

Agri-Food Institute

Industry Update – Q4 2023

Economic Developments

Inflationary pressure has eased as the year-over-year rate of increase in the PCE deflator has declined to 4%. However, Wells Fargo Economists see some cracks starting to appear in the economy. Households are lowering their savings rates and relying more heavily on credit card usage to finance household expenditures. In addition, overall delinquencies are trending higher as well. Wells Fargo economists expect that although the fed funds rate will stay flat for now, rising real interest rates will create headwinds in the U.S. economy resulting in real GDP growth turning negative early next year and the unemployment rate increasing. With inflation forecast to recede by the end of next year, Wells Fargo economists project the FOMC to cut rates by 225 bps in 2024. These rate cuts should set the stage for a rebound in the second half of next year, and through 2025.¹

Recent data shows that the U.S. economy remains resilient in the face of the 525 bps of rate hikes that the Federal Reserve has delivered since March 2022. Recent data shows capital spending is unlikely to repeat the solid growth it had in Q2 due to personal income increasing less than 3% and personal expenditure rising more than 9% since February 2020. Economists estimate household savings, which peaked in mid-2021 at \$2 trillion, have dropped to less than \$400 billion now.¹

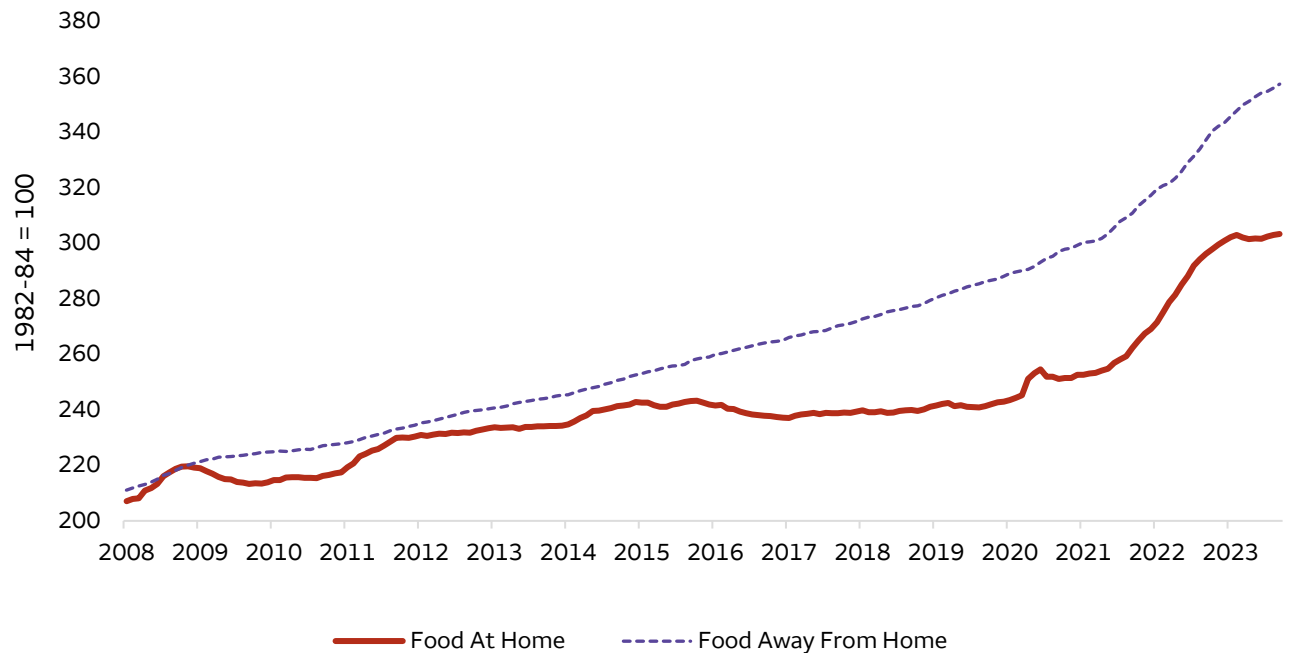
Key Industry Highlights

- The digital age in agriculture continues to evolve and thrive, and precision agriculture is the latest trend that continues to grow. Recent technological innovations being used by farmers include soil sensors for precise nutrient management, monitoring soil moisture to determine precise irrigation needs, using variable rate technology to apply fertilizers, pesticides, and other inputs more precisely, and utilization of drones to provide high-resolution imagery to inspect fields and identify potential problems. Artificial Intelligence will become more prominent in agriculture of all sizes in years to come.²
- According to BI Intelligence Research, global spending on smart technology and connected systems in the agriculture space is projected to triple in revenue by 2050. AI spending alone is predicted to grow at a CAGR of 25.5% between 2020 and 2026 reaching \$4 billion.³
- The United States Department of Agriculture reports that foreign ownership of U.S. farmland has nearly doubled in the past decade to over 40 million acres. A growing number of U.S. lawmakers, many at the state level, have introduced legislation to ban foreign ownership of farmland. Senator Joni Ernst, R-Iowa, and Debbie Stabenow, D-Mich., stated “China is threatening America’s food supply” in response to China-based corporations specifically buying farmland in the U.S. The Senate voted 91-7 in July 2023, to prevent China, Russia, North Korea, and Iran from purchasing U.S. farmland. The amendment will require the president to review farmland transactions from those four countries.⁴

Food highlights

- Food prices and availability could be a key concern in upcoming elections, as the conflicts in Ukraine and Gaza limit grain supply and pressure oil prices. U.S food prices are up 3.7% from last year after rising 11.4% in 2022.⁵
- Inflation is pushing the cost of groceries higher, and sales at fast-food restaurants like McDonald's and Starbucks increased by 5.75% since this time last year. Sit-down casual and fine-dining chains had a 2.38% increase in sales.⁶

