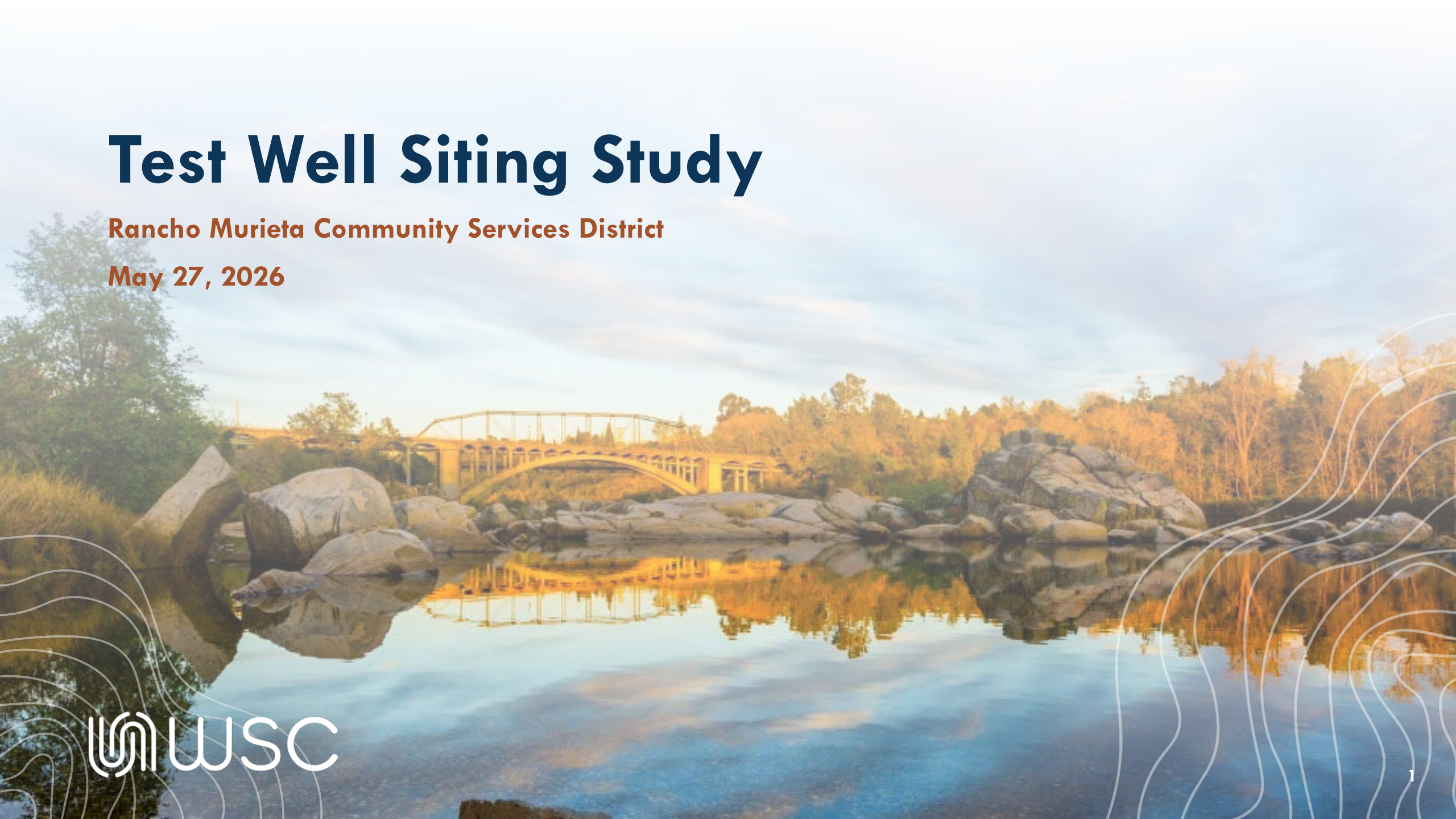
Test Well Siting Study

Rancho Murieta Community Services District

May 27, 2026



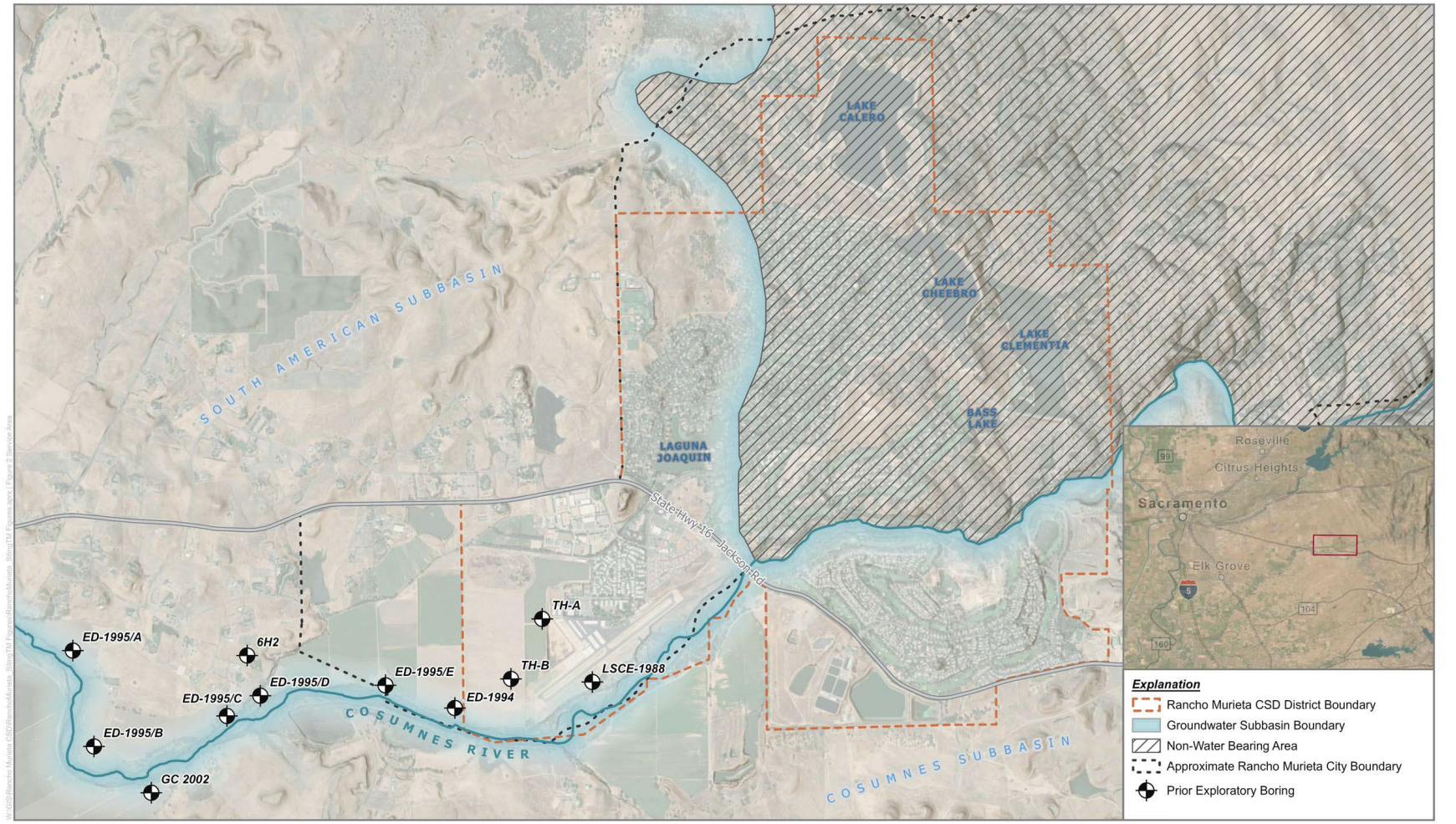
WSC

Project Objectives & Data Sources

