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# ***Staff Paper***

## **2010 ANNUAL AGRICULTURAL OUTLOOK**

**Coordinated by  
Jim Hilker**

**Staff Paper 2010-01**

**February 2010**



Department of Agricultural, Food and  
Resource Economics  
MICHIGAN STATE UNIVERSITY  
East Lansing, Michigan 48824

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## 2010 ANNUAL AGRICULTURAL OUTLOOK

coordinated by:

Jim Hilker  
hilkerj@msu.edu

36 pages

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## **THE GENERAL ECONOMY**

### **Les Manderscheid and Bob Myers**

The U.S. economy appears to be emerging slowly from the severe recession that began in January 2008. By the second half of 2009, the economy had begun growing again with a just-released preliminary estimate of 5.7% annualized GDP growth for the fourth quarter, and revised 2.2% for the third quarter. Despite this recent growth, there are still many concerns moving forward. The crisis in the financial system has choked off loans to small businesses and the unemployment rate has so far stubbornly refused to drop. It seems clear that businesses are delaying hiring until there is strong evidence of increased final demand. But with high unemployment and depressed housing prices consumers do not have the confidence to buy. So at present there is demand for rebuilding inventory but firms are reluctant to hire while they can increase productivity of their current work force.

A recent survey by the National Association for Business Economics reported that credit conditions have loosened in recent months but still constrain business spending. Firms plan to increase spending on computers and communication equipment but are delaying large projects until there is more certainty about future economic conditions. Over 60% of those surveyed expect real GDP growth of more than 2% in 2010.

The typical forecast at a recent Outlook Symposium sponsored by the Federal Reserve Bank of Chicago is for real GDP to be 2.5% higher in the fourth quarter of 2010 compared to a year earlier. Participants expected weak growth in business fixed investment and stronger growth in inventories and industrial production. The unemployment rate is forecast to be 9.8% by the fourth quarter of 2010, which is not much below the current rate. Sales of autos and light trucks are forecast at 11.4 million units, above the 10.2 for 2009, but still below the 13.2 of 2008, and the even larger numbers of some earlier years. These forecasts suggest improvement, but not the robust recovery that has followed many other U.S. recessions, especially when it comes to employment.

Michigan wage and salary employment has been especially hard hit and has declined in every year since 2000. A detailed breakdown by industry and education highlights the decline. Industries where a minimum of 30% of the work force hold a bachelor's degree were defined as "high education industries." Between 2001 and 2009 these industries had 5% private sector employment growth in the U.S., but lost 5% of their jobs in Michigan. The remaining industries, labeled "low education industries," lost 5% of their private sector employment in the U.S., while in Michigan these industries lost over 20% of their jobs. Further analysis showed that wages also increased more rapidly in the high education industries. For example, between 2001 and 2008 high education industry wages grew by 19.6% in Michigan compared to 11.2% for low education industries. Both sectors experienced faster wage growth in the U.S. as a whole compared to Michigan.

The "double whammy" of jobs being lost and wages increasing more slowly helps explain why Michigan has gone from a state with high personal income per capita to a state ranked 37<sup>th</sup> in the last full assessment, with an expected drop to 40<sup>th</sup> when data are next updated.

Looking forward there are more uncertainties surrounding the macroeconomic environment than we have experienced for some time. Oil prices fell rapidly during the recession, but have since ratcheted up again to the \$70-\$80 a barrel range. It is clear there is now a strong linkage between oil prices and other commodity prices, many of which have also have increased in recent months. Stock prices also staged a dramatic recovery during 2009, but appear poised for more volatility and downside risk in 2010 unless the recovery picks up steam. Given the state of the housing market and employment conditions there is real concern that both business and consumer confidence will remain low, slowing the recovery phase and making it less robust than for previous recessions. There is also concern about what will happen to future tax rates as the Government is forced to confront huge deficits brought on by stimulus spending and bailouts associated with the financial crisis. All of these concerns suggest we may be in for a bumpy macroeconomic ride over the next year, especially here in Michigan.

## **POLICY OUTLOOK**

**David Schweikhardt, Sandra Batie, and Roger Betz**

With the 2008 farm bill in place until 2012, there is likely to be little action on the legislative front for commodity programs in 2010. Nevertheless, farmers will need to be aware of their management alternatives under the 2008 farm bill and be prepared to make some important decisions. Foremost among these decisions will be whether to enroll in the Average Crop Revenue Election (ACRE) program created by the 2008 farm bill, or to remain in the Direct and Countercyclical Payment (DCP) program that was continued in the 2008 farm bill.

Under the rules of these programs, a producer who does not enroll in the ACRE program will automatically be re-enrolled in the DCP program. The first sign-up for the ACRE program occurred in August 2009. At that time, 3,241 farms in Michigan (546,505 base acres in Michigan) enrolled in the ACRE program. Producers who signed up for the ACRE program at that time must remain in the ACRE program through the 2012 crop year. Producers who did not enroll in ACRE during the August 2009 sign-up period (46,477 farms with 3.8 million base acres in Michigan) will be eligible to enroll in ACRE for the 2010 crop year. Consequently, producers should examine carefully the consequences of choosing either the ACRE program or the DCP program for 2010.

### **The Basics of ACRE**

The ACRE program is an optional program. Producers who enroll in the ACRE program will be eligible for revenue-based safety net payments. In comparing the two programs, producers must consider (a) the mechanisms used to calculate payments under each program, and (b) the role that each program can play in a comprehensive risk management strategy.

To become eligible for the ACRE program, a producer must forego (a) all countercyclical payments that would be received in the DCP program (at market prices below \$2.35 for corn, \$5.36 for soybeans, and \$3.40 for wheat); (b) a 20% reduction in the direct payments that would be received under the DCP program (a loss of 5.6 cents per bushel for corn, 8.8 cents for soybeans, and 10.4 cents for wheat); and (c) a 30% reduction in the marketing assistance loan rates for all commodities produced on the farm. In place of these foregone payments, the producer will be eligible for a revenue-based payment (where revenue = market price X yield). This payment will be based on benchmark farm revenue per acre, actual farm revenue, benchmark state revenue per acre, and actual state revenue. If the benchmark revenue is greater than the actual revenue in both the state and the farm comparison, then the producer will be eligible for an ACRE payment based on the difference between the state benchmark revenue and the state actual revenue.

In considering a comparison of the DCP and ACRE programs, many factors can come into play. At the same time, however, some major factors should stand out. First, the ACRE program is a *revenue-based* payment program, while the DCP program is a *price-based* payment program. This difference can be crucial when considering the choice of ACRE versus DCP within the producer's overall risk management strategy. While ACRE provides at least partial protection for yield risk, the DCP program does not provide any form of yield risk protection. This difference can be significant when considering which of these programs contributes to yield risk protection in an overall risk

management strategy. Second, DCP provides greater price risk protection than does ACRE at *extremely low* prices. For example, if the national average market price were to fall to the range between \$1.95 and \$1.37 for corn, DCP can provide greater price risk protection than ACRE in some circumstances. This results from the fact that a producer must accept a 30% reduction in the marketing loan rate in order to enroll in the ACRE program.

At the same time, ACRE provides greater price risk protection at price levels anywhere *above* the loan rate. Most importantly, the DCP program provides no protection for price risk *above* the \$2.35 level (for corn) because no countercyclical payment would be received under the DCP program until the price of corn fell to at least \$2.35. Thus, any decline in corn prices from their current level to \$2.35 would *not* provide any form of price risk protection under the DCP program. Under the ACRE program, a decrease in price from the existing level to \$2.35 and below would be covered by the ACRE payment when the decline in actual revenue occurs. Again, producers should be aware of the risk protection elements in the DCP and the ACRE programs and, more importantly, be aware of the risk protection that is *not* provided by these programs. A decision to enroll in ACRE or to remain in DCP should *not* simply be a decision of “which program has the highest guaranteed payment for 2010?” The decision should be made within the context of an overall risk management strategy.

### **What Is Happening with ACRE for the 2009 Crop?**

Though it is too early to know exactly what the ACRE program payments will be for the 2009 crop year, it is important to recognize the risk protection that is occurring from program participation. The marketing year for the 2009 corn and soybean crops will end on August 31, 2010. The USDA’s January 12 projected national average price range indicated that for Michigan, wheat is likely to be solidly “in-the-money” for producers who enrolled in the ACRE program (the ACRE payment received will be greater than the DCP payment forfeited). The same USDA price projections indicate that soybeans will be “out-of-the-money,” and corn will probably be “out-of-the-money.” At the same time, it must be recognized that recent trends in prices and in futures prices for the remainder of the 2009 marketing year indicate that it is “too-close-to-call” for these other crops and that final ACRE payments will be determined by the direction of market prices during the remaining 2009 crop year. Table 1 provides an analysis of wheat ACRE payments in Michigan under various scenarios (a spreadsheet for analyzing ACRE under various scenarios can be found at the website <http://www.msu.edu/user/betz>).

The Michigan state average corn yield for 2009 is currently 148 bushels per acre. USDA projects (as of January 12) the 2009 national average market price for corn will be \$3.40 to \$4.00. At a \$3.40 corn price, the state ACRE payment is \$9.13 per acre. With the 148 bushel yield, the payment becomes zero for any price above \$3.46. With a mid-point price of \$3.70, the ACRE payment would be zero. The Michigan state average soybean yield 40 bushels per acre, and the USDA mid-point price projection is \$9.65, which would place 2009 soybeans “out-of-the-money.” A national average market price below \$8.70 would trigger state ACRE payments in Michigan.

