### **Sugar and Sweeteners Outlook**



SSS-M-371 | July 17, 2019

Next release is August 17, 2019

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# U.S. and Mexico Sugar Production Raised Based on Recent Crop Data

The July *World Agricultural Supply and Demand Estimates* (WASDE) raised projected U.S. domestic sugar production for 2019/20 from June based on updated data on acreage. Imports for 2018/19 are also raised based on sugar program actions. Total use is reduced for both estimated 2018/19 and projected 2019/20 based on the current pace and trends in deliveries for the re-export program. Imports from Mexico are projected lower based on the anticipated U.S. Needs calculation by the U.S. Department of Commerce (USDOC) based on the projections from the July WASDE.

Mexico concluded its sugarcane harvest for 2018/19 with a record amount of area harvested. Sugarcane and sugar production are the second-highest totals reported; both behind the record crop of 2012/13. Exports to the United States are raised for 2018/19 due to an increase in the year's Export Limit, as announced by the USDOC, but are reduced for projected 2019/20 totals based on calculated U.S. Needs. Ending stocks forecasts for both 2018/19 and 2019/20 are based on a targeted stock level in line with history, with the remainder of supplies expected to be exported to non-U.S. destinations.

Caloric sweetener deliveries in the United States continued its downward trend in the 2018 calendar year; a trend that began in 1999. Deliveries of refined sugar declined for the second consecutive year. Deliveries of high-fructose corn syrup (HFCS) also declined, continuing a longer term trend consistent with the overall caloric sweetener market trends.

#### **U.S. Domestic Outlook**

### Increased Crop Outlook Raises U.S. Sugar Production Forecasts for 2019/20

Sugar supplies in the United States for 2019/20 are projected to be 13.978 million short tons raw value (STRV), a 95,000-STRV increase from the June WASDE report. The increase in supplies relative to the previous month, is due to a 236,000 STRV increase in beginning stocks; an increase of 121,000 STRV in domestic production; and a 262,000-STRV offsetting reduction in projected imports.

Table 1: U.S. sugar: supply and use, by fiscal year (Oct./Sept.), July 2019

Items		2018/19	2019/20		2018/19	2019/20
	2017/18	(estimate)	(forecast)	2017/18	(estimate)	(forecast)
	1,000 \$	Short tons, raw	value	1,000 Me	etric tons, ra	w value
Beginning stocks	1,876	2,008	1,761	1,702	1,822	1,598
Total production	9,293	8,947	9,260	8,430	8,117	8,400
Beet sugar	5,279	4,920	5,175	4,789	4,463	4,694
Cane sugar	4,014	4,028	4,085	3,641	3,654	3,706
Florida	1,983	2,005	2,051	1,799	1,819	1,861
Louisiana	1,862	1,875	1,900	1,689	,	1,724
Texas	169	147	134	153	134	121
Hawaii	0	0	0	0	0	0
Total imports	3,277	3,091	2,957	2,973	2,804	2,682
Tariff-rate quota imports	1,663	1,604	1,568	1,509	1,455	1,423
Other program imports	326	400	350	296	363	318
Non-program imports	1,287	1,087	1,039	1,168	986	942
Mexico	1,223	997	969	1,110	904	879
High-duty	64	90	70	58	82	64
Total supply	14,445	14,046	13,978	13,105	12,743	12,680
Total exports	170	35	35	154	32	32
Miscellaneous	82	0	0	75	0	0
Deliveries for domestic use	12,185	12,250	12,280	11,054	11,113	11,140
Transfer to sugar-containing products						
for exports under re-export program	110	100	80	100	91	73
Transfer to polyhydric alcohol, feed, other alcohol	28	25	25	25	23	23
Commodity Credit Corporation (CCC) sale for ethanol, other	0	0	0	0	0	0
Deliveries for domestic food and beverage use	12,048	12,125	12,175	10,930	11,000	11,045
Total use	12,438	12,285	12,315	11,283	11,145	11,172
Ending stocks	2,008	1,761	1,663	1,822	1,598	1,508
Private	2,008	1,761	1,663	1,822		
Commodity Credit Corporation (CCC)	0	0	0	0		0
Stocks-to-use ratio	16.14	14.34	13.50	16.14	14.34	13.50

Source: USDA, Economic Research Service, Sugar and Sweetener Outlook.

Beet sugar production for 2019/20 is projected to be 5.175 million STRV, a 21,000-STRV increase from the June report. The change is due to updated sugarbeet crop forecasts, based on the USDA's National Agricultural Statistics Service (NASS) data. This would represent a 4.9-

percent increase from the current 2018/19 estimate of 4.920 million STRV; which is unchanged from the previous month.

