

# COLORADO BUSINESS REVIEW

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## Colorado 2022 Midyear Economic Update



back 21.5 million jobs since May 2020, leaving the U.S. 0.3% (524,000 jobs) shy of the pre-recession peak recorded in February 2020. The U.S. is effectively at full employment—the unemployment rate stood at 3.6% in June 2022 compared to 3.5% in February 2020, and down from 14.7% in April 2020. The civilian labor force was close to the all-time high (-0.4%) in June, as was household employment (-0.5%). The labor force participation rate and the employment-population ratio remained 1.2 percentage points below January 2020, a signal that there is still room to grow jobs as workers are enticed back.

Colorado outperformed the nation and most states in job recovery and growth. The state recorded 2,855,000 jobs as of May 2022—1.2% above the pre-recession peak and 4.6% above May 2021 levels. Colorado is one of just 14 states above pre-recession levels. The unemployment rate descended to 3.5% in May. Labor force continues to set records in Colorado, and year-over-year growth ranked the state 5th in May and the labor force participation rate ranked Colorado 2nd nationally.

Heading into 2022, the Colorado Business Economic Outlook estimating committee projected job growth of 74,000 jobs. These estimates were

### Overview

The U.S. economy swiftly rebounded from the pandemic recession in 2021, reaching new highs and recording the fastest real GDP growth observed in nearly four decades. The 5.7% annual growth segued to a modest 1.4% annualized rate of decline in Q1 2022 according to the Bureau of Economic Analysis (BEA). Expectations for 2022 and 2023 have dimmed—Consensus Forecasts now projects 2.1% growth for the current year and 1% growth in 2023.

Despite the Q1 drop in GDP, two major components of the economy continued to expand: consumption,

which represents more than 70% of the economy, grew 2.7% and investment, which represents about 20% of real GDP, grew 2.3%. The two detractors from growth included government spending, which fell 2.7%, and net exports, which declined to -\$1.54 trillion.

On the positive front, the labor market remained strong in the first half of 2022. The job openings rate published by the Bureau of Labor Statistics was at a record level in the 22-year series, and the ratio of unemployed individuals to job openings rate remained at a record low. The U.S. added 2.7 million jobs in the first six months of 2022, and added



# FROM THE EDITOR

With arguably the worst of the COVID virus in the rearview mirror, consumers and businesses have moved on to new economic crises, ranging from lingering supply chain shortages, rapid inflation, and rising interest rates led by restrictive Fed policy. We present the midyear review of the Colorado economy in this issue of the *Colorado Business Review*, where we evaluate the observed data halfway through 2022 and update our expectations for the remainder of the year. The information presented is compiled from remarks made by Colorado Business Economic Outlook committee chairs at a roundtable meeting held in mid-June. Industry sector summaries include comparisons of the current economic situation to the forecast presented last December. In addition, key factors influencing recent economic trends are noted.

We greatly appreciate the time and input from the individuals who contributed to this update; their names are listed on the back page. I also acknowledge the BRD research staff—Brian Lewandowski and Trevor Hall—who collected data and conducted additional analysis for this issue.

Please contact me directly at 303-492-1147 with any comments or questions.

—Richard Wobbekind

revised up to 125,000 during the March update. At a meeting held in early June, the chairs of the 14 Colorado Business Economic Outlook Forum committees deliberated on the headwinds and tailwinds for each industry. The revised outlook for Colorado employment growth in 2022 is 104,000 (3.8%), with gains spanning every major industry in the state.

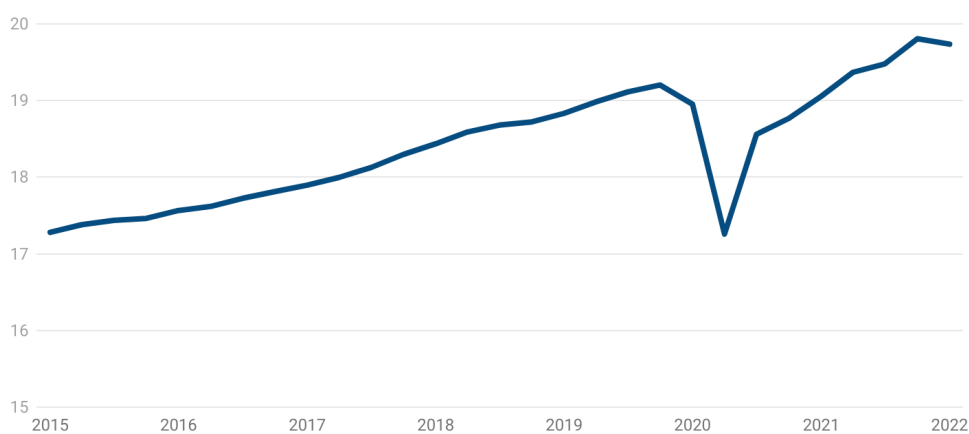
According to the Leeds Business Confidence Index (LBCI), business confidence soured ahead of Q3 2022 to the 5th-lowest level in the

20-year history of the index, driven down by concerns about inflation, interest rates, and the supply chain, among many other factors. Negative perceptions abounded for the national economy, state economy, industry sales, industry profits, hiring, and capital expenditures. The index remained pessimistic looking two quarters out to Q4 2022.

The headwinds are real, ranging from the highest inflation measured in the last four decades to restrictive Fed policy that drove up short-term

## U.S. Real GDP

U.S. Quarterly GDP, \$ Trillions



Source: Bureau of Economic Analysis and Consensus Forecasts • Created with Datawrapper

## Colorado's Rank Among Other States

Metric	1-Year	3-Year	5-Year	10-Year
Real GDP Growth	12	11	8	5
Employment Growth	12	10	7	6
Population Growth	17	24	23	21
Personal Income Growth	2	11	4	3
PCPI Growth	2	9	3	3
PCPI	8	11	12	20
Average Hourly Wage % Growth	3	25	10	25
Average Annual Pay % Growth	27	10	10	10
Average Annual Pay	8	9	11	12
Unemployment Rate	28	28	11	25
Labor Force % Growth	5	5	4	3
LFPR	2	4	7	9
FHFA Home Price Index Growth	20	16	13	8

Source: Bureau of Economic Analysis, Bureau of Labor Statistics, U.S. Census Bureau, Colorado Department of Local Affairs, Federal Housing Finance Agency All Transaction Index, BRD Calculations. \*Unemployment rate for the last month. • Created with Datawrapper

interest rates and pushed mortgages to the highest rates in over a decade. Housing starts have fallen. Small business conditions reported by the National Federation of Independent Business were at record lows, the Consumer Sentiment Survey has been depressed, and the stock market has been dancing around bear territory. The supply chain has yet to heal, and consumer demand may be cooling based on the May retail sales figures from the U.S. Census Bureau. Gasoline prices stand at record highs.

Despite the headwinds, Colorado has a history of outperforming the nation. While the Business Research Division acknowledges headwinds will have a slowing effect on the economy, researchers remain optimistic that Colorado will continue to be a leading state in the national economy.

## Population and Employment

According to the U.S. Census Bureau, Colorado's population increased by approximately 49,200 in 2020 and 30,000 in 2021. Both net migration and the natural increase slowed in 2020 and 2021 driving down population growth.

