the FEI	S.								

#### **Table 11-6**

2023 No Action, With Action and Mitigation Conditions Level of Service Analysis Weekday AM Peak Hour—Unsignalized Intersections

						Weekda	ay AM						
Interportion		No Ac	tion			With Action				Mitigation			
intersection	Lane	v/c	Delay		Lane	v/c	Delay		Lane	v/c	Delay		
	Group	Ratio	(sec)	LOS	Group	Ratio	(sec)	LOS	Group	Ratio	(sec)	LOS	
South 6th Street and Kent Avenue													
Eastbound	L	0.13	48.1	Е	L	0.28	112.7	F	Unmitigated				
Westbound	TR	0.35	25.1	D	TR	0.56	40.7	E+					
Northbound	L	0.01	7.5	Α	L	0.01	7.5	Α					
	Т	0.50	0.0	Α	Т	0.53	0.0	Α					
Notes:													
L = Left Turn, T =	L = Left Turn, T = Through, R = Right Turn, LOS = Level of Service												
+ Denotes a sign	+ Denotes a significant adverse traffic impact.												

## **Table 11-7**

## 2023 No Action, With Action and Mitigation Conditions Level of Service Analysis Weekday Midday Peak Hour—Signalized Intersections

		Weekday Midday											
		No Ac	tion			With A	ction			Mitiga	tion		
	Lane	v/c	Delay		Lane	v/c	Delay		Lane	v/c	Delay		
Intersection	Group	Ratio	(sec)	LOS	Group	Ratio	(sec)	LOS	Group	Ratio	(sec)	LOS	
Metropolitan Avenue and Kent Avenue													
Eastbound	LT	0.06	15.3	В	LT	0.08	15.4	В					
Westbound	TR	0.63	21.4	С	TR	0.70	21.2	С					
Northbound	L	0.01	6.6	Α	L	0.02	6.7	Α		Unmitig	gated		
	TR	1.13	92.5	F	TR	1.18	112.5	F+	- 3				
	Interse	ection	75.0	E	Interse	ection	88.2	F					
			Metro	politar	N Avenue	and Wy	the Aver	nue					
Eastbound	TR	0.63	10.8	В	TR	0.68	11.7	В	TR	0.59	10.2	Α	
Westbound	LT	1.11	109.2	F	LT	1.29	176.7	F+	LT	1.07	86.9	F	
Southbound	LTR	1.01	54.3	D	LTR	1.05	68.1	E+	L	0.24	11.3	В	
									TR	0.75	21.5	С	
	Interse	ection	58.6	E	Intersection 84.6 F			Interse	ection	35.8	D		
Notes:													
L = Left Turn, T = Through, R = Right Turn, LOS = Level of Service													
+ Denotes a sign	nificant ad	verse tra	affic impa	ct.									

This table has been updated for the FEIS.

## **Table 11-8**

## 2023 No Action, With Action and Mitigation Conditions Level of Service Analysis Weekday Midday Peak Hour—Unsignalized Intersections

						Weekday	/ Midday							
		No A	ction			With A	Action			Mitig	ation			
	Lane	v/c	Delay		Lane	v/c	Delay		Lane					
Intersection	Group	Ratio	(sec)	LOS	Group	Ratio	(sec)	LOS	Group	Ratio	(sec)	LOS		
South 5th Street and Wythe Avenue														
Eastbound	nd TR 0.34 19.8 C TR 0.60 35.6 E+								inatad					
Southbound	LT	0.04	1.3	Α	LT	0.06	1.6	Α	Unmitigated					
			S	outh 6	th Stree	t and Ke	nt Avenue							
Eastbound	L	0.07	48.8	Е	L	0.13	92.4	F						
Westbound	TR	0.38	25.9	D	TR	0.61	39.4	E+		Llomit	igotod	]		
Northbound	L	0.00	7.6	Α	L	0.00	7.6	Α		Unnin	igaleu	]		
	Т	0.32	0.0	Α	Т	0.33	0.0	Α						
Notes:	Notes:													
L = Left Turn, T = Through, R = Right Turn, LOS = Level of Service														
· Demeters a st			A	-										

+ Denotes a significant adverse traffic impact.