Finally, the state average yield for wheat in 2009 is 69 bushels per acre, and the USDA national average price projection is \$4.70 to \$5.00. These projections would result in a state ACRE payment \$48.82 to \$69.52 per acre. The maximum 2009 wheat payment rate of \$98.46 per acre would occur at a national average market price of

\$4.28. It should be noted that for each producer, the state payment rate is multiplied by the individual farm's yield ratio (the ratio of the farm's 2009 "olympic" average yield to the state's 2009 "olympic" yield of 68 bushels per acre).

### Looking Ahead

Given the outlook for continued price volatility in the 2010 to 2012 period, producers should carefully examine their program choices for both the ACRE program and the DCP program. The 2009 sign-up period occurred at an inconvenient time for many producers, potentially contributing to the low enrollment in 2009. Anecdotal evidence also suggests that some producers enrolled their own land in ACRE, but did not enroll those farms on which they are tenants. Because enrollment in ACRE requires the approval of landlords, producers should begin to notify landlords and lenders of the potential consequences of choosing between the ACRE and DCP program. The potential consequences for all three parties could be significant.

**Figure 1. ACRE Payments for Wheat in Michigan, 2009 Crop Year**

| WHEAT                | 2009      | ACRE STATE PAYMENT RATE per Acre |          |          |          |          |          |          |
|----------------------|-----------|----------------------------------|----------|----------|----------|----------|----------|----------|
|                      |           | Michigan Benchmark Yield 64-73   |          |          |          |          |          |          |
|                      | Nat Price | 65.0                             | 66.0     | 67.0     | 68.0     | 69.0     | 70.0     | 71.0     |
|                      | \$ 5.25   | \$ 52.57                         | \$ 47.32 | \$ 42.07 | \$ 36.82 | \$ 31.57 | \$ 26.32 | \$ 21.07 |
|                      | \$ 5.20   | \$ 55.82                         | \$ 50.62 | \$ 45.42 | \$ 40.22 | \$ 35.02 | \$ 29.82 | \$ 24.62 |
| Current              | \$ 5.15   | \$ 59.07                         | \$ 53.92 | \$ 48.77 | \$ 43.62 | \$ 38.47 | \$ 33.32 | \$ 28.17 |
| USDA                 | \$ 5.10   | \$ 62.32                         | \$ 57.22 | \$ 52.12 | \$ 47.02 | \$ 41.92 | \$ 36.82 | \$ 31.72 |
| Forecast             | \$ 5.05   | \$ 65.57                         | \$ 60.52 | \$ 55.47 | \$ 50.42 | \$ 45.37 | \$ 40.32 | \$ 35.27 |
| 1/12/2010            | \$ 5.00   | \$ 68.82                         | \$ 63.82 | \$ 58.82 | \$ 53.82 | \$ 48.82 | \$ 43.82 | \$ 38.82 |
|                      | \$ 4.95   | \$ 72.07                         | \$ 67.12 | \$ 62.17 | \$ 57.22 | \$ 52.27 | \$ 47.32 | \$ 42.37 |
| \$4.70               | \$ 4.90   | \$ 75.32                         | \$ 70.42 | \$ 65.52 | \$ 60.62 | \$ 55.72 | \$ 50.82 | \$ 45.92 |
| to                   | \$ 4.85   | \$ 78.57                         | \$ 73.72 | \$ 68.87 | \$ 64.02 | \$ 59.17 | \$ 54.32 | \$ 49.47 |
| \$5.00               | \$ 4.80   | \$ 81.82                         | \$ 77.02 | \$ 72.22 | \$ 67.42 | \$ 62.62 | \$ 57.82 | \$ 53.02 |
|                      | \$ 4.75   | \$ 85.07                         | \$ 80.32 | \$ 75.57 | \$ 70.82 | \$ 66.07 | \$ 61.32 | \$ 56.57 |
|                      | \$ 4.70   | \$ 88.32                         | \$ 83.62 | \$ 78.92 | \$ 74.22 | \$ 69.52 | \$ 64.82 | \$ 60.12 |
|                      | \$ 4.65   | \$ 91.57                         | \$ 86.92 | \$ 82.27 | \$ 77.62 | \$ 72.97 | \$ 68.32 | \$ 63.67 |
|                      | \$ 4.60   | \$ 94.82                         | \$ 90.22 | \$ 85.62 | \$ 81.02 | \$ 76.42 | \$ 71.82 | \$ 67.22 |
|                      | \$ 4.55   | \$ 98.07                         | \$ 93.52 | \$ 88.97 | \$ 84.42 | \$ 79.87 | \$ 75.32 | \$ 70.77 |
|                      | \$ 4.50   | \$ 98.46                         | \$ 96.82 | \$ 92.32 | \$ 87.82 | \$ 83.32 | \$ 78.82 | \$ 74.32 |
| for Max Payment Rate | \$ 4.54   | \$ 4.48                          | \$ 4.41  | \$ 4.34  | \$ 4.28  | \$ 4.22  | \$ 4.16  |          |
| Zero Payment Price   | \$ 6.06   | \$ 5.97                          | \$ 5.88  | \$ 5.79  | \$ 5.71  | \$ 5.63  | \$ 5.55  |          |

## 2010 INPUT COSTS

### Bill Knudson

Commodity prices appear to have stabilized. It also appears that input prices have stabilized. Fertilizer prices in particular have returned to more normal levels. Diesel prices also appear to be level. However, there is a potential for diesel prices to increase. Interest rates will remain low, but access to credit may remain difficult with loans going only to the best credit risks.

### Fertilizer

Fertilizer prices have finally begun to retreat to more rational levels. Table 1 below shows the retail prices for some typical fertilizers in January of 2009 and January of 2010.

**Table 1.**

| <b>Retail Fertilizer Prices – January 19, 2009 and<br/>January 19, 2010</b> |        |        |                |
|---|--------|--------|----------------|
|   | 2009   | 2010   | Percent Change |
| MAP   | 577.50 | 467.95 | -19.0          |
| Potash  | 850.28 | 508.94 | -40.1          |
| Urea  | 424.43 | 417.19 | -1.7           |
| Anhydrous   | 625.12 | 471.91 | -24.5          |
| Anhydrous   | 382.00 | 276.86 | -27.5          |

Source: DTN.

Phosphate prices and essentially fallen in by about 20% compared to a year earlier. Potash prices have declined by more than 40%. Compared to other fertilizer prices urea is relatively unchanged declining by only 1.7%. Anhydrous ammonia and UAN 28 is down by roughly 25%.

There are two things to consider when analyzing these figures. The first is that prices are likely to rise as farmers make their purchases as planting season approaches. The second is that these figures are national figures. Prices in Michigan may vary somewhat.

### Seed

While fertilizer prices have declined, seed prices continue to increase. This is particularly true of corn and soybean seed. In September 2009, Purdue University estimated the per acre cost of soybean seed to be \$52; the per acre cost of corn seed to be \$94, and the per acre cost of wheat seed to be \$34 in 2010. The price of corn and soybean seed has increased the most dramatically.

According to Bloomberg, Monsanto was considering raising seed prices as much as 42% for their most popular triple stacked varieties. In addition to seed prices increasing supplies are tight for several of the most popular varieties. It may be difficult

to change planting decisions if weather or other events make it difficult to get into the fields this spring. As is the case with fertilizer, actual prices may vary depending on local conditions and changes in the market between when the estimates were generated and actual planting time.

## **Fuel**

Diesel fuel prices have declined from their highs in 2008. According to the Michigan Agricultural Statistics Service, diesel prices in Michigan, Minnesota and Wisconsin declined from \$3.61 a gallon in 2008 to \$1.69 a gallon in 2009; a decline of 53.2%. Prices have rebounded somewhat from these lows. It should be noted that a decline in the value of the dollar or a disruption of global fuel supplies, could push the price higher. If the global economy begins to recover the demand for fuel may increase also driving prices higher. On the other hand, if the value of the dollar increases the price of fuel may decline. Forecasting the future price of fuel is difficult, but there is a strong likelihood that prices will remain relatively stable in the upcoming year.

## **Interest Rates**

Interest rates remained low throughout 2009, but credit conditions for some producers remained difficult, as credit was often extended only to those with the best credit worthiness. Interest rates in third quarter of 2009 were almost unchanged from 2008. According to the Federal Reserve Bank of Chicago, interest rates in the region which includes the Lower Peninsula, most of Indiana and Illinois, Iowa and the southern and western part of Wisconsin were 6.17% for operating loans and 6.13% for real estate loans.

Interest rates are likely to remain stable in 2010. The recovery if it occurs will be feeble and the Federal Reserve will continue its expansionary monetary policy until at least the latter part of 2010. Recent activity by the Fed has left interest rates unchanged.

## **MICHIGN FARMLAND VALUES DECLINE AFTER A 21 YEAR RUN**

**Eric Wittenberg and Steve Hanson**

It was bound to happen someday and that day finally arrived. Michigan farmland values experienced a decline after a long and steady period of growth. Last year was the first decline in agricultural-use land values since the annual Michigan Land Value Survey began in 1992, and the first decline for Michigan in 22 years. The annual Michigan Land Value Survey conducted in the spring of 2009 by the Department of Agricultural, Food, and Resource Economics at Michigan State University collects information on the value of different types of land across the State of Michigan. The 2009 survey reported land values, when compared with 2008, declined around 0.8 % statewide. Average farmland values in spring 2009 were reported to be:

|                           | <b>Southern Lower Peninsula</b> | <b>Michigan</b> |
|---------------------------|---------------------------------|-----------------|
| Tiled field crop land     | \$3,647                         | \$3,425         |
| Non-Tiled field crop land | \$2,911                         | \$2,656         |
| Sugar Beet land           | \$3,407                         | \$3,292         |
| Irrigated land            | \$3,790                         | \$3,603         |
| Fruit Trees               | \$6,009                         | \$5,782         |

The USDA reported in its "Land Values and Cash Rents 2009 Summary" that Michigan's agricultural cropland prices decreased 3.2% during 2008 to an average price of \$3,370 per acre. According to USDA statistics, the last time farmland values in Michigan experienced a decline was 1987.

