

**IN THE UNITED STATES DISTRICT COURT
FOR THE NORTHERN DISTRICT OF MISSISSIPPI
GREENVILLE DIVISION**

BRENDA J. COOPER, et al.

PLAINTIFFS

V.

NO. 4:16-CV-52-DMB-JMV

MERITOR, INC., et al.

DEFENDANTS

ORDER

In these consolidated cases, residents and former residents of the Eastern Heights neighborhood in Grenada, Mississippi, claim that the illegal disposal of chemicals at a nearby industrial facility contaminated their homes and property, and that the various operators of the facility concealed such disposal. Before the Court are numerous motions concerning certain opinions of three groundwater experts and a vapor intrusion expert designated by the plaintiffs. Because some of the challenged opinions offered by these experts do not meet the requirements for admission imposed by Federal Rule of Evidence 702 or *Daubert v. Merrell Dow Pharmaceuticals, Inc.*, such opinions will be excluded.

I

Relevant Background

These cases concern the Eastern Heights neighborhood (“Subdivision”) in Grenada, Mississippi; a neighboring industrial facility (“Facility”); and various bordering properties.

The Facility property includes three areas of interest: (1) a former equalization lagoon on its northern border; (2) a known area of contaminant release referred to as AOC-A; and (3) another known area of contaminant release referred to as AOC-B, which is just to the west of AOC-A.

The footprint of the Eastern Heights neighborhood may be described as a rough inverted cone shape, with the angled “bottom” pointing northwest and the round “top” pointing southeast.

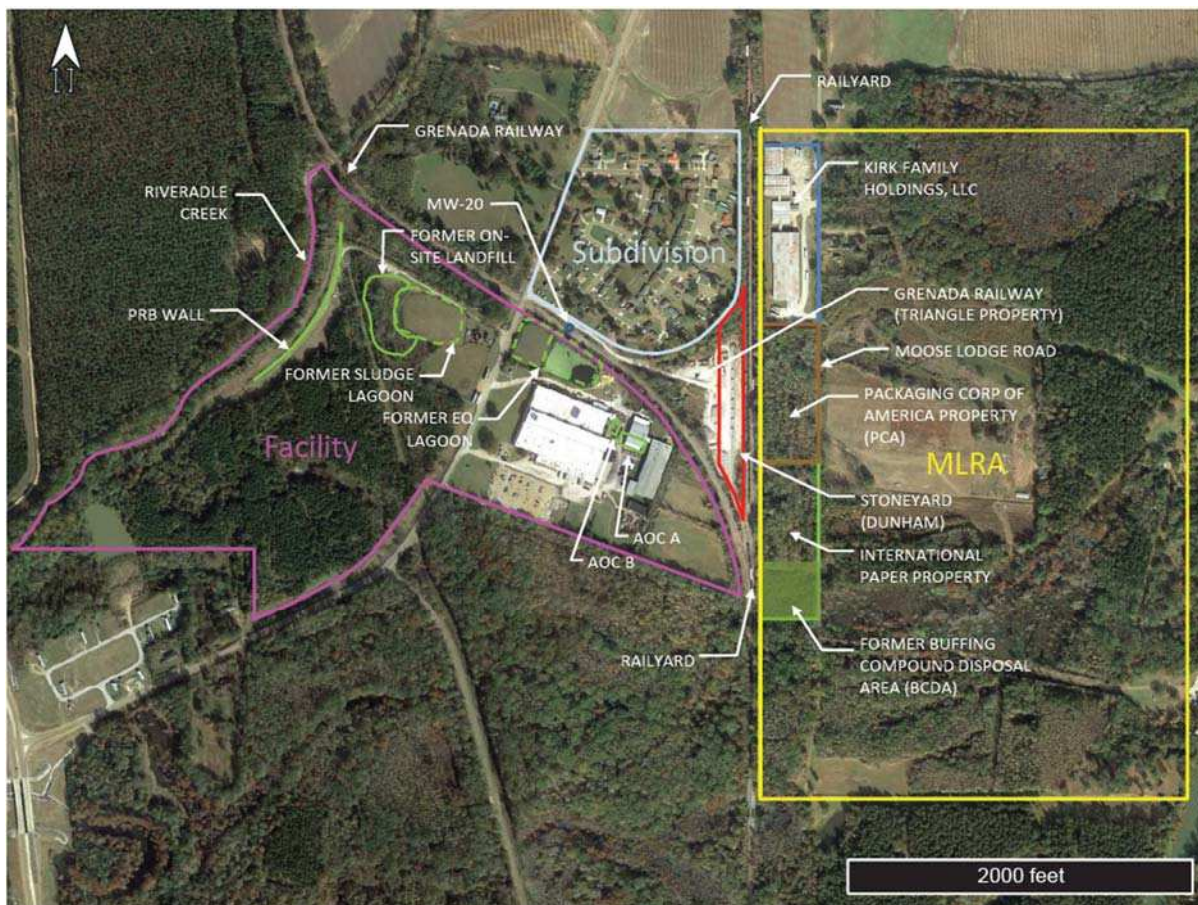
The round part of the cone is bordered to the southwest by the Facility, to the south by a triangular-shaped railyard property (“Railyard”) owned by the Grenada Railway, to the southeast by a stoneyard (“Stoneyard”) now owned by Dunham, Inc., and to the east by a railroad which runs south past the Subdivision and the Facility.

To the east of the railroad is a large rectangular tract of land which the parties refer to as the Moose Lodge Road Area (“MLRA”). Four rectangular parcels of interest sit on the MLRA’s western border, and run from north to south in the following order: (1) property owned by Kirk Family Holdings, LLC (“Kirk Property”); (2) property owned by Packaging Corp of America (“PCA Property”); (3) property owned by International Paper (“IP Property”); and (4) an area on the IP Property known as the former Buffing Compound Disposal Area (“BCDA”), where Facility employees disposed of chemicals in the late 1960s. These four areas are bordered to the east by Moose Lodge Road, which runs north to south through the MLRA and then turns east at the southern edge of the BCDA. A Permeable Reactive Barrier Wall (“PRB”), which was constructed in approximately 2004 to filter out chemicals from the groundwater, sits to the west between the Facility and Riverdale Creek.

The locations described above are roughly demonstrated in Figure 1¹ below.

¹ Doc #569-5. The plaintiffs take issue with the size of the BCDA reflected in Figure 1, which was generated by the defendants. The Court’s use of the map does not reflect a finding of the precise location and sizes of the relevant properties. The map is cited only as a demonstrative aid to show the general locations of the areas described.

Figure 1



The Kirk Property has housed various structures of unknown purpose and has been used, at least in part, for storage of drums of unknown substances. The drums were stored in the southwest portion of the property. The PCA Property was used primarily as agricultural land but has since been abandoned. The Railyard has “historically been used for railcar storage.”

The various properties sit atop a layer of surficial soil, which is primarily made up of silt and clay. The surficial soil overlays an upper aquifer, which is comprised primarily of fine to coarse sand. The upper aquifer is divided in places into shallow and deep zones by a layer of intermediate clay, and overlays a layer of shaley clay, which itself overlays a lower regional aquifer comprised of sand with trace clay partings. The regional aquifer is the source of water for the area, including the Subdivision.

II Relevant Procedural History

On March 16, 2016, Brenda Cooper, Sylvia Caffey, Margaret Odems, Bernice Richardson, Dora Ward, Rosie Brady, Pearl Seldon, Betty Phillips, Alice Crumley, and Sylvia Cunningham filed a complaint in the United States District Court for the Northern District of Mississippi against Rockwell International Corporation and the Randall Division of Textron, Inc. Doc. #1. On June 30, 2016, United States Magistrate Judge Jane M. Virden consolidated the case with four member cases² for purposes of discovery and motion practice. Doc. #41. The day after consolidation, the plaintiffs filed an amended complaint against Meritor, Inc., Rockwell Automation Inc., The Boeing Company, and Textron, Inc. Doc. #43.

In the amended complaint, the plaintiffs, residents or former residents of the Subdivision, seek damages for injuries to their homes and property caused by the operation of the Facility. The plaintiffs allege that the Facility was operated by (1) Rockwell International Corporation, the predecessor to Rockwell Automation, Inc., which itself is a predecessor to The Boeing Company, from 1965 until 1985; and (2) Randall Wheel Trim, a subsidiary of Textron, Inc., from 1985 until the present. Doc. #43 at 1–6, 9. The plaintiffs further allege that the Facility, which was used to manufacture chrome-plated wheel covers, utilized numerous chemicals, including hexavalent chromium and trichloroethylene (“TCE”), and that these chemicals were illegally placed into the environment, including the air and groundwater, with the defendants concealing such disposal.

On August 19, 2016, Judge Virden issued a case management order which set an April 28, 2017, expert disclosure deadline for the plaintiffs. Doc. #83. At some point before the deadline,³

² *Sledge, et al. v Meritor, Inc., et al.*, No. 4:16-cv-53; *Cooke, et al. v. Meritor, Inc., et al.*, No. 4:16-cv-54; *SRA Investments, LLC, et al. v. Meritor, Inc., et al.*, No. 4:16-cv-55; *Willis, et al. v. Meritor, Inc., et al.*, No. 4:16-cv-56.

³ The precise date of disclosure is not apparent from the record.

the plaintiffs disclosed C. Scott Simonton, James Brinkman, and David Jenkins as three of their experts (“Groundwater Experts”). The plaintiffs also disclosed a joint report (“Groundwater Report”) prepared by the Groundwater Experts titled, “Trespass of Environmental Contamination into the Eastern Heights Subdivision Resulting from Past Activities Associated with the Grenada Wheel Cover Manufacturing Facility at 635 Highway 332 in Grenada Mississippi.” Doc. #569-1.

The Groundwater Report sets forth eighteen distinct opinions:

Opinion 1: The Grenada Wheel Cover Manufacturing Facility (the Facility), former Rockwell International / Randall Textron Facility, and the Facility waste disposal area along Moose Lodge Road (disposal area) in Grenada, Mississippi, are known and continuing source of environmental contaminants. The Facility and disposal area have contaminated ambient air, groundwater, surface water, subsurface soils and soil vapors, and contamination has migrated through air, groundwater and soil vapor onto the property and into the homes in the Eastern Heights Subdivision (the Subdivision).

Opinion 2. Based on the chronology of the facility ownership, the responsible parties at a minimum include Rockwell International (also incorporated as Arvin-Meritor and Meritor) and Textron Automotive Company (formerly Randall Textron).

Opinion 3: Contaminated air, subsurface vapor and/or groundwater exist on all properties within the Subdivision. The plume of contaminated groundwater is much larger than shown in the reports that have been produced by consultants for the facility. The full extent of contamination from the facility and disposal site has not been characterized even though environmental investigations have been ongoing for almost 30 years.

Opinion 4. Contamination in groundwater has trespassed into the subdivision. Evidence for this trespass was available in 1993. Sampling since 2012 has shown groundwater and soil vapor beneath the Subdivision already is contaminated with chlorinated and non-chlorinated Volatile Organic Compounds (VOCs) including but not limited to trichloroethene and toluene. VOCs volatilize (convert from a liquid to a gas) from contaminated groundwater causing contamination in soil vapors above the contaminated groundwater. These contaminated vapors eventually migrate upward through the soil and sometimes through homes or industrial buildings above the plume to the atmosphere.

Opinion 5: Airborne pollutant pathways from sources in adjacent areas near the subdivision will not be remediated by the activities described in this plan. The proposed remedies for the subdivision are designed to eliminate contaminants in

subsurface air and in groundwater beneath the subdivision only. Because sources of contamination on the facility and disposal area will not be remediated by activities described in this plan, contamination of ambient air within the subdivision will continue after groundwater and soil vapor contamination has been remediated.

Opinion 6: The Grenada facility and activities related to this facility are the sources of groundwater contamination beneath the facility, the disposal site and the subdivision. The contamination beneath the subdivision originated as uncontrolled migration of contaminated groundwater from adjacent properties. No other commercial or industrial activity capable of generating the contamination exists within or by the subdivision.

Opinion 7: The aquifer beneath the subdivision is threatened by future uncontrolled migration of contaminated groundwater from both the disposal site and the Facility:
1. Contaminated groundwater is presently migrating from the disposal site and will continue to migrate unless remedial measures are implemented.
2. Effective remedial measures implemented within the subdivision could induce groundwater contamination from the facility to flow northward into the subdivision unless preventive measures are implemented to isolate the subdivision from contamination on the adjacent properties.

Opinion 8: Protecting and remediating the aquifer beneath the subdivision with only a pump and treat remedy would accelerate the arrival of more highly contaminated groundwater into the subdivision from the adjacent properties and would increase the cost and time to complete the remediation of contaminated groundwater beneath the subdivision due to continuous importation of additional contamination.

Opinion 9: To restore groundwater quality while preventing the migration of more contaminated groundwater from the adjacent source areas into the subdivision, a pump and treat system combined with a slurry wall is the optimal solution. The slurry wall will be installed along the eastern and southern sides of the subdivision. The slurry wall will divert natural groundwater flow paths southward around the subdivision while avoiding any potential contaminant migration northward into areas which are not believed to be contaminated. The pump and treat system and Monitored Natural Attenuation (MNA) are the remedies which will be operated behind the slurry wall and within the subdivision to remove contaminated groundwater. These remedies will continue until the groundwater in the subdivision is restored to concentrations below the EPA and MDEQ Maximum Contaminant Levels (MCLs) for each of the contaminants.

Opinion 10: The groundwater cleanup will be accomplished in a reasonable timeframe as described by RCRA guidelines for RCRA Corrective Actions (EPA, 2004, Handbook of Groundwater Protection and Cleanup Policies for RCRA Corrective Action, EPA530-R-04-030 April 2004). The time for remediation of groundwater beneath the subdivision is estimated to be 30 years, assuming no free-product/dense non-aqueous phase liquids are found within the shallow aquifer

beneath the subdivision. Two pore volumes of groundwater can be removed by pumping from the aquifer beneath the subdivision in 30 years. Pumping behind the slurry wall will cause clean water to flow into the subdivision from uncontaminated areas north of the subdivision. Removal of two pore volumes of contaminated water and replacement with clean groundwater will lower contaminant concentrations sufficiently that pumping can be diminished while MCLs are achieved by MNA. The slurry wall is essential to isolate the subdivision's groundwater from contaminated groundwater from the Facility and the disposal site during the pumping process and insure that only clean water is brought into the subdivision.

Opinion 11: The 30-year remedial measure timeframe will be preceded by a two-year period for project design and installation of the slurry wall, treatment plant and appurtenances, pumping wells and monitoring wells.

Opinion 12: The 30-year remedial measure timeframe will be followed by an indefinite period during which the pumping system and groundwater treatment facility will be maintained in a standby condition. The groundwater monitoring network around the subdivision will be maintained and will be sampled periodically during this time until groundwater remediation on the contaminated adjacent properties is no longer a threat to the groundwater quality beneath the subdivision.

Opinion 13: This plan and cost estimate uses a five-year post-remediation monitoring period. Because the duration of the post-remediation monitoring period depends entirely on the removal of the threat created by contamination on the adjacent properties, specifically, the successful remediation of continuing contaminant source and groundwater at the facility and the disposal site, the duration of the post-remediation monitoring period may be much longer than five years.

Opinion 14: The treatment plant and appurtenances will be decommissioned and removed, and pumping wells and monitoring wells will be removed after protection from the offsite groundwater contamination is no longer required.

Opinion 15: The cost of restoration for the properties to pre-impacted conditions is greater than \$1.7 million per property. This cost is based on an aggregate approach, that is, restoring and protecting the subdivision as a whole. The cost to restore and protect each property individually would be much greater.

Opinion 16: The restoration of the subsurface groundwater and soil vapor will not prevent the continuing pollution of ambient air within the subdivision from sources on the facility and the disposal site.

