WASHINGTON AGRICULTURE AT A CROSSROADS:

A Baseline Assessment of Agricultural Viability

FEBRUARY 2026





This report provides a high-level snapshot and establishes a baseline for a comprehensive agricultural viability study to be released in July 2026.

WSDA
Washington State Department of Agriculture

Washington Agriculture at a Crossroads:
A Baseline Assessment of Agricultural Viability in Washington State

February 2026

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EXECUTIVE SUMMARY

A healthy agricultural economy is essential to ensuring Washington's communities have access to fresh, affordable, and healthy food products. *Washington Agriculture at a Crossroads* contains a snapshot of the strengths, weaknesses, opportunities, and threats facing Washington agriculture. This information will serve as the baseline for a deeper analysis being completed by Washington State Department of Agriculture (WSDA) in June 2026.

Farmers and ranchers manage nearly 7.7 million acres in Washington, representing approximately 17% of the state's total land.[1] This farmland is utilized to grow diverse and high-value agricultural products which are sold locally and abroad. This farmland helps preserve open spaces, contributes to ecosystem services, and is a part of Washington's landscape. Washington's highly diverse geography and climate enable the state to grow over 300 unique commodities, making Washington the 2nd largest producer of specialty crops in the nation. Washington agriculture feeds people, supports hundreds of thousands of jobs, and generates revenue which in turn fuels Washington's economy through taxes. Ensuring the health of both the Washington farm and farmer is essential to the viability of Washington's communities, ecosystems, and overall economy.

Washington agriculture stewards 7.7 million acres, produces over 300 commodities, and contributes 10–13% of the state's GDP, yet producers face the lowest profit margins in the nation.

This report provides a baseline snapshot of agricultural viability to inform a deeper analysis in 2026.

Agriculture makes up 10 – 13% of the state's annual total gross domestic product (GDP) but agriculture in the state is currently facing economic challenges.[2] Compared to other states in the nation, Washington's agricultural producers have experienced the lowest profit margins and endured the highest production cost increases over the past decade.[3]

Rising input costs, trade challenges, labor and workforce concerns, increasing land cost and development pressure, a growing urban-rural divide, changing climatic conditions, declines in research funding, and infrastructure challenges intensify economic uncertainty. While some challenges may fall outside the purview of Washington's Legislature, this report aims to highlight opportunities for positive legislative engagement and interaction with the agricultural communities of the state.

1 Washington State Department of Agriculture. 2025. Agricultural Land Use. Online: https://agr.wa.gov/departments/land-and-water/natural-resources/agricultural-land-use

2 U.S. Bureau of Labor Statistics. GDP. Online: https://www.bea.gov/

3 USDA–ERS. September 03, 2025. Farm Income and Wealth Statistics – Returns to Operators. Online: https://data.ers.usda.gov/reports.aspx?ID=4032#P3734b573b0d54084b20f0ba69cfa9229_4_96iT0R0x47

BACKGROUND

This report was generated in response to the growing awareness that agriculture in Washington is facing unprecedented challenges that threaten the viability of producers. The health of farms and farmers are directly linked to the health of Washington's food and agricultural businesses, communities, and ecosystems.

The United States Department of Agriculture (USDA) Economic Research Service (ERS) publishes Farm Income and Wealth Statistics data. The Returns to Operators dataset estimates that Washington's agricultural operators had a cumulative take home pay of -$300 million in 2024.[4] This is the lowest estimated "returns to operators" metric in the nation reported by the USDA. This is one of the many indications that Washington State producers are facing headwinds. The intent of this report is to provide high-level insight into the strengths, weaknesses, threats, and opportunities facing Washington agriculture. A comprehensive report, including key insight from WSDA experts and partners, a deep dive into current economic conditions and agency recommendations, will be released in June 2026. Together, these reports can be viewed as a roadmap for understanding the challenges facing agriculture in our state, including the impact of state-level policies that put strain on agricultural producers.

Washington producers experienced an estimated -$300 million in returns to operators in 2024, the lowest in the nation.

This report examines strengths, weaknesses, opportunities, and threats to establish a shared understanding of current conditions.

Agricultural viability

There are many ways to define agricultural viability. For this discussion, agricultural viability refers to the ability of farmers and ranchers to operate profitably and sustainably, both today and in the future. Agricultural viability is Washington viability, as the success of one affects the other across local economies, communities, and ecosystems. Farmers and ranchers form the backbone of many rural communities, employ hundreds or thousands of people, donate to charities, serve on leadership boards, and produce local food. Agricultural producers are the largest group of private landowners in Washington, which means they have an enormous role in stewarding the state's land, air, and water. It is in the best interest of our farmers and ranchers to care for their communities and natural resources. By doing so, they ensure productive and profitable businesses for generations to come.

4 USDA – ERS. September 03, 2025. Farm Income and Wealth Statistics – Returns to Operators. Online: https://data.ers.usda.gov/reports.aspx?ID=4032#P3734b573b0d54084b20f0ba69cfa9229_4_96iT0R0x47

Washington agriculture is resilient

Washington agriculture has always proven to be resilient. Abundant natural resources including reliable water, rich soil, and diverse climates allow Washington's producers to cultivate and raise a plethora of crops and livestock. A rich history of agriculture coupled with Washington's proximity to rivers and ports has attracted farmers, food processors, and multi-national companies. Washington has the infrastructure to ship, process, and sell agricultural products throughout the world.

Washington's geography and climate, abundant natural resources, unique farms and food businesses and infrastructure have enabled Washington's farmers and ranchers to remain flexible and adapt during economic downturns and natural resource hardships. Historically, Washington State agriculture has adapted to economic and environmental change however current conditions are testing the limits of that adaptability.

A recent study conducted by the Washington State University (WSU) IMPACT Center analyzed the specialization of several commodities in Washington versus other states through the utilization of "location quotients."[5] WSU's IMPACT center found that several commodities are more concentrated in Washington as compared to the nation - this indicates that Washington producers possess a competitive advantage in growing and raising certain commodities. But that concentration is decreasing. The study found that between 2017 and 2023, the concentration of several commodities in Washington decreased anywhere from -7% (apples) to -52% (cherries). Washington is losing its competitive advantage. It is critical to explore ways in which to retain Washington's competitive advantage and through that advantage, enhance economic resilience.

Washington's diverse geography, climate, and infrastructure have long supported a resilient agricultural system.

However, declining commodity concentration signals a loss of competitive advantage in key sectors.



5 A location quotient is a statistic used to measure specialization, in this case commodity specialization, relative to a larger geographic area (the nation). Reference: Washington State University IMPACT Center. July 31, 2025. *Washington Agricultural Competitiveness and Business Viability Study* [Report prepared for WSDA].

The role of the Washington State Department of Agriculture

The Washington State Department of Agriculture (WSDA) has been supporting the agricultural economy of Washington State since 1913. Our enabling legislation states that "The director of agriculture shall exercise all the powers and perform all the duties relating to the development of markets, for agricultural products, state and federal cooperative marketing programs, land utilization for agricultural purposes, water resources, transportation, and farm labor as such matters relate to the production, distribution and sale of agricultural commodities."[6] Reference to agricultural viability can also be found in Chapter 15.04.400 which states "The legislature further finds that the department of agriculture has a duty to promote and protect agriculture and its dependent rural community in Washington state."[7]

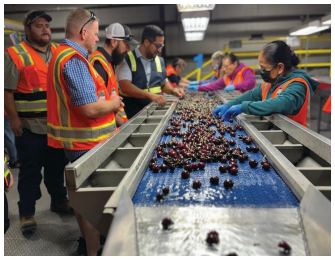
WSDA operates in all 39 counties, supporting agriculture through service delivery, regulation, and advocacy.

The agency plays a central role in maintaining agricultural viability while protecting consumers, public health, and the environment.

WSDA operates in all 39 Washington counties. Our mission is to support the viability and vitality of agriculture in Washington State, while protecting consumers, public health, and the environment. Our work falls into the three primary roles:

1. **Service**, including producer-paid services like produce grading, quality inspections, and laboratory analysis;
2. **Regulation**, including registration, licensing, permits, inspections, investigations, and technical assistance, and
3. **Advocacy**, including policy, promotion, outreach, and partnerships.

Over 800 full-time and 300 seasonal staff work from field to fork to support Washington's unique food system every single day, including diverse scientific and field staff, administrative professionals, specialists and investigators, and more. WSDA staff promote and protect the economic viability of Washington agriculture through education, science-backed policy decisions, and market development both here and abroad.






6 Chapter 43.23.030 RCW [1985 c 457 s 15; 1983 c 248 s 5; 1967 c 240 s 3; 1965 c 8 s 43.23.030. Prior: (i) 1921 c 7 s 90; RRS s 10848. (ii) 1937 c 90 s 10; RRS s 10847-1.]
7 Chapter 15.04.400 [1994 c 46 s 9; 1991 c 280 s 1.]

External forces shaping Washington agriculture

This report highlights phenomena that either strengthen, weaken, or threaten Washington's agricultural economy. Many of these pressures are complex, global, and geopolitical in nature, and so largely lie outside the direct authority of WSDA or the state Legislature. That being said, there are some actions that can be taken on the following topics to better position Washington producers. Actions are detailed later in the report. These complex pressures include:

Markets and tariffs: The U.S. is losing its reputation as a stable trade partner as trade deals fluctuate and tariffs flirt in and out of existence. As a repercussion, long-standing trade partners are turning to alternative countries for products.

Labor and workforce: Washington — like many other states — and agriculture — like many other industries — struggles with the availability of workers, the cost of retaining highly qualified individuals, an aging workforce, and complex labor regulations. These issues are largely outside of the Legislature's purview.

Land acquisition and price: Washington agricultural land prices continue to rise at a rate of over 2% per year. While the state average in 2025 was just $3,480 dollars per acre; water availability, soil quality, and farm infrastructure can drive those prices as high as $20,000 per acre in certain regions of the state.[8]

Washington agriculture generated $12.9 billion in production value in 2024 and ranks first nationally in several key commodities.

Despite this scale, the state has lost 10% of its farmland since 2002 and continues to see farm consolidation.

Land conversion: Washington has seen agricultural acreage reduced by 50% since 1970, with population growth driving conversion to commercial, industrial, and residential uses, especially along major interstates and highways. During that same period, the population of Washington grew from 3.6 million to just over 8.1 million people. Under future conditions, Washington could lose as many as 200,000 acres before 2040, with most of the acreage located near existing urban centers in Spokane, Pierce, and Snohomish counties.[9]

Aging transportation network: Washington uses trucks, trains, and barge networks to move crops to their final shipping destination. These systems are older and agriculture struggles with competing interests and needs. There are trade offs that need to be weighed in these infrastructure investments.

Free-market economy: Washington agriculture operates within the larger free-market economy. This limits the ability of policymakers and agency staff to influence who is farming and for how long, as well as what is planted and where.

8 USDA. August 1, 2025. 2025 Cropland Value by State. Online: https://www.nass.usda.gov/Charts_and_Maps/graphics/crop_value_map.pdf

9 Farms under Threat Future Scenarios. Washington 2040. American Farmland Trust. Online: FUT2040_WA.pdf

Overview of Washington agriculture

In 2024, Washington State agriculture had a production value of $12.9 billion.[10] Over the past five years, Washington's production value has fluctuated slightly but remained above $10 billion each year. Washington ranks first in the nation in the production of apples, blueberries, sweet cherries, hops, shellfish, and spearmint oil. Washington's top ten commodities are listed in Figure 1[11].

Washington agriculture covers over 7.7 million acres of working farmland, not including pasture, and over 300,000 acres of aquatic habitat (for shellfish production).[12] What crops are grown and where depends largely on climate, access to irrigation, and proximity to major transportation routes and markets. This is made apparent by Figure 2, which depicts the location and type of agricultural production throughout the state.

