Staff Report No. 2021-08 **January 14, 2021**

January Market Update
Corn, Soybeans, Rice, and Cotton

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WASDE Summary

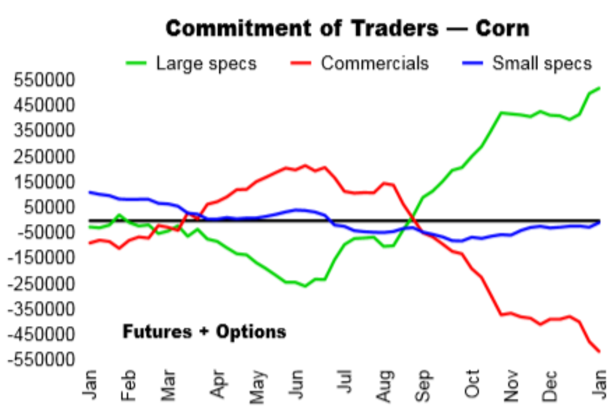
This month's 2020/21 U.S. **corn** outlook is for lower production, reduced corn used for ethanol, smaller feed and residual use and exports, and decreased ending stocks. Corn production is estimated at 14.182 billion bushels, down 324 million on a lower yield and slight reduction in harvested area. Total corn use is down 250 million bushels to 14.575 billion. Exports are down 100 million bushels, reflecting sharply lower supplies and higher expected prices. Corn used for ethanol is lowered, based on data through November from the *Grain Crushings and Co-Products Production* report and weekly ethanol production during December as indicated by the Energy Information Administration. Feed and residual use is reduced 50 million bushels to 5.650 billion, based on indicated disappearance during the September-November quarter. With supply falling more than use, corn stocks are lowered 150 million bushels to 1.552 billion. **The season-average corn price received by producers is raised to $4.20 per bushel.**

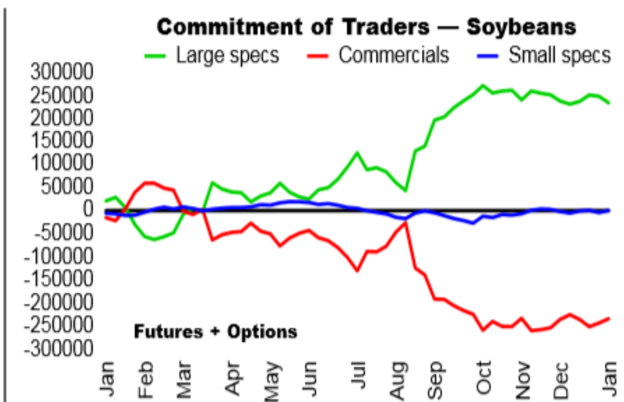
Soybean production is estimated at 4.135 billion bushels, down 35 million led by reductions for Minnesota, Iowa, and Kansas. Harvested area is estimated at 82.3 million acres, up slightly from the previous report. Yield is estimated at 50.2 bushels per acre, down 0.5 bushels. With higher imports and slightly higher beginning stocks, soybean supplies are down 14 million bushels from last month. The soybean crush forecast is raised 5 million bushels to 2.2 billion, reflecting improved prospects for soybean meal exports with a lower export forecast for Argentina. The soybean export forecast is raised 30 million to a record 2.23 billion bushels. With lower supplies and increased use, ending stocks are projected at 140 million bushels, down 35 million from the previous forecast. Soybean and soybean product prices are forecast higher this month. **The U.S. season-average soybean price for 2020/21 is projected at $11.15 per bushel,** up 60 cents as cash prices in Central Illinois reach 6-year highs.

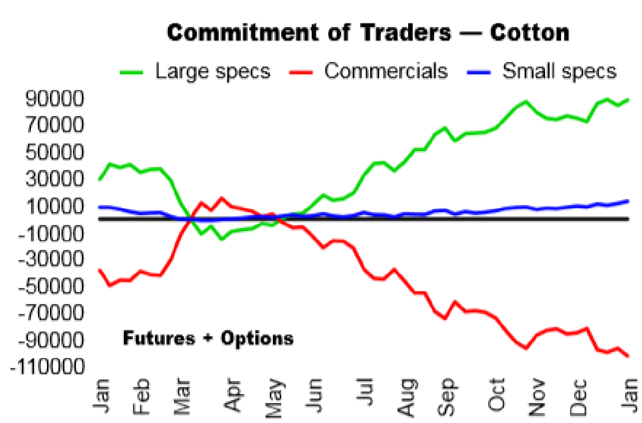
The outlook for 2020/21 U.S. **rice** this month is for larger supplies, higher domestic use, decreased exports, and lower ending stocks. Supplies are raised as increased production more than offsets decreased imports. All rice 2020/21 production is 227.6 cwt, up 1.5 million from the previous estimate. The all-rice average yield is estimated at 7,619 pounds per acre, up 59 pounds from the prior estimate. Imports are lowered 0.3 million cwt to 36.2 million with all the reduction in medium- and short-grain. All rice domestic and residual use is raised 14.5 million cwt to 160.0 million on higher-than-expected usage for August-November as implied by the NASS *Rice Stocks* report. Exports are lowered by 1.0 million cwt to 94.0 million, all for long-grain on the continued weak pace of sales and shipments for long-grain milled rice. Projected 2020/21 all rice ending stocks are lowered 12.4 million cwt to 38.4 million, primarily on higher projected domestic use. The **season-average price received by U.S. farmers for long grain rice is projected at $12.00 per cwt, an increase of $0.20.** The **season-average price received by U.S. farmers for southern medium grain rice is projected at $12.30 per cwt, an increase of $0.30.**

The U.S. 2020/21 **cotton** outlook shows higher exports, and lower production and ending stocks this month. Production is lowered nearly 1 million bales to 15.0 million, led by a 500,000-bale decline in Texas. U.S. mill use has been reduced 100,000 bales, but exports were raised 250,000 bales as rebounding world demand helps sustain a strong export pace. With lower production and higher demand, 2020/21 U.S. ending stocks are 1.1 million bales lower relative to last month, at 4.6 million bales or 26 percent of use. **The upland season-average price received by U.S. farmers is projected 3 cents higher this month, at 68 cents per pound**.

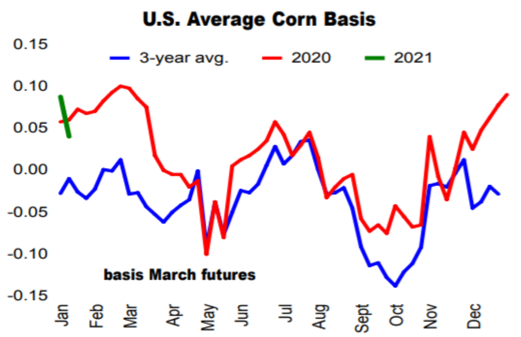
Commitment of Traders Report (COT) January 12, 2021