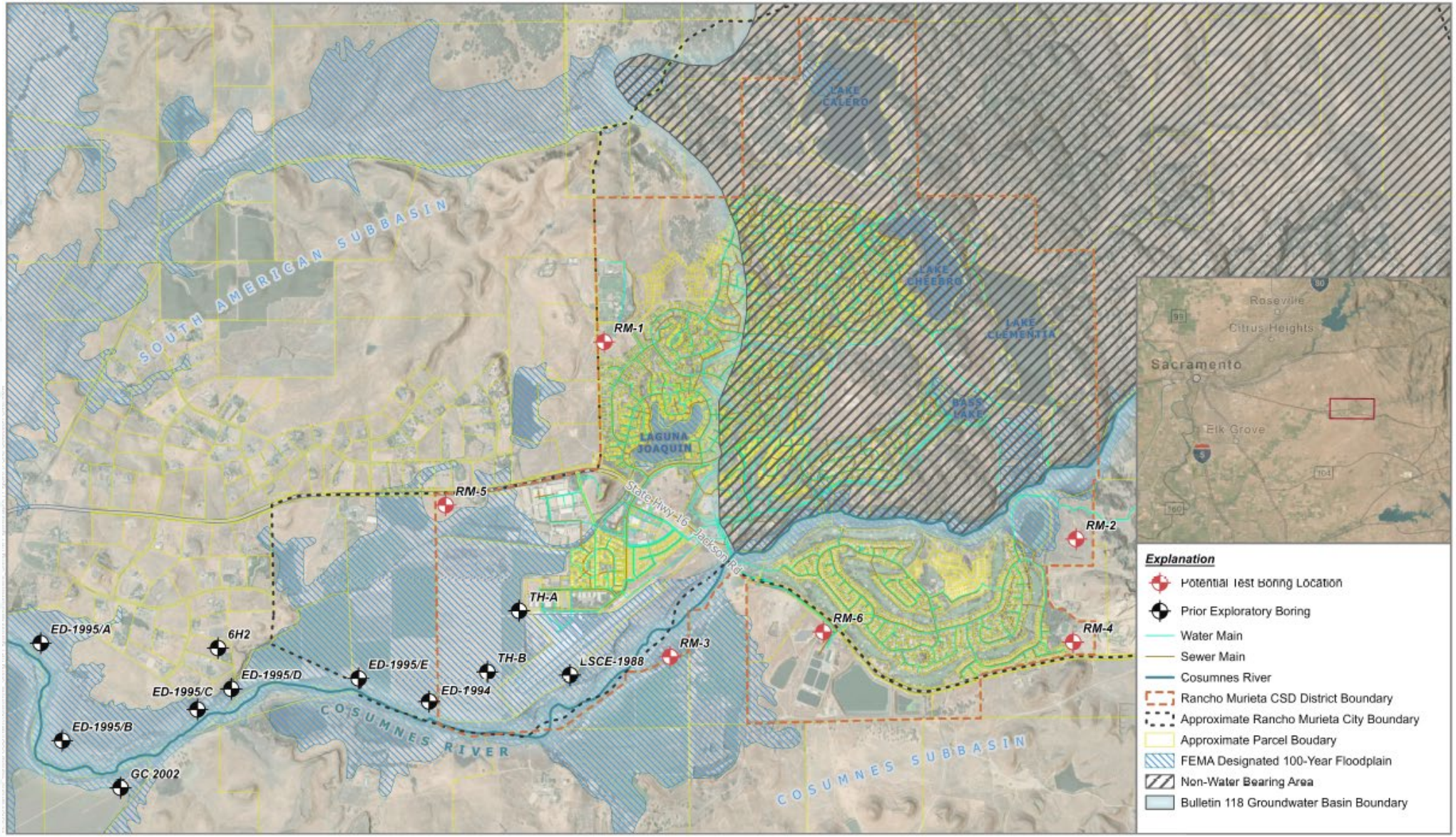
1. Identify Potential Exploratory Drilling Locations
2. Evaluate Hydrogeologic Feasibility using Existing Data
3. Assess Site Constraints and Logistical Considerations

