

FERC CP17-101 DEIS Issued on 3/23/2018

<https://www.ferc.gov/industries/gas/enviro/eis/2018/03-23-18-DEIS/DEIS.pdf>

15 Failure Points – Content of the DEIS fails to warrant Public Convenience & Necessity since:

- The complete impacts from the NESE Project could not be assessed at the time of the DEIS since much information was missing.
 - The conclusions of FERC's DEIS are not well supported in the DEIS.
 - The DEIS did not include clearly defined potential adverse impacts from the NESE Project and, without analyzing possible avoidance or minimization measures, FERC's conclusions that mitigation measures (which are not detailed in the DEIS) would acceptably reduce environmental impacts to minimal or non-significant levels cannot be substantiated or effectively reviewed by the public.
 - FERC's DEIS was not based on a complete economic analysis of benefits and harms.
 - FERC disregarded or minimized comments and requests from the public, legislators and municipality officials prior to the issuance of the DEIS and during the DEIS comment period without providing reasons with supportive scientific, data-driven studies.
- 1. There was no safety analysis of increased velocity of natural gas through lines A and C from CS206 to the Rockaway Transfer Point.** In the DEIS, FERC states *"Public concerns for safety [...] are out of scope"* for FERC's review of the NESE project, since MAOP will continue to be 800 pounds per square inch.
- MAOP is only one aspect of risk on the two main natural gas lines A and C.
 - The DEIS fails to account for risks associated with the increased velocity of natural gas added to Mainlines A and C.
 - A majority of the main lines A and C lines are 50+ year old, installed in 1950 and 1969 respectively.
(DEIS, pages ES-5 and 2-2)
- 2. There was no consideration or commitment to require air quality monitoring to be put in place at the CS206 site prior to the issuance of the FEIS and for the lifetime of the CS206 to monitor all chemical emissions from S206 identified in the certificate application.**
- Data obtained for air quality monitoring was not truly from the immediate area by using existing Monitoring Stations that are 7 miles or farther away.
 - Using data from Monitoring Stations in Elizabeth, East Brunswick & North Brunswick in NJ as well as from Philadelphia, PA does not account for the emissions from the operations of Trap Rock Quarry in a manner that is relevant to those living or visiting the immediate area.
 - The variance of air quality changes dramatically in this distance between the Air Monitoring Stations and the proposed CS206 site, making it impossible to accurately assess air quality impact in the immediate area.
 - By not requiring air quality monitoring at the site, FERC is unable to identify the potential impacts in the immediate area surrounding CS206, and FERC is not able to determine what would be needed to avoid, minimize or mitigate the environmental health impacts from CS206. Thus, FERC did not truly complete an environmental impact analysis of air pollution from CS206.
- 3. Validation of chemical emissions of Compressor Station 206's 'estimated' emissions from existing Solar MARS 100 compressors was dismissed by FERC in the DEIS.**
- Estimated emissions is never actual, especially in natural gas-fired turbines as evidenced in the Transco 3/27/2017 application where the manufacturer has significantly differing results in two separate test runs performed for the CS206 turbines.
 - The manufacturer does not warrant HAP emission accuracy.
 - Without actual measurements from Transco MARS 100 turbines in operation, FERC is unable to determine actual HAP toxic chemical emission quantities.
 - Throughout the DEIS, there is little validation of statements and specifications provided by Transco, yet the public has consistently found inaccuracies and at times blatant false statements.
 - Chemical emissions are critical to assessing the health and environmental impact for CS206.
 - For FERC to not validate the chemical emissions, exacerbates the failure of the DEIS to evaluate and mitigate the public safety, health and environmental impacts.

4. FERC denied that there is a need to perform a Health Impact Assessment (HIA) for those in the area around Compressor Station 206 with measurements of complete emissions including heat, exhaust volume and hazardous air pollutants (highly toxic airborne chemicals).

- **Heat Exhaust:** In the DEIS on pages 4-81 and 4-293, FERC dismisses heat exhaust impact to the environment. Instead, the impact of heat exhaust to the environment was only mentioned by FERC in reference to bird flights without providing any studies. There was no determination of potential impact and recommended mitigation for this for weather patterns, birds, insects, trees, and vegetation.

FERC never reviewed the impact of high heat massive exhaust output on the environment, weather patterns or impacts to nearby vegetation and insects in the area. A true environmental impact would review effects of high heat exhaust output (exhaust output of 210,000 cubic feet per minute at temperature greater than 849°F) to identify the impacts to local residents including weather patterns, vegetation, agriculture, rainfall, insects and birds.