The most recent data on land prices from the Federal Reserve Bank of Chicago found Michigan land prices remained constant (no change) from October 1, 2008 to October 1, 2009. All other states in the Federal Reserve's Seventh District showed declines between 2% and 7% during this same reporting the period.

Cash rent rates have remained essentially unchanged for tiled, non-tiled and irrigated cropland while rental rates for sugar beet cropland showed some decline. Fifty-three percent of the crop acres were controlled through leasing arrangements, with 83% of those on a cash rent basis. Average Michigan cash rent levels in spring 2009 were:

|                           | <b>Southern Lower Peninsula</b> | <b>Michigan</b> |
|---------------------------|---------------------------------|-----------------|
| Tiled field crop land     | \$116 per acre                  | \$108 per acre  |
| Non-Tiled field crop land | \$ 85 per acre                  | \$ 76 per acre  |
| Sugar Beet land           | \$144 per acre                  | \$139 per acre  |
| Irrigated land            | \$180 per acre                  | \$173 per acre  |

Additional details on land values and cash rents across the state are reported in the Department of Agricultural, Food, and Resource Economics Selected Agricultural Economics Reports that can be found on the web at:  
<http://www.aec.msu.edu/aecreports/index.htm>.

Michigan farmland values are influenced by both the agriculture and non-agriculture sectors. Land values are influenced by a combination of factors including the health of the ethanol industry, commodity markets, interest rates, and commercial and residential development. While Michigan agriculture is very diverse, major commodity crops, along with livestock, continue to play an important role in determining the value of farmland in many areas of the state. Somewhat lower crop prices for cash grain farmers and low milk prices for dairy farmers in 2009 helped soften farmland values. However, current economic conditions suggest the earnings for crop and dairy producers in 2010 should be better than 2009. Wet weather conditions of 2009 hopefully will not be a repeat in 2010. Currently, crop and milk prices are at or close to costs which will likely keep land prices stable in the short run.

Energy and oil prices have become a major factor impacting agriculture profitability and are affecting land prices in complex ways. The actual impacts are difficult to predict because, while higher energy costs increase the cost of production, they also increase the demand for bio-based fuel alternatives such as ethanol and bio-diesel which could increase demand for agricultural outputs (e.g., corn for ethanol production). While energy prices have dropped from record 2007-08 levels, they still remain historically high. Adjustment in supply (e.g., through OPEC production targets) and demand (as the global economy stabilizes) will continue to create volatility in the cost of energy and its impact on land prices.

Interest rates also impact land values in a variety of ways. As interest rates decline, the cost of borrowed funds for land purchases decreases. Through 2009, the Federal Reserve held the Federal Funds Rate (the interest rate banks charge each other for overnight loans) constant at 3.25% in an effort to stimulate the weakened economy. The WSJ Prime Rate (the base rate on corporate loans posted by at least 75% of the nation's 30 largest banks) is also currently 3.25%. Interestingly, long-term agricultural interest rates have not followed the steep drop in short-term rates. GreenStone Farm Credit Services reports 30-year fixed rate loans for agricultural real estate currently ranging from 7.15 to 8.45%. The linkage between long-term and short-term interest rates seems to have weakened as today's globalized financial markets work to assess long-term lending risks. This means the cost to finance land purchases has not provided the investment stimulus that lower rates have created in some other sectors.

Historically, a strong agriculture market in the 1970s ended sharply in 1981 and land prices softened dramatically until the late 1980s. Between 1987 and 2008, the price for farmland in Michigan has increased each year thanks to the combined effect of a strong agricultural sector and demand from the non-agricultural sector for uses such as residential development, recreational use, and commercial development. The demand for non-farm agricultural use has declined as Michigan's economy has continued to weaken. The 2009 MSU survey found the average non-agricultural-use value for undeveloped land in Michigan to be \$6,514 per acre for residential development, \$27,882 per acre for commercial/industrial development, and \$3,134 per acre for recreational development. Both residential and recreational land values declined last year while commercial/industrial land essentially held its value. A decline in non agricultural-use values for land tends to soften the demand for farm land in surrounding areas.

The US economic crisis has affected agricultural land values and helped land prices to level off. However, agricultural land prices have not seen the significant

adjustments that have occurred in residential and, more recently, commercial real estate values. The decline can also partially be attributed to producers and investors realizing that the historically high corn and soybean prices of 2008 would not continue into the future. The softening of agricultural land values appears to be concentrated on “marginal” tracts such as those with poorer soil characteristics or drainage issues. The value of quality land in good locations continues to remain stable or even increasing in some markets. Agricultural producers wanting to expand their operations and outside investors will likely continue to focus on the quality and location factors continuing to put upward pressure on “good” farm land in prime locations. Overall, Michigan agricultural land values should remain stable or increase slightly during 2010.

## **2010 ANNUAL CROP OUTLOOK**

**Jim Hilker**

### **Corn**

In the last seven years, we have had the seven highest U.S. corn yields and corn production years on record. Who would have guessed it! The 2009 U.S. corn yield of 165.2 bushels per acre smashed the previous record of 160.3 bushels per acre set in 2004. And, the really amazing part of it is the 2009 growing season was far from ideal. What could the yield have been with the ideal growing weather conditions we had in 2004? It really looks like we may be increasing corn yields at an increasing rate! Will we see another record in 2010?

The annual average corn price forecast in this outlook does not show much of a change. However, one thing we do know is that things can and will likely change, and often very fast. Corn prices will likely remain very volatile as we go through the year.

### **2009-10**

The 2009 growing year over much of the Corn Belt started out cool and wet, which led to late plantings in many areas and/or fields. That was followed by a cool growing season which slowed maturity. On top of that, it was very dry in a lot of areas over some long periods of time. Whether it was the cool weather, or new varieties, or some combination, most of the corn crop came through the drought period in very good shape. However, due to the late maturity, corn harvest started late and was not completed at the time of the last Crop Progress Report on December 20.

While we had record corn yields in 18 states, as well as the U.S., this crop has some problems. Test weight is lower than normal, partially due to late maturity, and therefore harvest; it did not dry down in the fields very well. Much of it had to be harvested in the high 20's and very little was harvested under 18% moisture. The scary part is, how well will it store?

Farmers planted a half million more acres of corn, 86.5 million, and harvested a million more acres of corn for grain, 79.6 million, in 2009 versus 2008. Total 2009 corn production came in at 13,151 million bushels, 113 million more bushels than the previous record set in 2007. The amazing part is that we planted 7 million less acres in 2009 than 2007! And, the 150.7 bushel per acre yield in 2007 was the second highest on record up to that date. The 2009-10 beginning stocks were 1,673 million bushels, which, when added to production, gave us a total supply of 14,834 million bushels; a record supply. See Table 1 - Supply/Demand Balance Sheet for Corn.

Michigan recorded a record corn crop in 2009, as it did the past two years. And, has had its five largest crops in the past five years. Michigan's 2009 corn yield was 148 bushels per acre, one bushel higher than the previous record set in 2006. Michigan planted 2.35 million acres of corn in 2009, down 50,000 acres from 2008, and harvested 2.1 million acres, down 40,000. However, yield was up 10 bushels per acre from 2008.

As we enter into February, the sixth month of the marketing year, we are getting a pretty good handle on use/demand, other than exports. The Quarterly Stocks Report gave us a pretty good idea of the feeding rate in the first quarter. It, along with the

slaughter to date, the last Hogs and Pigs Report, along with the latest Cattle-On-Feed and Cattle Inventory Reports, give us a pretty good idea of the number of animals that have been and will be fed. The USDA projected 2009-10 corn used for feed will be up 304 million bushels, 5.8%. More of this is due to a greater amount of feed fed per animal rather than more animals being fed. Live cattle slaughter weights are up around 15 pounds per head.

We also need to remember that “feed use” is actually feed use and residual. Or, in other words, this is where any errors in the projections are by definition. This is not to say I doubt the USDA’s 2009 corn production, in fact my guess is it is near correct. But when you have to make a projection like this year, without all the corn harvested, there is a greater chance of error.

The USDA is projecting corn used for ethanol use during 2009-10 at 4,200 million bushels, up 523 million bushels, about 11.3 billion gallons of ethanol. Corn used for other industrial uses is projected to drop a little as the economy has slowed, putting total FSI use at 5,470 million bushels. This puts total domestic use at 11,020 million bushels, 822 million bushels more than the previous year, as shown in Table 1.

As can be seen in Table 1, 2009-10 U.S. corn exports are expected to be up about 392 million bushels, 21%, from 2008-09. There are several reasons, and they may change. World corn production is up due to the large U.S. crop, dropping prices some. However, the rest of the world corn production is down a bit, giving us a bit less competition. And, despite a recent strengthening in the dollar, a weaker dollar over the 2009-10 marketing year-to-date, versus last year, makes our corn a little cheaper relative to other currencies. What the world and U.S. crops look like in late June and July could also greatly affect the final export number.