Opinion 17. Recent testing and airborne pollution modeling (SWAPE, 2017) indicate that the subdivision has historically been exposed to volatile organic contaminants in ambient air and that this exposure continues. As stated in the opinions above, contamination sources for this pathway will remain in place and

airborne contamination will continue to impact the subdivision and other areas surrounding the facility and disposal site until these source areas are remediated.

Opinion 18: Dense Non-Aqueous Phase Liquid (DNAPL) has been observed on the Grenada Facility near the SWMU 4, the former sludge lagoon, in monitoring well MW-2 and by AOC A, the leak from the former above-ground TCE storage tank, (Grenada 2012 Annual Report p.1-7). TCE is heavier than water and can penetrate clay layers, which threatens the water quality in the regional aquifer. The regional aquifer is the water supply for Grenada County. The data presented in Attachment 2 show that in 2015, TCE concentrations were increasing in most Facility monitoring wells, which had enough samples for evaluation. The threat to the regional aquifer will remain despite the efforts described in this report to protect the subdivision.

Id. at 2–5.

The plaintiffs also disclosed James Fineis as a vapor intrusion expert, and produced his expert report titled, “Evaluation of Vapor Intrusion Conditions Eastern Heights Neighborhood Grenada, Mississippi 38901” (“Fineis Report”). Doc. #626-1. The Fineis Report sets forth the following conclusions:

Based on the evaluation of 119 samples (50 soil gas, 15 background air, 22 indoor air and 32 sub-slab) collected during the initial phase of the investigation of Eastern Heights neighborhood, the vapor intrusion pathway from groundwater or soil gas is complete for all 19 homes tested. The vapor intrusion pathway with regards to soil gas contamination is complete for all 50 properties tested. Additionally, significant levels of chemicals associated with the operations at the Grenada Manufacturing Facility have been detected in the background air samples collected within the neighborhood which puts all residents within Eastern Heights neighborhood at risk.

Id. at 12.⁴

After the reports were disclosed, Meritor, Boeing, and Rockwell (“Meritor Defendants”) filed motions to exclude certain opinions and testimony of Brinkman, Doc. #569; Simonton, Doc. #571; and Jenkins, Doc. #578. Textron independently filed a motion to exclude certain opinions

⁴ On October 24, 2017, Fineis completed a “Supplemental Report to the April 2017 Report.” Doc. #440-4. On November 29, 2017, Meritor, Boeing, and Rockwell filed a motion to strike the supplemental report as an untimely new opinion. Doc. #439. Judge Virden granted the motion on December 28, 2017. Doc. #464.

of the Groundwater Experts, Doc. #585; and a motion to exclude certain opinions of Fineis, Doc. #583. The Meritor Defendants joined Textron's two motions. Doc. #593; Doc. #594.

In response to the defendants' motions, the Groundwater Experts and Fineis executed separate affidavits which the plaintiffs have relied on in numerous briefs, including their responses to the defendants' motions to exclude certain experts. On May 29, 2018, the defendants filed a motion to strike the affidavits prepared by the four experts. Doc. #700. All motions have been fully briefed.

III **Motion to Strike**

The Meritor Defendants ask the Court to strike portions of the four challenged affidavits as untimely new expert opinions. Doc. #700. The plaintiffs argue that "the affidavits [are] not new opinions" but are "rejoinders to counter the Defendants' gross mischaracterizations of their Rule 26 report and prior testimony." Doc. #741 at 4.

Federal Rule of Civil Procedure 26 governs discovery in federal court. Regarding experts, Rule 26(a)(2)(A) requires that "a party must disclose ... the identity of any witness it may use at trial to present evidence under Federal Rule of Evidence 702, 703, or 705." "[I]f the witness is one retained or specially employed to provide expert testimony in the case or one whose duties as the party's employee regularly involve giving expert testimony," Rule 26(a)(2)(B) mandates that the disclosure be accompanied by an expert report. Pursuant to Rule 26(a)(2)(B):

The report must contain:

- (i) a complete statement of all opinions the witness will express and the basis and reasons for them;
- (ii) the facts or data considered by the witness in forming them;
- (iii) any exhibits that will be used to summarize or support them;
- (iv) the witness's qualifications, including a list of all publications authored in the previous 10 years;

- (v) a list of all other cases in which, during the previous 4 years, the witness testified as an expert at trial or by deposition; and
- (vi) a statement of the compensation to be paid for the study and testimony in the case.

Rule 26(e) further requires a party who has made a disclosure under Rule 26(a) to supplement an expert report “in a timely manner if the party learns that in some material respect the [report] is incomplete or incorrect.” To ensure compliance with these dictates, Federal Rule 37(c)(1) provides that “[i]f a party fails to provide information ... as required by Rule 26(a) or (e), the party is not allowed to use that information or witness to supply evidence on a motion, at a hearing, or at a trial, unless the failure was substantially justified or is harmless.”

Consistent with the above, it is appropriate to strike or exclude from consideration expert affidavits which are filed after the expert disclosure deadline and which amount to new opinions. *See, e.g., Brumley v. Pfizer, Inc.*, 200 F.R.D. 596, 604 (S.D. Tex. 2001) (“Polukoff’s ... affidavit is untimely under Rule 26 to the extent that it goes beyond the opinions in his report The Court strikes ... any ... opinion that was not contained in the initial Rule 26 report.”); *Talbert v. City of Chicago*, 236 F.R.D. 415, 424 (N.D. Ill. 2006) (“It is no surprise that supplemental expert opinions that threaten to belatedly send the case on a wholly different tack are excluded.”) (collecting cases). However, “[t]o the extent that an expert affidavit is within the scope of the initial expert report, it is properly submitted in conjunction with dispositive motions even outside the time frame for expert discovery.” *Advanced Analytics, Inc. v. Citigroup Glob. Mkts., Inc.*, 301 F.R.D. 31, 36 (S.D.N.Y. 2014) (collecting cases).

As a general rule, “[t]he moving party bears the burden of showing that its adversary failed ... to [timely] disclose information required by Rule 26.” *In re Sept. 11th Liab. Ins. Coverage Cases*, 243 F.R.D. 114, 125 (S.D.N.Y. 2007). Accordingly, the Court must decide whether the Meritor Defendants have shown that the challenged affidavits represent impermissible new

opinions, or appropriate supplemental opinions.⁵ In this regard, “[t]he line between supplemental opinions and new opinions is not always clear, and the decision regarding how to make the distinction likely depend[s] on the facts of the case.” *In re Enron Corp. Secs., Derivative & Erisa Litig.*, MDL No. 1446, 2007 WL 5023541, at *8 (S.D. Tex. Feb. 1, 2007). Generally, “[c]ourts distinguish ‘true supplementation’ (e.g., correcting inadvertent errors or omissions) from gamesmanship and have repeatedly rejected attempts by parties to bolster their position at summary judgment by ‘supplementing’ an expert report with a ‘new and improved’ expert report.” *Petersen v. Midgett*, 140 F.Supp.3d 490, 502 (E.D.N.C. 2015) (collecting cases). “To rule otherwise would create a system where preliminary reports could be followed by supplementary reports and there would be no finality to expert reports, as each side, in order to buttress its case or position, could ‘supplement’ existing reports and modify opinions previously given.” *Beller ex rel. Beller v. United States*, 221 F.R.D. 696, 701 (D.N.M. 2003).

Of relevance here, while Rule 26 requires the disclosure of an expert report which includes, among other things, a “complete statement of all opinions the witness will express and the basis and reasons for them,” the rule does not prohibit experts from filing joint reports. *Dale K. Barker Co., P.C. v. Valley Pizza*, 541 F. App’x 810, 815–16 (10th Cir. 2013). However, it “does require that the report contain the ‘basis and reasons’ for each expert’s opinions.” *Adams v. United States*, No. 4:cv-03-49, 2011 WL 2144574, at *1 (D. Idaho May 29, 2011). Thus, “[w]hen [multiple] experts work as a team and divide up the work, the report must reveal this division of labor.” *Id.* In contrast, when experts “reviewed the same materials and, working together, came to the same opinions” a single joint report may be appropriate. *Valley Pizza*, 541 F. App’x at 816. In this

⁵ Because the plaintiffs, with two exceptions addressed below, have not argued that submission of the new affidavits after the expert deadline was substantially justified or harmless, to the extent the affidavits represent new opinions, they must be stricken.

sense, a joint report is properly considered as a report produced by each of its authors, with the scope of the report limited to the work actually performed by each expert. Thus, when an expert participates in the production of a joint report, his role in the production of the report dictates the scope of his initial disclosure.

A. Simonton Affidavit

The Meritor Defendants argue that Simonton’s affidavit includes eight opinions which are outside the scope of the initial report: (1) opinions regarding property-by-property analysis of contamination or exposure levels; (2) an opinion that “[c]hromium, arsenic and lead are present at super-regulatory levels in the groundwater throughout the entire neighborhood;” (3) opinions in the form of “contamination plume contour maps,” which purport to show contamination in the groundwater of individual properties; (4) opinions regarding individual detection levels for chromium, arsenic, lead and TCE as compared to maximum concentration levels for drinking water; (5) an opinion that “toxins are currently present in Eastern Heights at and on the above-enumerated properties at levels that exceed applicable regulatory and/or human health standards;” (6) an opinion that “[t]he concentrations at which the contaminants are found in the Subdivision decrease gradually and consistently as the distance from the Facility increases, supporting the conclusion that the Facility is the source of these contaminants;” (7) an opinion linking contamination in the groundwater to contamination in the soil; (8) an opinion that because arsenic was not detected in certain monitoring wells, it can be inferred that arsenic, chromium, and lead are not naturally occurring metals in the native soil.

1. Property-by-property analysis

Simonton’s affidavit includes a table purporting to represent the minimum “concentrations of chromium, arsenic, lead and TCE present under the properties at issue” Doc. #618-44. The

affidavit represents that data in the table was “[b]ased on Arcadis’ vertical profile sampling, which was conducted [at the direction of the defendants] to determine nature and extent of contamination.” *Id.* at 5. There is no dispute that the wells tested by Arcadis, a contractor hired by the defendants, were not located on the plaintiffs’ specific properties. Rather, it appears Simonton made his property-specific calculations by taking the data from the Arcadis wells and extrapolating the specific contaminant levels to the plaintiffs’ properties based on his creation of certain plume maps attached to his affidavit.

In opposing the motion to strike, the plaintiffs contend that “[t]he data for the charts included within Simonton’s affidavit come from boring locations in Eastern Heights chosen by Arcadis ... to create a vertical aquifer profile of the neighborhood and were included in Figures 6 and 7 of Simonton’s expert report.” Doc. #741 at 5. They also argue, without citation or detail, that “[t]he data and methods used by Simonton to reach this opinion were clearly and succinctly laid out within the original expert report.”

The Court has reviewed the Groundwater Report and has found no opinion on the specific levels of chromium, arsenic, lead and TCE present under the properties at issue. Rather, the report refers to the presence of such chemicals in the Subdivision as a whole. *See* Doc. #569-1 at 5. This focus is consistent with Simonton’s deposition, in which he testified that he looked at TCE concentrations “as a community,” and not at concentrations on any one property. Doc. #700-1 at 115.

While it is true the Groundwater Report included the Arcadis data on which Simonton’s new opinion is based, the plaintiffs have cited no authority that an expert may introduce a completely new opinion based on data included in an initial report. To the contrary, the law is clear that “courts will not admit supplemental expert evidence following the close of discovery

when it expounds a wholly new and complex approach designed to fill a significant and logical gap in the first report, as doing so would eviscerate the purpose of the expert disclosure rules.” *Advanced Analytics*, 301 F.R.D. at 36 (alterations omitted; collecting cases).

As explained more fully below, Simonton’s affidavit applies a wholly new and complex approach—utilizing contour lines to extrapolate contaminant concentrations—to calculate the contaminant concentrations on the relevant properties. This new approach, which produced a new set of data for new locations, constitutes a new opinion which is properly excluded under Rule 37. *Id.*

2. “Super-regulatory levels” of chromium, arsenic, and lead

The Meritor Defendants argue that Simonton’s statement regarding the presence of chromium, arsenic, and lead at “super-regulatory levels” is improper because “[i]n the Groundwater Report, Simonton does not offer an opinion about detection levels of chromium, arsenic, and lead.” Doc. #701 at 7. As support for this position, the Meritor Defendants cite the following portion from Simonton’s deposition:

Q: At any point in time did you play any role in determining whether or not there was hexavalent chromium in the neighborhood?

A: We’ve certainly recognized the threat of metals. Certainly, there’s chrome detections in the water. It seems like there’s hex chrome and arsenic and lead, for example I’m pretty confident that at least some of the analytical data shows that. I don’t recall who found it, where it was found, all that.

Q: Do you recall seeing any data suggesting that there was hex chrome in the groundwater beneath the Subdivision?

A: I think that was the same question you just asked, but yes, I think -- again, I know there’s detections of chrome. I think there’s detections of hex chrome, but I’m not sure.

Id. (quoting Doc. #700-1 at 210–11).

The plaintiffs respond that the Groundwater Report contains an explicit reference to the presence of the specific contaminants when it states:

The contamination resulted from activities from the facility. These activities include onsite and offsite chemical dumping, onsite leaks, discharges to groundwater and air emissions. The contaminants have trespassed and continue to trespass in the subdivision groundwater, soil, soil has and air. The contaminants in the subdivision environment include but are not limited to trichloroethene (TCE), 1,2-dicholorethene (DCE), vinyl chloride, tetrachloroethene, toluene, xylenes, benzene, methylene chloride, acetone, 2-butonone, bis (2-ethylhexyl) phthalate, chromium, hexavalent chromium, and lead. (2015 Moose Lodge Road Area Additional Investigation Report Tables 4-1 an 4-2). Many of these contaminants, including TCE, DCE, methylene chloride, arsenic, lead, chromium, and hexavalent chromium are in the subdivision at concentrations that exceed USEPA Risk-Based Screening Levels.

Doc. #741 at 6 (quoting Doc. #628-11 at 5). Additionally, though not argued by the plaintiffs, the Groundwater Report includes a goal of restoring “concentrations below the EPA and MDEQ Maximum Contaminant Levels (MCLs) for each of the contaminants.” Doc. #629-1 at 7.

Although less than clear, it appears the Meritor Defendants argue that, notwithstanding the Groundwater Report’s references to the levels of the identified contaminants, Simonton may not opine on the issue because he was not involved in the report’s analysis of the contaminants. Put differently, they seem to argue that the presence of the contaminants was not a part of Simonton’s initial report and that, therefore, he may not offer a supplemental opinion on this issue.

As quoted by the plaintiffs, the Groundwater Report includes an express statement that the levels of arsenic, chromium, and lead exceed relevant regulatory levels. Thus, to the extent this statement is properly attributed to Simonton, his similar statement in his affidavit is properly considered within the scope of his initial report. In this regard, while it appears the report’s authors were responsible for various aspects of the remediation plan included in the report, the Meritor Defendants have offered no evidence that Simonton was not involved in the analysis of contaminants in the Subdivision. To the contrary, Simonton testified that, while he could not recall

the source of the information, he believed the data he relied on showed the presence of the relevant contaminants. Under these circumstances, the Court concludes that the statement in the initial report regarding the presence of various contaminants is properly considered a part of Simonton's initial expert disclosure and that, therefore, his supplemental affidavit on the same subject is not a new opinion.

3. Plume contour maps

The Meritor Defendants contend the plume contour maps attached to Simonton's affidavit represent a new opinion which must be stricken. The plaintiffs respond that the contour maps are "demonstratives ... to aid the Court's understanding of Dr. Simonton's original opinions—Eastern Heights is contaminated." Doc. #741 at 7. The Meritor Defendants reply that "Simonton's creation of the maps is the methodology by which he took existing data from wells located off of Plaintiffs' properties and extrapolated that data to derive claimed levels of contamination specific to each subject property." Doc. #745 at 3.

