

2022 Carrizo Saturated Thickness Model

### 2022 Carrizo Saturated Sand Thickness Model

GCGCD is excited to announce the release of the NEW 2022 Carrizo Saturated Sand Thickness Model and Water Rights Allocation using the newly adopted Annual Production Cap (APC).

Effective June 1, 2022 – the District will release the new water rights calculations for property owners situated over the Carrizo Aquifer within the District boundaries using the APC of 16,000 acre-feet per year.

Remember, GCGCD Carrizo Water Rights are calculated by using the relative percentage of the total amount of saturated Carrizo sands within the District which is attributed to any individual property multiplied by the APC. [Rule 5.4(d)]

Continued on page 3.



[WWW.GCGCD.ORG](http://WWW.GCGCD.ORG)



Visit our website for more information!

# GCGCD NEWS



## SPRING 2022 Newsletter



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Happy Spring Everyone!

I wanted to thank you for your patience waiting on our Spring Newsletter. I postponed publishing so I could share with you the exciting news of our **NEW 2022 Carrizo Saturated Sand Thickness Model** release - Adopted just this month by the Board. Be sure to visit our website for the release of the Carrizo Water Rights using the new APC released on June 1<sup>st</sup> – [www.gcgcd.org](http://www.gcgcd.org)

Enjoy the Spring weather while it lasts – it will be Summer soon!

*Kelley*



*Kelley Cochran  
General Manager*



**READ ME!**

January 2022

Water Level [Report](#)

By William B. Klemt, P.G.



### SUMMARY

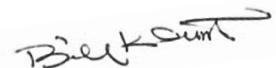
Short term: (January 2021 - January 2022) Carrizo Aquifer water levels declined ~ 1.8 feet

Long term: (2013-2022) Carrizo Aquifer water levels in the outcrop indicate an average decline of less than  $\frac{1}{2}$  foot/year

At the present-day level of pumpage, small to moderate water level declines are continuing in the Carrizo Aquifer down-dip from the outcrop.

However, additional proposed pumpage is expected to increase the rate of Carrizo Aquifer water level decline within the District to a more moderate level.

For the most part, Wilcox Aquifer water levels remain relatively stable.



Continued from cover: **2022 Carrizo Saturated Sand Thickness Model**

During our annual review of the model, and looking at the ‘best available science’, the District set out to evaluate if newly available data from the TWDB and current reliable hydrological data from the District’s water level measurements could be inputted to the model to reflect a more accurate depiction of the aquifer adjusting to changing conditions.

Following the completion of GCGCD’s Carrizo outcrop monitoring wells and the release of the TWDB Brackish Resources Aquifer Characterization System (BRACS) data and subsequent published TWDB Report 385, we tasked our GIS specialist and developer of the 2003 Carrizo Saturated Thickness Model - Shawn Vickers, Kiva Consulting to evaluate a possible model update.

Shawn worked with the TWDB BRACS manager Alysa Suydam, P.G. and the District’s hydrogeologist William B. Klemt, P.G. to review geophysical logs for possible inclusion. The analysis revealed that a new model would better reflect the aquifer characteristics. The new 2022 Carrizo Saturated Sand Thickness Model was adopted at our May 12<sup>th</sup> GCGCD board meeting. A technical memo will be available in June for those interesting in learning more about the model.