Projected 2009-10 ending stocks are 1,764 million bushels, 13.5% of use. In the old days, prior to fall 2006, this would mean corn prices in the \$2.45 per bushel range. But in the oil/gas/ethanol times we are now in, the price of fuel and the ethanol mandates play a large role. The weighted average annual price of corn this marketing year is expected to be in the \$3.70 range, plus or minus a bunch.

## **2010-11**

So how many corn acres will U.S. corn farmers plant this spring? To come up with that forecast we need to look at how many acres may be available, and what are the expected returns over variable cash costs of corn, and other crops which compete for the same acres. We also need to know how many acres are needed to meet projected use and leave a comfortable level of ending stocks, say 11-12% of projected use. As you will see discussed below, I project we will need about 13,400 million bushels of corn for use, and about 1,550 million bushels of ending stocks to have a stocks-to-use level of 11.5%. Given beginning stocks of 1,764 million bushels, and a trend yield around 160 bushels per acre (discussed below), we would need to plant 3 million more acres, 89.5 million.

So let’s look at the supply side of things. We already know from the Winter Wheat Seeding Report that 6.2 million less acres of winter wheat were planted, but not all of the non-planted acres can all grow corn and soybeans. Some of those unplanted wheat acres just mean less wheat/soybean double cropping. There are also over 2

million acres coming out of CRP. On top of that, we planted less acres of the seven principle crops last year than the previous year. So there are certainly 3 million additional acres that could be available to plant to corn.

Another consideration is which crop will give you the highest returns to fixed costs. So using today's new crop bids for corn and soybeans, and input prices you could have had over the past several weeks, and low and behold, it is about a toss-up for much of Michigan, but corn appears to have an advantage on the prime corn land across the Corn Belt. What does this tell me, again, the 3 million acres needed will be available given today's relative prices and levels, i.e., above variable costs.

The other 4.2 million acres unused wheat land and some of the CRP land not used for corn will likely be planted to soybeans, discussed below, cotton, which has had a big drop off in acres the past couple of years, and sorghum and barley which can do better on some of the wheat land not sown than corn and soybeans can.

The USDA will release the Planting Intentions Report on March 31, based on a first week of March survey. And, while the Planting Intentions Report provides very good information, over the last several years farmers have not hesitated to change their planting intentions based on what the market/weather is telling them until the last planter has pulled out of the field, after the double crop planting time period has passed.

From the discussion above, I am projecting that planted corn acres for 2010 will be 89.5 million acres, up 3 million from 2009. At this point, we have to go with the U.S. trend yield for 2009 of 160.5 bushels per acre. I have finally bowed to using what USDA uses, a trend line covering only 1991-2009. While short trend lines scare me, I would prefer at least another 10 years; my trend line using 1978-2009 would only show a trend yield of 156 bushels per acre in 2010. I can no longer buy that.

After subtracting off the average number of acres used for silage, and average acres not harvested due to some disaster, I project 82.1 million acres of corn will be harvested for grain. These numbers would indicate a 13,177 million bushel corn crop, which would just beat out 2009's record. And, when we add the beginning stocks to that figure, we come up with a total supply of 14,951 million bushels, as shown in the third column of Table 1.

Michigan farmers planted 120,000 less acres of wheat this past fall. My best analysis is that these acres will be split between corn and soybeans. If that is the case, and we get near our 2009 trend corn yield of 140 bushels per acre, Michigan will be looking at its second largest crop on record, just behind 2009.

On the use side, already mentioned above, total feed use is expected to be a little less in 2010-11 relative to 2009-10. The last Hogs and Pigs Report indicates the pork breeding herd is cutting back. That will clearly affect the 2010-11 marketing year. The Cattle Inventory Report shows breeding stock down as well. There will also be more distillers' grain available for feed. On the positive side, livestock returns should improve by 2010-11, which should keep feed use from dropping too much.

The next biggest user of corn used will continue to be ethanol; it is expected to increase enough to meet the mandates. While returns to ethanol producers will not go

back to the glory days, the corn crop should be big enough and gas prices high enough to keep the spread profitable. Other industrial uses of corn are expected to remain level.

Exports are expected to return to grow marginally with normal world crops. There is the danger that the world economy will continue to struggle, but the consensus is we will begin to see a turn-around in the world economy over the 2010-11 time period. All of the above projected uses can be seen in Table 1.

Total use is expected to grow more than production, lowering ending stocks, as show in Table 1. Ending stocks as a percent of use is expected to be 12%. However, rather than having prices in the \$2.50 range, oil prices in the \$50-\$60 range and the ethanol mandates will likely keep the prices in the high \$3.00 range.

**TABLE 1**  
**SUPPLY/DEMAND BALANCE SHEET FOR CORN**

|                                       | 2002-<br>2003 | 2003-<br>2004 | 2004-<br>2005 | 2005-<br>2006 | 2006-<br>2007 | 2007-<br>2008 | Est.<br>2008-<br>2009 | Proj.<br>2009-<br>2010 | Hilker<br>2010-<br>2011 |
|---------------------------------------|---------------|---------------|---------------|---------------|---------------|---------------|-----------------------|------------------------|-------------------------|
| <hr/>                                 |               |               |               |               |               |               |                       |                        |                         |
| <b>(Million Acres)</b>                |               |               |               |               |               |               |                       |                        |                         |
| Acres Planted                         | 78.9          | 78.6          | 80.9          | 81.8          | 78.3          | 93.5          | 86.0                  | 86.5                   | 89.5                    |
| Acres Harvested                       | 69.3          | 70.9          | 73.6          | 75.1          | 70.6          | 86.5          | 78.6                  | 79.6                   | 82.1                    |
| Bu./Harvested Acre                    | 129.3         | 142.2         | 160.4         | 148           | 149.1         | 150.7         | 153.9                 | 165.2                  | 160.5                   |
| <hr/>                                 |               |               |               |               |               |               |                       |                        |                         |
| <b>(Million Bushels)</b>              |               |               |               |               |               |               |                       |                        |                         |
| Beginning Stocks                      | 1596          | 1087          | 958           | 2114          | 1967          | 1304          | 1624                  | 1673                   | 1764                    |
| Production                            | 8967          | 10089         | 11807         | 11114         | 10531         | 13038         | 12092                 | 13151                  | 13177                   |
| Imports                               | 14            | 14            | 11            | 9             | 12            | 20            | 14                    | 10                     | 10                      |
| <b>Total Supply</b>                   | <b>10578</b>  | <b>11190</b>  | <b>12776</b>  | <b>13237</b>  | <b>12510</b>  | <b>14362</b>  | <b>13729</b>          | <b>14834</b>           | <b>14951</b>            |
| <hr/>                                 |               |               |               |               |               |               |                       |                        |                         |
| <b>Use:</b>                           |               |               |               |               |               |               |                       |                        |                         |
| Feed and Residual                     | 5563          | 5798          | 6158          | 6155          | 5591          | 5913          | 5246                  | 5550                   | 5450                    |
| Food, Seed and Ind.                   | 2340          | 2537          | 2686          | 2981          | 3490          | 4387          | 4953                  | 5470                   | 5880                    |
| Ethanol for Fuel                      | 996           | 1168          | 1818          | 2134          | 2125          | 2437          | 1858                  | 2050                   | 2075                    |
| <b>Total Domestic</b>                 | <b>7903</b>   | <b>8335</b>   | <b>8844</b>   | <b>9136</b>   | <b>9081</b>   | <b>10300</b>  | <b>10198</b>          | <b>11020</b>           | <b>11330</b>            |
| Exports                               | 1588          | 1897          | 1818          | 2134          | 2125          | 2437          | 1858                  | 2050                   | 2075                    |
| <b>Total Use</b>                      | <b>9491</b>   | <b>10232</b>  | <b>10662</b>  | <b>11270</b>  | <b>11206</b>  | <b>12737</b>  | <b>12056</b>          | <b>13070</b>           | <b>13405</b>            |
| <hr/>                                 |               |               |               |               |               |               |                       |                        |                         |
| Ending Stocks                         | 1087          | 958           | 2114          | 1967          | 1304          | 1624          | 1673                  | 1764                   | 1546                    |
| Ending Stocks,<br>% of Use            | 11.5          | 9.4           | 19.8          | 17.5          | 11.6          | 12.8          | 13.9                  | 13.5                   | 11.5                    |
| <hr/>                                 |               |               |               |               |               |               |                       |                        |                         |
| U.S. Loan Rate                        | \$1.98        | \$1.98        | \$1.95        | \$1.95        | \$1.95        | \$1.95        | \$1.95                | \$1.95                 | \$1.95                  |
| <hr/>                                 |               |               |               |               |               |               |                       |                        |                         |
| U.S. Season Average                   |               |               |               |               |               |               |                       |                        |                         |
| Farm Price, \$/Bu.                    | \$2.32        | \$2.42        | \$2.06        | \$2.00        | \$3.04        | \$4.20        | \$4.06                | \$3.70                 | \$3.90                  |
| <hr/>                                 |               |               |               |               |               |               |                       |                        |                         |
| Source: USDA and Jim Hilker. (2/1/10) |               |               |               |               |               |               |                       |                        |                         |

## **Wheat**

The U.S. winter wheat producers have spoken; they planted 6.2 million less acres of winter wheat last fall, down 14.3%, and this was on top of the 4.1 million acre cutback last year. Michigan producers cut back wheat acres from 620,000 for the 2009 wheat crop to 500,000 planted acres for the 2010 crop, a reduction of 19.3%. Some of the cutbacks were due to weather, including late harvest of other crops, and some due to low relative prices.

