



**NORTH MARIN
WATER DISTRICT**

Lynwood Pump Station Replacement

North Marin Water District

March 6, 2024

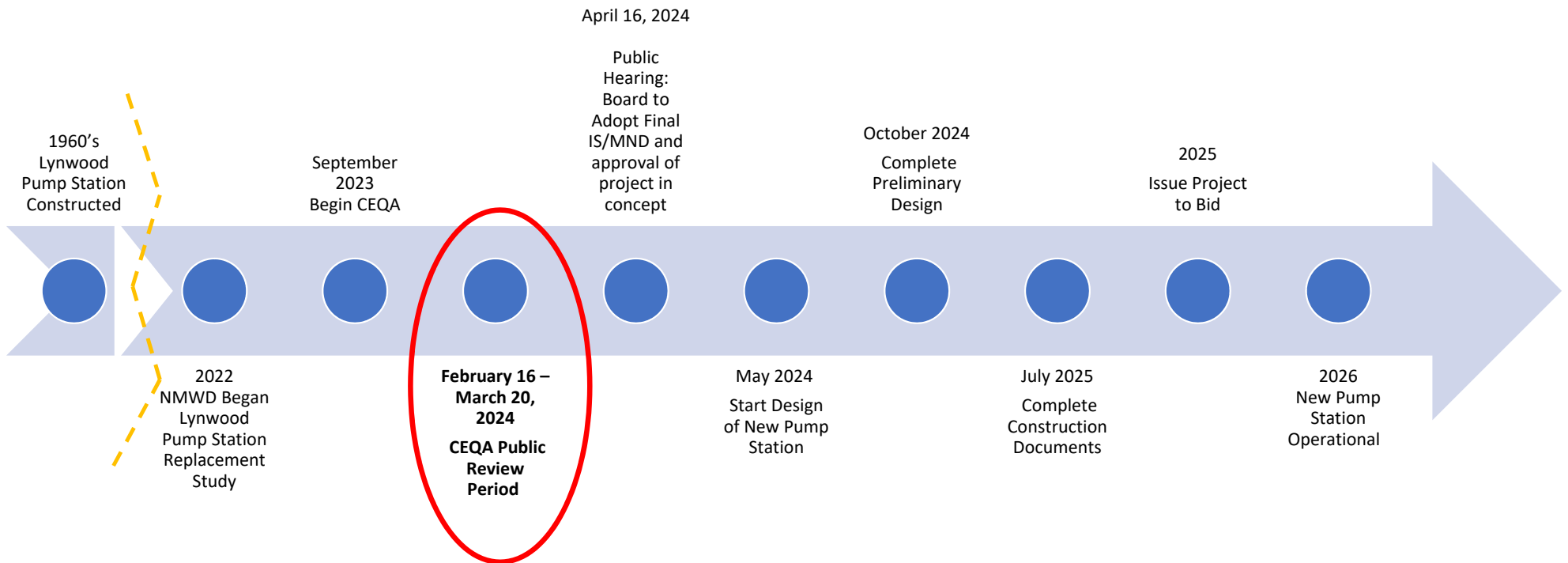
Public Information Meeting



Presentation Outline

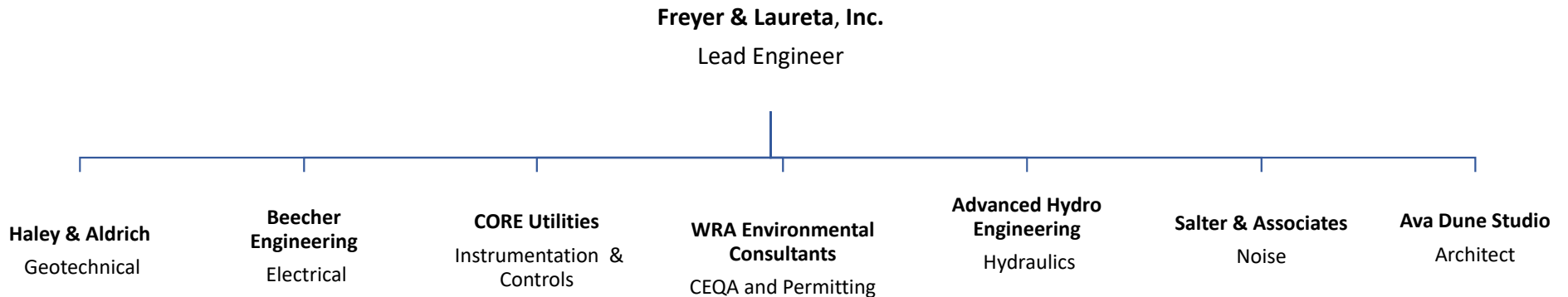
- Project Team
- NMWD Novato Water System
- Project Purpose
- Project Objectives
- Existing Pump Station
- Background Hydraulics
- Alternatives Overview
