



UGRA Volunteer Summer Study 2023



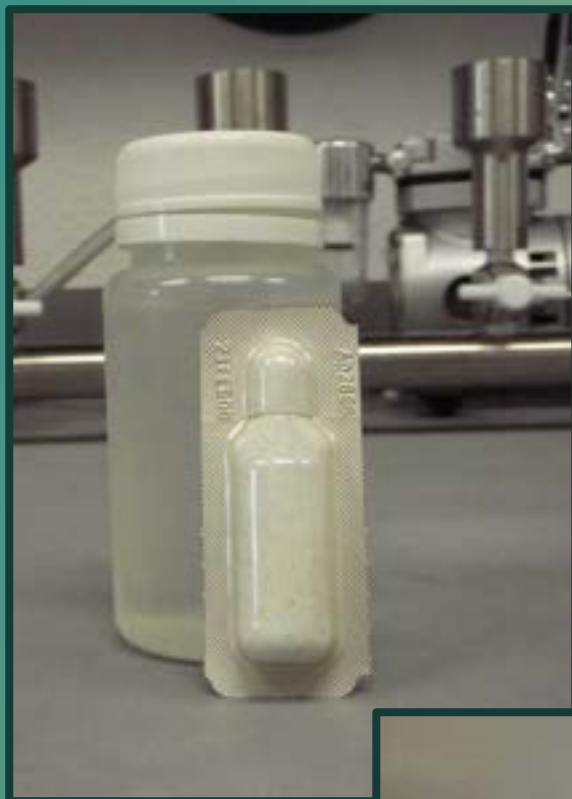
Goals

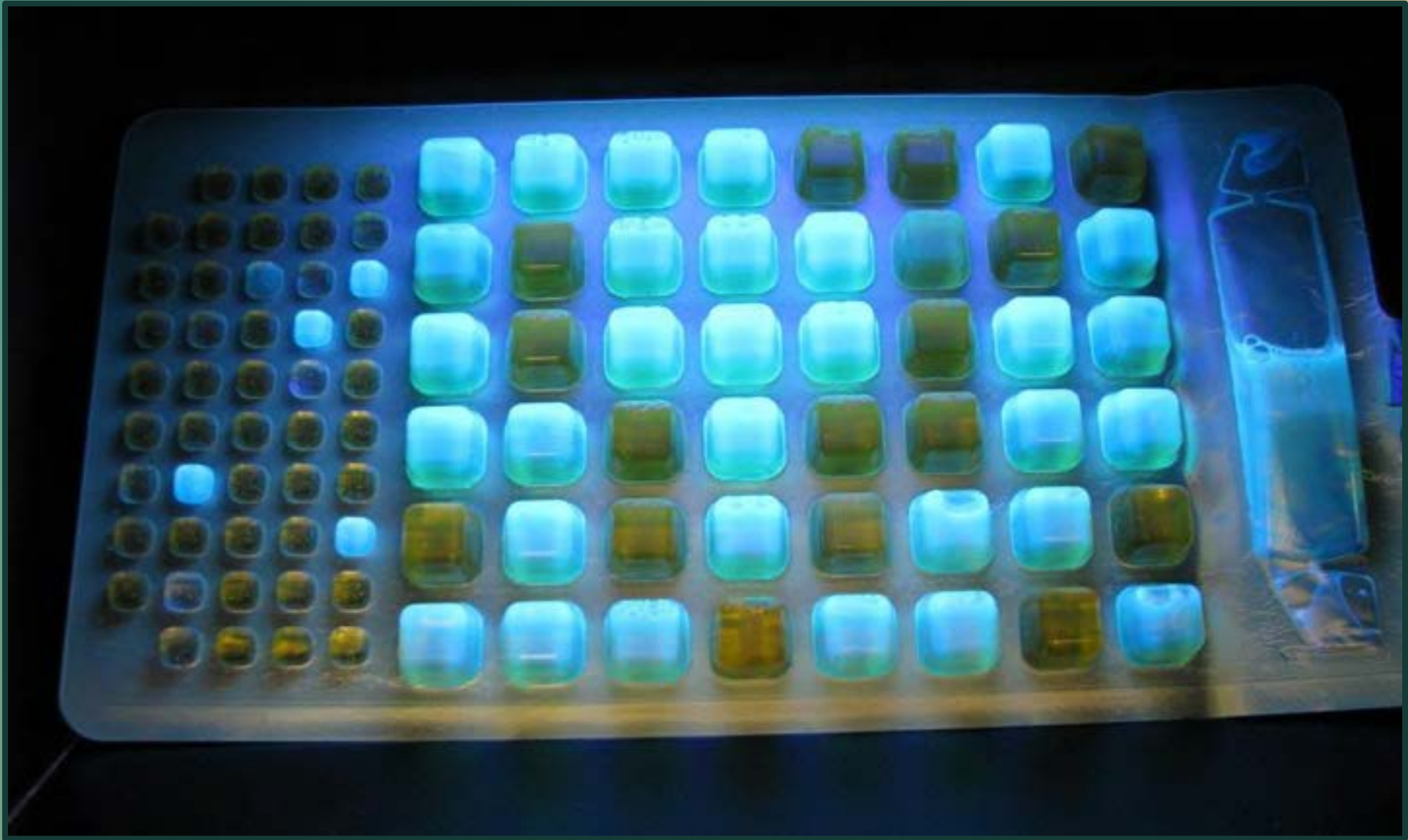
- Complement current UGRA summer bacteria sampling
- Identify areas in need of further investigation
- Include interested members of the community in water quality testing
- Build relationships with river stewards

Life of a Bacteria Sample

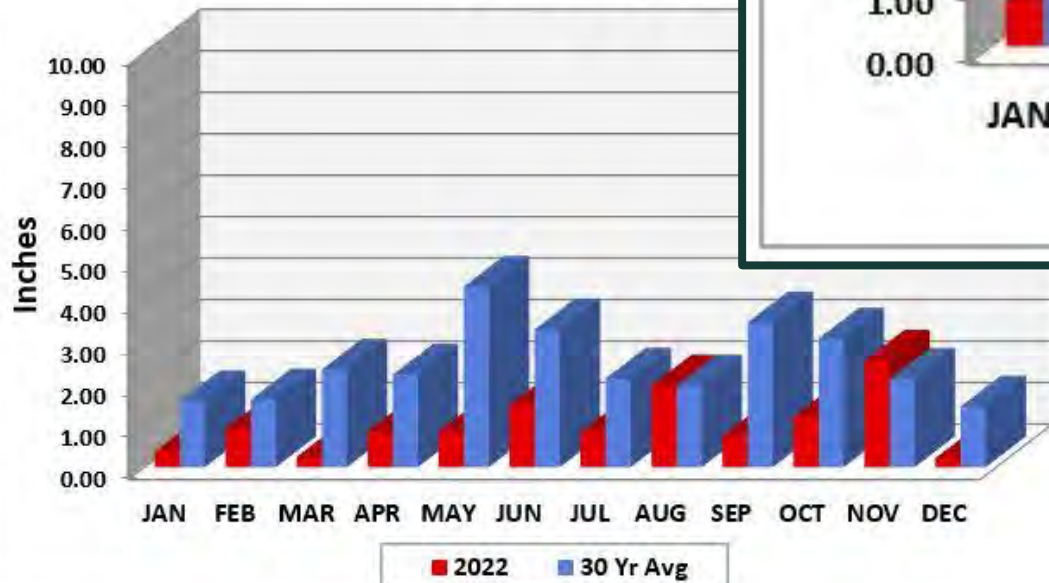
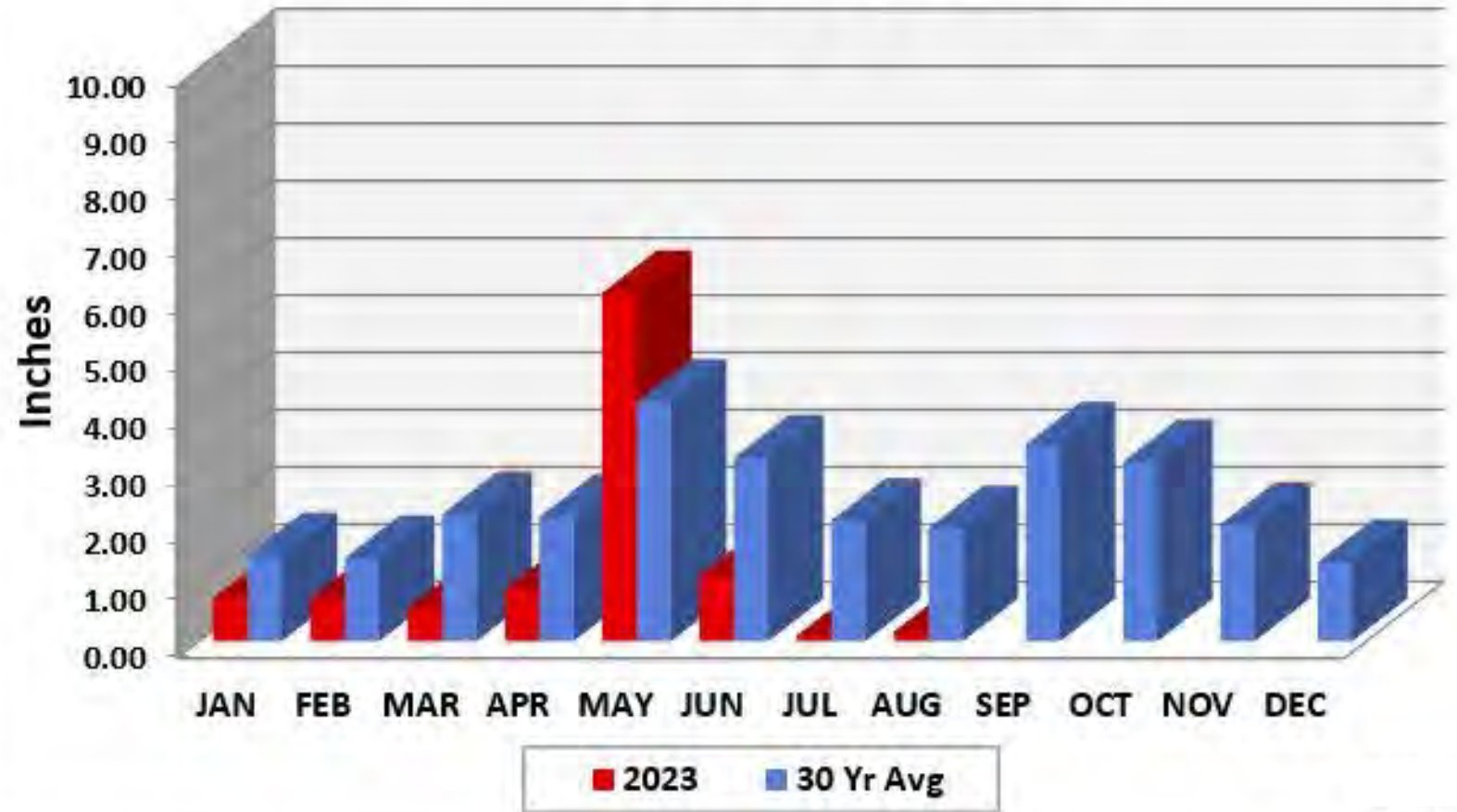


