10 HAZARDOUS MATERIALS

10.1 Introduction

The 2021 *CEQR Technical Manual* defines hazardous materials as substances that pose a threat to human health or the environment. Substances of concern include, but are not limited to, heavy metals, volatile organic compounds (VOCs) (including petroleum-related VOCs, chlorinated VOCs, and methane), semivolatile organic compounds (SVOCs), polychlorinated biphenyls (PCBs), and hazardous wastes (as defined by 6 New York Codes, Rules, and Regulations [NYCRR] Part 371).

Potential routes of exposure to hazardous materials can include direct contact, such as contact between contaminated soil and skin (dermal contact), breathing of VOCs or chemicals associated with suspended soil particles (inhalation), or swallowing soil or water (ingestion). Per the *CEQR Technical Manual,* public health may also be threatened when soil vapors migrate through the subsurface or along preferential pathways (such as a building foundation, utility conduit, or duct) and accumulate beneath a concrete slab or inside a basement, thereby resulting in an explosive, oxygen-deficient, or hazardous atmosphere.

The Development Site is an approximately 18-acre portion of Ferry Point Park (the "Park") and is part of Bronx Block 5622, Lot 1. The Park is 413.8 acres and is bisected by the Whitestone Bridge and the Hutchinson River Expressway. Most of the area of the Park to the east of the Whitestone Bridge was formerly used as an approximately 222-acre, municipal solid waste landfill but is currently used as the Bally's Golf Links at Ferry Point (the "Golf Course").

The Proposed Actions would facilitate the development of the Proposed Facility, an approximately 3,093,880-gross-square-foot (gsf) gaming facility on the Development Site. As part of the Proposed Actions, a replacement standalone golf clubhouse would be redeveloped north of the Proposed Facility, and improvements would be made to Ring Road. The existing Park access roadway west of where the Proposed Facility would be located (the "Waterfront Access Roadway") would be improved so that it can also be used to access portions of the Proposed Facility. Collectively, the Development Site and the improved Ring Road comprise the "Affected Area." The Proposed Facility, replacement

golf clubhouse, improved Waterfront Access Roadway, and improvements to Ring Road comprise the "Proposed Development."

10.2 Principal Conclusions

Development Site

The Proposed Actions would not result in significant adverse hazardous materials impacts. While the Development Site operated as a municipal solid waste landfill between 1951 and the mid-1960s, engineering and institutional controls and ongoing regulatory oversight preclude the potential for significant adverse hazardous materials impacts. A vapor barrier and active vapor mitigation system would be incorporated into the design of the Proposed Facility and replacement golf clubhouse.

In the 1990s and as part of the development of the Golf Course, a landfill gas interception and venting system was installed in the former landfill to reduce the potential for landfill gas accumulation.

An Environmental Assessment Statement (EAS) was prepared in 1999 (CEQR No. 99DPR006X) by Allee King Rosen & Fleming, Inc. to evaluate the area occupied by the Golf Course for development as a public recreational facility. As reported in the EAS in 1999, test programs indicated high methane concentrations at some locations at a depth of two- to three-feet below the surface of the landfill; however, negligible concentrations were found at the surface. Additionally, sampling indicated the presence of SVOCs, PCBs, arsenic, and lead above risk-based criteria.

In 2000, the New York State Department of Environmental Conservation (NYSDEC) issued Part 360 Permit No. 2-6006-00014 (the "Part 360 Permit") to allow the import and placement of nonhazardous, regulated fill necessary to construct the Golf Course. The final cover system was installed throughout the former landfill area of the Park to provide a barrier of uncontaminated soil and prevent exposure to underlying landfill material. The final cover is composed of a topmost layer (a matrix of vegetation, asphalt, gravel, concrete, or paver systems) followed by barrier protection material (BPM), consisting of clean soil meeting permit requirements ranging from one to two feet deep. The BPM contains surface drainage system elements and, in select areas, overlays a demarcation layer, which separates the BPM from the nonhazardous regulated fill material (shaping material) and existing landfill material.

The Development Site contains out-of-bounds areas of the Golf Course and areas capped by the pavement of the parking lot. The Part 360 Permit was modified several times to allow additional nonhazardous, regulated fill and changes in design features. In total, approximately 2,370,000 CY of nonhazardous, regulated fill was imported to the Golf Course. The most recent modified version of the Part 360 permit, which is now expired, is provided in Appendix F.

As noted previously, during development of the Golf Course a landfill-gas ventilation system was installed in the 1990s to prevent accumulation of landfill gas. This landfill-gas ventilation system is primarily a passive system located throughout the Park, including the Development Site; however, active vapor-removal-infrastructure exists in the on-site clubhouse. The passive system includes vent wells installed throughout the former landfill as well as venting trenches along the perimeter of the Golf Course to prevent off-site migration. The active landfill gas system within the on-site clubhouse building includes a sub-membrane depressurization (SMD) system with blowers to extract gas through vents

from the landfill's subsurface (below the building slab), and continuous explosive gas monitoring components. In 2013, NYC Parks prepared a Post Construction Custodial Care Plan (PCCCP) to comply with the requirements of 6 NYCRR Part 360 (see Appendix F). The PCCCP- defines the post-construction criteria applicable to operate, monitor, and maintain the environmental protection systems installed at the former landfill. In addition, 6 NYCRR Part 360 requires a -Declaration of Covenants and Restrictions to be- recorded against the former landfill property and -requires written authorization from NYSDEC for a change of use other than the current use.

