



MARYLAND DEPARTMENT OF THE ENVIRONMENT

Oil Control Program, Suite 620, 1800 Washington Blvd., Baltimore MD 21230-1719

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Martin O'Malley
Governor

Robert M. Summers, Ph.D.
Secretary

Anthony G. Brown
Lieutenant Governor

October 23, 2014

Mr. Donald Bull
Hess Corporation
One Hess Plaza
Woodbridge NJ 07095

RE: SITE STATUS LETTER

Case No. 91-2100-BA

Hess Station No. 20204

1613 East Joppa Road, Towson

Baltimore County, Maryland

Facility I.D. No. 545

Dear Mr. Bull:

The Oil Control Program (OCP) recently completed a review of the case file for the above-referenced property. On September 15, 2014, a meeting was held with representatives of Hess, including its environmental consultant and legal counsel, and the MDE-OCP to discuss the case and the path to case closure. In September 2013, the Department approved the *Corrective Action Plan and Park Redevelopment Draft - August 14, 2013*, which proposed demolition of the even numbered duplex structures (1612 through 1642 Yakona Road) and redevelopment of these properties as a park/green space. In November 2013, the Department approved the *Corrective Action Plan (CAP) and Park Redevelopment Addendum - October 11, 2013*, which provided additional details regarding site redevelopment and the installation of groundwater controls.

The Department approved the remedial goals of the *CAP* as follows:

1. To eliminate the seven risk factors as outlined in the *Maryland Environmental Assessment and Technology for Leaking Underground Storage Tanks* guidance document;
2. To accelerate natural attenuation of petroleum constituents in groundwater, and
3. To eliminate the potential for direct contact with groundwater at the park.

Redevelopment of the Yakona Road properties began in April 2014. The residential structures were razed, the properties were graded, and groundwater controls and park amenities were installed. The installation of replacement and additional monitoring wells and piezometers to monitor groundwater conditions was completed in August 2014. The Department received periodic updates from Hess' environmental consultant during site redevelopment and on August 30, 2014 the park was opened to the public.

A groundwater management system was designed to lower the water table and reduce the risk of groundwater impacted with petroleum from discharging to the sidewalk or to the ground surface at the park. Subsurface trenches were installed to intercept groundwater (four trenches that gravity feed into a main line that connects to the storm drain). The Department required Hess to submit contingency plans for the treatment of groundwater in the event discharged water from the groundwater management system to the storm drain exceeded the following site-specific standards: benzene at 5 parts per billion (ppb); total BTEX (the summation of benzene, toluene, ethylbenzene, and xylene) at 100 ppb; and total petroleum hydrocarbons (TPH) at 15 parts per million (ppm). The *Ridgely Manor Park Contingency Plan* was submitted in January 2014. MDE issued a response letter dated April 2014, which required the submittal of a revised plan. The *Ridgely Manor Park Contingency Plan - Revised* was subsequently received on April 10, 2014. The Department approved the *Contingency Plan* with modifications on May 6, 2014.

On August 1, 2014, the Department was notified via email that water discharged from the drainage system from the site to the storm drain exceeded site-specific discharge standards. Total BTEX was detected at 1,091 ppb, exceeding the discharge standard of 100 ppb. Hess installed bag filters and granular activated carbon (GAC) filters to treat the groundwater prior to discharge. Subsequent effluent groundwater samples collected in July through September 2014 were in compliance with the required discharge standards.

Please note that the Department was not notified of the discharge exceedance within the required timeframe of 24 hours after the laboratory results were received, per the *Contingency Plan Comments* in the Department's April 2, 2014 directive letter. Although Hess installed a GAC filtration system to treat the water prior to discharge to the storm drain, Hess failed to notify the exceedance to the Department in accordance with the letter or the date of carbon installation.

