BEFORE THE ENVIRONMENTAL APPEALS BOARD
UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C.

In the Matter of:	)	
Jordan Development Co., LLC,	)	**Appeal Nos. UIC 18-06**
Traverse City, Michigan,	)	**UIC 18-07**
Grove #13-11 SWD,	)	**UIC 18-08**
Permit No. MI-051-2D-0031	)	**UIC 18-09**
	)	

RESPONSE TO PETITIONS FOR REVIEW

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STATEMENT OF COMPLIANCE WITH WORD LIMITATION

This response brief complies with the 17,000-word limitation at *In re Jordan Development Co., LLC*, UIC Appeal Nos. 18-06 *et seq.* (EAB March 6, 2019) (Order Granting Request for Exceedance of Word Limitations). *See also* 40 C.F.R. § 124.19(d)(3).

INTRODUCTION

Pursuant to 40 C.F.R. § 124.19(b), the United States Environmental Protection Agency, Region 5 ("Region 5") hereby responds to the Petitions for Review ("Petitions") in the following UIC Appeal Nos.:

1) 18-06, by Emerson J. Addison, received by the Environmental Appeals Board ("Board") on November 23, 2018. UIC Appeal Nos. 18-06 *et seq.*, Filing #2 ("Addison Petition"). [1]

2) 18-07, by Ronald J. Kruske, D.D.S., received by the Board on November 25, 2018. UIC Appeal Nos. 18-06 *et seq.*, Filing #6 ("Ronald Kruske Petition").

3) 18-08, by Amy Kruske, received by the Board on November 25, 2018. UIC Appeal Nos. 18-06 *et seq.*, Filing #5 ("Amy Kruske Petition").

4) 18-09, by Jennifer L. Springstead, received by the Board on November 28, 2018. UIC Appeal Nos. 18-06 *et seq.*, Filing #7 ("Springstead Petition").

Each Petition seeks review, pursuant to 40 C.F.R. § 124.19, of an October 23, 2018 final permit (Permit No. MI-051-2D-0031, or "Permit") that Region 5 issued pursuant to the Underground Injection Control ("UIC") Program, Part C of the Safe Water Drinking Act ("SDWA"), 42 U.S.C. §§ 300h – 300h-8, and the regulations at 40 C.F.R. Parts 124 and 144–147, to Jordan Development Co., LLC, Traverse City, Michigan ("Permittee") for a UIC Class II well known as the "Grove #13-11" well ("Grove #13-11 well") to be constructed and operated in Gladwin County, Michigan.

The Board should deny the Petitions for the following reasons. First, Petitioners fail to

[1] Petitioners Addison, Ronald Kruske and Amy Kruske each submitted two Petitions. In this brief, Region 5 uses the date of the most recent Petition that each Petitioner filed.

meet the threshold procedural requirements at 40 C.F.R. §§ 124.13 and 124.19(a)(4)(ii), because Petitioners fail to demonstrate that the issues challenged were raised during the comment periods or that Region 5's responses to such issues are clearly erroneous or otherwise warrant review. Second, Petitioners impermissibly raise some of their arguments and introduce some documents for the first time in the Petitions, depriving Region 5 of any opportunity to have specifically responded to such arguments in making its decision. Third, Petitioners' arguments lack substantive merit, as Region 5 has explained the basis for its conclusions in the record – supporting its permitting decision. In many cases, Petitioners fail to address or even acknowledge such explanations, simply repeating their disagreement with Region 5's decision and thus failing to meet their burden to demonstrate that Region 5's conclusions are clearly erroneous or otherwise warrant review.

STATUTORY AND REGULATORY BACKGROUND

Congress enacted the SDWA in 1974 to ensure that the Nation's sources of drinking water are protected against contamination and "to prevent underground injection which endangers drinking water sources." 43 U.S.C. § 300h(b). Part C of the SDWA, 42 U.S.C. §§ 300h to 300h-8, is designed to protect underground sources of drinking water ("USDWs") from contamination caused by the underground injection of fluids. Among other things, the SDWA directed EPA to promulgate permit regulations containing minimum requirements for State UIC programs. 42 U.S.C. § 300h. EPA's regulations implementing the UIC program are at 40 C.F.R. Parts 144-147. Part 144 establishes the regulatory framework, including permitting requirements, for EPA-administered UIC programs. Part 146 sets out technical criteria and standards that must be met in permits. Procedural requirements applicable to UIC permits are at 40 C.F.R. Part 124.

The UIC regulations classify wells into six classes. *See* 40 C.F.R. §§ 144.6 and 146.5. The permit at issue in this appeal is for a Class II well. A "Class II" well is defined as:

> "Wells which inject fluids: (1) Which are brought to the surface in connection with natural gas storage operations, or conventional oil or natural gas production and may be commingled with waste waters from gas plants which are an integral part of production operations, unless those waters are classified as a hazardous waste at the time of injection. (2) For enhanced recovery of oil or natural gas; and, (3) For storage of hydrocarbons which are liquid at standard temperature and pressure." [*Id.*]

Region 5 has responsibility for administering the UIC permit program in the State of Michigan.[2] 40 C.F.R. § 147.1151.

FACTUAL AND PROCEDURAL BACKGROUND

On June 13, 2017, Region 5 received a UIC permit application from the Permittee, dated June 7, 2017, to construct and operate the Grove #13-11 well in Gladwin County, Michigan, for non-commercial disposal of brine from Permittee's production wells. Att. B-1. On September 15, 2017, Region 5 issued a draft permit for the Grove #13-11 well, with Permit No. MI-051-2D-0031 ("Grove #13-11 draft permit"). Att. B-2. Public comment periods for the Grove #13-11 draft permit ran from September 28 through October 31, 2017 and from May 15 through June 22, 2018 and included a public hearing on June 19, 2018. Att. B-3; and UIC Appeal Nos. 18-06 *et seq.*, Filing #10, Att. 3. Including comments made at the public hearing, Region 5 received over

[2] The SDWA directed EPA to promulgate regulations establishing minimum requirements for states to administer their own UIC programs, subject to EPA approval. 42 U.S.C. §§ 300h(a), 300h-1(b). If a state did not apply for approval to administer its own UIC program, or applied but did not receive EPA approval, then EPA was required to implement UIC regulations for that state. 42 U.S.C. § 300h-1(c); 40 C.F.R. § 144.1(e). The State of Michigan has not been approved to administer its own UIC permit program. Thus, Region 5 administers Michigan's UIC program. *See* 40 C.F.R. § 147.1151.

150 written and oral comments regarding the Grove #13-11 well. *See* certified Administrative Record, App. A.

On October 23, 2018, Region 5 issued 1) a final permit for the Grove #13-11 well, Permit No. MI-051-2D-0031, with an effective date of December 10, 2018 ("Permit"); and 2) a Response to Comments ("RTC") addressing public comments regarding the Grove #13-11 draft permit. UIC Appeal Nos. 18-06 *et seq.*, Filing #10, Atts. 1 (Permit) and 2 (RTC). Region 5 mailed a notice of the Permit; the Permit; and the RTC, to Petitioners and to all other persons who had provided Region 5 with comments or participated in the public hearing, as well as to State and federal officials. Att. B-4; *see also* 40 C.F.R. § 124.15(a). Petitioners then filed their respective Petitions, as described in the Introduction, above. Pursuant to the Board's order at *In re Jordan Development Co., LLC*, UIC Appeal Nos. 18-06 *et seq.* (EAB Feb. 5, 2019) (Order Granting Motion for Extension of Time to File Response), Region 5's response to the Petitions is due on or before March 13, 2019.

STANDARD OF REVIEW

40 C.F.R. § 124.19 governs the standard of review for appeal of a permit issued under 40 C.F.R. Part 124. The Board has the discretion either to grant or deny review of a permit decision. *See In re Avenal Power Ctr., LLC*, 15 E.A.D. 384, 394 (EAB 2011) slip op. at 14-15 (EAB Aug. 18, 2011). In considering a petition for review filed under 40 C.F.R. § 124.19, the Board must first evaluate whether the petitioner has met certain threshold requirements of the applicable regulations such as "timeliness, standing, issue preservation and specificity." 40

C.F.R. § 124.19(a)(2) – (4); *see also In re Seneca Resources Corp.*, 16 E.A.D. 411, 412 (EAB 2014) (citing *In re Indeck-Elwood, LLC*, 13 E.A.D. 126, 143 (EAB 2006)).[3]

The Petitioner has the burden of demonstrating that review by the Board is warranted. *In re City of Palmdale,* 15 E.A.D. 700, 705 (EAB 2012). To satisfy this burden, petitioners must meet their threshold pleading requirements. *See In re West Bay Exploration Co.,* UIC Appeal Nos. 14-66 and 14-67, 2014 EPA App. LEXIS 25, *2-*3 (EAB July 3, 2014); *In re Seneca Resources Corp.*, 16 E.A.D. at 412; *In re Cherry Berry B1-25 SWD,* UIC Appeal No. 09-02, 2010 EPA App. LEXIS 33, *2 (EAB Aug. 13, 2010), (quoting *In re Beeland Group, LLC,* 14 E.A.D. at 194-195). If the Board finds that a petitioner has failed to meet a threshold pleading requirement, the Board "typically denies or dismisses the petition for review." *In re Seneca Resources Corp.*, 16 E.A.D. at 412 (citations omitted). The Board "has frequently dismissed petitions that failed to meet these standards." *In re Cherry Berry*, 2010 EPA App. LEXIS 33 at *2 (citations omitted).

The Board may relax some of its more technical pleading standards for pro se petitioners such as the instant Petitioners. *Id.,* at *3; *In re Envtl. Disposal Sys., Inc.*, 12 E.A.D. 254, 292, n. 26 (EAB 2005); *In re Beckman Prod. Servs.*, 5 E.A.D. 10, 19 (EAB 1994). Yet as the Board has noted, "it is not incumbent upon the Board to scour the record to determine whether an issue was

[3] All Petitioners meet the 40 C.F.R. § 124.19(a)(2) standing requirements to file a petition for review of the Permit. Anyone who submitted comments on the Grove #13-11 draft permit during the public comment periods, or who participated in the public hearing, is entitled to file such a petition with the Board. 40 C.F.R. § 124.19(a)(2); *see also In re Beeland Group, LLC,* 14 E.A.D. 189, 195 (EAB Oct. 3, 2008). Only Petitioners Addison and Amy Kruske stated in their Petitions that they submitted comments on the Grove #13-11 draft permit. The Petitions of Petitioners Ronald Kruske and Springstead do not set forth the respective Petitioners' standing to appeal the Permit. But upon examining the administrative record, Region 5 determined that each Petitioner submitted comments of some sort to Region 5 during the public comment periods. *See* Atts. B-7 through B-10.

properly raised," and thus the Board still imposes a burden on every petitioner to demonstrate in the petition that the issues raised therein were first raised during the public comment periods on the Grove #13-11 draft permit. *In re Presidium Energy, LC*, UIC Appeal No. 09-01, 2009 EPA App. LEXIS 36, *3, n.4 (EAB July 27, 2009) (quoting *In re Encogen Cogeneration Facility*, 8 E.A.D. 244, 250 n.10 (EAB 1999)). The Board has stated:

> The requirement that the petitioner must show that an issue was raised during the public comment period in order to preserve it for review on appeal is not an arbitrary hurdle placed in the path of potential petitioners. Rather, the requirement serves an important function related to the efficiency and integrity of the overall administrative permitting scheme. The rule's intent is to ensure that the permitting authority has the first opportunity to address objections, and to give some finality to the permitting process. [*In re Presidium Energy*, 2009 EPA App. LEXIS 36 at *2, n.3 (citations omitted)]

40 C.F.R. § 124.19(a)(4)(ii) formalizes this requirement by stating that:

> Petitioners must demonstrate, by providing specific citation to the administrative record, including the document name and page number, that each issue being raised in the petition was raised during the public comment period (including any public hearing) as provided in [40 C.F.R.] § 124.13.