- Proposed Pump Station
- CEQA Findings and Public Review Period
- Timeline and Next steps
- Q&A

Timeline and Next Steps



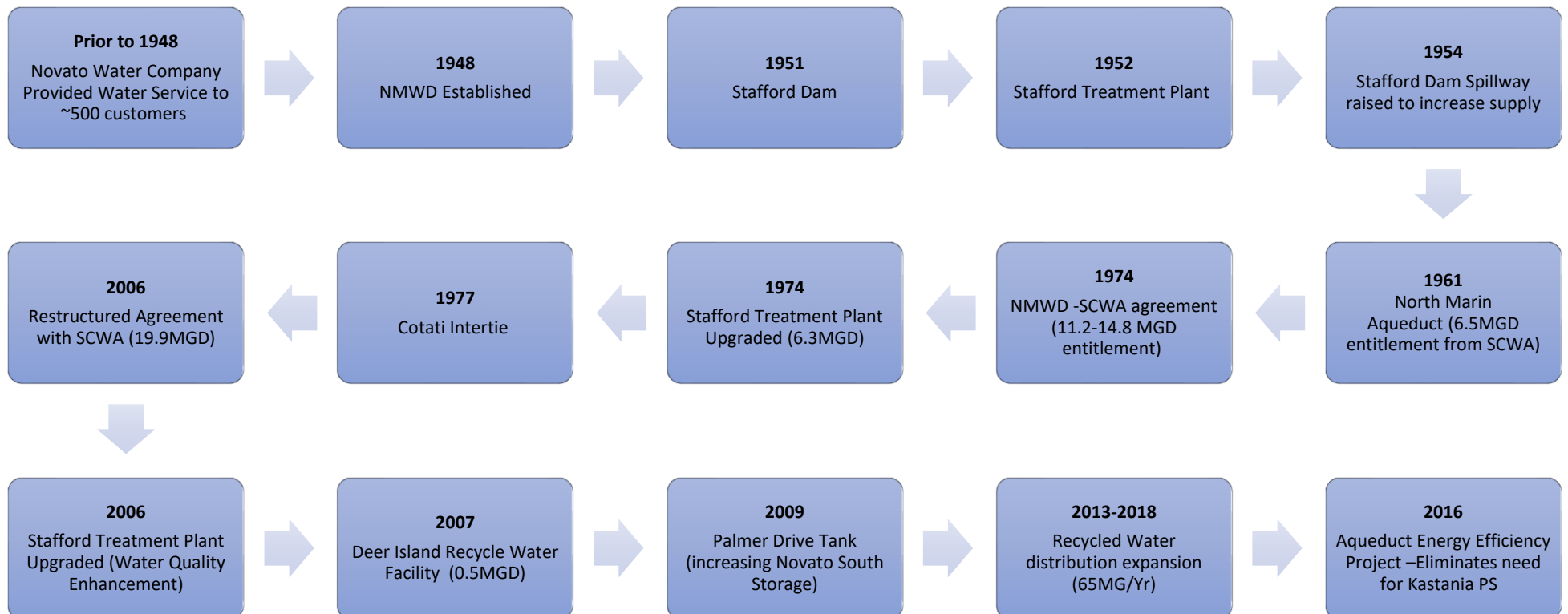
Project Team

- Tim Fvette, P.E.
North Marin Water District
- Jeff Tarantino, P.E.
Freyer & Laureta, Inc.
- Geoff Reilly, AICP
WRA Environmental Consultants
- Nick Brinton-McBean, Biologist
WRA Environmental Consultants