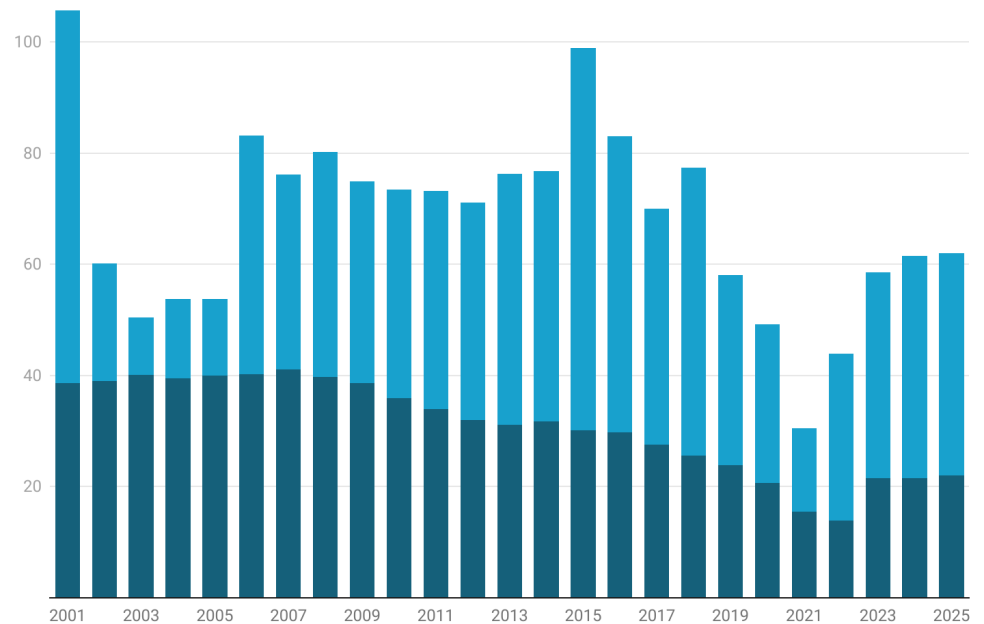
For 2022, births are forecast to remain around 62,000, with continued elevated deaths due to COVID of around 50,000. The natural increase is an estimated at 12,000. Net migration is expected to be around 30,000 in 2022. Overall population growth in Colorado is expected to be around 42,000, up from the estimated 30,000 in 2021.

From 2020 to 2021 over half of Colorado counties experienced a natural decline, meaning that local deaths exceed births. One third of the counties experienced net out-migration including the metro counties of Denver, Jefferson, Arapahoe, Boulder and Adams. The largest portion of outgoing residents continue to move to Texas, California, and Florida. These states are also the largest sources of in-migrants. Most counties are also seeing a decline in the

## Colorado Change in Population

Population Change, Thousands

■ Natural Increase (Births - Deaths) ■ Net Migration



Source: Colorado Demography Office, U.S. Census Bureau, and the Business Research Division • Created with Datawrapper

under-18 population due to the slow down in births.

Migration to the state has been greatly impacted by the pandemic with changes in mobility and a significant slow down in international migration. Likewise, the as concepts of work-from-home and digital nomads gain popularity, residency becomes slightly blurry. Note: population is counted at their place of residence - where they live most of the time. Visitors and digital nomads would not be counted as part of the resident population.

Colorado total nonfarm employment in May 2022 was 2.855 million, a year-over-year increase of 4.6%, or 124,600 jobs. Employment has rebounded in the state; as of May 2022 total employment stood 1.2%, or 35,100 jobs, above January 2020 levels. All supersectors in the state posted employment gains year-over-year, with Leisure and Hospitality observing the largest increase (12.5%), followed by Professional and Business Services (7%), and Other Services (5.2%).

Colorado's year-over-year growth in May totaled 124,600 jobs (4.6%). Three industries remained in deficit compared to pre-recession levels—Mining, Government, and Leisure and Hospitality.

The Boulder MSA observed the highest year-over-year employment growth in May 2022 (5.3%), followed by Denver-Aurora-Lakewood (4.7%), Pueblo (4.7%), Grand Junction (4.2%), Fort Collins-Loveland (4.2%), Colorado Springs (3.9%), and Greeley (3.6%). Colorado's unemployment rate has significantly retreated from the record highs seen in April 2020 due to the pandemic, sitting at 3.5% in May 2022, giving the state the 28th-lowest unemployment rate in the nation. The Boulder MSA had the lowest unemployment rate in the state in May at 2.4%, followed by Fort Collins (2.6%), Denver-Aurora-Lakewood (3.1%), Colorado Springs (3.2%), Grand Junction (3.3%), Greeley (3.3%), and Pueblo (4.9%). Unemployment rates have remained improved across the

state from the spike measured in April 2020 and are becoming comparable to pre-pandemic numbers.

Colorado's nominal GDP was \$426 billion as of Q4 2021, the 16th-largest in the country, led by Real Estate and Rental and Leasing, Government, and Professional, Scientific, and Technical Services. Real GDP grew 6.3% year-over-year, ranking 12th for growth in the nation. The three fastest-growing industries by real GDP in Q4 2021 were Accommodation and Food Services (31.4%); Arts, Entertainment and Recreation (29.3%); and Professional, Scientific, and Technical Services (18.9%).

### Agriculture

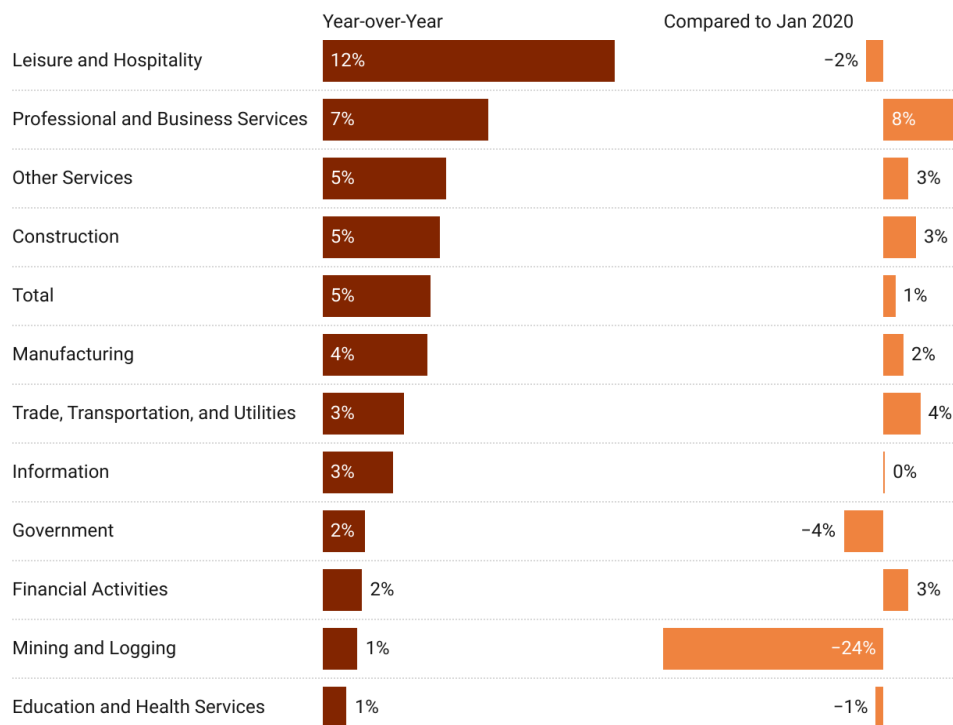
According to the BEA, Agriculture, Fishing, and Hunting nominal GDP totaled \$3.2 billion in Q4 2021, but real (inflation adjusted) GDP decreased 25.7% year-over-year.

Record inflation and high drought across the state drives prices for crops and animal products higher. Market prices for corn, wheat, fat cattle, milk, hogs, and sunflower are all generally higher across the board than a year ago. Corn prices are at a nine-year high (\$7.12 per bushel), and beef prices remain on the rise again this year. Input prices are more expensive across the board than a year ago: fuel, seed, feed, pesticides, and fertilizer have experienced price increases, as have farm labor, trucking and shipping, repairs, and equipment. Additionally, high interest rates will significantly impact operating expenses.

Supply chain disruptions also continue. Labor shortages result in logistical bottlenecks across transportation systems, which are necessary to facilitate agricultural trade. Supply issues in conjunction with record inflation results in higher prices, which would normally benefit Colorado farmers – however, significantly higher production costs are cutting into net income, and in some instances would mean producers could operate at a loss.

