IOWA STATE UNIVERSITY
Extension and Outreach

Iowa Farm Outlook

Department of Economics
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January Cattle Report

USDA has released the much anticipated January Cattle Inventory Report. Table 1 contains a summary of the report. The take-home contribution of the report was additional confirmation of shrinking national cattle supplies. Most final estimates were within the range of pre-report expectations with a few exceptions (namely the annual calf crop being down nearly 3% and 3-state small grain pasture grazing supplies being down almost 16%) generally suggesting future feeder cattle supplies may be even tighter than previously believed. The report itself can be construed as moderately bullish for cattle prices in late-2013 and 2014.

Table 1. January 1, 2013 Cattle Inventory[1]

	United States			Iowa		
	2012	2013	Percent of previous year	2012	2013	Percent of previous year
	(1,000)	(1,000)		(1,000)	(1,000)	
Cattle and calves	90,769	89,300	98.4	3,900	3,850	98.7
Cows and heifers that have calved	39,387	38,515	97.8	1,100	1,130	102.7
Beef cows	30,158	29,295	97.1	895	925	103.4
Milk cows	9,230	9,220	99.9	205	205	100.0
Heifers 500 pounds and over	19,338	19,129	98.9	920	950	103.3
For beef cow replacement	5,262	5,361	101.9	140	150	107.1
For milk cow replacement	4,622	4,551	98.5	160	120	75.0
Other heifers	9,454	9,218	97.5	620	680	109.7
Steers 500 pounds and over	15,833	15,813	99.9	1,300	1,250	96.2
Bulls 500 pounds and over	2,096	2,056	98.1	60	60	100.0
Calves under 500 pounds	14,115	13,787	97.7	520	460	88.5
Cattle on feed	14,121	13,352	94.5	1,300	1,280	98.5
	2011	2012	Percent of previous year	2011	2012	Percent of previous year
	(1,000)	(1,000)		(1,000)	(1,000)	
Calf crop	35,313	34,279	97.1	1,050	1,050	100.0

[1] The full report can be found at:
United States - http://usda01.library.cornell.edu/usda/current/Catt/Catt-02-01-2013.pdf and
Iowa - http://www.nass.usda.gov/Statistics_by_State/Iowa/Publications/Livestock_Report/reports/2013/Cattle/jan_cattle13.pdf.

U.S. Cattle Inventory
All cattle and calves in the U.S. as of January 1, 2013 totaled 89.30 head, a 1.6% decrease from January 1, 2012. This was the lowest January 1 inventory of all cattle and calves since the 88.10 million in 1952. Beef cows totaled 29.30 million, a 2.9% decrease from last year. The estimate for January 1, 2012 was increased by 275,000 with almost all of the revision in beef cow numbers coming in Oklahoma and Texas. This suggests that herd liquidation in 2011 was not as severe as earlier estimated in those two states. However, Texas lost even more beef cows in 2012, down 12.0%, while Oklahoma beef cow numbers dropped a modest 1.3% in 2012.

The report suggests collectively cattlemen have been adding youth to their breeding stock as replacement heifers are up from last year while the national beef cow herd has declined reflecting ongoing culling. Heifers for beef cow replacement totaled 5.36 million, a 1.9% increase from last year. While heifer replacements are higher than estimates for 2011 and 2012, they remain lower than any other year since 1990 suggesting "real expansion" has yet to be initiated. The recent year-over-year increase in heifers for beef cow replacement indicate, more than anything else, the contrast between what the industry would like to do compared to what they are able to do. Drought and continued beef cow liquidation meant that a very low percentage of those potential replacement heifers actually entered the herd in 2012. As we look forward, it depends almost entirely on whether drought conditions moderate to determine what percentage of those heifers may actually enter the herd in 2013.

The total calf crop for 2012 was 34.28 million, 2.9% lower than a year ago. This was the lowest annual calf crop since 1949. The smaller calf crop implies a net reduction in the number of cattle that will come to market in late-2013 and in 2014 and hence a moderately bullish forecast for cattle prices in late-2013 and 2014.

