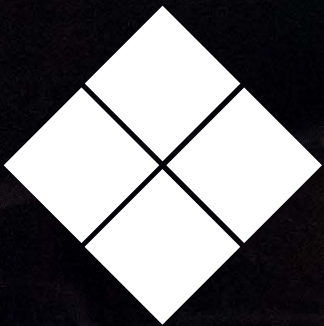


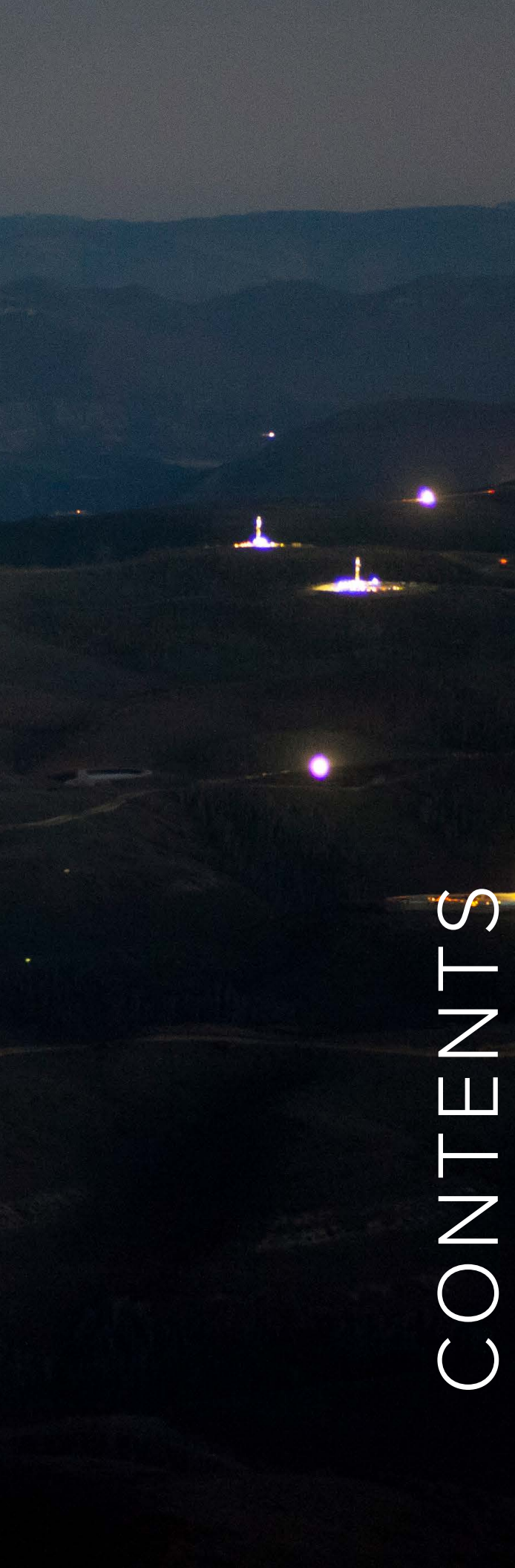


# EMPTY ENFORCEMENT

*Examining state oil  
and gas enforcement  
across the West*



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**WESTERNPRIORITIES.ORG**



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*by*

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# INTRODUCTION

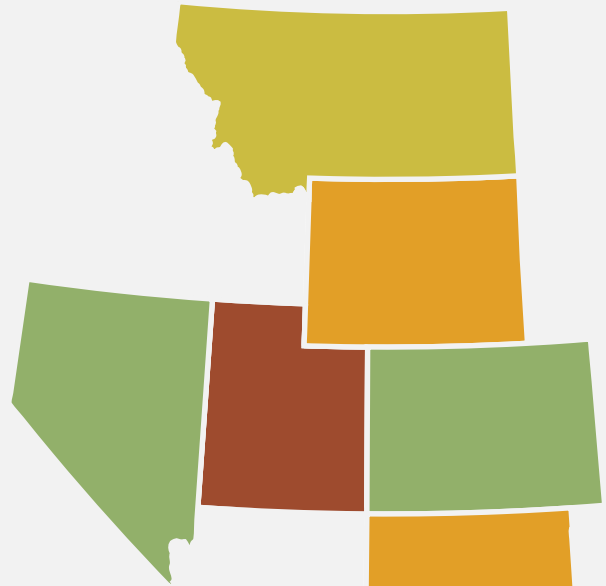
For decades, oil and gas development has spread across the American West, driving local economies through boom and bust cycles, fragmenting wildlife habitat, and harming communities with air and water pollution. States play a critical role in protecting public health and the environment by inspecting oil and gas facilities, identifying violations, and, when appropriate, issuing financial penalties. However, the structure and success of oil and gas enforcement programs varies widely from state to state. An examination of Western state oil and gas enforcement finds that while some states have successful programs worth emulating, many have room to improve in order to adequately protect the health and safety of local communities and hold companies accountable.

This new analysis by the Center for Western Priorities finds that many Western state oil and gas enforcement programs are at times understaffed, leading to low inspection rates. Few states issue financial penalties that are adequate to ensure oil and gas companies are complying with regulations, with some states issuing no financial penalties at all. In total, Western state oil and gas

enforcement programs only collected \$5.5 million from 62 fines in 2018, with more than 95 percent of that value assessed in Colorado. Critically, state enforcement programs often lack transparency, leaving the public in the dark. While some states have improved in recent years, decades of studies have shown that most states face chronic problems<sup>1</sup> when enforcing oil and gas regulations.

Looking across states, Utah has historically had the worst enforcement, while Wyoming and New Mexico are in the process of improving programs. Colorado, Montana, and Nevada have some of the stronger oil and gas enforcement programs, although they have opportunities to improve.

Enforcing environmental and safety regulations is especially critical as an oil and gas boom prepares to bust. With widespread operations and crashing oil prices, companies are looking to cut costs, and many may face the prospect of bankruptcy. It is critical that Western states prioritize improving their oil and gas enforcement programs to protect local communities and the environment, and make sure taxpayers aren't left on the hook for cleanup costs.



# HOW IS YOUR STATE DOING?

**BEST IN THE WEST**  
**MIDDLE OF THE PACK**  
**TRYING TO CATCH UP**  
**WORST IN THE WEST**

STATE	PROGRAM QUALITY	SUMMARY OF FINDINGS
Colorado	Best in the West	Commission collected the most financial penalties out of Western states. Good transparency. Staffing constraints have resulted in incomplete violation notice follow-ups and unassessed penalties over the last two years.
Montana	Middle of the pack	The second-most financial penalties, but with very low values assessed. 2018 inspection rates would require over two years to inspect all active wells under state jurisdiction.
Nevada	Best in the West	A miniscule industry results in thorough enforcement but raises questions about extensive leasing.
New Mexico	Trying to catch up	The previously toothless agency did not follow up on numerous violation notices, has by far the most spills, high staff vacancy rates, poor budget utilization, and requires high rates of inspection from staff. Unable to directly assess financial penalties until early 2020, but will now hopefully carry through financial consequences.
Utah	Worst in the West	The only program still unable to directly assess financial penalties. Toothless division issued no fines for 24 years, has high staff vacancy rates, and historically under-utilized its budget.
Wyoming	Trying to catch up	Extremely poor enforcement transparency. Commission does not track inspections or noncompliance issues, but is working on implementing a system. Issued the third-most fines 2018. Estimated inspection rates are low and would require over three years to inspect all non-plugged and abandoned wells under state jurisdiction.

## Going forward, states should:

1. Adopt a goal of inspecting all active wells once a year.
2. Track and publish all inspections, violations, resolutions, and penalties to increase enforcement transparency.
3. Standardize financial penalties in written public policies. These should include the time allowed to come into compliance and violation follow-up procedures.

4. Ensure state oil and gas enforcement agencies have the authority to directly assess financial penalties.
5. Increase financial penalties and their issuance such that the cost of noncompliance is greater than that of compliance.

To accomplish the above goals, states should better fund oil and gas enforcement programs where necessary and fully utilize budgets where applicable.

This report provides information on Western state oil and gas enforcement, followed by state-specific deep dives and supporting analyses.

