

Issue: Pipelines

The Atlantic Coast Pipeline

Introduction

Dominion Energy and three other major energy companies are pushing to continue building a project laying a major gas pipeline across the state of Virginia. The Atlantic Coast Pipeline would cover 600 miles from its origin in West Virginia to its ultimate outlet in North Carolina. Designed to transport shale gas fracked from the Marcellus-Utica formation, the pipeline would be 42 inches in diameter and cost at least \$7.5 billion. Land is being cleared in the forested Appalachian hilltops. The pipeline would also require construction of a polluting compressor station, now set to be built near a historically Black community in Buckingham County. The energy companies that in 2014 formed a joint venture to build the pipeline—Dominion, Duke Energy, Piedmont Natural Gas and Southern Company Gas—are expected to buy most of the pipeline’s capacity for their own plants. If Dominion succeeds in court fights and preserves federal and state approvals to build out this project, it will be another example of the political power of this company, which has long embraced fossil fuels. For decades, Republicans in the legislature have supported Dominion’s interests. The Federal Energy Regulatory Commission has long been predisposed to approve pipelines. But the Atlantic Coast pipeline has sparked widespread opposition from all sides of the political spectrum, indicating Dominion’s domination in Richmond may not last forever. New legal setbacks indicate federal and state approvals may have trouble withstanding court scrutiny.



Map by Oil Change International

The pipeline fight highlights four issues:

- 1) How much unnecessary environmental destruction will it cause?
- 2) Who will pay for it?
- 3) Will its natural gas supply crowd renewables out of Virginia’s future energy mix?
- 4) Is the siting of one compressor station an environmental injustice?

Environmental Impacts

The pipeline would cross the Allegheny and Blue Ridge Mountains from West Virginia to North Carolina and would require cutting a swath of 75 to 100 feet through 16 miles of the George Washington National Forest in Virginia’s Highland, Bath, and Augusta counties. A road would likely parallel the pipeline, causing further impacts to the surrounding natural environment, including disrupting natural habitats, increasing noise and air pollution, and increasing unnatural animal

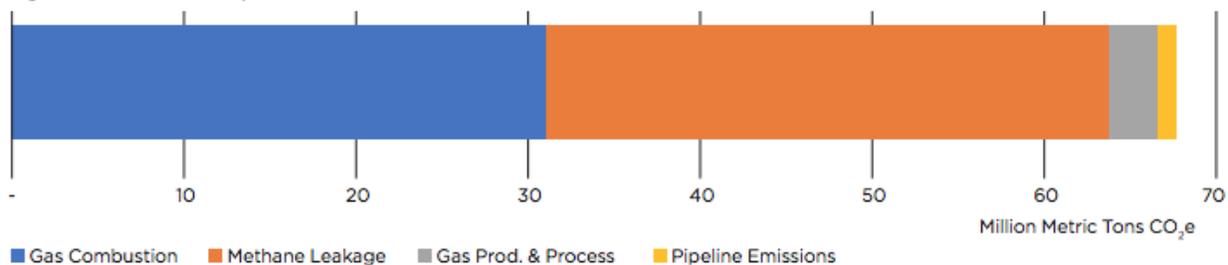
mortality.¹ This long, wide industrial zone would severely degrade some of the best remaining, least altered natural landscapes in the Eastern U.S.

On July 21, 2017, the Federal Energy Regulatory Commission (FERC) issued a “Final Environmental Impact Statement” for the controversial Atlantic Coast Pipeline,² concluding that the 600-mile pipeline’s impact on the environment would be reduced to “less-than-significant” levels if the developers follow 71 mitigation measures noted in its final order approving the pipeline. With FERC’s favorable review, the pipeline was a big step closer to the start of construction. While not surprised by the favorable report, environmental groups criticized the commission’s conclusion that the project would have “less-than-significant” impacts on the environment³.

One of the commission members dissented from FERC’s October 2017 vote approving the project,⁴ pointing out that the environmental damage of the Atlantic Coast Pipeline could be reduced by redrawing plans to combine it with the proposed Mountain Valley pipeline, whose route runs parallel in some places. In her dissent, Cheryl A. LaFleur wrote that plans, now abandoned, to combine the two pipelines in places “demonstrate that the regional needs these pipelines address may be met through alternative approaches that have significantly fewer environmental impacts.”