And while the Board may relax some of the more technical pleading standards for *pro se* petitioners such as Petitioners, even under this more liberal standard a petitioner must still identify the elements at issue in the permit and articulate how the Region erred or how it exercised its discretion in a manner that warrants Board review. 40 C.F.R. § 124.19. *See In re West Bay Exploration Co.,* 2014 EPA App. LEXIS 25 at*2-*3; *In re Seneca Resources Corp.*, 16 E.A.D. at 412 and 412 n.1; *In re Envtl. Disposal Sys.*, 12 E.A.D. at 292 n.26; *In re Beckman Prod. Servs.*, 5 E.A.D. at 19; *In re Presidium Energy,* 2009 EPA App. LEXIS 36 at *7 (citing *In re Knauf Fiber Glass, GmbH*, 8 E.A.D. 121, 127 & n.72 (EAB 1999)); *See In re Sutter Power Plant,* 8 E.A.D. 680, 687 (EAB 1999); *In re Envotech, L.P.*, 6 E.A.D. 260, 267-69 (EAB 1996).

Should the Board determine that a petitioner has met its threshold pleading obligations, then the Board determines the appropriate standard of review and decides whether the issues raised in the subject petition have any merit. *See In re Seneca Resources Corp.*, 16 E.A.D. at 412. Typically, the Board declines to review a UIC permit decision unless the petitioner demonstrates that the permit decision is either: 1) based upon a "clearly erroneous" finding of fact or conclusion of law; or 2) involves an "important policy consideration" or "exercise of discretion" that warrants review by the Board. 40 C.F.R. § 124.19(a)(4); *see also In re Envtl. Disposal Sys.*, 12 E.A.D. at 263 (citations omitted).

The Petitioner must demonstrate that either of the above-listed conditions of 40 C.F.R. § 124.19(a)(4) have been met by: identifying the permit conditions at issue and to be reviewed; showing that the issue was raised during the public comment period; and addressing the Region's response to Petitioner's comments and explaining why such response was inadequate. *In re Presidium Energy*, 2009 EPA App. LEXIS 36 at *5-*6. *See also* the Board's codification of such concepts at 40 C.F.R. §§ 124.19(a)(4)(i), 124.19(a)(4)(ii). "A petitioner must substantively confront the permit issuer's response to the petitioner's previous objections." *In re Windfall Oil & Gas, Inc.*, 16 E.A.D. 769, 795 (EAB 2015) (citing numerous cases for the same proposition); *see also LeBlanc v. EPA*, 310 Fed. Appx. 770, 775 (6th Cir. 2009), *aff'g In re Core Energy, LLC,* UIC Appeal No. 07-02 (EAB Dec. 19, 2007) (Order Denying Review) (affirming the Board's rejection of petitions where the petitioners restated "grievances" instead of substantively confronting the permit issuer's response). "Simply stating generalized objections to the permit or making vague and unsubstantiated arguments falls short" of explaining why a Region's response is inadequate and should lead to dismissal of the Petition. *In re City of Pittsfield*, NPDES Appeal No. 08-19, at 6 (EAB Mar. 4, 2009) (Order Denying Review) (citations

omitted). "[M]ere allegations of error are insufficient to support review." *In re Town of Westborough*, 10 E.A.D. 297, 311 (EAB 2002). One should provide "evidence or supporting documentation to rebut the information in the administrative record that supports the Region's conclusion . . . ." *In re Windfall Oil & Gas,* 16 E.A.D. at 785.

Further, a Petitioner may not simply repeat an argument that was made during the public comment period without engaging with or refuting the Region's explanation:

> Simply disagreeing with the Region and repeating concerns in a petition for review before the Board that previously have been presented to and answered by the permit issuer does not satisfy the regulatory requirement that petitioners confront the permit issuer's responses and explain why the responses were clearly erroneous or otherwise warrant Board review. *In re Windfall Oil & Gas*, 16 E.A.D. at 797 (citing 40 C.F.R. § 124.19(a)(4)(ii) and *In re Pa. Gen. Energy Co.*, 16 E.A.D. 498, 503 (EAB 2014)); *see also In re Windfall Oil & Gas*, 16 E.A.D. at 795 (citing numerous cases for the same proposition)

With limited exceptions, a Petitioner cannot support an argument with documents not submitted to the permit issuer during the public comment period:

> . . . the Board has frequently barred petitioners from relying on documents on appeal that could have been, but were not, submitted to the permit issuer during the comment period. *See, e.g., In re Chevron Michigan, LLC*, UIC Appeal No. 13-03, 2013 EPA App. LEXIS 39, *24 (EAB Nov. 7, 2013) (Order Denying Review) (declining to consider article on appeal because, although article was published prior to comment period, it was not raised during the comment period); *In re Russell City Energy Ctr., LLC*, PSD Appeal Nos. 10-01 through 10-05, 2010 EPA App. LEXIS 45, *73 n.35, *94 n.46 (EAB Nov. 18, 2010) [15 E.A.D. 1, 34 n. 35, 43 n. 46 (EAB 2010)]. [*In re: West Bay Exploration Co.*, UIC Appeal Nos. 14-66 and 14-67, 2014 EPA App. LEXIS 35, *20-*21 (EAB Sept. 22, 2014); *see also In re Dominion Brayton Point, LLC,* 12 E.A.D. 490, 518 (EAB 2006).]
>
> 40 C.F.R. § 124.13 augments this requirement by stating that:
>
> Any supporting materials which are submitted shall be included in full and may not be incorporated by reference, unless they are already part of the administrative record in the same proceeding, or consist of State or Federal statutes or regulations, EPA documents of general applicability, or other generally available reference materials.

The Board has in the past also looked to the preamble to 40 C.F.R. Part 124, which says that the Board's review should only be exercised "sparingly" and that "most permit conditions should be finally determined" by the Regions. Consolidated Permit Regulations, 45 Fed. Reg. 33,290, 33,412 (May 19, 1980); *accord In re Scituate Wastewater Treatment Plant*, 12 E.A.D. 707, 717 (EAB 2006); and *In re City of Moscow*, 10 E.A.D. 135, 140-41 (EAB 2001).

Finally, some of Petitioners' arguments involve technical determinations by Region 5, increasing Petitioners' burden of proof for those arguments:

> On technical or scientific issues . . . the Board will typically defer to a permit issuer's technical expertise and experience, as long as the permit issuer adequately explains its rationale and supports its reasoning in the administrative record. Accordingly, it is particularly important for petitioners challenging technical determinations to address the Region's rationale for its decision. It is not sufficient, however, for a petitioner to show merely that there is a "difference of opinion or an alternative theory regarding a technical matter." Thus, in challenging technical determinations, a petitioner bears a "particularly heavy burden" to show that the permit issuer has clearly erred. [*In re West Bay Exploration Co.*, 2014 EPA App. LEXIS 35 at *5-*6 (citations omitted); *see also In Re FutureGen Industrial Alliance, Inc.*, 16 E.A.D. 717, 721 (EAB 2015)]

ARGUMENT

1. Petitioners have not met their burden to demonstrate that their issues were raised during the public comment periods, or cited to where their issues and supporting documents appear in the administrative record, and therefore the Board should deny the Petitions on procedural grounds

With the exception of one argument by Petitioner Amy Kruske, Petitioners all failed to demonstrate that their issues were raised during the public comment periods. Petitioners simply cite as relevant "public comments" Region 5's summary of groups of comments in the RTC. Such references do not provide the document name and page number in the administrative record where any of Petitioners' specific arguments were raised, if in fact anyone did raise them during

the public comment process. When citing documents, Petitioners likewise fail to state whether these documents appear in the administrative record, and if so, where.

This leaves Region 5 and the Board to scour the record, to try to determine whether each of Petitioners' arguments was raised during the public comment process. This is contrary to the intent of 40 C.F.R. § 124.19(a)(4)(ii), which was to ensure that issues were raised in the public comment process, to give the permitting authority the first opportunity to address objections and to give some finality to the permitting process. *See In re Presidium Energy*, 2009 EPA App. LEXIS 36 at *2, n.3 (citations omitted). As Region 5 notes below, in some cases Petitioners' arguments and documents appear for the first time in their Petitions. Accordingly, the Board should deny the Petitions on this ground, with the sole exception of Petitioner Amy Kruske's first argument discussed at pp. 38-44, below, which should be denied for other reasons as discussed below.

2. The Board should dismiss Petitioner Addison's Petition, UIC Appeal No. 18-06

A. The Board should deny Petitioner Addison's Environmental Justice argument for failure to meet threshold procedural requirements and on the merits

Petitioner Addison's first claim asserts on a variety of grounds that EPA's "Environmental Justice screening was erroneous" and that "EPA has failed to apply any meaningful Environmental Justice guidelines." Addison Petition, at 7, 11.[4] This claim must fail on procedural grounds because Petitioner did not raise this argument during the public comment periods for the Grove #13-11 draft permit and has not cited to where anyone else did so, thus

[4] Petitioner made similar claims earlier in 2018, in the unrelated UIC Appeal No. 18-05, *In re Muskegon Development Co.*, Filing #1 (Petitioner Petition for Review), at 4-6.

failing to meet the threshold procedural requirement to demonstrate that each issue raised in the Petition was raised in the public comment periods. Additionally, Petitioner fails to meet his burden to demonstrate with specificity why EPA's addressing of Environmental Justice (EJ) as explained in the administrative record was clearly erroneous or otherwise warrants review. Finally, this claim must fail on its merits, for the reasons discussed below.

Because the RTC indicates that the Region specifically considered low-income population and education level among other factors in its EJ screening, and the Addison Petition fails to cite to such response, let alone demonstrate with specificity why such response was clearly erroneous or otherwise warrants review, the Petition should be denied for failure to meet the threshold procedural requirement at 40 C.F.R. § 124.19(a)(4)(ii).