The total cattle on feed inventory was estimated at 13.35 million, 5.5% lower than a year ago. It only happens twice a year that we get the total cattle on feed inventory and the monthly cattle on feed inventory (1,000+ head capacity). The monthly inventory down 5.6%, compared to the semi-annual inventory down 5.5% from a year ago, suggests some of the exiting and downsizing by smaller feedlots that was speculated to have occurred this past year may be slowing. However, without continued reductions in feedlot inventories, the feeder supply will continue to shrink. And, if conditions permit, increased heifer retention will further squeeze feeder supplies in the coming years.

Iowa Inventory
Iowa's cattle inventory was 3.85 million, 50,000 head or 1.3% lower than the year before. The bulk of the decline came from a 3.8% decline in the number of steers 500 pounds and over and an 11.5% decline in calves under 500 pounds. Beef cow inventory, at 925,000, was 3.4% above last year and heifers for beef cow replacement, at 150,000, was 7.1% above last year. While in total head Iowa has followed the national trend of downsizing over the 1994-2010 period, its relative role as home to beef cows and heifers being retained had remained relatively consistent prior to the ongoing drought and has since accelerated. This suggests Iowa may be a "growth area" in terms of its role in the national industry. Of course, the current ongoing weather concerns facing Iowa and many key cattle producing states may well alter this trajectory. The number of cattle on feed in Iowa was approximately 1.5% lower at 1.28 million on January 1, 2013. Approximately 48% of the state's inventory are in feedlots with 1000+ head capacity with the remaining 52% in smaller feedlots.

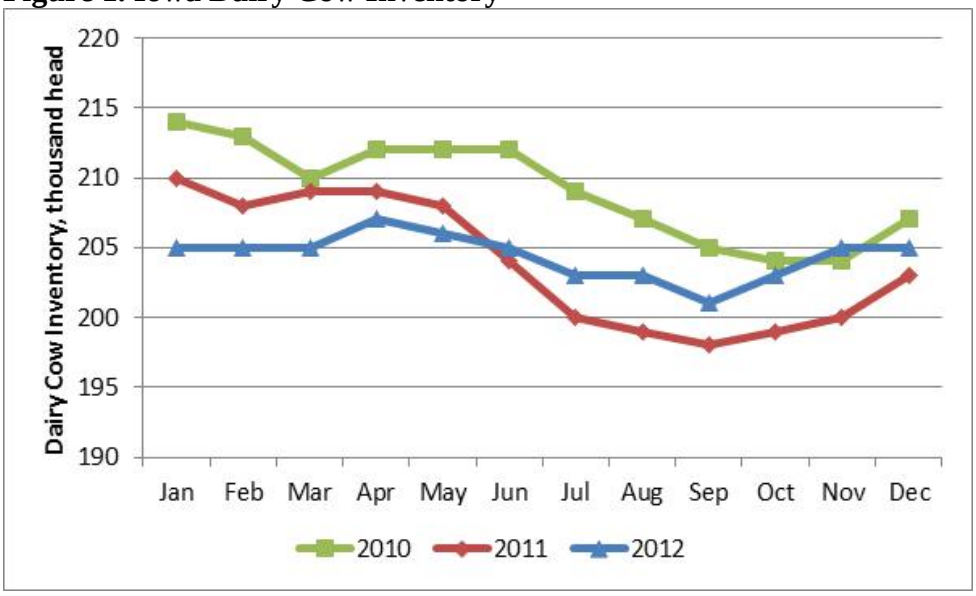
Lee Schulz

Dairy Outlook Overview

What happened in 2012?
U.S. milk cow herd closed out at 9.21 million cows, down 10 thousand head from 2011. Dairy cow slaughter increased in 2012 by six percent compared to 2011. The highest affected areas are regions which purchase a greater percentage of feed versus raising it. The Iowa milk cow herd increased two thousand cows to 205

thousand cows from 2011 to 2012. As shown in figure 1, inventory was highest at 207 thousand in April and lowest at 201 thousand in September.

