

**RISK ASSESSMENT EVALUATION OF GROUNDWATER OR SOIL REMEDIATION
ADDITIVES CONTAINING MICROORGANISMS**

Page 1 of 2

SEND TWO COPIES TO: DWQ - AQUIFER PROTECTION SECTION
 1636 MAIL SERVICE CENTER
 RALEIGH, NC 27699-1636
 TELEPHONE (919) 807-6464

Provide direct responses to each of the following items:

Required General Information

1. Department of Environment and Natural Resources Aquifer Protection Section contact person and phone number.
2. Current or future use of site with site contact person, address, and phone number.
3. Contractor applying product, contact person, address and phone number.
4. Distance and likelihood of impact to public or private wells used for drinking, industrial processes, cooling, agriculture, etc. Is area served by public water supply? Verification must be provided by the appropriate Regional Office of the Public Water Supply Section.
5. General description of the contaminants if present in the soil and/or groundwater at the site.
6. Name, approximate distance, and likelihood of impact to the nearest body of surface water to the site.
7. Approximate distance to nearest residence(s) and workplace.

Required Product/Process-Specific Information

1. Product manufacturer name, address, phone number, and contact person.
2. Genus/species/strain of microorganism(s) contained in product.
3. Identity of specific ingredients (including CAS#) and concentrations of ingredients contained in the product and purpose of each.*

**RISK ASSESSMENT EVALUATION OF GROUNDWATER OR SOIL REMEDIATION
ADDITIVES CONTAINING MICROORGANISMS**

Page 2 of 2

4. Documentation from authoritative technical references (i.e., *Bergey's Manual of Systematic Bacteriology*, *Bergey's Manual of Determinative Bacteriology* or other existing references) that the microorganisms are not pathogenic to animals or humans. (Provide a brief summary of the referenced material as well as a copy of the referenced material.)
5. Documentation from authoritative technical references that the microorganism(s) are naturally-occurring in the immediate or similar environment. (Provide a brief **summary** of the referenced material as well as a **copy** of the referenced material.)
6. Documentation from authoritative technical references of specific degradation products expected.
7. Documentation from authoritative technical references of expected migratory potential of microorganisms and degradation products in soil and groundwater.
8. Complete description of the use of the product at the site (e.g., application of the product to soil and/or groundwater, aeration of soil. Procedures needed to maintain growth and chemical degradation).
9. Approximate concentration of each ingredient following release into soil or groundwater.
10. Approximate distance and direction of travel for product in groundwater, the groundwater concentration of each ingredient at this distance, and distance from this point to the nearest drinking water source (that is currently used for drinking purposes). These should be reasonably accurate estimates based on best available information and calculations (modeling, if necessary) regarding aquifer characteristics and flowpaths at the site; where uncertainty exists in critical aquifer parameters (e.g., effective porosity), conservative assumption should be made in estimating these values so that worst-case predictions of travel distances are made.
11. Approximate groundwater concentration of each ingredient after pumping or recovery (if applicable).
12. If the product is expected to discharge to a nearby surface water, approximate concentrations of product in the water.

* If the composition of the proposed injected fluid is considered a trade secret and needs to be treated as confidential, please submit the confidential information clearly labeled as confidential. In addition, include a letter identifying the confidential information and stating why the information should be processed as confidential. All information warranting protection as a trade secret will be kept from public disclosure in accordance with G.S. 132-1.2. and 15A NCAC 2C .0211(g).

The risk assessment will be forwarded to the designated contact person for the site, consultant applying the product, and Aquifer Protection Section contact person.