

WISCONSIN ECONOMIC FORECAST – AUGUST 2023

- S&P Global has revised its real GDP growth forecasts for 2023, from 1.8% to 2.2%, and for 2024, from 1.2% to 1.4%.
- For 2023, the upward revision reflects newly reported unexpected strength in the middle quarters of the year.
- The upward revision to 2024 is tilted toward the beginning of the year, while growth of the last quarter of 2024, year-over-year, was revised down from 1.3% to 1.1%, and for 2025 from 1.6% to 1.4%.
- Recent financial turmoil has waned but translates into tightening of lending standards that undermine growth of consumption and GDP this year and next.
- The Fed raised the fed funds rate in July to a range of 5.25% to 5.5%. The forecast expects one more hike to bring the rate to a peak range of 5.5% to 5.75% in November and no reversal until mid-2024.
- Employment growth is still strong, but the forecast predicts slower employment growth toward the end of the year and into next year. The US unemployment rate is expected to rise to a peak of 4.8% in late 2026.

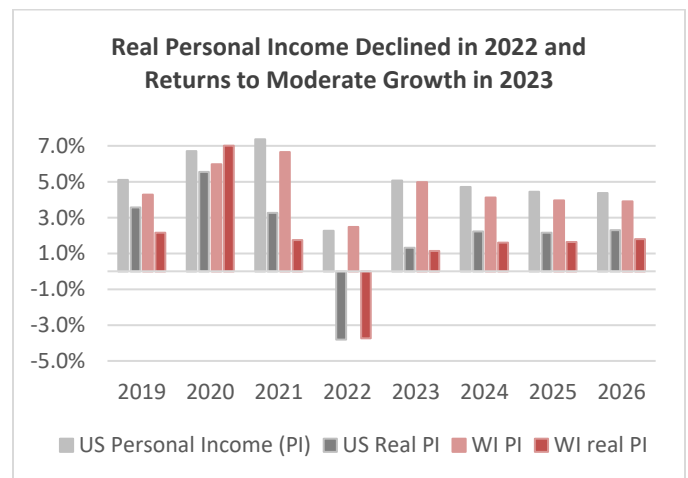
Strong growth in 2023 suggests that tight labor markets may persist until 2024. The recent resilience in spending and employment, persistently strong wage gains, and still-elevated core inflation signal the need for tighter financial conditions to slow growth enough to contain inflation. The forecast delays the expected period of slow growth to start by mid-2024. In the labor market, payroll gains have been slowing but have been sufficient to keep the labor force fully employed. In July, US payrolls grew by 187,000, while over the six months ending in July, they grew at an average monthly rate of 223,000 per month. The trend in payroll gains has been steadily declining since late 2021 and is expected to continue pushing the unemployment rate upwards until it peaks at 4.8% in 2026.

The forecast risks are still slightly tilted to the downside. S&P Global assigned a 55% likelihood to the slow-growth baseline scenario and 25% to the pessimistic recession scenario that includes a pause in growth compared to a growth slowdown in the baseline scenario.

US nominal personal income grew 2.3% in 2022, but inflation transformed that growth into a decline of 3.8% of real personal income. The expected 5.1% growth of personal

- Headline inflation has fallen convincingly below core inflation, following declines in prices of energy and agricultural commodities. The core PCE (personal consumption expenditures) price index remains high at 4.1%, well above the Federal Reserve's 2% target.
- Wisconsin total employment reached its pre-pandemic level in February of 2023, while private employment was at that level in September of 2022. US Total employment surpassed its pre-pandemic level by mid-2022.
- Wisconsin employment is expected to grow 1.6% in 2023, then stay almost flat through 2026. The Wisconsin unemployment rate is expected to rise to 3.8% in 2026.
- Wisconsin personal income increased 2.5% in 2022, with 8.0% growth in wages and salaries. The forecast anticipates nominal personal income growth of 5.0% in 2023 and 4.1% in 2024. High inflation rates yield a *decline* of 3.7% in real personal income in 2022 and expected growth of 1.1% in 2023.

income in 2023 will translate into mild growth of 1.3% after adjusting for inflation. S&P Global expects core PCE inflation to slow to 4.2% this year, before falling to 2.8% in 2024 and 2.2% in 2025.

