OPEN SPACE

CHAPTER 7

Under CEQR, an analysis of open space is conducted to determine whether or not a proposed project would have a direct impact resulting from the elimination or alteration of open space and/or an indirect impact resulting from overtaxing available open space. Open space is defined as publicly or privately owned land that is publicly accessible and operates, functions, or is available for leisure, play, or sport, or set aside for the protection and/or enhancement of the natural environment. An open space analysis focuses on officially designated existing or planned public open space.

As with each technical area assessed under CEQR, it is important for an applicant to work closely with the lead agency during the entire environmental review process. The lead agency may determine it is appropriate to consult or coordinate with the city’s expert technical agencies for a particular project. If so, the New York City Department of City Planning (DCP) and the New York City Department of Parks and Recreation (DPR) should be consulted for information, technical review, and recommendations for mitigation relating to open space. It is recommended that the lead agency coordinate with these expert agencies as early as possible in the environmental review process. Section 700 further outlines appropriate coordination with these (and other) expert agencies.

100. DEFINITIONS

Open space may be public or private and may include active and/or passive areas:

PUBLIC OPEN SPACE

Open space that is accessible to the public on a constant and regular basis, including for designated daily periods, is defined as "public" and analyzed under CEQR. Public open space may be under government or private jurisdiction and may include, but is not limited to, the following:

- Parks operated or managed by the City, State, or Federal governments and include neighborhood and regional parks, beaches, pools, golf courses, boardwalks, playgrounds, ballfields and recreation centers that are available to the public at no cost or through a nominal fee, as in the case of recreation centers and golf courses;
- Open space designated through regulatory approvals (such as zoning), including large-scale permits that prescribe publicly accessible open space, such as public plazas;
- Outdoor schoolyards if available to the public during non-school hours;
- Publicly-accessible institutional campuses;
- Esplanades;
- Designated greenways, as shown on the City’s Bike Map, and defined as multi-use pathways for non-motorized recreation and transportation along natural and manmade linear spaces such as rail and highway rights-of-way, river corridors and waterfront spaces;
- Landscaped medians with seating;
- Housing complex grounds, if publicly accessible;
- Nature preserves, if publicly accessible;
- Gardens, if publicly accessible;
• Church yards or cemeteries with seating; or
• Waterfront piers used for passive or active recreation, defined below.

Public open space does not include greenstreets, malls without seating, or sidewalks.

PRIVATE OPEN SPACE
Open space that is not publicly accessible or is available only to limited users and is not available to the public on a regular or constant basis is defined as “private.” It is not included in the quantitative analysis but may be considered in the qualitative assessment of potential open space impacts. Private open space may include, but is not necessarily limited to, the following:

• Private-access fee-charging spaces, such as health clubs;
• Yards or rooftop recreational facilities used by community facilities, such as public and private educational institutions, where the open space is accessible only to the institution-related population;
• Natural areas or wetlands with no public access;
• Arcades;
• Stoops;
• Vacant lots;
• Front and rear yards; and
• Private open space is considered only after an assessment of the proposed project’s effects on public open space has been completed. If the project is likely to have indirect effects on public open space (such as greater utilization demands), the ability of private open space to influence or alter those effects may be considered.

Open space includes both "active and "passive" categories as described below:

ACTIVE OPEN SPACE
Open space that is used for sports, exercise, or active play is classified as "active open space," and consists mainly of recreational facilities, and includes the following: playgrounds with playground equipment, playing fields (baseball, soccer, football, track), playing courts (basketball, handball, tennis), beach areas (swimming, volleyball, frisbee, running), pools, ice skating rinks, greenways, mountain biking trails, and esplanades (used for running, biking, rollerblading or other active play), multi-purpose play areas (open lawns and paved areas for active recreation, such as running games, informal ball-playing, skipping rope, etc.), and golf courses, including pitch and putt.

PASSIVE OPEN SPACE
Open space that is used for relaxation, such as sitting or strolling, is classified as "passive," and includes the following: plazas or medians with seating, a percentage of beach areas (sunbathing), picnicking areas, greenways and esplanades (sitting, strolling), paths, accessible restricted use lawns, gardens, and church yards or cemeteries with seating, and publicly accessible natural areas used, for example, for strolling, dog walking, and bird watching.

In many cases, open space may be used for both active and passive recreation. These include lawns and beaches, which permit both sunbathing and ad hoc ball or frisbee games.
A proposed project’s effects on open space may be either direct or indirect. These are defined as follows:

**DIRECT EFFECTS**
Direct effects may occur when the proposed project would encroach on, or cause a loss of, open space. Direct effects may also occur if the facilities within an open space would be so changed that the open space no longer serves the same user population. Limitation of public access and changes in the type and amount of public open space may also be considered direct effects. Other direct effects include the imposition of noise, air pollutant emissions, odors, or shadows on public open space that may alter its usability. Assessment of these effects is addressed in the relevant technical chapters of the manual and should be referenced for the open space analysis. It should be noted that direct effects may not always result in adverse effects to open space. Alterations and reprogramming of parks may be beneficial or may result in beneficial changes to some resources and may or may not have an adverse effect on others.

**INDIRECT EFFECTS**
Indirect effects may occur when the population generated by the proposed project overtaxes the capacity of existing open spaces so that their service to the future population of the affected area would be substantially or noticeably diminished.

**200. DETERMINING WHETHER AN OPEN SPACE ASSESSMENT IS APPROPRIATE**
An open space assessment may be necessary if a project potentially has a direct or indirect effect on open space. In determining whether or not to prepare an open space assessment, consider whether the changes are likely to adversely affect utilization of existing resources or specific users of these resources.

**210. DIRECT EFFECTS**
If a proposed project would have a direct effect on an open space, an assessment of the effects on open space and its users may be appropriate. Direct effects occur if the proposed project would:

- Result in a physical loss of public open space (by encroaching on an open space or displacing an open space);
- Change the use of an open space so that it no longer serves the same user population (e.g., elimination of playground equipment);
- Limit public access to an open space; or
- Cause increased noise or air pollutant emissions, odors, or shadows on public open space that would affect its usefulness, whether on a permanent or temporary basis.

However, when the direct effect would be so small that it would be unlikely to change use of the open space, an assessment may not be needed. For example, the loss of a small amount of open space to support infrastructure related to park purposes may not warrant a full open space analysis. When few users or a limited age group of users would be affected, new and comparable open space would be provided at the same location, or the proposed alterations to an existing open space would be improvements that create comparable or better facilities, significant adverse impacts are unlikely and a full assessment may not be needed. A simple comparison of conditions with and without the project and a discussion of the users affected may be adequate. However, most direct effects on open space do require some assessment, particularly when more information on users of that open space may be appropriate or there is ambiguity as to whether the project would reduce the usability of an open space, detract from its aesthetic qualities, or impair its operation.

