

Low-Income Residents and People of Color in Washington Are Living Near Chemical Dangers

The Center for Effective Government graded states based on the dangers faced by people of color and residents with incomes below the poverty line living within one mile of dangerous facilities. **Washington scored poorly with a “D” grade.**

Nationally, 7.5 percent of the population lives within one mile of a hazardous facility.

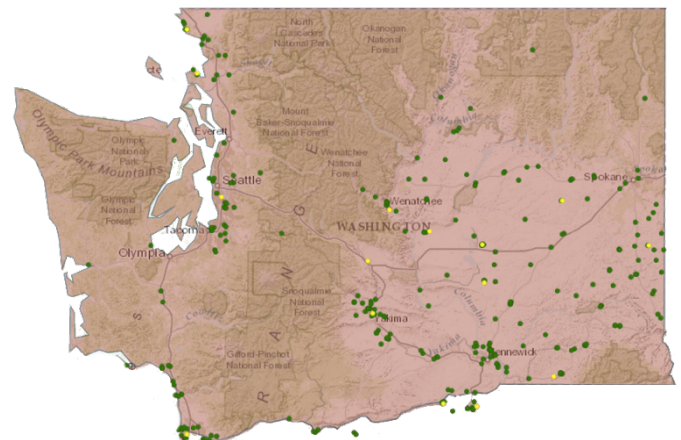
Key Findings

- Over 468,000 Washington residents (seven percent) live within one mile of a facility storing large amounts of extremely hazardous chemicals. These “fenceline communities” face potential chemical leaks and explosions on a daily basis.
- **Children of color under age 12 are twice as likely to live in fenceline communities as white children.**
- **Poor Latino children are roughly three-and-a-half times more likely to live in fenceline communities than white children who aren’t in poverty.**

Chemical dangers are real, and incidents are happening in Washington.

In 2014, the Columbia Colstor plant in Quincy leaked 1,505 pounds of anhydrous ammonia. This toxic gas can cause serious injury or death if inhaled and can travel several miles from its source. The Colstor plant – which stores up to 85,000 pounds of anhydrous ammonia – is less than a mile from Quincy High School, with a student body of almost 800. In fact, you can see the facility from the baseball diamond in front of the school.

Anhydrous ammonia is the most commonly reported chemical in Washington facilities. It is used by food manufacturers and warehouses as a refrigerant. It is also sold as a nitrogen fertilizer; Washington has several fertilizer distribution facilities that store significant quantities of this toxic gas.



[Click here to open an interactive map of your neighborhood.](#)

Washington’s 267 high-risk facilities also include food manufacturing and distribution centers and petroleum refineries. They are located in both rural and urban areas.

A handful of facilities store **chlorine gas**, another deadly substance that was used as a chemical weapon in World War I. These facilities include municipal water treatment facilities that use chlorine in water purification, as well as bleach manufacturing facilities. Many are in urban areas, and a chemical leak could injure and kill surrounding neighbors before they have time to evacuate.

These dangerous chemicals must travel to the facilities somehow, often by train or by truck, and accidents in transit can also lead to fatal releases.

Are people of color and low-income residents of Washington safe from chemical hazards?

Children of color under age 12 are twice as likely to live in fenceline communities as white children in the same age group. Latino children are over two-and-a-half times more likely. The proximity to hazardous facilities means that these children face acute dangers as well as daily exposure to toxic chemicals in their air and water.

Poor children under age 12 are one-and-a-half times more likely to live in fenceline communities compared to children who aren't poor. However, being poor *and* a child of color increases these likelihoods even more. **Poor Latino children, for example, are three-and-a-half times more likely to live in fenceline communities than white children who are not in poverty.**

Living in the shadow of an industrial facility increases stress on poor communities as they worry about the potential for a catastrophic disaster and daily exposures to toxic emissions. Living near these facilities can also decrease home values, meaning many poor families can't afford to move to safer neighborhoods if they want to do so.

Additionally, 252 Washington public schools are located within one mile of a hazardous facility, putting 97,000 students in danger. **Children of color and those receiving free lunches are one-and-a-half times more likely to attend these schools.**