Lab



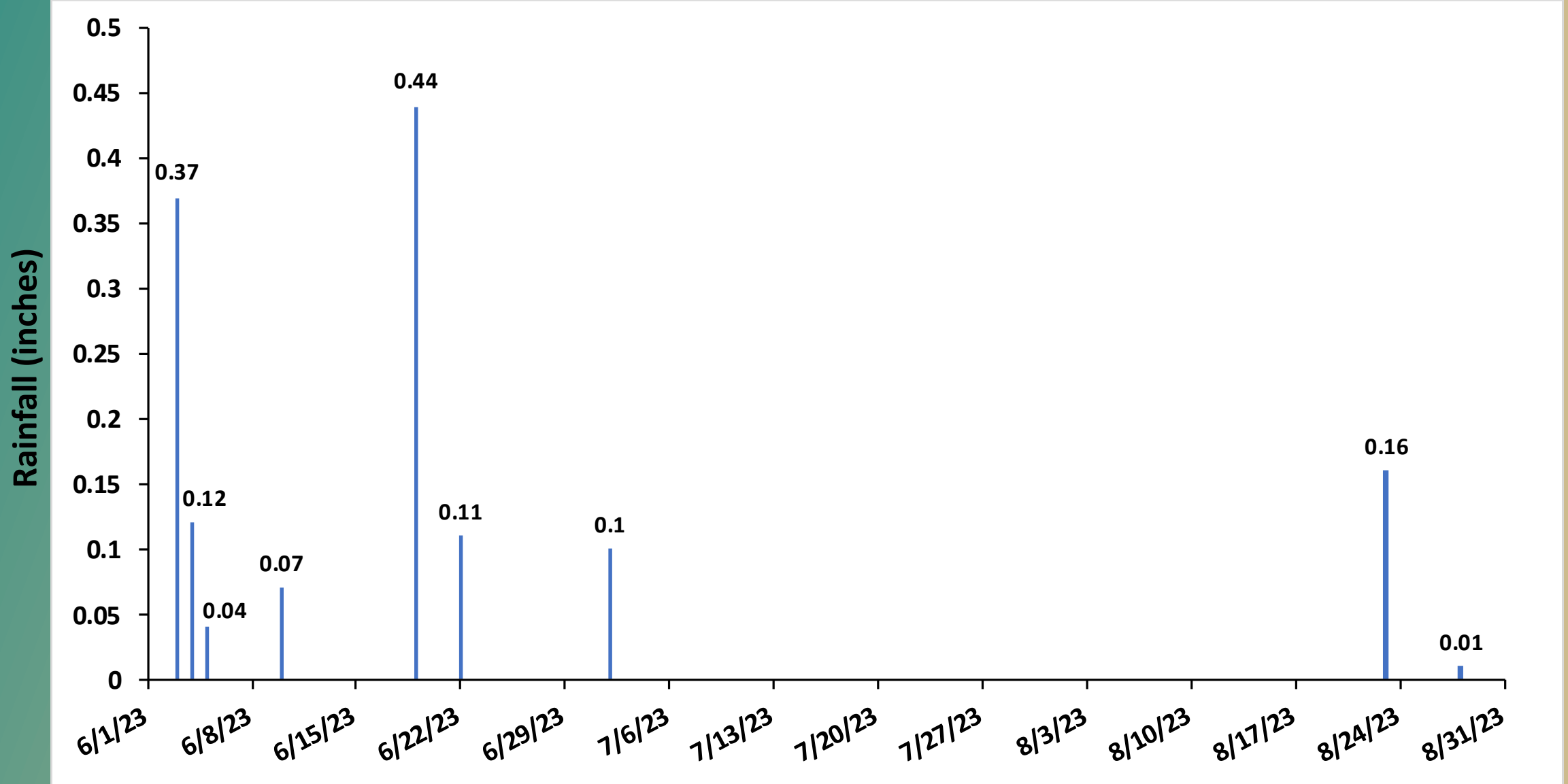


Rainfall By Month

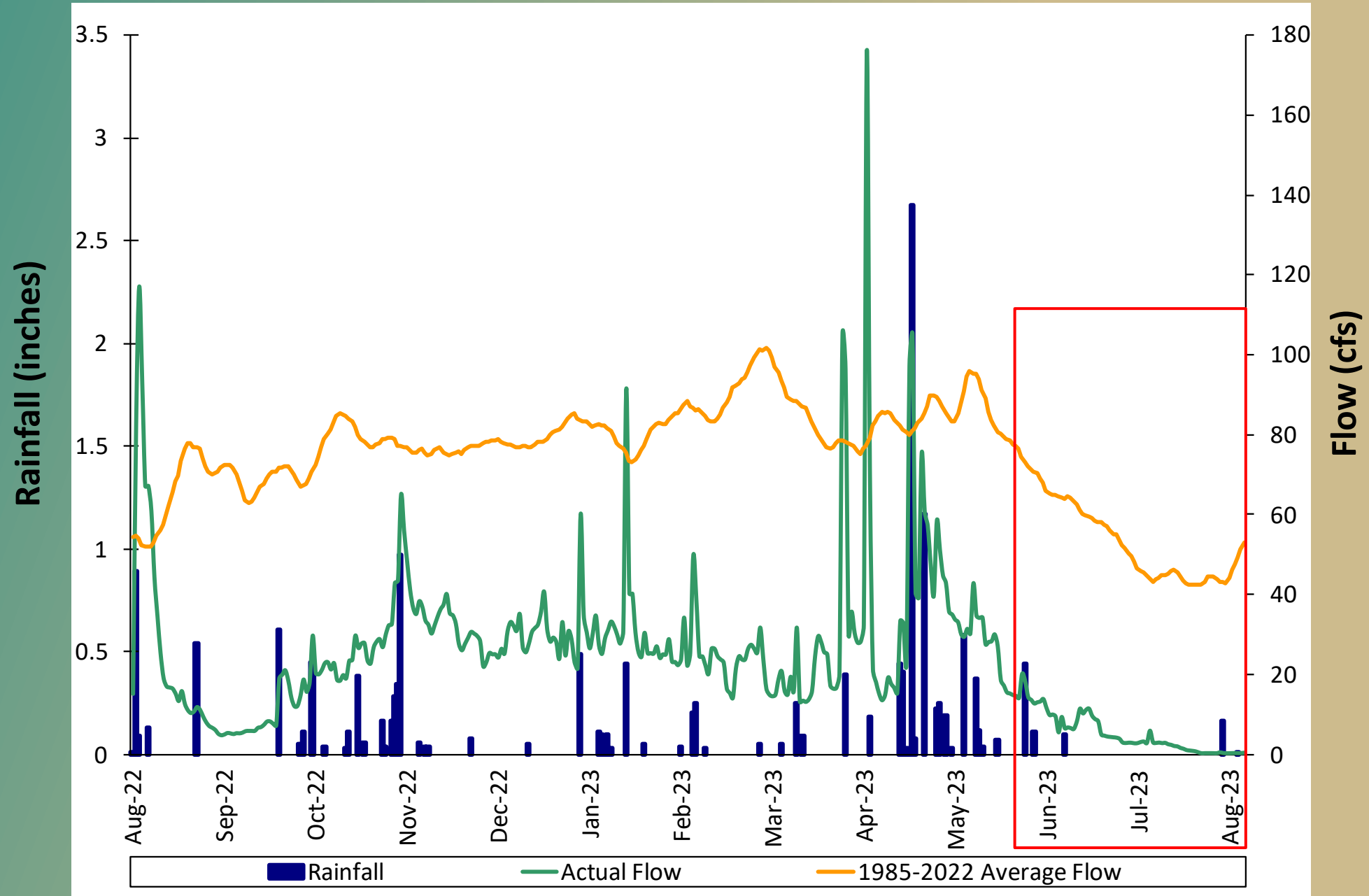


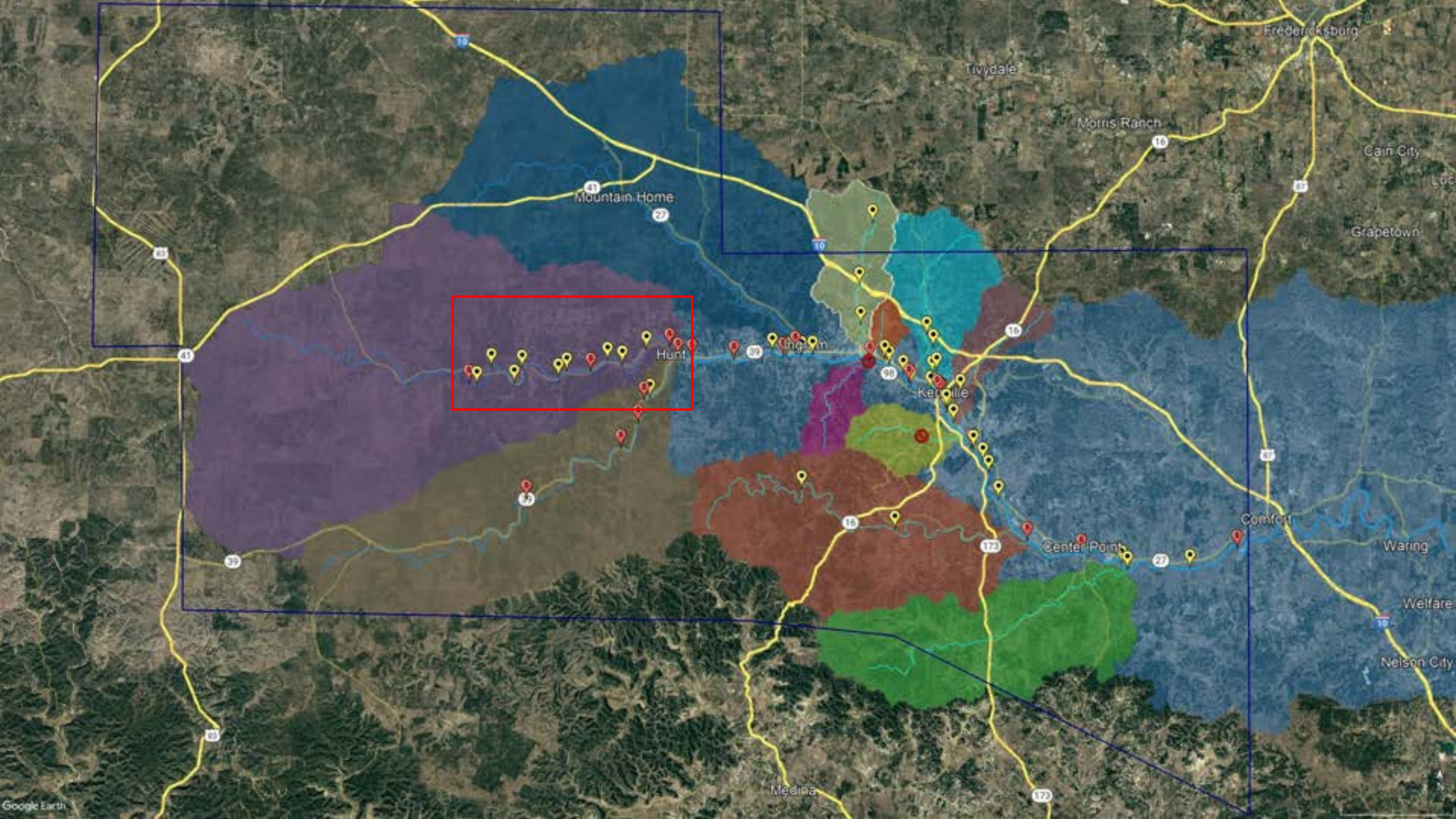
Knipling-Bushland U.S. Livestock Insects Research Laboratory: Kerrville, TX