Table 2: Beet sugar production projection calculation, 2018/19 and 2019/20

	2014/15	2015/16	2016/17	2017/18	2018/19	2018/19	2019/20	2019/20
					June	July	June	July
Sugarbeet production (1,000 short tons) 1/	31,285	35,371	36,881	35,325	33,145	33,145	33,916	34,071
Sugarbeet shrink 2/	5.4%	6.5%	8.3%	7.3%	5.0%	5.0%	6.5%	6.5%
Sugarbeet sliced (1,000 short tons)	29,595	33,066	33,834	32,742	31,488	31,488	31,712	31,857
Sugar extraction rate from slice	14.61%	14.58%	13.72%	15.18%	14.81%	14.81%	14.58%	14.58%
Sugar from beets slice (1,000 STRV)	4,325	4,820	4,643	4,970	4,663	4,663	4,624	4,645
Sugar from molasses (1,000 STRV) 2/	341	380	352	368	368	368	368	368
Crop-year sugar production (1,000 STRV) 3/	4,667	5,201	4,995	5,338	5,031	5,031	4,992	5,013
August-September sugar production (1,000 STRV)	461	688	606	715	655	655	511	511
August-September sugar production forecast (1,000 STRV)	688	606	715	655	511	511	633	633
Sugar from imported beets (1,000 STRV) 4/					33	33	40	40
Fiscal year sugar production (1,000 STRV)	4,893	5,119	5,103	5,279	4,920	4,920	5,154	5,175

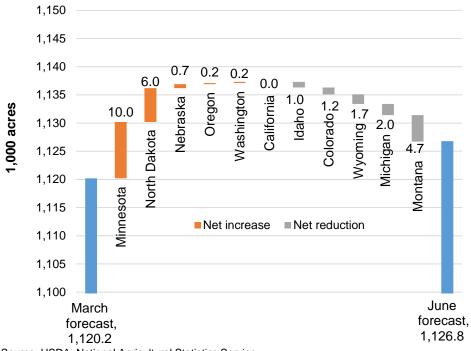
Notes: 1/ USDA, National Agricultural Statistics Service. 2/ Projections based on processor forecasts published by USDA, Farm Service Agency. 3/ August-July basis. 4/ Sugar from imported beets split out for projections only, included in total once full crop-year slice is recorded. They are incorporated into total production in historical data.

Source: USDA, Economic Research Service and World Agricultural Outlook Board.

On June 28, 2019, NASS published an updated forecast for planted sugarbeet acreage in 2019, as well as the first forecast for 2019 harvested area. The report, based on a survey of producers during the first 2 weeks of June, showed a 6.6-million-acre net increase in planted sugarbeet area compared with the first forecast published in the March *Prospective Plantings* report—1.127 million acres based on June surveys compared with the initial 1.120 million acre forecast. The forecast would represent a 1.2-percent increase from 2018/19 planted area.

This year's *Acreage* report was particularly significant given the adverse weather conditions that have occurred throughout sugarbeet-producing areas, which have altered growers' plans prior to the planting season. Several States saw a net reduction in planted area compared with the March intentions report. The biggest negative change came from Montana at 4,700 fewer acres. The planted area forecast for both Minnesota (10,000 acres) and North Dakota (6,000 acres) saw a net increase in June relative to the March *Prospective Plantings* report. Part of the net increase in planted acreage in Minnesota and North Dakota may be due to lower expected yields from the relatively late planting season in the region.

Figure 1
Planted area net changes, sugarbeets, by State, March 2019 forecast to June 2019 forecast



Source: USDA, National Agricultural Statistics Service.

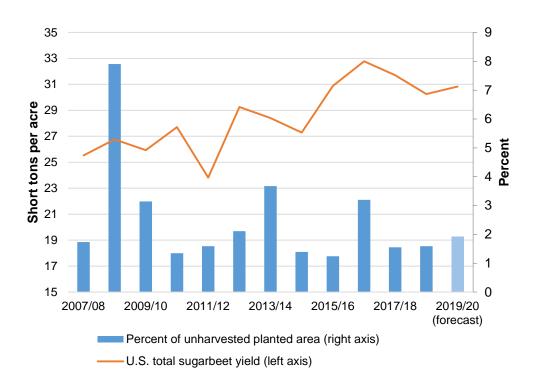
Harvested area is forecast to be 1.105 million acres based on the June NASS report—representing a 0.9-percent increase from 2018/19 harvested area. The forecast indicates that 1.9 percent of planted area is expected to go unharvested this year. That is above average, but lower than selected recent years that experienced weather- or crop-development-related issues. As recently as 2016/17, 3.2 percent of planted sugarbeet area went unharvested due to poor harvest and crop conditions. Given the challenging field conditions during the spring, unharvested planted area could be an important factor in determining the size and quality of this year's sugarbeet crop; ultimately affecting the outlook for U.S. beet sugar production. The report provided a snapshot of production expectations during the early-June production window. Important crop development stages during the summer, pest management, and harvest conditions will also contribute to growers' decisions regarding unharvested area.