Consumer Price Index for Food at Home and Away From Home

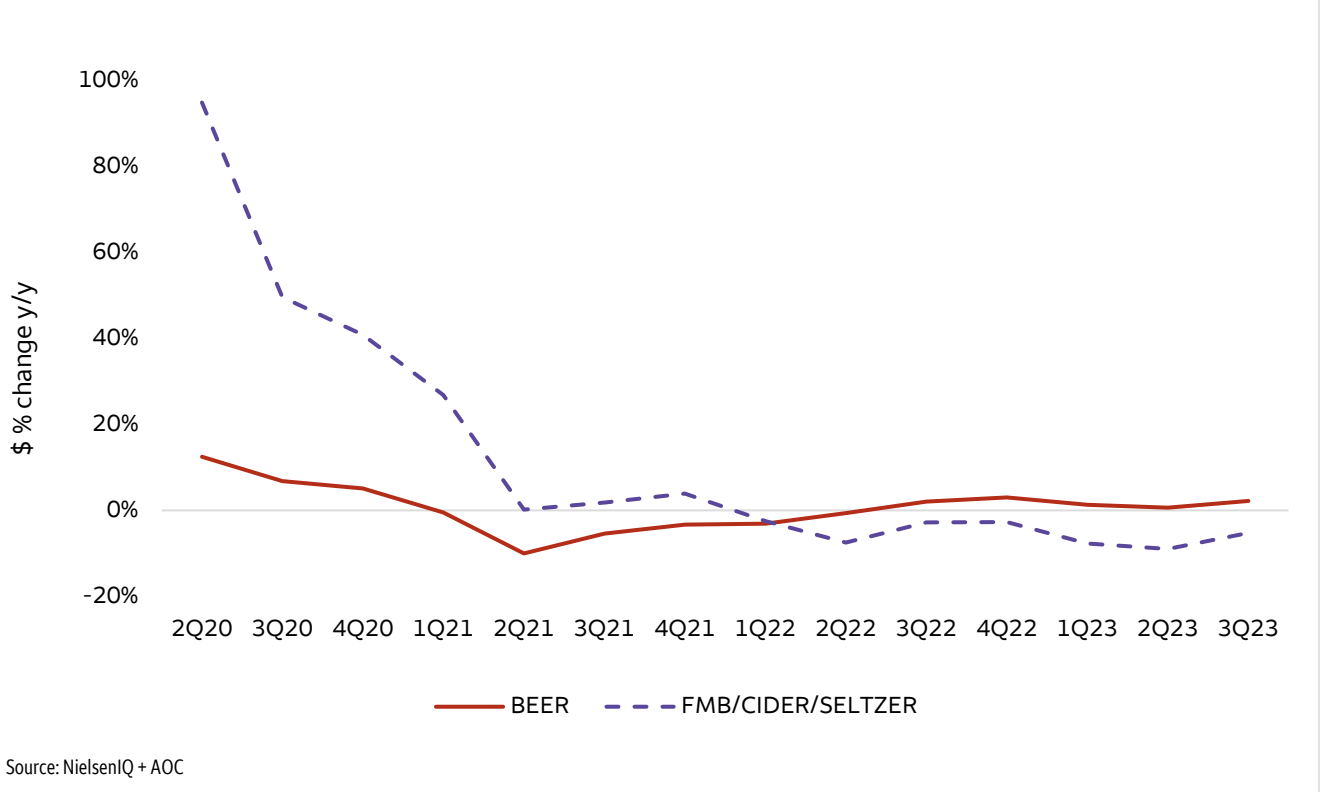


Source: FRED

Beverage highlights

- Beer sales volume was down 4.3% in September as summer came to an end. However, beer prices are up 5.3% from last year.⁷ Bud Light's sales continue to decline with 4-week sales volumes down 30% while Coors, Miller, and Modelo continue to gain share.⁸
- Total U.S. beer, flavored malt beverages (FMB), and seltzer sales volumes fell 3.9% in September. Spirit sales including bourbon, tequila, vodka, and prepared cocktails are up 6.5% in sales growth, but saw a volume decline in September.⁸ Wine prices increased 1.2% from this time last year.⁸

Beverage Nielsen Retail Trends, sales volume percent change

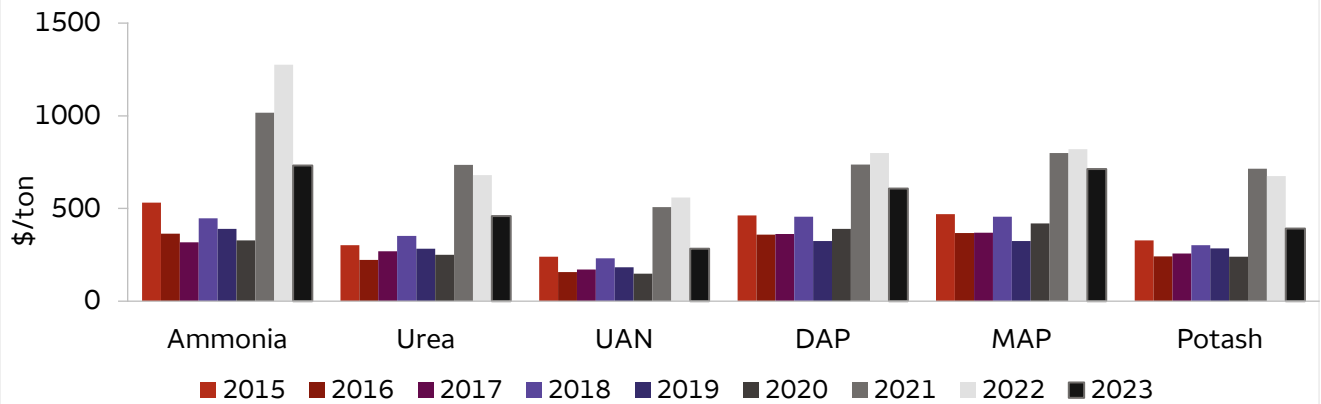


Commodity highlights

Crop Inputs

- Spot ammonia retail prices in the Midwest rebounded in the month of September as a rush of fall buying in addition to bullish urea news (India returning to the market for a tender offer) helped put in a low for the year. Retail prices are up \$119/ton to \$740/ton on average. Unless fall demand is substantial, prices likely won't move much higher.⁹

