

# Iowa Farm Outlook

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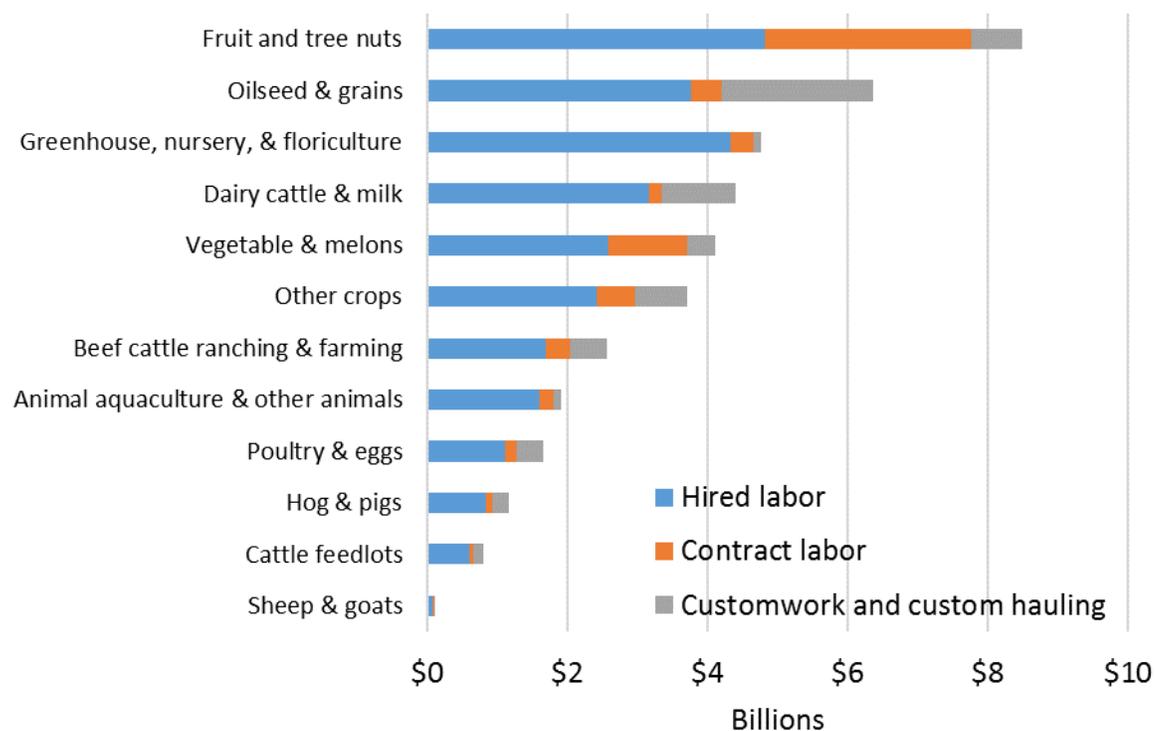
## Trends in the Number Farm Workers and Wage Rates

It's no secret that farming is typically more than a one-person job, especially on large-scale operations and/or operations that include multiple enterprises. As a result, many farm operators rely on hired agricultural workers, but some are finding it more challenging to find employees due to a widespread tight supply of farm labor.

The robust demand for labor in the farm sector is against a backdrop of increasingly threatening macroeconomic and demographic trends such as a slowing population growth in non-metro areas, an aging rural workforce, and a declining flow of immigrants into rural labor markets. The most immediate challenge to farm operators has been the strengthening of the broader U.S. labor market. According to the U.S. Bureau of Labor Statistics, the national unemployment rate fell from 9.6% in 2010 to 3.7% in October 2018. This low rate of national unemployment still understates the tight labor supply in most of the largest agricultural production states where unemployment is near or below three percent. Iowa's unemployment rate was 2.4% in October 2018.

In 2012, U.S. farms spent almost \$27 billion on hired labor according to the Census of Agriculture. The labor expense was even greater, at \$40 billion when contract and custom labor was included (Figure 1).