### **2009-10**

After two poor wheat crops across the world, including the U.S., in the 2006-07 and 2007-08 marketing years (June-May) led to record high wheat prices, for the second year in a row both the U.S. and world wheat crops were plentiful. In fact, the world set a new wheat production record of 683 MMT in 2008-09, and just missed matching it at 676 MMT estimated for 2009-10.

The 2009-10 U.S. wheat crop comes from planting 59.1 million acres, a 4.1 million acre decrease in acres planted, harvesting 43.9 million acres, and the second highest U.S. average wheat yield on record, just below last year's 44.9 bushel per acre, of 44.4 bushel per acre. The 2,206 million bushel wheat crop was down 11.3% from 2008, but was still the second largest crop, after last year since 2003. And when the 2009 wheat crop is added to the plentiful beginning stocks, total 2009-10 wheat supply was greater than 2008-09. See Table 2 below.

Michigan harvested 69 bushels per acre, in 2009 on the 560,000 acres harvested of the 620,000 acres planted, 38.64 million bushels, down from 49 million bushels. The 69 bushels per acre yield was the same as 2008, but 4 bushels per acre lower than the great 2006 state average yield of 74.

Eight months into the marketing year it appears wheat used for food will barely top last year by 1.4%. And seed use is projected to down with the lower plantings. Wheat used for feed is projected to be down 34% from last year's very high level, but about average. This leaves estimated total domestic use down 78 million bushels, 6%.

Then comes projecting 2008-09 wheat exports. While we have plenty of wheat, so does the rest of the world. Wheat export inspections and export sales to date, again eight months in, give us a pretty clear indication that wheat exports are, and will be down significantly. The USDA has projected 2009-10 exports will be 825 million bushels, down 190 million bushels, or 18.7%. Total use is projected to be down 268 million bushels, 11.8%.

Increased supply, decreased use, makes for larger ending stocks. Larger ending stocks and lower use, makes for a higher ending stocks-to-use ratio, 48.6%, which means lower prices. What does 48.6% really mean? For every two bushels of wheat that was used, we have one bushel of wheat left over! See the middle column of Table 2.

### **2010-11**

To project 2010-11 wheat planted acres I will start with the 37.1 million acres that was reported planted in the winter wheat seeding report. And then, I will assume the

same amount of spring and durum wheat will be planted as last year. And while that is not always the case, I don't see a lot of competition for those acres. That would put 2010-11 wheat planted acres at 59 million. From that I will subtract the average number of acres not harvested, and project 43.9 million acres of wheat will be harvested.

The trend wheat yield for 2009 is 43 bushels per acre. Lower yield, fewer harvest acres, means lower production. The problem is extremely high beginning stocks, left over from this year. When you add the two together, total supply is projected to be about the same as this year. See the last column of Table 2.

I expect food use to go up a couple of percent with population growth, less meat available, and affordable due to continued high employment and stagnant incomes. And, if the world returns to a trend yield, I expected exports of jump 15%, albeit from a low level. This would put total use up 157 million bushels, 8%.

Equal total supply, and a little bit more use, adds up to a 153 million bushel decrease in ending stocks and a healthy reduction in the stock-to-use ratio. Generally, a lower ending stock-to-use ratio means higher prices, and I show a higher projected 2010-11 price in Table 2 below. However, given the still relatively large ending stocks, the relative price of wheat remains low.

**TABLE 2**  
**SUPPLY/DEMAND BALANCE SHEET FOR WHEAT**

|                           | 2003-<br>2004 | 2004-<br>2005 | 2005-<br>2006 | 2006-<br>2007 | 2007-<br>2008 | Est.<br>2008-<br>2009 | Proj.<br>2009-<br>2010 | Hilker<br>2010-<br>2011 |
|---------------------------|---------------|---------------|---------------|---------------|---------------|-----------------------|------------------------|-------------------------|
| <hr/>                     |               |               |               |               |               |                       |                        |                         |
| <b>(Million Acres)</b>    |               |               |               |               |               |                       |                        |                         |
| Acres Planted             | 62.1          | 59.7          | 57.2          | 57.3          | 60.5          | 63.2                  | 59.1                   | 52.9                    |
| Acres Harvested           | 53.1          | 50.0          | 50.1          | 46.8          | 51.0          | 55.7                  | 49.9                   | 43.9                    |
| Bu./Harvested Acre        | 44.2          | 43.2          | 42.0          | 38.6          | 40.2          | 44.9                  | 44.4                   | 43.3                    |
| <hr/>                     |               |               |               |               |               |                       |                        |                         |
| <b>(Million Bushels)</b>  |               |               |               |               |               |                       |                        |                         |
| Beginning Stocks          | 491           | 546           | 540           | 571           | 456           | 306                   | 657                    | 976                     |
| Production                | 2345          | 2158          | 2105          | 1808          | 2051          | 2499                  | 2216                   | 1901                    |
| Imports                   | 68            | 71            | 82            | 122           | 113           | 127                   | 110                    | 110                     |
| <b>Total Supply</b>       | <b>2904</b>   | <b>2775</b>   | <b>2727</b>   | <b>2501</b>   | <b>2620</b>   | <b>2932</b>           | <b>2983</b>            | <b>2987</b>             |
| <hr/>                     |               |               |               |               |               |                       |                        |                         |
| <b>Use:</b>               |               |               |               |               |               |                       |                        |                         |
| Food                      | 907           | 910           | 915           | 938           | 948           | 927                   | 940                    | 960                     |
| Seed                      | 80            | 78            | 78            | 82            | 88            | 75                    | 72                     | 74                      |
| Feed and Residual         | 212           | 182           | 160           | 117           | 16            | 258                   | 170                    | 180                     |
| <b>Total Domestic</b>     | <b>1194</b>   | <b>1169</b>   | <b>1152</b>   | <b>1137</b>   | <b>1051</b>   | <b>1260</b>           | <b>1182</b>            | <b>1214</b>             |
| Exports                   | 1159          | 1066          | 1003          | 908           | 1263          | 1015                  | 825                    | 950                     |
| <b>Total Use</b>          | <b>2353</b>   | <b>2235</b>   | <b>2155</b>   | <b>2045</b>   | <b>2314</b>   | <b>2275</b>           | <b>2007</b>            | <b>2164</b>             |
| <hr/>                     |               |               |               |               |               |                       |                        |                         |
| Ending Stocks             | 546           | 540           | 571           | 456           | 306           | 657                   | 976                    | 823                     |
| Ending Stocks,<br>%of Use | 23.2          | 24.2          | 26.5          | 22.3          | 13.2          | 28.9                  | 48.6                   | 38.0                    |
| <hr/>                     |               |               |               |               |               |                       |                        |                         |
| U.S. Loan Rate            | \$2.80        | \$2.75        | \$2.75        | \$2.75        | \$2.75        | \$2.75                | \$2.75                 | \$2.75                  |
| <hr/>                     |               |               |               |               |               |                       |                        |                         |
| U.S. Season Average       |               |               |               |               |               |                       |                        |                         |
| U.S. \$/Bu.               | \$3.40        | \$3.40        | \$3.42        | \$4.26        | \$6.48        | \$6.78                | \$4.85                 | \$5.40                  |
| Michigan \$/Bu.           | \$3.35        | \$3.01        | \$3.13        | \$3.41        | \$5.01        | \$5.65                | \$4.00                 | \$4.40                  |

Source: USDA and Jim Hilker. (2/4/10)

## **Soybeans**

We came in to the 2009-10 marketing year with extremely low U.S. beginning stocks, and it appears we will end with sufficient ending stocks. What will 2010-11 bring with respect to ending stocks? And, what role will South America play?

### **2009-10**

Record yield, record planted and harvested acres, means the largest U.S. soybean crop. Producers planted 1.7 million more acres of soybeans in 2009, and despite the weather, already discussed in the corn section, harvested 44 bushels per acre. The previous high was 43 bushels per acre in 2005. The record crop came in at 3,361 million bushels, up from the 2,967 million last year, and from the previous record production of 3,197 million in 2006. However, due to very small beginning stock in 2009-10, 4.5% of use, and the humongous beginning stocks in 2006-07, 18.6% of use, the 2009-10 total supply, was not a record despite the record crop size. See the second column of Table 3.

Michigan planted 2.0 million acres of soybeans in 2009, up 100,000 acres from 2008. The State of Michigan averaged 40 bushels per acre, 3 bushels per acre higher than last year. While 40 bushels per acre is about Michigan's trend yield, and is the second highest yield we have had, although it has been achieved before, it is 6 bushels below the record 46 bushels per acre set in 2006.

Crush has picked up some from the dismal levels seen in the 2008-09 marketing year, but is still not projected to recover to the levels seen in 2006-07 and 2007-08 years. Crush is projected to be 1,710 million bushels, up 48 million bushels, 2.9%, as both domestic and especially foreign demand for U.S. soy oil and soy meal are up. The USDA is expecting seed use to be about the same and feed and residual use is expected to remain at more normal levels.

Exports, exports, exports are the big driver for soybeans this year to date. Export Inspections year-to-date, those bushels already shipped, are running 40% ahead of last year, five months into the 2009-10 marketing year. Export sales year-to-date, the above bushels plus those contracted for export, are running 43% ahead of the 2008-09 when we had record exports. Soybean exports for 2009-10 are projected to be up 7%. How can you reconcile only a 7% increase in projected exports given the exports and sales to date? It's called massive crops coming on in both Brazil and Argentina. Up until their harvest, which begins soon, the U.S. had the available soybeans; soon it will be South America. China will account for about half of U.S. soybean exports again this year.