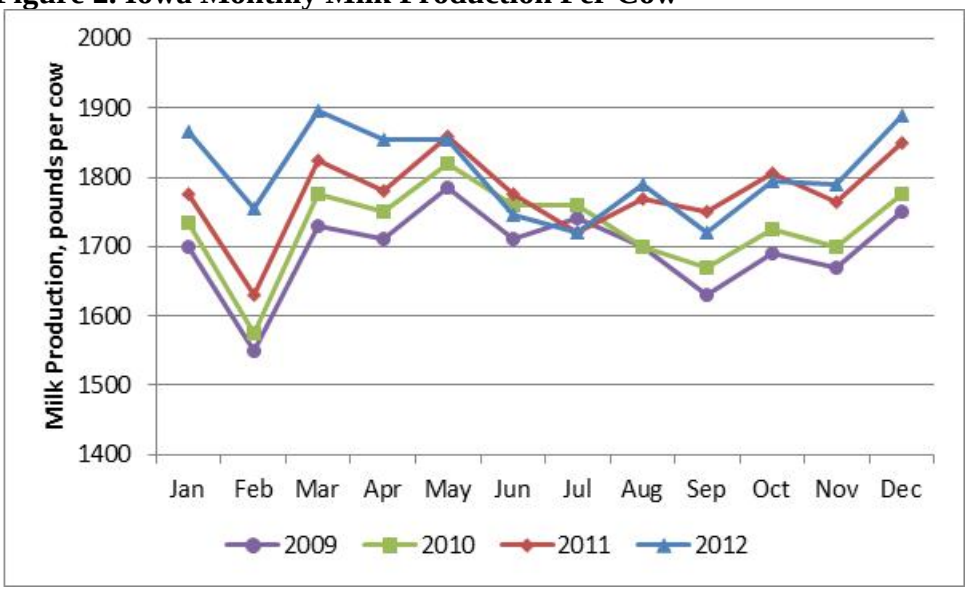
Figure 1. Iowa Dairy Cow Inventory



New Mexico and Arizona decreased cow inventory by 13 and 6 thousand head, respectively. However, Kansas and Michigan, combined, increased cow inventory by 15 thousand cows.

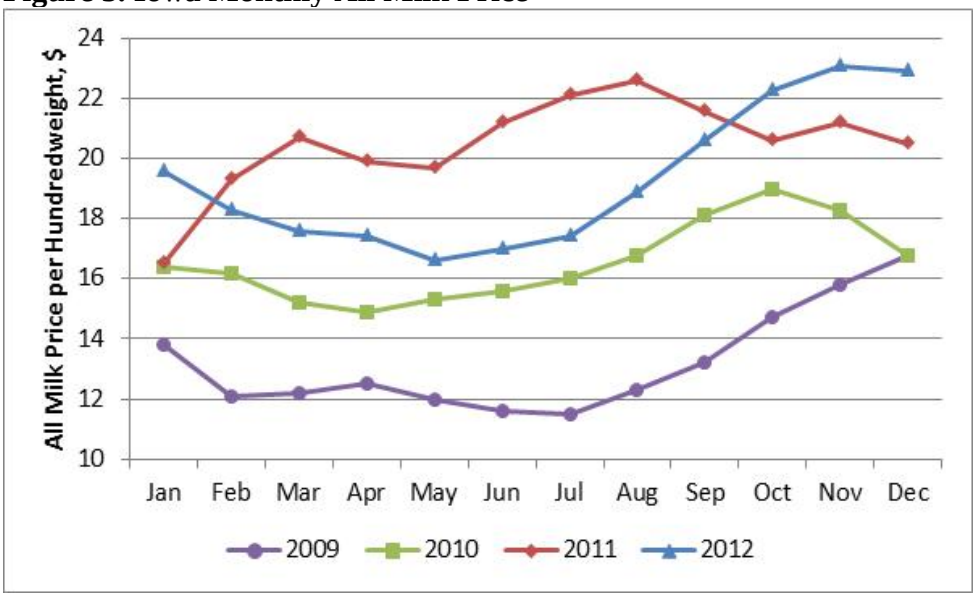
U.S. milk production was up 1.62 percent; annual production for all states is 19,854 pounds per cow and 21,957 for the 23 selected dairy states. Total milk production increased in Iowa by 2.0 percent for 2012 compared to 2011. Annual milk production per cow for Iowa was 21,695 pounds, an increase of 1.74 percent or 370 pounds. The state leader in milk production per cow increase was Wisconsin at 3.9 percent or 805 pounds. However, Texas and New Mexico decreased milk production per cow by at least 190 pounds.