Maintenance and monitoring of the landfill-gas system is performed in accordance with the operations, monitoring and maintenance (OM&M) program detailed in the 2013 Landfill Gas Management Plan (LFGMP). In accordance with the PCCCP, any new buildings require installation of active vapor mitigation systems. Two areas of assumed collection piping are located within the bounds of the Development Site, one in the western part of the Development Site, and one in the southern part of the Development Site. Adjustments to the monitoring system may requested by NYSDEC. During construction, passive collection piping will be maintained to the extent feasible or removed and replaced as necessary for continued landfill gas monitoring.

Per the *2023 Semi-Annual Post Closure Certification Report* – the latest available post closure report available – environmental systems and monitoring are ongoing at the Golf Course. Most recent reporting indicates that:

- the cover system remains in good condition with some areas that required reseeding and mulching, clearing of clogged drains, and some areas of washout into cart paths;
- the asphalt surface of the parking lot continues to function as a suitable landfill cover system, providing an exposure barrier between the public and subsurface materials. Observed cracks are surficial and do not penetrate through the full asphalt cap; and
- groundwater in certain locations beneath Golf Course contains VOCs, SVOCs, metals, ammonia, sulfate, and cyanide above NYSDEC Ambient Water Quality Standards (AWQS). Detections of VOCs, SVOCs, metals, and phenolics during groundwater sampling in 2023 are generally consistent in location or concentration with previous sampling events. The presence of cyanide in groundwater is generally consistent with other previous post-closure monitoring events, however, exceedances of the AWQS were only reported during the 2023 sampling event at two sampling locations.
- gas monitoring results from the landfill-gas system are consistent with previous post-closure monitoring events and suggest landfill gas conditions are stable.

The Proposed Development would be supported by deep foundations such as displacement piles anchored in bedrock, drilled piles, or steel/precast concrete piles. Installation of these piles would require a breach of the landfill cap and excavation of material underlying the existing cap. Anticipated regrading and surface soil displacement is estimated to extend across approximately 18 acres of the Development Site and approximately 4.89 acres for the expansion of Ring Road.

Ground-intrusive activities necessary to develop the Proposed Facility would be conducted pursuant to a Change of Use Work Plan (see ~~draft plan in~~ Appendix F) approved by NYSDEC, and environmental oversight and monitoring would be conducted under the supervision of a NY State licensed engineer. Per the Change of Use Work Plan, the NY State licensed engineer would oversee the screening of excavated material, observe the ~~imported~~ importation of materials, and implement both a community air monitoring plan (CAMP) and stormwater pollution prevention plan (SWPPP) to ensure that air and water

quality would not be negatively affected by construction. Excavated material would be characterized prior to excavation and would be disposed in accordance with applicable local, state, and federal regulations at an approved permitted disposal facility. The Change of Use Work Plan was conditionally approved by NYSDEC on April 30, 2025, with the provision that final design plans for the foundation, support of excavation, and site cover plans be provided to NYSDEC once complete (see Appendix F).

A vapor barrier and active vapor mitigation system would be incorporated into the design of the Proposed Facility and replacement golf clubhouse. The slabs of the new buildings along with other paved surfaces or a two-foot clean soil cap would comprise a new site cap across the Development Site. These measures would preclude impacts from potential soil vapor contaminants in the Proposed Facility and the replacement golf clubhouse.

The existing landfill infrastructure within the Development Site would be maintained in place to the extent feasible. The infrastructure that cannot be maintained would be replaced in-kind or relocated to a suitable alternate location within the Development Site in coordination with NYSDEC. The existing clubhouse and associated vapor mitigation system would be demolished and replaced during the Proposed Development. Stormwater at the Development Site would be managed and discharged in accordance with the New York City Department of Environmental Protection (NYCDEP) and other applicable regulatory agencies.

The Change of Use Workplan would govern operations during construction. Following completion of subsurface work but prior to completion of overall construction, a new, separate PCCCP would be developed to define the future operation, maintenance, and monitoring requirements for the operator of the Development Site, while the existing PCCCP would be updated to exclude the alienated parcel and associated infrastructure. Both PCCCPs would identify use restrictions and provisions to ensure that the engineering and institutional controls remain in place and are effective at the former landfill. Provisions of the PCCCP would include operation, monitoring, and maintenance of environmental protection systems, as needed, post-construction. Future monitoring within the Development Site would be the responsibility of Bally's rather than NYC Parks, thereby reducing the obligation of the City of New York to dedicate resources to monitor the Development Site.

The existing Declaration of Covenants and Restrictions would be amended to remove the alienated parcel and a new Declaration of Covenants and Restrictions would be created specifically for the alienated parcel (see Appendix F). Oversight provided by NYSDEC through the Change of Use Work Plan, PCCCPs and Declarations of Covenants and Restrictions, precludes the potential for significant adverse hazardous materials impacts on the Development Site.