## State oil and gas enforcement overview

State	Active wells under state enforcement jurisdiction (current)	Number of 2018 inspections	Number of 2018 violation notices	Number of fines in 2018	Total value of 2018 fines
Colorado	49,868 <sup>2</sup>	31,774 <sup>3</sup>	131 <sup>4</sup>	32 <sup>4</sup>	\$5,221,716 <sup>4</sup>
Montana	11,084* <sup>5</sup>	4,881 <sup>5</sup>	177 <sup>5</sup>	23 <sup>5</sup>	\$23,970 <sup>5</sup>
Nevada	60 <sup>6</sup>	123 <sup>6</sup>	0 <sup>6</sup>	0 <sup>6</sup>	\$0 <sup>6</sup>
New Mexico	54,711 <sup>7</sup>	41,574 <sup>7</sup>	2,129 <sup>7</sup>	0 <sup>7</sup>	\$0 <sup>7</sup>
Utah	4,591 <sup>#8</sup>	6,859 <sup>9</sup>	29 <sup>9</sup>	0 <sup>9</sup>	\$0 <sup>9</sup>
Wyoming	25,443 <sup>+10</sup>	7,000 <sup>^11</sup>	Not part of regulatory framework <sup>12</sup>	7 <sup>12</sup>	\$235,000 <sup>12</sup>

\*Excludes UIC wells, data unavailable. UIC well numbers insignificant for other states, but included in count.

#"Wells capable of production," per Utah records, in order to best match 'active' definitions of other states.

+Non-plugged and abandoned wells; Wyoming does not classify wells as active in the same manner as other states.<sup>12</sup>

^Wyoming estimate. Inspection counts have historically not been tracked.<sup>12</sup>





## WHAT IS ENFORCEMENT?

**W**estern states are home to vast stretches of national public lands and federally-owned mineral rights, which private companies can lease for oil and gas extraction. Enforcement jurisdiction is divided between the Bureau of Land Management (BLM) Inspection and Enforcement Program<sup>16</sup> and state enforcement programs. Most states have responsibility for state and privately-owned (also called fee) mineral leases,\* while the BLM has primary responsibility for enforcement on federal mineral leases. Some states have signed agreements with the federal government that allows them enforcement jurisdiction on federal leases. This analysis focuses on state enforcement program activities during 2018.

Every state has a division, board, or commission responsible for overseeing the oil and gas industry. These bodies issue permits, collect information used to assess fees and taxes, and hire inspectors to ensure compliance with environmental and safety regulations. The size of oil and gas industries overseen by these bodies varies dramatically across

states, as do jurisdiction and exact inspection and enforcement procedures.

Well inspections and reporting audits by state or federal personnel are the first step in the enforcement process. Inspectors visit oil and gas rigs looking for safety or environmental violations and document findings in photographs and reports. Enforcement programs then inform operators of noncompliant issues, and, upon continuing violations, penalize operators in the form of fines.

Many states try to reach an agreement with operators to resolve violations before fines are assessed or the matter is taken to a hearing. If a company has gone bankrupt or become defunct, states may revoke well bonds<sup>13</sup> (funds used to insure wells prior to drilling) to address violations. Regulators use bonds to reclaim orphaned wells, although evidence suggests<sup>14</sup> that outdated bonding requirements are insufficient<sup>15</sup> to cover costs, creating a growing backlog of unreclaimed orphan wells.

\*In addition to all Class II Underground Injection Control (UIC) wells via federal delegation of the EPA underground Injection Control Program.<sup>17</sup>



# THE NEED FOR STRONG ENFORCEMENT

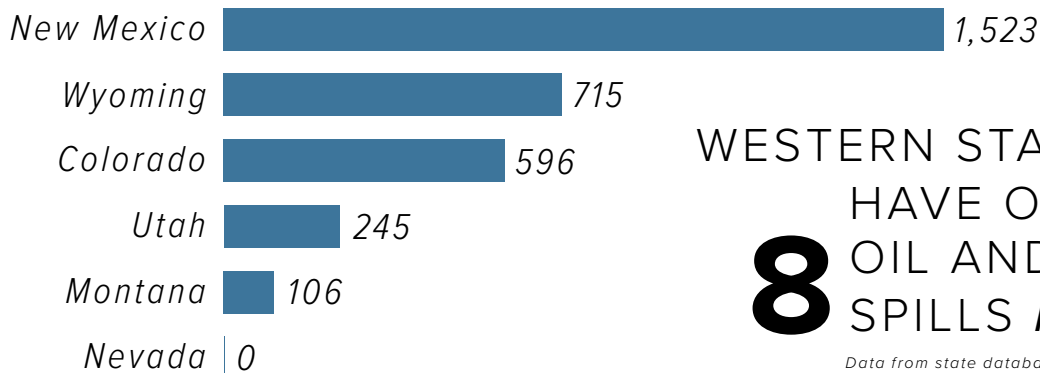
Since oil and gas development began, drilling has led to spills and releases that have harmed surrounding communities, workers, and wildlife. Over time, states and the federal government have developed a range of safety and environmental regulations in an attempt to reduce these impacts. However, to see results, oil and gas companies must actually comply with these regulations, hence the need for strong enforcement.

Drilling sites are dangerous. Tragically, evidence has shown that an oil and gas worker dies on

the job once every three months<sup>18</sup> in Colorado. Environmental hazards from oil and gas development are also common. Recent analysis shows that the West's top three oil and gas producing states reported an average of 8 spills per day in 2019.<sup>19</sup> Oil and gas related spills and releases are composed of crude oil, natural gas, and produced water, which is often laden with toxic chemicals.<sup>20</sup>

Active wells should be inspected at least once a year, as evidence demonstrates<sup>21</sup> that inspections

## 2018 Western oil and gas spills or releases



WESTERN STATES  
HAVE OVER  
**8** OIL AND GAS  
SPILLS *PER DAY*

Data from state databases and employees<sup>5,6,19,63</sup>



of oil and gas operations increase compliance. Equipment failure is often cited<sup>22</sup> as the main cause of incidents<sup>20</sup> on drilling sites, many of which are preventable with enhanced inspection and operator vigilance.

Utah is a case study in the need for financial penalties in oil and gas enforcement. A 2019 audit<sup>9</sup> of the Utah Oil and Gas Program found numerous deficiencies, including a complete lack of fines over the past 24-year history of the program. Violations that resulted in fines in other states went without penalty in Utah. In response, department leaders admitted<sup>23</sup> to a “culture of noncompliance” within the state.

Utah auditors<sup>9</sup> laid out the need for financial enforcement, writing:

*“Management reports that Operator A has blatantly disregarded the NOV’s [Notices of Violation], more than likely realizing that there is no consequence for doing so... Management confirmed that some industry operators are aware of the lack of consequence associated with NOV’s and have used negligence to their advantage.*

*Receiving an NOV, or several NOV’s, with no consequences may become a competitive advantage for noncompliant operators who cut corners. Failing to enforce penalties as outlined in statute has fostered a culture of noncompliance. Noncompliant operators are anticipated to cost taxpayers approximately \$1 million.”*

As Utah’s deficiencies demonstrate, standardized substantial fines are necessary in the enforcement process to prevent operator noncompliance, unnecessary risk, and taxpayers being left on the hook for cleanup costs.

## Oil & gas terminology

### BONDING

Oil and gas companies are required to secure a bond, or a set amount of money held by the state, to guarantee compliance with regulations. This bond ensures proper permitting has been obtained, and that regulations will be adhered to in the exploration, drilling, and reclamation process. Bonds are most often revoked from defunct operators who leave behind orphaned wells when their companies go out of business.

### NOV / NOAV

Notices of Violation (NOVs) and Notices of Alleged Violation (NOAVs) are documents produced by state enforcement agencies in order to inform operators of violations. They occur after inspections, and before hearings or financial penalties, although their exact usage differs across states. For example, in Montana NOV’s are violation-finding inspection reports given to an operator, which then has a timeline within which to correct the violation. In Colorado, NOAV’s are reserved for violations of higher class and almost always seek a financial penalty.

### SPILL

An oil and gas rig spill can contain multiple materials. The most commonly released material is “produced water,” salty wastewater often laden with toxic chemicals. Spills can also be composed of oil, condensate, and drilling fluids.

### ORPHANED WELL

An orphaned well is a well left behind by an operator who has gone out of business. These wells are extremely costly to properly dispose of, leaving the financial burden on either state or federal taxpayers. Well bonding is supposed to serve as a financial protection against orphaned wells, but research has shown that bond amounts are too low to adequately dispose of orphaned wells.

### CLASS II UNDERGROUND INJECTION CONTROL WELLS

Class II Underground Injection Control Wells (UIC Wells) are wells that inject fluids into the earth in association with oil and gas production. Injection is usually for storage, disposal, or enhanced recovery purposes. Most state enforcement agencies have primacy over Class II UIC programs, including wells on federal leases.



# EVALUATING OIL & GAS ENFORCEMENT ACROSS THE WEST

Previous research<sup>1</sup> has found chronic problems with state oil and gas enforcement programs in the Rocky Mountain West. Deficiencies include consistent understaffing, lack of transparency,<sup>24</sup> rare enforcement actions, trivial fines and penalties, and failure to adequately address these problems.