Wheat prices were volatile in 2021 and

## Colorado Employment Change (as of May 2022)



Source: Colorado Department of Labor and Employment. • Created with Datawrapper

remain so in 2022, with record drought conditions pushing prices to five-year highs (\$9.62/bushel as of April 2022). Record high temperatures and drought conditions in wheat-growing areas throughout the U.S. and Canada have reduced the supply. Additionally, the rise in wheat prices is partially due to the war in Ukraine, which disrupts the nation's capacity to produce and transport its wheat into market channels. The Colorado wheat crop totaled 69.5 million bushels in 2021, drastically higher than the 41 million bushels in 2020. Colorado winter wheat production is forecast to decrease 14.2% year-over-year in 2022, according to the USDA.

Colorado food and agricultural product exports reached a record \$2.3 billion in 2021 and that growth is continuing into 2022 with January-May levels 11% higher than a year ago. Beef and beef variety meats remain Colorado's top export, accounting for 66% of the \$1 billion of total food and agricultural product exports reported for Jan-May. Potato exports to Mexico are expected to see an

increase in 2022 as market access was expanded beginning May 15th to allow fresh potatoes from the U.S. to trade freely throughout all of Mexico. Prior to the agreement, U.S. fresh potatoes could only be sold within a 26 kilometer zone along the border.

The Colorado drought continues to affect ranchers, with rangeland conditions worsening and feed costs increasing, causing cattle producers to sell their herds. As of June 2022, Colorado was experiencing high instances of drought—82% of the state is experiencing at least moderate drought, 43% of the state is experiencing at least severe drought, and 16% of the state is experiencing at least extreme drought. Drought conditions are the worst in southern Colorado, with most counties south of Saguache County either experiencing severe or extreme drought. Moderate and severe drought numbers have fallen since the beginning of the calendar year. In conditions of moderate drought, dryland crops suffer, and farmers typically reduce planting. In severe

drought, farmers may reduce planting and sell cattle. In extreme drought, pasture conditions worsen, insect infestations are noted, and reservoirs fall to extremely low levels.

According to the USDA, U.S. farm income fell \$16.1 billion in 2021, to \$105.1 billion. In April 2022, U.S. farm income jumped 28.3% year-over-year. Additionally, the price of food in the U.S. surged 10.1% in the 12 months ending in May 2022, the highest level since 1981.

### Natural Resources and Mining

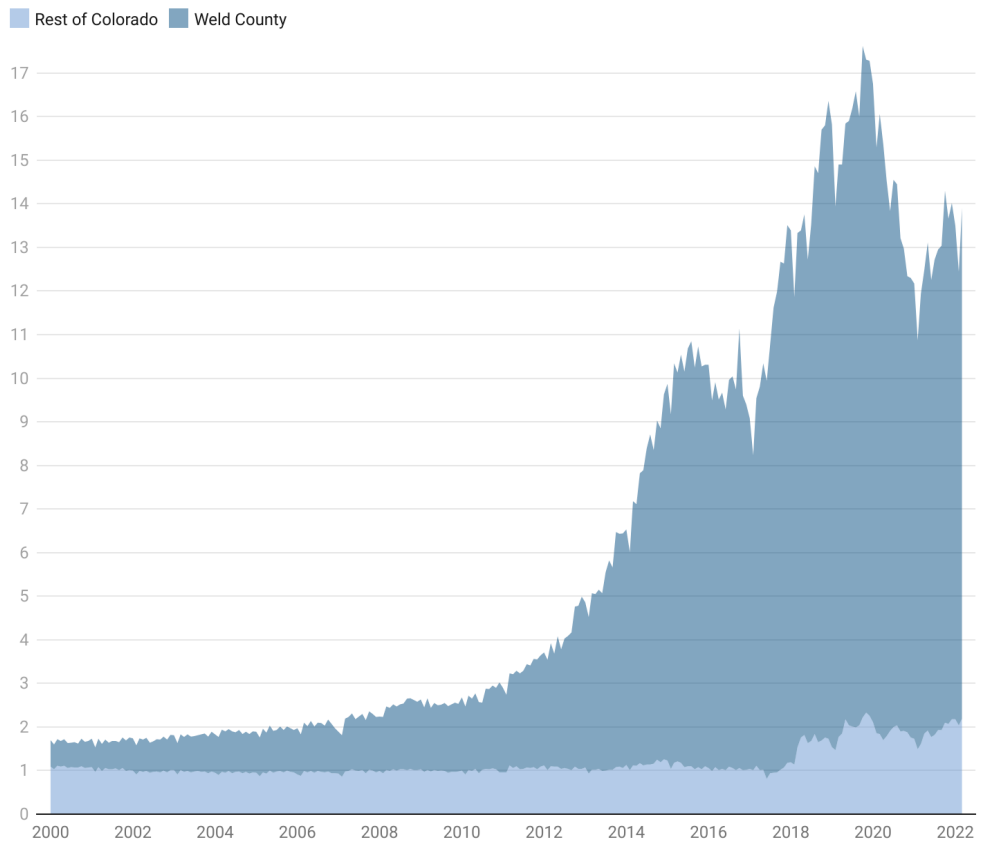
The Natural Resources and Mining Sector comprises the subsectors of Agriculture, Forestry, Fishing, and Hunting; and Mining, Quarrying, and Oil and Gas Extraction. This includes mineral solids such as coal, petroleum extraction, and all natural gases.

Natural Resources and Mining employment declined 9.2% in 2021 but increased 1.5% year-over-year in May. Industry employment is expected to pick up in the second half of 2022 in conjunction with high energy prices and demand. The industry is projected to end 2022 up 8.6%. In Colorado, the average annual pay for a mining and logging job in 2021 was \$89,631 compared to \$70,540 average annual pay for all industries. The industry made up 0.7% of Colorado's covered nonfarm employment in May 2022, compared to 0.04% for the nation. Industry real GDP increased 8.9% year-over-year in Q4 2021.

Since hitting lows in April 2020 not seen since 1999, the average monthly price of WTI oil has increased rapidly since 2019, growing to just over \$115 per barrel as of mid-June 2022—a 54% increase year-over-year. High energy prices can be attributed to a number of factors, including surging demand and supply disruptions due to the Russian invasion of Ukraine. As Russian forces move across Ukraine, disruptions in energy flow, as well as subsequent divestments in Russian energy, have altered the energy landscape. Additionally, inflation continues to play a significant role in the rising energy costs for consumers.

## Colorado Oil Production

Monthly Production in Weld County and the Rest of Colorado (Millions of Barrels)



Source: U.S. Census Bureau; Colorado Business Economic Outlook Committee • Created with Datawrapper

According to the U.S. Energy Information Administration, Colorado ranked 5th in crude oil production among U.S. states as of March 2022, producing 3.5% of the country's crude oil. According to the Colorado Oil & Gas Conservation Commission, Colorado field production of crude oil decreased 10.6% year-over-year, to 153.5 million barrels in 2021, with 85% of production concentrated in Weld County. Year-to-date through March production recorded a 14% increase year-over-year.

The Baker Hughes rig count has not come close to recovering to pre-COVID-19 levels but continues to rise after a low of four rigs observed in November 2020. As of June 2022, there are 16 oil rigs in Colorado. A similar trend has occurred in the nation, with the U.S. rig counts rising by 56% since last June.

Natural gas withdrawals decreased

5.7% annually in 2021, totaling 1,880 billion cubic feet. The revised production outlook for 2021 is approximately 2,000 billion cubic feet. The Henry Hub natural gas spot price nearly tripled in May 2022 compared to the year prior, from \$2.91/million btu to \$8.14/million btu.

Colorado coal production saw a year-to-date increase in June 2022 compared to the same period in 2021, increasing 16% from 4.4 million tons to 5.2 million tons. There are currently seven coal mines operating in Colorado and seven coal-fueled power plants. The state has begun to phase out coal-fired plants, with most slated to close by 2030. Xcel Energy remains the only provider, with coal plants not being scheduled to close before 2030.

As the industry continues to change, there are growing concerns about orphaned wells—wells that are



abandoned by their respective extraction company. Additionally, increased scrutiny around public health and environmental effects is causing concern within the industry. This is not affecting the permitting activity, however—average monthly permits are up to 100-110 as compared to 60 in 2021. There seems to be a renewed interest in drilling.