Ring Road

As a part of the Proposed Development, Ring Road would be improved to enhance circulation, safety, and access to the Development Site for pedestrians, cyclists, and vehicles. Ring Road would remain under ownership of the City of New York and would be transferred from NYC Parks to New York City Department of Transportation (NYCDOT). Ring Road exists outside the bounds of the former landfill and jurisdiction of the PCCCP. Therefore, a Phase I Environmental Site Assessment (ESA) was conducted in September 2024 to evaluate environmental conditions.

The 2024 Phase I ESA identified two Recognized Environmental Conditions (RECs) associated with the historic use of surrounding properties. Based on the findings of the

Phase I ESA, a Phase II Environmental Site Investigation (ESI) work plan, which includes a health and safety plan, was prepared and submitted to NYCDEP for review and approval. NYCDEP conditionally approved the Phase II ESI work plan in a letter dated 30 September 2024, and the final Phase II ESI work plan was dated October 4, 2024. The Phase II ESI ~~will~~ included the collection of soil and groundwater samples along Ring Road. Results of the Phase II ESI did not identify anomalies indicative of underground storage tanks (UST), and did not identify VOCs, pesticides, herbicides, or PCBs above the applicable standards in soil and groundwater samples. Non-native fill was identified and included SVOCs and metals at concentrations that exceeded applicable standards. SVOCs, dissolved metals, perfluorooctanoic acid (PFOA), and perfluorooctanesulfonic acid (PFOS) were also identified in groundwater samples at concentrations above drinking water standards.

Based on the findings of the Phase II ESI, a R~~r~~emedial ~~action~~ Action ~~plan~~ Plan (RAP) and ~~construction~~ Construction ~~health~~ Health and ~~safety~~ Safety ~~plan~~ Plan (CHASP) were prepared and submitted to NYCDEP for approval. The RAP was approved June 5, 2025, and determined to be consistent with NYCDEP's requirements for remediation. The RAP includes provisions for managing soil/fill in accordance with applicable Federal, State, and local requirements, and guidelines for temporary on-site stockpiling and reuse, soil/fill import, and off-site transportation and disposal of soil/fill. ~~may be required. If required, the RAP and CHASP would be completed for the Final EIS and would be reviewed and approved by NYCDEP prior to the start of development.~~ The RAP also includes the description and requirements for placement of a site cover system, which will act as an engineering control (EC) for the development of Ring Road, and provisions for institutional controls (IC), which may be required to commit the property owner and/or controlling agencies to maintaining the improvements. If required, the ECs and ICs will be will be managed under a Site Management Plan (SMP) which will be included in the Remedial Closure Report (RCR).~~If required by NYCDEP, institutional controls may also be necessary to ensure the maintenance and oversight of any required engineering controls.~~

If encountered during the reconstruction of Ring Road, hazardous materials or municipal solid waste would be handled per local, state, and federal regulations. NYCDOT oversight on the improvements to Ring Road, and compliance with local, state, and federal regulations would preclude the potential for significant adverse hazardous materials impacts. Therefore, the Proposed Actions do not have the potential to result in hazardous materials impacts from the proposed widening of and improvements to Ring Road.

10.3 Methodology

The *CEQR Technical Manual* indicates that a hazardous materials analysis is warranted if a project would result in development on a government-listed site such as a solid waste landfill. The Proposed Actions warrant a hazardous materials assessment because the Proposed Actions would include ground intrusive disturbance of the capped landfill and Ring Road. Since the Development Site is located on a former landfill, NYSDEC is considered an involved agency and has reviewed this chapter of the Environmental Impact Statement (EIS).

Development Site

Per the Final Scope of Work, this hazardous materials analysis discusses the former municipal solid waste landfill use, the fill materials subsequently imported to the site, and the monitoring and maintenance requirements described in the PCCCP. Following the guidance of the *CEQR Technical Manual* and Section 24-04 of the Rules of the City of New

York, this review process includes a review of the past and current uses of the Development Site. Current and historical environmental resources were reviewed to determine whether the project-generated development may increase the potential for human exposure to hazardous materials. Existing historical investigation and closure reports document the subsurface conditions beneath the former landfill.

Ring Road

This hazardous materials assessment also summarizes the findings of the Phase I ESA, ~~and~~ Phase II ESI, and RAP ~~Work Plan~~ for Ring Road.

The objective of a Phase I ESA is to identify the presence or likely presence, use, or release of hazardous substances or petroleum products, as defined in American Society for Testing and Materials (ASTM) E1527-21 as a REC. A Phase I ESA also identifies historical recognized environmental concerns (HREC). An HREC is defined by ASTM E1527-21 as a previous release of hazardous substances or petroleum products affecting the subject property that has been addressed to the satisfaction of the applicable regulatory authority and meets unrestricted use (UNRES) criteria established by a regulatory authority without subjecting the property to any regulatory controls. Typically, a Phase I ESA qualitatively evaluates environmental conditions within a particular area.

