



Weekly Outlook: Anticipating the March 1 Corn Stocks Estimate

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March 6, 2017

farmdoc daily (7):41

Recommended citation format: Hubbs, T. "[Weekly Outlook: Anticipating the March 1 Corn Stocks Estimate.](#)" *farmdoc daily* (7):41, Department of Agricultural and Consumer Economics, University of Illinois at Urbana-Champaign March 6, 2017.

Permalink: <http://farmdocdaily.illinois.edu/2017/03/anticipating-march-1-corn-stocks-estimate.html>

USDA's release of the [Quarterly Grain Stocks report](#) on March 31 will provide an estimate of corn stocks in storage as of March 1, 2017. This estimate provides the ability to calculate the magnitude of feed and residual use of corn during the second quarter of the marketing year. The calculation offers the basis for evaluating the probable feed and residual use during the entire marketing year and imparts information on the potential size of ending stocks. While the planting intentions estimates released on the same day in the [Prospective Plantings report](#) will likely eclipse the information provided in the Quarterly Grain Stocks report, the estimated corn stocks have important implications for the current marketing year.

The supply of corn available from December 2016 - February 2017 is the base for estimating March 1 stocks. Corn stocks at the beginning of the quarter were estimated at 12.383 billion bushels in the December Grain Stocks report. Currently, the Census Bureau estimates for corn imports are only available through December. In the first quarter of the marketing year, corn imports totaled 11.8 million bushels. Imports for the second quarter might have been around 14 million bushels. When imports are combined with the beginning stocks, total available supply for the second quarter comes in at 12.397 billion bushels.

An estimate of corn exports for the second quarter is based on the cumulative weekly export inspections estimate available for the entire quarter. Cumulative marketing year export inspections through February totaled approximately 975 million bushels. During the first four months of the marketing year, total Census Bureau corn exports were greater than cumulative export inspections by 70 million bushels. Assuming the margin is maintained through February, corn exports during the first half of the year equaled 1.04 billion bushels. Since exports in the first quarter totaled 551 million bushels, the estimate for second quarter corn exports equals 493 million bushels.

The [Grain Crushing and Co-Products Production report](#) released on March 1 estimated corn used for ethanol and co-product production during December 2016 and January 2017 at 950 million bushels. Weekly estimates of ethanol production provided by the Energy Information Administration indicates ethanol production increased by 6.1 percent in February 2017 from the preceding year. By calculating the amount of corn used to produce ethanol from these February numbers, corn used for ethanol production in February was approximately 436 million bushels. Total use for the quarter is estimated at 1.386 million bushels.

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Corn use to produce other food and industrial products during the 2016-17 marketing year is projected at 1.44 billion bushels by the USDA. Using historical corn use data, typically around 49 percent of the final marketing year food and industrial products use occurs in the first half of the marketing year. If this historical pattern holds and the USDA projection is correct, corn use for the first half of the marketing year totaled 708 million bushels. Corn use during the first quarter equaled 347 million bushels which set the second quarter use estimate at 361 million bushels.

The current USDA projection for feed and residual use sits at 5.6 billion bushels. In January, the projection was lowered by 50 million bushels due to a smaller than expected corn crop, increased corn use for ethanol, and the disappearance associated with the December 1 stocks report. The historical pattern of feed and residual use in corn may provide some indication of the second quarter use. For the five previous marketing years, use during the first half of the marketing year ranged from 69.5 – 75.4 percent with an average of 72 percent. Second quarter feed and residual use ranged from 25- 34 percent of the total use over this time span. For this analysis, the 72 percent average during the first half of the previous five marketing years is used to calculate expected feed and residual use during the second quarter. If the USDA projection is correct, feed and residual use during the first half of the 2016-17 marketing year totaled 4.057 billion bushels. Feed and residual use equaled 2.275 billion bushels in the first quarter. Therefore, the second quarter estimate totals 1.782 billion bushels.

By adding the estimates for exports and domestic uses, the total use of corn during the second quarter is 4.022 billion bushels. The total use estimate for the second quarter places March 1 corn stocks at 8.37 billion bushels. At this level, March 1 stocks come in 556 million bushels larger than the estimated 2016 March 1 corn stocks.

While it can be difficult to anticipate the quarterly stocks estimate in corn, it provides a basis for the magnitude of stocks that is considered neutral for corn prices. A corn stocks estimate that supports the USDA projection of 5.6 billion bushels of feed and residual use during the 2016-17 marketing year is neutral. An estimate of March 1 corn stocks that deviates significantly from market expectations will trigger a price reaction. This analysis indicates an estimate near 8.37 billion bushels should not alter expectations that feed and residual use is on track to meet the marketing year projection.

References

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