### **Construction**

The Construction Sector encompasses the Construction of Buildings, Heavy and Civil Engineering, and Specialty Trade Contractors industries. In May, the Construction Sector employed 186,300 people in Colorado, the seventh-largest sector in the state, with 6.5% of total employment. Employment in the sector was up 5% in May 2022 (8,900 jobs) year-over-year, slightly exceeding the rest of the nation, which grew 4.5%. Construction industry employment is projected to increase 9,400, or 5.3%, in 2022.

Construction is composed of three subgroups: residential, including single family homes and multifamily units like apartment complexes; nonresidential, including office, commercial, retail buildings or hospitals; and nonbuilding, including infrastructure projects. The entire sector was buoyed by the robust housing market, which experienced a historic 2021 and continues to grow. In June, mortgage rates reached 5.87%, the highest level since 2008, with inflation continuing to push the housing market into steeper ground.

Colorado residential building permits increased 2.6% year-to-date through April 2022, and the value of residential permits grew 6%, according to the U.S. Census Bureau. The value of residential construction spending published by Dodge Data & Analytics surged year-to-date through May 2022, up 44% over the same period last year. Homeownership continues to be on the rise as well,

reaching 65.9% in 2021—the highest since 2011. All this activity over the past year has pushed home prices up dramatically. The FHFA All-Transaction Index measures the movement of single-family home prices. In Q1 2022, the index increased 21.6% year-over-year. While multifamily construction continues going strong, single family construction is showing signs of slowing—traffic to model homes has slowed, cancellations on contracts are on the rise, and replacement waitlists are shrinking. Single family valuation is up 6%, and multifamily valuation is in double digits, with cost of inputs rising, inflation, and labor prices causing increases.

Nonresidential construction spending in Colorado was down 1.6% year-to-date through May 2022 compared to May 2021 year-to-date. The number of mega projects is dwindling, with smaller projects comprising the bulk of nonresidential projects. The industrial area

is also showing signs of expanding, with biosciences an area to keep an eye on. As with other industries, nonresidential construction is experiencing cost issues related to inflation and fuel prices. New bids will reflect higher labor costs as well as higher input costs.

The nonbuilding sector continues to benefit from the government stimulus, with the value of nonbuilding construction up 44% year-to-date through May.

## Manufacturing

The Manufacturing Sector is composed of the durable goods sector and the nondurable goods subsector. Durable goods last for a significant period of time, whereas nondurable goods are typically consumed quickly. In Colorado, Manufacturing employment grew 1.3% (1,900 jobs) in 2021 and were up 4.5% (6,600 jobs) year-over-year in May 2022. The industry is projected to add 4,600 jobs in 2022.

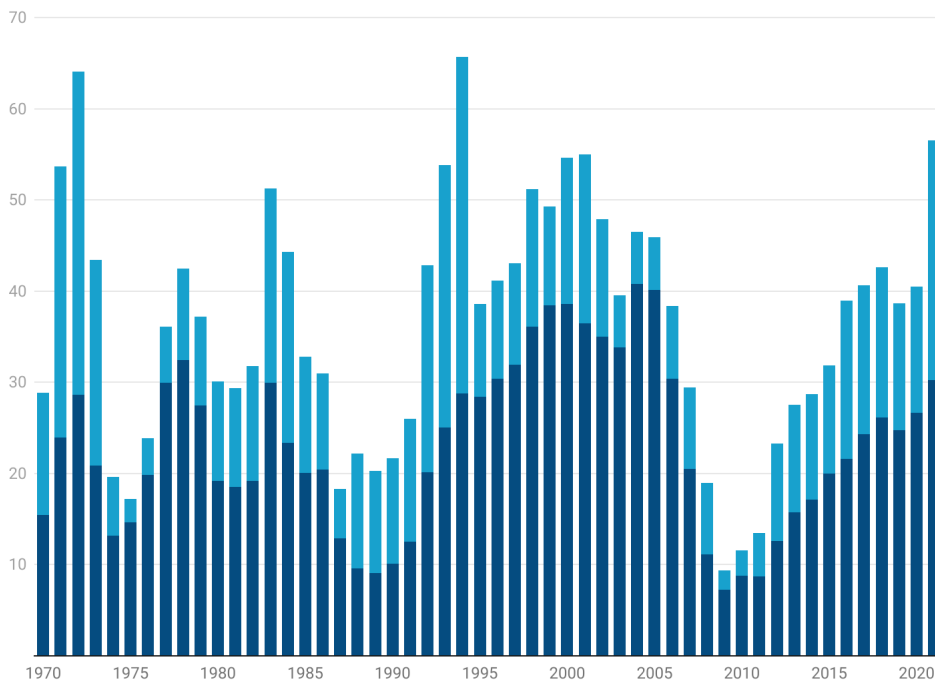
Manufacturing is the eighth-largest employment sector in Colorado, with 154,700 jobs, or 5.4% of total employment. Colorado manufacturing is growing slightly faster than the nation, with national manufacturing growing 4.5% year-over-year.

Durable goods manufacturing makes up the larger share of the two subsectors in the state at 60.1%, or 93,000 jobs. Within this subsector, there is manufacturing of wood and metal products, machines, including computers, electronic parts and aerospace materials, and transportation equipment. Computer and electronic product manufacturing added 100 jobs (0.04%) in May 2022 year-over-year. Transportation equipment manufacturing decreased 1.8% (200 jobs) year-over-year. Fabricated metal manufacturing in the state also faltered, losing 0.7% (100 jobs) in May 2022 year-over-year.

Nondurable manufacturing, which consists of food and beverages, makes up the other half of Colorado's Manufacturing Sector, with 39.9% of total Manufacturing employment, or 61,700 jobs, in May 2022. Within nondurable manufacturing is beverage manufacturing,

## Single Family and Multifamily Residential Building Permits

Permits, 1970-2021



Source: U.S. Census Bureau; Colorado Business Economic Outlook Committee • Created with Datawrapper

which has more than twice the proportion of manufacturing jobs than the nation. Nondurable manufacturing employment increased 8.8%, or 5,000 jobs, year-over-year in May.

Most Colorado MSAs have seen modest increases in manufacturing jobs year over year. Boulder was up 300 jobs (1.4%), Denver-Aurora-Lakewood gained 3,000 jobs (4.3%), and Fort Collins gained 1,000 jobs (6.9%) year-over-year. The growth across geographical regions is likely a reflection of the type of manufacturing jobs in those areas; Greeley and Pueblo are more dependent on the oil and gas industry, which is coming off of a poor year. Boulder has a higher presence of the tech and aerospace industries, which is constantly growing year after year.

New orders continue to be strong through the early portion of 2022, despite challenges related to the prices of raw materials. According to the Kansas City Fed Manufacturing Index, prices were reported to stagnate in late 2021, but a number of factors—including the war in Ukraine—are causing price increases.

