

STATE OF VERMONT
PUBLIC SERVICE BOARD

Petition of Vermont Gas Systems, Inc.,)
requesting a Certificate of Public Good pursuant)
to 30 V.S.A. § 248, authorizing the construction)
of the "Addison Natural Gas Project" consisting)
of approximately 43 miles of new natural gas)
transmission pipeline in Chittenden and Addison)
Counties, approximately 5 miles of new)
distribution mainlines in Addison County,)
together with three new gate stations in)
Williston, New Haven, and Middlebury,)
Vermont)

Docket No. 7970

**VERMONT AGENCY OF NATURAL RESOURCES' RESPONSE TO
THE PALMERS' FIRST SET OF DISCOVERY REQUESTS**

GENERAL OBJECTIONS

- A. The Agency objects to the Requests as overbroad and unduly burdensome on the grounds and to the extent they call for responses that are neither relevant to the subject matter of the pending action, nor reasonably calculated to lead to the discovery of admissible evidence.
- B. The Agency objects to the Requests on the grounds and to the extent that they seek responses that are subject to any or all of the following privileges: (i) the attorney-client privilege; (ii) trial preparation privilege; (iii) executive privilege, or that are otherwise privileged or protected from disclosure.
- C. The Agency objects to the Requests' Instructions and Definitions on the grounds and to the extent that they are overbroad, unduly burdensome and oppressive, purport to impose obligations on the Agency that are beyond the scope of the Public Service Board Rules or the Vermont Rules of Civil Procedure or other applicable law, cannot be produced without undue burden to the Agency and/or that require an unreasonable investigation on the part of the Agency in order to be produced, or purport to require the Agency to create documents responsive to any such Requests.
- D. The Agency objects to the Requests to the extent that they seek the production of documents and information already in the possession of, or publicly available to, or readily obtainable to the Petitioner and their counsel, on the ground that with respect to such production, Petitioner's Requests are thereby rendered unduly burdensome.

- E. The Agency objects to the Requests to the extent that they seek the production of documents and information in the possession, custody or control of entities other than the Agency, on the ground that such demanded production is beyond the scope of the Public Service Board Rules or the Vermont Rules of Civil Procedure and other applicable rules and law.
- F. The Agency expressly reserves the right to supplement, clarify, revise or correct any or all of the responses herein at any time. By making any response to the Requests, the Agency does not waive, and hereby expressly reserves, the right to assert any and all objections as to the admissibility of such responses into evidence at the time of trial of this action, or in any other proceeding, on any and all grounds, including but not limited to, competency, relevance, materiality and privilege. Further, the Agency provides the responses herein without in any manner express or implied admitting that the items in the Requests or in any response thereto are relevant or material to the subject matter of this proceeding.

These General Objections are made, to the extent applicable, in response to each of the Interrogatories and Requests for Production of Documents as if the objections were fully set forth therein.

RESPONSES

Bob Popp

1. On page 7, lines 9-15, of your prefiled testimony, you list seven state threatened plants (in 9 locations) and on page 9, lines 6-12 you list 7 uncommon to very rare plants (some in multiple locations) that are located in the project area. This seems like a lot to me. Is this an uncommonly high number of plants to be impacted in a project of this scope and magnitude or is this normal?

OBJECTION: The question is vague and ambiguous and contains some undefined terms that might have several meanings. Subject to and without waiving this objection, ANR offers the following:

RESPONSE

1. The number of Rare, Threatened, and Endangered plants along the proposed Vt Gas line is not unexpected. Long linear projects such as this one cross a lot of different natural communities and are more likely to intersect with more R,T,E populations than would a project of similar area focused in a more centralized polygon. Furthermore, the VT Gas corridor runs through the Champlain Valley which is among the more diverse areas of the state and has significantly more R,T,E plants than most other areas of the state.
2. In your opinion, would the impact to R,T,E, plants be more or less if the pipeline was sited along the VELCO right of way in its entirety? And how would the VELCO right of

way compare (in reference to number of R,T,E plants) to a route alongside Route 7?

RESPONSE: There are actually a high number of R,T,E plants along the VELCO corridor for the same reasons as outlined above. However, if proper care were taken, I would expect there to be less of an impact to R,T,E plants if the pipeline were situated entirely along the VELCO corridor in its entirety. There would likely be significantly less impact to R,T,E plants if the pipeline were situated alongside Rte. 7 than along the VELCO corridor or its present route.

