

Link: <https://www.statesmanjournal.com/story/news/local/stayton/2019/02/01/salem-drinking-water-santiam-river-economic-impact-endangered-species/2519013002/>

# How much is the North Santiam River worth? Try \$170 million a year

[Bill Poehler](#), Salem Statesman Journal Published 6:44 a.m. PT Feb. 1, 2019 | Updated 11:33 a.m. PT Feb. 1, 2019

Between storage reserves and groundwater wells, the city can serve its customers for several days without using river water. Statesman Journal

CONNECTTWEETLINKEDINCOMMENTEMAILMORE

The North Santiam River has an impact of \$170 million each year from uses including municipal water for 235,000 people in cities like Salem and Stayton, recreation on the river, hydropower and irrigation, according to an ECONorthwest report.

And millions of dollars are lost when something goes wrong, such as the toxic algae blooms at Detroit Lake last summer.

The ECONorthwest report – which cost \$30,000 — was commissioned by the North Santiam Watershed Council and the Oregon Business Council and was funded by Meyer Memorial Trust, Marion Soil and Water Conservation District, Marion County and Salem. It was the first to address the economic impact of the river.



[Buy Photo](#)

**The North Santiam River before it reaches the Geren Island Water Treatment Facility, on Tuesday, May 12, 2015, at Stayton. (Photo: BRENT DRINKUT/Statesman Journal)**

The report comes as the U.S. Army Corps of Engineers, which manages Detroit Dam, has proposed draining Detroit Lake to a level below previous drought stages for one to three years to build a cooling tower and aid in fish passage up the North Santiam River.

The Corps of Engineers is under a legal mandate to correct water temperatures to save the endangered Willamette River Steelhead and Upper Willamette River Spring Chinook.

The Corps' plans have worried residents and river users. Draining Detroit Lake would damage recreation use at the lake and all along the 100-mile-long river, plus it could restrict agriculture irrigation and force cities to find other sources of drinking water.

When a drought or some other issue befalls the river, the impact is felt in multiple ways, according to the report:

- Each year there is a shortage of water in the North Santiam costs between \$2 million and \$3.6 million in lost outdoor use of the river.
- The 84,421 residential households that depend on water from the North Santiam for drinking water are willing to pay between \$2 million and \$3.6 million to avoid curtailment of some uses of water, though those numbers would rise if water rationing was mandatory for all uses.

- NORPAC Foods estimates if it reliability of being able to use water from the river for cooling at its Stayton facility, it would cost between \$2 million to \$3 million to find alternative sources.
- Research by economists at Oregon State estimate for every foot of drop in water level below full pool at Detroit Lake, visitor days decline by 2 percent.



[Buy Photo](#)

**Water flows along the North Santiam Canyon after passing through the Detroit Dam on January 12, 2018, in Detroit, Ore. (Photo: MOLLY J. SMITH / Statesman Journal)**

The report cites fish counts from the Upper and Lower Bennett Dams, which are owned by Salem and the Santiam Water Control District, that show wild chinook are down year-over-year to 411 in 2018 from 1,630 in 2014, and wild steelhead were down to 401 from 943 in the same span.

The estimated value of the hydropower generated at Detroit Dam and Big Cliff Dam is \$7.8 million. But the dollar value placed on the annual value of avoided CO2 emissions is \$19.8 million.



Leroy Shepherd shows form and function during one of the Santiam Flycasters' monthly outings. And you can learn, too, on Aug. 9 in Salem. (Photo: Santiam Flycasters)

The estimated value of municipal water that cities including Salem, Stayton, Turner and Gates is \$66 million per year based on the amount customers pay to use the water. That doesn't include water used by Jefferson, Albany and Millersburg, which also draw some water from other sources as well as the North Santiam.

"The effects of the state and federal actions really do have an effect on the viability of those communities," said Danielle Gonzalez, director of economic development for Marion County.

The study says 234,910 people live within the watershed and about 6 percent of Oregon's population gets its drinking water from the river, and the population is up from 155,439 in 1990.

Salem is the largest municipal water user with 49,304 connections using 16,253,000,000 gallons of water a year.

**MORE:** [Fishing groups fight plan to eliminate hatchery steelhead from Santiam River](#)

NORPAC's processing facility in Stayton uses half of the city's water, 319,037,000 gallons per year.



At least 23,867 acres of land in Marion and Linn counties are irrigated with water from the North Santiam. The annual value of those crops is \$53.9 million.

There are 1,473 jobs tied directly to the river in industries such as manufacturing (679), government (253) and hospitality (236).

Water-based recreation is estimated to bring in \$36.5 million each year.

If something goes wrong, a lot of people – and a lot of money – is impacted.

“I always think that the value of water is more, but I think that this is a good starting point,” Gonzalez said. “If we have a project that is going to cost \$100 million, we know why.”

The report states climate change will impact the river by water supply availability, flows and ecosystems. A Willamette Water 2100 project study found average surface temperatures could rise between 2 and 13 degrees from current temperatures.

In addition, warmer air temperatures are expected to precipitate a decline in snowpack, which is expected to have a greater impact on the North Santiam River and McKenzie River than the rest of the Willamette River basin.



**The North Santiam River below Big Cliff Dam near Mill City is known to Steelhead anglers as the best spot for wrangling the fish. (Photo: Statesman Journal file)**

The ECONorthwest report states the rise in temperatures and increased nutrient deposition may increase the frequency and magnitude of toxic algae blooms, such as the one at Detroit last summer.

The ECONorthwest report states the value people place on the recovery of Willamette River Steelhead and Upper Willamette River Spring Chinook over 50 years is estimated at \$621 million, calculated on a per-household willingness-to-pay over 10 years of \$401.96 per household.

Among the other factors not assigned a monetary value such as aesthetics for property owners along the water – including Mill Creek in Salem – cultural and tribal values and health and well-being.

“This is just a first step,” McCoun said. “I think deeper analysis will be needed to be done.

“If you think about it, it should be done on all the water sources. It should be done on the Clackamas and the McKenzie rivers. In my mind, it's really the water budget.”

A stakeholder meeting to discuss the ECONorthwest report led by report author Sarah Reich will take place at 10 a.m. Feb. 19 in the conference room at the Marion County Public Works building at 5155 Silverton Road NE, Salem.

*bpoehler@StatesmanJournal.com or Twitter.com/bpoehler*

## Six numbers from the ECONorthwest report on the North Santiam River

**\$621 million:** The value Oregonians place on recovery of Upper Willamette Chinook in 50 years.

**\$66 million:** The amount customers pay for water from the North Santiam each year.

**\$53.9 million:** The annual value of crops produced with water from the North Santiam.

**\$36.5 million:** The estimated value of water-based tourism along the North Santiam each year based on 500,000 visits a year.

**\$7.8 million:** The value of hydropower produced at Detroit Dam and Big Cliff Dam.

**2 percent:** The drop in visitors at Detroit Lake for every foot below full pool.