

January 31, 2022

Submitted via regulations.gov

Karen Marsh Sector Policies and Programs Division (E143-05) Office of Air Quality Planning and Standards U.S. Environmental Protection Agency Research Triangle Park, NC 27711

# Re: Standards of Performance for New, Reconstructed, and Modified Sources and Emissions Guidelines for Existing Sources: Oil and Natural Gas Sector Climate Review

Dear Ms. Marsh:

Western Energy Alliance submits the following comments to the Environmental Protection Agency's (EPA) proposed rulemaking for the New Source Performance Standards Sections OOOOa, OOOOb, and OOOOc. While the Alliance is generally supportive of cost-effective regulation that incentivizes innovation, rewards positive performance, and provides regulatory certainty, certain provisions of this rulemaking will be challenging to implement, technically infeasible, or provide no environmental or emissions-mitigating benefit.

Western Energy Alliance represents 200 companies engaged in all aspects of environmentally responsible exploration and production of oil and natural gas across the West. The Alliance represents independents, the majority of which are small businesses with an average of fourteen employees.

The Alliance is separately submitting joint comments with a coalition of oil and natural gas trade groups known as the "Producer Associations." In this letter we highlight in further detail five issues that are of specific concern to Alliance members: the inappropriateness of EPA classifying the published document as a proposed rule without providing actual proposed rule language; the impracticability of applying Appendix K to onshore upstream operations; the inflexibility of the proposed pneumatic controller standards; clarifications needed within the liquids unloading definition, and the need to ensure EPA's alternative leak detection and repair (LDAR) options are designed to be as flexible as possible.

The Alliance urges EPA to make the changes recommended below and in the Producer Associations' comments in order to provide for a more effective and environmentally beneficial rule. We would be happy to work with EPA staff to help develop more effective rule language for EPA's future proposal.

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### I. EPA's Classification of the Publication in 86 FR 63110 as a Proposed Rule is Inappropriate

Under 42 U.S.C. § 7411(a)(2), "New Source" is defined as "any stationary source, the construction or modification of which is commenced after the publication of regulations (or, if earlier, proposed regulations) prescribing a standard of performance under this section which will be applicable to such source." For typical New Source Performance Standards, this generally means that compliance is required for those sources that are either modified or constructed after a particular trigger date, based on when regulations are proposed. Within this publication, EPA contends the types of sources discussed in the document would be required to meet the yet undefined standards in a forthcoming final rule if their construction or modification occurred after November 15, 2021<sup>1</sup>. In the view of the Alliance, this approach conflicts with 42 U.S.C. § 7411(a)(2) as there has yet to be a publication of regulations, or proposed regulations.

EPA recognizes that no publication of proposed regulations or regulatory text has been made, noting that "EPA plans to issue a supplemental proposal and supplemental RIA for the supplemental proposal to provide *regulatory text* for the proposed NSPS OOOOb and EG OOOOC"<sup>2</sup> (emphasis added). This is reiterated in EPA's supporting fact sheet on the rule proposal: "EPA intends to issue a supplemental proposal in 2022 that will provide *proposed regulatory text* and may expand on or modify the 2021 proposal in response to public input."<sup>3</sup> EPA is clear in the publication that the actual proposed regulations are forthcoming, and therefore the current publication would not trigger new source requirements for sources discussed in the publication at the date of its publication.

In addition, EPA intimates that the supplemental proposal could include sources, requirements, and information based on comments received that aren't mentioned in the current publication. If that were to happen, based on EPA's asserted date in the publication of November 15<sup>th</sup>, the OOOOb rule could end up having two separate compliance dates based on this current publication and the supplemental proposal, needlessly complicating regulatory compliance for impacted companies.

Instead of proposed regulations and regulatory text, the publication in 86 FR 63110 is a lengthy set of information that would typically be included in either the preamble to a rulemaking, or in an Advanced Notice of Proposed Rulemaking (ANPR), and some questions that would typically appear in an Information Collection Request. Given that EPA does identify some potential themes or ideas around what potential regulations in the rule could look like, EPA should have classified this publication as an ANPR, as EPA has done with previous rulemaking efforts. That said, a mere description of potential regulatory requirements that may be proposed in a supplemental proposal is not enough to inform

<sup>&</sup>lt;sup>1</sup> 86 FR 63116

<sup>&</sup>lt;sup>2</sup> 86 FR 63115

<sup>&</sup>lt;sup>3</sup> https://www.epa.gov/system/files/documents/2021-11/2021-oil-and-gas-proposal.-overview-fact-sheet.pdf

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the regulated public how they are to comply with a rule. In this instance, there is yet to be a rule to actually comply with.