The Atlantic Coast Pipeline has raised intense opposition from environmentalists and from the affected communities. Many have found the commission’s assessment of potential climate pollution inadequate. It failed to consider air pollution caused by fracking, downplayed methane leakage, and wrongly assumed gas will replace coal, though in fact it increasingly displaces clean energy. Those conclusions were drawn by Oil Change International research analyst Kelly Trout who argued the pipeline will cause 68 million metric tons of greenhouse gas pollution per year -- the equivalent of 20 coal plants or more than 14 million vehicles.⁵

Figure 1. Atlantic Coast Pipeline Annual GHG Emissions



Source: Oil Change International using IPCC, PSE, FERC and Santoro et al. See Gas Pipeline Climate Methodology (see Footnote 5).

Environmental groups have challenged the commission’s conclusion that the project would have “less-than-significant” impacts on the environment by providing a detailed analysis of its negative impacts on forests and waterways. Now the pipeline’s proposed stream crossings, approved by the federal Army Corps of Engineers, and its crossing of the Appalachian Trail, approved by the U.S. Forest Service, are proving to be its Achilles’ heels. Both approvals were overturned by the Fourth Circuit Court of Appeals in the last months of 2018. In the wake of the December court decision invalidating the Forest Service permit, the Southern Environmental Law Center has asked FERC to revoke its certification of the project.⁶

Before the court rulings, the Allegheny-Blue Ridge Alliance argued that FERC failed to assess the true market demand for natural gas and failed to consider the construction’s destruction of mountaintops along steep, forested Appalachian ridges or its impact on wetlands and threatened and endangered species.⁷

The Company Behind the Project

Dominion Energy, which proposed the pipeline five years ago, argues that it would serve multiple public utilities and support growing energy needs in Virginia and North Carolina. It leads a joint venture formed by four major, regionally based energy companies: Dominion Energy, Duke Energy, Piedmont Natural Gas, and Southern Company Gas. All would develop, construct, and operate it and could buy the gas it carries. They claim the pipeline would support over 17,000 jobs during construction, 2,200 operation jobs, would provide lower cost energy and cleaner air.⁸

Even if natural gas produces less pollution than coal, the earlier mainstay of Dominion's energy production, it is far dirtier than renewable sources like wind and solar. With major energy companies invested in using the natural gas that they have brought to their own power plants, they have no reason to replace their fossil-fuel energy offerings with renewable energy, even if the renewable energy is cheaper.

The pipeline's proposed route will run through environmentally fragile land and threaten land values and livelihoods of nearby residents. It potentially involves cutting into mountain ridgelines. Opponents claim abuse of eminent domain laws for private gain and argue that the pipeline is not needed to meet regional energy demands but is instead an attempt to increase profits to please shareholders.⁹ Dominion Energy, the biggest stakeholder in the pipeline, is an economic and political powerhouse in Virginia. The company and its powerful chief executive have used their deep pockets and political ties, deploying lobbyists to advance their interests, and providing major campaign contributions across the political spectrum.

State politicians in Virginia and North Carolina who have been publicly vocal about their support for the pipeline have been some of the biggest recipients of donations from its corporate backers.¹⁰ Key members of regulatory boards tasked with approval rights affecting the pipeline in Virginia have backgrounds raising conflict-of-interest concerns: the Virginia Department of Environmental Quality's Water Permitting Division director is a former lawyer for Dominion, according to minutes from a county board meeting.

The Political Lineups

Despite the positive environmental review, the Atlantic Coast Pipeline is not a done deal, as recent court rulings show. Still, opponents of the pipeline have an uphill battle as groups, including "Your Energy America," support the effort. Your Energy America was created in May 2017 by the American Gas Association (AGA) to promote natural gas use and undermine environmental advocacy campaigns against new natural gas pipelines.¹¹ Your Energy America is pushing Dominion's pipeline.

It is also supported by Governor Ralph Northam, a Democrat. Before the Air Pollution Board's crucial vote on the pipeline, Northam removed two of its members. He cited their expired terms, not their opposition to the pipeline.¹² In January 2019, the reconstituted board approved building a compressor station near a largely African-American community in Buckingham County¹³

The overall corporate structure of the pipeline ensures that its owners are its customers. This touches a nerve with strong conservatives; Ken Cuccinelli, the arch-conservative former Attorney General, has been actively opposing it. He wrote an op-ed article arguing the arrangement is monopolistic.¹⁴