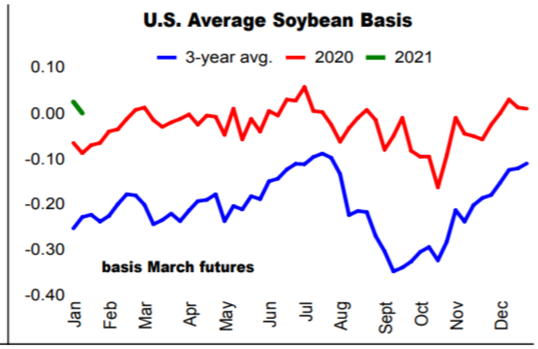


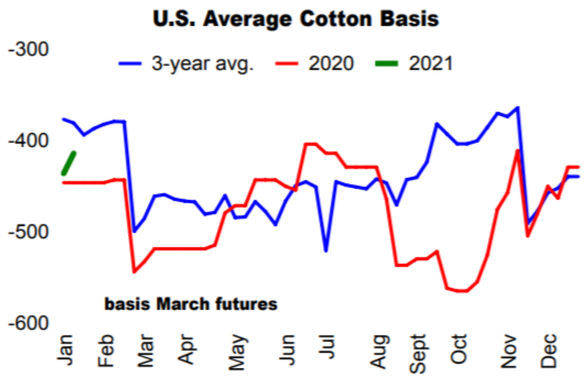




Cash Market Basis Charts January 14, 2021



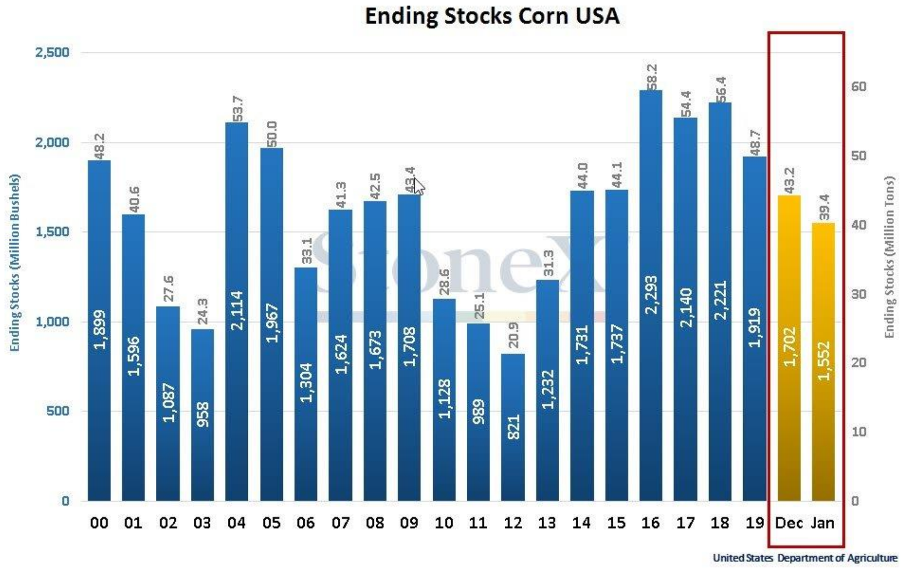


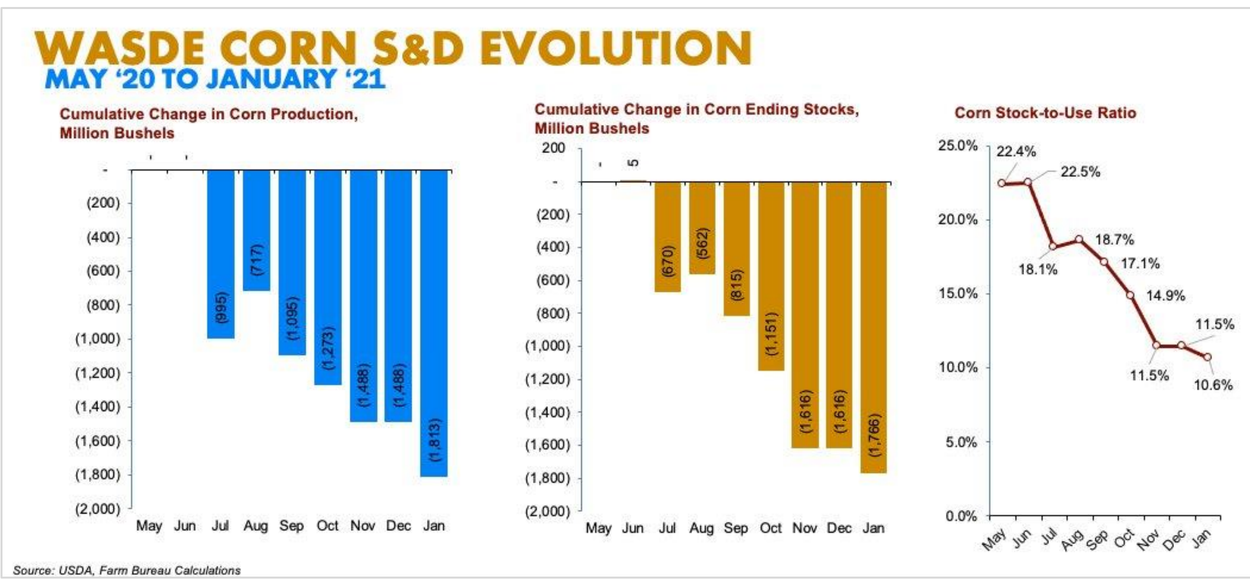


Corn

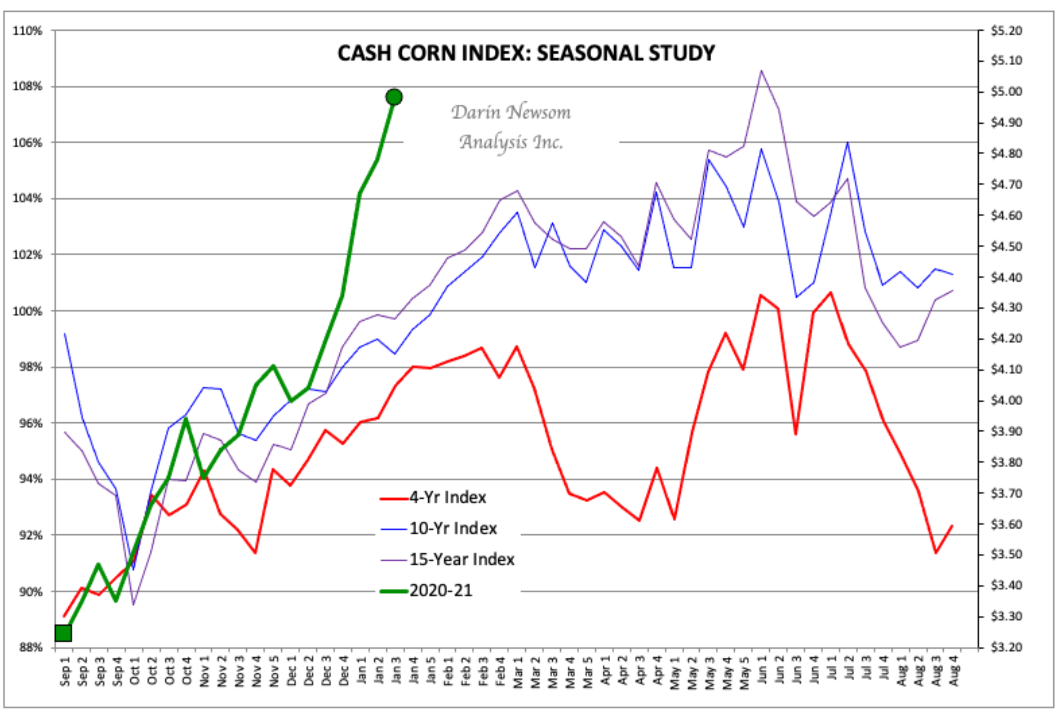
The corn market's bullish reaction to the report was friendly versus the trade’s expectations. The USDA slashed expected demand but cut its 2020 crop estimate even more. The bottom line is a projected 2020/21 corn carryout of 1.552 billion bushels, down from the average analyst estimate of 1.599 billion bushels and from last month's estimate of 1.702 billion bushels. Last year's carryout was 1.919 billion. The USDA's December 1st corn stocks number was bullish for corn at 11.322 billion bushels, well below the average analyst estimate of 11.951 billion.

The USDA cut corn demand across the board. Exports were cut by 100 million to 2.550 billion bushels; ethanol was cut by 50 million bushels from last month to 4.950 billion; and feed/residual use was cut by 50 million bushels to 5.650 billion. But the final Crop Production estimate more-than-offset these changes, as USDA slashed the national average corn yield by 3.8 bushels to 172.0 bushels/acre, and total production by 325 million bushels to 14.182 billion. Analysts were on average expecting a national corn yield of 175.3 bushels/acre and production of 14.470 billion.



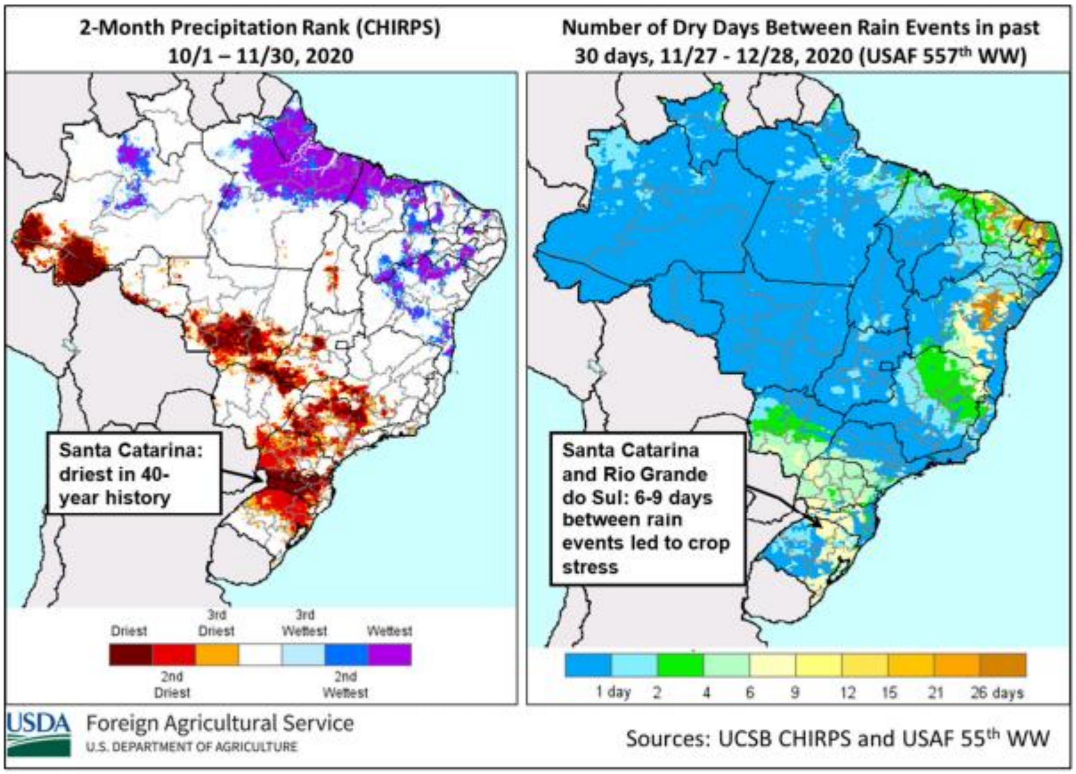


The latest estimate of 1.552 billion bushels is down more than 50% from the June projection. The crop alone fell 1.8 billion bushels (-11%) from original expectations. Stocks-to-use falls to 10.6% (was 11.5% in December), and that would be a 7-year low. CBOT corn futures are locked up the 25-cent daily limit after extremely bullish data from the USDA. The most-active contract has hit a high of $5.17-1/4 per bushel.



Corn prices have been and still currently are being influenced by concerns over South American supply and the dollar's precipitous fall to a three-year low have worked in tandem to limit losses for the corn complex. Corn exports have been strong thus far in the 2020/21 marketing year with little indication of slowing down amid a rising dollar and strong Chinese demand. A recovery in ethanol demand as gasoline demand increases would certainly increase usage rates. Should the USDA increase its optimism on demand for either of those demand targets, 1.652 billion bushels in 2020/21 corn ending stocks may turn out to be much smaller than previously thought.

Brazil Corn: First Corn Crop Affected by Dry Weather

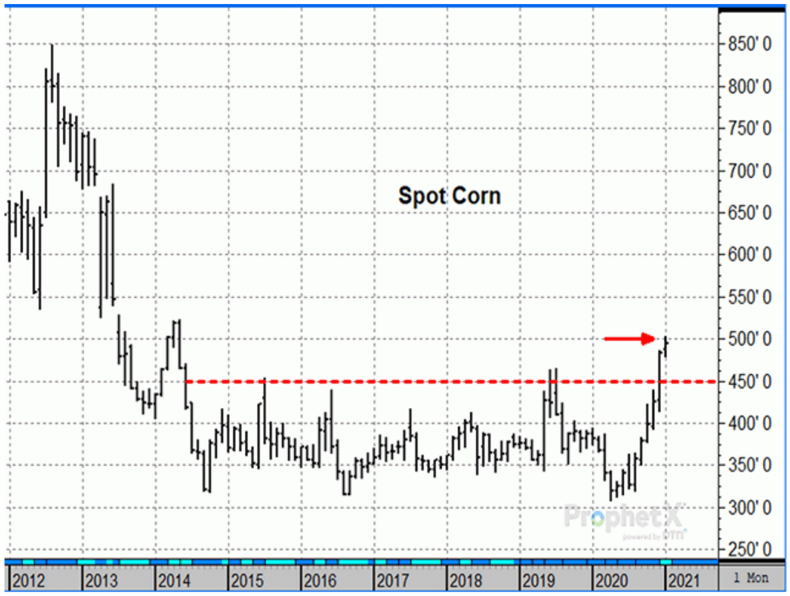


Brazil's first-season corn production comprises about one-fourth of total production, while second season (safrinha) corn production now covers approximately three-fourths of Brazil's total corn production. October and November were the driest two months in 40 years in some parts of southern and central Brazil. The substantial gaps between rain events and historic month-long delay in onset of rains has led to crop stress and negatively impacted crop development in Rio Grande do Sul and Santa Catarina. These two states contribute about 9 mmt (or 30%) to the first-crop production.

Supply concerns come as China goes on a crop-buying spree and places its bets on an economic recovery, luring investors back to commodities. Feed-grain demand in China is swelling as it rebuilds its hog industry after a devastating bout of African swine fever. Hedge funds have a near-record, net-long position across agricultural markets. Argentina last week announced a temporary suspension on corn-export licenses, prompting farmers to plan a three-day January sales halt in protest. Dryness in the region has raised concerns for corn and soy harvests, while top wheat shipper Russia will curb grain exports from mid-February to tame food inflation.

Corn futures have made a quick ride upward from $4.50 with the 20-day average still sitting around $4.48. Relative strength index currently sits at 86, the highest it has been since January 2008. Until January 6 (prior to the January 12 WASDE report), the last time spot corn futures traded above $5 was May 14, 2014. At that time, old crop ending corn stocks were estimated at 1.146 billion bushels, or 8.4%

of annual use. Drought was threatening the Western Corn Belt and 59% of the new corn crop was planted- in line with the usual pace.



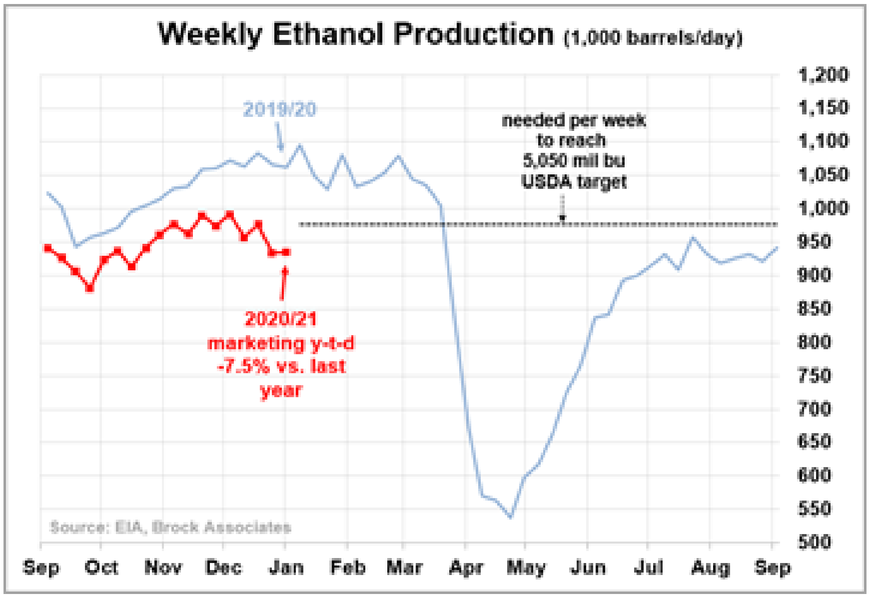
The drought threat of 2014 eventually retreated and the year closed out with a good corn harvest, reaching a record high 14.22 billion bushels on a record yield of 171 bushels per acre. Ending corn stocks increased to 1.73 billion bushels in 2014-15, which was the start of a six-year run that would put spot corn prices in a slump, averaging $3.70 a bushel and falling as low as $3.09 during the coronavirus-related selling panic in April 2020.

As we now know, there has been a remarkably bullish about-face in corn prices since that April low, due in part to a smaller corn crop in 2020 than was earlier anticipated and unexpected buying from China. China appears to have shortages of feed grain and oilseeds, and it is difficult to tell how much more corn China might buy.