Consideration of these effects during the construction phase of a project should also be taken into account when determining whether an open space assessment is required. Chapter 22, “Construction Impacts,” should be consulted for assessing the effects of construction activities on open space.
211. Parkland Alienation

In addition to direct effects on open space, if a project entails the use of parkland for a non-parkland purpose or the conveyance of municipal parkland, it may constitute “parkland alienation” in New York State, requiring state legislative authorization. Similarly, when a project involves the termination of use for outdoor recreation of city owned parkland that has received federal funds for acquisition or improvement, the project may also involve “conversion,” and requires the approval of the National Park Service of the U.S. Department of the Interior. For more information on how to proceed when a project may result in parkland alienation or conversion, please see Section 730.

220. INDIRECT EFFECTS

If a project may add population to an area, demand for existing open space facilities would typically increase. Indirect effects may occur when the population generated by the proposed project would be sufficiently large to noticeably diminish the ability of an area’s open space to serve the future population.

For the majority of projects, an assessment is conducted if the proposed project would generate more than 200 residents or 500 employees, or a similar number of other users (such as the visitor population that might be introduced by a large shopping area). However, the need for an open space assessment may vary in certain areas of the city that are considered either underserved or well-served by open space.

- **Underserved areas** are areas of high population density in the City that are generally the greatest distance from parkland where the amount of open space per 1000 residents is currently less than 2.5 acres.

- **Well-served areas**
  - Have an open space ratio above 2.5 accounting for existing parks that contain developed recreational resources; or
  - Are located within 0.25 mile (approximately a 10-minute walk) from developed and publicly accessible portions of regional parks.

The areas considered underserved or well-served by open space for each borough may be found using maps in the Appendix for the Bronx, Brooklyn, Manhattan, Queens, and Staten Island, and the methodologies for determining both underserved and well-served areas can be found here.

**THRESHOLDS FOR ASSESSMENT:**

- If a project is located in an underserved area, an open space assessment should be conducted if that project would generate more than 50 residents or 125 workers.
- If the project is located in a well-served area, an open space assessment should be conducted if that project would generate more than 350 residents or 750 workers in a well-served area.
- If a project is not located within an underserved or well-served area, an open space assessment should be conducted if that project would generate more than 200 residents or 500 employees.

If a proposed project would generate 50 residents or 125 workers or more in an underserved area, an open space assessment should be conducted. If the proposed project would generate 350 residents or 750 workers or more in a well-served area, an open space assessment should be conducted.

Higher thresholds in areas well-served by open space are appropriate because the area contains existing park resources that provide for the existing population and likely for a nominal amount of added population, while regional parks contain a wide variety of recreational facilities intended to serve many users at a given point in time.
300. Assessment Methods

If the project exceeds the thresholds outlined in Section 200, above, a preliminary assessment is warranted, and, depending on the results of that assessment, a more detailed analysis may also be required. A full, detailed open space analysis is necessary if the project would displace a highly utilized open space (direct effect) or introduce a large population in an area underserved by open space (indirect effect). In some cases, however, the need for a detailed analysis may be less clear, and a preliminary assessment may be useful in determining the need for a more detailed analysis of open space.

The first step in any open space analysis is to define and map a study area. Once the study area is defined, the next step is to determine which analysis is required through calculating the percentage change in the open space ratio between the No-Action condition and the future With-Action condition.

310. Study Areas and Mapping of Existing Open Space

Open space study areas are defined to allow analysis of both the nearby open spaces and the population using those open spaces. They are generally defined by a reasonable walking distance that users would travel to reach local open space and recreation areas—typically a 0.5 mile for residential users and 0.25 mile from commercial projects with a worker population. However, the boundaries of the study area should reflect existing conditions and may be irregularly shaped. For projects that would result in mixed-use projects (e.g., residential/commercial buildings), it may be appropriate to analyze two study areas—one for residential users and another for nonresidential users, such as workers. The following steps may be used to define an open space study area:

- Use a legible map of appropriate scale, such as a census tract map or DCP's Bytes of the Apple map as a base map. Locate the site of the proposed project and draw the physical boundary of the area affected by the project.

- From the boundary of all sites that would be developed as a result of the proposed project, delineate a radius of 0.25 mile for commercial projects or 0.5 mile for residential projects to create the generalized open space study area boundaries. As noted, it may be appropriate to define two study areas for mixed-use projects—one for residential users and another for commercial users.

- Identify all census tracts with at least 50 percent of their area within the generalized study area. The study area should include each of those census tracts in their entirety. Exclude all census tracts that have less than 50 percent of their area within the study area. Outline all census tracts to be included to refine the boundaries of the study area.

- Identify all open spaces within the defined study area. Field surveys of the study area are usually important to be certain that all appropriate open spaces are included. Determine the acreage for each of the open spaces within the study area as well.

If a project would result in an extremely large development or displace an open space, the boundary may also need to be adjusted to reflect additional open space resources likely to be affected. For example, if a tot lot playground facility designed for children less than 4 years old) would be eliminated under a proposed project, other existing tot lots should be included in the map, even if they are located beyond a 0.5 mile radius. If only direct effects from the project are expected, it may be possible to target the assessment to spaces that would be similar to those affected by the project. If the project is programmatic or generic, prototypical sites may have to be chosen for the analysis.

- Identify all open spaces within the defined study area. Field surveys of the study area are usually important to be certain that all appropriate open spaces are included. Determine the acreage for each of the open spaces within the study area as well.

Other boundary adjustments may be necessary to account for natural boundaries (ravines, rock outcrop-pings, water bodies, very steep slopes, wetlands) or built features (depressed highways, canals, railroad rights-of-way, etc.) that preclude access to open spaces within the study area. A written rationale for any adjustment of the boundary should be provided, and the acreage for any open space not
320. ANALYSIS TECHNIQUES

The open space assessment examines the type of open space and user population affected by the proposed project. Overall, the goal of this assessment is to determine the significance of the change in either the availability of open space relative to the demand from the new population or the usability of the open space affected by the proposed project. For example, a commercial or mixed-use project may introduce a large worker population, which tends to place demands on passive open space. The analysis would examine in further detail the amount of passive open space available with and without the project to quantify the impact, and if necessary, the mitigation.

For projects that would have a direct effect on a specific type of open space without introducing a significant new user population, it may be possible to target the assessment. The open space analysis may be targeted toward those open space resources that are similar to the space that would be eliminated or altered by the project. For example, if the direct effects are limited to an open space resource targeted for a certain age group, such as a tot lot for toddlers and preschoolers, the impact assessment may be targeted to assess only that age group and nearby tot lots.