The Court has reviewed Simonton's affidavit, as well as the Groundwater Report, and concludes that the Meritor Defendants' characterization of the plume maps is the most accurate. While portions of the maps, such as the location of the wells, may be demonstrative, there is no indication that the contour lines connecting the wells represent anything other than a new opinion regarding the specific chemicals at the Arcadis drilling sites. Accordingly, the maps are properly stricken.

4. Maximum concentration levels

The Meritor Defendants complain about the comparison in Simonton's affidavit of arsenic, chromium, TCE, and lead to the "USEPA's Maximum Contaminant Levels." Doc. #701 at 10. As explained above, the Groundwater Report states that various contaminants exceeded "USEPA

Risk-Based Screening Levels” and included a stated goal of restoring “concentrations below the EPA and MDEQ Maximum Contaminant Levels (MCLs) for each of the contaminants.” Doc. #629-1 at 7, 9. Insofar as this latter statement necessarily presupposes the opinion that the contaminants exceeded the relevant MCLs, the Court concludes that the challenged statement is within the scope of the Groundwater Report and is, therefore, not a new opinion.

5. Regulatory and human health levels

The Meritor Defendants argue:

The [Groundwater] Report makes no reference to either measured levels of contamination or any effect on human health. Simonton’s affidavit now leaps beyond his original opinion to argue that “toxins are currently present in Eastern Heights at and on the above-enumerated properties at levels that exceed applicable regulatory and/or human health standards.” This statement about regulatory and human health standards is a significant, new addition to his 18 existing opinions—and vastly expands the reach of Simonton’s opinions and one that Defendants should have had the opportunity to challenge.

Doc. #701 at 11 (record citation omitted). The plaintiffs respond that the initial report’s reference to “USEPA Risk – Based Screening Levels” encompasses “regulatory and/or human health standards.” Doc. #741 at 6. This Court agrees.

The EPA’s risk-based screening levels are “risk-based concentrations ... considered by the [EPA] to be protective for humans ... over a lifetime ...”⁶ Furthermore, MCLs are a part of “[t]he National Primary Drinking Water Regulations (NPDWR) [which] are legally enforceable primary standards ... that apply to public water systems.”⁷ Both metrics are indisputably related to health or human standards. Accordingly, the scope of the Groundwater Report clearly encompasses

⁶ See <https://www.epa.gov/risk/regional-screening-levels-frequent-questions#FQ1>; *Hawk Aircargo, Inc. v. Chao.*, 418 F.3d 453, 457 (5th Cir. 2005) (taking judicial notice of governmental website).

⁷ See <https://www.epa.gov/ground-water-and-drinking-water/national-primary-drinking-water-regulations>.

regulatory and/or health human standards, and the Meritor Defendants' argument to the contrary must be rejected.

6. Source of contamination

The Meritor Defendants seek to strike the opinion in Simonton's affidavit that "[t]he concentrations at which the contaminants are found in the neighborhood decreases gradually and consistently as the distance from the Facility increases, supporting the conclusion that the Facility is the source of these contaminants." Doc. #701 at 11. The Meritor Defendants contend this conclusion amounts to a new opinion "correlating distance and concentrations vis-à-vis the Facility" *Id.* at 12. The plaintiffs respond that this opinion is a clarification of Opinion 6 from the Groundwater Report which states that the contamination in the Subdivision is attributable to the Facility. Doc. #741 at 8-9.

While supplemental reports may clarify the way an expert formed an opinion, they may not use "different statistical methods" to support an earlier opinion. *Compare Equal Emp't Opportunity Comm'n v. Performance Food Grp., Inc.*, No. MJG-13-1712, 2018 WL 3608745, at *2 (D. Md. July 27, 2018) (report utilizing new statistical method was impermissible new opinion) *with Broyles v. Cantor Fitzgerald & Co.*, No. 3:10-857, 2017 WL 3301222, at *4 (M.D. La. July 24, 2017) ("It appears clear to me that this is not a new opinion and is simply his explanation, after review of documents which were dealt with in detail in the deposition and/or in the written discovery obtained from Dr. Youngblood, of how he reached his calculation."). In other words, an expert may explain how he reached a particular conclusion but may not "provide[] new sources and justifications for his opinion." *Avance v. Kerr-McGee Chem. LLC*, No. 5:04-cv-209, 2006 WL 3484246, at *3 (E.D. Tex. Nov. 30, 2006). In a similar vein, "[i]t is not mere supplementation when a party submits a manifestly incomplete report lacking analysis or a supporting rationale,

waits for the summary judgment deadline to pass, and then submits a fuller report that contains actual reasoning.” *United States v. Marder*, 318 F.R.D. 186, 190 (S.D. Fla. 2016).

Here, the Groundwater Report opines that the contamination was the result of migration of groundwater from the adjacent property. However, nothing in the report states or even suggests that this opinion was reached using the distance methodology set forth in Simonton’s affidavit. Indeed, Simonton’s discussion of distance in his affidavit is not framed as explanation for how he reached the opinion in his report. Rather, the methodology is presented as a part of his new property-by-property analysis. Accordingly, the Court concludes that the distance methodology represents a new method and, therefore, is properly stricken.

7. Contaminated soil

The Meritor Defendants also challenge Simonton’s conclusion that contaminant concentration in the groundwater at the levels estimated in his affidavit compels a conclusion that the soil at the individual properties is also contaminated. Because this Court has concluded that the property-by-property approach represents an impermissible new opinion, it follows that the related conclusions of soil contamination must also be excluded.

8. Naturally occurring contaminants

In his affidavit, Simonton opines that a review of groundwater data indicates that the contaminants addressed in the report (chromium, arsenic, lead and TCE) are not naturally occurring in local soil at the concentrations observed. The Meritor Defendants argue this is an impermissible new opinion. Doc. #701 at 12–13. The plaintiffs respond that this opinion was necessarily included in Simonton’s conclusion that the Facility caused the contamination and “[i]t was not necessary for Simonton to make a specific statement about the lack of naturally occurring

metals in the soil at certain concentrations, because this was explicitly shown by the data available to both parties.” Doc. #741 at 10.

Again, an expert offering a supplemental report or affidavit may explain how or why he reached a specific conclusion in his initial report but may not offer a new justification or opinion in doing so. Here, Simonton initially opined that the Facility caused the levels of contamination observed in various testing. While this opinion carries with it an implied conclusion that the levels of contamination were *not* naturally occurring, nothing in the Groundwater Report references or supports such a conclusion. Given the absence of any such information, the Court concludes that the affidavit’s statements regarding naturally occurring contaminants is an improper new opinion. *Marder*, 318 F.R.D. at 190.

B. Brinkman Affidavit

Brinkman’s affidavit is organized into six responses to specific points made in the Meritor Defendants’ *Daubert* motion challenging his opinions. *See* Doc. #626-5. The Meritor Defendants challenge four opinions in the affidavit: (1) that the defendants are the sole cause of the contamination in the Subdivision; (2) the existence of vapor intrusion pathways; (3) the location of dumping sites; and (4) the cause of pollution by benzene, toluene, ethylbenzene, and xylenes (“BTEX”) in the Subdivision.

1. Alternative causes

In his affidavit, Brinkman opines:

There is no evidence in the record that any of the chemicals used by the facility that now contaminate the facility, Eastern Heights and the surrounding area were ever introduced by any party other than the Defendants (including their predecessors in interest). That is to say, the totality of evidence in the thousands of pages of evidence related to dumping, leaking and discharging of these chemicals establishes that only the former operators of the facility are responsible for their presence, and none other.

Past employee depositions indicate that the Facility dumped along the eastern boundary of the Facility property. Depositions also indicate that the Facility blew waste to the north and the east, which could account for shallow sources in and by the railyard and areas east of Eastern Heights. Given the indiscriminate dumping perpetrated by the Facility and the deposition statements, the most likely source of contamination in the railyard is the Facility from acknowledged dumping that occurred along Moose Lodge Road.

Doc. #626-5 at 4. Brinkman bases these conclusions on “the totality of evidence in the thousands of pages of evidence related to dumping, leaking and discharging of these chemicals” *Id.* The Meritor Defendants argue Brinkman’s reference to this information amounts to improper buttressing. Doc. #701 at 13–14.

To be sure, the Groundwater Report concludes that “[n]o other commercial or industrial activity capable of generating the contamination exists within or by the subdivision.” Doc. #629-1 at 7. However, during his deposition, Brinkman stated he arrived at this conclusion by “just kind of looking at the area. I didn’t really do a thorough investigation.” Doc. #569-2 at 187. In light of Brinkman’s initial characterization of his research, there can be no serious dispute that the affidavit’s references to “thousands of pages of data” and “[p]ast employee depositions” represent new sources and justifications for his opinion and are, therefore, properly excluded.⁸ *Avance*, 2006 WL 3484246, at *3; *Beller*, 221 F.R.D. at 695.

2. Groundwater vapor intrusion pathways

The Meritor Defendants next argue that the statement in Brinkman’s affidavit “that toluene and TCE were detected in soil vapor, subsurface samples and indoor air samples show that a pathway [from the groundwater] is complete” is new and must be stricken. As support for this position, the Meritor Defendants point to portions of Brinkman’s deposition, in which he testified that he did

⁸ Without authority, the plaintiffs argue, “Brinkman’s statements regarding data relied on by Defendants in no way prejudice the Defendants because the Defendants could easily have questioned Mr. Brinkman on these issues had they wished, but elected not to do so.” Doc. #741 at 11. This is, of course, untrue. The Meritor Defendants would have had no reason to question Brinkman about data on which he expressly disclaimed reliance.

not consider himself an expert on vapor intrusion pathways and that he had no opinion on the existence of a completed vapor intrusion pathway from the groundwater for TCE or DCE. The plaintiffs respond that Brinkman’s reference to a completed pathway was not intended as “an opinion on vapor intrusion” but rather was a rebuttal to the Meritor Defendants’ “unsupported proposition that the clay layer below Eastern Height is ‘impermeable.’” Doc. #741 at 12. The plaintiffs specifically argue that “Brinkman asserting that the clay layer is, in fact, permeable is not a new opinion, but rather a reaffirmation of an established position expressed by Brinkman”⁹ *Id.*

In considering the parties’ arguments, the Court begins by noting that Brinkman’s statements regarding his qualifications to render an opinion on vapor intrusion are irrelevant to the Meritor Defendants’ motion to strike. If the opinion is new, it should be stricken regardless of Brinkman’s qualifications.

In evaluating whether the opinion is new, the Court notes that the Groundwater Report refers to “a completed vapor intrusion pathway for toluene contamination from the facility and disposal area” based on subslab analysis for homes. Doc. #629-1 at 18. Additionally, during his deposition, after an initial answer to the contrary, Brinkman testified that while he did not believe himself to be an expert on vapor intrusion, he believed there was a completed vapor intrusion pathway for TCE from the groundwater to the Eastern Heights neighborhood. Doc. #700-2 at 204. Under these circumstances, the Court concludes Brinkman’s opinion regarding a completed vapor intrusion pathway for toluene and TCE from the groundwater is not new.

⁹ The plaintiffs also argue Brinkman’s statement that a vapor intrusion pathway is complete was not “an opinion on vapor intrusion.” *See* Doc. #751 at 12. The Court rejects this position without further comment.

3. Dumping locations

The Meritor Defendants object to Brinkman's statement in his affidavit that, based on "depositions and sworn statements from dozens of former workers," the Facility "indiscriminate[ly] dump[ed] waste." Doc. #701 at 13–17. The Meritor Defendants contend that the reliance on this additional evidence is improper buttressing because, during his deposition, when Brinkman was asked to identify the evidence he relied on in determining that waste was disposed of along Moose Lodge Road, he could only remember the statement of Theo Berry. *Id.* The plaintiffs respond that Brinkman's inability to remember additional witness statements is not an indication that he did not rely on them. Doc. #741 at 14.

During his deposition, Brinkman testified that he believed the Facility dumped waste along Moose Lodge Road outside the BCDA. *See* Doc. #700-2 at 228–31. When asked what evidence supported this conclusion, Brinkman cited (1) the fact that "Meritor has taken responsibility as the responsible party and has admitted that it's their contamination by doing that;" and (2) "witness statements" about dumping combined with the existence of contaminated groundwater. *Id.* When asked to state the bases for his opinion regarding dumping locations, Brinkman referred to "witness statements," in the plural. He never testified that the only statement he relied on was from Berry. Rather, he testified he could not recall the specific statements. *Id.* Because an expert is free to clarify which sources he relied on, Brinkman's reference in his affidavit to additional employee statements is not improper.¹⁰ *See generally Broyles*, 2017 WL 3301222, at *5 ("Neither Dr. Youngblood, nor anyone else, can be expected to have memorized the entirety of the supporting data necessary to make the complex calculations referred to in his report and his deposition. This

¹⁰ Brinkman's reference to depositions and statements overlaps in some respects with the references this Court has determined to be improper buttressing with respect to his opinion regarding fault for the contamination in the Subdivision. Such references remain improper for the fault-related opinions.

type of explanation would clearly be allowed at trial and is specifically the kind of information which can be used in a declaration in opposition to the defendants' *Daubert* motions.”).

4. Presence of BTEX

In his affidavit, Brinkman, citing certain Arcadis data, refers to both the presence of fuel contaminants like BTEX in the Subdivision and the existence of gasoline tank leaks at the Facility as evidence supporting his general conclusions that the Facility is responsible for the contamination in the Subdivision. Doc. #626-5 at 5. The Meritor Defendants, citing Brinkman's testimony that he performed no air dispersion or soil vapor modeling with regard to the movement of BTEX from the Facility, argue Brinkman's opinion that the tank caused contamination in the Subdivision is “contrary to his deposition and report, which reflect that he did no such work in forming his opinions.” Doc. #701 at 16–17. The Meritor Defendants also argue that “[h]is affidavit in no way ties any alleged leaking tank or any of the four tanks at the Facility to BTEX in the Subdivision.” *Id.* at 16. The plaintiffs respond that Brinkman was not required to perform air dispersion modeling because the plaintiffs' theory is that the contamination passed from the tank and through the groundwater and then soil vapors into the Subdivision. Doc. #741 at 14–15. The Meritor Defendants reply that this could not have been Brinkman's theory because he testified there was no BTEX in the groundwater. Doc. #745 at 4–5.

While Brinkman's affidavit cites the gasoline tanks and presence of BTEX in the neighborhood as evidence that the Facility caused contamination in the Subdivision, he offers no specific opinion that the tanks caused the contamination or, relatedly, how such contamination may have occurred. Even if this Court attributed to Brinkman the groundwater-to-soil-vapor theory raised by the plaintiffs in their brief, Brinkman testified unambiguously that the plaintiffs' experts detected no BTEX chemicals in the monitoring wells beneath the Subdivision, and that he

performed no modeling of BTEX soil vapors in the neighborhood. Doc. #569-2 at 126–27, 180. In short, it is clear Brinkman performed no analysis connecting BTEX from any source at the Facility to BTEX in the Subdivision. To the extent his affidavit suggests otherwise, the motion to strike will be granted.

C. Jenkins Affidavit

The Meritor Defendants argue the following statements in Jenkins’ affidavit are inadmissible as new opinions or new evidence: (1) statements regarding Jenkins’ work with the EPA, including his work on the remediation of the Facility; (2) quotations from a memorandum Jenkins authored while with the EPA; (3) quotations from the EPA’s Handbook of Groundwater Protection and Cleanup Policies for RCRA Corrective Action; (4) statements that employees at the Facility did not follow specific procedures in their remediation attempts; (5) statements regarding the Facility’s PRB; (6) statements regarding MCLs for groundwater; (7) statements regarding potential sources of pollution at “the Kirk Property;” (8) statements regarding potential sources of pollution at the Railyard and Stoneyard; and (9) a statement that Simonton has demonstrated all properties in Eastern Heights are contaminated. The Meritor Defendants contend that “all of this commentary and opinion is entirely new and none of it was contained in the [Groundwater] Report nor was it identified by Jenkins in his deposition as an opinion he would be offering at trial.” Doc. #701 at 19.