## **Table 11-9** 2023 No Action, With Action and Mitigation Conditions Level of Service Analysis Weekday PM Peak Hour—Signalized Intersections

	Weekday PM												
		No Act	ion			With	Action			Mitig	ation		
	Lane	v/c	Delay		Lane	v/c	Delay		Lane	v/c	Delay		
Intersection	Group	Ratio	(sec)	LOS	Group	Ratio	(sec)	LOS	Group	Ratio	(sec)	LOS	
		1	Metrop	olitan	Avenue a	and Ken	t Avenue						
Eastbound	LT	0.05	15.1	В	LT	0.08	15.4	В					
Westbound	TR	0.38	17.3	В	TR	0.41	17.2	В					
Northbound	L	0.01	6.6	A	L	0.02	6.6	A		Unmi	tigated		
	IR	1.34	1//.6	F	IR	1.37	189.2	++					
	Interse	ection	153.6	F	Interse	ection	159.4	F					
Metropolitan Avenue and Wythe Avenue													
Eastbound	TR	0.72	10.7	В	TR	0.76	12.1	В	TR 0.69 10.6			В	
Westbound	LT	1.21	145.2	F	LT	1.38	216.2	F+	LT	1.19	131.6	F	
Southbound	LTR	1.03	60.1	E	LTR	1.09	79.8	E+	L	0.26	10.9	В	
			1	1				1	TR	0.73	19.1	В	
	Interse	ection	66.9	E	Interse	ection	94.1	F	Intersection 42.4				
			Metropo	itan A	venue an	d Bedfo	ord Avenue						
Eastbound	LT	0.98	45.8	D	LT	1.07	68.3	E+					
Westbound	TR	0.70	21.5	С	TR	0.74	23.2	С	Unmitigated				
Northbound	LTR	1.04	71.4	E	LTR	1.04	71.4	E	Onniugated				
	Interse	ection	48.0	D	Interse	ection	55.6	E					
			Sout	h 5th S	Street and	d Kent A	Avenue						
Eastbound	LT	0.12	24.7	С	LT	0.12	24.7	С	LT	0.12	25.5	С	
Northbound	TR	0.90	23.7	С	TR	1.03	48.8	D	TR	1.01	35.9	D	
	Interse	ection	23.7	С	Interse	ection	47.3	D	Inter	section	35.3	D	
			South	6th S	treet and	Wythe	Avenue						
Westbound	LT	0.29	22.9	С	LT	0.38	24.4	С					
Southbound	TR	1.07	74.7	E	TR	1.19	119.2	F+		Unmi	tigated		
	Interse	ection	65.8	E	Interse	ection	100.5	F			0		
			Br	oadwa	y and Wy	the Ave	enue						
Eastbound	TR	0.34	24.1	С	LT	0.35	24.3	С					
Westbound	L	0.51	14.7	В	L	0.51	14.9	В					
	Т	0.37	12.6	В	Т	0.38	12.7	В		Unmi	tigated		
Southbound	LTR	1.11	54.6	D	LTR	1.25	119.9	F+	2g				
	Interse	ection	39.3	D	Interse	ection	80.6	F					
Notes:													
L = Left Turn, T = T	hrough, R	= Right Tu	rn, LOS =	Level	of Service								
+ Denotes a signific	ant advers	e traffic in	npact.										
This table has bee	n updated	for the F	EIS.										

	,											•
			W	eekd	ay PM	Peak	Hour-	-Uns	signaliz	zed In	tersec	tions
						Weekda	ay PM					
		No Ac	tion		With Action				Mitigation			
Intersection	Lane Group	v/c Ratio	Delay (sec)	LOS	Lane Group	v/c Ratio	Delay (sec)	LOS	Lane Group	v/c Ratio	Delay (sec)	LOS
South 5th Street and Wythe Avenue												
Eastbound	TR	0.58	35.6	E	TR	0.81	55.5	F+	Unmitigated			
Southbound	LT	0.06	1.5	Α	LT	0.06	1.5	Α				
			S	outh 6t	h Street a	nd Kent	Avenue					
Eastbound	L	0.22	82.6	F	L	0.74	418.9	F				
Westbound	TR	0.51	32.5	D	TR	0.82	63.6	F+		Unmitid	hotod	
Northbound	L	0.00	0.0	Α	L	0.00	0.0	Α		Ommu	Jaleu	
	Т	0.41	0.0	Α	Т	0.42	0.0	Α				
Notes:												
L = Left Turn, T =	Through,	R = Righ	t Turn, LO	DS = Le	vel of Serv	vice						
+ Denotes a signi	ficant adve	erse traffi	c impact.									

## Table 11-10 2023 No Action, With Action and Mitigation Conditions Level of Service Analysis Weekday PM Peak Hour—Unsignalized Intersections

Metropolitan Avenue and Kent Avenue

The significant adverse impacts at the northbound through/right-turn of this intersection during the weekday AM, midday and PM peak hours could not be mitigated.