Rainfall Totals June – August 2023



Streamflow vs Rainfall in Kerrville



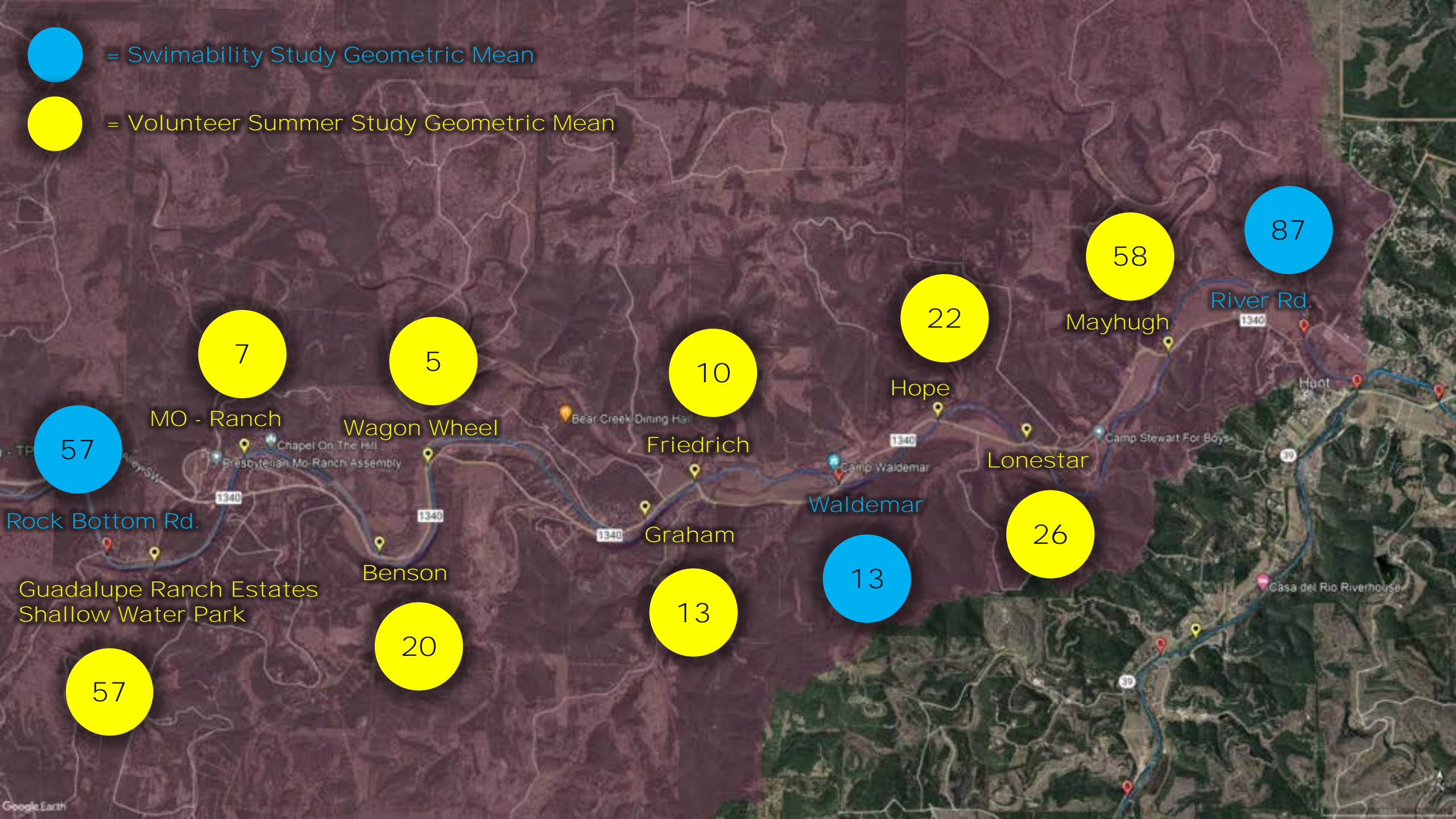




= Swimability Study Geometric Mean



= Volunteer Summer Study Geometric Mean



NF at Guadalupe Ranch Estates Shallow Water Park Sampled by Robert Bowles

57



NF at MO – Ranch
Sampled by MO – Ranch Staff

NF at Benson Crossing
Sampled by Bob and Karen Taylor



NF at Wagon Wheel Crossing
Sampled by Clinton Morse

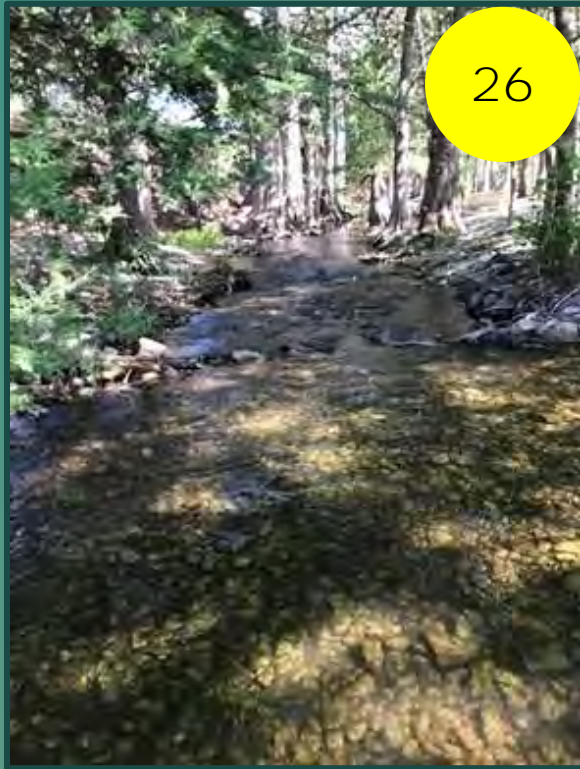


NF at Graham Crossing
Sampled by Bob and Karen Taylor



NF at Friedrich Crossing
Sampled by Bob and Karen Taylor

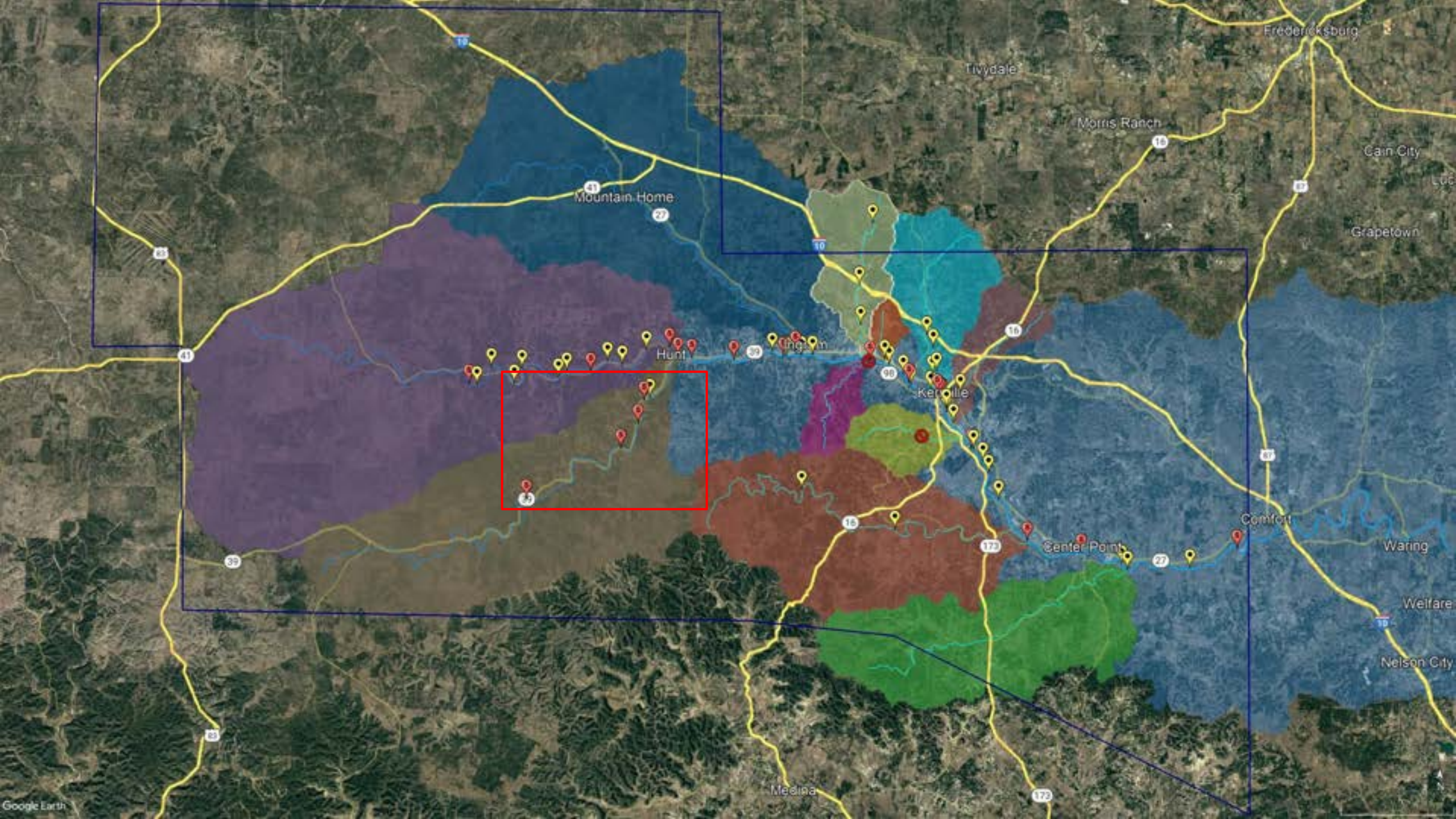
NF at Hope Crossing
Sampled by Nancy Huffman