By publishing this document with a purported compliance date of November 15, 2021, EPA is expecting operators to begin to track facilities that may or may not ultimately be regulated, with regulatory requirements that have not yet been proposed, and are expected to do so in addition to expecting more sources that could potentially be included in the future, all of which could impact compliance budgets, planning, and design. Absent clear guidance, EPA should not expect operators and the regulated public to anticipate the intentions of what a proposed rulemaking would look like in the future when developing plans for facility design, control technologies, and approaches.

The Alliance recognizes that it would be difficult to reclassify the publication as an ANPR at this stage. As such, to remedy the conflict the publication has with Clean Air Act (CAA) § 111(a)(2), (42 U.S.C. 7411(a)(2)) the Alliance encourages EPA to clarify in the supplemental proposal that the compliance date is triggered with the publication of the regulations and regulatory text in the supplemental proposal, whenever that is ultimately published in the *Federal Register*.

Going forward, the Alliance hopes EPA will avoid publishing documents titled as a proposed rule under the New Source Performance Standards absent formal regulatory text. This practice doesn't allow for sufficient public input and comment when the regulated public has a mere 75 days to comment on only the limited information that would normally be provided in a preamble. The Alliance also requests the supplemental proposal to come later this year include a robust comment period for regulated entities to adequately evaluate the impacts of the proposed rule.

#### II. Appendix K Should Not Be Applied to the Upstream Segment

Within this publication, EPA suggests that optical gas imaging (OGI) monitoring may need to be performed according to Appendix K to meet the not-yet-proposed requirements. As drafted, Appendix K outlines a set of additional recordkeeping, training, recording, and technical requirements that are largely impractical for use in upstream, midstream, transmission, and storage operations.

The Alliance supports the continued use of OGI emissions detection in the production, gathering, boosting, transmission and storage segments, and Alliance members are at the forefront of developing, implementing, and rigorously evaluating new technologies and approaches in the OGI space. Alliance members used OGI techniques to mitigate emissions from their facilities prior to their requirement in OOOOa, and our members will continue to support the use of OGI for emissions mitigation going forward.

The overly prescriptive requirements in Appendix K, however, do not accurately reflect the realities of conducting leak detection in rural, active oil field conditions. As such, aside

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from costs, the protocols establish requirements that will dramatically reduce the ability of operators to conduct leak inspections in a timely fashion. On the whole the Alliance believes application of Appendix K as drafted could hinder leak detection efforts in the production, gathering, boosting, transmission and storage segments, thus providing little to no additional environmental benefit. However, the Appendix K framework, with major adjustments, could be a valuable improvement to leak detection and repair options at processing plants and in the downstream segment.

The Alliance recommends that EPA instead codify the OGI requirements as set forth in OOOOa for compliance in OOOOb and OOOOc. Those rules have been implemented since 2015, and operators have designed processes and procedures to comply with those requirements over the last 7 years. Those requirements have been functioning as a means of mitigating emissions in upstream operations, and would be equally adequate for setting forth OGI requirements under a future OOOOb or OOOOc proposal.

Should EPA insist that an additional set of requirements is necessary for complying with OGI requirements, EPA should eliminate several of the requirements that are unnecessarily rigorous and prescriptive. First, the five second dwelling time is inappropriate for regulatory requirements in an upstream setting. Effective dwelling time is going to vary for different types of applications and relative to the skill of the OGI camera operator. Requiring a dwelling time for each component would force OGI inspections that can currently be performed in an afternoon to instead take several days. EPA hasn't provided sufficient evidence that this dwelling time requirement would identify more leaks, mitigate more emissions, or improve performance of OGI camera operators.

Instead, this requirement will end up having unintended negative consequences that are contrary to the Administration's objectives. Alliance members are working to continuously improve facility designs, including adding automation, eliminating tanks where they aren't necessary, and designing separation stages to capture as much gas as possible most efficiently. However, many of these modern designs require the installation of additional components; valves, controllers, gauges, connectors, and other equipment help to make these designs possible. By requiring facilities with a large number of components to include extended dwelling times for each component, EPA is inadvertently disincentivizing innovation in facility design and emissions mitigation. The Alliance suggests that EPA clarify that the dwelling time for multiple components can be completed concurrently.