Figure 1: Washington's Top Ten Agricultural Commodities: 2023 – 2024

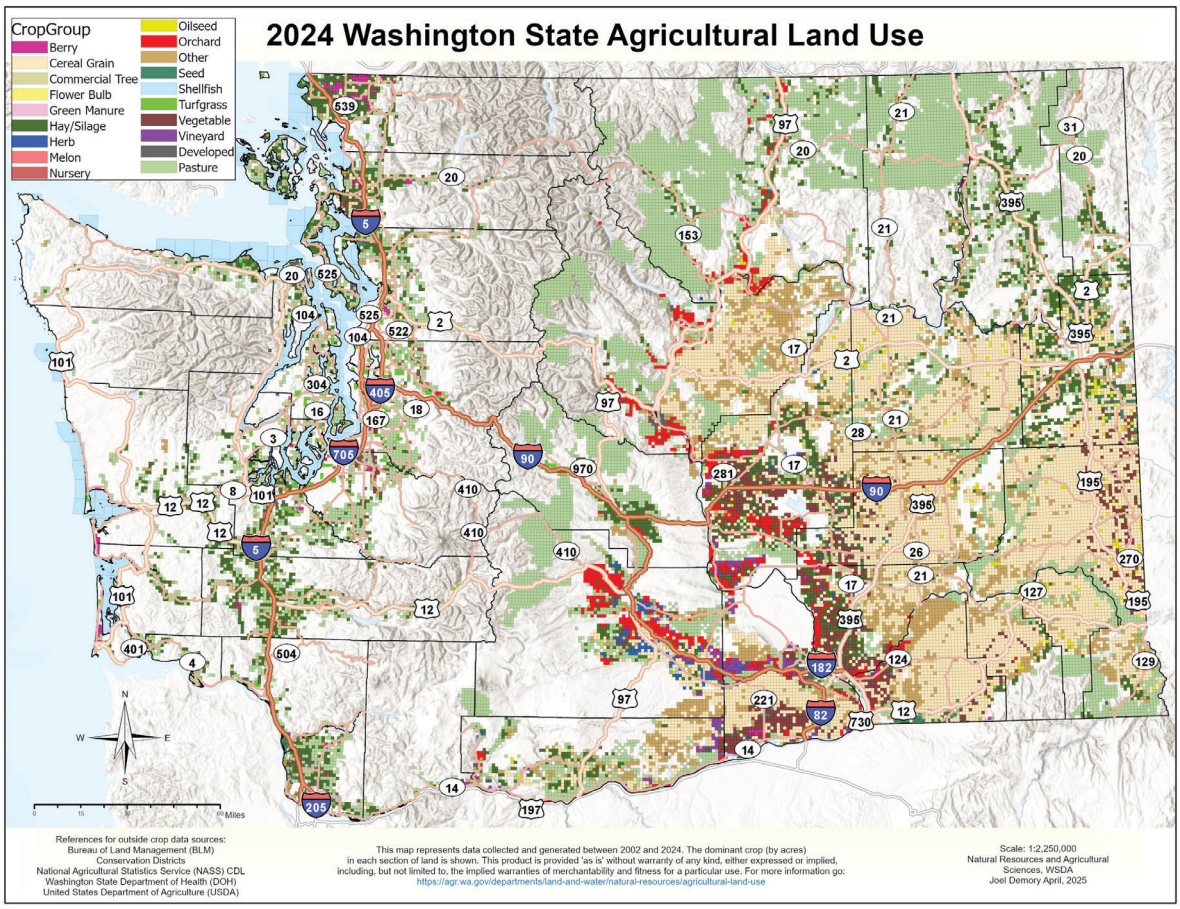
Commodity	Value of Production 2024 (1,000 dollars)	Value of Production 2023 (1,000 dollars)	Change 2024/2023 (%)
Apples	1,954,524	1,821,890	7%
Cattle and Calves	1,573,751	1,330,054	18%
Milk[1]	1,468,280	1,332,578	10%
Potatoes	1,028,456	1,160,712	-11%
Wheat, all	747,103	672,207	11%
Onions, all	476,785	445,889	7%
Hay, all	474,280	808,480	-41%
Eggs	463,506	402,471	15%
Cherries, sweet	434,794	289,983	50%
Hops	320,671	405,767	-21%
Value of production	7,655,533	7,664,572	-0.1%
Value of livestock production	4,899,691	4,388,613	12%
Farm-related income[2]	365,679	1,892,870	-81%
Total value of production, all commodities	12,920,903	13,946,055	-7%

1. Value at average returns per 100 pounds of milk in combined marketing of milk and cream plus value of milk used for home consumption and milk fed to calves.
2. Includes forest service products sold and other farm-related sources of income published in USDA Economic Research Service's Farm Income and Wealth Data.

SOURCE: United States Department of Agriculture, National Agricultural Statistics Service

10 Production value refers to the total dollar value of goods produced on farm each year, including income from sales, inventory, goods not sold and other income sources (e.g. value-added goods and rent).
11 USDA-NASS. December 2, 2025.
12 Washington State Department of Agriculture. 2025. Agricultural Land Use. Online: https://agr.wa.gov/departments/land-and-water/natural-resources/agricultural-land-use

Figure 2: Washington State Agricultural Land Use in 2024



Data Source. Washington State Department of Agriculture. Cropland Data Layer.

There are approximately 32,076 farms in Washington State; 94% of these farms are considered "family farms."[13] The average farm size in Washington is 432 acres, though more than 60% of the farms in Washington are less than 50 acres. Great diversity exists in the size of farms depending on the crop grown, location, and marketing avenues for a given crop.[14] Figure 3 provides insight into the number of farms by county.[15]

13 According to the USDA, a family farm is defined as any farm where the majority of the business is owned by the operator and individuals related to the operator.
14 USDA-NASS. Table 1: Historical Highlights: 2022 and Earlier Census Years. Online: https://www.nass.usda.gov/Publications/AgCensus/2022/Full_Report/Volume_1,_Chapter_1_State_Level/Washington/st53_1_001_001.pdf
15 USDA-NASS. 2024. Census of Agriculture. Table 1: County Summary Highlights: 2022. Online: https://www.nass.usda.gov/Publications/AgCensus/2022/Full_Report/Volume_1,_Chapter_2_County_Level/Washington/st53_2_001_001.pdf

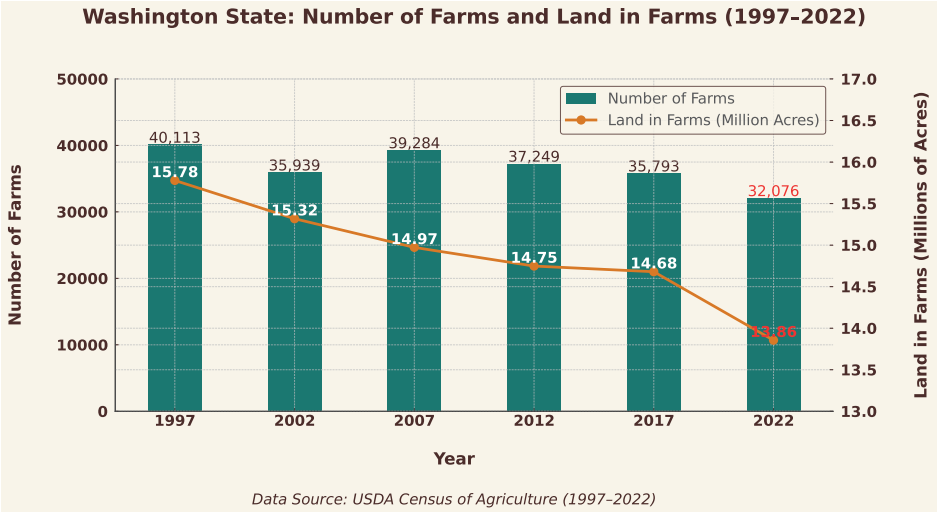
Figure 3: Number of Farms by County



Source: USDA-NASS. Agricultural Census 2024.

Between 2002 and 2022, the number of farms in Washington decreased 10.7% and the average size of farms increased by 5.4% (See Figure 4). The total farmland acreage in Washington decreased by 10% during the same period.

Figure 4: Farm Acreage and Number of Farms Over Time



There are approximately 60,453 producers in Washington State. The average age is 59.3 years old, with an average of 23.1 years of agricultural experience. Over 40% of Washington producers have worked on their current farm for more than 10 years.[16] The trend of an experienced and aging demographic is consistent with national averages.

16 USDA-NASS. Table 52. Selected Producer Characteristics: 2022 and 2017. Online: https://www.nass.usda.gov/Publications/AgCensus/2022/Full_Report/Volume_1,_Chapter_1_State_Level/Washington/st53_1_052_052.pdf

STRENGTHS: WASHINGTON AGRICULTURE

Washington's diverse geography, climate, abundant natural resources, built infrastructure and unique agricultural businesses are what makes Washington agriculture resilient. Farming, ranching, and food processing form the base for many rural economies in Washington, providing access to living-wage jobs in these communities. Agriculture provides over 164,000 jobs in the agriculture and food processing industry alone.[17] Agriculture also brings tax revenue into the state, with food and beverage processing generating over $26 billion in taxable gross business income in 2024.[18]

Washington's agricultural strength lies in its geographic and climatic diversity, export capacity, and robust infrastructure.

Agriculture supports over 164,000 jobs and generates billions in taxable business income statewide.

Agriculture can be found in every county in the state, providing value to Washingtonians in the form of healthy and nutritious food, jobs, and dollars into the state. A more detailed overview of Washington's strengths are detailed below:

Geographic and climatic advantages: Washington is geographically and climatically diverse, enabling its agricultural producers to grow over 300 commodities, many of which are high-valued and cannot be grown elsewhere. For example, Washington producers lead the nation in the production of several commodities including tree fruit, hops, and shellfish — all of which thrive due to the state's unique climate and geography. Currently, Washington ranks second nationally for organic commodity sales, growing 89% of the nation's organic apples.

Production practices across the state differ vastly due to precipitation and the availability of surface water, soil, regional climates, and more. Precipitation varies from the high rainfall zones (100+ inches of precipitation per year) of western Washington to the dry east side of the state (10 to 30 inches of precipitation per year).[19] Washington's houses ten of the twelve major soil orders and fourteen distinct climates exist in Washington.[20,21] This diversity allows producers to specialize in the production of certain commodities, bringing dollars into the state and distinguishing Washington producers from others in the nation and world. In addition, geographic

17 Community Attributes Inc. January 2015. Washington State Agriculture & Food Processing Economic/Fiscal Impact Study.
18 Department of Revenue. Quarterly Business Review Calendar Year 2024. Table 1 – Total Gross Business Income by Industry. Online: https://dor.wa.gov/about/statistics-reports/quarterly-business-reviews/quarterly-business-review-calendar-year-2024
19 PRISM. Northwest Alliance for Computational Science and Engineering. Average Annual Precipitation for Washington (1991-2020). Online: https://prism.oregonstate.edu/projects/gallery_view.php?state=WA
20 Hipple, Karl W. Washington Soil Atlas. USDA-NRCS. Online: https://www.nrcs.usda.gov/sites/default/files/2022-09/Washington%20Soil%20Atlas.pdf
21 Staudmeyer, Haley. Climate Classification of Washington State. Washington State Climate Office. April 8, 2022. Online: https://climate.uw.edu/2022/04/08/climate-classification-of-washington-state/

diversity reduces localized shocks in the case of extreme weather events, where disruptions rarely hit all regions equally. Therefore, losses in one area do not automatically translate into a statewide contraction.

Geographic and climatic diversity help foster state-wide resilience, especially on-farm resilience, helping to reduce risk during an economic downturn. When certain crops fail, or prices fall for one group, others may hold or even strengthen due to different demand drivers.

Unique farms and food businesses: People from all walks of life grow crops and raise livestock in Washington and their businesses create the unique fabric that makes up Washington's agriculture industry. The vast assortment of farms and food businesses in Washington is astounding. Farms and ranches in Washington range from very small in size (1 – 2 acres) to large (thousands of acres). Some farmers grow a single crop while others grow more than a dozen. Many producers sell commodities on contract to food packers and processors while others sell direct-to-consumer, provide product for schools or support food security through donations to hunger relief organizations. The people who grow food in Washington range from new and beginning farmers to veterans and multi-generational families. These people have unique businesses, some selling value-added products and services along with agricultural commodities. Washington agriculture is resilient because of the state's diversity in farms, ranches and food businesses.

Natural resource advantages: Washington's geography, fertile soil and varied climate are conducive to some of the best growing regions in the world. These regions range from the Skagit Valley, which is one of the top growing regions in the nation for tulips, berries and specialty potatoes, to the Columbia Basin which is the second largest potato producing region in the U.S. (behind Idaho).



In addition to growing regions, Washington's location on the Pacific Ocean coupled with the Columbia-Snake River inland waterways makes Washington a key exporter of both Washington grown crops and crops grown in other parts of the nation. Over $19 billion in agricultural products were moved through Washington ports in 2024. Of those products, approximately $7.64 billion was Washington grown or processed food and agricultural products.[22] Agricultural exports support Washington's farms and ranches by bringing dollars into the state, contributing to Washington's economy. Figure 5 provides insight into Washington's top export markets.

Figure 5: Washington's Top Export Markets (2024)

Country	2024 Export Value	Top Commodities
Canada	$1.37 Billion	Seafood, apples, cherries
Japan	$1.12 Billion	Frozen potatoes, hay, wheat
Mexico	$908 Million	Apples, frozen potatoes, malt
China	$693 Million	Beef, seafood, hay
South Korea	$508 Million	French fries, hay, wheat

SOURCE: U.S. Census Bureau, Foreign Trade Division via wisertrade.org

Built infrastructure and networks: Washington agriculture is resilient because of federal and state supported infrastructure which enables agricultural production, processing and shipping. This infrastructure includes federally funded irrigation projects which have transformed otherwise arid landscapes into some of the most productive growing regions in the world (e.g. the Yakima Valley and the Columbia Basin). This infrastructure also includes the lock and dam system on the Columbia and Snake Rivers which allow barges to transport wheat, fuel and commodities from other regions. Hydropower produced on these river systems provide affordable electricity to rural residents including agricultural producers who use this electricity to power irrigation pumps. Washington's infrastructure also includes rail and road transportation corridors which make moving goods to and from all corners of Washington possible.