## Metropolitan Avenue and Wythe Avenue

The significant adverse impacts at the southbound approach of this intersection during the weekday AM, midday, and PM peak hours could be fully mitigated by restriping the approach from one 5-foot Class II bike lane, one 11.5-foot shared left-turn/through/right-turn lane, and 7foot curbside parking on both the east and west sides of the roadway to one 11-foot left-turn lane, one 11-foot through/right-turn lane, one 5-foot Class II bike lane, and a 3.5-foot buffer; and by changing the parking regulation on the east curb of the southbound approach to "No Standing Anytime" and on the west curb of the southbound approach to "No Stopping Anytime." The parking regulation change would eliminate approximately seven parking spaces on the west side and five parking spaces on the east side for a total of 12 on-street parking spaces at the Wythe Avenue southbound approach. Additionally, the parking regulation along the south side of the Metropolitan Avenue (eastbound receiving lane) would be changed to "No Standing Anytime" for approximately 30 feet to accommodate turning vehicles from the southbound exclusive left-turn lane. This parking regulation change would eliminate an additional two on-street parking spaces. The significant adverse impact at the westbound approach of this intersection during the weekday AM and midday peak hours could be fully mitigated by shifting one second three seconds of green time from the southbound phase to the eastbound/westbound phase. The significant adverse impact at the westbound approach of this intersection during the weekday PM peak hour could be fully mitigated by shifting two seconds of green time from the southbound phase to the eastbound/westbound phase.

## Metropolitan Avenue and Bedford Avenue

The significant adverse impact at the eastbound approach of this intersection during the weekday PM peak hour could not be mitigated.

## South 6th Street and Wythe Avenue

The significant adverse impact at the southbound approach of this intersection during the weekday PM peak hour could not be mitigated.

#### 307 Kent Avenue

#### South 5th Street and Kent Avenue

The significant adverse impact at the northbound approach of this intersection during the weekday AM peak hour could be fully mitigated by shifting three seconds of green time from the eastbound phase to the northbound phase. The significant adverse impact at the northbound approach of this intersection during the weekday PM peak hour could be fully mitigated by shifting one second of green time from the eastbound phase to the northbound phase.

#### Broadway and Kent Avenue

The significant adverse impact at the westbound approach of this intersection during the weekday AM peak hour could be fully mitigated by shifting one second of green time from the northbound phase to the eastbound/westbound phase.

#### Broadway and Wythe Avenue

The significant adverse impact at the southbound approach of this intersection during the weekday PM peak hours could not be mitigated.

#### South 5th Street and Wythe Avenue

The significant adverse impacts at the eastbound approach of this intersection during the weekday midday and PM peak hours could not be fully mitigated.

#### South 6th Street and Kent Avenue

The significant adverse impact at the westbound approach of this intersection during the weekday AM, midday, and PM peak hours could not be mitigated.

## EFFECTS OF TRAFFIC MITIGATION ON PEDESTRIAN OPERATIONS

As described above, intersection operations would improve overall with the implementation of the recommended traffic mitigation measures, which include changes to existing signal timings and lane restripings. As the traffic analysis locations do not overlap with the pedestrian analysis locations, the above traffic mitigation measures would not alter the conclusions made for the pedestrian impact analysis nor would they result in the potential for any additional significant adverse pedestrian impacts.

## EFFECTS OF TRAFFIC MITIGATION ON PARKING

As described above, the parking regulation change mitigation measure recommended at the intersection of Metropolitan Avenue and Wythe Avenue would eliminate approximately 12 onstreet parking spaces at the Wythe Avenue southbound approach and two on-street parking spaces along the south side of Metropolitan Avenue (eastbound receiving lane) for a total of 14 on-street parking spaces. As described in Chapter 5, "Transportation," on-street parking in the area was observed to be generally at or near full utilization in the study area during the weekday daytime hours. For the purpose of this study, it is assumed the displaced on-street parking space demand would be accommodated by the available off-street parking spaces in the approximate <sup>1</sup>/<sub>4</sub>-mile off-street parking study area. Accounting for these 14 displaced on-street parking spaces, the 2023 With Action public off-street parking utilization is expected to increase to a maximum of 85 percent during the weekday midday peak period. Therefore, the displacement of on-street parking spaces due to the recommended mitigation measure would not result in a parking shortfall and the Proposed Actions would not result in a significant adverse parking impact.