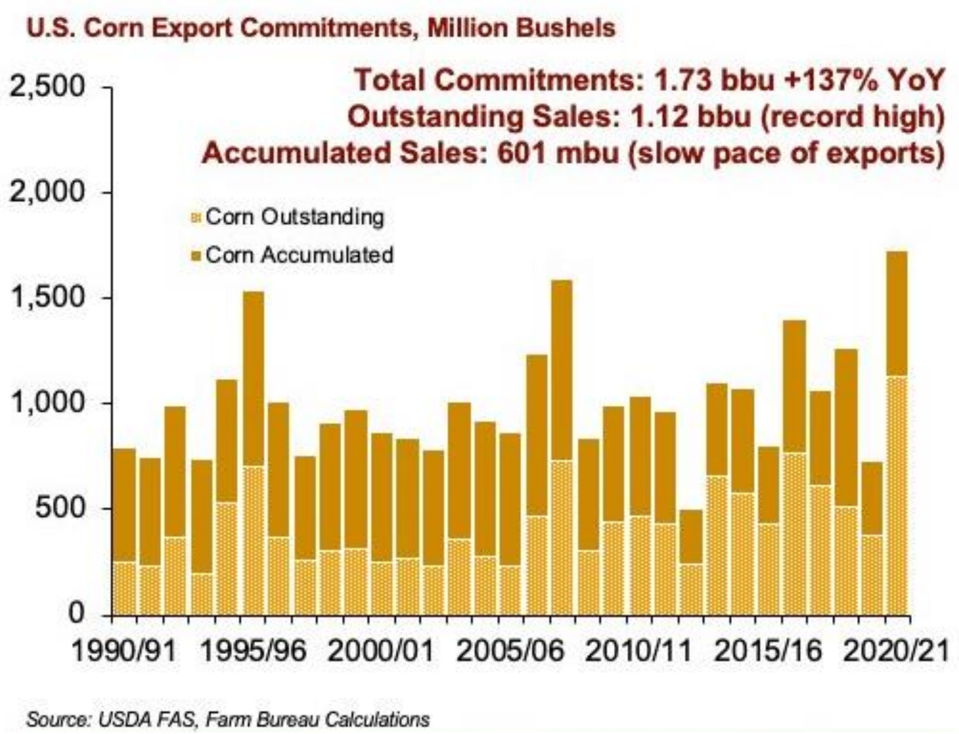
In the case of corn, the USDA's ending corn stocks estimate of 1.70 billion bushels is 11.5% of annual use. It is a lot more bullish than the 3.32 billion bushel estimate last June, but not close to the tight scenario we're talking about for soybeans. The history of cash corn prices at an 11.5% ending stocks-to-use ratio points to a target of $4.20 per bushel, which is far below the $4.94 per bushel that March corn settled at on Jan. 7th.

The 10-year average of spot soybean to spot corn prices is 2.5:1. Over the past 20 years, the ratio has ranged from roughly 2:1 to 3:1. The current ratio of 2.74:1 ($13.55 1/4 for March soybeans/$4.94 for March corn) is remarkably normal, given the much tighter fundamental supply concern in soybeans. The dilemma here is that if soybeans continue to trade higher on tight supplies, as their price history suggests they will, it seems likely that corn will keep trading higher as well.

Corn-for-ethanol demand remains a bearish factor for the corn market. As noted at midsession, ethanol production for the week ending December 25th was roughly steady with a week earlier. U.S. ethanol stocks fell slightly, but gasoline demand was at its weakest point since last May. Ethanol plant margins are very weak and there may be more plants shutting down or cutting back production in the near future. Ingredion today announced it is ceasing ethanol production at its Cedar Rapids, Iowa plant, the oldest in the Midwest, at the end of January.

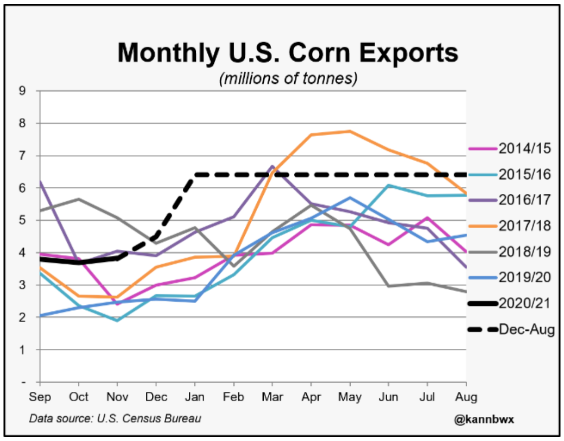


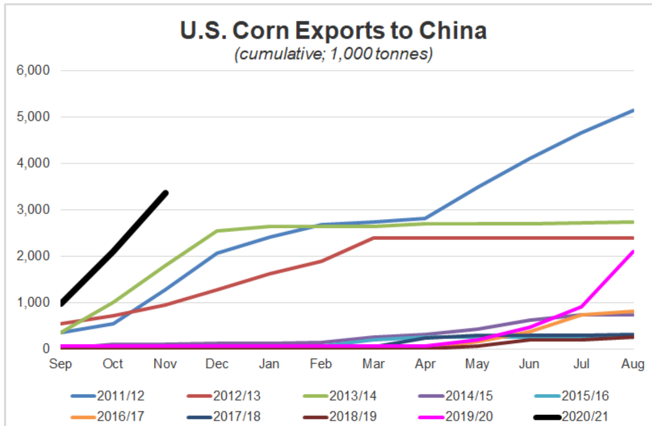
A lot of bullish news has already been factored into the corn market at these price levels and the bulls will likely need some fresh fodder soon to keep the upward momentum going. The bulls will no doubt be looking to next Tuesday's USDA reports for such news. However, at this point, it is very possible that even further cuts to U.S. production and ending stocks might be met with a "buy the rumor, sell the fact" reaction at least in the short-term. The record long position held by large speculators means there is big potential for profit-taking to pressure prices.



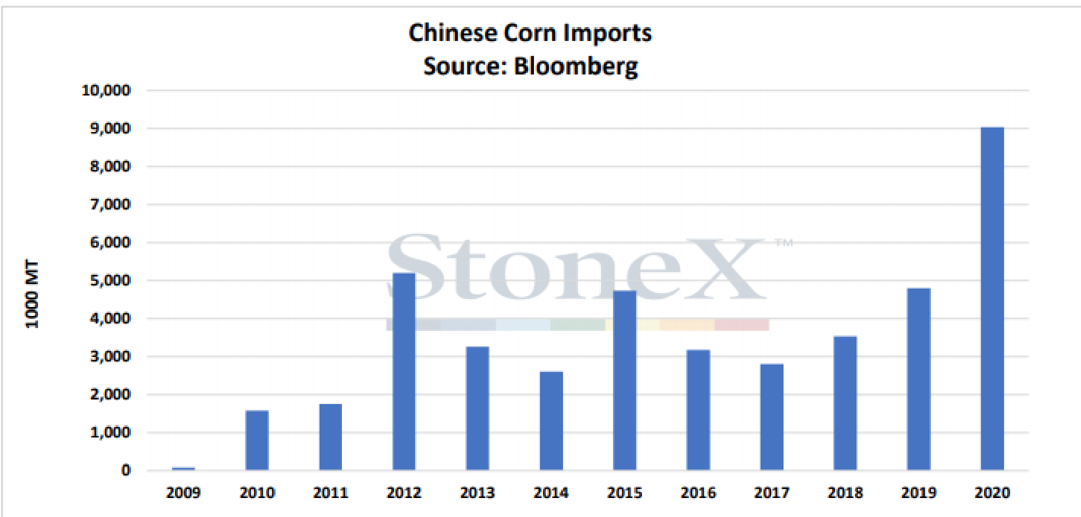
U.S. corn exports have been relatively weak when considering record USDA expectations (2.65 billion bushels/67.3 million metric tons). This shows, on average, what the rest of 2020/21 would need to look like to hit that target. It approximates December around 4.5 million metric tons using inspection data.

Corn exports in November were 3.8 million metric tons, and totals for Q1 are 11.3 million metric tons (445 million bushels) - 30% to China. That is -29% Q1 2018/19 and -19% Q1 2016/17. The U.S. shipped 1.28 million metric tons (51 million bushels) of corn to China in November - an all-time monthly record. September-November (Q1 2020/21) shipments to China total 3.4 million metric tons (133 million bushels) - a record pace thus far.





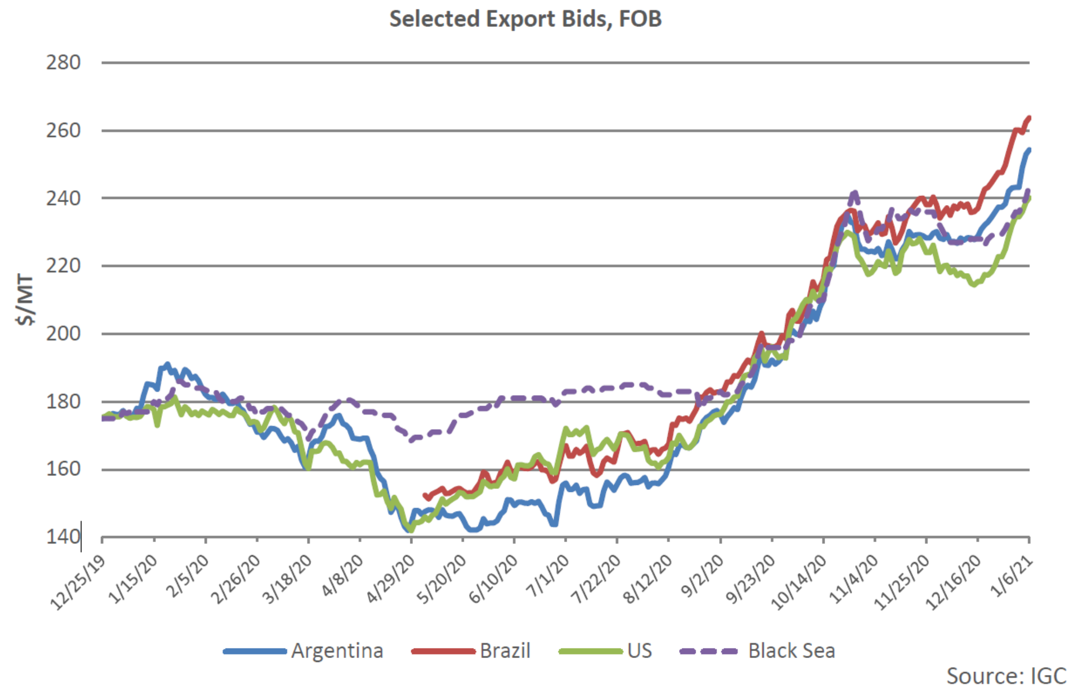
With respect to Chinese corn imports, the Financial Times recently reported, "China has been a particularly big buyer of everything from corn to rice. The country's authorities used their reserves to damp down price increases during the pandemic and are replenishing their strategic stockpiles. A recovery in the hog herd after the devastation caused by African swine fever has also meant a rebound in grains used for livestock feed."



The Financial Times report went on to say that, "In the corn market, for example, the US Department of Agriculture's Beijing bureau recently more than tripled estimates for China's imports in the 2020-21 crop year from 7 million tons to 22million. Due to the low level of state reserves, 'substantial corn imports will be necessary to meet demand while also controlling further price increases and maintain stocks throughout 2021."

Since the release of the USDA's December WASDE report, major corn export bids are higher across the board, most likely due to rising soybean prices and supply concerns in South America. Argentine bids are up $27/ton to $254 and Brazilian bids are up $29/ton to $264 on continued tight nearby supplies. Black

Sea bids are up $17/ton to $244 on strong demand from China. U.S. bids are up $22/ton to $240 on strong sales and shipments. U.S. bids remain the lowest of the major exporters.



Corn prices in exporting countries have gone up sharply from a year ago, initially impacted by smaller supplies in Ukraine and strong demand from China. Supply concerns in South America and rising soybean prices have further stimulated corn prices. Argentina's short-lived action to suspend export registrations for old crop corn sales during January and February has further fueled prices3. As of early January, exporters' prices ranged between $240 and $260/ton per ton, the highest since the summer of 2013. U.S. corn No. 2 at Gulf FOB hovered around $225/ton.

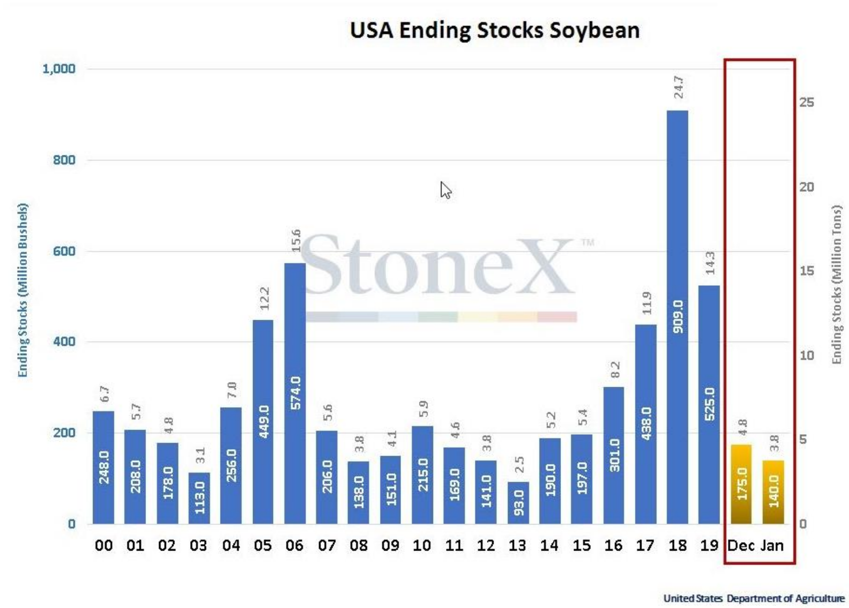
While available supplies are smaller in Ukraine, the export season is winding down for Argentina and Brazil. Corn planting is underway in Argentina and Brazil. Until the South American crop comes onto the market, typically in May/June, corn prices are expected to remain elevated reflecting tight availabilities and demand in China.