Petitioner Addison attempts to support his argument by asserting that the Region should have considered various factors in its EJ screening, such as:

- impact on wildlife, outdoor recreation and tourism (Addison Petition, at 8-9)
- the need for residents to test their private drinking water wells (*Id.*, at 8-11)
- veteran status (*Id.*, at 8)
- education level (*Id.*, at 8)
- disabilities and lack of health insurance (*Id.*, at 8)
- minority population (*Id.*, at 8)
- retail sales per capita (*Id.*, at 8)
- income (*Id.*, at 8-9)
- effect on property values (*Id.*, at 9)
- effect on agriculture (*Id.*, at 9-10)

Petitioner Addison raised none of these issues in his comments on the Grove #13-11 draft permit. Att. B-7. Petitioner also does not cite to where in the administrative record anyone else made any of the arguments that he now poses, or explain why he is entitled to raise these

arguments for the first time in his Petition.[5] Accordingly, Petitioner fails to meet the threshold procedural requirement to demonstrate that each issue raised in the Petition was raised in public comments, and thus the Board should deny review of Petitioner's EJ claims regarding such additional factors, under 40 C.F.R. §124.19(a)(4)(ii) and the precedent of *In re Presidium Energy*, 2009 EPA App. LEXIS 36 at *2, n.3 and *3, n.4.

Scouring the record, Region 5 has determined that one or more commenters commented on local income and the well's potential effect on property values, which could arguably be construed to raise issues relating to EJ. But even if the Board overlooks Petitioner Addison's failure to meet the procedural thresholds, and construes this comment to raise the EJ issues that Petitioner is now raising, the Board should deny this argument on substantive grounds. The RTC, and Region 5's underlying EJ Screen in this matter at Att. B-5 of this Response, detail Region 5's consideration of EJ factors in issuing the Permit. As Region 5 noted:

> This screening tool [EJScreen] examines 11 environmental and seven demographic indicators. It was noted that the site is in an area with potential Environmental Justice concerns based on household income and population having less than a high school education. This information was considered when choosing a location and time for the information session and hearing and when designing outreach materials. [RTC, at 12] [6]

Petitioner Addison's argument does not dispute Region 5's explanation. Petitioner has failed to carry his burden of showing that EPA's EJ screening was clearly erroneous or otherwise warrants review. *See* 40 C.F.R. § 124.19(a)(4)(i)(A)-(B); *In re La Paloma Energy Center, LLC*,

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[5] Petitioner Ronald Kruske, UIC Appeal No. 18-07, made a general comment referencing EJ during the June 19, 2018 public hearing, when he stated, "I'm aware that there's also a [sic] 2010 environmental justice guidelines, and I hope you could maybe find something in there that could help us maybe deny this permit." Att. B-6, at 32. None of Petitioner Addison's instant arguments credibly arise from that general statement.

[6] Region 5's EJ Screen also evaluated the area's minority population. Att. B-5.

16 E.A.D. 267, 269 (EAB 2014); and *In re Archer Daniels Midland Co.*, 17 E.A.D. 380, 383 (EAB 2017). Region 5 not only used at least some of the factors that Petitioner raised for the first time in his Petition (income and education level), but found that the area around the proposed well site had "potential Environmental Justice concerns" based on these indicators. Att. B-5.

Petitioner Addison does not explain how Region 5 should have used EJ to deny the Permit. Petitioner's argument should be denied on its merits, as EJ is not specified as a factor for consideration in issuing or denying Class II UIC permits. *See generally* 40 C.F.R. Parts 144 and 146; *see also* 40 C.F.R. § 146.24 (criteria to consider in issuing Class II UIC wells).

Moreover, in a similar challenge to the EPA EJ assessment in a UIC permitting matter, the Board held that EPA has no authority to deny or condition a permit where the permittee has demonstrated full compliance with the statutory and regulatory requirements. *In re Envotech*, 6 E.A.D. at 280. Further, the Board held that where such requirements are met, "the Agency *must* issue the permit, regardless of racial or socio-economic composition of the surrounding community and regardless of the economic effect of the facility on the surrounding community." *Id.,* at 280-281; *see also In re Windfall Oil & Gas*, 16 E.A.D. at 813 (holding that the effect of a proposed UIC well on property values was "beyond the scope of the Board's authority over this UIC permit appeal . . . ."). Petitioner Addison himself appears to acknowledge that *In re Envotech* invalidates his argument. Addison Petition, at 11. In light of this limited discretion, Petitioner has not met his burden to demonstrate that the Region's EJ screening and subsequent action was clearly erroneous. *See In re Archer Daniels Midland Co.,* 17 E.A.D. at 381, *citing In re Guam Waterworks Auth.*, 15 E.A.D. 437, 443 n.7 (EAB 2011) (in reviewing the permit issuer's exercise of its discretion, the Board will apply an abuse of discretion standard).

B. The Board should deny Petitioner Addison's seismicity, rock-fracturing and rock-dissolving arguments for failure to meet threshold procedural requirements and on the merits

Petitioner Addison next claims on a variety of grounds that Region 5's assessment of factors related to seismicity and rock-fracturing[7] is erroneous, because per Addison Petition, at 11-15:

- the unlimited injection volume will unacceptably increase the risk of rock fracturing and earthquakes
- the injection pressure will unacceptably increase the risk of rock fracturing and earthquakes
- injecting within 5 miles of a structural lineament means a higher risk of earthquakes
- "corrosive solvents" in the injectate may dissolve rock and increase earthquake risks

This claim must fail on procedural grounds because Petitioner Addison did not raise any of his arguments during the public comment periods for the Grove #13-11 draft permit and has not cited to where anyone else did so, thus failing to meet the threshold procedural requirement to demonstrate that each issue raised in the Petition was raised in the public comment periods or to explain why he is entitled to raise these arguments for the first time in his Petition. Additionally, Petitioner fails to meet his burden to demonstrate with specificity why EPA's response to such comments was clearly erroneous or otherwise warrants review, and this claim must fail on its merits, for the reasons discussed below.

[7] Petitioner Addison's group of arguments conflates seismicity and rock-fracturing.

i. Region 5 adequately and appropriately considered injection volume in finding that permit conditions would prevent seismicity and rock-fracturing risks

Petitioner Addison argues that the Permit allows injecting an "unlimited volume" of injectate and may result in rock fracturing and earthquakes. Addison Petition, at 12-15. Even if the Board overlooks Petitioner's failure to meet the procedural thresholds to raise this argument, the Board should deny this argument on substantive grounds. The RTC details Region 5's consideration of injection volume in issuing the Permit:

> The volumes given in the Statement of Basis are given as potential maximum volumes for reference, but volume is not limited in the permit. If pore space (openings in the rock) within the injection zone begins to get overfilled, the pore pressure (pressure within the openings) would increase and more pressure would be needed to inject additional fluid. This is a more accurate indicator of filling pore spaces than estimating pore volume based on a small sample of rock. Injection pressure is limited in the permit to avoid over-pressuring the rock, to eliminate the possibility of fracturing the rock. [RTC, at 5]

To paraphrase, the Permit allows injection only up to the receiving capacity of the injection zone at safe pressure. As the available space in the injection zone fills up, injection will require progressively higher injection pressure. When required injection pressure reaches the Permit's maximum injection pressure, then injection must cease. As the RTC explains, Region 5 is limiting injection volume indirectly this way because this method is more accurate in determining permissible injection volume than analyzing injection zone samples to set an injection volume limit.

Petitioner Addison has not addressed Region 5's explanation above. Petitioner simply states multiple times that what Petitioner mischaracterizes as "unlimited" injection volume will increase the risk of formation fracture. As Petitioner has not substantively confronted, let alone refuted Region 5's explanation, or even acknowledged that explanation, Petitioner has failed to carry his burden of showing that EPA's reasoning was clearly erroneous or otherwise warrants

review. *See* 40 C.F.R. § 124.19(a)(4)(i)(A)-(B); *In re La Paloma Energy Center,* 16 E.A.D. at 269; *In re Archer Daniels Midland Co.*, 17 E.A.D. at 383; and *In re Windfall Oil & Gas,* 16 E.A.D. at 799-800 (addressing seismicity issues). Region 5 further notes that Petitioner here challenges a technical determination by Region 5. Even if Petitioner had actually addressed and attempted to refute Region 5's explanation, he would bear "a "particularly heavy burden" to show that the permit issuer has clearly erred." *In re West Bay Exploration Co.*, 2014 EPA App. LEXIS 35 at *5-*6 (citations omitted); *see also In Re FutureGen Industrial Alliance,* 16 E.A.D. at 721.

ii. Region 5 adequately and appropriately considered injection pressure in finding that permit conditions would prevent seismicity and rock-fracturing risks

Petitioner Addison argues that the Permit allows injection at "high pressure," which may fracture rock and will increase the risk of seismic events. Addison Petition, at 12-15. Region 5 appears to have received no comment making this argument during the public comment periods, thus limiting Region 5's responses to this argument in the RTC. Even if the Board overlooks Petitioner's failure to meet the procedural thresholds to raise this argument, the Board should deny this argument on substantive grounds. The record reflects that Region 5 adequately considered and addressed injection pressure in including permit conditions to prevent against the risk of fracturing rock:

> Injection pressure is limited in the permit to avoid over-pressuring the rock, to eliminate the possibility of fracturing the rock. [RTC, at 5]
>
> Injection pressure is limited in the permit to avoid over-pressuring the rock, which would cause it to fracture. [RTC, at 5]
>
> The maximum injection pressure regulated by this permit is set so that the injection pressure will not fracture the injection zone rock. [RTC, at 7]

If someone had submitted a comment during the public comment periods regarding injection pressure, then Region 5 could have explained in more detail how it determined the Permit's maximum injection pressure, using site-specific information and a conservative margin to protect the injection zone rock from fracturing. Nonetheless, both the draft and final permit for the Grove #13-11 well contain the formula that Region 5 used to determine the Permit's maximum injection pressure, using such factors as:

- the fracture gradient of the injection zone rock
- the specific gravity of the brine to be injected
- the depth of the top of the injection zone [Att. B-2, at 16, note *; Permit, at 14, note *]

Petitioner Addison has not addressed Region 5's formula for calculating maximum injection pressure, nor the Region's explanations in the record that the injection pressure as calculated would prevent fracturing the rock. Instead, Petitioner baldly states multiple times that high injection pressures fracture rock and so Region 5 erred in issuing the Permit. As Petitioner has not substantively confronted, let alone refuted Region 5's explanation, or even acknowledged that explanation, Petitioner has failed to carry his burden of showing that EPA's reasoning was clearly erroneous or otherwise warrants review. *See* 40 C.F.R. § 124.19(a)(4)(i)(A)-(B); *In re La Paloma Energy Center,* 16 E.A.D. at 269; and *In re Archer Daniels Midland Co.*, 17 E.A.D. at 383; and *In re Windfall Oil & Gas,* 16 E.A.D. at 799-800 (addressing seismicity issues). Region 5 further notes that Petitioner here challenges a technical determination by Region 5. Even if Petitioner had actually addressed and attempted to refute Region 5's explanation, he would bear "a "particularly heavy burden" to show that the permit issuer has clearly erred." *In re West Bay Exploration Co.*, 2014 EPA App. LEXIS 35 at *5-*6 (citations omitted); *see also In Re FutureGen Industrial Alliance,* 16 E.A.D. at 721.