The Phase II ESI ~~Work Plan~~summarizes the subsurface investigation, environmental sampling, and laboratory analyses ~~was developed~~ performed to evaluate the RECs identified by the Phase I ESA and satisfy the NYCDEP requirements for a Phase II ESI ~~Work Plan~~ outlined in the *2021 CEQR Technical Manual.* The RAP is consistent with NYCDEP requirements for remediation and includes descriptions for the remedial actions associated with the development of Ring Road and associated park land. The~~Both~~ documents were reviewed and approved by NYCDEP (see Appendix F).

Impact Criteria

Per the *CEQR Technical Manual*, the potential for significant impacts from hazardous materials occurs when hazardous materials exist on a site and an action could increase pathways to their exposure to humans or the environment. Potential routes of exposure to hazardous materials can include dermal contact, inhalation, or ingestion. However, per the *CEQR Technical Manual*, conditions of contamination that are generally not considered significant adverse impacts include:

- When hazardous material concentrations in groundwater exceed NYSDEC Class GA groundwater quality standards listed in TOGS, unless there is a potential route of exposure through drinking water, vapor intrusion into buildings or structures, or groundwater recharge to surface waters, or the proposed project involves impacts associated with dewatering.
- In certain circumstances – particularly when asbestos and lead are present – compliance with applicable regulatory requirements would prevent significant impacts. For example, if the project requires demolition or renovation of a building containing asbestos, compliance with applicable regulatory requirements is necessary whether the project is also subject to CEQR.
- If an institutional control related to hazardous materials has been imposed on the project site or will be imposed on the site as part of the project, compliance with the terms and conditions of the institutional control may preclude the potential for significant adverse impacts.

Significant adverse hazardous materials impacts may also occur if an action would introduce new activities or processes using hazardous materials, or if the Proposed Actions have the potential to introduce a population to potential human or environmental exposure from off-site sources.

Data Sources

This hazardous materials assessment relies on the findings of the following informational sources (see Appendix F):

- *Ferry Point Park Environmental Assessment Statement* (EAS) and supporting analyses dated September 30, 1999, prepared by Allee King Rosen & Fleming, Inc.;
- the *Supplemental Engineering Report for the Solid Waste Management Facility Permit Application for Ferry Point Park East Bronx, New York* last revised on October 15, 2013, prepared by Ecology and Environment Engineering, P.C., for NYSDEC on behalf of NYC Parks;
- the *Ferry Point Park East Landfill Gas Management Plan* last revised October 15, 2013, prepared by Ecology and Environment Engineering, P.C. on behalf of NYC Parks;
- the *Ferry Point Park East Post Construction Custodial Care Plan* dated October 2013, prepared by NYC Parks on behalf of NYSDEC;
- the most recent Part 360 Permit issued to the Golf Course, dated May 21, 2014, issued by NYSDEC;
- the *Ferry Point Park Golf Course & Community Park Bronx, New York Final Construction Certification Report* dated October 19, 2015, prepared by NYC Parks on behalf of NYSDEC;
- the *Final Construction Certification Report: Subslab Depressurization System & Gas Line Installation* dated November 26, 2019, prepared by Maser Consulting P.A. for NYSDEC on behalf of NYC Parks; and
- the *2023 Semi-Annual Post-Closure Certification Report* dated October 2023, prepared by GEI Consultants, Inc., P.C. for NYSDEC on behalf of NYC Parks.

10.4 Existing Conditions

The Park is part of the NYC Parks system and is operated and maintained by NYC Parks' Borough of the Bronx Operations and Maintenance division.

The Development Site is an approximately 18-acre parcel located entirely within the Park and is bounded by Hutchinson River Expressway to the west, and otherwise bounded by the Golf Course and Park. Ring Road is the uninterrupted circular roadway within the Park that connects the southbound and northbound Hutchinson River Expressway service roads (see Appendix C for the metes and bounds of the parcels comprising the Affected Area). The Development Site is improved with the Golf Course clubhouse, parking lot, a portion of the Golf Course practice area, and other landscaped areas.

Development Site History

The Park was created through a combination of land purchase and reclamation. The Park's original 171 acres were purchased by the City in proceedings to acquire land for the

Whitestone Bridge in 1937, and plans were made for a beach, bathhouse, and cafeteria complex with a bus terminal and parking field. When the portion of the Park that is west of the Whitestone Bridge opened in 1941, the design had been scaled back and included a comfort station, baseball diamonds, an overlook, and picnic areas. In 1948, two park additions totaling 243 acres were acquired by condemnation.[1]

The NYC Department of Sanitation (DSNY) operated a municipal solid waste landfill on a portion of the Park to the east of the Whitestone Bridge from 1952 to 1970. The Development Site is within the footprint of the former landfill.

In the late 1990s, NYC Parks entered into a license agreement with Ferry Point Partners, LLC (FPP) to develop, construct, and operate a new public golf course, community park, waterfront park, and related facilities. In 1999, an EAS (CEQR No. 99DPR006X) was prepared by Allee King Rosen & Fleming, Inc. to evaluate the former landfill for development as a public recreational facility. The EAS was completed pursuant to City Environmental Quality Review (CEQR), and in conformance with the State Environmental Quality Review Act (SEQRA) in support of an application by NYC Parks for major concession and to demap two unbuilt and undeveloped streets – Emerson Avenue between Miles and Schley avenues, and Schley Avenue between Buttrick and Emerson avenues. The major concession was also subject to the City's Uniform Land Use Review Procedure (ULURP).