3. Are there any areas of R,T,E, plants between VELCO poles 180 and 190 on the VELCO right of way?

RESPONSE: There is a potential rare/uncommon plant designated as such on the Feb 2013 Natural Resource Report maps

4. In Q. 23, you are asked "Do you have any other concerns regarding potential impacts from the project?" You list several concerns and then talk about opening up of corridors for invasive species to infest otherwise inaccessible areas. On page 13, lines 12-14 you state "VT Gas has not addressed this concern which should be covered in an Invasive Species Management Plan which the Agency has requested from VT Gas and has yet not received."

When did the Agency request this information? RESPONSE ANR raised this issue

during a May 14, 2013 site visit with VG representatives and its consultants including Art Gilman and Adam Crary.

Person Providing Response: Bob Popp

Included in its May 20, 2013 Second Set of Information Requests on Petitioner, ANR asked Petitioner whether it would agree "to a condition in the Certificate of Public Good requiring a Plan to monitor and control for invasive species." ANR repeated its request for an invasive species monitoring plan during a meeting with Petitioner on 6/7/13.

(Judith Dillon)

The Wetlands program does include invasive species monitoring in its permits. (Alan Quackenbush)

VG will need to do a baseline study before construction in order to document the baseline conditions.

How will impacts be assessed without baseline data? Will you require this data before issuing permits?

RESPONSE: VG has provided an invasive species monitoring plan which includes a commitment to conduct a baseline inventory. ANR is evaluating the sufficiency of the Plan. As a preliminary matter, it is uncertain when and where the baseline inventory will

be conducted. ANR would also recommend that plants on the Noxious Weed watch list be included in the Invasive Species Monitoring Plan.

Alan Quackenbush

1. On page 3, lines 16-19 Q. Will the project have any impact on the wetlands or buffers?
 - A. Yes, impacts will result primarily from trenching and clearing of vegetation. Most of the trenching impacts will be temporary, if the soil layers can be removed and replaced in order, and if the hydrology of the wetland does not change. If the hydrology changes or the soil layers are not removed and replaced in order, these impacts will be permanent.”

I take this to mean that the “water balance” (as hydrology is defined in Wikipedia), could be changed by this trenching? What other circumstances would change the “water balance” or hydrology of the wetlands?

OBJECTION: ANR interprets the question to ask, Could the hydrology or water balance be changed by trenching, to which the Agency offers the following response.

RESPONSE: Wetland hydrology refers to the sum total of wetness characteristics of a wetland. Wetland characteristics include the hydrologic cycle; water table levels; water chemistry; hydrologic budget, and ground water flow patterns (Sec. 2.39 Vermont Wetland Rules). Any activity that may alter wetland hydrology, including the flow of surface water or ground water into or out of the wetland must be addressed.

2. Mr. Quackenbush mentions he will need the location of the blasting activities to determine potential impacts to wetland hydrology. Has the Agency gotten any maps or other information from the Petitioner as to where the blasting will occur as of yet.

RESPONSE: ANR has requested information on where and in what amounts blasting will occur and its proximity to wetlands and water sources. The Petitioner has not provided this information.

3. Will ANR require this information to be submitted before any permits are issued?

RESPONSE: As blasting activities may adversely impact wetlands, ANR needs to know the location and extent of the blasting activities before we can consider the application complete or issue a permit.

4. Originally, VGS had 5 routes they were considering for this pipeline. They settled on Number 5 through Monkton. (lucky us). I am assuming this original route through Monkton (now known as 5a) was the "least environmentally damaging practicable alternative" at this time. Then, when the townspeople of Monkton raised a ruckus, and the route was shifted off the town roads and mostly onto the VELCO right of way, (except where it deviates through the middle of our farm) and Route 5a became 5b. (See Q ANG:VNG.2-8, 2-35, 2-43, 2-45, 2-49) it seemed like you were not really too happy about that because it sited the pipeline through more wetlands and environmentally sensitive areas.

What I would like to know is, what made you decide that Route 5b is now the "least environmentally damaging practicable alternative" compared to the other four original routes . . . specifically the one down the Route 7 corridor? Please provide any correspondence, research, field notes, permit applications or other documentation that confirms that ANR agrees that Route 5b is less environmentally damaging than any of the other original routes previously considered.

RESPONSE. ANR has not made a determination that alignment 5b is less environmentally damaging than any other original routes previously considered.

A LEDPA determination has not been made regarding alternative 5b or any other alternative. The LEDPA determination is ultimately made by the Army Corps of Engineers and upon information and belief that determination has not been made.

