**STAFF PROPOSED DEVELOPMENT CONDITIONS**

**SEA 80-L/V-061-02**

~~**February 24, 2014**~~
**March 7, 2014**

If it is the intent of the Board of Supervisors (Board) to approve SEA 80-L/V-061-02 located at Tax Map Parcels 113-1((1)) part 5, 7, and 8 and 113-3((1)) 1, 2, and 4 (10201, 10209, 10215, 10219, and 10229 Furnace Road) to amend a special exception amendment previously approved for a landfill to permit modifications to the landfill and development conditions and the addition of electrical generating facilities (wind, solar, methane gas, and geothermal), radio controlled aircraft field, baseball hitting range(s), and golf driving range pursuant to Sections 3-104, 9-201, 9-301, and 9-501 of the Fairfax County Zoning Ordinance Staff recommends that the Board condition the approval by requiring conformance with the following development conditions. These development conditions incorporate and supersede all previous development conditions. Previously approved conditions carried forward, some updated, are marked with an asterisk (*).

1. This Special Exception Amendment is granted for the location indicated in the application and is not transferable to other land.*

2. This Special Exception Amendment (SEA) is granted for the location and uses outlined in the application as amended by these conditions. A revised site plan incorporating these conditions shall be submitted to the Department of Public Works and Environmental Services (DPWES).*

3. A copy of this Special Exception Amendment shall be posted in a conspicuous place within the operations trailer and scale houses along with the Non-Residential Use Permit on the property of the use and be made available to all Departments of the County of Fairfax during the hours of operation of the permitted use.*

4. Submission and approval of a site plan prepared in accordance with the provisions of Article 17, is required prior to the start of any landfilling activity approved as part of this Special Exception Amendment and for the proposed electrical generating facilities (wind, solar, methane, and geothermal), radio controlled aircraft field, baseball hitting range(s), and golf driving range. Any site plan submitted pursuant to this special exception amendment shall be in substantial conformance with the approved Special Exception Amendment Plat (SEA Plat) entitled “Lorton Green Energy Park and Debris Landfill,” prepared by BC Consultants, Inc., dated March 22, 2013, as revised through February 20, 2014, and these conditions. Minor modifications to the approved Special Exception may be permitted pursuant to Par. 4 of Sect. 9-004 of the Zoning Ordinance.*

5. Prior to site plan approval, the proposed landfill expansion to include the electrical generating facilities proposed in Phase 1, shall be submitted to the Geotechnical Review Board (GRB) for its review and approval. Any and all recommendations of the GRB within its purview shall be implemented; if these recommendations cannot be implemented in substantial conformance with the SEA Plat, this Special Exception Amendment shall be null and void. If the GRB determines that any portion of the review is outside of its purview, that portion shall be forwarded back to DPWES for review prior to site plan approval.

   Prior to site plan approval for the solar panels proposed in Phase 4, the wind turbines and/or solar panels proposed in Phase 5, and for each of the proposed active recreational uses proposed in Phases 5 and 6 (radio controlled aircraft field, baseball hitting range(s), and golf driving range) each use shall require the review and approval by the Geotechnical Review Board (GRB). Any and all recommendations of the GRB within its purview shall be implemented. If these recommendations cannot be implemented for any of the above Phases 4-6 uses then that use shall not be permitted. If the GRB determines that any portion of the review is outside of its purview, that portion shall be forwarded back to DPWES for review prior to site plan approval.

6. No construction of the Phase 5 and Phase 6 active recreational facilities on top of the landfill, as depicted in the SEA Plat, shall take place until the applicant has been released from its post-closure monitoring and maintenance requirements by the Virginia Department of Environmental Quality (DEQ) ends and the following takes place:

   - The GRB has determined in writing that any residual post construction settlement will not affect the structural integrity of the proposed improvements; and

   - DEQ, the County's Fire and Rescue Department and/or DPWES has determined that the nature and extent of corrosion producing properties, the generation and escape of combustible gases and potential fire hazards of the constituent material, considering its state of decomposition, has been provided for adequately and will not create an unsafe or hazardous condition in or around any of said proposed improvements.