In relation to hazardous materials, the 1999 EAS prepared by Allee King Rosen & Fleming, Inc. reported that:

- Soil borings and soil and gas sampling showed results consistent with a municipal landfill;
- Test programs indicated high methane concentrations at some locations at a depth of two- to three-feet below the surface of the landfill; however, negligible concentrations were found at the surface;
- Waste test materials indicated SVOCs, PCBs, arsenic, and lead above risk-based criteria.
- Soil cover test results indicated that SVOCs and arsenic exceeded risk-based criteria at a limited number of locations.

The development of the Golf Course incorporated measures to minimize exposure pathways for both methane and soil contaminants:

- A health and safety plan;
- A landfill gas interception and venting system was installed to reduce the potential for landfill gas accumulation. There are currently four confirmed passive vent wells within the bounds of the Development Site and two areas of assumed collection piping in the western and southern parts of the site;
- A 12- to 24-inch-thick final cover of topsoil comprising nonhazardous regulated soil materials was imported to the Golf Course to cover contaminants in the soil and waste materials; however, in the rough waste (out-of-bounds) areas of the Golf Course, a minimum of six inches of material was placed or retained;

[1] https://www.nycgovparks.org/parks/ferry-point-park/history#:~:text=The%20original%20parcel%20of%20171,for%20the%20Bronx%2DWhitestone%20Bridge.

- A monitoring well network to monitor groundwater quality across the former landfill, including one confirmed well within the southern part of the Development Site; and
- A commitment was made to dispose of waste materials excavated during construction in compliance with all applicable rules and regulations.

On July 17, 2000, NYSDEC issued the Part 360 Permit jointly to FPP and NYC Parks to allow the import and placement of a total of 1,000,000 cubic yards (CY) of nonhazardous regulated fill necessary to construct the Golf Course. NYCRR Part 360 required that a PCCCP be established to set post-construction and monitoring requirements associated with the former landfill use and the construction of the Golf Course. Several modifications to the Part 360 Permit allowed additional nonhazardous regulated fill and changes in design features. In total, approximately 2,370,000 CY of nonhazardous regulated fill was approved for import to cap the former landfill area with a soil cover of varying thickness. The cover system in the proposed area of development consists of a topmost layer (including vegetation, asphalt, and other ground cover), followed by 12 to 24 inches of barrier protection material, a demarcation barrier in select areas, and shaping material above the landfill material.

During construction of the Golf Course and clubhouse, solid waste was generated throughout the site development and excavation phases. Solid waste material was not used as fill material on-site after it was encountered, except for the solid waste excavated and reused on-site and in accordance with an Order on Consent issued by NYSDEC as of January 4, 2004 (Order on Consent No. R2-20030724-187). Per the Part 360 Permit, municipal solid waste at the Development Site was transported and secured into segregated stockpile locations prior to off-site disposal. Municipal solid waste material consisted of metal, glass, tires, plastics, rubber, paper, fabrics, and miscellaneous debris. Prior to stockpiling excavated solid waste, the existing ground surface was covered with an impermeable plastic membrane. The stockpile was then encircled with silt fence and covered with an impermeable plastic that was secured with sandbags prior to off-site disposal.

In 2007, NYC Parks terminated the license agreement with FPP and took over development responsibilities of the waterfront park and the Golf Course.

In 2015, the 18-hole Golf Course was completed over the former landfill. A Declaration of Covenants and Restrictions recorded in December 2015 requires, among other things, that written authorization be obtained from NYSDEC for a change of use other than for the current use. Beginning in 2015, Trump Ferry Point, LLC operated the Golf Course.

In September 2023, the concession to operate the Golf Course was transferred to Bally's. NYC Parks remains responsible for inspection monitoring, reporting, and oversight of operations and maintenance of the Park, while operating infrastructure and monitoring within the Development Site will become the responsibility of Bally's.

Monitoring

A PCCCP was established in 2013 to comply with the requirements of 6 NYCRR Part 360 and to define the post construction criteria applicable to the operation, monitoring and maintenance of the environmental protection systems installed in the former landfill. As construction activities were still on-going at the time of initial 2013 submission, relevant changes and additions associated with final construction were incorporated into an amended subsurface operations plan. As part of this addendum, NYC Parks was required to submit post construction documentation such as a stormwater pollution prevention

plan, maintenance documentation per the state pollution discharge elimination system general permit, and documentation of installation of the sub-slab depressurization system in the clubhouse building.

Based on the as-built drawings of the Golf Course and the 2023 Semi-Annual Post Closure Certification Report, the following environmental systems and/or monitoring are ongoing within the Development Site:

- Quarterly monitoring of the final cover system and biannual infrastructure inspections;
- Semi-annual inspections of the asphalt pavement of the clubhouse parking lot;
- Monthly piezometer monitoring;
- The sub-slab depressurization system beneath the current Golf Course clubhouse is being monitored on a quarterly basis;
- Groundwater monitoring wells are currently being sampled on a biennial basis;
- Landfill gas (LFG) monitoring wells and passive vents are being monitored on a quarterly basis;
- One settlement plate is present within the Development Site; however, as of June 15, 2023, NYSDEC approved the termination of future settlement plate monitoring, as long as the former landfill continues to be utilized and maintained in its current condition as a golf course;
- Four unconfirmed LFG passive vent wells and two unconfirmed LFG collection pipes were identified in the Development Site; however, these do not appear to be part of the ongoing monitoring program and it is unknown if these have been closed in place.