**Figure 1. Total Farm Labor Expenses by North American Industry Classification, 2012**

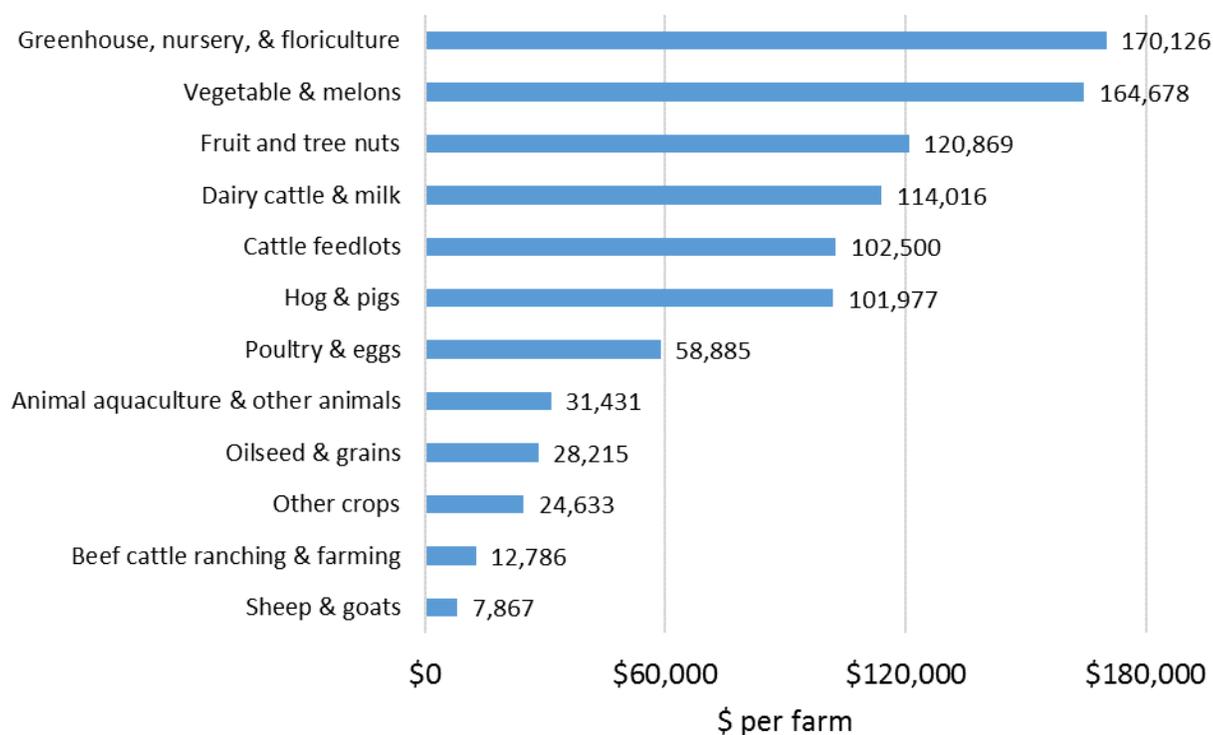


Data Source: USDA Census of Agriculture.

Thirty-five percent of all farms in the 2012 Census of Agriculture reported having hired labor and the average per farm hired labor expense was roughly \$47,640. Vegetable and melon farming had the highest average at \$114,016 per farm while sheep and goat farming had the lowest at \$7,867 per farm (Figure 2). The census

definition of a farm is any place from which \$1,000 or more of agricultural products were produced and sold, or normally would have been sold, during the census year. Over 22,600 of these farms reported having a hired labor expense over \$100,000.

**Figure 2. Hired Labor Expenses per Farm by North American Industry Classification, 2012**



Data Source: USDA Census of Agriculture.

The most recent release of the Farm Labor report by USDA’s National Agricultural Statistics Service (NASS) shows that changes have occurred in the farm labor force recently. According to the report, 784,000 hired field, livestock, supervisors, and other (e.g., bookkeepers) workers were on the nation’s farms and ranches during the reference week of October 7-13, 2018. This figure represents a decrease of 56,000 hired workers or 6.7% from the previous year. The NASS Farm Labor survey excludes measures of contract, custom (e.g., hay baling, combining, spraying, fertilizing), and service (e.g., veterinarian work, artificial insemination) labor.