Jeff Merrell

1. Page 6, lines 3-5 in your examination of GHG emissions predictions by Eileen Simollardes, (EMS-1) you conclude that her estimated prediction for GHG reduction benefits "provides no information that would enable the reader to understand the level of uncertainty present in various inputs and assumptions used to generate the GHG emission benefit results." Then on page 9, lines 9-15, you say, Absent a life-cycle analysis, it would only be possible to say that at the burner tip, combustion of natural gas emits a smaller mass of greenhouse gases than an energy equivalent amount of fuel oil or propane. Depending on methane emissions that occur "upstream" in the natural gas life cycle, this may or may not accurately reflect the comparative difference in greenhouse gas emissions between natural gas and other fuels (i.e., if fugitive methane leaks during natural gas productions are large, the greenhouse gas benefits attributable to the project would be reduced, or even could be negated.)

So, can it be assumed by your testimony that VGS has been exaggerating the greenhouse gas

emission savings this project will produce and that Ms. Simollardes' exhibit EMS-1 should have no bearing on the decision the Board makes regarding this project.

OBJECTION: The question appears to seek Mr. Merrell's opinion on whether people should make assumptions about his testimony. The question is vague and confusing. Subject to and without waiving this objection, ANR offers the following:

RESPONSE: My testimony indicates that Ms. Simollardes' Exhibit EMS-1 has not provided a comprehensive estimate of greenhouse gas (GHG) emissions reductions, as it does not account for life-cycle GHG emissions from natural gas production, transmission, distribution, etc., nor does it compare life-cycle GHG emissions from natural gas to those of fuel oil or propane. Given these deficiencies, it is possible that Exhibit EMS-1 overestimates the GHG benefits of the project

Person providing response: Jeff Merrell

Objection: Judith L. Dillon

The 248 process has been focused on the economics and the environmental (GHG) consequences of this project, but no one has broached the subject of the process of extracting the "natural" gas that will be carried and sold through this pipeline. What is your opinion on the true cost to the environment that hydraulic fracturing causes and how should these costs affect the Board's decision on whether or not the pipeline is in the "public good."

OBJECTION: The question exceeds the scope of Mr. Merrell's testimony and appears to seek information that is not reasonably calculated to lead to the discovery of admissible evidence and seeks a legal conclusion. Subject to and without waiving this objection, ANR offers the following;

RESPONSE:

It is undeniably true that extraction of natural gas by hydraulic fracturing has associated negative environmental impacts. It is also true that there are negative environmental impacts associated with the extraction of other fuel types. The Board considers the environmental impacts of a project in making its public good determination.

The Vermont Legislature passed Act No. 152 (H.464) in 2012 prohibiting hydraulic fracturing for oil or natural gas in Vermont. This bill also requires the Agency of Natural Resources to report back to the general assembly by January 2016 regarding the safety of hydraulic fracturing. The U.S. Environmental Protection Agency (US EPA), academic institutions and a number of states with natural gas resources (e.g., New York) continue to evaluate the environmental impacts associated with hydraulic fracturing.

What impact do you think the added usage of "natural" gas in Vermont will have on water and air quality in the areas where it is extracted?

OBJECTION: A. The question seeks information beyond the scope of the Board's review of the proposed project.

J. Calvi

1. On page 9, lines 1-5, you list the 12 major watersheds that the project area crosses. Are marshes and swamps not considered watersheds and is that why they are not on the list? And what area of Lake Champlain basin will be crossed during Phase 1 of this Project?

RESPONSE: A watershed is a geographic area in which all water flows to the same water course or water body. Marshes and swamps can be water features within a watershed, and in the stormwater permit application these, in addition to other wetlands, were considered in the context of larger watersheds. Watersheds may come in different sizes, and in this case they were categorized by major rivers. [While all of the river watersheds mentioned are part of the greater Lake Champlain "Basin" they also each make up their own, smaller, watersheds as well.]

The portion of the Lake Champlain watershed referenced in my testimony refers to the Lake Champlain Direct watershed, which means it does not flow first to a major river – instead, all of the land within that area flows directly into the lake. This specific portion of the Lake Champlain Direct Watershed is located in Colchester, in between the Winooski River and Mallet's Creek Watersheds.

2. During the process of horizontal directional drilling, copious amounts of water mixed with bentonite are used during the drilling process. Will the water and bentonite residue be removed or discharged on site? How is it collected and contained?

OBJECTION: The Question is more appropriate for the Petitioner, Vermont Gas. Subject to and without waiving this objection, ANR offers the following:

RESPONSE: ANR has asked Vermont Gas how it will manage the water used during the horizontal directional drilling process. The water is not stormwater and its discharge is not covered under the stormwater permit.

DATED at Montpelier, Vermont this 12th day of July 2013.

VERMONT AGENCY OF
NATURAL RESOURCES

As to OBJECTIONS

By: _____
Judith L. Dillon