Table 3: Sugarbeet harvested area, 2015/16 to 2019/20, July 2019

State	2015/16	2016/17	2017/18	2018/19	2019/20	Annual Change
					(forecast)	
			1,000 acres			Percent
Minnesota	435.0	417.0	409.0	408.0	413.0	1.2
North Dakota	206.0	203.0	212.0	199.0	205.0	3.0
Idaho	172.0	170.0	166.0	163.0	166.0	1.8
Michigan	151.0	149.0	143.0	147.0	144.0	-2.0
Nebraska	46.8	47.2	45.2	44.1	43.7	-0.9
Montana	43.7	45.3	42.7	42.4	41.9	-1.2
Wyoming	31.2	30.0	31.6	30.7	30.8	0.3
Colorado	27.3	27.6	29.0	25.5	25.0	-2.0
Washington	N/A	1.9	1.8	1.8	2.0	11.1
Oregon	7.7	10.2	9.1	9.3	9.5	2.2
Washington	N/A	1.9	1.8	1.8	2.0	11.1
U.S. Total	1,145.4	1,126.2	1,113.8	1,095.4	1,105.1	0.9

Source: USDA, National Agricultural Statistics Service.

Figure 2
Unharvested sugarbeet area and yields, 2007/08 to 2019/20



Source: USDA, National Agricultural Statistics Service.

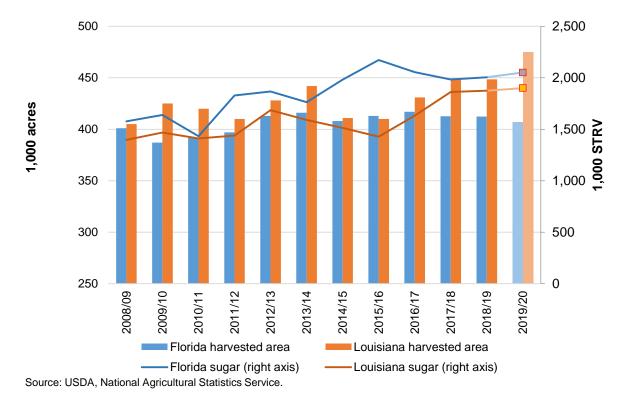
### Cane Sugar Production Raised Due to Larger Harvested Area Forecast for 2019/20

The outlook for cane sugar production is raised for 2019/20, due to an improved outlook for U.S. sugarcane production, particularly in Louisiana. Cane sugar production for 2019/20 is projected to total 4.085 million STRV in the July WASDE—a 100,000-STRV increase from the previous month. This would represent a 1.4-percent increase from current estimates for 2018/19.

The June NASS *Acreage* report published the first estimates for harvested sugarcane area in the United States for 2019. U.S. sugarcane-producing States are expected to harvest 916,400 acres in 2019/20, a 1.9-percent increase from the previous year. This total includes both sugarcane harvested for sugar production and sugarcane dedicated for seed stock. If realized, it would be the highest area total since 2005/06, which saw 921,900 acres harvested.

Florida and Louisiana are expected to be the two largest sugarcane-producing States again in 2019/20. Harvested area in Louisiana is forecast at 475,000 acres, a 6.9-percent increase from the previous year. The forecast indicates the continuation of the upward trend in area dedicated to sugarcane production in the State. The current forecast would be the largest acreage mark for the State since 2003/04. Reports from the local industry and regional experts indicate that the growth has been facilitated by new varieties of sugarcane, which have allowed for more production in the northern frontier of the traditional growing-region. Cane sugar production in the State is raised 100,000 STRV from the previous month's forecast to 1.900 million STRV. The increase is in line with the raised production for sugarcane in the State, and is consistent with processors' forecasts.

Figure 3
Sugarcane harvested area and sugar production, Florida and Louisiana, 2008/09 to 2019/20



Florida is currently forecast to harvest 407,000 acres of sugarcane—which would represent a 1.3-percent decline from the previous crop. Sugarcane area in Florida has remained relatively stable for more than a decade. The current sugarcane production forecast is about equal to the 10-year average for Florida.

Cane sugar production in Florida for 2019/20 is unchanged at 2.051 million STRV. Sugar production in Florida is more dependent upon yield and recovery rate conditions that are impacted by weather during the growth development periods of the summer and harvest conditions of the fall. The current projection reflects crops that are in line with recent averages for yield and sucrose recovery.

### Sugar Program Announcements Adjust Outlook for Imports in 2018/19 and 2019/20

Total sugar imports are estimated to 3.091 million STRV in 2018/19, a 216,000-STRV increase from the previous month. The increase is largely due to policy-related actions by both the USDA and the U.S. Trade Representative (USTR). On June 25, 2019, the USTR announced a

reallocation of the WTO raw sugar tariff-rate quota (TRQ). This action distributed unused quota allocation from countries that were willing to surrender unfilled quota allotments to quota holders that indicated they would have additional raw sugar for export to the United States for the remainder of 2018/19. As a result, estimated imports under quota programs for 2018/19 are estimated at 1.604 million STRV, a 66,000-STRV increase from the June WASDE. The current estimate is based on a forecasted shortfall of 55,000 STRV due to the reallocation, down from the previous month's 121,000 STRV.