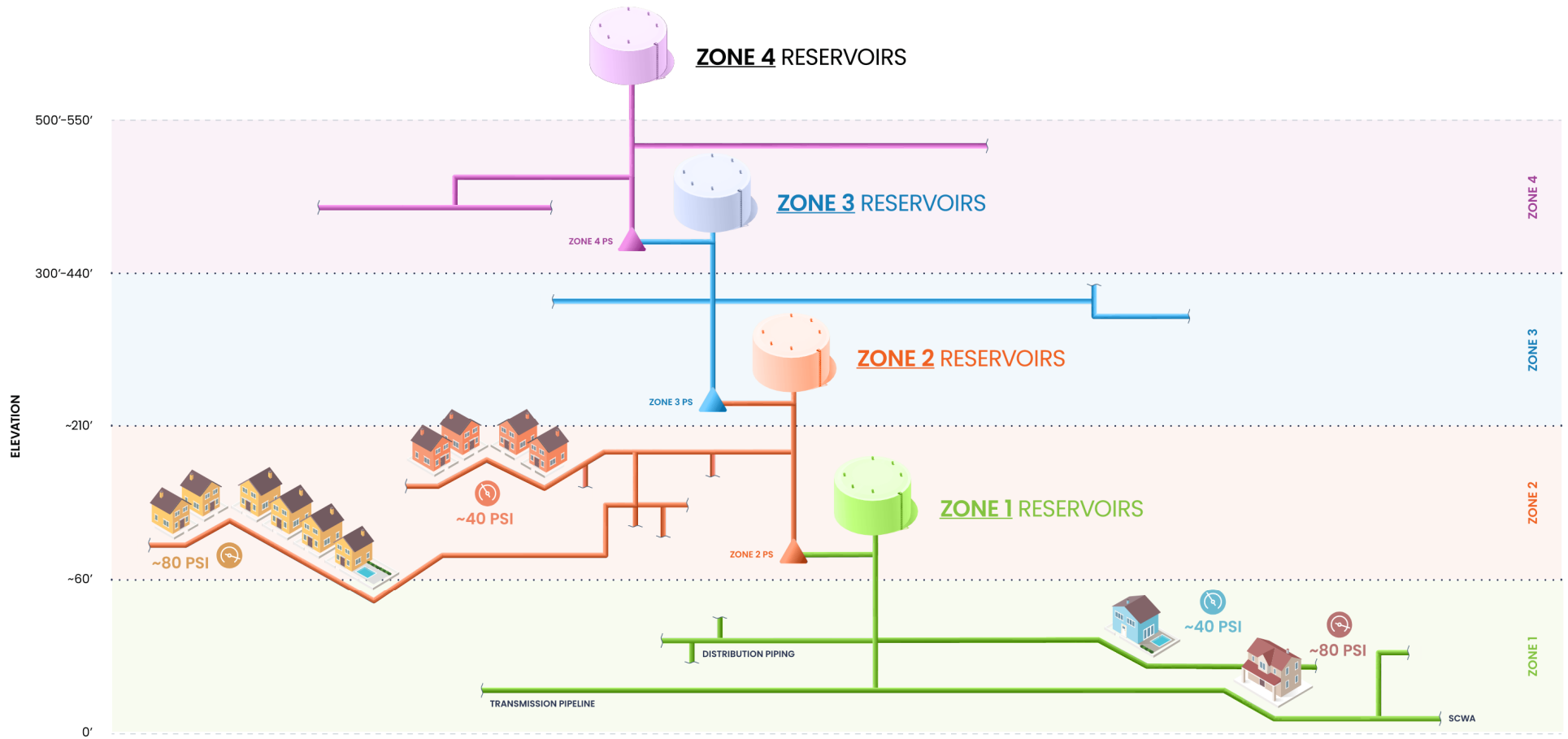


NMWD History

NMWD mission is to meet the expectations of our customers in providing potable and recycled water and sewer services that are reliable, high-quality, environmentally responsible, and reasonably priced.

