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Feed Outlook

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Once Again, Corn Use Reduced

The 2018/19 U.S. corn disappearance is projected 200 million bushels lower to 14.6 billion on lower feed and residual, exports, and corn use for ethanol. Corn carryout is projected at 2.0 billion bushels, up 200 million, while the projected corn price remains at $3.55 per bushel. Producer planting intentions provide a peek at next year's crop—corn acreage is indicated to be up 4 percent to 92.8 million acres.

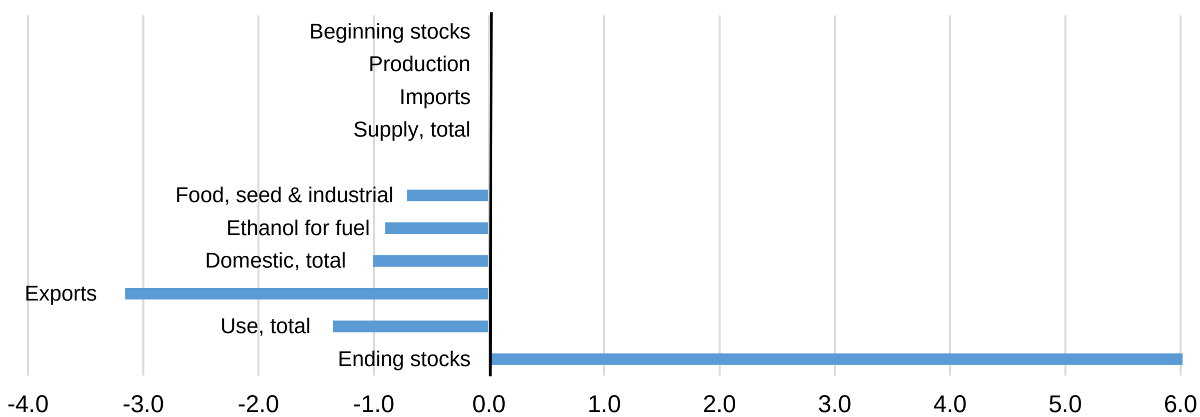
Corn production and trade are boosted further as all three major foreign corn exporters—Brazil, Argentina, and Ukraine—see their corn production and exports grow. Projected ***U.S.*** 2018/19 corn exports are reduced this month due to increased competition from South America and Ukraine.

Domestic Outlook

U.S. Feed Grain Use Lowered

U.S. feed grain disappearance is projected 5.0 million tons lower at 384.6 million. Feed and residual is lowered 1.7 million tons to 139.9 as corn is lowered and sorghum raised. Lower corn exports and use for ethanol dampen total use this month by 5.0 million tons, resulting in a projection of 384.6 million, 6.5 million below last year’s level. Ending stocks are raised 5.0 million tons to 55.7 million.

Figure 1
Corn supply and use: percent change from last month's forecast



Source: USDA, Economic Research Service, Feed Grains Database.

Grain Consuming Animal Units

Grain consuming animal units (GCAU) for 2018/19 are projected at 100.6 million units, virtually unchanged from last month and 1.4 million over last year’s revision of 99.2 million. Feed and residual use per GCAU is projected at 1.42 tons, slightly lower than last month and virtually unchanged from last year. Hog inventory was reduced, leading to most of the change this month. Historical changes are made for layer inventories.

Feed and Residual Use: Four Feed Grains and Wheat Lowered

Feed and residual use for the four feed grains (corn, sorghum, barley, and oats) and wheat, on a September-August marketing year basis for 2018/19, is projected at 142.9 tons, 5.5 million below last month. Feed and residual use is raised for sorghum but more than offset by a decline in corn, wheat, and oats. The current projection is ahead of last year by 2.3 million tons, less than last month's gain.

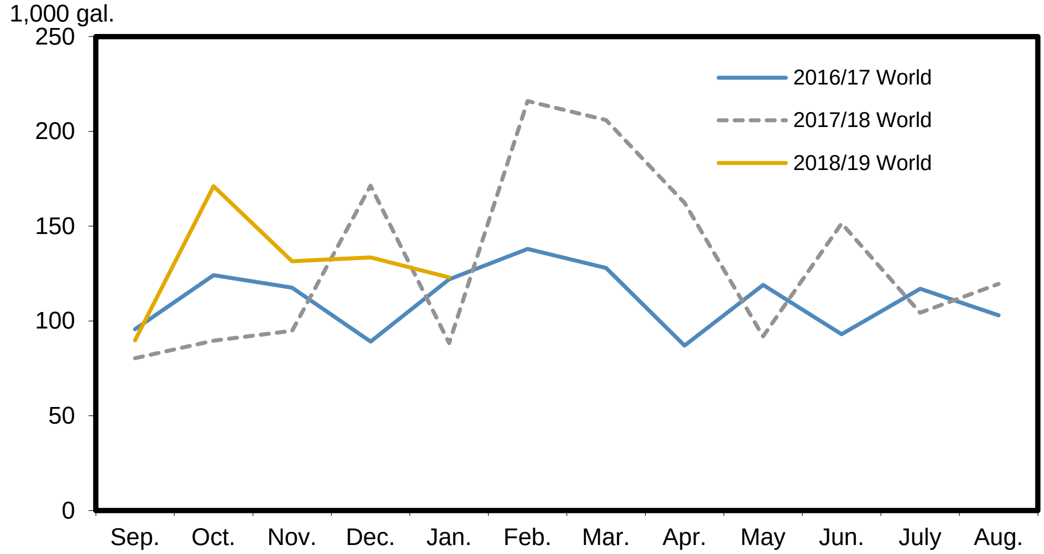
Lower Corn Disappearance Projected for 2018/19

U.S. projected corn disappearance is lowered 200 million bushels this month to 14,565 million. Food, seed, and industrial (FSI) use is lowered 50 million bushels to 6,965 million on reduced prospects for ethanol, which is lowered the same amount to 5,500 million bushels. The April 1 *Grain Crushings and Co-Products Production* report from USDA's National Agricultural Statistics Service (NASS) indicates the pace of corn used for fuel ethanol this marketing year (through February) is trailing last year by 4 percent, maintaining the same downward trend as last month. U.S. Energy Information Administration data for March indicate lower levels of ethanol production, leading to a projection of corn for ethanol of 5,500 million bushels for 2018/19. On the positive side, exports of ethanol for the first 5 months (December-January) of the marketing year are 22 percent higher than this point last year at 2.577 million liters. Brazil, Canada, India, and the Netherlands are the major destinations for ethanol exports.

There were no changes to other FSI projections.

Figure 2

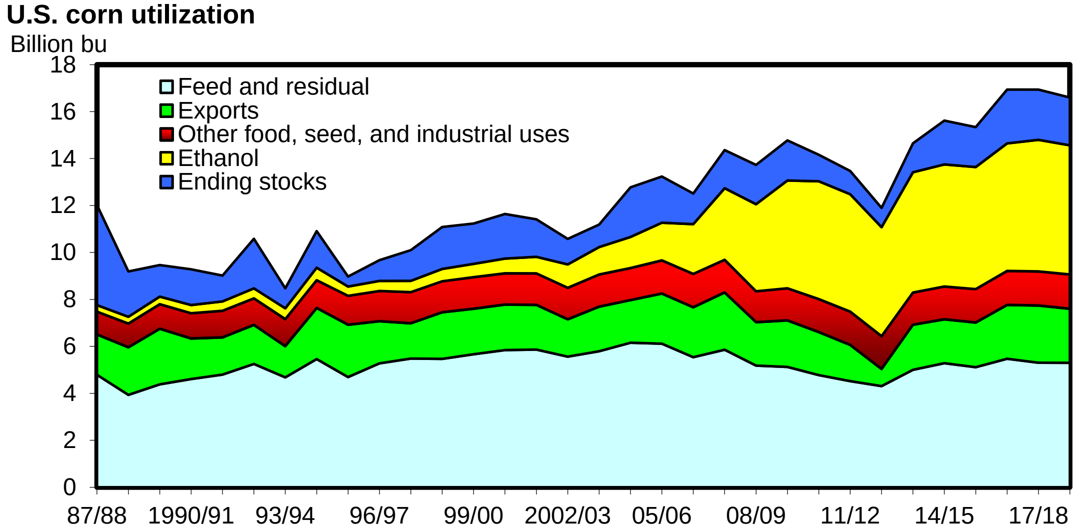
U.S. fuel ethanol exports



Source: USDA, Economic Research Service with data from USDC, U.S. Census Bureau.

Figure 3

U.S. corn utilization



Note: Marketing year 2018/19 is projected.
Source: USDA, World Agricultural Outlook Board, *WASDE.*

Six-Month Corn Disappearance

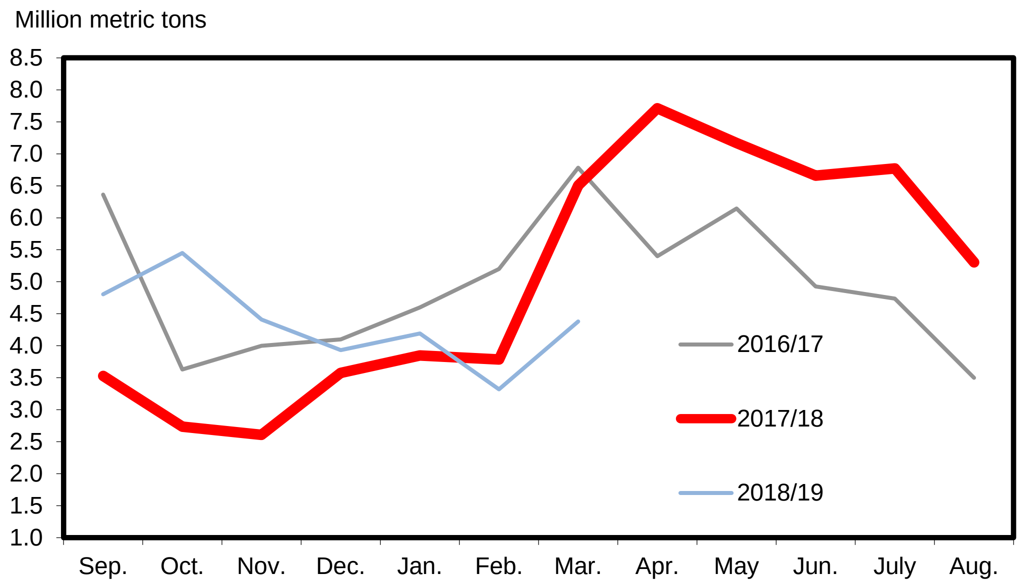
NASS's *Grain Stocks* reports on March 1 corn stocks, elucidating disappearance for the first half of the marketing year. At 3,471 million bushels, September-February feed and residual is 65 percent of the projected 2018/19 total of 5,300 million bushels. In 2017/18, feed and residual for the first half was 71 percent of the 5,304 million bushel total, closer to the 5-year average of 72 percent. Current expectations are for feed and residual use during the second half of the marketing year to exceed levels seen a year ago.

Exports Lowered Again Due to Strong Competition

Projected 2018/19 U.S. corn exports are lowered 75 million bushels for the second consecutive month for a new projection of 2,300 million. The United States continues to face stiff price competition from Brazil, Argentina, and the Ukraine. If realized, projected exports would be 138 million bushels below 2017/18.