Washington agriculture is also resilient because of the "soft infrastructure" composed of technical assistance networks, Washington's land grant university (WSU) and nonprofits which fulfill research needs, and commodity organizations which support agricultural producers. These networks enable everything from business support and market expansion to research and development to ensure Washington's agricultural producers can produce some of the highest valued, and highest quality, crops in the world.

22 Washington State Department of Agriculture. May 2025. Washington Agriculture, A Global Impact. Online: https://cms.agr.wa.gov/WSDAKentico/Documents/Pubs/AGR5-2505-003-GlobalImpactExportInfographic.pdf?_gl=1*ddoibd*_ga*MTIwODc2OTg2OC4xNjU4NTI4NjEw*_ga_9JCK8SVQPE*czE3NjQ2MjI3MDIkbzE1NCRnMSR0MTc2NDYyMzA1OCRqMzMkbDAkaDA.

WEAKNESSES: WASHINGTON AGRICULTURE

Washington agriculture possesses several weaknesses which threaten the viability of farms, ranches, and agribusinesses in the state. Impacts to agricultural viability ultimately trickle down, impacting the livelihood of countless rural communities, residents who rely on Washington agriculture for healthy and nutritious food, and Washington's ecosystem. These weaknesses are outlined in the following sections.

Input costs and business environment

The cost to grow, store, ship, and sell agricultural commodities has steadily increased over time. This is particularly true in Washington where agricultural producers generally utilize more inputs towards production of their agricultural products than producers in other states and regions. This is due to the complex demands of the specialty crops which are found in Washington.

According to USDA Economic Research Service (ERS) Farm Income and Wealth Statistic Data, as of 2024, Washington ranked eighth in the nation for total agricultural production expenses.[23] During the same period, Washington ranked forty-second in the nation for net farm income.[24,25] The same data shows that total production expenses have nearly doubled since 2016 (Figure 6). Overall, these data suggest that Washington agricultural producers' profit margins are some of the lowest in the country. Businesses must remain profitable in order to operate. These numbers, coupled with large levels of farmland loss over the past decade, indicate that farms are struggling financially.

Production expenses for Washington producers have nearly doubled since 2016 while net farm income remains among the lowest nationally.

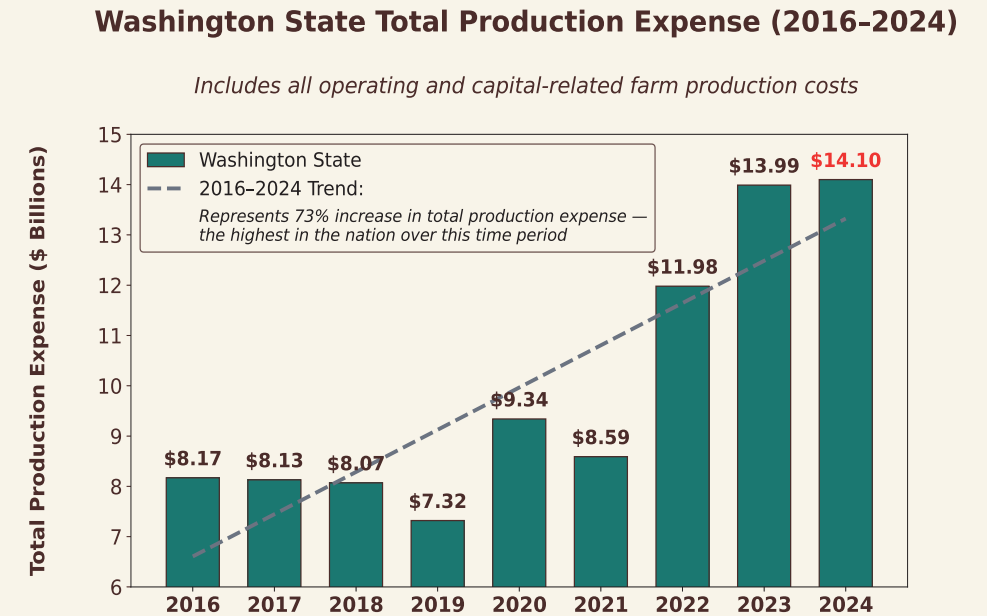
Rising costs, regulatory complexity, and market volatility are constraining farm profitability.

Eighth in the nation for total agricultural production expenses.



23 According to USDA NASS, production expenses are defined as the total cost of all inputs used to produce agricultural commodities.
24 USDA-ERS. Farm Income and Wealth Statistics. Online: https://ers.usda.gov/data-products/farm-income-and-wealth-statistics/charts-and-maps-about-your-state
25 According to USDA NASS, net farm income is defined as the total return to operators after all production expenses have been paid. Net farm income includes cash and noncash income and expenses, it accounts for changes in commodity inventories as well.

Figure 6: Washington State Total Production Expense

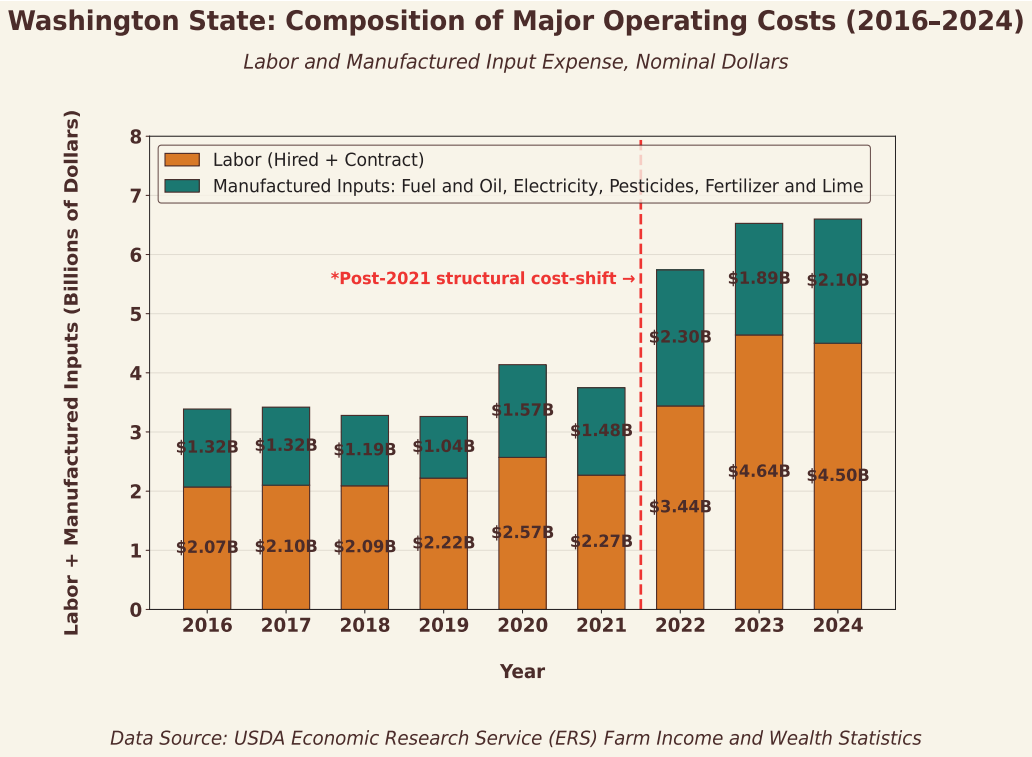


Production expenses for agricultural producers are composed of individual input costs including labor, feed, fuel, fertilizer, maintenance costs, and more. Washington producers are experiencing some of the highest input costs in the nation. Labor expense, defined as the cost to employ workers, is by far the largest input cost for producers, followed by manufactured inputs and feed. Manufactured inputs, which include pesticides, fertilizer, fuels, oils, and electricity, have increased in cost by nearly 60% since 2016.[26] High costs directly correlate with reduced agricultural viability.

Washington ranks second in the nation for fuel costs; this has an impact on farmers through increases in fuel expenses and indirectly through fertilizer costs.[27] Figure 7 depicts changes in labor costs and manufactured input costs over time in Washington. Input costs have dramatically increased, notably since the COVID-19 pandemic.

26 USDA-ERS. 2025. Farm Income and Wealth Statistics. Online: https://www.ers.usda.gov/data-products/farm-income-and-wealth-statistics/charts-and-maps-about-your-state
27 NCSL. State Minimum Wage Summary. Online: https://www.ncsl.org/labor-and-employment/state-minimum-wages

Figure 7: Washington Farm Production Expenses (2016 – 2024)

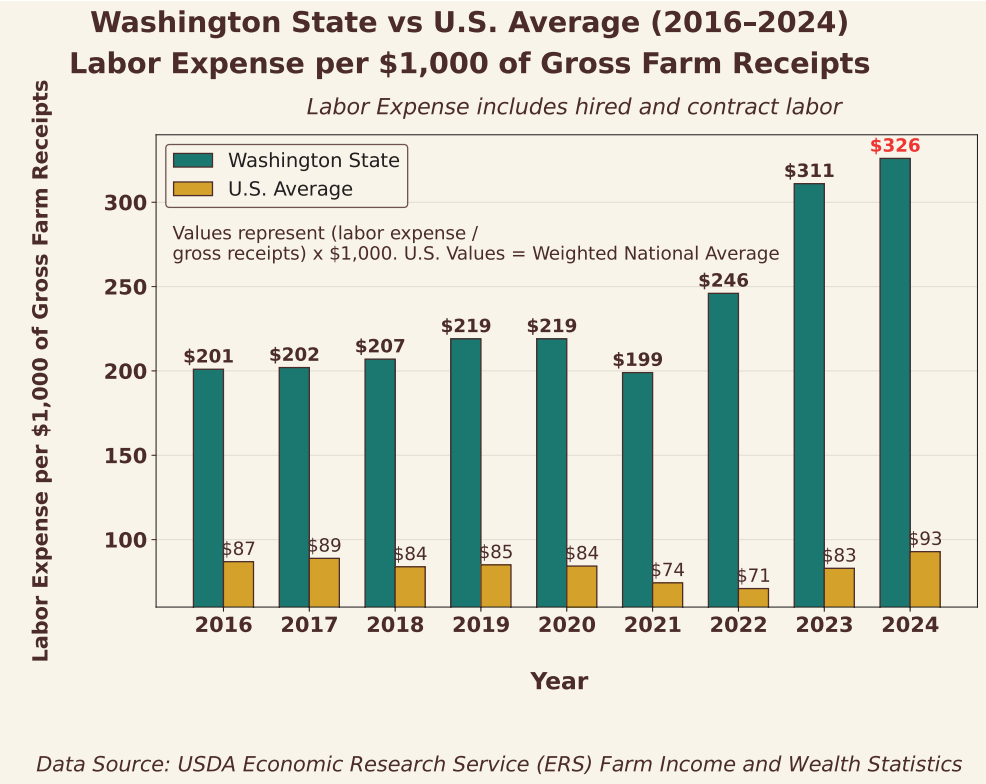


High and increasing input costs coupled with an increasingly complex business environment are limiting the ability of agricultural producers to operate at a sustainable level. Ultimately, this has led to consolidation within the industry as farmers and ranchers struggle to produce quality products while also remaining profitable.

Labor cost: Labor is the single largest production input cost in Washington. Washington has a consistent need for labor that supports high quality and quantity commodity production. As a specialty crop state, Washington has a higher need for workers, which naturally leads to higher labor costs than other states in the country. In 2024, Washington farms accrued a total of over $4.47 billion in labor costs, making up nearly 32% of all production expenses.[28] Between 2016 and 2024, total labor expenses for Washington producers increased by 117%. The average U.S. producer experienced a 51% increase in labor expense during the same time period. Moreover, Washignton agricultural producers experienced a 75% increase in total labor expenses between 2020 and 2024, the average U.S. producer experienced a 41% increase over the same time period.[29] After adjusting for farm revenue, Washington agricultural operators experienced the largest increase in labor costs per dollar of gross receipts (revenue) of any state in the U.S. between 2016 and 2024 (Figure 8).

28 USDA-ERS. 2025. Farm Income and Wealth Statistics. Online: https://www.ers.usda.gov/data-products/farm-income-and-wealth-statistics/charts-and-maps-about-your-state
29 USDA NASS QuickStats

Figure 8: Washington State Labor Expense



Data Source: USDA Economic Research Service (ERS) Farm Income and Wealth Statistics

Labor costs tend to be highly dependent on crop and farm type (e.g. how many employees are hired, farm size, and location). Some commodities, such as tree fruit, are particularly impacted by increasing labor costs. For example, in 2023 labor accounted for 99% of the average apple producer's return per bin.[30] Such high costs are unsustainable. These costs are shrinking margins and ultimately limiting profitability.

Increased costs associated with labor management and reporting, as well as rising minimum wages, have driven this dramatic increase. This trend is expected to worsen over time as minimum wage rates are expected to increase, subsequently impacting overtime hours and the total cost of labor.