Additionally, on June 26, 2019, at the request of the USDA, the U.S. Department of Commerce (USDOC) announced an increase in Mexico's 2018/19 Export Limit of 100,000 STRV, as provided by the Suspension Agreements. As a result, imports from Mexico are estimated at 997,000 STRV, an increase of 100,000 STRV—or the entirety of the raised limit. The increase only pertains to raw sugar, however. The amount of refined sugar—as defined by the agreement—allowed to enter the United States in 2018/19 is still 30 percent of the original Export Limit amount. As a result, in addition to product specification, such as polarity, the additional imports from Mexico will have to come by ocean vessel and be "free-flowing" (meaning not in a bag, tote, or other packaging).

Unrelated to the program announcements, estimated imports under the re-export program are raised 50,000-STRV to 400,000 STRV based on the pace of entries under the program thus far in the year.

Imports for 2019/20 are projected to be 2.959 million STRV, a 260,000-STRV reduction from the June report. Imports under quota programs are projected at 1.568 million STRV, an increase of 187,000 STRV from the previous month. The increase is entirely due to USDA's announcement of the additional quantity in the Specialty Sugar Quantity import quota of 187,000 STRV, which was announced by the USDA on June 26, 2019. The projected shortfall for the WTO raw sugar TRQ remains unchanged at 99,000 STRV.

Imports from Mexico are projected total 969,000 STRV, a 449,000-STRV reduction from the June report. The projection is consistent with the terms of the Suspension Agreements and reflect the anticipated U.S. Needs calculation by the USDOC, which would be the first action USDOC will take with regard to the 2019/20 Export Limit.

High-tier imports are unchanged from previous reports for both 2018/19 and 2019/20 at 90,000 STRV and 70,000 STRV, respectively. Sugar imports entering the United States at full duty rates continue to come in at a higher pace relative to the past 8 to 10 years, as they have since the summer of 2018, due to price differentials between U.S. and world sugar prices; regional

price differentials within the United States; and high demand likely for high-value, niche market sugar that can command a price premium.

### U.S. Sugar Deliveries for Food and Beverage Use Remain Unchanged for 2018/19 and 2019/20

Total sugar use in the United States is estimated to be 12.285 million STRV for 2018/19—a 20,000 STRV reduction from the previous month's estimate. Total use for 2019/20 is projected to be 12.315 million, a reduction of 40,000 STRV from the previous report.

The changes are the result of lowered expectations for deliveries for the re-export program; with the reduction for 2018/19 based on the pace-to-date of deliveries through June and the reduction for 2019/20 due to the continued downward trend seen in recent years. This trend is not the result of lowered participation in the program, but rather, the result of differing behaviors by participating license holders in how to utilize the program. As explained in earlier reports (link), credits for importers of raw sugar can be generated by: exporting refined sugar; delivering sugar for sugar-containing products (SCP) that are exported; delivering to producers of polyhydric alcohol; or by obtaining credits from the balance of SCP-exporters and polyhydric producers. In recent years, transfers of credits between manufacturers and refiners have been more common than delivery of physical sugar. As a result, physical sugar delivered under the re-export program has been lowered; a trend that is expected to carry into 2019/20.

Deliveries for food and beverage use is estimated to be 12.125 million STRV for 2018/19 and projected at 12.175 million STRV for 2019/20—both figures unchanged from the previous month. The current forecasts represent a 0.6-percent and 0.4-percent annual increase, respectively. This follows the general trend seen in recent years of continued annual growth, although at a lower rate than seen in the U.S. market as recently as 5 to 10 years ago. The subsequent special article in this report looks at important market drivers for this trend and change in growth rates.

Through May, the Farm Service Agency's (FSA) *Sweetener Market Data* shows that deliveries during 2018/19 for food and beverage use is currently 1.1 percent above the same period the year prior. Sector-level trends have remained consistent throughout the year, although the magnitudes have settled as the year has progressed. Sugarbeet processors' deliveries have been down relative to the record-levels seen during 2016/17 and 2017/18. Cane refiners' deliveries are closer to the levels seen in 2015/16, compared with the two below-trend years in 2016/17 and 2017/18. Non-reporter deliveries are substantially larger compared with the

previous year, although this segment of the market is relatively small and volatile on a monthly basis, which temper the expectations that this level of growth will sustain itself for the remainder of the year.

