DuPont Pompton Lakes Works
2000 Cannonball Road
Pompton Lakes, NJ 07442

The miracles of science™

March 23, 2012

Dear Resident:

In July 2011, DuPont completed the first phase of a pilot study to determine if using a technology known as bioremediation would be beneficial in treating groundwater contamination in the off-site groundwater plume adjacent to our property. As you may know, bioremediation is a process that uses naturally occurring bacteria or microorganisms to remove contaminants present in soil and water.

The first step of the pilot study consisted of installing a series of wells in the pilot area located at the intersection of Barbara Drive and Schuyler Avenue. The wells were used to conduct testing which provided data on groundwater flow rates and direction as well as other environmental factors present in the shallow and intermediate zones of the aquifer.

Beginning in April and lasting until the fall 2012, DuPont will gather additional data to further evaluate the effectiveness of implementing bioremediation within the intermediate zone of the aquifer. Lactate and other microorganisms will be added to groundwater to assist in the biodegradation process. Measurements will be collected from the wells installed during the first phase of the study for the purpose of optimizing the testing. Samples will also be collected to assist in the evaluation of the technology for implementation on a larger scale.

A summary of activities to be completed during this phase of the pilot study are provided on the reverse side of this letter and is also available on the Pompton Lakes Works website (www.pomptonlakesworks.com).

Although we do not anticipate any road closures, traffic patterns in the area of Barbara Drive and Schuyler Avenue will be modified to ensure everyone's safety. As in the past, we will coordinate with the Pompton Lakes police department to assist with traffic safety. Working hours will not start before 8 am and will not go beyond 5 pm.

We appreciate your support of this effort and we will do our best to minimize disruptions during the completion of our work. Please contact us at (973) 492-7703 with any questions or if you have feedback about the pilot study.

Sincerely,

David E Epps

David E. Epps, P.G.
Project Director, Pompton Lakes Works
DuPont Corporate Remediation Group

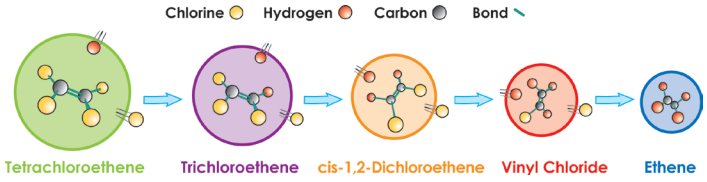
cc: Anthony Cinque, NJDEP
Clifford Ng, USEPA
Kevin Boyle, Borough of Pompton Lakes

Bioremediation Pilot Study
Pompton Lakes, New Jersey

THE SCIENCE

What is bioremediation?

Bioremediation uses microorganisms to reduce chemical concentrations in the environment. Bioremediation may be employed to convert specific soil and groundwater contaminants, such as trichloroethene (TCE) to non-toxic compounds, such as ethene.



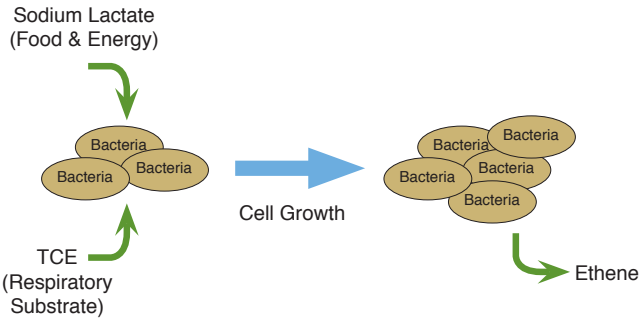
What is bioaugmentation?

Bioaugmentation is the addition of beneficial microorganisms to improve the rate or extent of the breakdown of a compound (e.g., TCE) into less toxic compounds.

What do microorganisms need to grow?