321. Open Space Ratios and Planning Standards

In New York City, local open space ratios vary widely, and the median ratio at the Citywide Community District level is 1.5 acres of open space per 1,000 residents. Typically, for the assessment of both direct and indirect effects, citywide local norms have been calculated for comparison and analysis. As a planning goal, a ratio of 2.5 acres per 1,000 residents represents an area well-served by open spaces, and is consequently used as an optimal benchmark for residential populations in large-scale plans and proposals. Ideally, this would comprise 0.50 acres of passive space and 2.0 acres of active open space per 1,000 residents. For such large-scale projects (and for planning purposes), the City also seeks to attain its planning goal of a balance of 80 percent active open space and 20 percent passive open space. The City’s planning goal is based, in part, on National Recreation and Park Association guidelines from 1.25 to 2.5 acres per 1,000 residents of neighborhood parks within one-half mile, 5 to 8 acres per 1,000 residents of community parks within one to two miles, and 5 to 10 acres per 1,000 residents of regional parks within a one-hour drive of urban areas. Studies have shown that nonresidents, specifically workers, tend to use passive open space. The optimal ratio for worker populations is 0.15 acres of passive open space per 1,000 nonresidents.

Although a typical population mix may call for such a goal, it may not be attainable for some areas of the City, such as Midtown Manhattan, or for certain populations skewed toward certain age groups. Therefore, the City does not consider these ratios as its open space policy for every neighborhood, and consequently, these ratios do not constitute an impact threshold. Rather, the ratios are benchmarks that represent how well an area is served by its open space.

330. PRELIMINARY ASSESSMENT

A preliminary assessment may be useful when the open space assessment can be targeted to a particular user group, or if it is not clear whether a full, detailed open space analysis is necessary.

The following methodology examines the change in total population relative to total open space in the study area to determine whether the elimination of open space and/or increase in user population would significantly reduce the amount of available open space for the area's population:

- Calculate total population in the study area at the time of the most recent decennial census, with a population adjustment based on subsequent population estimates.
  - PROJECTS THAT WOULD RESULT IN AN INCREASE IN RESIDENTIAL POPULATION. Calculate the residential population of the study area. If the project would occur in an area with a substantial nonresiden-
tial population (i.e., employees, visitors, students, etc.), the nonresidential population of the study area should also be calculated.

- **PROJECTS THAT WOULD RESULT IN AN INCREASE IN NONRESIDENTIAL POPULATION (I.E., EMPLOYEES, VISITORS, STUDENTS, ETC.).** Calculate the nonresidential population. If the project would occur in an area with a substantial residential population, the residential population of the study area should also be calculated.

- **PROJECTS THAT WOULD RESULT IN AN INCREASE IN BOTH RESIDENTIAL AND NONRESIDENTIAL POPULATION.** Calculate the residential and nonresidential population of the study area.
  
  - Calculate total open space in the study area using the information gathered in Section 310.
  
  - Determine the open space ratio (R) in the study area, using the information from steps 1 and 2. The open space ratio is expressed as the amount of open space acreage per 1,000 population, and is calculated as follows:

  \[
  R = \frac{\text{acres of open space}}{\text{population}} \times 1000
  \]

  
  - **PROJECTS THAT WOULD RESULT IN AN INCREASE IN RESIDENTIAL POPULATION.** Calculate the open space ratio for the residential population. If the project would occur in an area with an existing substantial nonresidential population, the open space ratio for the nonresidential population should also be calculated.

  - **PROJECTS THAT WOULD RESULT IN AN INCREASE IN BOTH RESIDENTIAL AND NONRESIDENTIAL POPULATION (I.E., EMPLOYEES, VISITORS, STUDENTS, ETC.).** Calculate the open space ratio for the nonresidential population. If the project would occur in an area with an existing substantial residential population, the open space ratio for the residential population of the study area should also be calculated.

  - **PROJECTS THAT WOULD RESULT IN AN INCREASE IN BOTH RESIDENTIAL AND NONRESIDENTIAL POPULATION.** Calculate the open space ratio for both the residential and nonresidential populations of the study area.

  - Add the population expected with the proposed project to the total population calculated in step 1, above.

  - Calculate any changes in the acreage of open space in the future With-Action (accounting for increases and/or decreases resulting from the project).

  Calculate the With-Action open space ratio.

  If the open space ratio would increase or remain substantially the same in the With-Action condition compared to the No-Action condition, no further analysis of open space is needed (unless direct, qualitative changes to open space may occur because of the project). Decreases in the open space ratio would generally warrant a more detailed analysis under the following conditions:

  - If the decrease in the open space ratio approaches or exceeds 5 percent, it is generally considered to be a substantial change warranting more detailed analysis.

    - The closer the ratio is to 2.5 acres per 1,000 residents, or when the open space in the area exceeds this ratio, a greater percentage of change (more than 5 percent) may be tolerated.

  - If the study area exhibits a low open space ratio (e.g., below the citywide average of 1.5 acres per 1,000 residents or 0.15 acres of passive space per 1,000 nonresidential users), indicating a shortfall of open space, even a small decrease (less than 5%) in that ratio as a result of the project may require detailed analysis.
Detailed analysis of open space effects on residents is generally unnecessary if the open space ratio decreases by less than 1 percent. However, the existing open space ratio may be so low that even an open space ratio change of less than 1 percent may result in potential significant open space impacts. In that case, the potential for open space impacts should be further assessed.

Similarly, the more the open space ratio drops below 0.15 acres of passive space per 1,000 population, the more likely the project is to have an effect on the nonresidential population’s use of open space.

This assessment may also consider and compare the amount of open space in the study area relative to the community district and the borough to assess the relative shortfall or availability of open space in the study area.

If this analysis suggests the need for additional assessment, proceed to the detailed analysis.

340. DETAILED ANALYSIS

A detailed open space analysis typically breaks down study area population by age group and details the amount and quality of various types of open space to assess the availability of particular types of open space for particular age groups. In conducting this assessment, the analysis focuses on where shortfalls in open space exist now (or in the future), to identify whether the shortfalls are a result of the project. Where it is clear from the outset that the project would affect a particular type of open space or particular age group, the analysis may focus on those issues.

341. Identify Study Area Population

Using the total study area population calculated in the Preliminary Assessment (Section 330), break down the population by age group and list age groups as both total persons and as a percentage of total population in study area, as shown in Table 7-1.

These age groups represent different types of open space users. For example, the 4-year-old-and-younger age group typically uses tot lots, while other age groups may use a variety of active and passive facilities. If it is clear that the area supports a substantial weekday (nonresidential) population, such as workers, college students, or visitors, data on the size of such population and the source of this data should be obtained using the following sources:

- Data on daytime worker population may be obtained from DCP [here](#).
- Daytime college population may be determined by contacting administrative officers of colleges and other post-secondary educational institutions in the study area.
- Visitor population may be estimated using information from visitor attractions and major shopping attractions—this may include daily, weekend, or annual visitor counts and estimates of daily or weekend shoppers.