Figure 2. Iowa Monthly Milk Production Per Cow



Iowa All Milk Price varied $6.50 in 2012; average All Milk Price for Iowa was $19.31. As shown in Figure 3, the lowest price came in May due to growth in production in first half of the year. While the highest price at $23.10 was in November partially due to a decrease in cow inventory over the summer and fall months as a result of tightened margins and strong cull cow prices. These factors also slowed production growth which assisted higher milk prices at the end of 2012.

Figure 3. Iowa Monthly All Milk Price



Tight margins were the theme throughout most of the year due to high feed costs which stemmed from both high grain and hay prices. Factors driving feed commodity prices higher were the wide spread drought and a tight ending inventory based on expected demand and given supply.

Exports accounted for 13.6 percent of milk production on a milk-solids basis. Increased ability to meet needs of foreign buyers and increased demand from the growing middle class helped to grow exports in 2012. Global demand increased enough to absorb the gain in production in Oceania countries in late 2012. This, along with the slow in U.S. milk production at the end of the year, leaves most global dairy product inventories at lower levels than December 2011.

What can we expect for 2013?

The first half of 2013 is more predictable due to unknown milk and crop production factors that will come into play mid-year. Tight financial margins stemming from high feed costs will continue for at least the first half of 2013 or until the next crop harvest. The size of current crop inventory and next harvest will drive price while quality of both may affect milk production. Current conditions will contribute to slow growth in total milk production due to expected limited herd expansion and growth in milk production efficiency.

Lower milk prices are expected in early 2013 due to weaker dairy prices with the exception of dry whey. While cheese and butter product prices have decreased due to growing inventories (respective to inventory levels in prior months) at the end of the year, prices may increase in early to mid- 2013 due to expected supplier purchases. Lack of surplus in global product inventories and expected slower growth in milk production will provide as positive factors for milk prices in mid- to-late 2013. Additionally, growth in dairy product demand from growing middle class and continued strength from Mexico for export products (SMP and cheese) will support milk prices throughout 2013 for U.S. producers.

What is unknown for 2013?

The last half of the year is highly questionable for dairy producers due to questions surrounding weather variability, volatility in markets, and state of foreign market economies.

Questions at the producer level surround feed and milk output. How will feed quality and quantity harvested in 2013 affect overall milk production? Will producers continue to more efficient with feed quality harvested or alternative feed sources? Historically, producers have increased milk production with culling cows and heifer replacements and making necessary ration changes. The weather, feed commodity price volatility, and cow management will help determine growth in milk production for 2013. Additionally, the level of global milk production growth and product demand will affect product and milk prices.

Recently, weather has played a factor in driving the current feed prices. In addition to the drought across the Corn Belt, dry weather patterns in the South America are affecting the grain crop growing season which will further affect corn and soybean prices.

Economic stability in foreign countries also factor into the strength of the US dairy industry due to related value of the dollar and dairy exports. The European Union economy is expected to be in a state of recession while the US is expected to recover in 2013, all while China's economy is expected to continue to grow.

