NASS *Highlights*

May 2026 • No. 2026-1

2025 AGRICULTURAL CHEMICAL USE SURVEY

Potatoes

Nine states . . .

. . . accounted for 91.9% of U.S. acres planted to potatoes in 2025.

About the Survey

The Agricultural Chemical Use Program of USDA's National Agricultural Statistics Service (NASS) is the federal government's official source of statistics about on-farm and post-harvest commercial fertilizer and pesticide use and pest management practices. NASS conducts field crop agricultural chemical use surveys as part of the Agricultural Resource Management Survey. NASS conducted the potato chemical use survey in the fall of 2025.

Access the Data

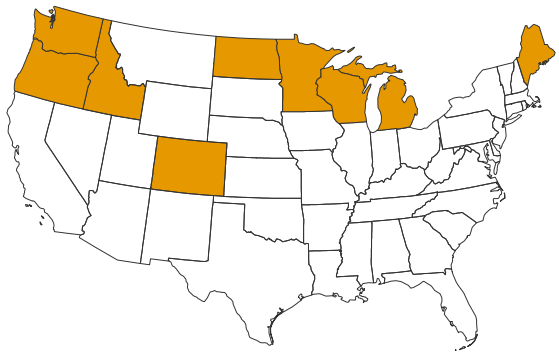
Access 2025 and earlier potato chemical use data through the Quick Stats database (http://quickstats.nass.usda.gov).

- In Program, select "Survey"
- In Sector, select "Environmental"
- In Group, select "Vegetables"
- In Commodity, select "Potatoes"
- Select your category, data item, geographic level, and year

For pre-defined Quick Stats queries, go to http://bit.ly/AgChem and click "Data Tables" under the 2025 Cotton and Potatoes heading. For methodology information, go to http://bit.ly/AgChem and click "Methodology."

The 2025 Agricultural Chemical Use Survey of potato producers collected data about fertilizer and pesticide use as well as pest management practices in growing potatoes. NASS conducted the survey among potato producers in nine states that accounted for 91.9% of the 902,000 acres planted to potatoes in the United States in 2025: Colorado, Idaho, Maine, Michigan, Minnesota, North Dakota, Oregon, Washington, and Wisconsin. (Fig. 1 and Table 4) The data are for the 2025 crop year, the one-year period beginning after the 2024 harvest and ending after the 2025 harvest.

Fig. 1. States in the 2025 Potatoes Chemical Use Survey



Fertilizer Use

Fertilizer refers to a soil-enriching input that contains one or more plant nutrients. For the 2025 crop year, farmers applied nitrogen to 99% of planted acres, at an average rate of 176 pounds per acre, for a total of 142 million pounds. They applied phosphate to 88% of planted acres, potash to 83%, and sulfur to 78% of planted acres. (Table 1)

Table 1. Fertilizer Applied to Potato Planted Acres, 2025 Crop Year

	% of Planted Nutrient[a]	Avg. Rate for Year (lbs/acre/year)	Total Applied (mil lbs)
Nitrogen (N)	99	176	142.0
Phosphate (P_2O_5)	88	100	72.0
Potash (K_2O)	83	123	83.4
Sulfur (S)	78	60	38.5

[a] *Acres with multiple nutrients are counted in each category.*

Pesticide Use

The pesticide active ingredients used on potatoes are classified in this report as herbicides (targeting weeds), insecticides (targeting insects), fungicides (targeting fungal disease), and other chemicals (targeting all other pests and other materials, including extraneous crop foliage). Fungicides were used most extensively, applied to 96% of planted acres. Insecticides and herbicides were applied to 92% and 90% of planted acres, respectively. (Fig. 2)

The most widely used fungicide was chlorothalonil (applied to 78% of planted acres). Among herbicides, metribuzin and pendimethalin were the most widely applied active ingredients (used on 57% and 47% of planted acres, respectively). Diquat dibromide was applied to 43% of the planted acres. (Table 2)

Fig. 2. Pesticides Applied to Potato Planted Acres, 2025 Crop Year
(% of planted acres)

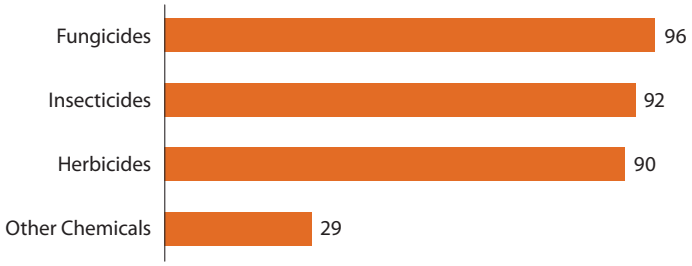


Table 2. Top Pesticides Applied to Potato Planted Acres, 2025 Crop Year

Active Ingredient	Acres with Ingredient[a]	Avg. Rate for Year (lbs/acre/year)	Total Applied (lbs)
Chlorothalonil (fungicide)	78	3.028	1,951,000
Metribuzin (herbicide)	57	0.528	246,000
Pendimethalin (herbicide)	47	0.843	326,000
Diquat dibromide (herbicide)	43	0.509	182,000
Fluopyram (fungicide)	42	0.200	68,000

[a] *Acres with multiple nutrients are counted in each category.*

Pest Management Practices

The survey asked growers to report on the practices they used to manage pests, defined as weeds, insects, or diseases. Potato growers reported practices in four categories: prevention, avoidance, monitoring, and suppression (PAMS).

- *Prevention* practices involve actions to keep a pest population from infesting a crop or field.
- *Avoidance* practices use cultural measures to mitigate or eliminate the detrimental effects of pests.
- *Monitoring* practices observe or detect pests by systematic sampling, counting, or other forms of scouting.
- *Suppression* practices involve controlling or reducing existing pest populations to mitigate crop damage.

The most widely used prevention practice in growing potatoes was cleaning equipment and implements after field work, used on 86% of planted acres. The top avoidance practice was rotating crops (75%). Scouting for diseases, insects, mites, and weeds were the most widely reported monitoring practices, used on 99% of the planted acres. Maintaining ground cover, mulching, or using other physical barriers was the top suppression practice used on 79% of the acres. (Table 3)

Table 3. Top Practice in Pest Management Category, 2025 Crop Year
(% of planted acres, potatoes)

Prevention: Equipment and implements cleaned after completing field work to reduce spread of pests	86
Avoidance: Rotated crops during last three years	75
Monitoring: Scouting for diseases (deliberately, or by general observations while performing tasks)	99
Monitoring: Scouting for insects and mites (deliberately, or by general observations while performing tasks)	99
Monitoring: Scouting for weeds (deliberately, or by general observations while performing tasks)	99
Suppression: Maintained ground covers, mulches, or other physical barriers	79

Table 4. Surveyed States: Acres Planted to Potatoes, 2025

	thousands of acres	% of U.S.
U.S. Total	**902.0**	**100**
Idaho	315	34.9
Washington	140	15.5
North Dakota	70	7.8
Wisconsin	68	7.5
Colorado	55	6.1
Maine	52	5.8
Minnesota	48	5.3
Michigan	41	4.5
Oregon	40	4.4
Total, Surveyed States	**829**	**91.9**

Numbers may not add due to rounding.

USDA AGRICULTURE COUNTS

USDA is an equal opportunity provider, employer, and lender.
www.nass.usda.gov