Table 5: Food and beverage deliveries, 2014/15 to 2018/19, October through May

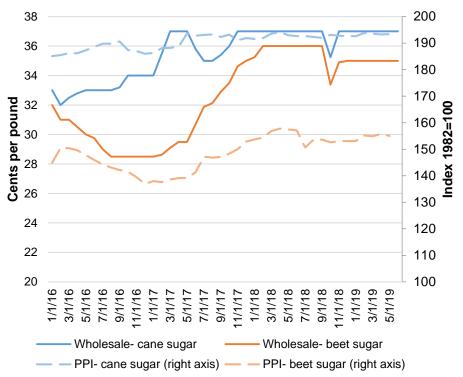
	2014/15	2015/16	2016/17	2017/18	2018/19	Annual change
			1,000 STRV			Percent
Beet sugar processors	3,120	2,953	3,519	3,487	3,320	-4.8
Cane sugar refiners	4,030	4,221	3,987	3,964	4,142	4.5
Total reporters	7,150	7,174	7,506	7,451	7,463	0.2
Non-reporter, direct consumption	378	557	505	438	510	16.5
Total deliveries	7,528	7,731	8,011	7,888	7,973	1.1
Final fiscal year deliveries 1/	11,921	11,881	12,102	12,048	12,125	0.6

<sup>1/</sup> Latest WASDE estimate for 2018/19. Source: USDA, Farm Service Agency.

## Refined Sugar Prices Remain Steady, U.S. Raw Sugar Price Levels Fall Slightly Since 2018/19 Program Announcements

Wholesale spot market refined sugar prices for 2018/19 have remained unchanged since December 2018. Weekly prices in July have also remained unchanged after the USDA and USTR announcements in late June regarding import programs for the 2018/19 fiscal year. According to media and industry reports, negotiations and contract pricing for 2019/20 refined sugar has been at a lower level than the current year. Some of this may be due to market fundamentals, but some of the pricing is due to seasonal pricing patterns and marketing strategies. The short-lived dip in refined sugar prices at the beginning of 2018/19 was likely due to this type of marketing strategy for early-season marketing. Poor weather conditions during the harvest of sugarbeets quickly pushed refined prices up, as the market adjusted for the expectation of lower domestic supplies available on the market.

Figure 4
Refined sugar prices, wholesale and Producer Price Indices, monthly



Source: USDA, Economic Research Service.

Producer Price Indices (PPI), published by the Bureau of Labor Statistics, have shown a general trend upward for both refined cane and refined beet sugar—each showing a 1.4 percent increase in May 2019 compared with levels at the end of the 2017/18 fiscal year in September 2018. The PPI trends also reveal the seasonal pattern in beet sugar prices—with prices falling slightly during the summer of 2018, prior to the beginning of the 2018/19 crop year. They have then steadily trended upward as the current crop's marketing year went along.

Subsequent to the announcement, U.S. raw sugar futures market prices declined to a slightly lower level; given the increased supply available after the changes to the WTO raw sugar TRQ and increased access for Mexico exporters for the remainder of the fiscal year. Based on prices of futures contracts on July 1, however, implied refiners' margins still appear to be comparable to levels seen since the beginning of the 2017/18 fiscal year. Pricing for refined cane sugar differs based on region, however. Refiners on the West coast and Northeast are able to market at a premium relative to refineries in the Southeast and Gulf regions—a disparity that affects the sector's overall profitability. Nonetheless, price and margin levels are much improved from

2016/17 when raw sugar supplies were relatively tight and price levels resulted in tight margins for cane refiners.

25 60 20 50 Cents per pound Cents per pound 15 10 20 5 10 0 0 1/1/2010 1/1/2011 1/1/2012 1/1/2013 1/1/2014 Refiners, mardin adjasted to Letining loss (Light axis) 1/1/2020 1/1/2008 1/1/2009 Raw sugar nearby futures price (left axis) M&B Refined refined cane spot price (left axis( – – Futures Refiners' margin, adjusted for refining loss (right axis)

Figure 5 U.S. refiner margins, monthly, January 2008 to September 2020

Source: U.S. Department of Agriculture, Economic Research Service.

#### **Mexico Outlook**

Large Sugarcane Harvest Leads To Raised Sugar Production Forecasts for 2018/19 and 2019/20

Mexico total supplies for 2018/19 are raised 26,000 metric tons, actual value (MT) in the July WASDE, due to higher production. The 2018/19 sugarcane harvest campaign concluded, with the last Mexican processor ending its season on June 28, 2019. Preliminary final sugar production for the year totaled 6.424 million MT, a 6.9-percent increase from the previous year.

