## AV'S LOWPRO® DESIGN WITH THE CITY OF TULARE Aqueous Vets® Teamed with W.M. Lyles Co. to Complete 1,2,3-TCP Mitigation Project

## **BACKGROUND**

Aqueous Vets® (AV®) teamed with W.M. Lyles Co. (WML) to provide thirteen (13) of our **PF LowPro® Series** Granular Activated Carbon (GAC) systems to complete the City of Tulare's 1,2,3 - TCP Mitigation project. Due to each site location's proximity to residential and commercial development areas, AV's unique "Low Pro" design was selected as it offered the advantages of reduced overall height and competitive operational specifications when compared to older traditional systems.

The "Low Pro" Series of systems provides all the operational design (vessel volume, hydraulic/head loss characteristics, EBCT) requirements while achieving an industry leading **overall system height of less than 15 feet. AV's PF LowPro® Series** systems have benefited several utilities throughout CA to mitigate the California Environmental Quality Act (CEQA) concerns.





PROJECT LOCATION

Tulare, CA

PROJECT TYPE

Design, Manufacture, Supply **PROJECT TIMEFRAME** 

Feb. 2019 – Dec. 2019

**PROJECT PHASE** 

Complete

**AV® SCOPE OF WORK** 

\$4,300,000

END USER

City of Tulare

**GENERAL CONTRACTOR** 

W.M. Lyles Co.

**DESIGN ENGINEER** 

Provost & Pritchard

Cosulting Group











KEY GAC SYSTEM DESIGN & OPERATIONAL PARAMETERS	VALUE
Number of Systems/Vessels per System	13/2
Operating Configuration	Parallel/Lead-Lag
Carbon Capacity/Volume per Vessel	714 ft <sup>3</sup>
Media Type	Coconut
Design Flow Rate per System	1,000 gpm
Total Design Flow	15 MGD
Hydraulic Loading	8.8 gpm/ft <sup>2</sup>
Empty Bed Contact Time @ 1,000 gpm per System	10.7 Minutes
Underdrain	Septa/External Ring Header
Overall System Height to Top of Pipe	14'-10"

