

GROUNDWATER ISSUES SUBCOMMITTEE
OF THE
TEXAS GROUNDWATER PROTECTION COMMITTEE
RECORD OF MEETING
First Quarter Meeting, Fiscal Year 2027

Meeting Date: September 16, 2026
Meeting No.: 47

Place: videoconference
Room: N/A

TABLE OF CONTENTS

MEETING ATTENDANCE	2
MEETING HANDOUTS	3
MEETING RECORD OF SEPTEMBER 16, 2026.....	4
1. PRE-MEETING REMINDERS	4
2. CALL TO ORDER AND INTRODUCTIONS	4
3. STATUS REPORTS	4
Agricultural Chemicals Task Force	4
TGPC Publications.....	4
4. SET FUTURE MEETING DATE	5
5. DISCUSS CURRENT GROUNDWATER ISSUES	5
Oil and Gas Produced Water.....	5
Emerging Chemical and Biological Contaminants.....	6
Managed Aquifer Recharge (MAR)	7
Abandoned Water Wells	7
Groundwater Quality Monitoring	7
Brackish Groundwater	8
Evapotranspiration Networks.....	8
Others	8
6. BUSINESS DISCUSSION AND POSSIBLE ACTION.....	9
Draft TGPC GWI Subcommittee <i>Annual Report</i>	9
Discussion of White Papers Under Development.....	9
7. ANNOUNCEMENTS.....	9
8. PUBLIC COMMENT	10
9. ADJOURN	10

MEETING ATTENDANCE

Subcommittee Members

Kathy McCormack (Co-Chair)
Chris Heiligenstein (Co-Chair)
Rebecca Storms
Omar Valdez
David Villarreal
T.J. Helton

Adam Foster
Giovanni Piccinni
Justin Thompson

Chris Hooyboer
Ken Rainwater
Linzy Foster

Agency Staff

Stanley Aniagu

Katie Brice
Hailey Davidson

Kristin DeBone
Jennifer Delgado
Sarah Findley
Dan Hannah
April Hoh
Cindy Hooper
Natalie Houston
Peggy Hunka
James LaManna
James Robinson
Carly Rotzler
Eric Simon
Scott Underwood
Phillip Valladolid
Scout Vanderwal

Interested Parties

Diana Nichols

Affiliation

Texas Commission on Environmental Quality (TCEQ)
Railroad Commission of Texas (RRC)
Texas Water Development Board (TWDB)
Texas Department of State Health Services (DSHS)
Texas Department of Agriculture (TDA)
Texas State Soil and Water Conservation Board (TSSWCB)
Texas Alliance of Groundwater Districts (TAGD)
Texas A&M AgriLife Research (AgriLife Research)
Bureau of Economic Geology of The University of Texas at Austin (UTBEG)
Texas Department of Licensing and Regulation (TDLR)
Texas Tech University (TTU)
United States Geological Survey (USGS)

Affiliation

Program

TCEQ	Toxicology, Risk Assessment, and Research Division
TCEQ	Water Availability Division
TCEQ	Program Support and Environmental Assistance Division
TCEQ	Water Quality Planning Division
RRC	
TCEQ	Water Availability Division
TCEQ	Water Availability Division
TCEQ	Water Availability Division
TCEQ	Water Availability Division
USGS	
TCEQ	Water Availability Division
TCEQ	Water Supply Division
TCEQ	Radioactive Materials Division
Texas Parks and Wildlife Department (TPWD)	
TCEQ	Water Availability Division
TCEQ	Water Availability Division
TWDB	
DSHS	