The above discussion puts total use for 2009-10 at 3,262 million bushels, up 215 million bushels from last year when we had tight supplies. However, because total supplies grew an even faster 322 million bushels, this allowed projected ending stocks to grow 107 million bushels. This puts projected 2009-10 ending stocks at 245 million bushels, 7.5% of use. And will lead to a somewhat lower annual average price. See Table 3.

## **2010-11**

Please go back and read the first three paragraphs of corn, under the subtitle 2009-10. In that section, I discuss why I think both corn and soybean planted acres will be up about 2 million acres this spring. That would have U.S. producers planting around 77.8 million acres of soybeans. The 2009-10 trend yield for U.S. soybeans is 42.5 bushels per acre. The outcome of these assumptions would be 2009 U.S. soybean production of 3.26 billion bushels, which would be a record. However, due to much smaller beginning stocks in 2006-07, total supply will be 130 million bushels below the record supply in 2006-07. Check out the third column of Table 3 where I put these projections in order.

As stated earlier, Michigan farmers planted 160,000 less acres of wheat this past fall. My best analysis is that these acres will be split between soybeans and corn as well, for the same reasons discussed with corn, about the same expected returns per acre. If that is the case, and we get near our 2009 trend soybean yield of 40 bushels per acre, Michigan will be looking at a very large soybean crop.

On the 2009-10 use side, my projection calls for U.S. crush returning back to a more normal level, but not quite to the previous highs. This is based on a projected leveling out to a slight improvement of the nasty situation in the livestock industries, and the world economy as we move into 2010. As long as we have trend world soybean yields in 2009, I would expect U.S. exports to remain about the same to some improvement as shown. This suggests that the South American soybean crop will be larger next year, and that while the world may again increase soybean use, I suspect it will be at a much slower rate of increase for the two years or so.

The 2009-10 soybean total use projection is a healthy 117 million bushels above this year, and if it occurs, will be a record disappearance, slightly edging out the 2006-07 use level. However, due to the much larger increase in total supply relative to total use, the projected ending stocks almost double in size. In the "old" days, this would probably mean a soybean price in the \$6.00-\$7.00 per bushel range. However, given the high correlation of corn and soybean prices, I am forecasting an average annual price of \$8.00 per bushel, hardly two times that of corn. But, in order for my forecast to have an 80% chance of being accurate, I will forecast that prices will be between \$5.00 and \$13.00 dollars per bushels this fall. The point being, soybean, wheat, and corn markets are likely to stay extremely volatile.

**TABLE 3**  
**SUPPLY/DEMAND BALANCE SHEET FOR SOYBEANS**

|  | 2002-<br>2003 | 2003-<br>2004 | 2004-<br>2005 | 2005-<br>2006 | 2006-<br>2007 | 2007-<br>2008 | Est.<br>2008-<br>2009 | Proj.<br>2009-<br>2010 | Hilker<br>2010-<br>2011 |
|--|---------------|---------------|---------------|---------------|---------------|---------------|-----------------------|------------------------|-------------------------|
| <hr/>                                  |               |               |               |               |               |               |                       |                        |                         |
| <b>(Million Acres)</b>                 |               |               |               |               |               |               |                       |                        |                         |
| Acres Planted                          | 74            | 73.4          | 75.2          | 72            | 75.5          | 64.7          | 75.7                  | 77.5                   | 78.9                    |
| Acres Harvested                        | 72.5          | 72.3          | 74.0          | 71.3          | 74.6          | 64.1          | 74.7                  | 76.4                   | 77.9                    |
| Bu./Harvested Acre                     | 38.0          | 33.9          | 42.2          | 43.0          | 42.9          | 41.7          | 39.7                  | 44.0                   | 43.0                    |
| <hr/>                                  |               |               |               |               |               |               |                       |                        |                         |
| <b>(Million Bushels)</b>               |               |               |               |               |               |               |                       |                        |                         |
| Beginning Stocks                       | 208           | 178           | 112           | 256           | 449           | 574           | 205                   | 138                    | 245                     |
| Production                             | 2756          | 2454          | 3124          | 3063          | 3197          | 2677          | 2967                  | 3361                   | 3350                    |
| Imports                                | 5             | 6             | 6             | 3             | 9             | 10            | 13                    | 8                      | 10                      |
| <b>Total Supply</b>                    | <b>2969</b>   | <b>2638</b>   | <b>3242</b>   | <b>3322</b>   | <b>3656</b>   | <b>3261</b>   | <b>3185</b>           | <b>3507</b>            | <b>3604</b>             |
| <b>Use:</b>                            |               |               |               |               |               |               |                       |                        |                         |
| Crushings                              | 1615          | 1530          | 1696          | 1739          | 1808          | 1803          | 1662                  | 1710                   | 1805                    |
| Exports                                | 1045          | 885           | 1097          | 940           | 1116          | 1159          | 1283                  | 1375                   | 1350                    |
| Seed                                   | 89            | 92            | 88            | 93            | 80            | 93            | 95                    | 94                     | 95                      |
| Residual                               | 41            | 19            | 105           | 101           | 77            | 0             | 6                     | 83                     | 80                      |
| <b>Total Use</b>                       | <b>2791</b>   | <b>2526</b>   | <b>2986</b>   | <b>2873</b>   | <b>3081</b>   | <b>3056</b>   | <b>3047</b>           | <b>3262</b>            | <b>3330</b>             |
| <b>Ending Stocks</b>                   | <b>178</b>    | <b>112</b>    | <b>256</b>    | <b>449</b>    | <b>574</b>    | <b>205</b>    | <b>138</b>            | <b>245</b>             | <b>274</b>              |
| <b>Ending Stocks,<br/>    % of Use</b> | <b>6.4</b>    | <b>4.4</b>    | <b>8.6</b>    | <b>15.6</b>   | <b>18.6</b>   | <b>6.7</b>    | <b>4.5</b>            | <b>7.5</b>             | <b>8.2</b>              |
| <b>U.S. Loan Rate</b>                  | <b>\$5.00</b> | <b>\$5.00</b> | <b>\$5.00</b> | <b>\$5.00</b> | <b>\$5.00</b> | <b>\$5.00</b> | <b>\$5.00</b>         | <b>\$5.00</b>          | <b>\$5.00</b>           |
| <b>U.S. Season Average</b>             |               |               |               |               |               |               |                       |                        |                         |
| Farm Price, \$/Bu.                     | \$5.53        | \$7.34        | \$5.74        | \$5.66        | \$6.43        | \$10.10       | \$9.97                | \$9.65                 | \$9.40                  |
| <hr/>                                  |               |               |               |               |               |               |                       |                        |                         |
| Source: USDA and Jim Hilker. (2/4/10)  |               |               |               |               |               |               |                       |                        |                         |

## **2010 ANNUAL LIVESTOCK OUTLOOK**

**Jim Hilker**

### **Cattle**

Feedlots took less of a bloodbath in 2009 than 2008, but the results were still devastating. The Livestock Marketing Information Center calculated that commercial feedlots feeding out 750 pound feeder steers lost about \$90.00 per head in 2009, better than the \$130.00 per head lost in 2008; the most since the 1970's, but still the second worse since the 1970's. January 2010 was the 32<sup>nd</sup> consecutive month of feedlot losses. This, of course, forces down calf prices leading to a declining beef cow herd, which we expect to decline again during 2010.

The January 1, 2010 Cattle Inventory Report reported the U.S. had 93,701 million head of cattle and calves as of January 1<sup>st</sup>, 0.9% below a year ago, and the smallest since 1959. USDA estimated the total U.S. cow herd at 40.46 million head, 1.4% smaller than a year ago, with the beef cowherd at 31.38 million head, 1.1% smaller than a year ago, and the dairy cowherd at 9.08 million head was down 2.7%.

The U.S. inventory of all cattle and calves for January 1, 2009 was reduced by over 820,000 head, with the beef cow inventory reduced by 336,000 head. The January 1, 2009 beef cow inventory is the smallest reported since 1963, while the number of operations with cattle and calves continued on its downward trend in 2009. The number of heifers held as beef cow replacements at 5.44 million head was 1.7% below a year ago, and the smallest reported since 1990. Given the decline in calf prices, regional droughts, and high fertilizer costs last year, downward trending beef cattle numbers were expected.

USDA reported the 2009 calf crop at 35.82 million head, 0.9% smaller than 2008's, the smallest calf crop since 1950. Given high feedstuff prices in 2009 and the placement of calves at heavier weights, the same scenario as 2008, the estimated number of cattle outside of feedlots was expected to be near last year. As of January 1, the calculated available supply of feeder cattle outside feedlots was 27.54 million head, down just 35,000 head (0.1%) from last year.

All cattle and calves in Michigan on January 1 were at 1,100,000 head, up 3% from previous year. All cows that had calved were at 450,000 head, up 1%. Beef cows were up 4%, at 96,000, after being down 13% last year. Dairy cows numbers were put at 354,000, even with the January 1, 2009. Beef cow replacements were even at 27,000, while dairy cow replacements were up 7% at 158,000 head. Michigan's 2009 calf crop was 380,000, up 5,000 head from the previous year. The survey does not distinguish between beef and dairy calves. Michigan had 170,000 cattle on feed January 1, up 3%. It is not a bad thing to be growing when other are shrinking, if the economy holds up.

U.S. beef production is expected to be down over 2% for 2010 as slaughter is expected to be down 3% with weights being up a percent. Steer prices are expected to average in the \$86-\$89 per cwt. range for all of 2010, after averaging \$83.25 for 2009. With 700-800# feeder steers averaging \$99-103, up from \$97.28, and 500-600# feeder calves averaging \$111-115 per cwt., versus \$109.68 in 2009.