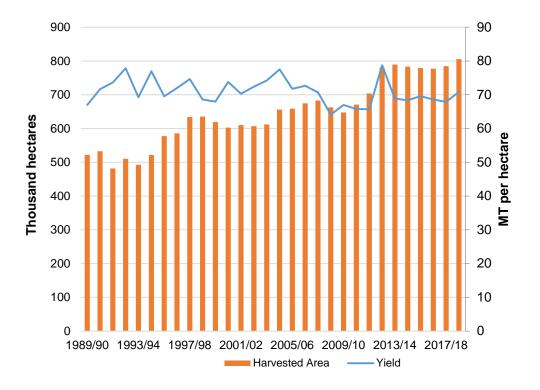
Mexico's 2018/19 crop concluded as one of the country's most productive and sizable. Mexican growers produced 57.037 million metric tons of sugarcane on 806,000 hectares of harvested area. This was a record harvested area total, and the first time Mexico sugarcane area exceeded 800,000 hectares.

Table 5: Mexico sugar supply and use, 2017/18 - 2018/19 and projected 2019/20, July 2019

Items	2017/18	2018/19 (estimate)	2019/20 (forecast)
	1,	,000 metric tons, actual weight	
Beginning stocks	1,002	1,395	995
Production	6,010	6,425	6,248
Imports	220	70	70
Imports for consumption	132	20	20
Imports for sugar-containing product exports, IMMEX 1/, other	88	50	50
Total supply	7,232	7,890	7,313
Disappearance			
Human consumption	4,228	4,236	4,297
For sugar-containing product exports (IMMEX)	482	480	480
Other deliveries and end-of-year statistical adjustment	29	0	0
Total	4,739	4,716	4,777
Exports	1,099	2,179	1,542
Exports to the United States & Puerto Rico	1,047	853	829
Exports to other countries	52	1,326	713
Total use	5,838	6,895	6,318
Ending stocks	1,395	995	995
		1,000 metric tons, raw value	
Beginning stocks	1,062	1,478	1,055
Production	6,370	6,811	6,623
Imports	234	74	74
Imports for consumption	140	21	21
Imports for sugar-containing product exports (IMMEX)	93	53	53
Total supply	7,666	8,363	7,752
Disappearance			
Human consumption	4,482	4,490	4,554
For sugar-containing product exports (IMMEX)	510	509	509
Other deliveries and end-of-year statistical adjustment	31	0	0
Total	5,023	4,999	5,063
Exports	1,165	2,310	1.634
Exports to the United States & Puerto Rico	1,110	904	879
Exports to other countries	55	1,405	756
Total use	6,188	7,309	6,698
Ending stocks	1,478	1,055	1,054
Stocks-to-human consumption (percent)	33.0	23.5	23.2
Stocks-to-use (percent)	23.9	14.4	15.7
High-fructose corn syrup (HFCS) consumption (dry weight)	1,593	1,520	1,520
1/IMMEV - Industria Manufacturora Maguiladora y do Sonyicios do Exportación	,	,- ,-	,

1/ IMMEX = Industria Manufacturera, Maquiladora y de Servicios de Exportación.
Source: USDA, World Agricultural Supply and Demand Estimates and Economic Research Service, Sugar and Sweeteners Outlook; Conadesuca.

Figure 6
Mexico sugarcane harvested area and yield, 1989/90 to 2018/19

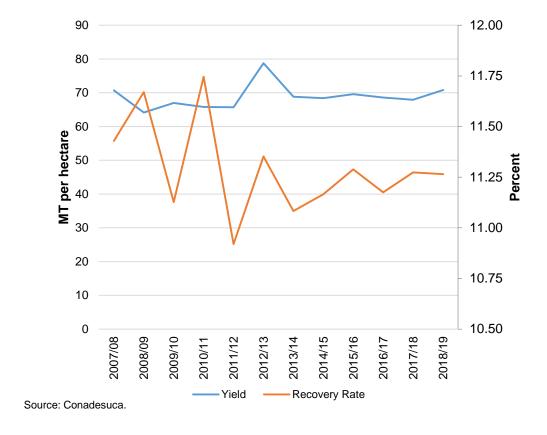


Source: USDA, Economic Research Service.

Favorable growing and harvesting conditions resulted in sugarcane yields totaling 70.8 metric tons per hectare; the second-highest yielding crop of the past 10 years behind the record-setting crop of 2012/13 that yielded 78.7 metric tons per hectare. The sugarcane production total is also the second-highest crop behind 2012/13, which totaled 61.439 million metric tons. The average recovery rates by processors finished at 11.27 percent. This is well above the 5-year average. Recovery rates similar to 2018/19 were much more likely prior to 2012/13, when the Mexican sugarcane industry produced on a small base of land, but were also much more variable from year-to-year.

Figure 7

Mexico sugarcane yield and industrial recovery rate, 2007/08 to 2018/19



Production for 2019/20 is projected to total 6.248 million MT, a 65,000-MT increase from the June projection. The projection is based on the same harvested area base as 2018/19, as well as a national yield and recovery rate in line with 5-year averages. There currently is no significant trend in yields and recovery rates, looking at recent historical results. Sugarcane production still seems highly correlated with weather and harvest conditions. The 5-year average estimates are consistent with an assumption of normal weather conditions for the remainder of the spring and autumn growing seasons, as well as the winter and spring harvest period. Conadesuca typically releases its first estimate for production in the fall prior to the beginning of the harvest. That information could provide additional information on the harvested area intentions of growers.