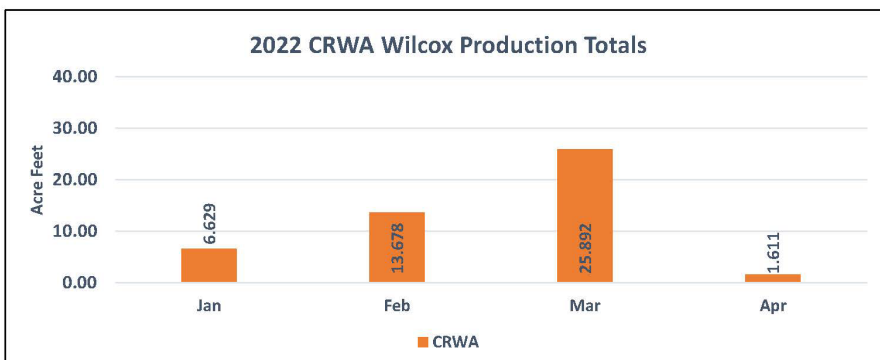
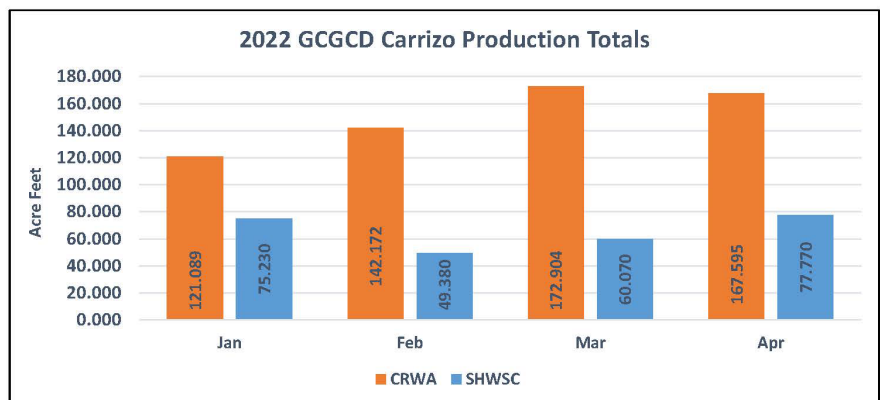
New Carrizo Water Rights will be posted on our website June 1<sup>st</sup> [www.gcgcd.org](http://www.gcgcd.org).

**DFC Update**

April 15, 2022 – The Desired Future Conditions Explanatory Report and other materials for Groundwater Management Area 13 were determined Administratively Complete in accordance with statute and approved by the Executive Administrator.

**Next step** – Each GCD within GMA 13 will formally adopt the DFC.

Modeled Available Groundwater (MAG) values will be issued no later than October 15, 2022.





Additional information

[State Managed Well Plugging Video](#)

[Wells remaining to be Plugged with State Managed Funds](#)

[State Managed Plugging Activities Monthly Reports](#)

**RRC Eligibility for \$343m for Orphan Oil & Gas Wells**

Through the RRC, Texas is eligible to apply for \$343 million in federal infrastructure funds to assist with the clean-up of orphan oil and gas wells. *What is an orphaned oil & gas well?* A well is considered 'orphaned' when there is no longer a legal owner to take responsibility.

This program's funding will enable the RRC to continue it's plugging programs, remediating high-priority wells, and collecting additional data regarding the number of orphaned wells. These wells can pose a contamination risk to groundwater, among other concerns. To learn more about the RRC's orphaned wells in Texas – visit the RRC's website [Orphan Well Query \(texas.gov\)](#)

**Annual Geronimo and Alligator Creeks Clean Up**

Held April 30<sup>th</sup> & Another great success! Thank you to all that participated.

<http://gcgcd.org/outreach.html>



Texas A&M AgriLife Extension organizes this event and once again, GCGCD is proud to sponsor this great cause!

For more information visit: [Home - Geronimo and Alligator Creeks Watershed Partnership \(geronimocreek.org\)](#)



**Water Conservation Tips**

- ❖ Only order water in a restaurant if you're *actually* going to drink it
- ❖ Do you grab a fresh towel for each shower? Make it last a week – do less laundry – save water!
- ❖ Don't overwater your plants, garden & lawn – Use a soil moisture meter for healthier plants and conservation!
- ❖ When cooking, peel and clean vegetables in a large bowl of water instead of under running water.





Omar changing out transducer at Monitoring Well MW-CZ-7



Texas Runs on Water is a  
2022 Conservation Wrangler!



