

## **BILL ANALYSIS**

H.B. 3013  
By: Larson  
Natural Resources  
Committee Report (Unamended)

### **BACKGROUND AND PURPOSE**

Growing evidence suggests that Texas is experiencing one of the worst droughts on record. While the supply of water is decreasing, the demand for water is increasing. Interested parties point out that the 2012 State Water Plan projects a need for almost 9 million acre-feet per year of new water by 2060 and contend that underground storage of water in an aquifer for later retrieval and beneficial use is critical to meeting that need. H.B. 3013 seeks to encourage the development of aquifer storage and recovery projects throughout Texas by establishing a legal and regulatory framework that reflects the technical application of this technology. The bill's goals include expediting the permitting process for aquifer storage and recovery projects and clarifying the role of groundwater conservation districts in such projects.

### **RULEMAKING AUTHORITY**

It is the committee's opinion that rulemaking authority is expressly granted to the Texas Commission on Environmental Quality in SECTION 3 of this bill.

It is the committee's opinion that rulemaking authority is expressly granted to groundwater conservation districts in SECTION 10 of this bill.

It is the committee's opinion that rulemaking authority is expressly granted to the Texas Water Development Board in SECTION 10 of this bill.

### **ANALYSIS**

SECTION 1. Amends Section 11.002, Water Code, by adding Subdivisions (21) and (22) as follows:

(21) Defines "aquifer storage and recovery project" to mean an undertaking to facilitate the injection of surface water, groundwater, or treated effluent into a suitable aquifer by means of a well for later retrieval and beneficial use from that well or another well.

(22) Defines "target aquifer" to mean an aquifer used in an aquifer storage and recovery project.

SECTION 2. Amends the heading to Section 11.153, Water Code, as follows:

Sec. 11.153. AQUIFER STORAGE AND RECOVERY PROJECTS, rather than PROJECTS FOR STORAGE OF APPROPRIATED WATER IN AQUIFERS.

SECTION 3. Amends Sections 11.153(a), (b), (c), and (d), Water Code, as follows:

(a) Requires the Texas Commission on Environmental Quality (TCEQ) to expedite the issuance of temporary or term permits for aquifer storage and recovery projects, rather than requires TCEQ to investigate the feasibility of storing appropriated water in various types of aquifers around the state by encouraging the issuance of temporary permits for demonstration projects for the storage of appropriated water for subsequent retrieval and beneficial use. Requires TCEQ by rule to allow the use of an existing permit for appropriated water that authorizes a consumptive use for a project to demonstrate the feasibility of an aquifer storage and recovery project.

(b) Requires that a permit described by Subsection (a) authorize the use of a sufficient quantity of appropriated water to demonstrate the feasibility of the aquifer storage and recovery project for the duration of the project to provide TCEQ the opportunity to evaluate the storage of appropriated water in the target aquifer, rather than requires that a permit described by Subsection (a) be for only the duration of the pilot project to provide TCEQ and the board further opportunity to evaluate the storage of appropriated water in aquifers for subsequent retrieval and beneficial use.

(c) Authorizes the permit holder, after a permit holder has completed the feasibility project described by Subsection (a), rather than at the conclusion of a pilot project, to file an appropriate application for a permit or permit amendment to store appropriated water in an aquifer storage and recovery project. Requires the TCEQ, after considering the success of the project and the criteria set out in Section 11.154, to determine whether to issue a permit or permit amendment authorizing the continued storage of appropriated water in the aquifer.

(d) Requires TCEQ to issue a final order granting a permit or amendment to a permit authorizing the storage of appropriated water using an aquifer storage and recovery project, rather than in aquifers for subsequent beneficial use, where the aquifer storage and recovery project is shown to be feasible under the criteria provided in Sections 11.154(c) and (d), rather than where completed pilot projects or historically demonstrated projects have been shown to be feasible under the criteria provided in Sections 11.154(c) and (d).