- Adkins Engineering & Surveying, (May 2024) Technical Memorandum Title Unknown.
- CH2M Hill, (1997) "*Water Supply for the Deerk Creek Hills Project*"
- Dunn Environmental, Inc. (2012) "*New Water Well Background Data Summary, Surface Geophysics, Hydrogeologic Conceptual Model and Proposed Testhole Locations*"
- Dunn Environmental, Inc. (2013) "*Technical Memorandum: Production Water Well Assessment.*"
- Omochumne–Hartnell Water District and Sacramento County, *Cosumnes Subbasin (5-22.16) Groundwater Sustainability Plan*, 2021
- Sacramento Central Groundwater Authority (SCGA), *South American Subbasin Groundwater Sustainability Plan*, 2021
- State Water Resources Control Board. (n.d.). *Groundwater Ambient Monitoring and Assessment (GAMA) Online Tools and Data.*
- U.S. Environmental Protection Agency (EPA). (n.d.). *Superfund Site Information (CERCLA/SARA)*. Available at: https://www.epa.gov/superfund
- Wagner, D.L., Jennings, C.W., Bedrossian, T.L., & Bortugno, E.J. (1981). *Geologic map of the Sacramento quadrangle, California, 1:250,000* (Regional Geologic Map RGM-1A). California Division of Mines and Geology.