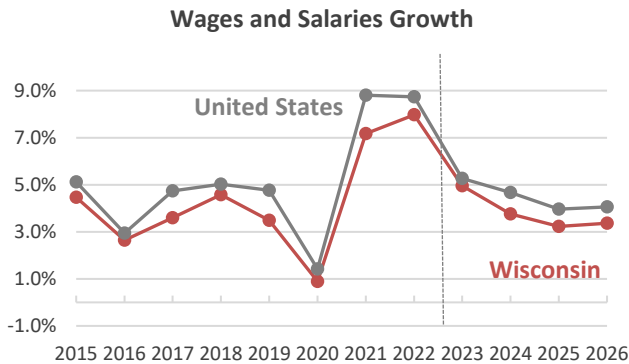


Sources: Bureau of Economic Analysis and Wisconsin DOR (forecast).

The latest release of state personal income shows that Wisconsin personal income grew 6.9% at an annual rate in the first quarter of 2023, compared to 5.1% nationwide and 5.2% in the Great Lakes region. The increase of personal transfers payments was the main driver of growth for Wisconsin personal income (19.4%), compared to increases of

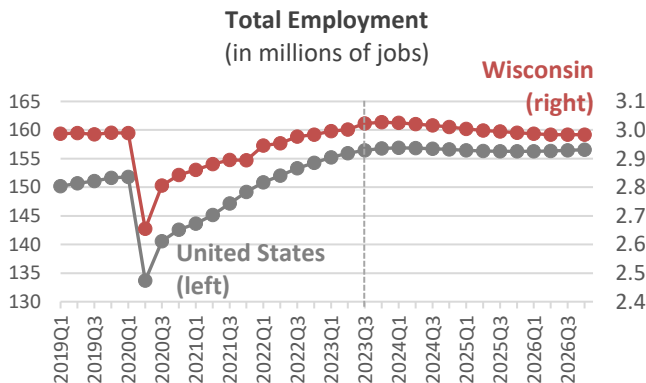
6.1% nationwide and 7.5% for the Great Lakes region. Wisconsin net earnings (mostly wages and salaries) grew 4.0% in Wisconsin, below the 4.6% of the US and 4.8% of the Great Lakes region.

The forecast expects Wisconsin nominal personal income to grow 5.0% in 2023 and 4.1% in 2024. After adjusting for inflation, Wisconsin real personal income is forecasted to increase 1.1% in 2023 and 1.6% in 2024 and 2025 as inflation moderates.



Sources: Bureau of Economic Analysis and Wisconsin DOR (forecast).

Wages and salaries are expected to increase 5.0% in Wisconsin and 5.3% in the US in 2023, following growth of 8.0% and 8.8% in 2022, respectively. The outlook for 2024 expects another year of positive although slower wage growth in Wisconsin (3.8%) and nationwide (4.7%). The Fed's policy of higher rates will slow employment growth while lowering inflation, bringing growth of wages and salaries, and personal income, down too.



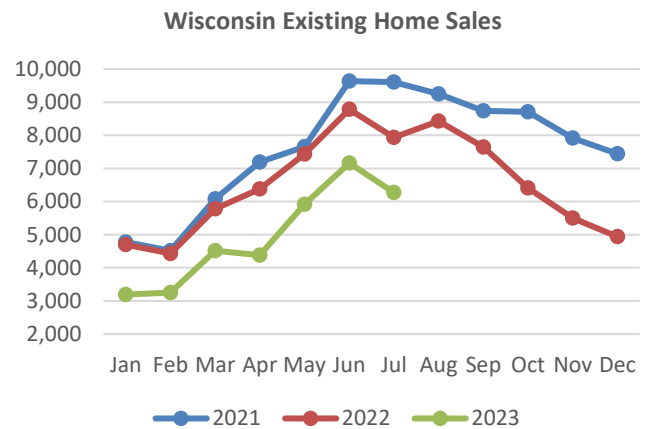
Sources: Bureau of Labor Statistics (CES) and Wisconsin DOR (forecast).