Moving forward, the Department is hereby restating the requirements regarding site monitoring and reporting, as stipulated in prior approval letters and presented below:

Routine Monitoring

1. All monitoring wells and piezometers must be gauged using an oil/water interface probe on a monthly basis for a minimum of 12 months. After the minimum monitoring period had been satisfied and if the data supports, a written request may be submitted to reduce this frequency. Monthly gauging must continue until written approval for reduced monitoring is received from the Department.
2. Groundwater samples must be collected from all monitoring wells and piezometers on a quarterly basis (every three months) for a minimum of one year (i.e., four quarters). If the groundwater sampling data indicate stable and/or decreasing trends, a written request may be submitted to reduce the sampling frequency. Quarterly sampling must continue until written approval to do otherwise is received from the Department.
3. Monthly gauging and quarterly sampling data must be submitted in *Quarterly Monitoring Reports*.
4. All pre-existing monitoring wells that were not abandoned prior to park construction must be redeveloped by a Maryland-licensed well driller. Well development methods must include active surging of the well in addition to pumping/purging.

Groundwater Management System Monitoring

5. The open storm drain in the vicinity of former 1614 Yakona Road and any storm drain or subgrade utility in the park space must be field screened for the detection of petroleum vapors with a calibrated photo ionization detector (PID) on a monthly basis.
6. Water from the groundwater management system must be sampled prior to discharge at pre-, mid-, and post filtration locations on a bi-monthly basis (two times per month). The bi-monthly sampling schedule may not revert back to a monthly sampling schedule until six consecutive bi-monthly sampling results (i.e., three consecutive months) are below the site-specific discharge criteria. If these conditions are met, the GAC filtration system may be bypassed upon written approval by the Department.
7. If bypassing or removal of GAC filtration systems is approved by the Department and if an exceedance is detected above stipulated standards, the Department must be notified within 24 hours upon receipt of the laboratory data and treatment must be implemented immediately. Sampling on a bi-monthly basis must then be performed as described above.
8. Data collected from vapor field screening and groundwater discharge sampling (Items 5 and 6 above) must be submitted in *Monthly Update Reports*. The reports must include a map of the drainage system noting the locations where PID screening was conducted.

Required Reports

9. **No later than November 30, 2014**, a *CAP Implementation Report* must be submitted, including, at a minimum, the following information:
 - A. Report detailing the final design of the GAC filtration system and the date of installation;
 - B. Final design specifications for the park and groundwater management system, including cross section(s) / schematic(s) showing the depth of the groundwater management system piping in relation to the ground surface and measured groundwater elevations; and
 - C. All sampling data collected from the groundwater management system to date, including the samples collected from each manway along the line.

Future Remediation

The Department understands that Hess and its environmental consultant anticipate dissolved phase concentrations in the groundwater management system discharge will be below site-specific discharge standards due to natural attenuation within the next two years. While the Department approves of continued site monitoring, additional remedial technologies may be used to enhance and accelerate natural attenuation at the site. If additional remediation or an alternative treatment method for the treatment of groundwater is considered, a *Work Plan* must be submitted for our review and approval.

Please note that if MDE and/or Hess receive any complaints of petroleum odors emanating from groundwater at the park, additional assessment and corrective actions may be required.

Hess must notify the case manager at least five (5) working days prior to conducting any field work associated with this project. When submitting documentation to the Oil Control Program, include three hard copies and an electronic copy on a labeled compact disc (CD) to the attention of the case manager at the above letterhead address. If you have any questions, please contact the case manager, Mrs. Jenny Herman, at 410-537-3413 (email: jenny.herman@maryland.gov) or me at 410-537-3482 (email: ellen.jackson@maryland.gov).

Sincerely,



Ellen Jackson, Central Region Section Head,
Remediation and State-Lead Division
Oil Control Program

JH/nln

cc: Stephen L. Leifer, Esquire (Baker Botts)
Mr. Keith Green (WSP Environmental & Energy, LLC)
Mr. Kevin Koepenick (Baltimore County DEPS)
Mr. Andrew B. Miller
Mr. Christopher H. Ralston
Priscilla N. Carroll, Esquire
Mr. Horacio Tablada