iii. Region 5 adequately and appropriately considered structural lineaments and faults in finding that permit conditions would prevent seismicity risks

Petitioner Addison argues that the Permit allows injection within 5 miles of a fault, which will increase the probability of seismic events. Addison Petition, at 12-15. Again, Region 5 appears to have received no public comment making this argument, thus limiting Region 5's responses to this argument in the RTC. Even if the Board overlooks Petitioner's failure to meet the procedural thresholds to raise this argument, the Board should deny this argument on substantive grounds. Region 5 addressed seismicity concerns in the administrative record and RTC, stating in a portion of the RTC applicable to structural lineaments:

> Jordan Development addressed the issue of faults in its permit application. The EPA's technical review of the permit application also included an investigation into the chances of induced and naturally-occurring earthquakes. EPA is required to consider and did consider known or suspected faults in the area of review (40 C.F.R. §146.24).
>
> The Underground Injection Control National Technical Workgroup decision model recommends that EPA evaluate whether there is a history of successful disposal activity in the proposed well's area and whether there have been seismic events there. While this well has not been used previously for injection, other EPA-permitted injection wells are in the county and have a history of successful disposal activity. **There is a structural lineament (a linear feature in the landscape, not a known fault) outside of the area of review but within 5 miles of the proposed injection well, but it has not been active in recent geologic time.**
>
> Recorded earthquakes serve as a general indicator of seismic activity and the potential existence of a stressed fault. A record of past earthquakes would be evidence of the presence of stressed faults in the area, a common criteria EPA considers when evaluating the potential for seismic activity and induced seismicity. **The lack of seismic activity in the proposed well area is evidence that there are no active faults in a stressed state in the area and that the geologic siting is appropriate for injection.** The three earthquakes that have occurred in recorded history in Michigan have all been over 100 km from the well location, as was the April 20, 2018 quake in Amherstberg, Ontario, Canada. After examining the U.S. Geological Survey (USGS) 50-Year Quake Probability Map

> and the USGS assessment of Hazard Values and the area-specific factors, we concluded that the probability of a natural seismic event is negligible, as is the probability of this well causing an induced seismic event. [RTC, at 9-10 (emphasis added)]

If someone had submitted a comment during the public comment periods regarding injecting within 5 miles of a structural lineament, then Region 5 could have explained in more detail how it evaluated that lineament. But Region 5 can provide a limited discussion from the existing record, which demonstrates that Petitioner Addison's argument must fail on the merits.

As the RTC quotation above notes, a structural lineament is a landscape feature and is not necessarily a fault. The lineament in question here is not a known fault. If it is in fact a fault, it has not been active in thousands of years (recent geologic time). As Region 5 noted in the RTC, in evaluating seismicity it reviewed historic seismic events; the U.S. Geological Survey (USGS) 50-Year Quake Probability Map; and the USGS assessment of Hazard Values and the area-specific factors. Region 5 found no evidence of a stressed fault in the area and that the probability of inducing a seismic event by injection was "negligible."

Petitioner Addison has not addressed Region 5's explanation in the RTC, quoted above. Petitioner simply implies or states multiple times that the lineament is a fault (e.g., Addison Petition, at 13) and that the proposed well will unacceptably increase the risk of seismic activity. Petitioner does not for example explain either 1) how he knows the lineament is a fault, or 2) why injection would increase the risk of a seismic event such that Region 5 erred in issuing the Permit, in light of no evidence of a stressed fault in the area. As Petitioner has not substantively confronted, let alone refuted Region 5's explanation, or even acknowledged that explanation, Petitioner has failed to carry his burden of showing that EPA's reasoning was clearly erroneous or otherwise warrants review. *See* 40 C.F.R. § 124.19(a)(4)(i)(A)-(B); *In re La Paloma Energy*

Center, 16 E.A.D. at 269; *In re Archer Daniels Midland Co.*, 17 E.A.D. at 383; and *In re Windfall Oil & Gas,* 16 E.A.D. at 799-800 (addressing seismicity issues). Region 5 further notes that Petitioner here challenges a technical determination by Region 5. Even if Petitioner had actually addressed and attempted to refute Region 5's explanation, he would bear "a "particularly heavy burden" to show that the permit issuer has clearly erred." *In re West Bay Exploration Co.*, 2014 EPA App. LEXIS 35 at *5-*6 (citations omitted); *see also In Re FutureGen Industrial Alliance,* 16 E.A.D. at 721.

iv. Region 5 adequately and appropriately considered injectate corrosivity in finding that permit conditions would prevent seismicity and rock-dissolving risks

Petitioner Addison argues that the injectate's composition is not public knowledge, which places first responders at risk in the event of a surface spill. Addison Petition, at 14. Petitioner also argues that corrosive substances may be present in the brine and may dissolve rock formations, thereby increasing the risk of seismic events. *Id.*, at 12-15. Region 5 appears to have received no public comment making either of these arguments, thus limiting the Region's responses to these arguments in the record. Even if the Board overlooks Petitioner's failure to meet the procedural thresholds to raise this argument, the Board should deny these arguments on substantive grounds.

In his public comment, Petitioner Addison did state the following concern: "Ability of local first responders and emergency workers to respond to and address any possible emergencies or accidents that may occur." Att. B-7. This vague statement does not raise the issue of "unknown" injectate composition being a threat to first responders. Moreover, the RTC, responding to Petitioner's comment, correctly notes that surface spills and dangers to first

responders are outside the scope of the UIC permit process and regulations. RTC, at 2; *see also* 40 C.F.R. Parts 144 and 146; and *In re Windfall Oil & Gas,* 16 E.A.D. at 813, rejecting arguments regarding "the possibility of surface spills" as "beyond the scope of the Board's authority over this UIC permit appeal."

Regarding Petitioner Addison's argument that the unknown injectate composition may dissolve rock formations and increase seismicity risks, Region 5 and the public are more aware of injectate composition than Petitioner claims. Both the draft and final permit for the Grove #13-11 well allow only "noncommercial brine disposal from production wells owned or operated by Jordan Development Co, LLC. Att. B-2, at 1; Permit, at 1. The RTC summarizes Region 5's knowledge of brine injectate:

> Oilfield brines, or "produced water," commonly may contain various amounts of hydrocarbons, such as benzene, ethylbenzene, toluene, xylene, naphthalene, and polycyclic aromatic hydrocarbons. Some producing formations can have low levels of naturally-occurring radioactive materials. These compounds occur naturally in fluids that are separated from oil and gas . . . Oilfield brine has been exempted from the definition of hazardous waste by the Resource Conservation and Recovery Act under 40 C.F.R. § 261.4(b)(5), which specifically exempts "drilling fluids, produced waters, and other wastes associated with the exploration, development, or production of crude oil, natural gas or geothermal energy." This means that the fluid coming out of a production well, which is called brine but may also include drilling fluids among other things, can be injected into a Class II well, regardless of its constituents. As explained. . . the purpose of the permitting standards is to prevent exposure of the brine to fresh water . . . .
>
> EPA requires all permittees to submit operating data with the permit application, including source and analysis of the physical and chemical characteristics of the injection fluid. The company submitted a representative brine sample that meets the UIC regulation requirements at 40 C.F.R. § 146.24(a)(4)(iii). These regulations require a fluid analysis but do not include a list of chemicals to be analyzed for Class II injection wells. EPA Region 5's permitting tool titled "Example: Underground Injection Control Class II Permit Application" advises applicants to provide a fluid analysis that includes concentrations of, but is not limited to the following: sodium, calcium, magnesium, barium, total iron, chloride, sulfate, carbonate, bicarbonate, sulfide,

and total dissolved solids; as well as pH, resistivity (ohm-meters), and specific gravity. This permitting tool list contains sufficient analytes to allow EPA to determine if the results are consistent with oil or gas production related brine. EPA has determined that the applicant has provided sufficient information, including a representative brine analysis, to allow EPA to make a permitting decision.

Furthermore, the permit requires Jordan to submit an annual chemical composition analysis of the injection fluid. According to Part III(A) of the permit, the analysis shall include but is not limited to the following: sodium, calcium, magnesium, barium, total iron, chloride, sulfate, carbonate, bicarbonate, sulfide, total dissolved solids, pH, resistivity, and specific gravity. This information is available to the public.

* * *

As mentioned . . . drilling fluids, produced wastes, and other wastes associated with the exploration, development, or production of crude oil, natural gas or geothermal energy has been exempted from the definition of hazardous waste under the Resource Conservation and Recovery Act under 40 C.F.R. § 261.4(b)(5). In addition, such fluids are expressly included within the scope of Class II fluids under the Safe Drinking Water Act. [Please see 40 C.F.R. § 144.6(b)]. This means that the fluid coming out of a production well, which is called brine but may also include drilling fluids among other things, can be injected into a Class II well, regardless of its constituents. In any case, the design, engineering, construction, operation, maintenance requirements, and geologic setting provide a high level of confidence that the well will not pose a risk to groundwater resources. [RTC, at 6-8; *see also* Permit, at 14, note **].

If someone had submitted a comment during the public comment periods regarding potentially corrosive injectate increasing the probability of seismic events, then Region 5 could have addressed that concern in more detail in the RTC. Region 5 is additionally hamstrung in responding to Petitioner Addison's corrosivity argument because Petitioner does not explain how corrosive injectate would in fact increase the risk of seismic events and nothing in the record demonstrates such risk. Moreover, as indicated in the RTC section quoted above, EPA examined naturally-occurring brines, drilling fluids and associated materials during multiple rulemaking processes under RCRA and SDWA, and determined that such fluids could be injected in Class II

UIC wells without endangering USDWs if those wells complied with applicable permit conditions required by SDWA and EPA's implementing regulations.

Petitioner Addison's argument, in essence, challenges the UIC regulations at 40 C.F.R. § 144.6(b) that allow brine injection. But the time to challenge that regulation is long past. As the Board has recognized, "[a] permit appeal is not the appropriate forum in which to challenge either the validity of Agency regulations or the policy judgments that underlie them." *In re City of Port St. Joe and Fla. Coast Paper Co.*, 7 E.A.D. 275, 287 (EAB 1997); *see also In re FutureGen Industrial Alliance*, 16 E.A.D. at 724; and *In re Tondu Energy Co.*, 9 E.A.D. 710, 715-716 (EAB 2001). For this reason as well, Petitioner's argument fails and the Board should reject this argument.

Additionally, regarding the specific injectate at issue for the Grove #13-11 well, as part of applying for the Permit and pursuant to UIC regulations at 40 C.F.R. § 146.24(a)(4)(iii) the permittee sent Region 5 1) information on the source of that injectate; and 2) an analysis of the chemical and physical characteristics of a representative sample of that injectate. Att. B-1, at App. 5. Region 5 reviewed this information and determined that the proposed injectate is consistent with oil or gas production related brine and is acceptable to inject into the Grove #13-11 well under permit conditions.