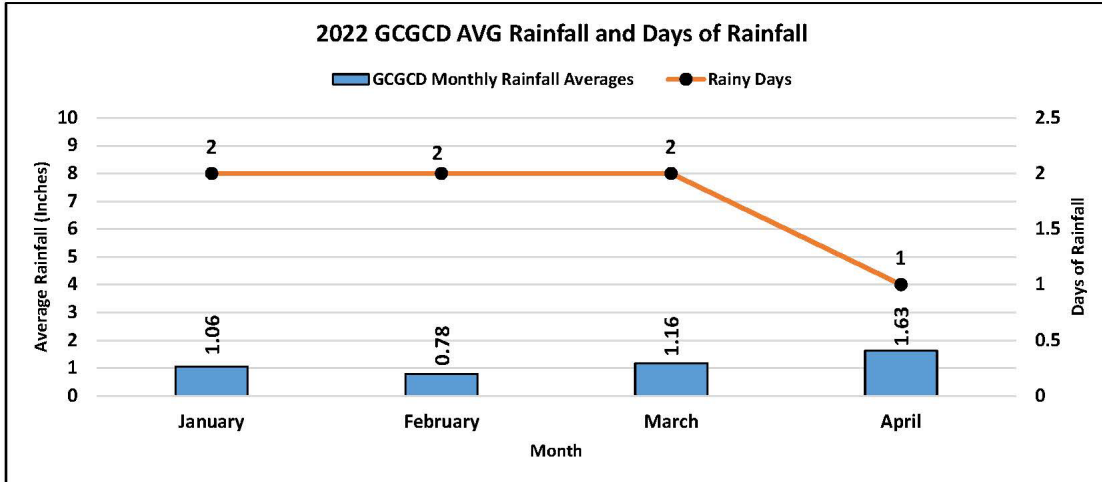
**Texan by Nature (TxN) Conservation Wrangler is an accelerator program that catalyzes the very best Texan-led conservation projects occurring in the state. Selected projects are science-based and demonstrate a positive Return on Conservation for people, prosperity, and natural resources.**

**Texas Water Foundation is working to lead Texas into a sustainable water future by investing in the next generation of water leaders, equipping decision makers, and inviting every Texan to recognize that **Texas Runs on Water.****

SSLGC Guadalupe  
Project well field  
progressing.



Thank you - Don Barrett of Walker Partners - for the field day tour



## EARTH DAY 2022

Seguin's Earth Day Celebration was held Downtown Central Park, Austin Street in conjunction with Main Street's Spring Trade Days on April 30<sup>th</sup>. Hundreds of folks turned out to join in the celebration and learn more about how to help protect the environment and conserve natural resources.

We want to thank everyone for coming by our booth and visiting with us about water conservation! We're so happy you joined our newsletter list!



Thank you,  
Mayor Donna Dodgen, for stopping by our booth!



GCGCD Board President Hilmar Starcke, III

District Field Tech Omar Maldonado greeted everyone with a smile!



Even ELVIS stopped by 😊



## Atlantic Hurricane Season 2022



### Hurricane Name List 2022

Every hurricane season, it is important to refresh on the difference between storm warnings. A **watch** and a **warning** have different levels of urgency. Both can be applied to hurricanes, tropical storms, tornadoes, and/or floods. Knowing the difference between these terms is essential to identifying the dangers of an approaching weather event. As hurricane season is upon us - it's an excellent idea to discuss an emergency plan with your family *before* a watch or warning has been issued.

A **hurricane watch** is issued when a hurricane poses a possible threat to your area, generally within 48 hours. A watch does not necessarily mean you will experience hurricane conditions, but that these conditions are possible. In the event of a hurricane watch, people should prepare their homes and review their evacuation plans in case a warning is issued.

A **hurricane warning** is issued when hurricane force winds are expected within 24 hours. A warning is essentially a 'wake-up' call that hurricane conditions are expected in your area and any plans to protect your family, pets, and property should have already been done. If evacuation orders are in place, immediately leave the threatened area.