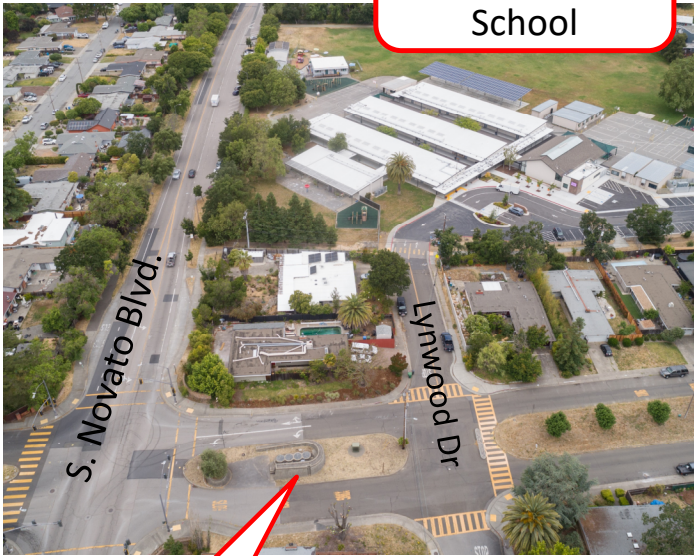


Novato Water System

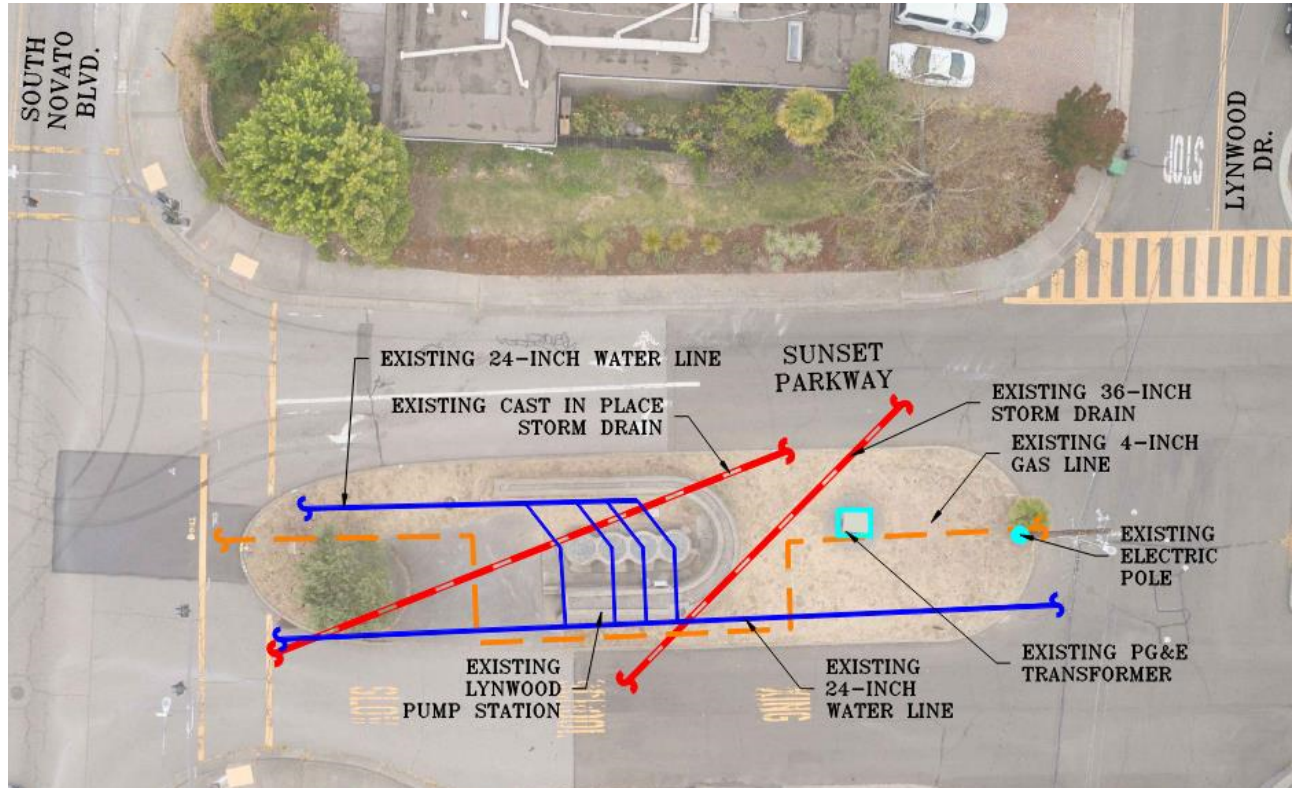


Existing Pump Station Site Constraints

Lynwood Elementary School



Existing Pump Station



Existing Pump Station Facility Rendering



Project Purpose

- Lynwood Pump Station originally constructed in the 1960s
- Pump station serves approximately 25% of NMWD customers
- Critical component to meet both drinking water and emergency needs for the Novato community
- Pump station components have reached end of useful life and must be replaced