Additionally, under the Permit, the permittee must annually analyze a representative sample of the Grove #13-11 injectate for parameters including pH and provide that analysis to Region 5. Att. B-2, at 11 (Section II.B.3.c) and 14, note **. As Region 5 noted in the RTC, all of these analyses are publicly available. And the permittee's representative sample from the permit application process is part of the administrative record in this matter and has been available to Petitioner Addison for examination. In fact Region 5 presented the representative

sample's analysis to the audience as part of a slideshow at the June 19, 2018 public hearing, during an information session immediately before the recorded public hearing. Region 5 has affirmatively presented this analysis to the public, not just passively made it available.

The injectate analysis that the permittee submitted as part of its permit application included analytical results for pH, which measures corrosivity. This analysis showed that a representative sample of the injectate had a pH of 6.4, which is considered essentially neutral. Att. B-1, at App. 5. Accordingly Petitioner Addison's corrosivity argument fails substantively as well.

The proposed injectate is consistent with production brines, a category of fluid that EPA has assessed in depth and determined can be injected into Class II UIC wells without endangering USDWs, if in compliance with permit conditions established pursuant to the SDWA and UIC regulations. A representative sample of the injectate had a neutral pH. And Region 5 determined that on the facts of the Permit -- which include no indication of an active, stressed fault near the proposed well site, as well as limitations on injection pressure -- injection of the proposed Grove #13-11 injectate would not present a risk of endangerment due to seismicity. *See also In re Windfall Oil & Gas,* 16 E.A.D. at 798 n. 25 (rejecting a similar argument, where the representative sample of the proposed injectate likewise had a pH of 6-8).

Petitioner Addison has not addressed Region 5's explanation in the RTC and has also not addressed the actual pH of a representative sample of the injectate, both of which are part of the administrative record for the Permit. Petitioner simply asserts that injecting corrosive fluid is an unacceptable risk, without even explaining that fluid's mechanism for allegedly triggering seismic events. As Petitioner has not substantively confronted, let alone refuted Region 5's explanation, or even acknowledged that explanation, Petitioner has failed to carry his burden of

showing that EPA's reasoning was clearly erroneous or otherwise warrants review. *See* 40 C.F.R. § 124.19(a)(4)(i)(A)-(B); *In re La Paloma Energy Center,* 16 E.A.D. at 269; and *In re Archer Daniels Midland Co.*, 17 E.A.D. at 383. Region 5 further notes that Petitioner here challenges a technical determination by Region 5. Even if Petitioner had actually addressed and attempted to refute Region 5's explanation, he would bear "a "particularly heavy burden" to show that the permit issuer has clearly erred." *In re West Bay Exploration Co.*, 2014 EPA App. LEXIS 35 at *5-*6 (citations omitted); *see also In Re FutureGen Industrial Alliance,* 16 E.A.D. at 721.

C. The Board should deny Petitioner Addison's more general complaints for failure to meet threshold procedural requirements and on the merits

Petitioner Addison also makes a number of general complaints in Addison Petition, at 15-16:

- EPA provides inadequate oversight of state UIC programs, somehow resulting in an underreporting of UIC well failure rates
- permittee has a "questionable track record" and therefore an unspecified party should audit and disclose permittee's compliance history
- the oil industry is debt-ridden overall and therefore the permittee should have to prove an unspecified level of "financial solvency" via a "full audit" to obtain the Permit

These claims must fail on procedural grounds because Petitioner Addison did not raise any of these arguments during the public comment periods for the Grove #13-11 draft permit (Att. B-7) and has not cited to where anyone else did so, thus failing to meet the threshold procedural requirement to demonstrate that each issue raised in the Petition was raised in the public comment periods or explain why he is entitled to raise these arguments for the first time in his Petition. In addition, Petitioner fails to meet his burden to demonstrate with specificity why

EPA's responses and explanations in the record relating to such comments were clearly erroneous or otherwise warrant review. Finally, these arguments must fail on their merits, for the reasons discussed below.

i. Petitioner Addison's argument regarding EPA program oversight is not properly before the Board and is irrelevant to Region 5's issuance of the Permit

The bulk of Petitioner Addison's argument regarding inadequate EPA oversight consists of simply quoting a purported portion of a U.S. General Accounting Office ("GAO") report. Addison Petition, at 15-16. Petitioner's lengthy quotation discusses EPA's oversight of state UIC programs.[8] No one appears to have submitted this document during the public comment periods. Therefore pursuant to Board case law, Petitioner may not use it now for the first time on appeal. *In re Chevron Michigan,* 2013 EPA App. LEXIS 39 at *24; *In re Russell City Energy Ctr.,* 15 E.A.D. at 34 n.35, 43 n.46; *In re: West Bay Exploration Co.*, 2014 EPA App. LEXIS 35 at *20-*21; *In re Dominion Brayton Point,* 12 E.A.D. at 518; *see also* 40 C.F.R. § 124.13. Accordingly the Board should dismiss Petitioner's argument on procedural grounds.

Even if the Board overlooks Petitioner Addison's failure to meet the procedural thresholds to raise this argument, the Board should deny it on substantive grounds. First, Petitioner's argument is irrelevant to Region 5's decision to issue the Permit. Based on this document apparently introduced for the first time on appeal, Petitioner concludes that UIC well failure rates are underreported. But nowhere does Petitioner's argument explain how the underreporting of well failure rates resulted in an error by Region 5 in its decision to issue the

[8]Petitioner did not provide this report to Region 5, or provide any citation to it other than calling it "a recent GAO Report." Addison Petition, at 15.

Permit. The Petitioner is required to raise his concerns with specificity during the comment periods; Region 5 should not be compelled to divine the meaning of issues raised for the first time on appeal.

Moreover, the quoted language from the GAO report discusses EPA's oversight of state UIC programs and incorporation of state UIC program requirements into federal regulations. It does not address EPA's issuance of permits in states like Michigan, where EPA directly implements the UIC program and where Region 5 issued the permit at issue here. And the quoted language certainly does not address possible errors with respect to Region 5's decision to issue the Permit. For all of these reasons, Petitioner Addison's argument fails substantively as well.

ii. Petitioner Addison's argument regarding permittee's compliance history is not properly before the Board and is irrelevant to Region 5's issuance of the Permit

Petitioner Addison alleges that the permittee has "a poor record for compliance" and that therefore an unspecified party should perform a "full audit" of permittee's compliance history and make that publicly available (Addison Petition, at 16). Region 5 does not seem to have received any comments requesting an audit and public disclosure of permittee's compliance history. Region 5 did receive at least one comment expressing concern that Region 5 did not evaluate permittee's "track record" during its permit decision. But as Region 5 responded in the RTC:

> UIC regulations at 40 C.F.R. § 146.24 specify which factors EPA must consider in evaluating a UIC permit application. EPA may not consider any factors not set forth at 40 C.F.R. § 146.24. Because UIC regulations do not authorize EPA to consider an applicant's compliance history, EPA cannot deny or issue Jordan Development's permit application based on issues outside of the site-specific factors allowed in regulations. However, 40 C.F.R. § 144.40 provides that EPA

> may, after public notice and the opportunity for a hearing, terminate a permit for noncompliance with the same. [RTC, at 12]

Petitioner Addison has not addressed Region 5's explanation above. Petitioner simply asserts, without evidence, that the permittee has a poor compliance history, without addressing Region 5's authority under the UIC permitting regulations to require a compliance audit prior to making a final permit decision. As Petitioner has not substantively confronted, let alone refuted Region 5's explanation, or even acknowledged that explanation, Petitioner has failed to carry his procedural burden of showing that EPA's reasoning was clearly erroneous or otherwise warrants review. *See* 40 C.F.R. § 124.19(a)(4)(i)(A)-(B); *In re La Paloma Energy Center,* 16 E.A.D. at 269; and *In re Archer Daniels Midland Co.*, 17 E.A.D. at 383.

Petitioner Addison instead simply repeats previously-addressed concerns, which is insufficient to meet this burden. Accordingly, the Board should dismiss Petitioner's argument on this ground as well. *In re Windfall Oil & Gas*, 16 E.A.D. at 797 (citing 40 C.F.R. § 124.19(a)(4)(ii) and *In re Pa. Gen. Energy Co.*, 16 E.A.D. at 503); *see also In re Windfall Oil & Gas*, 16 E.A.D. at 795 (citing numerous cases for the same proposition).

Petitioner Addison's argument also fails on substantive grounds. As explained in the RTC, a permittee's compliance history is not a specified factor for consideration in issuing a Class II UIC permit. The Board has likewise held that a permittee's compliance record is "not relevant" to the Region's decision to grant a UIC permit, concluding that it "has no jurisdictional basis to review a permit based solely on a company's past compliance history." *In re Envotech,* 6 E.A.D. at 273. Similarly, in *In re Windfall Oil & Gas*, 16 E.A.D. at 813, the Board held that concerns regarding a permittee's future compliance were "beyond the scope of the Board's authority over this UIC permit appeal," further noting:

> Concerns regarding future noncompliance are speculative and do not call into question the terms of an otherwise valid permit. A permit appeal is not a forum to entertain speculations about future permit compliance. [*Id.*, citations omitted; *see also Envotech*, 6 E.A.D. at 273-274.]

Accordingly, the Board should dismiss this argument on both procedural and substantive grounds.

iii. Petitioner Addison's argument regarding permittee's financial solvency is not properly before the Board and is outside the scope of UIC permitting authority

Petitioner Addison finally argues that because the oil and gas industry has what Petitioner characterizes as "massive debt," permittee must demonstrate "financial solvency" to obtain the Permit. Petitioner further argues that an unspecified party must conduct a "full audit" of permittee. Addison Petition, at 16. Region 5 does not seem to have received any comments requesting an audit or demonstration of financial solvency by permittee. Accordingly the Board should dismiss Petitioner's argument on procedural grounds, as Petitioner raises this issue for the first time on appeal.

Petitioner Addison references certain comments in his Petition, but they do not specifically address Petitioner's demand for an unspecified financial demonstration by permittee as a prerequisite for obtaining the Permit. These include at least one comment expressing concern about whether permittee could be held liable for damages arising from its operation of the Grove #13-11 well because permittee is a limited liability company (LLC). RTC, at 11-12. Another comment expressed concern that permittee's financial assurance only covered the cost of plugging the well, instead of all environmental damage that could potentially arise from operating the Grove #13-11 well. *Id.*, at 10-11.

Region 5 responded to the comment or comments regarding the amount of permittee's financial assurance as follows:

> UIC regulations require the permittee to provide financial assurance for properly plugging the well. Jordan Development, L.L.C. has a letter of credit for $28,500 for this purpose. No SDWA provision or federal UIC regulation authorizes EPA to require Class II well owners/operators to be bonded for other reasons, including the cleanup costs of any potential contamination. [*Id.*, at 11; *see also* Att. B-1, at Att. Q]

Petitioner Addison has not addressed Region 5's explanation, beyond mischaracterizing it by stating that Region 5 "failed to respond to" the comments regarding permittee's financial assurance and corporate liability. Petitioner does not allege that permittee itself has any financial issues, nor does he define what would constitute adequate "financial solvency." He only recites vague concerns about permittee's industry as a whole.