In their response, the plaintiffs do not address the Meritor Defendants’ arguments regarding the potential sources of pollution at the Kirk Property, the Railyard, or the Stoneyard. Regarding the first six categories of statements, however, the plaintiffs argue that the various information “is to clarify how Mr. Jenkins determined that his remediation plan was necessary, nothing more.” Doc. #741 at 15. As to the final category, the plaintiffs argue that Jenkins’ characterization of

Simonton’s opinion is not a new opinion but “is a fact which Dr. Simonton determined through his analysis of Eastern Heights.” *Id.* The Meritor Defendants reply that “[e]ven a cursory review of Jenkins’s affidavit demonstrates that he is offering new opinions, bases, facts, and data that were required to be included in his original 2017 report.” Doc. #745 at 5.

None of the parties devoted much effort in developing their respective arguments. Accordingly, the task of sifting through Jenkins’ somewhat-rambling affidavit has been left to the Court. In this regard, Jenkins states in his affidavit that the “brief history of 3 decades of environmental investigation followed by inadequate or inappropriate action and sometimes by no action explains why an evaluation of options and mechanisms to protect the Eastern Heights Subdivision from groundwater contamination on adjacent properties was performed.” Doc. #627-23 at 5. He further opines that “[d]efensive measures [in his remediation plan] were considered necessary because the managers of the Grenada Manufacturing Facility were aware of contamination beneath the Grenada Facility by 1989” and failed to respond appropriately. *Id.* at 2–8. Jenkins then cites the MCLs and various EPA regulations to show the inadequacy of the response. *Id.* While the Court questions whether the level of detail in the affidavit is necessary, the statements regarding the history of the Facility, including compliance with various EPA dictates (categories one through six above), represent an explanation for how Jenkins created his remediation plan and are, therefore, not new opinions.

Turning to Jenkins’ statements regarding potential sources of pollution at the Kirk Property, the affidavit avers that Jenkins “ignored the Kirk property because ... data ... showed the source was farther up gradient and not on Kirk property.” Doc. #627-23 at 10. The affidavit goes on to explain why specific data supports the conclusion that the relevant pollution source is not located on the Kirk Property, the Railyard, or the Stoneyard. As explained above, Jenkins is

entitled to explain how and why he reached a specific conclusion. Accordingly, the Court concludes that Jenkins' explanation for why he did not consider the Kirk Property to be a source of the contamination in the Subdivision is not a new opinion. However, the opinions regarding the Stoneyard and Railyard, which are not offered to explain a previous opinion but to show why his previous opinion was right, are indisputably new opinions and are properly stricken.

Finally, the Court finds Jenkins' statement regarding Simonton's original community-wide findings is not a new opinion but rather an explanation for why he did not feel a property-by-property analysis was necessary. Specifically, Jenkins stated, "An assessment of the distribution of contamination inside the Subdivision was not part of this effort and was not necessary to complete this effort." Doc. #627-23 at 14. This is a quintessential explanation for how an expert reached an opinion and is, therefore, proper.

D. Fineis Affidavit

As quoted above, Fineis' initial report offered conclusions regarding vapor intrusion pathways for groundwater and soil gas contamination. Doc. #440-1 at 12. The Meritor Defendants argue that Fineis' affidavit contains new opinions and improper buttressing in the form of (1) references to a December 20, 2016, EPA Memorandum and an April 2017 report from Tetra Tech, a third-party contractor; (2) generalized references to test results by the defendants' consultants, the EPA, and EPA's consultants; and (3) a statement that "overwhelmingly the opinions of the experts was that the plant was the source" of the pollution. Doc. #701 at 22-23.

1. References to new test results

In his affidavit, Fineis refers to various test results from other entities which he claims supports his conclusion regarding the existence of vapor intrusion. The Meritor Defendants argue that this amounts to improper buttressing insofar as Fineis, during his deposition, expressly

disclaimed reliance on any other data because he “wanted [his] data to stand on its own and not be biased by ... other[] information.” Doc. #700-4 at 17. The plaintiffs do not dispute this general point but argue that Fineis could not have relied on the Tetra Tech data because it was not disclosed to the plaintiffs until after the discovery deadline. Doc. #741 at 17.

This Court concludes that, for the reasons above, Fineis may not bolster his opinion by relying on data on which he expressly disclaimed reliance. In the same vein, the plaintiffs may not justify Fineis’ late disclosure by arguing that the disclosure of the Tetra Tech data was untimely. At most, this fact would only justify reliance on the Tetra Tech data. Furthermore, while a late disclosure may justify an untimely new opinion, the plaintiffs have offered no evidence that they took reasonable efforts to supplement Fineis’ opinion once they received the relevant data. *See Dykes v. Cleveland Nursing & Rehab. Ctr.*, No. 4:15-cv-76, 2018 WL 3058870, at *4 (N.D. Miss. June 20, 2018) (“As a general rule, a supplemental disclosure under Rule 26(e)(1)(A) is timely if it is made as soon as possible after the party learns of the deficiency.”) (alterations and quotation marks omitted). In the absence of such evidence, the late disclosure cannot be “substantially justified.” *Fish v. Kobach*, No. 16-2105, 2018 WL 1116534, at *8 (D. Kan. Feb. 27, 2018).

2. Facility as source of contaminants

In his affidavit, Fineis states:

I was not hired to opine to the source of the contaminants. However, through my conversations with defendants’ consultants, MDEQ staff and EPA staff while conducting and/or observing testing one could reasonably ascertain that overwhelmingly the opinions of the experts was that the plant was the source. I was not hired nor did I perform testing to independently verify others conclusions that the plant was the source.

Doc. #626-2 at 5.

While the plaintiffs argue that this opinion is properly considered because it is commonsense, Fineis testified that he did not “do any source identification” in forming his opinions. Doc. #700-4 at 109. Because it is undisputed that Fineis did not perform source identification in producing his report, he may not do so in a supplemental affidavit.

E. Summary

For the reasons above, the motion to strike is granted to the extent it asks the Court to strike from the affidavits:

1. Simonton’s (a) conclusions and analysis regarding contamination on individual properties; (b) plume contour maps; (c) analysis regarding the contamination concentrations and distance from the Facility; and (d) opinions related to whether the contamination in the Subdivision is naturally occurring.

2. Brinkman’s discussion of evidence attributing responsibility for contamination to the Facility and opinions regarding the movement of BTEX from the Facility to the Subdivision.

3. Jenkins’ analysis regarding why the Stoneyard and Railyard were not sources of contamination in the Subdivision.

4. Fineis’ discussion of third-party testing and opinions identifying the Facility as the source of contamination in the Subdivision.

IV

Standard Governing Admissibility of Expert Opinions

Federal Rule of Evidence 702 provides:

A witness who is qualified as an expert by knowledge, skill, experience, training, or education may testify in the form of an opinion or otherwise if:

- (a) the expert’s scientific, technical, or other specialized knowledge will help the trier of fact to understand the evidence or to determine a fact in issue;
- (b) the testimony is based on sufficient facts or data;
- (c) the testimony is the product of reliable principles and methods; and

(d) the expert has reliably applied the principles and methods to the facts of the case.

A “district court has wide latitude when navigating the expert-qualification process.” *Williams v. Manitowoc Cranes, L.L.C.*, 898 F.3d 607, 625 (5th Cir. 2018). “As long as there are sufficient indicia that an individual will provide a reliable opinion on a subject, a district court may qualify that individual as an expert.” *Id.* (quotation marks omitted).

Under *Daubert v. Merrell Dow Pharmaceuticals, Inc.*, 509 U.S. 579 (1993), a district court has a “special obligation ... to ensure that any and all scientific testimony is not only relevant, but reliable.” *Bear Ranch, L.L.C. v. Heartbrand Beef, Inc.*, 885 F.3d 794, 802 (5th Cir. 2018) (internal alterations and quotation marks omitted). “To establish reliability under *Daubert*, an expert bears the burden of furnishing some objective, independent validation of his methodology.” *Brown v. Ill. Cent. R.R. Co.*, 705 F.3d 531, 536 (5th Cir. 2013) (internal alterations and quotation marks omitted).

When evaluating reliability, *Daubert* dictates that trial courts should consider: (1) “the extent to which a given technique can be tested;” (2) “whether the technique is subject to peer review and publication; (3) “any known potential rate of error, the existence and maintenance of standards governing operation of the technique; and (4) “whether the method has been generally accepted in the relevant scientific community.” *Hathaway v. Bazany*, 507 F.3d 312, 318 (5th Cir. 2007). The *Daubert* factors “are not mandatory or exclusive.” *Id.* Rather, the district court should consider whether the enumerated factors “are appropriate, use them as a starting point, and then ascertain if other factors should be considered.” *Id.* (citing *Black v. Food Lion*, 171 F.3d 308, 311–12 (5th Cir. 1999)).

In addition to the specific factors enumerated in *Daubert*, the Advisory Committee's Note to the 2000 Amendment to Rule 702 states that the following five "factors remain relevant to the determination of the reliability of expert testimony:"

- (1) Whether experts are proposing to testify about matters growing naturally and directly out of research they have conducted independent of the litigation, or whether they have developed their opinions expressly for purposes of testifying.
- (2) Whether the expert has unjustifiably extrapolated from an accepted premise to an unfounded conclusion.
- (3) Whether the expert has adequately accounted for obvious alternative explanations.
- (4) Whether the expert is being as careful as he would be in his regular professional work outside his paid litigation consulting.
- (5) Whether the field of expertise claimed by the expert is known to reach reliable results for the type of opinion the expert would give.

Fed. R. Evid. 702 advisory committee's note to 2000 amendment (quotation marks and citations omitted).

Overall, the Court must be mindful that "the fact that ... testimony may be assailable does not mean it is inadmissible under Rule 702. The trial court's role as gatekeeper ... is not intended to serve as a replacement for the adversary system." *United States v. Ebron*, 683 F.3d 105, 139 (5th Cir. 2012).

V

Brinkman Opinions

The Meritor Defendants argue that (1) Brinkman's opinions on ambient air are inadmissible because they rely on the opinions of Paul Rosenfeld, an expert who has been withdrawn; (2) Brinkman's opinions on vapor intrusion are inadmissible because he has no expertise on the topic and because the opinions fail to fit the facts of the case; (3) Brinkman's opinions on the source of contamination are inadmissible because he failed to consider or account for alternative explanations for groundwater contamination in the Subdivision; (4) Brinkman's opinions on groundwater contamination are inadmissible because he failed to use available

scientific methods to arrive at his opinions; (5) Brinkman employed an unreliable methodology to determine that BTEX moved north from the Facility; (6) Brinkman's opinion that the Facility dumped outside the BCDA is factually unsupported; (7) Brinkman's opinion that groundwater flows from "the disposal area" to the Subdivision is factually unsupported; (8) Brinkman's opinion that groundwater flows from the Facility to the subdivision is unsupported; and (9) the remediation plan proposed by Brinkman is inappropriate.¹¹

A. Ambient Air

The Groundwater Report concludes that the various defendants are responsible for past and continued contamination of ambient air in the Subdivision. The Meritor Defendants argue that Brinkman cannot opine on this issue because he testified he relied solely on the withdrawn opinions of Paul Rosenfeld and Rosenfeld's company, SWAPE,¹² to reach the conclusion, and the plaintiffs have stipulated that "none of their other experts will rely upon any of Dr. Rosenfeld's

¹¹ In setting forth the standards for evaluating proper factual support, the Meritor Defendants argue this case is "similar" to *Berry v. Armstrong Rubber Co.*, 989 F.2d 822 (5th Cir. 1993), a decision in which the Fifth Circuit affirmed a district court's exclusion of certain environmental experts. Doc. #570 at 27–28. Specifically, the Meritor Defendants assert:

Similar to this case, in *Berry* ... some of the plaintiffs asserted property damage claims based on Armstrong's alleged dumping of toxic waste from 1937 to the 1970s on nearby sites. Plaintiffs' experts opined that chemicals found on several adjacent properties came from Armstrong. As here, there were witnesses who testified that they participated in or observed defendant dumping tires and barrels of waste in the general area of plaintiffs' homes decades earlier. Also as here, plaintiffs' chemical engineering expert relied on samples, including soil vapor samples, from properties not involved in the case. And like here, regulatory agencies had concluded that "there was no imminent threat to the public health or environment." Finally, like here, testing from other entities concluded that groundwater under the Armstrong waste disposal sites flowed away from plaintiffs' land. The Fifth Circuit held that the District Court for the Southern District of Mississippi correctly excluded the plaintiffs' chemical engineer, and granted summary judgment in favor of Armstrong, agreeing that plaintiffs' experts had relied on improper facts.

Id.(citations omitted). It is unclear whether the Meritor Defendants intended this discussion to apply specifically to Brinkman's opinions regarding the sources of contamination. To the extent they did, the Court finds *Berry* not controlling here. In *Berry*, the chemical engineer's "opinions were not based on tests he performed, or even tests of the properties at issue" 989 F.2d at 828. In contrast, Brinkman evaluated data specifically related to the subject of his opinion—the Subdivision. Thus, unlike the expert in *Berry*, Brinkman evaluated the property at issue in his report.

¹² Rosenfeld and SWAPE's opinions have been withdrawn pursuant to a stipulation between the parties. See Doc. #506.

opinions or testimony or any statements, data, facts, opinions, or conclusions.” Doc. #570 at 20. The Meritor Defendants further contend that Brinkman cannot opine as to whether fumes from the Facility could blow into the Subdivision because he lacks expertise on that topic. *Id.*

As an initial matter, while Brinkman testified he relied on Rosenfeld’s opinions and data, he never testified, contrary to the Meritor Defendants’ representation, that he relied *solely* on Rosenfeld’s opinions or data in formulating the Groundwater Report. *See* Doc. #569-2 at 71, 75–76. To the extent there was any ambiguity on this subject, Brinkman submitted an affidavit clarifying that “none of my opinions depend upon or rely upon a withdrawn expert.” Doc. #626-5 at ¶ 5. In light of this unambiguous and unchallenged declaration, the Court rejects the Meritor Defendants’ argument that Brinkman cannot testify as to the presence of contamination in the ambient air due to Rosenfeld’s withdrawal.

The Meritor Defendants also argue that “Brinkman has no foundation for any opinions about alleged air contamination in the Subdivision. He acknowledges that air dispersion modeling would be needed to identify whether fumes from the Facility could blow north into the Subdivision, and that he himself lacks any expertise in that area.” Doc. #570 at 25. In this regard, the Meritor Defendants cite the following exchange from Brinkman’s deposition:

Q: Do you have any evidence to show that soil vapors can move north from the Grenada Facility into the Eastern Heights neighborhood?

A: It gets two – two things. One, again, I’m not an air dispersion modeler. That’s the type of expertise that would help out in that. The evidence I have is that it’s there and it’s close.

Doc. #569-2 at 64.

The Court agrees that the plaintiffs have failed to show Brinkman is qualified to testify that soil vapors from the Facility migrated to the Subdivision. While Brinkman testified that he is able to opine that there is air contamination in both the Subdivision and the Facility, he unequivocally

testified that he lacks the expertise to testify that soil vapors could migrate from the latter to the former. In the absence of such expertise, he may not testify on this point.

B. Vapor Intrusion Pathways

The Meritor Defendants argue Brinkman cannot opine on the issue of completed pathways for vapor intrusion (whether vapor could travel from contamination in the groundwater or soil to the plaintiffs' properties) because he has "no knowledge, experience or expertise in vapor intrusion ... or vapor pathways." Doc. #570 at 18. They also argue the existence of a vapor intrusion pathway is unsupported by the facts. *Id.* The plaintiffs respond:

Brinkman is not being proffered as a vapor intrusion expert. Brinkman has provided an opinion that the property is contaminated as a result of vapor intrusion, an opinion he has based on evidence obtained through the review of studies and opinions fully disclosed in his report. Further, Defendants challenge that Brinkman's opinions are unreliable because he relied on the test data, but not opinions, of Plaintiffs' expert, James Fineis However, this challenge is unfounded and baseless, as it is well established that a party's expert can rely on the test data of other party experts.