- No seismic consideration given to existing PS piping

Project Objectives

Improve
Reliability

Electrical
Equipment

Equipment
& Pipe Age

Enhance
Operability

Safety

System
Constraints

Meet Future
Needs

Growth

System
Redundancy

Existing Pump Station Constraints

- Pump shaft vibration
- Constrained location and environment
- Piping condition
- Electrical equipment vulnerability



Existing Pump Station Constraints

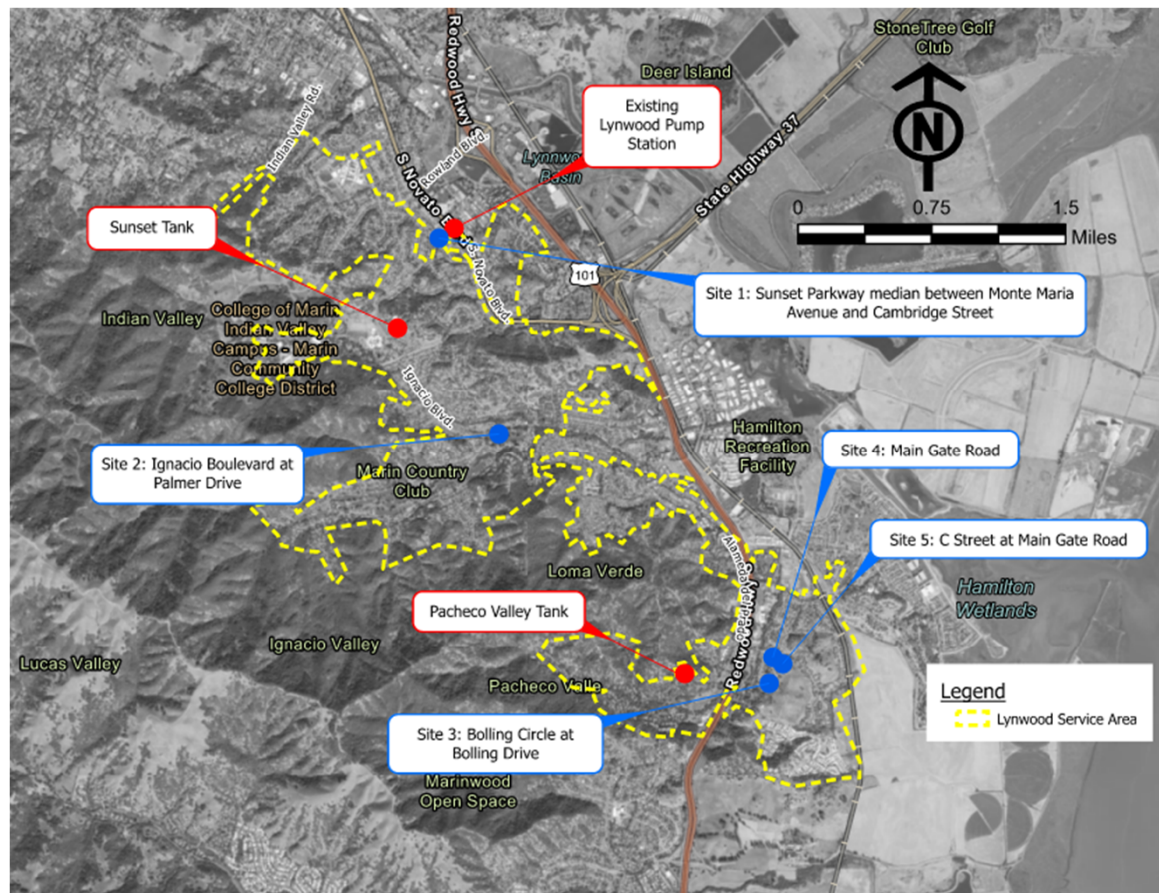
- Pump shaft vibration
- Constrained location and environment
- Piping condition
- Electrical equipment vulnerability