Petitioner Addison also does not address Region 5's authority to require a full financial audit prior to making a final permit decision. As Petitioner has not substantively confronted, let alone refuted Region 5's explanation of financial assurance, or even acknowledged that explanation, Petitioner has failed to carry his burden of showing that EPA's reasoning was clearly erroneous or otherwise warrants review. *See* 40 C.F.R. § 124.19(a)(4)(i)(A)-(B); *In re La Paloma Energy Center,* 16 E.A.D. at 269; and *In re Archer Daniels Midland Co.*, 17 E.A.D. at 383. Accordingly the Board should dismiss this argument on substantive grounds as well.

3. The Board should dismiss Petitioners Ronald Kruske, D.D.S. and Jennifer Springstead's Petitions, UIC Appeal Nos. 18-07 and 18-09

A. Portions of Petitioners Ronald Kruske and Springstead's injection volume argument are improperly before the Board and Region 5 adequately and appropriately considered injection volume concerns in this matter

Petitioners Ronald Kruske and Jennifer Springstead argue that the Permit allows injecting an "unlimited volume" of injectate and will increase earthquake risks. Ronald Kruske Petition, at 2-4; Springstead Petition, at 2-4. Petitioners have not cited to where this issue was raised in a public comment, thus failing to meet the threshold procedural requirement to demonstrate that each issue raised in the Petition was raised in the public comment periods. However, Region 5's review of Petitioner Ronald Kruske's public comments shows that he at least raised concerns about injection volume, despite failing to meet the requirement to identify such comments in his Petition. Att. B-8, 6/22/18 email at 2.

As discussed at pp. 15-16, above, Region 5 received and the RTC responds to one or more comments regarding injection volume. Region 5 refers the Board to that discussion for greater detail. Petitioners Ronald Kruske and Springstead do not address Region 5's response to comments regarding injection volume, including Region 5's explanation that the permit does not allow "unlimited volume," but rather limits injection volume through limits on the maximum injection pressure. RTC, at 5. Because Petitioners fail to confront the Region's response, let alone meet their burden to demonstrate that the Region's response was clearly erroneous, Petitioners' argument must fail. *See* 40 C.F.R. § 124.19(a)(4)(i)(A)-(B); *In re La Paloma Energy Center,* 16 E.A.D. at 269; *In re Archer Daniels Midland Co.*, 17 E.A.D. at 383; and *In re Windfall Oil & Gas,* 16 E.A.D. at 799-800 (addressing seismicity issues).

Instead of addressing RTC explanations of injection volume, Petitioners Ronald Kruske

and Springstead quote language from an energy industry newsletter regarding injection-induced seismicity. No one appears to have submitted this document during the public comment periods. Therefore, pursuant to Board case law, Petitioners may not use it now for the first time on appeal. *In re Chevron Michigan,* 2013 EPA App. LEXIS 39 at *24; *In re Russell City Energy Ctr.,* 15 E.A.D. at 34 n.35, 43 n.46; *In re: West Bay Exploration Co.*, 2014 EPA App. LEXIS 35 at *20-*21; *see also* 40 C.F.R. § 124.13. Accordingly the Board should not consider arguments based on this document.

Even if the Board does consider arguments based on this document, it should reject them on substantive grounds. The record supports Region 5's conclusion that the permitted injection activity does not present a risk of seismicity. *See, e.g.,* RTC, at 9–10 (finding "negligible" probability of either a natural or induced seismic event, based on area-specific geological assessment); *Id.*, at 5 (Responses #6 and #7, both noting that injection pressure is limited, to avoid over-pressurizing the rock which can result in fracturing).

The newsletter upon which Petitioners Ronald Kruske and Springstead rely addresses induced seismicity in Oklahoma and Pennsylvania. Petitioners do not explain how this comparison across locations with different geology is apt. In addition, although the newsletter notes that studies (not cited or provided) have noted a correlation between induced seismicity and "quick" injection of around 300,000 barrels per month of fluid, Petitioners do not explain how the factors behind such purported findings of correlation compare to those in the Permit, for example in terms of injection pressure or area-specific seismic history.

Petitioners Ronald Kruske and Springstead also argue that Region 5 relied on *Hydrogeology for Underground Injection Control in Michigan: Part I* (Dept. of Geology, W. Mich. Univ., 1981) for its decision regarding injection volume; that this document is out of date

because it predates "high volume injection"; and that therefore Region 5 erred in its consideration of injection volume. Petitioners are mistaken. Region 5 did not rely on this document to determine injection volume – but rather limited injection volume as a function of injection pressure calculated according to a scientific formula. RTC, at 5; Att. B-2, at 16, note *; Permit, at 14, note *. Region 5 actually used the *Hydrogeology* document to help assess the location's suitability for injection: potential confining zones, descriptions of geologic formations that may be present, etc. For this purpose, the document remains valuable because rock formations change over geologic time, not in less than 40 years.

In sum, Petitioners Ronald Kruske and Springstead's argument regarding injection volume and induced seismicity relies on information apparently not submitted during the comment process; fails to explain how this information applies to the permit decision at issue; fails to address Region 5's findings, based on assessing site-specific geology, that the risk of induced seismicity is negligible; and fails to explain why Region 5's responses on questions of injection volume and injection pressure are clearly erroneous or otherwise warrant review. Further, Region 5 is entitled to additional deference regarding technical decisions such as this one. *In re West Bay Exploration Co.*, 2014 EPA App. LEXIS 35 at *5-*6 (citations omitted); *see also In Re FutureGen Industrial Alliance,* 16 E.A.D. at 721. Accordingly this argument fails substantively.

B. Region 5 adequately and appropriately searched for potential active faults in this matter

Petitioners Ronald Kruske and Springstead argue that the area of review (AOR) that Region 5 used in issuing the Permit is too small, because Region 5 used a radius of less than half

a mile and injection can trigger earthquakes further away. Ronald Kruske Petition, at 4-5; Springstead Petition, at 4-5. Region 5 does not seem to have received any comments regarding the need to look beyond the AOR for seismic issues such as active faults. But according to the RTC, Region 5 received several comments that the AOR should be larger. RTC, at 4. Region 5 responded to these comments by ultimately doubling the size of the AOR. *Id.*, at 4-5.[9]

Petitioners Ronald Kruske and Springstead did not raise this seismicity issue in their comments on the Grove #13-11 draft permit. Atts. B-8, B-9. Petitioners also do not cite to where in the administrative record anyone else made this argument, or explain why they are entitled to raise this argument for the first time in their Petitions. Accordingly, Petitioners fail to meet the threshold procedural requirement to demonstrate that each issue raised in the Petition was raised in public comments, and thus the Board should deny review of this argument, under 40 C.F.R. §124.19(a)(4)(ii) and the precedent of *In re Presidium Energy*, 2009 EPA App. LEXIS 36 at *2, n.3 and *3, n.4.

Even should the Board choose to overlook Petitioners Ronald Kruske and Springstead's failure to meet the procedural thresholds to raise this argument, the Board should dismiss Petitioners' argument on substantive grounds. Petitioners are mistaken in their apparent assumption that Region 5'assessment of the potential for seismic activity was limited to the AOR. The AOR is that area in which Region 5 searches for "conduits for liquid transmittal from the injection zone of the [proposed well] into USDWs." RTC, at 4; *see also* Grove #13-11 draft permit, Att. B-2, at 1. Such conduits include improperly-constructed or improperly-plugged,

[9] Because Petitioners actually wanted Region 5 to increase the area in which it searched for active faults, not increase the AOR in which it searched for wells, Region 5 does not here delve into its AOR calculations. Region 5 stands prepared to do so however, should the Board desire it.

abandoned wells that penetrate the confining layer to the injection zone. *Id.*, at 4-5 (*see* Comments #4 and #5); *see also* 40 C.F.R. §§ 144.55(a), 146.6.[10]

Region 5's search for seismic issues actually included looking for active faults (i.e., those along which movement created an earthquake) in a 100 km radius of the proposed well site, much larger than the AOR. Region 5 found no earthquakes in recorded history within 100 km of the proposed well site. RTC, at 10. And Region 5 used a number of sources to search for seismic risks. *Id.* Because Region 5 assessed seismic potential in an area significantly larger than the AOR, the Board should also dismiss Petitioners' argument on substantive grounds.

C. Region 5 adequately evaluated the nature of the injectate in this matter

Petitioners Ronald Kruske and Springstead finally argue that Region 5 "cherry picked" the facts during the public comment periods by failing to inform the public of all possible constituents of the injectate. Ronald Kruske Petition, at 5-7; Springstead Petition, at 5-7. In doing so, Petitioners do not object to any permit term or condition or present any other specific challenge to the permit decision, as required by 40 C.F.R. § 124.19(a)(4). Moreover, they fail to identify any elements in the Permit that are clearly erroneous or otherwise warrant Board review. 40 C.F.R. § 124.19(a)(4). *See In re West Bay Exploration Co.,* 2014 EPA App. LEXIS 25 at *2-*3; *In re Seneca Resources Corp.*, 16 E.A.D. at 412 and 412 n.1; *In re Envtl. Disposal Sys.*, 12 E.A.D. at 292 n.26; *In re Beckman Prod. Servs.*, 5 E.A.D. at 19; *In re Presidium Energy,* 2009 EPA App. LEXIS 36 at *7 (citing *In re Knauf Fiber Glass*, 8 E.A.D. at 127 & n.72); *See In re*

[10] Such conduits also include geologic faults whether active or inactive and so Region 5 does assess faults in the AOR. But as noted immediately below, Region 5's search for seismic issues and active faults extended far beyond the AOR.

Sutter Power Plant, 8 E.A.D. at 687; *In re Envotech, L.P.*, 6 E.A.D. at 267-69. Accordingly, the Board should reject this argument on the procedural grounds.

Petitioners Ronald Kruske and Springstead fail to cite to where in the administrative record anyone raised a similar comment, an error itself additionally meriting dismissal on procedural grounds. Region 5 has however determined that Petitioner Ronald Kruske made a similar comment during the public comment periods. Att. B-8, 6/22/18 email at 1-2. But even if the Board overlooks this procedural error, or Petitioners' failure to challenge a particular permit condition, the Board should reject Petitioners' argument for substantive reasons.

