

To: Edward Hanlon/DC/USEPA/US@EPA

Date: 04/06/2010 04:48 PM

Subject: "materials" for consideration by the SAB Environmental Engineer Committee Hydraulic Fracturing Research Plan Review

Dear Mr. Hanlon,

I submit these comments as "materials" to be considered by the Committee.

Thank you,

Tom Noonan
Hancock, NY

Remediation of Hydro Fracturing operations

I have been searching long and hard for information or studies on the long term remediation of hydro fracturing wells in our region (New York's Southern Tier). **THERE ARE NONE. Because none has been conducted.**

The subject has not been thoroughly, adequately, or even cursorily explored by any State, Federal, or industry body.

Here are some questions that I feel need to be addressed before we face the full scale industrialization of our region that natural gas fracking promises.

- 1) What happens to a horizontal high volume hydrofracturing (fracking) well when its production dwindles and it is capped-off as is the claimed industry practice?
- 2) What happens to millions and millions of gallons of carcinogenic and radioactive (in most cases, according to a New York State DEC study) brine that remains in one such well for eons under pressure in rock formations that have been repeatedly fracked?
- 3) What happens to the steel and iron casings and pipes of one such well that contains this pressurized hazardous and radioactive waste in an incredibly salty environment for eons to come?
- 4) Since industry practice is to use concrete only for the first few hundred feet of a well, what happens to the remaining 6,000 to 9,000 feet of steel and iron vertical pipe (and 6,000 to 8,000 feet of horizontal pipe) of one such well over eons in a clearly corrosive hostile?
- 5) How much would it cost to remediate one such well and its millions of gallons of hazardous radioactive waste fluids should its pipes fail in the future?
- 6) Is it even possible to remediate one such well and its carcinogenic and radioactive waste under even the best circumstances?

- 7) I propose that to drill one such well without thorough study is to possibly create a carcinogenic and radioactive time bomb buried in the earth in fragile steel and iron casing over thousands and thousands of feet over eons in a terribly hostile environment.
- 8) It would be unwise to create **just one** of these wells without taking the time to study these possible outcomes. But what about the nightmare we now face of injecting 20,000 to 40,000 of these wells (according to industry projections) into the ground of our region knowing that when the well stop producing the gas corporations are just going to fold up shop and go somewhere to start this process over again.
- 9) **But enough bad news - here's the good news:** If we can just figure out how to remediate one of these wells, what's a twenty or thirty thousand more? Or two hundred thousand more, right?
- 10) Isn't the mandate of good government to study issues that could have such a dramatic affect on the public health and welfare of our citizens today. (And in the case of fracking wells, buried miles under ground, we must think ahead for thousands of years to come as those pipes sit down there corroding).

We hope the EPA will take on the job of exploring these issues. No one else seems to want to do it - I guess no one thinks there's any real benefit to it.

But just maybe there is. Just maybe.