What can you do to prepare for uncertainty?
An operation's financial stability going into 2012 and percent of feed purchased versus raised will help to determine the financial sustainability of farms surviving a period of lower milk prices. With tight margins expected for early 2013, it is important to know how long your dairy operation can financially withstand low margins. This can be determined by doing complete financial analysis and 'what if' scenarios. These scenarios evaluate what amount of change in revenue decline, expense increase, and interest rate increase can an operation withstand before being in a negative financial position. This can help understand how market volatility in the coming year could impact their operation's feasibility to remain in production. Additionally, it can allow operators to be proactive in planning for and working with their financial team to create a plan to survive a time of low margins.

Additionally, with higher feed costs, it is important to calculate cost of production on a per-hundredweight of milk produced. This value can help producers evaluate financial margins, feed costs, and appropriately make milk or feed marketing decisions. Although milk prices seem high relative to years past, high feed costs require producers to continue to become better financial managers.

Kristen Schulte

Here Comes South America

Last Friday the USDA released its monthly supply and demand report. This report reflects global supply and demand as the South American crop begins to roll in. Most of the market action after the release of the report was on the soybean side. However, the report set up some interesting story lines as we move into the 2013 planting season.

For the corn market, the U.S. adjustments were small. The production and supply numbers remain the same from last month's report. The feed and ethanol demands were also held constant. But export demand continued to slide. The USDA adjusted export demand down 50 million bushels, but food demand through corn sweeteners was raised 20 million bushels to partially offset. In the end, ending stocks were raised 30 million bushels to finish out at 632 million bushels. And the USDA season average price was lowered by 20¢ to a midpoint of $7.20 per bushel.

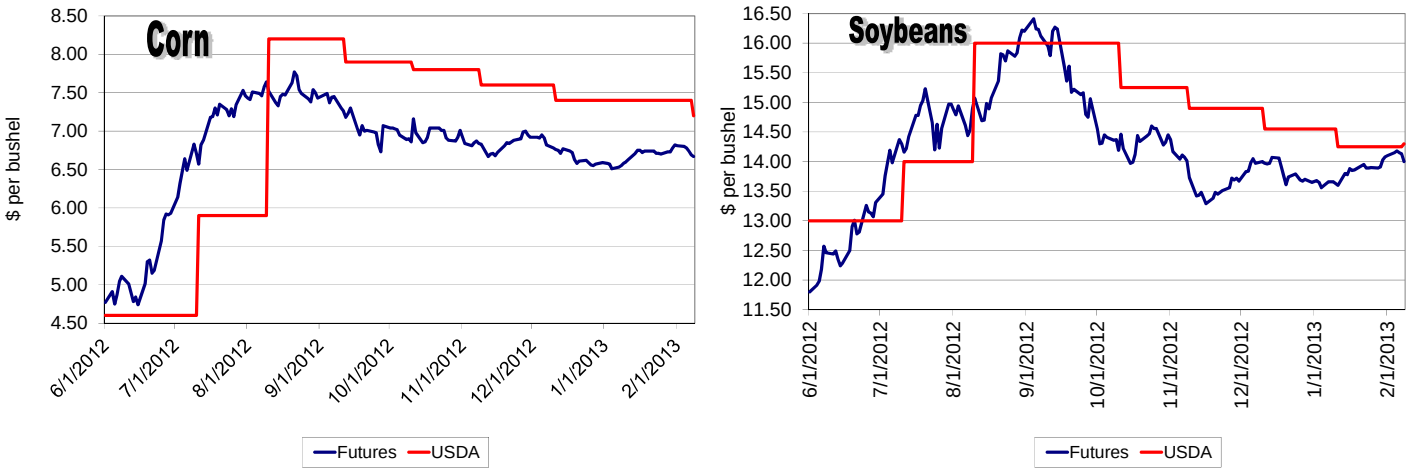
For the soybean market the adjustments on the U.S. side were also very small. Again, the production and supply numbers were the same as in last month's report. On the demand side, crush demand was raised 10 million bushels while export, seed, and residual demand were held constant. This lowered ending stocks to 125 million bushels, leaving us with the tightest stocks we have seen in quite some time. Given the tightness in the market, the USDA raised their season average price estimate to $14.30 per bushel.