As-built drawings that show existing infrastructure within the Development Site are included in Appendix G.

Per the *2023 Semi-Annual Post Closure Certification Report* – the latest available post closure report available – environmental systems and monitoring are ongoing at the Golf Course. In relation to the Development Site, the most recent reporting indicates that:

- the cover system remains in good condition with some areas that required reseeding and clearing of washout into cart paths;
- the asphalt surface of the parking lot continues to function as a suitable landfill cover system, providing an exposure barrier between the public and subsurface materials. Observed cracks are surficial and do not penetrate through the full asphalt cap; and
- groundwater within the bounds of the Development Site contains VOCs, metals, and cyanide above NYSDEC Ambient Water Quality Standards. Detections of VOCs and metals during groundwater sampling in 2023 are generally consistent in location or concentration with previous sampling events. The presence of cyanide in groundwater is generally consistent with other previous post-closure monitoring events, however, exceedances of the Ambient Water Quality Standards were only reported during the 2023 sampling event at two sampling locations.

Ring Road

Phase I ESA (September 2024)

The Phase I ESA for Ring Road was conducted in September 2024 in accordance with the ASTM Practice E1527-21, the U.S. Environmental Protection Agency's All Appropriate Inquiry (AAI) Rule, and industry standard practice. The Phase I ESA identified two RECs:

- REC 1 – Current and Historical Use of the Adjoining and Surrounding Properties: Historical adjoining and surrounding use of the Development Site, within the footprint of a former municipal solid waste landfill, a United Parcel Service (UPS) facility with petroleum and chemical bulk storage, and a Metropolitan Transportation Authority (MTA) bridge support facility with petroleum bulk storage are proximate to Ring Road. Documented and undocumented spills or releases of petroleum products of hazardous substances associated with these properties have adversely affected groundwater and/or soil vapor near Ring Road.
- REC 2 – Non-Native Fill: Non-native fill is ~~potentially beneath~~expected to underly Ring Road above native soil. Non-native fill in New York City may contain contaminants, particularly metals and SVOCs, at concentrations that exceed applicable state and/or federal standards.

Phase II ESI Work Plan (September 2024)

A Phase II ESI Work Plan, which included a health and safety plan, was prepared and approved in September 2024 that outlines the subsurface investigation, environmental sampling, and laboratory analyses to be performed. The Phase II ESI Work Plan focused on areas identified as RECs in the Phase I ESA, and ~~the Phase II ESI~~ include~~d~~s ~~the following investigations~~scope of work:

Geophysical Survey

- A geophysical survey to locate any buried utilities near Ring Road and the proposed sampling locations;

Soil

- 42 soil borings installed across the development boundaries of Ring Road (one about every 100 linear feet);
- Two soil samples collected from each soil boring (a total of 84 soil samples from the borings);
- Laboratory analysis of surface soil samples (0-2 feet below grade surface [bgs]) and subsurface soil samples (~~2~~5-~~7~~5 feet bgs);
- ~~A third soil sample at select sampling locations may be taken if indications of impacts are identified; and~~

~~-~~*Groundwater*

- Convert ~~Ten~~ ten soil boring locations ~~will be converted~~ into temporary groundwater monitoring wells and collect ten groundwater samples ~~will be collected~~for laboratory analysis.

~~Sample locations are shown in the Phase II Work Plan included in Appendix F.~~

There are no enclosed structures along Ring Road or in the adjacent area; therefore, no soil vapor sampling wais proposed. The Phase II ESI work plan proposed Soil and groundwater samples would be submitted for a full laboratory analysis of volatile organic compounds (VOCs), semi-volatile organic compounds (SVOCs), polychlorinated biphenyls (PCBs), Target Analyte List (TAL) metals, pesticides and, herbicides, and polyfluoroalkyl substances (PFAS)for all soil samples, with PFAS analysis at select boring locations. The Phase II ESI work plan also stated that groundwater samples would be analyzed for VOCs, SVOCs, PCBs, TAL metalsAll groundwater samples would also be analyzed for both (dissolved and total) metals, pesticides, herbicides, and PFAS.

Phase II ESI Report (April 2025)

Following completion of the Phase II ESI field work and laboratory analysis, a Phase II ESI Report summarizing the findings of the investigation would bewas prepared. Soil analytical results would bewere compared to the NYSDEC Part 375-6.8(a) Restricted Use Restricted-Residential (RURR) Soil Cleanup Objectives (SCOs) and the NYSDEC Part 375 RURR guidance values for PFASand ; groundwater samples would bewere compared to the Division of Water Technical and Operational Guidance Series (TOGS) 1.1.1 Ambient Water Quality Standards (SGVs).