7. If any of the currently undisturbed areas of the landfill along the northern and eastern portion of the site as depicted on the SEA Plat are proposed to be disturbed for any reason (including installation of utility lines, detention ponds, access roads, etc.), then, prior to any such disturbance, a tight interval (30-foot intervals between shovel tests) Phase I archaeological survey shall be performed prior to site plan approval for those areas proposed to be disturbed and not previously the subject of a Phase 1 archaeological survey using a scope of work approved by the Cultural Resource Management and Protection Section of the Fairfax County Park Authority (FCPA). If any archaeological resources are found by the Phase I survey and are determined to be potentially significant and

disturbance of these resources cannot be avoided, then a Phase II study shall be performed to assess the significance of such resources in the Phase I study area. If deemed necessary by FCPA, a Phase III data recovery shall be performed in accordance with a scope approved by the Cultural Resource Management and Protection Section, FCPA. Draft and final archaeological reports produced as a result of the Phase I, II, and/or III studies shall be submitted for the review and approval by the Cultural Resource Management and Protection Section of FCPA.*

8. Stormwater management and Best Management Practices (BMPs) for the subject property shall be provided as depicted on the SEA Plat and in conformance with the applicable Public Facilities Manual (PFM) standards, unless waived and/or modified by DPWES.*

9. If deemed necessary by DPWES during site plan review, a Water Quality Impact Assessment (WQIA) shall be provided for encroachments into the Resource Protection Area for the purpose of providing adequate outfall and/or redevelopment of the existing stormwater management facilities. Should any such encroachment be necessary, the limits of disturbance shall be no greater than that permitted by these development conditions, irrespective of that shown on the SEA Plat.*

<u>Conditions on the Operation of the Landfill</u>

10. Prior to site plan submission, a copy of the current Closure Plan (which addresses leachate control) approved by the Virginia Department of Environmental Quality (DEQ) shall be provided to the Department of Planning and Zoning (DPZ), the Solid Waste Program, DPWES and the Mount Vernon District Supervisor's office. A copy of the approved Closure Plan shall be maintained on-site and made available. Amended versions of the Closure Plan shall be submitted to the above mentioned agencies and offices as revisions occur and with any subsequent site plan submissions. In addition, the applicant shall initiate its Major Permit Amendment with DEQ. A letter confirming said initiation shall be provided to the above referenced agencies and office. A copy of the Major Permit Amendment shall be maintained on-site and be made available upon demand. A letter confirming subsequent amendments to said Major Permit Amendment shall be submitted to the above referenced agencies and office as revisions occur and with any subsequent site plan submissions.

    If DEQ does not approve the Major Permit Amendment, then this SEA shall be null and void.

11. The landfill shall be operated in conformance with all sections of Virginia Administrative Code (VAC) applicable to the proposed landfill operations, except as waived or modified by DEQ.*

12. The height of the landfill prior to the installation of final cover (cap) of the landfill, vegetation, and "structures" as shown on the SEA Plat, shall not exceed the proposed final debris elevation, as shown on the SEA Plat. All landfill disposal activities shall cease when the final debris elevation of 412 feet above sea level is reached, or December 31, 2040, whichever occurs first. Such debris height across the landfill shall not exceed the elevations depicted by the proposed topography shown on the SEA Plat, except for (i) any temporary berms or temporary stockpiles that may be required or approved by DEQ or by the Director of DPWES for operational reasons, visual screening or noise attenuation or capping and (ii) to provide adequate drainage from the center of the landfill.*

13. The landfill shall receive only construction demolition debris materials, as defined in Section 104 of the County Code and as deemed permissible by Federal, State and County regulations. Unacceptable landfill materials shall be prohibited on-site in accordance with the implementation of the Unauthorized Waste Control Plan as required by Virginia's Solid Waste Management Regulations and approved by DEQ.

14. Waste materials shall not be burned nor allowed to be burned at the site.*

15. A liner system shall be installed in all landfill cells as required in accordance with Virginia Solid Waste Management Regulations.*

16. A tire wash system, including a wash rack/grate system to dislodge mud on truck tires, shall be provided as depicted on the SEA Plat in order to ensure that mud is not tracked from the landfill onto the surrounding roads. The tire wash system may move from its location as shown on the SEA Plat. However, the tire wash system shall be in a location that will wash truck tires prior to exit from the subject property. In the event that one of the access points to the subject property becomes an additional truck exit, that exit shall contain a tire wash system as described below. The tire wash system shall be maintained in accordance with the manufacturer's recommendations. Adequate resources (including spare parts) shall be maintained on-site in order to ensure that any needed repairs are made within a 24-hour period. To ensure that the truck tires remain clean after washing, a minimum of 400 feet of pavement shall be installed immediately after the tire wash and shall be followed by gravel between said pavement area and the exit at Furnace Road. In addition, “cattle guards” shall be employed to knock off mud and water in three locations: (i) before the tire wash; (ii) immediately after the tire wash; and (iii) at the landfill exit. Should the tire wash be inoperable, alternative (and equivalent) methods of removing mud from the tires shall be employed. Should said alternative methods be unavailable, no landfill materials shall be accepted until the tire wash is back in operation. Said new tire wash system shall be installed and in operation by December 31, 2014, unless DPWES determines that approval of a site plan revision or site plan amendment is necessary; then it shall be installed within six months after obtaining such approval.