NF at Lonestar Crossing
Sampled by Bake Foster



NF at Mayhugh Crossing
Sampled by Bake Foster

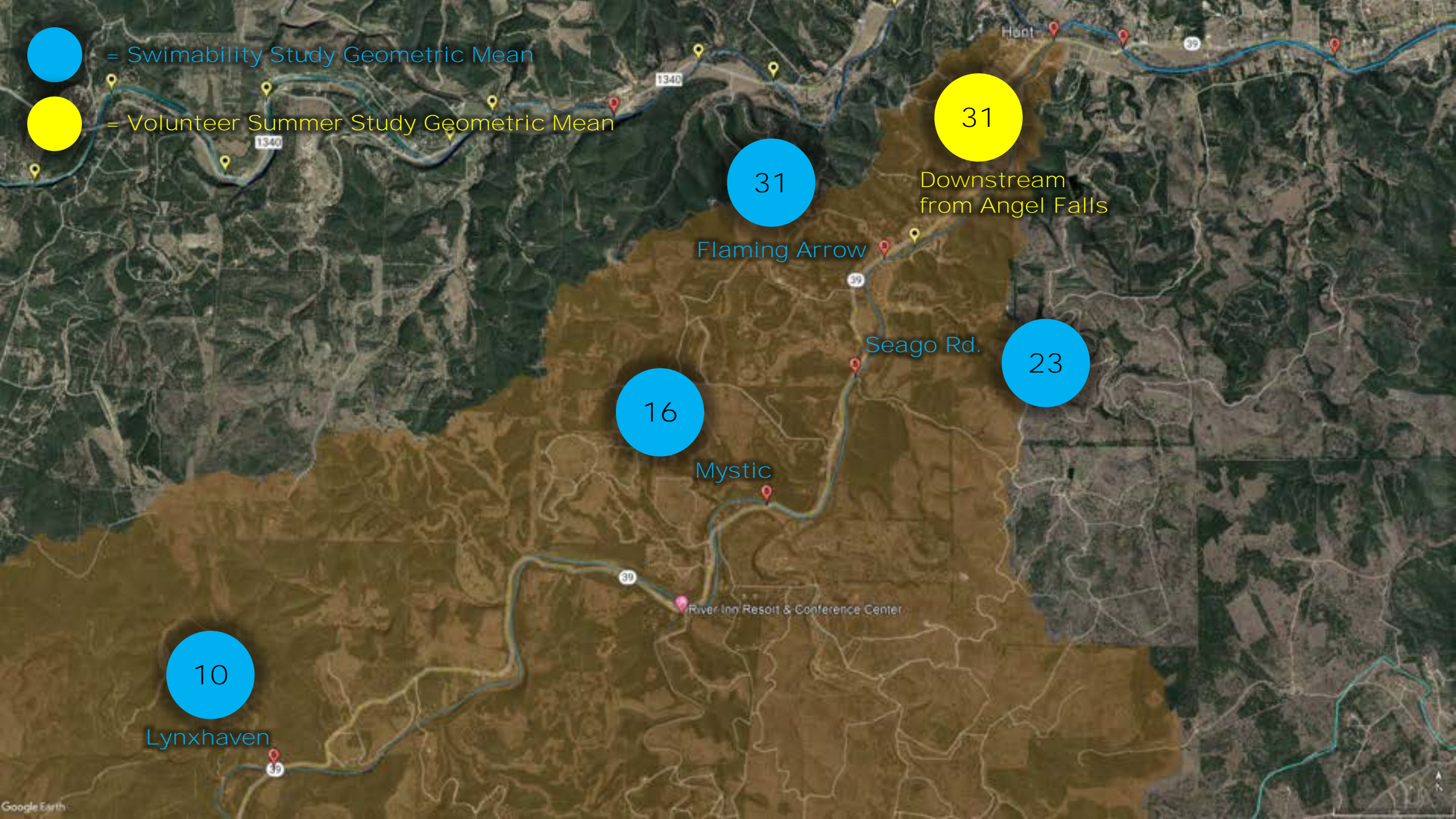




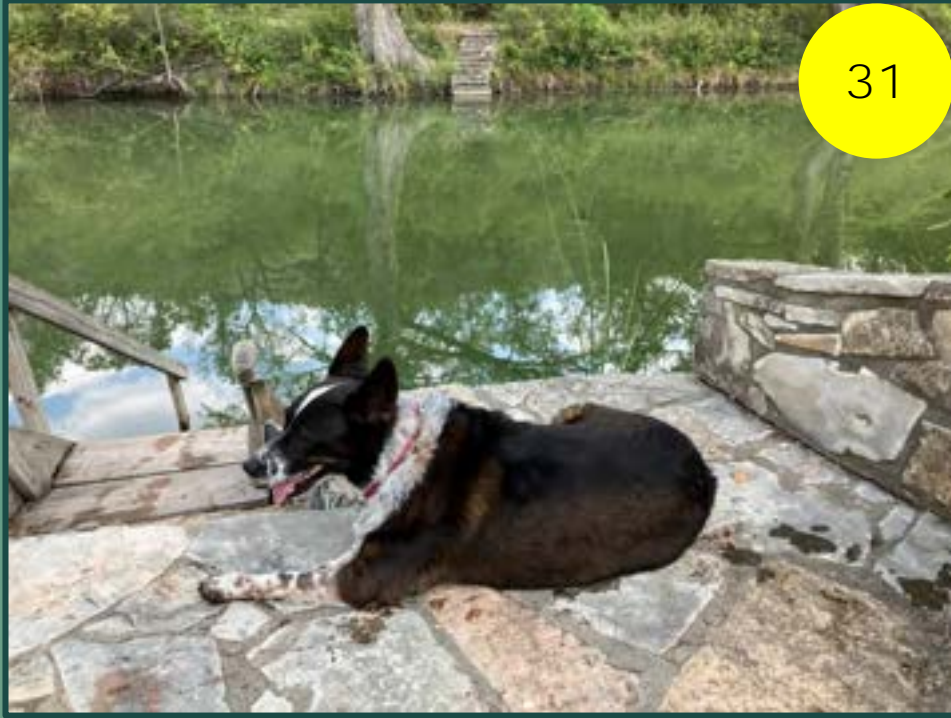
= Swimability Study Geometric Mean



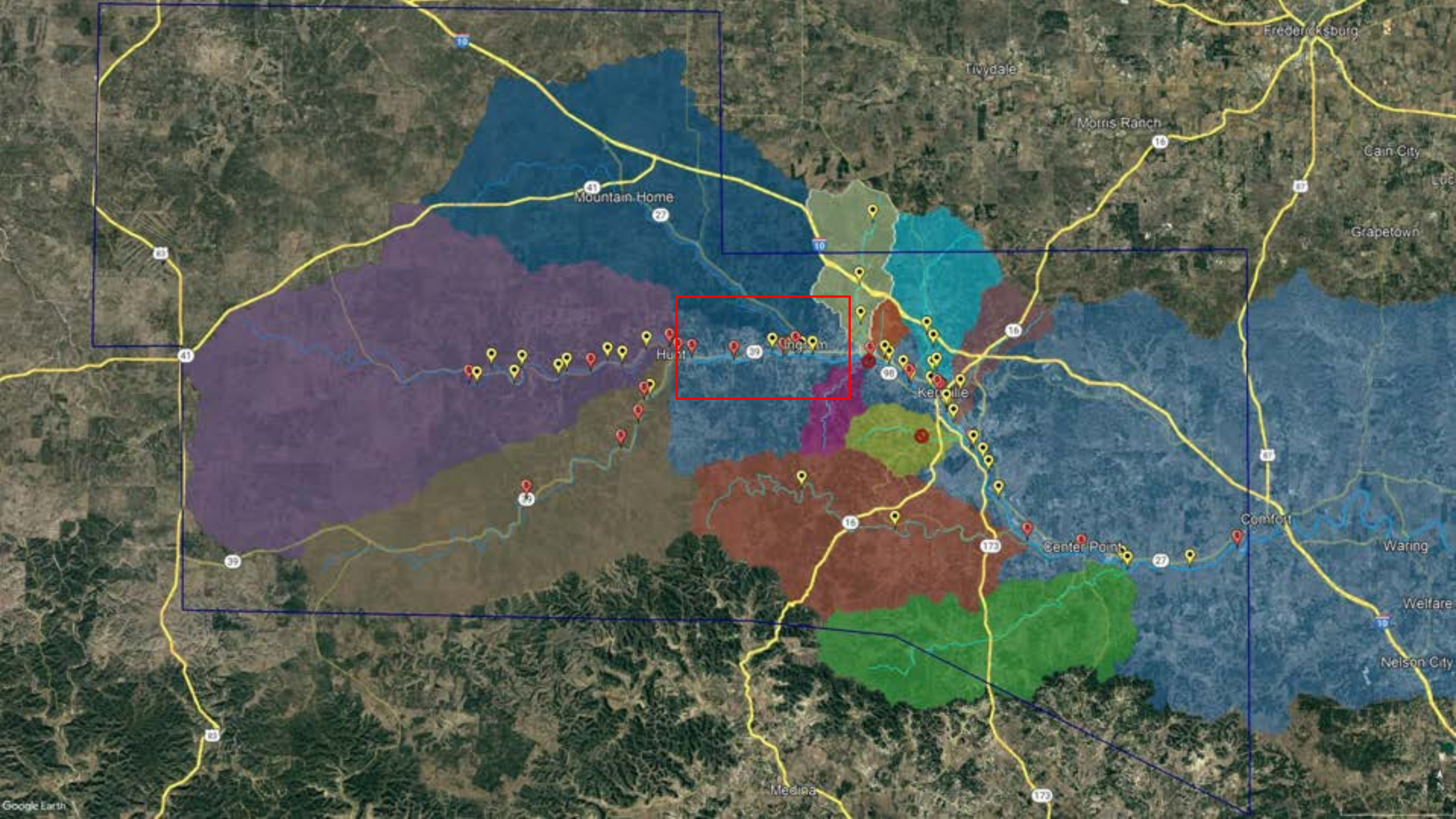
= Volunteer Summer Study Geometric Mean



31



SF Downstream from Angel Falls
Sampled by Dee Elliott

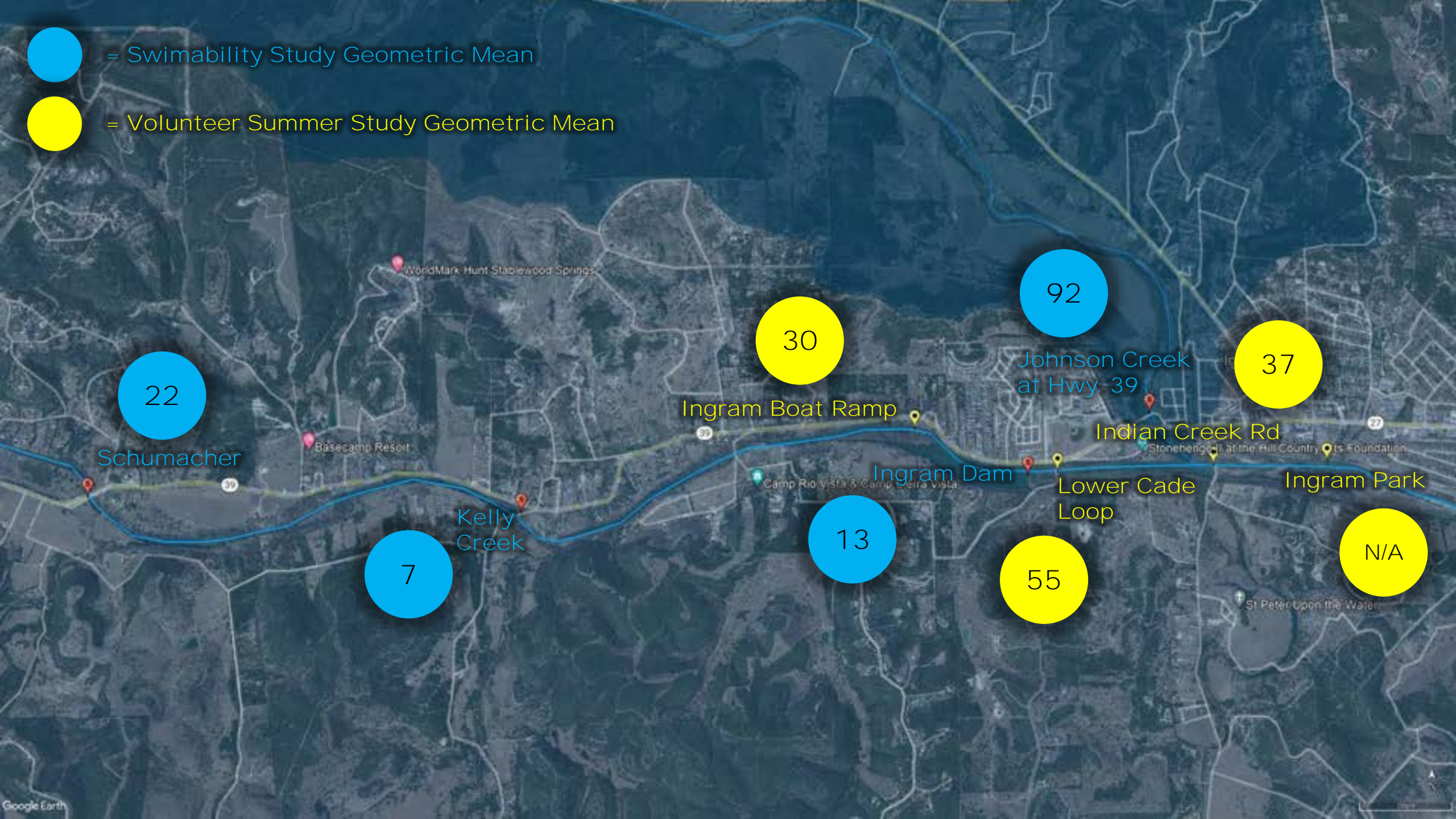




= Swimability Study Geometric Mean



= Volunteer Summer Study Geometric Mean



GR at Ingram Boat Ramp
Sampled by Nellwyn Sadler



55



GR at Lower Cade Loop
Sampled by Alice King

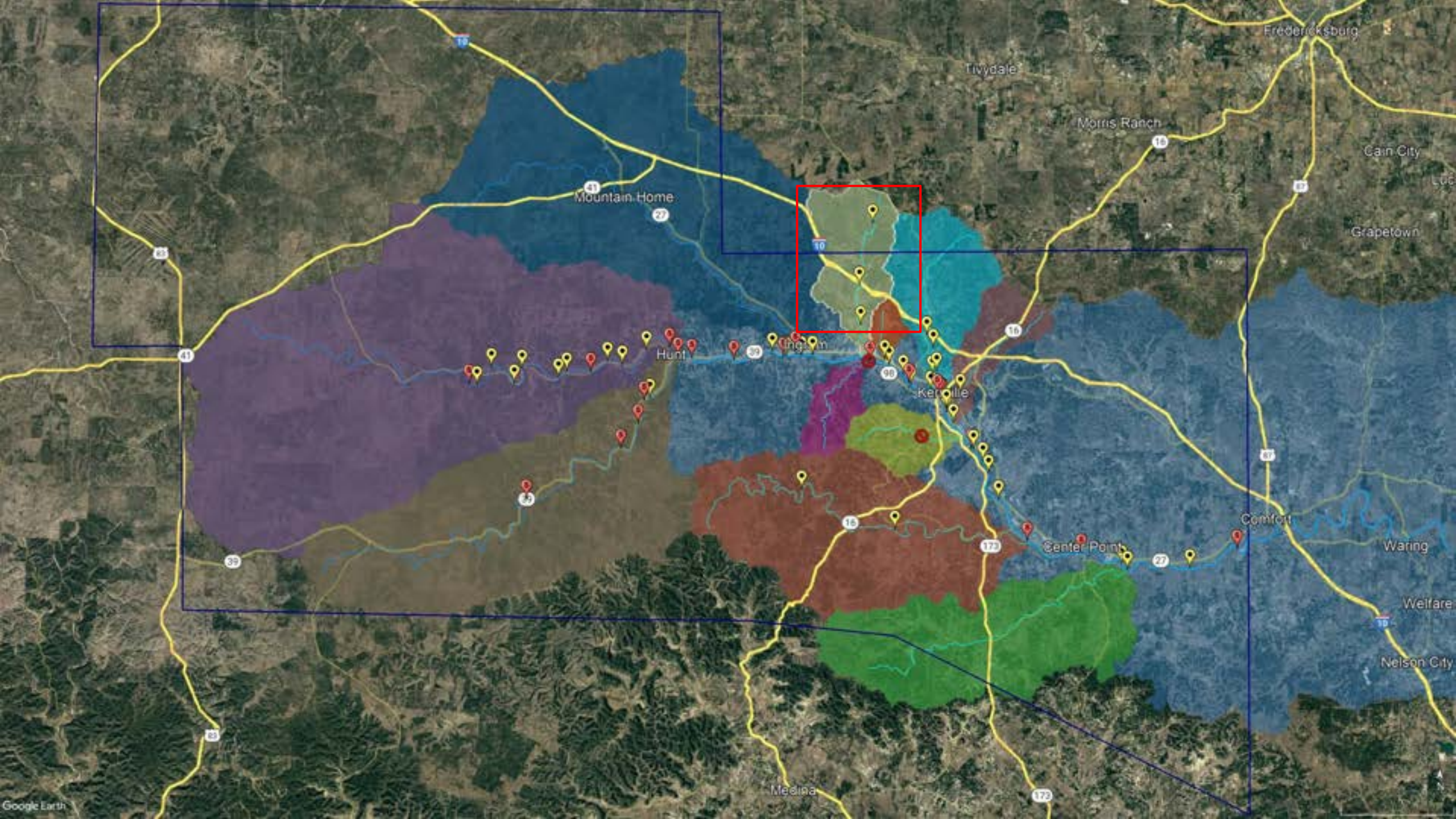


GR at Indian Creek Rd. Crossing
Sampled by Nellwyn Sadler



N/A

GR at Ingram Park
Sampled by Patrick Andrews