For an analysis targeting a specific open space and user population, the assessment may focus only on that user population comparable to the population that would be displaced. For example, if only a tot lot is to be affected by the proposed project, the demographic analysis may focus on the appropriate age group 4 years old and younger.

342. Identify and Describe Study Area Open Spaces

Next, identify and describe open spaces included in the study area through data collection and site visits to determine the types of facilities, utilization levels, accessibility, and condition. This description may also note any major regional facilities that may be proximate to the study area boundary. A list of regional parks may be found [here](#).
342.1. Field Surveys
Data collection should include field surveys of the open space resources if relevant data are not readily available. In these cases, it is recommended that information be obtained from at least two site visits, at least one of which is at the peak hour of use and in good weather. Information regarding the appropriate timing of a field visit may be obtained through conversations with community groups and facility operators. For designated greenways, in particular, field visits assist in assessing the portion of the open space utilized as active versus passive open space. For example, a field visit to the greenway along Route 9A will likely determine that 100% of the greenway is active, while a field visit to the greenway in Manhattan’s Riverside Park will result in a distribution of both active and passive activities. Peak hour varies for different users and open space facilities. Commercial areas tend to have a peak hour at lunch time - noon to 2:00 p.m. Residential neighborhoods often have peak hours on weekends and after school, but verification with park operators may be useful. For example, some schools use parks for recess, and certain facilities in parks may attract users at any time to create other peak hours. Greenways may see peak use for recreation on weekends and peak use for transportation purposes during work rush hours. For beach areas, consider seasonal issues when including such areas in an open space inventory.

342.2. Data Collection
In general, the following data are useful in assessing open space conditions in an area. For projects that may affect a specific type of user or specific type of open space, this assessment may be tailored for that group. A sample format for gathering and organizing this information is found in Table 7-2.

- **NAME AND ADDRESS OF EACH OPEN SPACE FACILITY.**
- **MAP KEY NUMBER.** This indicates the location and description each open space facility on the open space map described in Section 310.
- **OWNER (PUBLIC/PRIVATE).**
- **ACREAGE.** Acreage for lands underwater at beaches or waterfront parks should not be included, but may be considered when performing the assessment of the adequacy of open space described in Subsection 343.
- **PERCENT OF AREA (AND ACREAGE) DEVOTED TO ACTIVE AND PASSIVE USES.** Estimates based on the facility type and equipment should be provided. In general, the following assumptions of active and passive uses may be appropriate:
  - Esplanades are typically 50 percent active, 50 percent passive;
  - Beaches may be considered 20 to 40 percent active, and 60 to 80 percent passive;
  - Sitting areas are 100 percent passive;
  - Ball fields are 100 percent active;
  - Multipurpose play areas are generally 100 percent active, unless field surveys confirm limiting conditions;
  - Greenways are 100 percent active;
  - Greenways within park boundaries that utilize an existing esplanade are 70 percent active and 30 percent passive;
  - Golf courses, including pitch and putt courses, tend to serve a very limited portion of the population. The assessment should consider the fact that a golf course may contribute a substantial amount of open space acreage, but due to
its limited function, it may not serve a comparable amount of the study area population’s active open space needs.

- The lead agency may determine that other active versus passive percentages for the affected resources may be more appropriate based on information obtained from sites visits and consultation with DPR for city parks. Analyzing the use of open space into the categories of passive and active uses often requires judgment, and for any particular case, typical open space resources may be used differently.

- **OPEN SPACE FEATURES, TYPES OF EQUIPMENT, FACILITIES, ETC.** In many cases, the features of an open space area (or lack thereof) may be important in assessing how the open space is used currently, and how it may be used in the future With-Action condition. For example, a passive open space area with no seating may not be useful while provision of seating and other attractive features, such as planters, may make that area more useable by both the existing community and any future population. Facilities within public parks managed by DPR may be verified by searching a park by name or zip code here.

- **THE QUALITY OF AN OPEN SPACE IS GENERALLY RATED AS ACCEPTABLE OR UNACCEPTABLE FOR OVERALL CONDITION AND CLEANLINESS.** The quality of the open space’s features and conditions is important in the assessment of the usability of the open space. This information may be useful when a lead agency is determining impacts or considering mitigation for open space impacts, if any. Inspection ratings for parks maintained and operated by DPR are accessible here, searching by park name, and then clicking on Inspections. Information on DPR’s Inspection Program is found here.

- **HOURS OF OPERATION AND ACCESS.** Many public open spaces, such as school playgrounds or public plazas, are open and accessible only during specified hours. This information is obtained through site visits, where required signage describes the hours of operation; discussions with operators; conversations with building superintendents; or, in the case of public plazas, either the operators or DCP. Public parks operated by DPR are generally open from 6:00 a.m. until 1:00 a.m., unless park signage indicates otherwise. In addition, the PlaNYC Schoolyards to Playgrounds initiative expands the public use of schoolyards by adding additional schoolyards for joint use that are currently not part of the program. These playgrounds are jointly operated by the Department of Education (DOE) and DPR, and are available for public use during non-school hours weekdays and on weekends. A search for a jointly operated playground may be made by performing a “Find Your Park” search and looking up the playground name. A list of schoolyards added to the program through PlaNYC may be found here.

- **USER GROUPS.** One assessment of the overall quality of an area’s public open space facilities is based on how well those facilities fulfill the recreational needs of each age group. Recreational facilities typically used by different age groups are as follows:
  - **AGES 4 AND YOUNGER.** Typically, children 4 years old or younger use traditional playgrounds that have play equipment for toddlers and preschool children.
  - **AGES 5 TO 9.** Children ages 5 through 9 use traditional playgrounds with play equipment suitable for school-age children, as well as grassy and hard-surfaced open spaces, which are important for ball playing, running, skipping rope, etc.
  - **AGES 10 TO 14.** Children ages 10 through 14 use playground equipment, court spaces, and ball fields.
AGES 15 TO 19. Teenagers' and young adults' tend to use court facilities such as basketball and field sports such as football or soccer.

AGES 20 TO 64. Adults continue to use court facilities and fields for sports, as well as more individualized recreation, such as rollerblading, biking, and jogging, which require bike paths, esplanades, and vehicle-free roadways. Adults also gather with families for picnicking, adhoc active sports such as frisbee, and recreational activities in which all ages may participate.

AGES 65 AND OVER. Senior citizens engage in active recreation such as handball, tennis, gardening, and swimming, as well as recreational activities that require passive facilities.