Corn Belt Wholesale Fertilizer Prices as of Mid October

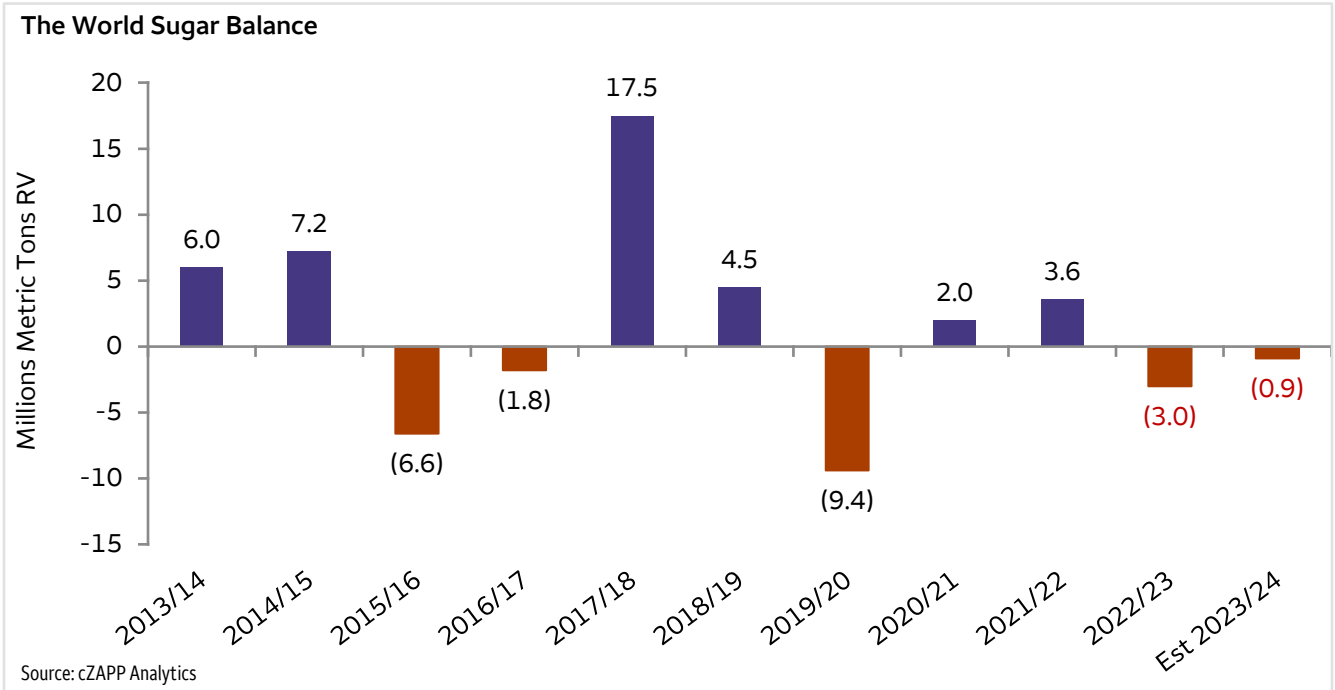


Source: Green Markets

- European Union governments failed on October 13 to give a decisive opinion on a proposal to extend by 10 years EU approval for the use of glyphosate, the active ingredient in Roundup weedkiller. A “qualified majority” of 15 countries representing at least 65% of the bloc’s population had been required to support or block the proposal. They will try again in the first half of November when another failure to produce a clear opinion would leave the decision with the European Commission. A decision is needed by December 14 as the current approval expires the following day.¹⁰
- EPA is asking for public input on whether pesticide-treated seed should be regulated and, if so, to what extent. The three major members of the neonicotinoids class were registered by EPA in 1994, 2000, and 2003. Pesticide-treated seed currently is exempt from registration requirements under the Federal Insecticide, Fungicide and Rodenticide Act. Bayer and Syngenta are two of the largest producers of pesticide-coated seed treatments in the U.S.¹¹
- Water levels continued to recede on the Mississippi River and its tributaries during the week. Depths at Cairo, IL, fell to 4.54 feet on October 8, the gauge’s lowest point since 2.90 feet was recorded on November 21, 1901, prior to the construction of the modern lock and dam system on the Mississippi and Ohio Rivers. Loading drafts have been reduced by different levels with Northbound tows restricted to 65-70% of normal capacity limiting fertilizer deliveries. Many upper river locks are scheduled to close for the winter navigation season between December 5 and March 11, 2024.¹²

Sugar

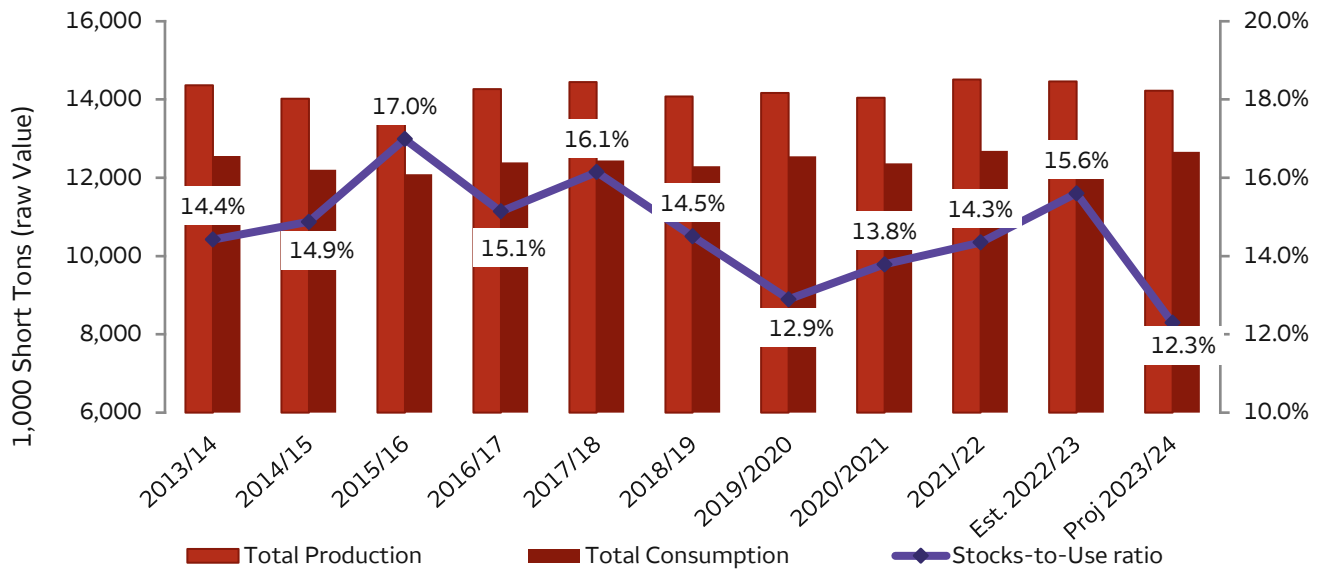
- Overall global production for the 2023/24 crop year is forecasted to decline by 2.12mm metric tons due to lower projected production in India, Thailand, and Australia resulting mainly from the current El Niño weather pattern. This pattern has raised concerns about global supplies since this leaves Brazil as the only producer that will have available production to export since most supplies from other regions are already under contract, and this will limit opportunities for importers. Global consumption is expected to increase 2.3% due to projected strong growth from China, Indonesia, and Russia. Global stocks are estimated to drop lower as growth in consumption exceeds production, supporting higher prices as indicated by the current #11 futures market as well as the decline in the latest global S/U to 18.5%.¹³
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- The latest USDA WASDE report for October 2023 projected a 1.2% decline in the stocks-use ratio from September 2023, and a 3.3% decline Y/Y due to lower projected production and imports offset by flat projected consumption.

Sugar (cont'd)

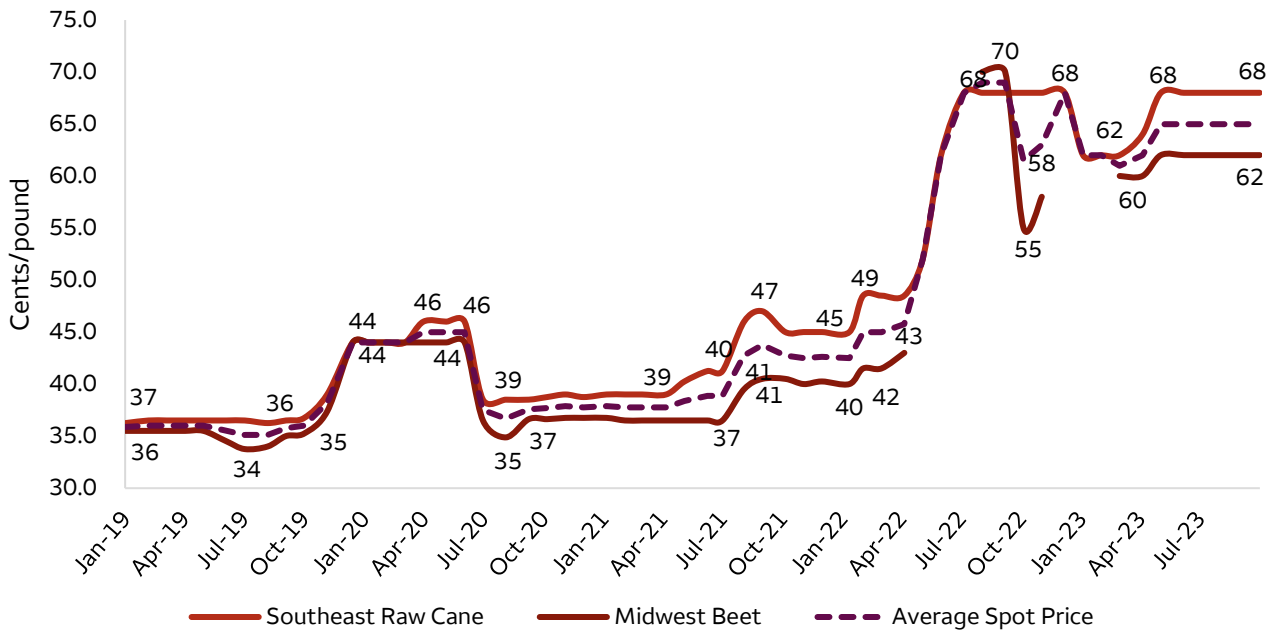
U.S. Sugar - Stocks-to-Use Ratio



Source: USDA-WASDE

- Current spot market prices for sugar remain strong at \$0.62/lb. for beet and \$0.68/lb. for cane supported by lower-than-expected cane production (LA and TX) for the 2023/24 crop year coupled with lower projected imports.¹³ Average prices that have been contracted by beet and cane producers are coming in lower than current spot but are above last year's contracted prices which bodes well for another good year, assuming a normal crop is produced.