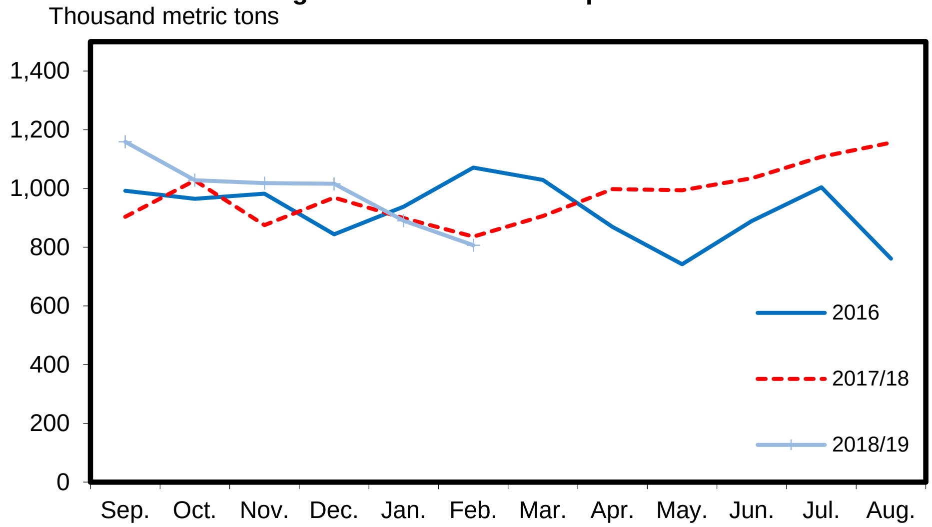
Resulting ending stocks are projected at 2,035 million bushels, 200 above last month and 105 million below 2017/18. The stocks-to-use ratio increased this month to 14.0 from last month's 12.4.

Figure 4
Monthly U.S. corn exports



Source: USDA, Economic Research Service with data from USDC, U.S. Census, March 2019 *Grain Inspections*.

Figure 5
U.S. dried distillers grains with solubles exports

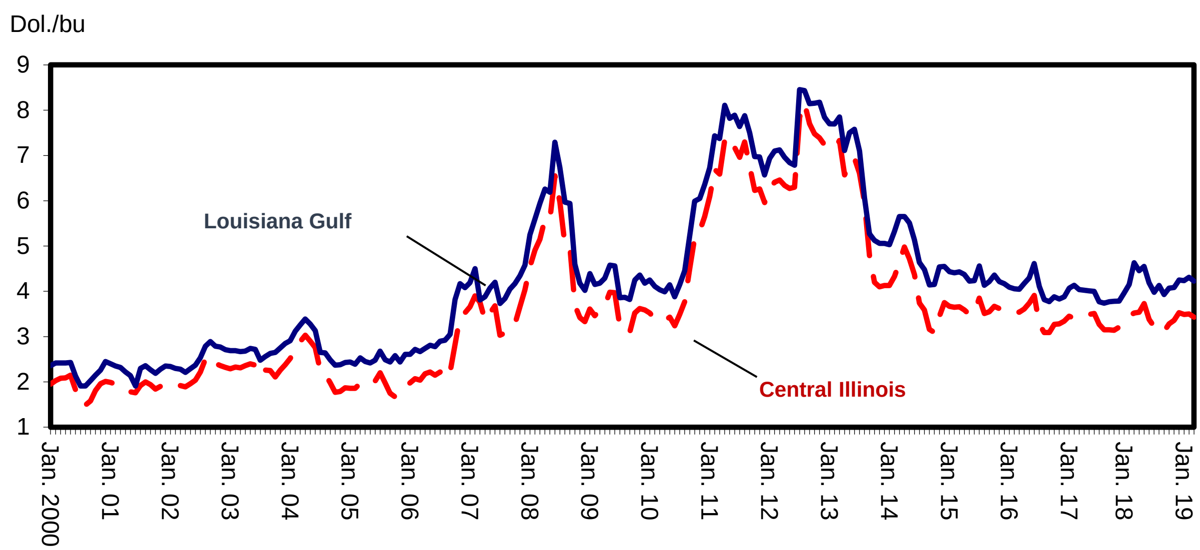


Source: USDA, Economic Research Service with data from U.S. Census Bureau.

2018/19 Corn Price Steady This Month

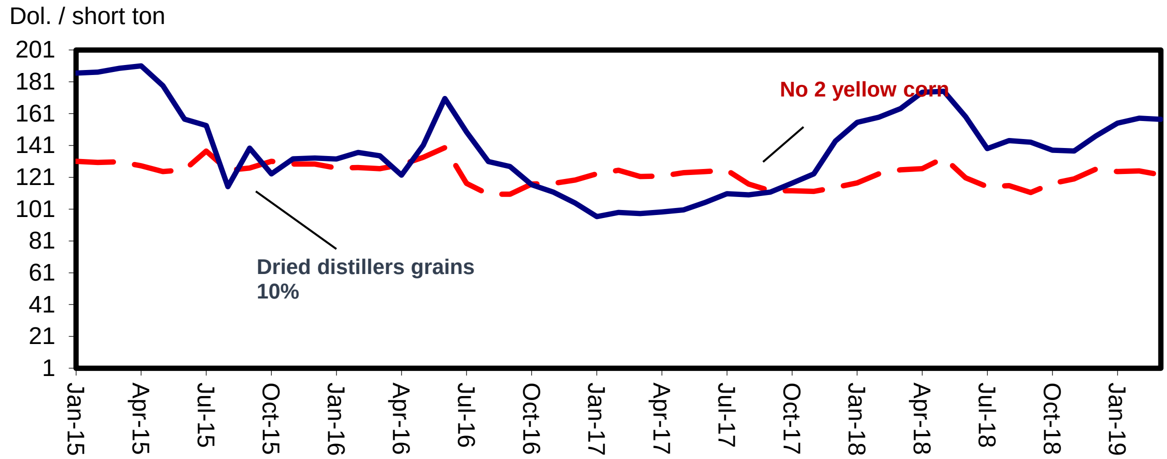
The projected average price received by farmers for 2018/19 is unchanged at $3.55 with a range of $3.40 to $3.70 per bushel, narrowed $0.05 per bushel on each end.

Figure 6
Monthly corn (yellow #2) prices for Central Illinois and Louisiana Gulf



Sources: USDA, Economic Research Service, *Feed Grains Database* and USDA, Agricultural Marketing Service, http://marketnews.usda.gov/portal/lg.

Figure 7
Monthly and prices for Central Illinois # 2 yellow corn and corn distillers dried grain

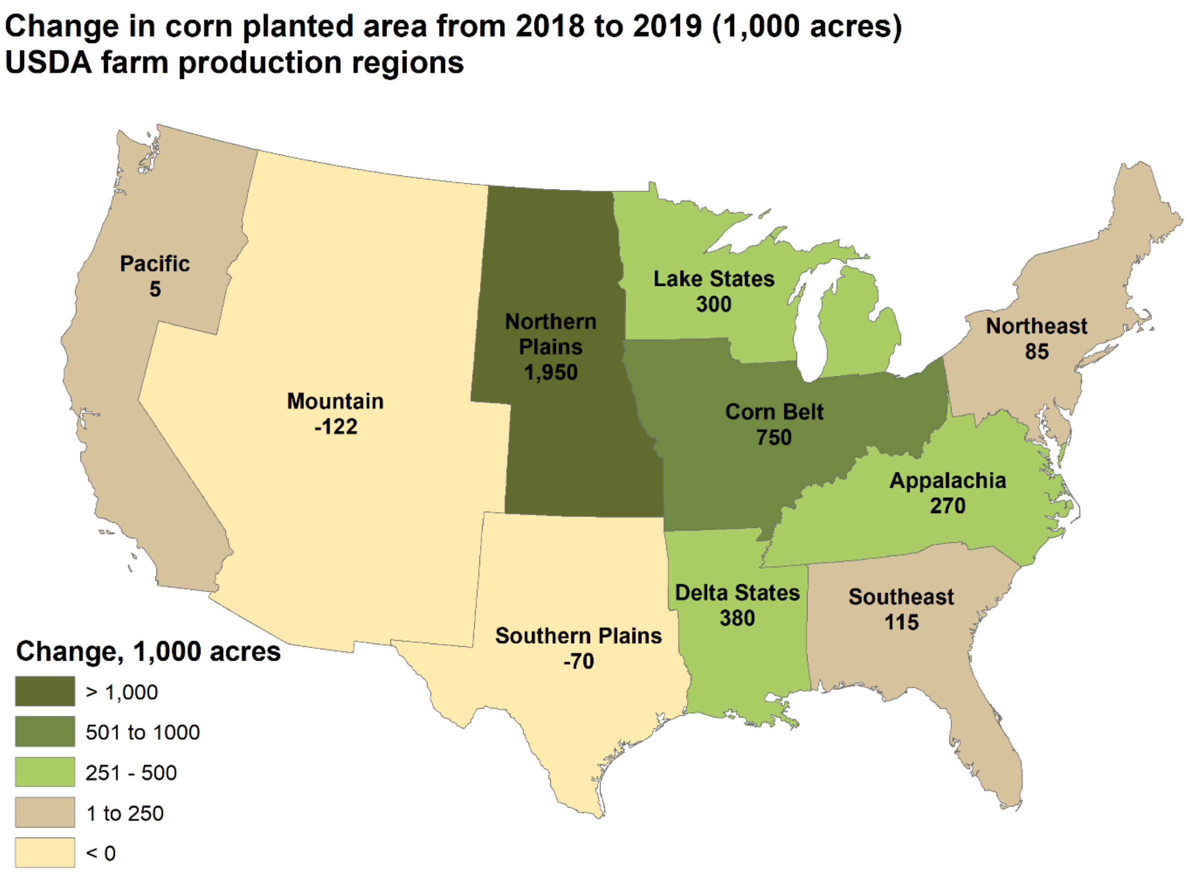


Sources: USDA, Economic Research Service, *Feed Grains Database* and USDA, Agricultural Marketing Service, http://marketnews.usda.gov/portal/lg.

Intended Corn Acreage up for 2019/20

NASS's *Prospective Plantings* report indicates a 3.66-million-acre increase in intended corn planted acreage in 2019/20 to 92.8 million, based on the March Agricultural Survey conducted during the first 2 weeks of March 2019. Relative prices, as well as typical crop rotation cycles, have encouraged producers to switch from soybeans and spring wheat to corn. Weather issues during the winter wheat planting season in some States also contributed to opportunities for corn acreage. If realized, this would be the largest planted acreage for corn since the 2016/17 crop year. Corn area increases are most pronounced in North Dakota, South Dakota, Iowa, Kansas, and Illinois, which are expected to add a combined 2.5 million acres relative to a year ago. If realized, the intended corn acreage for North Dakota would be a new record.

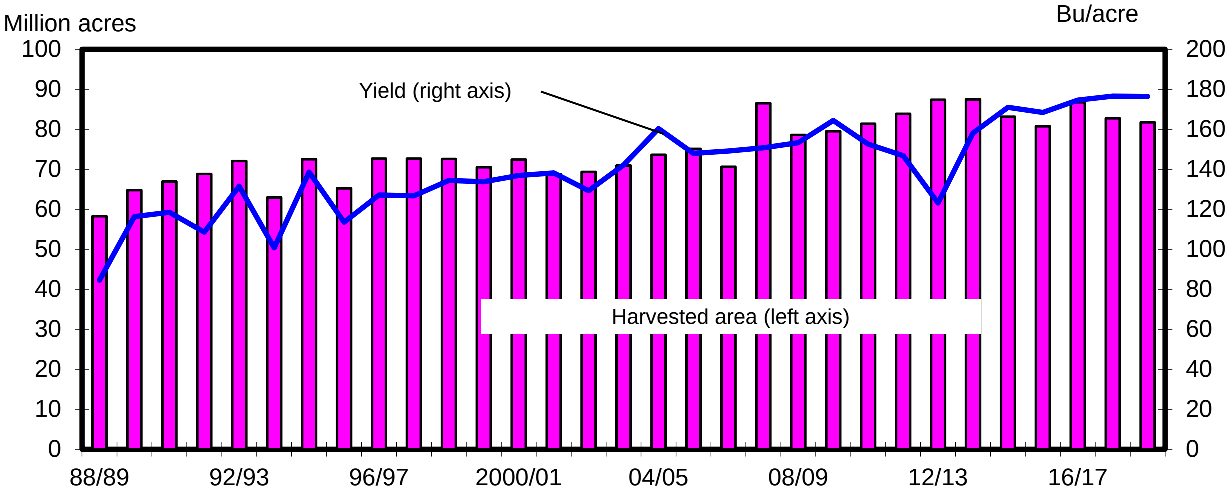
Figure 8



Source: USDA NASS *Prospective Plantings* report, March 29, 2019

While these are the intentions as of early March, extensive flooding in the Midwest during mid-March may delay actual plantings or force producers to switch to crops with shorter growing seasons or soil moisture requirements.