In 2026, Washington's minimum wage will rise another 2.8%, from $16.66 to $17.13 per hour. Washington has one of the highest minimum wages in the nation and it is also one of three states in the nation that requires agricultural employees receive overtime pay.

Labor is the single largest production expense in Washington agriculture, increasing 117% between 2016 and 2024.

After adjusting for revenue, Washington producers experienced the largest labor cost increase in the nation.

30 Johnson, Jared and Kate Prengaman. December 2024. A new look at labor costs for apple growers. Online: https://goodfruit.com/a-new-look-at-labor-costs-for-apple-growers/

The total cost of labor encompasses far more than minimum wages and overtime laws; it includes the cost of L&I insurance, unemployment tax, workers compensation, and compliance. Increasingly complex and costly labor requirements are eroding producer profits. Washington producers are particularly vulnerable to variations in labor costs, in particular, tree fruit producers, due to the high percentage of crops that require manual labor (versus mechanical options).

Business environment: Tariffs, trade tensions, regulatory burdens, increased costs, and supply chain disruptions, among other factors, have increased the risk and reduced the viability of agricultural operations. Uncertainty around tariff policies has led to increased risk resulting in businesses contracting investments and re-ordering supply chains. The increased complexity of regulatory compliance (i.e. worker protection, food safety, etc.) has increased the time and cost associated with producing and selling agricultural goods. Disruptions within the food system further exasperate producer hardship, an example being the COVID-19 pandemic, where supply chain infrastructure was not equipped to accommodate changes in sales outlets resulting in reduced viability. For example, repackaging product to accomodate bulk sales as opposed to commercial grocery sales was a challenge.

Today, only 44% of Washington producers cite farming as their primary occupation — a testimony to the challenges of earning a living wage via agriculture. Many producers are working secondary, off-farm jobs to help shield themselves from the volatility found in agricultural markets today. Furthermore, most agricultural producers are price-takers, meaning they have very little influence over the price at which they sell their crop or commodity. As a result, producers typically aim to minimize input costs. Rising input costs, coupled with deteriorating commodity prices, are quickly reducing producer viability.



Additionally, producers are often at the whim of "the middleman" — i.e. packers, shippers, suppliers, and transporters to remain viable. They have little influence over the supply chain itself, making them particularly vulnerable to even the smallest changes in the cost of transportation, fuel, fertilizer, feed, and other input costs. As a result, many operations have become vertically integrated to help reduce their operation's exposure to supply chain uncertainty.

When the agricultural economy enters a slump, such as in 2025, producers have few sales alternatives. In the wine grape industry, for example, tonnage decreased from 152,000+ tons in 2024 to nearly 110,000 tons in 2025 — which is equivalent to pre-2001 levels of wine grape production.[31] These numbers represent a major contraction

31 Correspondence with the Washington State Wine Commission. November 2025.

within the wine grape industry. Overreliance on contracts with specific purchasers, and the inability to pivot due to few alternative sales outlets, reduces the resilience of Washington's agricultural industry.

Losses in income and a challenging business environment have contributed to consolidation within the agricultural industry. Though businesses naturally consolidate to remain competitive, too much consolidation can lead to reduced efficiency, reduced innovation, and lack of productivity. Consolidation can also lead to losses in local and rural economies, increased barriers to entry for young, underrepresented, and beginning farmers, and increased risk associated with consolidated supply chains. Consolidation, especially in Washington's dairy and specialty crop sectors, is a long-run trend which is likely to continue, and even increase, as Washington's agricultural industry faces new and persistent challenges.

Trade challenges

International trade is a vital component of Washington's agricultural industry. As such, any disruption, change in policy, or change in regulation has a large impact on farmers, ranchers, and export businesses. Washington is facing several challenges. Some are historical, while others are developing as political tensions and trade policy evolve. Some of these challenges are highlighted below:

Tariff and non-tariff trade barriers: Washington agriculture exports are affected by numerous trade barriers restricting access of U.S. agricultural products to a variety of countries. These barriers range from tariffs, which can make our products prohibitively expensive, to non-tariff trade barriers including import restrictions and overly complicated regulations that prohibit product entry for protectionist purposes.

Trade uncertainty: In recent years, trade has not been a demonstrated federal priority, and policies that addressed trade barriers to U.S. agriculture were lacking. Recently, trade has become a high federal priority, with long-standing trade policies and relationships in flux. While new opportunities may result, the continually shifting trade climate can make it challenging for Washington's agricultural exporters to plan and execute market strategies and can make trading partners hesitant to enter new business relationships.

Supply chain risks: Lessons learned during the Covid-19 pandemic related to reducing port congestion and adding capacity continue to be implemented and will help mitigate large-scale, catastrophic supply chain disruptions in the future.

Washington agriculture is highly dependent on international trade and vulnerable to tariff volatility and policy uncertainty.

Price disadvantages and supply chain risks further limit export competitiveness.

However, there are several threats that continue to face Washington's agricultural export supply chain, including port development pressures and necessary improvements to freight corridors.

Price disadvantage: In addition to the tariffs that are being applied to U.S. agriculture exports, Washington agricultural products are typically already more expensive than products from countries with less effective quality controls and lower production costs. The strength of the U.S. dollar, and transportation costs are additional variables outside the exporter's control and can result in a higher price point.

Workforce and labor availability

Retention of the agricultural workforce is perhaps one of the most pressing challenges to Washington agriculture. Not only are producers aging out of the workforce, but the domestic workforce is shrinking and access to the non-domestic workforce is growing in complexity.

As of 2024, there were roughly 87,911 domestic farm workers employed on farms, though this number fluctuates greatly depending on the time of year.[32] This number does not include the thousands of full-time and seasonal farm workers employed in fruit packing, food processing, or meat packing.

The appeal of working outside, in sometimes harsh conditions and for long hours, has long lost its luster as modern convenience has given way to comfortable, living-wage jobs. The number of domestic agricultural producers in Washington has decreased over time as the current population retires and the barriers to begin, inherit, or buy a farm or ranch increase. The seasonal availability of farm workers has also decreased over time, leading to the increased use in the federal guest worker program (the H-2A guestworker program).

Washington's agricultural workforce is aging, with fewer than 6.5% of producers under the age of 35.

As domestic labor availability declines, reliance on the H-2A guestworker program has increased by 465% since 2013.

In 2024, Washington State was the fourth largest user of the H-2A guestworker program with 35,884 guestworker certifications.[33] Washington's H-2A usage is growing at a faster rate than the national average, as domestic farm worker availability has decreased, and the timing and intensity of crop harvest has increased. Washington producers are more dependent on the H-2A guestworker program than producers in other states due to the high labor needs of specialty crops.

32 ESD. Agricultural Employment and Wages. Online: https://esd.wa.gov/jobs-and-training/labor-market-information/employment-and-wages/agricultural-employment-and-wages
33 U.S. DOL. Office of Foreign Labor Certification. H-2A Temporary Agricultural Program – Selected Statistics, Fiscal Year (FY) 2024. Online: https://www.dol.gov/sites/dolgov/files/ETA/oflc/pdfs/H-2A_Selected_Statistics_FY2024_Q4.pdf

Coupled with increasing farm labor costs, the agricultural industry is struggling to hire and retain a workforce. The challenges associated with Washington's workforce are elaborated upon below:

Aging of the agricultural workforce: There are approximately 60,453 producers in Washington State, with roughly two-thirds of those producers being fifty-five years or older. Less than 6.5% of producers are considered "young producers" (less than 35 years old).[34] Producers in Washington are aging at a rate faster than the replacement workforce. The same is true for farm workers. Between 2000 and 2020, there was a 32% increase in the average age of farm workers in the U.S.[35] High barriers to entry and small profit margins discourage the next generation of farmers, ranchers, and farm workers. This raises the question: what happens to Washington's farms and food security if no one replaces aging farmers, ranchers, and farm workers?

Seasonal in nature: Agricultural workforce employment fluctuates throughout the year as crops mature. In 2024, the agricultural workforce nearly doubled in six months, growing from about 67,000 to just over 120,000 employees between January and July.[36] The seasonal nature of agricultural work lends itself to challenges. For instance, as farm worker families settle over time, there is decreased interest in part-time and migratory work. Agriculture in the U.S. has traditionally relied on migratory farm labor in the form of workers who travel from their winter homes to follow available work. This typically involves workers who travel from California and Oregon following crops that mature later in Washington such as cherries, apples, grapes, and hops. Migration patterns of domestic farm workers have slowed dramatically over the last twenty years as fewer farm workers enter the U.S., and those that remain encourage their children to settle in one place and pursue year-round jobs.

Loss of the domestic workforce and increased H-2A usage: H-2A usage in Washington has increased dramatically over the past two decades because of domestic worker shortages. Since 2013, H-2A usage has increased by 465% in Washington.[37] Competition between crops has driven many producers to hire H-2A guestworkers primarily during peak harvest season.

Though it is more expensive to utilize the H-2A program, a declining domestic workforce makes it necessary for operators to do so. Beyond the cost to apply and manage an H-2A certification, growers are required to provide job-specific wages, free housing, and transportation. Growers also spend time and money training and

34 USDA-NASS. Table 52. Selected Producer Characteristics: 2022 and 2017. Online: https://www.nass.usda.gov/Publications/AgCensus/2022/Full_Report/Volume_1,_Chapter_1_State_Level/Washington/st53_1_052_052.pdf
35 DOL. National Agricultural Workers Survey. Farm Labor. Table 1. National Demographics. Online: https://www.dol.gov/agencies/eta/research/publications
36 ESD. Agricultural employment and wages. Online: https://esd.wa.gov/jobs-and-training/labor-market-information/employment-and-wages/agricultural-employment-and-wages
37 U.S. DOL. Performance Data. Online: https://www.dol.gov/agencies/eta/foreign-labor/performance

managing guestworkers to ensure they understand their job requirements and have a sense of home while living in the U.S. Many producers, often managing small and diversified operations or from historically underserved populations, do not have the time or money to utilize the H-2A program. While the H-2A program is helpful to producers, it is not feasible for small farms and does not solve the issue of a shrinking and costly domestic workforce for most of Washington's farmers and ranchers.

The mental health costs of farming and ranching

In 2025, WSDA in conjunction with lawmakers, WSU Extension, public health partners, and industry stakeholders, published the Washington State report on Mental Health & Suicide Prevention for Agricultural Producers and Workers. The study found that agricultural producers and workers encounter significant mental health challenges due to economic instability, unpredictable markets, and complex regulatory environments. The growing challenges within Washington's agricultural industry are increasing mental health stressors.

These stressors increase suicide risk and interact with systemic barriers that limit access to mental health care. High service costs, long travel distances, and persistent stigma frequently deter individuals in agricultural communities from seeking treatment. When treatment is accessed, a shortage of rural mental health professionals with agricultural expertise often diminishes the effectiveness of care. This workforce shortage is compounded by a fragmented behavioral health system in which crisis lines, state agencies, and local health networks often lack coordination. As a result, individuals experience inconsistent services, unreliable referrals, and critical gaps in care during periods of acute need. The mental health cost of farming and ranching exhibits a great burden on Washington's agricultural industry.

Economic instability, regulatory pressure, and workforce challenges are increasing mental health stressors for producers and farm workers.

Limited access to rural behavioral health services compounds these risks.

Land cost, availability, and urban encroachment

Washington State has some of the highest per acre costs for farmland in the nation. This is due to many circumstances, including but not limited to, high soil quality, specialty crop values, proximity to markets, urban encroachment, competing land use interests, and water availability.

In certain areas, cost pressures come from within the agricultural community. Increased demand for land is consistently found across all Washington counties. For instance, there is a shared interest among agricultural producers in maximizing production value through the conversion to high-value perennial crops such as berries, tree fruit, and wine grapes. In other areas, pressure comes from proximity to popular vacation areas, such as near the Columbia, Yakima, Wenatchee, Skagit, Chehalis, and Nooksack Rivers. In addition, pressure exists near Lake Chelan, Roosevelt, and Osoyoos. This also includes areas near Washington's three national parks: Olympic, Mount Rainier, and North Cascades. In some counties, agricultural land never makes it to the market making it difficult for those new to agriculture to access land.

Farmland prices and development pressure continue to limit access to agricultural land, particularly near urban centers.

Competing land uses, including clean energy development, pose additional challenges to long-term agricultural production.

Places like Skagit County have strict land use regulations to protect working farmland and prevent sprawl. All Washington counties are protected with Right-to-Farm ordinances that do not stop encroachment but provide protection for farmers who were there first. Despite this, there continues to be conflict between relocated urban residents and agricultural producers. Development pressure drives acreage prices higher, sometimes putting that acreage out of reach for continued agricultural production. Washington relies on the Growth Management Act (GMA) to direct cities and counties on how to preserve and protect agricultural land. As the GMA is administered at the county level, there are 39 separate approaches to enforcement, making it difficult for landowners whose properties do not fit within political borders.