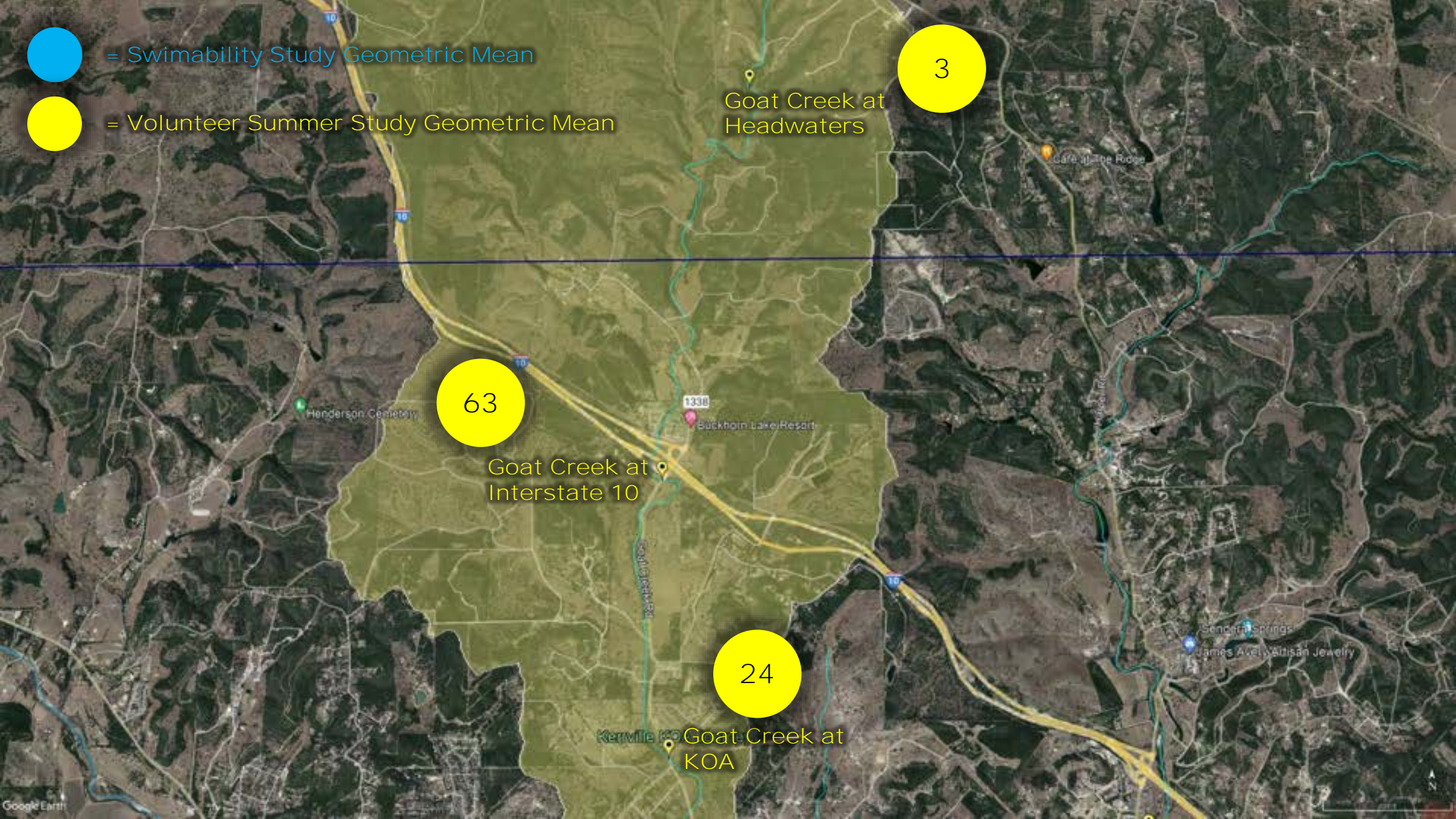




= Swimability Study Geometric Mean



= Volunteer Summer Study Geometric Mean



3

Goat Creek at
Headwaters

63

Goat Creek at
Interstate 10

24

Kermile KOA
Goat Creek at
KOA

Goat Creek at Headwaters
Sampled by Maura Windlinger



63

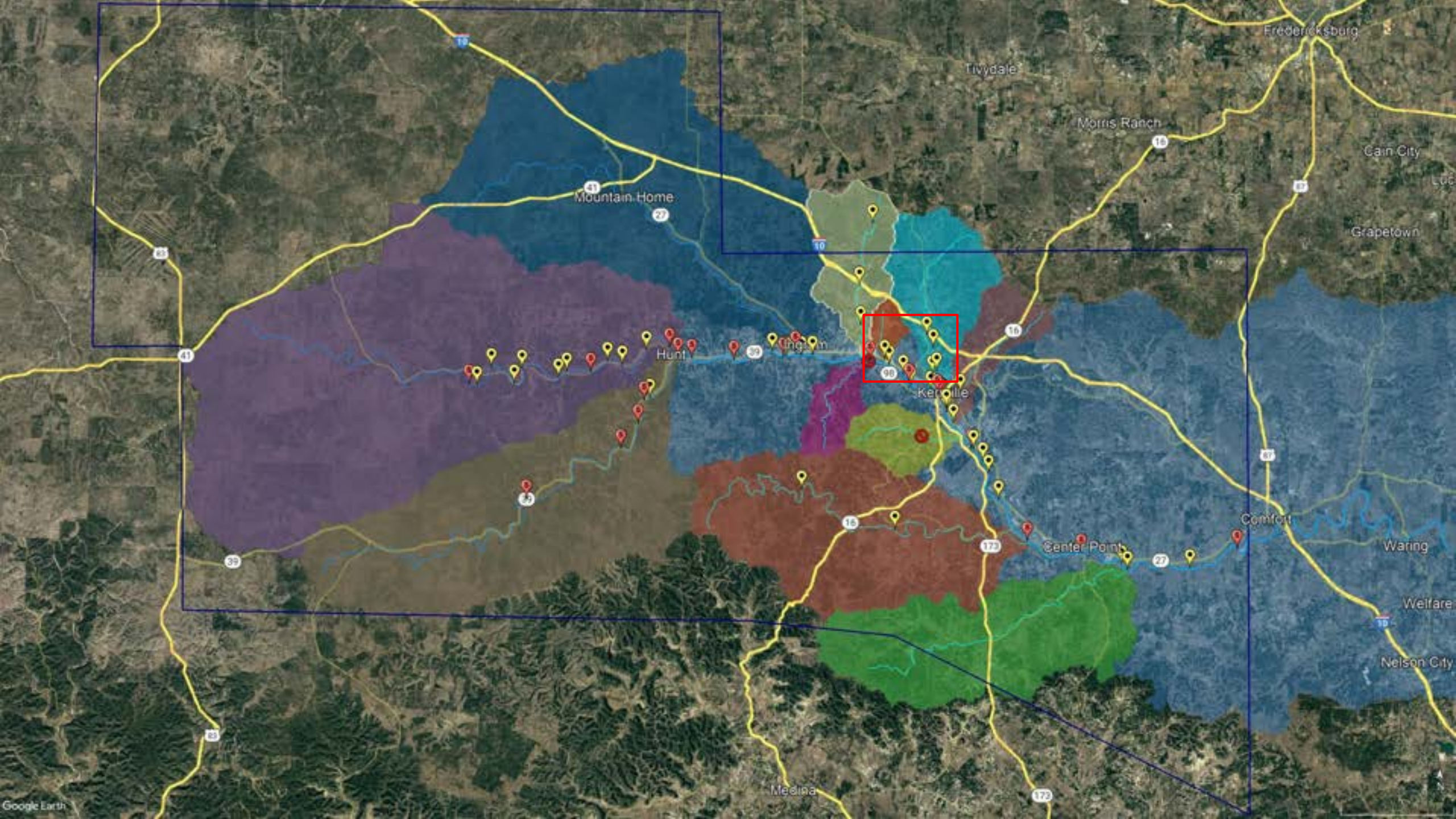


Goat Creek at I-10
Sampled by Maura Windlinger / Palmore Baxter

24



Goat Creek at KOA
Sampled by Palmore Baxter

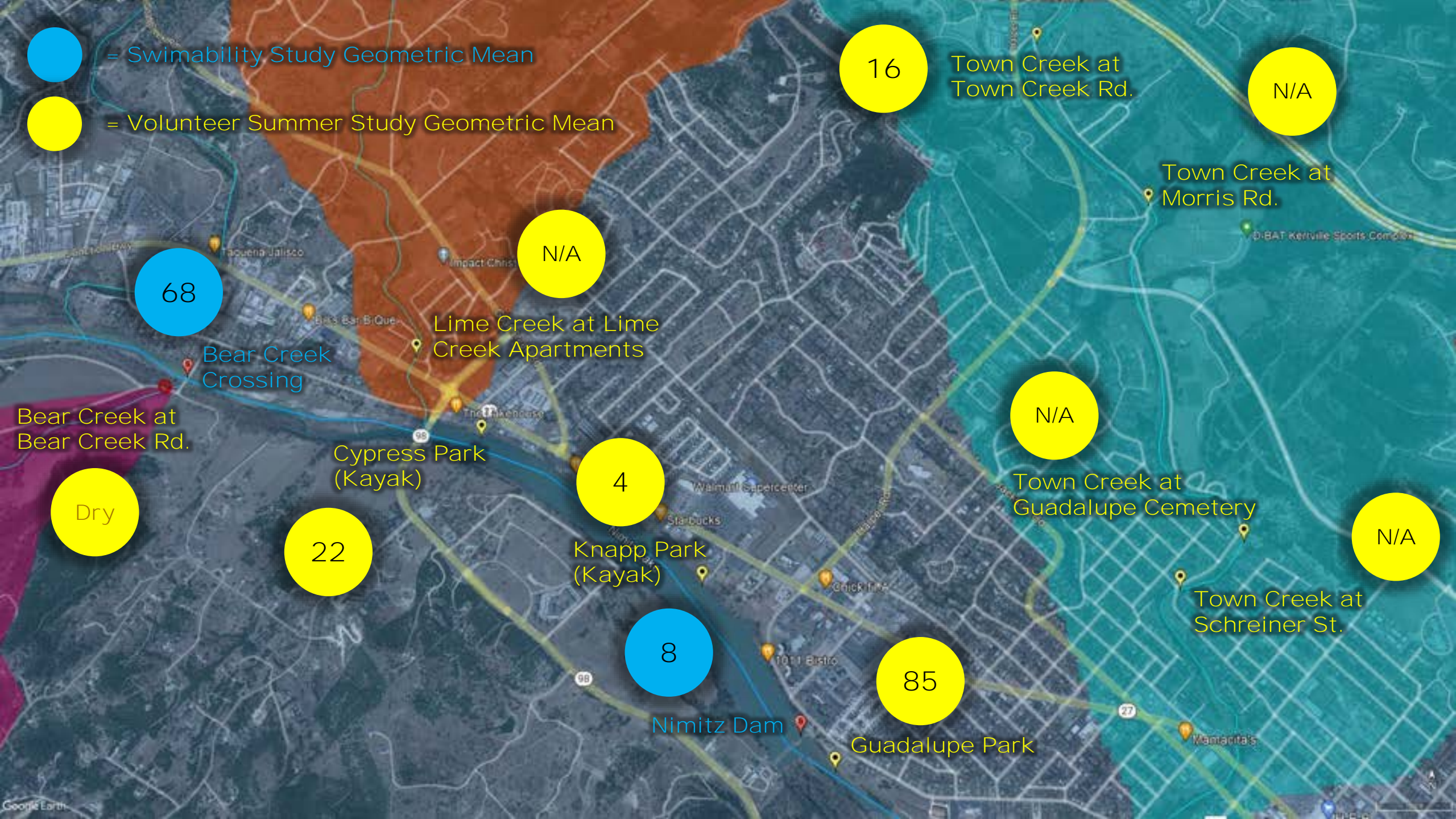




= Swimability Study Geometric Mean



= Volunteer Summer Study Geometric Mean



GR at Knapp Park (kayak)
Sampled by Carl and Katy Kappel



4



22

GR at Cypress Park (kayak)
Sampled by Carl and Katy Kappel



85

GR at Guadalupe Park