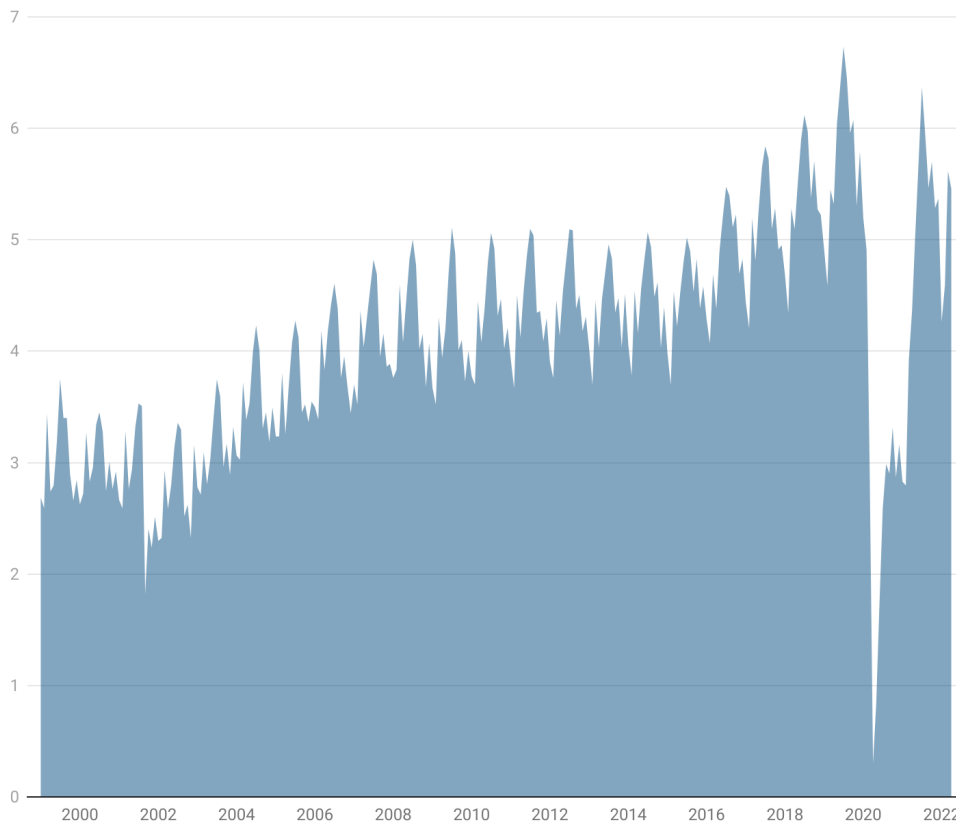
Manufacturing jobs don't seem to be on the upturn nationally, however. The ISM Manufacturing Index measures manufacturing activity through a monthly survey of purchasing managers at manufacturing firms. In June 2022, the index recorded a reading of 56.1, a decrease of 8.9 points from June 2021. This indicates the sector is still expanding, but the expected pace of growth has slowed. The Kansas City Fed also produces a manufacturing survey of its own, which identifies manufacturing activity, such as production and shipments, as well as price changes of raw materials and finished goods. This survey also suggests slowing activity, particularly for durable goods.

## Trade, Transportation, and Utilities

Within the Trade, Transportation, and Utilities Sector, the Trade subsector consists of Wholesale and Retail Trade firms. Wholesale trade sells large quantities of goods to professional users and retailers, which in turn resell to consumers. Wholesale trade is made up of durable goods—items that last for a

## DIA Enplanements and Deplanements

DIA Monthly Passenger Traffic, Millions



Source: Denver International Airport • Created with Datawrapper

considerably long time—and nondurable goods, which are consumed immediately.

Overall, TTU employment in Colorado has increased 3.5% (16,700 jobs) year-over-year in May 2022, bringing employment 3.9% above levels observed in January 2020. TTU is the largest employer in the state, consisting of 17.5% of total employment. The industry is projected to add 12,000 jobs (2.5%) in 2022.

The Transportation, Warehousing, and Utilities subsector observed gains year-over-year in May 2022, increasing 8.2% (8,400 jobs). This growth has been bolstered by Trucking, Couriers, and Warehousing; however, a new delivery tax and higher fuel costs could negatively impact the industry. Air transportation employment grew 11% and exceeds its pre-pandemic employment peak at some of the highest employment recorded. Truck transportation, couriers and messengers, and warehousing and

storage have varied in performance year-over-year, growing 2%, showing no growth, and growing 26%, respectively. However, all of these industries are adversely impacted by the rapidly rising cost of fuel and inflation, which could hinder employment gains in the future.

National retail sales were up considerably year-over-year, growing 8.1% through May 2022 compared to the same period in 2021. However, retail sales declined 0.3% from April to May, a potential indication that inflation is catching up with household spending. For example, Motor Vehicle and Parts Dealers, Furniture and Home Furniture Stores, and Electronic and Appliance Stores have decreased 3.5%, 0.9%, and 1.3% month-over-month, respectively. Gasoline stations, on the other hand, were up 4% month-over-month and 43.2% year-over-year. Several industries are still seeing modest month-to-month gains but show signs of slowing as the

year progresses. Online retail has surged as a continued consequence of the pandemic, and national e-commerce retail sales grew 6.7% year-over-year in the first quarter of 2022 and comprise 14.3% of total retail sales.

Retail trade employment grew 1.1% year-over-year in May 2022, resulting in an increase of 3,000 jobs. Colorado retail sales have followed a similar pattern to that of the nation: total retail sales in the state were up 14.3% year-over-year in February 2022, with clothing stores increasing 27% and sporting goods, hobby, musical instruments, and bookstores increasing 8%. Gas station sales were up 33% year-over-year in February amid rapidly growing gas prices. Colorado taxable sales grew 15.2% in March 2022 compared to March 2021. This number is likely a result of high inflation and slowing consumer spending.

Wholesale trade employment was up 4.9% in May 2022 year-over-year.



According to the Federal Aviation Administration, Denver International Airport ranked as the third-busiest airport in the nation so far in 2022, with 28.6 million enplanements and was outperformed by only Dallas-Fort Worth International (2nd) and Jackson Atlanta International (1st). DEN recorded the busiest April on record for passenger traffic.

### Information

Information employment increased 3% year-over-year in May 2022. Employment in the Information Sector has exceeded January 2020 levels. By component, Telecommunications, the largest employment subsector, posted a 6.8% decline in employment in May 2022 year-over-year, Publishing grew 3.5%, and Software Publishers grew 4.4%. Industry real GDP declined 3.6% in 2021 and 1.5% year-over-year in Q4 2021. Information is projected to add 1,300 jobs in 2022.

### Financial Activities

The Financial Activities Sector includes establishments primarily engaged in financial transactions, as well as establishments engaged in renting, leasing, or otherwise allowing the use of tangible or intangible assets. Financial Activities employment rose 2.8% (4,900 jobs) in 2021 and grew 1.7% (3,000 jobs) year-over-year in May 2022. The industry is projected to add 2,700 jobs (1.5%) in 2022, as rising interest rates slow some areas of the industry (e.g., mortgage refinancing).

By subsector, Finance and Insurance grew by 2,600 jobs (2.2%) in 2021 and 1,400 jobs (1.2%) year-over-year in May 2022. Real Estate, Rental, and Leasing expanded 2,300 jobs (4.2%) in 2021 and 2.8% year-over-year in May.

Equity indices experienced a great deal of volatility in 2021 and 2022, and many are in bear market territory due to inflation and other economic pressures. The S&P 500 has reached its lowest point since December 2020, dropping 10.4% in one month as of mid-June. The NASDAQ followed suit, reaching its lowest point since July 2020. Capital markets could



continue to plummet as the Fed takes measures to combat inflation, bringing short-term interest rates to the highest in 28 years.