Figure 9
U.S. corn harvested area and yield

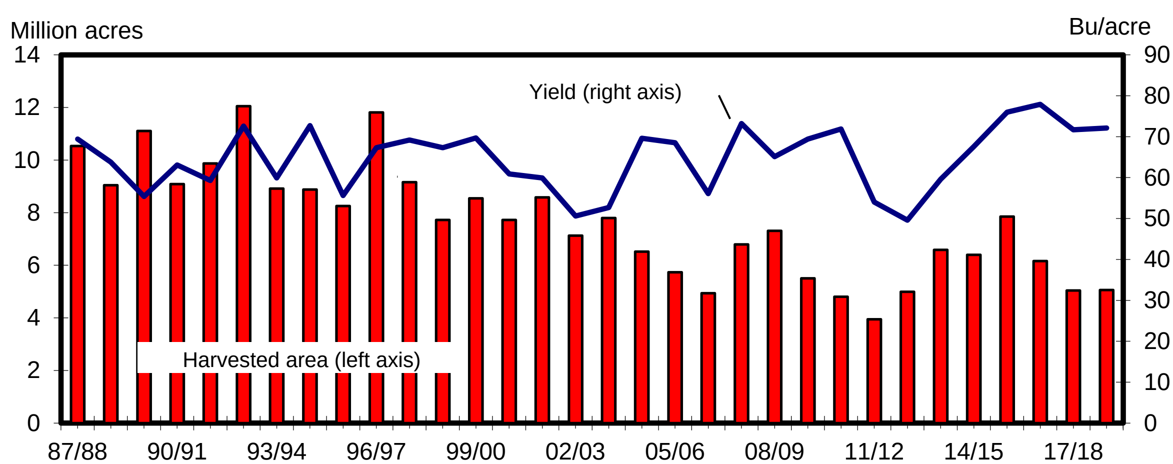


Sources:USDA, Economic Research Service with data from USDA, National Agricultural Statistics Service, *QuickStats* and USDA, World Agricultural Outlook Board, *Crop Projections, 2019.*

2017/18: Offsetting Marginal Changes in Sorghum Use as Data Become Available:

U.S. sorghum total supply remains unchanged in 2017/18 at 397.348 million bushels. Sorghum total use remains constant at 157.346 million bushels. However, this camouflages marginal changes in underlying use categories. First is a reduction in feed and residual use of 0.347 million bushels to 96.943 million bushels. Offsetting this is a 0.347-million-bushel increase in ethanol production at 59.170 million bushels.

Figure 10
U.S. sorghum harvested area and yield

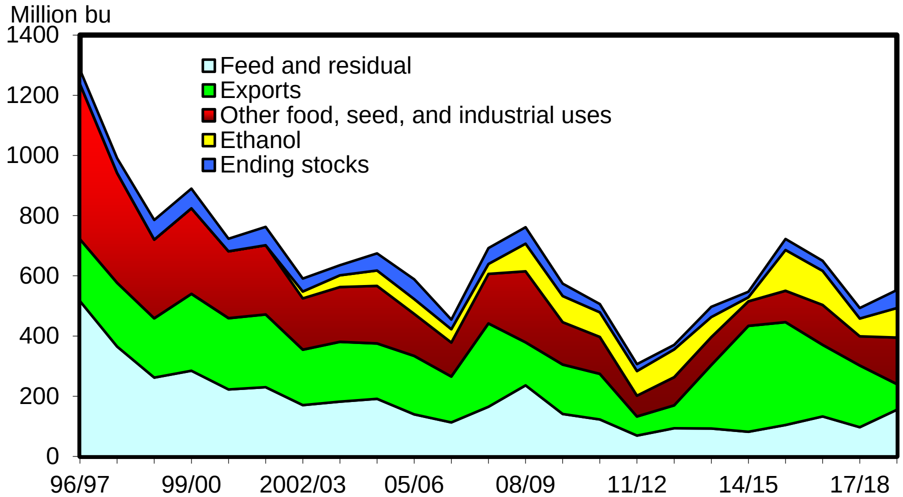


Sources:USDA, Economic Research Service with data from USDA, National Agricultural Statistics Service, *Quick Stats* and USDA, World Agricultural Outlook Board*, WASDE.*

2018/19: Sorghum Use Shuffled From Exports and Ethanol to Feed and Residual

Total domestic sorghum production remains unchanged this month at 364.986 million bushels. With beginning stocks of 34.854 million bushels, total supply is 399.840 million bushels.

Figure 11
U.S. sorghum utilization

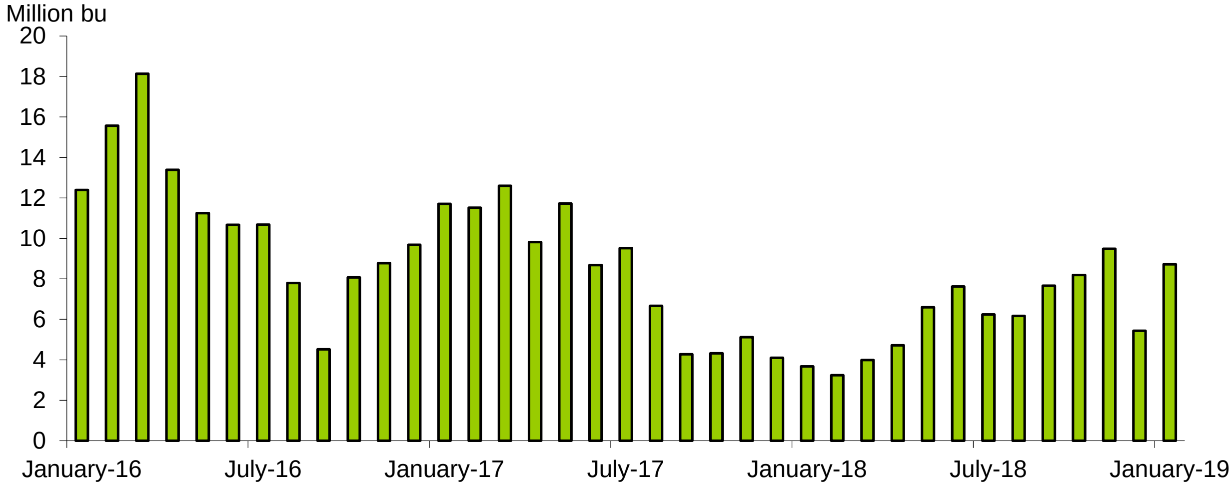


Note: Marketing year 2018/19 is projected.
Source: USDA, World Agricultural Outlook Board, *WASDE.*

Domestic total use is raised 5.0 million bushels to 255.000 million bushels. Feed and residual is up 10.000 million bushels compared to last month, totaling 155.000 million bushels, based on disappearance indicated during the December-February quarter as reported in *Grain Stocks*. Ethanol use of sorghum is reduced by 5.0 million bushels from 103.0 to 98.000 million bushels.

Figure 12

U.S. sorghum for ethanol use by month



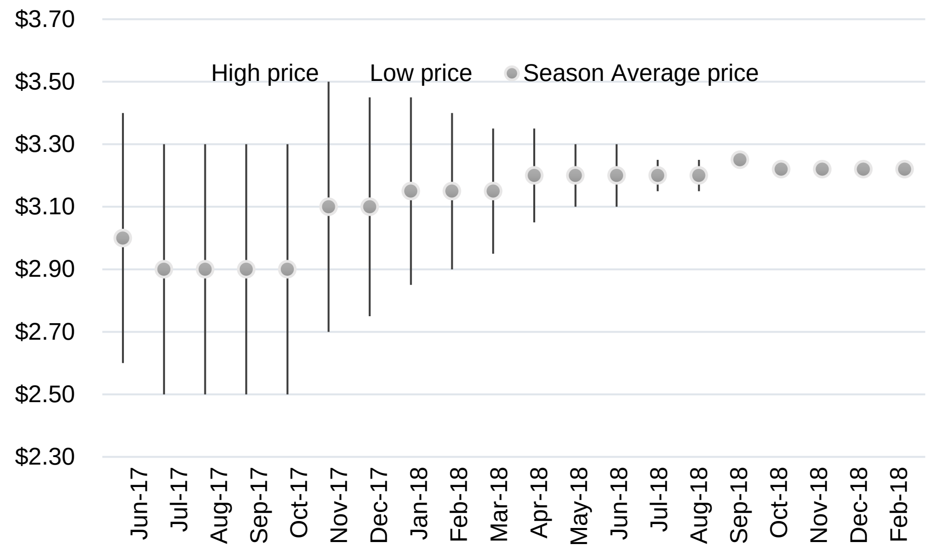
Note: Months for which data were withheld to avoid disclosure are shown as null.
Source: USDA, Economic Research Service with data from USDA, National Agricultural Statistics Service, *Grain Crushings and Co-Products Production.*

Projected sorghum exports remain constant at 85.0 million bushels. Total use is increased 5.0 million bushels to 340.0 million bushels as sorghum is expected to continue to price itself into domestic feed channels. However, if realized, this level would be the lowest use since 2012/13.

Sorghum ending stocks are expected to be 59.840, down 5.0 million bushels from last month's estimate.

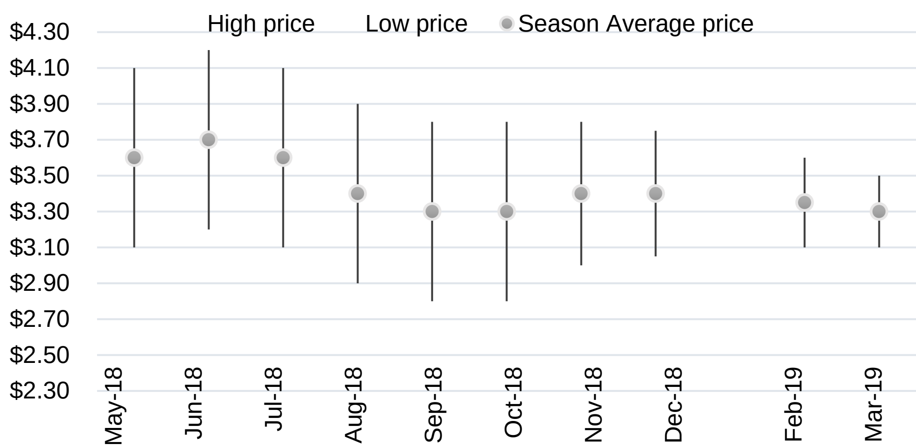
The anticipated average season price for sorghum is reduced by $0.10 to $3.20 per bushel, with the projected high price being $3.35 and the low price being $3.05 per bushel.

Figure 13a
WASDE sorghum price projections for 2017/18



Source:USDA, Economic Research Service with data from USDA, World Agricultural Outlook Board, *WASDE,* June 2017 to February 2019.

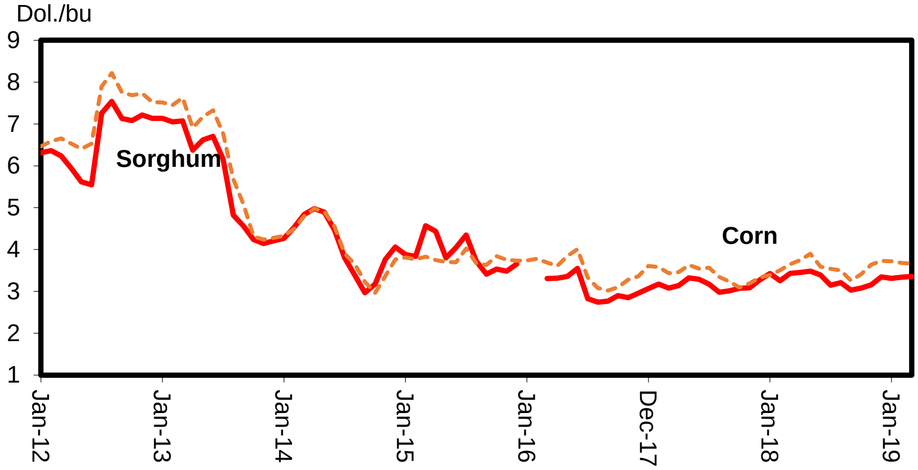
Figure 13b
WASDE sorghum price projections for 2018/19



Source:USDA, Economic Research Service with data from USDA, World Agricultural Outlook Board, *WASDE,* May 2018 to April 2019

Figure 14

Monthly yellow #2 grain sorghum and corn prices for Kansas City



Sources: USDA, Economic Research Service, *Feed Grains Database* and USDA, Agricultural Marketing Service, http://marketnews.usda.gov/portal/lg.

