



Guadalupe-Blanco River Authority

Your Trusted
Water Resource

Welcome to the 2025 CRP Steering Committee Meeting

- Please sign in!
- Agendas are available near the sign in sheet
- Please silence your cell phone
- Drinks are available in the kitchen

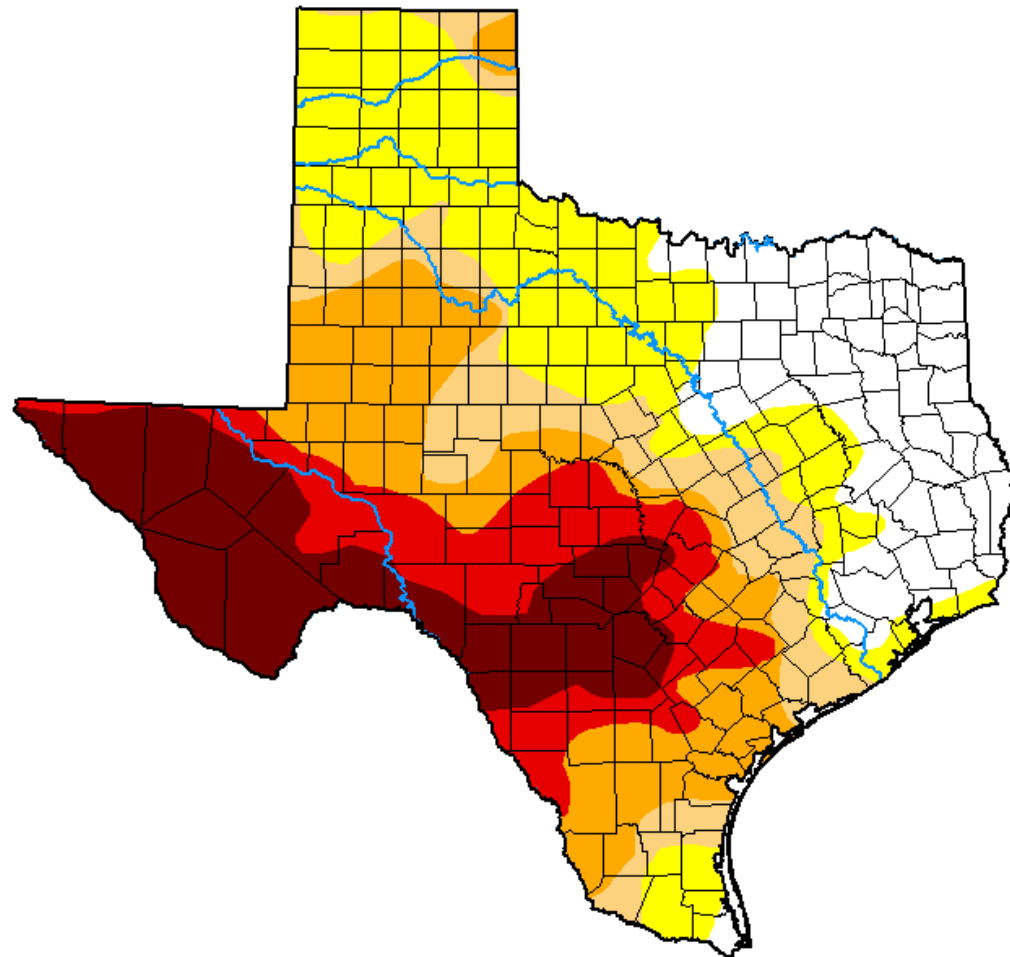
FY26-27 GBRA Clean Rivers Program Budget

	FY 2026 9/1/25 – 8/31/26	FY 2027 9/1/26 – 8/31/27	FY26 – FY27 Total
Total CRP Budget	\$161,118	\$161,028	\$322,390
Personnel	\$12,093	\$12,093	\$24,186
Supplies	\$8,195	\$8,210	\$16,369
Equipment	-	-	-
Travel	\$8,250	\$8,390	\$6,585
Other	\$132,450	\$132,540	\$265,080

U.S. Drought Monitor Texas

April 15, 2025
(Released Thursday, Apr. 17, 2025)
Valid 8 a.m. EDT

GBRA.ORG



Intensity:

- None
- D0 Abnormally Dry
- D1 Moderate Drought
- D2 Severe Drought
- D3 Extreme Drought
- D4 Exceptional Drought

The Drought Monitor focuses on broad-scale conditions. Local conditions may vary. For more information on the Drought Monitor, go to <https://droughtmonitor.unl.edu/About.aspx>

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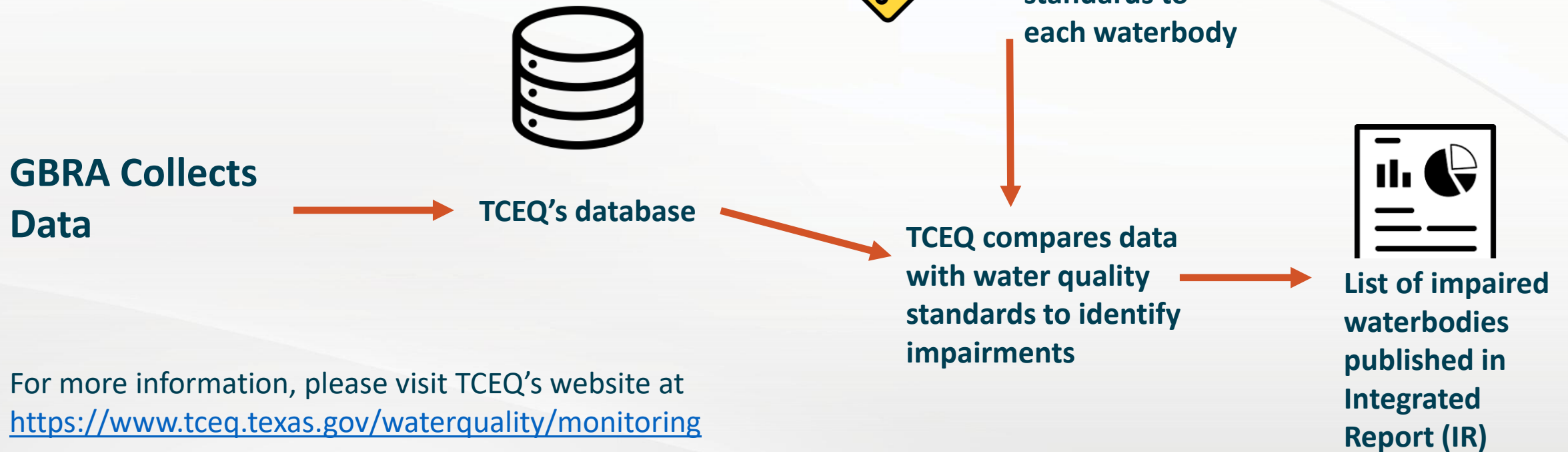


droughtmonitor.unl.edu

A Snapshot View of an Impaired Stream



How are CRP Data Used?



303d list of 2024 IR

Impaired segments in Guadalupe River Basin

Impairment	# of Segments Impaired
Bacteria	8
Dissolved Oxygen	3
Fish community	3
Macrobentic Community	3
Mercury in Fish Tissue	1
Total Dissolved Solids	1



Bacteria Impairment- Comal River

- Impaired due to elevated bacteria (*E. coli*) since 2016
- Only 2.5 mi long
- Located in New Braunfels
- Heavily used for recreation-tubing, swimming, etc.



Possible Contributors

Bacteria source tracking study:

- 64% *E. coli* from wildlife



Other Sources:

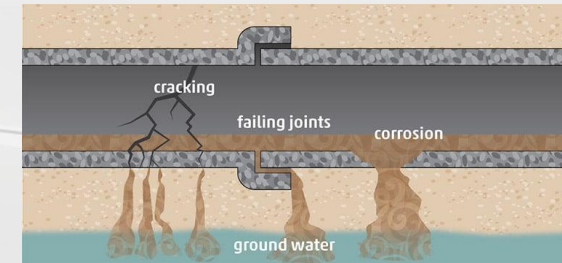
Pets



Livestock



Humans



Watershed Protection Plan

Best Management Practices Include:

- City ordinance banning the feeding of wildlife
- Educate on importance of picking up pet waste
- Removal of wildlife feces at specific locations along river



