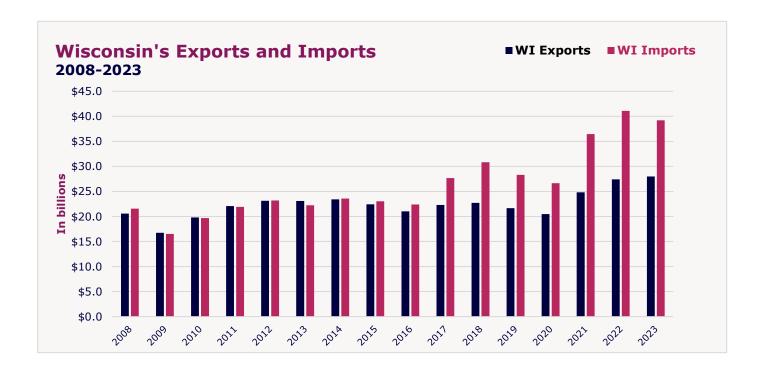


2023 Highlights

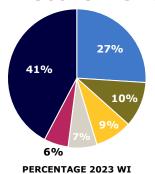
- After a record-setting year in 2022, the value of goods exported from Wisconsin reached yet another record high
 in 2023. High inflation in the U.S. combined with Russia's ongoing invasion of Ukraine and shifting supply chains
 all negatively impacted trade in 2023. Notwithstanding these challenges, Wisconsin exports have continued to
 show consistent, above-average growth across multiple product categories since the post-COVID low in 2020.
- Wisconsin firms exported \$28.0 billion worth of products to 200 countries and customs territories in 2023. That amounted to an increase of \$589.0 million (2.1%) vs. 2022. Exports from the U.S. as a whole decreased by \$45.9 billion (2.2%) during the same timeframe. Wisconsin ranked 20th among the 50 states in exports, the same position held in 2022.
- Almost half (\$12.7 billion, or 45.6%) of Wisconsin's exports in 2023 stayed within North America—with \$4.3 billion, or 15.4%, shipping to Mexico thanks to impressive growth (\$708.5 million, or 19.6%). The 27 members of the post-Brexit European Union accounted for \$4.8 billion, or 17.1%, of Wisconsin's exports in 2023, while China accounted for \$1.4 billion, or 5.3% (representing a decrease of \$311.8 million, or 17.2%).
- Of the top 10 product categories exported from the state, five set record-high levels in 2023, including industrial machinery; electrical machinery; medical and scientific instruments; plastic products; and aircraft, spacecraft, and parts. Exports of pharmaceuticals, which include COVID-19 vaccines, decreased by \$601.1 million (54.3%).
- Wisconsin's imports in 2023 totaled \$39.2 billion, a decrease of \$1.7 billion (4.2%) from 2022. Wisconsin ranked 19th among the 50 states for total imports, moving up one spot from 2022. Total U.S. imports decreased by \$158.4 billion (4.8%) in 2023 vs. 2022.
- The International Monetary Fund predicts stronger-than-expected economic growth for the second half of 2023 in
 the U.S. as well as several major emerging markets and developing economies. Not all places saw this rising
 momentum, with notably subdued growth in the eurozone reflecting weak consumer sentiment, the lingering
 effects of high energy prices, and weakness in interest-rate-sensitive manufacturing and business investment.



WISCONSIN TRADE DATA



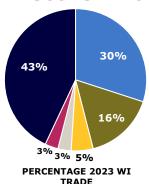
WISCONSIN'S TOP EXPORT PRODUCTS: 2023



TRADE

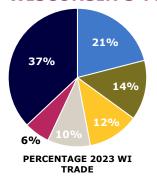
PRODUCT CATEGORY	2022	2023	%Δ ′22-՝23	2013	%Δ ′13-՝23
Industrial Machinery	\$7,078,231,557	\$7,612,443,064	7.55%	\$6,837,108,781	11.34%
Electrical Machinery	\$2,585,640,513	\$2,950,049,748	14.09%	\$2,220,143,571	32.88%
Med./Sci. Instruments	\$2,434,234,040	\$2,526,610,310	3.79%	\$2,263,099,636	11.64%
Non-rail Vehicles	\$1,685,588,941	\$1,874,695,341	11.22%	\$1,937,032,639	-3.22%
Plastic Products	\$1,605,721,503	\$1,609,888,585	0.26%	\$953,191,625	68.89%
Other Products	\$12,042,987,075	\$11,447,754,696	-4.94%	\$8,899,891,611	28.63%
Total	\$27,432,403,629	\$28,021,441,744	2.15%	\$23,110,467,863	21.25%

WISCONSIN TOP EXPORT DESTINATIONS: 2023



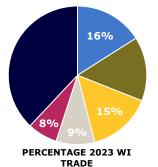
COUNTRY	2022	2023	%Δ ′22-՝23	2013	%Δ ′13-՝23
Canada	\$8,641,012,697	\$8,457,446,129	-2.12%	\$7,527,467,418	12.35%
Mexico	\$3,612,084,182	\$4,320,613,718	19.62%	\$2,517,358,465	71.63%
China	\$1,805,555,226	\$1,493,740,535	-17.27%	\$1,658,633,542	-9.94%
Germany	\$1,044,112,153	\$959,219,726	-8.13%	\$701,328,253	36.77%
United Kingdom	\$881,435,536	\$897,767,298	1.85%	\$678,769,961	32.26%
Other Countries	\$11,448,203,835	\$11,892,654,338	3.88%	\$10,026,910,224	18.61%
Total	\$27,432,403,629	\$28,021,441,744	2.15%	\$23,110,467,863	21.25%

WISCONSIN'S TOP IMPORT PRODUCTS: 2023



PRODUCT CATEGORY	2022	2023	%Δ ′22-՝23	2013	%Δ ′13-՝23
Industrial Machinery	\$8,114,101,979	\$8,080,373,191	-0.42%	\$3,918,780,893	106.20%
Pharmaceuticals	\$5,742,739,395	\$5,472,612,529	-4.70%	\$358,940,748	1424.66%
Electrical Machinery	\$5,086,303,985	\$4,790,027,746	-5.82%	\$2,617,430,636	83.00%
Med./Sci. Instruments	\$2,487,456,250	\$3,944,385,401	58.57%	\$1,530,493,330	157.72%
Non-rail Vehicles	\$2,302,154,803	\$2,360,983,756	2.56%	\$1,158,526,489	103.79%
Other	\$17,295,204,703	\$14,630,821,731	-15.41%	\$12,638,855,249	15.76%
Total	\$41,027,961,115	\$39,279,204,354	-4.26%	\$22,223,027,345	76.75%