U.S. Spot Sugar Price Quotes



Source: Sosland Sweetener Report

Sugar (cont'd)

Sugar Contract Pricing (12 months)

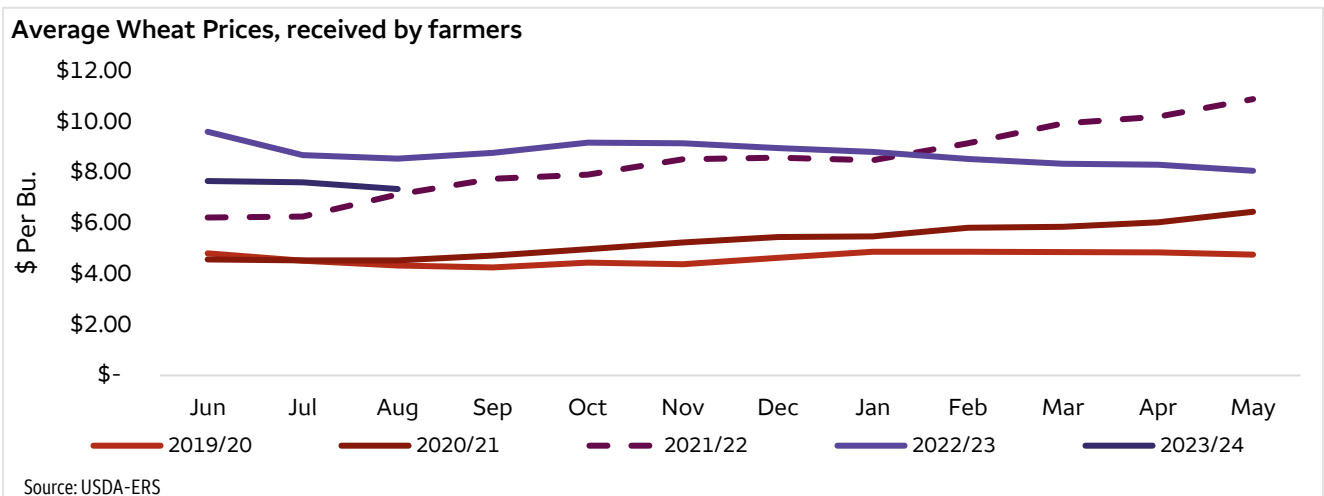
Crop Year	Beet	Cane
(Oct - Sept)	cents/pound	
2018/19	34 - 35	36 - 37
2019/20	33.5 - 34	35 - 37
2020/21	34 - 36	38 - 40
2021/22	39 - 41	43 - 45
2022/23	40 - 42	45 - 46
2023/24*	57 - 60	59 - 62

* Average pricing as of 10/11/2023

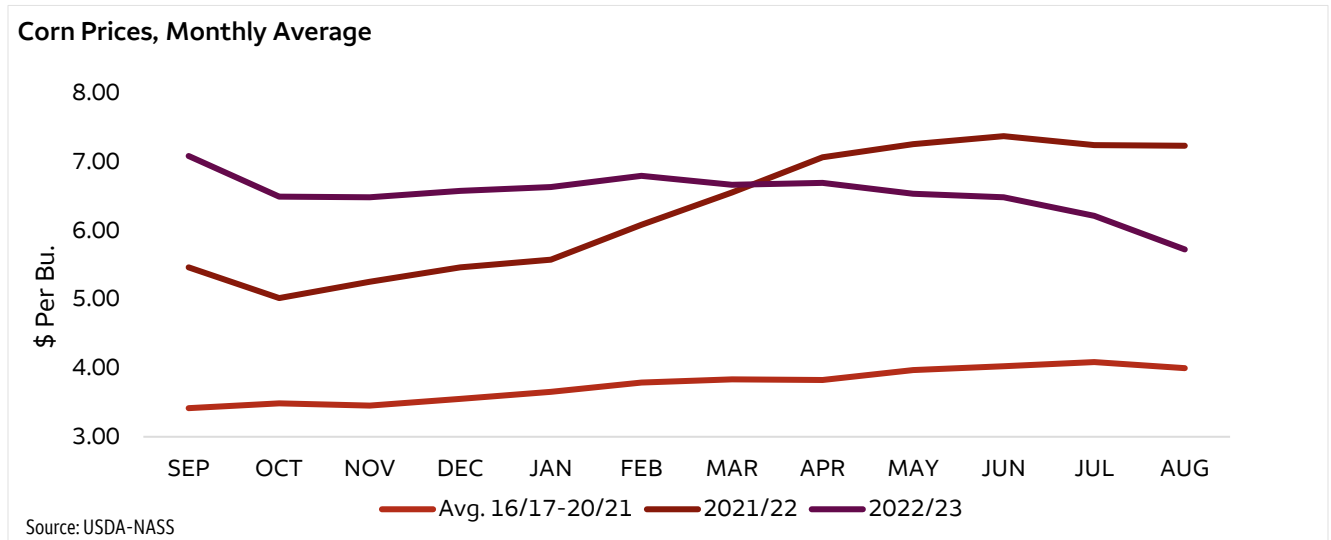
Source: Sosland Sweetener Report

Grain and Oilseeds

- The October World Agricultural Supply and Demand Estimates (WASDE) reported larger-than-expected cuts in both corn and soybean yield and production, and lower ending stocks.¹⁴ However, the corn crop will still produce over 15 billion bushels and soybeans over 4 billion bushels, both numbers viewed as adequate. The fall harvest is surprisingly good after drought and heat threatened the crops over the summer months. The resilient crops will hold corn and soybean prices at moderate levels. The farming sector is currently subject to high fuel and fertilizer prices as the world geopolitical conflicts work to disrupt supplies.
- Russia's attacks on Ukraine ports continue but cargo ships are utilizing the humanitarian corridor set up, and continue to move. China's wheat crop has reportedly been damaged by heavy rains, giving support to wheat prices, but demand remains slow as world wheat stocks are at average levels.¹⁵ Early indications are that wheat acreage numbers (winter wheat being planted now) for 2024 will be similar in those of 2023.¹⁶

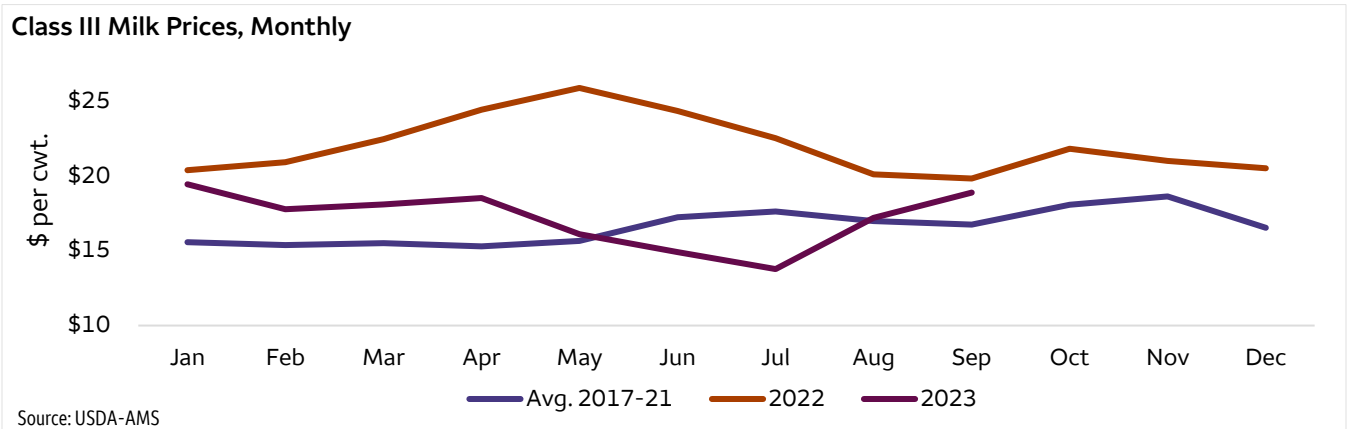


Grain and Oilseeds (cont'd)