Second, the training requirements would be difficult if not impossible for many operators to meet. Requiring fifty surveys be done under a senior operator's supervision, ten surveys observed by a senior operator, and forty surveys verified by a senior operator does not adequately account for the staffing limitations facing many Alliance members. Under Appendix K as currently drafted, the instructor would be required to have surveys completed at five hundred different sites in their career history, with at least twenty being in the last year. This will be a difficult standard for most if not all instructors to meet given they will also be training new OGI operators. The training standards essentially require a

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time demand of greater than 120 surveys at a minimum for each OGI operator being trained by the senior operator.

In addition, quarterly performance audits would need to be performed for each trainee, which would add additional surveys for the year. Combined with the other requirements in Appendix K, including the dwelling time requirement that would make surveys at larger facilities take multiple days, there would not be enough time in the year for a senior operator to both meet his or her requirements to maintain senior operator status and train even a single OGI operator. The Alliance urges EPA to give serious consideration to eliminating these requirements to provide an opportunity for industry to effectively train and deploy capable OGI operators and expand leak detection capabilities.

Given the monitoring frequency required by OOOOa and potentially required by OOOOb, OOOOc, as well as state rules, developing a team to perform OGI surveys would require the training of entire teams of OGI operators, which would then require entire teams of senior operators. As defined, there are not enough people qualified to meet these requirements available for the operators subject to the proposed requirements. Perhaps more importantly, to meet those requirements would require almost all senior operators to be spending most if not all their time on audits and training.

The Alliance member companies would prefer most senior operators perform surveys and find and fix leaks in a timely fashion, instead of spending their skills exclusively on training and audits. Furthermore, the current proposal could be interpreted such that a senior operator must have a career history of 500 different sites surveyed in their career. This is problematic since there are many operators, including Alliance members, that don't have 500 sites to be surveyed within their organization. Even if EPA intended for those sites to be 500 distinct surveys, that requirement would be difficult to meet for smaller operators with in-house staff.

For those smaller operators, this rule would ultimately require that they outsource their OGI surveys to a third-party contractor. Contractor availability would become a key concern, thus placing many smaller companies at a significant disadvantage in meeting their regulatory obligations. EPA rules should not force companies into acquiring services outside of their organization when in-house teams can deliver the same results and potentially repair leaks at a faster rate. We encourage EPA to work with industry in ensuring the regulations ultimately create an efficient framework for leak detection that accounts for differences in operator size and capabilities.

Additionally, the use of a numerical count of sites or surveys is misguided, as sites under Appendix K can vary wildly by size and complexity. For example, this survey threshold would consider a wellhead-only site survey as equivalent experience to a large refinery. As an alternative, the Alliance suggests that EPA require a senior operator be a certified thermographer, and field training for OGI camera operators consist of an hours-based training requirement. As an alternative to Appendix K as currently drafted, EPA should

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require that operators establish a training and verification program but allow flexibility for operators to determine the requirements of that program based on the complexity and scope of their operations.

Third, requirements in Appendix K for the development of operating envelopes are highly problematic. Operating envelopes could be developed by either a manufacturer or the operator of the equipment that would effectively cover most, if not all, foreseeable monitoring situations. While there may be some exceptions where an individual operating envelope could be necessary for a specific type of component or situation, EPA should allow for a generalized operating envelope to cover operations within an entire operational area, and note those exceptions, as opposed to requiring an individual envelope for each equipment and camera configuration.

#### III. The Pneumatic Controller Standards Would be Impractical to Implement, and Should Allow More Flexibility for Compliance

EPA's publication describes a framework where all gas-driven pneumatic controllers would be eliminated from new and existing sources, with the exception of those controllers in Alaska where electricity and solar power is not available. At those facilities, low-bleed pneumatics would be required. At upstream oil and natural gas facilities, pneumatic controllers are used in a wide variety of applications and circumstances, but their main function is to ensure safe operations for facilities that are generally unmanned. To perform this purpose, those controllers need to be reliable and robust, as failure of a controller can potentially lead to spills, fires, and injury to workers.

Alliance members support reducing emissions from our operations, including emissions from pneumatic controllers. In fact, Alliance members in basins across the country have taken on projects to retrofit facilities with intermittent bleed and low bleed controllers, outfitted facilities with instrument air equipment, and routed emissions from facilities to control devices where possible. However, these retrofits and equipment modifications are not applicable in all scenarios. For this reason, EPA should allow more flexibility in any proposed pneumatic controller requirements.

