

In March 2017, the U.S. Grains Council released its sixth annual *Corn Export Cargo Quality Report*. This report showed that the aggregate averages for the 2016/2017 export cargo samples were rated at U.S. grade No. 2 or better on all grade attributes. Notable U.S. Aggregate quality attributes found in the survey include:

EXPORT CARGO GRADE FACTORS AND MOISTURE

- Higher average test weight (57.4 pounds per bushel or 73.8 kilograms per hectoliter) than 2015/2016. About 97 percent of the samples were above the limit for U.S. No. 1 grade corn, indicating overall good quality.
- Slightly lower average broken corn and foreign material (BCFM) (2.9 percent) than 2015/2016 but the same as 5YA¹. About 63 percent of the samples were below the limit for U.S. No. 2 grade. BCFM predictably increased, from 0.7 percent to 2.9 percent, as the crop moved from harvest through the market channel to export.
- Higher average total damage (2.7 percent) than 2015/2016. However, the majority (96.7 percent) of the samples were still below the limit for U.S. No. 2 grade.
- Negligible observed heat damage, indicating good management of drying and storage of corn throughout the market channel.
- Slightly lower average moisture (14.3 percent) than 2015/2016 and 5YA.

EXPORT CARGO CHEMICAL COMPOSITION

- Higher average protein concentration (8.6 percent dry basis) than 2015/2016, but the same as 2014/2015, 5YA, and the 2016 harvest average.
- Lower average starch concentration (72.4 percent dry basis) than 2015/2016, 2014/2015, and 5YA.
- Higher average oil concentration (4.0 percent dry basis) than 2015/2016, 2014/2015, and 5YA.

EXPORT CARGO PHYSICAL FACTORS

- Lower average stress cracks (5 percent) than 2015/2016, 2014/2015, and 5YA. The majority of export samples (94.4%) had less than 15% stress cracks, which should result in low rates of breakage during handling.
- Lower average stress crack index (11.6) than 2015/2016, 2014/2015, and 5YA. The low levels are likely due to excellent field dry down conditions at harvest and little artificial drying needed across the market channel.

¹5YA represents the simple average of the quality factor's averages from the 2011/2012, 2012/2013, 2013/2014, 2014/2015, and 2015/2016 Corn Export Cargo Quality Reports.



- Higher average 100-kernel weight (35.26 grams) than 2015/2016, but slightly lower than 5YA.
- Same average kernel volume (0.27 cubic centimeters) as 2015/2016 and 5YA.
- Higher average kernel true density (1.285 grams per cubic centimeter) than 2015/2016, but similar to 5YA.
- Lower average percent of whole kernels (88.2 percent) than 2015/2016, but close to 5YA.
- Lower average horneous (hard) endosperm (79 percent) than 2015/2016, 2014/2015, and 5YA, indicating potentially softer corn in 2016/2017 than in previous years.

EXPORT CARGO MYCOTOXINS

- All the export samples tested had results below the U.S. Food and Drug Administration (FDA) action level (20 parts per billion) for aflatoxins. A lower proportion of the export samples had no detectable levels of aflatoxins than in 2015/2016 and 2014/2015.
- All the export samples tested had results below the 5 ppm FDA advisory level for DON (deoxynivalenol or vomitoxin), the same as in 2015/2016 and 2014/2015. However, there were more samples showing levels of DON above the U.S. Department of Agriculture (USDA) Federal Grain Inspection Service (FGIS) "Lower Conformance Level" in 2016/2017 than in 2015/2016 and 2014/2015.

VIEW THE FULL REPORT ONLINE

The full report provides more details on these results and the tests used to assess the samples. Please visit www.grains.org to view the report in its entirety.

ABOUT THE U.S. GRAINS COUNCIL

The U.S. Grains Council is a private, non-profit partnership of farmers and agribusinesses committed to building and expanding international markets for U.S. sorghum, barley, corn, and their co-products, including ethanol. The Council is headquartered in Washington, D.C., and has 10 international offices that oversee programs in more than 50 countries.