Looking at the world market, global corn production was raised 2.1 million tons as we look at increased production coming from the southern hemisphere. Brazil is expected to have 1.5 million more tons based on both higher corn plantings and better yields for first season corn. And there are increased production estimates for Mexico, India, and Ukraine. However, the Argentine corn crop has been stressed due to persistent dryness over the past month which followed a wet period that they had at the beginning of the planting season.

Global soybean production was raised slightly as the production increases in Brazil were offset by deteriorating conditions in Argentina. At this time Brazil is projected to set a record for their soybean harvest. USDA raised their soybean production estimates in Brazil to a record 83.5 million tons. That would move Brazil past the U.S. to become the world's largest soybean producer. And it was that piece of news which drove the soybean market down significantly after the report.

As we near the midpoint of 2012 marketing year, futures prices for corn and soybeans have worked their way down from the record highs just before harvest. Typically, I rely on price projections that depend on average basis levels over the course of the marketing year. Figure 1 shows those price projections, labeled "Futures" as they are based on the futures prices for that given day. As you can see, those projections have run consistently below the USDA projections. If I factor in the current basis levels we are seeing across Iowa, the gap between the two projection lines shrinks dramatically. Cash prices across the nation have not only been boosted by the high futures prices, but also by incredibly strong basis levels.

Figure 1. 2012 season-average price estimates.



One thing to watch as we move through the spring will be the adjustments that USDA makes to demand as we move forward. With this report USDA increased their forecast for meat production across the board. As the numbers now stand, only beef production is projected to decline in 2013. Pork, broiler, and turkey production are all projected to increase as we move through the year. If these production projections hold, then we would expect to see better feed demand as we move into 2014. Given the relatively small demand adjustment in this month's report, crop demand outlook is stabilizing as we move into the planting season.

Looking forward, weather remains the #1 concern of the crop markets. Drought conditions continue to cover a majority of the country. And while conditions are improving in many areas, subsoil moisture remains a major concern. Since the fall, the storm tracks have favored the eastern Corn Belt. This has helped improve the production outlook for Illinois and states to the east. However, the western Corn Belt remains under significant crop conditions. And given that it was the western Corn Belt where most of the acreage increase for 2012 occurred, the lingering effects of the drought there weigh heavily on the market.

Futures prices for the 2013 crops show that the markets are still offering good prices to incentivize farmers to plant corn and soybeans in 2013. While the recent report did take a bite out of those prices, we are still looking at season-average corn price estimates in the $5.30 range, with soybeans around $12 per bushels.

Given ISU Extension production cost estimates, the 2013 corn and soybean crops are still pricing out at profitable levels. Corn is holding a 90¢ margin, while soybeans are at $1.50 margin. While these margins are smaller than we have captured in most of the last five years, they are historically good margins. However, they may be fleeting. The degree of price volatility in the crop markets is likely as large as it was in 2008, when we saw prices swing over a multi-dollar range. At least, it looks like we will start the 2013 crop season with the potential for continued crop profitability.

Figure 2. 2013 season-average price estimates.

