

40 CFR Part 60 Subpart OOOOc Final State Plan

Bureau of Air Quality
August 2026



Agenda

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- State Plan Components
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- Public Comment Period
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Background

- On March 8, 2024, the U.S. Environmental Protection Agency (EPA) finalized rules to reduce emissions of methane and volatile organic compounds (VOCs) from the oil and natural gas sector.
 - New Source Performance Standards (NSPS) for facilities built/modified/reconstructed after 12/6/2022 (OOOOOb). These standards are incorporated by reference.
 - Emissions Guidelines (EG) for states to follow in designing and executing state plans to cover existing sources (OOOOOc).



Background

- The EPA's rule applies to oil and gas facilities involved in:
 - production and processing, including equipment and processes at well sites, storage tank batteries, gathering and boosting compressor stations, and natural gas processing plants.
 - natural gas transmission and storage, including compressor stations and storage tank batteries.
- EPA's new rule requires frequent monitoring and repair of methane leaks at well sites, centralized production facilities, and compressor stations using established inspection technologies or, at an operator's selection, novel advanced detection technologies.
- The rule imposes several new requirements on reciprocating compressors, centrifugal compressors, pneumatic pumps and controllers and sweetening units, as well as the completion process and liquids unloading process.



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Presumptive Standards

- Compliance must be demonstrated through performance testing, monitoring, recordkeeping, and reporting.
- At the direction of EPA, operators must investigate and report on emissions of 100 kg/h or more that are detected by certified third-party notifiers.
- Wellbore liquids unloading operations must be conducted without emissions to the atmosphere if feasible or using best management practices otherwise.
- Associated gas must be recovered and either routed to a sales line, used as an onsite fuel or for another beneficial use, or reinjected into a well, except in certain limited circumstances.



Presumptive Standards

- Except at a well site, a centrifugal compressor using wet or dry seals must be monitored and replaced if emissions exceed 3 scfm. A wet seal centrifugal compressor must also route emissions from the wet seal degassing system to a control.
- Except at a well site, a reciprocating compressor rod end packing must be monitored and replaced if emissions exceed 2 scfm.
- Process controllers must be operated with zero methane emissions to the atmosphere.
- Pumps must be operated with zero methane emissions to the atmosphere unless the site does not have access to electrical power and has fewer than three natural gas-driven diaphragm pumps. Emissions from the natural gas-driven diaphragm pumps must be routed to a process, VRU, or control if one is on site and if it is technically feasible, regardless of the actual control efficiency.



Presumptive Standards

- Storage vessels and tank batteries must install control if PTE exceeds 20 tpy of methane or actual emissions exceed 14 tons on a 12-month rolling basis.
- Fugitive emissions components at well sites must be monitored using the required methods and frequency based on the equipment located on site.
- Fugitive emissions components at centralized production facilities must be monitored bimonthly using AVO and quarterly using instrument based LDAR.
- Fugitive emissions components at a compressor station must be monitored monthly using AVO and quarterly using instrument based LDAR.
- Fugitive emissions from process equipment at a natural gas processing plant must be monitored using the required methods and frequency unless using an approved alternative monitoring method except in certain limited circumstances.



State Plan Components

- To demonstrate compliance with OOOO_c, states must submit a State Plan to the U.S. EPA by January 22, 2027. Required components of a state plan include:
 - Inventory of designated facilities and their emissions.
 - Compliance schedules for each designated facility or logical grouping.
 - Standards of performance, including compliance demonstration requirements. Standards must be at least as stringent as the model rule except as determined when examining remaining useful life and other factors (RULOF).
 - Documentation of meaningful engagement of the State Plan or State Plan revision.

State Plan Components (cont.)

- Certification that public hearings were held, including a list of witnesses, their affiliation, and a summary of their comments.
- Provisions for progress reports to EPA.
- Identification of enforceable state mechanisms to implement the State Plan.
- Demonstration of the Commonwealth's authority to carry out the State Plan.



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Enforceable State Mechanism

- States must include, adequately document, and demonstrate the methods employed to implement and enforce the standards. The EPA provides options for states to meet this requirement:
 - State Permits or General Permit
 - Administrative Orders
 - Administrative Rulemakings
- In the proposed State Plan the Department proposed a General Permit approach for OOOOc as the enforceable state mechanism, to be proposed and developed after the close of the State Plan public comment period.



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Meaningful Engagement

- The Department presented a draft State Plan to:
 - Air Quality Technical Advisory Committee (AQTAC) - Oct. 10, 2024
 - Small Business Compliance Advisory Committee (SBCAC) - Oct. 23, 2024
 - The joint meeting of the Citizens Advisory Committee (CAC) and Environmental Justice Advisory Board (EJAB) - Nov. 12, 2024
 - Oil and Gas Technical Advisory Board (TAB) - Dec. 5, 2024
 - PA Grade Crude Development Advisory Committee (CDAC) - Dec. 12, 2024
- The Department returned to AQTAC, SBCAC, and CDAC on Feb 6, 26, and April 24, 2025 respectively to provide an update on the department's enforcement mechanism approach of General Permits
- Additionally, the DEP held a public webinar on April 1, 2025

Public Comment Period

- The proposed State Plan was published on May 31, 2025 for a 60-day public comment period.
- The Department scheduled six in-person public hearings across the Commonwealth, and one virtual public hearings. An additional virtual public hearing was scheduled in response to a request from the public.
- The public comment period closed on July 30, 2025.
- A high level of public interest in the proposed State Plan resulted in over 10,000 public comments submitted.