Environmental Justice

Compressor stations required to move natural gas are allowed to emit limited amounts of air pollutants including toxic gases like methane, nitrous oxides and carbon monoxide, despite multiple claims the pollutants are causing illnesses in the area.^{15,16} Dominion’s application for a Virginia Air Pollution Control Board permit said the compressor in Buckingham County would be in a predominantly white area, citing broad-based census data but ignoring a detailed count by an anthropologist who did a door-to-door evaluation in the Union Hill community, which was founded by freed slaves.¹⁷ She identified 158 people within a one-mile radius of the site; 129 are not white. One outgoing board member wrote an op-ed article pointing to the deep roots of the local African-American community and saying, “a siting may be deemed inequitable if a population begins at a disadvantage, as is certainly the case of the Union Hill community.”¹⁸ “Historically, they always put these types of facilities in depressed areas, minority areas, where people have less clout and less education. This has to change,” said Paul Wilson, a local pastor.¹⁹ Friends of Buckingham challenged the permit in the Fourth U.S. Circuit Court.²⁰

Who Pays?

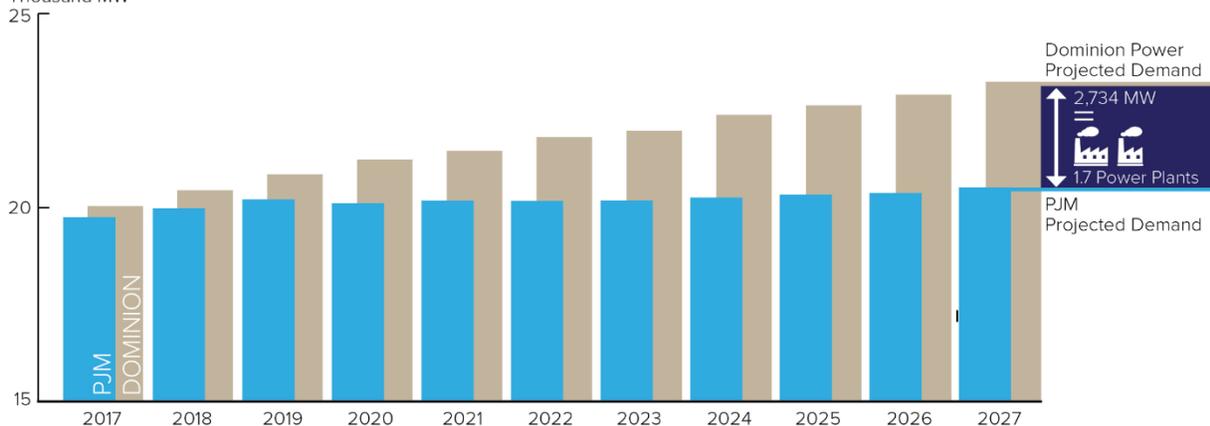
Federal rules allow the joint venture constructing the pipeline to charge customers—like power stations—rates based on the cost of transporting the gas (the \$7.5 billion in construction costs plus future operating costs). Federal authorities approve the rates the pipeline owners set. Here, some of the pipeline owners (Dominion Energy) and its customers (Dominion Energy power stations) are one and the same, so the next question is: how much of this cost can Dominion pass on to its ratepayers? The State Corporation Commission decides; the legislature can set the standards it must use.

Now the legislature is considering a measure to restrict Dominion’s ability to pass on the transportation costs, potentially reducing its revenues. The bill was just approved by a House committee that historically takes Dominion’s side on most issues. The measure would limit Dominion’s ability to pass on transportation costs unless the utility can prove to the State Corporation Commission that the incoming gas was really needed to supply the customers’ electricity.²¹ Dominion’s forecasts of future demand are significantly higher than those of PJM, the area’s regional grid operator, according to an analysis by the Southern Environmental Law Center.²²

CUSTOMER DEMAND FORECAST

PJM (GRID OPERATOR) VS. DOMINION

Thousand MW



Source: Dominion 2017 IRP and PJM projected demand (from PJM 2017 forecast)

Graphic by Southern Environmental Law Center

The Impact on Renewable Energy Alternatives

Virginia's renewable energy goals are voluntary. Dominion reports annually on its renewable energy options, as it did last year.²³ But beyond the state's non-enforceable targets, there are other demands for renewable energy. Facebook²⁴ and Microsoft²⁵ are planning or building energy-hungry facilities, like Facebook's data center in Henrico County. Both are committing to use renewable energy for all or most of their needs. Microsoft has a contract to use 315 megawatts of power generated by the planned 500-megawatt solar facility being built in Spotsylvania County.²⁶ Other businesses, large and small, as well as residents, are increasingly interested in having access to renewable energy.