Intentions Indicate Lowest Sorghum Area on Record

NASS's *Prospective Plantings* report indicates that producers intend to reduce sorghum planted area for 2019/20 by 10 percent, to 5.135 million acres, compared to the previous year. The largest percentage acreage reductions are for Oklahoma, South Dakota, and Texas, with smaller percentage reductions for Kansas and Nebraska. Oklahoma is projected to increase oat and soybean acreage, South Dakota is projected to plant more corn and barley, and Kansas is expected to have record high upland cotton plantings. Colorado is the only State that is expected to increase sorghum acreage. If realized, this would be the lowest sorghum acreage on record. Sorghum export sales continue far behind last year's pace, and stocks as of March 1, 2019, are up 37 percent from a year ago.

In addition to the acreage reductions for specific States, intended planting estimates for Arkansas, Georgia, Illinois, Louisiana, Mississippi, Missouri, and North Carolina were discontinued in 2019. Those States accounted for 195,000 acres in 2018, or less than 4 percent of the total 2018 planted acreage.

Barley 2018/19: Expected Season Average Price Range Refined

Barley total supply remains unchanged in 2018/19 at 255.563 million bushels. Total use and ending stocks also remain unchanged at 165.000 and 90.563 million bushels, respectively.

The season average price expectations are refined on the high end down $0.05 to $2.70 and up $0.05 on the low end to $2.60 per bushel. The anticipated season average price is $2.65 per bushel.

Barley Acreage Intentions Up Fractionally

NASS's *Prospective Plantings* report shows that farmers intend to plant 2.55 million acres of barley in 2019, up fractionally from 2.54 million acres in 2018. Within the stable national acreage, there are some local shifts, with Arizona, Kansas, and North Carolina increasing acreage and Michigan and Virginia reducing acreage. The top three barley acreage States from 2018 of Montana, North Dakota, and Idaho remain the top three States for intended barley plantings in 2019, although Idaho's acreage is expected to decrease compared to 2018. Idaho is expected to increase acreage for wheat, oats, and dry peas.

Oats 2018/19: Expected Season Average Price Range Refined

Oats total supply remains unchanged in 2018/19 at 187.146 million bushels. Total use and ending stocks also remain unchanged at 151.000 and 36.146 million bushels, respectively.

The season average price expectations are refined on the high end down $0.05 to $4.80 and up $0.05 on the low end to $4.40 per bushel. The anticipated season average price is $4.60 per bushel.

Intentions Indicate Lowest Oats Area on Record

NASS's *Prospective Plantings* report indicates that producers intend to plant 2.56 million acres of oats, down 7 percent from 2.746 million acres in 2018. The States with the largest percentage increase in acreage are Oklahoma, Idaho, and Oregon, while the largest percentage decreases are in North Carolina, California, and Arkansas. Record low planted acreage is estimated in Arkansas, California, Maine, Minnesota, and North Carolina. Relative prices have encouraged producers to switch acreage in those States to other crops, particularly corn, barley, durum wheat, and cotton. Oats stocks reported March 1, 2019, were 9 percent lower than last year, but with Canada expecting 13 percent larger seeded area, supplies are expected to remain ample for North America.

In addition to the acreage reductions for specific States, intended plantings estimates for Alabama, Colorado, South Carolina, Washington, and Wyoming were discontinued in 2019. Those States accounted for 196,000 acres in 2018, or about 7 percent of the planted acreage.

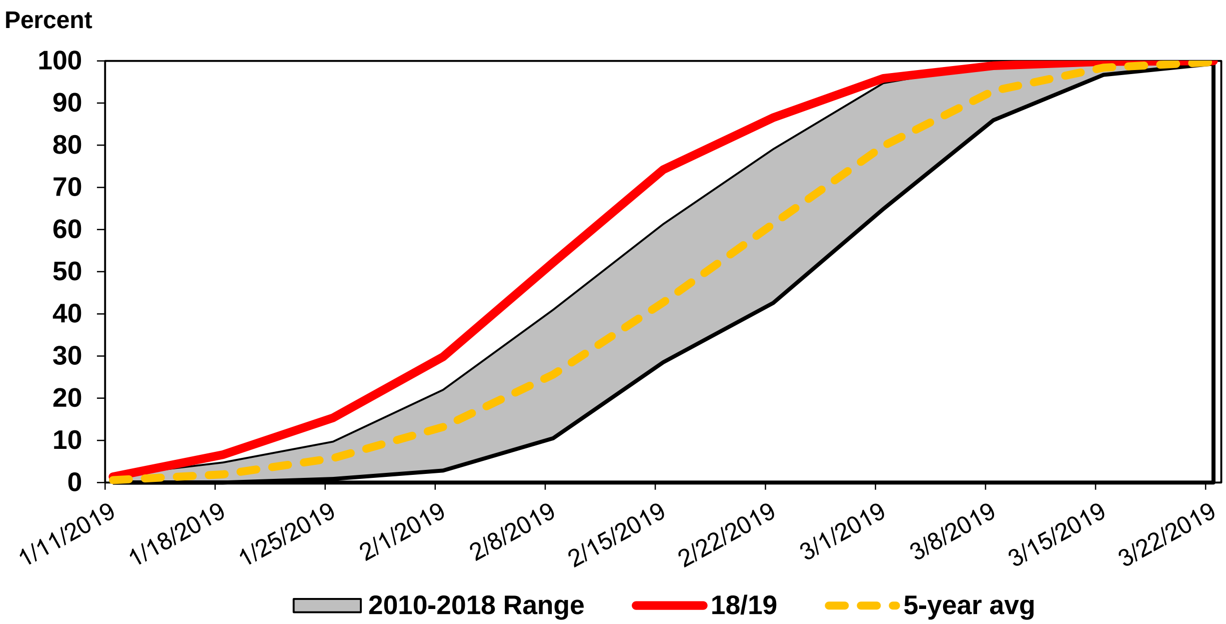
International Outlook

Corn Output in South America Is Getting Bigger

Global coarse grain production in 2016/17 is forecast up 5.3 million tons this month, while world corn output is raised by 6.2 million tons. The aggregate increase in corn output is partly offset by a reduction in mixed grain production in the ***European Union (Poland)***. The major contributors to the corn production increase are ***Brazil, Argentina, Ukraine, European Union, and Mexico***. The first three countries are the largest corn exporters behind the ***United States***, whose exports roughly equal the combined exports of any two of those other countries. The European Union (EU) and Mexico are the world's largest corn importers.

The ***Brazil*** corn production forecast is raised by 1.5 million tons to 96.0 million this month, getting closer to the 2016/17 record, as projections for second-crop corn yields improve. Second-crop corn (safrinha, or "small" crop in Portuguese), which constitutes more than 70 percent of corn output in Brazil, grows mainly in the central-west part of the country. This year's planting was off to a rapid early start, with record fast planting progress (see fig. 15), corn planted within the ideal timeframe, and beneficial rains in most major growing areas.

Figure 15. Second-crop corn planting progress in Mato Grosso



Source: *Instituto Mato-Grossense De Economia Agropecuaria (IMEA)*. Historical data are interpolated to same temporal basis as 2018/19.

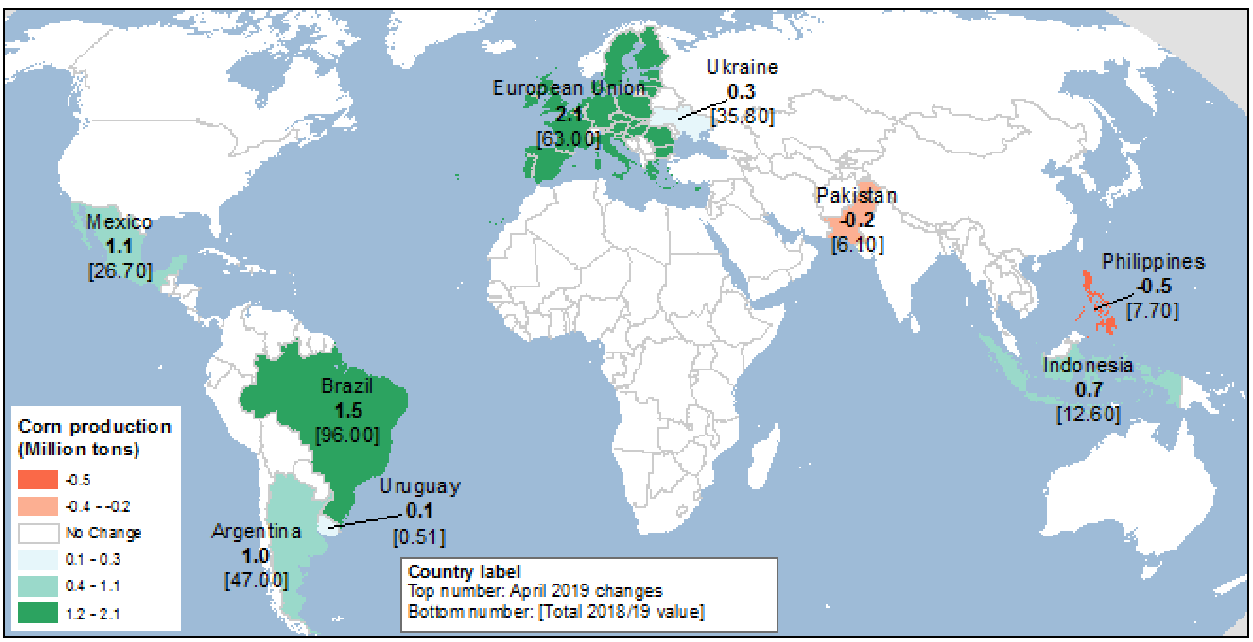
Early planting in the major second-crop corn areas was possible as the weather allowed quick harvesting of soybeans, which freed land for corn. This greatly increases the probability of higher yields as it gives the crop extra time to develop and complete grain filling prior to the normal end of the rainy season. Although the risk of corn suffering from the premature abrupt ending of the rainy season is waning, it cannot yet be completely written off.

A record-size corn crop is projected for ***Argentina***, up 1.0 million tons to 47.0 million, with the record-high area getting even bigger, up 0.2 million hectares to 5.7 million. The corn harvest started slower than average, but early yields in the core corn areas exceed expectations. However, corn yields are expected to decline as the harvest moves to the north of the country.

This month, a corn production series was revised for ***Haiti***. The revision goes back to 2000 and is based on official data and on the estimates of local USDA, Foreign Agricultural Service staff.

Additional information on this month's changes in coarse grain production are provided in tables A1, A2 and map A below for corn production. The changes in the global, foreign, and the U.S coarse grain production by type of grain are shown in table A1, while changes in coarse grain production by country are given in table A2.

Map A – Corn production changes for 2018/19, April 2019



Source: USDA, Foreign Agricultural Service, Production, Supply and Distribution online database.