Doc. #627 at 23.

Pursuant to Federal Rule of Evidence 703, "[a]n expert may base an opinion on facts or data in the case that the expert has been made aware of or personally observed. If experts in the particular field would reasonably rely on those kinds of facts or data in forming an opinion on the subject, they need not be admissible for the opinion to be admitted." Consistent with this rule, an expert may rely on reports of other experts so long as experts in the particular field would reasonably rely on such information. *See Monsanto Co. v. David*, 516 F.3d 1009, 1015 (5th Cir. 2008) ("Koppatschek's reliance on the scientific reports prepared by his team is therefore the type of reliance that is reasonable for expert witnesses."). However, "[a] scientist ... is not permitted to be the mouthpiece of a scientist in a different specialty. That would not be responsible science." *Dura v. Auto. Sys. of Ind., Inc. v. CTS Corp.*, 285 F.3d 609, 614 (7th Cir. 2002).

The distinction between proper reliance and improper parroting is not always easy to draw. The Seventh Circuit, however, has offered useful guidance. According to the Seventh Circuit, an expert may rely on data or opinions where the “soundness of the underlying expert judgment” is not in issue but may not do so “[i]f it were apparent that the study was not cut and dried.” *Id.* at 614. For example:

A theoretical economist ... would not be allowed to testify to the findings of an econometric study conducted by another economist if he lacked expertise in econometrics and the study raised questions that only an econometrician could answer. If it were apparent that the study was not cut and dried, the author would have to testify; he could not hide behind the theoretician.

Id. Or, in an example closer to the present case, a hydrologist who lacks expertise in groundwater flow could testify “that [a] well was contaminated by volatile organic compounds and that if [a plant] was within the well field’s capture zone some of the contamination may have come from that plant” but the expert could not testify that the plant was in the capture zone where the size of the capture zone was an issue in the case and not a “cut-and-dried procedure[.]” *Id.* at 614–15.

Here, there can be no serious dispute that the existence of vapor intrusion pathways is both an issue in this case and not a cut-and-dried procedure. Accordingly, Brinkman, like the expert in *Dura*, may not parrot the opinion of an existence of the pathway. Rather, he may testify, based on his expertise, that if the pathway exists, the Meritor Defendants are responsible for the resulting pollution. Having reached this conclusion, the Court declines to consider whether Brinkman’s opinion regarding the completed pathway is supported by the facts.

C. Responsibility for Contamination

“A necessary ingredient [of opinions on causation] is the exclusion of alternative causes.” *Michaels v. Avitech, Inc.*, 202 F.3d 746, 753 (5th Cir. 2000). Accordingly, “[i]n deciding whether an expert employed a reliable method, the district court has discretion to consider whether the

expert has adequately accounted for obvious alternative explanations.” *Brown v. Burlington N. Santa Fe Ry. Co.*, 765 F.3d 765, 773 (7th Cir. 2014); *accord, Packgen v. Berry Plastics Corp.*, 847 F.3d 80, 87 (1st Cir. 2017); *Redd v. DePuy Orthopaedics, Inc.*, 700 F. App’x 551, 554 (8th Cir. 2017). A “failure to test for ... obvious and significant alternative explanations renders [an] analysis essentially worthless.” *In re Wireless Tel. Servs. Antitrust Litig.*, 385 F.Supp.2d 403, 428 (S.D.N.Y. 2005) (quotation marks omitted); *see Michaels*, 202 F.3d at 753 (failure to exclude other potential causes “would likely” render an opinion inadmissible under *Daubert*).

The Meritor Defendants argue Brinkman failed to adequately account for obvious alternative sources of groundwater contamination located at the Railyard, the Kirk Property, and the PCA Property.¹³ Doc. #570 at 26–27. The plaintiffs respond that the identified sources are not obvious alternatives and that, even if they were, Brinkman adequately accounted for them. Doc. #627 at 19–21.

1. Obvious explanations

A district court has discretion to determine whether potential alternative causes are “obvious” so as to render a failure to address them unreliable. *Brown*, 765 F.3d at 773. While it appears the Fifth Circuit has not offered a specific definition for “obvious,” courts have generally focused on the strength of the evidence connecting the potential cause to the claimed injury. *Compare Taber v. Allied Waste Sys., Inc.*, 642 F. App’x 801, 811 (10th Cir. 2016) (alternative explanation “obvious” when there is “established connection” between possible explanation and claimed injury) *and Zimmer, Inc. v. Stryker Corp.*, No. 3:14-cv-152, 2018 WL 276324, at *5 (N.D. Ind. Jan. 3, 2018) (“the record contains many readily apparent facts that posit alternative

¹³ The Meritor Defendants also suggest that “evidence that any waste deposited elsewhere in the MLRA towards the Yalobusha River did not contribute to the mapped contamination plume from the BCDA” is an alternative explanation. This is, quite obviously, not an “alternative cause.”

explanations”) with *Betts v. Gen. Motors Corp.*, No. 3:04-cv-169, 2008 WL 2789524, at *5 (N.D. Miss. July 16, 2008) (“no evidence of alternate” explanation) and *United States ex rel. Dolan v. Long Grove Manor, Inc.*, No. 10-c-368, 2018 WL 3389733, at *3 (N.D. Ill. July 12, 2018) (alternative explanation not obvious when party offered no statistical evidence in support). This approach is similar to that used by the Fifth Circuit in *Michaels*, quoted above, in which it held that an opinion attributing contamination in an airplane to negligent installation of a right pump would “likely” be excludable under *Daubert* based on a failure to exclude alternative causes where:

[a]ccording to the evidence, all of the following can introduce contamination into the system: the negligent installation of a pump, the actual failure of a pump, engine cleaning, and even normal operation. [And i]n this case, debris was found after (1) four years of operation, (2) four engine cleanings, (3) three pump failures, (4) the installation of the left pump, and (5) the discovery of an oil leak near the left pump, which all agree was never fixed.

Michaels, 202 F.3d at 753. Based on these facts, the Fifth Circuit held that “[g]iven the variety of intervening events, the finding of debris alone [relied on by the expert] cannot support any rational inference that [the] installation of the right pump was negligent, given that the plaintiff’s experts wholly fail to address and rule out the numerous other potential causes.” *Id.* Thus, in *Michaels*, the Fifth Circuit focused on the established evidentiary connections between the possible causes (negligence, pump failure, engine cleaning, and normal operation) and the facts of the case (multiple engine cleanings, multiple pump failures, and long operation) to determine the expert failed to account for obvious explanations.

Based on the authority above, the Court concludes that an alternative explanation is “obvious” when the record reveals a sufficiently strong evidentiary connection between the

alternative causes and the claimed injury to call into question the reliability of the opinion.¹⁴ Having reached this conclusion, the Court turns to the substance of Brinkman's opinions.

On October 26, 2016, before the issuance of the Groundwater Report, David Jenkins, one of Brinkman's co-authors, sent Brinkman an e-mail stating, in relevant part:

Contamination is crossing the RR tracks from what had previously been an unknown source area to enter the southern portion [of] Eastern Heights Subdivision.

The information presented in your TCE figures sent today (Oct 26, 2016) suggest there probably is a 2nd previously unknown source area east of the RR tracks which created a TCE plume which enters the northern portion of the Eastern Heights Subdivision. None of the cross-sections in the 2015 Moose Lodge Report goes far enough north to detect the plume from this 2nd source area

The extent of TCE contamination to the east and west have not been defined. TCE probably underlies the gravel site between MLR dump and the neighborhood. Also, another or other sources may exist due east of the neighborhood.

Doc. #569-9.

In addition to the unknown sources identified by Jenkins, undisputed data contained in the Groundwater Report shows contaminated groundwater extending from an area east of the railway, near both the BCDA and areas northeast of the BCDA, through the Stoneyard and Railyard properties, into the Subdivision. *See* Doc. #569-1 at 36–37; Doc. #627-5. A rough approximation¹⁵ of the relevant groundwater plume is shown in Figure 2¹⁶ below.

¹⁴ This approach is consistent with the holdings of other circuits. *See, e.g., Claar v. Burlington N. R.R. Co.*, 29 F.3d 499, 502 (9th Cir. 1994) (district court acted within its discretion when it found doctors' diagnoses to be unreliable because neither doctor "made any effort to rule out other possible causes for the injuries plaintiffs complain of, even though they admitted that this step would be standard procedure before arriving at a diagnosis"); *Redd*, 700 F. App'x at 554 ("Sastry did not consider the obvious alternative explanation for the fracture recognized by Redd's own doctors").

¹⁵ As evidenced by the note in the figure, the size of the plume is the subject of debate but its general location is not.

¹⁶ Doc. #569-1 at 36.

Figure 2



Thus, in this case, there is no dispute that pollution on the other properties extends into the Subdivision. Thus, there is certainly an established connection between contamination on the properties and the contamination in the Subdivision. However, the plaintiffs argue that these properties are not obvious alternative explanations for the contamination because interrogatories directed to the various property owners produced no responses that there were “spills, leaks or releases” of chemicals on the properties and because the location of the relevant contamination sources are consistent with evidence showing that the Meritor Defendants dumped chemicals to the north of the BCDA. In essence, the plaintiffs argue that, *apart from the chemicals dumped by the Meritor Defendants in the MLRA*, there is no connection between the contamination located on the other properties and the contamination in the Subdivision. The Court disagrees.

As explained above, the plaintiffs’ own expert identified two “unknown source areas” crossing the railroad tracks from the Kirk Property into the Subdivision. Doc. #569-9. Both

sources are located near undisputed industrial activity and well to the north of the most-northern site of dumping identified by the plaintiffs. *See* Doc. #627-2. Additionally, it is undisputed that a contamination plume passes into the Subdivision through the Railyard, another undisputed site of industrial activity. Doc. #569-1 at 36. In sum, the evidence shows the migration of pollution from various industrial sites into the Subdivision. While it is certainly possible (or even probable) that all pollution in the MLRA was caused by the Meritor Defendants' dumping and that the various property owners are not responsible for this migrating pollution, the Court concludes that the existence of industrial and commercial activities (the storage of railcars and drums of unknown substances) on the relevant properties establishes a sufficient evidentiary connection between the industrial and commercial activities on the relevant properties and the claimed pollution so as to render the properties (and the corresponding activities) obvious alternative explanations within the meaning of Rule 702. *See Lee-Bolton v. Koppers, Inc.*, 319 F.R.D. 346, 373–74 (N.D. Fla. 2017) (personal homes were obvious alternative explanations for contamination when “[p]ractically every expert testified that dioxins are ubiquitous in an urban environment and that in this case, numerous potentially contributing sources exist even within each home”); *Innis Arden Golf Club v. Pitney Bowes, Inc.*, 629 F.Supp.2d 175, 189 (D. Conn. 2009) (nearby industrial properties were obvious alternative sources where evidence showed other properties shared an outfall with defendant’s property and plaintiff was “concerned ... about the possibility that the [pollutants] originated on other properties”).

2. Adequate explanations

As quoted above, an expert must adequately account for obvious alternative explanations. Necessarily, the adequacy of the accounting depends on the nature of the expert’s opinion. Thus, an expert who opines that something is a contributing cause of an injury need only “show why a

particular explanation is not, in the expert's view, the *sole* cause" of the injury. *Schultz v. Akzo Nobel Paints, LLC*, 721 F.3d 426, 442–43 (7th Cir. 2013). However, to opine that something is the *sole* cause of an injury, the expert must eliminate the obvious alternative explanations "as highly improbable." *Taber*, 642 F. App'x at 811.

In this case, the Groundwater Report offers opinions that the defendants are (or were) responsible for the pollution and more specific opinions that the defendants are the sole cause of the contamination. Brinkman, during his deposition, testified that, in reaching these conclusions, he did not attempt to rule out disposal of TCE-contaminated waste by other companies or individuals because "there was an obvious source that was admitted to by the Grenada companies in this area." Doc. #569-2 at 153. Additionally, Brinkman testified that he performed "no direct investigation" of the past activities at the PCA or Kirk properties. Doc. #569-2 at 194. With regard to the Groundwater Report's conclusion that there were no other commercial or industrial activities capable of generating the contamination in the Subdivision, Brinkman stated that "you can say there's a K[irk] property, the PCA property, the railroad looking for some other source, but none of that makes sense compared to the known sources on this property." *Id.* at 186. Thus, Brinkman stated he reached this conclusion "just kind of looking at the area. I didn't really do a thorough investigation." *Id.*

While the plaintiffs try to argue that their experts are not required to prove a negative and that there is insufficient evidence to support a "phantom dumper" theory, the issue to be resolved here is not whether the claimed contamination actually came from another source but rather whether Brinkman adequately accounted for obvious alternative sources in reaching his conclusions. In this regard, Brinkman is not required to prove a negative but rather to explain why certain obvious alternative explanations do not undermine his conclusion. To this end, and despite

the data showing sources of contamination and/or pollution on other properties (including locations far from any confirmed source of disposal by the defendants), Brinkman took no action to eliminate possible other sources of contamination. This is insufficient under *Daubert* and Rule 702. Compare *Innis Arden*, 629 F.Supp.2d 189 (total failure to address alternative sites warranted exclusion) with *Castaic Laker Water Agency v. Whittaker Corp.*, No. 00-12613, 2002 WL 34700741, at *8 (C.D. Cal. Oct. 25, 2002) (expert's consideration of alternative sites but failure to consider migration pathways went to weight not admissibility of opinion). Accordingly, Brinkman's opinions on the sources of groundwater contamination must be excluded.

D. Groundwater Flow Methodology

The Groundwater Report contains two opinions regarding groundwater flow direction: (1) that groundwater from the "disposal area" tends to flow in the direction of the Subdivision; and (2) that while groundwater does not currently flow from the Facility to the Subdivision, "flow direction has varied over time and at times has flowed from the Facility toward the Subdivision." Doc. #569-1 at 7. With regard to this second opinion, the Groundwater Report opines that "[p]rior to remediation, the Equalization lagoon ... may have driven contamination further north than presently occurs" *Id.*

The Meritor Defendants argue Brinkman's groundwater flow opinions are unreliable because Brinkman and his co-experts "failed to use the tools of science" to arrive at the opinions. Doc. #570 at 22. Specifically, the defendants contend the experts "relied on a computer program that does not model either transport (the movement of chemical mass as it travels through the environment) or fate (how contaminants degrade or change as they move)." *Id.* In response, Brinkman explains that fate and transport modeling was not necessary in light of the "ten years of quarterly reports" which were analyzed in the Groundwater Report. Specifically, Brinkman states,

“This very large sample of data informs the *actual* directions of groundwater movement.” Doc. #627-20 at 5. In reply, the Meritor Defendants seem to concede that reliance on contour maps may satisfy *Daubert* but argue that “[a]dhering to the facts would require Brinkman to analyze[] the full set of contour maps. He did not do so.” Doc. #703 at 4. Put differently, the Meritor Defendants do not argue that the methodology of analyzing contour maps is unreliable. Rather, they argue that Brinkman, as well as the other Groundwater Experts, misapplied the methodology in this case by “cherry-pick[ing]” certain data to come to the conclusion that the groundwater “tends” to flow from the disposal area to the Subdivision. Doc. #570 at 9. They further argue that “Brinkman conceded that no data, from any point in time, demonstrates that groundwater flowed from the Facility into the Subdivision.” *Id.* at 25.