First, EPA should allow for the flexibility to route emissions to a control device where one already exists. Where control devices and flares are adequate at reducing methane emissions by 95% for other processes and equipment, there is little justification to treat pneumatic controllers differently. This should be sufficient to reduce emissions from most controllers at facilities with high throughput.

For those facilities that do not already have a control device on location, typically because they are low-production locations, options for effectively reducing emissions from pneumatic controllers are limited. For example, EPA has overstated the effectiveness and functional application of both solar and mechanical controllers. For many applications,

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mechanical controllers are not reliable and can't be used in higher pressure implementations.

For solar controllers, limitations are not only based on availability of sunlight. Average ambient temperature is an important concern for ensuring battery power is reliable for functioning when sunlight isn't available, while the prevalence of fog or dust can also limit solar controller effectiveness. In fact, solar controllers are a relatively new technology that is still being evaluated for its effectiveness and reliability. EPA should not force operators to trade safety and reliability for a slight decrease in emissions when other options are available.

As a further example, in the Uinta Basin, there are certain times of year where fog can sit over the basin for several weeks, effectively making solar controllers useless. In much of that area electrical power is also unavailable. For this reason, if portions of Alaska are exempted from proposed requirements, then other areas of the country need to be evaluated as well. In the West, line power is often unattainable where endangered species concerns preclude the construction of power lines and other infrastructure. Northern basins have concerns with cloud cover, snow, and battery reliability. Southern basins have concerns with dust and heat/humidity related battery reliability. These concerns are not effectively addressed in EPA's publication.

Even electrical controllers have their limitations, as they can generally only be used to control valves. So even in situations where electricity is available, often it won't be sufficient to reliably keep the entire facility operating safely.

In addition, at older facilities where more than electric controllers are required, the only remaining option would be to install a diesel or natural gas driven compressor to use compressed air to control pneumatics. In those cases, older facilities that currently have very little throughput, and therefore very little emissions from pneumatics, installing a gas driven or diesel driven air compressor could increase GHG emissions from the facility, or at the very least result in a very small reduction in emissions. For those facilities, in the OOOOc context, low-bleed or intermittent bleed controllers should be required.

Additionally, EPA has significantly underestimated the cost and difficulty of retrofitting facilities to comply with the regulation. Alliance member estimates from actual retrofit projects range to as high as \$250,000 per facility for large facilities with many controllers, which is a price point far outside the range described in EPA's publication.<sup>4</sup> While these costs may be lower for lower-producing facilities, the fact that EPA estimated the top end for the range for large facilities to be only \$96,000 signals there is a flaw in the calculation for it to be that far off actual project execution.

<sup>4</sup> 86 FR 63206

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Additionally, for smaller facilities that have lower production, installing and operating instrument air systems could easily exceed the value of the recoverable production from the wells associated with those facilities, forcing those operators to shut in production. Across the United States there are thousands of wells that would be rendered uneconomic to operate should the framework described in EPA's publication be proposed for existing sources. For this reason, EPA should propose a rule that allows for low or intermittent bleed devices to be used for existing facilities.

Finally, EPA has not adequately considered the impacts of the current supply chain interruptions on the ability for operators to comply with the rule. Specialized equipment, such as air compressors, electric controllers, and equipment needed to retrofit facilities have been particularly hard-hit by supply chain constraints related to COVID-19. Alliance members have experienced delays of several months in acquiring equipment to retrofit facilities to instrument air, all prior to this publication being made. The increased demand for that equipment given potential rule requirements to be proposed would only exacerbate the challenges associated with acquiring that equipment.

EPA should ensure that a significant amount of time be provided to operators in complying with the rule for new and existing sources to allow for operators to continue to operate their facilities. The Alliance recommends a phase-in period of 3 years for new and modified facilities to install equipment required to meet a non-emitting standard, and a longer period of 7 years for existing facilities to retrofit equipment with low-bleed, intermittent bleed, or non-emitting controllers.

# IV. EPA's Liquids Unloading Requirement Should Be Limited to Gas Wells that Vent to Atmosphere

Liquids unloading is a practice that will inevitably be applied to most wells along their lifetimes. Because of this, Alliance members are committed to minimizing emissions from liquids unloading events and continue to share best practices and techniques. The Alliance therefore is supportive generally of developing Best Management Practices (BMPs) to be applied to liquids unloading but doing so in such a way that avoids duplication of reporting efforts and unnecessary requirements.