Source: National Weather Service



- Alex
- Bonnie
- Colin
- Danielle
- Earl
- Fiona
- Gaston
- Hermine
- Ian
- Julia
- Karl
- Lisa
- Martin
- Nicole
- Owen
- Paula
- Richard
- Shary
- Tobias
- Virginie
- Walter

### Why Are Tropical Storms and Hurricanes Given Names?

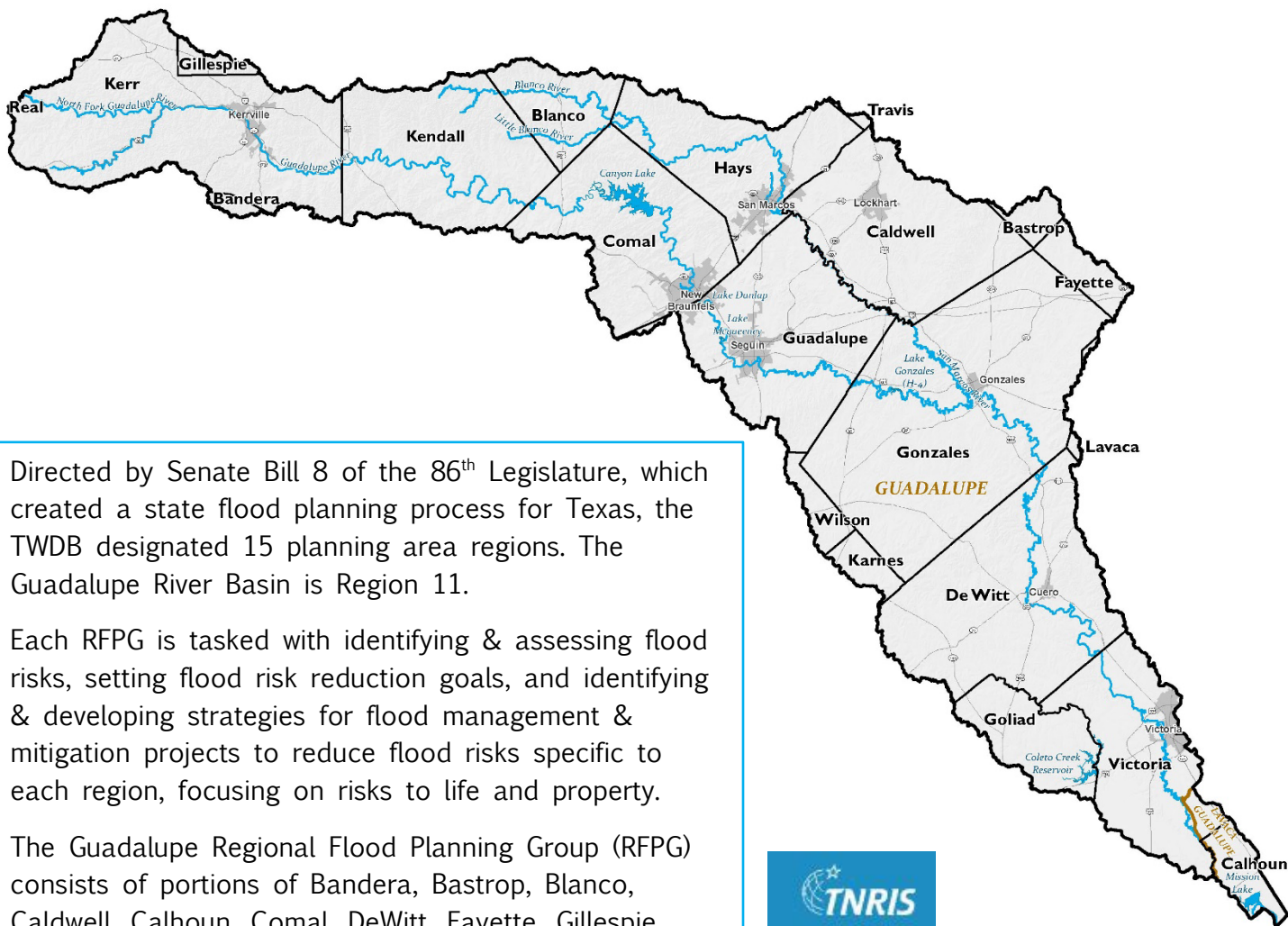
Prior to naming tropical cyclones, storms were typically named according to the area it impacted and the year that it formed. For example, the Galveston Storm of 1900. During World War II, meteorologists in the U.S. Army and Navy recognized the need for a better system to denote hurricanes. Adopted in 1953 as tribute to their wives and girlfriends, hurricanes were given women's names. However, this naming system was criticized and in 1979 the National Weather Service and the World Meteorological Association switched over to an alternating inventory of both men's and women's names. These lists of names are rotated every six years, alternating between male to female or female to male. The only change to these lists occurs if a tropical storm or hurricane is so deadly or costly that the name is retired from future use. Some examples of retired names include Andrew, Harvey, Maria, and Katrina.