Farm operators paid their hired workers an average wage of \$14.47 per hour during the October 2018 reference week, up \$1.05 or 7.8% from last year. Field workers received an average of \$13.74 per hour, up 91 cents from last October, while livestock workers earned \$13.38 per hour compared \$12.22 a year earlier. The field and livestock worker combined wage rate, at \$13.64 per hour, was up \$1.16 or 9.5% from last year. Benefits, such as housing and meals, are provided to some workers but the values are not included in the Farm Survey reported wage rates. In addition, there are certainly tradeoffs between salary, insurance benefits, working conditions, and other provisions that are not reflected in this aggregate data.

The number of hours worked averaged 41.5 hours for all hired workers during the October survey week, consistent with the 41.6 hours a year ago. Of the 784,000 hired workers during the reference week of October 7-13, 2018, 73% of are expected to be employed for 150 days or more (an indication of full-time employment) while 27% are expected to be employed for 149 days or less (part-time employment).

The Farm Labor survey is conducted twice each year in April and October and NASS compiles, analyzes and publishes the survey results the following month. By asking about two separate time periods each of the two times the survey is administered and data is collected during the year, NASS is able to publish quarterly data and capture seasonal variation. For example, during the April data collection, data for both January and April

reference weeks are collected and during the October data collection, data for both July and October reference weeks are collected. The quarterly reference week is the Sunday to Saturday period which includes the 12<sup>th</sup> day of the month. The survey provides information on the number of agricultural workers, hours worked, and wage rates at the national and regional levels. The data that farm operators provide through NASS's Farm Labor survey allow state and federal policy-makers to establish labor policies based on accurate information and help ensure farmers can get sufficient hired labor for their operations. The information is also critically important for individuals involved in recruiting, retaining, and managing farm labor and analysts who regularly assess the labor market situation.

The largest percentage decreases in the number of hired farm workers from last October to this October occurred in the Southeast (Alabama, Georgia, and South Carolina), Delta (Arkansas, Louisiana, and Mississippi), and Mountain II (Colorado, Nevada, and Utah) regions. These regions accounted for 28,000 or 50% of the reduction in hired workers for the reference weeks in October 2017 and October 2018. The Cornbelt II (Iowa, Missouri) region had a 6,000 or 20.7% reduction in hired workers between the two reference periods.

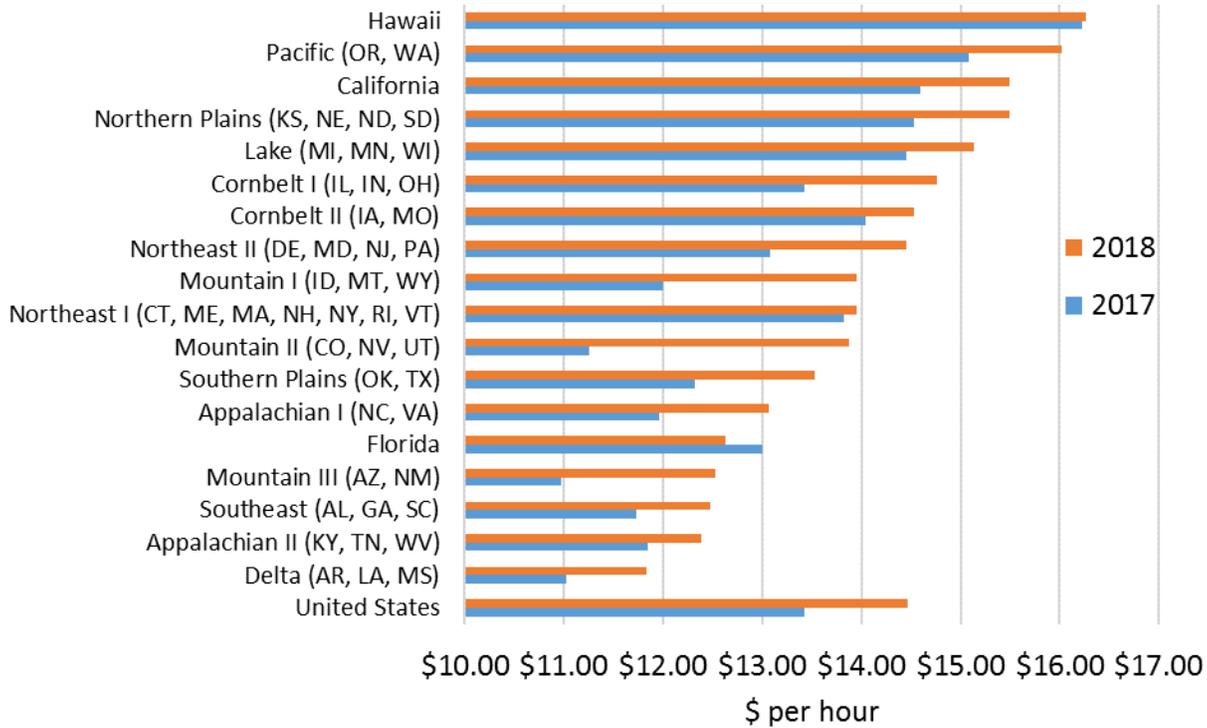
In every labor market there is competition for workers and the reduction in hired labor workers, even when comparing a reference week from one year to another, could be a sign that this competition is negatively impacting the farm sector. Farm wage rates have increased, still turnover has increased because workers have more options than last year. If the unemployment level is low enough, workers feel they can get a new job quickly. The decline in hired labor workers could be weather related too. Early October continued the wetter-than-normal conditions from September, especially in Iowa's southern quarter and eastern third. Notable, precipitation events occurred during the first half of the month as an active pattern brought low pressure systems with associated cold fronts across the state. Harvest of most field crops remained behind normal due to this weather. Therefore, fewer hired workers, especially part-time worker, were needed which likely contributed to the drop in hired worker numbers in the Cornbelt II region.