Table A1 – World and U.S. coarse grain production at a glance (2018/19), April 2019					
	Region or country	Production	Change from previous month	YoY change[1]	Comments
			Million tons		
Coarse grain production (total)					
↑	**World**	**1,377.2**	**+5.3**	**+19.7**	
↑	**Foreign**	**997.2**	**+5.3**	**+24.2**	Changes are made for a number of countries and commodities. See table A2.
	United States	**379.9**	**No change**	**–4.5**	See section on U.S. domestic output.
World production of coarse grains by type of grain					
			CORN		
↑	**World**	**1,107.4**	**+6.2**	**+31.0**	
↑	**Foreign**	**741.1**	**+6.2**	**+35.8**	Higher corn production is projected for Brazil, Argentina, European Union, Mexico, Indonesia, and Ukraine. See table A2 and map A.
	United States	**366.3**	**No change**	**–4.8**	See section on U.S. domestic output.
			BARLEY		
↓	**World**	**140.7**	**-0.1**	**–3.4**	
↓	**Foreign**	**137.3**	**-0.1**	**–3.6**	Slightly higher output projected for Ukraine and Moldova is more than offset by reduced estimates for Afghanistan and Norway. See table A2.
	United States	**3.3**	**No change**	**+0.2**	See section on U.S. domestic output.
			SORGHUM		
↑	**World**	**57.1**	**+0.2**	**–0.6**	
↑	**Foreign**	**47.8**	**+0.2**	**–0.7**	A projected increase for Brazil and Mexico and a downward adjustment for El Salvador. See table A2.
	United States	**9.3**	**No change**	**+0.1**	See section on U.S. domestic output.
			OATS		
↓	**World**	**22.1**	**-0.1**	**-1.2**	
↓	**Foreign**	**21.3**	**-0.1**	**-1.3**	Lower oats output is projected for Norway.
	United States	**0.8**	**No change**	**+0.1**	See section on U.S. domestic output.
			MIXED GRAIN		
↓	**World/Foreign**	**13.9**	**-0.9**	**-1.7**	Lower production projected for the European Union. See table A2.

[1]YoY: year over year changes.

Changes smaller than 0.1 million tons are made for rye and millet. **For changes and country notes, see table A2.**

Source: USDA, Foreign Agricultural Service, Production, Supply and Distribution online database.

	Type of crop	Crop year	Production	Change in forecast[1]	YoY[2] change	Comments
			Million tons			
Coarse grain production by country and by type of grain (2018/19)						
			BRAZIL			
↑	**Corn**	*Mar–Feb*	**96.0**	**+1.5**	**+14.0**	The increase is attributed to higher yields for the second (summer) crop corn. Early planting in all major second-crop corn areas (safrinha corn about 2/3 of the total) greatly increases probability of achieving higher yields. See report text.
↑	**Sorghum**	*Oct–Sep*	**1.9**	**+0.1**	**–0.2**	Sorghum output adjustment is based mainly on reported final area. Barley and oats production are also slightly adjusted up.
			ARGENTINA			
↑	**Corn**	*Mar–Feb*	**47.0**	**+1.0**	**+14.0**	Already record-high corn area is revised higher, while early corn yields exceed expectations. See report text.
			EUROPEAN UNION (EU)			
↑	**Corn**	*Oct–Sep*	**63.0**	**+2.1**	**+0.9**	Although at this point, the changes are supposed to be a fine-tuning of European crop area and output, this month brings substantial revisions for European (mainly French and German) corn, with both area and yield changes.
↓	**Mixed Grain**	*Jul–Jun*	**13.6**	**–0.9**	**–1.8**	Lower projection for mixed grain yields in Poland.
			MEXICO			
↑	**Corn**	*Oct–Sep*	**26.7**	**+1.1**	**–0.9**	Abundant rainfall boosted yields for already harvested summer corn that constitutes 75 percent of the total crop. Increase is based on more complete data from SADER (Secretariat of Agriculture and Rural Development—previously SAGARPA).
↑	**Sorghum**	*Oct–Sep*	**4.7**	**+0.1**	**+0.2**	Favorable weather for winter crops slightly boosted sorghum yields.
			INDONESIA			
↑	**Corn**	*Oct–Sep*	**12.6**	**+0.7**	**+1.2**	The Government aims at self-sufficiency in corn production and supports corn growers, providing subsidies for fertilizer and machinery and distributing free higher yielding hybrid corn seed to farmers. Corn expands into new farmland, sometimes replacing cacao and teak and sometimes being intercropped.
			UKRAINE			
↑	**Corn**	*Oct–Sep*	**35.8**	**+0.3**	**+11.7**	The final adjustment published by the State statistical agency.
↑	**Barley**	*Jul–Jun*	**7.6**	**+0.2**	**–1.1**	The final adjustment published by the State statistical agency.
			PHILIPPINES			
↓	**Corn**	*Jul–Jun*	**7.7**	**–0.5**	**–0.3**	Yields are expected lower as the crop was hit by drought (El Nino).

[1]Change from previous month. Smaller changes for coarse grain output are made for several countries, see map A for changes in corn.

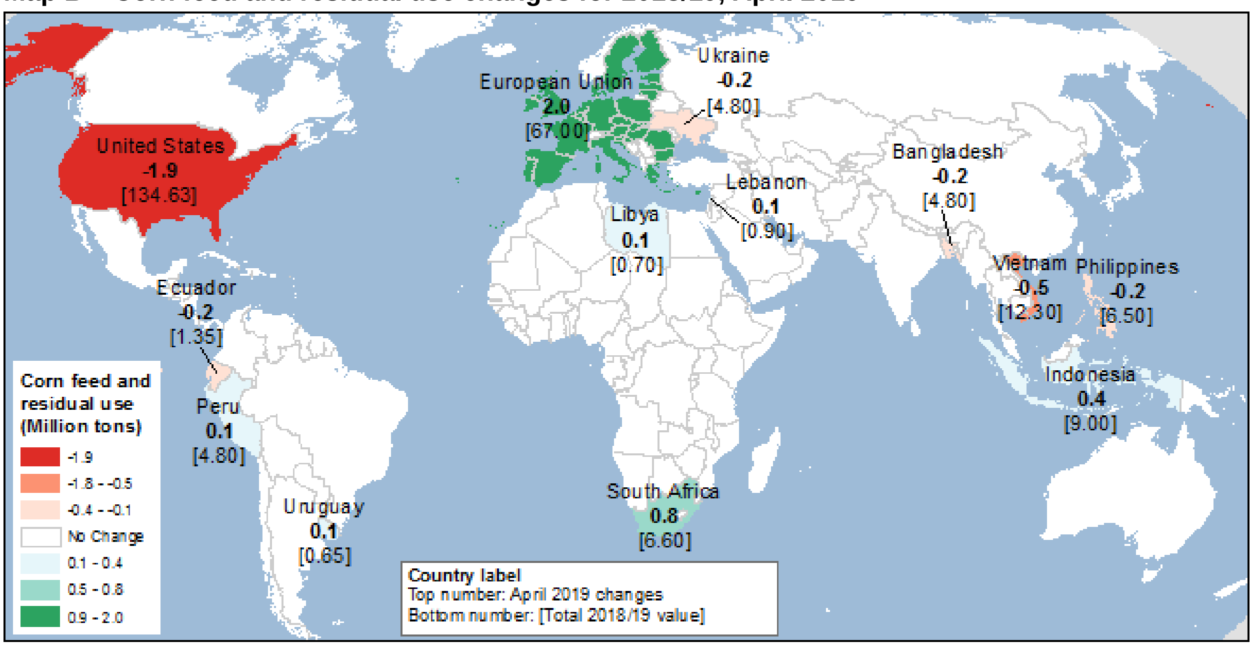
[2] YoY: year over year changes.

Source: USDA, Foreign Agricultural Service, Production, Supply and Distribution online database.

Global Coarse Grain Use Projected Higher

Foreign coarse grain domestic consumption in 2018/19 is projected up 2.9 million tons this month to a record high 1,081.6 million, with many changes reflecting production revisions, shifts in feeding among grains with a shift away from wheat to corn for domestic feed use, the economic situation, and multiple changes across corn-importing and exporting countries. The increase nearly offsets a reduction in U.S. feeding (see domestic section above), making global domestic disappearance virtually unchanged. Foreign domestic use of corn is raised 3.2 million tons, barley use is up 0.5 million tons, while mixed grain and sorghum use are down 0.9 and 0.2 million tons, respectively. The largest increase in corn use is projected for the EU, up 2.5 million tons this month. This reflects both a larger crop and increased imports, as relatively price-competitive corn is more than offsetting a reduction in wheat feeding, as more wheat is being exported. Another important change in consumption is for South Africa, up 1.0 million tons, as the country is expected to import additional mostly yellow corn but also some white corn to offset upcoming low output. For a visual display of this month's changes in corn domestic consumption, see map B.

Map B – Corn feed and residual use changes for 2018/19, April 2019



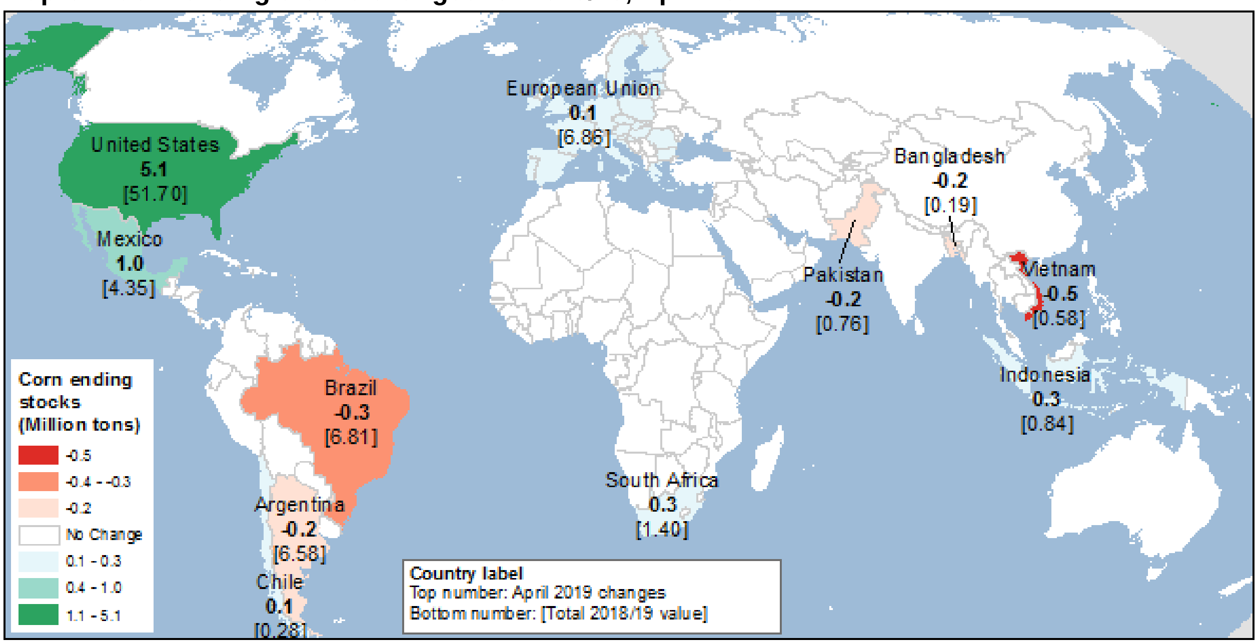
Source: USDA, Foreign Agricultural Service, Production, Supply, and Distribution database.

Coarse Grain Stocks Increase Led by the U.S.

World 2018/19 coarse grain ending stocks are forecast 5.1 million tons higher than the March projection, to reach 341.3 million. Foreign coarse grain stocks are projected marginally higher, up just 0.1 million tons, with numerous offsetting changes as U.S. stocks are projected about 10 percent higher (see the discussion in the domestic section). Apart from the United States, whose corn stocks are up 5.1 million tons, the largest change in foreign stocks is a projected increase for Mexico, up 1.0 million tons to 4.3 million, due to higher corn output. Corn stocks in Vietnam and Brazil are projected down 0.5 and 0.3 million tons, respectively (lower imports for Vietnam and higher exports for Brazil that more than offset increased production). All other country changes are smaller.

Map C below provides a visual display of this month's country changes in corn ending stocks.