- **Exhaust Volume Flow:** The DEIS does not review exhaust volume flow impact on the local area environment. There is no mention in the DEIS regarding exhaust output volume, yet it is integral to the two Solar MARS 100 compressors with two 50-foot smokestacks. Additionally, what is the resonance of the two smokestacks caused by the exhaust output flow? On page 4-81 in the DEIS, FERC acknowledges “there is no available data on high velocity, high temperature exhaust impacts”. The DEIS must perform the impact analysis on high velocity, high temperature exhaust if it is to be regarded as a true environmental impact statement.
- **Chemical Emissions:** In FERC’s DEIS, the determination that emissions from Compressor Station 206 would be less than the NAAQS was a reason given for not performing an analysis of the potential impact of highly toxic airborne chemical emissions from CS206. NAAQS do not review formaldehyde, ammonia, acrolein, acetaldehyde, ethylbenzene, benzene, toluene, propylene oxide or xylene. These chemicals, reported by Williams/Transco as ones expected to be emitted from CS206, are highly toxic as airborne and in minute parts per million concentrations (some toxic in parts per billion), as identified by NIH, NOAA and EPA references.
<https://drive.google.com/file/d/1TVdbhjFv4kTD4xgsaH1SBJgLrheLjR15/view?usp=sharing>.
- **Health Impact Assessment:** The DEIS deems the HIA is not warranted despite the fact that the DEIS does not review or assess any real environmental or health impacts associated with CS206 emissions types discussed above. Without assessing environmental impacts resulting from emissions, FERC is not able to provide a valid environmental impact statement.
 - Without assessing environmental impacts resulting from emissions, FERC is not able to provide a valid environmental impact statement.
 - A Health Impact Assessment is warranted because, as FERC noted, HAP emissions can cause serious health problems and environmental impacts (DEIS, page 4-292).
 - We live in a nonattainment area for ozone, and emissions of NOx and VOCs, precursors to ozone, would not aid attempts to reduce ozone which is highly correlated with significant health issues.
 - The NJDEP recently adjusted reporting thresholds for Air Toxics (February 2018) and, using these more restrictive levels which are currently considered to be protective of human health, the “HAP emissions from each of the two Mars 100 turbines exceed reporting thresholds for formaldehyde, acetaldehyde, acrolein, benzene, ethylbenzene, naphthalene, and propylene oxide.” [Accession No. 20180514-6168(32885359)]
 - Particulate Matter is clearly linked to significant health impacts, and studies have found that repeated exposure to levels below the “protective” NAAQS is significantly correlated with health issues including early death and kidney disease.
 - In the Application from Williams/Transco for NESE, they report an expectation, based on modeling, that PM_{2.5} emissions for Compressor Station 206 and background air would approach the minimally “acceptable” thresholds:
Annual: 10.1 microgram/m³ (EPA-NAAQS threshold: 12 microgram/m³)
24-hour 32.1 microgram/m³ (EPA-NAAQS threshold: 35 microgram/m³)

- 5. FERC did not assess the environmental benefit when it dismissed a request to explore enhanced energy regeneration/efficiencies that could reduce heat emissions from Compressor Station 206.**
 - In the DEIS, FERC mentioned requests for a waste heat recovery system for CS206 on page 4-292, but the potential environmental benefits were dismissed for reasons that did not include supportive documentation.
 - Part of the purpose of the request was to reduce environmental damage from exhaust heat output, which the DEIS acknowledges exists, but FERC did not perform an environmental impact analysis and, therefore, FERC is unable to provide a valid finding. With the environmental benefits plus energy cogeneration, which could drive an electric turbine, CS206 could become the first hybrid compressor station maximizing efficiencies and reducing carbon footprint.

- 6. There was no modeling of the impact of year-after-year blasting at Trap Rock Quarry on the proposed Compressor Station 206 along with all associated buildings and pipelines at the site.**
 - There was no analysis or consideration given to cumulative or compounded impacts of blasting over time.
 - Trap Rock Quarry anticipates continuing its mining operations on the property until the year 2040 where the face of the quarry is 2,100-feet from the compressor station building. (DEIS, page ES-4)
 - FERC's request for the final foundation design of the compressor station to be submitted prior to construction (DEIS, page 4-316) does not address these concerns.