For the October 2018 reference week, only the Lake (Michigan, Minnesota, and Wisconsin) region saw a large increase in the number of hired workers from the October 2017 reference week, with 11,000 or 20% more workers on the region's farms. It is difficult to speculate why this particular region saw such a large increase in the number of hired workers, especially when most regions experienced a decrease. A few other regions saw an increase in the number of hired workers but the increase was small in number and percentage. One factor that could have led to the stronger demand for hired workers, is the need to replace the ones that were lost. Between October 9-15, 2016 and October 8-14, 2017 the Lake region lost 4,000 or 6.8% of its hired farm workers.

In October 2018, hired worker wage rates were above a year ago in almost all regions and for all almost types of workers. An increasingly competitive economic environment, coupled with a need to attract new employees and retain existing workers, continued to push hired farm wage rates higher. The largest percentage increases in average wage rates for all hired workers occurred in the Mountain I (Idaho, Montana, and Wyoming), Mountain II (Colorado, Nevada, and Utah), and Mountain III (Arizona and New Mexico) regions. Wage rates in these regions were up 16.3%, 23.3%, and 14.2%, respectively (Figure 3).

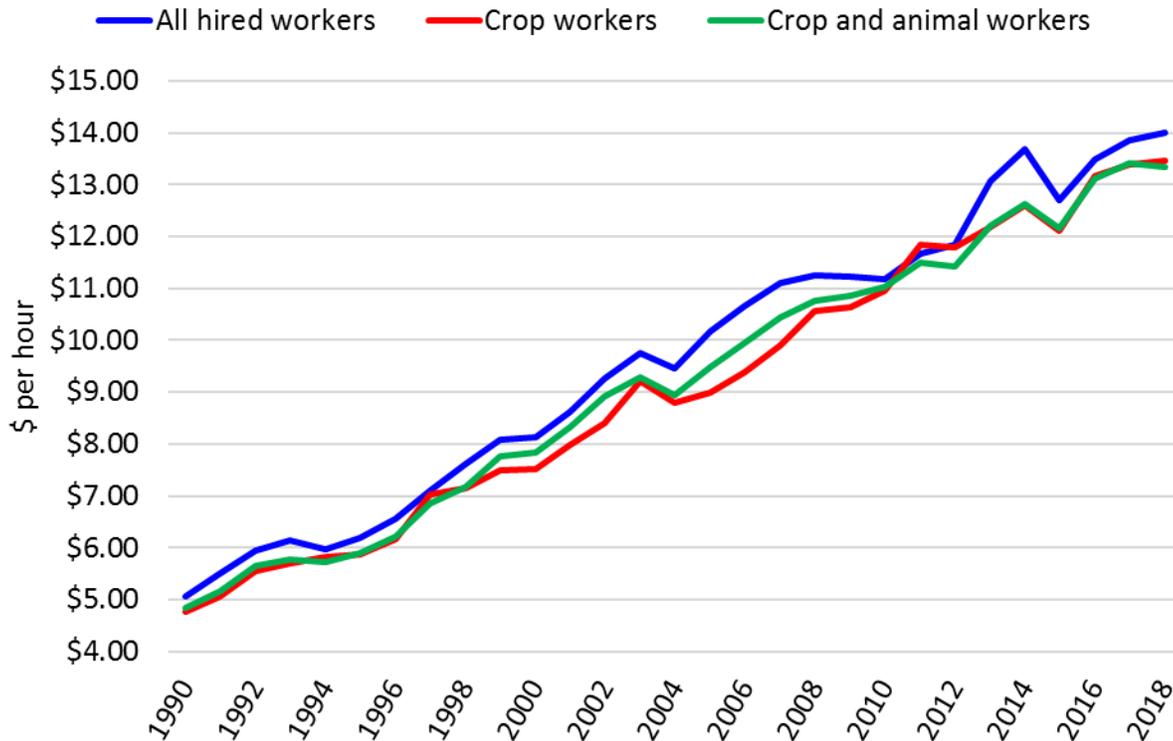
For the Cornbelt II (Iowa, Missouri) region the average wage rate for all hired workers was \$14.53 per hour during the October 2018 reference week, up \$0.49 or 3.5% from last year. Field workers received an average of \$13.94 per hour, up 11 cents from last October, while livestock workers earned \$13.65 per hour compared \$12.95 a year earlier. The field and livestock worker combined wage rate, at \$13.85 per hour, was up \$0.30 or 2.2% from last year. Annual nominal (not inflation-adjusted) wages for the Cornbelt II's hired farmworkers have risen by just under 4% per year since 1990 (Figure 4). Annual rates are averages of the published wage rates for each survey week weighted by the number of hours worked during the week. Annual average wage rates are not reported for solely livestock workers.

**Figure 3. Wage Rates for All Hired Workers by Region and the United States**



Data source: USDA-NASS.

**Figure 4. Cornbelt II (Iowa, Missouri) Annual Average Wage Rates**



Data source: USDA-NASS.

As always, I like to remind folks that these numbers are useful as a ballpark. NASS only reports farm workers in general categories, so the averages reported may not fit specialized categories of workers. Furthermore, NASS does not provide farm worker wage summaries for most individual states or by counties. As with all statistics, just knowing the average is only part of the story, but at least it offers a reference point to provide a benchmark and analyze trends over time.

*Lee Schulz*

## **Farming: It's a Stressful Occupation**

*This article was co-written with David Brown, Human Sciences Extension and Outreach, Program Specialist, and Anthony Santiago, Human Sciences Extension and Outreach, College Projects Specialist, Iowa State University.*

Farming is a high stress occupation, due to many conditions not under the farmer's control, such as weather, commodity prices, machinery breakdowns or tariffs. As has been noted, when you look back over the last ten years, crop agriculture has swung between two regimes. The years 2009 to 2012 were characterized by strong crop prices, driven in the beginning by record building demand and at the end by a drought. The years 2013 to 2018 are characterized by strong crop production, a consistent string of large harvests that have been more than enough to meet and exceed demand. The outlook for 2019, based on the information we have today, suggests another challenging year is in front of us.

For corn, while the 2018 crop is smaller than its' predecessor, it is still a very large crop. This continues the string of large corn crops, with the last six U.S. corn crops being the six largest ever. Corn usage over the past six years has been robust as well, but, in general, usage has run just short of supplies. Corn stocks have built and corn prices have retreated. Feed usage has grown with the general expansion in the livestock sector. Biofuel usage has continued to provide slow, steady growth. Combined, these two sources of demand provide a solid 11 billion bushel usage base for the corn market. Food, seed, and industrial usage remains stable as well. The wildcard is the export picture. In general, international corn demand has been growing over the past six years. But with greater competition of other corn producers worldwide and the threat from tariffs and trade disputes, export projections are tenuous at best.