Finally, a significant push towards clean energy, particularly wind and solar, creates additional land use competition, especially in eastern and central Washington where holdings are larger and sunlight is abundant.

Urban-rural divide

The urban-rural divide refers to the growing disparities in the economic drivers, politics, and social aspects of urban and rural Washington. As of 2020, over 83% of Washington's population was considered urban and just over 16% considered rural.[38] Less than 1% of Washington's residents are directly involved in agriculture.

These disparities, coupled with losses in farms and farmland, create a disconnect between urban consumers and rural agricultural producers. As the number of farms and people working in agriculture dwindles, connection to and understanding of agriculture dwindles. A recent study by the University of Minnesota surveyed consumers and found that only 24% strongly trust information about where their food is grown.[39] Most consumers do not have a favorable impression of agriculture or food production.

This lack of trust and understanding leads to misconceptions for both the consumer and the producer. It is in the public's interest to increase understanding of the food system and create an environment that supports farmers and ranchers while also ensuring that crops and livestock are produced in a way consistent with consumer desires.

More than 83% of Washington's population is urban, while less than 1% is directly involved in agriculture.

This growing disconnect contributes to misunderstanding and policy decisions that can undermine farm viability.

There are many opportunities within the food system to connect urban residents with rural food production. This would improve agricultural viability in the state and better support Washington's food system.



38 University of Minnesota. March 3, 2022. Bridging the food trust gap. Online: https://cfans.umn.edu/news/bridging-food-trust-gap

Clean energy

The development of renewable energy is a key Washington policy priority; renewable energy will be critical for meeting state greenhouse gas reduction targets. Clean energy development, including solar, wind, and biogas, presents both opportunities and challenges for Washington agriculture. Understanding the risk associated with clean energy integration is essential to ensure development supports farm viability, sustainability, and equity. Below is a summary of the risks that Washington energy policy and technology pose to Washington agriculture.

Land-use conflicts and crop displacement: Large-scale solar arrays, wind turbines, and bioenergy infrastructure can reduce the acreage available for crops, pastures, or orchards, and exacerbate tradeoffs between Tribes, agriculture, and wildlife conservation. Even small installations can fragment fields, complicate machinery access, and limit crop rotation options. These challenges are particularly pronounced in regions such as the Columbia Basin and the Yakima Valley where optimal land is highly productive but limited.

Soil, water, and operational impacts: Construction activities, heavy equipment traffic, and new access roads can compact soils, alter drainage, and increase erosion risk. Impermeable surfaces associated with solar or wind infrastructure may affect irrigation efficiency or runoff patterns. In livestock operations, construction dust, noise, and activity can stress animals. Wind turbines can slightly alter local microclimates, potentially affecting frost-sensitive crops or causing pollution.



Economic and equity risks: Anaerobic digesters, which convert manure into biogas, require substantial capital investment, large herd sizes, and access to utility interconnection. This limits participation to very large operations, potentially exacerbating existing farm consolidation trends, and reducing opportunities for small and medium producers. In cropland, leasing land for solar or wind can provide supplemental income but may inadvertently reduce the long-term availability or quality of agricultural land.

Regulatory and permitting challenges: Washington farms must navigate local zoning, Growth Management Act requirements, utility interconnection, and environmental reviews. Delays or disputes over easements, compensation, or utility access can interfere with operational schedules and increase farm administrative burden.

Challenges in scalability and agricultural suitability: The adoption of emerging technologies is continually hindered by lack of scalability and lack of agricultural suitability. This is especially true for agrivoltaics systems – i.e. those in which solar arrays are installed on farmland but continue to allow for concurrent crop production. Success of these systems depends on a highly specific fit-for-purpose design coupled with an ideal climate, irrigation, and cropping patterns.

Clean energy development presents both opportunities and risks for Washington agriculture.

Without careful planning, renewable energy projects may exacerbate land-use conflicts and consolidation pressures.

The production of on-farm renewable energy holds great promise for diversifying farm income streams while supporting state climate targets. However, these systems are not without tangible risks to Washington agriculture. Careful planning, regional policy awareness, and equitable incentive structures are critical to optimizing potential benefits while mitigating impacts on farm productivity, consolidation, and long-term sustainability.

Climatic changes and associated on-farm and off-farm risks

Long-term climatic changes and associated extreme weather events present a myriad of risks to Washington's agricultural operations, rural livelihoods, worker safety, and food production. Agricultural systems in Washington are already experiencing a wide range of climate-driven impacts. Key drivers include rising temperatures (Figure 9), changing precipitation patterns (Figure 10), declining snowpack and shifting water availability (Figure 10), elevated atmospheric CO_2, and an increase in the frequency and intensity of extreme events.

Figure 9: Statewide Observed and Projected Temperature Changes Through 2100[40]

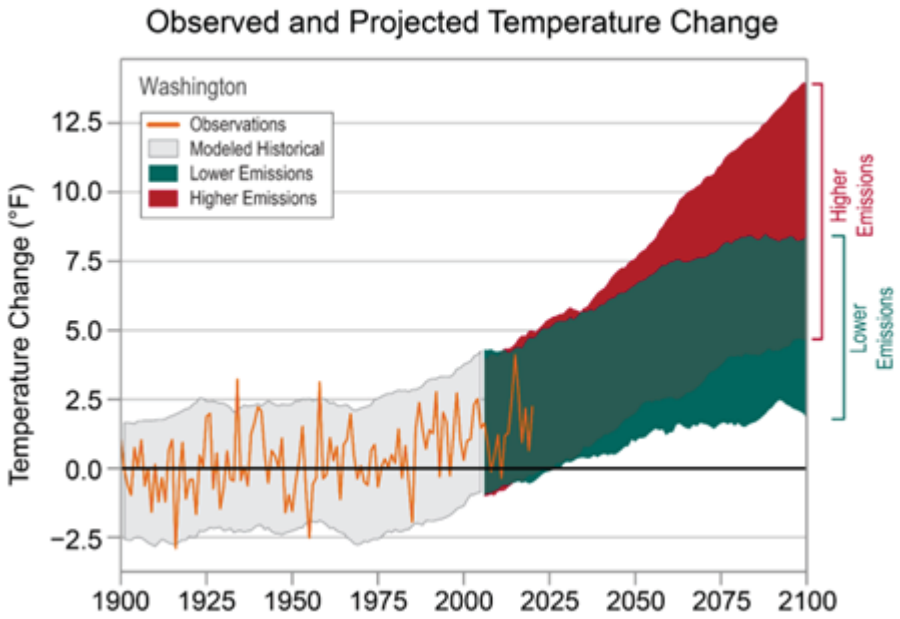
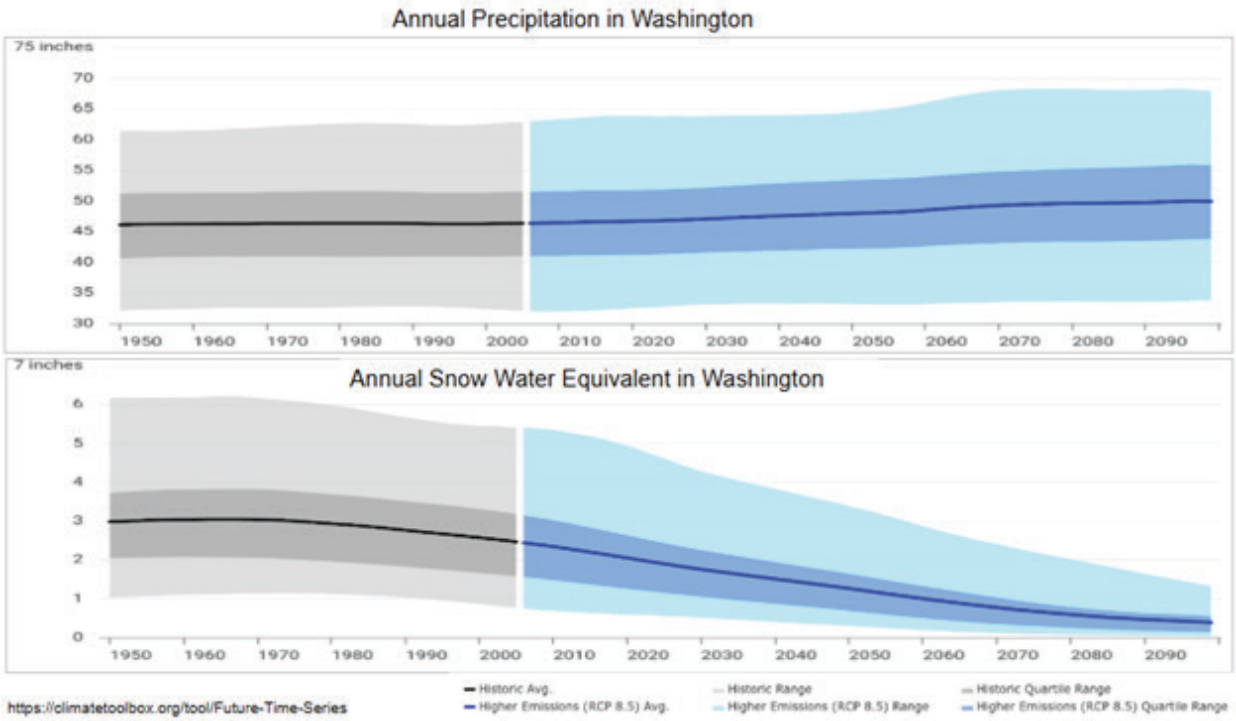


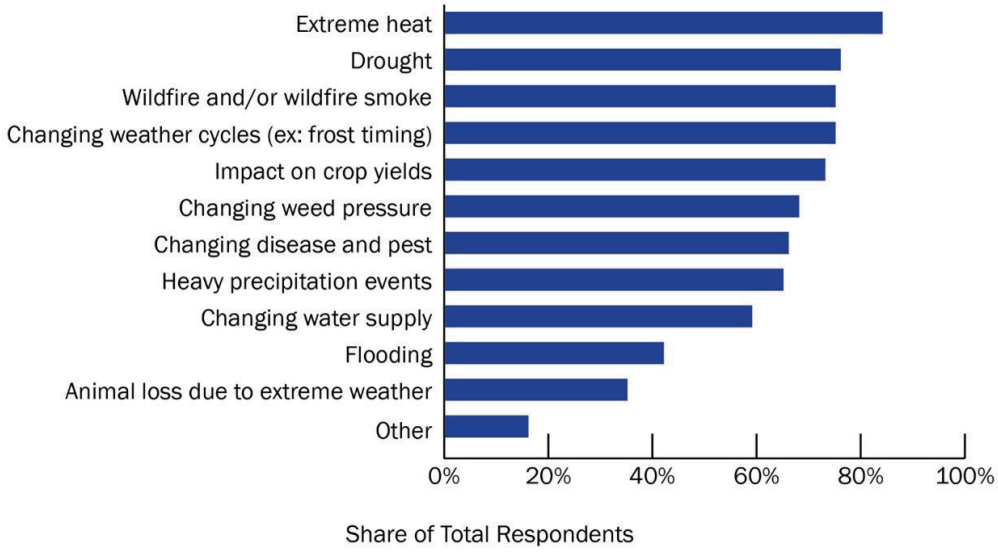
Figure 10: Statewide Observed and Projected Precipitation and Snowpack Changes Through 2100[41]



40 Frankson et al., 2022 in Washington State Enhanced Hazard Mitigation Plan (2023)
41 Adapted from the Climate Toolbox. Online: https://climatetoolbox.org/

In a climate resilience survey issued by WSDA in 2024, over 70% of 292 respondents stated that extreme heat, drought, wildfire and/or smoke, changing weather, and crop yield challenges had impacted their operations in the last five years (Figure 11). In a companion survey, over 95% of 211 farm workers reported being impacted by climate change.[42]

Figure 11: Survey Responses: Producers and Agricultural Stakeholders - Climate Issues Impacting Operations (Last 5 Years) (n=292)



For detailed information about current and future climate change impacts, based on agricultural interviews and from scientific literature, see WSDA's Climate Resilience Plan for Washington Agriculture (2025).

Briefly, on-farm impacts include:

Changes to water supply: Temperature increases and shifting precipitation will change how much, and when, water is available. This will be due to earlier runoff and less late-season flow because of declining snowpack. Irrigators — especially junior water rights holders — will face more shortages. Flooding and stormwater challenges are likely to increase west of the Cascades. Investments in storage and delivery infrastructure will be needed to maintain reliable irrigation and livestock watering systems.

Increased threat to water quality: Increased flooding and heavy rain events can erode soil, increase nutrient and sediment runoff, and degrade drinking water and aquatic habitats. These impacts threaten shellfish safety and harvest timing due to toxin accumulation and algal blooms. Runoff from urban areas may add pollutants, and dairies could face lagoon overflow challenges from higher winter precipitation.

42 WSDA (2025). Climate Resilience Plan for Washington Agriculture. D.L. Gelardi (Ed.). Washington State Department of Agriculture AGR2-2502-003

Increased impacts and losses from extreme events: Extreme temperatures, freezes, and storms increasingly damage crops, livestock, and infrastructure. Heat waves can reduce fruit quality, raise irrigation demand, and cause aquaculture and livestock mortality. Floods and wildfires can devastate farms and rangelands, while insurance programs may become costlier or insufficient to cover rising risks.