Our analysis confirms that these shortcomings remain the norm across the West. Some agencies have high staff vacancy rates and a low number of inspections in comparison to the number of wells under their jurisdiction. Some states do not collect or report critical data. Nearly all state agencies continue to collect few fines in comparison to the number of wells, inspections, and violation notices issued. Even when collected, financial penalties are often insufficient to ensure operator compliance.

# Inspection staffing

Inspectors play a critical role in identifying safety and environmental violations at oil and gas sites, helping to protect communities and workers. However, some Western state inspection programs are severely understaffed and struggle to fulfill their mission and ensure operator compliance. As of the end of 2019, all states except Colorado had roughly the same number of inspectors as in 2013.<sup>1</sup> Colorado increased the number of inspectors on staff. While staffing levels have remained largely the same, all states except for Montana and Nevada have seen increased oil and gas production<sup>25</sup> since 2013.

States performed between 123 (Nevada) and over 41,000 (New Mexico) inspections in 2018. Assuming states had the same number of inspectors in 2018 as they did at the end of 2019, this would mean that inspectors in New Mexico, Utah, and Colorado had to perform over a thousand inspections per inspector. Such high ratios of inspections to inspectors raise questions as to the thoroughness and quality of state program inspections. At the same time, slowing the rate of inspections while

leaving staffing levels the same would mean many wells could go uninspected for years at a time. For example, at 2018 rates of inspection, Montana and Wyoming would require 2.3 and 3.6 years, respectively, to inspect active (MT) or non-plugged and abandoned (WY) wells under their primary jurisdiction. These data demonstrate the need to either increase funding for inspectors or fill positions that have already been created. Notably, Utah and New Mexico had staff vacancies at the end of 2019 of 25 percent and 31 percent, respectively.

# Financial penalties

State enforcement programs help protect our air, water, and wildlife. Assessing financial penalties for sustained violations can also help provide critical funds for continued enforcement. However, such penalties are rarely assessed in most Western states, and the penalties that are assessed are often insignificant. Across the country, economic consequences<sup>24</sup> for operator noncompliance do not provide meaningful compliance incentives or deter repeat offenders.

## State oil and gas enforcement staffing and administration

State	Inspectors at the end of 2019	Regulating body vacancies at end of 2019	Inspections per inspector in 2018*	Years to inspect active wells under enforcement jurisdiction <sup>#</sup>	Percent of 2018 regulating body budget used
<b>Colorado</b>	26 <sup>26</sup>	6%	1,222	1.6	94% <sup>27</sup>
<b>Montana</b>	7 <sup>28</sup>	9%	697	2.3	82% <sup>5</sup>
<b>Nevada</b>	1.5 <sup>6</sup>	0%	82	0.5	102% <sup>6</sup>
<b>New Mexico</b>	12 <sup>29</sup>	31%	3,465	1.3	75% <sup>7</sup>
<b>Utah</b>	6 <sup>9</sup>	25%	1,143	0.7	55% <sup>9</sup>
<b>Wyoming</b>	11 <sup>30</sup>	4%	636	3.6	79% <sup>11</sup>

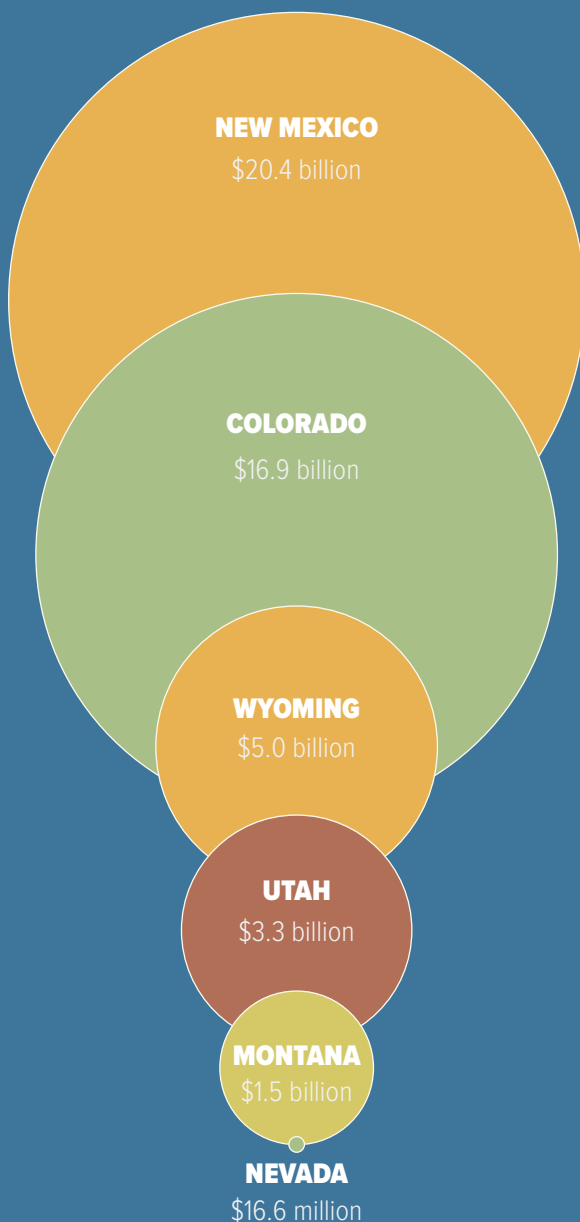
\*Assuming the same number of inspectors as currently employed.

<sup>#</sup>At the rate of 2018 inspections.

# Western oil & gas production

Oil and gas production varies across the West, and can be a good proxy for industry size. Although oil prices have plummeted as market forces combine with the coronavirus pandemic, the oil and gas produced by Colorado and New Mexico in 2018 which would have been valued at tens of billions of dollars based on average 2018 prices. Wyoming, Utah, and Montana follow far behind, with Nevada producing a miniscule amount of product. Calculations are based on 2018 prices of natural gas at \$3.15 per thousand cubic feet,<sup>68</sup> and oil at \$64.90 per barrel.<sup>69</sup> Production amounts are inclusive of federal minerals. See appendix for calculations and additional information.

## ESTIMATED 2018 OIL & GAS VALUE



While Western states produced an estimated \$47 billion of oil and gas in 2018, state regulators only assessed \$5.5 million in fines. Over 95 percent of the fine value collected came from Colorado. Neither New Mexico, Utah, nor Nevada collected any fines in 2018. According to Utah state auditors,<sup>9</sup> the lack of penalties is due to court involvement and lengthy timelines, as Utah regulators are unable to assess fines without a court order. A substantial drop<sup>31</sup> in New Mexico penalties after 2009, the year in which the state became required to go through a district court to assess penalties, suggests the same was the case in New Mexico in 2018. Wyoming only collected seven fines in 2018, a surprisingly low number for one of the largest oil and gas producing states in the West. Colorado and Montana both collected over 20 fines, but with dramatically different price tags: Colorado's average fine value was the highest at \$163,179, while Montana's average fine value was only \$1,042.

## Transparency

State enforcement data is largely inaccessible<sup>24</sup> to the public and difficult to navigate. Montana, Utah, and Nevada only provide most information upon request, and much of their available information is difficult to find and use. Wyoming does not collect necessary information on inspections or noncompliant issues, making it difficult to either internally or externally assess enforcement follow-through. New Mexico provides substantial oil and gas information on its website,<sup>35</sup> but data interfaces related to enforcement are difficult to identify and navigate. In contrast to the striking lack of information transparency in other states, Colorado has enforcement information easily accessible on its website<sup>36</sup> in addition to readily accessible detailed inspection and enforcement documents<sup>37</sup> with written policies and guidelines.