SECTION 4. Amends Section 11.154, Water Code, as follows:

Sec. 11.154. PERMITS FOR AQUIFER STORAGE AND RECOVERY PROJECTS, rather than PERMITS TO STORE APPROPRIATED WATER IN AQUIFERS. (a) Requires that an application filed with TCEQ under Section 11.153 for a permit or a permit amendment to authorize the storage of appropriated water in an aquifer storage and recovery project, rather than an application filed with TCEQ to undertake a project under Section 11.153, include:

- (1) the information required for an application for a permit or permit amendment to appropriate state water;
- (2) all information required for an application for a permit for a Class V injection well without requiring a separate hearing or notice; and
- (3) a map or plat showing the injection facility and the aquifer in which the water will be stored.

(a-1) Provides that Subsection (a)(1) does not apply to an application filed under this section if the application is for an amendment to an existing permit and:

- (1) the permit the applicant seeks to amend authorizes a consumptive use of the appropriated water; and
- (2) the requested amendment will not change the point of diversion or the rate of diversion authorized under the permit the applicant seeks to amend.

(b) Provides that, if the application is for a permit or permit amendment to store appropriated water in a groundwater reservoir or a subdivision of a groundwater reservoir, as defined by Chapter 36, that is under the jurisdiction of a groundwater conservation district:

- (1) the applicant is required to:
  - (A) provide a copy of the application to each groundwater conservation district that has jurisdiction over the reservoir or subdivision;

(B) register the permit as provided by Subchapter N, Chapter 36, rather than cooperate, with each district that has jurisdiction over the reservoir or subdivision, rather than to ensure compliance with the rules of each district; and

(C) comply with the rules governing the injection, storage, and withdrawal of appropriated water stored in the reservoir or subdivision that are adopted by each district that has jurisdiction over the reservoir or subdivision, including a rule specifically relating to an aquifer storage and recovery project; and

Strikes a provision stating that the applicant is required to cooperate with each district that has jurisdiction over the reservoir or subdivision to develop rules regarding the injection, storage, and withdrawal of appropriated water stored in the aquifer.

(2) Requires TCEQ to require that the applicant notify TCEQ when the applicant has registered the permit with the district as required by Subdivision (1)(B), rather than requires TCEQ to require that any agreement the applicant reaches with a district that has jurisdiction over the reservoir or subdivision regarding the terms for the injection, storage, and withdrawal of appropriated water be included as a condition of the permit or permit amendment.

(c) Requires TCEQ, before issuing a permit or an amendment to an existing permit authorizing the storage of appropriated water in an aquifer storage and recovery project, to consider whether:

(1) the introduction of water into the target aquifer, rather than the aquifer, will alter the physical, chemical, or biological quality of native groundwater to a degree that the introduction would:

(A) render groundwater produced from the aquifer harmful or detrimental to people, animals, vegetation, or property; or

(B) require treatment of the groundwater to a greater extent than the native groundwater requires before being applied to that beneficial use;

(2) the water stored in the target aquifer, rather than receiving aquifer, can be successfully retrieved, rather than harvested, from the aquifer for beneficial use; and

(3) reasonable diligence will be used to protect the water stored in the target aquifer, rather than receiving aquifer, from unauthorized withdrawals to the extent necessary to maximize the permit holder's ability to retrieve and beneficially use the stored water without experiencing unreasonable loss of appropriated water.

Strikes a provision requiring TCEQ, on receipt of an application for a permit or permit amendment to an existing permit from an applicant with a completed pilot or historically demonstrated project, to evaluate the success of the project for purposes of issuing a final order granting a permit or permit amendment authorizing the storage of appropriated water incident to a beneficial use.