In the first quarter, beef production is expected to be down 0.9%, with steer prices averaging \$86-\$88, feeder steers averaging \$95-\$98, and feeder calves averaging \$107-\$110. In the second quarter, production is expected to be down 3.4%, with steer prices averaging \$87-\$90, feeder steers averaging \$98-\$102, and feeder calves averaging \$112-\$116.

In the third quarter, production is expected to be down 1.4%, with steer prices averaging \$83-\$87, feeder steers averaging \$102-\$108, and feeder calves averaging \$114-\$118. In the fourth quarter, production is expected to be down 2.1%, with steer prices averaging \$87-\$92, feeder steers averaging \$99-\$107, and feeder calves averaging \$108-\$117.

## **Hogs**

Farrow-to-finish hog operations averaged over a \$30 loss per head in 2009, a repeat of 2008; these large losses started in mid 2007 after a three year run of positive returns. The reaction to those losses is starting to show up in declining numbers as will be discussed below. Pork production was down 1.5%, and per capita consumption was down 1.3 pounds in 2009 versus 2008. And, generally when this is the case, you would expect prices to go up; that is if demand doesn't decline. However, the 2009 average National Average Weighted Base carcass prices dropped from \$64.83 per cwt. in 2008 to \$56.87 per cwt. in 2009. That indicates a huge drop off in demand. And, while some of the drop off in demand came from exports being down 1.4%, domestic demand for hogs was down sharply as well.

All hogs and pigs on December 1 were 98.2% of last year. The breeding herd was down 3.5% and is now the smallest breeding herd since the 1800's. Hogs kept for marketing were down 2%. The number of market hogs weighing 180 pounds or more on December 1 was down 2.3% compared to 12 months earlier. The 120-179 pound group was down 2.1%; the 50-179 pound inventory was down 1.9%; and the inventory of pigs weighing less than 50 pounds was down 1.8% compared to a year earlier.

The fall September-November farrowings, this spring's production, were down 1.8%, but the fall pig crop was up 0.2% as pigs per litter were up 2.1%. The continued climb in pigs saved per litter is remarkable. December-February winter farrowing intentions, next summer's production, were down 1.9% and March-May farrowing intentions, next fall's production, were 2.8%. If we continue to climb in pigs saved per litter, we may not see as much of a cutback in production.

Michigan did not seem to fit the mold. The Michigan breeding herd stayed even at 110,000 head, relative to December 1, 2008. Our hogs kept for market were up 5%, putting our total numbers up 5%. Pigs saved per litter for Michigan were up to 9.69 from 9.51, 1.9%.

Pork production is expected to be down 0.9% in 2010, as slaughter is expected to be down 1.2% with weights being up a bit in the last three quarters. Carcass prices (multiply by .72 to have live price projections) are expected to average in the \$63-\$66 per cwt. range for all of 2010, up 13.2% relative to 2009. This price assumes the USDA's 9.6% projected increase in exports occurs and demand levels off to strengthen a bit.

In the first quarter, pork production is expected to be down 1.5%, with carcass prices averaging \$60-\$63, up nearly 6%. In the second quarter, production is expected to be down 0.7%, with carcass prices averaging \$63-\$66 per cwt., up 8% or so. In the third quarter, production is expected to be down 0.7%, with carcass prices averaging \$66-\$69, up around 24%. In the fourth quarter, production is expected to be down 0.7%, with carcass prices averaging \$64-\$67, up around 18%. Maybe we will see some profits in the third quarter.

Per capita consumption in 2010 is expected to drop another 2.9% with the above production slowdown, and is an important factor in the higher prices shown above. Cutbacks in beef production also factor in. While these higher prices will help, they will not completely offset relatively high feed prices, and I expect the breeding herd to continue to shrink into 2011. However, continued efficiency gains, and an eventual return to breakeven returns are expected to keep 2011 production only marginally lower than 2010 and that means a continuation in the drop in per capita consumption.

## 2010 DAIRY SITUATION AND OUTLOOK

### Christopher Wolf

Coming off of the worst milk price margin year for farmers in recent decades – and possibly ever – the prospects for 2010 are improved, but the degree of improvement is dependent on many factors.

### Review of 2009

The boom and bust pattern of the past couple of decades continued in 2009 with a major bust following the boom of 2007. This price cycle reflects the consequences of demand shocks, in this case the recession, on a market with very inelastic (read slow to change quantity in response to price changes) dairy products market. From a U.S. all milk price of \$19.13 per cwt. in 2007, and \$18.29 per cwt. in 2008, 2009 all milk price averaged only \$12.79 per cwt. while feed prices remained relatively high. The result was many herds not covering even feed costs in some months and large total financial losses across the U.S. for the year.

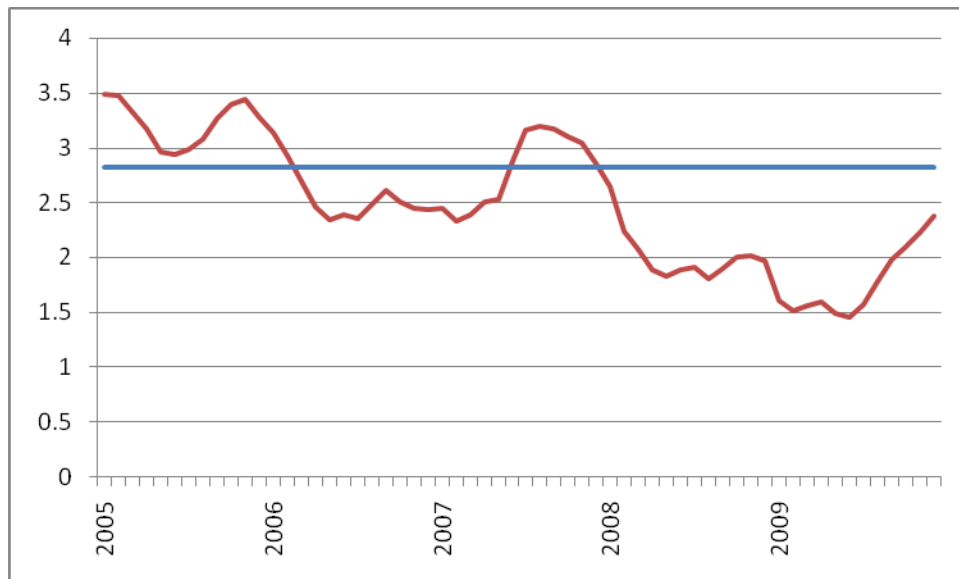


Figure 1. US Milk-to-feed price ration, monthly 2005-2009

The long-run average milk-to-feed price ratio is 2.8. As Figure 1 illustrates, the U.S. milk-to-feed price ratio has been below this level for all of 2008 and 2009. The recovery in late 2009 reflects higher milk prices, but the profitability levels remain dismal.

Herds that were purchasing a majority of feed were very stressed in 2009. Although all regions were stressed, this was a financial crisis that seemed to hit the West and Southwest regions harder than the Upper Midwest and Northeast regions. The West region in particular was hit with high feed prices exacerbated by water shortages. The product mix reflected these regional disparities with large increases in cheese production while butter and non-fat dry milk production tailed off.

The primary reason for the milk price collapse was lost export markets. Prior to 2004, the U.S. regularly exported less than 5% of milk production on a total solids basis. In 2004, the U.S. exported 7.5% of milk production and the percentage of production that was exported increased steadily peaking at 11% in 2008. The global economic crisis of 2008 shrank the demand for dairy products world-wide and dried up credit to finance imports in other countries. The result was that world prices for dairy products, except for dry whey, crashed by 50% or more between late summer and the end of 2008. U.S. exports – both quantity and value – dropped precipitously in 2009 and domestic demand was not enough to absorb that excess production. The result was continued low prices and building product inventories.

As 2009 began, the general consensus was that the dairy herd would need to decline by between 250,000 and 400,000 cows to get back to a break-even price – unless feed costs declined or export markets recovered. The U.S. herd was 9.312 million cows in January and 9.082 million in December a decline of 230,000 cows. The decline in cow numbers was disproportionately from the West region. Michigan was essentially unchanged in total dairy cow numbers while Wisconsin and Minnesota actually grew their herds.

There were many industry and government policy responses to the dire financial situation. The Cooperatives Working Together (CWT) program held three herd buyouts in 2009. All total, these buyouts removed more than 201,000 cows. In addition to the Milk Income Loss Contract (MILC) payments, the U.S. government temporarily increased the price support in the fall and passed legislation to purchase \$60 million in cheese and provide \$290 million in payments to farmers. The bailout payments did not happen until 2010.

Milk prices strengthened as the year went on. The U.S. all milk price finished at 2009 \$16.30 per cwt. Stocks of major products did build in 2009, however, with stocks in November (December was unavailable at press time) up 17.3% in milk fat terms and 12.9% in skim solids terms over one year earlier.

## **Outlook for 2010**

With the drop off in export markets, inventories built in 2009 and put a ceiling on price increases in the short-term. World dairy product markets reflect much higher prices than our domestic market at the current time holding out the possibility that an increase in exports will help the domestic milk price.

The USDA is forecasting that the U.S. dairy herd will average 9 million cows – meaning it will not grow and will even contract slightly in 2010. Meanwhile USDA forecasts that milk per cow will increase 1.9% this year – which is basically the trend increase in milk per cow. On net, USDA forecasts that total milk production will contract modestly.