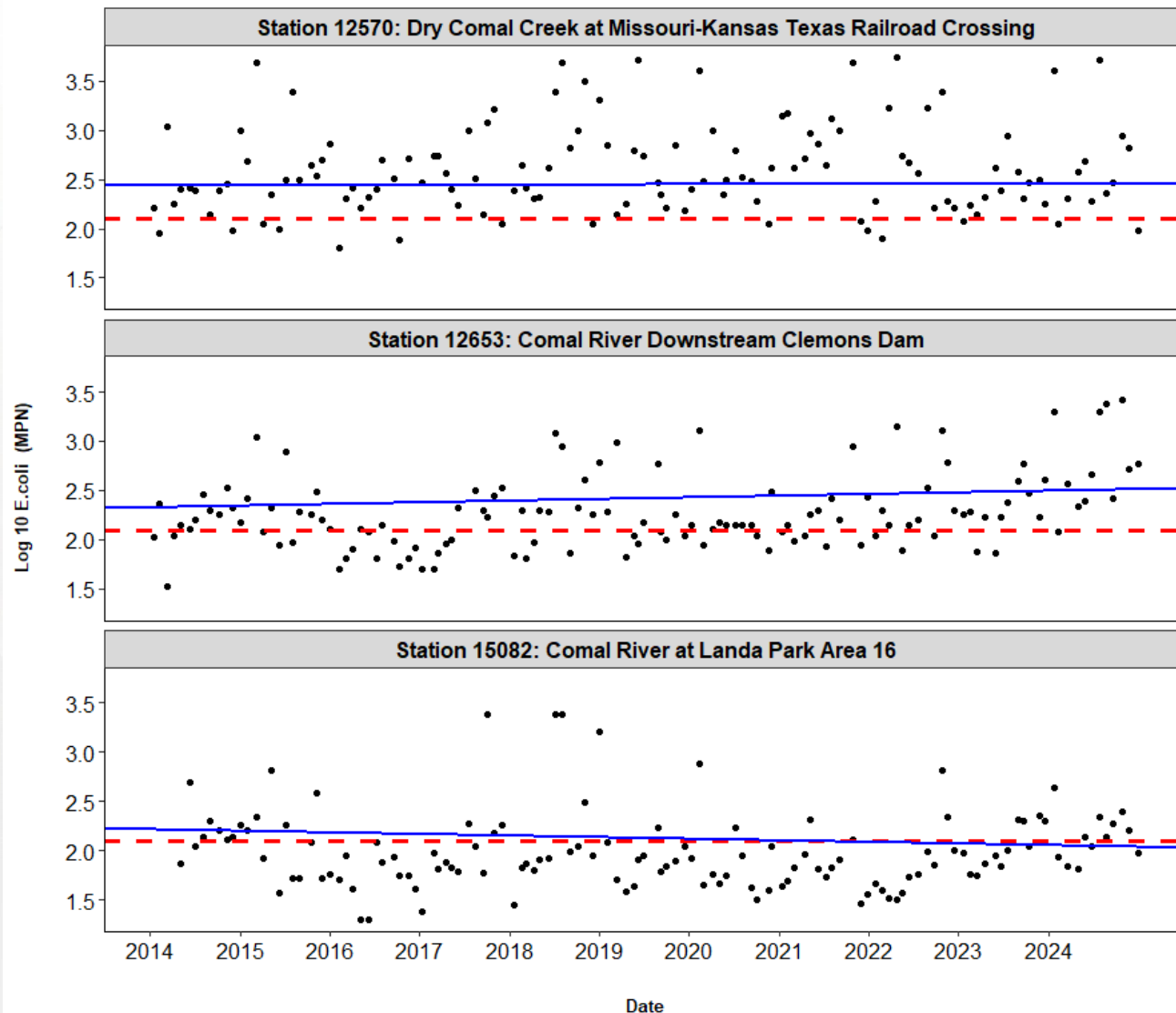
Are we seeing a difference in *E.coli*?