Inequities in Likelihood of Living in a Fenceline Community

Racial Inequities			Income (Poverty) Inequities		
	Score	Grade		Score	Grade
Percentage of People of Color Who Live in Fenceline	9.5%	C	Percentage of Poor People Who Live in Fenceline	9.7%	C
Likelihood of People of Color to Live in Fenceline (compared to whites)	1.6 times more likely	C	Likelihood of Poor People to Live in Fenceline (compared to those not in poverty)	1.5 times more likely	D
Percentage of Children of Color Under 12 Who Live in Fenceline	10.5%	C	Percentage of Poor Children Under 12 Who Live in Fenceline	11%	D
Likelihood of Children of Color Under 12 to Live in Fenceline (compared to white children under 12)	1.9 times more likely	D	Likelihood of Poor Children Under 12 to Live in Fenceline (compared to children under 12 not in poverty)	1.6 times more likely	C
Percentage of Children of Color Who Attend Public Schools in Fenceline	11.5%	C	Percentage of Children Receiving Free Lunch Who Attend Schools in Fenceline	12.5%	D
Likelihood of Children of Color to Attend Public Schools in Fenceline (compared to white children)	1.5 times more likely	C	Likelihood of Children Receiving Free Lunch to Attend Schools in Fenceline (compared to children not receiving free lunch)	1.5 times more likely	D
Percentage of Elderly of Color Who Live in Fenceline	7.3%	C	Percentage of Elderly Poor People Who Live in Fenceline	8.1%	C
Likelihood of Elderly of Color to Live in Fenceline (compared to elderly whites)	1.2 times more likely	B	Likelihood of Elderly Poor People to Live in Fenceline (compared to elderly people not in poverty)	1.4 times more likely	C
People of Color Grade		C	Poverty Grade		D
Overall Grade: D					

What you can do to protect your community from dangerous chemicals.

Washington residents like you can help. You can organize people in your community and educate others about these dangers. You can learn about your local zoning process (if your state gives local governments zoning authority) and whether it protects community members from nearby industrial plants that use hazardous chemicals – and share what you learn with your friends and neighbors. You can attend public meetings and planning hearings and urge decision makers to think carefully about the sites chosen for new industrial facilities, and you can write, call, and meet with other state, county, and city officials to send the message that *all* Washington residents deserve to be protected from chemical dangers.

You can also demand that the federal government require facilities to switch to safer chemicals and alternatives whenever feasible and urge the Washington State Department of Ecology and the state-level OSHA to conduct more thorough and frequent inspections to spot problems before they cause disasters. And Washington residents can push local governments to require buffer zones around new and expanded chemical facilities to ensure homes and schools are not built nearby.

Table 1: Percentage of Population Who Live in Fenceline Communities, by Age and Race

	Black	Latino	American Indian/ Alaskan Native	Asian/Pacific Islander/ Native Hawaiian	White Not Hispanic	All Races
All Ages	5.9%	13.8%	7.3%	7.0%	6.0%	7.0%
0-17	6.0%	14.4%	7.7%	7.2%	5.4%	7.4%
18-64	5.9%	13.5%	7.3%	7.1%	6.2%	7.0%
65+	5.1%	12.0%	6.4%	6.1%	6.0%	6.2%
Total # in fenceline	13,749	106,235	6,676	37,300	289,688	468,063
Likelihood of living in fenceline, compared to whites	Just as likely	2.3	1.2	1.2	---	---

Table 2: Percentage of Poor Population Who Live in Fenceline Communities, by Age and Race

	Black	Latino	American Indian/ Alaskan Native	Asian/Pacific Islander/ Native Hawaiian	White Not Hispanic	All Races
All Ages	6.4%	16.6%	7.4%	6.0%	8.0%	9.7%
0-17	6.7%	17.3%	7.1%	5.7%	7.6%	10.9%
18-64	6.4%	15.9%	7.7%	6.4%	8.1%	9.2%
65+	4.4%	16.2%	6.5%	4.6%	8.2%	8.1%
Total # in fenceline	3,757	34,477	1,788	3,964	39,899	86,411
Likelihood of living in fenceline, compared to whites in poverty	1.2 times less likely	2.1	1.1 times less likely	1.3	---	---
Likelihood of living in fenceline, compared to same race not in poverty	1.1	1.3	Just as likely	1.2 times less likely	1.4	1.5
Likelihood of living in fenceline, compared to whites not in poverty	1.1	2.9	1.3	Just as likely	1.4	---

Table 3: Percentage of Children Who Attend Public School in Fenceline Communities, by Grade and Race

	Black	Latino	American Indian/ Alaskan Native	Asian/Pacific Islander/ Native Hawaiian	White Not Hispanic	All Races
All Grades	4.2%	17.3%	11.8%	5.8%	7.6%	9.2%
Pre-K - 2	3.6%	18.7%	11.5%	5.4%	7.8%	9.9%
3-7	4.7%	17.0%	12.8%	6.0%	7.2%	9.0%
8-12	4.0%	16.4%	11.1%	5.8%	8.0%	9.0%
Total # in fenceline	2,024	36,936	1,800	4,917	47,585	97,019
Likelihood of attending schools in fenceline, compared to white children	1.8 times less likely	2.3	1.5	1.3 times less likely	---	---

Find the Full Report at ForEffectiveGov.org