## State oil and gas enforcement financial penalties

State	Financial penalty process	Noncompliant issues reported in 2018	2018 violation notices	Number of fines in 2018	Total value of 2018 fines
<b>Colorado</b>	Assessed by state commission	1,721 <sup>3</sup>	131 <sup>4</sup>	32 <sup>4</sup>	\$5,221,716 <sup>4</sup>
<b>Montana</b>	Assessed by state board	177 <sup>5</sup>	177 <sup>5</sup>	23 <sup>5</sup>	\$23,970 <sup>5</sup>
<b>Nevada</b>	Assessed by state division	0 <sup>6</sup>	0 <sup>6</sup>	0 <sup>6</sup>	\$0 <sup>6</sup>
<b>New Mexico</b>	Required court order until 2019; now assessed by state division	2,129 <sup>7</sup>	2,129 <sup>7</sup>	0 <sup>7</sup>	\$0 <sup>7</sup>
<b>Utah</b>	Requires court order	105 <sup>9</sup>	29 <sup>9</sup>	0 <sup>9</sup>	\$0 <sup>9</sup>
<b>Wyoming</b>	Assessed by state commission	Not tracked <sup>12</sup>	Not part of regulatory framework <sup>12</sup>	7 <sup>12</sup>	\$235,000 <sup>12</sup>

State	Average 2018 fine value	Year of last fine	Number of bonds forfeited in 2018	Value of bonds forfeited in 2018
<b>Colorado</b>	\$163,179	2019 <sup>42</sup>	2 <sup>4</sup>	\$245,000.00 <sup>33</sup>
<b>Montana</b>	\$1,042	2019 <sup>5</sup>	5 <sup>5</sup>	\$130,395.55 <sup>5</sup>
<b>Nevada</b>	N/A	2015 <sup>6</sup>	0 <sup>6</sup>	\$0.00 <sup>6</sup>
<b>New Mexico</b>	N/A	2017 <sup>7</sup>	"Does not have documents responsive to request" <sup>34</sup>	"Does not have documents responsive to request" <sup>34</sup>
<b>Utah</b>	N/A	No documentation of fine ever issued prior to 2019 audit <sup>9</sup>	0 <sup>32</sup>	\$0.00 <sup>32</sup>
<b>Wyoming</b>	\$33,571	2019 <sup>12</sup>	8 <sup>12</sup>	\$360,300.00 <sup>12</sup>



# STATE ANALYSES

A deep dive into  
2018 oil and gas  
enforcement in  
Colorado, Montana,  
Nevada, New Mexico,  
Utah, and Wyoming.



# COLORADO

## A Western leader

The Colorado Oil and Gas Conservation Commission (COGCC) is a leader in Western oil and gas enforcement. The program demonstrates that it is possible to have strong enforcement even while regulating one of the largest oil and gas industries in the West. In addition to regulating state and fee leases, the commission holds a Memorandum of Understanding<sup>38</sup> with the Bureau of Land Management that gives it enforcement jurisdiction over federal leases.<sup>39</sup>

The commission issued 32 fines in 2018, far more than any other Western state. Collectively worth over \$5 million, the average fine value was \$163,179, both significantly higher than any other state. The Colorado agency is also one of few to fully utilize its budget, have low staff vacancies, and be able to inspect all active wells under its enforcement jurisdiction in a timely manner based on 2018 inspection rates (1.6 years). The program has a high level of transparency, with enforcement data available and accessible via the program's Daily Activity Dashboard.<sup>3</sup>



*Best in  
the West*

### KEY STATS

- Active wells under enforcement jurisdiction: **49,868**
- 2018 inspections: **31,774**
- Inspectors at the end of 2019: **26**
- Years to inspect active wells under enforcement jurisdiction: **1.6**
- 2018 Notices of Violation: **131**
- 2018 fines: **32**
- Total 2018 fine value: **\$5,221,716**
- Average 2018 fine value: **\$163,179**
- Commission staff vacancies: **6%**
- 2018 commission budget usage: **94%**

Colorado voters recently re-oriented<sup>40</sup> the commission's mission to prioritize public health, safety, and the environment. Rules resulting from the mission change remain ongoing.

# Opportunities to improve

Although Colorado’s commission has a stronger enforcement program than its peers, the state still has opportunities to improve.

According to the program’s policies,<sup>41</sup> only violations of high class—such as those that threaten public health or the environment—result in violation notices. Of those few violations that result in notices, the commission states that virtually all will seek financial penalties. However, many of these notices are unresolved.<sup>37</sup>

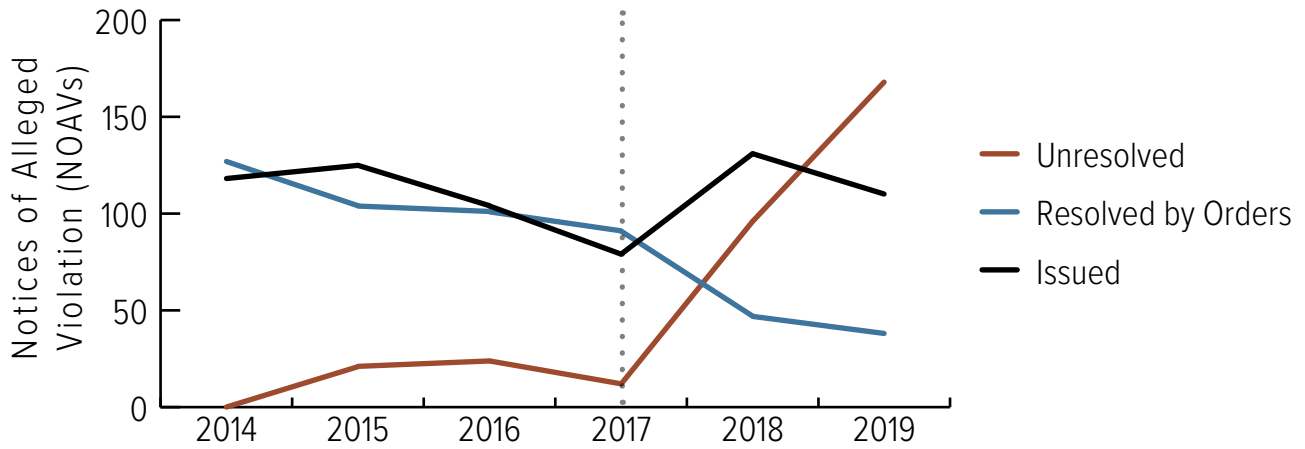
The number of unresolved notices in Colorado has skyrocketed since 2017, with potentially millions

of dollars in penalties unassessed and unpaid by operators with open violations.<sup>42,43,44,45,46</sup> The total value of penalties assessed over the past two years has dropped in tandem with decreased enforcement follow-through.<sup>42,43,44,45,46</sup> These changes cannot be explained by production differences, as there was no significant change in Colorado oil and gas production<sup>3</sup> from 2016 to 2018.\*

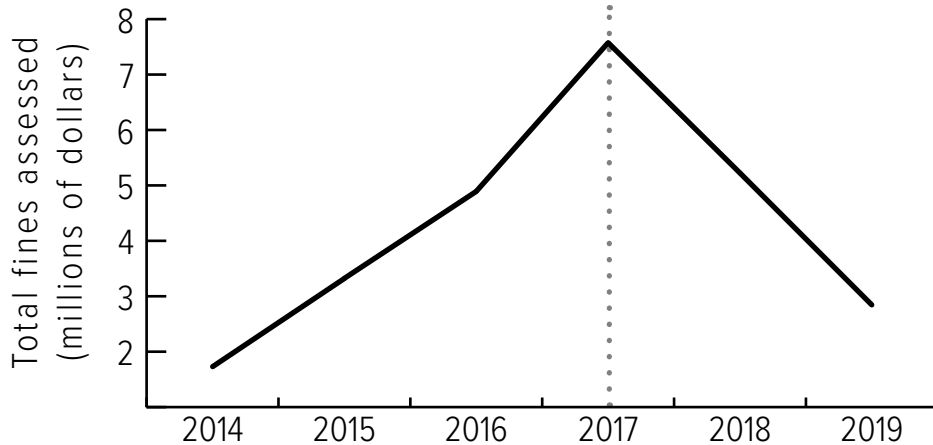
*Unresolved notices of alleged violation in Colorado have skyrocketed since 2017.*

\*As measured by COGCC in Barrels of Oil Equivalent (BOE).