Map C – Corn ending stocks changes for 2018/19, April 2019

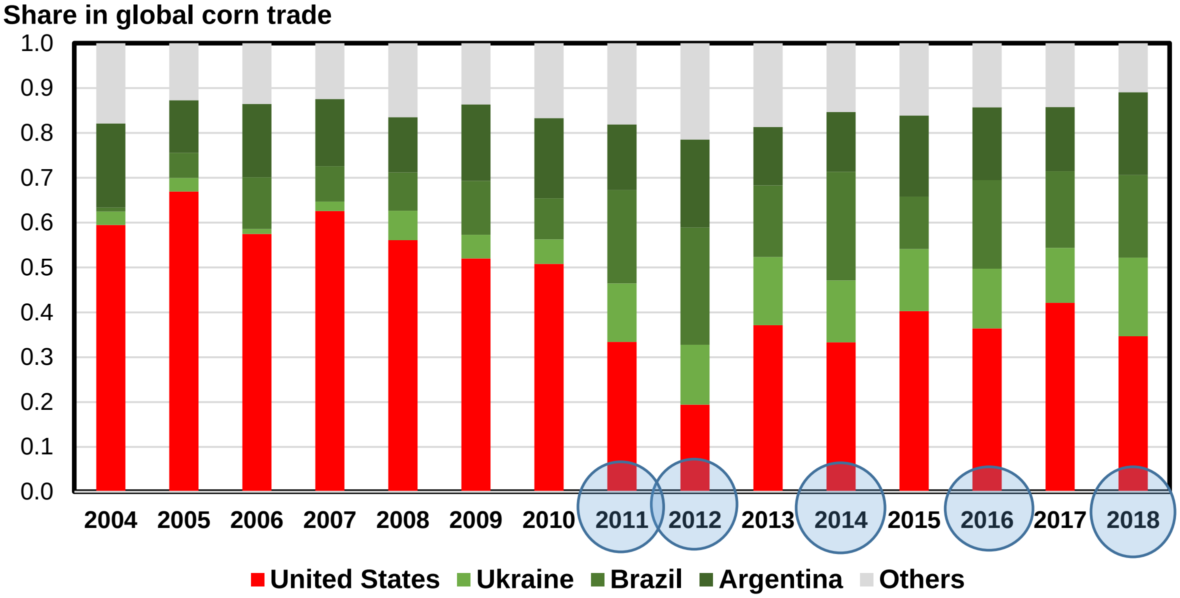


Source: USDA, Foreign Agricultural Service, Production, Supply, and Distribution database.

South American Bumper Harvests Curtail U.S. Exports

Projected ***U.S.*** 2018/19 corn exports are further reduced this month because of intensified competition from South America and Ukraine. U.S. market share in global corn trade has become highly dependent on the crop size in ***Brazil***, ***Argentina***, and ***Ukraine***, whose aggregate corn output is currently projected to exceed last year's harvest by almost 30 million tons. In years when bumper crops in those three major corn exporters boost their export price competitiveness, U.S. corn exports tend to fall, as happened in 2011, 2012, 2014, 2016, and in the current year of 2018 (see fig. 16 below).

Figure 16. U.S. market share is greatly affected by the size of major competitors' corn crop



Source: USDA, Foreign Agricultural Service, Production, Supply and Distribution online database.

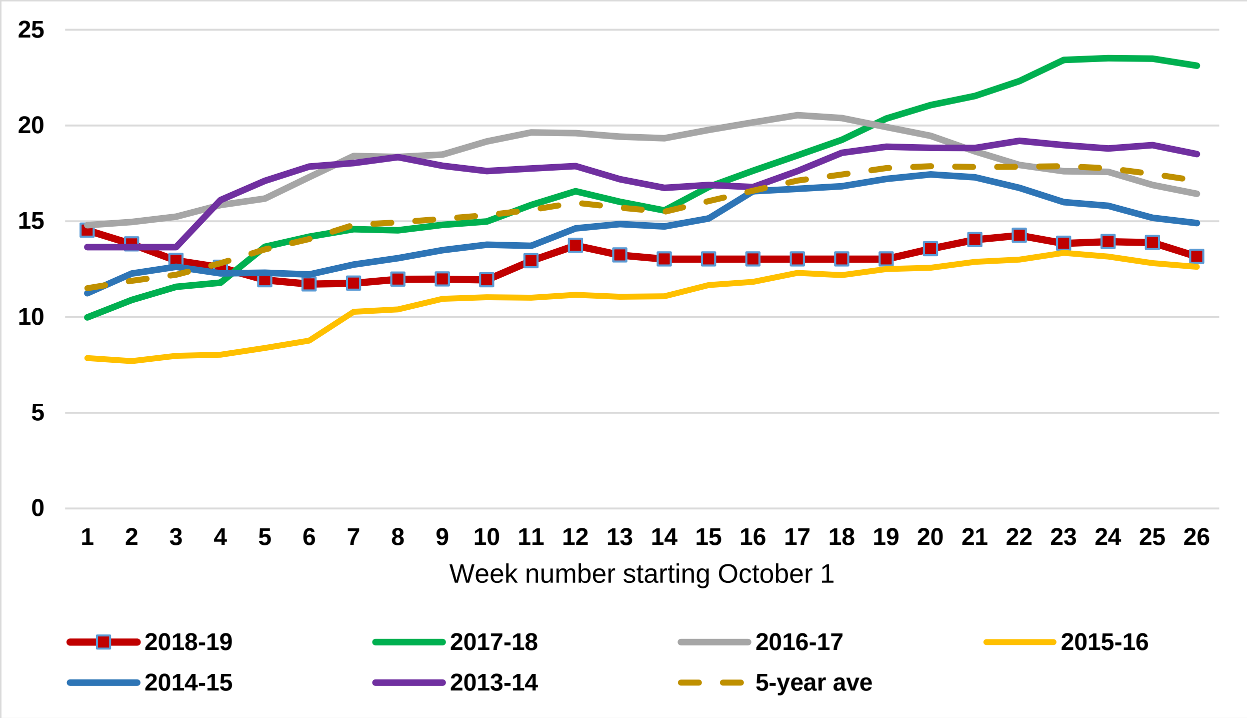
In particular, the variability of U.S. corn exports during the July to October time period is correlated to the Brazilian second-crop (safrinha) corn size and its highly variable yields that depend on the ability of farmers to plant early in the season and especially on the length and intensity of the rainy season in the center-west of the country.

U.S. October–September 2018/19 corn exports are projected down 2.0 million tons this month to 58.0 million (down 75 million bushels to 2,300 million for the September–August local marketing year). Unlike last year when both Brazil and Argentina had disappointing harvests that allowed the United States to accelerate its corn exports in the second half of the marketing year, this year U.S. corn exports are frontloaded. In the second half of this trade year, highly price-competitive corn from Brazil, Argentina, and Ukraine is expected to curb U.S. exports.

The pace of corn shipments in the beginning of the year has been strong, with Census data for October–January 2019 at 19.8 million tons, the highest since 2007/08. However, since the beginning of November, U.S. outstanding sales have been lagging behind not only last year but also a 5-year average (fig. 17 below). Furthermore, February-March 2019 corn export inspections (adjusted up for trade with Mexico) lag considerably behind a year ago. As of now, weekly corn exports inspections adjusted for uninspected truck and rail shipments to Mexico and Canada would need to average about 1.0 million tons per week through the end of August, when the 2018/19 local marketing year ends.

Figure 17. U.S. outstanding export sales for corn

Million tons



Source: USDA, Foreign Agricultural Service, U.S. Export Sales, Weekly Sales.

Brazilian corn exports dropped sharply in February-March, as highly profitable soybeans are currently being harvested and exported, thereby shifting port capacity use from corn to soybeans. Yet, when Brazil starts to harvest its second-crop corn in June, corn exports are expected to boom in July. ***Argentina*** and ***Ukraine*** also are expected to provide stiff competition. While Ukrainian corn exports are expected to slow down by July, Argentina is expected to significantly accelerate its shipments in April as the corn harvest advances, an expectation supported by the record-high port loading. This month, corn exports are projected 1.5 million tons higher for Brazil to reach 31.0 million, up 1.0 million tons to 29.0 million for Argentina, and up 0.5 million tons to 29.5 million for Ukraine. U.S. corn forward prices for delivery through

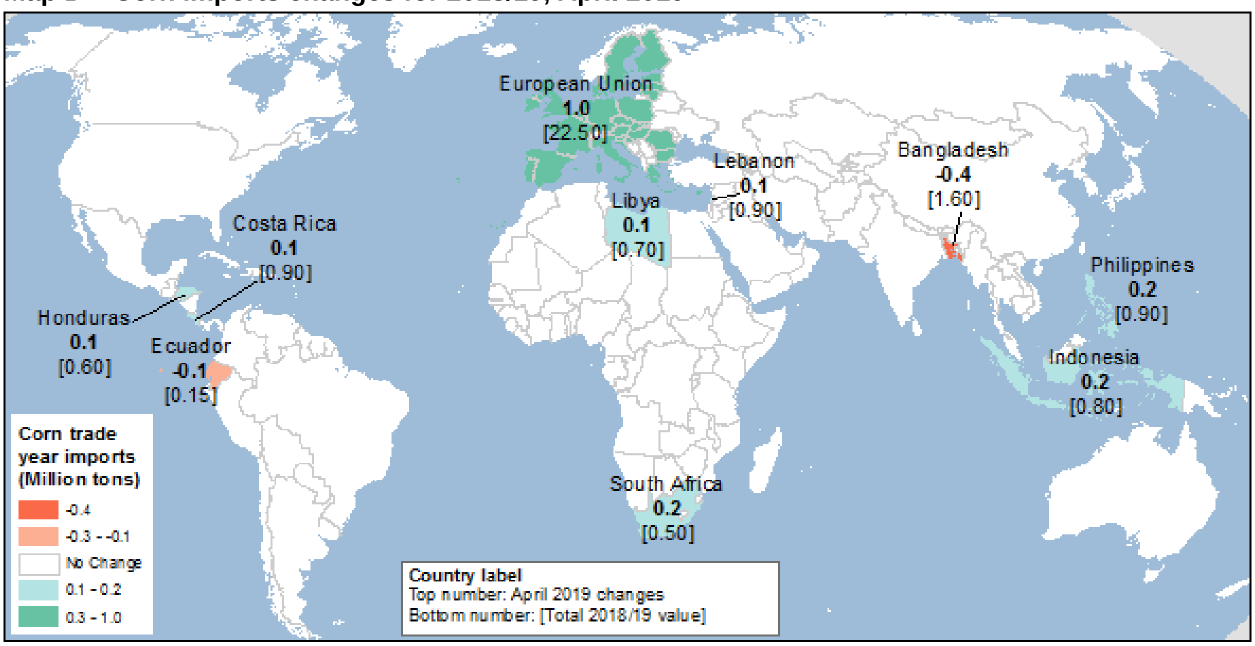
August are at a substantial premium compared to Brazil and Argentina on a free-on-board basis, with the strong U.S. currency and logistics hurting U.S. competitiveness.

Strong competition is keeping corn prices attractive to importers and supports strong world trade. ***EU*** corn imports are raised by 1.0 million tons to a whopping 22.5 million, reflecting a brisk import pace and exceeding the last year's previous record by more than 4 million tons. Additional corn imports this month are partly offsetting a reduction in EU wheat feeding, as Ukraine is expected to ship additional corn to the region. At the same time, EU corn export prospects are also increased by 0.5 million tons to 2.0 million because of the massive increase in the region's corn supplies this month and a faster pace of exports. Corn import prospects are raised for the ***Philippines*** and ***South Africa***, which have lower corn supplies this year, and are reduced for ***Bangladesh,*** where corn output is up year-to-year.

Global exports of sorghum, barley, and oats are virtually unchanged this month, while rye exports are up 0.2 million tons due to additional shipments from Russia to the EU.

Map D below provides a visual display of this month's country changes in corn imports.

Map D – Corn imports changes for 2018/19, April 2019



Source: USDA, Foreign Agricultural Service, Production, Supply, and Distribution database.