WISCONSIN'S TOP IMPORT SOURCES: 2023



COUNTRY	2022	2023	%Δ ′22-՝23	2013	%Δ ′13-`23
Canada	\$6,139,281,566	\$6,256,057,110	1.90%	\$4,213,354,523	48.48%
Mexico	\$3,881,665,064	\$6,027,949,491	55.29%	\$2,451,608,338	145.88%
China	\$8,237,302,386	\$5,844,420,275	-29.05%	\$5,853,697,126	-0.16%
Ireland	\$2,519,009,267	\$3,618,067,674	43.63%	\$50,118,275	7119.06%
Germany	\$2,649,534,880	\$2,632,718,401	-0.63%	\$1,211,710,473	117.27%
Other	\$17,601,167,952	\$14,899,991,403	-15.35%	\$8,442,538,610	76.49%
Total	\$41,027,961,115	\$39,279,204,354	-4.26%	\$22,223,027,345	76.75%

TRADE DATA



EXPORTS BY COUNTRY

- 1. Exports to **Canada**, Wisconsin's top trading partner historically, saw significant gains the prior two years, pushing total exports in 2022 to a record high of \$8.6 billion, an increase of \$1.1 billion (14.6%) vs. 2021. In 2023, exports to Canada declined by a marginal \$183.5 million (2.1%), resulting in part from decreases in exports of beverages, spirits, and vinegar (down \$84.4 million, or 22.3%); prepared cereal, flour, and starch (down \$40.0 million, or 24.0%); and furniture, bedding, and lamps (down \$33.8 million, or 15.8%). Industrial machinery exports made up 22.6% of all exports to Canada (increasing by \$30.1 million, or 1.6%), followed by electrical machinery (which increased by \$44.1 million, or 5.7%). Non-rail vehicles and parts ranked third among product categories, (increasing by \$43.0 million, or 6.0%). Wisconsin ranked 13th among the 50 states in total exports to Canada in 2023.
- 2. **Mexico** maintained its position as the No. 2 export destination after purchasing a record \$4.3 billion of Wisconsin goods in 2023 (an increase of \$708.5 million, or 19.6%). By comparison, total U.S. exports to Mexico decreased by 0.3% vs. 2022. The top product categories exported from Wisconsin included industrial machinery, electrical machinery, and plastic products, which all saw significant increases: \$194.4 million (25.0%), \$189.3 million (34.2%), and \$38.0 million (9.8%), respectively. Of the top 10 product categories exported to Mexico, only non-rail vehicles and articles of iron or steel saw decreases (dropping by \$67.6 million, or 17.0%, and \$15.5 million, or 7.3%, respectively).
- 3. After three consecutive years of growth in exports to **China**, in 2023 shipments from Wisconsin to this market decreased by \$311.8 million (17.2%). All but two of the top 10 product categories declined vs. 2022, the exceptions being plastic products (up \$8.3 million, or 12.6%) and wadding, felt, yarn, twine, etc. (up \$8.1 million, or 28.7%). Total U.S. exports to China decreased by \$6.2 billion (4.0%) in 2023 vs. 2022 after increasing by \$2.5 billion (1.7%) the year prior.
- 4. **Germany** continued to rank as Wisconsin's fourth-leading export destination in 2023, with purchases in the amount of \$959.2 million (a decrease of \$84.8 million, or 8.1%). Exports of aircraft, spacecraft, and parts contributed to the decline (dropping by \$136.7 million, or 79.5%), as did industrial machinery exports (down \$20.4 million, or 9.4%). Some categories saw growth, including plastic products, electrical machinery, and organic chemicals, up \$40.2 million (77.9%), \$14.7 million (21.6%), and \$18.2 million (37.4%), respectively.
- 5. The **United Kingdom** remains Wisconsin's No. 5 export market after logging two consecutive years of record-high purchases of Wisconsin products, including \$241.9 million in aircraft, spacecraft and parts (an increase of \$52.4 million, or 27.6%) in 2023. Industrial machinery, electrical machinery, and medical and scientific instruments were all down vs. 2022, dropping by \$11.5 million (4.9%), \$1.9 million (2.3%), and \$14.2 million (18.1%), respectively.
- 6. Growth in exports to **Belgium** in the amount of \$226.9 million (33.9%) allowed this market to increase its ranking from No. 8 in 2022 to No. 6 just one year later. Although exports have set records for two consecutive years, these exports are likely destined for other markets within the EU, as Belgium is a major logistics hub with a relatively small economy.
- 7. Exports to **Australia** increased by \$48.0 million (6.2%) to end the year at \$812.5 million (the second-best result on record), yet this market dropped one spot vs. 2022. Categories that saw growth included non-rail vehicles and parts (up \$40.5 million, or 40.1%), electrical machinery (up \$10.4 million, or 20.4%), and misc. edible preparations (up \$7.7 million, or 159.2%).
- 8. A record amount of goods shipped to the **Netherlands** (\$742.1 million—an increase of \$178.9 million, or 31.7%) boosted this market's ranking from No. 10 in 2022 to No. 8 in 2023. Industrial machinery exports (constituting \$328.7 million, or 44.2% of total exports to this market) grew by an impressive \$136.6 million (71.1%). Electrical machinery exports, the No. 2 product category, increased by \$35.3 million (53.0%) vs. 2022.
- 9. **South Korea** maintained the No. 9 position among Wisconsin export destinations, with shipments decreasing by a nominal \$3.0 million (0.4%) in 2023. Decreases in exports of industrial machinery (down \$5.1 million, or 4.4%) and electrical machinery (down \$2.1 million, or 6.0%) were offset by increases in medical and scientific instruments (up \$26.4 million, or 34.3%) and meat products (up \$21.8 million, or 34.9%).