With regard to the flow from the disposal area, the Groundwater Report states expressly that the Groundwater Experts reviewed the thirty-two available contour maps and based their conclusions on the analysis that approximately two-thirds of the reviewed maps showed flows towards the Subdivision. *See* Doc. #569-1 at 8. While, as described above, the data from the southern portion of the disposal area does not show a tendency to flow toward the Subdivision, Brinkman has since clarified that this opinion relates to possible dump sites further to the north. To the extent this opinion has been limited, the Court deems it reliable.

With regard to the flow from the Facility, Brinkman, in his affidavit, pointed to a single contour map from 2008 showing groundwater flowing from the Facility into the Subdivision.¹⁷ Doc. #626-5 at 3–4. To the extent there is no dispute that the contour map represents the flow of

¹⁷ During his deposition, Brinkman testified that he was unaware of any data showing that groundwater flowed from the Facility to the north. Doc. #569-2 at 211. In his affidavit, he referenced the 2008 contour map when discussing the scientific method he used. *See* Doc. #626-5 at 5. To the extent this statement was not challenged as a new opinion in the Meritor Defendants’ motion to strike, the Court has considered it.

groundwater, the Court concludes that no modeling was necessary to support Brinkman's conclusion that, at one point, groundwater flowed from the Facility into the Subdivision.

E. BTEX Movement

The Meritor Defendants argue Brinkman employed an unreliable methodology to determine that BTEX moved north from the Facility. Doc. #570 at 11 n.6, 18–19. They further contend that, to the extent Brinkman opines that the BTEX came from a leaky gas tank, the opinion is untimely and unsupported by the factual record. *Id.*

During his deposition, Brinkman testified it was “probable” that BTEX from the Facility moved through soil vapors into the soil at the Subdivision. Doc. #569-2 at 129. He further testified the mechanism of movement for the BTEX to the neighborhood would be dispersal of soil vapors and that soil vapors tend to move radially from a source. *Id.* at 125–26. However, as described above, Brinkman also testified that he did not consider himself an expert on the movement of soil vapors and that his opinion was not based on any scientific methods but rather the “the prevalence of BTEX in the soil vapor samples in the Eastern Heights neighborhood and at least one source close to it in the neighborhood.” Doc. #569-2 at 128. Put differently, Brinkman testified that he believed BTEX from the Facility migrated to the Subdivision because there was BTEX contamination in both the Facility and the Subdivision.

The plaintiffs argue that this proximity-method is valid because “Defendants’ own expert, [Ranjit] Machado, agrees that TCE and each of the BTEX chemicals will spread from the source, outwards and unrestricted through the soils.” Doc. #627 at 26.” In evaluating the plaintiffs’ argument, the Court first notes that the pages of Machado’s deposition cited by the plaintiffs were not included in the deposition exhibit provided to the Court. The plaintiffs did however provide a portion of the deposition during which Machado testified that TCE spilled on the ground will

volatize into the soil gas and that, once volatized, will “defuse in all directions.” Doc. #627-10 at 86–87. This is consistent with Simonton’s observation that “[a]romatic compounds such as BTEX spread ... radially.” Doc. #627-21 at 11. Thus, according to Simonton, “[n]o modeling is necessary when ... actual sample data is available that supports [the] conclusion.” *Id.*

While the plaintiffs have introduced evidence that volatized BTEX may move radially through soil, they have offered no evidence that it moves *without restriction*. And, while Simonton testified that no modeling was necessary given the sampling data, the plaintiffs have offered no evidence supporting this statement. In the absence of any testimony that proximity alone is a reliable method for determining movement of contamination, this testimony falls far short of the reliability requirements of *Daubert*.¹⁸ *See Brown*, 705 F.3d at 536 (burden on expert to show reliability).

F. Dumping outside BCDA

As quoted above, the Groundwater Report refers to a “disposal area” along Moose Lodge Road. In this regard, the report includes a map, reproduced below in Figure 3,¹⁹ identifying three disposal sites, and one “possible release area.”

¹⁸ Having reached this conclusion, the Court declines to address the Meritor Defendants’ related arguments, asserted in a conclusory fashion in a footnote, that Brinkman’s opinion that a leaky gas tank contributed to the movement of BTEX is inadmissible as a new opinion or is properly excluded as unreliable. *See* Doc. #570 at 11 n.16.

¹⁹ Doc. #569-1 at 32.

Figure 3



While the Meritor Defendants concede that dumping occurred at the southernmost location (which falls within the BCDA), they argue there is no evidence supporting a conclusion that dumping occurred at the other “Moose Lodge Road Sites” or the “Possible Release Area.”

In his affidavit, Brinkman pointed to three specific pieces of evidence supporting the conclusion that dumping occurred along Moose Lodge Road outside the BCDA: (1) an agreed order signed by Meritor assuming responsibility for an area located outside the BCDA; (2) the deposition of Jerry Williams, a former employee at the Facility; and (3) “[s]urface and shallow soil data collected by a Meritor consultant.” Doc. #626-5 at 3.

To the extent Brinkman opines the Meritor Defendants’ disposed of waste north of the official BCDA, the Meritor Defendants argue the opinion is unsupported by facts. Doc. #570 at 29. To this end, the Meritor Defendants argue that no buffing compound or paint waste has been found at the location identified by Williams and that based on Williams’ later testimony, it is clear he misidentified the dumping location. *Id.*

Under *Daubert*, a district court’s “focus, of course, must be solely on principles and methodology, not on the conclusions that they generate.” 509 U.S. at 595. However, “conclusions and methodology are not entirely distinct from one another.” *Gen. Elec. Co. v. Joiner*, 522 U.S. 136, 146 (1997). “[N]othing in either *Daubert* or the Federal Rules of Evidence requires a district court to admit opinion evidence that is connected to existing data only by the *ipse dixit* of the expert.” *Id.* “A court may conclude that there is simply too great an analytical gap between the data and the opinion proffered.” *Id.* “The issue for the Court to determine is whether this is a case where the expert’s assumptions amount to rampant speculation and should be excluded, or whether his assumptions merely represent a weak factual basis for his testimony that is appropriately challenged on cross examination.” *Heller v. District of Columbia*, 952 F.Supp.2d 133, 140 (D.D.C. 2013) (quotations marks omitted). The Court concludes that for the reasons below, Simonton’s conclusion that dumping occurred outside the BCDA is supported by some record evidence and, therefore, falls closer to the latter than the former.

Williams, an employee at the Facility in 1966 or 1967, testified that he dumped Facility waste at a particular location outside the BCDA. Doc. #636-1 at 42. When asked to identify the location, Williams identified a spot on a map to the northeast of the BCDA. *Id.* at 52– 53. This location, sometimes referenced by the parties as “the Williams Circle,” is shown in Figure 4.²⁰

²⁰ Doc. #636-1 at Ex. 2.

Figure 4



The location marked by Williams falls very close to high concentrations of TCE contamination observed by the Meritor Defendants' contractor Stantec (as shown below in Figure 5²¹), and relatively close to geographic coordinates for which Meritor assumed financial responsibility for environmental remediation in an agreed order with the MDEQ (as shown below in Figure 6²²).

²¹ Doc. #636-2.

²² Doc. #636-3; Doc. #636-4.

Figure 5



Figure 6



However, Williams' estimate of the dumping location is not beyond question. It is undisputed that during the mid-1960s, the area identified by Williams was farmland and that Williams later testified that he would not have dumped waste on a "field that was being plowed." Doc. #571-20 at 26. Furthermore, Williams testified that another employee, Theodore Berry, ordinarily drove the truck and that he would defer to Berry's recollection of the dump site. *Id.* at 30. Berry, for his part, testified that he had a "special place" for dumping along Moose Lodge Road far to the east of the MLRA, near the Yalobusha River. Doc. #569-16 at 22–24.

In sum, there is some evidentiary support for the opinion regarding dumping near the two northern Moose Lodge Road sites identified in the Groundwater Report. For this reason, the Court concludes that the opinion is not "rampant speculation" and, therefore, is properly attacked on cross-examination rather than excluded through a pretrial motion. However, insofar as none of the evidence identified by Brinkman or the plaintiffs supports the existence of any dumping in the "Potential Release Area," the opinion regarding this site must be rejected as unreliable.

G. Groundwater Flow

The Groundwater Report contains the conclusion that "[t]he contaminated groundwater at the disposal area is hydraulically up gradient from the subdivision, meaning that contamination in groundwater has followed natural pathways and has migrated toward and beneath the subdivision."

Doc. #569-1 at 7. This opinion was based on the following analysis:

A dynamic groundwater flow divide exists at and sometimes east of the disposal area. East of the divide groundwater tends to flow to the east and southeast, towards the Yalobusha River. To the west of the divide, groundwater tends to flow to the north and northwest, directly towards the Eastern Heights subdivision. Table 3 summarizes interpretations of the direction of groundwater flow from the disposal area towards the subdivision based on groundwater elevation contour maps in quarterly reports. The first quarter 2009 and fourth quarter 2010 reports were not found in the MDEQ file. Copies of Figure 3 in quarterly reports after the second quarter of 2013 were not legible. North/northwest (N/NW) flow is flow from the disposal site towards the subdivision. About two-thirds, 21 of the 32 groundwater

contour maps, indicate flow from the disposal site towards the subdivision. For example, Figure 5 shows two flow lines (arrows) to the northwest, directly from the disposal site to the subdivision.

Id. at 7–8. The Meritor Defendants argue this conclusion is based on cherry-picked evidence and contradicts Brinkman’s own testimony, and Jenkins’ testimony, that the groundwater in the BCDA flows away from the Subdivision. Doc. #570 at 9.

The Meritor Defendants are correct that, in their depositions, both Jenkins and Brinkman testified that groundwater from the BCDA proper flows generally to the southwest. *See* Doc. #569-22 at 245–47; Doc. #569-2 at 235–36. However, Brinkman testified that groundwater flows from other “possible release area[s]” in the MLRA into the Subdivision. Doc. #569-2 at 235–36. Brinkman’s response affidavit clarifies that “ten years of quarterly reports produced by Meritor’s consultants ... show that the predominant direction of flow from source areas along Moose Lodge Road was to the north-northwest, towards the neighborhood.” Doc. #626-5 at 4–5. Brinkman further explains that “in many instances ... [the] groundwater flows from where Jerry Williams indicated he dumped contaminants to the west, northwest across Moose Lodge Road ... into Eastern Heights.” *Id.* at 5 Brinkman also points to a specific figure showing groundwater flowing from the BCDA and Facility itself into the Subdivision. *Id.*

The parties do not dispute that groundwater flows from portions of the MLRA into the Subdivision. Indeed, the Meritor Defendants argue as much when they contend that pollutants flow from the Kirk Property to the Subdivision. There also seems to be no dispute that, while groundwater flow is not constant, the flow from the southeastern portion of the MLRA (the BCDA proper) is, with limited exceptions, not toward the Subdivision. Thus, in essence, the dispute regarding opinions on groundwater flow is an issue of nomenclature (the Groundwater Report’s definition of “disposal area”) rather than science (the actual direction of the flow). The

Groundwater Report itself defines the “disposal area” somewhat ambiguously as the “waste disposal area along Moose Lodge Road.” Doc. #569-1 at 2. This definition necessarily demands an inquiry into the locations along Moose Lodge Road where the Groundwater Experts determined the Facility was disposing of waste.

As explained above, the Groundwater Report identified three dumping locations north of the BCDA: two sites located near the border of the IP Property and the PCA Property; and a site located in the middle of the PCA Property. While no evidence supports dumping at the PCA site, the Court concludes that the opinion regarding dumping near the PCA and IP border is sufficiently reliable. The Meritor Defendants have offered no argument that the general direction of groundwater flow from the PCA and IP border is generally in the direction of the Subdivision. Accordingly, insofar as the “disposal area” is properly considered to include the two dump sites at the PCA and IP border, the Court deems the report’s conclusions regarding the tendency of the groundwater flow to be reliable. However, to the extent the term refers to the southern dumpsite, the area which Brinkman testified tends to move to the west and southwest (rather than to the north and northwest as stated in the Groundwater Report), the Court finds an analytical gap between the data and the opinion which justifies rejection of the opinion.

H. Flow from Facility

As shown in Figure 1, the Facility maintained an equalization lagoon for storage of waste on the northern edge of its property. The Groundwater Report opines that the lagoon is “a known source of groundwater contamination” and “[p]rior to remediation ... may have driven contamination further north than presently occurs because water levels in the operating pond probably were higher than they are now.” Doc. #569-1 at 7. The Meritor Defendants argue this opinion is inadmissible as a “mere untested hypothesis.” Doc. #570 at 29. In response, the

plaintiffs argue primarily that Brinkman’s opinion on this subject is reliable because it is undisputed the lagoon is contaminated. Doc. #627 at 10–11.

The Meritor Defendants do not challenge the conclusion that the lagoon represents a source of contamination. Rather, they challenge the conclusion that *the contamination from the lagoon* altered the flow of groundwater so as to push it toward the Subdivision. With regard to this specific opinion, Brinkman conceded he performed no specific testing and failed to identify any grounds for this theory. Doc. #569-2 at 211–13. Based on Brinkman’s inability to establish a methodology for the opinion regarding the impact of the equalization lagoon on groundwater flow, the Court concludes the opinion is unreliable and properly excluded.

Furthermore, “imprecise and unspecific testimony” should be excluded as unhelpful to the jury. *See Boye v. Connor Corp.*, No. 12-cv-12108, 2014 WL 4772720, at *5 (E.D. Mich. Sep. 24, 2014) (collecting cases); *see also* 6 JONES ON EVIDENCE § 42:32 (7th ed.) (“Statements frequently appear in the case law that for an expert to testify that defendant's conduct was unfortunate or that certain events or substances ‘might’ or ‘could’ have caused a specified result, are of little help to a fact-finder and therefore should be excluded.”). Therefore, the opinion that contamination from the lagoon “may” have caused pollution to move north into the Subdivision is properly excluded as imprecise and unspecific.

I. Remediation Plan

The Groundwater Report calls for implementation of a remediation plan which would restore the various properties in the Subdivision to their pre-contamination state and prevent future contamination. The Meritor Defendants argue the remediation plan is “irrelevant” because the “EPA would never approve, let alone mandate such a solution ...” Doc. #570 at 21. The Meritor Defendants also argue Brinkman has a “financial interest in this case ... in the nature of a

contingent fee” because Brinkman testified that his proposed remediation plan, the one to be adopted should the plaintiffs prevail, would likely involve him serving as a Technical Director. Doc. #570 at 27 n.14 & accompanying text.

With regard to the contingency of the fee, “[t]he employment of a witness for a fee contingent upon victory for the party in whose favor he testifies is a violation of both the Model Rules of Professional Conduct and the Code of Professional Responsibility.” *United States v. Cervantes-Pascheco*, 826 F.2d 310, 316 (5th Cir. 1987) (Rubin, J., concurring). However, “because a person interested in the outcome of a case [may be] a competent witness, experts employed on ... contingent-fee basis have been permitted to testify.” *Id.*; see *Tagatz v. Marquette Univ.*, 861 F.2d 1040, 1042 (7th Cir. 1988) (rule against contingency fees “is a rule of professional conduct rather than of admissibility of evidence”). Accordingly, even if the remediation plan may properly be characterized as a contingency fee, a classification which is by no means certain, this fact would go to the weight of Brinkman’s testimony, not its admissibility. In reaching this conclusion, the Court notes that *In re DePuy Orthopaedics, Inc.*, 888 F.3d 753 (5th Cir. 2018), a case cited by the Meritor Defendants, is not to the contrary. In *DePuy*, the Fifth Circuit held that a district court abused its discretion when it denied a motion for post-judgment relief based on a party’s failure to disclose the contingent nature of an expert’s fees. *Id.* at 790–92. The *DePuy* court did not, however, rule that the contingent nature of the fee rendered the testimony per se inadmissible.