Lynwood Pump Station Risk Assessment

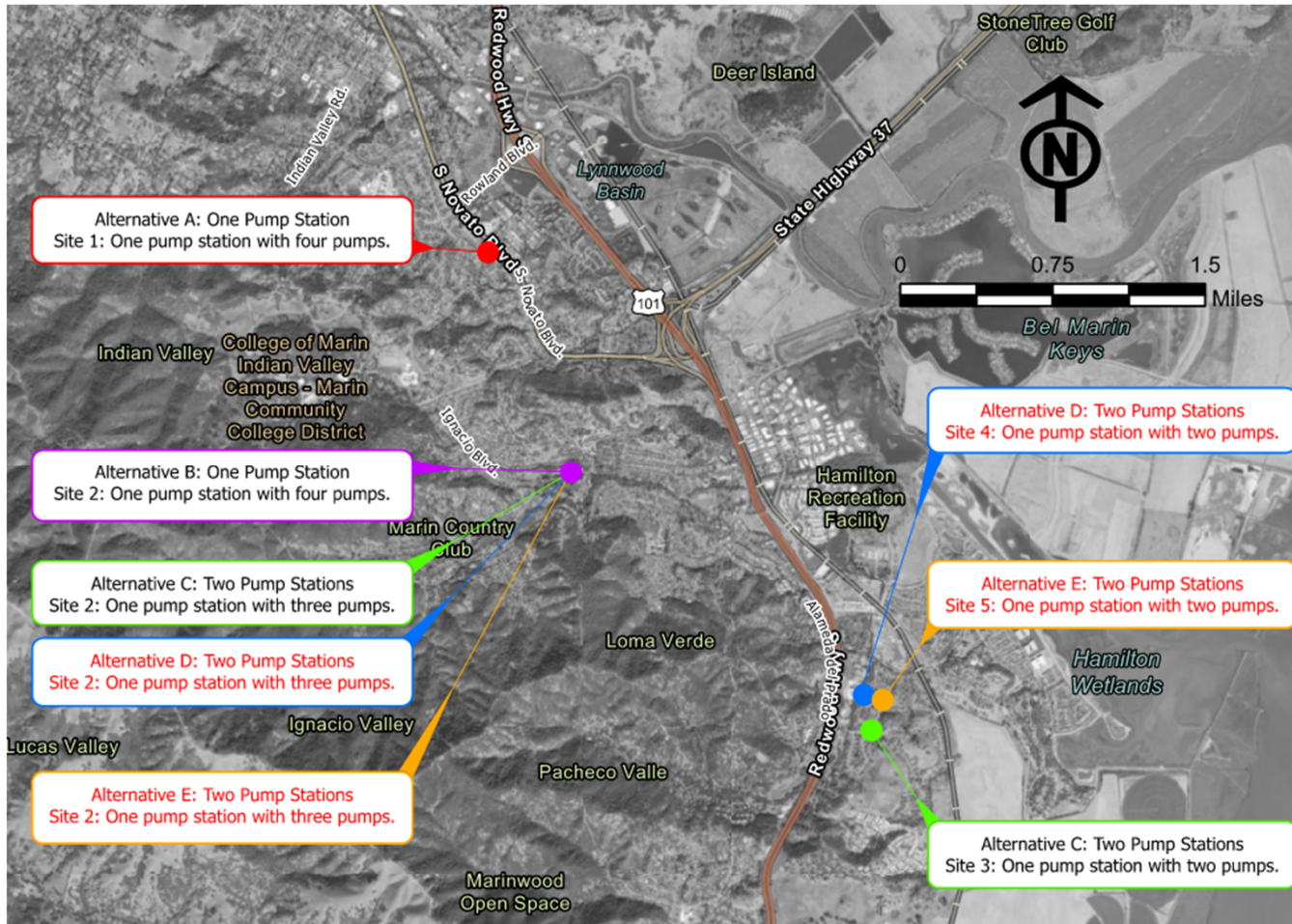
Evaluation Criteria	Risk Level	Consequence
Equipment Failure	High	Water delivery disruption
Meet Future Demand	Medium	Delay critical housing needs
Safety and Maintenance Access	High	Staff injured performing critical maintenance and repairs
Maintain Water Storage for Emergency Needs	Medium	Pacheco Valley Tank may not be full to meet demands during an emergency event
System Redundancy	Medium	If Lynwood Pump Station operation is interrupted, San Marin Pump Station may not be able to meet all primary Zone 2 demands