TOP DESTINATIONS FOR WISCONSIN EXPORTS

2023			EXPORT VALUE		% СН	ANGE	2013
RANK	COUNTRY	2022	2023	2013	2022- 2023	2013- 2023	RANK
1	Canada	\$8,641,012,697	\$8,457,446,129	\$7,527,467,418	-2.12%	12.35%	1
2	Mexico	\$3,612,084,182	\$4,320,613,718	\$2,517,358,465	19.62%	71.63%	2
3	China	\$1,805,555,226	\$1,493,740,535	\$1,658,633,542	-17.27%	-9.94%	3
4	Germany	\$1,044,112,153	\$959,219,726	\$701,328,253	-8.13%	36.77%	5
5	United Kingdom	\$881,435,536	\$897,767,298	\$678,769,961	1.85%	32.26%	6
6	Belgium	\$668,484,738	\$895,389,249	\$384,734,661	33.94%	132.73%	14
7	Australia	\$764,493,348	\$812,508,554	\$675,962,518	6.28%	20.20%	7
8	Netherlands	\$563,189,214	\$742,184,482	\$378,821,603	31.78%	95.92%	15
9	Korea, Republic Of	\$657,660,209	\$654,603,865	\$431,055,876	-0.46%	51.86%	11
10	Japan	\$699,879,799	\$643,305,728	\$933,796,729	-8.08%	-31.11%	4
11	Czech Republic	\$173,472,205	\$479,169,283	\$65,720,188	176.22%	629.11%	39
12	Chile	\$515,084,530	\$475,621,080	\$473,691,215	-7.66%	0.41%	9
13	Brazil	\$395,968,659	\$406,266,901	\$477,210,841	2.60%	-14.87%	8
14	India	\$295,500,624	\$385,303,096	\$289,426,476	30.39%	33.13%	16
15	Taiwan	\$306,841,851	\$380,449,385	\$173,558,616	23.99%	119.21%	23
16	Thailand	\$364,399,596	\$379,722,680	\$203,398,633	4.21%	86.69%	22
17	France	\$491,539,713	\$364,863,746	\$460,005,642	-25.77%	-20.68%	10
18	Singapore	\$420,822,846	\$348,134,570	\$259,146,678	-17.27%	34.34%	19
19	Turkey	\$84,677,502	\$297,459,094	\$75,884,236	251.28%	291.99%	35
20	Saudi Arabia	\$122,121,005	\$271,929,577	\$396,169,096	122.67%	-31.36%	12
21	Switzerland	\$91,559,825	\$270,166,773	\$101,466,259	195.07%	166.26%	30
22	Italy	\$326,710,504	\$254,771,111	\$279,180,105	-22.02%	-8.74%	17
23	South Africa	\$178,056,239	\$197,456,414	\$261,073,014	10.90%	-24.37%	18
24	Hong Kong	\$152,671,011	\$195,061,399	\$250,102,875	27.77%	-22.01%	21
25	Ireland	\$155,979,370	\$187,854,074	\$85,313,298	20.44%	120.19%	33
26	Spain	\$161,639,809	\$185,473,701	\$86,823,050	14.75%	113.62%	31
27	Indonesia	\$201,528,295	\$163,505,126	\$86,484,688	-18.87%	89.06%	32
28	United Arab Emirates	\$146,818,712	\$162,166,622	\$393,685,635	10.45%	-58.81%	13
29	Malaysia	\$217,589,368	\$161,258,617	\$140,252,053	-25.89%	14.98%	26
30	Peru	\$138,060,639	\$158,883,107	\$256,571,920	15.08%	-38.07%	20
31	Denmark	\$72,529,467	\$154,504,978	\$57,684,704	113.02%	167.84%	42
32	Poland	\$129,120,251	\$143,866,889	\$83,979,223	11.42%	71.31%	34
33	Costa Rica	\$140,616,252	\$137,653,104	\$50,899,128	-2.11%	170.44%	47
34	Sweden	\$126,167,115	\$126,979,172	\$122,977,657	0.64%	3.25%	29
35	Colombia	\$158,867,478	\$116,272,971	\$166,767,682	-26.81%	-30.28%	24
	Other	\$2,526,153,661	\$1,739,868,990	\$1,925,065,925	-31.13%	-9.62%	
	Total	\$27,432,403,629	\$28,021,441,744	\$23,110,467,863	2.15%	21.25%	