(d) Authorizes TCEQ, in making its evaluation under Subsection (c), to consider all relevant facts, including:

(1) the location and depth of the target aquifer, rather than aquifer, in which the stored water is located;

- (2) the nature and extent of the surface development and activity above the stored water;
- (3) the permit holder's ability to prevent unauthorized withdrawals by contract or the exercise of the power of eminent domain;
- (4) the existence of a groundwater conservation district or other governmental entity, rather than an underground water conservation district, with jurisdiction over the production of water from the target aquifer, rather than with jurisdiction over the aquifer storing the water, and the district's ability to adopt rules to protect water stored in the aquifer storage and recovery project, rather than stored water; and
- (5) the existence of any other political subdivision or state agency authorized to regulate the drilling of wells into or the production of water from the target aquifer.

(e) Requires a permit or a permit amendment that authorizes the storage of appropriated water, rather than a permit to store appropriated water, in a groundwater reservoir or subdivision, as defined by Chapter 36, to provide as a condition to the permit or permit amendment, rather than to the permit alone, that the permit holder is required to:

- (1) register the permit holder's injection and recovery wells that are used in connection with an aquifer storage and recovery project, with a groundwater conservation district that has jurisdiction over the reservoir or subdivision, if any; and
- (2) comply with the reporting requirements established under Subchapter N, Chapter 36.

Strikes a provision stating that the permit holder is required to, each calendar month, provide the district, if any, with a written report showing for the previous calendar month the amount of water injected for storage; and the amount of water recaptured for use.

SECTION 5. Amends the heading to Section 11.155, Water Code, as follows:

Sec. 11.155. **AQUIFER STORAGE AND RECOVERY PROJECT REPORTS**, rather than **AQUIFER STORAGE PILOT PROJECT REPORTS**.

SECTION 6. Amends Section 11.155(b), Water Code, as follows:

(b) Requires the board, as part of the state and regional water planning process, to conduct studies, investigations, and surveys of the aquifers in the state, including target aquifers, as it considers necessary to determine the feasibility of recommending the occurrence, quantity, quality, and availability of other aquifers in which water may be stored and subsequently retrieved for beneficial use, rather than requires the board to make other studies, investigations, and surveys of the aquifers in the state, as it considers necessary to determine the occurrence, quantity, quality, and availability of other aquifers in which water may be stored and subsequently retrieved for beneficial use.

Strikes a provision requiring the board to undertake the studies, investigations, and surveys in the following order of priority: (1) the aquifers described in Section 11.153(a); (2) areas designated by TCEQ as "priority groundwater management areas" under Section 35.008; and (3) other areas of the state in a priority to be determined by the board's ranking of where the greatest need exists.

SECTION 7. Amends Section 26.001, Water Code, by adding Subdivisions (27) and (28) as follows:

(27) Defines "aquifer storage and recovery project" to mean an undertaking to facilitate

the injection of surface water, groundwater, or treated effluent into a suitable aquifer by means of a well for later retrieval for beneficial use from that well or another well.

(28) Defines "target aquifer" to mean an aquifer used in an aquifer storage and recovery project.

SECTION 8. Amends Sections 26.0271(b) and (c), Water Code, as follows:

(b) Authorizes TCEQ, in any permit or amendment to a permit issued under this chapter, at the request of the applicant to authorize a wastewater treatment facility to contribute treated domestic wastewater produced by the facility as reclaimed water to a reuse water system, or for storage in an aquifer storage and recovery project, if TCEQ has approved the use of reclaimed water from the wastewater treatment facility.

(c) Requires TCEQ, in any permit or amendment to a permit issued under this chapter, at the request of the applicant to authorize, subject to any required approval by the United States Environmental Protection Agency, a wastewater treatment facility to:

- (1) contribute reclaimed water into a reuse water system operated by the agency;
- (2) discharge reclaimed water contributed to a reuse water system at any outfall for which a discharge from the reuse water system is authorized in any permit issued for any wastewater treatment facility operated by the agency; or
- (3) inject the reclaimed water for storage in an aquifer storage and recovery project.