Strong prices are expected to curb import demand as most countries are sensitive to feed costs. Import forecasts for many countries are trimmed from prior expectations. China imports, however, are raised reflecting stronger feed demand and rising domestic prices. In fact, the spread between China's national average wholesale price and U.S. corn has widened throughout 2020. In December, China corn prices reached $394/ton, almost twice as high as U.S. corn. As China continues to rebuild its swine sector, demand for competitively priced feedstuffs is likely to remain strong. China corn imports for 2020/21 (October-September) are currently forecast at 17.5 million tons, the second largest after the European Union.

Soybeans

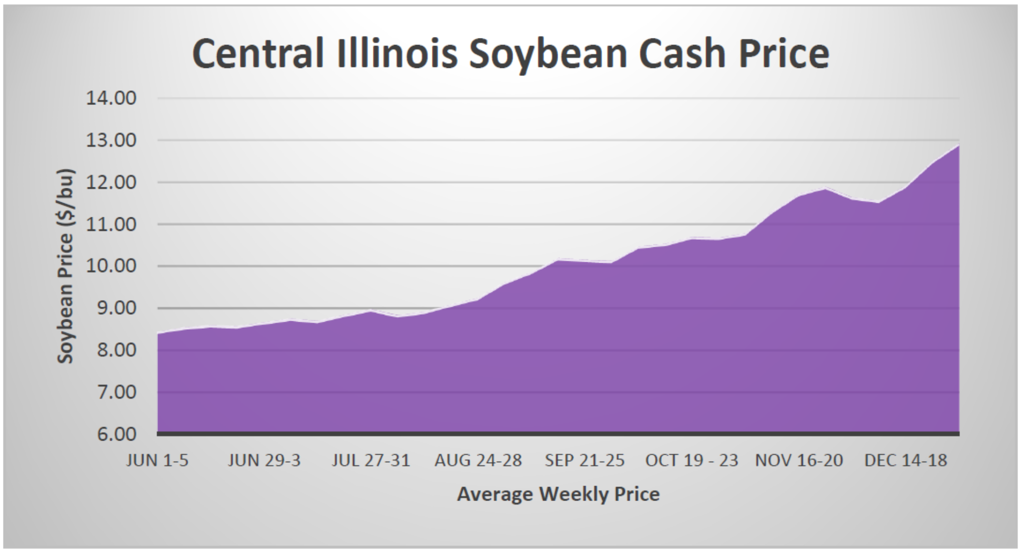
The USDA report was less dramatic for soybeans, although the balance sheet for soybeans has already had the trade on edge. The USDA lowered its 2020 soybean yield estimate to 50.2 bushels/acre from

November’s projected estimate of 50.7, and the total crop size to 4.135 billion bushels from 4.170 billion in November. These cuts were larger than expected, as analysts were on average expecting a yield of 50.5 and production of 4.158 billion bushels. Bottom-line numbers for soybeans were near expectations however, particularly the 2020-21 projected carryout of 140 million bushels, almost right on the average of 139 million. While this number may not be a surprise, it is nonetheless very tight, encouraging higher prices. As we have noted recently, even with a big jump in 2021 acres, it will take a huge national average yield to start to rebuild stocks.



"Beans are well into the teens." The most-active CBOT soybeans broke through $14 per bushel for the first time since June 2014 on shrinking global supplies and strong demand.

Soybean prices continued to rise in December after retreating slightly from late November highs. Cash prices pushed past $13.00 per bushel in early January following futures prices in Chicago that rose above $13.50 per bushel. Central Illinois cash prices have added $1.00/bu since mid-December, propelled by short-term uncertainty for soybean and product shipments out of Argentina as well as tightening supplies in the United States and concerns regarding yields in South America. Since mid-August, U.S. cash soybean prices are up 50 percent on both strong China demand (rebounding pork feeding) and tightening U.S. supplies (smaller-than-anticipated production over the past 2 harvests).



Dry weather conditions in South America have also supported higher prices. Soybeans in Brazil remain tight with increased imports supplementing limited domestic supplies in late 2020. Recent rains have alleviated some of the concerns, though total rainfall to date remains below historic trends reducing subsurface moisture levels in many growing regions. Regardless, Brazil production is still forecast record large in 2021.

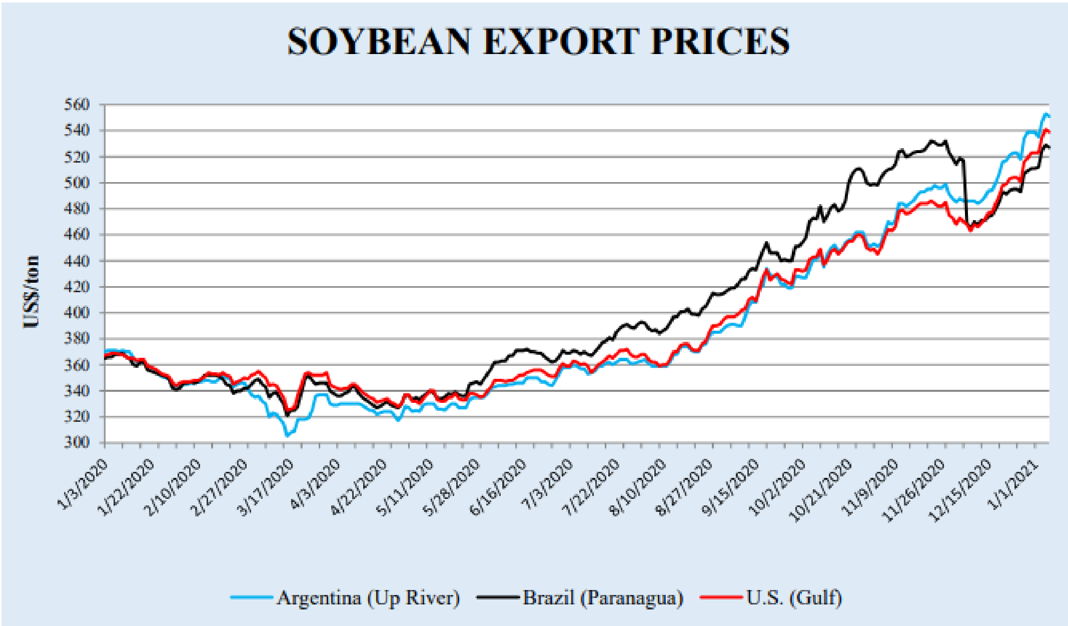
With futures prices closing near $13.75 per bushel on January 11th, they remain well above prices observed in mid-December. With a lower U.S. 2020 soybean harvest estimate this month and reduced U.S. carryout forecast for 2020/21, support for current price levels is expected to remain strong. Expectations are that prices may decline once the Brazil harvest begins in earnest in the coming weeks. While this will alleviate any short-term supply issues, supply and demand factors still point to prices remaining well above the depressed levels observed prior to August 2020.

Soybean export prices for the United States and Argentina strengthened for the seventh consecutive month, reaching its highest level since July 2014. Prices rose throughout the month on strong export demand, lower carry-in from 2019/20, and dry weather in South America. Brazil soybean prices plummeted in early December due to more favorable weather conditions, but trended upward with the other two major exporters during the rest of the month. Rising oil prices persisted in December due to sustained demand for oils despite lockdowns and lower soybean crush in South America. Argentine soy oil prices outpaced both the United States and Brazil, largely due to prolonged strikes, leading to the largest U.S. soy oil price discount against Argentina since June 2015. Palm oil prices continued to rally to more than eight-year highs tracking strong rival oil prices and tightening supplies due to strong exports to India and Kenya in December.

December 2020 Soybean Export Prices

	U.S. Soybeans	Argentina Soybeans	Brazil Soybeans
December Avg Price	$ 486/ton	$ 504/ton	$ 491/ton
Change vs November	+ $ 12/ton	+ $ 21/ton	- $ 30/ton

Source: International Grains Council; all prices are FOB: U.S. Gulf, Argentina Up River, Brazil Paranagua



Crush demand has also been active in the U.S., running 7% above last year's pace in the first three months of 2020-21. Some private analysts estimate U.S. ending soybean stocks below 100 million bushels. Historically speaking, soybean supplies have rarely been below 4% of annual use the past 23 years, but cash soybean prices often trade above $15 per bushel when the ending stocks-to-use ratio drops below 5%. This is a genuinely bullish soybean market and prices may climb higher yet.

Current Federal Grain Inspection Service data show that U.S. soybean export inspections through the week ending December 24th at 1.3 billion bushels, approximately 61% of the December WASDE export projection of 2.2 billion bushels. The average pace to meeting WASDE projections at this point during the marketing year, before the retaliatory tariffs by China, was approximately 52%. Should that pace hold, a reasonable expectation for soybean exports during the current 2020/21 marketing year could be in the 2.6 billion bushel range – 400 million bushels higher than the current projections, and given current carryout levels, 225 million bushels higher than our projected ending stocks.

On the back of strong Chinese demand ($6.8 billion in soybeans purchased in October and November), U.S. soybean export commitments are at record highs. Following a short crop year in 2019, the U.S. is on pace to see the smallest soybean carryout and stocks-to-use level since 2013. This, in turn, is expected to lead to the highest marketing year average price for soybeans since 2013, $10.55 per bushel.

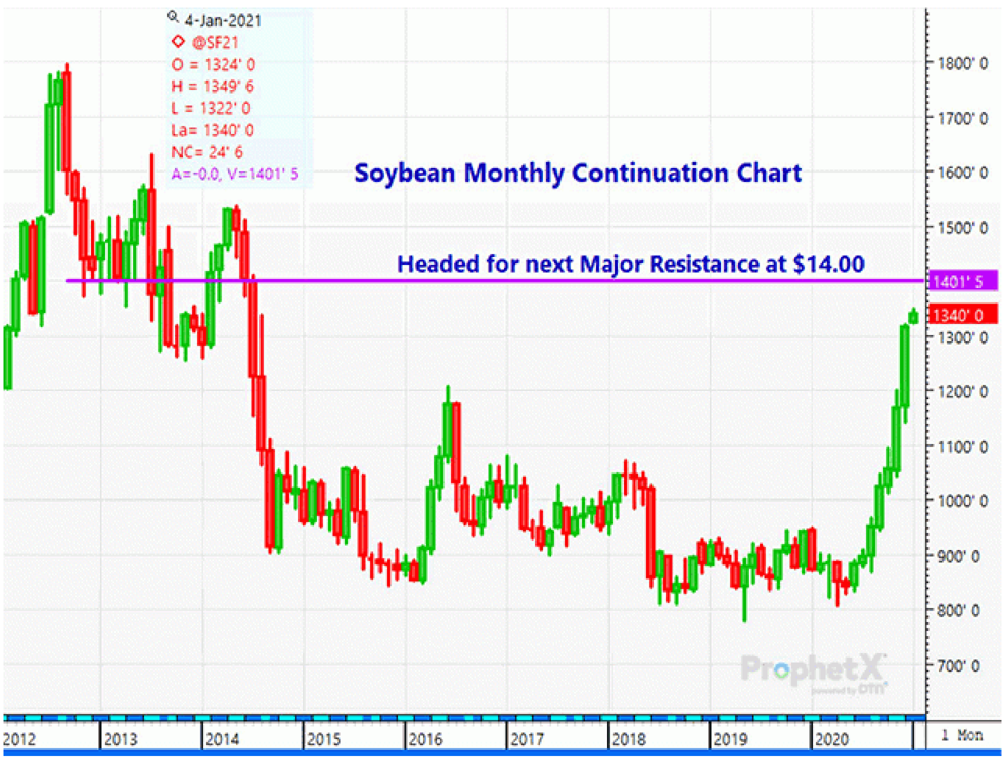
For bulls, any increases in soybean demand in the upcoming January WASDE, if all other factors hold constant, could push soybean stocks-to-use levels to their lowest percentage in decades. In anticipation of the January report, soybean futures prices have sharply rallied in recent weeks and are approaching $13 per bushel.