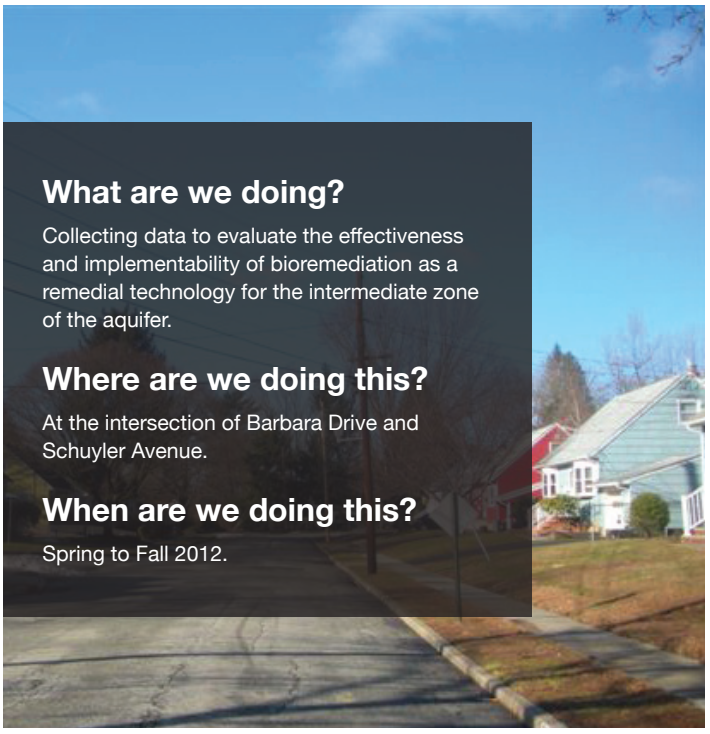
Like all living things, microorganisms need food (i.e., a supply of carbon and energy), a respiratory substrate (i.e., something to "breathe" like air for humans), mineral nutrients and water to grow. The selected food source for this pilot study is sodium lactate, a product that is also used in food industries. Groundwater contaminants, such as TCE, act as a respiratory substrate for the microcoorganisms.

The schematic below shows how microorganisms grow using a respiratory substrate (e.g., TCE or cis-1,2,-dichloroethene) and food (e.g., lactate) to increase their cell numbers and produce ethene. We need to grow sufficient numbers of microorganisms in order for bioremediation to be successful.



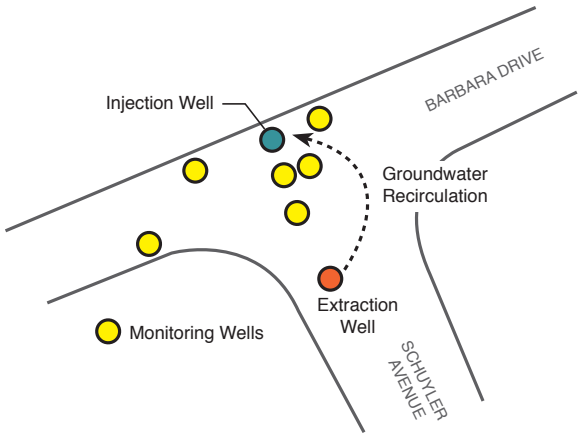
How long will this take?

Bioremediation is an effective technology to address groundwater contamination. In most cases, weeks to months may be required for populations of microorganisms to grow to sufficient numbers to observe complete transformation to ethene. Delivering and distributing food (i.e., sodium lactate) to the subsurface can be difficult and potentially limit the effectiveness of bioremediation.



THE TECHNOLOGY

Sodium lactate and microorganisms will be added to extracted groundwater and injected to promote contact with, and enhance degradation of, contaminants within the intermediate portion of the aquifer.



If you have any additional questions please contact:

- Pompton Lakes Works | http://www.pomptonlakesworks.com
- DuPont Pompton Lakes: 973-492-7703

Visit the following websites for additional information on bioremediation:

- Environmental Protection Agency | http://www.epa.gov/oust/cat/INSITBIO.HTM
- ITRC | http://www.itrcweb.org/

Geosyntec consultants

geosyntec.com