## Colorado Notices of Alleged Violation over time



## Colorado fines assessed over time



Graph data<sup>42,43,44,45,46</sup>





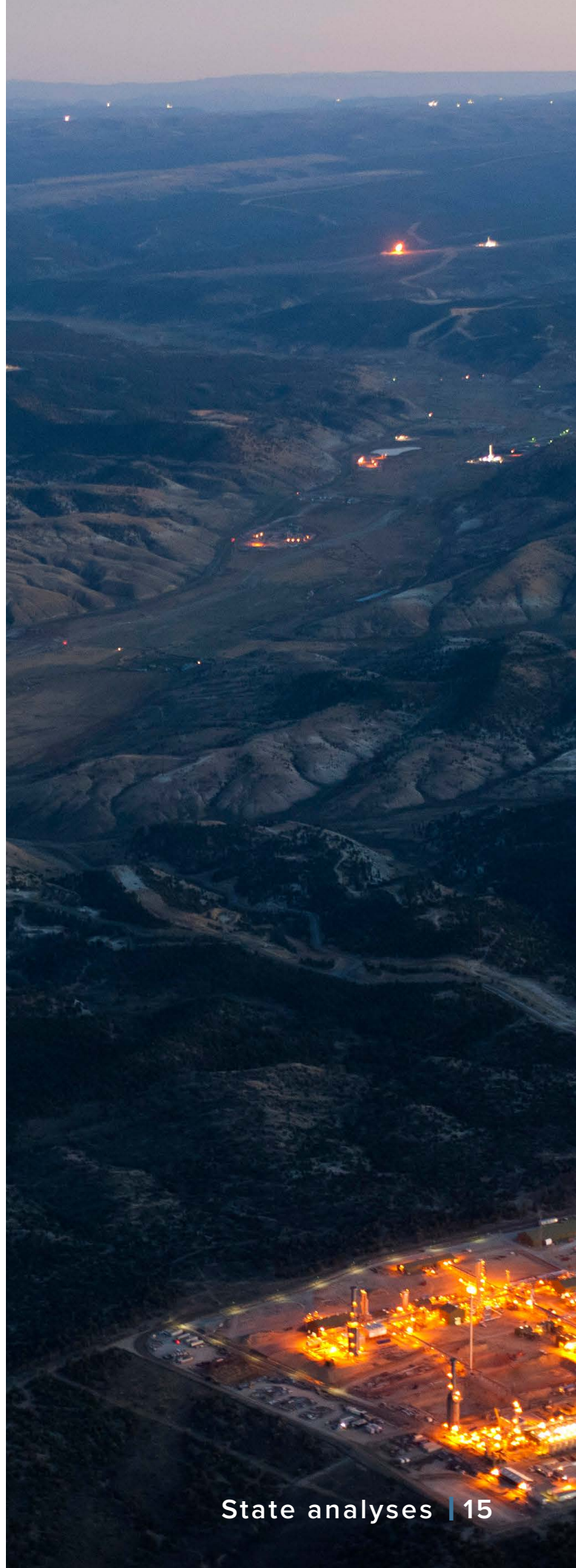
Further analysis of Colorado’s 2018 violation notices shows that 52 percent of violations remained unresolved at the end of 2019.<sup>47</sup> If the average fine value for violations issued in 2018 held across the remaining unresolved violations, they would carry nearly \$9 million in penalties.

In direct correspondence, commission enforcement staff said that open notices of alleged violation are usually due to delays in getting to a final agreement or order, staffing delays and overcapacity, and lack of commission and enforcement officer time.<sup>48</sup>

A recent audit also found that 75 percent of oil and gas operators in Colorado<sup>49</sup> were out of compliance with their monthly well reporting from 2016 to 2018, impacting the accuracy of the state’s severance tax collection. The audit additionally found that the commission penalized none of the companies,<sup>50</sup> which would have been subject to up to \$308 million in fines under the agency’s rules.

## Moving forward

Colorado is a leader in state oil and gas enforcement, but still has opportunities to improve. The high number of unresolved violations shows a need to increase the state’s enforcement budget and resolve issues of overcapacity. By resolving these issues, Colorado can continue to serve as a role model for other states and remain the best in the West.





# MONTANA

## Strong yet small

The Montana Board of Oil and Gas Conservation (MBOG) is another of the stronger state oil and gas enforcement agencies. The board issued the second-most fines of all Western states in 2018, while overseeing one of the smallest oil and gas industries. With low staff vacancy rates, good budget usage, and few spills, Montana is an example of a state making a reasonably good attempt to regulate a small industry.

## Numerous yet inadequate financial penalties

In Montana, inspectors follow up on violations, and those operators who do not come into compliance by the deadline are issued a formal deadline. Those operators who again do not come into compliance are referred to the board for a hearing, where fines and penalties are assessed. Although the board issued the second-most fines in 2018 (28), the average fine was a paltry \$1,042 even after multiple missed opportunities for the operator to come into



*Middle of the pack*

## KEY STATS

- Active wells under enforcement jurisdiction: **11,084**
- 2018 inspections: **4,881**
- Inspectors at the end of 2019: **7**
- Years to inspect active wells under enforcement jurisdiction: **2.3**
- 2018 Notices of Violation: **177**
- 2018 fines: **23**
- Total 2018 fine value: **\$23,970**
- Average 2018 fine value: **\$1,042**
- Commission staff vacancies: **9%**
- 2018 board budget usage: **82%**

compliance. Fines of this scale are a drop in the bucket for many operators. Board code states that the minimum civil penalty is \$75 per day,<sup>51</sup> which is less than half of Colorado's minimum penalty of \$200 per day.<sup>41</sup>

There is a clear need for Montana to increase minimum penalties, as it is highly unlikely that fines on the order of hundreds of dollars will serve as a deterrent for companies valued in the millions or billions of dollars, who continue to violate regulations even in states such as Colorado, which issues average fines on the order of hundreds of thousands of dollars.

*The average fine issued by the Montana Board of Oil and Gas Conservation in 2018 was \$1,042, a drop in the bucket for many operators.*

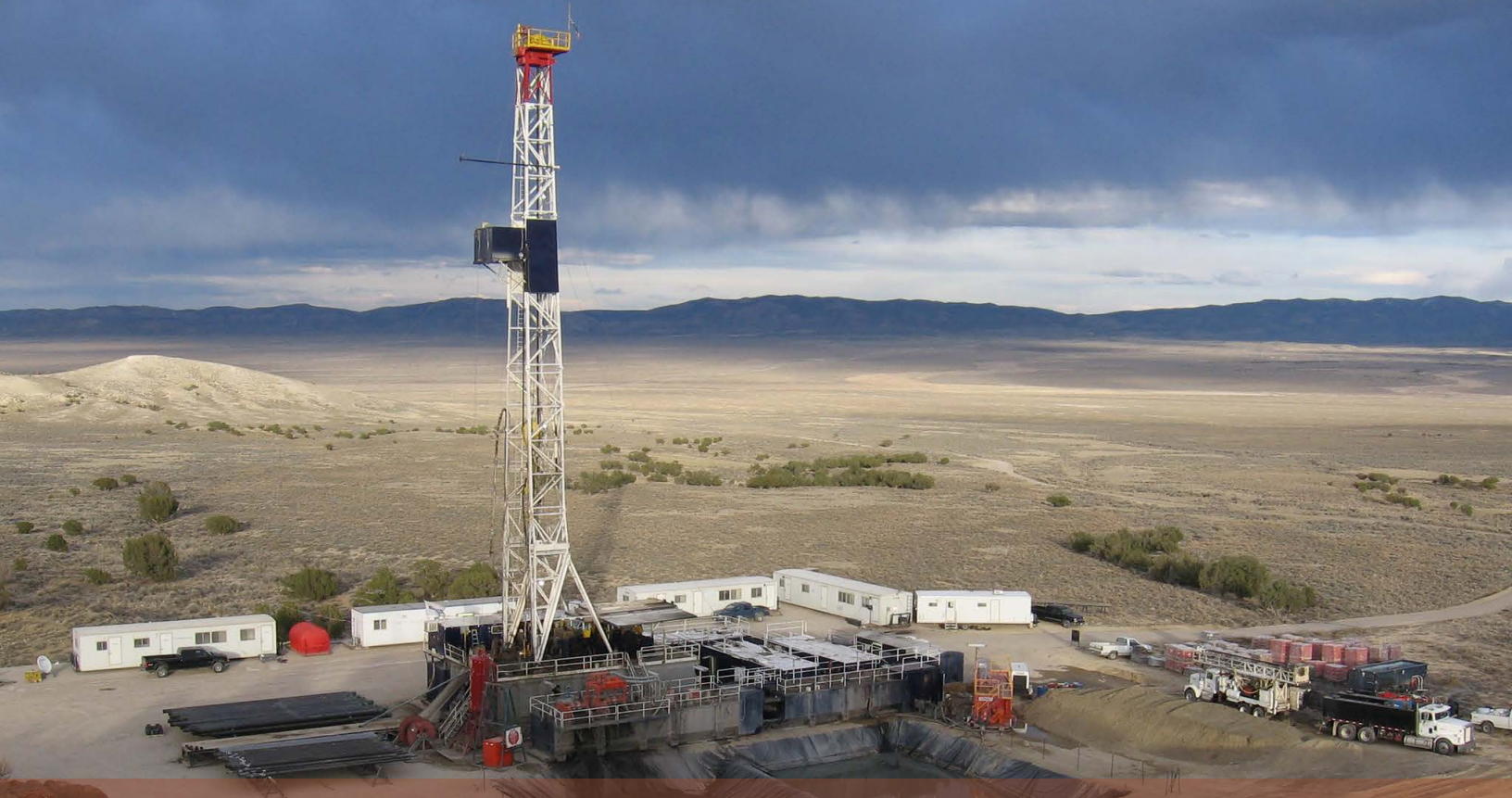
## Healthy but slow inspection

Montana requires a low rate of inspection from its inspectors, which suggests that each of these inspections may be of higher quality. However, the board has a need for more enforcement personnel, as it would take the program over two years to inspect all active wells under its jurisdiction at 2018 rates, assuming that it had the same number of inspectors employed. This rate is nearly the exact same as it was in 2013.<sup>1</sup>

## Minimal penalty policy

Montana's only full penalty policy adopted by the board is that regarding delinquent injection and production reporting.<sup>5</sup> All other fines are determined by the board at hearings or business meetings on a case by case basis. The small fines leveraged against operators within Montana demonstrate the need for a complete written and adopted penalty policy, which would standardize fine amounts across different operators. A new penalty policy would also provide an opportunity to modernize minimum penalties, incentivizing operator compliance.