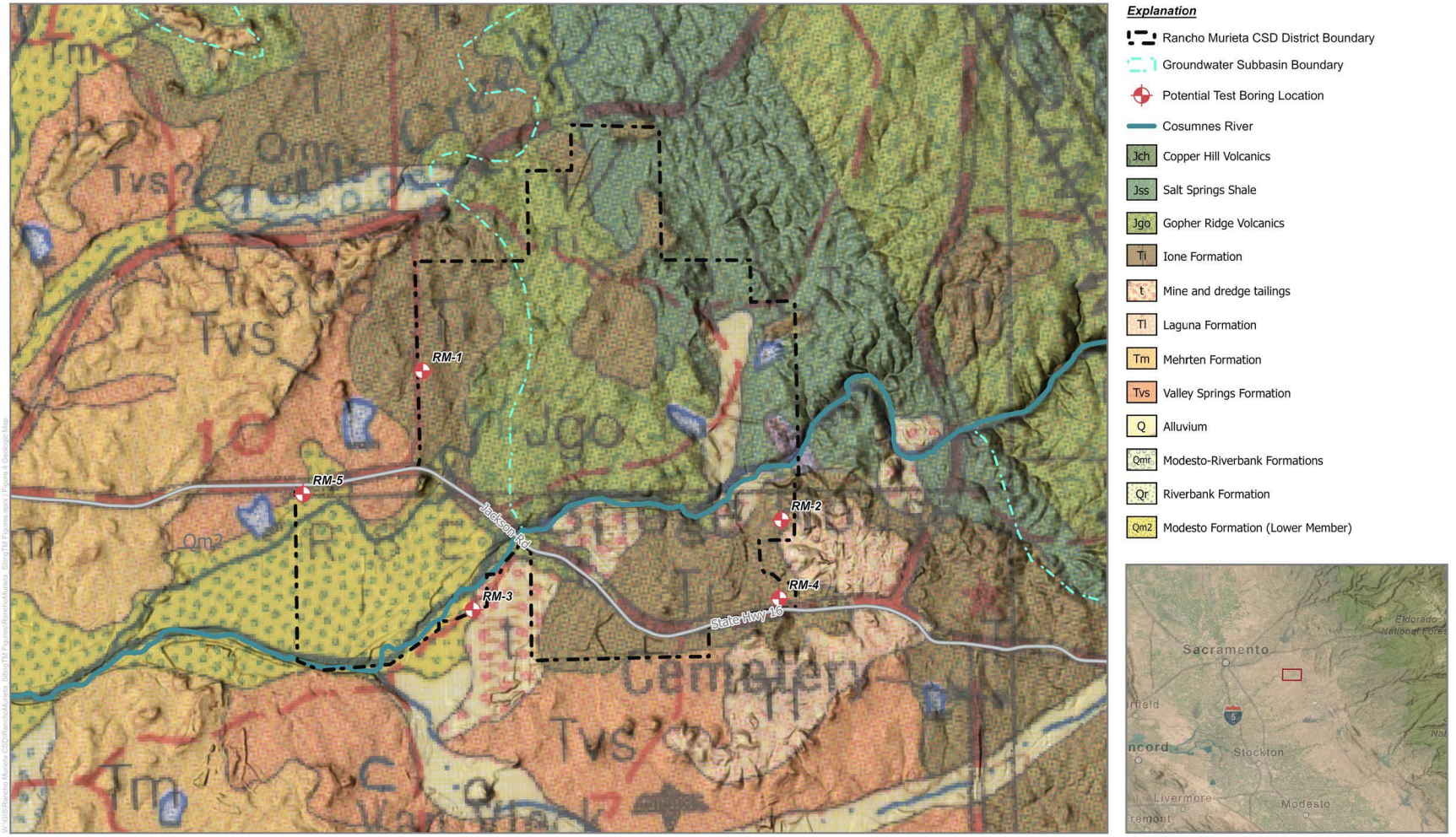
Project Area



Selected Locations for Exploratory Drilling Sites



Geologic Setting



Rancho Murieta Test Borehole Siting Technical Memorandum

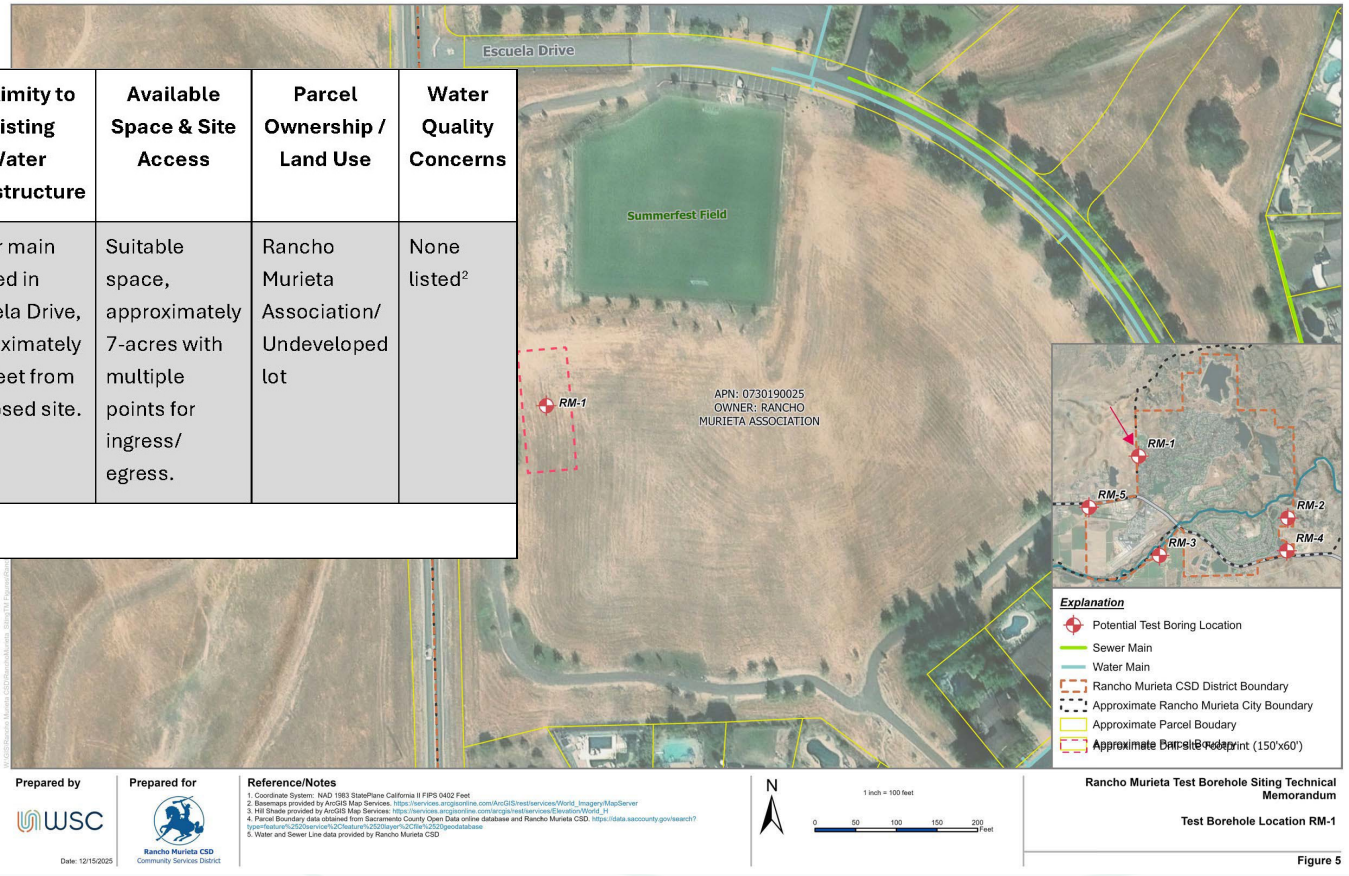
Geologic Map with Test Borehole Locations