The state CES (Current Employment Statistics) jobs data show Wisconsin employment grew 1.7% in the first half of 2023, compared to 2.7% nationwide. The outlook projects total nonfarm Wisconsin employment to grow 1.6% in 2023 and stay flat for the next three years showing small up and down

changes. Service-providing industries are leading the growth in 2023, with leisure and hospitality growing 3.6%, other services 2.8% and education and health services 2.4%. The two largest sectors: trade, transportation and utilities, and manufacturing are expected to grow 1.3% and 0.6%, respectively.

Current employment data show that six Wisconsin employment sectors reached their pre-pandemic level by July. Meanwhile the other five sectors still show a level of employment below that of February 2020, namely: leisure and hospitality (-3.9%), government (-3.4%), other services (-2.1%), information (-8.3%), and natural resources and mining (-2.6%). The household survey showed the Wisconsin unemployment rate at 2.6% in July, up from a bottom of 2.4% in May. This rate is low by historical standards and well below the 3.8% nationwide.

The Federal Reserve started to adjust the fed funds in March 2022 and completed eleven rate hikes to date that brought the fed funds rate to a range of 5.25% to 5.50% as of July. The August forecast assumed one more rate increases and no reversal until mid-2024. Higher interest rates and prices reduced home ownership affordability.



Sources: Wisconsin Realtors Association

The number of existing home sales in Wisconsin published by the WRA is shown in the chart above. The number of homes sold in 2022 were 14.4% below the number of sales in 2021. This decline continued in 2023, with sales through July falling 23.6%, compared to the same period in 2022. Prices continued to grow at a slightly slower pace in the first seven months of 2023, growing 7.8% versus growth of 9.5% in 2022. The median home price increased 46% in the past four years, from \$205,000 in July 2019 to \$300,000 in July 2023, while most income measures grew by less than half of that growth.

Employment (Annual)**Table 1. Wisconsin CES Employment Forecast: Industry Detail**

(Thousands of jobs)

	History				Forecast			
	2019	2020	2021	2022	2023	2024	2025	2026
Total Nonfarm	2,988.1	2,822.9	2,882.5	2,965.0	3,011.9	3,018.0	3,003.7	3,000.9
% Change	0.2	-5.5	2.1	2.9	1.6	0.2	-0.5	-0.1
Private Nonfarm	2,578.1	2,435.6	2,492.1	2,568.9	2,607.8	2,607.0	2,590.5	2,586.9
% Change	0.4	-5.5	2.3	3.1	1.5	0.0	-0.6	-0.1
Natural Resources & Mining	4.2	3.5	3.5	3.7	3.8	3.9	4.0	4.2
% Change	-11.2	-15.5	-1.2	5.5	3.5	1.0	3.7	5.5
Construction	124.5	124.1	126.6	131.3	133.8	133.9	133.7	134.2
% Change	1.7	-0.3	2.0	3.7	1.9	0.1	-0.2	0.4
Manufacturing	483.4	459.1	466.3	481.2	483.9	475.3	463.2	457.9
% Change	0.8	-5.0	1.6	3.2	0.6	-1.8	-2.5	-1.2
Trade, Transportation & Utilities	535.4	520.3	533.2	549.8	556.7	547.2	533.9	527.4
% Change	-0.9	-2.8	2.5	3.1	1.3	-1.7	-2.4	-1.2
Information	47.1	45.0	44.9	46.3	46.3	47.7	48.5	48.0
% Change	-0.3	-4.4	-0.1	3.2	-0.1	3.1	1.7	-1.0
Financial Activities	154.4	153.1	154.3	158.8	160.4	160.7	161.5	162.3
% Change	0.9	-0.9	0.8	2.9	1.0	0.2	0.5	0.5
Professional & Business Services	326.9	309.5	316.4	327.8	328.2	330.2	332.1	332.3
% Change	-0.5	-5.3	2.2	3.6	0.1	0.6	0.6	0.1
Education & Health Services	464.0	450.6	452.8	457.5	468.5	474.0	474.3	473.4
% Change	1.5	-2.9	0.5	1.0	2.4	1.2	0.1	-0.2
Leisure & Hospitality	285.6	227.5	251.1	266.7	276.2	282.5	285.6	291.5
% Change	1.1	-20.3	10.4	6.2	3.6	2.3	1.1	2.1
Other Services	152.7	142.8	142.9	145.8	149.9	151.8	153.6	155.8
% Change	0.3	-6.4	0.0	2.1	2.8	1.2	1.2	1.4
Government	410.0	387.3	390.4	396.1	404.1	411.0	413.2	414.0
% Change	-0.9	-5.5	0.8	1.5	2.0	1.7	0.5	0.2
Federal Government	29.3	30.8	29.9	29.5	30.3	30.3	30.3	30.3
% Change	0.7	5.1	-2.9	-1.4	2.7	0.0	0.0	0.0
State & Local Government	380.7	356.5	360.5	366.6	373.9	380.7	382.9	383.7
% Change	-1.0	-6.4	1.1	1.7	2.0	1.8	0.6	0.2