Bears will point to the downside: With higher prices comes the possibility of canceled export sales. While many buyers may lock in prices in advance, current outstanding sales of soybeans are a record 708 million bushels, leaving open the door for buyers to walk away from high-priced and unhedged soybeans. That, of course, would push stockpiles higher, holding all else constant. Additionally, should South America receive much-needed rainfall in the coming weeks or the port strike in Argentina comes to an end, the demand for U.S.-sourced soybeans could be reduced – again driving prices lower and ending stocks higher.

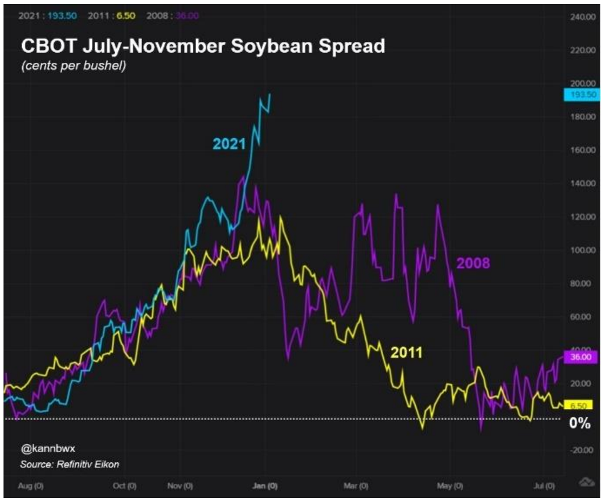
As record U.S. soybean export commitments and record U.S. crush continue to paint a bullish picture for U.S. ending soy stocks, one has to look at the monthly chart to see where this rally can take us next. That level appears to be $14 on March soybeans.

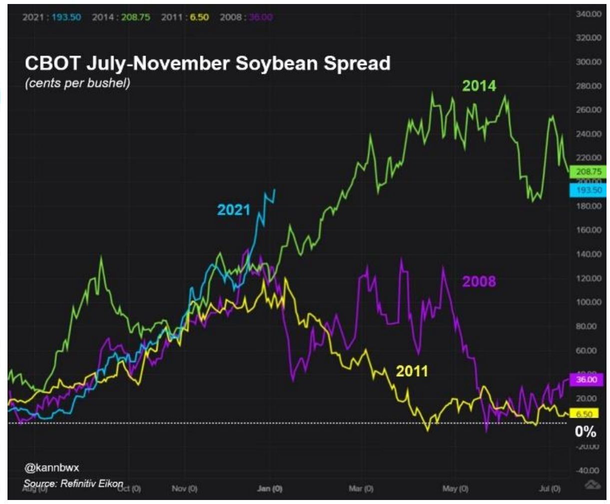
Adding to the bullish scenario and the glaring need for prices to rise even further to slow demand, is the fact that China's resurgent economy and hog industry has propelled their own soy crush 24% higher than the previous year. May soybean meal futures in China on Monday hit a new high of close to $528 per MT a glaring incentive to import more soybeans from the U.S.

The monthly soybean chart has revealed eight straight higher closes, as U.S. soybeans have been the origin of choice following a dry start, delayed planting in South America and scarce old-crop stocks. With Brazil's soybean harvest delayed by possibly two to three weeks, U.S. soybeans continue to be the origin of choice.

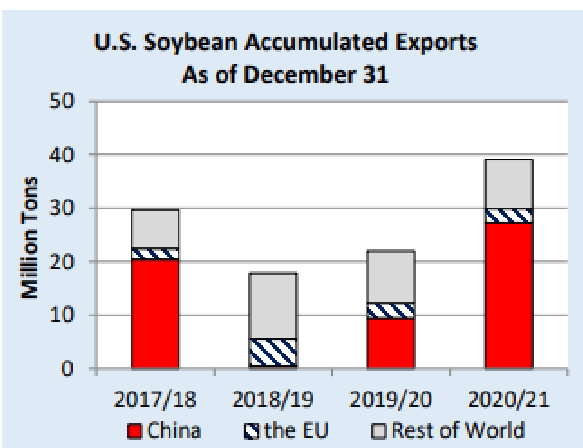


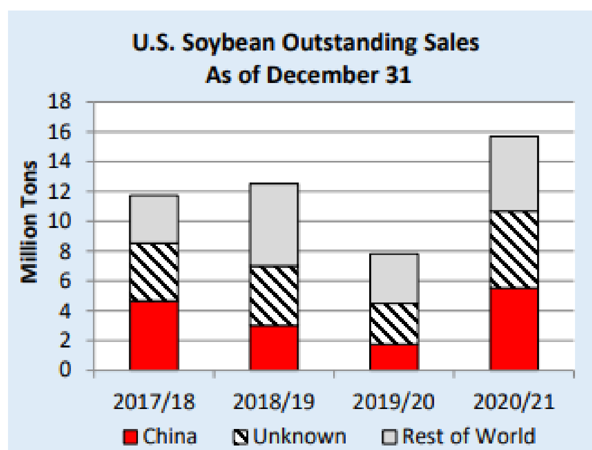
The one thing to be cautious about is that the daily soybean chart is getting overbought, and funds are long large position in soybeans, meal, and bean oil of close to 400,000 contracts. However, right now, the bulls are in total control. Interestingly, the figures below illustrate how tightly packed together July-November 2021 soybeans had been with the 2008 and 2011 spreads.

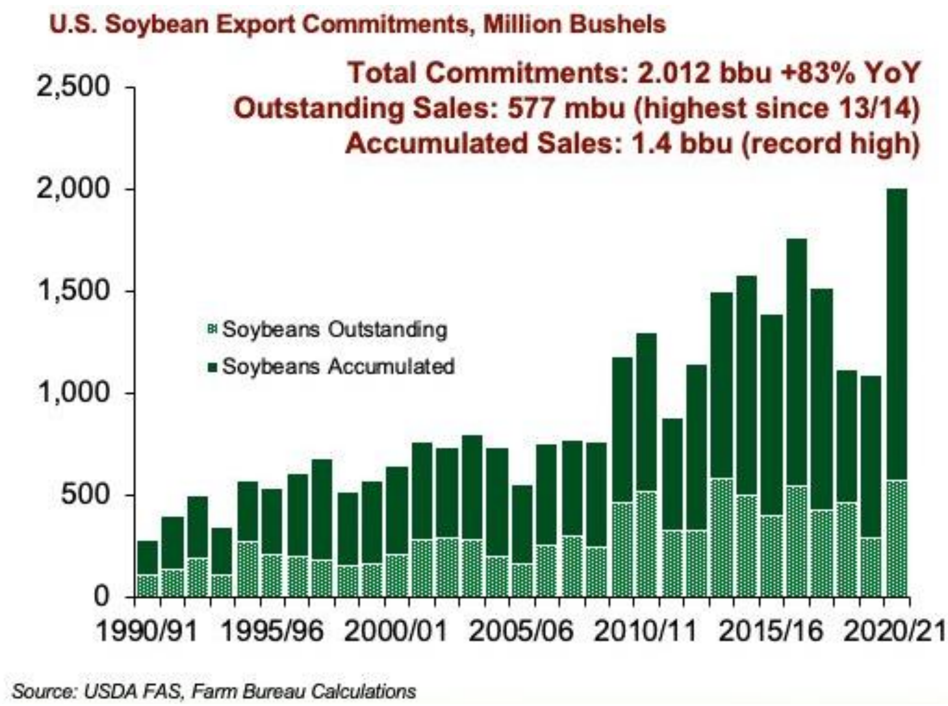




As of December 31, 2020, cumulative global U.S. soybean shipments hit a record high of 39.0 million tons driven by the faster-than-normal pace of shipments to China, which also hit a record (27.3 million tons). This is 6.0 million tons higher than the previous record pace of shipments in 2016/17. In 2020/21, China has front-loaded its purchases taking advantage of cheaper U.S. soybeans and offsetting limited exportable supplies in South America. Outstanding sales to all destinations reached its second-highest level ever, slightly less than the record in 2013/14 at 15.7 million tons. Due to the record pace of shipments and outstanding sales destined for China, total global commitments reached record highs at 54.8 million tons, up 6.8 million tons from the previous record in 2016/17. New sales for delivery next marketing year are running higher this year at 892,000 tons compared to 184,000 tons during the same period last year.







The world continues to wait for news of a cessation to the Argentine grain workers' strike as negotiations between both sides continue. Workers have now been on strike for nearly a month after walking off the job in conjunction with Argentine oilseed workers on December 9 to protest wages amid soaring inflation and pandemic working conditions.

As harvest kicks off in Mato Grosso this week, a USDA attaché estimates that Brazil's 2020/21 crop will likely yield 4.831 billion bushels. The attaché reports as much as a six-week delay in planting progress last fall after dry weather prevented timely sowing. The USDA's current estimate for the Brazilian crop is 4.886 billion bushels.

The attaché expects crush rates to hold steady at 1.672 billion bushels for the 2020/21 marketing year in Brazil, due, in large part, to strong domestic soy oil demand for biodiesel. Export rates are expected to rise by 4% to 3.1223 billion bushels – the majority of which will likely be shipped to China. The USDA currently estimates that Brazil will ship 2.751 billion bushels into international channels next year.

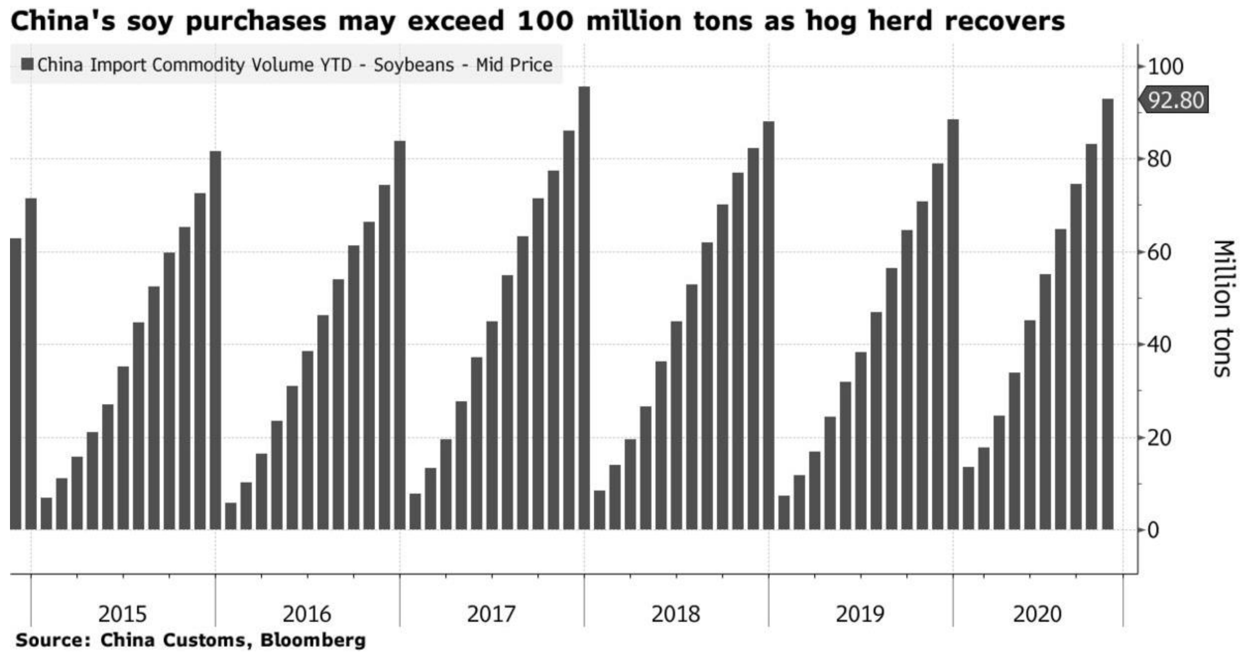
Another USDA attaché in Argentina estimates the 2020/21 soybean crop to total 1.837 billion bushels. The forecast is optimistic as it relies on timely rains to replenish soil moisture levels in key Argentine growing regions. The attaché's report is in line with current USDA estimates for the Argentine crop, which also stand at 1.837 billion bushels.

China's soybean imports will probably surge above 100 million tons in 2020-21, smashing the previous high set in the last marketing year, as local crushers ramp up capacity to take advantage of the country's burgeoning demand for animal protein.

Imports from the U.S. may more than double to 36 million tons amid expectations of lower output from South America, Shi Yongge, general manager of state-owned Jiusan Group, told a conference in Guangzhou. "The increase in purchases is also part of China's efforts to meet its Phase One trade deal with the U.S., he added."

China's soybean imports will probably surge above 100 million tons in 2020-21, smashing the previous

China has bought a massive amount of soybeans this year to feed a domestic swine herd that is recovering faster than expected from African swine fever. The buying frenzy helped spark a global price rally at a time when investors are concerned about supply, particularly as La Niña causes dryness in Brazil and Argentina which could hurt crops. Corn, which is also used in pig feed, has seen a similar surge.