General Supportive Comments

- Some commentators supported the efforts to reduce methane emissions, considering health, climate, the environment, and economic impacts.
- Some commentators appreciated the Department's willingness to mirror the provisions of the federal model rule into the State Plan by reference, citing shifting federal requirements.
- Some commentators suggest the Department bring these new protections into effect faster than the proposed timeline, citing a concern of reducing harmful pollutions as quickly as possible.



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General Adverse Comments

- Some commentators suggested that the State Plan treats conventional and unconventional wells the same and fails to account for the difference between these types of wells, their production levels, and the types of equipment used.
- Some commentators stated that the costs of the State Plan would be burdensome for the conventional industry, potentially resulting in loss of jobs, abandonment of wells, and loss of oil and gas supply.

Specific Section Comments

- Some commentators encouraged the Department to develop standards that are longer-lasting, durable, strong, permanent, enforceable, or rooted in DEP's authority. Others explicitly asked the department to enforce the standards through a formal rulemaking.
- Some commentators suggested the Department abandon the proposed process of incorporating the standards into a General Permit, and return to the formal rulemaking process, citing differences between conventional and unconventional oil and gas operations in Pennsylvania.



Specific Section Comments

- Some commentators encouraged the Department to use a permit-by-rule mechanism for enforcement, citing shifting federal requirements.
- Some commentators recommended the Department pause, slow down, or suspend the process, citing shifting changes to the federal regulations.



Specific Sections Comments

- Some commentators suggested that the use of Method 21 or Optical Gas Imaging for leak detection is not well-suited and too costly for low volume wells, and that these wells should be exclusively required to use Audio, Visual, Olfactory (AVO) detection methods.
- Some commentators suggested that the Department did not adequately consider RULOF in the State Plan.



Specific Sections Comments

- Some commentators requested consultation with the conventional industry operators to analyze RULOF, and encouraged flexibility around areas such as RULOF.
- Some commentators requested further details on the implementation of the General Permit.

Specific Section Comments

- Some commentators, citing public health and climate change, encourage the Department to adopt stronger protections, specifically:
 - Create more protective standards against flaring
 - Include leak monitoring and replacement of outdated equipment
 - Require quarterly leak monitoring.
 - Include separators in complex well sites, and monthly inspections of the equipment
 - Require faster timelines to repair leaks once detected



Specific Section Comments

- Some commentators urge the Department to include smaller and marginal wells, and require more frequent monitoring of these sites.
- Some commentators recommend the Department increase engagement with communities and residents living near fracking and oil and gas drilling.



Act 45 of 2025

- After the close of the public comment period, on November 12, 2025, new requirements were enacted into Pennsylvania law under section 6.1(g) of the Air Pollution Control Act 35 P.S. § 4006.1(g)) and Act 45 of 2025 that mandate the review of general permit applications within a 30-day timeframe.
- This complicated the implementation of the proposed General Permit enforcement mechanism. Considering the volume of applications and staff limitations, the Department determined that the General Permit approach would be untenable.

Federal Regulatory Changes

The EPA has made several key revisions to the federal standards:

- July 31, 2025 – Postponed several OOOOb key compliance and reporting deadlines; suspended implementation of the "Super Emitter" Program; and extended the State Plan submittal deadline until January 22, 2027.
- April 4, 2026 – Revised requirements in OOOOb for flaring of associated gas.
- May 1, 2026 – Issued guidance regarding continued routine flaring at wells after May 7, 2026 in limited circumstances.
- Changes to monitoring of net heating value (NHV) of the inlet gas stream to a control.



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State Plan Major Revisions

- Based on public comments, the enactment of Act 45 of 2025, and changes at the federal level, the Department is revising the proposed General Permit enforcement mechanism.
- To enforce the requirements under 40 CFR Part 60 Subpart OOOOc, the Department will propose a state rulemaking process under the authority of the APCA.
- These revisions are reflected in the final State Plan, and the Model Rule language has been removed.
- The State Plan was also revised to reflect federal changes and incorporate requirements for meaningful engagement and public testimony.

Next Steps

- Submission of the State Plan to EPA by January 22, 2027 for conditional approval.
- Conduct an information request for equipment inventories from conventional well site and centralized production facility operators.
- Review collected data to determine appropriate standards of performance.
- Draft the proposed rulemaking package.
- Conduct public engagement for each proposed rulemaking, and present to advisory committees.
- Presentation to the Environmental Quality Board for consideration.



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The Department of Environmental Protection's mission is to protect Pennsylvania's air, land and water resources and to provide for the health and safety of its residents and visitors, consistent with the rights and duties established under the Environmental Rights Amendment (Article 1, Section 27 of the Pennsylvania Constitution).