With regard to the relevancy of the plan, the plaintiffs respond that the remediation plan is offered “[i]n order to show that remediation costs exceed the value of the property,” which is a consideration for damages under Mississippi law. Doc. #627 at 8. The Meritor Defendants reply

this argument is inconsistent with Brinkman's stated belief that he saw himself working on the remediation for approximately ten years. Doc. #703 at 3.

The plaintiffs are correct that restoration costs are relevant to their claims for damages. *Patterson v. Holman*, 917 So.2d 125, 134 (Miss. Ct. App. 2005). There is no dispute that, irrespective of Brinkman's intentions, the remediation plan as proposed represents a proposal for restoring the property. While the Meritor Defendants and their expert believe the EPA is unlikely to sanction such a plan and that proceeding without such a sanction would be "unwise,"²³ there is no evidence or suggestion that an EPA sanction is a precondition to the proposed remediation plan. Accordingly, the Court agrees with the plaintiffs that the remediation plan is relevant to the extent the plaintiffs intend to offer it.

J. Summary

In sum, excluded are Brinkman's opinions that (1) the Facility is the source of ambient air contamination in the Subdivision; (2) vapor intrusion has contaminated the Subdivision; (3) the Facility is responsible for the contamination in the Subdivision; (4) BTEX has traveled from the Facility to the Subdivision; (5) groundwater generally flows from the BCDA proper to the Subdivision; (6) the Facility dumped waste outside the BCDA proper at locations other than the sites identified at the border of the PCA and IP Properties; and (7) a leaking gasoline tank may have pushed the groundwater flow from the Facility into the Subdivision.

VI Simonton Opinions

The Meritor Defendants' motion regarding Simonton seeks exclusion of the following opinions: (1) there was a "trespass" of contaminants in the Subdivision; (2) contamination from

²³ See Doc. #569-7 at 16.

the BCDA is a “known and continuing source” of contamination in the Subdivision; (3) waste from the Facility was dumped in the MLRA outside the BCDA; (4) there was a completed vapor intrusion pathway into the neighborhood; (5) “[n]o other commercial or industrial activity capable of generating the contamination exists within or by the Subdivision;” and (6) a remediation plan to remove the contamination would cost approximately \$142.9 million.

A. Property-by-Property Analysis

As quoted above, the Groundwater Report includes the conclusions that “Contaminated air, subsurface vapor and/or groundwater exist on all properties within the Subdivision” and that “[t]he entire area of the Subdivision is underlain by contaminated groundwater.” Doc. #569-1 at 16. Simonton testified that in forming opinions regarding contamination in the Subdivision, he did not consider individual properties but employed a “holistic approach.” Doc. #571-2 at 115. The Meritor Defendants argue Simonton’s “composite approach,” which looked only at the Subdivision as a whole, is contrary to Mississippi law, which requires that a plaintiff asserting a trespass claim assert an “individualized injury to the property” Doc. #572 at 22. This Court disagrees.

The Meritor Defendants are correct that under Mississippi law, when a “claimant alleges trespass as a result of chemical discharges, the burden lies with the claimant to prove an actual physical invasion of the subject property.” *Prescott v. Leaf River Forest Prods., Inc.*, 740 So.2d 301, 310 (Miss. 1999). However, it does not follow from this proposition of law—which refers to a plaintiff’s burden of proof and not the reliability of any particular expert method—that an expert must conduct a property-by-property inquiry to determine that all properties in an area are contaminated. Put differently, Mississippi law speaks to *what* a plaintiff must prove, not *how* he must prove it. Accordingly, so long as Simonton employed a reliable method for determining the

contamination of all properties, his failure to sample each property does not render his opinion unreliable.

Simonton submitted an affidavit which includes an analysis finding contamination on each individual property based on contour lines drawn from various testing sites throughout the Subdivision. However, this portion of his affidavit was stricken as an improper new opinion. Without this stricken analysis, there is no evidence in the Groundwater Report or from Simonton's deposition how Simonton employed his "holistic" approach to determine that each property of each plaintiff is contaminated or that his method for reaching this conclusion is in any way reliable.²⁴ In the absence of such evidence, Simonton's conclusions regarding the presence of contamination on the plaintiffs' individual properties are properly excluded.

B. Location of Dumping

Simonton testified during his deposition that the Meritor Defendants were "dumping" contaminants along Moose Lodge Road "all over hell's creation and back." Doc. #571-2 at 69. Simonton explained that he reached this conclusion based on his consideration of the deposition testimony of Theo Berry, a former employee at the Facility; that the defendants admitted to dumping in the "16 section;" and that the defendants have "taken responsibility" for the MLRA. *Id.* at 69–70. In a non-stricken portion of his affidavit, Simonton clarified that his opinion regarding dumping outside the BCDA proper was informed by undisputed dumping on "the 16th section land near the Grenada Lake," and the deposition testimony of Jerry Williams, who testified that during his employment with the Facility, he dumped waste in a spot outside the BCDA "where

²⁴ The Meritor Defendants did not expressly argue a lack of reliability. However, "[a]s numerous courts have recognized, while no party has raised any *Daubert* challenges, the court has authority to raise its concerns *sua sponte* to fulfill its unique gatekeeping function and ensure the integrity of the judicial process." *Graham v. Dallas Area Rapid Transit*, 288 F.Supp.3d 711,729 n.9 (N.D. Tex. 2017) (collecting cases).

high concentrations were found corroborating Williams['] testimony ... and field verified by a vice president of the Defendant.” Doc. #636-21 at 9–10.

The Meritor Defendants contend that the opinion regarding dumping “all over hell’s creation and back” should be excluded because it is “unscientific in the extreme” and based on a “fictitious set of facts.” Doc. #572 at 23. They further argue that “[t]he theory that Defendants disposed of waste elsewhere in the MLRA besides the BCDA, and that this contributes to the groundwater plume extending to the Subdivision, flies in the face of facts.” *Id.* at 14. Thus, the Meritor Defendants appear to raise two arguments regarding Simonton’s opinion on dumping locations. First, they challenge his specific opinion that the Meritor Defendants were dumping “all over hell’s creation and back.” Second, they challenge the underlying opinion that the Meritor Defendants were dumping beyond the area outside the BCDA.

To be admissible, an expert opinion must “assist the trier of fact to determine a fact in issue.” *Barefoot v. Weyerhaeuser NR Co.*, 729 F. App’x 300, 303 (5th Cir. 2018). In this regard, “[a] trial court may exclude expert testimony that is imprecise and unspecific or whose factual basis is not adequately explained.” *Smith v. Johnson & Johnson*, No. 3:08-cv-245, 2011 WL 3876997, at *6 (S.D. Miss. Aug. 31, 2011) (quoting *S. Grouts & Mortars v. 3m Co.*, 575 F.3d 1235, 1245 (11th Cir. 2009)). Simonton’s opinion that the Meritor Defendants were dumping “all over hell’s creation and back,” which clearly was not intended as a literal statement, is both imprecise and unspecific, and is therefore properly excluded as unhelpful to the jury.

To the extent Simonton opines the Meritor Defendants’ disposed of waste north of the official BCDA, the Court, for the reasons discussed in the section addressing Brinkman’s opinion on the same subject, concludes the opinion is reliable to the extent it refers to dumpsites at the

border of the IP and PCA properties but is unreliable to the extent it refers to other possible release areas.

C. Groundwater Flow Direction

The Meritor Defendants argue that “Simonton has no explanation, based on his consideration of groundwater flow direction, for how groundwater contamination could get from the BCDA to the Subdivision, far to the northwest” and that, accordingly, such conclusion should be excluded as failing to fit the facts of the case. Doc. #572 at 23. More broadly, they fault Simonton for failing “to carry out any fate and transport modeling as to groundwater flow.” *Id.* at 25.

In his affidavit, Simonton, like Brinkman, clarified that the statements about groundwater flow were not referring to the BCDA specifically but to the “disposal area” in the MLRA generally. *See* Doc. #636-21 at 7. For the reasons discussed in the section addressing Brinkman’s opinions on the same subject, the Court concludes the groundwater flow opinion is reliable to the extent it is limited to the disposal sites located near the border of the PCA Property and IP Property.

D. Vapor Intrusion Pathway

The phrase “vapor intrusion” refers to the contamination of structures by vapors emanating from a subsurface source such as groundwater. Doc. #571-2 at 37. The route taken from the source of contamination to the structure is known as a “pathway.” *Id.* at 101.

In this case, the Groundwater Report opines that “contamination has migrated through ... soil vapor ... into the homes” of Eastern Heights. During his deposition, Simonton testified that he did not perform vapor intrusion modeling but that “you can recognize the pathway. It ... establishes itself. If you’ve got a volatile organic compound in groundwater, then the pathway already exists.” *Id.* Later, Simonton offered a slightly different method for establishing a pathway

when he testified that a pathway exists if volatile organic compounds exist in the subsurface and there is “no mechanism to keep those contaminants from migrating from the subsurface into the home.” *Id.* at 112. With regard to geologic conditions, Simonton testified that “generally” geologic conditions would slow but not prevent the migration of subsurface vapors to the surface. *Id.* at 102. However, Simonton conceded that certain conditions could completely prevent migration. *Id.* Finally, Simonton explained that in determining the existence of pathways, “we don’t look at houses individually. That’s not how it’s done.” *Id.* at 117. Simonton concluded that pathways into the plaintiffs’ homes exist because “[w]e have volatile organic compounds [and] no mechanism to interrupt the pathway.” *Id.* at 112.

The Meritor Defendants argue this conclusion regarding the existence of vapor intrusion is unreliable because it is not based on scientific methods. Doc. #572 at 12–15. Specifically, they contend Simonton performed no analysis to establish the existence of a pathway between the contaminated groundwater beneath the neighborhood and each home. *Id.* They also argue Simonton ignored the EPA’s conclusion that the Subdivision sits on top of an “8 to 12-foot silty clay layer [which] appears to be preventing TCE vapors from coming up into the homes.” *Id.* at 14 (quoting Doc. #572-4)). According to the Meritor Defendants, Simonton’s holistic approach conflicts with guidance from the EPA which directs that a vapor intrusion pathway inquiry focus on particular structures. Doc. #572 at 12–15. In this regard, they point to the expert report of their vapor intrusion expert Ranjit Machado, which states:

According to the USEPA, the vapor intrusion pathway is considered “complete” if:

1. A subsurface source of vapor-forming chemicals is present (e.g., in the soil or in groundwater) underneath or near the building(s);
2. Vapors form and have a route along which to migrate (be transported) toward the building(s);

3. The building(s) is(are) susceptible to soil gas entry, which means openings exist for the vapors to enter the building and driving ‘forces’ exist to draw the vapors from the subsurface through the openings into the building(s);
4. One or more vapor-forming chemicals comprising the subsurface vapor source(s) is (or are) also present in the indoor environment; and
5. The building(s) is (or are) occupied by one or more individuals when the vapor-forming chemical(s) is (or are) present indoors.

Doc. #571-6 at 7–8 (emphases and footnote omitted) (citing U.S. Env'tl. Protection Agency, Office of Solid Waste and Emergency Response, OSWER Technical Guide for Assessing & Mitigating the Vapor Intrusion Pathway from Subsurface Vapor Sources to Indoor Air, OSWER Publication 9200.2-154 (2015)).

As an initial matter, there is no indication the EPA’s guidance, which requires a building-specific evaluation of susceptibility to vapor intrusion, represents the exclusive method for determining the existence of a vapor intrusion pathway. However, Simonton himself conceded that evaluation of a pathway should involve consideration of mechanisms preventing migration of pathways. Furthermore, neither the plaintiffs nor Simonton have pointed this Court to *any* evidence or authority which would support a finding that the existence of a pathway into a building may be determined without looking at the specific building’s amenability to intrusion. Accordingly, the Court must conclude that Simonton’s method for determining pathways is unreliable. *See Baker v. Chevron U.S.A., Inc.*, 533 F. App’x 509, 523–24 (6th Cir. 2013) (excluding under *Daubert* expert testimony that “the mere presence of benzene, toluene, xylene, and ethyl benzene in varying concentrations in the soils ... could only have originated from the plume”). Having reached this conclusion, the Court need not consider whether Simonton adequately accounted for the silty clay layer identified by the EPA.

E. Responsibility for Contamination

The Meritor Defendants argue the Groundwater Report's attribution to the Facility of responsibility for contamination should be excluded because Simonton failed to adequately account for "several alternatives, including contamination sourced from the Railyard/Stoneyard and Kirk/PCA properties." Doc. #572 at 26. For the reasons above, the Court concludes the activities on these properties represent obvious alternative explanations for the observed contamination. Accordingly, the question becomes whether Simonton adequately accounted for them.

The Groundwater Report offers opinions that the defendants are (or were) contributing sources of pollution and opinions that the defendants are the sole cause of the contamination. In support of these conclusions, and despite hotspots of pollution recognized in his report, Simonton, like Brinkman, testified that he took no steps to investigate the history of any of the surrounding properties.²⁵ Doc. #571-2 at 258. As it was with Brinkman, this is insufficient under *Daubert* and Rule 702. Simonton's opinions on the responsibility for groundwater contamination must be excluded.

F. Remediation Plan

As they did regarding Brinkman, the Meritor Defendants argue the remediation plan is "irrelevant" because the "EPA would never approve, let alone mandate such a solution" Doc. #572 at 22. The plaintiffs again respond that the remediation plan is offered to establish the restoration cost for the various properties, which is a consideration for damages under Mississippi

²⁵ Simonton testified that "[t]here is nothing in the record database" regarding potential sources and that there "is eyewitnesses that say nobody else was dumping [along Moose Lodge Road]." Doc. #571-2 at 68-69.

law. Doc. #636 at 24–25. For the same reasons discussed above, the remediation plan is relevant to the extent the plaintiffs intend to offer it.

G. BTEX Contamination from Leaky Gas Tank

Finally, the Meritor Defendants challenge as untimely and unreliable Simonton’s opinion that a leaky gas tank on the Facility property caused BTEX contamination in the Subdivision. Doc. #572 at 6, 17 n.8. The plaintiffs did not respond to these arguments and the Court declines to do so on their behalf. Accordingly, the motion to exclude will be granted as to Simonton’s opinion regarding the leaky gas tank.

H. Summary

In sum, excluded are Simonton’s opinions that (1) the plaintiffs’ individual properties are contaminated; (2) groundwater flows from the BCDA proper to the Subdivision; (3) the Facility dumped waste outside the BCDA proper at locations other than the sites identified at the border of the PCA and IP Properties; (4) the buildings in the Subdivision are contaminated by vapor intrusion; (5) the Facility is responsible for the contamination in the Subdivision; and (6) a leaky gas tank caused contamination in the Subdivision.

VII **Jenkins Opinions**

The Meritor Defendants seek exclusion of Jenkins’ opinions that (1) contamination flowed from the MLRA disposal area to the Subdivision; (2) the remediation plan proposed in the Groundwater Report is appropriate; (3) the Facility is responsible for the contamination in the Subdivision; and (4) the equalization lagoon caused groundwater to flow north from the Facility into the Subdivision. Doc. #579 at 25–26.

A. Failure to Account for Obvious Alternative Explanations

As with Simonton and Brinkman, the Meritor Defendants argue that Jenkins' opinion that the Facility is responsible for the contamination in the Subdivision is unreliable because he failed to account for the obvious alternative explanations of industrial activity on nearby properties. Because this Court has already concluded the nearby properties represent obvious alternative explanations, the question becomes whether Jenkins adequately considered these sources in developing his opinion.

During his deposition, Jenkins was asked what steps he took to determine "whether there were other commercial industrial activity capable of generating the contamination." Doc. #578-2 at 126. Jenkins responded, "I examined both air photos and drove through the neighborhood. I saw no signs of any kind of commercial activity, no sign of any kind of industrial activity within the neighborhood." *Id.* When shown photos of commercial facilities on the Kirk Property, Jenkins testified that he undertook no investigation to determine whether the activities on the Kirk Property could have led to contamination. *Id.* at 127. Thus, Jenkins conceded that the opinion regarding the absence of other commercial activity in the area probably went "a little too far." *Id.* Accordingly, it seems clear that Jenkins, like Simonton and Brinkman, made no effort to address obvious alternative explanations. His failure to do so renders inadmissible his opinion on responsibility for the contamination.