Risks to crop and forage quality: Quality issues such as poor apple coloration, smoke-tainted wine grapes, and nutrient loss in forage crops are growing concerns. Heat, drought, and wildfire smoke all reduce crop value and feed quality.

Increased impacts from pests, weeds, and disease: Warmer conditions will favor many pests, weeds, and pathogens, allowing more generations per year and earlier emergence. Beneficial insects and pollinators could also be harmed, compounding yield losses. Higher temperatures and increased wind may reduce pesticide application windows, emphasizing the need for new management approaches.

Increased health risks to the agricultural workforce: Farm workers face greater exposure to extreme heat, wildfire smoke, and zoonotic diseases. By mid-century, eastern Washington could see roughly thirty-five more days per year with dangerous heat levels. New state safety rules require rest and shade, but further support is needed to balance worker protection and productivity.

Rising temperatures, changing precipitation, and increased extreme weather events are already affecting Washington agriculture.

Over 70% of producers and 95% of farm workers report climate-related impacts on operations and livelihoods.

Threat of ocean acidification to aquaculture operations: Acidifying coastal waters are reducing carbonate availability needed for shell formation in shellfish. This threatens bivalve and salmon production and pushes hatcheries toward more controlled environments. The problem is expected to intensify, posing long-term challenges for aquaculture viability.



Increased financial risk for farm workers and small, under-resourced, and socially disadvantaged operators: These groups have fewer resources to adapt and limited access to grants and technical assistance. Heat, smoke, and crop damage can reduce both worker earnings and available work hours. Rising household energy and childcare costs further strain finances, highlighting the inequitable impacts of climate change.

Changing crop suitability: As temperature and water patterns shift, some crops will become less viable while others may expand. Long-term planning requires more research and resources on drought- and heat-tolerant crops and on-farm resilience strategies.

Off-farm impacts include:

Increased threats to transportation and utility infrastructure: Extreme weather, wildfires, and floods threaten roads, ports, and electrical systems that agriculture depends on. Disruptions can delay perishable shipments, damage shellfish broodstock in transit, and raise input costs. Wildfire-related power shutoffs can halt irrigation, feeding, and cooling operations, ultimately leading to product losses and reduced farm income.

Increased regulatory costs, risks, and market volatility: Climate-related global disruptions can drive up input and commodity costs, while new emissions and environmental regulations may raise compliance burdens. Together, these pressures heighten uncertainty and financial risk for farms

Lack of climate resilience data, research, technical support, and equipment: In surveys and interviews, producers across Washington have emphasized the shortage of locally relevant research, technical assistance, and reliable forecasts to guide adaptation. Declining Extension capacity and uneven regional access to expertise hinder implementation of resilience practices. Farmers have requested more applied research, outreach staff, and data tools tailored to Washington's varied agricultural regions and stakeholders.



Reductions in extension and land grant university investments

Investment in land grant universities, including Extension, are critical in fostering innovation and growth. For every dollar spent on public research and development, $20 in value is returned to the U.S. economy. Despite this value, federally allocated public research dollars have dropped off precipitously over the past few decades, peaking in 2002 at around $6 billion dollars allocated per year in the U.S. and then dropping off and stagnating at about $4 billion dollars per year. Today's funding is on par with 1970's levels. China's public research dollars now double those of the U.S.[43]

Declining investment in agricultural research, Extension, and infrastructure threatens long-term innovation and resilience.

Producers consistently report the need for more locally relevant data, technical assistance, and applied research.

Decreases in federal funding have a trickle-down effect on state funding. When federal funds decrease, matching state funds also decrease. State funding for Washington State University (WSU), Washington's land grant university, comes from both state funds and student tuition. Declines in federal and state funding coupled with a drop in enrollment have greatly decreased the research dollars allocated to WSU as well as the number of faculty hired within the College of Agricultural, Human, and Natural Resource Sciences (CAHNRS).

Between 2015 and 2023, CAHNRS experienced a 14% decline in faculty as a direct result of state funding reductions. During the same time, WSU Extension faculty decreased by almost 36%.[44] Reductions in state funding have had a direct impact on the faculty hired by WSU for agricultural research. This impacts the quality and quantity of agricultural research produced in Washington and the technical support available to Washington producers.

Transportation and infrastructure

Washington's farmers and ranchers rely on infrastructure including roadways, waterways, irrigation projects and ports to produce, transport and sell products. One of the major contributors to the resilience of Washington's agricultural industry is infrastructure which is historically supported by federal and state appropriations. But, deteriorating budgets, a shifting political climate and a lack of maintenance have threatened critical infrastructure. Several threats pertinent to Washington's infrastructure are outlined below:

43 APLU Board on Agriculture Assembly 2023 Farm Bill Request. 2023. Online: https://www.aplu.org/wp-content/uploads/APLU-RFA-leave-behind.pdf

44 Correspondence with Vicki McCracken and Scot Hulbert. Washington State University. December 2025.

Columbia-Snake River inland waterways: The Columbia Snake River system moves 55% of all U.S. wheat destined for export markets. One barge can move as much as thirty-five rail cars or one hundred and thirty-four 18-wheelers.[45] This system is at risk, as work is done to better balance transportation needs with listed species recovery and other concerns. Unfortunately, no viable transportation alternatives currently exist, as rail is already over-subscribed, and the already degraded, small highway system cannot withstand increased trucking.[46]

Infrastructure ratings: Washington has relatively low infrastructure ratings across its highways, bridges, and other transportation networks. The 2025 Report Card for America's Infrastructure gave Washington State a "C" grade across all components, with roads scoring a "C-", bridges a "C+", and 58 percent of our roads deemed in "fair" or "poor" condition. Without investments in those spaces, Washington's 32,000+ farms will struggle to move crops to domestic markets or international shipping points.[47]

Specific to ports: There are several threats that continue to face Washington's port infrastructure, including those related to non-industrial development pressures and the need for critical roadway improvements. Most recently, the Port of Seattle took legal action against a City of Seattle proposal that would have changed zoning at the Port to include affordable housing. These types of conflicts are ever present, as Washington struggles both with housing quantity and affordability, especially along the I-5 corridor.



45 U.S. Wheat Associates. Facts About U.S. Wheat Exports and the Columbia Snake River System. March 11, 2022. Online: https://uswheat.org/wheatletter/facts-about-u-s-wheat-exports-and-the-columbia-snake-river-system/

46 Washington Office of Superintendent of Public Instruction. Agricultural Education End of Year Report Program Data 2024. Online: https://content.govdelivery.com/attachments/WAOSPI/2024/09/17/file_attachments/3000794/WA%20State%20Ag%20Ed%20Program%20Data%202024%20-%209-15-24.pdf

47 ASCE. Washington 2019 Report Card. Online: https://infrastructurereportcard.org/state-item/washington/

OPPORTUNITIES: WASHINGTON AGRICULTURE

Significant investment in our farmers and ranchers is necessary to support the continued production of high-quality crops and food products. This includes directing resources to support soluble businesses (i.e. reducing the cost of inputs, streamlining regulations, etc.) and developing systems that enhance resilience (e.g. infrastructure investments). Opportunities to support Washington agriculture are outlined in the following sections.

Trade and international markets

Washington's high-quality, diverse products — coupled with the ability to get those products quickly and cheaply to foreign consumers — has always made Washington a desirable agricultural trade partner. However, growing trade uncertainty is quickly eroding Washington's market power abroad. Ensuring that farmers, ranchers, and agribusinesses can export their products both now and into the future is essential to maintaining many of Washington's farms and ranches.

Investments in agricultural trade are quite timely. Standards of living are increasing in developing countries and consumers are becoming more health-conscious and well-traveled. This has increased the demand for Washington's diverse array of products. At the same time, pressure from the federal government has drawn attention to market access disparities and trade barriers affecting U.S. agriculture. This has shed light on opportunities to negotiate resolution of tariff disparities.

Although tariffs, trade disputes, and the response of trade partners are largely out of the control of Washington's Legislature, the Legislature can support programs that enhance trade relationships and Washington's reputation as a producer of quality goods. Investments can also be made to open market avenues and improve export infrastructure. Any actions taken to provide tax relief and reduce costs for exporters are win-win opportunities for Washington agriculture, export businesses, and the state economy. Such opportunities are outlined below:

Support agricultural trade networks: As a robust and trade-driven agricultural state, Washington exporters have access to a network of support resources and export-focused programs. Such resources include export development support and programming from USDA, WSDA, the Western U.S. Agriculture Trade Association (WUSATA), agricultural commodity commissions, industry associations, and other state and national organizations. These programs provide significant trade assistance, continued support at the state and federal level has the potential to significantly impact producers.

Leverage and reinforce Washington's strong reputation for quality: Throughout the world, Washington agriculture products have an excellent reputation for quality. Washington's farmers, fishers, ranchers, and processors are subject to strict safety standards and quality controls. Foreign consumers increasingly demand safe, high-quality products. Programs that ensure quality control already exist and should be supported and enhanced. For example, WSDA manages several programs designed to ensure product safety, verify freedom from pests and diseases, and certify product grades and standards. These safety and quality certifications not only provide required assurance for market entry but are also highly desirable marketing attributes that help Washington products stand out to consumers.



There also exists opportunities to invest in shovel-ready programs, such as the WSDA Washington agricultural product promotion program which is aimed at enhancing the market power of Washington grown products through shared labeling. This program currently lacks funding, but industry analysis and stakeholder support indicates its value.

Invest in port infrastructure: Washington State is well positioned geographically and contains an expansive public port system. Exporters have access to one of the largest container gateways in North America through the Northwest Seaport Alliance. They also have access to a variety of ocean, river, rail, road, and air-freight options. To maintain this advantage and mitigate supply chain disruptions, critical roadway maintenance is required.

Any investment that enhances the efficiency and reliability of the state's infrastructure will positively impact exporters and de facto agricultural producers. There exist opportunities to invest in infrastructure to better prepare ports during large scale disruptions (such as the COVID-19 pandemic), improve access through road, rail, and river, and prioritize development that aligns with port needs. Such opportunities present tangible value to Washington's farms and food systems.

The resilience of Washington's farm and food system are highly dependent on the ability of producers and businesses to export their products. Investments in stable trade relationships, funding for marketing and export assistance, viable businesses and operational export infrastructure can have tangible impacts on Washington's agricultural exporters.

Farm and food system development

Farmers and ranchers are at the center of Washington's food systems and community food security is dependent on their ability to operate efficiently while being able to withstand shocks. Recent events such as the COVID-19 pandemic, inflation and a depressed economy have highlighted areas of weakness within Washington's food system. To build a more resilient Washington, strategic efforts must be made to strengthen existing, and build new, infrastructure, networks, supply chains, and improve communication and coordination from farm to fork. "Right-sized" solutions are built on understanding and meeting farmers and ranchers where they are today. Here are some examples of "right-sized" solutions:

Support land access for the next generation of farmers: As the existing farm population ages, the allure of retiring land to higher paying commercial and residential development has been a cause of farmland conversion and ultimately loss of farmland for the next generation. Incentives for farmland preservation and investments in succession planning can help retain farmland in production and transfer farmland to the next generation of farmers and ranchers. Specifically, there exists opportunities to:

- Support funding for farmland access and farmland transition through investment in succession planning, tax incentives, and publicly owned working lands.
- Utilize and promote land use planning and agricultural lands designations.
- Promote farmland preservation and transition to the next generation, provide agricultural conservation easements and tax relief to landowners.

The next generation of farmers can be supported by policies and investments that aid in retaining working farmland while also opening pathways for farmland transition.

Invest in the "right sized" infrastructure: The COVID-19 pandemic highlighted weaknesses in Washington's food system, particularly the lack of "right-sized" infrastructure for the aggregation, processing and distribution of products produced by mid and small-scale farms and food businesses. Reliance on single source providers (i.e. singular vendor, contractor, etc.) and either too expensive or non-existing infrastructure resulted in massive losses to farms and food businesses of all scales during the pandemic.

Since then, there has been a movement to support supply chain diversity through programs such as the WSDA Local Meat Processing Capacity Grant (funding ceased in 2022) as well as the ongoing Local Food System Infrastructure Grant (LFSI) which are focused on investing in the public benefits of cooperative, well-coordinated local food supply chains and market access for Washington's farms, ranches, food processors,

and food distributors. There are ample opportunities to support investments in infrastructure and to reduce barriers to the public-private development of critical food system infrastructure. Doing so can foster statewide food system resilience and improve food access for vulnerable people.

Invest in technical assistance: Farms and food businesses operate within a complex, multi-jurisdictional regulatory environment that requires product-specific subject matter expertise and place-based technical assistance. State-supported technical assistance for producers and processors is critical but is often lacking (due to funding) or not comprehensive enough to address the complex needs of farms and food businesses, particularly small and mid-sized farms and food businesses. Technical assistance is often disparate because it is provided by various organizations including university Extension programs, nonprofit organizations and government programs. Incentives for collaboration between service providers and improvement of existing networks can both remove redundancies and create pathways tailored to needs.