# NEVADA

## The Outlier: Nearly nonexistent

Nevada is an outlier among the Western states surveyed: there are only 60 active wells in the entire state. There is no oil and gas commission in Nevada. Rather, because the program is so small, it is operated by the Nevada Division of Minerals together with geothermal and dissolved mineral exploration.<sup>6</sup> The division regularly inspects every permitted well within the state, including those on federal land.

Such frequent inspections could potentially result in few violations. However, it is difficult to say whether this is due to good enforcement practices or a miniscule industry.

## Extensive leasing

The minute number of wells in Nevada demonstrates the complete lack of interest that operators have in drilling within the state. Yet, from



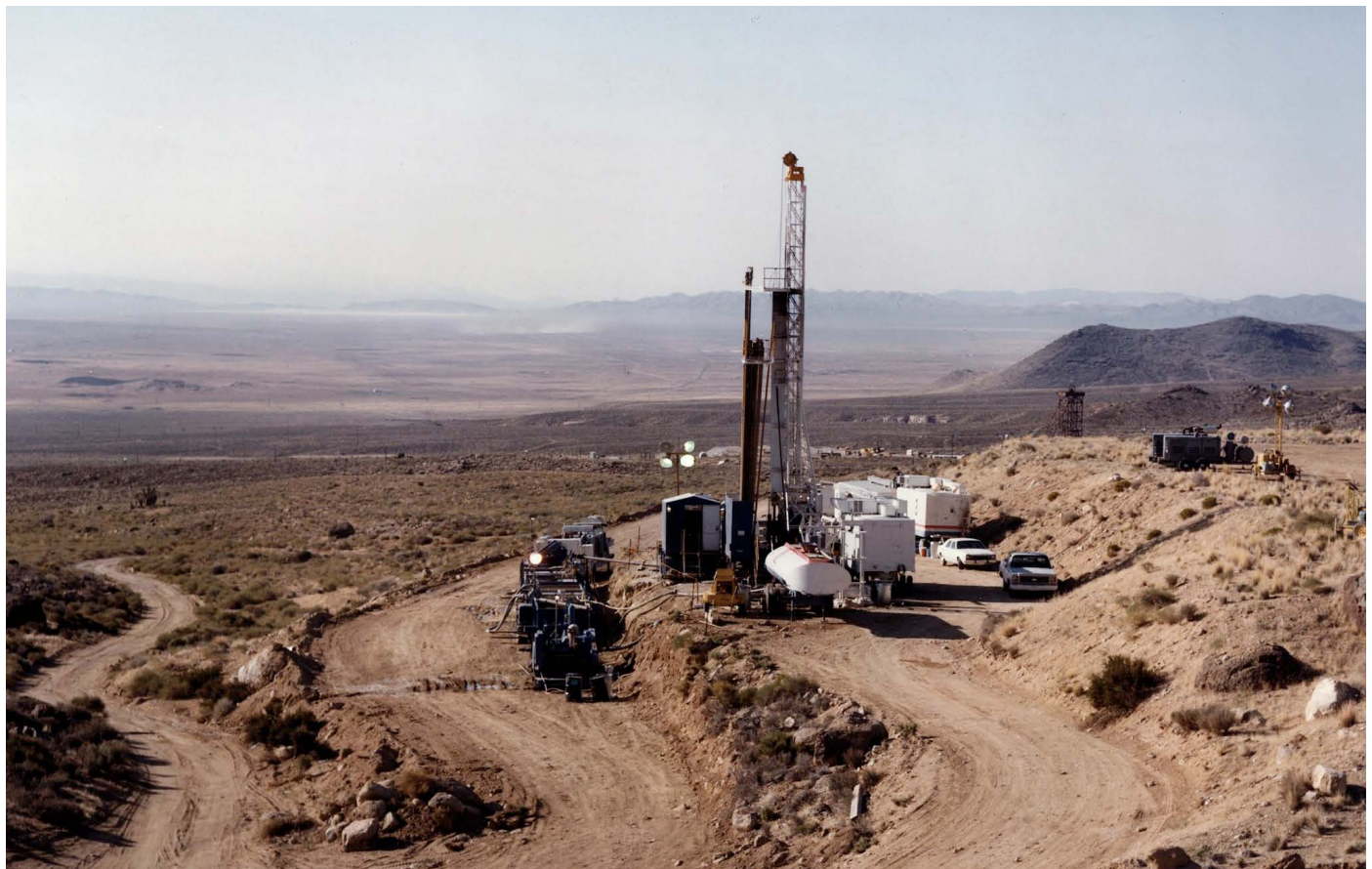
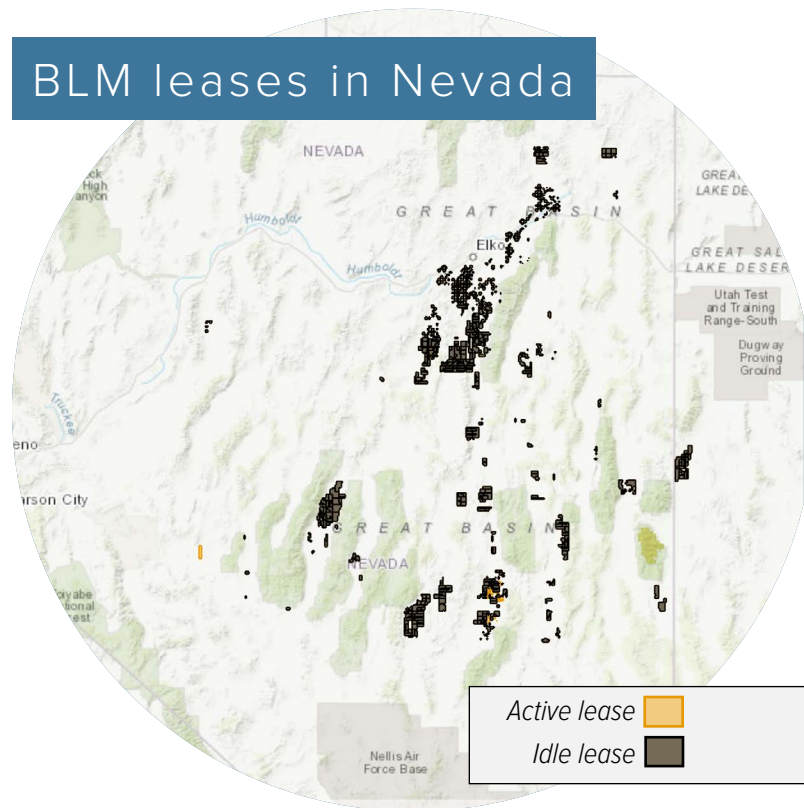
*Best in  
the West*

## KEY STATS

- Active wells under enforcement jurisdiction: **60**
- 2018 inspections: **123**
- Inspectors at the end of 2019: **1.5**
- Years to inspect active wells under enforcement jurisdiction: **0.5**
- 2018 Notices of Violation: **0**
- 2018 fines: **0**
- Total 2018 fine value: **\$0**
- Average 2018 fine value: **\$0**
- Commission staff vacancies: **0%**
- 2018 board budget usage: **102%**

2009 to 2018, the industry nominated 58 million acres<sup>52</sup> of federal minerals in Nevada for oil and gas leases. These extensive nominations allow speculators to buy cheap leases in hopes of selling them to other companies at a profit and for larger companies to pad their statistics for investors. Under the Trump administration, the BLM has offered up more than 1.8 million acres<sup>52</sup> of Nevada oil and gas leases at auction, many of which end up being non-competitively leased for \$1.50 per year.<sup>53</sup> Many of these leases are never developed, locking up the land from being managed for other uses.

