Chapter 21: Alternatives

A. INTRODUCTION

OVERVIEW

In accordance with the State Environmental Quality Review Act (SEQRA) and City Environmental Quality Review (CEQR), this chapter presents and analyzes alternatives to the proposed action. Under SEQRA and CEQR, alternatives selected for consideration in an Environmental Impact Statement (EIS) are generally those that have the potential to reduce, eliminate, or avoid adverse impacts of a proposed action while meeting some or all of the goals and objectives of the action. In addition to a comparative impact analysis, the alternatives are assessed to determine to what extent they substantively meet the goals and objectives of the proposed action.

This chapter analyzes a range of alternatives to the proposed action. Four alternatives are considered: the No Action Alternative, in which the project site and the rezoning area would remain in their current condition; an existing zoning alternative, which was considered by the designated developer but found to be infeasible; and two alternatives to reduce or eliminate significant impacts identified in the technical analyses.

For the alternatives that offer a reasonable and practicable alternative to the proposed action, the anticipated effects of the proposed action for each of the technical analyses presented in the EIS are compared to those that would result from each of the alternatives. The purpose of this analysis, as set forth in the *CEQR Technical Manual*, is to provide the decision-makers with the opportunity to consider practicable alternatives that are consistent with the project's purpose and that could potentially reduce or eliminate significant adverse environmental impacts identified in the EIS.

B. NO ACTION ALTERNATIVE

Consideration of the No Action Alternative, mandated by both SEQRA and CEQR, is intended to provide the lead and involved agencies with an assessment of the consequences of not selecting the proposed action. This alternative is analyzed as the future without the proposed action in each of the technical areas of the EIS, Chapters 2 through 19. The No Action Alternative assumes that no discretionary actions would be taken—specifically, that there would be no disposition of interests in City-owned property to the designated developer and that no amendments to the zoning map would be adopted.

The No Action Alternative would not involve any major changes to the rezoning area, and the proposed Flushing Commons development would not be implemented. The disposition of the remainder of Lot 25 for the development of affordable housing by the Macedonia African Methodist Episcopal (AME) Church would not occur in the No Action Alternative. The No Action Alternative would not result in new high-quality development on this large parcel of

City-owned land in Downtown Flushing. The No Action Alternative would not create new employment and residential opportunities and generate economic and fiscal benefits to the City in the form of economic activity, tax revenue, and community benefits, including approximately 98,000 square feet of community facility space and a 1.5-acre town square-style public open space, an amenity that is notably absent in this densest portion of Downtown Flushing.

The No Action Alternative would not respond to the City's land use strategy for the site, as reflected in the "Development Framework for Downtown Flushing," May 2004. The Development Framework considers opportunities for high-quality mixed-use development, improved connections with adjacent regional destinations, enhancements to public open spaces and streetscapes, and transportation and parking strategies. That document proposes the development of Municipal Lot 1 as a way to reconnect and renew downtown. Thus, the No Action Alternative would not meet the Development Framework's five stated goals for the site:

- Create a town square-style public open space that will be a center of community activity.
- Enhance the pedestrian environment with street-level retail to attract shoppers east of Main Street.
- Help meet housing demand and stabilize the retail market by establishing a new residential community in Downtown Flushing.
- Maintain competitively priced parking on-site.
- Serve as a clear example of high-quality design and construction that will raise the standard for private investment in Downtown Flushing.

LAND USE, ZONING, AND PUBLIC POLICY

In the No Action Alternative, the Flushing Commons project site would continue to operate as Municipal Lot 1, the northeastern corner of Lot 25 would continue to be occupied by Municipal Lot 1, and Lot 46 would continue to be occupied by the Macedonia AME Church. No new residential, commercial, community facility, hotel, or open space uses would be introduced in the rezoning area. Unlike the proposed action, this alternative would not enhance the quality and diversity of Downtown Flushing and more firmly establish Downtown Flushing as an important commercial and residential center in New York City. In the No Action Alternative, Municipal Lot 1 would continue to provide a well-utilized large surface public parking lot, which has been serving Downtown Flushing since the 1960s. Overall, neither the No Action Alternative nor the proposed action's development would result in significant adverse impacts to the area's land use, zoning, and public policy.

