



AGENDA MEMORANDUM

First Reading for the City Council Meeting of September 02, 2025
Second Reading for the City Council Meeting of September 09, 2025

DATE: September 2, 2025

TO: Peter Zaroni, City Manager

FROM: Drew Molly, Chief Operating Officer, CCW
DrewM@cctexas.com
(361) 826-1853

Nicholas Winkelmann, P.E., Director of Water Systems, CCW
NickW@cctexas.com
361-826-1796

Ordinance amending Corpus Christi Code, Section 55-37 to establish requirements for water wells to avoid cross connection with City water supply and to include backflow prevention device testing filing fee which was previously established in City Code Section 14-1313 and providing for a penalty not to exceed \$2,000 and publication, effective October 1, 2025.

CAPTION:

Ordinance amending Corpus Christi Code, Section 55-37 to establish requirements for water wells to avoid cross connection with City water supply and to include backflow prevention device testing filing fee which was previously established in City Code Section 14-1313 and providing for penalty and publication, effective October 1, 2025.

SUMMARY:

Corpus Christi Water is proposing to amend Corpus Christi Code, Section 55-37 to mandate an air gap or physical separation between the well system and the potable water supply. If an air gap is present, a customer service inspection (CSI) will be required every three years, and it will be the customer's responsibility to contact a certified customer service inspector to conduct the inspection. If no air gap exists, a reduced pressure assembly must be installed at the meter and tested annually by a certified backflow assembly tester.

Additionally, an amendment to Ordinance Section 55-37 - procedures for installation, testing, repair, and replacement of backflow prevention devices and associated billing - will update the ordinance to require backflow prevention assembly testers to submit test reports to the city's third-party database within 10 days of testing.

Ordinance Section 55-37 will also incorporate the backflow prevention device testing filing fee, which was previously established and codified under City Code Section 14-1313, Development Services Fee Schedule.

BACKGROUND AND FINDINGS:

Due to ongoing drought conditions, Corpus Christi Water (CCW) has observed an increase in well construction. To ensure compliance with Texas Commission on Environmental Quality (TCEQ) regulations and safeguard the potable water system from backflow contamination, it is essential to enforce proper backflow prevention measures as required by TCEQ.

TCEQ RG-478 states that residences, buildings, or facilities that:

- Use an auxiliary water supply, such as a private well, a rainwater-harvesting system, or a pump in a lake, must install a reduced pressure assembly (RPZ) at the meter connection or provide an air gap at the meter. If it can be documented in a customer service inspection that the plumbing system of the auxiliary water supply and the plumbing system of the potable water supply are physically separated and not cross-connected then this separation distance may serve as an air gap. **Periodic** CSIs will be required to make sure that the two separate systems have not been cross connected.

Comparison of Municipal Ordinance Practices:

- San Antonio Water System (SAWS) and Houston: Requires installation of a Reduced Pressure Zone (RPZ) backflow prevention assembly at the meter for properties with private wells. Annual testing of the RPZ is mandatory, regardless of the presence of an air gap.
- Aransas Pass, Kingsville, Robstown, Driscoll, Bishop, and Ricardo: Require an RPZ assembly at the meter with annual backflow testing. If an air gap is present, these cities also mandate an annual customer service inspection to verify compliance.

Amend Ordinance Sec. 55-37 Procedures for installation, testing, repair, and replacement of backflow prevention devices and associated billing:

Establish Requirements to Avoid Cross Connection Between the City Water Supply and Water Well

CCW is requesting amending Section 55-37 to clearly address properties with private water wells that also have access to public water service. The ordinance should require compliance with TCEQ regulations by mandating either a reduced pressure backflow assembly at the water meter or an air gap. If an air gap is present, an inspection should be required at least once every three years to confirm that a proper separation between the auxiliary water supply and the potable water supply is being maintained.

Test Report Submittal

Previously, backflow assembly testers were required to hand-deliver test reports to the water department. Under the proposed amendment to Ordinance Sec. 55-37, backflow assembly testers will be required to submit test reports electronically via the city's designated third-party database.

Backflow Prevention Device Filing Fee

The backflow prevention device testing filing fee was originally established by Development Services, which previously managed the Backflow Prevention Program. This fee is paid by certified backflow assembly testers upon submission of their test reports and is used to offset administrative costs associated with program operations.

To streamline the reporting process, Development Services transitioned to using a third-party database provider, The Compliance Engine. This system enabled testers to electronically submit test reports, eliminating the need for in-person delivery. Additionally, the database facilitated more efficient tracking of backflow assemblies, reducing the burden on city staff to manually monitor thousands of devices. Testers were required to pay the \$20 filing fee to The Compliance Engine, a portion of which was remitted to Development Services to support program expenses.

In 2018, the Backflow Prevention Program was transferred to Corpus Christi Water. Since taking over, CCW has implemented a new database system managed by Vepo LLC, which offers enhanced tracking capabilities for backflow assemblies. The platform also verifies tester credentials, including BPAT licenses and test gauge calibrations, ensuring compliance with regulatory standards. Testers continue to pay the \$20 filing fee to Vepo for each report submitted, with \$9 of that amount returned to CCW to help fund program operations. Since CCW is running the Backflow Prevention Program, it makes sense to move the backflow backflow prevention device testing filing fee out of Development Services Fee Schedule into Section 55-37 which provides procedures for installation, testing, repair, and replacement of backflow prevention devices and associated billing.

ALTERNATIVES:

Rejecting amending Section 55-37 requiring backflow prevention for properties with wells would violate TCEQ regulations, potentially exposing the city to the risk of contaminating its potable water system resulting in a water boil notice.

If the amendment to Sec 55-37 is not approved, testers will not be obligated to upload reports to the city's third-party database, making it difficult to effectively monitor the status of backflow testing—the primary function of the database.

FISCAL IMPACT:

N/A

Funding Detail:

N/A

RECOMMENDATION:

Staff recommend amending Ordinance 55-37 as outlined.

LIST OF SUPPORTING DOCUMENTS:

TCEQ RG-478 – Well Requirements
30 TAC 290.47(f) – Assessment of Hazards and Selection of Assemblies
Proposed Ordinance Amendment