

Lake Van Norden

Summit Valley is an important piece of Donner Summit history. Native Americans lived in the valley during summers for thousands of years leaving behind grinding mortars, metates, and basalt flakes. Thousands of emigrants first saw the valley from the tops of the passes and then took their wagons across it. Crossing the Sierra was the hardest part of the journey but they were in California and now it was all downhill, to their new lives. The Dutch Flat Donner Lake Wagon Rd. crossed the valley to help build the railroad and was followed by the first transcontinental railroad, the first transcontinental highway and the first transcontinental telephone line. The first transcontinental air route went right overhead, guided by beacons on the valley's periphery.

An important piece of Summit Valley history is the Van Norden Dam and Lake Van Norden.

There was a dam in Summit Valley as early as 1874 but we don't know what it was used for. The South Yuba Canal Company had a network of dams, reservoirs, and canals that took water to lower elevations for mining, and particularly, hydraulic mining. The company bought the dam in Summit Valley.

In 1886 hydraulic mining was outlawed and it looked like all of the infrastructure dedicated to hydraulic mining was superfluous. The South Yuba Canal Co. could have been in trouble. Fortunately, just at that time, orchards were being planted in the Central Valley and they needed irrigation. Towns were growing and needing more water too. Then electricity arrived and the canal company became a

After snow melt California's rivers and streams "became mere rivulets – but pitiful contrast to the swollen and turbulent torrents which course through the grand canyons and meadow-like valleys for the remainder of the year."

Rudolph Van Norden, 1903, explaining the need for dams, canals, and reservoirs

supplier of electricity as well as water. The South Yuba Canal Co. became the Central California Electric Co. and that eventually became P. G. & E. P. G. & E. enlarged the dam in 1916 to its present configuration. The lake held 5,600 acre feet of water when full. Each spring the lake filled with snow melt. Each summer the water was let out,



Above: Alfred A. Hart, #109 Summit Valley Emigrant Mt. & Donner Pass in the distance ca. 1869, Lake Van Norden ca. 1955, Summit Valley, 2016

keeping the Yuba River flowing and generating electricity downstream.

While the lake was full it was the center of the local summit community. People fished, boated, and waterskied on the lake. There was a campground on the north side. The continual flow of water down the Yuba River in summers helped enable downstream communities to grow. As the lake receded during late summer and fall grasses grew sheep arrived for final fattening before their final trip.

In 1976 the dam was found to unsafe in the opinion of the State Division of Dams and P. G. & E. looked into enlarging it but because the dam sits on 30 feet of unstable glacial til (gravel left behind by melting glaciers) the company didn't see the fix as cost effective. The dam was notched and each year filled only 150 acre feet. Although the lake was much smaller, it still provided recreation for people and a variety of habitats for some of Donner Summit's 500 plant, 115 butterfly, 100 bird and dozens of animal species.

In 2012 the Truckee Donner Land Trust bought the valley from failed developers. They inherited a problem because the developers had been told by the State to drain the lake to below fifty acre feet. The Land Trust wanted to sell the valley to the Forest Service which would not take the valley with any lake. The Land Trust did not entertain any other solutions and so opened the drain and completely drained the lake in 2015. If the Forest Service consummates the purchase their plan is to restore the dry meadow to what it was before there was any dam and no summer river.

The Dam Itself

"The dam at Lake Van Norden is of earth fill, rip rapped on the inner slope, and has a wooden core of 3 by 8 inch planking. The Dam is provided with a wooden spillway at its west end. The outlet is a 22 inch pipe of riveted

steel through the base of the dam. It is 27 feet high 1637 feet long storing 5874 acre feet."

Van Norden is a sprinkle constructed dam meaning wagons carrying dirt followed one another sprinkling dirt layer upon layer. At least parts of the interior of the dam are redwood boards. There are places where those can be seen. The original dam was placed on the existing valley floor and not on an excavation down to bedrock. It is that placement on up to 30 feet of glacial til (gravel) that ended its function as a dam. (from documents in the California Division of Dams files).

Who Was Van Norden?

Lake Van Norden was named for Charles Van Norden the scion of a wealthy family from New York. His brother, Warner, had made an extended visit to California and was apparently impressed with investment opportunities for his Van Norden Trust Company. He invested in the South Yuba Canal Co. and Spaulding Dam by forming the South Yuba Water and Mining Co.

Charles Van Norden, Warner's brother, was at loose ends with some health problems. He came to California to represent the family. The dam is named for him.



Carleton Watkins #835 "Summit Valley, Castle Peak, and Railroad Snow Sheds..." ca. 1874 Just right of center you can see the first dam in Summit Valley. To the left of that are the buildings of the original Soda Springs Station.

The First Dam in Summit Valley

"Arrived at the summit of the Sierra Nevada on the line of the railroad, there are many delightful pedestrian and horseback excursions to be made in various directions, and the finest points are fortunately the least hackneyed. At Summit Valley (which is associated with the relief of the tragically fated Donner emigrants, and is only three miles from Donner pass) there is an odious saw-mill, which has thinned out the forests; an ugly group of whitewashed houses; a ruined creek, whose waters are like a tan-vat; a big sandy dam across the valley, reared in a vain attempt to make an ice-pond; a multitude of dead, blanched trees, a great, staring, repellent blank. And yet this valley is not unlovely. Its upper end, still a green meadow leads to the base of peaks 10,000 or 12,000 feet high, whose light-gray summits of granite, or volcanic breccia, weather into castel-

lated forms, rise in sharp contrast to the green woods margining the level meadow. A little apart from the noisy station, the woods are beautiful, as we have described them, and the boulder-strewn [sic] earth reminds one of the pasture dotted with sheep."

"Summering in the Sierra" Benjamin Avery Overland Monthly and Out West Magazine, February, 1874