Dairy

- The combination of low milk prices, high feed costs, and record beef prices has caused dairy farmers to cull more cows. Through September, 2.1 million head of dairy cows had been sent to slaughter which is up 108,000 head over last year.¹⁷ This may lead to higher milk prices into 2024.
- Overall, import growth slowed from China, and there was stronger competition from the European Union and New Zealand. Additionally, U.S. cheese remains the highest price among major exporters. As a result, U.S. dry whey exports fell 16%, and cheese dropped 6% this year. The situation could have been far worse had it not been for Mexico's stepped-up cheese purchases. Bolstered by a strong peso, Mexico purchased 13% more cheese in the first eight months of 2023.¹⁸
- CME butter prices have been at historically record highs hovering over \$3/pound.¹⁹ These prices are the result of lower milk supply due to summer heat and herd reduction, as well as butter retailers stocking up ahead of the winter holiday season.
- The USDA is continuing to listen to proposals to amend Federal Milk Marketing Orders. This would be the first adjustment since the early 2000's. There have been a wide range of proposals on a range of issues such as adjusting the pricing of each component of raw milk and the 'make allowance'. This is a highly debated subject that will certainly alter the dairy industry. However, it may take an extended amount of time to finalize.



Fresh Produce

- Berries will be transitioning from the California growing season to Mexican and South American production in November. Salinas Valley berry production experienced a shortened season and revenues may be lighter in that growing region.
- After a slow start to the season, leafy greens have been producing adequate volumes with stable pricing. The crop is still on track to transition in the November timeframe to Arizona and the Inland Empire of California.
- Processing tomatoes are continuing harvest through October and potentially November. Processors have noted this is the first year where more harvesting and processing will take place in October versus July. Margins have the potential to be impacted by late season premiums being paid by processors.

Tree Nuts

- **Walnuts**- California walnut growers are harvesting throughout the state, and estimates are that the crop could reach 760m tons in 2023, a 1% increase over last year. Quality looks much improved since 2022, which could aid marketing. There continues to be concern that both domestic and export buyers have become accustomed to low prices and may hold off on large purchases to see how the crop finishes. Orchard removals have reduced bearing acreage to 375m acres, and both growers and handlers anticipate continued orchard removals. There are growers in all parts of the San Joaquin and Sacramento Valleys that are considering not harvesting the crop to cut their losses. Low prices have made walnuts difficult for growers to sustain. Recent sales prices are in the \$0.60 to \$0.66 per pound range (\$2.20 to \$2.50 for walnut meats). In general, growers need \$0.75/lbs. to breakeven, and \$0.85 for some profitability (these depend on debt carry, overhead, water cost, etc.).²¹
- **Almonds**- Almond harvest is approaching completion, with hulling to continue through the end of the year. Harvest has run approximately two weeks behind normal from the start. The wild year that has been 2023 has continued to be unpredictable. Rainfall during bloom, cool and wet spring conditions, low prices, slow sales both domestic and export, have all challenged California's almond producers and marketers. The 2023 objective estimate from the USDA was released in July, and forecast a crop of 2.6 billion pounds, a 1% increase from 2022. Growers, hullers, and marketers throughout the State have reported higher- than-normal levels of worm and pest damage, which may shrink the size of the crop that is marketable. September is the first month of the marketing year for the crop, and the position report from the Almond Board of California shows total supplies down 21%, but this is understated due to delayed harvest. September shipments, both domestic and export, have picked up, but still lag the boom years of 5+/- years ago. Market reports from various sources note that buyers are buying hand to mouth, waiting to see what the size and quality of the total crop is. Many buyers have become used to low prices and may be slow to buy until they must. Recent sales indicate grower prices of \$1.60 to \$1.75 per lbs., however as the crop marketing year and payments extend until the Summer of 2024, there are a lot of sales and markets to be explored before pricing becomes known.²⁵
- **Pistachios**- The 2023 California pistachio crop is estimated in a report from the American Pistachio Growers at 1.36 billion pounds from 454m bearing acres. This large crop is driven by continued increases in acres planted and coming into production and an "on year" for this highly alternate bearing crop. New plantings have continued in California as pistachios have replaced almonds due to better grower returns and have become the permanent crop of choice in areas with water supply restrictions and lower quality ground water supplies. Notable volumes of pistachios are also now being produced in Arizona, New Mexico, and Texas, adding to potential supplies. With harvest still underway, price expectations for growers are muted as most growers and handlers are anticipating a large crop. Early estimates are for prices in the \$1.90/lbs. range. Long term, the Pistachio crop from California could exceed 2 billion pounds in the early 2030s, with acreage reaching 800m acres or more.²⁶