Sampled by Alice King

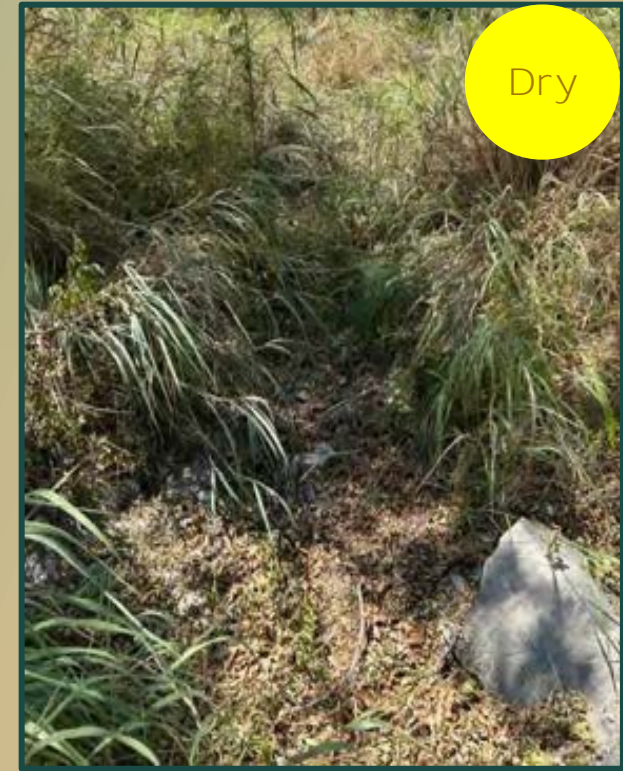


Town Creek at Town Creek Rd.
Sampled by Phillip Youngblood

Bear Creek at Bear Creek Rd.
David Bartels



N/A



Dry

Lime Creek at Lime Creek Apartments
Sampled by Patrick Andrews

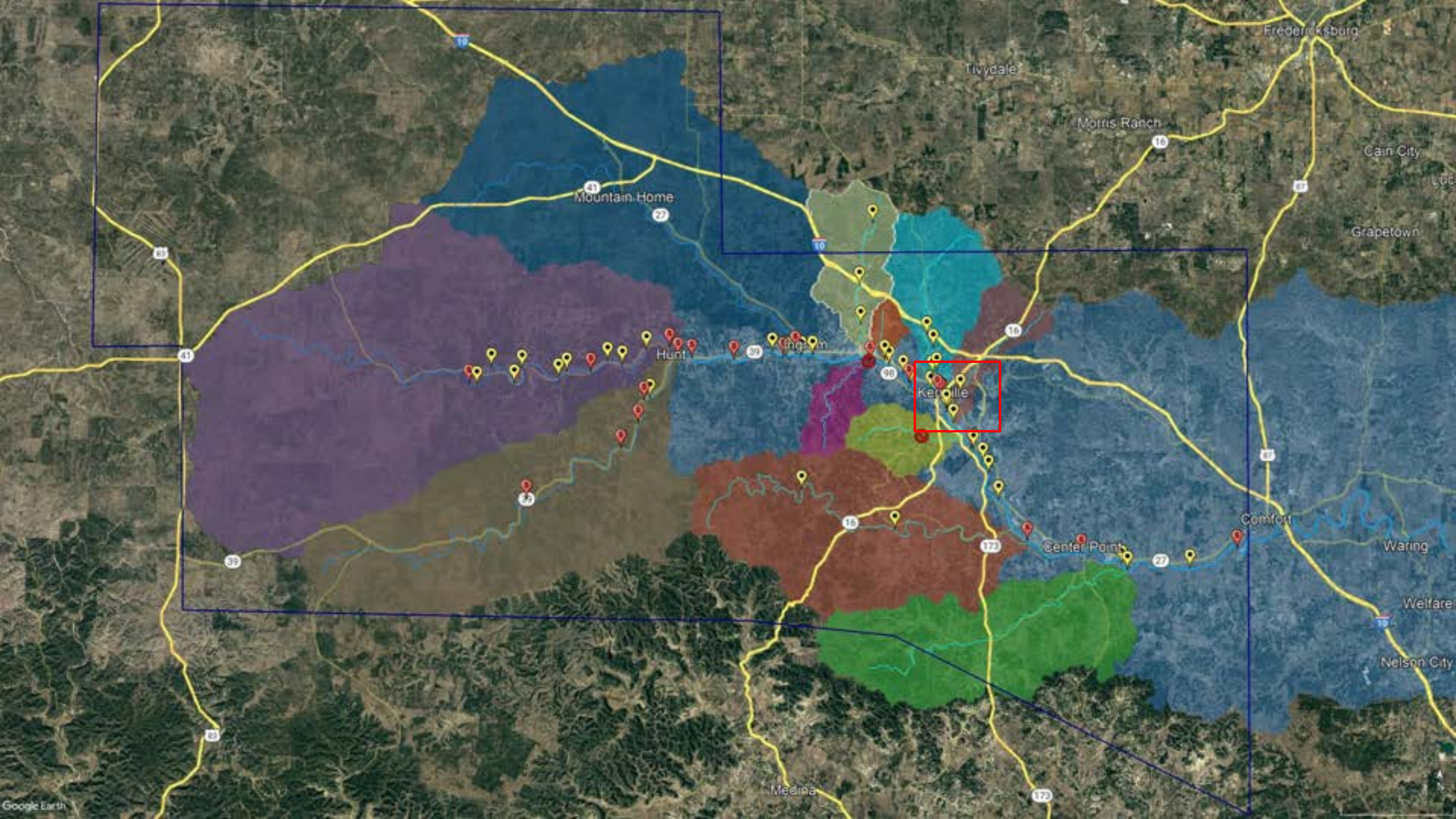
Town Creek at Morris Rd.
Sampled by Trudy Eberhardt

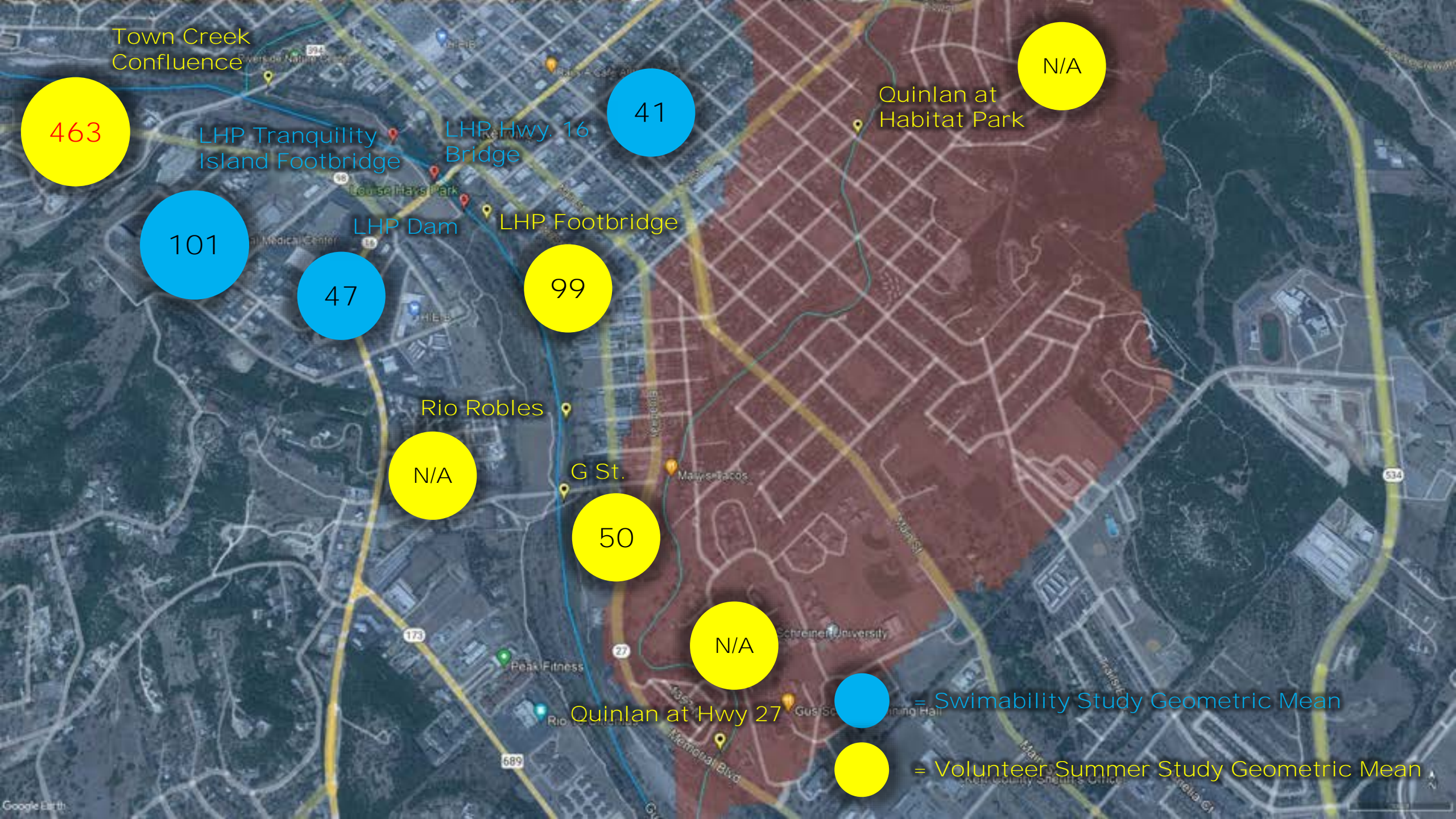


Town Creek at Guadalupe Cemetery
Sampled by Jim Gardner



Town Creek at Schreiner St.
Sampled by Jim Gardner





GR at Town Creek Confluence
Sampled by Trudy Eberhardt



GR at Louise Hays Park Footbridge
Sampled by Sherry Wilson



GR at G St.
Sampled by Deb Youngblood



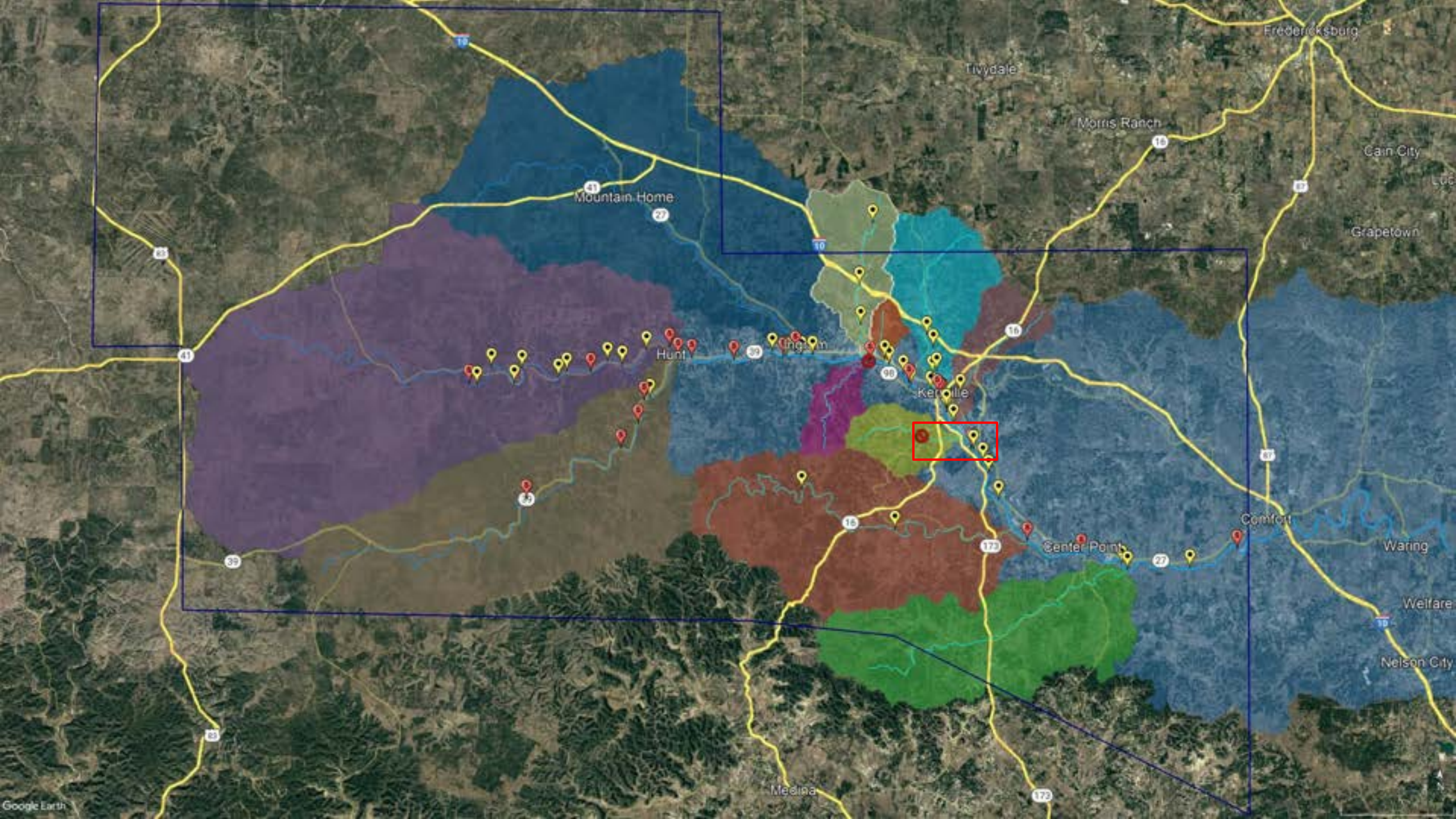
GR at Rio Robles
Sampled by Larry Hesketh