Figure 1 shows the dramatic price swings and the associated production cost shifts over the past ten years. Through the past few years, corn producers have faced prices below production costs. In 2017 and 2018, only due to the fact of record state yields have production costs dipped below USDA's estimated prices.

For soybeans, 2018 is basically a continuation of the past two years, with record production and usage. But as with corn, supplies have generally exceeded usage. Stocks are building and prices have retreated. Soybean's demand structure had been relatively more supportive than corn's, and thus, in relative terms soybean prices have held up better. But that has definitely changed with the trade problems. It's hard to understate the importance of the Chinese market for soybeans. Soybean tariffs have greatly reduced trade between the U.S. and China. And that has lowered soybean prices significantly over the past several months. Figure 2 shows that the soybean market has followed the same pattern as corn. Prices have fallen more quickly than costs. Even with the record yields of the past couple of years, soybean margins have been challenging.

Farm incomes have declined precipitously over the past few years. National net farm income has been cut in half. Working capital has been reduced for many producers and has disappeared for some. Maintaining adequate cash flow has been and continues to be a challenge. All of this leads to stress in farm country. Not only is there the stress of producing and marketing crops, but also the individual and societal stress that comes with hard times. Now is a good time to review ways to alleviate stress in farm country and help others (and maybe even ourselves) deal with difficult times. One crucial tool is communication. While farming can be seen as an individualized profession, we often rely on a team of advisors and companions to guide our decisions