Figure 4

RM-1: Summary

Site ID	Geologic Setting	Estimated Groundwater Production Potential	FEMA 100-Year Floodplain	Proximity to Existing Water Infrastructure	Available Space & Site Access	Parcel Ownership / Land Use	Water Quality Concerns
RM-1	Ione Formation[1]	30 -100 gpm	Outside of the 100-year floodplain	Water main located in Escuela Drive, approximately 500-feet from proposed site.	Suitable space, approximately 7-acres with multiple points for ingress/ egress.	Rancho Murieta Association/ Undeveloped lot	None listed[2]

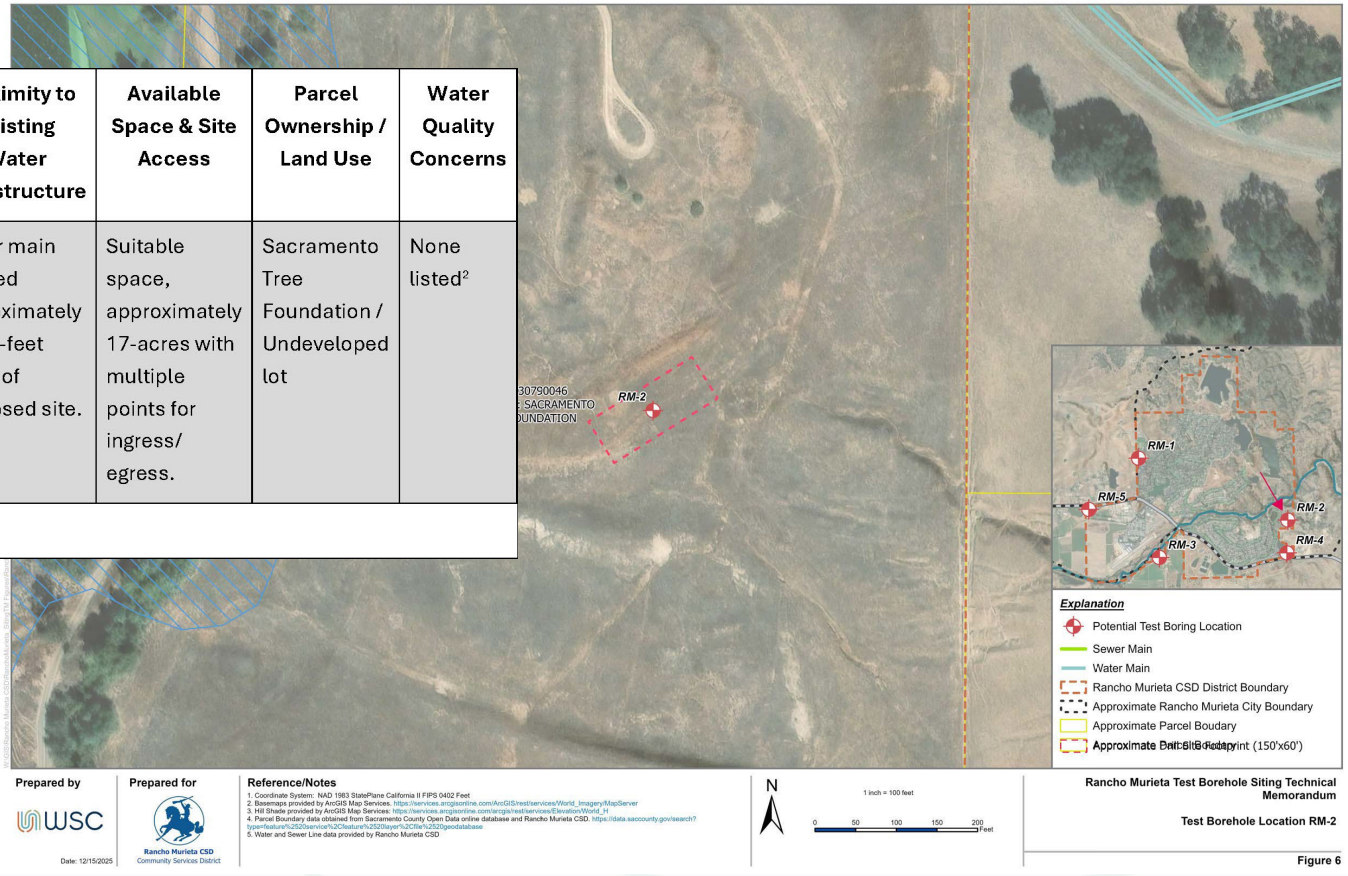
1- primarily sandstone and clay with sand/gravel lenses
2- As shown on the SWRCB GAMA website.