SOCIOECONOMIC CONDITIONS

Like the proposed action, the No Action Alternative would not result in either direct or indirect commercial and residential displacement, and would not have any adverse effects on specific industries. However, unlike the proposed action, the No Action Alternative would not provide housing, commercial, and community facility space in the study area and would not be consistent with existing trends in this area of Queens. The socioeconomic benefits of the proposed action would not be realized with the No Action Alternative.

COMMUNITY FACILITIES AND SERVICES

Like the proposed action, the No Action Alternative would not directly displace police, fire, public education, public child care, or health care facilities. In the No Action Alternative, background growth and new development near the study area would generate new demand for public schools, libraries, child care centers, and health care facilities. Similar to conditions with the proposed action, there would be adequate capacity at public elementary and intermediate schools, libraries, and health care facilities to support this growth in the No Action Alternative. Therefore, the No Action Alternative, like the proposed action, would not result in significant adverse impacts on these community facilities. In the No Action Alternative, like the proposed action, the study area would operate above capacity, with a shortage in publicly-funded child care and Head Start slots.

OPEN SPACE

While the No Action Alternative would not introduce new residents and workers to the open space study area, it would also not result in the proposed action's creation of 1.5 acres of new passive open space—an amenity that is notably absent in this densest portion of Downtown Flushing. On balance, the open space ratios would generally be lower for the No Action Alternative (see Table 21-1) than with the proposed action. The No Action Alternative would not result in any significant adverse effects on open space in the study area; in comparison, the decline in the active open space ratio in the under the proposed action would constitute a significant adverse impact on active open spaces.

Table 21-1 No Action Alternative, Adequacy of Open Space Resources Compared with the Proposed Action

Ratio	City Guideline Ratio ¹	No Action Ratio ¹	Proposed Action Ratio ¹	Percent Change
Commercial Study Area				
Passive/non-residents	0.15	0.258	0.320	24.07
Passive/total population	weighted ²	0.102	0.130	27.73
Residential Study Area				
Total/residents	2.50	0.141	0.160	13.51
Active/residents	2.00	0.071	0.069	-2.82
Passive/residents	0.50	0.070	0.092	30.40
Passive/total population	weighted ²	0.050	0.065	28.57

Notes:

1. Ratios in acres per 1,000 people.

SHADOWS

Without new buildings on the Flushing Commons project site, the No Action Alternative would not result in significant new shadows on sun-sensitive receptors. Therefore, the No Action Alternative would not cast new shadows on the arched windows of the Macedonia AME Church,

^{2.} Weighted average combining 0.15 acres per 1,000 workers and 0.50 acres per 1,000 residents is different in each condition. In commercial study area: existing conditions, 0.37; future without the proposed action, 0.36; future with the proposed action, 0.36. In residential study area: 0.40 for existing and future without the proposed action and 0.39 in the future without the proposed action.

whereas the proposed action would result in significant adverse impacts on this sun-sensitive receptor.

HISTORIC RESOURCES

In the No Action Alternative, the rezoning area is expected to remain in its current use. Therefore, the potential archaeological resources in the rezoning area would remain undisturbed. In addition, since no development would occur on the Flushing Commons project site or on the remainder of Lot 25, this alternative would not have any potential effects on the Macedonia AME Church or other historic resources in the surrounding area. No significant adverse impacts on archaeological or architectural resources would occur with the No Action Alternative.

URBAN DESIGN AND VISUAL RESOURCES

In the No Action Alternative, the Flushing Commons project site would remain in its current condition as a municipal parking lot and the remainder of the rezoning area would continue to be occupied by the Macedonia AME Church and municipal parking. Therefore, the general visual character of the rezoning area would remain unchanged, and would be sharply different from the proposed action. Unlike the No Action Alternative, the proposed Flushing Commons project is expected to enhance the vitality of the surrounding streets by introducing active retail and commercial uses, and the proposed open plaza and green spaces would further improve the streetscape of the study area and provide a visual break in the density of the area. Overall, neither the No Action Alternative, nor the proposed action, would have any significant adverse impacts on the urban design and visual character of the surrounding area.