17. Prior to landfilling in any new operational areas beyond those allowed pursuant to SEA 80-L/V-061 ~~(290 feet above sea level)~~, sediment basins meeting State and County regulations shall be provided in the Phase shown on the SEA Plat and maintained.*

18. All dikes, basins and stockpiles shall be seeded and mulched as soon as they are constructed.*

19. Litter shall be controlled by the use of litter fences at the top of the landfill on each side of the active debris dumping areas along the working face. Furthermore, a Litter Control program shall be prepared and implemented in accordance with Virginia's Solid Waste Management Regulations.*

20. A Groundwater Monitoring Program shall be prepared and implemented in accordance with Virginia's Solid Waste Management Regulations. A copy of all water test results, including groundwater, surface water and water quality, submitted to DEQ, shall also be submitted at the same time to the Fairfax County Health Department and the Solid Waste Program, DPWES. If, upon determination by DEQ and/or Fairfax County, any off-site private well is adversely affected by the landfill operation, the landfill owner will provide an adequate potable water supply to any affected property within 48 hours of being notified of such a determination.*

21. Dredge soils may be deposited at the landfill so long as the dredge soils entering the site meet the DEQ definition of acceptable waste for Construction and Demolition Debris landfills. Dredge soils from the Lake Barcroft Water District and from the Lorton Station Homeowners' Association, which meet the DEQ definition cited above, shall be accepted at the landfill at no cost. Dredge soils may be accepted after the cessation of landfill disposal activities and during the post-closure period in connection with landscaping improvements and installation of the final cap.*

22. The control of decomposition gases from the landfill shall be monitored through the implementation of a Gas Management Plan in accordance with Virginia's Solid Waste Management Regulations. A coarse aggregate gas collection layer with collection pipe and gas vents above breathing zones shall be installed as part of the cap in areas that are proposed for Phase 5 and Phase 6 recreational uses on top of the landfill, including parking areas, as reviewed and approved by DPWES. All proposed structures on top of the landfill shall be open air, self-venting construction in order to prevent the buildup of landfill gases. Any closed structures, such as the leachate pump houses, shall be locked to prohibit public access.*

23. Recycling of construction and demolition debris (and related materials) shall continue to be carried out on the landfill as an accessory use. Recycling shall include the sorting, separation, storing, and processing (such as chipping, crushing, augmenting) of debris and recyclable materials (including, without

limitation, the sorting of cardboard, metal, wood and inert material).

24. A yearly contribution of $60,000 shall be provided to the County for use by DPWES for public outreach and education associated with recycling activities applicable to construction and demolition debris. Contributions shall begin August 1, 2009, and shall continue annually until the cessation of landfill disposal activities.*

25. An Emergency Contingency Plan shall be prepared and implemented in accordance with Virginia's Solid Waste Management Regulations. A list of the landfill's equipment operators and their telephone numbers shall be made available to the County's Emergency Operations Center and kept current by the landfill operator.*

26. Landfill materials may be accepted and clearing or grading of any kind may take place on the site only between the hours of 7:00 A.M. to 5:30 P.M. Monday through Friday and between 7:00 A.M. and 3:00 PM on Saturdays. The landfill gates shall be permitted to open to customers at 5:30 A.M. Monday through Friday and at 6 A.M. on Saturdays to allow customers to queue on-site while waiting for landfill activities to commence. However, in no case shall landfill operations begin until the commencement of the normal business hours listed above. With prior approval from the Director of the Department of Public Works and Environmental Services, or his designated agent, the applicant may operate until 5:00 P.M. on Saturday on an emergency basis. This approval shall not be granted more than ten times per calendar year. In the event of a significant community emergency, as determined in writing by the County Executive, the landfill may temporarily operate outside of normal business hours.*

27. In an effort to solve mutual problems, the operator will work with, and will, as necessary, meet on a regular basis with the Mount Vernon Council and/or the South County Federation and/or any other groups (such as neighboring homeowner associations) as designated by the Mount Vernon District Supervisor.*

28. Per Sect. 9-205 of the Zoning Ordinance, the site shall be made available to the Director of DPWES or his representative in preparation of the annual report to the Board of Supervisors. As a result of the annual inspection, the Director of DPWES may recommend additional restrictions and limitations on the use to the Board.*

~~28.~~29. The vegetated landfill berm located around the perimeter of the landfill, as shown on Sheets 6-10 and 15 of the SEA Plat shall not exceed a height of 70 feet and shall be maintained by the applicant and/or landfill owner.