Table 2. Wisconsin Household Survey Employment Measures

	History				Forecast			
	2019	2020	2021	2022	2023	2024	2025	2026
Labor Force	3,111.8	3,093.9	3,100.9	3,082.5	3,100.3	3,130.3	3,141.9	3,158.8
% Change	-0.4	-0.6	0.2	-0.6	0.6	1.0	0.4	0.5
Employment	3,012.8	2,896.5	2,981.8	2,992.1	3,020.1	3,037.3	3,030.2	3,038.0
% Change	-0.6	-3.9	2.9	0.4	0.9	0.6	-0.2	0.3
Unemployment Rate (%)	3.2	6.4	3.8	2.9	2.6	3.0	3.6	3.8

Source: Bureau of Labor Statistics, Wisconsin Department of Revenue (Forecast)

Employment (Quarterly)

Table 3. Wisconsin CES Employment Forecast: Industry Detail
(Thousands of jobs, seasonally adjusted data, annual rate of change)

	History				Forecast			
	2022:3	2022:4	2023:1	2023:2	2023:3	2023:4	2024:1	2024:2
Total Nonfarm	2,976.9	2,984.3	2,995.6	3,001.5	3,023.4	3,027.1	3,025.0	3,020.6
% Change	2.8	3.1	1.7	1.6	1.6	1.4	1.0	0.6
Private Nonfarm	2,578.5	2,584.9	2,594.2	2,598.7	2,618.6	2,619.5	2,615.6	2,609.9
% Change	2.9	1.0	1.5	0.7	3.1	0.1	-0.6	-0.9
Natural Resources & Mining	3.7	3.8	3.8	3.8	3.8	3.8	3.8	3.8
% Change	3.7	7.4	3.6	0.0	2.6	-0.5	0.3	1.7
Construction	131.9	133.0	133.3	134.6	133.7	133.6	134.2	133.9
% Change	5.0	3.4	0.9	4.1	-2.7	-0.2	1.7	-0.9
Manufacturing	483.0	484.3	485.3	483.0	484.7	482.7	480.3	476.5
% Change	2.3	1.1	0.8	-1.9	1.4	-1.6	-2.0	-3.2
Trade, Transportation & Utilities	551.0	551.9	553.9	556.2	558.2	558.6	554.2	549.7
% Change	1.1	0.6	1.5	1.7	1.4	0.3	-3.1	-3.3
Information	46.6	47.0	45.6	44.7	47.4	47.5	47.5	47.5
% Change	4.7	2.9	-11.1	-7.9	26.3	1.1	0.2	0.0
Financial Activities	159.0	159.7	160.5	160.9	160.0	160.2	160.4	160.4
% Change	1.2	1.7	2.0	1.2	-2.4	0.5	0.6	0.1
Professional & Business Services	329.9	326.7	325.0	326.8	330.8	330.3	330.6	330.0
% Change	2.3	-3.9	-2.0	2.2	5.0	-0.6	0.3	-0.7
Education & Health Services	459.8	461.8	466.2	466.1	470.6	471.0	472.5	473.9
% Change	4.7	1.7	3.9	-0.1	3.9	0.3	1.3	1.2
Leisure & Hospitality	267.3	270.0	271.9	272.4	279.4	281.2	280.9	282.6
% Change	4.4	4.1	2.8	0.8	10.7	2.5	-0.4	2.4
Other Services	146.3	146.9	148.8	150.1	150.1	150.6	151.2	151.6
% Change	3.7	1.7	5.4	3.6	-0.2	1.4	1.5	1.1
Government	398.4	399.4	401.3	402.8	404.8	407.6	409.4	410.7
% Change	5.4	1.1	1.9	1.5	2.0	2.8	1.8	1.3
Federal Government	29.4	29.5	30.0	30.4	30.4	30.3	30.3	30.3
% Change	-0.5	1.4	7.0	5.4	-0.1	-0.9	-0.7	0.2
State & Local Government	369.0	369.9	371.3	372.4	374.4	377.3	379.1	380.4
% Change	5.9	1.1	1.5	1.2	2.2	3.1	2.0	1.4

