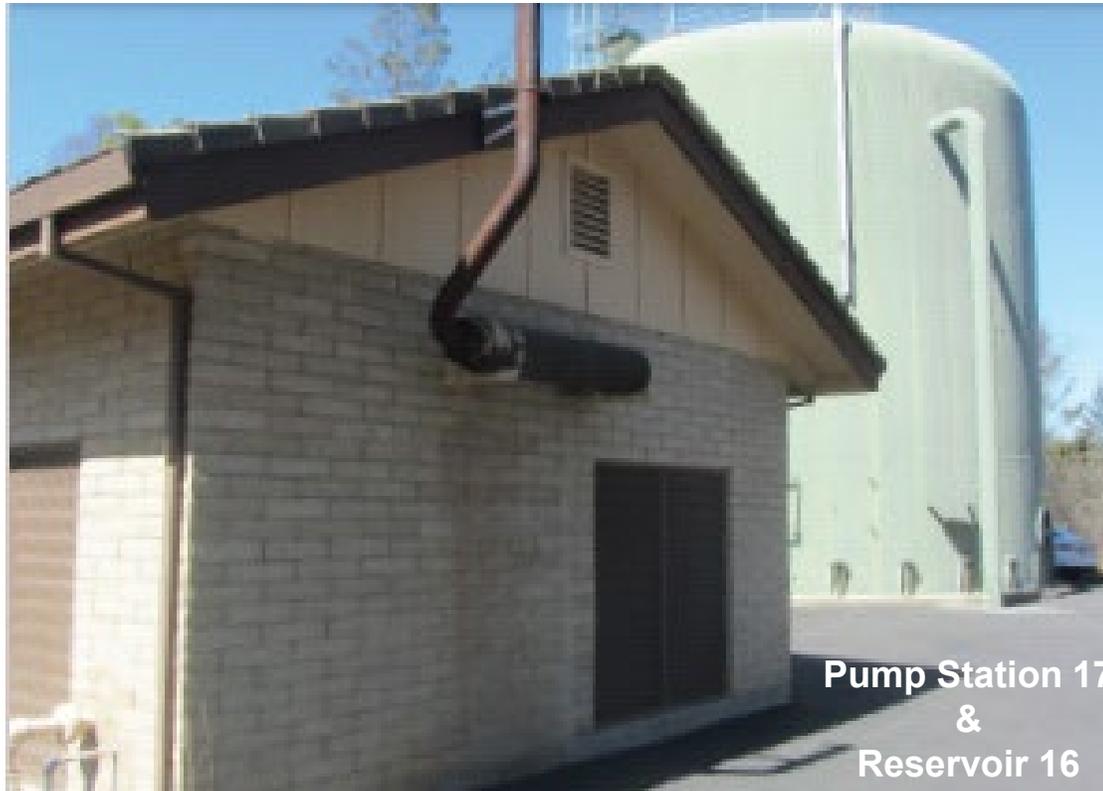


Project Work Order Approval

Professional Engineering Design Services for the Seismic Upgrades and Improvements Phase 5 - R9A, R16 and R17, and VFD and Fire Pump Additions at S16 & S17



