

## A. INTRODUCTION

Unavoidable significant adverse impacts are defined as those that meet the following two criteria:

- There are no reasonably practicable mitigation measures to eliminate the impact; and
- There are no reasonable alternatives to the Proposed Actions that would meet the purpose and need for the actions, eliminate the impact, and not cause other or similar significant adverse impacts.

As described in Chapter 23, “Mitigation,” a number of the potential impacts identified for the proposed project could be mitigated. However, as described below, in some cases, project impacts would not be fully mitigated.

## B. SHADOWS

The analysis in Chapter 7, “Shadows” found that the proposed project’s development on Site A would result in a significant adverse impact on the 1.8-acre Grand Ferry Park. During the fall, winter, and early spring the utility of the park will be significantly impacted due to increased shadows on sun-sensitive features used by park visitors (e.g., benches, picnic tables, etc.) and the park’s vegetation would also be adversely affected. During the warmer months (April through October), all areas of the park would continue to get several hours of sun in the morning, and most areas of the park would get sun later in the afternoon as well. New shadow cast by the proposed building at Site A would move west to east across the park over the course of several hours in the middle of the day. The new shadow would not last for more than about two and a quarter hours on any one particular location, but the total duration of time from its entry at the western edge of the park to its exit at the eastern edge would range from about six and a half hours at the equinoxes to three and three quarters hours at the summer solstice. The several hours of incremental midday shadow would cause a significant adverse impact to the users of this open space during the fall, winter and early spring, and would likely also adversely impact the park’s vegetation.

The *CEQR Technical Manual* identifies several different measures that could mitigate significant adverse shadow impacts on open spaces. These measures include: relocating facilities within an open space to avoid sunlight loss; relocating or replacing vegetation; undertaking additional maintenance to reduce the likelihood of species loss; or providing replacement facilities on another nearby site. CEQR guidelines also discuss alternatives that may reduce or eliminate shadow impacts, including reorientation of building bulk or reorientation of the site plan. As described above, the significant adverse impact would occur at times of year when the viability of vegetation is not significantly affected by the incremental loss of sunlight. Therefore, replacing or relocating vegetation is not considered as a potential mitigation. Due to the narrowness of the site and its immediate proximity to Grand Ferry Park, it is not possible to alter

the site plan so as to avoid a substantial amount of shadow being cast on this open space. It should be noted that the proposed project would create approximately four acres of new public open space, including a connection to Grand Ferry Park. During all seasons, the project-created open space would provide new sunlit areas during times when Grand Ferry Park is experiencing areas of incremental shadow.

The applicant has consulted with the New York City Department of Parks and Recreation (DPR) and the New York City Department of City Planning (DCP) to develop the mitigation program. In order to address the significant adverse shadows impacts on Grand Ferry Park, the Restrictive Declaration, as discussed in Chapter 23, “Mitigation,” requires the applicant to provide funding for monitoring and maintenance of affected plantings within Grand Ferry Park and replacement, as necessary, with shade-tolerant species. While these funds would be used to enhance the quality of Grand Ferry Park, they would not reduce the incremental shadows cast by the proposed project. Therefore, the significant adverse shadows impact to Grand Ferry Park would only be partially mitigated by these measures.

### **C. HISTORIC RESOURCES**

As described in Chapter 8, “Historic Resources,” the buildings on the project site have been determined eligible for listing on the State and National Registers of Historic Places (S/NRs). The proposed project would demolish all structures on the project site with the exception of the complex known as “the Refinery.” The Refinery is composed of three buildings—the Filter, Pan, and Finishing Houses—and the complex was designated a New York City Landmark on September 25, 2007. The three structures would be preserved and renovated under the proposed project, and the New York City Landmarks Preservation Commission (LPC) has approved the project’s plans for their renovation and adaptive reuse. The demolition of the remaining S/NR-eligible buildings would constitute a significant adverse impact on architectural resources.

Measures to partially mitigate significant adverse impacts would be implemented in consultation with the New York State Office of Parks, Recreation, and Historic Preservation (OPRHP) and would be set forth in either a Memorandum of Agreement (MOA) or Letter of Resolution (LOR) to be signed by the applicant, SHPO, and other involved agencies. Mitigation measures include preparation of Historic American Engineering Record (HAER) documentation of the buildings on the site, which would include photographic documentation, historic plans, and an accompanying historical narrative; and consultation with SHPO with respect to the adaptive reuse design of the Refinery at the pre-final and final design stages. In addition, industrial artifacts would be included as part of an interpretive display, to include signage, as part of the proposed open space design. Items that are considered for salvage include machinery, crane rails, syrup tanks, elements of larger structures, and historic signage. The design intent of the interpretive display is to place the artifacts in a linear fashion to represent the sugar production process that took place on the site. The applicant will salvage the three sets of original wood doors on the Refinery’s Kent Avenue façade and seek to incorporate them into the design of the rehabilitated Refinery. Pursuant to the terms of the MOA or LOR, the salvage and reuse of industrial artifacts would be contingent upon their feasibility for salvage and reinstallation. \*