

State of Wisconsin
DEPARTMENT OF NATURAL RESOURCES
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August 10, 2016

William Nicklas
James Baumgartner
D & C Partners, LLP
W223 N7658 Cherry Hill Road
Sussex, WI 53089

Subject: Case Closure Denial – Site Investigation Incomplete
Superior Health Linens, Cudahy, Wisconsin
DNR BRRTS Activity # 02-41-532649 FID 241780880

Dear Mr. Nicklas and Mr. Baumgartner:

On July 7, 2016, the Southeast Region (SER) Closure Committee reviewed your request for closure of the case described above. The Department of Natural Resources (DNR) reviews environmental remediation cases for compliance with state and federal laws to maintain consistency in the closure of these cases. As discussed with your consultant D'Arcy Gravelle in our July 29, 2016 phone call, the closure committee has denied closure because additional requirements must be met. The purpose of this letter is to inform you of the remaining requirements for obtaining closure. We request that within 60 days of this letter, you provide us with your written response regarding the necessary work and a schedule for completion of this work.

As noted above, additional site work is necessary in order to meet the requirements for site closure. Before you can request closure your site investigation must be completed and documented in a Site Investigation Report in accordance with ch. NR 716 Wis. Adm. Code. Due to the site complexity and the degree of known contamination it is important that you follow the site investigation requirements outline in that rule and complete a Remedial Options Analysis Report outlined in ch. NR 722 Wis. Adm. Code. The additional information needed is outlined below.

The review fee submitted with this request was applied to the site investigation review. A closure review fee will be required with submittal of the next closure packet.

Need to Define the Degree and Extent of Contamination

Additional soil and groundwater investigation activities are needed in order to define the degree and extent of contamination and to assess remedial options. The soil and groundwater contamination in the area of the rear exit located in the southwest corner of your property contains soil and groundwater concentrations more than four orders of magnitude higher than applicable soil and groundwater standards. This is most evident in the soil and groundwater data collected from the area of borings HP-3 and HP-6. The horizontal and vertical extent of contamination in this area has not been defined.

In the area of HP-3 and HP-6 the DNR recommends implementing a multi-level soil and groundwater sampling plan to define the vertical extent of contamination in both saturated and unsaturated media. Stratigraphic information from that work could then be used to place additional soil borings, monitoring wells, and piezometers to define the vertical and horizontal degree and extent of contamination. Future submittals should include a detailed site map illustrating all the following: location of all previous spills and BRRTs activities, any waste disposal areas, fill areas, subsurface facilities and utilities, historic contaminant sources, current/historic shipping and receiving ingress/egress, monitoring well and

sampling points, and topography. Spills/releases often occur at entry and exit points of buildings, and this information can help determine the source(s) of contamination. By delineating the areas of historic spills and closed BRRTs sites we can better understand if the contamination detected in those areas is potentially related to closed activities or a new spill. Topographic information will assist in understanding how contaminants may have migrated over land and assist in estimating volumes of contaminated soil. Future maps in your Site Investigation Report and RAOR should illustrate soil and groundwater contamination isoconcentrations for the contaminants of concern, rather than only Residual Contaminant Level (RCL) or Enforcement Standard (ES) exceedance delineations.

Need for Remedial Action Option Report (RAOR) – Remedy Selection

After you have completed your site investigation in accordance with Ch. NR 716 Wis. Adm. Code, you should conduct a remedial action options analysis and submit a RAOR in accordance with ch. NR 722.13 Wis. Adm. Code. The report identifies and evaluates various remedial action options with the goal of selecting an option.

Your current submittal suggests that natural attenuation and a barrier consisting existing surface cover are an appropriate remedy to address the soil and groundwater contamination currently identified in your investigation. The proposal for use of existing surface features as a barrier and natural attenuation as the groundwater remedy should be evaluated only after the degree and extent of contamination is known and while conducting an analysis of remedial options. The requested additional investigation should help to better evaluate appropriate remedial actions to address the high level contamination in the apparent source area as well as ground water contamination extending from that source area.

When evaluating groundwater remedies, a minimum of 8 successive quarterly rounds of sampling is necessary to demonstrate compliance with applicable requirements of chs. NR 140 and NR 726.05(6) Wis. Adm. Code. More monitoring data may be necessary due to the complexity of the site or where statistical analysis will be used for data evaluation. If monitored natural attenuation is to be used as a remedial action, you need to determine the extent of groundwater contamination, monitor for natural attenuation parameters, and determine whether there is a stable or receding plume. We recommend you use the Department's guidance, *Understanding Chlorinated Hydrocarbon Behavior in Groundwater*, RR-699, found on our website.

Need for Updated Maintenance Plan for the Vapor Mitigation System

An updated Maintenance Plan for the final approved remedy should include: the vapor mitigation system labeled and clearly identified in photographs, and the location and type of cap should be identified on maps and photographs. The plan should clearly identify what passes or fails as part of the inspection. A model plan and guidance "*Maintenance Plans for Vapor Mitigation Systems/ Vapor Intrusion Response Actions/Vapor Barriers*" RR-981 can be found on our website.

Need for Future Waste Determinations

Both State and Federal rules require the generator of a solid waste to determine whether that waste is a hazardous waste. This requirement (see s. 291.21, Stats.) applies to contaminated media and other waste generated during remediation activities, as well as process wastes. Please review our *Guidance for Hazardous Waste Remediation* RR-705 to assist you in making future waste determinations. Your recent soil excavation and disposal was conducted in areas of documented trichloroethene (TCE) above the Industrial Direct Contact Residual Contaminant Level (8.81 mg/kg) at concentrations that may be classified as a hazardous waste. The profile for your solid waste disposal relied solely on the analysis using EPA SWA Method 8260. In the future when making a hazardous waste determination under Ch. NR 661 Wis. Adm. Code, the Toxicity Characteristic Leaching Procedure (TCLP) test should be performed on your representative sample to determine whether the waste material would meet the definition of a characteristic hazardous waste.

Need for Notifications

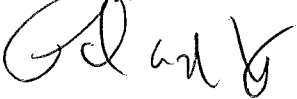
Recently you collected soil and groundwater samples on the adjoining railroad property. Ch. NR 716.14(2) requires you to report all sampling results to the DNR and to the property owner within 10 business days after receiving the sample results. Please conduct the necessary notifications for this recent sampling and ensure future sampling conforms with this rule.

Also, for the future closure submittal, ch. NR 726.13 Wis. Adm Code requires that affected parties are notified of site specific conditions of closure. The figures in your recent closure request illustrated adjoining properties that would be affected by a closure decision and would need to be notified under this rule.

Within 60 days of the date of this letter, please respond in writing with a schedule of your plans to meet these requirements. Until requirements have been met, your site will remain "open" and you will also need to continue to submit the semi-annual progress reports, as required by s. NR 700.11, Wis. Adm. Code. You will also be responsible for any operation and maintenance activities required under s. NR 724.13, Wis. Adm. Code., including annual inspections of your vapor mitigation system.

We appreciate your efforts to restore the environment at this site. Your consultant has indicated that you would like to have a meeting to discuss this letter and the project. If you have any questions regarding this letter or to schedule a meeting, please contact Doug Cieslak at (262) 574-2182 or me at (414)263-8561.

Sincerely,



Pamela A. Mylotta
Team Supervisor, Southeast Region
Remediation & Redevelopment Program

cc: D'Arcy Gravelle – Key Engineering Group LTD (email only)