**Table 11-11** 

## MITIGATION IMPLEMENTATION

Subject to the approvals of DOT, the above recommended mitigation measures would be implemented to mitigate the projected significant adverse traffic impacts at the completion of the Proposed Actions in 2023.

## TRANSIT

## BUS LINE-HAUL

The bus-line haul analyses showed that the Proposed Actions would result in significant adverse impacts on the northbound B32 during the weekday AM peak period and on the northbound B62 during the weekday PM peak period in the 2023 With Action condition.

**Table 11-11** provides a comparison of existing service and the number of buses required to fully mitigate the identified significant adverse line-haul impacts along the B32 and B62 bus routes. While NYCT routinely monitors changes in bus ridership and would make the necessary service adjustments where warranted, these service adjustments are subject to NYCT's fiscal and operational constraints and, if implemented, would occur over time.

	2023 Mitigated With Action Condition Bus Line-haul Analysis											
Route Direction	Bus Capacity	Existing Service (Buses/hr)	No Action (Passengers/Bus)	With Action (Passengers/ Bus)	Number of Additional Buses Needed for Mitigation	Mitigated (Passenger/ Bus)						
			AM Peak H	our								
B32 Northbound	54	3	37	57	1	42						
	PM Peak Hour											
B62 Northbound 54 5 44 56 1 46												
Note: The B32 ar	Note: The B32 and B62 routes operate standard buses with a guideline capacity of 54 passengers per bus.											

## PEDESTRIANS

As discussed in Chapter 5, "Transportation," pedestrian conditions were evaluated at seven sidewalks, eight corners, and three crosswalks for the weekday AM, midday, and PM peak hours. In the 2023 With Action condition, the Proposed Actions would result in significant adverse pedestrian impacts at the north segment of the East Sidewalk along Kent Avenue between South 3rd Street and South 2nd Street during the weekday midday and PM peak hours.

As summarized in **Table 11-12**, the significant adverse pedestrian impacts at the Kent Avenue East Sidewalk north segment could be fully mitigated by relocating the existing tree pit to the south segment of same sidewalk where Project Development Site 1 is planned to include a five-foot wide setback. The south segment of the East Sidewalk along Kent Avenue between South 3rd Street and South 2nd Street was not significantly adversely impacted in the pedestrian analysis, however, it is included in **Table 11-12** to demonstrate the feasibility of relocating the existing tree pit from the north segment of the sidewalk to the south segment to mitigate the sidewalk impact at the north segment. The proposed pedestrian mitigation measures would be subject to approval prior to implementation by DOT. Tree relocations/removals would additionally be subject to a permit application process for review by the New York City Department of Parks and Recreation (NYC Parks) with the appropriate restitution, if deemed warranted, made in compliance with Chapter 5 of Title 56 of the Rules of New York (NYC Park Rules) and Local Law 3 of 2010.

## **Table 11-12** 2023 No Action, With Action, and Mitigation Conditions Pedestrian Level of Service Analysis

		2023		2023	3	202	23	
		No Acti	on	With Ac	tion	Mitiga	ation	
Location	Mitigation Measures	SFP	LOS	SFP	LOS	SFP	LOS	
	Weekday Midday Peal	k Hour						
East Sidewalk along Kent Avenue between South 3rd Street and South 2nd Street – North Segment	Move existing tree pit to the south segment of the sidewalk where Project Development Site 1 plans to include a 5-foot wide setback	47.9	с	25.7	D	35.4	D	
East Sidewalk along Kent Avenue between South 3rd Street and South 2nd Street – South Segment*	N/A	64.5	с	74.5	с	66.0	с	
	Weekday PM Peak	lour						
East Sidewalk along Kent Avenue between South 3rd Street and South 2nd Street – North Segment	Move existing tree pit to the south segment of the sidewalk where Project Development Site 1 plans to include a 5-foot wide setback	46.2	с	30.2	D	41.3	С	
East Sidewalk along Kent Avenue between South 3rd Street and South 2nd Street – South Segment*	N/A	62.3	с	84.2	с	74.7	с	
<ul> <li>Note: SFP = square feet per pedestrian; LOS = Level of Service</li> <li>*The south segment of the East Sidewalk along Kent Avenue between South 3rd Street and South 2nd Street was not significantly adversely impacted in the pedestrian analysis, but is included in this table to demonstrate the</li> </ul>								

feasibility of relocating the existing tree pit from the north segment of the sidewalk to the south segment to mitigate the sidewalk impact at the north segment.