

Duplicates/Conflicts with/Companion to/Relates to: Relates to HB 458
Duplicates/Relates to Appropriation in the General Appropriation Act

SECTION III: NARRATIVE

BILL SUMMARY

Synopsis:

HB 457 provides that sequestration of carbon dioxide shall be permitted in the state under the newly created Geologic Carbon Dioxide Sequestration Act (the Act) and confers regulatory oversight and jurisdiction over CO₂ sequestration to the Oil Conservation Division (OCD) of the Department of Energy, Minerals and Natural Resources; OCD is granted authority to promulgate rules to implement the Act.

An operator desiring to form a sequestration unit acquires lands and places them in a unit based on “the reasonably ascertained areal extent of migration of the sequestered carbon dioxide with the formation or formations....” The unit also identifies an areal buffer and subsurface monitoring zone. If a person does not willingly join the unit, the bill stipulates ways to force pool an owner into a unit, exempting lands that are state trust lands from the forced pooling provision. At least 85% of the lands within the sequestered unit must agree to participate in the unit.

HB 457 sets forth certain requirements for a sequestration unit application submitted to OCD, along with certain notice and hearing requirements. HB 457 also sets forth certain findings the OCD must make for any application. The bill allows OCD to charge fees and creates certain funds for OCD.

HB 457 defines “pore space” and further states “the surface estate includes the pore space in all strata below the surface lands and waters of this state.”

HB 457 also makes clear the operator of the unit owns the sequestered CO₂. The Act makes clear that, so long as the unit is in effect, the CO₂ cannot be produced.

FISCAL IMPLICATIONS

The intended purpose of the legislation appears to be to create a framework for large-scale carbon sequestration projects. The New Mexico State Land Office (NMSLO) does not currently have leasing instruments, financial assurances or other required instruments to perform this type of leasing activity (large-scale CO₂ sequestration projects). Creation of, and management of, these types of projects may require additional personnel and resources.

With regard to revenue, there could be a positive revenue impact from any new pore space leasing activities that occur that would have not otherwise happened without the legislation. There may also be a negative revenue impact to the extent that the utilization of pore space for CO₂ sequestration competes with or interferes with other subsurface activities, such as salt-water injection wells or oil and gas development. Further, without clarification of “pore space,” there is the potential to impact oil and gas revenues by severely interfering with mineral right interests and development plans.

SIGNIFICANT ISSUES

Under the direction of the Commissioner of Public Lands, the New Mexico State Land Office manages about nine million acres of surface estate and 13 million acres of minerals. HB 457 would specify that, in the absence of specific language to the contrary, the “the surface estate includes the pore space in all strata below the surface lands and waters of this state.” This would serve as the first time in the state that pore space is defined. The scope of this provision in HB 457 is not limited to the use of pore space for purposes of CO₂ sequestration. The bill thus has implications for over four million acres of state trust mineral estate severed from the surface estate and goes beyond CO₂ sequestration to include other uses of the pore space. The oil and gas industry often uses the subsurface to maximize oil production. For example, a company may put hundreds, if not thousands, of feet of subsurface pipe in the mineral estate before the first take point in order to maximize the completions of a new well.

Section 4(C) states the NMSLO may grant an operator rights for geologic sequestration on such terms as it finds are reasonable and that provide compensation equal to the “fair market value” of the rights. Other than statutory oil and gas leases and a handful of other forms of mining leases, the Commissioner generally has authority to enter into leases at her discretion (on terms consistent with the Enabling Act’s requirement that leases be made based at a rate that reflects their “true value”) that she finds beneficial to the public schools and other beneficiaries on whose behalf she acts. With respect to state trust lands, it should be understood that the Commissioner may approve CO₂ sequestration on terms and conditions, including compensation, that the Commissioner deems appropriate, consistent with the requirements of the Enabling Act. The Enabling Act, federal law consented to by the State of New Mexico as a condition of statehood, controls the use of state trust lands and includes specific requirements conditioning their use.

The bill provides for the formation of units and, per Section 4(D) grants OCD the authority to grant an operator the right to commence operations within the unit. However, the unit concept is analogous to an oil and gas unit wherein parcels of land, under different ownership (e.g., BLM, state, fee) are joined together for development or, in this case, sequestration purposes. Such units are subject to certain terms set forth, if they include federal lands, by the federal government, with any additional stipulations added by the NMSLO, if NMSLO lands are included. If a unit does not include federal lands, the NMSLO has a separate unit agreement. The agreements allow for leases to be maintained under certain terms per the unit agreement. The federal and state oversight of units, with OCD overseeing the regulatory aspect of the wells, has been a long proven successful practice of land management, which is what the sequestration units are—blocks of land. Thus, best practice would be to have sequestration units follow a process similar to oil and gas units and, if BLM and/or NMSLO lands are included, require preliminary and final approval from those agencies, while also requiring OCD approval of the unit itself.