Align public procurement and purchasing grants requirements with the needs of producers: Many farms and food businesses struggle to access public dollars due to grant structure (reimbursement based), eligibility criteria, and limited capacity or data. The agricultural community could be better served through improvements in procurement policies and procedures, as well as better alignment of funding cycles based on the agricultural season. Additionally, if the state developed certain processing, distribution and logistics capabilities to manage raw agricultural products, more producers would have opportunities to participate in public procurement.

Improve the process for producers to donate surplus food to hunger relief programs: In partnership with the Department of Ecology, WSDA and a collection of food business stakeholders recently prepared recommendations to streamline and support food donation across Washington. Producers want to see the food that they've grown eaten by someone in need, but they cannot incur additional risk or costs to do so. There exists the opportunity for the development of state-supported food donation procedures and networks that simplify and reduce the risk for producers to donate surplus food to community-based hunger relief.



Improved food system coordination: The ability to respond to hunger and food security, especially during a crisis and in a manner that supports Washington's farms and food businesses, is critical but lacking in Washington. Coordination can be strengthened by providing agencies with the directive, leveraging public-private partnerships and developing dashboards to monitor and map food insecurity in real time. Agencies can also coordinate to incentivize voluntary data sharing across the supply chain.

Workforce development and agricultural education

Strong and accessible agricultural education is critical to keeping Washington's farms and food systems economically viable, resilient to change, and rooted in local communities. The complexity and diversity of Washington agriculture demands an educated workforce pipeline. This pipeline includes youth who choose farming or ag-adjacent careers, technicians and managers who can run precision equipment, manage soil and water, and leverage Washington's data and technology-rich environment for decision making, and workers displaced from automation who require re-training for durable rural jobs. Specific workforce development opportunities are outlined below:

Enhance understanding of agriculture in youth: School-based agricultural education and career-tech programs, including FFA and 4-H, are essential in providing students with hands-on skills and career exposure. Public reporting shows that there are approximately 510 agricultural teachers placed in 271 middle and high school locations statewide in 2024.[48] There exists efforts to engage teachers and students to explore air quality, drought, wildfire impacts, and other agricultural challenges. Efforts include; Franklin Conservation District's Wheat Week, and new agriculture climate programming from WSU's Agricultural Weather Sensing Network (AgWeatherNet) — funded by WSDA in the 23-25 biennium. Such efforts are examples of how Washington's education system can be invested in to promote a greater understanding of agriculture and increase interest in agricultural careers. School-based agricultural education can support the development of tomorrow's agricultural workforce.

Education of the existing workforce: Targeted training keeps Washington farms competitive as many agricultural jobs increasingly require advanced technical knowledge and leadership skills. Statewide workforce analyses project that roughly 75% of Washington jobs will need some form of post-secondary education in the coming years.[49] However, a national survey of crop workers reported only 16% have

48 Washington Office of Superintendent of Public Instruction. Agricultural Education End of Year Report Program Data 2024. Online: https://content.govdelivery.com/attachments/WAOSPI/2024/09/17/file_attachments/3000794/WA%20State%20Ag%20Ed%20Program%20Data%202024%20-%209-15-24.pdf

49 Washington Round Table. Skill Up For Our Future. Online: https://www.waroundtable.com/skillupwa/

education beyond high school.[50] Initiatives like the Agricultural Leadership Program are essential for Washington agricultural viability. This bilingual training program enhances leadership skills of farm supervisors and managers, by providing them with the knowledge and tools to effectively manage communication, delegation, conflict resolution, and more. The Farmworker Innovation Challenge, run by local non-profit Semillero de Ideas, also supports farm worker professional development by leveraging their expertise and rewarding their ingenuity.

Support programs that encourage diversity and reduce barriers to entry: There are ongoing efforts to reduce barriers to workforce development, including lack of exposure to agriculture, especially for minority, diversified and beginning producers, and lack of access to farmland and technical resources. Existing programs in Washington include the state chapter of MANRRS (Minorities in Agriculture, Natural Resources, and Related Sciences) which promotes a more diverse agricultural workforce by supporting academic and professional advancement. Farm incubators and business support centers like Viva Farms and 21 Acres also provide vital services to emerging food and farm entities.

Investing in education at all levels: While Washington's agricultural and educational communities are launching innovative and impactful programs, significant opportunities remain. Meeting the state's future workforce needs will require sustained and expanded investment. This includes stable funding for K–12 agricultural education to reach more districts, particularly in rural and overburdened communities. Also, dedicated support for Extension and conservation district–led youth programming. Additionally, long-term commitments to worker training, bilingual leadership development, and reskilling programs that help displaced workers transition into high-demand agricultural careers.

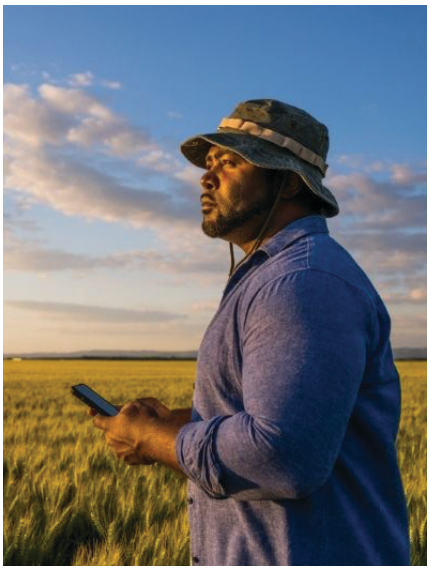
Recognizing the needs of current and future generations, WSDA has spearheaded efforts to support educational programs. For example, in the 2023 – 2025 first supplemental budget, WSDA requested funding for a pilot project to promote diversity in agricultural leadership and expand educational opportunities. The pilot used a four-tiered approach to support K – 12 students, collegiate participants, farm supervisors and managers, and agriculture professionals.

Other programs, which are shovel ready but have not received support, include WSDA's 2023-2025 biennium request. WSDA requested and received one-time funding for the MANRRS chapter at WSU, Washington State FFA, the Agricultural Leadership Program, the AgForestry Leadership Program, and for Semillero de Ideas. These one-time investments were requested on an ongoing basis in 2025 – 2027 but were not funded due to the state's budget issues.

50 DOL. September 2023. Findings from the National Agricultural Workers Survey (NAWS) 2021 – 2022: A Demographic and Employment Profile of United States Crop Workers. Research Report No. 17. Online: https://www.dol.gov/sites/dolgov/files/ETA/naws/pdfs/NAWS%20Research%20Report%2017.pdf

Supporting mental health for farmers and farm workers

Agricultural farmers and farm workers experience suicide rates that are significantly higher than those of the general population. Contributing factors include economic pressure, regulatory stress, extended working hours, social isolation, limited access to culturally responsive behavioral health services, and stigma. The Washington State report on Mental Health & Suicide Prevention for Agricultural Producers and Workers work group recommends short- and medium-term policy actions to improve crisis access, outreach, and training; integrated one-stop services such as financial and legal assistance; research around economic and regulatory impacts; and coordination in funding. Effective implementation will require targeted legislative investment, statutory reforms to enhance crisis response, and collaboration with the Department of Health, WSU Extension, and community organizations. Legislative leadership is essential to close service gaps, sustain rural behavioral health infrastructure, and ensure that agricultural farmers and farm workers have access to timely, culturally competent mental health care.



Clean energy

Renewable energy development in the agricultural sector can provide multiple benefits to farmers, ranchers and the public in Washington, including diversifying income streams, reducing energy costs, and reducing greenhouse gas emissions. As described earlier, however, renewable energy development is not without tradeoffs for, and risks to, agriculture. Fortunately, a robust research and incentive environment has emerged to optimize benefits, mitigate consequences, and translate data into action. Just a few related efforts include: Least-Conflict Solar Siting, which brings stakeholders together to identify renewable energy sites with the fewest conflicts; agrivoltaic feasibility studies, which have identified orchard systems as particularly amenable to dual-use solar energy production; and the Dairy Digester Program which provides funds to offset the costs of anaerobic digesters for methane capture and biogas production. In addition to the production of renewable energy, several efforts are underway to reduce energy use in agriculture. These efforts include the provision of global positioning units (GPS) for tractors to reduce fuel use through Sustainable Farms and Fields, and the pursuit of "green fertilizers" which are fertilizers produced locally using less energy-intensive methods.

Despite the risks, careful planning around the integration of agriculture and renewable energy has the potential to present substantial economic, operational, and environmental benefits. Risks, including land-use conflicts, soil impacts, operational interference, and consolidation pressures, can be effectively mitigated through targeted research, innovative technology, supportive policies, and equitable incentive structures.

Opportunities and strategies to mitigate climate risks

Climate change poses significant risks to Washington agriculture industry. However, due to the state's geographic diversity, unique landscapes, and location, climate change is anticipated to provide opportunities as well, especially compared to other states across the country. Strategic funding and focus can position the state to take advantage of these opportunities.

Opportunities include:

Geographic advantages: Negative climate-related impacts on Washington's agriculture may be less severe than on other production regions in the U.S., increasing the state's importance in terms of its contributions to the national agricultural economy and food security. The state's relatively temperate climate, surface water availability, extensive irrigation systems, and variety of crops bolster its potential to increase in importance as an agricultural region in a climate-changed future. For example, compared to the northwest region, the southwest may be experiencing an increasing trend in drought severity. Additionally, California's San Joaquin Valley could face up to a twenty-percent reduction in irrigation water supply by 2040 due to a combination of climate change and policy changes that drastically reduce groundwater withdrawals. Washington is not expected to see comparable reductions. To realize the potential of these geographic advantages, strategic investment and management are required at every scale, including in research, processing infrastructure, and water storage infrastructure.

Availability of state funding for climate change mitigation and adaptation: While the availability of federal funds for climate change mitigation and adaptation is closely linked with politics and administration change, Washington has a relatively abundant and stable source of funding. Washington's carbon cap-and-invest market, known as the Climate Commitment Act (CCA), continues to generate billions of dollars for in-state climate change mitigation and adaptation projects. To date, these funds have supported agriculture through programs that reduce the costs of compost use, on-farm clean energy, clean tractor equipment, and conservation tracking tools, among other projects. However, many of these programs were cut in the 2025 – 2027 biennium due to the state's budget issues. Overall, agriculture is a relatively small recipient of CCA funds (less than 0.5% of funds appropriated in the 2023 – 2025 biennium) compared to other sectors. More CCA funding is needed to expand climate resilience planning and implementation for Washington agriculture.

Expanded climate planning: Increased awareness of climate risks has led to the adoption of new policies and plans related to climate at the state and local levels. Governments are including climate risks in natural hazard mitigation and resilience plans and are factoring in the anticipated future climate (rather than historical climate) into their plans. WSDA has an opportunity to work with counties across the state as they create or update climate action plans to ensure that: agricultural

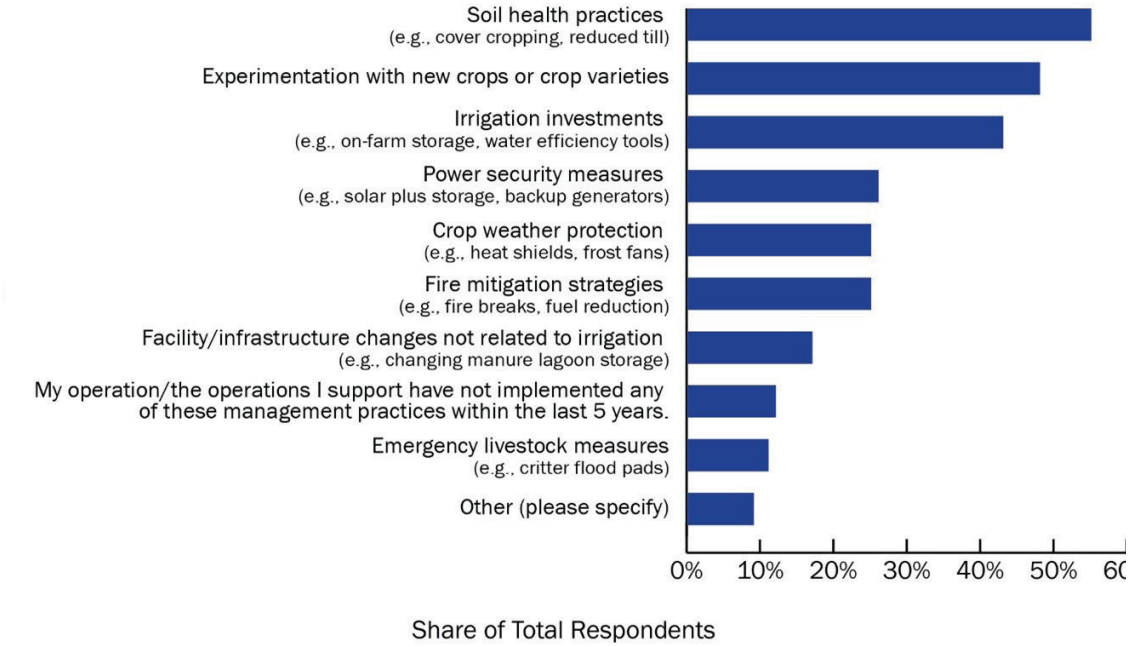
risks and opportunities are included, diverse agricultural stakeholders are part of the planning processes, and planned actions are coordinated and complementary across the state.