SECTION 9. Amends Section 26.029(a), Water Code, as follows:

(a) In each permit, TCEQ shall prescribe the conditions on which it is issued, including:

- (1) the duration of the permit;
- (2) the location of the point of discharge of the waste;
- (3) the maximum quantity of waste that may be discharged under the permit at any time and from time to time;
- (4) the character and quality of waste that may be discharged under the permit;
- (5) any monitoring and reporting requirements prescribed by TCEQ for the permittee; and
- (6) the target aquifer into which the treated effluent may be injected as a contribution to an aquifer storage and recovery project.

SECTION 10. Amends Chapter 36, Water Code, by adding Subchapter N as follows:

#### SUBCHAPTER N. AQUIFER STORAGE AND RECOVERY PROJECTS

Sec. 36.451. DEFINITIONS. In this subchapter:

- (1) Defines "aquifer storage and recovery project" to mean an undertaking to facilitate the injection of surface water, groundwater, or treated effluent into a suitable aquifer by means of a well for later retrieval and beneficial use from that well or another well.
- (2) Defines "target aquifer" to mean an aquifer used in an aquifer storage and recovery project.

Sec. 36.452. AQUIFER STORAGE AND RECOVERY PROJECT WELLS. (a) Provides that a well that is constructed and operated as part of an aquifer storage and

recovery project is subject to the permitting requirements established under Section 11.154.

(b) Provides that a well that is constructed and operated as part of an aquifer storage and recovery project is not subject to:

(1) permitting by a district; or

(2) rules adopted by a district relating to spacing, setback, or production limits.

Sec. 36.453. REGISTRATION OF WELLS. (a) Requires a well that is constructed and operated as part of an aquifer storage and recovery project to be registered with the district.

(b) Requires the registration application to include:

(1) the longitude and latitude coordinates of the well;

(2) the depth at which the deepest point of the well is located and the aquifer, groundwater reservoir, or aquifer subdivision into which the well penetrates;

(3) a designation of the well as a well for injection, recovery, or injection and recovery;

(4) a copy of TCEQ's Class V injection well authorization, if applicable;

(5) a copy of an authorization, if required, to use the surface and subsurface of the property to construct and operate an aquifer storage and recovery project, including a deed, lease, or easement;

(6) evidence that each well associated with the aquifer storage and recovery project is metered; and

(7) a copy of the following, as applicable:

(A) a permit authorizing the use of the water to be injected into a storage well, if use of that water requires a permit;

(B) a permit for use of unappropriated water from TCEQ; or

(C) a production and operating permit issued by a district other than the district in which the well is registered.

(c) Requires a district to register a well that is the subject of an application that meets the requirements of Subsection (b).

Sec. 36.454. PROTECTION OF RIGHTS TO STORED WATER. (a) Requires that a district, except as provided by Subsection (b), to adopt rules to protect water stored in an aquifer storage and recovery project to the greatest extent practicable.

(b) Provides that the district is not required to adopt rules to prohibit the withdrawal of water stored in an aquifer storage and recovery project by the holder of a permit issued by a district from a well located outside of the area described in the aquifer storage and recovery project well registration.

(c) Provides that nothing in this subchapter may be construed as authorizing the production of groundwater from an aquifer, groundwater reservoir, or subdivision of an aquifer within the jurisdiction of a district without a permit issued under this chapter.

(d) Requires that a district, in considering an application for a permit for production from a highly productive aquifer, as determined by district rule, for purposes of storing the water produced in an aquifer storage and recovery project, to consider:

(1) the benefits of storing the water in the aquifer storage and recovery project; and

(2) the ability of the more productive contributing aquifer to recover and replace the water stored in the target aquifer.

Sec. 36.455. REPORTS. (a) Requires a person operating an aquifer storage and recovery project to meter the volume of water injected and recovered from each well associated with the project at the wellhead and file a monthly report with the district in which each well is located. Requires the report to contain the following information:

(1) the amount of water injected for storage in each well located in the district and the source of the injected water; and

(2) the amount of water recovered from each well located in the district.