Region 5 responded to Petitioner Ronald Kruske's comment and possibly similar comments in the RTC:

> **Comment #10** – Commenters were concerned over the composition of the injected fluid, call it "toxic waste" and wanted to know every possible constituent in the brine.
>
> **Response #10** -- Oilfield brines, or "produced water", commonly may contain various amounts of hydrocarbons, such as benzene, ethylbenzene, toluene, xylene, naphthalene, and polycyclic aromatic hydrocarbons. Some producing formations can have low levels of naturally-occurring radioactive materials. These compounds occur naturally in fluids that are separated from oil and gas. While there is no established definition of "toxic waste," there are well-established definitions of "hazardous waste." Oilfield brine has been exempted from the definition of hazardous waste by the Resource Conservation and Recovery Act under 40 C.F.R. § 261.4(b)(5), which specifically exempts "drilling fluids, produced waters, and other wastes associated with the exploration, development, or production of crude oil, natural gas or geothermal energy." This means that the fluid coming out of a production well, which is called brine but may also include drilling fluids among other things, can be injected into a Class II well, regardless of its constituents. As explained in the Response to Comment #2, above, the purpose of the permitting standards is to prevent exposure of the brine to fresh water, thus protecting people as well as terrestrial and aquatic wildlife and plants.
>
> EPA requires all permittees to submit operating data with the permit application, including source and analysis of the physical and chemical characteristics of the injection fluid. The company submitted a representative brine sample that meets the UIC regulation requirements at 40 C.F.R. § 146.24(a)(4)(iii). These

> regulations require a fluid analysis but do not include a list of chemicals to be analyzed for Class II injection wells. EPA Region 5's permitting tool titled "Example: Underground Injection Control Class II Permit Application" advises applicants to provide a fluid analysis that includes concentrations of, but is not limited to the following: sodium, calcium, magnesium, barium, total iron, chloride, sulfate, carbonate, bicarbonate, sulfide, and total dissolved solids; as well as pH, resistivity (ohm-meters), and specific gravity. This permitting tool list contains sufficient analytes to allow EPA to determine if the results are consistent with oil or gas production related brine. EPA has determined that the applicant has provided sufficient information, including a representative brine analysis, to allow EPA to make a permitting decision. [RTC, at 6-7.]

To paraphrase, Class II wells may receive certain fluids including those "brought to the surface in connection with conventional oil or natural gas production." *See* 40 C.F.R. § 146.5(b). Region 5's responsibility under the UIC regulations is to determine whether a proposed injectate falls within the category of permissible Class II fluids at 40 C.F.R. § 146.5(b). In issuing the Permit, Region 5 required an appropriate analysis for this purpose and appropriately used that analysis to determine that the proposed injectate constitutes Class II fluid.

Region 5 shared the analytical results for the proposed injectate with the public, both by placing them in the administrative record (App. B-1, at App. 5) and by presenting them to the audience as part of a slideshow at the June 19, 2018 public hearing, during an information session immediately before the recorded public hearing. Petitioners Ronald Kruske and Springstead now argue that Region 5 should have listed every constituent that could potentially be in the injectate, but cite to no regulation requiring this disclosure. Indeed, as referenced in the RTC, the UIC regulations at 40 C.F.R. § 146.24(a)(4)(iii) require only "an appropriate analysis of the chemical and physical characteristics of the injection fluid," which Region 5 has interpreted to require information regarding certain analytes to enable a determination as to whether the fluids constitute oil and gas production-related brine. Accordingly, because Petitioners have failed to demonstrate that Region 5 clearly erred in not obtaining or then

disclosing information about each potential constituent in the injectate, the Board should dismiss this argument on substantive grounds. *See* 40 C.F.R. § 124.19(a)(4)(i)(A)-(B); *In re La Paloma Energy Center,* 16 E.A.D. at 269; and *In re Archer Daniels Midland Co.*, 17 E.A.D. at 383.

Ultimately, Petitioners Ronald Kruske and Springstead's real concern appears to be that fluids such as the proposed injectate are exempt from the RCRA definition of hazardous waste (*see* 40 C.F.R. § 261.4(b)(5)) and can be injected into Class II wells. To the extent that Petitioners take issue with this classification of Class II fluids, Region 5 notes that "[a] permit appeal is not the appropriate forum in which to challenge either the validity of Agency regulations or the policy judgments that underlie them." *In re City of Port St. Joe and Fla. Coast Paper Co.*, 7 E.A.D. at 287; *see also In re FutureGen Industrial Alliance*, 16 E.A.D. at 724; and *In re Tondu Energy Co.*, 9 E.A.D. at 715-716. For this reason as well, Petitioners' argument fails and the Board should reject this argument.

4. The Board should dismiss Petitioner Amy Kruske's Petition, UIC Appeal Nos. 18-08

A. The Board should deny Petitioner Amy Kruske's arguments regarding well failure statistics for failure to meet threshold procedural requirements and on the merits

Petitioner Amy Kruske argues that Region 5 erred by not responding to statistics that various commenters offered regarding well failures. Amy Kruske Petition, at 2-4. Petitioner cites to three places in the administrative record where commenters, including her, claimed to offer statistics regarding well failures that she claims Region 5 did not address. *Id.*, at 3. However, as explained below, Petitioner cannot rely upon supporting materials not submitted in full to Region 5 and so the Board should dismiss her arguments on procedural grounds. The Board should also dismiss her arguments on substantive grounds, as Region 5 appropriately

responded to such comments by discussing relevant well failure statistics based on its own data, as documented in the record. The Board should further dismiss her arguments on substantive grounds, because Petitioner fails to demonstrate that Region 5's consideration of well failure data in issuing the Permit was clearly erroneous, or otherwise warrants review.

During the public comment periods, multiple commenters submitted comments citing purported statistics for well failure. In most cases these comments neither provided any citation for their sources, nor submitted those sources if any to Region 5. Region 5 responded to these comments:

> **Comment #13** – Numerous comments gave "statistics" saying 4 in 10 wells leak, or some other high percentage, but no specific sources of information were mentioned.
>
> **Response #13** – The "statistics" that commenters mentioned do not reflect EPA's experience in Michigan. In a review of all active Class II injection wells in Michigan over the past five years, the failure rate has been no higher than 5% in any given year. This failure rate is almost entirely (100% to 99.72%) limited to annulus fluid leaking into the tubing and then into the injection zone, and not injectate fluid (brine) passing through the casing into an area other than the intended injection zone. Such casing leaks are extremely rare in Michigan; in the past five years the rate of casing need repairs has ranged from 0 to .28% per year . . . .[i]f monitoring indicates a leak in the annulus or if the well should fail a mechanical integrity demonstration, then the permit requires the well to be shut down immediately and the failure reported to EPA within 24 hours. This is what EPA considers a well "failure." [RTC, at 8-9]

UIC regulations at 40 C.F.R. § 124.13 requires that a commenter must provide the actual source of any supporting material:

> . . . any supporting materials which are submitted shall be included in full and may not be incorporated by reference, unless they are already part of the administrative record in the same proceeding, or consist of State or Federal statutes and regulations, EPA documents of general applicability, or other generally available reference materials. [*see also In re Chevron Michigan,* 2013 EPA App. LEXIS 39 at *24; *In re Russell City Energy Ctr.,* 15 E.A.D. at 34 n.35, 43 n.46; *In re: West Bay Exploration Co.*, 2014 EPA App. LEXIS 35 at *20-*21.]

None of the three statistics-related comments that Petitioner Amy Kruske now cites even provide a usable citation to their source, which as noted above would still not meet the regulatory requirements to allow those statistics' use as supporting materials. And none of the actual sources for those statistics appear in the administrative record either. The only citations that the three commenters Petitioner mentioned give for their purported statistics are:

Commenter	**Reference**
Tyler Roberson	"By your own research . . . ." [Att. B-6, at 10]
	". . . that is according to your guys' research." [*Id.*, at 10]
Amy Kruske	none provided [*Id.*, at 22]
LuAnn Kozma	". . . in 2016 your own study showed that . . .from December 13, 2016, . . . that's your own EPA information, ..." (*Id.*, at 47-48)

Because apparently none of the purported statistics were submitted to EPA, or are otherwise part of the administrative record or generally available reference materials, the Board should dismiss Petitioner's arguments for failing to comply with 40 C.F.R. § 124.13. Region 5 asks the Board to note the impossibility of verifying a claimed statistic with no citation, or with a vague claim of something being EPA data. The Region 5 geologist reviewing the Grove #13-11 permit application tried to locate these purported sources during her consideration of public comments before Region 5 issued the Permit, but was unsuccessful in finding them, even Ms. Kozma's reference to a December 13, 2016 study[11]. Without these original data sources, EPA could not verify or consider the commenters' purported statistics regarding well failure.

[11] During the permit review process, while attempting to locate the document that Ms. Kozma referenced, the Region 5 geologist reviewing the Grove #13-11 permit application located a December 13, 2016 EPA study regarding the effects of hydraulic fracturing, or "fracking," on drinking water resources. Fracking is a petroleum production process, substantively different from UIC brine disposal injection. Region 5 is uncertain whether this is the document Ms. Kozma referenced. Regardless, that document did not appear

Petitioner Amy Kruske also cited statistics from quoted portions of two documents – articles by ProPublica and the Environment America Research & Policy Center ("EARPC"). Petitioner does not cite to where these documents appear in the administrative record and on that procedural ground the Board should dismiss her argument from those documents. *In re Presidium Energy*, 2009 EPA App. LEXIS 36 at *3, n.4 (quoting *In re Encogen Cogeneration Facility*, 8 E.A.D. at 250 n.10); *see also* 40 C.F.R. § 124.19(a)(4)(ii). Region 5 eventually found the ProPublica article in the administrative record, but no one appears to have submitted the EARPC document during the public comment periods.[12] Therefore pursuant to Board case law, Petitioner may not use the EARPC document now for the first time on appeal. *In re Chevron Michigan,* 2013 EPA App. LEXIS 39 at *24; *In re Russell City Energy Ctr.,* 15 E.A.D. at 34 n.35, 43 n.46; *In re: West Bay Exploration Co.*, 2014 EPA App. LEXIS 35 at *20-*21; *In re Dominion Brayton Point,* 12 E.A.D. at 518; *see also* 40 C.F.R. § 124.13. Accordingly the Board should dismiss that portion of Petitioner's argument on additional procedural grounds.

Even if the Board overlooks Petitioner Amy Kruske's failure to meet the procedural thresholds to raise the well failure statistics in either the ProPublica or EARPC article excerpts, the Board should dismiss Petitioner's argument on substantive grounds. The record describes Region 5's own experience with well failure in Michigan, which Region 5 considered in its permit decision. RTC, at 8 (again, concluding that in a review of all Class II wells in Michigan over five years, the well failure rate was no higher than 5% in a given year, and that leaks of

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to address UIC wells or UIC well failures and Region 5 determined it was irrelevant to the permit review process.

[12] Petitioner did not submit the EARPC document with her Petition, either.

injectate were "extremely rare," with the rate of casings needing repair no higher than 0.28%). Region 5's response went on to explain how well construction and monitoring requirements in the Permit would prevent the risk of well failures (*Id.*, at 8). Region 5's response also explained how permitting and regulatory requirements ameliorate that risk. *Id.*, at 9 (Response #13); *see also Id.*, at 4 (Response #3, noting that if any monitoring well indicates a leak the permittee must stop injection immediately; notify EPA; and not resume injection until EPA is satisfied the problem is fixed and gives permission to resume injection); Att. B-2, at. 5-6 (Sections I.E.9.e and subsections) and 8-9 (Sections I.E.16, I.E.17 and subsections); Permit, at 5 (Sections I.E.9.e and subsections) and 7-8 (Sections I.E.16, I.E.17 and subsections).