NEIGHBORHOOD CHARACTER

Unlike the proposed action, the No Action Alternative would not result in a major change in land use in the rezoning area, a change considered to be complementary to the area, as it would create a mixed-use development that would bring new residents, workers, and visitors to the area as well as serve the existing Downtown Flushing community. The No Action Alternative would not bring additional housing to an established residential neighborhood or promote the area's role as a regional center of retail and commerce. The No Action Alternative would not provide approximately 1.5 acres of new passive open space on the site—an amenity that is notably absent in Downtown Flushing.

Therefore, the No Action Alternative would not result in the benefits to neighborhood character that would be achieved with the proposed action. Overall, the No Action Alternative, like the proposed action, would not result in significant adverse impacts to neighborhood character.

HAZARDOUS MATERIALS

Potential hazardous materials would not be disturbed in the No Action Alternative (because there would be no major construction). Therefore, the No Action Alternative, like the proposed action, would have no significant adverse environmental impacts from exposure to hazardous materials.

INFRASTRUCTURE

The No Action Alternative would not generate additional demand from the rezoning area for City water supply and sewer services. The Tallman Island Water Pollution Control Plant (WPCP) would have available capacity to treat the increased sewage generated by both the No Action Alternative and the proposed action. Stormwater in the No Action Alternative would flow into the existing combined sewers in the surrounding area. As with the proposed action, the No Action Alternative's additional demand on infrastructure services would not affect the City's water supply or local water pressure, or result in infrastructure impacts on the City's sewer system. Therefore, the No Action Alternative, like the proposed action, would not result in significant adverse infrastructure impacts.

SOLID WASTE AND SANITATION

In the No Action Alternative, the volume of solid waste generated from the rezoning area would not change, and no major changes in the City's solid waste management handling practices are expected. With this alternative, the proposed action's increase in solid waste would not occur. The No Action Alternative, like the proposed action, would not result in any significant adverse impacts on the solid waste handling and disposal systems that serve New York City.

ENERGY

No new energy demands from the rezoning area would be created with the No Action Alternative. Therefore, the No Action Alternative, like the proposed action, would not result in significant adverse impacts on energy systems.

TRAFFIC AND PARKING

Although this alternative would not generate any new traffic trips, traffic volumes in the study area are expected to increase as a result of other planned development in the study area and general growth in the City. Significant adverse traffic impacts at 17 intersections during the weekday AM peak hour, 14 intersections during the weekday midday peak hour, 20 intersections during the weekday PM peak hour, and 21 intersections during the Saturday midday peak hour that would result from the proposed action would not occur with this alternative, thus eliminating the need for mitigation associated with the proposed action. Unlike the proposed action, the No Action Alternative would not result in significant adverse unmitigated traffic impacts at 13 intersections during the weekday AM peak hour, 11 intersections during the weekday midday peak hour, 13 intersections during the weekday PM peak hour, and 14 intersections during the Saturday midday peak hour. As with the proposed action, no impacts to parking are anticipated with this alternative.

TRANSIT AND PEDESTRIANS

Although this alternative would not generate any new transit and pedestrian trips, volumes in the study area would be expected to increase as a result of other planned development in the study area and general growth in the City. Neither the No Action Alternative nor the proposed action would result in any significant adverse impacts at the Flushing-Main Street subway station. Significant adverse bus impacts on the local buses, including the Q17, Q27, Q44/20, and Q48, that would result from the proposed action would not occur with this alternative. Similarly, significant adverse impacts from the proposed action at five crosswalks, three corners, and two sidewalks during the weekday midday peak hour, three crosswalks, three corners, and two sidewalks during the weekday PM peak hour, and three crosswalks, three corners, and two sidewalks, during the Saturday midday peak hour would not occur with the No Action Alternative, thus eliminating the need for mitigation associated with the proposed action. Unlike

the proposed action, the No Action Alternative would not result in significant adverse unmitigated pedestrian impacts at three corners and one sidewalk during each of the weekday midday, weekday PM, and Saturday midday peak hours.