(b) Provides that the report required by Subsection (a) is required to be filed not later than the 20th day of each month.

(c) Requires a person operating an aquifer storage and recovery project to file an annual report with the district in which each well associated with the project is located. Requires that the report contain the following information:

(1) the cumulative amount of water in storage in the project; and

(2) a map showing the areal extent of the underground movement of the stored water as of the end of the year in which the report is prepared.

(d) Provides that the report required by Subsection (c) must be filed not later than January 20 of each year.

(e) Requires that, if water is injected into a well for storage in one district and later recovered from a well located in a different district, the reports required under this section be provided to each district in which a well associated with the project is located.

Sec. 36.456. FEES. (a) Prohibits a district, except as provided by Subsections (b) and (c), from assessing against an aquifer storage and recovery project a fee, assessment, or tax.

(b) Authorizes a district to require:

(1) the payment of a fee of \$100 for each well related to an aquifer storage and recovery project that is registered as provided by Section 36.453, payable at the time the well is registered with the district, except as provided by Subsection (c); and

(2) the payment of an annual fee not to exceed \$5 per acre-foot of water injected in an aquifer storage and recovery project during the preceding year, which must be submitted with the annual report required under Section 36.455(c).

(c) Provides that the fees collected by a district:

(1) under Subsection (b)(1) may not exceed \$10,000 for a single aquifer storage and recovery project and may only be used to compensate the district for the cost of conducting field inspections to verify:

(A) the location of wells associated with an aquifer storage and recovery project; and

(B) the installation of meters on each well associated with an aquifer storage and recovery project; and

(2) under Subsection (b)(2) must be deposited into a mitigation account and may be used by the district only to compensate a person who meets the requirements prescribed by Subsection (d).

(d) Authorizes a district to pay money from a mitigation account to a person in an amount equal to the costs incurred by the person to repair, rehabilitate, or replace a well if the person presents evidence to the district's board of directors that demonstrates to a reasonable degree of certainty that the operation of the aquifer storage and recovery project resulted in damage to the person's well.

(e) Prohibits a district's payment of money under Subsection (d) from being construed as an admission of liability by an aquifer storage and recovery project.

Sec. 36.457. STORAGE AND RECOVERY. (a) Authorizes water in an aquifer storage and recovery project to be stored in and recovered from multiple aquifers, provided that the storage and recovery is accomplished using injection and recovery wells completed in the affected aquifer. Authorizes individual injection and recovery wells to be completed only in a single aquifer to prevent cross-contamination of aquifers.

(b) Provides that water stored in an aquifer storage and recovery project is not subject to production limits, cutbacks, or other action by the district to reduce production.

Sec. 36.458. REGULATION BY DISTRICT. Provides that an aquifer storage and recovery project, and the water stored in a project, is not subject to any provision or requirement of this chapter related to the desired future conditions or modeled available groundwater adopted by the district or the applicable groundwater management area.

Sec. 36.459. ADMINISTRATION. Requires the executive administrator to develop for adoption by the Texas Water Development Board (TWDB) or any successor agency model rules for the administration of aquifer storage and recovery projects for groundwater districts not later than December 31, 2013. Provides that the model rules, once adopted, are applicable to all groundwater districts in the state and are required to be adopted by each groundwater district on or before the 60th day following the date of adoption by the TWDB.

Sec. 36.460. WASTEWATER USAGE. Authorizes, under a permit issued under Chapter 26, treated wastewater effluent to be stored in an aquifer storage and recovery project.

Sec. 36.461. STATE FUNDING. Provides that an aquifer storage and recovery project is eligible for state funding in the form of loans and grants from any available fund or revenue source used to fund projects included in the state water plan.

SECTION 11. Repeals Sections 11.153(e) and 11.155(a), Water Code.

SECTION 12. Provides for the effective date of this Act.

### **EFFECTIVE DATE**

This Act takes effect September 1, 2013.