Table 6: Mexico sugar produciton, first estimate and final production report, 2014/15 to 2019/20 (forecast)

		2014/15	2015/16	2016/17	2017/18	2018/19	2019/2020
							(forecast)
Harvested Area (hectares)	First Estimate	816,505	801,745	808,218	801,907	822,935	
	Final	783,416	778,930	777,078	784,661	805,511	805,511
Yield (MT/hectare)	First Estimate	67.36	67.70	69.79	69.38	68.80	
	Final	68.42	69.57	68.60	67.89	70.81	69.06
Industrial Passyon, (paraent)	First Estimate	11.18	11.16	11.29	11.11	11.20	
Industrial Recovery (percent)	Final	11.16	11.29	11.18	11.27	11.27	11.23
Production (MT, actual value)	First Estimate	6,151,372	6,056,025	6,370,922	6,182,273	6,358,193	
Froduction (ivi1, actual value)	Final	5,984,903	6,117,048	5,957,170	6,009,237	6,425,332	6,248,113

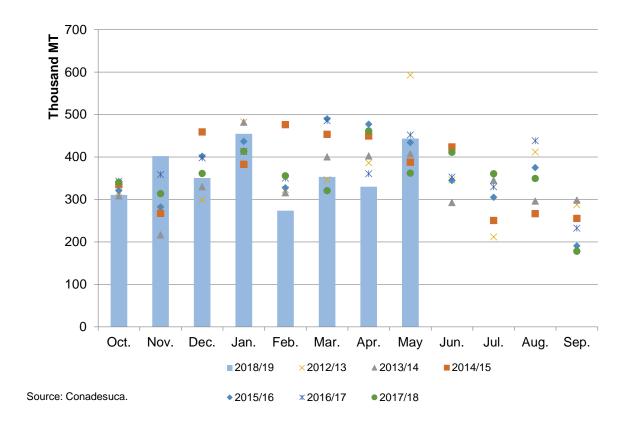
Source: Conadesuca; USDA, World Agricultural Outlook Board.

#### Domestic Delivery Forecasts Remain Unchanged, Exports Adjusted Based on Suspension Agreement Terms and Targeted Ending Stocks

Domestic deliveries in Mexico remain unchanged for both 2018/19 estimates and 2019/20 projections, relative to the June WASDE report. Domestic deliveries for food and beverage use in 2018/19 are estimated at 4.236 million MT. Through May, Conadesuca reports that domestic deliveries for food and beverage use is 0.4-percent behind the previous year. High-fructose corn syrup (HFCS) deliveries are also down through May, by 3.4 percent. So overall sweetener consumption is 1.2-percent lower than 2017/19 during this period. Sugar deliveries were relatively weak in recent months. Deliveries in May picked up a bit, however.

Figure 8

Mexican sugar consumption October to December, monthly



Projected domestic deliveries for 2019/20 are at 4.296 million MT, which would be a 1.4-percent increase from the current estimate for 2018/19. The projection is based on per capita sweetener consumption remaining constant and also based on the total volume of HFCS deliveries remaining flat year over year.

Mexico exports are estimated to be 2.179 million MT for 2018/19, a 26,000-MT increase from the June report and consistent with the production increase. Shipments to the United States are estimated to total 853,000 MT, an 86,000-MT increase from the previous month due to the increase of the Export Limit for 2018/19 by USDOC. Exports to non-U.S. destinations are estimated at 1.326 million, a 60,000-MT reduction. The estimate is based on Mexico exporting enough supplies to keep domestic ending stocks at a historical target of 10 weeks of total domestic deliveries.

Exports for 2019/20 are projected to total 1.542 million MT, a 65,000-MT increase from the previous month, following the same basis as 2018/19 estimates. Shipments to the United States are projected to be 829,000 MT, based on the terms of the Suspension Agreement and the anticipated calculation of U.S. Needs by USDOC based on the July WASDE projections for the

U.S. sugar market. Exports to other countries are projected at 713,000 MT—a 450,000 MT increase from the June report.

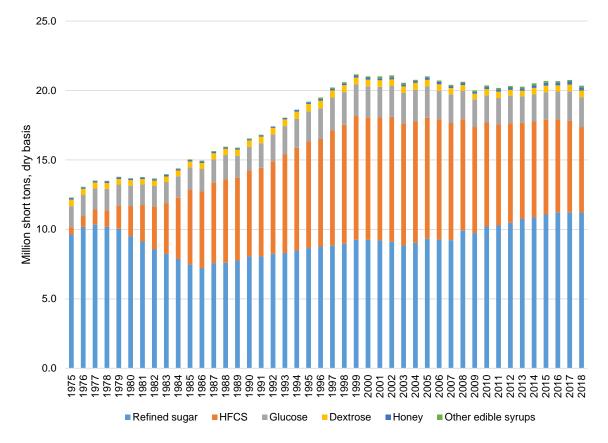
Ending stocks for 2019/20 are projected to total 995,000 MT, which would result in a 23.2 percent stocks-to-consumption ratio—in line with historical levels.