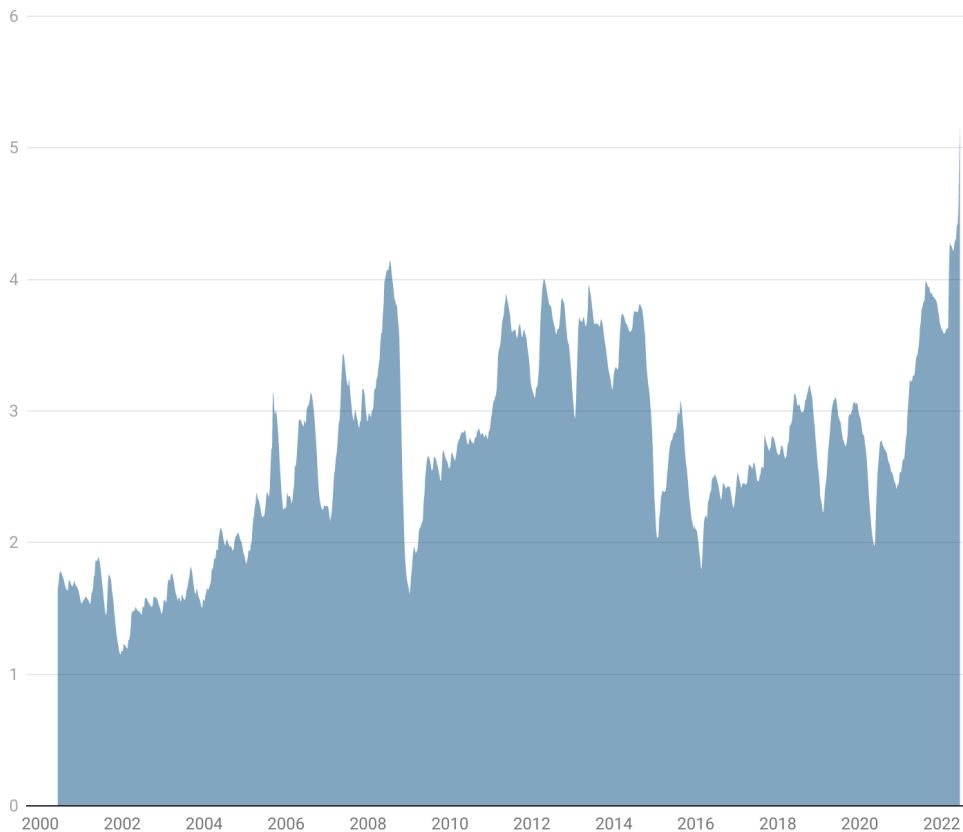
In an effort to normalize inflation, the Fed raised interest rates by 0.75 percentage points, the largest rate increase since 1994. As of June 2022, the 10-year government bond yield in the

U.S. was 3.2%, one of the highest yields in the world. Comparatively, Germany maintains a 1.71% 10-year government bond yield, the United Kingdom is at 2.51%, and Japan maintains a 0.25% yield. These rising interest rates make it easier for investors to make income and significantly impact profits in the banking industry. Mortgage rates are also surging,



## Weekly Colorado Midgrade Conventional Retail Gasoline Prices

Dollars per Gallon



Source: U.S. Energy Information Administration • Created with Datawrapper

reaching 5.78%, the highest level since 2008.

Across the nation, rising prices and inflation are impacting consumers. Average rent rates have exceeded \$2,000 monthly and average gasoline prices have exceeded \$5 per gallon. This rise in the cost of living has a large impact on discretionary spending, which is teetering as essential purchases cover more of consumers' budget.

In the cryptocurrency market, bitcoin has lost approximately \$1 trillion in valuation this year, including a 69% loss from the November 2021 peak. Other cryptocurrency markets are also seeing massive losses, and even bankruptcy and dissipation without any FDIC insurance.

Colorado deposits reached \$6.97 billion as of June 2021, up 16.7% from \$5.98 billion in June 2020. The largest institutions in Colorado by market share are Wells Fargo (20.9%), JPMorgan Chase (11.6%), and First Bank (11.1%), according to the FDIC.

The residential housing market in Colorado has been booming over the past year as demand has outstripped supply, pushing prices higher and leading to the Denver Metro area having the

lowest average days on market in the nation. According to the Federal Housing Finance Agency (FHFA) all transactions index, Colorado housing prices continued to increase in 2021 and into Q1 2022, continuing a growth trend since 2012. In Q1 2022, Colorado's house price index grew 21.6% year-over-year, ranking the state 13th in the nation. The Pueblo MSA observed the highest year-over-year growth rate among Colorado MSAs in Q1 2022, with 25.2% growth, followed by Colorado Springs (23.3%), Boulder (21.7%), Denver-Aurora-Lakewood (21.4%), Fort Collins (20.5%), Grand Junction (18.7%), and Greeley (17.9%).

### Professional and Business Services

Professional and Business Services (PBS) encapsulates a diverse set of subsectors such as professional, scientific, and technical services, which includes legal services, accounting, architectural services, computer, and software design, and consulting. Moreover, the sector also contains the management of companies and enterprises, as well as a variety of administrative services that include waste management, building support, business support, and employment services. PBS jobs are usually high-paying business-to-business jobs that are usually well-insulated from the effects of isolation and lockdowns.

The PBS Sector employs the second-most workers in Colorado, with 481,500 employees in May 2022, the second-highest number of jobs by sector in the state. In May, PBS employment grew 7% year-over-year (31,700 jobs). The industry is projected to add 26,700 jobs in 2022, growing 5.9%. This record of success is due to a number of factors, including both supply and demand for PBS talent. Importantly, the relatively easy shift to work-from-home in the largest PBS subsectors ensured companies could keep trusted talent. Despite the quick recovery, the change in overall earnings or "wage inflation" in these sectors has remained muted, at just a 5% increase since early 2020. Additionally, PBS sectors remain at risk due to disruptions from the ongoing spikes, which have

slowed the return to office. Growing recruiting and retention challenges are vexing some employers in an increasingly tight labor market, despite a record number of unfilled job openings and opportunities.

While employment growth is expected to remain strong in the next year, challenges to the sector include the increasing cost of business that could deter hiring, figuring out how to support remote employees, and information security to prevent ransomware attacks.

The Professional, Scientific, and Technical (PST) subsector, which employed 271,900 people (56.5% of total PBS employment) in May 2022, is proving to be one of the state's most dynamic sectors, swinging from a loss of 8,400 jobs during the pandemic to adding 35,600 in the last two years. The sector stood 7.8% above the pre-recession peak as of May 2022 and was up 7% year-over-year.

Colorado is also home to 23 Fortune 1000 companies, including Arrow Electronics, Ball Corporation, Davita Incorporated, and Maxar Technologies. Administrative and Waste Services has continued to grow, having suffered the worst losses in the sector during the pandemic but outperforming forecasts

from last year. In May 2022, the sector grew 6% year-over-year, or by 9,300 jobs. Despite making up 34% of PBS employment, Administrative and Waste Services consisted of only 18% of total wages. Employment in the Employment Services industry, meanwhile, grew 23.9% year-over-year, even exceeding the pre-pandemic peak. Business Support Services grew 6.3% year-over-year in May, and Services to Buildings and Dwellings declined 3.5%.

### Education and Health Services

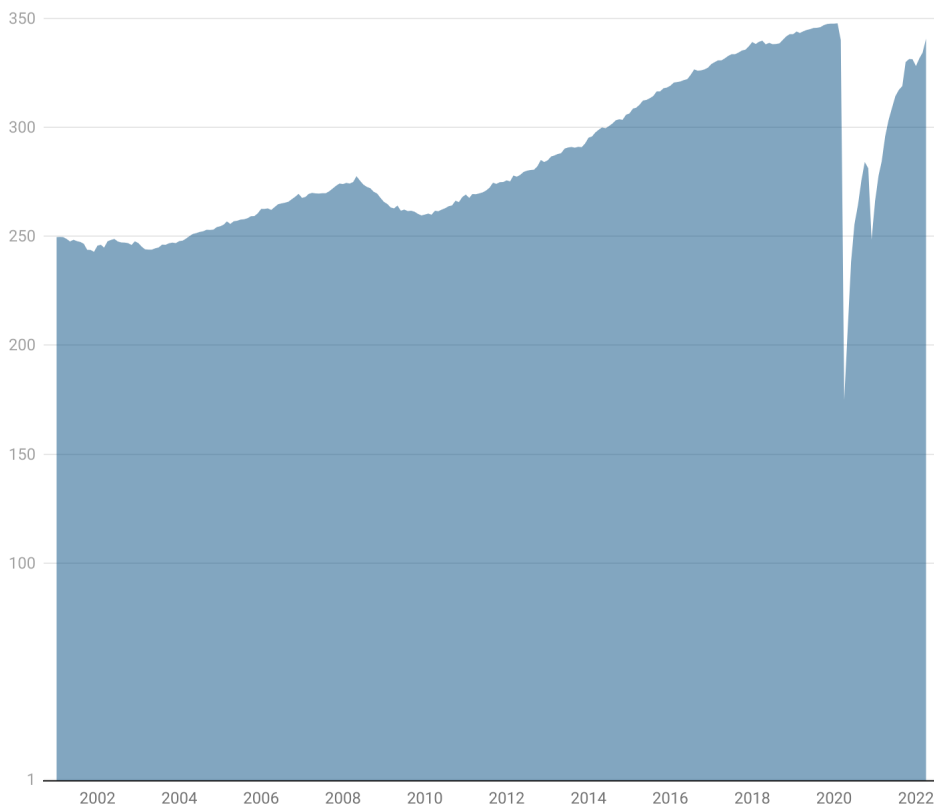
The Education and Health Services (EHS) Sector includes private-sector establishments that provide instruction and training by private schools and universities, as well as establishments that provide health care and social assistance to individuals. Approximately 12.3% of Colorado's workforce is employed in the EHS Sector, the fourth-largest sector in the state; the national average is 16%. In terms of 2021 annual real GDP, Educational Services and Health Care and Social Assistance GDP grew 3.3%.