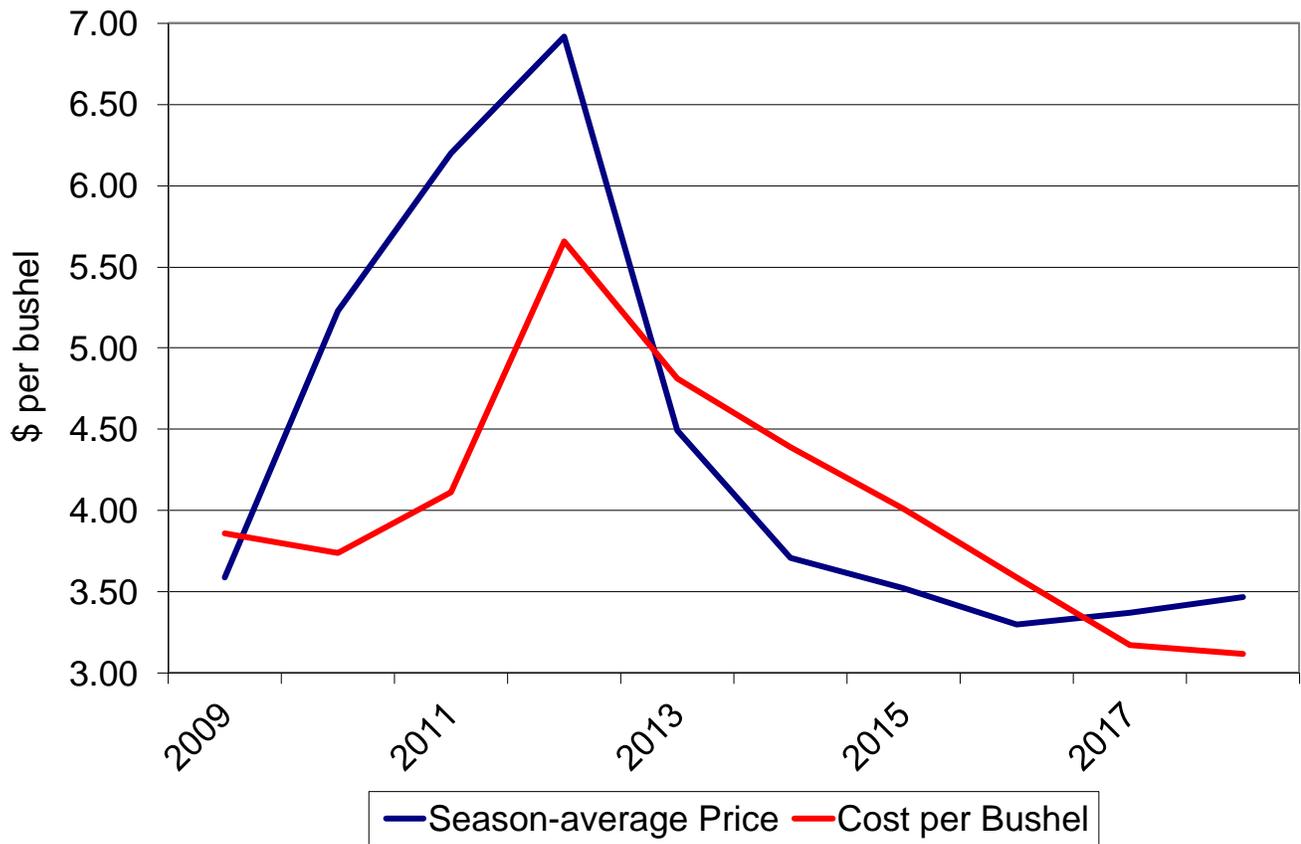


Figure 1. Corn prices and costs.