China's soybean imports from Brazil may slip to 56.9 million tons during 2020-21 from 69 million in the previous year, while purchases from Russia could halve to about 450,000 tons due to low planting acreage, Shi estimated. China's marketing year starts in October.

With hog numbers in the world's biggest pork producer likely to make a full recovery by the first half next year, domestic soy processors are cashing in. Crushing capacity will expand by 31,000 tons a day in 2021 and a further 20,000 tons per day the following year, Shi said at the conference organized by the Dalian Commodity Exchange.

The industry processed 88 million tons of soybeans in 2019-20 at an average operation rate of 69%. The top 10 crushers account for 84% of the country's total capacity. State-owned COFCO has a market share of 18%; Yihai Kerry has 16%, while Jiusan and state-owned Sinograin hold 8% each.

China soybean meal demand may climb by as much as 10% in 2020-21 from 5.8% last year, as improvements in living standards continue to bolster demand for meat, eggs and milk. Meal, a product of soybeans, is used for animal feed.

Looking to 2021 soybean production, the new crop soybean-corn price ratio has shown a clear and strong preference for increasing soybean acreage this spring. A tighter 2020/21 soybean carryout – shrinking from 14 days to 9 – would reward soybean growers looking to make premiums selling beans off the combine next fall.

Rice

March rice futures are up sharply following the January WASDE report release and are working on a bullish outside trading day after USDA slashed its forecast for the 2020/21 all-rice carryout by 12.4 mil. cwt. on a sharp increase in projected domestic and residual usage implied by the NASS *Rice Stocks* report. Strong prices and tight supplies in Asia are a potentially supportive factor. Vietnam has been buying rice from India for the first time in decades, and today Reuters reports that exports out of Thailand could be restricted due to a lack of available containers.

By class, long grain domestic use is projected 14 million cwt higher, more than offsetting a 1 million cwt decline in exports. Ending stocks decline 11.9 million cwt. Average farm price rises 20 cents to $12.00. This particular figure has caused something of a stir in the market today, since this change, along with many other changes in other grains, was not expected. Whether this will result in higher cash prices over the long term is the question now. Assuming these new figures are correct, 26.3 million cwts of long grain carryover is still quite a large number.

For medium and short grain rice, there were fractional changes in most line items lead to a 0.4 million cwt drop in ending stocks. The average farm price in California is unchanged at $19.00, while in the South the value is up 30 cents to $12.30.

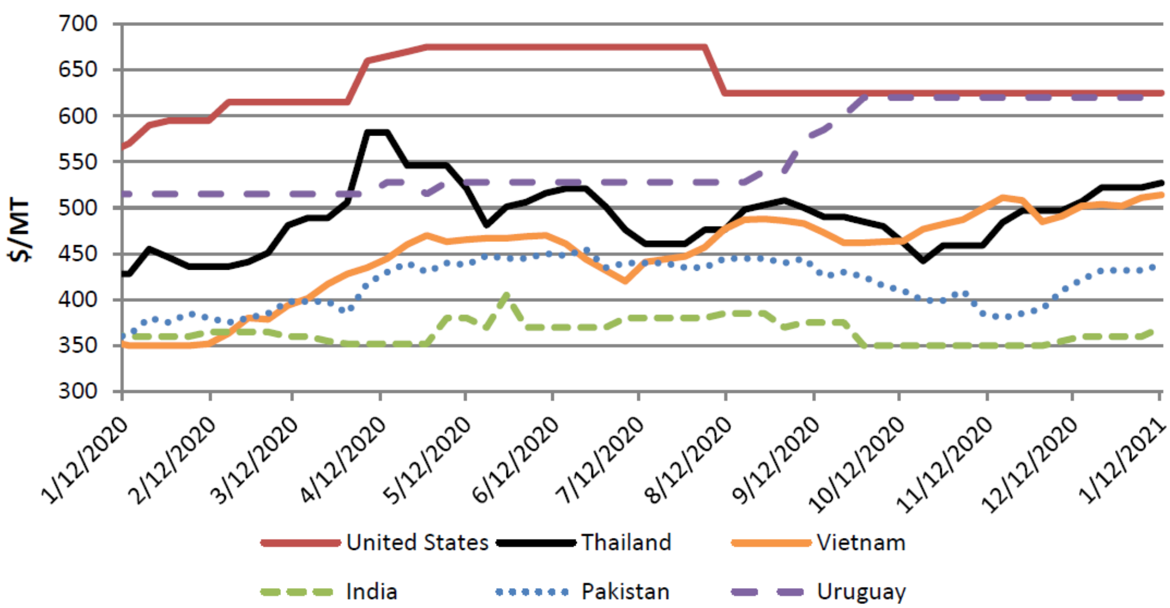
Rice acreage in 2021 is expected to be constant to slightly less than 2020 acreage levels across the Mid-South. Rice acres will be in flux due to weather and price for competing crops (e.g., soybeans and corn). By state, Arkansas is projecting a net loss of 90,000 acres (115,00 fewer long grain acres and 25,000 additional medium grain acres). Louisiana could see an increase in rice acres (10,000-20,000 acres) after suffering crop damage from the 2020 hurricane season. Attractive rice prices and interest in furrow irrigated rice in the northeastern part of the state are driving factors for more acres. After Mississippi rice producers increased rice acres to 164,000 acres in 2020, they are not expected to see much of a rise in 2021.Competing soybean and corn prices are hindering the possibility for a significant increase in rice acres.

There has been minimal movement in the cash market. Prices are largely reported to be sideways since mid-December but that may begin to shift as we proceed into the New Year. There is already growing chatter concerning the strong bean and corn prices which may drag on 2021 U.S. rice acres unless the rice market begins to develop some momentum in the near future. Some believe that momentum will be influenced by the rice crop condition in Mercosur where extremely dry conditions are going to cause a significant reduction in the harvest in each country.

Export demand for long-grain is down 4% year to date, which is mainly the result of milled rice demand being down 10.5% YTD. In terms of paddy, gross sales are on par with last year, but shipments are ahead of schedule. Although the US Dollar has not lost much value against the Thai Baht, it has against other currencies. Based on the ICE futures US Dollar Index, the currency weakened by more than 5% since October against major global currencies. Should the US Dollar decline further, there may be additional exporting opportunities in Latin America, however, to gain increased market share in the Middle East and Asia, the Dollar will have to lose value against key Asian exporting origins such as Thailand, India, and Myanmar.

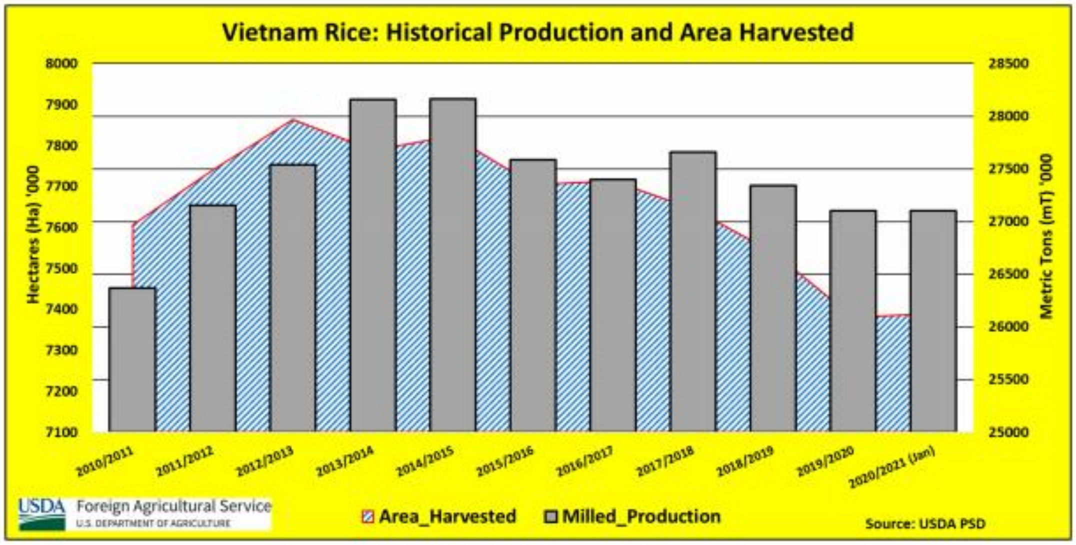
Over the past month, Western Hemisphere prices remained elevated well above those of Asian suppliers with U.S. quotes at $625 per ton and Uruguayan quotes at $620 per ton. Thai quotes continued to rise to $527 per ton on continued currency strength. Vietnamese quotes rose to $514 per ton on tight supplies prior to the February harvest. Pakistani quotes escalated to $438/ton, while Indian quotes rose to $370 per ton, reflecting rising demand from Bangladesh.

Weekly FOB Long Grain Rice Export Quotes: Last 12 Months



USDA estimates Vietnam's 2020/21 rice production at 27.1 million metric tons (milled basis), up marginally from last month, but unchanged from last year. Since 2015, production has been mostly trending downward. One of the main factors for the decline in rice production has been attributed to the reduction in rice cultivated area. Harvested area is estimated at 7.4 million hectares, down marginally from last month, but up slightly from last year. Harvested area is down 3 percent from the 5-year average.

Yield is estimated at 5.87 tons per hectare, up 1 percent from last month, but down marginally from last year.



Rice has three seasons of production in Vietnam: winter, spring, and autumn. The bulk of the rice output derives from the spring and autumn seasons, accounting for about 80 percent of total production. Since 2015, the spring and autumn rice production seasons have mostly trended downward and are forecast down 4 percent and 5 percent, respectively. The downward shift in production for the main producing seasons has been due to continued reductions in area. Cultivated rice area has been declining annually due to several factors such as a shift to higher profitable crops, increased residential development, salinity intrusion, and land erosion. Cultivated area is forecast to be reduced for the spring and autumn seasons for market year 2020/21.

Cotton

Cotton futures have taken off for the upside again on support from a lower U.S. cotton carryout estimate and surging corn and soybean prices, which have no doubt triggered concerns that 2021 U.S. cotton acreage will fall too low. The USDA cut its U.S. cotton carryout estimate by 1.1 million bales or more than 19% due to lower estimate production and stronger expected exports. The USDA lowered U.S. cotton production by 1.0 million bales to 14.95 million and raised exports by 250,0000 bales to 15.25 million. The USDA raised the projected on-farm avg. cotton price for 2020-21 by 3 cents per pound to 68 cents.

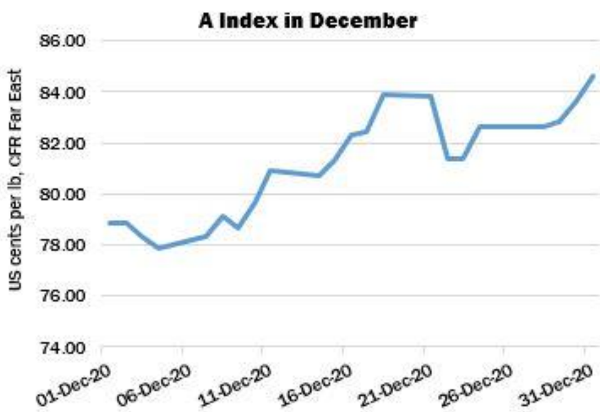
USDA numbers for cotton in over the month of December gave the market more confidence than what is reflected in reality. The USDA's monthly production estimates finally showed the lower U.S. crop that many have long said was out there. Supply/demand projections also showed a rebound in world use/demand.

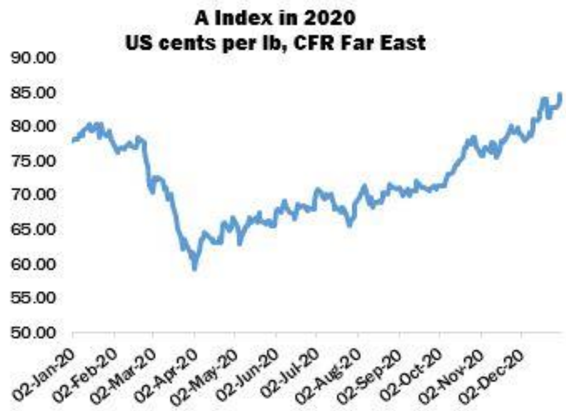
Chinese consumption has been able to maintain its increased pace for another month, and local observers suggest the industry is back to normal operations. Thus, exports to China and Pakistan have outpaced USDA estimates. Thus, it is conceivable that the USDA's newly elevated export estimate of 15.0 million bales will even be surpassed. That is, U.S. cotton market off-take during the 2020-21 marketing year will be greater than the 2020 U.S. crop. In fact, U.S carryover – currently estimated by the USDA at 5.7

million bales – may fall much closer to 5.0 million bales or even as low as the 2019 beginning stocks level of 4.9 million bales.