Affiliation

Kelly Hart & Hallman, LLP

MEETING HANDOUTS

1. Texas Groundwater Protection Committee (TGPC) Groundwater Issues (GWI) Subcommittee Meeting Agenda, September 16, 2026
2. TGPC GWI Subcommittee Meeting Record, June 3, 2026
3. TGPC Agricultural Chemicals (AgChem) Task Force (TF) Status Report, September 16, 2026
4. TGPC Publications Status Report, September 16, 2026
5. Texas Water Journal *Potential Effects of Produced Water Discharge on Surface Water Quality: Two Case Studies on Nueces River Watershed*, Texas paper, <https://twj-ojs-tdl.tdl.org/twj/article/view/7259/6535>
6. National Ground Water Association (NGWA) *Virus Attenuation in Managed Aquifer Recharge* position paper, https://www.ngwa.org/docs/default-source/default-document-library/virus-attenuation-in-mar_final.pdf?sfvrsn=b8c5643_1
7. South Texas News *Judge Reverses TCEQ decision on UEC Groundwater Permits* news article, https://www.southtexasnews.com/goliad_advance_guard/judge-reverses-tceq-decision-on-uec-groundwater-permits/article_2143e710-2228-4efb-ae4c-dd7ddd4677ed.html
8. NGWA *Data Centers and Groundwater Resources* position paper, https://www.ngwa.org/docs/default-source/default-document-library/2024-position-papers/datacenterspositionpaperfinal.pdf?sfvrsn=2069bff0_3
9. Draft TGPC GWI Subcommittee *Annual Report*
10. USGS Groundwater Updates

MEETING RECORD OF SEPTEMBER 16, 2026

1. PRE-MEETING REMINDERS

Before the meeting started, Chris Heiligenstein (RRC) provided the attendees with some tips that would facilitate a productive videoconference.

2. CALL TO ORDER AND INTRODUCTIONS

The TGPC approves all Subcommittee products and designated TGPC members attending this Subcommittee meeting participated as an employee or representative of their agency or organization, not as a designated TGPC member. Therefore, this Subcommittee meeting was not subject to the Open Meetings Act and it was held 100% virtually. The public was also able to attend this meeting via videoconference or teleconference at no cost.

Chris Heiligenstein (RRC), Co-Chair of the GWI Subcommittee, called the meeting to order at approximately 9:33 AM CDT and then called the roll of GWI Subcommittee members. The representative from Texas A&M AgriLife Extension Service (AgriLife Extension) was not present at the meeting.

3. STATUS REPORTS

Agricultural Chemicals Task Force

After Al Cherepon's recent retirement, Dan Hannah (TCEQ) would be taking over TCEQ's pesticide project, and he reported on the Agricultural Chemicals Task Force:

- For Fiscal Year (FY) 2026, a total of 200 groundwater samples (not including blank/duplicate samples for QA/QC) were provided to TCEQ by TWDB as part of the Cooperative Monitoring Program. All samples were analyzed by immunoassay for atrazine, with one detect (0.06 ppb) that was well below the Maximum Contaminant Level (MCL) of 3.0 ppb.
- The updated TCEQ Interagency Pesticide Database (IPD) and FY 2026 pesticide monitoring results from the TCEQ Public Drinking Water program and TCEQ Source Water Protection program would be uploaded into the U.S. Environmental Protection Agency (EPA) Central Data Exchange – Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA) Grant Database website in late October 2026 or early November 2026. An updated IPD report was still being prepared to replace the previous 2008 report. Numerous potential errors were identified with the USGS data between 2019 and 2025, and this was being investigated and corrected as needed.
- On August 4, 2026, Dan Hannah (TCEQ) attended TCEQ's annual Public Drinking Water Conference in Austin and staffed the TGPC exhibit booth from which FIFRA grant-related information was distributed.
- The Pesticides of INterest Tracking System (POINTS) database was no longer in service. Should this change, updates would be provided annually in December.
- The Fall pesticide program meeting would be hosted by the U.S. EPA in Dallas in October 2026, and it would again be in a hybrid format.

David Villarreal (TDA) asked if the Agricultural Chemicals Task Force’s scope could be expanded beyond pesticides to include other contaminants (e.g., microplastics and nanoplastics (MNPs), polyfluoroalkyl substances (PFAS), microbials, etc.). Eric Simon (TCEQ) indicated that the current U.S. EPA FIFRA grant to TCEQ only applied to traditional pesticide products.

TGPC Publications

Cindy Hooper (TCEQ) reported on the following TGPC publication:

- *Activities and Recommendations of the Texas Groundwater Protection Committee: Report to the 90th Legislature* (“Legislative Report”, TCEQ publication SFR-47/26)
 - o The TGPC Legislative Report Subcommittee was preparing the draft *Legislative Report* to be presented to the TGPC for approval at its October 2026 meeting.
 - o The final report would be delivered by December 31, 2026.

