

TROJAN UV™ CASE STUDIES

Municipal Drinking Water



Trojan UV Solutions: Disinfecting with UV in Drinking Water

Filtration Avoidance in Surface Water, North Tahoe Public Utilities District, California

With its mountain beauty and deep, clear waters, Lake Tahoe is one of the most popular vacation spots in the California/Nevada area. Approximately 15 million vacationers a year visit the Lake Tahoe Basin for both summer and winter sports. The popularity of Lake Tahoe has resulted in increased traffic, infrastructure, crowds and urban sprawl in this environmentally-sensitive area.

The North Tahoe Public Utilities District wanted to avoid the costly construction and lengthy permit cycle required to build a new filtration system. North Tahoe required a simple, cost-effective disinfection solution that would meet the requirements of the Surface Water Treatment Rule and pass strict California Department of Health Services approvals. North Tahoe also required a solution that would fit into their existing infrastructure in a way that maximized the use of expensive land and met environmental permitting requirements.

THE TROJAN SOLUTION

The North Tahoe Public Utilities District evaluated a number of different treatment technologies and found UV to be the best option for their needs. North Tahoe turned to Trojan for its TrojanUVSwift™ technology. The TrojanUVSwift™12 reactor offered North Tahoe a compact footprint, effective disinfection, and proven, validated, performance.

In addition to avoiding the costs of constructing a new filter, North Tahoe became the first large scale UV system for disinfecting drinking water in California. Trojan's experience and depth of knowledge of UV disinfection were just some of the reasons for its selection.

SYSTEM DESIGN PARAMETERS

- **FLOW CAPACITY:** 4.6 million gallons per day (725.5 m³/hr)
- **ULTRAVIOLET TRANSMITTANCE (UVT):** 99%
- **DISINFECTION OBJECTIVE:** Barrier to *Cryptosporidium*
- **DISINFECTION METHOD:** UV

TROJAN TESTIMONIAL

"With UV, we are able to avoid construction of a new filtration system and increase our disinfection."

North Tahoe, California