AIR QUALITY

The No Action Alternative would not result in any new growth or development in the rezoning area, and thus HVAC and industrial source emissions in the No Action Alternative would be similar to existing conditions. Emissions from mobile sources in the study area are expected to increase as a result of planned development in the study area and general growth in the City. Like the proposed action, the No Action Alternative would not have a significant adverse impact on air quality, either from mobile, stationary, or industrial sources of pollution. No violations of the National Ambient Air Quality Standards (NAAQS) for emissions of NO_x, CO, PM₁₀, and SO₂, and no significant impacts due to PM_{2.5} emissions are predicted to occur either in the No Action Alternative or with the proposed action. Likewise, both the No Action Alternative and the proposed action would be consistent with the New York State Implementation Plan (SIP).

NOISE

Like the proposed action, no significant adverse noise impacts would occur at the six noise receptor locations surrounding the rezoning area with the No Action Alternative. In addition, neither the No Action Alternative nor the proposed action would result in any significant adverse noise impacts from building mechanical systems and any backup power generation equipment.

CONSTRUCTION IMPACTS

No construction would occur in the rezoning area with the No Action Alternative. The construction activities associated with the proposed action, including economic benefits, would not occur in this alternative. The economic effects of major construction projects are typically estimated based on direct benefits—the value of site improvements as measured by construction-related labor, materials and services, and indirect benefits—expenditures made by suppliers, construction workers, and other employees involved in the direct activity.

PUBLIC HEALTH

Neither the No Action Alternative nor the proposed action would result in significant adverse impacts to public health. With either the No Action Alternative or the proposed action, no air quality impacts from increased vehicular traffic or emissions from stationary sources would result. Neither the No Action Alternative nor the proposed action would create a new source of noise or odors, and neither would result in significant adverse hazardous materials impacts.

C. EXISTING ZONING ALTERNATIVE

During the initial planning process, an alternative was considered to develop the Flushing Commons project under the existing C4-3 zoning district currently mapped for the rezoning area. The existing C4-3 district allows a floor area ratio (FAR) of 3.4 for commercial uses, 4.8 for community facility uses, and 2.43 for residential uses. There are accessory parking requirements for C4-3 districts specific to various uses. Parking must be provided for 70 percent of the new residential dwelling units. Such commercial uses as restaurant, retail, and office uses require one parking space for every 400 square feet of floor area. Other commercial uses, such

as hotels, require one parking space for every 12 rooms and one space for every 25 people. Community facilities require one parking space for every 20 people.

The proposed C4-4 district has lower parking requirements than the existing C4-3 district. The proposed rezoning from C4-3 to C4-4 would reduce the residential parking requirement from 70 percent of units to 50 percent. The commercial parking requirement for restaurant, retail, and office uses would be reduced from one space per 400 square feet under C4-3 to one space per 1,000 square feet under C4-4. There would be no parking requirement for community facility uses under C4-4, compared with one space per 20 people under the existing C4-3 zoning. The commercial parking requirement for possible hotel uses would remain the same.

As described in Chapter 1, "Project Description," the Flushing Commons project has been proposed in response to a request for proposals (RFP) issued by the New York City Economic Development Corporation (NYCEDC) to encourage new high-quality development on this large parcel of City-owned land in Downtown Flushing. The RFP set forth several development controls and minimum land use requirements for the site, including a minimum 1 acre of public open space; a significant market-rate residential component; street-level retail, in which each storefront must have its own street-level entrance and be accessible for pedestrians at street level from the sidewalk or public space; and, at minimum, the provision of 750 short-term public parking spaces and 75 permit parking spaces. In addition, the RFP noted that the majority of the parking must be accommodated underground, but a small number of spaces could be permitted above ground provided the structures have sensitive design and do not adversely affect the streetwall or pedestrian experience; and that the inclusion of a cultural or community facility in this development is recommended, but not required.

Based on the parking requirements of the existing C4-3 district, the Flushing Commons project would require a total of 2,380 parking spaces—1,555 accessory parking spaces required by zoning and 825 public parking spaces required by the RFP. This would result in approximately 780 more spaces than that of the proposed action. To accommodate all of this parking below grade, five levels would have to be constructed, whereas parking for the Flushing Commons project under the proposed C4-4 parking requirements would be accommodated in three belowgrade levels.