The nice build-up in prices, especially over the past six weeks, has been driven by increased optimism from demand side factors. Now, we also finally have validation of a smaller than previously expected U.S. crop and improved demand estimates to boot. The market was also positively influenced by the record high trade for the Dow Jones. The stock market moved up based on the idea that a new and massive Congressional stimulus will happen once the Biden administration is inaugurated.

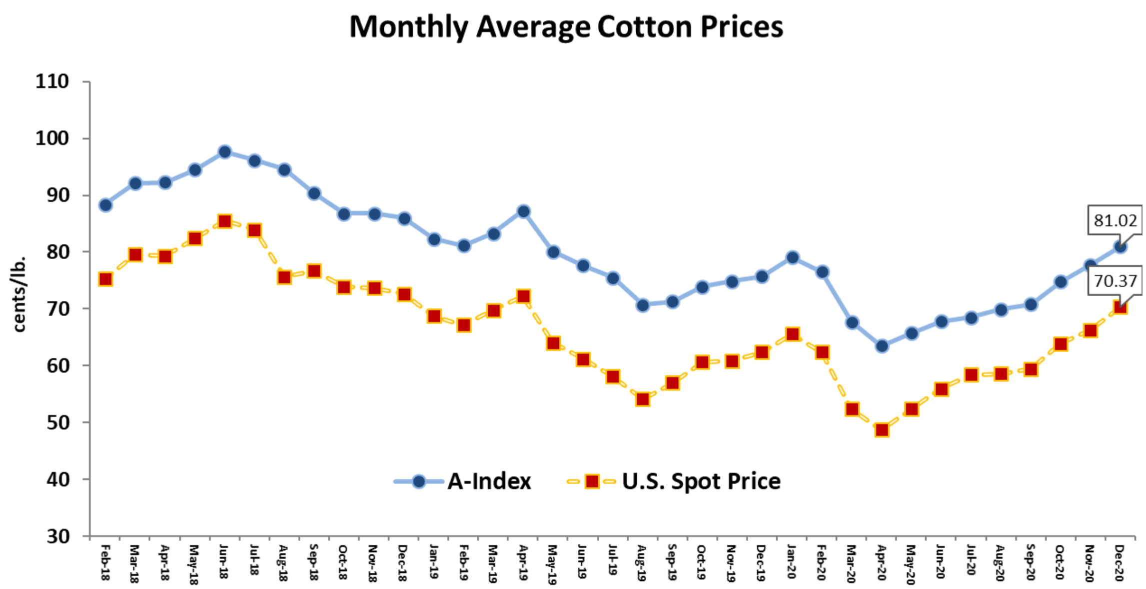
December saw a continuation of the recovery in world prices that began in early April. The Cotlook A Index advanced by 480 cent points to end the month at 84.60 cents per lb, its highest point of the calendar year, representing a gain of 43 percent from the low point of 59.15 cents per lb recorded on April 2, when the effect of the COVID pandemic was at its most acute.





New York futures once again led the advance of upland prices in December, a trajectory that was interrupted only briefly when New York fell sharply on December 21 as news emerged of a new and more infectious strain of Covid-19. Speculative buying of the No. 2 contract remained a feature, as financial markets continued to respond to the monetary stimulus provided by the US Federal Reserve and other central banks. Share indices touched new highs during December.

The A-index and U.S. spot price have continued to climb on tightening U.S. old-crop and new-crop supplies, record U.S. shipments through December, and strengthening global cotton demand. Both have reached the highest levels since April 2019.



In the physical market, support in the form of active mill buying was forthcoming from a number of major import markets. Motivated by a continued disparity between local prices and the substantially more competitive offers of imported cotton, Chinese mills and traders (including state-owned enterprises) were active buyers throughout the month. The same price relationship precluded the commencement of the planned program of State Reserve purchases from the domestic crop.

Import purchasing, from China and elsewhere, focused largely on US cotton, though not to the exclusion of other origins. The four weekly export reports released during December added about 1.59 million running bales (about 360,000 tonnes) to this season's commitment (upland and Pima combined). By December 24, sales of all cotton had moved slightly ahead of last season and were equivalent to nearly 82 percent of Washington's forecast for the marketing year. At fifteen million statistical bales of 480 lbs, that projection may now appear rather conservative.

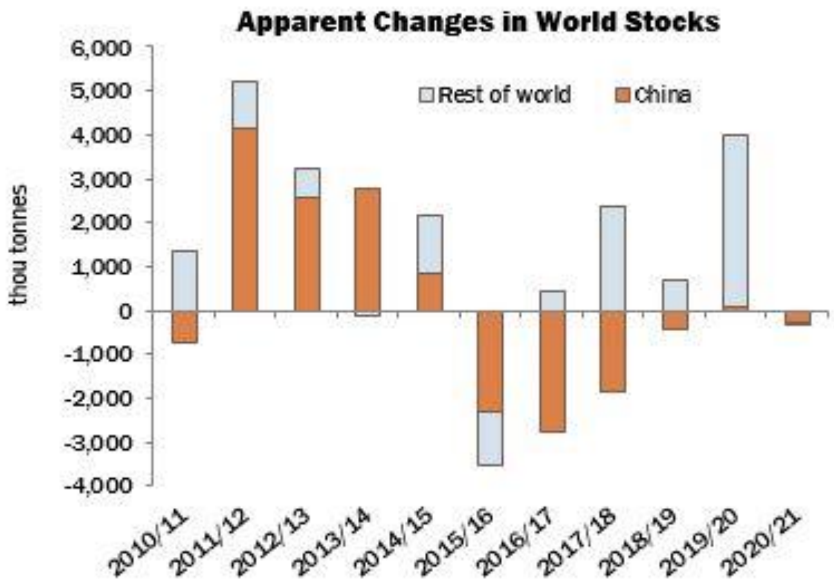
The broad-based mill demand reflected the replenishment of mill inventories of raw cotton (as well as those further down the supply chain) that had been kept to a minimum owing to apprehension with regard to the future pattern of demand. Chinese import demand for cotton yarn (also a function of the price disparity alluded to above) provided a boost to spinning activity on many markets. Several major textile and garment manufacturing countries published robust export data and, overall, the impression remained of a revival of the cotton-textile supply chain, from which spinners were benefiting. Consumption estimates thus showed an upward bias.

On the supply side, the reverse was true: December witnessed lower production forecasts adopted by Cotton Outlook for the United States and India.

The USDA's December supply and demand estimates included a long-anticipated reduction to the domestic production forecast. In the event, the scale of the adjustment – over one million bales, the result principally of a lowering of yield estimates for the state of Texas – exceeded expectations.

Thoughts that an early and abundant Monsoon, coupled with a record area under cotton, would result in a bumper Indian crop have been tempered somewhat. Excessive and protracted rainfall has caused damage in some producing states, most notably Telangana, and overall production forecasts have been revised downward.

The combination of reduced production forecasts and an improving consumption outlook provided support to the continued price rally from a fundamental supply and demand perspective. In December, Cotton Outlook's monthly production and consumption estimates for the first time indicated a net reduction of world stocks during the 2020/21 season. At 325,000 tonnes, the decrease is dwarfed by the previous season's addition to world stocks (not far shy of four million tonnes) but nonetheless contributed to a noteworthy shift of sentiment to the bull side.



Dr. O.A. Cleveland lists his factors that will likely lead market direction over the course of the year.

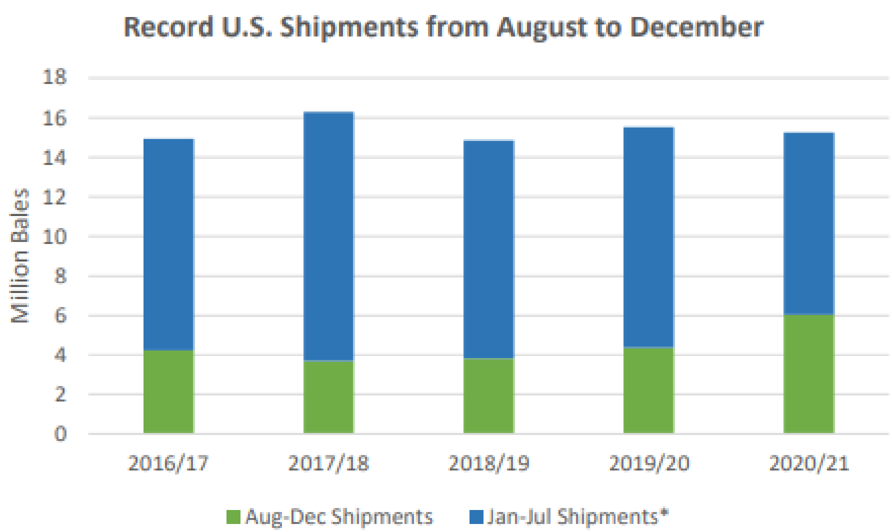
Bullish

- Imbalance in World Food Supply/Demand
- World Demand Increasing: pent up demand
- World Stocks Decreasing
- U.S. Stocks Decreasing
- U.S. Old Crop Quality Sold/Selling Out
- 10% Reduction–U.S. New Crop Plantings: grain/oilseed prices pressure plantings
- Drought expected in U.S. Southwest; Texas-Oklahoma Plains
- Increasing Chinese Prices/Declining Stocks
- Decreasing Chinese and Indian Stocks
- Commodity Complex Encourages Speculative Bullishness
- U.S./Europe Prevention of Chinese Child/Slave Labor Products Entering marketplace
- Technicals: trend, moving averages, fund positions, on-call sales
- Aggressive Selling Posture of Indian Cotton

Bearish

- Chinese Covid Virus Disruptions
- World Stocks 98+/- Million Bales
- U.S. stocks 5 +/- Million Bales
- Increase in Australian, Brazilian, Pakistani, U.S. Production
- High Prices Cure High Prices
- Low Polyester Prices
- Selloff in Record High Stock Market Will Pressure
- Cotton Prices

The USDA FAS reports that "record U.S. shipments through December are supporting a stronger U.S. export forecast at 15.25 million bales, despite production falling 5.0 million bales from the previous year." China has accounted for almost half of U.S. exports in the first 5 months, with the country's total imports forecast at 10.5 million bales, the highest level in 7 years. Moreover, China's consumption is expected to recover 5.5 million bales from the previous year and reach 38.5 million bales, accounting for more than one-third of world use in 2020/21.



**Note: Jan-Jul shipments for 2020/21 are forecast; Aug-Dec are USDA Export Sales Reporting shipments*

Chinese demand for U.S. cotton has been mostly led by the State Reserve and State-owned Enterprises (SOEs), which have likely accounted for more than three-fourths of total imports of U.S. cotton thus far in 2020/21. Instead of sourcing from Brazil, the primary supplier in the previous 2 marketing years, the State Reserve and the SOEs have returned to the United States likely in part spurred by the Phase One Agreement. Despite higher U.S. prices relative to Brazil and India (second and-third-largest exporters forecast in 2020/21), U.S. sales and shipments to China through December exceeded the previous year by more than 2.3 million bales. These export volumes are notable considering higher exportable supplies for Brazil and India, where both countries have record carry-in and Brazil's 2020/21 exports are forecast at a record. U.S. exports are boosted this month and forecast to be mostly unchanged from the previous year due to a historic pace for shipments and resilient China demand, despite fewer shipments and sales to Vietnam and Bangladesh.

The Wall Street Journal reported that cotton prices have risen to their highest level in nearly two years thanks to dry weather that has shrunk the crop and concerns of forced labor in China that have made a big chunk of the nation's fiber output off-limits to clothing makers. The Journal article added that, "a lack of rainfall in key growing regions has reduced expectations for the current crop." The International Cotton Advisory Committee last month trimmed its estimates for the global harvest by about 1%. The USDA expects the smallest domestic cotton crop in five years.

The approval and distribution of Covid-19 vaccines have fueled expectations of a revival among apparel makers and retailers that have suffered during the pandemic and related lockdowns. Operating profits at department stores, including Macy's Inc., Nordstrom Inc. and Kohl's Corp. as well as other clothing retailers such as Gap Inc., should at least double this year compared with last, Moody's Investors Service predicts. U.S. cotton has lately become more attractive to the yarn spinners and cloth makers that supply garment factories and, ultimately, clothing retailers.

A weakened dollar has reduced the price of U.S. bales for foreign cotton buyers. The WSJ Dollar Index, which measures the dollar against a basket of 16 other currencies, lost about 5% in 2020 and is off more than 12% from its March peak. Between quality issues with cotton from other countries including India and the agreement to buy more U.S. farm goods, Chinese mills are likely to turn to American growers. China has committed to buying 4.1 million bales of U.S. cotton during the current marketing year, which began in August. That is 50% more than China bought from U.S. farmers before the two nations signed their 'phase one' trade deal in January 2020.