U.S. Senator for Nevada Catherine Cortez Masto recently introduced legislation<sup>54</sup> in early 2020 that would prohibit land managers from auctioning off parcels with minimal development potential, cracking down on rampant speculation. Rather than continuing to lease lands that operators won't drill on, Interior Department leaders should be taking the opportunity to alternatively manage those lands for economy-supporting outdoor recreation,<sup>55</sup> carbon sequestration, or renewable energy production.<sup>56</sup>





# NEW MEXICO

## Toothless, but improving

New Mexico is home to one of the largest oil and gas industries in the Western United States, producing more oil in 2018<sup>25</sup> than Wyoming, Montana, Utah, and Nevada combined. Although the New Mexico enforcement program has many strong policies, the New Mexico Oil Conservation Division (OCD) has room to improve.

Like Nevada, New Mexico has the ability to inspect, assess, and collect fines for wells on federal leases in New Mexico in coordination with the BLM, although its primary jurisdiction is state and private leases.<sup>57</sup>

The New Mexico division was unable to assess fines<sup>58</sup> without going through district court between 2009 and 2020 due to a New Mexico Supreme Court ruling. This ruling had a significant impact<sup>31</sup> on penalties collected by the program: annual penalties collected from 2007-2009 averaged \$685,333, and dropped to an average of \$7,167 from 2010-2018. There is evidence of the consequences.



*Trying to catch up*

### KEY STATS

- Active wells under enforcement jurisdiction: **54,711**
- 2018 inspections: **41,574**
- Inspectors at the end of 2019: **12**
- Years to inspect active wells under enforcement jurisdiction: **1.3**
- 2018 Notices of Violation: **2,129**
- 2018 fines: **0**
- Total 2018 fine value: **\$0**
- Average 2018 fine value: **\$0**
- Commission staff vacancies: **31%**
- 2018 board budget usage: **75%**

From 2008 to 2018, New Mexico oil and gas-related spills and violations increased by nearly 100%.<sup>31</sup> In

2018, New Mexico had by far the most oil and gas-related spills of all Western states.

The program only recently regained its ability to assess fines and penalties with the signing of the Fluid Oil and Gas Waste Act on April 3, 2019,<sup>59</sup> which went into effect on January 1, 2020. This change will hopefully allow its staff to follow through on the violations they continually discover.

*During the time that the New Mexico Oil Conservation Division was unable to directly assess fines, oil and gas related **spills and violations** increased by nearly 100%.*

## The right process

In recent years, the New Mexico enforcement program has done its due diligence all the way up until assessing financial penalties. The division performed over 41,000 inspections in 2018. At this rate, the state would only take 1.3 years to inspect all active wells under its enforcement jurisdiction. New Mexico also issued over 2,000 violation notices in 2018. These steps are crucial in the enforcement process, and demonstrate that the program is on the right track.

\*Assuming the same number of inspectors in 2018 as are currently employed and 251 working days<sup>60</sup> in 2018.

However, after identifying violations, the division was unable to enforce any of its findings via financial penalties. Hopefully the division's newfound authority will allow it to assess the many penalties that it could not issue over the past decade.

## Administrative deficiencies

New Mexico has a critical need to employ additional staff; the division had a 31 percent staff vacancy rate at the end of 2019. These positions will need to be filled if the state is to begin assessing financial penalties on top of the duties the program already performs. Additionally, New Mexico division staff inspected an average of 3,465 wells each in 2018, which would require 13.8 inspections per person per working day.\* Additional staff would reduce the inspections required of each inspector, potentially increasing inspection quality.

Filling staff vacancies and increasing bandwidth should be relatively straight-forward for the division: in 2018, the program only utilized 75 percent of its budget.





# UTAH

## A culture of complete noncompliance

Although Utah has a smaller oil and gas industry than Colorado, New Mexico, or Wyoming, the state has one of the worst enforcement programs and struggles under poor policy. The state is in dire need of continuing policy and administrative changes.

This analysis echoes a scathing audit<sup>9</sup> of the Oil and Gas Program within the Utah Division of Oil, Gas, and Mining (DOG M) in late 2019, which found that noncompliant issues are not resolved in a timely manner, inspections do not follow program policy, a decreasing number of inspectors, and a lack of record keeping, among other shortfalls. A number of the issues highlighted by the audit were traced to intentionally low budget usage.

In response to the audit, department leaders admitted<sup>23</sup> to a “culture of noncompliance” within the state. Since that time,<sup>61</sup> the agency has put its



*Worst in the West*

### KEY STATS

- Active wells under enforcement jurisdiction: **4,591**
- 2018 inspections: **6,859**
- Inspectors at the end of 2019: **6**
- Years to inspect active wells under enforcement jurisdiction: **0.7**
- 2018 Notices of Violation: **29**
- 2018 fines: **0**
- Total 2018 fine value: **\$0**
- Average 2018 fine value: **\$0**
- Commission staff vacancies: **25%**
- 2018 board budget usage: **55%**

program under new leadership, worked to resolve most of the unresolved cases documented in the audit, and is hiring more inspectors. It remains to



be seen whether the program's changes will have a lasting impact on its enforcement quality and the number and frequency of incidents in the state.

## A blank enforcement history

As of 2018, there was no documentation<sup>9</sup> of a fine issued by Utah's enforcement program in the past 24 years, further evidence of the fact that bodies without the ability to directly assess penalties simply do not assess any penalties at all. Similar to New Mexico during the period from 2009-2019, Utah regulators need to go through a civil suit in district court to assess penalties, a process that requires significantly more employee time and resources. Violations in Utah that resulted in fines in other states went without penalty.

*Utah DOGM Director Baza acknowledged that Utah's coal enforcement program works better than its oil and gas enforcement program because the coal program was required to adopt federal standards.*

Following the audit, a Utah state senator introduced a bill<sup>62</sup> that would allow the division

to directly issue and collect fines. Such a policy change, as was made in New Mexico in 2019, is absolutely essential to ensuring operator compliance within the state.

## State versus federal control

Utah Division of Oil, Gas, and Mining Director John R. Baza acknowledged<sup>23</sup> that Utah's coal enforcement program works better than its oil and gas program because the coal program was required to adopt federal enforcement standards. He also stated that the BLM has done a better job of enforcing and requiring fines for oil and gas violations on federal lands than Utah has done on state and private lands.

The state's stark shortcomings come in the wake of continual calls by Utah legislators<sup>65</sup> to transfer federal lands to state ownership, often claiming that states manage land better than the federal government. Not only do last year's audit and this analysis demonstrate that Utah has a history of poor oil and gas enforcement, but past researchers have also concluded that transfer of federal lands to states would make environmental compliance more expensive and difficult,<sup>66</sup> and would saddle states with massive management costs.<sup>67</sup>





# WYOMING

## Enforcement without data

Wyoming has one of the larger oil and gas industries in the Western United States. However, the Wyoming Oil and Gas Conservation Commission (WOGCC) is woefully lacking in basic enforcement information and transparency, and issued far fewer fines than Montana or Colorado in 2018.

The Wyoming commission does not track noncompliant issues or inspections.<sup>12</sup> Additionally, state data is extremely difficult to access even when available. The state is finally in the process of implementing a tracking system that should be in place by spring 2020.<sup>12</sup>

Such a lack of data makes it extremely difficult to assess the enforcement quality of Wyoming's program. It remains to be seen whether Wyoming will successfully fix its data and transparency system, as well as what those data, once available, will show.



*Trying to catch up*

## KEY STATS

- Active wells under enforcement jurisdiction: **25,443**
- 2018 inspections: **7,000**
- Inspectors at the end of 2019: **11**
- Years to inspect active wells under enforcement jurisdiction: **3.6**
- 2018 Notices of Violation: **Not tracked**
- 2018 fines: **7**
- Total 2018 fine value: **\$235,000**
- Average 2018 fine value: **\$33,571**
- Commission staff vacancies: **4%**
- 2018 board budget usage: **79%**



## Low inspection rates

Although the state does not track inspections, the commission's 2018 annual report<sup>11</sup> states that Wyoming averages about 7,000 inspections per year.

*The Wyoming Oil and Gas Conservation Commission has not tracked inspections or noncompliant issues for years.*

Seven thousand inspections would give Wyoming the lowest inspection rate of all Western states: this many inspections only accounts for 28% of wells under its jurisdiction that have not been classified as plugged and abandoned.\* At this rate it would take the commission 3.6 years to inspect the non-plugged wells that it is responsible for.

\*Wyoming does not classify wells as 'active' in the same manner as other states.<sup>12</sup>

With so few inspections occurring, it is likely that operators allow violations to continue, possibly threatening public health and the environment.