The Phase II ESI included the following findings and conclusions (see Appendix F):

- Anomalies indicative of potential underground storage tanks were not identified.
- Non-native fill was identified throughout the investigation area.
- VOCs, pesticides, herbicides, and PCBs were not identified in soil samples at concentrations exceeding any RURR SCOs.
- PFOA and PFOS were not identified in soil samples above RURR guidance values.
- SVOCs and metals were identified in non-native fill at concentrations exceeding the RURR SCOs throughout the investigation area. These concentrations of SVOCs and metals are typically found in non-native fill throughout New York City and are not indicative of a release of hazardous materials.
- SVOCs and dissolved metals (iron, magnesium, manganese, sodium, and thallium) were identified at concentrations exceeding the NYSDEC SGVs for groundwater. SVOCs identified in groundwater samples above the NYSDEC SGVs are likely due to entrained sediment in the sample from non-native fill.
- PFOA and PFOS were identified at concentrations exceeding the NYSDEC SGVs in groundwater; however, an on-site source was not identified.

Remedial Action Plan (May 2025)

Following the environmental investigations, a RAP was submitted to NYCDEP May 27, 2025, and approved by NYCDEP June 5, 2025, prior to the publication of the Final EIS (see Appendix F). The RAP includes the following remedial action requirements:

- Removal and disposal of the existing concrete and asphalt cover. Asphalt and concrete would be managed and disposed in accordance with Part 360: Solid Waste Management Facility regulations.
- Excavation of soil and any miscellaneous debris ranging from 1 to 5 feet for improvements to and expansion of Ring Road.

- Registering and removing unknown petroleum storage tanks, if encountered, in accordance with NYSDEC requirements.
- Handling, transportation, and disposal of excavated fill and native overburden soil in accordance with NYSDEC regulations Part 360: Solid Waste Management Facilities and Part 364: Waste Transporter Permits, and other applicable local, State, and Federal regulations.
- Collection and analysis of confirmation samples of grossly impacted areas, if identified during excavation.
- Importation and/or reuse of soil/fill in accordance with 6 NYCRR Part 360 and the NYSDEC Division of Environmental Remediation (DER) Technical Guidance for Site Investigation and Remediation to facilitate construction of the expanded roadway and proposed sidewalks and to raise overall grade of the NYCDOT improvements to a working elevation ranging from about elevation (el) 8 to 13 with respect to the North American Vertical Datum of 1988 (NAVD88).
- If necessary, local dewatering in compliance with City, State, and Federal laws and regulations. Extracted groundwater will either be containerized for off-site disposal at a permitted facility or will be treated under a permit from NYCDEP to meet pretreatment requirements prior to discharge to the sewer system.
- Implementing CAMP during all ground-intrusive activities.
- Capping the developed area of Ring Road with impervious surface cover (e.g., concrete or asphalt). Other improvements to the site are planned outside of Ring Road (e.g., bike lane and landscaping). Any pervious areas located within these improvements will be capped with a minimum of two feet of clean material (i.e., native crushed stone, soil, or topsoil meeting 6 NYCRR Part 360 and 6 NYCRR Part 375 SCOs). The cap will serve as an EC.

10.5 No-Action Condition

Development Site

In the No-Action Condition, the one-story, 25,265-gsf golf clubhouse, accessory surface parking lot, a portion of the practice area, and other landscaped areas would remain as existing conditions. The existing uses on the Development Site are allowable uses on parkland pursuant to a license agreement between Bally's and NYC Parks and the Declaration of Covenants and Restrictions. NYC Parks' operation, monitoring, and maintenance of the former landfill would continue per the PCCCP.

Ring Road

Absent the Proposed Actions, no ground disturbance would occur on Ring Road and it would remain in its existing condition as a one-lane, one-way park roadway. The roadway would not be widened, and no additional improvements would be made to the roadway or existing roadway infrastructure. Traffic controls to enhance pedestrian safety would not be implemented, and walking and biking paths for cyclists and pedestrians would not be developed.

10.6 With-Action Condition

Development Site

In the With-Action Condition, Bally's would construct the Proposed Facility and replacement standalone golf clubhouse on the Development Site. The Proposed Facility would contain approximately 561,320 gsf of gaming and food and beverage space, an approximately 500-key hotel with a spa and meeting space, a 2,000-person event center, approximately 6,100 gsf of retail, and a new police substation. The replacement golf clubhouse would be approximately 40,160 gsf.

The Proposed Development would be supported by deep foundations such as displacement piles anchored in bedrock beneath the landfill, drilled piles, or steel/precast concrete piles. Installation of these piles would require a breach of the landfill cap and excavation of material underlying the existing cap. Excavated material would be characterized prior to excavation and would be disposed in accordance with applicable local, state, and federal regulations at an approved permitted disposal facility. If material is characterized and meets NYSDEC reuse requirements, the material may be reused at the Development Site.

The slabs of the new buildings would introduce new site caps across the building footprint. The cap of nonhazardous, regulated fill in the areas outside the building footprints would be restored following construction.