Buffering, Landscaping and Screening Conditions

~~29.~~30. Irrespective of the notation on the SEA Plat that says "approximate limits of clearing and grading," the limits of clearing and grading as depicted on the SEA Plat shall be strictly adhered to. No new waste (debris) placement activity shall take place within 75 feet of the greater of the RPA or the 100-year floodplain of Giles Run. There shall be no disturbance within the RPA except in those limited areas depicted on the SEA Plat and/or as permitted under the Chesapeake Bay Preservation Ordinance.*

~~30.~~31. Notwithstanding the limitations of other development conditions, the applicant shall be permitted to encroach into the limits of clearing and grading and/or the RPA without an SEA in order to conduct environmental monitoring and/or remediation activities to ameliorate a potential environmental and/or public health hazard. Prior to the commencement of any such disturbance, the applicant shall obtain all necessary approvals from DPWES for the actions to be taken, and immediately following any such activities, shall restore the disturbed area to the extent required,.*

~~31.~~32. All permanent berms located within buffer areas shall be landscaped to the satisfaction of the Urban Forest Management Division (UFMD), DPWES. The materials used and their separation shall be in conformance with the landscaping standards of Article 13 of the Zoning Ordinance as may be applicable and as determined and approved by UFMD.*

~~32.~~33. A 50-foot wide continuous transitional screening buffer of existing trees shall be maintained along the northern boundary of the site as depicted on Sheet 21 of the SEA Plat and subject to UFMD approval.*

~~33.~~34. Along the southern property boundary, i.e., from the southernmost point of the property to a point approximately: (i) 600 feet along the southwestern boundary and (ii) 800 feet along the southeastern boundary, a landscaped buffer of at least 100 feet shall be maintained. In any area along this boundary where a minimum of 100 feet of natural vegetation does not exist, additional landscaping shall be planted. The landscaping shall be designed to the satisfaction of UFMD, DPWES. The materials used and their separation shall comply with the landscaping standards of Article 13 of the Zoning Ordinance, as determined by UFMD, DPWES.*

Conditions for the Landscaping of the Property

~~34.~~35. A landscape plan for all phases shall be prepared and submitted for the review and approval by UFMD, DPWES as part of the site plan approval for the landfill use. The landscape plan shall provide for revegetation of the landfill as depicted on the SEA Plat and shall include suitable varieties of trees and shrubs to the satisfaction of and approval by UFMD, DPWES, consistent with that shown on the SEA Plat.*

~~35.~~36. Prior to site plan approval, an invasive species management plan shall be developed by the applicant's arborist for approval by UFMD in order to control non-native, invasive vegetation and promote the establishment of native species. This plan shall be reviewed and approved by UFMD, DPWES.*

~~36.~~37. All landscaping installed by the applicant shall be maintained in good health by the applicant. Any such landscaping that should die within the initial three growing seasons shall be replaced by the operator/applicant within the first growing season after its death, or as determined appropriate by UFMD.*

~~37.~~38. At the time of site plan approval cash, bond, or a letter of credit and payable to the County of Fairfax shall be posted to ensure that the approved landscaping and revegetation plans are completed in an amount determined by UFMD, DPWES.*

~~38.~~39. Landscape planting shall be installed according to the landscape plan for each phase as generally depicted on the SEA Plat. Landscaping in one phase may begin before the completion of any prior phase to facilitate ongoing landfill operations. An interim vegetative cover shall be provided in disturbed areas where active landfill operations are complete and an interim landfill cap has been installed for any given area regardless of phase. Final landscaping, according to the approved landscape plan, shall be provided at the beginning of the first full planting season following the installation of the final landfill cap, subject to review and approval by UFMD. Final cover material shall be provided in accordance with DEQ design requirements, as approved in the Major Permit Amendment. Additional soil shall be placed on top of the final cover in those locations where the planting of trees is to occur, subject to the review and approval by UFMD and DEQ.

~~39.~~40. Final landscaping of the landfill shall be completed within one year after the termination of landfilling operations on the property and completion of the full landfill cap.*

Transportation Conditions

~~40.~~41. Commercial truck traffic to and from the site shall enter the site only from the south. Commercial truck traffic shall be prohibited from making left turns into and right turns out of the landfill. The applicant shall retain its existing approved design at its main entrance and shall provide a similar restrictive design (as approved by the Virginia Department of Transportation) at its new southern entrance to accomplish this restriction. Signage shall be posted indicating the traffic restrictions at each of the site's entrances/exits. The operator shall inform all regular customers of these restrictions in writing at least twice a year.*

~~41.~~42. Right-of-way to 44 feet from the existing centerline along the site's Furnace Road frontage and any ancillary easements shall be reserved for dedication to the Board of Supervisors in fee simple without encumbrances at no cost as shown on the SEA Plat. This right-of-way shall be dedicated upon demand by Fairfax County and/or the Virginia Department of Transportation (VDOT). Should this right-of-way dedication be required prior to completion of landfill activities, the raised concrete island at the main entrance to the landfill shall be permitted to remain, subject to VDOT approval.