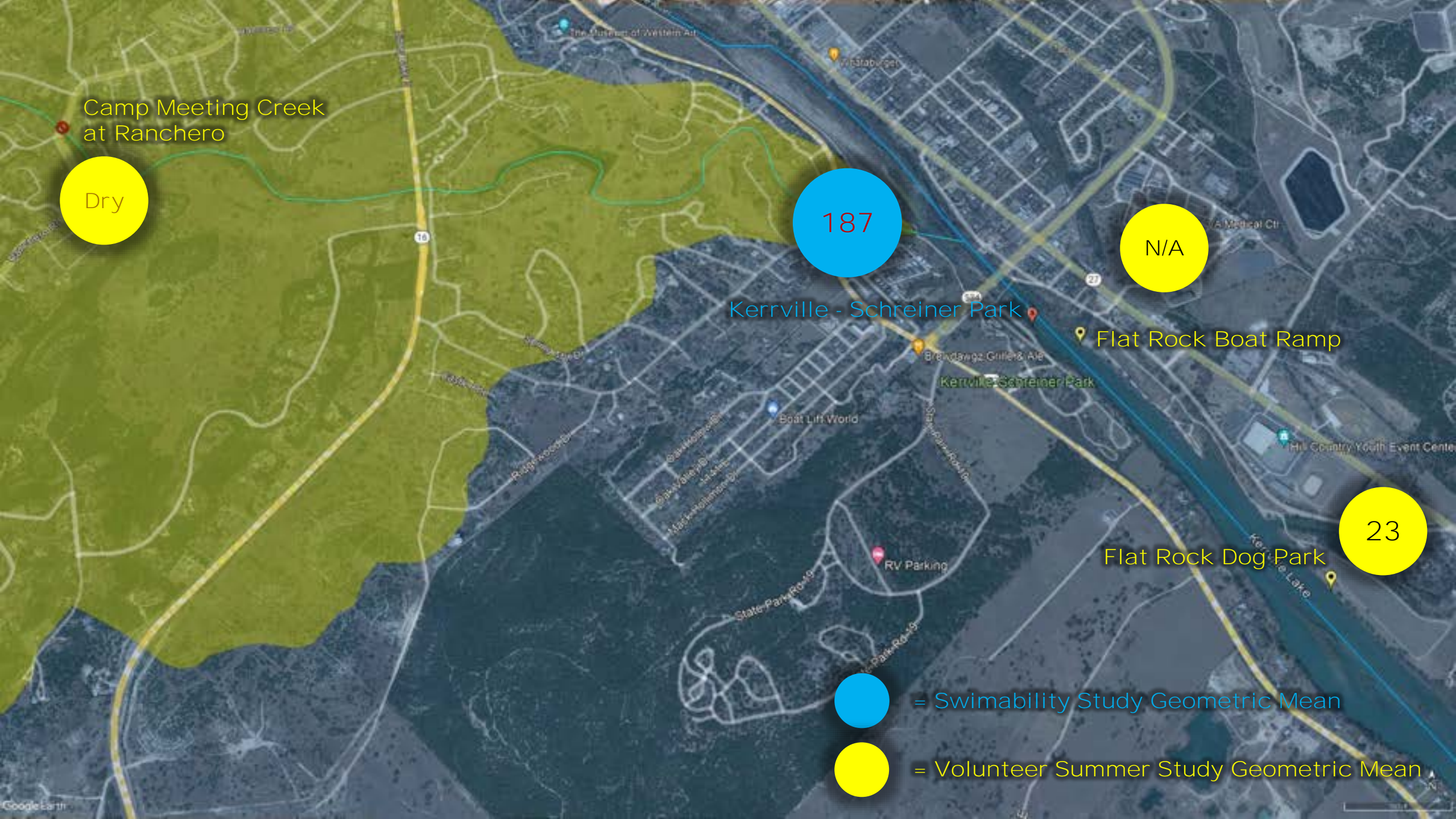


Quinlan Creek at Habitat Park
Sampled by Larry Hesketh



Quinlan Creek at Hwy. 27
Sampled by Lizbeth Lopez





Camp Meeting Creek
at Ranchero

Dry

187

N/A

Kerrville - Schreiner Park

Flat Rock Boat Ramp

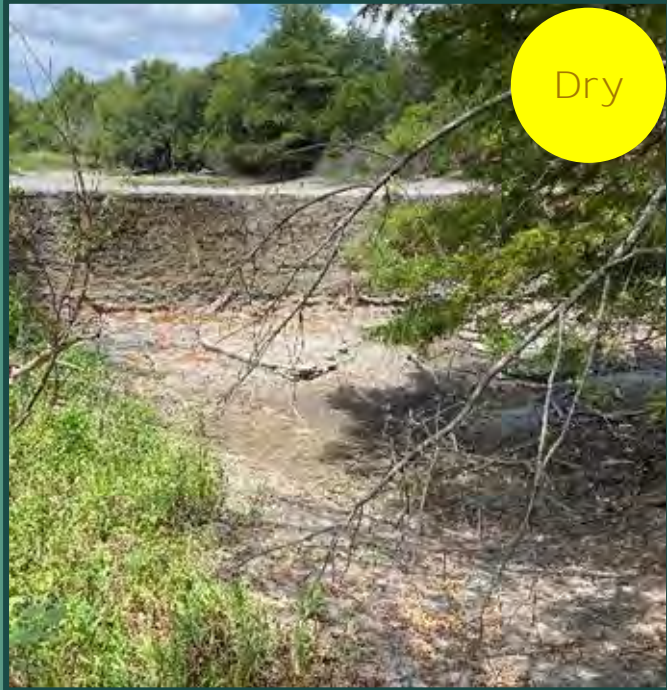
Flat Rock Dog Park

23

= Swimability Study Geometric Mean

= Volunteer Summer Study Geometric Mean

GR at Flat Rock Dog Park
Sampled by Sherry Wilson

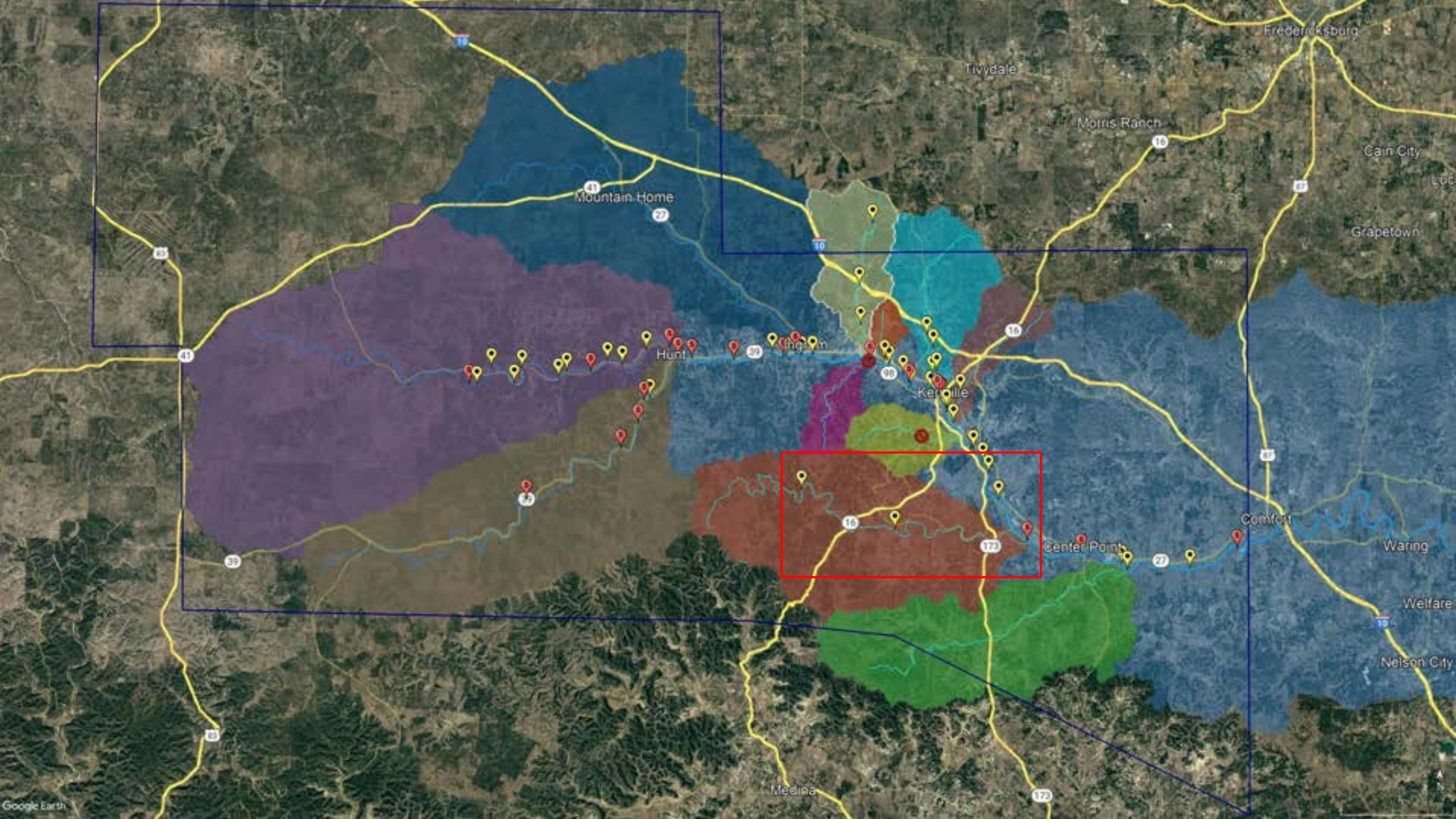


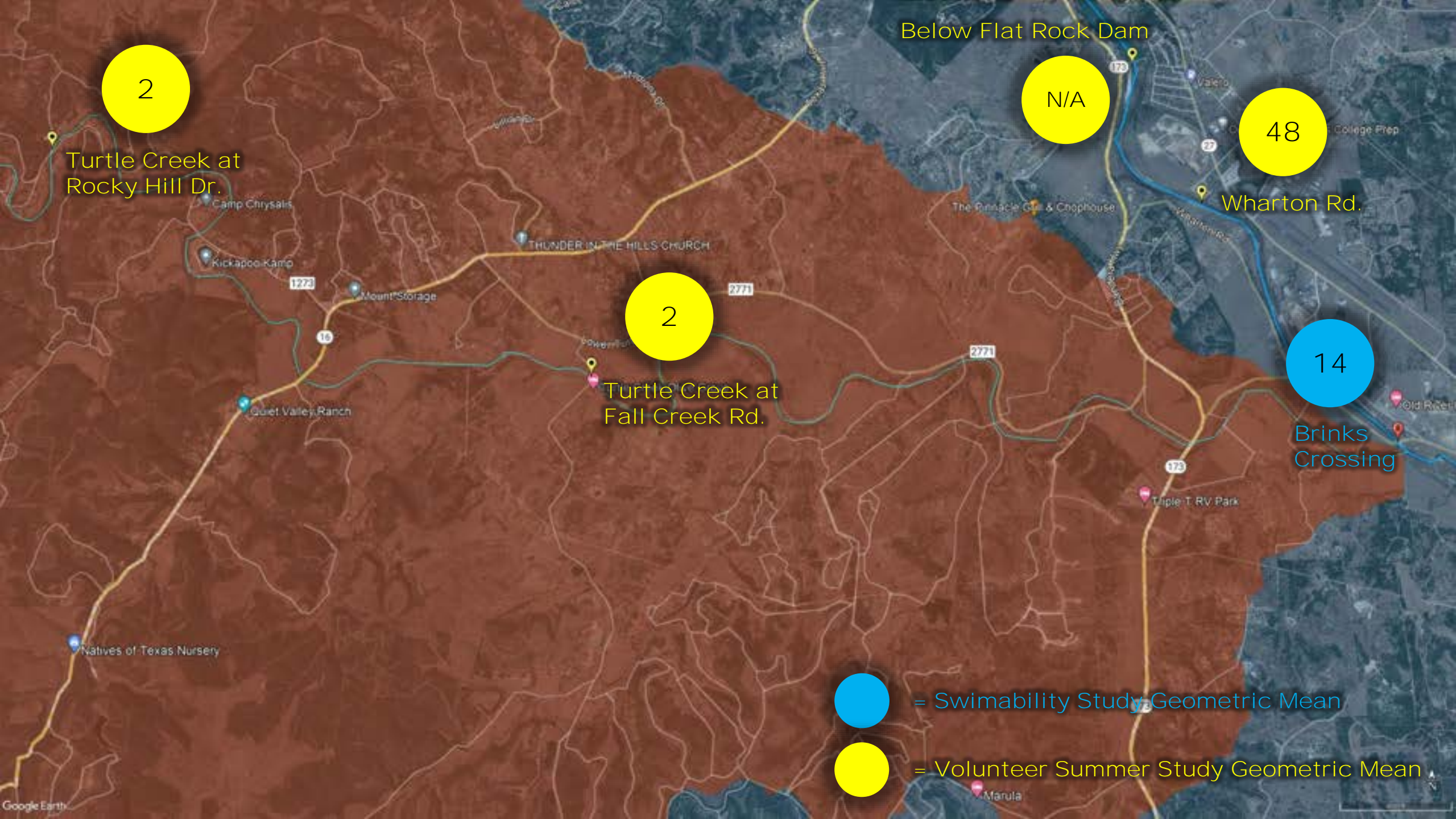
GR at Flat Rock Boat Ramp
Sampled by Jim Gardner



Camp Meeting Creek at Ranchero Rd.
Larry Hesketh







GR at Wharton Rd.
Sampled by John Hornung



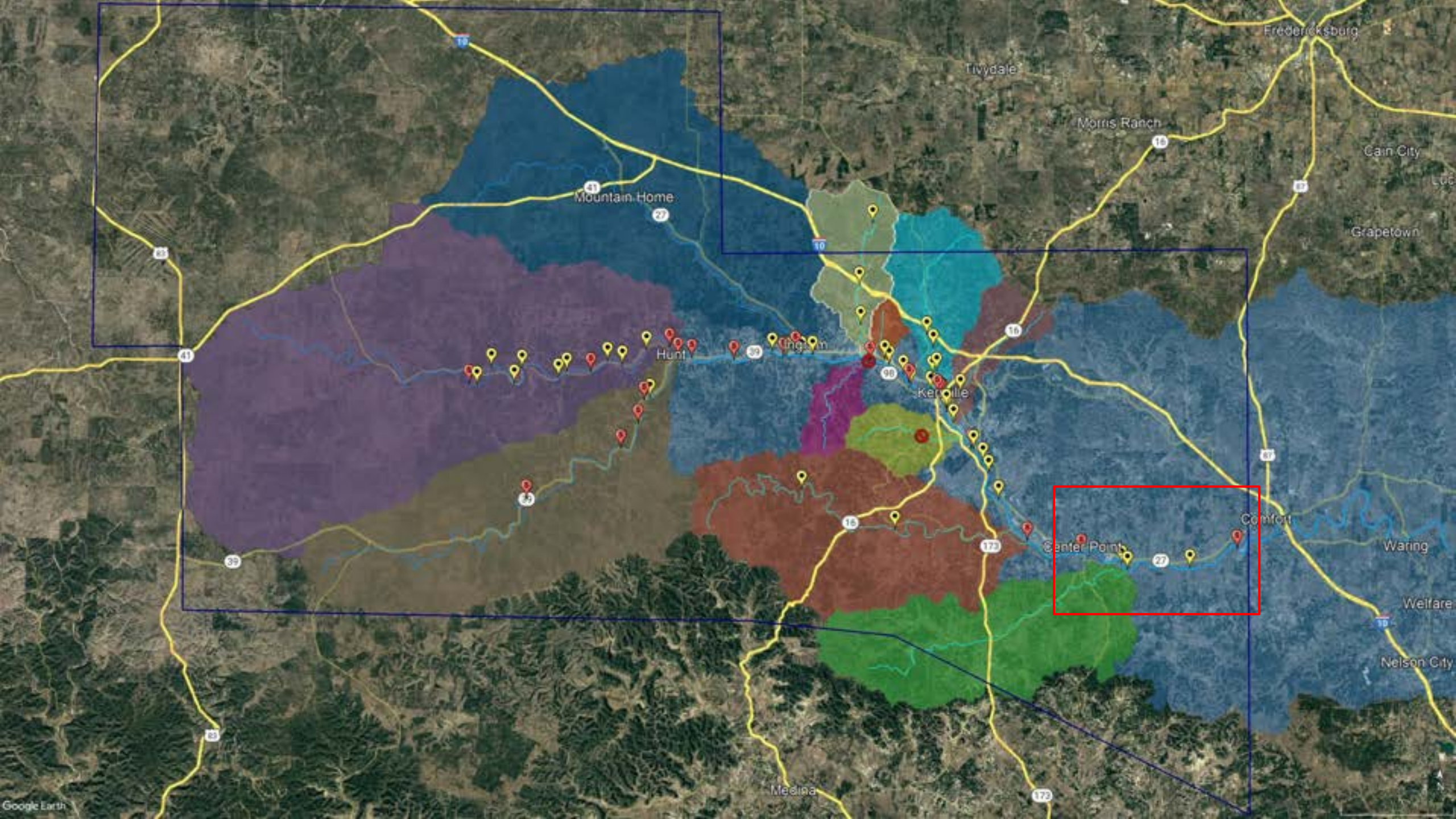
Turtle Creek at Rocky Hill Dr.
Sampled by Kathy Loring