Suggested Citation

Capehart, Tom, Liefert, Olga, Olson, David W., *Feed Outlook*, FDS-19d, U.S. Department of Agriculture, Economic Research Service, April 11, 2019

Table 1--Feed grains: U.S. quarterly supply and disappearance (million bushels), 4/11/2019

Commodity, market year, and quarter 1/			Beginning stocks	Production	Imports	Total supply	Food, seed, and industrial use	Feed and residual use	Exports	Total disappear-ance	Ending stocks	Farm price 2/ (dollars per bushel)
Corn	2015/16	Sep-Nov	1,731	13,602	13	15,346	1,631	2,178	301	4,111	11,235	3.65
		Dec-Feb	11,235		18	11,253	1,652	1,438	341	3,431	7,822	3.64
		Mar-May	7,822		21	7,843	1,655	914	563	3,132	4,711	3.60
		Jun-Aug	4,711		16	4,727	1,709	587	694	2,990	1,737	3.55
		Mkt yr	1,731	13,602	68	15,401	6,647	5,118	1,899	13,664	1,737	3.61
	2016/17	Sep-Nov	1,737	15,148	14	16,899	1,689	2,279	548	4,516	12,383	3.26
		Dec-Feb	12,383		12	12,395	1,711	1,523	539	3,773	8,622	3.39
		Mar-May	8,622		17	8,639	1,741	982	687	3,410	5,229	3.46
		Jun-Aug	5,229		14	5,243	1,743	686	520	2,949	2,293	3.40
		Mkt yr	1,737	15,148	57	16,942	6,885	5,470	2,294	14,649	2,293	3.36
	2017/18	Sep-Nov	2,293	14,609	11	16,914	1,743	2,255	349	4,347	12,567	3.21
		Dec-Feb	12,567		9	12,575	1,738	1,503	441	3,683	8,892	3.30
		Mar-May	8,892		8	8,900	1,782	943	871	3,595	5,305	3.58
		Jun-Aug	5,305		9	5,314	1,793	603	777	3,174	2,140	3.46
		Mkt yr	2,293	14,609	36	16,939	7,056	5,304	2,438	14,799	2,140	3.36
	2018/19	Sep-Nov	2,140	14,420	6	16,567	1,712	2,285	633	4,630	11,937	3.41
		Dec-Feb	11,937		10	11,947	1,656	1,186	500	3,342	8,605	3.56
		Mkt yr	2,140	14,420	40	16,600	6,965	5,300	2,300	14,565	2,035	3.40-3.70
Sorghum	2015/16	Sep-Nov	18.41	596.75	3.60	618.76	22.14	159.65	114.44	296.23	322.54	3.54
		Dec-Feb	322.54		0.98	323.51	41.77	-6.14	86.30	121.93	201.58	3.17
		Mar-May	201.58		0.01	201.59	43.31	-5.53	73.46	111.24	90.35	3.10
		Jun-Aug	90.35		0.01	90.36	29.73	-43.65	67.65	53.73	36.63	3.33
		Mkt yr	18.41	596.75	4.59	619.75	136.95	104.32	341.85	583.12	36.63	3.31
	2016/17	Sep-Nov	36.63	480.26	0.00	516.90	21.65	144.36	41.81	207.82	309.08	2.62
		Dec-Feb	309.08		0.00	309.08	33.06	5.97	89.32	128.34	180.75	2.69
		Mar-May	180.75		0.00	180.75	34.62	2.41	59.02	96.04	84.71	2.79
		Jun-Aug	84.71		1.73	86.44	25.30	-19.99	47.67	52.98	33.46	3.53
		Mkt yr	36.63	480.26	1.74	518.63	114.61	132.74	237.82	485.18	33.46	2.79
	2017/18	Sep-Nov	33.46	361.87	1.91	397.24	13.92	110.13	45.71	169.75	227.49	3.05
		Dec-Feb	227.49		0.05	227.55	10.24	5.72	71.33	87.29	140.26	3.18
		Mar-May	140.26		0.01	140.27	15.81	-14.45	73.58	74.93	65.33	3.40
		Jun-Aug	65.33		0.04	65.38	20.44	-4.45	14.53	30.52	34.85	3.78
		Mkt yr	33.46	361.87	2.02	397.35	60.40	96.94	205.15	362.49	34.85	3.22
	2018/19	Sep-Nov	34.85	364.99		399.84	25.56	99.13	16.37	141.06	258.78	3.18
		Dec-Feb	258.78			258.78	23.36	19.69	23.00	66.05	192.73	3.20
		Mkt yr	34.85	364.99		399.84	100.00	155.00	85.00	340.00	59.84	3.05-3.35

Table 1--Feed grains: U.S. quarterly supply and disappearance, cont. (million bushels), 4/1/2019

Commodity, market year, and quarter 1/			Beginning stocks	Production	Imports	Total supply	Food, seed, and industrial use	Feed and residual use	Exports	Total disappearance	Ending stocks	Farm price 2/ (dollars per bushel)
Barley	2015/16	Jun-Aug	79	218	4	301	41	38	3	82	219	5.39
		Sep-Nov	219		4	223	37	1	4	43	180	5.52
		Dec-Feb	180		7	187	36	11	3	50	138	5.66
		Mar-May	138		4	141	44	-5	1	39	102	5.43
		Mkt yr	79	218	19	315	158	44	11	213	102	5.52
	2016/17	Jun-Aug	102	200	2	304	41	32	1	74	230	4.99
		Sep-Nov	230		2	232	39	-0	1	40	193	4.78
		Dec-Feb	193		2	195	37	12	1	50	145	5.04
		Mar-May	145		3	148	45	-6	2	41	106	4.96
		Mkt yr	102	200	10	312	162	39	4	205	106	4.96
	2017/18	Jun-Aug	106	143	2	252	41	30	2	72	180	
		Sep-Nov	180		2	182	38	-17	2	23	159	
		Dec-Feb	159		2	161	35	-6	1	31	130	
		Mar-May	130		3	133	43	-5	1	38	94	
		Mkt yr	106	143	9	259	157	2	5	164	94	4.47
	2018/19	Jun-Aug	94	153	1	249	40	33	1	74	175	
		Sep-Nov	175		1	176	38	-16	1	23	153	
		Dec-Feb	153		2	154	36	-4	1	33	121	
		Mkt yr	94	153	8	256	155	5	5	165	91	4.40-4.80
Oats	2015/16	Jun-Aug	54	89	18	161	18	49	0	67	94	2.15
		Sep-Nov	94		26	120	18	19	1	37	83	2.08
		Dec-Feb	83		25	108	17	15	0	33	75	2.09
		Mar-May	75		16	91	23	10	1	34	57	2.11
		Mkt yr	54	89	86	229	77	93	2	172	57	2.12
	2016/17	Jun-Aug	57	65	21	142	19	44	1	63	79	1.87
		Sep-Nov	79		28	106	18	12	1	31	75	2.03
		Dec-Feb	75		24	100	17	18	1	37	63	2.35
		Mar-May	63		18	81	22	8	1	31	50	2.42
		Mkt yr	57	65	90	212	76	82	3	161	50	2.06
	2017/18	Jun-Aug	50	50	19	119	19	27	1	47	72	2.35
		Sep-Nov	72		30	102	18	17	1	36	66	2.58
		Dec-Feb	66		20	86	18	13	1	31	55	3.03
		Mar-May	55		20	75	23	11	1	34	41	2.94
		Mkt yr	50	50	89	189	78	68	2	148	41	2.59
	2018/19	Jun-Aug	41	56	19	116	19	22	0	41	75	2.55
		Sep-Nov	75		28	103	19	17	0	36	67	2.65
		Dec-Feb	67		21	88	18	19	0	38	50	2.77
		Mkt yr	41	56	90	187	79	70	2	151	36	2.60-2.70

Latest market year is projected; previous market year is estimated. Totals may not add due to rounding.
1/ Corn and sorghum, September 1-August 31 marketing year; Barley and oats, June 1-May 31 marketing year.

2/ Average price received by farmers based on monthly price weighted by monthly marketings. For the latest market year, quarterly prices are calculated by using the current monthly prices weighted by the monthly marketings for those months for the previous 5 years divided by the sum of marketings for those months.
Source: USDA, World Agricultural Outlook Board, World Agricultural Supply and Demand Estimates and supporting materials.

Data run: 4/10/2019

Table 2--Feed and residual use of wheat and coarse grains, 4/11/2019

Market year and quarter 1/		Corn (million metric tons)	Sorghum (million metric tons)	Barley (million metric tons)	Oats (million metric tons)	Feed grains (million metric tons)	Wheat (million metric tons)	Energy feeds (million metric tons)	Grain consuming animal units (millions)	Energy feeds per grain consuming animal unit (tons)
2016/17	Q1 Sep-Nov	57.9	3.7	-0.0	0.2	61.8	-0.8	61.0		
	Q2 Dec-Feb	38.7	0.2	0.3	0.3	39.4	-0.4	39.1		
	Q3 Mar-May	24.9	0.1	-0.1	0.2	25.0	-1.7	23.3		
	Q4 Jun-Aug	17.4	-0.5	0.7	0.4	18.0	4.5	22.5		
	MY Sep-Aug	138.9	3.4	0.8	1.2	144.3	1.6	145.9	95.7	1.5
2017/18	Q1 Sep-Nov	57.3	2.8	-0.4	0.3	60.0	-1.5	58.5		
	Q2 Dec-Feb	38.2	0.1	-0.1	0.2	38.5	-0.4	38.1		
	Q3 Mar-May	23.9	-0.4	-0.1	0.2	23.7	-1.2	22.5		
	Q4 Jun-Aug	15.3	-0.1	0.7	0.4	16.3	5.2	21.5		
	MY Sep-Aug	134.7	2.5	0.1	1.2	138.5	2.1	140.5	99.2	1.4
2018/19	Q1 Sep-Nov	58.0	2.5	-0.4	0.3	60.5	-2.1	58.4		
	Q2 Dec-Feb	30.1	0.5	-0.1	0.3	30.9	-0.1	30.8		
	MY Sep-Aug	134.6	3.9	0.3	1.3	140.1	2.7	142.9	100.6	1.4

1/ Corn and sorghum, September 1-August 31 marketing year; Barley and oats, June 1-May 31 marketing year.
Source: USDA, World Agricultural Outlook Board, World Agricultural Supply and Demand Estimates and supporting materials.

Table 3--Cash feed grain prices, 4/11/2019

Mkt year and month 1/	Corn, No. 2 yellow, Central IL (dollars per bushel)			Corn, No. 2 yellow, Gulf ports, LA (dollars per bushel)			Sorghum, No. 2 yellow, Gulf ports, LA (dollars per cwt)
	2016/17	2017/18	2018/19	2016/17	2017/18	2018/19	2016/17
Sep	3.09	3.15	3.12	3.78	3.74	3.93	
Oct	3.27	3.15	3.28	3.88	3.77	4.07	
Nov	3.28	3.14	3.36	3.83	3.78	4.09	
Dec	3.34	3.21	3.53	3.88	3.79	4.25	
Jan	3.45	3.29	3.53	4.07	3.96	4.24	
Feb	3.51	3.45	3.50	4.14	4.15	4.31	
Mar	3.40	3.52	3.43	4.04	4.36	422.50	
Apr	3.41	3.54		3.98	4.46		
May	3.47	3.73		4.03	4.55		
Jun	3.49	3.38		4.01	4.19		7.56
Jul	3.51	3.22		4.00	3.98		
Aug	3.27	3.24		3.77	4.13		
Mkt year	3.37	3.34		3.95	4.07		7.56

	Barley, No. 2 feed, Minneapolis, MN (dollars per bushel)			Barley, No. 3 malting, Minneapolis, MN (dollars per bushel)		Oats, No. 2 white heavy, Minneapolis, MN (dollars per bushel)		
	2016/17	2017/18	2018/19	2016/17	2017/18	2016/17	2017/18	2018/19
Jun	2.36	2.05	2.85		4.70	2.58	2.95	2.88
Jul	2.33	2.05	2.85		4.67	2.61	3.17	2.84
Aug	2.08	2.10	2.78		4.70	2.34	2.98	2.91
Sep	1.95	2.10	2.60		4.70	2.29	2.87	2.91
Oct	2.00	2.10	2.60		4.70	2.67	2.97	3.18
Nov	2.00	2.36	2.60			2.84	2.94	3.22
Dec	2.00	2.61	2.60		4.85	2.92	2.73	3.31
Jan	2.00	2.65	2.60		4.85	2.97	2.90	3.28
Feb	2.00	2.81	2.60		4.85	3.07	2.96	3.23
Mar	2.02	2.85	2.60	4.70	4.50	2.90	2.79	3.18
Apr	2.05	2.85				2.86	2.72	
May	2.05	2.85				2.88	2.89	
Mkt year	2.07	2.45		4.70	4.72	2.74	2.90	

1/ Corn and sorghum, September 1-August 31 marketing year; Barley and oats, June 1-May 31 marketing year. Simple average of monthly prices for the marketing year.
Source: USDA, Agricultural Marketing Service, http://marketnews.usda.gov/portal/lg.