Based on the results of the Cotton Grower Acreage Survey recently conducted with cotton growers and other industry sources, U.S. cotton producers appear set to plant 11,611,000 acres of cotton (upland and ELS) in 2021. That is a 4.7% decrease from the 12,185,000 planted acres reported by the USDA NASS last June.

Commodity prices will certainly have a definite influence in acreage decisions. But for cotton, growers also have to contend with decreased global demand for cotton products driven by COVID-19, dialed down mill capacities, uncomfortably high cotton carryover stocks for the U.S. and the world, and continued export competition with Brazil and India.

China continued to import healthy amounts of U.S. cotton during 2020, partly to meet the obligations of the Phase I Trade Agreement but also to ensure adequate supplies of cotton for the country's mills that aren't sourced from the country's Xinjiang region. Long standing rumors of forced labor practices in the region resulted in the U.S. blocking all cotton-related imports from Xinjiang in early December. How this decision will impact cotton trade with China in 2021 remains to be seen. Xinjiang accounts for 85% of China's total cotton output, according to the National Bureau of Statistics of China. U.S. officials say that items made with forced labor, from blue jeans to blankets, have been sold in American stores. China accounts for 40% of global textile exports and 30% of global clothing exports, according to data from the World Trade Organization. If a bulk of China's homegrown cotton is forbidden in American stores, its mills must procure their raw material elsewhere.

Also, the industry is weather-weary, with 2021 promising to be a La Niña year, which traditionally means hotter, dryer weather for areas of the Southwest that are still trying to recover from intense drought in 2020.

State	2020 USDA Final	2021 CG Projected
Alabama	470,000	450,000
Florida	95,000	110,000
Georgia	1,230,000	1,110,000
North Carolina	370,000	350,000
South Carolina	190,000	180,000
Virginia	95,000	90,000
SOUTHEAST	2,450,000	2,290,000
Arkansas	500,000	400,000
Louisiana	200,000	180,000
Mississippi	520,000	500,000
Missouri	310,000	280,000
Tennessee	350,000	325,000
MID-SOUTH	1,880,000	1,685,000
Kansas	195,000	190,000
Oklahoma	640,000	550,000
Texas	6,615,000	6,500,000
SOUTHWEST	7,450,000	7,240,000
Arizona	132,000	130,000
California	205,000	200,000
New Mexico	68,000	66,000
WESTERN	405,000	396,000
TOTAL	12,185,000	11,611,000

Top Ag Policy Areas to Watch in 2021

The highly contentious 2020 election is now history, and we will move forward with a new administration and several new members of congress along with changes in leadership of the U.S. House and Senate Agriculture Committees. A new Secretary of Agriculture and a new leader in the Environmental Protection Agency, along with subsequent appointments within the federal and state agencies, can have a big impact on how various agriculture and environmental policies are implemented and administered. The following constitute some perspectives on key ag policy issues that will likely be under consideration during the next session of Congress, or by executive action from the new administration.

COVID-19

Any COVID-related policies that are enacted at the federal level, either through congressional action or by administrative order, certainly could have some impact on the agriculture industry. Last spring, we saw the financial implications that can be incurred by production agriculture, when COVID outbreaks closed processing plants and caused interruptions in supply chains. Farm operators received significant financial support in 2020 from the coronavirus food assistance program (CFAP1 and CFAP2) payments. A big question going forward is whether the federal government will again step up with assistance payments for farm families, if there are similar challenges in 2021.

Trade policy

Within the past year, the new United States-Mexico-Canada (USMCA) trade agreement between the three countries and the new Phase 1 trade agreement between the U.S. and China were implemented. Ag trade with China has increased considerably in 2020; however, Chinese ag trade is still below the trade targets that were established in the Phase 1 agreement. The previous administration withdrew from the Trans-Pacific Partnership (TPP) trade agreement with many Asian countries, including Japan. It will be interesting if the new administration and leadership in congress goes back to multi-lateral trade agreements such as TPP, as well as if we continue with the current trade policy with China, Canada and Mexico, which are the three largest trade partners for U.S. ag products.

Climate change

The current administration discontinued many of the discussions and negotiations regarding climate change that the U.S. had previously been involved both domestically and with foreign countries. The new administration and many other elected leaders are now calling for a return to a more aggressive approach by the U.S. in dealing with climate change, both within the U.S. borders and internationally. Many of the proposed ideas involve implementing measures to reduce the man-induced impacts of a changing climate, several of which ultimately could have a major impact on the agriculture industry, both positive and negative. In the past, congress has been reluctant to take much action relative to climate change, due to questioning the scientific evidence, as well as the uncertainty regarding economic implications; however, it appears that this trend may be changing.

Renewable energy

The next administration and congress will need to decide what direction the U.S. takes regarding the mandated use of renewable fuels through the Renewable Fuels Standard and other incentives for renewable fuels, such as tax credits, etc. While there is generally considerable support for development of alternative energy sources, congress and many organizations have become quite divided on the RFS and other mandated energy programs, especially as it relates to climate change proposals. Ethanol and biodiesel production, which are covered by the RFS, have a major economic impact for farm operators, as well as for the overall rural economy in the Upper Midwest.

Rural health care

Rising health care costs and access to adequate health care continues to be a major concern for farm and rural families in many areas of the U.S. Some families have seen health insurance premiums rise 50-100 percent in recent years, with individual farm families and some small business owners now paying $30,000-40,000 per year or more for health care coverage. At the same time, many rural hospitals and clinics have been closed and consolidated into larger regional health centers, which has limited access to quality health care services in some rural areas.

Broadband access

One ongoing issue that has been brought to the forefront by the COVID-19 outbreak has been the inconsistent or the lack of internet service and connections in many rural areas. As public schools have been forced to utilize distance learning models to educate elementary and high school students in the past year, one of the biggest limiting factors has been inadequate internet service in many rural areas. Many previous and newly elected officials have talked about the need for major federal investment into infrastructure upgrades, which hopefully will also include improved broadband capabilities in rural communities.

Immigration reform

Immigration policy continues to be a major issue in many portions of the U.S. and has a lot of political ramifications. Many industries, including agriculture, could be significantly impacted by any potential immigration reform legislation. Both production agriculture and the ag processing industry are heavily reliant on an immigrant workforce, so major changes in getting needed workers into portions of the U.S.

could greatly affect the rural economy in some locations. If congress does not act on immigration reform, the administration could choose to issue some executive orders relative to the issue.

Farm bill

The current farm bill expires after the 2023 crop year, so early development of the next farm bill is likely to start occurring in congress and with agricultural leaders during the next two years. Both the U.S. House and Senate Agriculture Committees will be under new leadership during the next session of congress. There are many groups and organizations pushing for major policy changes in the next farm bill. As usual, the budget allocation toward the next farm bill will be a big part of that discussion, with some members of congress already calling for budget cuts when the next bill is written. Some of the key ag policy discussions in development of the next farm bill will include revisions in current commodity and crop insurance programs, expanding Conservation Reserve Program acreage and other conservation programs, and changes to payment limits. Adjustments to food and nutrition programs (SNAP, WIC, etc.), which account for about three-fourths of the farm bill budget, will also be a key part of farm bill discussions.

Farm financial stress

Low profitability in both crop and livestock production in the past several years has increased financial stress for farm families in many areas of the U.S. Even though the increased federal aid and higher crop prices have improved the financial situation for many farm operators in some areas in 2020, there are still many farm families facing financial difficulties and increased stress levels. There will likely continue to be a need in the future to provide programs and support for the farm operators and families who are facing these challenges.

Pro Farmer has identified the potential policy impacts if Democrats control the Senate pertaining to additional coronavirus stimulus, party-line voting, Biden Cabinet appointments, the filibuster, and committee leadership.

- Coronavirus aid/stimulus. In the short term, the narrowness of Democratic control- a 50-50 Senate, with ties broken by incoming Vice President Kamala Harris, and a slim majority in the House- means that stimulus is more likely than changes to taxes, observers note. Goldman Sachs predicted "a Democratic Senate majority to allow for greater fiscal policy changes," including additional stimulus, perhaps followed later by "a limited amount of tax increases." Democratic leaders will now be able to push through billions of dollars in aid to governments in Democratic states like New York and elsewhere.
- President-elect Biden will be able to fill his Cabinet and his administration without major obstacles and the Senate will consider and confirm most of the judges he nominates. Biden now may nominate an attorney general he may not have had the Democrats not captured the Senate.
- As long as the filibuster survives- and that seems more than likely- many Democratic priorities will need 60 votes in the Senate. Moderate Democrats such as West Virginia's Joe Manchin will have the key swing vote, along with any moderate Republicans (such as Alaska's Lisa Murkowski) who might be willing to cut deals in some policy areas.
- Key committee leaders: Sen. Bernie Sanders (I-VT) would be chairman of the Budget Committee and will likely push for reductions in defense spending. Sen. Ron Wyden (D-OR) would chair the tax-writing Finance panel. He wants to tax gains in capital assets each year even if they are not sold. Sen. Sherrod Brown (D-OH) would chair the Banking panel and Sen. Elizabeth Warren (D-MA) on the financial institutions subcommittee would try to change rules to steer lending and

capital to their priorities and cut lending to fossil-fuel companies. Sen. Dick Durbin (D-IL) will lead the Judiciary Committee.

PLC Farm Program Payment Projections - 2020 CY

Below are projections for the Price Loss Coverage (PLC) program national Marketing Year Average (MYA) prices for the 2020/21 crop year. A PLC program payment is triggered when the MYA price for a commodity falls below that commodity's effective reference price. The payment rate is then multiplied by the farm's program yield and is made on 85% of base acres.

Covered Commodity	*2020/21 MYA Price**	*Effective Reference Price*	*2020 CY PLC Payment Rate*
Corn	$4.20	$3.70	--
Grain Sorghum	$4.70	$3.95	--
Long Grain Rice	$12.00	$14.00	$2.00
Medium Grain Rice	$12.30	$14.00	$1.70
Seed Cotton	$0.3464	$0.3670	$0.0206
Soybeans	$11.15	$8.40	--
Wheat	$4.85	$5.50	$0.65

*national marketing year average (MYA) prices reflect the midpoint price level from the January 12, 2021 WASDE report.

ARC-CO Farm Program Price Parameters - 2020 CY

The table below presents the five-year Olympic average national marketing year average prices for purposes of the Agriculture Risk Coverage (ARC-CO) program in addition to the projected national MYA price used for in the calculation of actual county (parish) revenue. An ARC-CO program payment is triggered when the actual parish revenue for a particular commodity falls below that commodity's historical revenue guarantee. ARC-CO farm program payments are capped at 10% of the benchmark revenue. The payment rate is then made on 85% of base acres. No individual farm level production data is used for the purposes of ARC-CO program payment calculation.

Covered Commodity	*2020/21 MYA Price**	*2020 ARC-CO Benchmark Price (5-yr Olympic Average)*
Corn	$4.00	$3.70
Grain Sorghum	$4.40	$3.95
Long Grain Rice	$11.80	$14.00
Medium Grain Rice	$12.00	$14.00
Seed Cotton	$0.3339	$0.3670
Soybeans	$10.55	$9.25
Wheat	$4.70	$5.50

*national marketing year average (MYA) prices reflect the midpoint price level from the January 12, 2021 WASDE report.

The 2018 Farm Bill now allows producers to make an annual election for Agriculture Risk Coverage (ARC) and Price Loss Coverage (PLC). The deadline to change your election with Farm Service Agency is March 15, 2021 which will be the program elected for the crop harvested in 2021 (Marketing Year 2021/2022).

Sources: USDA Agriculture Market Service (AMS), USDA Foreign Agriculture Service (FAS), USDA Farm Service Agency (FSA), USDA National Agriculture Statistics Service (NASS), USDA Economic Research Service (ERS), USDA FAS GAIN Report, USDA Office of Communications, USDA World Supply Demand Estimates (WASDE), AgDay, Ag Fax Media, Ag Market Network, Agri-Pulse, Ag Web, Agricultural Market Information System (AMIS), Allendale, American Farm Bureau Federation, Bloomberg News, CME Group, Cotton Grower, Cotton Incorporated, Cotton Outlook, Creed Rice Report, Delta Farm Press, DTN Progressive Farmer, Farm Futures, Fiber 2 Fashion, International Grains Council, Iowa State University, LSU AgCenter, National Cotton Council, Peterson Institute of International Economics, Pro Farmer, Reuters, Rice Market Letter, Stone X, Southeast Farm Press, Successful Farming, University of Arkansas, University of Illinois, U.S. Grains Council, USA Rice Federation, U.S. Soybean Export Council, and the Wall Street Journal.

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