#### **Special Article: Caloric Sweetener Deliveries**

#### Caloric Sweetener Deliveries Decline in 2018, Per Capita Deliveries of Refined Sugar Fall for Second-Straight Year

In 2018, caloric sweetener deliveries totaled 20.343 million short tons, dry basis (tons), a 2.0-percent decrease from the 2017 total of 20.758 million tons. The 2.0-percent annual decline represents a relatively large annual change compared with recent years; the largest since a 3.0-percent decline in 2009. Caloric sweetener deliveries have remained fairly flat since peaking in 1999, however.

Figure 9
Total U.S. caloric sweetener deliveries for food and beverage use, calendar year, 1975 to 2018



Source: USDA, Economic Research Service

On a per capita basis, total caloric sweetener deliveries fell by 2.6 percent in 2018. Total per capita caloric sweetener deliveries were 124.4 pounds, dry basis (pounds) in 2018 compared with 127.7 pounds the previous year. This also continues the general trend seen since 1999, as

well as representing the largest annual change since 2009. Most of the change is driven by a 7.0-percent decline in per capita high-fructose corn syrup (HFCS) deliveries. At 37.6 pounds in 2018, per capita HFCS deliveries are at their lowest level since 1984. Per capita deliveries of refined sugar also fell from 69.1 pounds in 2017 to 68.5 in 2018. This marked the second-consecutive year of annual declines, diverging from the increasing trend seen from 2008 to 2016. Per capita increases were seen in relatively small components of the overall complex, as follows: glucose (0.3 percent), honey (0.2 percent), and edible syrups (4.0 percent)—while dextrose deliveries decreased from the previous year (0.6 percent).

Pounds, dry basis ■Refined sugar ■HFCS ■Glucose ■Dextrose ■Honey ■Other edible syrups

Figure 10

Per capita U.S. caloric sweetener deliveries for food and beverage use, calendar year, 1975 to 2018

Source: USDA, Economic Research Service.

One of the key features of caloric sweetener markets over the past few decades has been the relationship between refined sugar and HFCS deliveries. After gaining a sizable market share from the 1970s to the 1990s—much of which at the expense of refined sugar markets—the overall decline in per capita caloric sweetener deliveries at the beginning of the turn of the century is also primarily attributed to HFCS. Per capita refined sugar deliveries began trending upward beginning around 2008, reclaiming market share. This trend corresponded with the implementation of NAFTA's sweetener market provisions that allowed sugar imports from

Mexico to enter the United States duty-free, increasing the supplies of sugar available during that time. The most recent data suggest that the per capita gains for the sugar market may no longer be sustainable.

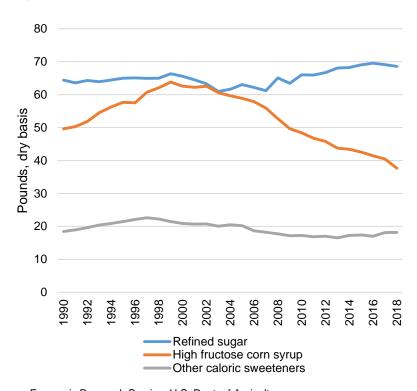


Figure 11
Per capita U.S. caloric sweetener deliveries for food and beverage use, calendar year, 1990 to 2018

 $Source: Economic \ Research \ Service, \ U.S. \ Dept. \ of \ Agriculture.$ 

Longer term trends show the dynamics between refined sugar and HFCS demand. Looking at a longer term horizon—particularly the 10- and 15-year window—refined sugar deliveries have outpaced population growth and outperformed the overall sweetener market. In more recent years, average growth rates for total deliveries of sugar have fallen and now lag behind population growth; hence, the reduction in per capita deliveries. Even the short-term growth rates for sugar remain positive, unlike HFCS and overall sweetener markets. The slowing trend in the broader market, however, seems to be a decelerating factor for sugar deliveries in recent years.

Table 7: Average annual growth rates for total caloric sweeteners deliveries, calendar year

_	3-year	10-year	15-year	20-year
		Per		
Refined sugar	0.40	1.23	1.58	1.12
HFCS	-3.43	-2.64	-2.38	-1.65
Total caloric sweetener	-0.57	-0.14	-0.07	-0.06
U.S. population	0.66	0.72	0.80	0.85

Source: USDA, Economic Research Service.

#### **Suggested Citation**

McConnell, Michael J. and David Olson, *Sugar and Sweeteners Outlook*, SSS-M-371, U.S. Department of Agriculture, Economic Research Service, July 17, 2019