The facility/age worksheet (Table 7-3) may be useful in determining which of the study area's open spaces are appropriate for a given age group. For projects that may affect a specific type of open space or introduce a specific user group, the assessment may be targeted to that group.

In some cases — particularly when an open space would be directly affected — it may be necessary to conduct a user survey to understand more fully the potential impacts on the users of the open space. User surveys may take the form of systematic interviews or observations of the users. These should be conducted when the open space is accessible during the day (and during the peak periods of usage), on weekdays and weekends, in good weather, and account for seasonal variations in use of open space. Documentation for surveys typically includes the date, time of day, and weather at the time the survey is taken.

Observation surveys may include the following questions:

- What age user groups are using the open space?
- How many are using the open space?
- What facilities are being used?
- What facilities are not being used?
- Is the space adaptable for both active and passive uses?

Interview surveys may include the following questions:

- How frequently do people use the open space during the course of a day, week, month, or season?
- How long do the users stay?
- What other facilities do the users currently use?
- Where are the users coming from and how do they get to the facility?
- What parts of the facility do people use?
- What attracts or detracts from the use of the open space?

**UTILIZATION LEVEL.** The level of use an open space receives—low, moderate, or heavy—is also noted, as follows:

- **LOW UTILIZATION:** 25 percent capacity or less utilization at the peak hour, meaning that much of the space, facility, or equipment is available for use.
OPEN SPACE

- **MODERATE UTILIZATION**: 25 to 75 percent capacity utilization at peak hour, meaning that some passive spaces and/or active facilities are available for use.

- **HEAVY UTILIZATION**: 75 percent or greater capacity utilization at peak hours, meaning that few or none of the open space facilities are available for use.

This information is obtained by site visits and by conversations with operators of the open space and the community. Factors that may be important in determining the utilization include the following:

- Benches filled (General rule: 3 linear feet per person).
- Lines to use equipment or facilities.
- People leaving because it is crowded.
- People leaving before entering because it is too crowded.
- Multiple activities occurring and conflicting with each other.
- Inappropriate age groups using equipment and preempting appropriate age groups (e.g., teenagers using playground equipment, skateboarding in passive areas).
- Litter overflowing (may indicate capacity as well as maintenance management).
- Competition for use of facilities (i.e., demand for field permits).
- Active field sports on undesignated areas.

**OTHER FACTORS AFFECTING UTILIZATION.** Low utilization is not always an indicator of low demand. Some factors, either permanent or temporary, may create underutilization. These factors are often related to shadows, wind, air quality, noise, safety, and conflicting uses in a multi-use area, as described below. In some cases, a detailed utilization study may be appropriate.

- **SHADOWS**. Shadows on sun-sensitive uses, such as botanical or landscape attractions, swimming pools, or benches, may affect use of an open space. This information may be noted during the field survey. If a shadow assessment is being performed for the proposed project (see Chapter 8, “Shadows”), the technical analyses and graphics presented in that chapter should be considered and referenced in the open space assessment.

- **AIR QUALITY/ODORS**. These may also affect use of an open space. If the project is likely to have a significant air quality/odor impact on open space resources, the technical analyses presented in Chapter 17, “Air Quality,” should be referenced and considered in the open space analysis.

- **NOISE**. Excessive noise, including traffic noise, may prohibit specific types of use in an open space. If the project is likely to have a significant noise impact on open space resources, the technical analyses presented in Chapter 19, “Noise,” should be referenced and considered in the open space analysis.

- **SAFETY**. Poor safety conditions may also deter use. These may be because of design (e.g., equipment with poor spacing or appropriate surface treatment) or conditions. Typically, important factors include access, crime, pedestrian safety, and other transportation issues such as a lack of (or poor condition of) park perimeter sidewalks or no crosswalks at high demand park entrances, etc.
343. Assess the Adequacy of Open Space

Use the data gathered in the tasks above to provide an evaluation of the study area’s existing open space conditions relative to the open space needs of the study area users. The assessment should include a quantitative and qualitative assessment, using the following guidance.

First, calculate the existing active open space, passive open space, and total open space ratios for the study area, using the population and open space acreage data identified in Subsections 341.1 and 341.2 above. The open space ratio is expressed as the amount of open space acreage per 1,000 population.

This ratio may be tailored to age groups and types of facilities that would be affected by the proposed project. For example, one playground per 1,250 children is a goal delineated in PlaNYC. Therefore, a ratio of the number of playgrounds per 1,250 children may be an appropriate assessment for new residential developments in areas in which the age group analyses indicate a large percentage of children in comparison to the borough or city’s population age distribution.

Typically, it is appropriate to provide the following information when calculating the open space ratio:

**PROJECTS THAT WOULD RESULT IN AN INCREASE IN RESIDENTIAL POPULATION**
- Calculate the open space ratio for the residential population:
  1. Number of acres of active open space per 1,000 residents;
  2. Number of acres of passive open space per 1,000 residents; and
  3. Number of acres of total open space per 1,000 residents.

If the project is in an area with a substantial nonresidential population, the open space ratio for the nonresidential population of the study area should also be calculated:

- 1. Number of acres of passive open space per 1,000 nonresidents.

**PROJECTS THAT WOULD RESULT IN AN INCREASE IN NONRESIDENTIAL POPULATION (I.E., EMPLOYEES, VISITORS, STUDENTS, ETC.)**
- Calculate the open space ratio for the nonresidential population:
  1. Number of acres of passive open space per 1,000 nonresidents.

If the project is in an area with a substantial residential population, the open space ratio for the residential population should also be calculated:

- 1. Number of acres of active open space per 1,000 residents;
  2. Number of acres of passive open space per 1,000 residents; and
  3. Number of acres of total open space per 1,000 residents.

**PROJECTS THAT WOULD RESULT IN AN INCREASE IN BOTH RESIDENTIAL AND NONRESIDENTIAL POPULATION**
- Calculate the open space ratio for the residential and nonresidential populations of the study area:
  1. Number of acres of active open space per 1,000 residents;
  2. Number of acres of passive open space per 1,000 residents;
  3. Number of acres of total open space per 1,000 residents;
  4. Number of acres of passive open space per 1,000 nonresidents.

To then assess the adequacy of existing open space within the study area, consider the following factors:

- Is the open space ratio for the population of the study area less than 2.5 acres per 1,000 residents, the City’s planning goal? Is the project site located in an area deemed underserved by DPR?
Open Space

- Do effects of air quality or noise, shadows, extreme wind conditions, or issues of safety, such as the siting of facilities within parks with poor spacing or design features, or the lack of safe nonmotorized access to or within open space resources, cause a decrease in the usability of the open space supply?