~~42.~~43. There shall be no access to the property for any landfilling purpose through the adjoining properties to the north. Pedestrian access shall not be permitted, except a trail connection to Lorton Valley may be provided in Phase 1 solely at the option of the Lorton Valley Homeowners Association, as depicted on the SEA Plat.

~~43.~~44. Effective dust and gravel control measures shall be installed and maintained by the operator of the landfill. At a minimum, these measures shall include the full-time availability of a water tank truck and sweeper vehicle on-site.*

~~44.~~45. As depicted on the SEA Plat, beginning at the end of Phase 1 of operations after the berm is completed in that area, a second right turn in-only lane shall be constructed by the applicant, as approved by VDOT, as a new southern entrance-only for truck traffic travelling north on Furnace Road. No left turn into nor exits from the landfill shall be permitted at this second/southern entrance.

Renewable Energy Program

~~45.~~46. The applicant shall establish a Green Energy Park (GEP) on portions of the landfill as generally shown on the SEA Plat. Said GEP shall consist of renewable energy generation facilities including wind, geothermal infrastructure and methane gas collection systems and potentially solar panels, as interim uses during both the landfill operations and post-closure periods, as described below:

A. The applicant shall erect three wind turbines by the end of Phase 1 (the Phase 1 wind turbines, as depicted on Sheet 6 of the SEA Plat). Each of the three wind turbines to be installed on-site by the applicant during Phase 1 shall be capable

of producing at least one-quarter megawatt peak of electricity. The first turbine shall be installed no later than 18 months after all necessary Federal, Virginia, and Fairfax County approvals are obtained for the wind turbine, to include, but not limited to: (i) FAA and/or other Federal, State and County approvals; (ii) all requisite DEQ approvals, including the Major Permit Amendment; (iii) all requisite County approvals such as GRB, site plan, land development and structure permits, non-DEQ bonding, and Non-RUP, have been obtained; (iv) and any other approvals not noted for the wind turbines to operate on the landfill. The above referenced approvals are collectively referred to as Necessary Approvals. Necessary Approvals shall diligently be pursued by the applicant. The second and third turbines shall be installed within 36 months after having received all Necessary Approvals.

The applicant shall install an inverter or similar device in order to convert the electricity produced by the Phase 1 wind turbines from direct current to alternate current. During Phase 2 of development, at least 75% of electricity generated by the Phase 1 wind turbines after conversion to alternate current shall be consumed on-site by landfill facilities or activities.

Fifty percent of any revenue, in excess of 2.5 cents per kilowatt hour, the applicant receives from the sale of the electricity produced shall be contributed to the County of Fairfax (the County) within 30 days after receipt of such revenue. The applicant shall submit a quarterly report to DPWES documenting the electricity produced.

For any electricity produced by the Phase 1 wind turbines and consumed on-site, the applicant shall contribute to the County 50% of the price (over 2.5 cents) it would have paid to a third party provider for the ‘electricity supply service’ net of taxes and distribution charges.

The applicant shall construct a foundation for the Phase 1 wind turbines, the design for which shall be reviewed and approved by DEQ. The Phase 1 wind turbines shall be operated for their useful life or until the initiation of Phase 5 landfilling activities requires their removal.

B. The applicant also shall install a methane gas recovery system within the landfill and shall deliver to the County, at a mutually agreed upon nearby location (such as Landfill Energy Systems, Inc.), methane gas sufficient to generate the equivalent of an average of two million kilowatt hours annually of electricity, with the intent that it will be used by the County to generate electricity sufficient for the normal operating needs of County-owned facility(ies) and/or for use by County-owned facilities as a fuel for operations, such as the Noman Cole Water Pollution Control Plant. The applicant shall pay the incremental cost, if any, of processing the methane gas so that it is suitable for combustion by industry-standard co-generation infrastructure. Delivery of the methane gas shall begin within 18 months

of site plan, Non-RUP, and DEQ approvals for the SEA landfill expansion and continue until the cessation of landfill activities or until December 31, 2040, whichever occurs first. Should the applicant fail to provide sufficient methane gas to generate the 2 million kilowatt hours in any given calendar year, it must pay the County $0.125 for each equivalent kilowatt of electricity that cannot be generated due to the unsupplied methane gas, up to a maximum payment of $250,000 in any given calendar year. After 2040, the applicant shall provide to the County 50% of the methane gas that is recovered from the methane recovery system and will continue to do so each year until the DEQ post-closure period ends.