Andy Wilt, PE
January 12, 2021



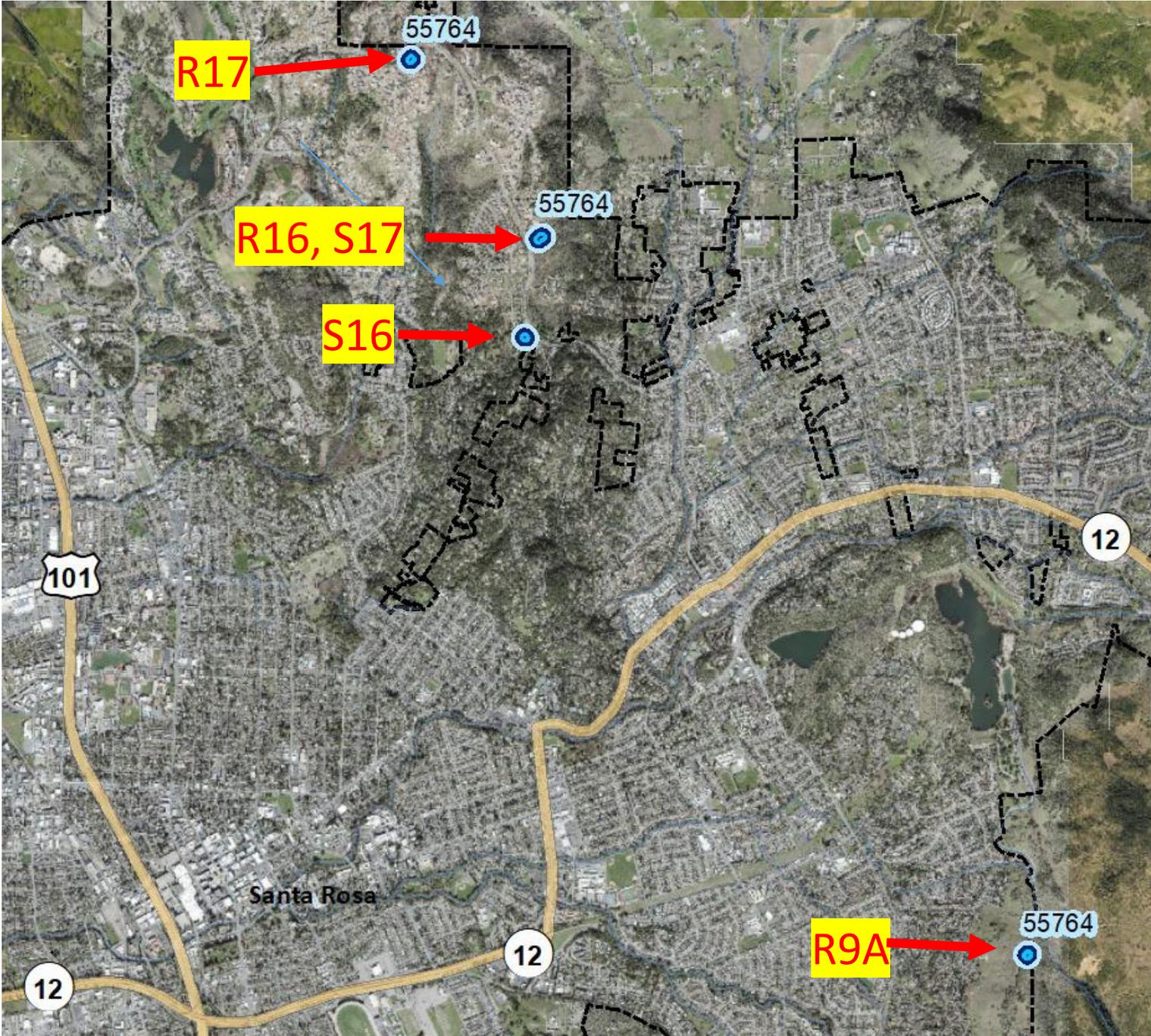
Pump Station 17
&
Reservoir 16

Outline

- Location map
- Background
- Scope of work
- RFP Process
- Engineering Agreement
- Recommendation



Geographic locations of project



Background

- Final phase of a 5-phase effort to bring Reservoirs up to current code
- June 2018 Technical Memo from West Yost
 - 3 Reservoirs
 - 2 Water Pump Stations



Background



Reservoirs

R16, R17 - deficiencies due to original design calculation errors

R9A - deficiencies due to age (1977)



Scope

Recommended improvements – bring up to current code

Seismic and Structural improvements

Safety, site security

Water quality

Corrosion and coatings



Scope

S16 and S17 – Evaluate and design improvements to increase fire protection in zones 3 and 17 (16 benefits as well)

- Replace existing motor controls with VFD's for 2 pumps and motors
- Install new 1,500 gpm pump , motor, and VFD
- Building upgrades to accommodate new pump and electrical equipment.



The RFP Process

- 54 MPSA approved consultants solicited, only 1 Response
- 2 Person Proposal Review Committee
- Brelje and Race selected as most qualified
 - Subconsultants: ZFA Structural Engineers, ATEEM Electrical Engineering, Group Delta Consultants for updating seismic parameters.
 - Vote was unanimous
 - Recent and relevant experience
 - Discussed technical issues and options
 - Positive references

Engineering Design Services Agreement

- Design development to refine scope for pump stations
- Prepare design & construction documents
- Proposed cost = Not to exceed \$1,035,400 (including 10% contingency)
- Professional services agreements that exceed \$500,000 require Board approval

RECOMMENDATION

It is recommended by the Departments of Water and Transportation and Public Works (TPW) that the Contract Review Subcommittee support approval of a Project Work Order (PWO) under the Master Professional Services Agreement with Brelje and Race Consulting Engineers, of Santa Rosa, California, to provide Professional Engineering Design Services for the Seismic Upgrades and Improvements Phase 5 - R9A, R16 and R17, and VFD and Fire Pump Additions at S16 & S17 project in the amount not to exceed \$1,035,400.