Table 4--Selected feed and feed byproduct prices (dollars per ton), 4/11/2019

Mkt year and month 1/	Soybean meal, high protein, Central Illinois, IL			Cottonseed meal, 41% solvent, Memphis, TN			Corn gluten feed, 21% protein, Midwest		Corn gluten meal, 60% protein, Midwest	
	2016/17	2017/18	2018/19	2016/17	2017/18	2018/19	2016/17	2017/18	2016/17	2017/18
Oct	323.26	319.24	319.15	241.88	229.00	249.00	77.00	80.70	466.13	469.30
Nov	322.42	313.52	310.62	221.00	228.75	240.00	83.50	93.00	477.50	487.24
Dec	321.03	327.17	311.70	217.50	232.50	243.50	92.83	96.25	501.67	482.88
Jan	332.34	322.60	314.93	223.50	259.00	247.50	97.50	98.80	502.50	477.60
Feb	334.32	362.85	290.12	221.88	303.13	235.00	88.13	106.25	516.50	483.13
Mar	320.34	379.85	306.38	210.63	323.13	226.25	87.13	105.50	505.63	524.75
Apr	305.67	385.85		195.00	263.13		75.00		501.13	
May	293.68	393.55		179.50	262.50		71.00		485.30	
Jun	258.75	355.71		179.38	257.50		68.38		475.75	
Jul	326.04	341.08		200.84	253.13		71.35		467.88	
Aug	301.05	332.50		198.50	260.00		73.10		475.50	
Sep	307.70	318.33		213.75	258.75		75.00		469.25	
Mkt yr	312.22	346.02		208.61	260.88		79.99	96.75	487.06	487.48

	Meat and bone meal, Central US			Distillers dried grains, Central Illinois, IL			Wheat middlings, Kansas City, MO			Alfalfa hay, weighted-average farm price 2/	
	2016/17	2017/18	2018/19	2016/17	2017/18	2018/19	2016/17	2017/18	2018/19	2017/18	2018/19
Oct	237.50	228.00	267.50	116.25	117.30	137.50	79.43	70.36	80.00	153.00	178.00
Nov	229.00	219.38	257.50	111.70	123.13	137.50	85.53	86.85	105.00	150.00	175.00
Dec	211.67	221.67	257.50	104.84	143.75	147.00	101.62	107.88	148.00	149.00	180.00
Jan	255.60	220.00	259.50	96.30	155.50	154.80	98.25	123.68	108.10	153.00	181.00
Feb	285.00	225.84	260.00	98.88	158.88	158.13	84.66	114.61	98.88	155.00	180.00
Mar	284.38	275.00	263.33	98.25	164.13	157.38	80.76	99.69	101.50	165.00	
Apr	266.25	316.25		99.25	174.38		58.03	100.22		183.00	
May	245.50	293.00		100.50	174.90		48.41	98.90		189.00	
Jun	248.13	288.75		105.25	158.50		60.39	89.50		181.00	
Jul	276.25	283.75		110.63	139.30		67.10	64.50		179.00	
Aug	318.50	265.63		110.00	144.00		63.15	83.50		177.00	
Sep	301.88	266.25		111.63	142.50		67.48	84.00		180.00	
Mkt yr	263.31	258.63		105.29	149.69		74.57	93.64		154.00	

1/ October 1-September 30 except for hay. Simple average of monthly prices for the marketing year except for hay.
2/ May 1-April 30 marketing year. U.S. season-average price based on monthly price received by farmers weighted by monthly marketings.

Source: USDA, Agricultural Marketing Service, http://marketnews.usda.gov/portal/lg, and USDA, National Agricultural Statistics Service, http://www.nass.usda.gov/Data_and_Statistics/Quick_Stats/index.asp.

Table 5--Corn: Food, seed, and industrial use (million bushels), 4/11/2019

Mkt year and qtr 1/		High-fructose corn syrup (HFCS)	Glucose and dextrose	Starch	Alcohol for fuel	Alcohol for beverages and manufacturing	Cereals and other products	Seed	Total food, seed, and industrial use
2016/17	Q1 Sep-Nov	113.13	88.81	58.20	1,343.08	35.78	49.92	0.00	1,688.92
	Q2 Dec-Feb	106.71	88.53	56.36	1,371.21	36.35	52.33	0.00	1,711.49
	Q3 Mar-May	120.23	96.89	59.70	1,346.10	36.72	54.45	27.25	1,741.34
	Q4 Jun-Aug	126.90	97.13	61.09	1,371.56	37.15	47.60	2.05	1,743.49
	MY Sep-Aug	466.98	371.35	235.35	5,431.95	146.00	204.30	29.30	6,885.23
2017/18	Q1 Sep-Nov	111.69	93.51	59.42	1,391.29	36.46	50.38	0.00	1,742.74
	Q2 Dec-Feb	105.21	87.91	56.87	1,397.46	38.23	52.82	0.00	1,738.50
	Q3 Mar-May	117.97	94.42	58.56	1,388.64	38.50	55.27	28.15	1,781.52
	Q4 Jun-Aug	124.13	95.51	60.88	1,427.43	35.83	48.23	1.48	1,793.48
	MY Sep-Aug	459.00	371.35	235.73	5,604.83	149.00	206.70	29.64	7,056.24
2018/19	Q1 Sep-Nov	108.19	89.39	59.36	1,365.70	37.00	52.00	0.00	1,711.64
	Q2 Dec-Feb	106.00	93.00	58.00	1,308.55	38.00	52.00	0.00	1,655.55
	MY Sep-Aug	455.00	380.00	240.00	5,500.00	150.00	208.80	31.20	6,965.00

1/ September-August. Latest data may be preliminary or projected.
Source: Calculated by USDA, Economic Research Service.

Date run: 4/10/2019

Table 6--Wholesale corn milling product and byproduct prices, 4/11/2019

Mkt year and month 1/	Corn meal, yellow, Chicago, IL (dollars per cwt)		Corn meal, yellow, New York, NY (dollars per cwt)		Corn starch, Midwest 3/ (dollars per cwt)		Dextrose, Midwest (cents per pound)		High-fructose corn syrup (42%), Midwest (cents per pound)
	2017/18	2018/19	2017/18	2018/19	2017/18	2018/19	2017/18	2018/19	2017/18
Sep	16.01	14.97	17.68	16.64	14.41	14.35	39.00	39.25	28.25
Oct	15.94	15.24	17.61	16.91	13.87	13.69	39.00	39.25	28.25
Nov	15.78	15.09	17.45	16.76	13.90	14.14	39.00	39.25	28.25
Dec	15.69	15.17	17.35	16.90	13.75	14.38	39.00	39.25	28.25
Jan	15.75	15.14	17.42	16.81	13.81	14.59	39.25	40.00	28.25
Feb	16.09	17.49	17.76	16.66	14.08	14.74	39.25	40.00	
Mar	16.13	14.51	17.80	16.18	14.53	14.95	39.25	40.00	
Apr	16.23		17.90		14.65		39.25		
May	16.41		18.08		14.44		39.25		
Jun	15.64		17.31		14.77		39.25		
Jul	15.28		16.95		14.20		39.25		
Aug	15.35		17.02		13.78		39.25		
Mkt year 2/	15.86		17.53		14.18		39.17		

1/ September-August. Latest month is preliminary.
2/ Simple average of monthly prices for the marketing year.
3/ Bulk-industrial, unmodified.
Source: Milling and Baking News, except for corn starch which is from private industry.

Date run: 4/10/2019

Table 7--U.S. feed grain imports by selected sources (1,000 metric tons) 1/, 4/11/2019

Import and country/region		---------- 2016/17 ----------		---------- 2017/18 ----------		2018/19
		Mkt year	Jun-Jan	Mkt year	Jun-Jan	Jun-Jan
Oats	Canada	1,507	1,107	1,483	1,037	986
	Sweden	27		41	41	27
	Finland	21	21	16	16	18
	All other countries	0	0	0	0	0
	Total 2/	1,556	1,128	1,540	1,094	1,031
Malting barley	Canada	102	57	87	54	43
	All other countries	17	17	1	0	0
	Total 2/	119	73	88	55	43
Other barley 3/	Canada	89	50	109	71	37
	All other countries	2	1	1	0	0
	Total 2/	90	51	110	71	37

1/ Grain only. Market year (June-May) and market year to date.
2/ Totals may not add due to rounding.
3/ Grain for purposes other than malting, such as feed and seed use.
Source: U.S. Department of Commerce, Bureau of the Census, Foreign Trade Statistics.

Date run: 4/10/2019

Table 8--U.S. feed grain exports by selected destinations (1,000 metric tons) 1/, 4/11/2019

		---------- 2016/17 ----------		---------- 2017/18 ----------		2018/19
Export and country/region		Mkt year	Sep-Jan	Mkt year	Sep-Jan	Sep-Jan
Corn	Mexico	13,932	5,253	15,724	5,959	7,472
	Japan	13,557	4,433	13,183	3,354	5,704
	South Korea	5,601	2,422	5,736	624	2,015
	Colombia	4,733	1,887	5,083	2,104	2,410
	Peru	2,989	1,040	3,238	1,387	1,303
	China (Taiwan)	2,962	1,152	2,464	244	1,085
	Saudi Arabia	2,163	980	1,495	145	446
	Guatemala	993	398	867	243	549
	Morocco	871	399	748	88	102
	European Union-27	843	203	1,904	49	32
	Costa Rica	819	339	853	310	357
	Dominican Republic	807	364	639	59	352
	China (Mainland)	807	21	306	26	6
	Canada	704	362	1,663	571	1,057
	Sub-Saharan Africa	605	307	137	0.320	18
	El Salvador	593	227	457	102	270
	Chile	543	418	15	0.573	14
	Honduras	506	186	621	185	216
	Panama	504	239	502	235	196
	Venezuela	419	158	435	165	150
	Indonesia	351	248	147	0.867	7
	Cuba	337	163	117		
	Nicaragua	329	123	280	59	144
	Malaysia	327	108	68	10	29
	Egypt	323	211	1,332	55	530
	All other countries	1,652	843	3,921	311	668
	Total 2/	58,270	22,485	61,935	16,289	25,131
Sorghum	China (Mainland)	4,740	2,435	4,210	2,099	0.081
	Mexico	585	269	93	49	199
	Sub-Saharan Africa	467	134	363	41	150
	Japan	224	41	357	54	78
	All other countries	25	14	188	7	262
	Total 2/	6,041	2,894	5,211	2,250	689
		---------- 2016/17 ----------		---------- 2017/18 ----------		2018/19
		Mkt year	Jun-Jan	Mkt year	Jun-Jan	Jun-Jan
Barley	Canada	63	27	69	55	29
	Japan	23	12	31	25	33
	China (Taiwan)	4	2	5	3	5
	Mexico	2	1	0.542	0.427	0.317
	All other countries	3	2	6	4	5
	Total 2/	95	45	111	87	72

1/ Grain only. Market year (September-August for corn and sorghum, June-May for barley) and market year to date.
2/ Totals may not add due to rounding.
Source: U.S. Department of Commerce, Bureau of the Census, Foreign Trade Statistics.

Date run: 4/10/2019