WISCONSIN EXPORTS BY TOP PRODUCT CATEGORIES

- 1. Although Wisconsin companies exported a record \$7.6 billion in **industrial machinery** in 2023 (an increase of \$534.2 million, or 7.5%), the state of Georgia saw an increase of \$1.8 billion (28.2%), causing Wisconsin to drop one rank to No. 8 among U.S. states for 2023. Total U.S. exports in this product category rose by 1.3% in 2023.
 - Automatic data processing machine exports remained the largest subcategory of industrial machinery exports, logging growth of \$344.2 million (55.8%). The top four destinations for this subcategory were the Netherlands (up \$158.1 million, or 445.8%), the Czech Republic (up \$34.6 million, or 63.2%), Belgium (up \$4.8 million, or 6.2%), and Singapore (up \$10.9 million, or 117.0%).
 - Spark ignition internal combustion engines, the third-leading subcategory in 2022, rose to the second position in 2023 after exports grew by \$44.9 million (8.1%), with 42.0% of this volume (\$240.1 million) destined for Belgium after that market's purchases of the subcategory increased by \$27.9 million (12.5%) vs. 2022.
 - Transmission shaft, bearing, and gear exports, the second-leading subcategory in 2022, saw exports decline by \$6.0 million (1.0%), with 23.7% of the total volume (\$140.0 million) destined for Canada.
- 2. **Electrical machinery** remains the No. 2 product category in 2023, recording growth in the amount of \$364.4 million (14.0%). Wisconsin ranked 18th in the U.S. for this product category, up one position from 2022, while total U.S. exports increased by a marginal \$2.5 billion (1.2%) in 2023.
 - The largest subcategory in 2023, electric transformers and converters, saw exports of \$451.0 million, an increase of \$114.4 million (34.0%). Canada was the destination for 32.5% of this subcategory (\$146.8 million), followed by Mexico with 21.7% (\$97.9 million), representing an increase of 59.1% (\$36.3 million).
 - Exports of electric generating sets totaled \$333.2 million, reflecting a decrease of \$3.9 million (1.1%) vs. 2022.
 Canada alone accounted for 79.2% of this volume (\$263.9 million) in 2023.
- 3. Exports of **medical and scientific instruments** grew by \$92.3 million (3.7%) in 2023, allowing this category to maintain No. 3 position with exports of \$2.5 billion. The top two subcategories accounted for 55.7% of this product category's total value exported from Wisconsin in 2023:
 - Medical, surgical, and dental instruments saw the largest increase among the subcategories, with total exports
 of \$723.1 million (reflecting growth of \$103.9 million, or 16.7%). Top destinations for this subcategory included
 South Korea, Canada, Ireland, China, and Germany.
 - X-ray, alpha, gamma, etc. equipment and parts exports totaled \$684.2 million, increasing by \$32.3 million (4.9%) vs. 2022. Top destinations included China, India, France, Italy, and Japan.
- 4. Exports of **vehicles and parts** grew by \$189.1 million (11.2%) in 2023. The subcategory of parts and accessories, which accounts for 30.5% of this category (\$573.4 million), saw a decrease in exports of \$65.7 million (10.2%). Shipments of tractors grew by \$162.8 million (59.5%), with 72.7% of the total destined for Belgium and Canada.
- 5. Wisconsin's exports of **plastic products** saw minimal growth (up \$4.1 million, or 0.2%). Canada purchased 36.2% of this volume, followed by Mexico at 26.3%. The top five subcategories—including plates, sheets, etc.; plastic containers; articles of plastic; and self-adhesive plates, sheets, etc.—accounted for 70.4% of this category's total volume in 2023.
- 6. The product category **aircraft, spacecraft, and parts** recorded the highest growth rate (39.3%) and second-highest dollar volume increase (\$367.0 million) in 2023, lifting its ranking by one position vs. 2022. Top destinations included the UK (up 27.6%), Turkey (up 1,844.0%), Switzerland (up 3,020.9%), and the Czech Republic (up 16,244.6%).
- 7. **Paper products** exports are mainly concentrated in toilet paper, paperboard, coated paper, and similar products. Canada was the primary destination, receiving 70.4% of the \$903.5 million in total exports in 2023.
- 8. **Articles of iron or steel** exports—including screws, bolts, nuts, etc.; tubes, pipes, and fittings; and cast products—decreased by \$60.0 million (9.4%). Canada and Mexico purchased \$196.6 million (34.3%) and \$194.9 million (34.0%) of this volume, respectively.
- 9. Exports of **pharmaceutical products** had grown steadily from \$259.6 million in 2012 to \$315.7 million in 2020. In 2021, this product category grew exponentially, totaling \$1.9 billion for the year. The subcategory responsible for this increase was vaccines for human medicine (specifically, COVID-19 vaccines). Global demand for vaccines has declined significantly the past two years, and in 2023, exports of vaccines for human medicine totaled \$418.1 million (a decline of \$503.8 million, or 54.6%), while the broader pharmaceutical products category declined by \$601.1 million (54.3%).



TOP PRODUCTS EXPORTED FROM WISCONSIN

2023			EXPORT VALUE		% Cŀ	IANGE	2013	
RANK	PRODUCT CATEGORY	2022	2023	2013	2022- 2023	2013- 2023	RANK	
1	Industrial Machinery	\$7,078,231,557	\$7,612,443,064	\$6,837,108,781	7.55%	11.34%	1	
2	Electrical Machinery	\$2,585,640,513	\$2,950,049,748	\$2,220,143,571	14.09%	32.88%	3	
3	Medical and Scientific Instruments	\$2,434,234,040	\$2,526,610,310	\$2,263,099,636	3.79%	11.64%	2	
4	Non-Rail Vehicles and Parts	\$1,685,588,941	\$1,874,695,341	\$1,937,032,639	11.22%	-3.22%	4	
5	Plastic Products	\$1,605,721,503	\$1,609,888,585	\$953,191,625	0.26%	68.89%	5	
6	Aircraft, Spacecraft, and Parts	\$934,149,731	\$1,301,241,346	\$306,860,186	39.30%	324.05%	13	
7	Paper Products	\$911,861,876	\$903,597,196	\$928,408,884	-0.91%	-2.67%	6	
8	Articles of Iron or Steel	\$632,917,169	\$572,824,654	\$439,777,241	-9.49%	30.25%	7	
9	Pharmaceutical Products	\$1,106,891,193	\$505,760,736	\$278,212,409	-54.31%	81.79%	15	
10	Misc. Chemical Products	\$518,717,064	\$479,786,226	\$330,721,200	-7.51%	45.07%	11	
11	Misc. Edible Preparations	\$439,420,719	\$456,367,858	\$314,575,267	3.86%	45.07%	12	
12	Organic Chemicals	\$439,613,948	\$338,413,087	\$156,343,822	-23.02%	116.45%	26	
13	Starch, Glue, Enzymes	\$355,187,047	\$335,871,819	\$146,653,882	-5.44%	129.02%	27	
14	Dairy Products, Eggs, Honey	\$404,324,161	\$328,572,507	\$397,940,116	-18.74%	-17.43%	8	
15	Furniture, Bedding, Lamps	\$338,520,067	\$321,667,333	\$348,289,498	-4.98%	-7.64%	10	
16	Prep. Vegetables, Fruits, Nuts	\$333,799,663	\$316,741,450	\$194,165,992	-5.11%	63.13%	21	
17	Beverages, Spirits, Vinegar	\$385,891,960	\$301,689,495	\$301,055,502	-21.82%	0.21%	14	
18	Printed Books, Newspapers, Manuscripts, Etc.	\$279,785,455	\$274,250,951	\$395,546,687	-1.98%	-30.67%	9	
19	Salt, Stone, Cement, Plaster	\$237,498,549	\$265,531,551	\$117,590,295	11.80%	125.81%	34	
20	Essential Oils, Perfumes	\$267,666,215	\$257,885,409	\$175,583,066	-3.65%	46.87%	25	
21	Articles of Wood	\$283,645,373	\$251,072,523	\$209,467,548	-11.48%	19.86%	19	
22	Misc. Base Metal Products	\$246,634,016	\$247,041,102	\$134,915,921	0.17%	83.11%	31	
23	Meat Products	\$179,670,629	\$218,747,495	\$125,739,724	21.75%	73.97%	33	
24	Oil Seeds	\$175,444,367	\$195,653,579	\$139,713,060	11.52%	40.04%	30	
25	Other Products of Animal Origin	\$196,411,343	\$187,709,393	\$66,573,471	-4.43%	181.96%	43	
26	Prepared Meet and Seafood	\$205,232,860	\$184,022,088	\$183,978,002	-10.33%	0.02%	22	
27	Tanning and Dyes, Paint, Ink	\$177,512,475	\$182,718,677	\$146,443,159	2.93%	24.77%	29	
28	Soap, Waxes, Polishes, Candles	\$144,882,658	\$170,995,333	\$133,433,451	18.02%	28.15%	32	
29	Prepared Cereal, Flour, Starch	\$207,370,852	\$166,375,716	\$225,273,492	-19.77%	-26.15%	18	
30	Iron and Steel Products	\$150,437,148	\$157,932,715	\$85,084,832	4.98%	85.62%	40	
31	Food Industry Waste, Animal Feed	\$194,434,410	\$148,299,577	\$146,653,772	-23.73%	1.12%	28	
32	Metal Tools, Cutlery, Etc.	\$132,082,671	\$136,335,363	\$78,534,705	3.22%	73.60%	42	
33	Aluminum Products	\$126,004,566	\$133,214,741	\$95,184,195	5.72%	39.95%	37	
34	Rubber Products	\$143,195,911	\$128,039,375	\$94,107,779	-10.58%	36.06%	38	
35	Cereals	\$168,226,264	\$124,603,142	\$240,448,810	-25.93%	-48.18%	16	
	Other	\$1,725,556,715	\$1,854,792,259	\$1,962,615,643	7.49%	-5.49%		
	TOTAL	\$27,432,403,629	\$28,021,441,744	\$23,110,467,863	2.15%	21.25%		