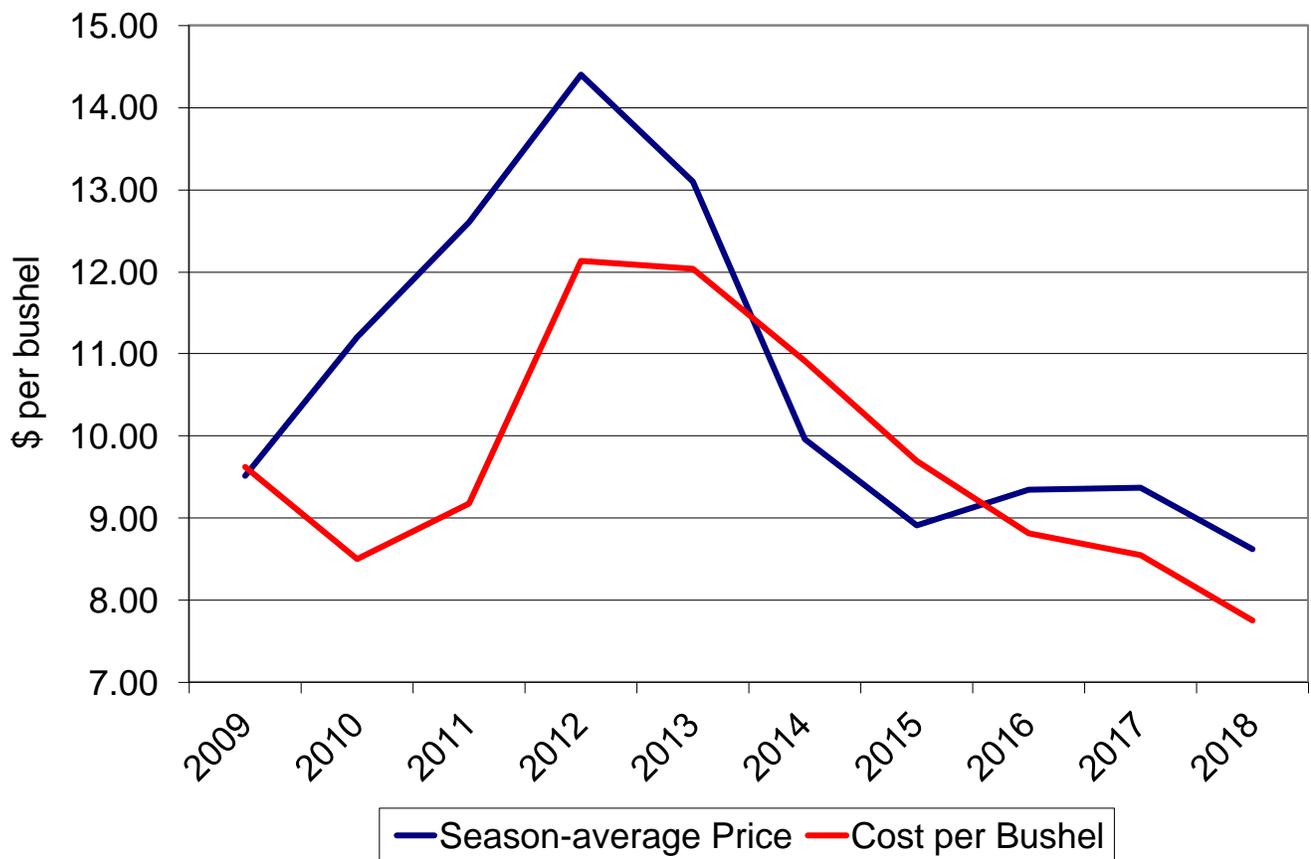


Figure 2. Soybean prices and costs.