The unanswered question posed by the Atlantic Coast pipeline is this: if Dominion is building out its solar-powered generation at a slower pace and will have more natural-gas-powered energy readily available, will these and other businesses and residents that want to go green be unable to do so, because Dominion's investments so disproportionately favor fossil fuels? The onus for protecting our state's renewable energy options now and in the future clearly rests with our state legislators.

¹ <https://www.environmentalscience.org/roads>

² https://www.dailyprogress.com/newsvirginian/news/state/final-environmental-statement-released-on-atlantic-coast-pipeline/article_0d6c0fd4-6e6e-11e7-83ad-af041d1bb447.html

³ https://www.washingtonpost.com/local/virginia-politics/as-court-challenges-pile-up-gas-pipeline-falls-behind/2018/12/29/8637dbd2-0549-11e9-b5df-5d3874f1ac36_story.html?noredirect=on&utm_term=.c9056e46767d

⁴ <https://www.ferc.gov/CalendarFiles/20171013192035-CP15-554-000.pdf>

⁵ <http://priceofoil.org/2017/02/15/new-analysis-mountain-valley-and-atlantic-coast-pipelines-are-climate-disasters/>

https://www.richmond.com/news/virginia/government-politics/federal-court-throws-out-permit-for-atlantic-coast-pipeline-to/article_9f94d373-6a35-5530-8141-1c885b05b096.html

⁷ <https://www.sierraclub.org/press-releases/2017/10/ferc-rubber-stamps-fracked-gas-pipelines-despite-widespread-concerns-and>

⁸ <https://atlanticcoastpipeline.com/about/default.aspx>

⁹ <https://www.southernenvironment.org/cases-and-projects/proposed-natural-gas-pipeline-threatens-scenic-western-virginia>

¹⁰ <http://priceofoil.org/2017/04/14/not-news-politicians-take-hundreds-of-thousands-of-dollars-from-pipeline-companies-sign-letter-supporting-pipeline-project/>

¹¹ <https://www.desmogblog.com/your-energy-america>

¹² https://www.washingtonpost.com/local/virginia-politics/va-governor-removes-two-board-members-ahead-of-crucial-vote-on-pipeline-project/2018/11/16/69e8af78-e9a2-11e8-a939-9469f1166f9d_story.html?utm_term=.0c94a1a04dfa

¹³https://www.richmond.com/news/virginia/government-politics/state-air-board-backs-buckingham-compressor-station-for-atlantic-coast/article_651e240c-fc0e-5ae5-933b-ff54f5bc8b22.html

¹⁴https://www.washingtonpost.com/opinions/virginia-has-a-pipeline-problem/2018/11/02/5387b236-d3b0-11e8-8c22-fa2ef74bd6d6_story.html?utm_term=.60dc8e72ecb7

¹⁵ <http://www.friendsofbuckinghamva.org/friends/learning-center/compressor/>

¹⁶<https://www.allegHENYfront.org/compressor-stations-open-up-new-front-in-fracking-debate/>

¹⁷https://www.washingtonpost.com/local/virginia-politics/former-board-members-challenge-state-data-ahead-of-key-vote-on-pipeline-facility/2019/01/07/4a49852a-1288-11e9-b6ad-9cf62dbb0a8_story.html?utm_term=.d873fab0eff6

¹⁸https://www.washingtonpost.com/opinions/2019/01/07/is-virginia-interested-environmental-justice-were-about-find-out/?utm_term=.7107a22f0de4

¹⁹<https://www.southernenvironment.org/news-and-press/news-feed/virginia-community-rallies-against-pipelines-compressor-station>

²⁰https://www.southernenvironment.org/uploads/audio/Petition_for_Review_w_Ex_A_FINAL.pdf

²¹https://www.washingtonpost.com/business/bill-limiting-pipeline-costs-to-ratepayers-advancing/2019/01/29/8799d448-23fe-11e9-b5b4-1d18dfb7b084_story.html?utm_term=.16d344b2aa0e

²²<https://www.southernenvironment.org/cases-and-projects/proposed-natural-gas-pipeline-threatens-scenic-western-virginia>

²³ https://www.scc.virginia.gov/pur/renew/dev_renew_18.pdf

²⁴<https://www.greentechmedia.com/articles/read/facebook-pledges-to-buy-100-renewable-energy-by-2020#gs.OdFEBfQe>

²⁵<https://news.microsoft.com/2018/03/21/microsoft-adds-315-megawatts-of-new-solar-power-in-virginia-in-largest-corporate-solar-agreement-in-the-united-states/>

²⁶ <https://pv-magazine-usa.com/2018/08/10/virginia-approves-500-mw-of-solar-power-plant/>