Education and Health Services recorded year-over-year employment growth in May 2022 of 1%. The industry remained down 3,000 jobs, or 0.8%,



## Leisure and Hospitality

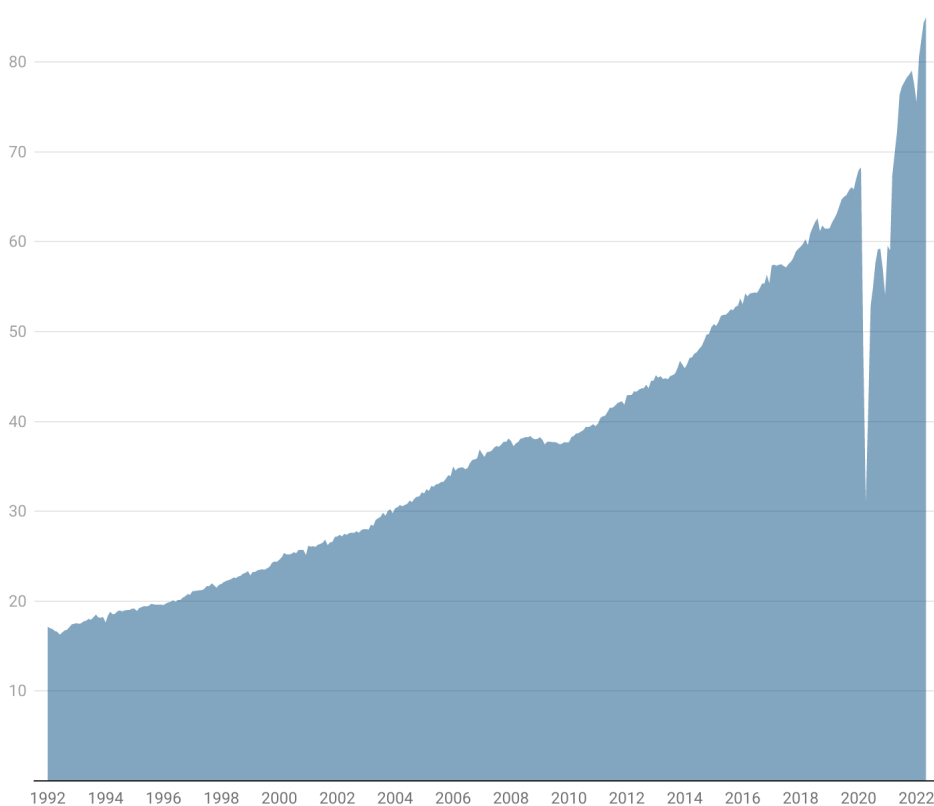
Employment, Thousands



Source: Bureau of Labor Statistics, Current Employment Statistics • Created with Datawrapper

## U.S. Total Retail Sales, Food Services and Drinking Places

Advance Monthly Sales, Billions of Dollars



Source: U.S. Census Bureau • Created with Datawrapper

from January 2020 levels. Industry employment is projected to increase 4,600 jobs or 1.3% for the year in 2022. The Educational Services subsector experienced an 8.2% employment increase year-over-year, while the Health Care and Social Assistance subsector was flat.

Colorado's state government received \$5.9 billion from the American Rescue Plan Act that Congress passed in March 2021. More than \$2 billion went directly to state agencies for health, human services, and assistance to local governments. The legislature appropriated \$1 billion last year, leaving \$2.8 billion to allocate by 2024. Other legislative actions included signing into law HB22-1279, the Reproductive Health Equity Act, which guarantees protection for abortion in the state. Additionally, HB1326 (Fentanyl Accountability and Prevention), HB22-1370 (impacts pharma rebates), and SB22-226 (recruiting and retaining healthcare workforce) were also signed into law. Lastly, the HHS announced on June 23rd that it has approved a public option health insurance plan for Colorado. This is a health insurance plan that is dictated by state regulators and sold through health insurance companies. Washington state is the first to try this approach. Participation in the public option in Washington was low in the first year of launch, 2020.

Hospitals continue to experience significant staffing shortages, especially for nurses. Turnover increased from 15.5% in 2020 to 18.8% in 2021, the highest level in 15 years. This could have negative impacts to the quality of care that patients receive as well as safety. Additionally, patients are still delaying care relative to 2019 rates pre-COVID. This is driving down revenue for hospitals and putting patients at more risk as patients that do come in tend to be sicker, making it more costly. This trend is also pertinent for cancer screenings, which continue to be delayed relative to pre-pandemic numbers. Emerging data suggests that people are now coming in with later stage cancer diagnoses.



The COVID pandemic also heralded a mental health crisis. CDC data show that a higher number of high school students are reporting persistent feelings of sadness and/or hopelessness from 27.1% in 2004 to 44.2% in 2021, a 17.1 percentage point increase. Additionally, a poll conducted in April 2022 indicates that 59% of adults in the United States are concerned about their own mental health or the mental health of someone that they care about. This is up from 50% in April 2020, a nine percentage point increase. Colorado passed mental health legislation that allocates \$500 million to mental health services.

### **Leisure and Hospitality**

The Leisure and Hospitality Sector covers establishments in the tourism, travel, and recreational industries. This is the fifth-largest sector in Colorado, making up 11.9% of total employment. In terms of employment, this was Colorado's fastest growing industry in 2021, increasing 12.6% and adding

34,400 jobs. This growth continued in 2022 with the addition of 37,800 jobs year-over-year in May, though the industry remained 1.9% below the pre-recession peak. The industry is projected add an average of 31,800 jobs in 2022.

Within the Leisure and Hospitality sector are the Arts, Entertainment, and Recreation industry and Accommodation & Food Services industry, the former increasing 17.2% year-over-year and the latter increasing 11.5% year-over-year in May 2022. Accommodation and Food Services make up the majority of the sector, accounting for 83%, or 282,600 jobs. Much debate has been held surrounding the labor shortages preventing these industries from fully recovering. Potential causes aside, restaurants, hotels, and other hospitality employers have lamented being short-staffed.

With rising fuel prices and the increasing cost of airline tickets, the AAA travel survey revision is less optimistic, with tourism and visits becoming more

financially challenging. International travel is still likely to improve compared to 2020 and 2021, with the lifting of COVID testing requirements from international flights.

Food services and drinking places gained 28,700 jobs in 2021. Growth continued in 2022 as the industry added 23,200 jobs year-over-year in May (10.9%). According to data gathered by the U.S. Census Bureau, national sales at food services and drinking places surged 17.5% in May 2022, an increase of more than \$12.6 billion (seasonally adjusted). Sales first passed their pre-pandemic peak in April and have grown each month thereafter, passing \$70 billion for the first time ever in June 2021 and \$80 billion in February 2022.

According to the National Park Service, recreation visits to Colorado's national parks totaled 7.92 million in 2021, a 29.6% decrease from 2020. Rocky Mountain National Park contributed 4.43 million of these visits (55.9%).