- 7. In the DEIS, FERC failed to provide a realistic analysis of specific ecological impacts associated with loss of forest and wetland habitat.**
 - FERC dismissed concerns about the loss of forested land by noting that, in the bigger picture in the areas, there was plenty more forested land. FERC acknowledges that it would take at least 50 years for these trees to re-establish themselves, but there is no plan to have Williams/Transco maintain responsibility for this until the trees are fully re-established. (DEIS, page ES-14)
 - The benefit of forests absorbing stormwater and pollutants was not considered by FERC in their DEIS.
 - Removal of 17.7 acres of forest to build the proposed Compressor Station 206 and its access road (DEIS, page 4-80) is not insignificant.
 - There were no presented plans or reviews of wetland impacts from constructing a septic system at CS206.

- 8. There was no complete analysis of the short- and long-term potential impacts of noise from construction activity on marinelife in and around the Raritan & Lower New York Bays.**
 - There was no assessment of acoustic impacts from construction of the Raritan Bay Loop to North Atlantic right whales.
 - There was no reporting or analysis of construction methods that could refine pile driving methods to reduce acoustic impact.
 - There was no reporting of acoustic analyses for the added piles that would be installed and removed as part of the new platform at the Morgan Shore Approach.

- 9. There was no analysis of the impact of marine vessel traffic (insertion/removal of piles, transporting, loading/unloading, staging and mooring) on the environment, local economies and marinelife in and around the Raritan & Lower New York Bays.**
 - FERC likens concentrated marine vessel activities and movement patterns along the 15,585.7 acres of work space to normal bay marine vessel activities instead of reviewing activities, patterns and moorings associated with each pipeline segment and the impact on toxic sediment disruption, benthic organisms and acoustical impacts.
 - There was no detailing of potential impacts from marine vessel traffic and activities disrupting the seafloor from transporting, loading/unloading, staging and construction or a plan for avoiding or mitigating the impacts of these activities.
 - Since the schedule for construction is not finalized, the impact of restricted zones for local fishing or other boats is not yet known in terms of costs to those who rely on these for their living or recreational activities.

10. There was no assessment of potential long-term effects of toxic sediment disturbance on shorelines, beachgoers, marine life or the health of shoreline communities in terms of costs to health, safety and economics.

- The impacts to benthic and demersal marine species will certainly impact the economics of the local fishing industry, but FERC did not independently evaluate this prior to reaching conclusions about impacts.
- The DEIS did not include a realistic analysis of specific impacts that would occur following destruction of benthic communities that are essential food sources for marine life. FERC dismissed concerns about the loss of benthic species from burial by noting that, in the bigger picture in the areas, there were plenty more sources of this food for marine life in the New York Bight.
- There was not an adequate assessment of avoiding and mitigating impacts from construction on the horseshoe crabs which have a fragile existence, serve as a food source for threatened and endangered species, and are extremely important to biomedical research. FERC basically dismissed impacts to this important species. Additionally, FERC used outdated data about horseshoe crabs that was supplied by Williams/Transco without verifying its accuracy.
- FERC used a study from 1983 rather than a more current 2001 study to render conclusions about the hard clam population in the waters to be crossed by the Raritan Bay Loop. Additionally, there was no mention in the DEIS of the fact that the proposed route would go through areas of clam populations infected with the Quahog Parasitic Unknown (QPX) disease which is in sediment and waters that could spread from construction disturbances. There was no attention given to future clam harvesting or a possible transplantation program in the DEIS.
- There were no reported results of testing for contaminants and the impact of excavation for areas from which Williams/Transco might get backfill material for the Raritan Bay Loop, and the source areas have yet to be finalized.
- Without specifically knowing the potential impacts, and providing information about possible avoidance measures, any suggested mitigation measure is meaningless.

11. There was no comprehensive, scientific assessment of the short- and long-term impacts to benthic organism (horseshoe crabs, surf clams) and marine mammal (dolphins, seals and whales) habitat.

- The DEIS only addressed the actual 117.2 acres of pipe laying activities and did not assess environmental impact of the full work space of 15,585.7 acres with the associated marine vessel traffic, activities and moorings.
- During the construction, there would be a high concentration of marine vessel traffic, activities and moorings within the 15,585.7-acre workspace. It is impossible that this doesn't directly disturb benthic and marine mammal habitats as well as disturb the toxic sediment which can also adversely impact habitats and food sources of marine mammal, benthic, fish and migratory bird species.