Additionally, there is growing recognition that the most effective funding programs should be implemented before a crisis occurs. For example, Washington State's HB 2147 passed in 2024 to establish the Agricultural Pest and Disease Response Account that can rapidly distribute funds during an invasive species crisis. This will help the state be more resilient through climate change by bolstering early pest detection and rapid response. To better plan and prepare for drought, HB 1138 established a Drought Preparedness Account in 2023. This account was already utilized when Washington State made an early drought declaration in April 2024, in response to low snowpack and forecasted warm and dry conditions. This allowed emergency funds to be distributed early enough to mitigate existing and anticipated impacts.

Increased focus on resilience practices and technologies: There is growing awareness that on-farm management is linked to operational resilience. In 2024, the Natural Resource Conservation Service (NRCS) used Inflation Reduction Act funds to expand climate-smart agriculture and forestry activities. In 2020, the Washington Soil Health Initiative was formalized in statute, directing WSDA, the Washington State Conservation Commission (SCC), and WSU to improve soil health and increase the adoption of on-farm conservation practices through outreach and education, policy support, research, and diverse economic incentives. In a Climate Resilience survey issued by WSDA in 2024, soil health practices were the most cited on-farm climate resilience strategy (Figure 12). State funding has also supported the expansion of WSU's AgWeatherNet, which collects and delivers quality spatiotemporal weather data in the state to drive forecasts, models, and decision-support tools. These are just a few scientific advances supported at the federal and state levels. Additional research and experimentation will help producers implement practices that work best on their farms.



Figure 12: Survey Responses: Producers and Agricultural Stakeholders- Practices Used to Mitigate Climate Impacts (Last 5 Years) (n=292)[51]



Many emerging technologies support data-driven precision management in agricultural fields. These technologies may provide opportunities to optimize production, protect worker health, and achieve environmental goals. While some technologies such as autonomous tractors, precision sprayers, and robotic harvest machines require more research and development to overcome challenges of scale and accessibility, other technologies such as soil moisture monitor sensors are increasingly affordable and may be subsidized by public grants. Collectively, these technologies can support the efficient use of fuel, water, and farm inputs, which can reduce GHG emissions, off-target drift of pesticides and nutrients, and farmer input costs.WSDA's Climate Resilience Plan for Washington Agriculture, released in March 2025, was developed through a collaborative process that included climate science and policy reviews, feedback from agricultural stakeholders, and assessments of current WSDA and state programs. More than 600 farmers, farm workers, and staff from agricultural organizations shared their experiences, helping shape a realistic and impactful path forward. The resulting effort outlines 6 goals, 14 strategies, and 27 specific and measurable actions to address risks and enhance agricultural resilience, along with proposed timelines and cost estimates. These actions establish a playbook for funders and institutions that support agriculture, such as state agencies, local jurisdictions, and research universities

51 Source: WSDA (2025). Climate Resilience Plan for Washington Agriculture. D.L. Gelardi (Ed.). Washington State Department of Agriculture AGR2-2502-003

Investments in agricultural technology

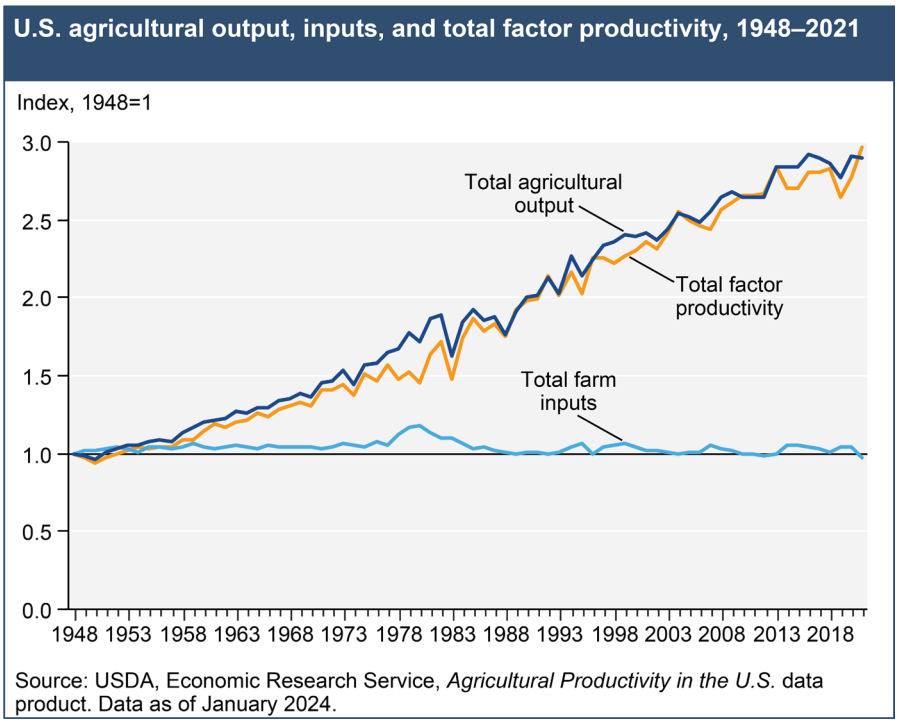
New technology and its application to agriculture presents a burgeoning opportunity to advance agricultural yields and efficiency as well as improve conditions for farm workers, reduce environmental impacts, and eliminate supply chain redundancies. The development of technology and applications specific to crops, locations, and business needs are growing in importance. Recognizing this, cross-disciplinary efforts such as AgAID have been developed and are focused on multipronged approaches to fostering technological development. Technological advancements have very tangible impacts.

These impacts include:

Improved productivity and efficiency: The USDA uses Total Factor Productively (TFP) to measure agricultural outputs. Simply put, TFP is a measurement of the quantity of agricultural outputs produced as a result of inputs (i.e. chemicals, labor, machinery, etc.). The United States is the most productive country in the world. In fact, as of 2021 U.S. farm output was 190% more than output in 1948.[52]

This productivity is driven primarily by technological advancements which have enabled more output per unit of land and unit of labor (Figure 13).

Figure 13: U.S. Total Factor Productivity (1948 – 2021)



52 USDA- ERS. November 2023. Agricultural productivity in the United States – Productivity Growth in the U.S. Agriculture. Online: https://www.ers.usda.gov/data-products/agricultural-productivity-in-the-united-states/productivity-growth-in-us-agriculture

Improved crop and livestock management: There exists a plethora of technologies designed to enhance the ability of farmers and ranchers to manage crops and livestock. These technologies are often focused on soil and irrigation management, pest and disease identification and improved weed control. One example of a tool pertinent to growers is the WSU Decision Aid System (DAS). DAS is a comprehensive platform used to coalesce and transfer information for decision making to tree fruit growers via horticultural models. These models incorporate weather data from WSU's AgWeatherNet, forecasts provided by Weather Source, historic weather data from Daymet, and other information sources such as the WSU Orchard Pest Management Online and the WSU Crop Protection Guide.[53] DAS is a critical technology which enables tree fruit growers to make management decisions about pests and diseases.

DAS is just one example of how technology can improve agricultural management. Other examples include automated irrigation systems which decrease total water use and remote sensing, which can reduce fertilizer and chemical applications. Drones have also been used to revolutionize crop monitoring, precision agriculture, soil analysis, and pest control. Technology is a conduit to improved crop and livestock management and a means for reducing environmental and social impacts.

Improved conditions for farm workers: Technologies, such as automated harvesters and GPS-driven tractors, often incite fear regarding the displacement of the agricultural workforce. Technology has a long way to go before completely replacing people. However, current technology can be used to assist farm workers, often referred to as mechanical aids, in ways that enhance the safety of a given task while also improving efficiency. For example, many producers in the tree fruit industry have adopted picking platforms for harvest. Platforms improve safety by reducing ladder usage and increasing efficiency by reducing the time it takes for laborers to move, climb, and pick fruit. Beyond safety, technology can improve work experience and communication between farm workers and managers. For example, phone applications that translate directions into native languages can be used for record keeping and training purposes.

Ultimately, technology is reducing the number of low-skilled jobs within the agricultural industry and leading to jobs that require an understanding of new technologies and their applications. Investments in training and up-skilling farm workers will have a positive impact on the farm worker community. Technology-assisted jobs are often safer and incur higher wages.

53 WSU. Decision Aid System. Online: https://decisionaid.systems/

Cross-cutting solutions: Technological advancement is the vehicle for cross-cutting solutions. For example, crop yields are dependent on the producer maximizing crop genetic potential and environmental conditions. Technology can advance solutions in a multi-pronged manner through improved crop genetics (i.e. disease resistance, yield enhancements, etc.) as well as improvements to the ability of the producer to manage the environment (i.e. smart systems to monitor crop stress, smart orchards, precision agriculture, etc.). Agricultural technology can be implemented across agriculture including within the supply chain (e.g. packing house, storage, transportation) and at the point of consumption (i.e. smart packaging, spoilage indicators, etc.) to improve quality and reduce reduction.

Advancements in agricultural technology are perhaps the single largest contributor to improvements in crop yields, minimization of resource use, and improvements in food quality. Washington producers will benefit from any investments in home-grown solutions (i.e. technologies developed at the point of production or in concert with end-users).



THREATS

Washington State Administrative Code is the 8th largest state regulatory system in the country. When combined with applicable U.S. Code of Regulations, this represents over 1.3 million combined regulatory restrictions in Washington State. The Mercatus Center concluded that the long-term impacts of excessive regulations can include slower economic growth, higher unemployment, increased poverty rates, and higher inflation, among other effects.[54] One way to combat these impacts is to focus on regulatory streamlining and improved customer experiences, both of which are currently underway in 2025 under the guidance of Governor Ferguson.

Agriculture is faced with regulations from more than a dozen agencies; much work can be done to reduce the cost and complexity of compliance. A full analysis of the impacts of regulatory uncertainty on agriculture in Washington will be included in WSDA's June 2026 report.

The large summer report intends to include significant stakeholder feedback on threats to agricultural viability. This will include stakeholders from all parts of the food system, including farmers, farmworkers, tribes, food assistance partners, and many more. The goal of this broad "Threats" section will be to identify both threats and possible solutions that could be adopted by state agencies or the legislature in coming years.



54 Chambers, Dustin and Patrick McLaughlin. Mercatus Center. George Mason University. August 6, 2024. Washington's Regulatory Landscape. Federal and State Rules and Some of Their Unintended Consequences. Online: https://www.mercatus.org/regsnapshots24/washington

CONCLUSION

Washington's farmers and ranchers produce some of the highest-quality agricultural products in the world. Yet this production, and the communities and ecosystems it supports, face mounting pressures from forces largely outside producers' control. Such pressures include: rising input costs, trade volatility, labor shortages, land conversion, a growing urban-rural divide, changing climatic conditions, declines in research funding, infrastructure constraints, and the realities of competing in a global marketplace. Even so, Washington has meaningful opportunities to strengthen the long-term outlook for its farmers and ranchers.

Over the past two decades, the state has enacted numerous laws that have reshaped how farms and ranches operate and strive to remain viable. WSDA believes progress is possible when agricultural viability, environmental stewardship, and local food production are approached as interconnected systems rather than separate policy arenas. Farmers and ranchers depend on healthy ecosystems, reliable labor, resilient rural economies, and access to both domestic and international markets. As one of the state's largest land-based sectors, agriculture is uniquely positioned to partner in salmon recovery, clean water protection, habitat improvement, climate resilience, and robust regional food systems including contributing to food access for Washingtonians.

Our hope is that by candidly sharing these challenges and highlighting the work already underway to address them, Washington can advance solutions that preserve local food production, protect environmental resources, and create conditions in which farmers and ranchers can not only persist, but genuinely thrive.

This report has outlined the considerable pressures currently borne by Washington agriculture and the consequences of inaction. A comprehensive list of recommendations to improve the viability of Washington agriculture will be included in the June 2026 report, though this document points to several opportunities for positive action.

The state is at a pivotal moment: we can invest in a future where agriculture remains strong, or we can allow food production to shift to regions with fewer barriers and less alignment with Washington's environmental and community goals. When working lands are no longer actively farmed, they are often converted to industrial, commercial, or residential uses. This fragments landscapes, complicates environmental objectives, and strains the services that underpin healthy rural communities.

Our hope is that by candidly sharing these challenges and highlighting the work already underway to address them, Washington can advance solutions that preserve local food production, protect environmental resources, and create conditions in which farmers and ranchers can not only persist, but genuinely thrive.