- Is the proportion of active and passive open space appropriate for the population and age groups served? Note that for areas in which there is a substantial worker, student, or visitor population, there is typically a need for more passive space resources.

- Other data gathered in Subsection 342, including the following: user population by age; fees or other charges; types of facilities available to serve needs of different age groups; the variety of active and passive uses; conditions of facilities; utilization levels; and factors that may encourage or deter use, including accessibility of different types of open space (physical location and barriers to access), competing uses, fee or hour restrictions.

- Other factors, such as the availability of any major regional park, as detailed here, the predominant housing type, and the availability of private open space facilities to serve the existing population.

These questions should be evaluated in the context of the study area and the neighborhood.

The type of project proposed also affects the factors considered. The data gathered in the detailed analysis may be helpful in determining the adequacy of the open space and whether it is a “good fit” with the With-Action population. For instance, residential projects typically focus on the appropriateness of an area’s open spaces for the different age groups in the study area; commercial projects typically describe the adequacy of available open space for office workers, who may use passive facilities within 0.25 mile for sitting, socializing, eating lunch, and strolling. Mixed-use projects should describe the adequacy of available open space for residential users as well as commercial workers.

For projects that would have direct effects on specific facilities, the assessment should focus on only those open spaces that are comparable to those that would be displaced.

344. Future No-Action Condition

The future No-Action analysis projects conditions in the study area for the build year without the proposed project, providing a baseline condition against which the impact of the project may be measured. The analysis includes data on projected population, as well as recreational facilities/open space facilities built or approved to be constructed by the build year. The analysis considers any changes to the following factors expected in the future without the project.

STUDY AREA POPULATION
Based on the development and population projected for the future build year, estimate the projected population in the study area by age group. Identify changes in daytime population for projects that would increase the nonresidential population.

IDENTIFY AND DESCRIBE STUDY AREA OPEN SPACES
Identify any changes to open space anticipated by the future build year. Include new open space and alterations/deletions to existing open space. Also include changes that have been adopted or officially approved by a public agency. This inventory may include projects under construction, public open spaces that have been approved as mitigation for other projects, or open spaces that are committed in DPR’s capital budget. The same information gathered above in Subsection 342.2 is also appropriate for this inventory (with the exception of facility conditions, utilization levels, and, possibly, factors influencing utilization levels).
**ASSESS THE ADEQUACY OF OPEN SPACE**

The purpose of this step is to determine the open space conditions in the future No-Action condition as it relates to the needs of the number and types of users predicted for the future No-Action condition. This assessment is performed in the same way as the assessment of existing adequacy, described above. This includes calculating the open space ratio for the future No-Action condition and qualitatively assessing whether or not the area is sufficiently served by open spaces, given the types of open space and the profile of the study area population.

**345. Future With-Action Condition**

The future With-Action assessment analyzes conditions in the study area for the build year with the proposed project. Both the quantitative and qualitative factors are considered in the assessment to the extent to which the project may affect the existing open space resources and their capacity to serve the study area population.

This assessment typically begins with a brief description of the project, and how it might affect open space—by displacing or encroaching on open space, introducing a population that would place demands on open space, *etc.* Then, the analysis is performed using the same methodology as for existing conditions and future No-Action conditions, described above. This includes the following.

**IDENTIFY CHANGES TO STUDY AREA POPULATION**

This projection is based on population projections for the proposed project together with future No-Action conditions determined above. For the project population, provide a breakdown by age, and a description of the estimated daytime population (workers, students, tourists), as appropriate.

**IDENTIFY AND DESCRIBE CHANGES TO STUDY AREA OPEN SPACES**

Describe the open space changes from the No-Action condition, both on site and off site, which would occur as a result of the proposed project. Describe the open space that would be eliminated, altered, created and/or improved as a result of the project.

**ASSESS THE ADEQUACY OF OPEN SPACE**

Calculate the ratio of acres of open space per 1,000 population. Indicate the additional users as a result of the proposed project and assess the adequacy of open space resources to accommodate these users. Note whether the project would provide on-site open space resources in sufficient quantity and quality to serve the needs of its users adequately (offsetting any effect of the anticipated increase in population). This may be private as well as public open space. For example, the zoning requirements for Quality Housing mandate indoor recreational space as well as exterior open space. This space would typically satisfy some of the demand created by such a project.

If the project is likely to have potential significant shadow, air quality/odor, or noise effects on open space resources, discuss those effects as well. Refer to the appropriate technical analyses.

**400. Determining Impact Significance**

In this step, the significance of a project's effects on an area's open spaces is determined using both qualitative and quantitative factors, as compared to the No-Action condition. As discussed below, the determination of significance is based upon the context of a project, including its location, the quality and quantity of the open space in the future With-Action, the types of open space provided, and any new open space provided by the project.

**410. Quantitative Impact**

The proposed project may result in a significant adverse open space impact under the following circumstances:

- There would be a direct displacement/alteration of existing open space within the study area that has a significant adverse effect on existing users, unless the proposed project would provide a comparable re-
placement (size, usability, and quality) within the study area (i.e., there is a net loss of publicly accessible open space).

- The project would reduce the open space ratio by more than 5 percent in areas that are currently below the City’s median community district open space ratio of 1.5 acres per 1,000 residents. In areas that are extremely lacking in open space, a reduction as small as 1 percent may be considered significant, depending on the area of the City. These reductions may result in overburdening existing facilities or further exacerbating a deficiency in open space.

As noted above in Section 321, the ratios are often not feasible for many areas of the City, and the City does not consider these ratios as its open space policy for every neighborhood. Consequently, the ratios do not constitute an absolute impact threshold. Rather, these are benchmarks that represent how well an area is served by its open space. Local open space ratios vary widely, and the median ratio at the citywide community district level is 1.5 acres of open space per 1,000 residents.

When assessing the effects of a change in the open space ratio, consider the balance of passive and active open space resources appropriate to support the affected population. A larger percent of active space is usually preferred, because the physical space requirements for active open space uses are significantly greater. That is, a greater number of passive open space users, such as those sitting on a park bench to enjoy fresh air, may be accommodated within a smaller space. Active open space users have greater physical space needs for the movement and activity required for active recreation, such as children’s play equipment, organized or spontaneous sports such as frisbee or ball playing, hopscotch, or other outdoor exercise.

As noted earlier, for large-scale projects (and for planning purposes), the City seeks to attain a planning goal of a balance of 80 percent active open space and 20 percent passive open space. Although a typical population mix may call for such a goal, it may not be attainable for some areas of the city or for certain areas with populations skewed toward certain age groups. Analyzing the breakdown of open space into the categories of passive and active uses often requires judgment, and for any particular case, typical open space resources may be used very differently.