Cindy Hooper (TCEQ) also reported on the following groundwater-related TCEQ publication:

- *Priority Groundwater Management Areas and Groundwater Conservation Districts, Report to the 90th Texas Legislature* (“PGMA/GCD Legislative Report”, TCEQ publication SFR-53/26)
 - o The *PGMA/GCD Legislative Report* was being prepared and would be delivered by January 2027.

Adam Foster (TAGD) asked why the El Paso County PGMA had been removed from the *PGMA/GCD Legislative Report* several years ago. Peggy Hunka (TCEQ) indicated that there had been improvements in the area (e.g., alternative water supplies) after the El Paso County PGMA Report (<https://www.tceq.texas.gov/groundwater/groundwater-planning-assessment/pgma.html#designated>) was published in 1998, so although that PGMA still exists, the recommendation for the creation of one or more GCDs within it has not been needed.

4. SET FUTURE MEETING DATE

The next TGPC GWI Subcommittee meeting was scheduled for Wednesday, December 2, 2026, at 9:30 AM CST and it was planned as a videoconference.

5. DISCUSS CURRENT GROUNDWATER ISSUES

Oil and Gas Produced Water

The *Texas Water Journal* had published a paper regarding the potential effects of produced water (PW) discharge on surface water quality in two segments of the Nueces River in southeast Texas (<https://twj-ojs-tdl.tdl.org/twj/article/view/7259/6535>). West of the 98th meridian, sufficiently treated PW from oilfields can be legally discharged into surface water for beneficial reuse. The study compared two sites – one associated with permitted discharges from an active oil extraction operation, and a “legacy” site known to be contaminated even after oil and gas operations were terminated there in 1987. At both sites, downstream concentrations of key PW constituents were consistently and significantly higher than their upstream counterparts. The study concluded that the permitting of surface discharges of treated PW must be carefully

regulated, and the downstream water quality must be continuously monitored for signature PW constituents. Note that groundwater quality was not a part of this study. Omar Valdez (DSHS) added that a key variable regarding groundwater quality is whether a waterway is a gaining stream or a losing stream, and that stream sediment contamination has a significant effect on the human food chain (e.g., metals within and adsorbed to the sediment can find their way into fish that humans then consume).

Justin Thompson (UTBEG) reported that a data center in west Texas was considering the use of oil and gas PW for their cooling systems. Stanley Aniagu (TCEQ) announced that the Interstate Technology & Regulatory Council (ITRC, <https://itrcweb.org/>) had decided to establish a Brines and Produced Water Team (<https://itrcweb.org/brines-produced-water/>) in 2027, any interested parties could join the team, and that the ITRC was referencing a lot of the Texas Produced Water Consortium (TxPWC, <https://www.depts.ttu.edu/research/tx-water-consortium/>) information. Carly Rotzler (TPWD) added that she and Marty Kelly (TPWD) had been attending the monthly TxPWC Stakeholder meetings where they learned that:

- TxPWC would be releasing their legislative report in early October 2026;
- A proposed data center in Abilene may be using treated PW for cooling;
- TxPWC had recently given testimonies at two Texas legislative hearings, and they would be giving presentations at five upcoming conferences; and,
- TxPWC was continuing its PW crop and biological research through TTU.

In addition, Carly Rotzler (TPWD) reported that they were working with Southwest Research Institute (SWRI) on groundwater / surface water interactions at several sites along the Pecos River.

Ken Rainwater (TTU) joined at approximately 10:04 AM CDT and was present for the remainder of the meeting.

Emerging Chemical and Biological Contaminants

Justin Thompson (UTBEG) reported that the detection limits for PFAS and MNPs were challenging due to the analysis costs for the specialized instrumentation that was required. Rebecca Storms (TWDB) added that PFAS and MNPs were ubiquitous in the environment, so tracing the sources and responsible parties can also be challenging.