### **Other Services**

The Other Services industry includes automotive repair, car washes, nail salons, barber shops, religious organizations, funeral homes, grantmaking foundations, and labor unions, and others. Industry employment grew 4.3% in 2021 and 5.5% in May 2022, year-over-year. The Repair and Maintenance subsector was up 8.4% year-over-year in May; Personal and Laundry Services is up 9.4%; and the largest subsector, Religious, Grantmaking, Civic, Professional, and Similar Organizations, was up 2.9%. Employment in the Other Services industry is projected to gain 4,600 jobs for the year.

### **Government**

Government employment decreased 1.9% in 2021 but rose 1.8% year-over-year in May 2022. State and local governments gained jobs, while the federal government lost jobs. Employment is projected to increase 4,400 jobs for the year. Real industry GDP was up 2.3% year-over-year in Q4 2021.

The Government supersector comprises federal, state, and local government, including higher education institutions and public schools. In May 2022, the Government Sector employed 442,200 individuals, a year-over-year increase of 1.8%. The annual gains came from state and local government and their continued recovery from the COVID-19 declines. Federal government posted year-over-year declines. The state government subsector includes state agencies and departments, such as the Colorado Department of Transportation and the Colorado Department of Regulatory Agencies, and public universities. State government employment totaled 124,700 in May. State government is seeing rebounds with the resumption of in-person instruction at state universities and the rehiring of student workers. The local government subsector includes city, county, school, and special district employees. Local government employment totaled 264,300 in April. Federal government employment totaled 53,200 in May.

Government continues to face similar issues as years prior, and these issues are not unique to Colorado. Labor shortages and the costs to compete with the private sector continue to be challenges. Inflation is also having an adverse impact on government ranging from capital construction costs to fuel costs.

### **International Trade**

International trade began 2021 still below its pre-pandemic 2019 numbers. The effects of inflation and an economy still recovering from COVID are still felt in the high volatility of trade patterns. Goods exports are on track to be the highest ever, following a record 2021. As international trade rebounded significantly in both the U.S. and Colorado from the 2020 recession lows headwinds remain that could impact trade in the year ahead —namely, high inflation and fuel costs.

According to data from the Bureau of Economic Analysis (BEA), U.S. exports grew 17.9% in Q1 2022 year-over-year and imports rose 22.8%. Colorado exports increased 11.1% year-over-

year in April 2022 according to the U.S. Census Bureau. Year to date, Colorado's exports have increased 9.5%, with its largest trading partners being Canada (16.1%), Mexico (13.8%), China (10.6%), South Korea (7%), and Japan (5.4%).

Of these, the only country to experience a decrease in exports from Colorado year-over-year is Mexico, decreasing by 3.2%. Year-to-date through April 2022, Colorado exports to Canada increased by 19.1% while exports to China increased 25.1% year-over-year. Colorado exports to South Korea increased by 27.5%, and Japanese exports grew by 30.1%. This rapid growth brought Japan into the top five in exports year-over-year in April 2022. Exports to Canada through April 2022 year-to-date were up 13.7%, exports to Mexico increased 19.5% year-to-date, China increased by 31%, and South Korea decreased by 8.4%. Additionally, Colorado's exports to Malaysia stand at seven times the proportion of U.S. exports to Malaysia, the Philippines has three times Colorado exports, and Switzerland has two times. While exports to Colorado's largest trading partners are growing rapidly year-over-year, it is necessary to consider inflation—the rapid rise in export valuations is expected to continue as the price of goods skyrockets relative to two years ago.

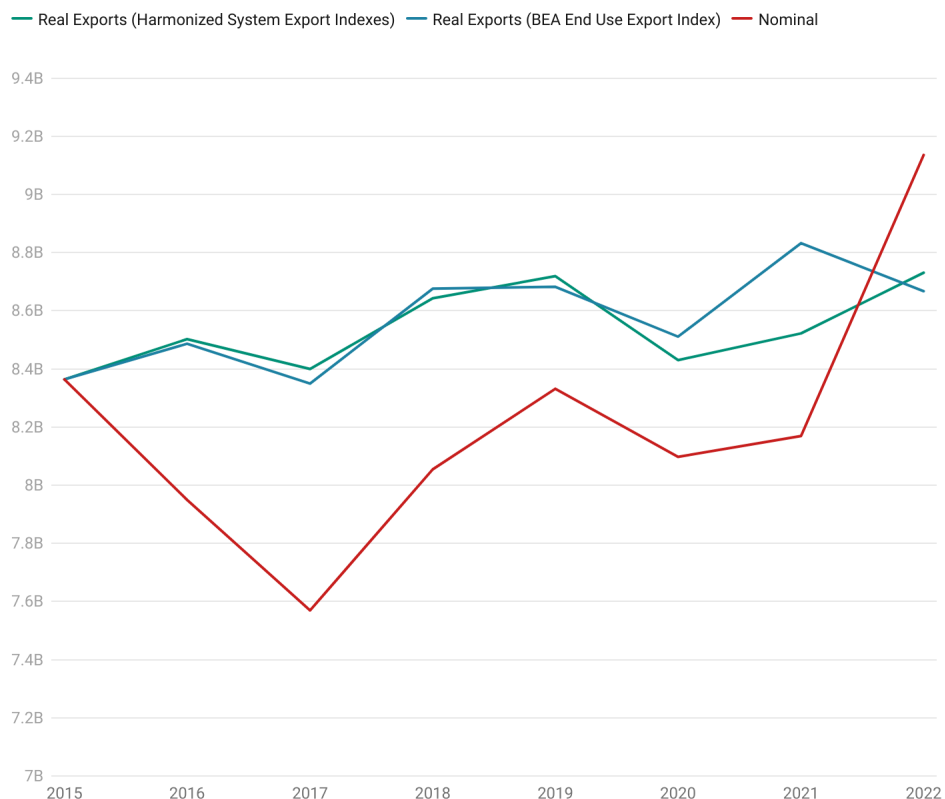
Colorado's top four exports in 2022, accounting for about 63.4% of the total value of state exports, were (in order):

- Food and Kindred Products
- Computer and Electronic Products
- Machinery, except Electrical
- Transportation Equipment

There were a select few commodities that recorded astronomical growth through April 2022. Exports of Transportation Equipment rose 143.6% year-over-year through April 2022 compared to the same period last year. Minerals and Ores increased by 874.8%, Forestry Products increased by 265.5%, Textiles & Fabrics increased 68%, and Used or Second-hand Merchandise

## Colorado Nominal vs. Real (2014 Dollars) Goods Export Value

Billions of Dollars




Source: Bureau of Labor Statistics, Bureau of Economic Analysis, Federal Reserve Bank of St. Louis • Created with Datawrapper

increased 63.7%. Meanwhile, Chemicals fell 16%, Agricultural Products decreased 54%, and Other Special Classification Provisions decreased 19%. Additionally, Colorado's meat export maintains critical importance to Colorado's trade, accounting for 15 times the proportion of exports when compared to the U.S. as a whole. Additionally, photographic and cinematographic exports are about 14 times the national share, and rawhides and skins (in conjunction with meat exports) are 10 times the national share.

Colorado imports increased 39.6% in April 2022 year-over-year and are up 30.3% through May 2022 year-to-date 45.2%. The top three countries that Colorado imports from are (in order): Canada (34.1% of total imports), China (9.4%), and Mexico (7.9%). The value of imports from Canada increased 49.9% in 2022 year-over-year, and 45.2% year-to-date. Imports from China increased 3.5% in 2022 year-over-year and decreased

81.1% year-to-date through April 2022, capping off an explosive upswing in late 2021-early 2022. The value of imports from Mexico increased 29.2% in 2022 year-over-year and grew 32.4% year-to-date through April 2022.

Nominal data indicate one of the most explosive years ever for Colorado international trade. However, with the continuing rise of inflation and prices of goods, the real metrics provide a different story—a 1.9% decrease in exports from Colorado from 2020-2021. When adjusting for real volume, Colorado international trade is not seeing a particularly notable year—and with the dollar strengthening, a slowdown in nominal manufacturing and exports is expected. 

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