12. There was no sediment core sampling of the entire designated workspace in Raritan Bay & Lower New York Bay.

- Williams/Transco's primary sediment core samples were only taken along the proposed pipeline path with additional sampling in the Raritan Bay Slag Superfund site waters. However, sediment core samples were not taken throughout the entire 15,585.7 acre workspace.
- Without this data, it is impossible to assess the full toxic sediment potential contamination and resuspension in the work area.
- The need to take more sediment core samples in the workspace areas was submitted in 2017 to FERC numerous times after the 3/27/2017 application was issued.
- Without this data, FERC is unable to accurately assess environmental impact of the focused traffic, activities and moorings within the 15,585.7-acre workspace area.

13. There was no complete analysis of the economic adverse impact that will result from disturbances in/by the Raritan & Lower New York Bays on the greater community and habitat.

- There was no quantitative analysis of the costs, risks and other adverse impacts from NESE on recreation, tourism and the multi-million dollar fishing industry from construction of the Raritan Bay Loop.
- Even though they questioned discrepancies in the numbers related to potential jobs, FERC seemed to have accepted Rutgers' exaggerated claims of benefits without providing their own independent examination and evaluation of the information. The finding of the Goodman Group [presented in Accession No. 20180514-6168(32885361)] revealed discrepancies between numbers of on-site construction jobs in the Rutgers report and Williams/Transco's Construction Workforce Data, revealing that the Rutgers authors overestimated the jobs by about 75%.

14. There was no analysis of predicted impacts from increased Greenhouse Gases and methane leaks and emissions as impacts from the NESE Project on the area.

- Methane, the main component of natural gas, is 86–100 times more potent a greenhouse gas than CO₂ in the first 20 years it is in the atmosphere. This means that if just 3% of natural gas leaks from extraction to delivery, natural gas is worse than coal for the climate.
- Increases in Greenhouse Gases from NESE were acknowledged as real by FERC, but the impact of this on increased severe weather events such as floods, and increased temperatures of air and water that would affect habitats, behaviors, and food sources for wildlife and marine life, etc. was not considered in a meaningful way that would allow consideration of the appropriateness of any suggested mitigation efforts.
- Extreme weather impacts, which can be reasonably anticipated, were not considered as part of the FERC environmental review / permitting process even though the air pollution, exhaust heat, disruptions to the bays, and potential fluid leaks from the proposed NESE Project will certainly increase damaging impacts on wetlands and flood-prone areas.
- Compressor stations leak excessively more methane than what is reported by pipeline companies.
- Even using conservative methane leakage rates, the buildout of natural gas pipelines would prevent New York from meeting its state greenhouse gas emission reductions goals.
- The DEIS refers to outdated New York City emission goals, which are now significantly more ambitious, including a goal to reduce emissions to 80 percent below 2005 levels by 2050
- Methane leaks have been detected on Staten Island at the rate of one per mile, and National Grid & ConEd are monitoring reported leaks. Though leaks within five-feet of buildings must be repaired promptly, thousands of other leaks continue to emit methane into the air until they are repaired.

15. There was not an adequate public outreach by Williams/Transco or FERC for a project that could significantly impact human health and result in environmental contamination and harm for many decades if it is constructed, and the requirement for a *full and fair discussion of significant environmental impacts* did not include people who work, live or otherwise are in the range of those potential impacts.

- There was no notification or efforts to engage residents of Montgomery or Princeton in pre-filing scoping sessions.
- The turnout of 275 people in Franklin Township and 50 people in Old Bridge for these meetings, where local populations exceed 100,000 for each area, was not enough for FERC to have shared facts and specifications of the Project or gauge the significance of concerns of residents who should have been well informed.
- Additionally, submissions to FERC since 3/27/2017 have identified multiple occasions where Williams/Transco provides misinformation and false information.

Chairman Kevin J. McIntyre responded to Senator Cory Booker on April 25, 2018 regarding Senator Booker's submission on February 26, 2018. Chairman McIntyre acknowledged numerous requests for a Health Impact Assessment of proposed CS206 and stated that the March 23, 2018 DEIS independently evaluates the environmental impacts of the Northeast Supply Enhancement Project, including impacts from CS206. The above Failure Points identified in the DEIS contradict Chairman Kevin J. McIntyre's statement and illustrate a disconnect between what Chairman McIntyre states regarding independent environmental impact analysis and the lack of environmental impact analysis performed in the DEIS report. This does not represent public integrity or oversight for public wellbeing.