Carly Rotzler (TPWD) reported that the U.S. EPA had recently released a guidance document on PFAS in biosolids (<https://www.wastedive.com/news/epa-draft-guidance-pfas-in-biosolids-reactions-listening-session/829431/>), and that this was of interest in Johnson County where a disaster declaration had been issued in 2025 due to the field application of PFAS-contaminated biosolids and the additional concern that this could potentially affecting the local groundwater quality. Adam Foster (TAGD) asked whether a recommendation could be made to increase groundwater sampling and analysis for PFAS and MNPs, and Kathy McCormack (TCEQ) indicated that this was one of the recommendations in the TGPC white paper on groundwater quality monitoring (https://tgpc.texas.gov/gwissues/white_papers/GWQMwhitepaper09Oct2024.pdf). Adam Foster (TAGD) added that USGS had been doing a lot of work related to PFAS, and Linzy Foster

(USGS) provided a reference to one of their recent papers regarding the land application of reused materials, their contaminants, and plant uptake of those contaminants (<https://www.usgs.gov/publications/land-application-biosolid-livestock-and-drilling-wastes-us-farmland-a-potential>).

Managed Aquifer Recharge (MAR)

The National Ground Water Association (NGWA) had released a position paper on *Virus Attenuation in Managed Aquifer Recharge* (https://www.ngwa.org/docs/default-source/default-document-library/virus-attenuation-in-mar_final.pdf?sfvrsn=b8c5643_1) highlighting:

- The issue of conservative state regulations regarding virus reduction constraining MAR for communities in need of supplementing water supply;
- Evidence demonstrating subsurface virus attenuation during recharge effectively protecting groundwater; and,
- Their priority for incorporating the best available science on subsurface virus attenuation into practical and cost-effective MAR regulatory frameworks.

Rebecca Storms (TWDB) reported that TWDB and TCEQ staff would be presenting on the Aquifer Storage and Recovery (ASR) and Aquifer Recharge (AR) implementation process in Texas at the next TGPC meeting on October 14, 2026.

Abandoned Water Wells

There was no discussion of this topic at the meeting.

Groundwater Quality Monitoring

Rebecca Storms (TWDB) reported that:

- The FY 2026 water quality season was completed in August 2026. TWDB staff collected 333 groundwater quality samples from wells in four major aquifers and five minor aquifers, with a few samples collected in additional aquifers. Major aquifers included the Carrizo-Wilcox, Hueco-Mesilla Bolson, Pecos Valley, and Seymour, and primary minor aquifers included the Blaine, Queen City, Sparta, West Texas Bolson, and Cross Timbers.
 - o TWDB funded Cooperator sampling efforts for an additional 95 samples.
 - o TWDB staff additionally visited 13 on-going observation springs and six new intermittent observation springs to measure flow rates and collect field water quality parameters as part of the Springs Monitoring Program activities. Five water quality samples were collected from the intermittent observation springs (located in the Edwards-Trinity Plateau, Ellenberger-San Saba, and Igneous aquifers) for laboratory analysis.
- TWDB planned to sample the Edwards-Trinity (Plateau) and Trinity aquifers, and some nearby minor aquifers, in the summer of 2027.

Brackish Groundwater

Rebecca Storms (TWDB) reported that:

- Their Board designated four new Brackish Groundwater Production Zones (BGPZs) for the southern portion of the Trinity Aquifer on September 10, 2026. Datasets for these new zones and an updated map showing all current BGPZs were available at <https://www.twdb.texas.gov/groundwater/bracs/HB30.asp>.

Evapotranspiration Networks

Rebecca Storms (TWDB) reported that:

- TexMesonet staff installed a new meteorological station at Moon Ranch in Jeff Davis County;
- TexMesonet staff were contacted by the Neches and Trinity Valley GCD about the potential for installing mesonet stations on GCD lands; staff had reviewed sites proposed by the GCD and would follow up on a few sites from the list, and east Texas currently had a gap in mesonet coverage, so collaborating with the GCD would potentially help establish one or more TexMesonet stations in that area;
- A new TexMesonet station was contracted to be installed in Presidio County. This site was selected with a lead from the Jeff Davis County Underground Water Conservation District (UWCD); and,
- Their Executive Administrator had given preliminary approval to proceed with funding two evapotranspiration (ET) projects to be executed by AgriLife Extension.

Others

On July 22, 2026, a Travis County district judge filed a ruling in favor of Goliad County GCD which reversed a TCEQ order granting Uranium Energy Corporation (UEC) the renewal and amendment of two permits (https://www.southtexasnews.com/goliad_advance_guard/judge-reverses-tceq-decision-on-uec-groundwater-permits/article_2143e710-2228-4efb-ae4c-dd7ddd4677ed.html). The judge ruled that the decision to issue the permits was “arbitrary and capricious and/or in violation of a statutory provision by failing to protect groundwater.” TCEQ must conduct further proceedings.