TRADE DATA



"SUPERCATEGORIES" EXPORTED FROM WISCONSIN

(Supercategories combine multiple two-, four-, and six-digit HS code categories.)

2023	SATE CODY	EXPORT VALUE			% CHANGE		2013	
RANK	CATEGORY	2022	2023	2013	2022- 2023	2013- 2023	RANK	
1	Energy, Power, & Controls	\$5,024,770,294	\$5,500,159,534	\$4,598,299,567	9.46%	19.61%	1	
2	Water Technology	\$5,368,021,406	\$5,207,993,481	\$4,556,185,674	-2.98%	14.30%	2	
3	Agricultural Products	\$4,215,682,549	\$3,872,728,537	\$3,416,583,671	-8.14%	13.35%	3	
4	Biotech & Life Sciences	\$3,406,487,189	\$2,801,474,249	\$2,615,193,273	-17.76%	7.12%	4	
5	Aviation/Aerospace	\$1,016,944,361	\$1,383,499,844	\$383,566,876	36.04%	260.69%	5	

Several major sectors of Wisconsin's economy produce goods that fall into related categories as defined by the Harmonized System (HS) of codes used to classify exports. When combined into "supercategories," several of these could rank among Wisconsin's top export categories, after industrial machinery.

- The **energy, power, and controls** supercategory grew by the largest dollar value in 2023 (increasing by \$475.3 million, or 9.4%), allowing this sector to reclaim the top position. The sector's largest product category, outboard engines, posted exports of \$453.1 million in 2023 (up \$25.5 million, or 5.9%), followed by spark-ignition internal combustion engines, which recorded \$326.7 million in exports (up \$41.2 million or 14.4%), and static converters and power adapters with \$308.1 million (up \$86.5 million, or 39.0%). Just under half (\$2.6 billion, or 48.6%) of this supercategory was exported to Canada and Mexico in 2023.
- The water technology sector includes a wide variety of equipment used in the filtering, distribution, measuring, and use of water. In 2023, the product categories that fall within this supercategory saw exports decline by \$160.2 million (2.9%), resulting in a drop in ranking vs. 2022. Top export destinations for this sector include Canada (which purchased \$1.3 billion, or 25.4% of the total) and Mexico (with \$1.0 billion, or 20.2%), followed by Germany (\$289.6 million), China (\$235.4 million), the United Kingdom (\$172.3 million), and Australia (\$167.3 million).
- The **agricultural products** supercategory includes bulk commodities and processed foods, as well as some specialty products. The sector's largest subcategory, miscellaneous edible preparations, accounts for \$456.3 million (11.7%) of the total. The second-largest subcategory remains dairy products, bird eggs, and honey, even as exports decreased by \$75.7 million (18.7%) in 2023. The No. 3 subcategory, prepared vegetables, fruits, and nuts, also decreased (in the amount of \$17.0 million, or 5.1%). Canada is the dominant market for Wisconsin agricultural products (purchasing 38.6% of the total), followed by Mexico with \$11.7%. For further information on agricultural trade, visit the <u>Department of Agriculture, Trade, and Consumer Protection website</u>.
- The **biotech and life sciences products** supercategory includes vaccines, which, as previously noted, saw massive increases in exports from 2020 to 2021. The ongoing decline in vaccine exports weighed heavily on this supercategory, which as a whole declined by \$605.0 million (17.7%) in 2023 vs. 2022. The top destinations for this supercategory in 2023 included Canada, with 13.4% of the total, followed by China and Germany, with 13.2% and 5.6%, respectively.
- Exports of aircraft, spacecraft, and parts accounted for 94.0% of the entire **aviation/aerospace** supercategory. As previously noted, that product category grew by an impressive 39.3% in 2023. In addition, the smaller subcategories of instrumentation, navigation, and communication systems realized increases as well, contributing to the 36.0% increase in total exports for this supercategory. Top export destinations in 2023 included the UK, up \$49.8 million (25.6%), Turkey, up \$188.2 million (1,834.6%), and Switzerland, up \$182.0 million (2,898.2%).