Background Hydraulics



- Lynwood Pump Station service area has expanded from original design with addition of Hamilton
- Physical location is no longer centered within its service area and is limited by conveyance capacity
- Sunset Tank is filled first then Pacheco Valley Tank

Alternatives Description



Alternatives Comparison Matrix

Evaluation Criteria	Retrofit Existing	Alt A (Site 1)	Alt B (Site 2)	Alt C (Sites 2 & 3)	Alt D (Sites 2 & 4)	Alt E (Sites 2 & 5)
Replaces Aging Infrastructure	X	X	X	X	X	X
Meet Future Demand	X	X	X	X	X	X
Improvements Safety and Maintenance Access		X	X	X	X	X
Improves Pacheco Valley Tank Fill Operations			X	X	X	X
Provides Opportunity to Improve Zone 1 Storage Tank Operations				X	X	X
Provides System Redundancy				X	X	X
Relative Project Cost	\$\$\$	\$	\$\$	\$\$\$\$	\$\$\$	\$\$\$

Pump Station Structure Renderings: Stucco over Concrete Masonry Units



Pump Station Structure Renderings: Split Face Concrete Masonry Units



Pump Station Structure Renderings: Wood Slat Panel over Concrete Masonry Units



CEQA Initial Study Checklist & Findings

- Environmental factors potentially affected:
 - Air Quality
 - Biological Resources
 - Cultural Resources
 - Geology and Soils
 - Hydrology and Water Quality
 - Tribal Cultural Resources
 - Utilities/ Service Systems
 - Mandatory Findings of Significance
- All potential impacts can be mitigated and, therefore, a Mitigated Negative Declaration is appropriate to comply with CEQA.
- All five alternatives have similar impacts.