The bill does not require operators of carbon sequestration facilities to provide emergency response plans in their application. Such a requirement is standard for acid gas injection wells before the OCD and should be part of the application requirement set forth in Section 5(B). CO₂ pipeline ruptures can cause serious injury and even death to people nearby because they deprive the affected area of sufficient oxygen.¹

¹ <https://www.npr.org/2023/05/21/1172679786/carbon-capture-carbon-dioxide-pipeline>

The bill, in Section 5(B), provides notice to mineral owners and lessees, and surface and pore space owners within one-half mile of the buffer zone of the sequestration unit. This notice area may be too small and should be increased to two miles of the exterior of the boundary of the proposed sequestration boundary. Further, there is no requirement in the application to list all oil and gas wells within two miles of the proposed exterior boundary of the sequestration boundary; this should be a requirement to include all wells, by API number, and list each formation from which the wells are producing. This is particularly important as the Illinois Archer Daniels Midland carbon sequestration facility is already leaking after CO₂ ate away the pipes in new project monitoring wells, and there is concern the CO₂ could reach old, surrounding wells and the CO₂ could migrate upwards into water.²

Further, in addition to the notice required, it should be clear that all surface lessees within two miles should receive notice. The bill is silent as to surface lessees. However, there are surface lessees that may have homes, commercial businesses, etc. and should receive notice. Also, with notice to the BLM, NMSLO conferred with BLM and suggests notice go to the “State Director, Bureau of Land Management” in order to ensure proper notice the BLM.

The bill, in Section 6(C)(2) requires OCD to make a finding in any order that the CO₂ unit will not impact fresh water. As the state often uses water beyond fresh water (e.g., brackish water) for other purposes, the finding would likely be better stated to require OCD to “Protect fresh water and any other brackish water to a TDS level determined in rule.”

EPA regulates class VI injection wells for carbon sequestration. New Mexico could gain primacy to regulate these wells but has not yet done so at this point. It is unclear how the bill’s provisions giving OCD authority over CO₂ sequestration units and other approvals does or does not fit into the pre-existing EPA regulatory structure.

PERFORMANCE IMPLICATIONS

ADMINISTRATIVE IMPLICATIONS

CONFLICT, DUPLICATION, COMPANIONSHIP, RELATIONSHIP

TECHNICAL ISSUES

The definition of “pore space” set forth in this bill may cause confusion within the oil and gas industry if not further defined. In particular, pore space that does not exist in its natural form and is manufactured (e.g., through blasting, drilling, etc.) is not naturally occurring pore space. Thus, the definition of pore space in Section 2 could be further revised to state pore space shall be naturally occurring within the formations, voids, and fractures. Without such further definition, the distinction between a pore space agreement and a subsurface easement (where the void occurs due to manufactured activity) would be impossible to distinguish under the proposed definition of “pore space.”

Section 5(B)(9) discusses payment for severed formations within the buffer or monitoring

² See, e.g. Leak at Illinois carbon injection project cast a shadow on the future of taxpayer-subsidized carbon capture. Oil & Gas Watch (Oct. 17, 2024) avail at: <https://news.oilandgaswatch.org/post/leaks-at-illinois-carbon-injection-project-cast-a-shadow-on-the-future-of-taxpayer-subsidized-carbon-capture>

zones. State Land Office leases cannot be depth severed and no payment may be made to the NMSLO for severed formations of state trust lands. A separate lease for any formation where sequestration is proposed or for impacted lands must be obtained from the State Land Office.

Section 5(B)(8) discusses payment for the pore space to each owner and people within the buffer zone. The bill should make clear the NMSLO is not required to accept the proposed compensation and can set its own rate for the pore space. Further, it should be clear that the lessee of record does not own the pore space and only the Commissioner can enter any agreement for the pore space as to state trust lands.

Section 6(C) 10 only appears to protect state oil and gas and other mineral assets that are being used or are “currently being proposed to be used” but not oil and gas and other minerals that could be leased at a future lease sale but are not undergoing active consideration.

The NMSLO has large holdings of split-estate lands and Section 7(D) could benefit from additional clarity regarding situations where the pore space has been previously severed.

OTHER SUBSTANTIVE ISSUES

The bill (Section 5(B)(8)) provides for public disclosure of the “amount per acre that the operator proposes to pay to compensate the owners of the surface estate, including owners in the designated buffer area and, if severed, the owners of the subsurface formation or formations containing pore space...” No similar requirement currently applies to operators seeking to acquire various approvals from OCD (such as permits to drill, compulsory pooling orders, acid gas wells, salt water disposal wells, etc.).

The bill defines pore space and creates pore space law for the first time within a carbon sequestration bill. Since pore space is used and relied on by other industries and has a larger implication, a stand-alone bill for pore space may be advisable and provide more transparency.

ALTERNATIVES

WHAT WILL BE THE CONSEQUENCES OF NOT ENACTING THIS BILL

AMENDMENTS

See comments above.