Construction of the additional two levels below grade, for a total of five levels, is not feasible because of several site constraints. Due to the level of groundwater at the site, the fifth level of parking (P5) would be located approximately 6 feet below the water table, and building foundations would be as much as 12 feet below the water table. Dewatering would be required, and operating a dewatering system across the entire site (approximately 5 acres) would be logistically difficult. It is anticipated that only localized dewatering would be required for construction of the proposed three levels of below-grade parking. During construction of the five below-grade levels, a dewatering system would need to operate continuously—24 hours a day, seven days a week, for 12 months to prevent uplift on the footings and structure. To counter the buoyancy, several levels of superstructure would need to be constructed before the dewatering system could be deactivated, and a large pressure slab would need to be installed to counter the uplift at the perimeter of the site. The large volume of groundwater would be discharged into the combined sewer system surrounding the site. The New York City Department of Environmental Protection (NYCDEP) would need to review the dewatering plan to assess the capacity in the existing system to handle the discharge. The dewatering and construction associated with the below-grade P5 parking level would be cost prohibitive for the project.

To meet the minimum open space requirements for the project, building footprints could not be enlarged from that currently proposed by the Flushing Commons site plan. To accommodate the C4-3 parking requirements above grade, portions of the street level retail would need to be eliminated and the provisions of quality open space would be severely diminished. This would not meet the goals of the project to have active ground-floor retail. If ground-floor retail could be accommodated in buildings with parking developed above, then the buildings would need to be substantially taller to accommodate the same development program. However, the additional height would likely not be approved by the Federal Aviation Administration (FAA)¹. If parking were to be developed above grade and completely replace other revenue-generating uses, then the project would not be financially viable for the designated developer. Thus, the parking requirement for the existing C4-3 zoning could not be accommodated above grade.

For all these reasons, the existing zoning alternative is not considered a viable and feasible alternative and was eliminated from further consideration.

D. ALTERNATIVES TO REDUCE OR AVOID SIGNIFICANT ADVERSE IMPACTS

The impact analyses in this DEIS identify unmitigated significant adverse impacts with respect to shadows, historic resources (due to shadows), traffic, and pedestrians (see Chapter 6, "Shadows," Chapter 7, "Historic Resources," Chapter 14, "Traffic and Parking," and Chapter 15, "Transit and Pedestrians," respectively). This section examines the feasibility of alternatives that would reduce or eliminate these unmitigated significant impacts.

SHADOWS

The proposed Flushing Commons project would cause a significant adverse impact by casting new shadows on the arched western and southern windows of the Macedonia AME Church. The Flushing Commons project's incremental shadow would significantly reduce the amount of direct sunlight that currently shines through these windows throughout the year and thus would adversely affect the users of this potential historic resource.

Bringing the C/D Building down to 75 feet would eliminate the shadow impact on the windows of the southern façade of the church.

Similarly to the proposed action, there would be no incremental shadow on the June 21 analysis day with this alternative.

On the May and August analysis day, the two hours of late morning incremental shadow that would occur with the proposed action would be completely eliminated with this alternative.

On the March and September analysis day, there would only be 30 minutes of incremental shadow, from 9:45 AM to 10:15 AM, and only a very limited area would be affected; the entire large central window and one of the two smaller windows would remain entirely unshaded.

In December, shadow cast by the alternative would fall on portions of the windows for much of the day. However, the windows would only be completely shaded between 8:51 AM and 10:30 AM. Shadow would begin moving off the large central window at 10:30 AM and would exit

¹ The Flushing Commons project site is also located in the flight path for LaGuardia Airport, and the FAA must make a determination of No Hazard to Air Navigation for any new construction.

completely by 11:15 AM, though the two small lower windows would continue to be in shadow. By 12:30 PM, all incremental shadow would be off the southern façade, and would remain off until 2:00 PM. From 2:00 PM until 2:53 PM some incremental shadow would return to the lower windows.

Project shadow would still fall on portions of the windows for much of the day, only fully shaded between 8:51 AM and 10:30 AM. Between 10:30 AM and 11:15 AM shadow would move off main window and after 11:15 AM full sunlight would be able to come through the main window until the end of the analysis day in mid-afternoon.