Table 4. Wisconsin Household Survey Employment Measures

	History				Forecast			
	2022:3	2022:4	2023:1	2023:2	2023:3	2023:4	2024:1	2024:2
Labor Force	3,076.7	3,068.4	3,070.7	3,099.4	3,113.3	3,117.6	3,122.1	3,127.2
% Change	-1.9	-1.1	0.3	3.8	1.8	0.6	0.6	0.7
Employment	2,982.4	2,975.8	2,988.2	3,025.1	3,032.3	3,034.9	3,036.6	3,037.2
% Change	-0.1	-0.6	-0.7	0.8	1.7	2.0	1.6	0.4
Unemployment Rate (%)	3.1	3.0	2.7	2.4	2.6	2.7	2.7	2.9

Source: Bureau of Labor Statistics, Wisconsin Department of Revenue (Forecast)

Employment (Quarterly)

Table 3b. Wisconsin CES Employment Forecast: Industry Detail

(Thousands of jobs, year-over-year change)

	History				Forecast			
	2022:3	2022:4	2023:1	2023:2	2023:3	2023:4	2024:1	2024:2
Total Nonfarm	2,976.9	2,984.3	2,995.6	3,001.5	3,023.4	3,027.1	3,025.0	3,020.60
% Change	2.8	3.1	1.7	1.6	1.6	1.4	1.0	0.6
Private Nonfarm	2,578.5	2,584.9	2,594.2	2,598.7	2,618.6	2,619.5	2,615.6	2,609.9
% Change	3.1	3.2	1.7	1.5	1.6	1.3	0.8	0.4
Natural Resources & Mining	3.7	3.8	3.8	3.8	3.8	3.8	3.8	3.8
% Change	7.8	5.6	5.6	3.6	3.4	1.4	0.6	1.0
Construction	131.9	133.0	133.3	134.6	133.7	133.6	134.2	133.9
% Change	4.5	3.1	2.6	3.3	1.4	0.5	0.7	-0.6
Manufacturing	483.0	484.3	485.3	483.0	484.7	482.7	480.3	476.5
% Change	3.4	2.7	1.7	0.6	0.4	-0.3	-1.0	-1.3
Trade, Transportation & Utilities	551.0	551.9	553.9	556.2	558.2	558.6	554.2	549.7
% Change	3.0	4.2	1.3	1.2	1.3	1.2	0.1	-1.2
Information	46.6	47.0	45.6	44.7	47.4	47.5	47.5	47.5
% Change	3.5	4.6	-0.1	-3.1	1.5	1.1	4.2	6.3
Financial Activities	159.0	159.7	160.5	160.9	160.0	160.2	160.4	160.4
% Change	2.9	4.1	1.7	1.5	0.6	0.3	0.0	-0.3
Professional & Business Services	329.9	326.7	325.0	326.8	330.8	330.3	330.6	330.0
% Change	4.2	3.7	-0.4	-0.4	0.3	1.1	1.7	1.0
Education & Health Services	459.8	461.8	466.2	466.1	470.6	471.0	472.5	473.9
% Change	1.2	3.2	2.7	2.6	2.4	2.0	1.4	1.7
Leisure & Hospitality	267.3	270.0	271.9	272.4	279.4	281.2	280.9	282.6
% Change	4.7	1.1	2.6	3.0	4.5	4.1	3.3	3.7
Other Services	146.3	146.9	148.8	150.1	150.1	150.6	151.2	151.6
% Change	1.8	2.6	2.4	3.6	2.6	2.5	1.6	1.0
Government	398.4	399.4	401.3	402.8	404.8	407.6	409.4	410.7
% Change	1.3	2.5	2.0	2.5	1.6	2.0	2.0	2.0
Federal Government	29.4	29.5	30.0	30.4	30.4	30.3	30.3	30.3
% Change	-2.0	-0.4	1.2	3.3	3.4	2.8	0.9	-0.4
State & Local Government	369.0	369.9	371.3	372.4	374.4	377.3	379.1	380.4
% Change	1.5	2.7	2.1	2.4	1.5	2.0	2.1	2.2