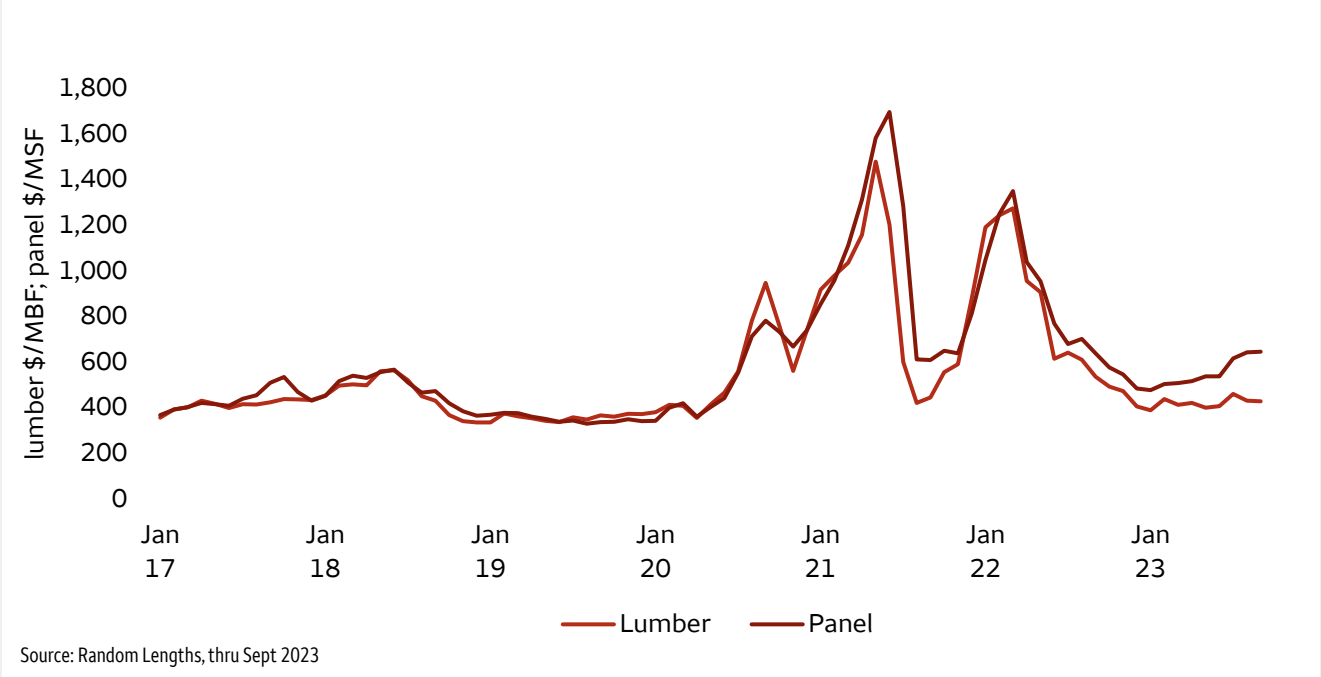
Citrus

- The final U.S. citrus crop summary for the 2022/23 season as reported by the USDA’s NASS reports total U.S. citrus production dropped to a new low of 4.9mm tons, down 12% from prior crop year’s production the lowest combined total U.S. production in the last 50 years. This year’s historically small crop is primarily attributed to the long-term decline in Florida’s total orange crop combined with a smaller navel orange and tangerine crops in California. However, Texas’ grapefruit and Valencia orange crop improved over prior year as did the lemon crop in both California and Arizona. Overall, California remained the largest citrus producing state accounting for approximately 92% of the fresh market production in the U.S. Total value of the U.S. citrus crop of \$2.6 billion was also down from the prior crop year by 13.5%, or a decrease in real value of 16% after adjusting for inflation.²⁷
- California’s navel orange forecast for 2023/24 crop is up 1% Y/Y at 74MM boxes. Cara Cara’s continue to be a growing and popular variety for the fresh market.²²
- Florida’s total orange crop for the 2022/23 season came in at 811,000 tons, down 60% from the prior season and the lowest on record in 80 years. In addition to lower production related to citrus greening, it approximately 42% of the total decline is attributable to Hurricane Ian and resulted in average fruit droppage of ~70%, the highest ever since this data began to be collected for the 1960/61 season. Current projections for the 2023/24 Florida crop totals 20,500 boxes, up 30% over prior year, with Valencia up 35% and early/mids up 22%.²³

Forest Products

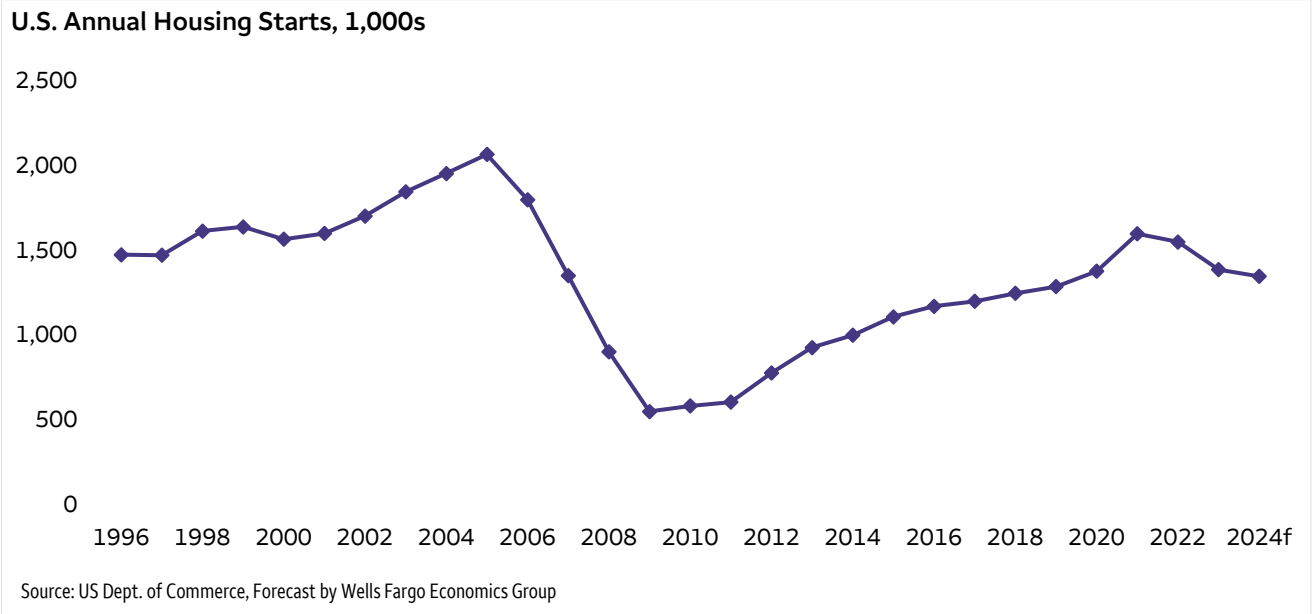
- Softwood framing lumber prices have been trending sideways for most of 2023, trading within a relatively narrow range compared to the huge swings over 2020-2022. Right now, the framing lumber market at \$403/MBF is still tenuous but drifting lower.²⁴ The outlook is guarded at best with near lumber futures holding close to cash markets.²⁴
- Structural panel prices have been steadily improving throughout the course of 2023, rising over 35% since hitting a low point in January 2023. However, the last month has started to see some weakness in the nominal structural panel composite with the most recent weekly value dropping to \$577/MSF.²⁴ Nonetheless, prices for OSB and softwood plywood prices are holding-up pretty well overall in a market with lots of uncertainty.

U.S. Framing Lumber and Structural Panel Monthly Composite Prices



Forest Products (cont'd)

- In October 2023, the Wells Fargo Economics Group maintained its U.S. housing starts forecast at 1,390,000 total starts in 2023, which is a 10.5% YOY decline from 2022. However, its forecast for 2024 total U.S. housing starts was revised 3.5% lower to 1,350,000.
- Headwinds remain the high cost of housing and abruptly rising mortgage rates, where 30-year fixed conventional rates have recently climbed back over 7.5% and may have even hit 8.0%, depending on the resource.²⁴ The current mortgage rates are likely a shock to first-time home buyers who had become accustomed to mortgage rates below 4%.