Primarily, EPA must clarify within its proposed rule that liquids unloading requirements are only applicable to gas wells that vent to atmosphere, consistent with the Technical Support Document for liquids unloading. Considering these activities and techniques do not contribute in any significant way to methane emissions, there is no justification for them to be subject to recordkeeping and reporting requirements as affected facilities. Consistent with this reasoning, option 1 is not technically feasible. Instead, the Alliance generally supports the approach in option 2. This approach should also limit the required recordkeeping and reporting requirements such as to not duplicate the reporting made by operators in EPA's Greenhouse Gas Reporting Rule Subpart W.

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In addition, when developing BMPs for liquids unloading, it is important that EPA maintain flexibility as paramount. Techniques used for liquids unloading are certainly not a one-size-fits-all application, as some equipment and processes that may work to remove liquids and minimize emissions at one well may in fact be inefficient or increase emissions if applied to a different well with different operating parameters. EPA should work with industry to select already developed BMPs to apply to liquids unloading operations.

The Alliance supports the language that EPA includes in the publication: "following specific steps that create a differential pressure to minimize the need to vent a well to unload liquids and reducing wellbore pressure as much as possible prior to opening to atmosphere via storage tank, unloading through the separator where feasible, and requiring an operator to remain on-site throughout the unloading, and closure of all well head vents to the atmosphere and return of the well to production as soon as practicable." This language, if applied as criteria for an operator's BMPs, would provide for emissions minimization across all types of liquids unloading event without prescribing certain technologies.

# V. EPA's Alternative Leak Screening Language Limits Development of Effective New Technologies

EPA describes an approach for alternative screening using advanced measurement technologies within the publication to encourage the use of area-wide technologies to better identify emissions sources. The Alliance supports this general approach, and in fact Alliance members have recently piloted and evaluated several different approaches and technologies for area-wide and screening surveys. While the field of methane and emissions detection is rapidly advancing, and various technologies have shown effectiveness in different scenarios, there are advancements and developments in the technology that industry and EPA cannot foresee.

The Alliance is concerned that EPA's alternative leak screening proposal is too prescriptive and will limit our members' ability to effectively incorporate new technology into their leak detection and repair programs. For example, a single detection limit is inappropriate, and EPA should consider a range of sensitivities and frequencies to make that determination. EPA should explore the capabilities of emission mitigation modeling to determine the appropriate survey frequency required to achieve equivalence with current OGI survey requirements, as various detection thresholds used at different frequencies can be more effective than the described OGI requirements.

By setting a specific detection threshold, EPA is unnecessarily limiting the breadth of technologies that can be used by Alliance members, and in turn limiting the potential for the development of new technologies in the future that could have otherwise effectively reduced emissions from oil and gas production, which runs contrary to the Administration's goals. The Alliance encourages EPA to evaluate the broad range of comments and data available from technology developers and adjust the alternative

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screening framework before proposing a rule so that the rule language allows for the broadest possible technology application.

In conclusion, Western Energy Alliance encourages EPA to continue to evaluate the provisions discussed within the publication, so that ultimately when a rule is proposed, it can fully allow for the intricacies and nuance required to effectively regulate industries as complex as the upstream and midstream oil and gas segments. EPA's summary of potential rule provisions lacks flexibility and consideration for several factors that will make compliance impractical, if not technically infeasible, and in some cases may result in an overall increase in total greenhouse gas emissions.

Further, certain provisions in the rule would render large swaths of production in the United States uneconomic to continue to operate, which will only further constrain domestic supply and force domestic energy users to be more dependent on oil produced overseas, where EPA's jurisdiction doesn't extend. Creating rules that force the shutting in of wells in the United States to instead ship more oil across the ocean from less regulated countries ultimately increases global greenhouse gas emissions and introduces negative externalities that EPA has seemingly ignored in the development of this rulemaking.

Western Energy Alliance encourages EPA to implement the solutions proposed above, in addition to the concerns we shared in the Producer Associations comments. We would be happy to discuss these comments in further detail, should EPA find any further clarification or discussion about the issues identified in this letter to be useful.

Sincerely,

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Tripp Parks Vice President of Government Affairs