What a Difference the Weather Makes
December 10, 2015

A few weeks ago a cool and wet long range forecast meant that large volumes of wet grains would be coming out of the field, at highly variable quality. Well, that did not happen. Warm temperatures and low dewpoints (dry air) since Labor Day have completely changed the crop quality picture. While there are still instances of wet grain and areas with delayed harvest from early September rains, overall the Iowa corn and soybean crops have had a marked reversal from what we anticipated.

The rapid field drydown driven by low humidity air also increased corn test weights, a key measure of future storability. Much of 2015 corn will have to be stored a year or more.

The emphasis now should be on long term storage preparation. The most important action right at harvest is to reduce the temperatures as much as possible. We have had low dewpoints, in the 30s and 40s, which will allow aeration to take grain temperatures down quickly, even if the grain is wet. Do not hold wet grain without aeration; this will use much of the storage life very quickly.

If grain is cold, it is not necessary to overdry below 15% (corn) or 13% (soybeans) in the fall. Routine aeration of long term stored grain may eventually overdry the grain, but leave maximum revenue options open as long as possible.

Diseases and the very tall stalks created by this year’s growing season are creating trashier corn than normal. Tall and fragile stalks are putting large amounts of plant material through the combine. Trash in this case is likely to be cobs and plant pieces rather than fines from broken corn. Careful combine adjustments between hybrids will help to control these materials but may not be capable of complete removal.

Fines should be reduced by taking out the center core after filling. Because typical grain cleaners in farm handling systems are designed to remove more fines than cobs, leaves, and stalk parts, elevators and users will likely have to remove these materials, if needed.

Grain handling emphasis should now be on protecting the storage life of what has turned out to be a much more storable crop than expected before harvest.

Contact:
Dr. Charles R. Hurburgh, Jr.
Professor, Agricultural and Biosystems Engineering
3167 NSRIC, Iowa State University, Ames, Iowa 50011
515-294-8629, tatry@iastate.edu