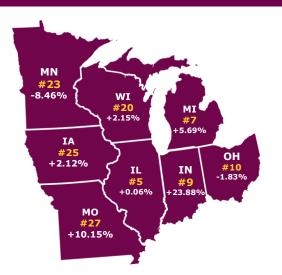


WISCONSIN'S EXPORTS COMPARED TO OTHER STATES

- Among U.S. states, 20 saw their exports decline in 2023, with West Virginia dropping the most (a 27.4% decline).
- Among Midwestern states, Wisconsin ranked lower in terms of growth, though two states had declines and two states had lower percentage growth.
- The graphic to the right shows Midwest states with their overall rank among the 50 states as well as their 2023 percentage growth.

WISCONSIN LEADS THE U.S. IN THE EXPORT OF:

- Dimethyl Propylphosphonate (HS 293142) 100% of the U.S. total
- Sheep/Lamb Skins Without Wool (HS 410221) 100% of the U.S. total
- Pseudoephedrine and Their Salts (HS 293942) 94.8% of the U.S. total
- Ethylene Dibromide (HS 290362) 90.1% of the U.S. total
- Live Birds (HS 010639) 84.8% of the U.S. total
- Machines for Making Paper Bags Etc. or Envelopes (HS 844120) 77.7% of the U.S. total
- Drying Machines with Dry Linen Capacity Not Over 10kg (HS 845121) 76.4% of the U.S. total
- Vessels for Transport of Goods and Persons (HS 890190) 75.2% of the U.S. total
- Machines for Molding Articles in Paper Pulp, Paper or Paperboard (HS 844140) 74.7% of the U.S. total
- Outboard Engines for Marine Propulsion (HS 840721) 70.6% of the U.S. total
- Cotton Yarn of Combined Fibers, >=85% of Cotton by Weight (HS 520526) 70.0% of the U.S. total
- Passenger Motor Vehicles with Diesel Engines not over 1500 CC (HS 870331) 68.4% of the U.S. total
- Calcined Dolomite (HS 251820) 68.3% of the U.S. total
- Mirex (HS 290383) 66.9% of the U.S. total
- Lignite, Not Agglomerated (HS 270210) 64.8% of the U.S. total
- Machines & Apparatus for Arc Welding of Metals (HS 851539) 62.9% of the U.S. total
- Salmonidae, Fresh or Chilled (HS 030219) 61.6% of the U.S. total
- Inboard Engines for Marine Propulsion (HS 840729) 59.8% of the U.S. total
- Bovine Semen (HS 051110) 59.3% of the U.S. total
- Glassine & Other Glazed Transparent/Translucent Paper (HS 480640) 58.8% of the U.S. total
- 2,2-Diphenyl-2-Hydroxyacetic Acid (Benzilic Acid) (HS 291817) 57.4% of the U.S. total
- Rennet and Concentrates Thereof (HS 350710) 56.1% of the U.S. total
- Paper and Paperboard, Uncut (HS 480262) 55.8% of the U.S. total
- Carbon Tetrachloride (HS 290314) 54.9% of the U.S. total
- Ginseng Roots, Fresh or Dried (HS 121120) 52.8% of the U.S. total
- Hoopwood; Split Poles; Pickets, Etc., Coniferous (HS 440410) 52.2% of the U.S. total
- Lavatory Seats & Covers, Made of Plastics (HS 392220) 51.9% of the U.S. total
- Yarn, Carded Wool, Not Retail, >=85% of Wool by Weight (HS 510610) 51.9% of the U.S. total
- Mink Furskins, Raw, Whole (HS 430110) 51.7% of the U.S. total
- Malt, Roasted (HS 110720) 51.7% of the U.S. total
- Washing Machines, Automatic with Dry Line Cap not Over 10kg (HS 845011) 51.5% of the U.S. total
- Machinery For Making Paper or Paperboard (HS 843920) 51.5% of the U.S. total
- Presses for Manufacture of Particle Board & Other Board of Wood, Cork (HS 847930) 50.8% of the U.S. total
- Tablecloths & Table Napkins of Paper, Paper Pulp Etc. (HS 481830) 50.7% of the U.S. total
- Sweet Corn, Prepared/Preserved, Not Frozen (HS 200580) 50.2% of the U.S. total
- Lactose In Solid Form and Lactose Syrup (HS 170219) 49.7% of the U.S. total
- Machines For Make Up Paper Pulp, Paper, Paperboard (HS 844180) 48.8% of the U.S. total
- Manure Spreaders (HS 843241) 47.9% of the U.S. total
- Newspapers, Etc. Appearing Less Than 4 Times Per Week (HS 490290) 47.4% of the U.S. total