C. Within 24 months after having received all necessary approvals for implementation of the SEA landfill expansion and approval of PCA 2000-MV-034 at Tax Map Parcel 113-1 ((1)) 12 and 13 (the PCA Property), as proposed, the applicant shall install a geothermal recovery infrastructure at the landfill with capacity to support 1 million square feet of building structure(s) and shall provide an access point for hook-up to such systems by the County on the boundary of the PCA Property. The Applicant shall maintain the geothermal recovery infra-structure and related access point until the end of the DEQ post-closure period ends.

D. As depicted on the SEA Plat, in Phase 4, the applicant shall create an approximately 10-acre platform within the southern portion of the operations area to facilitate the provision of solar panels by the applicant and/or others.

E. By the end of Phase 5, the applicant shall have established an approximately 40-acre platform to facilitate future creation of a larger GEP, which may include the potential for up to 12 wind turbines (or wind infrastructure sufficient to produce at least 3 megawatt peak electric power capacity), solar panels (or solar conversion infrastructure sufficient to produce at least 7.5 megawatt peak electric power capacity) and/or more advanced technologies (referred to as the Full Green Energy Park "Full GEP") to be provided by public and/or private entities with the applicant's agreement.

F. Prior to establishment of the Phase 5 wind turbines, the applicant and/or others, as appropriate, shall file a variance request to allow the wind turbine to exceed the height limitation in the R-1 District or should the Board of Supervisors amend the Zoning Ordinance to permit an increase in height for Category 2 electrical generating facilities the applicant shall be subject to the approved Zoning Ordinance Amendment.

~~46.~~47. Wind turbines on the subject property shall not exceed 180 feet in height (to include the rotor blades) and shall be in general accordance with the maximum dimensions, as shown on Sheet 14 of the SEA Plat.

~~47.~~48. The following shall be paid by the applicant to the Fairfax County Board of Supervisors for the respective renewable energy generating facility not provided within the timeframe specified, in the following amounts in lieu of said facility: (i) $1,000,000 for each Phase 1 wind turbine not installed within 4 years of necessary approvals for the landfill expansion; (ii) $6,000,000 should the methane recovery system not be installed within 4 years of receiving the necessary approvals for the landfill expansion (while still being committed to pay $250,000 or to supply two million kilowatt hours annually); and (iii) $1,000,000 should the geothermal not be installed as approved by DEQ within 4 years of receiving the necessary approvals for the landfill expansion. In lieu of said payment penalty, the applicant may expend one or more of the penalty amounts on installation on-site of renewable energy technology other than that technology not timely provided, subject to a Board motion authorizing such expenditure and installation. Said funds shall be payable to Fairfax County with consideration toward local community needs in the Lorton/South County area and/or renewable energy infrastructure at County-owned property, as determined by the Board. The Zoning Administrator may grant extensions to the above penalty payment periods if it is determined that the applicant diligently has pursued said necessary approvals.

Other Public Contributions by the Applicant

~~48.~~49. Subject to the receipt of the necessary approvals for the landfill expansion, the applicant has agreed to contribute $15,000,000 to the Board in installments of $750,000 each per year beginning no later than January 31, 2019, and ending no later than January 31, 2038. Said funds shall be payable to Fairfax County with consideration toward local community needs in the Lorton/South County area, as determined by the Board. These funds shall be in addition to the separate recreation contribution below and the other Green Energy Program expenditures and contributions to the County committed herein by this applicant.

~~49.~~50. In addition to the above contribution, the applicant shall contribute $3,200,000 to the Fairfax County Park Authority no later than January 31, 2019, for use for recreational facilities in the Lorton/South County area subject to all necessary approvals for the landfill expansion.

~~50.~~51. As shown on Sheets 6 through 14 of the SEA Plat and subject to DEQ approval, an "Observation Point" shall be installed by the applicant during Phase 1 in the general location of the Phase 1 wind turbines and be open for visitors within 120 days after the three turbines begin operation. The Observation Point and an ancillary shuttle service shall only be available for controlled access and remain in operation until the DEQ post-closure period ends, in accordance with the following:

A. Access to the Observation Point shall be controlled solely by the applicant via shuttle service at no cost to visitors. The applicant may require that

each visitor execute a liability waiver and release. Visitors shall park at the solar farm located on the contiguous PCA 2000-MV-034 property located at Tax Map Parcels 113-1((1)) 12 and 13 (PCA Property) and travel on-site via the applicant's shuttle service and escorted by the landowner up to the Observation Point.