NGWA had also released a position paper on *Data Centers and Groundwater Resources* (https://www.ngwa.org/docs/default-source/default-document-library/2024-position-papers/datacenterspositionpaperfinal.pdf?sfvrsn=2069bff0_3). They believed that data centers must be planned and managed in a manner that protects groundwater resources, and they were offering an overview of this paper in a free webinar on September 17, 2026. Note that while NGWA advocates for “the responsible development, management, and use of water”, the TGPC is focused on groundwater quality, and thus far it had refrained from involvement in this issue which is mainly related to groundwater supply and usage.

6. BUSINESS DISCUSSION AND POSSIBLE ACTION

Draft TGPC GWI Subcommittee *Annual Report*

As required by the GWI Subcommittee's *Charge* (https://tgpc.texas.gov/wp-content/themes/responsive/subcommittees/gwissues/GWI_SubComm_Charge12Jul2023.pdf), Chris Heiligenstein (RRC) presented a draft of the TGPC GWI Subcommittee *Annual Report*. In FY 2026, the GWI Subcommittee met four times, reviewed the Agricultural Chemicals Task Force and TGPC Publications status reports, and discussed a number of groundwater-related topics. At the meeting on June 3, 2026, the GWI Subcommittee reviewed its *Charge* and did not have any changes to recommend to the TGPC. In FY 2027, the GWI Subcommittee would develop its new biennial *Activity Plan* and continue to develop white papers. Omar Valdez (DSHS) asked whether MNPs could be made a stand-alone issue in the next *Activity Plan* (rather than included within the broader issue of emerging chemical and biological contaminants), and Kathy McCormack (TCEQ) indicated that this could certainly be discussed during upcoming Subcommittee meetings. Ken Rainwater (TTU) moved, Stanley Aniagu (TCEQ) seconded, and all remaining members approved the draft *Annual Report* with one minor change (i.e., the date on page 1). The *Annual Report* would be presented to the TGPC for final approval at their next meeting.

Discussion of White Papers Under Development

There was no discussion of white papers at the meeting.

7. ANNOUNCEMENTS

Linzy Foster (USGS) announced a recent publication from their Oklahoma-Texas Water Science Center regarding *Continuous Monitoring and Temporal Variability of Fluorescence of Dissolved Organic Matter in Karst Groundwater of the Edwards Aquifer, South-Central Texas, 2019–24* (<https://doi.org/10.3133/sir20265058>). Recent publications and news related to groundwater from their Water Mission Area were *A roadmap for identifying and interpreting physical processes and national water model prediction bias associated with baseflow index regimes across the contiguous United States* (<https://www.usgs.gov/publications/a-roadmap-identifying-and-interpreting-physical-processes-and-national-water-model>), and *As above, so below? Trends in groundwater and streamflow across the United States 1980–2020* (<https://www.usgs.gov/mission-areas/water-resources/news/above-so-below-trends-groundwater-and-streamflow-across-united>). An update from their Water Data for the Nation team was the NWISWeb Decommission Campaign 3 (<https://waterdata.usgs.gov/blog/nwisweb-decommission-campaign3>) which would retire all remaining National Water Information System Web (NWISWeb) pages and WaterServices – this work was expected to continue through February 2027, and it was the last of three campaigns to decommission legacy NWISWeb pages currently hosted at <https://waterdata.usgs.gov>, including NWISMapper and the Monitoring Location Pages.

Kathy McCormack (TCEQ) provided an update on the TGPC website redesign project that had been announced at the TGPC meeting on July 8, 2026. The project had been funded, and work

was underway. The TGPC website had not been upgraded in over a decade, and it currently had some cybersecurity vulnerabilities which this redesign would address. The website would continue to have the same URL, but it would have a simplified look and feel.

8. PUBLIC COMMENT

Kristin DeBone (TCEQ) announced that the public comment period had closed on their draft *2027 Texas Nonpoint Source Management Program*, that it was scheduled to go before TCEQ and TSSWCB commissioners for final approval in December 2026, and then it would be submitted to the U.S. EPA in March 2027.

9. ADJOURN

Chris Heiligenstein (RRC) adjourned the meeting at approximately 10:42 AM CDT.