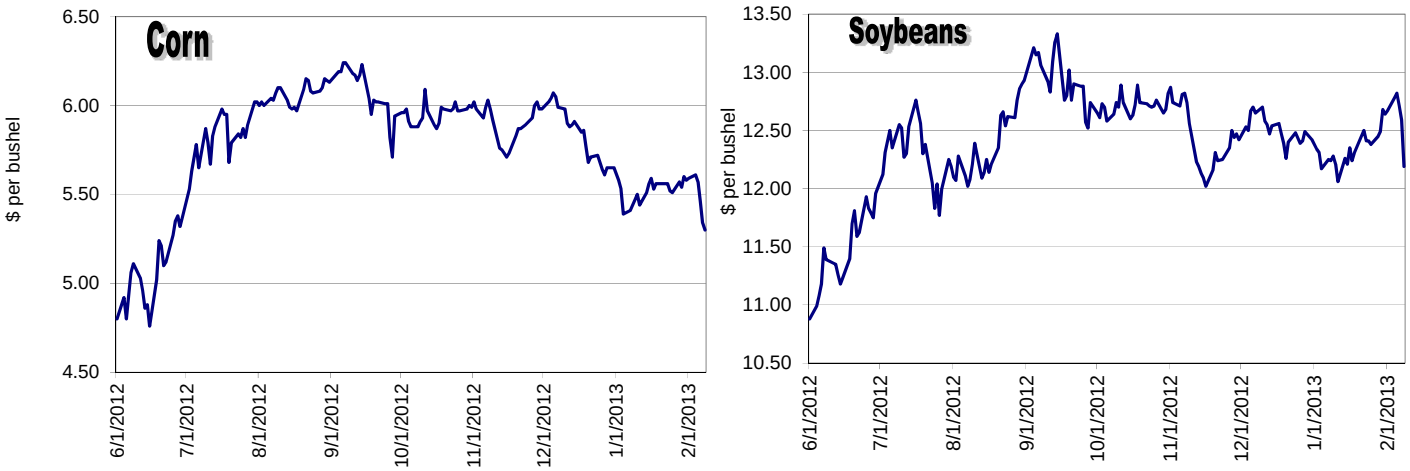
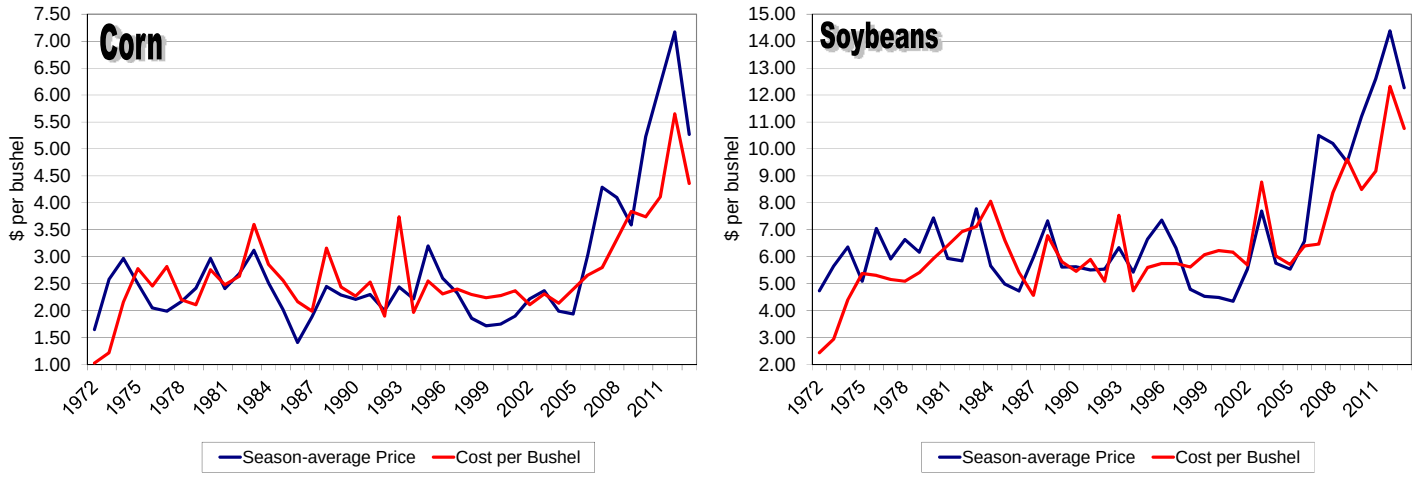


Figure 3. Crop prices versus costs.



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