Petitioner has not addressed these responses, let alone explained why they are clearly erroneous. As Petitioner has not substantively confronted, let alone refuted Region 5's explanation, or even acknowledged that explanation, Petitioner has failed to carry her burden of showing that EPA's reasoning was clearly erroneous or otherwise warrants review. *See* 40 C.F.R. § 124.19(a)(4)(i)(A)-(B); *In re La Paloma Energy Center,* 16 E.A.D. at 269; and *In re Archer Daniels Midland Co.*, 17 E.A.D. at 383.

Instead Petitioner Amy Kruske repeats unverified statistics, the validity of which EPA has been unable to corroborate due to the commenters' failure to provide the source documents.[13] Continued disagreement by merely repeating previously-addressed concerns constitutes grounds for dismissal. *In re Windfall Oil & Gas*, 16 E.A.D. at 797 (citing 40 C.F.R. § 124.19(a)(4)(ii)

[13] Although the ProPublica excerpt appears in the administrative record, the 16% failure rate it claims from a "ProPublica review" of records (Amy Kruske Petition, at 4) in no way matches Region 5's experience with Class II wells in Michigan. Lacking any further information on ProPublica's methodology and data interpretation, Region 5 acted according to its experience regulating Class II wells in Michigan.

and *In re Pa. Gen. Energy Co.*, 16 E.A.D. at 503); *see also In re Windfall Oil & Gas*, 16 E.A.D. at 795 (citing numerous cases for the same proposition). Accordingly the Board should dismiss Petitioner's arguments for lack of substantive merit.

"A permitting authority's response to a comment need only be commensurate with the comprehensiveness of the comment itself." *In re FutureGen Industrial Alliance*, 16 E.A.D. at 754 (noting *In re N.E. Hub Partners, L.P.*, 7 E.A.D. 561, 582-584 (EAB 1998)). Region 5 considered the various allegations as well as it could against its own actual experience, given the nature of the alleged statistics. Accordingly the Board should reject Petitioner Amy Kruske's argument on this substantive ground as well.

Additionally, even taken at face value the statistics that Petitioner Amy Kruske cites do not invalidate Region 5's decision to issue the Permit. Petitioner fails to identify a contested permit condition or other specific challenge to the permit, as 40 C.F.R. § 124.19(a)(4) requires. Rather, Petitioner appears to challenge the entire practice of underground injection, which UIC regulations authorize. *See* 40 C.F.R. Parts 144 and 146. Petitioner's challenge therefore amounts to an impermissible challenge to the validity of agency regulations. *In re City of Port St. Joe and Fla. Coast Paper Co.*, 7 E.A.D. at 287; *see also In re FutureGen Industrial Alliance*, 16 E.A.D. at 724; and *In re Tondu Energy Co.*, 9 E.A.D. at 715-716.

Petitioner Amy Kruske's argument from the ProPublica article quotation additionally appears to be that Region 5 should use injection well safety across the country to determine the propriety of issuing the Permit. Petitioner has failed to explain why this nationwide well safety data has relevance to Region 5's determination that issuing the Permit was consistent with UIC regulations, particularly in light of Region 5's consideration of more specific statewide data regarding injection well safety as discussed above. Therefore the Board should also dismiss

Petitioner's arguments on the substantive grounds of failing to explain why the data renders Region 5's permitting decision at issue clearly erroneous or otherwise warrants discretion, in light of the record supporting this decision.

B. The Board should deny Petitioner Amy Kruske's arguments regarding harm to wildlife and water resources for failure to meet threshold procedural requirements and on the merits

Finally, Petitioner Amy Kruske argues that Region 5 erred in its response to comments regarding threats to wildlife from surface water spills and by issuing a permit that may cause wildlife, recreational and economic harm to surface water resources. Amy Kruske Petition, at 5-6. However, Petitioner's argument relies on supporting materials apparently not submitted to Region 5 and so the Board should dismiss her arguments on procedural grounds.

Specifically, in support of her argument, Petitioner Amy Kruske relies on excerpts from documents she describes as "an article written by Amy Mall for the NRDC" and "University Outreach, University of Michigan – Flint, 2010." Amy Kruske Petition, at 5-6. No one appears to have submitted either of these documents during the public comment periods.[14] Pursuant to Board case law, Petitioner may not introduce or rely on these documents now for the first time on appeal. *In re Chevron Michigan,* 2013 EPA App. LEXIS 39 at *24; *In re Russell City Energy Ctr.,* 15 E.A.D. at 34 n.35, 43 n.46; *In re: West Bay Exploration Co.*, 2014 EPA App. LEXIS 35 at *20-*21; *In re Dominion Brayton Point,* 12 E.A.D. at 518; *see also* 40 C.F.R. § 124.13. Accordingly the Board should dismiss Petitioner's argument on procedural grounds.

In addition, the Board should dismiss Petitioner Amy Kruske's argument because

[14] Petitioner Amy Kruske did not submit either of these documents with her Petition, either.

Petitioner has failed to meet her substantive burden to demonstrate that EPA's response to comments regarding surface water impacts was clearly erroneous or otherwise warrants review. First, Petitioner has not addressed Region 5's consideration of surface water contamination in the RTC. In RTC Response #14, Region 5 explained that "there is no hydrological connection" between the injection zone and surface waters, and that the Permit's requirements "will be sufficient to prevent upward movement of the injected fluid into… surface waters." RTC, at 9. Petitioner does not address this explanation, simply repeating her concern about the threats to wildlife and recreation from contamination of surface waters.

Similarly, the Mall article excerpt – if not rejected on procedural grounds – fails to support Petitioner Amy Kruske's substantive argument. The Mall article excerpt discusses only the impacts of a surface fracking fluid spill on aquatic wildlife, but not Region 5's explanation in the RTC that Permit conditions will prevent brine injectate from entering surface waters. As Petitioner has not substantively confronted, let alone acknowledged or refuted this explanation, Petitioner has failed to carry her burden of showing that EPA's response was clearly erroneous or otherwise warrants review. *See* 40 C.F.R. § 124.19(a)(4)(i)(A)-(B); *In re La Paloma Energy Center,* 16 E.A.D. at 269; and *In re Archer Daniels Midland Co.*, 17 E.A.D. at 383.

Moreover, the Board should dismiss Petitioner Amy Kruske's argument regarding impacts to surface waters on substantive grounds, because:

> [o]n a number of prior occasions, the Board has made clear that its authority to review UIC permit decisions extends to the boundaries of the UIC permitting program itself, with its SDWA-directed focus on the protection of USDWs, and no farther. [*In re Envtl. Disposal Sys.*, 12 E.A.D. at 266, citing *In re Am. Soda, L.L.P.*, 9 E.A.D. 280, 286 (EAB 2000) ("the SDWA and the UIC regulations authorize the Board to review UIC permitting decisions only as they affect a well's compliance with the SDWA and applicable UIC regulations"); *In re N.E. Hub Partners*, 7 E.A.D. at 567 ("protection of interests outside of the UIC program [is] beyond our authority to review in the context of [a UIC] case"),

review denied sub nom. *Penn Fuel Gas, Inc. v. U.S. EPA*, 185 F.3d 862 (3d Cir. 1999); and *In re Federated Oil & Gas of Traverse City, Michigan*, 6 E.A.D. 722, 725-726 (EAB 1997).]

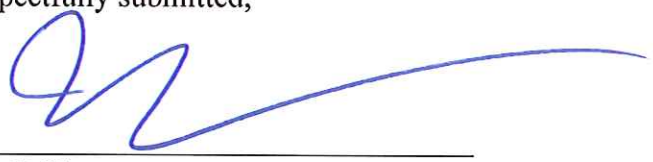
Accordingly, the Board's jurisdiction is limited to impacts to USDWs from the injected activity – and would not include authority to address Petitioner's arguments regarding surface water impacts. *See In re Windfall Oil and Gas,* 16 E.A.D. at 813 (rejecting arguments regarding the possibility of surface spills as "beyond the scope of the Board's authority" over the UIC permit appeal).

Substantively, the Board should also dismiss Petitioner Amy Kruske's argument regarding non-endangered and non-threatened wildlife because it lies outside the scope of the Board's jurisdiction to review UIC permits. Specifically, in RTC Response #16, the Region addressed concerns regarding wildlife impacts by explaining that EPA conducted an Endangered Species Act review and concluded that the Permit would have no effect on threatened or endangered species. RTC, at 10. Petitioner argues that this response was deficient because the Region addressed only endangered, and not "un-endangered," species. However, Petitioner has not identified any provision in the SDWA or UIC regulations that would require Region 5 to condition or deny a UIC permit based on impacts to non-endangered species from surface water contamination. Accordingly, based on prior Board case law discussed above, the Board lacks jurisdiction to address this argument.

CONCLUSION

For the reasons discussed above, the Board should dismiss the Petitions both for failure to meet threshold procedural requirements and on the merits.

Respectfully submitted,



Dated: March 12, 2019

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BEFORE THE ENVIRONMENTAL APPEALS BOARD
UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C.

In the Matter of:	)	
Jordan Development Co., LLC,	)	**Appeal Nos. UIC 18-06**
Traverse City, Michigan,	)	**UIC 18-07**
Grove #13-11 SWD,	)	**UIC 18-08**
Permit No. MI-051-2D-0031	)	**UIC 18-09**
	)	

CERTIFICATE OF SERVICE

I hereby certify that the original of this **RESPONSE TO PETITION FOR REVIEW** in the matter **JORDAN DEVELOPMENT COMPANY, LLC OF TRAVERSE CITY, MICHIGAN, GROVE #13-11 SWD, PERMIT NO. MI-051-2D-0031, GLADWIN COUNTY, MICHIGAN, UIC Appeal Nos. 18-06, 18-07, 18-08 and 18-09**, and all associated attachments, was filed electronically with the Board. In addition, one identical paper copy of all attachments was sent to the Board, via Express Mail, to the following address:

Clerk of the Board
U.S. Environmental Protection Agency
Environmental Appeals Board
1201 Constitution Avenue, NW
U.S. EPA East Building, Room 3332
Washington, DC 20004

Further, I hereby certify that one copy of this **RESPONSE TO PETITION FOR REVIEW** in the matter **JORDAN DEVLOPMENT COMPANY, LLC OF TRAVERSE CITY, MICHIGAN, GROVE #13-11 SWD, PERMIT NO. MI-051-2D-0031, GLADWIN COUNTY, MICHIGAN, UIC Appeal Nos. 18-06, 18-07, 18-08 and 18-09**, and all associated attachments, was sent to the Petitioners and Permittee, via email pursuant to Board order, to the following addresses:

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March 12, 2019
Date