TRADE DATA



WISCONSIN IMPORTS

- Wisconsin's total imports decreased by \$1.7 billion (4.2%) in 2023 after increasing by \$4.6 billion (12.7%) in 2022. By comparison, total U.S. imports decreased by 4.8% in 2023. Wisconsin ranked 19th in the U.S. for total imports by state in 2023, up from 20th place in 2022.
- Canada returned to the top spot among Wisconsin's sources of imported goods (a position it hasn't held since 2008), providing imports totaling \$6.2 billion. Modest growth of \$116.7 million (1.9%) allowed Wisconsin's imports from Canada to set a new record for the second consecutive year.
 - Industrial machinery imports, at \$660.8 million, returned as the top product category imported from Canada, growing by \$97.3 million (17.2%).
 - Plastic products dropped to the second position, decreasing by \$71.0 million (10.7%).
 - Non-rail vehicles made up the largest increase in imports from Canada, growing by \$289.6 million (156.6%), followed by special classification provisions, up \$114.4 million (44.3%).
- Imports from Mexico increased by an impressive \$2.1 billion (55.2%) in 2023 after increasing by \$734.7 million (23.2%) in 2022. These imports hit a new record of \$6.0 billion, bringing Mexico into the No. 2 spot among import sources for the first time.
 - Imports of medical and scientific instruments, at \$1.4 billion, constituted 32.3% of total imports from Mexico, increasing by \$1.4 billion (331.2%).
 - Electrical machinery, the second-largest product category imported from Mexico, increased by \$190.7 million (19.7%), while non-rail vehicles, the third-largest product category, increased by \$192.1 million (35.2%).
 - o Of the top 10 product categories imported from Mexico, only plastic products and articles of iron or steel decreased (by \$1.0 million, or 0.5%, and \$2.4 million, or 3.6%, respectively.
- China fell from the top position in 2022 to the No. 3 position in 2023 after imports decreased by \$2.3 billion (29.0%). The largest declines were seen in imports of industrial machinery, down \$474.2 million (23.4%), pharmaceuticals, down \$357.4 million (70.6%), and electrical machinery, down \$336.7 million (22.5%). Of the top 10 product categories, only special classification provisions imports increased vs. 2022 (up \$17.4 million, or 12.3%).
- Starting in 2015, Wisconsin began importing large quantities of pharmaceuticals from Ireland. In 2023, of the \$3.6 billion worth of goods imported from this market, \$3.4 billion (95.5%) were pharmaceuticals, logging additional growth on top of the \$1.0 billion (45.3%) seen for this product category in 2023 vs. 2022.
- Germany dropped to the No. 5 position after imports decreased slightly (down \$16.8 million, 0.6%). Increases in imports of industrial machinery (up \$71.6 million, or 8.0%) and medical and scientific instruments (up \$79.0 million, or 20.9%) were offset by a decrease in pharmaceutical imports (down \$100.6 million, or 22.7%).
- Industrial machinery imports, at \$8.0 billion, accounted for 20.5% of all Wisconsin imports in 2023. Hand tools were the largest subcategory at \$1.3 billion, representing 16.5% of the total. Transmission shafts, bearings, and gears is the second-largest subcategory at \$446.1 million (down \$67.3 million, or 13.1%), followed by parts for engines at \$418.8 million (down \$62.7 million, or 13.0%). China ranks as the top supplier of industrial machinery imported into Wisconsin, followed by Germany, Vietnam, and Italy.
- The pharmaceutical product category and its many subcategories include such products as human and animal blood, cell cultures, bandages, and medicaments. Vaccines for human medicine (HS 300214) accounted for \$4.5 million, or 83.3% of all pharmaceutical imports into Wisconsin in 2023. Of the \$5.4 billion of imports, Ireland was the source of \$3.4 billion (63.1% of the total), followed by Belgium, Germany, and Spain.
- Electrical machinery imports, the No. 3 product category, decreased by \$296.2 million (5.8%) to end 2023 at \$4.7 billion. Subcategories include electrical transmission sets (up \$30.5 million, or 3.6%), phone and voice apparatus (up \$94.4 million, or 28.1%), and electronic integrated circuits (up \$62.6 million, or 20.2%). With 24.1% of the total, Mexico surpassed China as the top supplier of electrical machinery imported into Wisconsin.



TOP SOURCES OF WISCONSIN IMPORTS

2022			% CH	IANGE	2013		
2023 RANK	COUNTRY	2022	2023	2013	2022- 2023	2013- 2023	RANK
1	Canada	\$6,139,281,566	\$6,256,057,110	\$4,213,354,523	1.90%	48.48%	2
2	Mexico	\$3,881,665,064	\$6,027,949,491	\$2,451,608,338	55.29%	145.88%	3
3	China	\$8,237,302,386	\$5,844,420,275	\$5,853,697,126	-29.05%	-0.16%	1
4	Ireland	\$2,519,009,267	\$3,618,067,674	\$50,118,275	43.63%	7119.06%	37
5	Germany	\$2,649,534,880	\$2,632,718,401	\$1,211,710,473	-0.63%	117.27%	4
6	Vietnam	\$2,537,110,536	\$2,226,177,706	\$736,493,196	-12.26%	202.27%	5
7	Italy	\$1,348,374,725	\$1,194,039,994	\$697,002,830	-11.45%	71.31%	7
8	Belgium	\$2,060,358,239	\$1,146,038,183	\$82,527,154	-44.38%	1288.68%	33
9	India	\$1,234,957,379	\$1,050,212,643	\$639,008,607	-14.96%	64.35%	8
10	Taiwan	\$1,256,693,026	\$930,997,516	\$487,165,491	-25.92%	91.10%	9
11	Japan	\$732,508,672	\$762,146,075	\$732,934,569	4.05%	3.99%	6
12	Malaysia	\$608,469,358	\$638,055,784	\$129,704,893	4.86%	391.93%	24
13	United Kingdom	\$715,126,884	\$597,141,735	\$291,434,855	-16.50%	104.90%	13
14	Spain	\$436,183,922	\$486,244,469	\$110,672,153	11.48%	339.36%	27
15	France	\$535,633,821	\$479,241,517	\$451,333,622	-10.53%	6.18%	10
16	Korea, Republic Of	\$582,845,853	\$414,248,360	\$312,894,642	-28.93%	32.39%	12
17	Switzerland	\$320,608,008	\$386,979,921	\$173,501,663	20.70%	123.04%	18
18	Thailand	\$356,457,488	\$313,897,998	\$85,835,077	-11.94%	265.70%	32
19	Turkey	\$475,488,496	\$303,118,111	\$54,083,492	-36.25%	460.46%	35
20	Bangladesh	\$421,036,978	\$287,868,853	\$220,084,407	-31.63%	30.80%	16
21	Finland	\$241,640,060	\$286,566,200	\$277,511,749	18.59%	3.26%	14
22	Netherlands	\$279,084,705	\$281,342,242	\$146,959,767	0.81%	91.44%	23
23	Austria	\$238,177,018	\$256,359,409	\$177,830,347	7.63%	44.16%	17
24	Philippines	\$252,709,929	\$223,761,197	\$128,845,422	-11.46%	73.67%	25
25	Israel	\$149,833,527	\$211,290,153	\$165,473,196	41.02%	27.69%	19
26	Sweden	\$238,785,309	\$208,856,665	\$86,727,366	-12.53%	140.82%	31
27	Denmark	\$222,364,933	\$184,560,612	\$102,967,402	-17.00%	79.24%	29
28	Dominican Republic	\$149,652,483	\$184,188,999	\$8,157,757	23.08%	2157.84%	56
29	Indonesia	\$293,540,972	\$177,327,203	\$378,534,568	-39.59%	-53.15%	11
30	Czech Republic	\$125,520,783	\$164,408,059	\$42,036,178	30.98%	291.11%	38
31	Cambodia	\$256,202,207	\$155,359,298	\$155,674,840	-39.36%	-0.20%	21
32	Poland	\$139,501,261	\$149,600,648	\$51,381,690	7.24%	191.16%	36
33	Brazil	\$161,333,659	\$125,197,984	\$151,240,807	-22.40%	-17.22%	22
34	Australia	\$106,150,572	\$97,780,899	\$164,746,066	-7.88%	-40.65%	20
35	Hungary	\$62,017,250	\$68,231,277	\$21,957,078	10.02%	210.75%	50
	Other	\$1,062,799,899	\$908,751,693	\$1,177,817,726	-14.49%	-22.84%	
	Total	\$41,027,961,115	\$39,279,204,354	\$22,223,027,345	-4.26%	76.75%	