B. The applicant shall provide a parking easement at the PCA Property for the duration of the operation of the off-site visitor parking/shuttle service area. The parking easement shall be recorded in the land records with a copy provided to DPWES.

C. Parking at the off-site parking area on the PCA Property shall only be permitted for the Observation Point visitors and shuttle service and for maintenance vehicles while providing maintenance to the electrical generating facilities at the PCA Property and to the PCA property.

D. The applicant shall provide for two established times (and duration) for tours each month from April 1 to November 30 and also allow a limited number of additional tours to be scheduled with ample notice. Each regular and additional tour may require a minimum of five (5) and may be limited to no more than twenty (20) visitors to occur. The frequency of regularly scheduled tours may be reduced upon demonstration by the applicant to the Zoning Administrator to reflect actual demand and/or current weather conditions. The applicant may implement a pre-registration system.

E. In addition to the above tours, the applicant shall collaborate with the County upon request by any member of the Board of Supervisors to host pre-scheduled community special events at the Observation Point. For each special event considered, the applicant shall determine whether the proposed scope, timing and number of participants may be accommodated in a safe manner that does not interfere with landfill and other operations, including the Green Energy Park. Scheduling shall be proposed through the applicant and shall be limited as to the number of special events (not to exceed three in any calendar year) and the number of participants at each, as determined by the applicant. Special events shall be restricted to the Observation Point area and occur only from April 15 to November 15, outside of landfill operating hours (unless otherwise agreed to by the applicant). The County shall be responsible for security and all other logistics. The events shall be consistent with the nature of a working landfill and the GEP, and shall not involve erection of tents or other structures, or involve food or alcohol. Each participant may be required to execute a release of liability in favor of the applicant and shall be transported to and from the site only in shuttle-type vehicles approved by the applicant and the applicant shall not be responsible to provide such transportation. The applicant, in its sole discretion, may decline or cancel proposed special events due to safety, inclement weather and/or other

conditions or concerns related to landfill and other operations. The applicant shall attempt to accommodate such special events until the DEQ post-closure period ends.

F. Outdoor style wooden bench seating shall be provided for up to 20 visitors, with a lectern at the head of the benches to provide for speakers.

G. Tourist style telescopes (on posts) shall be provided at the east and west flanks of the Observation Point area. Actual location of each telescope could vary from edge of the seating area to ridges of the elevation.

H. Information signs describing the "Green Energy Triangle," history of the area and local attractions shall be provided.

I. The Observation Point shall be open for tours beginning during Phase 1 (as provided above) until the beginning of Phase 5, generally as depicted on the SEA Plat. At the beginning of Phase 5, when the Phase 1 wind turbines are removed (to permit filling and capping within the southern platform area), the Observation Point and its related features shall be relocated northward, with the understanding that its location likely will need to be further moved as Phase 5 landfill operations and capping proceed toward closure. Thus, during Phase 5 there may be gaps and transition periods (not to exceed 18 months cumulatively) during which no Observation Point shall be available due to filling, settling and capping activities.

~~51.~~52. The applicant shall provide, within 12 months of having received all necessary approvals for the Phase 1 wind turbines, $200,000 to the Board as a contribution toward an educational feature available to the public which describes the renewable energy operations on the applicant's properties as well as those renewable energy activities occurring on neighboring County land, and provides information on renewable energy.

~~52.~~53. The applicant shall provide to the County operational data (operating cost, productivity, weather and revenue information) equipment specifications, and maintenance data related to its renewable energy park on an annual basis over the GEP's operating life. Said data shall be available electronically for access and use by the general public and academic bodies, and for research.

54. The applicant's consultant shall prepare a study, consistent with U.S. Fish & Wildlife Service's Land-Based Wind Energy Guidelines (Guidelines), as amended, which provides a structured, scientific process for addressing wildlife conservation concerns at all stages of land-based wind energy development and examines migratory bird patterns, including endangered species. The Guidelines consist of 5 tiers and the applicant shall submit a report based on each tier to the Department of Planning and Zoning (DPZ) and to DPWES with

Tiers 1-3 submitted, as applicable, prior to the issuance of the building permit for installation of the first Phase 1 wind turbine. Tiers 4-5 shall be submitted prior to the end of Phase 5. Should the 12 wind turbines be installed in Phase 5, the applicant or operator shall be subject to the Guidelines and shall submit reports in accordance with each of the five tiers.

55. The applicant shall demonstrate to DPZ what measures are being taken to mitigate the wind turbine's impact to birds and bats prior to the issuance of the building permit for installation of (i) the first Phase 1 wind turbine, and (ii) the first Phase 5 (full GEP) turbine. Such mitigation may include but are not limited to: smart siting, radar technology to detect when birds are approaching, raising the cut-in speed to 6 meters per second or higher, turning off the wind turbines at night, using lighting to minimize nighttime migratory bird collision, or other such means of mitigating impacts to birds and bats.