Source: [National Weather Service](https://www.weather.gov)



WORLD METEOROLOGICAL ORGANIZATION  
Weather - Climate - Water

## Region 11 Guadalupe Flood Planning Region



Directed by Senate Bill 8 of the 86<sup>th</sup> Legislature, which created a state flood planning process for Texas, the TWDB designated 15 planning area regions. The Guadalupe River Basin is Region 11.

Each RFPG is tasked with identifying & assessing flood risks, setting flood risk reduction goals, and identifying & developing strategies for flood management & mitigation projects to reduce flood risks specific to each region, focusing on risks to life and property.

The Guadalupe Regional Flood Planning Group (RFPG) consists of portions of Bandera, Bastrop, Blanco, Caldwell, Calhoun, Comal, DeWitt, Fayette, Gillespie, Goliad, Gonzales, Guadalupe, Hays, Karnes, Kendall, Kerr, Lavaca, Real, Refugio, Travis, Victoria, and Wilson counties lying within the Guadalupe River Basin.

The Comal, Blanco, and San Marcos Rivers all feed the Guadalupe River along this region. This region includes 5 major lakes & reservoirs.

The first regional flood plans will be due January 2023. The first statewide flood plan is due Sept. 1, 2024.

More Info – visit [Home - Guadalupe Regional Flood Planning Group \(guadalupefpg.org\)](http://www.guadalupefpg.org)

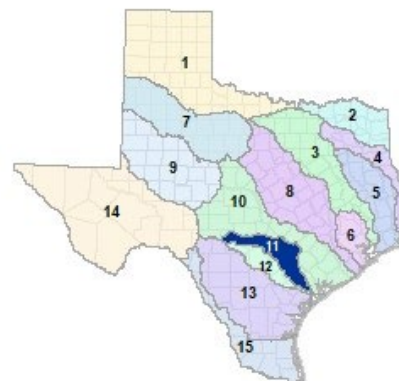
[Flood Planning | Texas Water Development Board](http://www.gcgcd.org)



Texas Water Development Board  
1700 North Congress Avenue, Austin, TX 78701  
www.twdb.texas.gov @twdb facebook.com/twdbboard



Maps/images courtesy of [TNRIS](http://www.tnr.org) & [TWDB](http://www.twdb.org)







**UPCOMING EVENTS**

American Ground Water Trust – June 1<sup>st</sup> & 2<sup>nd</sup> – Austin, TX <https://agwt.org/events>

Upcoming GCGCD board meetings: June 9<sup>th</sup>, & July 14<sup>th</sup> @ 4:30 PM

TAGD Summit – August 30<sup>th</sup> – Sept. 1<sup>st</sup>

[Texas Groundwater Summit](#) | [The Texas Alliance of Groundwater Districts](#)

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**Did you know - what led to the first  
Earth Day celebration?**

An unfortunate oil spill off the coast of Santa Barbara, California on January 28, 1969 led to ~30 million gallons of oil being released into the Pacific Ocean. This ‘environmental disaster’ sparked a push towards stronger environmental regulations.

On January 28, 1970, Environmental Rights Day was created in Santa Barbara, CA which led to the creation of Earth Day now celebrated globally on April 22 since 1970.

Source: earthday.org



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