CEQA Findings – Mitigation Measures

Mitigation Measure	Common Requirement	Project Specific Requirement	Notes
AQ-1: Fugitive Dust Control Measures	X		Standard requirement for dust control, minimize equipment idling time, etc.
BIO-1: Nesting Birds	X		Pre-construction survey during nesting bird season and establish exclusion zone if nesting birds discovered
HYDRO-1: Erosion Control Plan	X		Standard erosion control Best Management Practices (e.g. straw waddles, etc.)
CUL-1: Buried Archeological Resources		X	For Site 4 and Site 5, requirement to stop work if buried archeological resources are encountered
CUL-2: Archaeological Training and Monitoring		X	For Site 4 and Site 5, preconstruction archaeological training is required. Excavation work shall be monitored by an archaeologist.
CUL-3: Human Remains	X		Standard requirement to stop work if remains encountered

CEQA Public Review Period

- Public can provide written comments during public review period
- 34 Day Public Review Period: February 16, 2024 to March 20, 2024
- Comments should be mailed or emailed to District no later than 5:00 p.m. on March 20, 2024:

Tim Fvette, P.E.

Senior Engineer

North Marin Water District

PO BOX 146

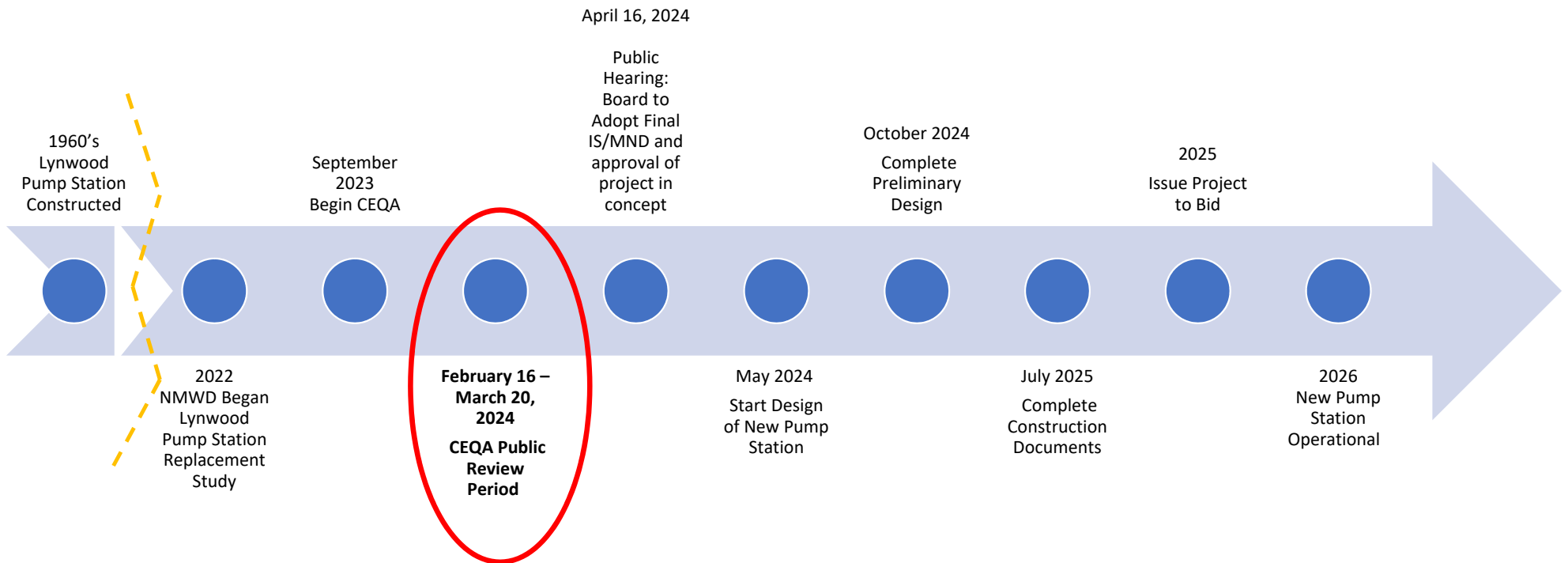
Novato, CA, 94948-0116

tfvette@nmwd.com

Draft IS/MND Available for Public Review

- Available online:
<https://nmwd.com/lynwood/>
- Available in person, by appointment only. Please call 415-897-4133 to schedule an appointment:
100 Wood Hollow Drive
Suite 300
Novato, CA

Timeline and Next Steps



Q&A