

A. INTRODUCTION

Public health is the effort of society to protect and improve the health and well-being of its population. The 2014 *City Environmental Quality Review (CEQR) Technical Manual* defines as its goal with respect to public health “to determine whether adverse impacts on public health may occur as a result of a proposed project, and if so, to identify measures to mitigate such effects.”

As described in Chapter 1, “Project Description,” the American Museum of Natural History (AMNH or the Museum) is proposing the construction of a new building, the Richard Gilder Center for Science, Education, and Innovation. The Museum is located in Theodore Roosevelt Park, which is City-owned parkland under the jurisdiction of the New York City Department of Parks and Recreation (NYC Parks). The Gilder Center would be an approximately 105-foot-tall (five-stories above grade; taking into account mechanical and elevator bulkheads, a portion of the rooftop would reach 115 feet), approximately 203,000-gross-square-foot (gsf) addition on the west side of the Museum complex facing Columbus Avenue. The proposed project would also include approximately 42,000 gsf of renovations to existing Museum space and improvements to approximately 75,000 square feet of open space in Theodore Roosevelt Park.

B. ASSESSMENT

According to the *CEQR Technical Manual*, for most proposed projects, a public health analysis is not necessary. Where no significant unmitigated adverse impact is found in other CEQR analysis areas, such as air quality, water quality, hazardous materials, or noise, no public health analysis is warranted. If an unmitigated significant adverse impact is identified in one of these analysis areas, the lead agency may determine that a public health assessment is warranted for that specific technical area.

The proposed project would have no known risks with respect to hazardous materials that cannot be controlled through the use of the measures described in Chapter 8, “Hazardous Materials” and Chapter 15, “Construction.” The measures, including pre-construction asbestos-containing materials (ACM) surveys; soil stockpiling, soil disposal and transportation measures; dust control; contingency measures if additional petroleum storage tanks or other contamination should be unexpectedly encountered; and a minimum two foot clean fill buffer in any landscaped or uncapped areas, ~~would be~~ documented in a New York City Department of Environmental Protection (DEP)-approved Remedial Action Plan (RAP) and associated Construction Health and Safety Plan (CHASP), which would be implemented during project construction.

As analyzed in Chapter 10, “Air Quality,” there would not be any significant adverse air quality impacts and as analyzed in Chapter 15, “Construction,” construction activities associated with the proposed project would not result in any significant adverse stationary or mobile source air

quality impacts. The proposed project would adhere to *New York City Air Pollution Control Code* regulations regarding construction-related dust emissions, and to *New York City Administrative Code* limitations on construction-vehicle idling time.

As analyzed in Chapter 12, “Noise,” there would not be any significant adverse noise impacts upon completion of construction. As analyzed in Chapter 15, “Construction,” construction of the proposed project would not only include noise control measures as required by the *New York City Noise Control Code*, but would include additional measures such as the use of quieter equipment (i.e., cranes, quieter generators, person lifts, landscaping excavators, and landscaping loaders), materials delivery and truck queuing within the enclosed construction area rather than on the street, additional shielding of equipment, and the installation of partially enclosed structures to house the concrete pump and two concrete mixer trucks as they access the pump and to house concrete mixer trucks as they are washed out before leaving the site. Notwithstanding these noise control measures, the updated construction noise analysis identified locations that would experience temporary exceedances of CEQR Technical Manual noise impact criteria. At times over the course of construction of the proposed project, and particularly during the most noise-intensive construction activities, noise would be readily noticeable and potentially intrusive.

At open space receptors within Theodore Roosevelt Park, the greatest noise levels during construction were predicted to occur intermittently over the course of up to approximately 13 months. At the nearest residential receptors to the construction work area, the greatest noise levels during construction were predicted to occur intermittently over the course of up to approximately 3 months. While the noise from construction would be noticeable at times, the duration of the highest levels of construction noise at any given area would be limited and would typically occur during weekday daytime hours, rather than during the evening or night-time hours when residences are most sensitive to noise. At other receptors near the project area, including school receptors, noise resulting from construction of the proposed project may at times be noticeable, but would be temporary and would generally not exceed typical noise levels in the general area. Furthermore, the expected levels of noise are typical of New York City construction projects and would comply with all New York City Noise Control Code and New York City Department of Buildings (DOB) restrictions on construction noise. Based on the limited duration of the predicted construction noise, the moderate total noise levels during most of the construction period, and the other factors discussed above, construction noise associated with the proposed project would not be expected to result in significant adverse impacts.

~~the detailed construction noise analysis identified two residential buildings (101 and 112 West 79th Street [which uses the address 118 West 79th Street]) where construction of the proposed project would result in increases in noise levels that would exceed CEQR noise impact criteria and result in interior noise levels that exceed CEQR noise exposure guidance at times throughout the 36-month construction period. While the expected levels of noise are typical of New York City construction projects and would comply with all New York City Noise Control Code and New York City Department of Buildings (DOB) restrictions on construction noise, the level and duration of construction noise at these buildings would constitute a temporary significant adverse noise impact under the New York State Environmental Quality Review Act (SEQRA) and CEQR. The highest levels of construction noise at these receptors would result from rock excavation using mounted impact hammers. The greatest noise levels would occur intermittently over a period of approximately 5 months. However, the predicted impacts at 101 and 112 (118) West 79th Street could be fully mitigated using either receptor control measures or source control measures, as described in Chapter 17, “Mitigation.” Accounting for the proposed~~

construction and logistics plan, construction noise from the project does not represent a significant impact. Nonetheless, because receptor control measures were previously considered for 101 West 79th Street and 112 (118) West 79th Street based on the findings of the DEIS (i.e., storm windows and air conditioning units at residences that do not already have air conditioning), AMNH has committed to make an offer of these measures to residents of those two buildings. In addition, the predicted construction noise levels would be below relevant health-based thresholds, including World Health Organization (WHO) and Occupational Health and Safety Administration (OSHA) thresholds for potential hearing damage. Outside of the construction work hours, nearby residences and open space users would not experience elevated noise levels as a result of construction. Consequently, the predicted ~~significant adverse~~ construction noise ~~impacts levels~~ would not have the potential to result in a significant adverse public health impact.

Therefore, the proposed project would not result in significant adverse public health impacts. *