During the spring, summer and fall seasons the windows of the church's southern façade would remain unaffected by project shadow. In the winter, the large central window would remain in sunlight for most of the analysis day. Therefore under this alternative, the Flushing Commons project would not result in a significant shadow impact on the southern façade of the church.

Bringing the building located just west of the church (Building B) down to 100 feet would not eliminate the significant shadow impact on the windows along the western façade of the church, because there would still be between two and three hours of new shadow covering the windows in the late afternoons of the late spring and summer seasons, and nearly two hours in the March and September analysis period as well. Eliminating this building entirely and leaving only the 73 feet high retail base would still result in approximately two hours of new shadow through the late spring and summer.

TRAFFIC AND PARKING

As discussed in Chapter 14, "Traffic and Parking," the proposed action would result in significant adverse traffic impacts at 17 intersections during the weekday AM peak hour, 14 intersections during the weekday midday peak hour, 20 intersections during the weekday PM peak hour, and 21 intersections during the Saturday peak hour. As discussed in Chapter 20, "Mitigation," the range of traffic mitigation measures available could not fully mitigate the impacts of the proposed action at 13 of the 17 impacted intersections during the weekday AM peak hour, 11 of the 14 impacted intersections during the weekday midday peak hour, 13 of the 20 impacted intersections during the weekday PM peak hour, and 14 of the 21 impacted intersections during the Saturday midday peak hour. As mentioned in Chapter 14, "Traffic and Parking," NYCDOT is considering several scenarios to improve traffic and pedestrian conditions in Downtown Flushing as alternatives to the contra-flow configuration, which is the scenario analyzed in this DEIS. The City continues to analyze other scenarios and it is possible that some of the unmitigated traffic impacts may be eliminated, although it is likely that numerous significant adverse traffic impacts would remain unmitigated.

Since the elimination of these significant adverse traffic impacts would require that not more than a few vehicles could travel through numerous study area intersections, any small amount of new development on the project site would create an unmitigatable significant adverse traffic impact. Therefore, there would be no feasible reduction in the density of the Flushing Commons project that could reduce or eliminate these impacts, which would remain significant unmitigated impacts of the proposed action.

TRANSIT AND PEDESTRIANS

As described in Chapter 15, "Transit and Pedestrians," the proposed action would result in significant adverse impacts at five crosswalks, three street corners, and three sidewalks during

the weekday midday peak hour; at three crosswalks, three street corners, and two sidewalks during the weekday PM peak hour; and at three crosswalks, three street corners, and two sidewalks during the Saturday midday peak hour. There were no significant adverse pedestrian impacts projected for the weekday AM peak hour.

As discussed in Chapter 20, "Mitigation," implementing the proposed pedestrian mitigation measures would fully mitigate all significant adverse crosswalk and sidewalk impacts, with the exception of those identified for the northeast sidewalk along Main Street at Roosevelt Avenue. These projected impacts during the weekday midday, PM, and Saturday PM peak hours would remain unmitigated. At the 39th Avenue/Main Street, Roosevelt Avenue/Main Street, and Roosevelt Avenue/Union Street intersections, all identified street corner impacts would also remain unmitigated. As mentioned in Chapter 14, "Traffic and Parking," NYCDOT is considering several scenarios to improve traffic and pedestrian conditions in Downtown Flushing as alternatives to the contra-flow configuration, which is the scenario analyzed in this DEIS.

The significant adverse pedestrian impacts are projected to occur at some of the busiest locations in Downtown Flushing where sidewalks, street corners and crosswalks already experience significant volumes of pedestrians generated by the high-density commercial, retail and residential uses, in addition to being located in the vicinity of a major subway station and terminus at Main Street, and numerous bus lines. Further, the incremental volume of pedestrians generated by the proposed action includes not only walk-only trips, but also those involving subway and bus passenger pedestrian trips. The elimination of the significant adverse pedestrian impacts would therefore require that a substantially smaller incremental volume of peak hour pedestrian trips be added by these various modes of transportation to these already busy locations. It is projected that a development program that is greater than 45 percent of the size of the development program proposed for the project site would create an unmitigatable significant adverse pedestrian impact. Therefore, there would be no feasible reduction in the density of the Flushing Commons project that could reduce or eliminate these impacts, which would remain significant unmitigated impacts of the proposed action.