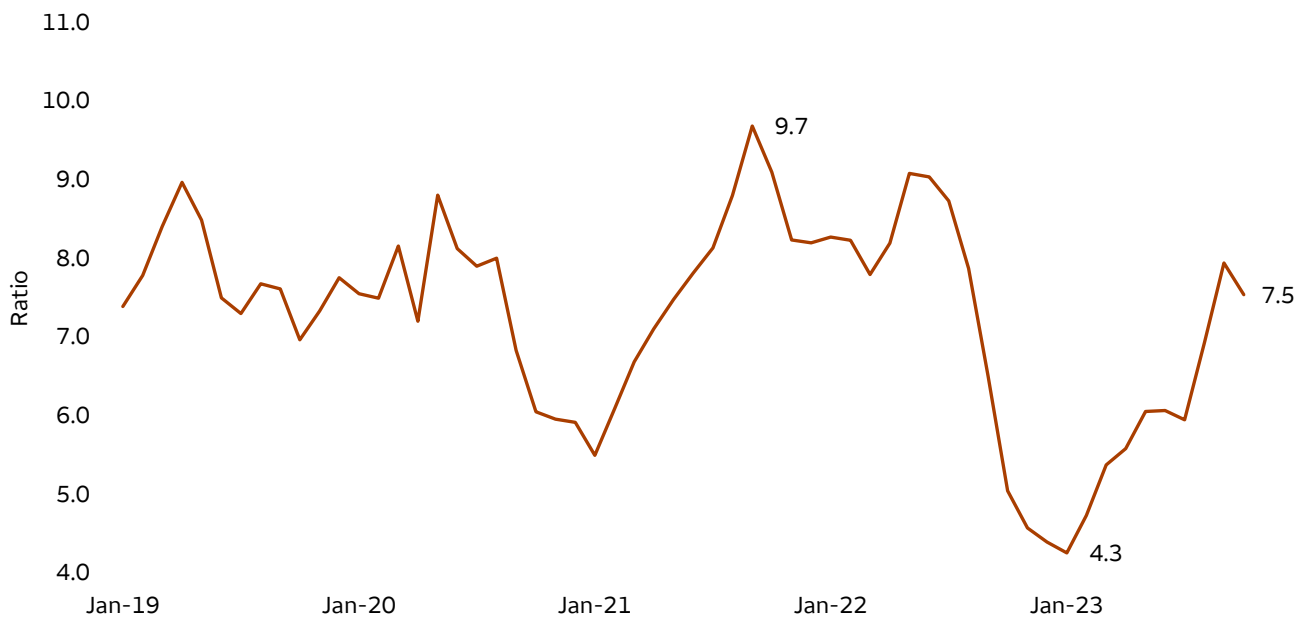


Protein

- Comparing retail prices to 2022 levels, consumers paid less in September for pork (-1.7%), poultry (-0.4%), and eggs (-14.5%) and more for beef (+7.0%).²⁸ According to Nielsen data, weekly volume sales in the second half of 2023 are increasing for chicken, steady for beef, and mixed for pork.
- Highly Pathogenic Avian Influenza (HPAI) returns to the U.S. this fall. In October, 21 new cases in U.S. commercial turkey flocks have been confirmed in Minnesota, Utah, South Dakota, Iowa, and California.²⁹ While the poultry industry is keeping a close eye on the situation, less than 1 million birds have been impacted. For comparison, last year saw over 8 million birds impacted in the Sept/Oct time frame.
- Margins and profitability for broiler processors have improved in the second half of 2023 on higher chicken pricing and lower feed costs.³⁰ A combination of announced processing plants closures, lower slaughter numbers, lighter weight birds, and improving consumer demand is supporting higher wholesale pricing.

Chicken Packer Margin

Est. Ratio

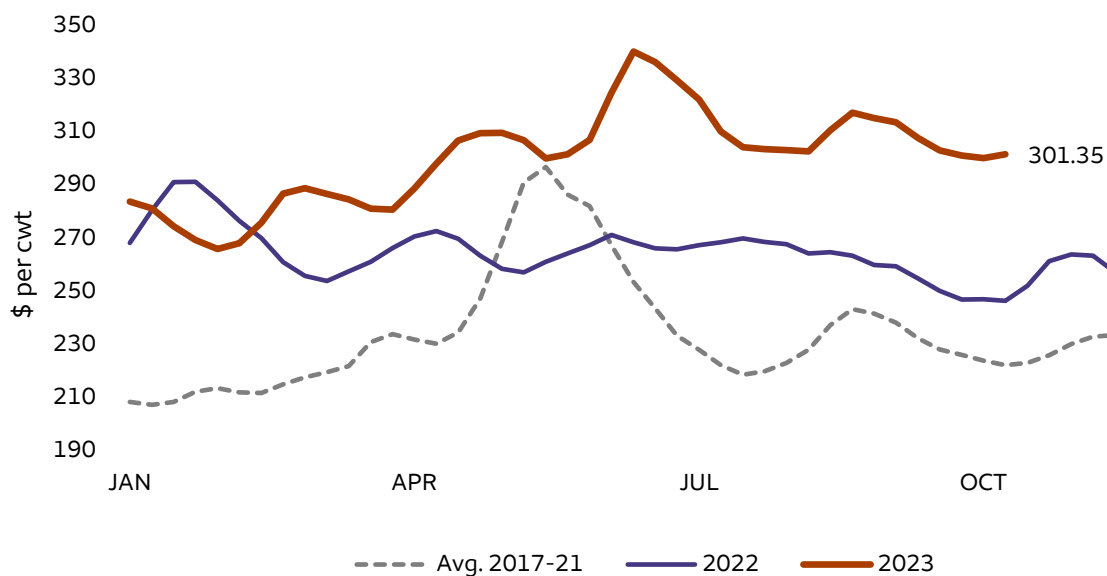


Sources: USDA, CME, Calculations by Wells Fargo

- The beef industry continues to deal with lower supply. Total cattle slaughter YTD is down 4.6% YoY.³¹ Lower cattle supplies pushed fed cattle prices 25% higher YoY in October.³¹ Wholesale choice box beef prices averaged 22% higher YoY in early October.³¹ Imports of beef have increased 5% YTD to help fill some of the void in trimming/ground beef supplies.³² Beef supply is forecasted to continue lower into 2024.³³

Boxed Beef Cutout Value

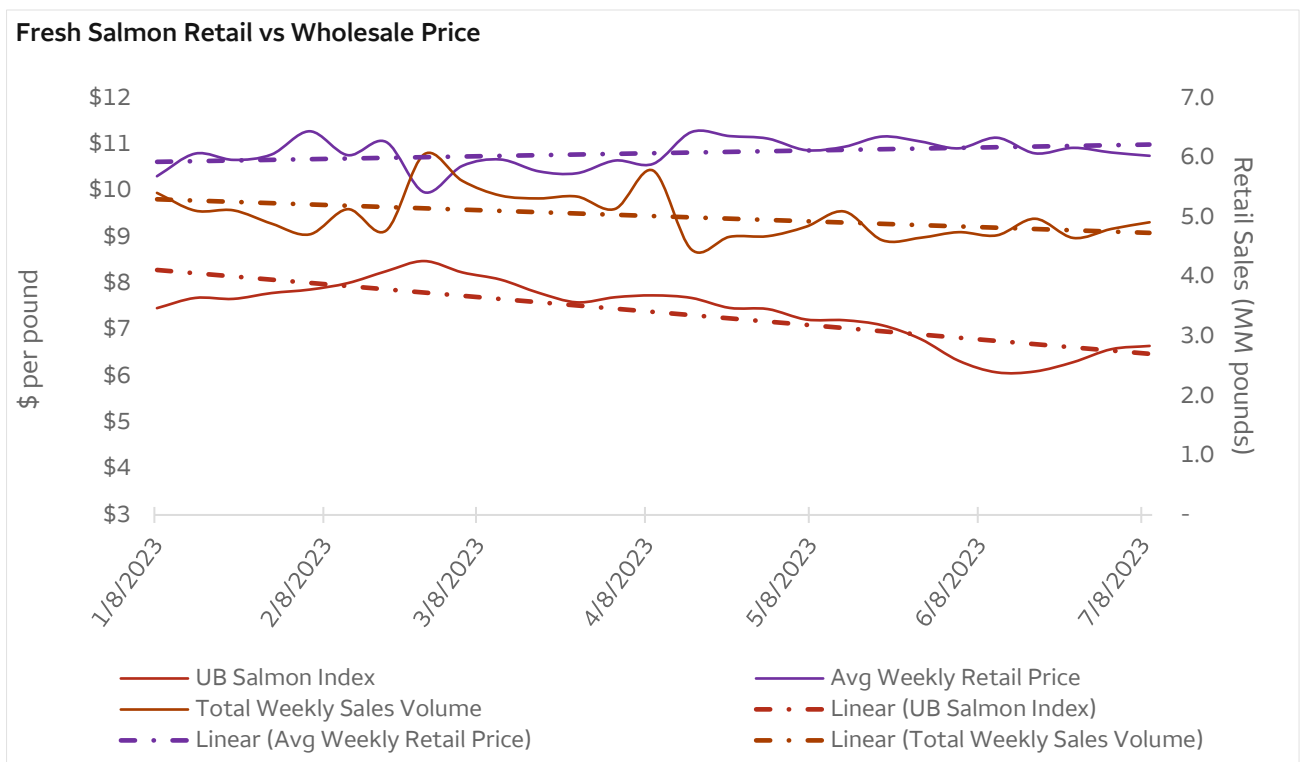
Choice 600-900 lbs., Carcass, Negotiated, Weekly