RM-2: Summary

Site ID	Geologic Setting	Estimated Groundwater Production Potential	FEMA 100-Year Floodplain	Proximity to Existing Water Infrastructure	Available Space & Site Access	Parcel Ownership / Land Use	Water Quality Concerns
RM-2	Ione Formation[1]	5- 50 gpm	Within the 100-year floodplain	Water main located approximately 1,000-feet north of proposed site.	Suitable space, approximately 17-acres with multiple points for ingress/ egress.	Sacramento Tree Foundation / Undeveloped lot	None listed[2]

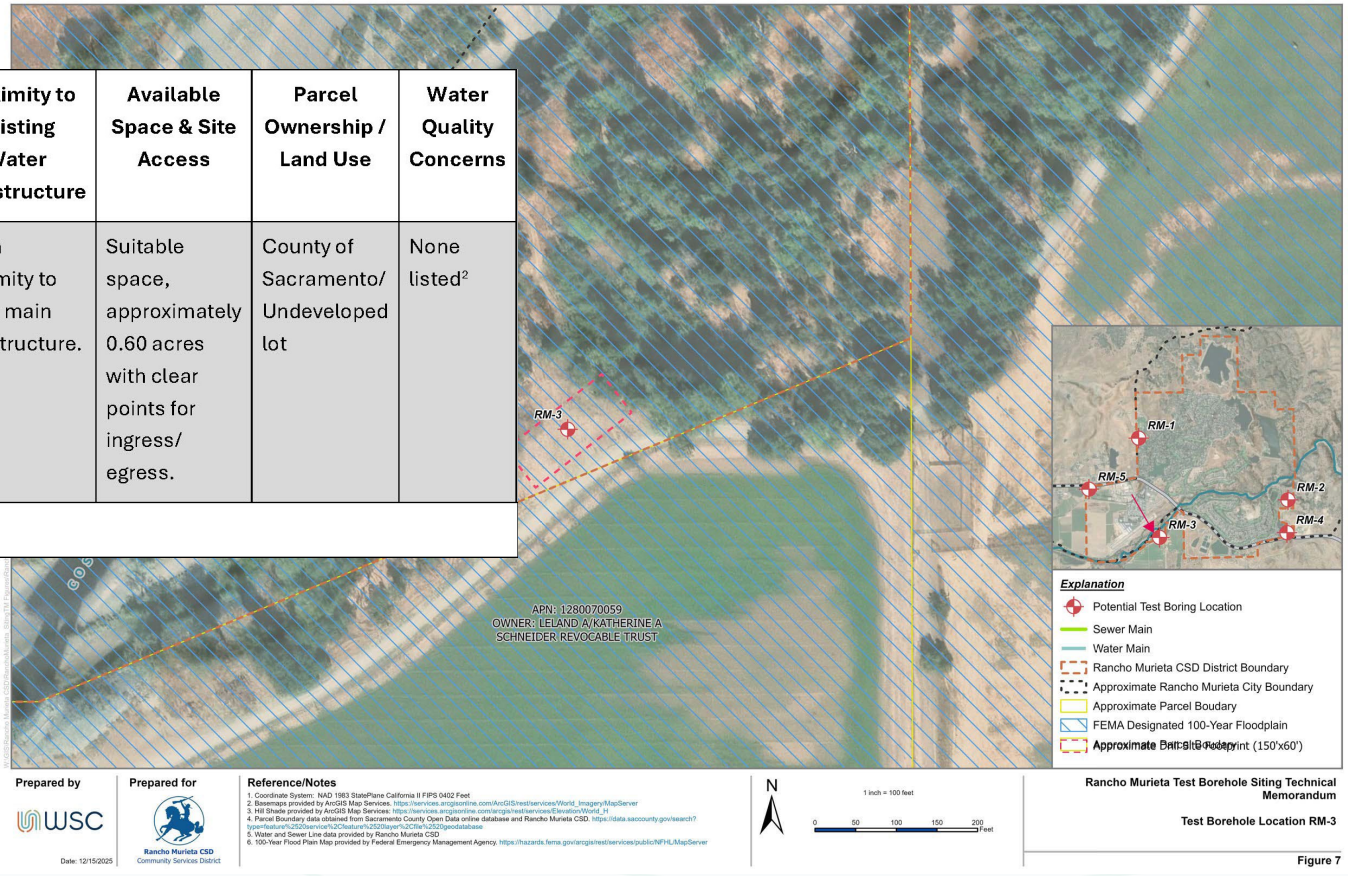
1- primarily sandstone and clay with sand/gravel lenses
2- As shown on the SWRCB GAMA website.