For the project study area, the lead agency should review existing open space conditions, including the type of recreation facilities (passive vs. active), the City’s median community district open space ratio of 1.5 acres per 1,000 residents, and the City’s optimal benchmark of 2.5 acres of open space per 1000 residents to aid in the determination of a significant quantitative impact on existing open space. Projects that may result in significant quantitative impacts on open space resources, or projects that would exacerbate an existing underserved area in relation to open space, are typically further assessed in the qualitative assessment approach (described below) to determine overall significance of the impact.

420. QUALITATIVE IMPACT

The adequacy of the open space in the study area should be considered in order to determine whether these changes in open space conditions and/or utilization results in a significant adverse effect to open space. To make this determination, the type of open space (active or passive), its capacity and conditions, the distribution of open space, whether the area is considered “well-served” or “underserved” by open space, the distance to regional parks, the connectivity of open space, and any additional open space provided by the project, including rooftop gardens, greenhouses, new active or passive open space, should be considered in relation to the quantitative changes identified above. These considerations may vary in importance depending on the project and the area in which it is located. For instance, provisions of new active open space may carry more weight in an area where a large residential population would be added as a result of the project.

The following are useful in determining whether there is a significant impact to open space conditions:

- If a proposed project results in a significant physical effect on existing open space by increasing shadow, noise, air pollutant emissions, or odors compared to the future No-Action condition, then there may be a significant impact requiring mitigation.
For example, a significant impact may occur if a project causes a significant incremental shadow on a park facility, such as a spray shower at a playground or a lawn area used for sunbathing, because the facilities may not be able to be used as intended.

- If a proposed project does not affect quantitative open space needs, but causes a qualitative impact compared to the No-Action condition, then there may be a significant impact on open space requiring mitigation. This may occur in those instances when the overall open space ratio is adequate, but a specific user group (such as young children or bocce players) would be adversely affected by being underserved or there would be conflicts in the utilization of open space as a result of the proposed project.

For example, open space planned for a large-scale development may include more passive open space (such as a plaza) than active, which may not provide an appropriate mix of active and passive recreational facilities typically required by the residential population.

500. Developing Mitigation

If the proposed project results in a significant adverse open space impact, on-site or off-site measures to mitigate the impact to the greatest extent practicable are identified. Some ways in which open space impacts may be mitigated are as follows:

- Create, on-site, new public open space of the type needed to serve the proposed population and to offset the proposed project’s impact on existing open space in the study area.
- Create new public open space elsewhere in the study area of a type needed to serve the needs of the added population.
- Improve existing open spaces in the study area to increase their utility, safety, and capacity to meet identified needs in the study area. The creation or enhancement of active open space facilities may be achieved by adding field lighting to allow for extended hours of play, the rehabilitation of an existing field with synthetic turf treatment to allow for expanded use, or adding playground equipment to an underutilized passive area within a park. DPR should be consulted for consideration of any of these possibilities or for any additional means to improve the active components of an existing park.
- The provision of maintenance equipment, such as a power washer or off-road vehicle, to enable increased park usage within an existing park or recreation center.
- Mitigation for the alienation or conversion of public parkland typically involves the acquisition of replacement parkland of equal or greater size and value servicing the same community of users.
- Capital improvements to a poorly maintained open space may increase its usefulness and mitigate a significant impact.
- Implement missing segments of the City’s greenway network to enable safe, non-motorized access to existing open space resources within the study area or a nearby major recreational facility.

600. Developing Alternatives

Alternatives to the proposed project that would avoid significant impacts on open space resources may include a smaller project (creating less demand for open space) or an alternate site (transferring the open space demand to an area with sufficient supply to accommodate the added demand). If a project may involve the alienation or conversion of parkland, the possible use of alternative sites should be given consideration as early as possible in the planning process.

Alternatives to the proposed project are analyzed using the methodology described under the future With-Action condition and impacts are compared to those of the proposed project.
700. Regulations and Coordination

710. Regulations and Standards

SEQR (6 NYCRR 617.11(a)(8)) and the 1977 Mayoral Executive Order 91, as amended, both state that a significant impact would occur if a project resulted in "a substantial change in the use, or intensity of use, of land including agricultural, open space or recreational resources, or in its capacity to support existing uses."

Trees under the jurisdiction of DPR. Title 18 of the Administrative Code of the City of New York, and Chapter 5 of Title 56 of the Rules of the City of New York detail the requirements and rules for applying for permission to remove trees under the jurisdiction of DPR and for determining tree replacement values.

720. Projects with U.S. Department of Transportation Funding

The U.S. Department of Transportation Act of 1966 Section 4(f) requires the Federal Highway Administration (FHWA) to assess the environmental effects of a project through the NEPA process. The FHWA is directed not to approve any program or project that requires the use of any publicly owned public park, recreation area, or wildlife or waterfowl refuge, or any land from an historic site of national, state, or local significance, unless there is no feasible and prudent alternative to the use and all possible planning to minimize harm resulting from such use is included. The environmental regulations for applying 4(f) to transportation project development are found at 23 CFR 771.135.

730. Alienation and Conversion of Parkland

Government-owned parkland and open space (that has been dedicated as such) is invested with a “public trust” that protects it from being converted to non-parkland uses without State legislative authorization. Thus, when a project eliminates dedicated City-owned parkland or open space, or involves certain changes in use of dedicated City-owned parkland or open space, the City must have the authorization of the New York State Legislature and Governor to alienate the parkland or open space. For example, if land from a City-owned park was to be converted into a school or supermarket, this project would have to be authorized by the State Legislature and Governor. This authorization takes the form of a parkland alienation bill. In general, before it will pass such a bill, the State Legislature requires the City Council to pass what is known as a “home rule resolution,” requesting state authorization of the change of use. Moreover, if state funding in the form of a grant has been invested in the park or open space, then the grant program may impose additional requirements that govern the alienation process.

When a project involves the termination of use for outdoor recreation of City-owned parkland that has received federal funds for acquisition or improvement under either the Land and Water Conservation Fund or the Urban Park Recreation and Recovery Program, the project may also involve “conversion,” and requires the approval of the National Park Service of the U.S. Department of the Interior. The conversion process is governed by rules and regulations of the National Park Service and requires the substitution of lands of at least equal fair market value that offer reasonably equivalent recreation opportunities as the parkland to be converted. The conversion process is in addition to the parkland alienation authorization required by state law.

The project sponsor should contact the DPR Parklands Office as soon as possible to determine whether state or federal funds have been used in the development or acquisition of a public park. The project sponsor should also review the Guide to the Alienation or Conversion of Municipal Parklands from the NYS Office of Parks, Recreation and Historic Preservation (OPRHP). Contact information for DPR and the regional office of OPRHP is included in Section 750 of this Chapter, “Location of Information.”