Image of Dry Comal 1/23/2024

- Multiple linear regression of log *E.coli* over time
 - Adjusts for flow and Total Suspended Solids (TSS)
- *E.coli* values fluctuate with flow, generally increasing when there is runoff
- *E.coli* can also bind to sediments, so higher suspended solids can = greater bacteria readings



Log E. coli vs. Time

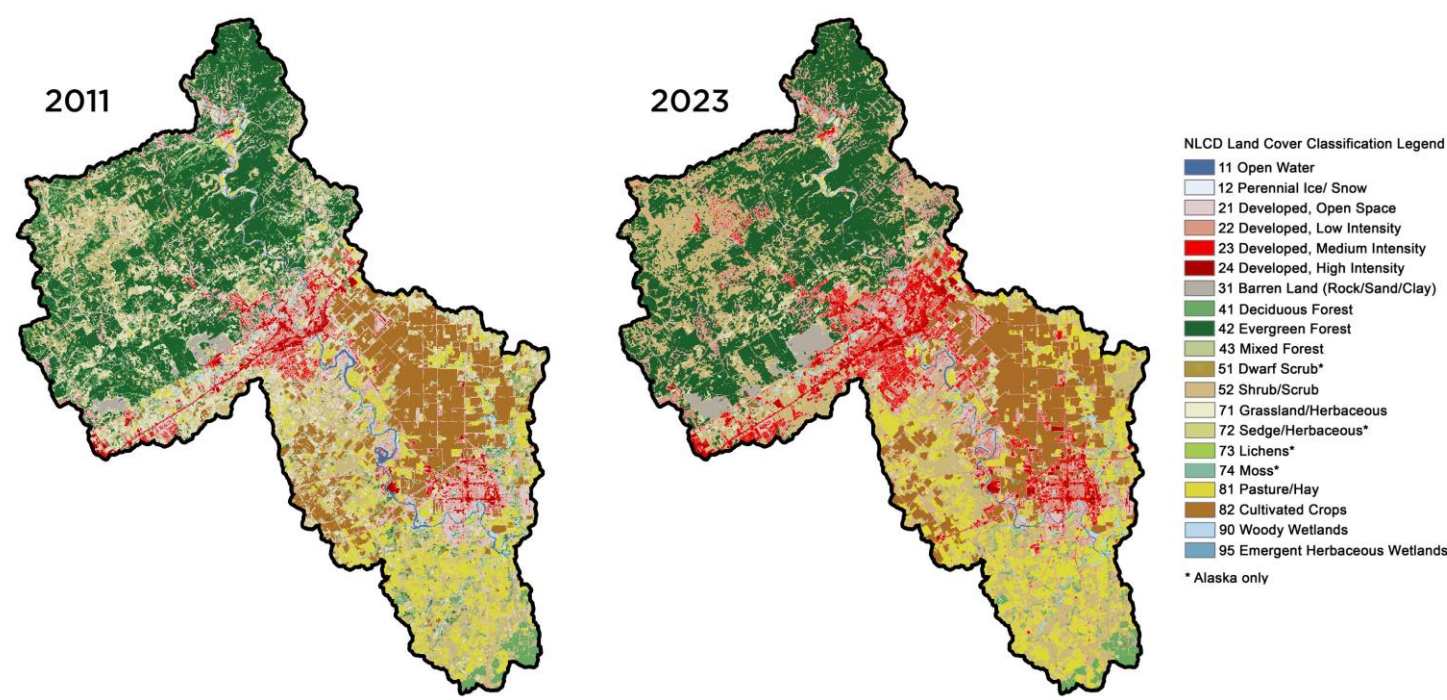


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Station	12570	12653	15082
Overall F-value	F(3,123)=19.15	F(3,126)=21.88	F(3,123)=3.36
Overall model p-value	<0.001	<0.001	0.021
Flow t-value	1.09	-3.16	-2.677
Flow p-value	0.277	0.002	0.008
TSS t-value	6.10	5.97	1.096
TSS p-value	<0.001	<0.001	0.275
Date t-value	0.126	1.77	-1.326
Date p-value	0.900	0.080	0.187

Are we seeing a difference in *E.coli*?

Land Use change between 2011 and 2023 in the Comal River Watershed



Source: United States Geological Survey (USGS), National Land Cover Database, 2011 and 2023.

Land Use	2011	2023	Percent Change
Developed	6%	18%	12%
Cultivated Crops/Hay	21%	22%	1%
Open water	1%	0%	0%
open space, barren land	11%	8%	-3%
Forest/wetland	31%	27%	-4%
Grassland/scrubshrub	31%	25%	-5%

Questions?