Recreational Uses

~~53.~~56. As generally depicted on Sheet 21 of the SEA Plat, in Phase 1 an approximately 5.2 acre private recreation area shall be provided by the applicant at the sole option of the Lorton Valley Homeowners' Association (LVHOA) and made available for use solely by LVHOA residents and their guests; if provided, said private recreation area and land area shall be conveyed in fee simple to LVHOA. No later than one year after approval of the site plan related to the proposed landfill expansion, the applicant shall provide in writing to the LVHOA its proposal to convey the 5.2 acre private recreation area and amenities. The LVHOA shall have six months upon receipt of the applicant's letter to respond in writing to the applicant's proposed conveyance. If the LVHOA requires additional time, such additional time shall be mutually agreed upon by the applicant and LVHOA. In the event LVHOA chooses not to accept said private recreation area, then the recreation area shall not be constructed and this land shall not be conveyed, and shall remain in undisturbed open space. Regardless of conveyance, a 50-foot-wide treed buffer shall be provided along the entire northern property boundary and consist of a combination of existing, mature trees and supplemental plantings shall be installed by the applicant and shall be subjected to a conservation easement prior to conveyance of the recreation area to LVHOA. Grading shall be permitted within this buffer area, as determined by UFMD, as necessary for installation of the adjacent natural surface trail and/or other improvements identified immediately below. Adjacent to this buffer area, a natural trail and any off-site trail connection, exercise stations along the trail, a multi-purpose open space area, a dog park, and/or picnic tables and 5.2 acres of private recreation area shall be provided by the applicant at the sole option of and if agreed to by the LVHOA at any time prior to installation of the third Phase 1 wind turbine.

~~54.~~57. As generally depicted on Sheets 10 and 14 of the SEA Plat, an outdoor baseball hitting range/cages may be provided during the Phase 5 DEQ post-closure period, if permitted by DEQ, or after the DEQ post-closure period ends. No outdoor lighting shall be permitted.

~~55.~~58. As generally depicted on Sheet 45 of the SEA Plat, and as approved by DPWES on separate site plan submission(s), active recreation uses consisting of baseball hitting range(s), a golf driving range and/or a radio controlled aircraft field may be provided by the applicant or lessee during Phase 6 of development either: (a) subsequent to cessation of the potential 12 wind turbines and/or solar panels on the 40-acre platform or a portion thereof, or (b) upon the end of DEQ post-closure period. There shall be no outdoor lighting permitted for these uses.

~~56.~~59. If requested, the applicant shall assist with site preparation for a 2 to 3-acre area designated in Apple Orchard Recreation Area or in the vicinity of Laurel Hill Park, for community garden use. Site preparation shall be limited solely to clearing and grading no more than three acres of land to be used for such garden. The applicant shall not be responsible for any additional support (except as specifically provided below), including any road improvements or impervious surface improvements, construction of any structure or any other site improvements. In collaboration with the entity managing said community garden, the applicant shall provide for use at the community garden throughout the landfill's operating life, from its recycling operation, reasonable amounts of recovered soils, crushed stone, mulch and other recovered materials to support garden activities. The applicant shall make a onetime contribution of $50,000 to the entity managing the garden operation for the materials and fees related to creation of the garden if and when all County approvals have been secured by such entity to construct and operate the garden. As may be requested by such entity, the applicant shall provide soil testing on a one time basis for quality, composition, and drainage provided such testing occurs in conjunction with any testing the applicant carries out as part of its landfill site plan approval process. This development condition shall be null and void and the applicant shall not be bound to provide such support if the garden is not established prior to January 1, 2019.

The above proposed conditions are staff recommendations and do not reflect the position of the Board of Supervisors (Board) unless and until adopted by the Board.

This approval, contingent on the above noted conditions, shall not relieve the applicant from compliance with the provisions of any applicable ordinances, regulations, or adopted standards. The applicant shall be responsible for obtaining the required Non-Residential Use Permit through established procedures, and this Special Exception Amendment shall not be valid until this has been accomplished.

Pursuant to Section 9-015 of the Zoning Ordinance, this special exception amendment shall automatically expire, without notice, 48 months after the date of approval unless the use has been established or construction has commenced and been diligently

prosecuted. The Board of Supervisors may grant additional time to establish the use or to commence construction if a written request for additional time is filed with the Zoning Administrator prior to the date of expiration of the special exception amendment. The request must specify the amount of additional time requested, the basis for the amount of time requested and an explanation of why additional time is required.