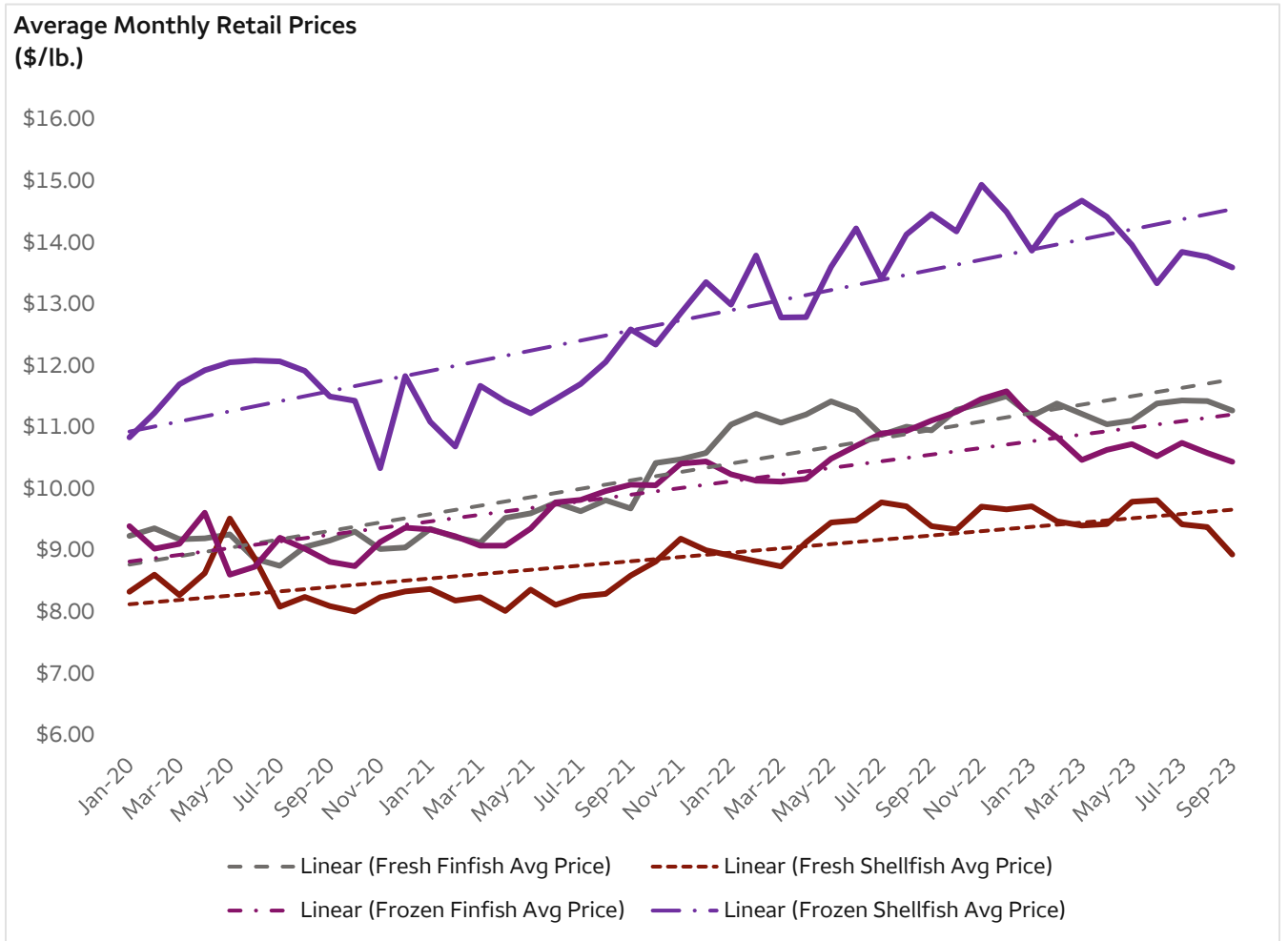
Source: USDA-AMS

Seafood

- The overall seafood industry remains unsettled as harvesters, 1st and 2nd stage processors, and wholesalers/distributors all continue to deal with the negative impacts of inflation coupled with rising interest rates on the overall seafood supply chain. Each step of the chain typically relies on some type of borrowing to finance purchases, cost of maintaining inventory, and collecting receivables. While this need for financing is not in itself unusual, when the cost of financing for each link in the overall supply chain effectively doubles in a year's time, these increased costs force a price adjustment at each level of the supply chain. As prices rise, however, demand typically declines as buyers look for lower cost products which results in lower sales and a build-up of inventory which creates pressure for a price adjustment to clear out the growing inventory. As a result, the wholesale value of various seafood products falls. This is what has essentially happened to shrimp, salmon, crab, and several other products which has ultimately flowed down to the harvesters who are being offered lower prices for their catch.³⁴
- The result of the above scenario is what is being observed in the market today. While wholesale prices on average have declined from all-time highs achieved in late 2021/early 2022, retail prices as reported by Circana/Urner Barry have increased over the same period. Essentially, we're seeing a lower volume of seafood sales at the retail level combined with higher retail prices as retailers have less room to reduce prices due to the higher overall supply chain costs. An example of this is presented in the graph below which compares the wholesale UB salmon index price to the average weekly retail price and retail sales volume of salmon sold across the U.S. Although retail prices appear to have stabilized at a higher overall level, retail sales volume as well as wholesale prices continue to decline. Although this example is for salmon, the same pattern has been observed for cod, pollock, flounder, shrimp, and many others. Going forward it will be interesting to see if this trend continues or eventually reverts to a more "normalized" trend, but if it doesn't, then eventually only the lowest cost producers will be able to remain in business.³⁵



Seafood (cont'd)



Specialty Crops

- The 2022/23 coffee year is projected to be up 1.7% to 171.3 million bags. World coffee consumption is expected to increase by 1.7% to 178.5 million bags in coffee year 2022/23.³⁶
- Robusta coffee, which is traditionally cheaper than Arabica coffee, is near a record high at \$1.20 per pound. Record prices are attributed to drought in Brazil, and poor weather in both Indonesia and India.³⁶

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Sources:

1. Wells Fargo Economist
2. AgMatrix
3. BI Intelligence
4. CNN/USDA
5. Food Institute
6. US Census Bureau
7. US Bureau of Labor Statistics
8. NielsenIQ
9. Roach Ag Fertilizer
10. Reuters
11. Progressive Farmer Magazine – DTN
12. Green Markets Report
13. USDA-FAS, cZAPP Analytics
14. Progressive Farmers 10/23
15. EverAg
16. USDA Oct Outlook
17. Kansas Farmer 10/23
18. Farm Progress
19. The Weekly Wire
20. California Table Grape Commission
21. Ag Alert & Wells Fargo Ag Services
22. Citrus Industry
23. USDA-NASS
24. Random Lengths, October 2023
25. Almond Board of California, Blue Diamond Growers
26. American Pistachio Growers, Wells Fargo Ag Services
27. USDA-ERS and Tree Nut Outlook
28. BLS
29. USDA-APHIS
30. USDA, CME, Wells Fargo Calculations
31. USDA-AMS
32. USDA-ERS
33. USDA-WASDE
34. Urner Barry/Comtell, Wells Fargo
35. Circana & Urner Barry
36. International Coffee Organization