

Fires in Oregon consumed 700,000 acres of public and private land in 2017, costing state, federal, local, tribal and private entities more than \$340 million to suppress. This doesn't include the immeasurable loss of homes, tourism dollars, recreational amenities and natural resources. The fires also had the negative impact to our health care system through increased emergency room visits and hospital admissions as many Oregonians suffered from wildfire smoke.

### **Smoke and Public Health**

During the 2017 fire season, parts of Oregon were swathed in hazardous levels of smoke. In all, about 160 days reached a level considered unhealthy for sensitive groups (USG).

The state's data show the impact on local medical facilities. During the first full week of September, for example, visits to emergency rooms and urgent care were 86 percent higher than expected based on historic trends, according to the Oregon Health Authority.

Asthma-related visits were among these. Records for one single day show that on Sept. 5, there were 583 asthma-related emergency room and urgent care visits. This was 20 percent more than expected on that day. Patients between the ages of 18 and 44 represented the largest increase in visitors.

Oregon's ESSENCE program (Electronic Surveillance System for the Early Notification of Community-Based Epidemics) further recorded data at 60 non-federal emergency departments. During Sept. 4 and 5, it found a 24 percent increase in asthma-related visits statewide.

In 2017, Oregon high schools cancelled a combined total of 223 football, boys' soccer and girls' soccer games during September, the month in which the most games were cancelled. Between August and October, schools canceled 353 games in these sports.

### **Economy**

Road closures impeding travel, as well as air quality warnings encouraging people to stay indoors, dealt a blow to Oregon businesses that rely on tourists and in-state travelers. These include leisure and hospitality companies, such as restaurants, hotels and excursion services.

A state report issued on Oct. 26 highlights the noticeable impact on local jobs in the Columbia Gorge, Central Oregon and Southern Oregon. In those areas, leisure and hospitality businesses cut 600 more jobs in September than they typically would, according to the State of Oregon Employment Department report.

In Central Oregon, this impact was especially noticeable. The leisure sector typically declines at the end of the summer tourism season by 6 percent. This year the decline was close to 8.5 percent. In the Columbia Gorge, Hood River County lost 100 jobs in leisure and hospitality, as well as 70 in retail trade. Wasco County lost 90 jobs in leisure and hospitality but none in retail. Tribal government employment, including Kah-Nee-Ta Resort, fell by 40 jobs in September. Some of these job losses might be expected at the end of the tourist season.

Jason Lewis-Berry, Director of Regional Solutions for the state of Oregon, testified to the Oregon Legislature in November. In his testimony, he cited the lost jobs as well as a decline in sales of as much as 60 percent for businesses, both of which hit the leisure and hospitality industry hard.

Many small woodland, industrial owners were affected by those fires. Losses included to timber value, grazing lands and fencing. Private resource losses, primarily in timber, are estimated at \$60 million.

## **Forest Health**

Over 90 percent of the acres burned in 2017 occurred on land under the firefighting jurisdiction of the U.S. Forest Service. A majority of Oregon's forest land is owned by the federal government and much of it is classified as being at high risk of catastrophic wildfire.

In fact, the U.S. Forest Service's most recent Forest Inventory Analysis found that Oregon has 571,000,000 standing dead trees, with a large majority on federal forests. According to a separate analysis by the Oregon Forest Resources Institute (OFRI), the amount of standing dead trees in the 14 million acres of Oregon's national forests is 50 percent more than the live tree volume on all state and local forestlands. In 2016, statewide aerial surveys detected 647,000 acres with damage or mortality from forest insects.

National Forest timberlands had 56 percent mortality of their growth and only 9 percent removals, which includes harvests and non-commercial cutting. This mortality figure contrasts sharply with state and private forests, which had 19 percent and 12 percent mortality, respectively.

More than 70 percent of the standing dead timber on federal lands is on non-reserved lands (lands not already designated as wilderness) that are open and available for sustainable timber harvest.

## **Need for Active Forest Management**

The University of Montana found that comprehensive treatment prescriptions designed to restore sustainable ecological conditions- including logging, thinning and prescribed fire- can move 90 percent of treated acres into a low-hazard condition.

Research shows that active forest management reduces the risk of catastrophic wildfires. Thinning forests can reduce wildfire severity by up to 60 percent and remove up to 400 percent more carbon from the air than leaving forests alone. The same active management can enhance biodiversity, create jobs more efficiently than any other sector and help offset emissions from fossil fuels by utilizing forest residues to generate electricity.

The Nature Conservancy, and the U.S. Forest Service studied the economic benefit in taking proactive forest management activities. They found that fuel treatments such as forest thinning and controlled burning can save up to three times the cost of future fires, reduce high-severity fire by up to 75 percent, and bring added benefits for people, water, and wildlife. They also found that by reducing the size and severity of fires, the carbon emissions from the fires were decreased by 38 to 77 percent, suggesting that these activities could protect the carbon stocks sequestered in our forests.

## **Economic Potential**

Oregon has led the nation in softwood lumber production for many years. Oregon's lumber output of 5.2 billion board feet in 2015 accounted for about 16.5 percent of total U.S. production. That's an increase of 36 percent from the recessionary low in 2009. However, Oregon sawmill output in 2015 was only about 70 percent of the pre-recessionary high in the early 2000s.

The forest sector included about 61,000 jobs in Oregon in 2015, according to the Oregon Employment Department. The average annual wage of those jobs was \$50,000. This is 4 percent higher than the average wage of \$48,300 for all Oregon employment. One million board feet of timber harvested in Oregon supports 11 jobs