Table 4b. Wisconsin Household Survey Employment Measures

	History				Forecast			
	2022:3	2022:4	2023:1	2023:2	2023:3	2023:4	2024:1	2024:2
Labor Force	3,076.7	3,068.4	3,070.7	3,099.4	3,113.3	3,117.6	3,122.1	3,127.2
% Change	-0.8	-0.7	-0.8	0.3	1.2	1.6	1.7	0.9
Employment	2,982.4	2,975.8	2,988.2	3,025.1	3,032.3	3,034.9	3,036.6	3,037.2
% Change	-0.1	-0.6	-0.7	0.8	1.7	2.0	1.6	0.4
Unemployment Rate (%)	3.1	3.0	2.7	2.4	2.6	2.7	2.7	2.9

Source: Bureau of Labor Statistics, Wisconsin Department of Revenue (Forecast)

Wisconsin Personal Income (Annual)

Table 5. Wisconsin Personal Income by Major Source

(\$ Billions)

	History				Forecast			
	2019	2020	2021	2022	2023	2024	2025	2026
Total Personal Income	311.0	329.6	351.6	360.3	378.2	393.7	409.3	425.3
% Change	4.3	6.0	6.7	2.5	5.0	4.1	4.0	3.9
Wages and Salaries	155.6	157.0	168.2	181.6	190.6	197.8	204.2	211.0
% Change	3.5	0.9	7.2	8.0	5.0	3.8	3.2	3.4
Supplements to Wages and Salaries	40.6	40.1	41.0	42.8	44.7	46.3	47.8	49.4
% Change	2.5	-1.1	2.3	4.3	4.4	3.6	3.2	3.3
Proprietor's Income	20.1	23.8	24.6	27.0	27.0	27.5	28.4	29.3
% Change	4.0	18.6	3.3	9.9	-0.1	2.0	3.1	3.3
Property Income	61.2	61.7	63.3	66.0	69.4	74.2	78.5	81.6
% Change	6.8	0.8	2.7	4.2	5.1	7.0	5.8	3.9
Personal Interest Income	24.8	24.7	25.1	25.9	27.5	31.7	35.7	37.5
% Change	3.4	-0.5	1.6	3.2	6.2	15.4	12.4	5.0
Personal Dividend Income	25.2	25.5	27.1	28.1	28.6	29.7	30.8	31.8
% Change	13.5	0.9	6.4	3.8	1.9	3.7	3.5	3.5
Rental Income	11.2	11.5	11.2	12.0	13.3	12.8	12.1	12.3
% Change	0.5	3.3	-3.1	7.6	10.4	-3.6	-5.5	1.5
Personal Current Transfer Receipts	54.4	68.7	76.7	66.8	71.7	74.1	77.6	82.0
% Change	5.0	26.2	11.7	-12.9	7.4	3.4	4.6	5.7
Residence Adjustment	4.2	4.0	4.3	4.6	4.7	4.9	5.0	5.2
% Change	6.7	-5.9	7.5	8.1	3.0	3.6	2.9	3.0
Contributions to Govt. Social Ins.	25.1	25.6	26.6	28.6	30.0	31.1	32.2	33.2
% Change	4.0	2.2	4.0	7.3	4.8	3.9	3.3	3.3

Table 6. Wisconsin Related Income Measures

(Different units)