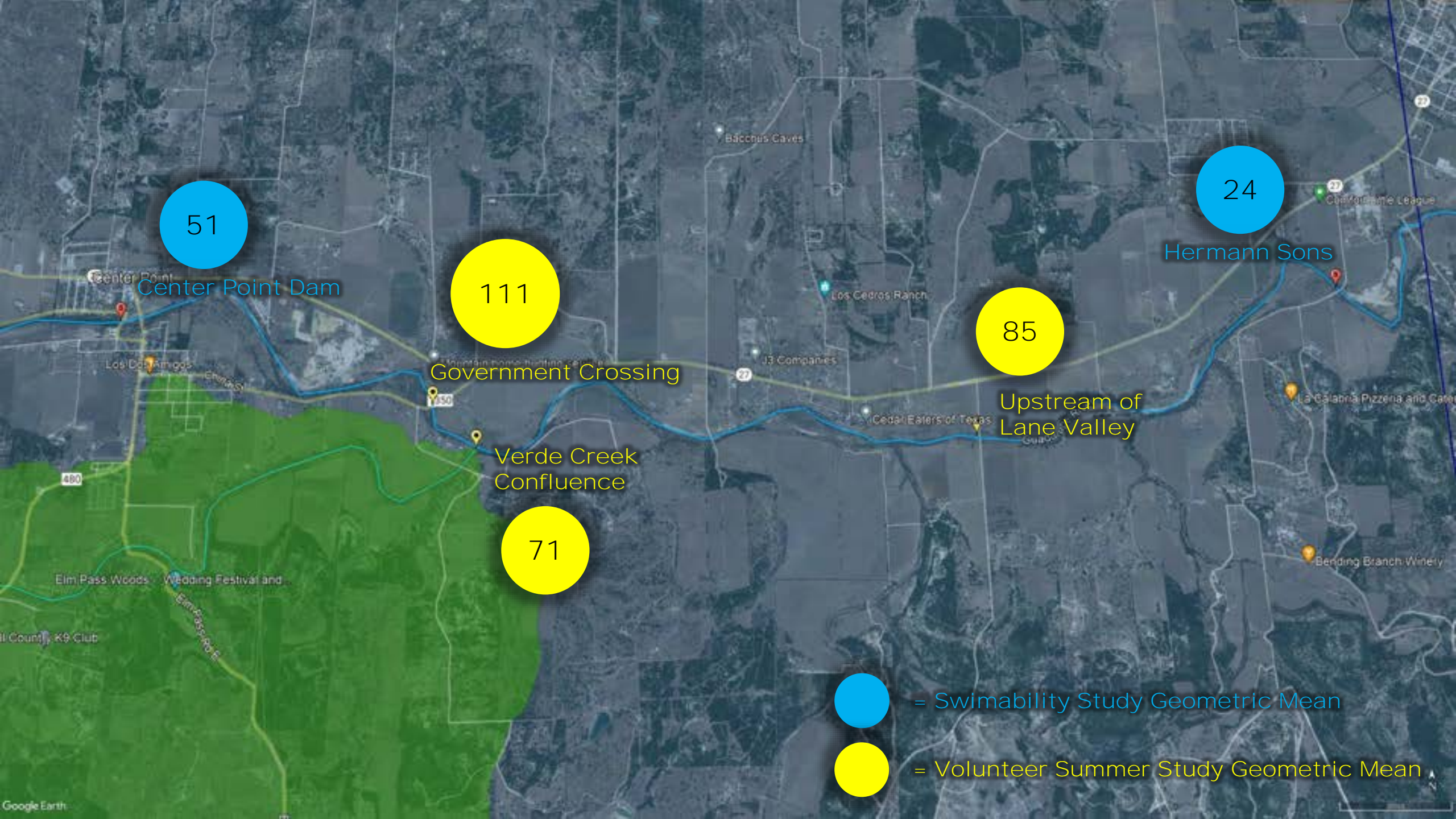


Turtle Creek at Fall Creek Rd.
Sampled by Kathy Loring



GR Below Flat Rock Dam
Sampled by Clark Williams





GR at Government Crossing
Sampled by Patricia Higgins

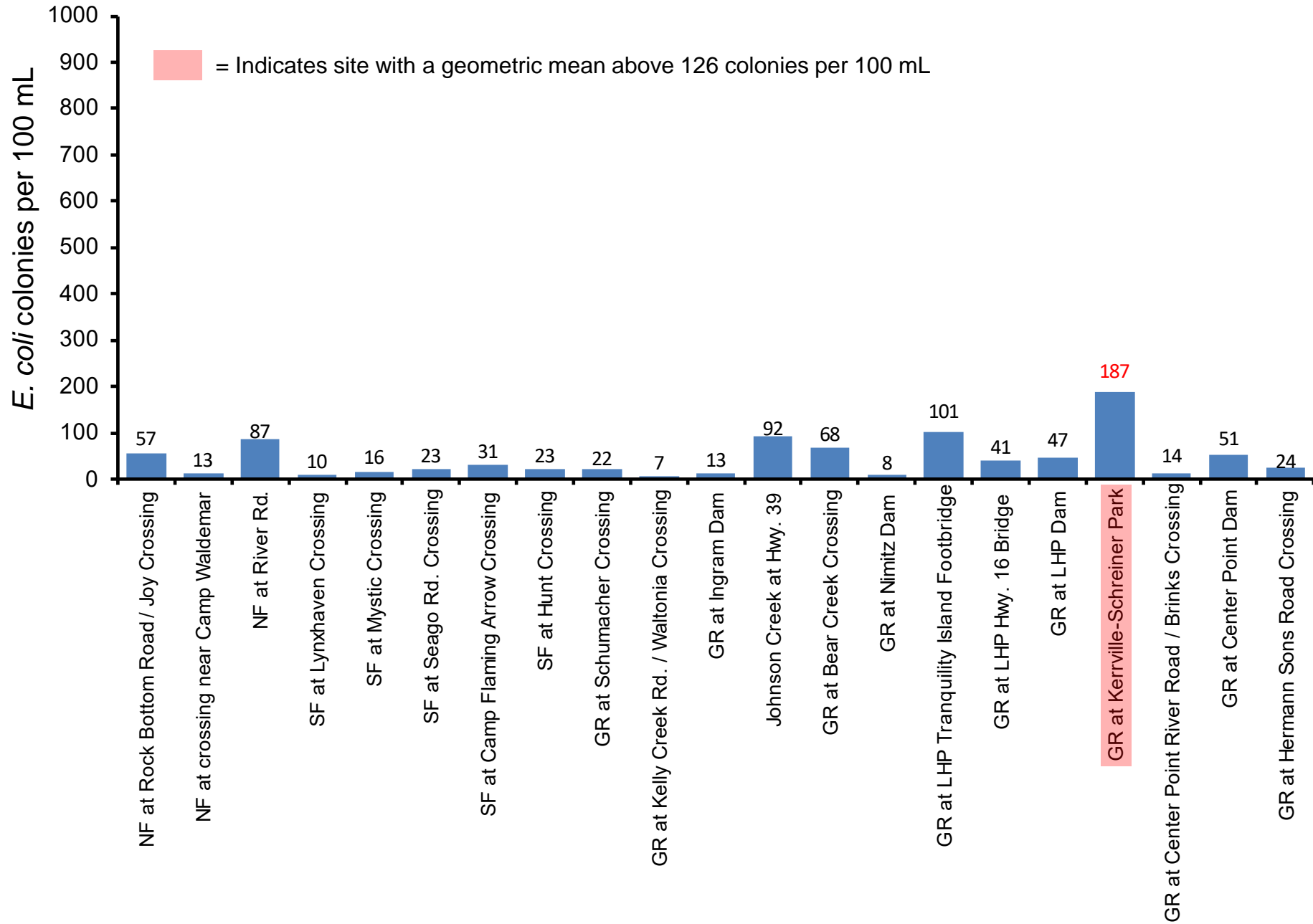


GR at Verde Creek Confluence
Sampled by Patricia Higgins

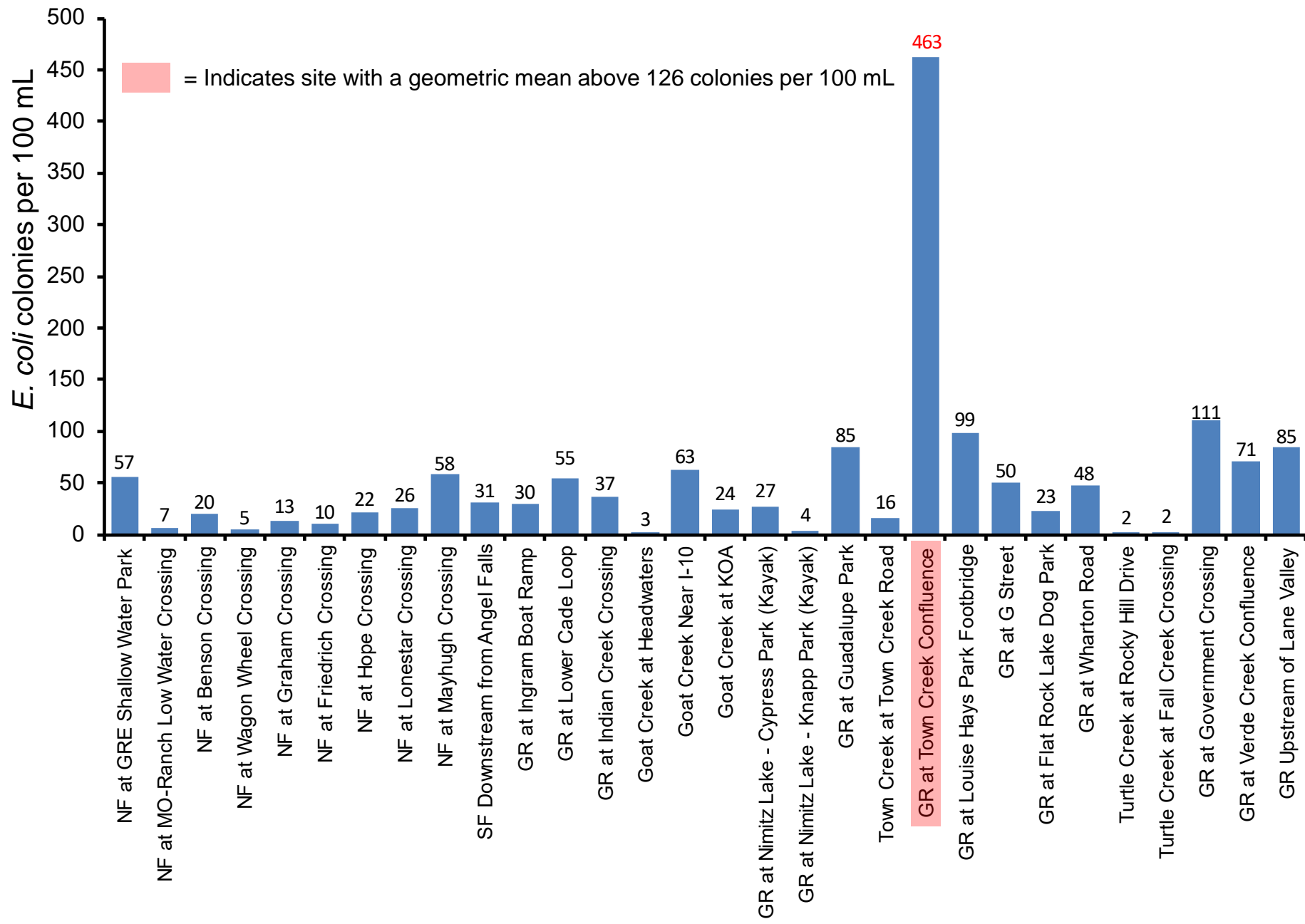


GR Upstream of Lane Valley
Sampled by Paz Lovett

Swimability Geometric Means



Volunteer Geometric Means



THANK YOU!

See you next summer!