RM-3: Summary

Site ID	Geologic Setting	Estimated Groundwater Production Potential	FEMA 100-Year Floodplain	Proximity to Existing Water Infrastructure	Available Space & Site Access	Parcel Ownership / Land Use	Water Quality Concerns
RM-3	Modesto Formation[1]	50- 200 gpm	Within the 100-year floodplain	Not in proximity to water main infrastructure.	Suitable space, approximately 0.60 acres with clear points for ingress/ egress.	County of Sacramento/ Undeveloped lot	None listed[2]

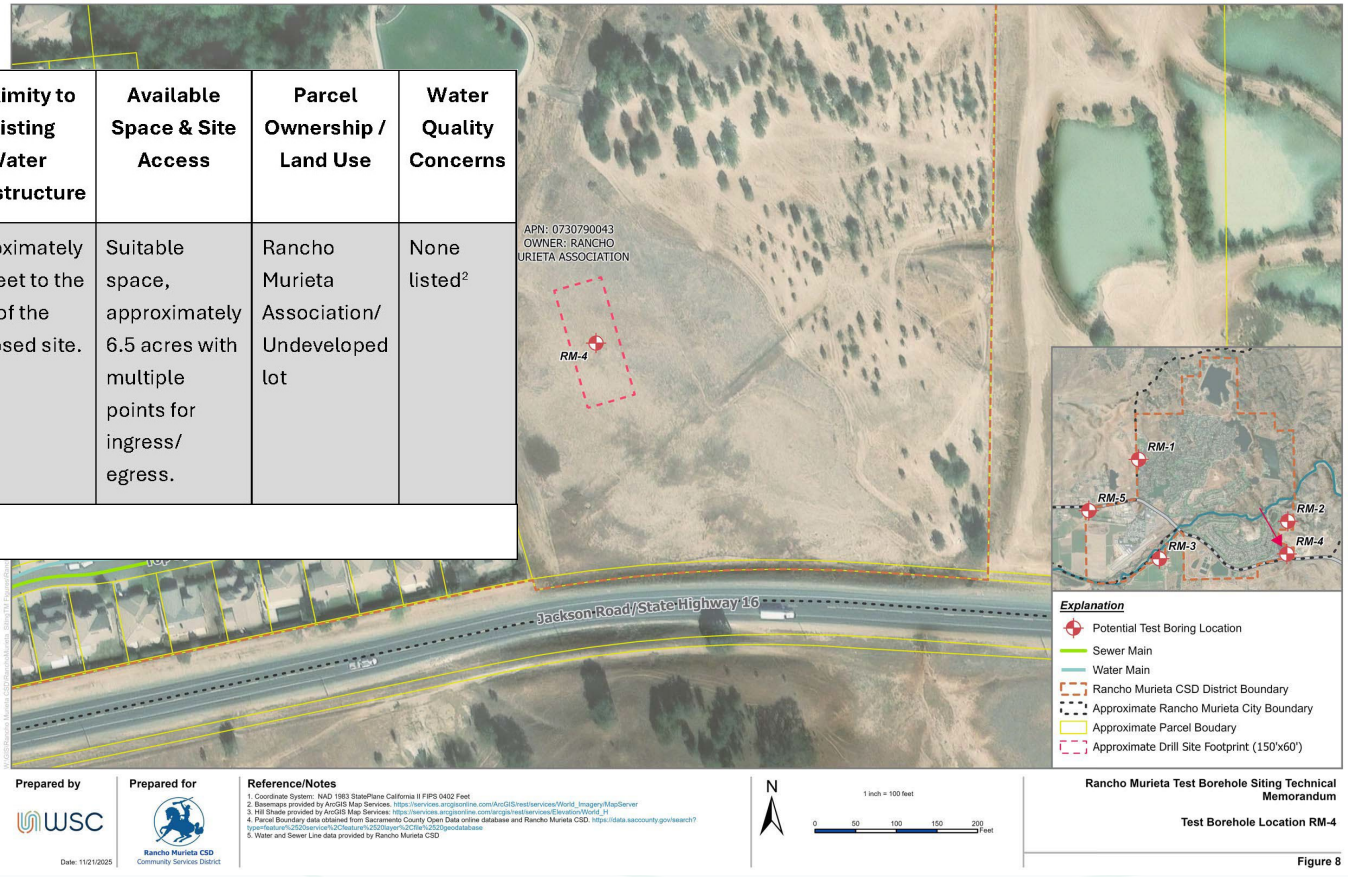
1- Loosely to moderately compacted sands, silts, and gravels
2- As shown on the SWRCB GAMA website.



RM-4: Summary

Site ID	Geologic Setting	Estimated Groundwater Production Potential	FEMA 100-Year Floodplain	Proximity to Existing Water Infrastructure	Available Space & Site Access	Parcel Ownership / Land Use	Water Quality Concerns
RM-4	Ione Formation[1]	5- 50 gpm	Not located within the 100-year floodplain	Approximately 400-feet to the west of the proposed site.	Suitable space, approximately 6.5 acres with multiple points for ingress/ egress.	Rancho Murieta Association/ Undeveloped lot	None listed[2]