	History				Forecast			
	2019	2020	2021	2022	2023	2024	2025	2026
Real Personal Income (2012 \$ Billions)	300.0	321.1	326.7	314.5	318.0	323.2	328.4	334.3
% Change	2.2	7.0	1.8	-3.7	1.1	1.6	1.6	1.8
Population (Millions)	5.880	5.896	5.880	5.893	5.910	5.930	5.940	5.960
% Change	0.4	0.3	-0.3	0.2	0.3	0.3	0.3	0.3
Per Capita Income (\$)	52,893	55,904	59,787	61,210	64,019	66,452	68,885	71,357
Change	3.9	5.7	6.9	2.4	4.7	3.8	3.7	3.6
Personal Tax & Nontax Payments (\$ Billions)	35.3	35.2	40.3	48.1	44.1	44.2	45.7	47.5
% Change	8.1	-0.3	14.6	19.3	-8.2	0.0	3.4	4.1
Disposable Personal Income (\$ Billions)	275.7	294.5	311.3	312.2	334.0	349.6	363.6	377.7
% Change	3.8	6.8	5.7	0.3	7.0	4.7	4.0	3.9
GDP (\$ Billions)	345.2	340.6	368.6	401.8	423.8	439.0	453.4	468.9
% Change	3.8	-1.3	8.2	9.0	5.5	3.6	3.3	3.4
Real GDP (chained 2012 \$ Billions)	303.7	293.1	306.5	311.7	317.0	320.3	323.3	327.2
% Change	1.5	-3.5	4.6	1.7	1.7	1.0	1.0	1.2

Source: Bureau of Economic Analysis, Wisconsin Department of Revenue (Forecast)

Wisconsin Personal Income (Quarterly)

Table 7. Wisconsin Personal Income by Major Source
(\$ Billions, seasonally adjusted, annual rate of change)

	History				Forecast			
	2022:2	2022:3	2022:4	2023:1	2023:2	2023:3	2023:4	2024:1
Total Personal Income	356.3	364.9	367.4	373.5	375.8	379.9	383.5	388.1
% Change	4.3	10.0	2.8	6.9	2.5	4.4	3.9	4.8
Wages and Salaries	178.3	185.2	185.5	187.8	189.0	192.0	193.8	195.3
% Change	1.9	16.4	0.7	4.9	2.6	6.5	3.8	3.2
Supplements to Wages and Salaries	42.2	43.3	43.7	44.2	44.3	44.9	45.3	45.7
% Change	3.1	10.8	3.6	4.2	1.5	5.2	3.8	3.7
Proprietor's Income	27.2	27.2	27.2	27.2	26.8	26.8	27.1	27.2
% Change	9.4	0.5	-0.2	0.9	-6.3	0.1	4.0	2.0
Property Income	65.7	66.4	67.5	68.3	69.1	69.6	70.7	72.1
% Change	7.0	4.4	6.9	4.6	5.0	3.0	6.3	8.1
Personal Current Transfer Receipts	66.5	67.2	68.0	71.1	71.6	72.0	72.3	73.7
% Change	5.6	4.6	4.6	19.4	3.3	1.8	1.8	8.2
Residence Adjustment	4.6	4.7	4.6	4.7	4.7	4.8	4.8	4.9
% Change	6.8	5.8	-0.8	2.1	2.6	6.4	3.6	3.2
Contributions to Government Social Ins.	28.1	29.1	29.2	29.6	29.7	30.1	30.4	30.8
% Change	1.6	14.9	0.8	6.4	1.6	5.5	3.8	4.9

Source: Bureau of Economic Analysis, Wisconsin Department of Revenue (Forecast)

General Purposes Revenues

Table 8. General Purposes Revenues, Fiscal Year 2023 Totals (Preliminary)
(\$ Millions)

	FY2022	FY2023	Annual Change	Expected Revenues	\$ Difference
Individual Income Tax	9,214.4	9,414.7	2.2%	9,450.0	-35.3
General Sales Tax	6,978.3	7,456.1	6.8%	7,480.0	-23.9
Corporate Franchise Tax	2,960.0	2,748.5	-7.1%	2,715.0	33.5
Other Revenues	1,395.7	1,354.7	-2.9%	1,343.1	11.6
Total GPR	20,548.4	20,974.0	2.1%	20,988.1	-14.1

Source: Wisconsin Department of Revenue

Expected Revenues are based on the Wisconsin Legislative Fiscal Bureau's May 2023 forecast for FY2023.