Additionally, if there is a possibility that a project involves alienation or conversion of parkland, it is advisable to consult with legal counsel to decide how to proceed. In most cases, the requirement to obtain legislative authorization for the alienation of parkland is found in case law, not statutes, with the exception of statutory requirements relating to specific state grants programs. New York courts consistently have held that land that is dedicat-
ed for park purposes cannot be conveyed or used for another purpose without an authorizing act of the State legislature.

Specific statutory provisions relating to the alienation of parklands that have received state grant funding or the conversion of parklands that have received federal funding are set forth in:

- Article 17 of the New York Parks, Recreation and Historic Preservation Law, the Outdoor Recreation Development Bond Act of 1965.
- Title 9 of Article 52 of the New York Environmental Conservation Law, the Environmental Quality Bond Act of 1986.
- Environmental Conservation Law Section 56–0309 (12) of the Clean Water/Clean Air Bond Act of 1996 prohibits the sale, lease, exchange, donation, or other disposal of land acquired, developed, improved, restored or rehabilitated for parks projects or use for other than public park projects without express authority of the State legislature. Legislative approval of parkland alienation includes specific requirements, such as substitution of property.
- Sections 432.4 and 432.5 of Title 9 of the New York Codes, Rules and Regulations (“NYCRR”) set forth the procedures and requirements for alienation of Bond Act project parklands.

740. APPLICABLE COORDINATION
Coordination with other agencies and open space experts may be appropriate for gathering information needed for the CEQR review. In particular, coordination with DPR is appropriate for proposed projects that occur on parkland or other public open space under its jurisdiction, or require mitigation for significant open space impacts that occur on parkland or other open space under its jurisdiction.

750. LOCATION OF INFORMATION
For gathering open space information, many sources are available to lead agencies and CEQR applicants, including maps, property data, guidelines, reports, documents, files, and base maps of various parks and public open spaces.

The following is a list of agencies that have relevant information with respect to open space resources and policies.

- New York City Department of Parks and Recreation
  The Arsenal
  830 Fifth Avenue
  New York, NY 10065
  Natural Resources Group: 212-360-1417
  Operations & Management Planning: 212-360-8234
  Parklands: 212-360-3411
  Planning: 212-360-3403
- Operation Green Thumb
  49 Chambers Street, Room 1020
  New York, NY 10007
  212-788-8068

- Department of Parks and Recreation, Parkland Sectional Maps, City of New York, reference material only. Provides delineated parkland on maps.

- Department of Parks and Recreation, Property Lists, City of New York, reference material only. Provides name of park, acreage, facilities within park and Jointly Operated Playground sites, etc.

- Department of Parks and Recreation, "Property Folders," City of New York, reference material only. Provides real estate, historical, and natural history information.

- New York State Office of Parks, Recreation and Historic Preservation
  
  New York City Office
  Adam Clayton Powell, Jr. State Office Building
  163 W. 125th Street
  New York, NY 10027
  212-886-2740

- National Park Service of the U.S. Department of the Interior
  
  Manhattan Site:
  26 Wall Street
  New York, NY 10005
  212-825-6990

  Gateway National Recreation Area:
  Headquarters, Building 69
  Floyd Bennett Field
  Brooklyn, NY 11234
  718-338-3687

- New York City Department of City Planning
  
  22 Reade Street
  New York, NY 10007
  212-720-3300

  Demographics Division: 2000 Census and demographic data. Population and age data available by census tract.
  Waterfront and Open Space Division: Information on parks and open space programs and policies.

  Book and Map Sales Office
  Hours: 10 AM – 1 PM & 2 – 4 PM, Monday-Friday
  212-720-3667

**INFORMATION AVAILABLE ON STATE PARKS IN NEW YORK CITY**


**INFORMATION ON PUBLIC PLAZAS**
• Department of City Planning, Bytes of the Big Apple: Tax Block Base Maps in DXF Format, City of New York, March 1991.

• Department of City Planning, Bytes of the Big Apple: Tax Block Base Maps in Illustrator Format, City of New York, June 1992.

• Department of City Planning, Bytes of the Big Apple: LION Single Line Street Base Map in MapInfo format, on diskette, City of New York, March 1992.

• Department of City Planning, Recreation and Open Space in New York City: Community Districts with Lowest Parkland/Population Ratios, City of New York, January 1992.

**INFORMATION ON DESIGNATED GREENWAYS, EXISTING AND PROPOSED**


• Department of City Planning and Department of Transportation, *New York City Bicycle Master Plan*, May 1997.

**MAPS SHOWING RECOMMENDED BIKE ROUTES THROUGHOUT THE FIVE BOROUGHS**

• Department of City Planning and Department of Transportation, *NYC Cycling Map*, 2010.

**INFORMATION ON THE PROVISION OF OPEN SPACE IN ECONOMIC DEVELOPMENT PROJECTS**

• Department of City Planning & Municipal Art Society: 2000 Study of Public Plazas.
  
  New York City Department of City Planning
  Manhattan Office
  22 Reade Street, 6th Floor
  New York, NY 10007
  212-720-3542

• New York City Economic Development Corporation
  110 William Street
  New York, NY 10038
  212-619-5000

**INFORMATION ON OPEN SPACES IN HOUSING PROJECTS AND ON INTERIM SITE IMPROVEMENTS**

• New York City Department of Housing Preservation and Development
  Division of Property Management
  100 Gold Street
  New York, NY 10038
  212-863-7087
FOR PUBLIC SCHOOL PLAYGROUNDS AND OPEN SPACE OR RECREATIONAL FACILITIES, REQUESTS MAY BE MADE FOR SQUARE FOOTAGE OF SPECIFIC SITES. FOR JOINTLY OPERATED PLAYGROUNDS (JOPS), WHICH ARE OPERATED BY BOTH THE BOARD OF EDUCATION AND DPR, CONTACT THE RELEVANT COMMUNITY SCHOOL DISTRICT OFFICE FOR INFORMATION ON FACILITIES, ACCESSIBILITY, HOURS OF OPERATION, ETC.

- New York City Board of Education
  Division of School Facilities
  44-36 Vernon Boulevard,
  Long Island City, NY 11101
  718-349-5799

INFORMATION ON THE PROVISION OF OPEN SPACE IN HOUSING AUTHORITY PROJECTS
- New York City Housing Authority
  5 Park Place
  New York, NY 10007
  212-306-3000

INFORMATION ON THE SHORT- AND LONG-TERM LEASES OF CITY-OWNED LAND FOR OPEN SPACE USES
- Department of Citywide Administrative Services
  Division of Real Estate Services
  20th Floor, Municipal Building
  New York, NY 10007
  212-669-8888

2012 Technical Manual
Out of Date - DO NOT USE