B. Groundwater Flow Methodology

The Meritor Defendants argue, "Jenkins failed to carry out any modeling to substantiate the speculative hypothesis in the Report that purported leakage from the EQ Lagoon may have driven contamination towards the Subdivision, and failed to apply the capability of the G-Flow program to test that theory." Doc. #579 at 22. In response, the plaintiffs argue a model was

unnecessary because “Jenkins and his co-authors relied on the clear evidence that the soil beneath the EQ lagoon, in its current state, is contaminated, coupled with historic (actual not modeled) groundwater flow[] maps that show a clear pattern of flow from the EQ lagoon to Eastern Heights”²⁶ Doc. #628 at 18. As support for this statement, the plaintiffs cite a groundwater contour map from February 2008 showing a groundwater flow from the Facility north into the Subdivision. *Id.* at 19.

The plaintiffs, however, have offered no evidence that contamination near the lagoon combined with a single contour map is a reliable methodology for the opinion regarding the flow of water from the lagoon. Even had they made such a showing, there is no indication Jenkins himself utilized the method. Indeed, Jenkins’ affidavit, which states that “there was no need to model the performance of the Equalization Lagoon in order to design and model the protective remedial measures considered,” suggests that Jenkins was not involved in the conclusion regarding flow from the Lagoon. Accordingly, Jenkins is precluded from offering the opinion.

C. Groundwater Flow Opinions

As with Jenkins and Simonton, the Meritor Defendants argue Jenkins cannot testify that groundwater tends to flow from the disposal area because this opinion conflicts with the facts that show groundwater from the BCDA flows away from the Subdivision. Doc. #579 at 22. They also contend Jenkins was aware of no data showing that groundwater flowed directly from the Facility to the Subdivision. *Id.* The Meritor Defendants further argue the opinion is unreliable insofar as it did not rely on fate and transport modeling. *Id.* at 25. The plaintiffs respond that modeling was unnecessary because contour maps showed the actual flow of groundwater.

²⁶ The plaintiffs also cite other evidence supporting the argument that the EQ lagoon was the source of contamination in the Subdivision. *See* Doc. #628 at 17–19. This evidence has no bearing on the actual methodology employed by Jenkins.

With respect to flow from the Facility, Jenkins testified unequivocally he was unaware of any data which showed a groundwater flow from the Facility to the Subdivision. Doc. #578-2 at 72. Additionally, he specified he did not attempt to refine the groundwater flow analysis under the Facility because his “area of interest was in the Eastern Heights subdivision, not the plant itself.” *Id.* Insofar as it appears Jenkins was uninvolved in developing the opinions regarding flow from the Facility, he will not be permitted to testify on this issue.

With respect to the flow from the “disposal area,” this Court again concludes that the opinion regarding groundwater flow is reliable to the extent it refers to the dumpsite near the Williams Circle, and is unreliable to the extent it refers to other locations.

D. Remediation Plan

The Meritor Defendants argue Jenkins’ opinion regarding the appropriateness of the remediation plan proposed in the Groundwater Report is unreliable because the EPA would never approve the plan and because Jenkins, in formulating the plan, incorrectly assumed that the entire Subdivision is underlain by contaminated groundwater and that the “pump and treat” procedure included in the plan would cause TCE concentration to decrease by one-half every four years. Doc. #579 at 16–18, 22–23. The Meritor Defendants further contend that even if the assumption regarding TCE deterioration is correct, pumping is unnecessary because natural degradation would have the same impact. *Id.* at 18. The plaintiffs respond that the EPA’s approval of the plan is uncertain and that even if it was not, it would not matter because the relevancy of the plan is to show “the cost of restoration far exceeds the costs of relocating the Plaintiffs’ property.” Doc. #628 at 21–24. The plaintiffs did not respond to the argument regarding Jenkins’ assumptions.

For the reasons above, the Court rejects the Meritor Defendants’ argument regarding the EPA’s approval.

With regard to the assumptions, an expert's incorrect assumptions may create an "analytical gap between the data and the opinion proffered" sufficient to justify exclusion. *Berk v. St. Vincent's Hosp. & Med. Ctr.*, 380 F.Supp.2d 334, 350 (S.D.N.Y. 2005); see *LVL XIII Brands, Inc. v. Louis Vuitton Malletier S.A.*, 209 F.Supp.3d 612, 641 (S.D.N.Y. 2016). However, not all incorrect assumptions mandate exclusion. See *Rosenfeld v. Oceania Cruises, Inc.*, 654 F.3d 1190, 1194 (11th Cir. 2011) (finding "based on the facts of this case" that slip and fall expert's incorrect assumption about location of fall was proper subject for cross examination). Rather, an incorrect assumption will require exclusion only when a court "cannot fairly infer" that the expert would have reached the same opinion without the inaccurate assumption. *Berk*, 380 F.Supp.2d at 353.

First, the Court concludes that Jenkins' opinion regarding the decrease of TCE concentrations is not an incorrect assumption. Jenkins testified he based this opinion on "publications that give summaries of TCE degradation rates at other sources" and his observation that TCE in certain wells at the Grenada site show "contaminant concentrations [which] appear to be declining at a rate that resembles a four year half life." Doc. #578-2 at 184-85. The Meritor Defendants have offered no evidence to contradict this assumption. Furthermore, to the extent they argue the pumps are unnecessary to the remediation efforts, they offer no argument or authority which would justify exclusion under *Daubert* on such grounds.

With respect to the prevalence of contaminated groundwater, Jenkins testified that he assumed full contamination "simply ... for purposes of maximizing or estimating the maximum flow that would go to the treatment plan." Doc. #578-2 at 183-84. Given the limited purpose of the assumption, the Court can fairly infer that Jenkins would have reached the same conclusion about the appropriateness of the remediation plan had he used the correct information. Accordingly, the incorrect assumptions, to the extent they exist, do not require exclusion.

E. Summary

In sum, excluded are Jenkins' opinions that (1) groundwater flows from the BCDA proper to the Subdivision; (2) the Facility dumped waste outside the BCDA proper at locations other than the sites identified at the border of the PCA and IP Properties; (3) the Facility is responsible for the contamination in the Subdivision; and (4) the equalization lagoon may have driven groundwater flow north from the Facility into the Subdivision.

VIII

Textron's Motion to Exclude Groundwater Experts

Textron seeks exclusion of two opinions by the Groundwater Experts: (1) that groundwater might have flowed north from the Facility; and (2) that contaminants might have moved from the upper aquifer to the regional aquifer. Doc. #588 at 8–15.

A. Northerly Groundwater Flow from Facility

Although framed as a single challenge, Textron's motion actually challenges three separate opinions: (1) that water flowed north from the Facility into the Subdivision; (2) that the northward flow was caused by contamination in the groundwater; and (3) that TCE contamination in the Subdivision was caused by TCE from the Facility. Doc. #588 at 14–16.

As explained above, evidence of a northward flow from the Facility is supported by a 2008 contour map considered by Brinkman. However, there is no evidence linking this specific directional flow to the equalization lagoon. Accordingly, the Court concludes that, while Brinkman may testify that, at one point, groundwater flowed from the Facility into the Subdivision, no expert may testify that this northerly flow was caused by contamination in the lagoon. With regard to the actual opinion that TCE in the Subdivision is attributable to TCE from the Facility, the plaintiffs cite various items of evidence as proof that the Facility caused the contamination. Doc. #629 at 8–10. However, they offer no evidence as to the specific methodology applied by

any of the Groundwater Experts which would support this conclusion. Under these circumstances, exclusion is appropriate.

B. Movement from Upper Aquifer to Regional Aquifer

The Groundwater Report contains the opinion that “TCE is heavier than water and can penetrate clay layers, which threatens the water quality in the regional aquifer.” Doc. #588-1 at 4.

The report also opines:

[S]ome groundwater may flow from the deep zone of the upper aquifer into the underlying Regional Aquifer. Downward flow may occur through natural breaks in the “Marl Clay” layer shown in Figure 4 or where large concentrations of cVOCs accumulate on the top of the “Marl Clay” layer forming a Dense Non-Aqueous Phase Liquid (DNAPL) also shown in Figure 4. Because these liquids are non-aqueous (waterless), they can desiccate (dry and shrink) clay materials allowing the heavy liquid to flow downward through the shrinkage cracks. The possibility of downward movement of DNAPL below the uppermost aquifer into the underlying clay and regional aquifer has not been investigated by the responsible parties.

Id. at 8. Textron argues these opinions are untested, would not help the jury, and are otherwise irrelevant to the plaintiffs’ claims. Doc. #588 at 13–16.

“[E]xpert testimony must be relevant, not simply in the sense that all testimony must be relevant, but also in the sense that the expert’s proposed opinion would assist the trier of fact to understand or determine a fact in issue.” *Bocanegra v. Vicmar Servs., Inc.*, 320 F.3d 581, 584 (5th Cir. 2003). As explained above, expert testimony is unhelpful when it is imprecise or unscientific. In this regard, expert testimony regarding the potential of a future event is excludable when the expert is unable to opine on the likelihood or severity of the future event. *See Taylor v. Consol. Rail Corp.*, 114 F.3d 1189, 1997 WL 321142, at *7 (6th Cir. June 11, 1997) (unpublished decision) (district court did not err in excluding opinion of future condition where “there was no evidence that this condition would likely occur and no evidence whatsoever as to what the effects of that condition would be”).

Here, the opinions in the Groundwater Report regarding the possibility of future regional aquifer contamination are wholly imprecise and unscientific. The opinions reflect no conclusions on the likelihood of the future contamination, the severity of the future contamination, or when such contamination would occur. Given these deficiencies, the opinions would be unhelpful to the jury and are properly excluded.

IX **Motion to Exclude Fineis**

Textron seeks exclusion of Fineis' opinions that (1) there is vapor intrusion on the plaintiffs' properties; (2) the Facility is responsible for the pollution in the Subdivision; and (3) the chemicals in the Subdivision create a risk to residents. *See* Doc. #584.

A. Vapor Intrusion

As quoted above, Fineis concluded there is a soil to gas vapor intrusion pathway for the nineteen homes evaluated in his report. Textron argues the vapor intrusion pathway opinions should be excluded because Fineis used an unreliable methodology in creating his report and because Fineis abandoned these opinions by testifying that his results are incorrect. *Id.* at 13–20. In response, the plaintiffs raise a number of arguments not implicated by Textron's motion, such as relevance, prejudice, and general factual support for the challenged opinions. *See* Doc. #626. With regard to Textron's actual arguments, the plaintiffs do not dispute that Fineis abandoned his opinions on vapor intrusion but argue that the underlying data he collected is otherwise reliable and admissible. Doc. #626 at 10.

An opinion which has been disclaimed or abandoned by an expert is, of course, unreliable. *See Accident Ins. Co. v. Classic Bldg. Design, LLC*, No. 2:11-cv-33, 2012 WL 3913090, at *13 (S.D. Miss. Sep. 7, 2012) (“[T]his Court will not set a precedent by accepting an opinion in an expert's report that the expert later abandoned at deposition and acknowledged should have been

changed.”) (quotation marks omitted); *Monje v. Spin Master Inc.*, No. cv-09-1713, 2015 WL 11117070, at *1 (D. Ariz. May 6, 2015) (“The Court sees no way an opinion that an expert so unambiguously abandons can provide the degree of reliability that the Federal Rules of Evidence require.”). During his testimony, Fineis testified that were a completed vapor intrusion pathway to exist for the tested homes, the pathway would come from the sub-slab. Doc. #584-2 at 199. However, he also testified that, due to an absence of necessary data, he could not render an opinion of a completed pathway for any home in the subdivision from the sub-slab to the indoor air. *Id.* at 201. Given this testimony, the Court concludes Fineis’ ultimate opinions on vapor intrusion are unreliable and must be excluded.

The Court then must next decide whether Fineis’ testing results, as distinct from his ultimate opinions, are nonetheless admissible. To this end, the plaintiffs argue:

Mr. Fineis’s testimony will verify the methodology of this testing and an analysis of what chemical existed at the time of testing in homes, under the slabs, in the soil gas and in the outdoor air. The testimony will verify the levels of the chemicals found in the tests and how such chemical levels compare with the published Health Based Risk Guidelines. The types of chemicals found and the levels of the chemicals in the home, slabs and soil are necessary for the trier of fact to evaluate the Grenada Neighborhood.

Doc. #626 at 2–3. Textron argues Fineis’ test results should be excluded because “it is the use of unsound test methodology that has led Fineis to where he is now” and because “[t]est results showing the *presence* of contamination on some property does not provide any evidence that conduct by Textron (or any other defendant) *caused* that contamination.” Doc. #696 at 3.

With regard to Fineis’ sampling methodology, Textron argues Fineis ignored industry guidance by failing to collect soil gas samples from near the alleged source of contamination and by failing to collect shallow soil gas samples from a depth of five feet or more. Doc. #584 at 17. In response, Fineis contends he was unable to gain access to the Facility site to perform the near-

source sampling and that “[t]he shallow groundwater table required an adjust . . . in order to prevent the collection of water instead of gas, which would void the sample collected . . .” Doc. #626-2 at 4. Fineis thus states that he “conducted all testing within the guidelines of applicable standards for soil gas, sub slab, indoor air, and ambient testing.” *Id.* In light of this unchallenged evidence, the Court concludes that Fineis’ sampling methodology is reliable.

With regard to the relevance of the information, the Court agrees with Textron that testimony of causation alone does not prove liability on the part of any of the defendants. However, there is no admissibility requirement for expert testimony (or any evidence) that a given piece of evidence be case dispositive on its own. To the contrary, evidence need only have a tendency to make a material fact more or less probable. Fed. R. Evid. 401. Similarly, an expert may testify in the form of an opinion if, among other requirements, the testimony would “help the trier of fact to understand the evidence or to determine a fact in issue . . .” Fed. R. Evid. 702(a). Because there is no dispute that Fineis’ testimony relates to the presence of contamination in the Subdivision—an issue indisputably material to this action—the Court concludes that its inability to independently establish liability does not require exclusion.

B. Responsibility for Contamination in Subdivision

Textron argues Fineis’ opinion regarding the source of contamination in the Subdivision must be excluded because he testified that he performed no source identification. Doc. #584 at 20–21. The plaintiffs did not respond to this argument. In the absence of any evidence that Fineis’ source opinion was based on sound methodology, such opinion must be excluded.

C. Risk to Residents

Finally, Textron argues that Fineis is unqualified to opine on the risks, if any, the chemicals in the Subdivision pose to the Subdivision’s residents and that even if he was qualified, he

employed unreliable methodologies to come to his conclusion. Doc. #584 at 22–24. The plaintiffs did not respond to this argument. And, in his affidavit Fineis makes clear that he “was not hired to opine, nor am I qualified to testify to the toxicology effects of the contaminants on humans or the environment.” Doc. #626-2 at 5. Insofar as there is no dispute Fineis is unqualified to opine on the health risks of contamination, Fineis’ opinions on risk to the residents of the Subdivision will be excluded.

D. Summary

In sum, excluded are Fineis’ opinions that (1) the buildings in the Subdivision are contaminated by vapor intrusion; (2) the Facility is responsible for contamination in the Subdivision; and (3) the contamination in the Subdivision poses a risk to the residents.

IX **Conclusion**

In accordance with the rulings above, the motion to strike [700] and the motions to exclude [569][571][578][583][585], including the relevant joinders [593][594] are **GRANTED in Part and DENIED in Part**.

SO ORDERED, this 11th day of February, 2019.

/s/Debra M. Brown
UNITED STATES DISTRICT JUDGE