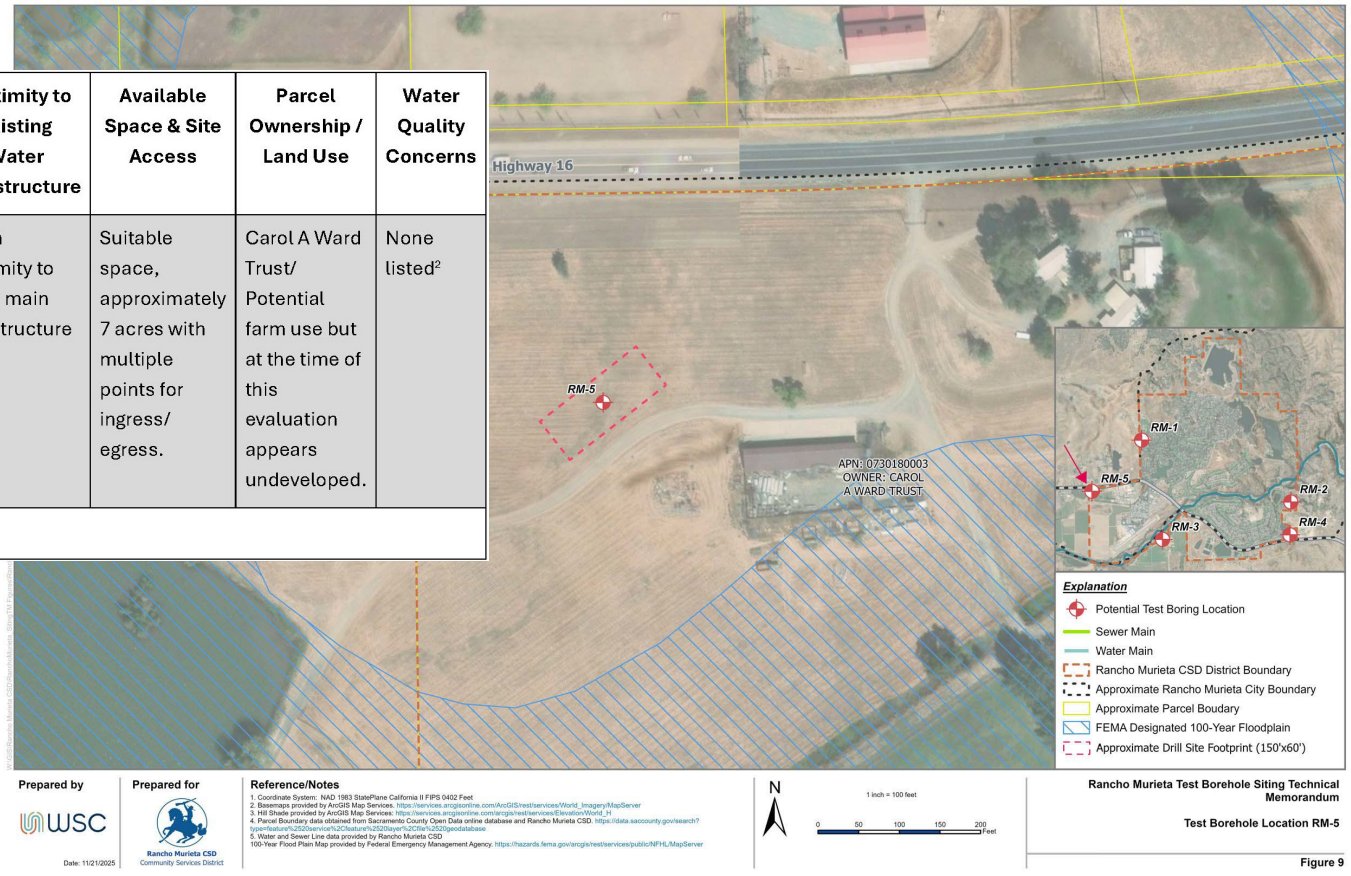
1- primarily sandstone and clay with sand/gravel lenses
2- As shown on the SWRCB GAMA website.



RM-5: Summary

Site ID	Geologic Setting	Estimated Groundwater Production Potential	FEMA 100-Year Floodplain	Proximity to Existing Water Infrastructure	Available Space & Site Access	Parcel Ownership / Land Use	Water Quality Concerns
RM-5	Ione Formation[1]	200-400 gpm	Not located within the 100-year floodplain	Not in proximity to water main infrastructure	Suitable space, approximately 7 acres with multiple points for ingress/ egress.	Carol A Ward Trust/ Potential farm use but at the time of this evaluation appears undeveloped.	None listed[2]

1- primarily sandstone and clay with sand/gravel lenses
2- As shown on the SWRCB GAMA website.



RM-6: Summary

Site ID	Geologic Setting	Estimated Groundwater Production Potential	FEMA 100-Year Floodplain	Proximity to Existing Water Infrastructure	Available Space & Site Access	Parcel Ownership / Land Use	Water Quality Concerns
RM-6	Ione Formation[1]	50-100 gpm	Not located within the 100-year floodplain	Approximately 200-feet to the east of the proposed site.	Suitable space, approximately 1.12 acres with suitable points for ingress/ egress.	RMCSD	None listed[2]

Notes:
GPM – gallons per minute
1- primarily sandstone and clay with sand/gravel lenses
2- As shown on the SWRCB GAMA website.

Questions?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