and/or serve as a sounding board for our thoughts on moving the farm business forward. In tougher times, those conversations with production and financial advisors are more important. They can help focus discussions on the items where the farm's production and finances can be the most impacted. Co-op and seed agronomists can shed light on improving crop yields or finding "more bang for the buck" on production costs. Brokers and grain merchandizers can help producers work through marketing strategies to provide price floors or open up opportunities for price improvement. Ag lenders and financial advisors can explore techniques to extend cash reserves and improve cash flows.

Farm production and financial stress can be feed back into individual, family, and community stress. And given the stress within the farm sector, now's a good time to review the signs and symptoms of stress (in ourselves and in others), strategies to cope with various stressors, and resources to help. Stress is a natural part of life. It's our way to dealing with unexpected events and is a natural survival instinct. However, our inability to manage stress well can be damaging to both our physical and mental health.

Physically, stress can cause high blood pressure, muscle tension, headaches, digestive issues, and breathing problems. The longer these symptoms last, the more damage that can be done. Chronic stress can lead to heart attacks, strokes, diabetes, and a deterioration of our immune system. Physical problems can also create mental issues, triggering depression, anxiety, addiction, and suicidal thoughts.

Stress can cause individuals to withdraw from our activities and communities. Some individuals will emotionally retreat, showing little emotion; whereas others will become impatient and angry. Fearfulness and anxiety increase, while concentration and clarity decline. Often, those most impacted by stress try to block it out or blame others for issues, which can create additional conflicts. People look to compensate for issues by overindulging (food/drink/gambling) or changing their normal patterns (sleep, for example). They may allow maintenance for their farm, livestock, and equipment to fall behind. Stress can lead to more accidents, due to fatigue and lack of concentration, and stressful reactions may be mirrored by our loved ones and children.

When can we tell when stress has moved beyond normal levels and some form of care is needed? Concerns should be raised when stress significantly impacts the physical and mental state of a person. Individuals needing help often withdraw from friendships and social gatherings, have unusual and/or sudden changes in their physical appearance and emotional state, and display unexpected behaviors.

Even without formal training, we can help individuals struggling with stress in a variety of ways. We can listen to them and provide support. We can acknowledge their distress, be direct and professional in our responses to them, and help connect them with resources to better manage the underlying issues. We can discuss approaches to relieve or release stress: prayer, meditation, exercise, visualization, humor, etc. Stressful situations have many triggers and many solutions.

Sometimes the key to stress is planning for it. Farming is a hectic, but sporadic, profession. Some stressful events we can plan for, discussing plans and priorities (when the combine breaks down, who will run to town for the parts). With other events, we may need to let go, saying "No" to extra commitments. When stressed, it can be important to maintain our health and social connections. Get good sleep, eat balanced meals, and enjoy your personal relationships.

But sometimes the stress can be overwhelming and extra help is needed. There are many resources available to those going through stressful periods in their life. For example, during the 1980's farm crisis, Iowa State University Extension started the [Iowa Concern Hotline](https://www.extension.iastate.edu/extension/2018/01/10/iowa-concern-hotline) (1-800-447-1985). This hotline has grown beyond just ag issues and is now available 24 hours of day, 7 days a week, to help people find quick connections to the resources and services available to those in need. [Michigan State](https://www.maizecrops.com/) and [North Dakota State](https://www.northdakotastate.edu/) Universities have created materials to directly related to managing stress on the farm and in farm families.

While we hope your stress levels stay near normal and your farm business flourishes, we also hope you find this information useful if you know someone who needs help. As Chad can speak from experience, the hardest conversation to have can also be the best conversation to have when you need some help. To end, allow us to

quote that slightly known Canadian philosopher/TV show, Red Green, “Remember, we’re pulling for you. We’re all in this together.”

*Chad Hart*

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