WISCONSIN TRADE DATA



TOP PRODUCTS IMPORTED INTO WISCONSIN

2023 RANK 1 2	PRODUCT CATEGORY	2022					2013
2		2022	2023	2013	2022- 2023	2013- 2023	RANK
	Industrial Machinery	\$8,114,101,979	\$8,080,373,191	\$3,918,780,893	-0.42%	106.20%	1
_	Pharmaceutical Products	\$5,742,739,395	\$5,472,612,529	\$358,940,748	-4.70%	1424.66%	17
3	Electrical Machinery	\$5,086,303,985	\$4,790,027,746	\$2,617,430,636	-5.82%	83.00%	2
4	Medical and Scientific Instruments	\$2,487,456,250	\$3,944,385,401	\$1,530,493,330	58.57%	157.72%	4
5	Non-Rail Vehicles and Parts	\$2,302,154,803	\$2,360,983,756	\$1,158,526,489	2.56%	103.79%	5
6	Plastic Products	\$1,801,632,899	\$1,470,442,051	\$957,684,700	-18.38%	53.54%	7
7	Special Classifications	\$1,012,493,201	\$1,169,658,982	\$477,920,214	15.52%	144.74%	11
8	Apparel Articles, Knit or Crochet	\$1,302,852,805	\$887,320,151	\$1,715,239,152	-31.89%	-48.27%	3
9	Furniture, Bedding, Lamps	\$1,080,259,720	\$832,645,973	\$873,872,528	-22.92%	-4.72%	8
10	Paper Products	\$730,093,353	\$685,988,093	\$476,834,619	-6.04%	43.86%	12
11	Apparel Articles, Non-Knit	\$823,991,371	\$644,887,015	\$995,796,394	-21.74%	-35.24%	6
12	Articles of Iron or Steel	\$775,370,968	\$639,865,337	\$427,661,393	-17.48%	49.62%	13
13	Mineral Fuel, Oil, Etc.	\$636,095,398	\$561,513,140	\$172,636,312	-11.73%	225.26%	23
14	Metal Tools, Cutlery, Etc.	\$514,061,722	\$512,372,580	\$151,252,348	-0.33%	238.75%	25
15	Iron and Steel Products	\$685,561,536	\$502,304,829	\$231,012,347	-26.73%	117.44%	19
16	Wood Products	\$613,734,076	\$470,582,844	\$378,438,132	-23.32%	24.35%	16
17	Misc. Base Metal Products	\$455,577,983	\$397,196,527	\$299,568,790	-12.81%	32.59%	18
18	Textile Art, Needlecraft Sets	\$463,940,868	\$373,722,742	\$404,361,086	-19.45%	-7.58%	14
19	Toys, Games, Sporting Goods	\$573,559,426	\$349,451,343	\$498,411,480	-39.07%	-29.89%	10
20	Aluminum Products	\$460,356,227	\$323,002,569	\$166,860,661	-29.84%	93.58%	24
21	Wood Pulp	\$377,935,686	\$301,414,673	\$398,655,559	-20.25%	-24.39%	15
22	Footware	\$432,437,281	\$245,496,792	\$583,920,609	-43.23%	-57.96%	9
23	Ceramic Products	\$105,303,337	\$230,120,039	\$79,887,267	118.53%	188.06%	39
24	Organic Chemicals	\$304,563,819	\$212,738,712	\$194,849,912	-30.15%	9.18%	22
25	Misc. Chemical Products	\$279,014,821	\$205,439,891	\$224,486,941	-26.37%	-8.48%	20
26	Rubber Products	\$256,396,647	\$204,626,604	\$195,522,417	-20.19%	4.66%	21
27	Starch, Glue, Enzymes	\$228,400,535	\$199,291,659	\$85,047,039	-12.74%	134.33%	35
28	Misc. Edible Preparations	\$225,951,918	\$189,948,823	\$115,964,441	-15.93%	63.80%	28
29	Inorganic Chemicals, Rare- Earth Metals	\$103,099,877	\$140,967,938	\$81,566,959	36.73%	72.82%	37
30	Fertilizers	\$181,667,508	\$131,403,771	\$135,873,784	-27.67%	-3.29%	26
31	Edible Vegetables, Roots, Tubers	\$119,442,414	\$125,936,824	\$50,370,455	5.44%	150.02%	50
32	Articles of Stone, Plaster, Cement, Etc.	\$128,131,120	\$124,523,578	\$80,570,713	-2.82%	54.55%	38
33	Glass And Glassware	\$122,314,780	\$122,535,203	\$118,798,208	0.18%	3.15%	27
34	Leather Products	\$135,094,215	\$118,909,875	\$88,752,348	-11.98%	33.98%	34
35	Misc. Manufactured Articles	\$94,339,625	\$116,841,283	\$21,496,111	23.85%	443.55%	66
	Other	\$2,271,529,567	\$2,139,671,890	\$1,955,542,330	-5.80%	9.42%	
	Total	\$41,027,961,115	\$39,279,204,354	\$22,223,027,345	-4.26%	76.75%	

DATA SOURCE: The U.S. Census Bureau is the official source for U.S. export and import data, including data by individual state. WEDC subscribes to WISERTrade, an online service from the World Institute for Strategic Economic Research in Leverett, MA, that converts the raw census data into a more user-friendly format, http://www.wisertrade.org/.