## Inadequate financial penalties

The commission issued seven fines in 2018, averaging \$33,571. Compared to the number of wells under the program's jurisdiction, this is a much lower number of fines and average fine value than the neighboring state of Colorado.

Lack of financial penalties on operators in Wyoming highlights the need for the state to improve its enforcement program's transparency so that taxpayers can ensure that the state is receiving the fines it is entitled to, and that operators are held accountable for noncompliance.



# RECOMMENDATIONS

Based on current deficiencies with state oil and gas enforcement across the West, the following are best practices that states and their enforcement programs should strive to implement in the future.

## **1. Adopt a goal of inspecting all non-plugged and abandoned wells once a year.**

Equipment failure is a common cause of dangerous incidents. Since all non-plugged and abandoned wells are still in service or have the potential to be in service, these wells should be inspected once a year to protect the public and the environment.

## **2. Track and publish all inspections, violations, resolutions, and penalties to increase enforcement transparency.**

Transparency is essential for holding operators and state enforcement programs accountable for violations and appropriate follow-up. States should develop online databases of inspections, violations, resolutions, and penalties that are easily accessible by the public. Those states that do not already collect this information should do so, as they currently have few benchmarks for assessment.

## **3. Standardize financial penalties in written policies. These should include the time allowed to come into compliance and violation follow-up procedures.**

Some states do not have adequate written financial policies. This may result in inconsistent enforcement and lack of transparency. Clarifying violation procedures would allow enforcement programs to more adequately follow-up with operators and ensure that compliance has been achieved.

## **4. Ensure state oil and gas enforcement agencies have the authority to assess financial penalties.**

Regulators in Utah and New Mexico in 2018 did not have the authority to directly assess penalties.

The result, no fines in 2018, potentially led to more environmental and safety violations. All states should ensure that state oil and gas enforcement agencies have the authority to directly assess financial penalties without going through district court, which requires additional employee time and resources. Agencies should be able to easily financially penalize any and all operators whose conduct threatens public and environmental safety.

## **5. Increase financial penalties and their issuance such that the cost of noncompliance is greater than that of compliance.**

Incredibly low fines against operators with violations are common in the West (when they are assessed at all). These fines do little to affect the economic decision-making of large companies; fine rates need to be raised, standardized, and ultimately enforced. Larger and more aggressively issued fines would ensure greater compliance.

## **6. Better fund oil and gas enforcement programs where necessary to accomplish the above goals, and better-utilize budgets where applicable.**

Many Western states suffer from a lack of funding for oil and gas enforcement, while others fail to fully use the funding already allocated. States that already use their entire oil and gas regulation budgets could improve their enforcement with increased funding, and improved enforcement could also help provide funding for future years. However, many states with weaker enforcement programs tend to use a lower percentage of their regulatory agency budgets. For example, New Mexico and Utah regulatory bodies only utilized 75 percent and 55 percent of their respective budgets. These states should use their budgets more efficiently.



# CONCLUSION

For decades the oil and gas industry has had an outsized presence in the Western United States. Not only has this region experienced the boom-and-bust economy that comes with the industry, but also the threats to human and environmental health. State oil and gas enforcement programs play a critical role in ensuring that balanced, responsible development takes place. However, deficiencies in state oil and gas enforcement programs are widespread across the West. It is up to governors, legislatures, and oil and gas regulators to fix these shortcomings, hold extraction companies accountable, and protect local communities, lands, waters, and wildlife.

This analysis finds that the chronic oil and gas enforcement problems identified by previous studies persist across Western states. Financial penalties are rarely leveraged against operators, and understaffing, overwork, and unrealistic inspection rates create an environment in which oil and gas operators are able to avoid accountability.

There are a number of best practices that states should strive to implement in the future. These practices and policies will help reduce the impacts of oil and gas development on Western communities and landscapes. It is time for Western states to step up and provide their oil and gas regulators with enforcement tools, and for state regulators to forcefully use them, to better protect their communities and lands.



## ACKNOWLEDGEMENTS

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Gas, and Mining; and Wyoming Oil and Gas Conservation Commission who responded to data requests and answered questions throughout this report's production.

## METHODOLOGY

The Center for Western Priorities compiled publicly available information from state oil and gas enforcement programs. Where necessary, additional requests for information were submitted, and information was collected through direct correspondence with officials at the relevant state programs. The number of active wells, spills, and inspections under differing jurisdiction were assessed as well as possible under the constraint of varied and opaque state information reporting; it is possible that exact numbers may differ, but within a small margin of error.

Well counts were not established for 2018; rather, current well counts were used as these are easier to acquire or calculate. These well counts were used as a proxy for 2018 operation levels.

Current inspector numbers were counted from state agency websites where possible, while staff vacancies were calculated based on staff contacts on agency websites and from organizational structure documents where possible. The number of inspections per inspector is based on an

assumption that the same number of inspectors was employed in 2018 as at the end of 2019.

Wyoming inspection numbers are not tracked, but an estimated average number is available from WOGCC's 2018 annual report;<sup>11</sup> this number was used for relevant calculations. One half of WOGCC's '18-'19 biennial budget<sup>11</sup> was used as a proxy for the 2018 budget.

Wells under enforcement jurisdiction represents the total number of wells that a state agency has potential authority to enforce. In Colorado, Nevada, and New Mexico, this is all wells except for those on tribal leases, as the state programs have inspection and enforcement jurisdiction on federal lands. Montana, Utah, and Wyoming only have inspection and enforcement jurisdiction over state leases, private leases, and Class II UIC leases.

Colorado spill and well data were downloaded, and those on Indian Reservations were removed from the analysis to obtain the closest possible number to those actually under state jurisdiction.

The number of wells under the Wyoming program’s jurisdiction was calculated based on publicly available GIS data,<sup>10</sup> while all other states either had easily accessible data or were able to give adequate answers as to the number and types of wells and leases. SQL queries were used in ArcGIS to select the required lease and code types. All well codes aside from “PA” (Permanently Abandoned) were considered ‘active’ for this analysis as Wyoming does not classify wells as ‘active’ in the same way as other states. Only those entries with a spudding date were considered an actual well. UIC wells on federal leases were added to those on state and private leases to calculate total wells under program jurisdiction. The codes used for selecting UIC wells were I, D, DO, and IO (injection or disposal wells). The number of UIC wells pulled and added were relatively negligible in comparison to the number of regular oil and gas wells. In Wyoming, a single attribute is not designated to lease type. Rather, the first in a set of two labels designates mineral ownership, and the combination of labels is given a code. Federal jurisdiction codes used were: 10, 11, 13, and 14. State jurisdiction codes used were: 23, 30, 31, 34, 36, 40, 41, 43, and 46. Of the mixed mineral codes, 81, 83, 84, and 85 are those without any federal minerals and therefore have no split enforcement jurisdiction; these were added to state jurisdiction, and were again negligible.

For analysis of COGCC NOAVs, 2014 to 2019 data was found on COGCC’s Enforcement site.<sup>37</sup> The Supplemental version of each Annual Violations and Penalties Report<sup>42,43,44,45,46</sup> was used, as these include the full calendar year. These documents include the number of NOAVs issued, the total number of NOAVs resolved each year, and the total penalties assessed each year. Withdrawn NOAVs were removed from the 2014 data in order to standardize them. 2018 NOAV violations were pulled from COGCC’s Incident Search<sup>47</sup> in order to establish the number of violations for each NOAV, violations resolved, and calculate average penalties per violation. Additional 2018 NOAVs resolved in 2019 were pulled from the 2019 Annual Violations and Penalties report.



# APPENDIX

## Estimated oil and gas production value in 2018

State	EIA estimate of statewide producing wells <sup>70</sup>	2018 dry gas production (million cubic feet) <sup>71</sup>	2018 oil production (barrels) <sup>25</sup>	Calculated 2018 dry gas value <sup>68</sup>	Calculated 2018 oil value <sup>69</sup>	Calculated combined value
<b>Colorado</b>	50,940	1,688,040	177,817,000	\$5,317,326,000	\$11,540,323,300	\$16,857,649,300
<b>Montana</b>	9,871	42,090	21,540,000	\$132,583,500	\$1,397,946,000	\$1,530,529,500
<b>Nevada</b>	59	3	255,000	\$9,450	\$16,549,500	\$16,558,950
<b>New Mexico</b>	58,209	1,360,001	248,958,000	\$4,284,003,150	\$16,157,374,200	\$20,441,377,350
<b>Utah</b>	12,562	285,248	37,063,000	\$898,531,200	\$2,405,388,700	\$3,303,919,900
<b>Wyoming</b>	33,103	1,575,261	87,955	\$4,962,072,150	\$5,708,279.50	\$4,967,780,429





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