Ground-intrusive activities necessary to develop the Proposed Facility would be conducted pursuant to a Change of Use Work Plan approved by NYSDEC, and environmental oversight and monitoring would be conducted under the supervision of a NY State licensed engineer. Per the Change of Use Work Plan, the NY State licensed engineer would oversee the screening of excavated material, observe the importation of materials, and implement both a ~~community air monitoring plan~~CAMP and a ~~stormwater pollution prevention plan~~SWPPP. Excavated material would be characterized and would be either reused on the Development Site, if it meets NYSDEC reuse requirements, or disposed in accordance with applicable local, state, and federal regulations at an approved permitted disposal facility. A vapor barrier and active vapor mitigation system would be incorporated into the design of the Proposed Facility and replacement golf clubhouse. Stormwater at the Development Site would be managed and discharged in accordance with NYCDEP and NYSDEC permits, as applicable. The Change of Use Work Plan was conditionally approved by the NYSDEC on April 30, 2025, with the provision that final design plans for the foundation, support of excavation, and site cover plans be provided once complete (see Appendix F).

The existing landfill infrastructure on the Development Site would be maintained to the extent feasible. The infrastructure that cannot be maintained would be replaced in-kind or relocated to a suitable alternate location on the Development Site in coordination with NYSDEC.

The Change of Use Workplan would govern operations during construction. Following completion of subsurface work but prior to completion of overall construction, a new PCCCP would be generated to define the future operation, maintenance, and monitoring requirements for the operator of the Development Site. The existing PCCCP would be updated to exclude the alienated parcel and associated infrastructure. Both PCCCPs would identify use restrictions and provisions to ensure that the engineering and institutional controls remain in place and are effective at the former landfill. Provisions of the PCCCP

would include operation, monitoring, and maintenance of environmental protection systems, as needed, post-construction. Future monitoring within the Development Site would be the responsibility of Bally's rather than NYC Parks, thereby reducing the obligation of the City of New York to dedicate resources to monitor the Development Site.

The existing Declaration of Covenants and Restrictions would be amended to remove the alienated parcel and a new Declaration of Covenants and Restrictions would be created specifically for the alienated parcel. With oversight provided by NYSDEC through the Change of Use Work Plan, PCCCPs and Declarations of Covenants and Restrictions, the potential for significant adverse hazardous materials impacts on the Development Site would be precluded.

Ring Road

As a part of the Proposed Development, Ring Road would be expanded and improved to enhance circulation, safety, and access to the Development Site for pedestrians, cyclists, and vehicles. Pedestrian access improvements would also be implemented in the associated park land adjacent to the ~~along~~ Ring Road improvements to enhance connectivity beneath the Hutchinson River Expressway overpass, allowing improved connection between the Development Site and the western portion of the Park. Ring Road would remain under City ownership and would be transferred from NYC Parks to NYCDOT. The remaining improvement areas (adjacent to Ring Road) would remain under the ownership of NYC Parks.

Based on the findings of the Phase I ESA, a Phase II ESI ~~would be~~was performed ~~on~~ to evaluate soil and groundwater, ~~Ring Road in accordance with the NYCDEP-approved Phase II ESI Work Plan and associated health and safety plan (as outlined above)~~and to inform and prepare a RAP for the management of soil and/or groundwater during the redevelopment of Ring Road and associated park land in accordance with applicable federal, state, and local requirements. The ~~Both the~~ Phase I ESA, ~~and~~ Phase II ESI Work Plan, Phase II ESI Report, and subsequent RAP were reviewed and approved by NYCDEP and are included in Appendix F of this EIS. Soil ~~and groundwater~~ samples ~~would be~~were taken ~~throughout the development boundaries of~~from soil borings within a 9.61-acre area consisting of Ring Road and adjacent park land, and ~~would be~~were submitted for a full laboratory analysis of VOCs, SVOCs, PCBs, TAL metals, herbicides and pesticides, and PFAS in select locations. Groundwater samples ~~would~~ were also ~~be~~ collected at select boring locations and analyzed for VOCs, SVOCs, PCBs, TAL metals (~~both~~ dissolved and total), ~~metals~~pesticides, herbicides, and PFAS. ~~If warranted, a~~Based on the results of the Phase II ESI, a RAP and CHASP ~~would be~~were developed ~~completed~~ for the Final EIS and ~~would be~~were reviewed and approved by NYCDEP prior to the start of development. ~~If~~ The RAP includes ~~required by NYCDEP,~~provisions for ICs and/or ECs for the redevelopment/expansion of Ring Road and for adjacent park land improvements, which will be maintained and managed under an SMP (if required). ~~institutional controls may also be necessary to ensure the maintenance and oversight of any required engineering controls.~~

Design, development, and construction of the proposed roadway ~~-~~expansion/park land improvements would be conducted in coordination with NYCDOT and NYC Parks. If identified during construction of the proposed ~~roadway~~ improvements, hazardous or municipal solid waste materials would be removed pursuant to local, state, and federal policies. NYCDEP oversight of remediation actions, ~~if required,~~ NYCDOT oversight on the improvements to Ring Road, and compliance with local, state, and federal regulations would preclude the potential for significant adverse hazardous materials impacts.

Therefore, the Proposed Actions do not have the potential to result in hazardous materials impacts, and further analysis is not warranted.