Public Health Response to Gas Well Drilling In Broome County

The Broome County Health Department, Division of Environmental Health Services has program responsibilities that should complement the statutory and regulatory requirements of the New York State Department of Environmental Conservation (NYSDEC) for gas well drilling in New York State.

We provide regulatory oversight of public water supplies in Broome County. This includes the large municipal supplies serving the urban core as well as the many smaller supplies serving people and businesses throughout the county. Approximately 165,000 (84%) county residents are served by 77 Community Public Water Supplies (municipal and mobile home parks) which are regularly tested for bacterial, organic, inorganic and radiologic parameters. We have the capacity to advise NYSDEC of the locations of all 190 Community and Non-Community (restaurants, convenience stores, campgrounds, etc.) public supplies prior to drilling so that the potential for impacts can be considered by NYSDEC in the permit process. Many of the supplies serve businesses under permit to the Health Department and may have their operations restricted if their supply does not meet State standards. We can also provide information on existing source protection ordinances, areas of influence, aquifer characteristics, locations of dump sites, and existing water quality for the valley municipal groundwater sources should the NYSDEC receive an application for drilling in the primary/principal aquifers serving the region.

The remaining 30,000 (16%) county residents are served by private water supplies mainly consisting of drilled wells, but may include springs or other sources. We have developed and are updating a list of well water parameters that individual homeowners and businesses can use when sampling for background (pre-drilling) conditions. Most reflect naturally occurring parameters along with some common construction site contaminants. Lacking are specific parameters for compounds comprising the hydraulic fracturing fluid. Those compounds will be considered after the Supplemental Generic Environmental Impact Statement (SGEIS) is finalized. At this time, Broome County Health Department does not endorse private water well baseline sampling, since the closer the baseline tests are to the commencement of drilling activity, the more representative they will be of actual water quality during the drilling period, and the more valid they will be as a basis for evaluating post-drilling test results for possible impacts from a gas well site. A good rule-of-thumb is two to six months before drilling commences. As stated in the draft SGEIS, drilling companies will be responsible for identifying water wells within a half-mile radius of their gas well pad and offering baseline and ongoing testing to well owners within 1,000 feet of their pads. In order for the test results to be admissible in legal proceedings, samples must be collected by an unbiased third party (not the landowner or the gas company) according to accepted procedures; have a verifiable chain of custody; and be tested in a lab that is certified by the state where the well is located. Usually the water sample is collected by an employee of the certified lab. Broome County Environmental Health Services Division does not have the facilities or the personnel to collect and analyze water samples from private wells.

The Division of Environmental Health is required to investigate nuisance complaints to determine if a public health nuisance exists. Residents typically contact us on many issues and we predict that residents will contact us as gas drilling proceeds with concerns and questions such as well water quality, noise, dust, chemical use and other issues. Through their regulatory pre-emption, NYSDEC staff have the responsibility to respond to all complaints except drinking water quality issues as stated in the draft SGEIS. Broome County Health Department will develop a mechanism to assist residents by referring callers to the appropriate NYSDEC contact.

Performance standards of the Broome County Public Health Services Plan require Environmental Health Services to have a response procedure to chemical emergencies and chemical exposures. Environmental Health and other Health Department staff will continue to respond to chemical incidents in, primarily, an assessment and advisory role to first responders and remediation personnel. Chemical spills and emergencies can potentially occur with natural gas development activities, as with any industrial activity, and Broome County Health Department will continue its mandated role in assisting responders to limit the scope of public health impacts.

Environmental Health Staff have reviewed the NYSDEC 1992 Generic Environmental Impact Statement (GEIS) and have reviewed and commented on the 2009 SGEIS to identify other areas where we could help assure that gas drilling does not produce public health impacts. Staff will also review any Site Specific Environmental Impacts Statements and review any Environmental Assessment Forms developed under a SEQRA Type 1 positive determination near regulated facilities.

Development of the natural gas resource presents challenges to state, county, and local governments. Communication and information sharing among the NYSDEC, the NYSDOH and County Health Departments can help ensure that environmental challenges do not become public health problems. The New York State Conference of Directors of Environmental Health has established a committee to review issues related to gas well drilling that may impact local programs and where intervention by local environmental health would be appropriate or requested.

Please visit the Broome County Environmental Health website at

http://gobroomecounty.co.broome.nyenet/eh/

for additional information.