At the current time, the futures market is offering a Class III price that approaches \$16 per cwt. in the later months of 2010. The Michigan mailbox price has averaged \$1 per cwt. above the Class III price over the past decade so this should translate into something on the order of \$17 per cwt. for Michigan farmers at that time. However, the markets are carefully watching international prices and cattle inventories in the US. At the present time, there are about 47 replacements available for every 100

milk cows. This is a high ratio – from 1995 through 2004 the ratio consistently sat at 43 replacements per 100 milk cows. If the national herd begins to grow again and export markets remain stagnant, milk prices might not recover to break-even levels as quickly.

## **TAXES IN 2009 AND 2010**

**Larry R. Borton**

The Internal Revenue Service's current emphasis is the Tax Gap. This is the revenue that is not collected but is owed. Their estimate was \$345 billion with 80% of the gap from those who file their taxes incorrectly. Non-payment and non-filing comprise the rest of the gap. In an effort to increase correct filing, the IRS will require anyone who prepares taxes for a fee and/or signs a tax form as preparing it for someone else will have to take an initial competency test and annually take continuing education courses. Certified Public Accountants and Enrolled Agents and some Attorneys already have similar requirements, but other tax preparers have not been required, although many tax preparers already take continuing education courses without the requirement just to maintain their knowledge of current tax rules.

In our current environment, cabinet level nominees and chairmen of congressional committees have understated substantial taxes because of disallowed deductions, unreported income, or failure to follow the rules. If those who author the tax laws and manage those that collect the revenue cannot correctly file their taxes, how can we pay our taxes correctly? Two principles should be kept in mind. The first is that all income is taxable unless a law, regulation, or ruling exempts it. The second is that deductions must be allowed by law, regulation, or ruling in order to take them. If there is not some substantial authority or precedent that can be cited, then the income is taxable or the deduction is not allowed. The authority is not always easy to find and interpretation is not always black or white. That compels us to find competent, experienced tax professionals if our tax preparation is complicated.

In 2009, the IRS had a program in Michigan to audit randomly selected returns of dairy farms from the 2007 tax year. While the program's goal was to find deferred income and disallow the deferral which would result in more tax plus penalties and interest, the audits could look at anything on or associated with the tax return. Expect a revenue agent to look closely during an audit at reported income compared to expected income for the farm size and type. Then expect a request for substantiation of all deductions and business expenses. Substantiation means to show invoices, payments, contemporary records or other items that support the deduction or position taken on tax forms or records. Without substantiation deductions will be disallowed.

In 2009, the credit for an estate after the death of a taxpayer allowed \$3.5 million of property to be excluded from estate tax. Basis of property is essentially the original cost plus or minus adjustments like depreciation. A decedent's property received a step-up (or a step-down) in basis to the fair market value on the date of death rather than using the cost of the property when purchased or the remaining depreciable basis of the property. This allowed the property to be sold with little or no gain so the heirs paid virtually no income tax on the gains.

So far in 2010, there is no longer any estate tax, but property can only get a step-up in basis of \$1.3 million with a surviving spouse getting an extra \$3 million. This means that inherited property, if sold, could have income tax due on the gains after these amounts are reached. This is likely to change. Most tax observers expect a limit on the estate exclusion amount to be reinstated and make it retroactive to the beginning of 2010. Congress has been considering this for years, but has not changed it yet.

A list of tax facts for 2009 may be useful in understanding your tax due this year.

- The standard deduction depends on filing status. The married, filing jointly taxpayers get \$11,400. It is increased for those who are elderly or blind. It may also be increased for a casualty loss, sales tax paid on a new vehicle, or real estate taxes up to \$1,000 (\$500 for single). This may require using the new Schedule L.
- The alternative minimum tax (AMT) exemption amount is set at \$70,950. This is a second method to calculate income taxes and must be paid if it's more than the normal calculation method.
- Self employment tax (social security and medicare) is paid on 92.35% of earned income (Schedule F) up to \$106,800 and 2.9% above that. An optional farm method allows a farmer to pay enough to earn four quarters of credit for social security even though income was very low or negative.
- Long term capital gains rates (0% and 15%) are lower than ordinary income tax rates (10%, 15%, 25%, 28%, 31% and 35%).
- Michigan income tax rate remains at 4.35%.
- Credits result in one dollar less in taxes for each dollar of credit while deductions reduce taxes by the marginal tax rate. These credits change frequently and almost always phase out or disappear as income increases. Non-refundable credits are only available if the taxpayer owes tax for the year. Refundable credits get paid to the taxpayer even if no income tax is owed.
  - Making Work Pay Credit amounts to 6.2% of earned income to a maximum of \$1,000 married (\$500 single). Calculate this on the new Schedule M.
  - The American Opportunity Credit is an expansion of the Hope Credit. It can be used during the first four years of college and is 100% of the first \$2,000 paid on tuition and fees plus 25% of the next \$2,000 to a maximum of \$2,500. Up to \$1,000 (40%) may be refundable using a revised Form 8863.
  - The First-time Homebuyer Credit has been extended to June 30, 2010 for closing as long as a purchase contract is signed before May 1, 2010. It is a refundable credit of 10% of the purchase price of a home to a maximum of \$8,000 as long as the taxpayer or spouse has not owned a home for 36 months. Purchaser must be at least 18 years of age and documentation (closing statement) must be included when filing. A taxpayer who has maintained a principal residence for five consecutive years in the prior eight years and purchases a home as their new principal residence may be treated like a first-time homebuyer with a maximum credit of \$6,500. There is a revised Form 5405 for this.
  - Residential Energy Credits are 30% of the cost of qualified energy efficient improvements or property to a maximum of \$1,500 combined for years 2009 and 2010. There is an additional credit for solar, small wind, geothermal or fuel cell property. A revised Form 5405 covers this credit.
  - Child Tax Credit is \$1,000 per child under 17 years at the end of 2009. Although normally nonrefundable, a taxpayer who qualifies for the Additional Child Tax Credit may get a refundable credit.
  - The popular Earned Income Credit (EIC) is refundable with a maximum of \$457 with no children, \$3,043 with one child, \$5,028 with two children,

and \$5,657 with three or more children. Income ranges are broader in 2009 than in 2008. For anyone who qualifies for a federal EIC, Michigan increased its EIC rate from 10% of the federal credit in 2008 to 20% in 2009.

- Depreciation has an unusual wrinkle for most new, seven year farm machinery and equipment. It is required to depreciate as if it were five year property. Direct expensing continued to be \$250,000 for 2009 with phase-out beginning at \$800,000 of qualified property placed into service. The 50% bonus or special depreciation continued in 2009 for all new farm property. It is required to be taken unless the taxpayer elects out of it.
- The Domestic Production Activities Deduction continued at the 6% level in 2009, but increases to 9% in 2010.
- Net Operating Losses for farms may normally be carried back either two years or five years or may be carried forward. A new law allows small businesses including farms to also carry back either four or three years.
- The Cash for Clunkers program was not income to the buyer, but the basis of the vehicle was reduced by the amount of the price reduction.

Now let's look at some other tax items for 2010.

- In the recent past there has been a tendency for tax laws to be extended or adjusted for just one year. This requires Congress to pass new legislation each year to continue popular deductions such as higher AMT exemptions, educator expenses, tuition and fees deduction, and higher section 179 direct expensing. We are waiting for action on these items.
- For 2010 a new Farm Loss Limit is the greater of \$300,000 or the taxpayer's total net farm income for the five prior tax years. This applies to most farms that accept government program payments.
- Many inflation indexed numbers in tax law will have little or no increases in 2010. For example, the personal exemption amount remains at \$3,650 per person. The standard deduction stays at \$11,400 for married, filing jointly and \$5,700 for single, while the Head of Household increases only \$50 to \$8,400.
- While there were many tax consequences in the health care bills, these are uncertain at this time.

Many tax items are expected to be passed in 2010 since it is an election year. Until they are signed into law, it makes tax planning more difficult. Before making major purchasing or selling decisions or business changes, consult your tax practitioner to check on the latest tax consequences.

## **FARM INCOME**

### **David Schweikhardt**

As farmers look toward 2010, much of the farm income outlook will be shaped by the ongoing credit crisis that began in August 2007. Commodity prices, exports, interest expenses, and input costs are all likely to be affected by the credit crisis that reached full force in September 2008 and is likely to continue through 2010 and beyond. Uncertainties about the direction that the credit crisis will take in 2010, variations in income outlook across agricultural sectors (e.g., livestock versus crop sectors) will continue to dominate the farm income outlook for 2010.

During 2008, U.S. farmers achieved the highest net farm income on record, with net farm income in the U.S. reaching \$87.1 billion in 2008, higher than the \$70.9 billion of 2007 and well above the 10-year average of \$63.6 billion. During 2009, net farm income retreated from that 2008 level to an estimated \$57 billion, one of the largest one-year shifts in farm income in history. This return of farm income to a more “normal” level near the 10-year average is likely to mirror the outlook for 2010. Other than very large unforeseen events (e.g., major weather events), there is very little reason to believe that net farm income will approach the levels of the 2007-08 period. Moreover, these aggregate numbers will continue to obscure the widely divergent conditions that prevailed across the farm sector in 2008-09. The performance of individual industries (i.e., crop versus livestock/dairy) is likely to be extremely variable in 2010, as each industry faces its unique supply/demand outlook and production cost scenario.

The record net farm income levels of 2007 and 2008 were based largely upon the high commodity prices that prevailed during those years. As grain and oilseed prices began to retreat after the middle of 2008, the value of crop production declined from a peak of \$182 billion in 2008 to \$164 billion in 2009. The value of production of food crops (\$14.5 billion in 2009) and feed grains (\$49.7 billion) both saw a decline of 20-30% during 2009. Only oilseed crops (\$31.7 billion) had an increase in the value of production in 2009. Fruit production (\$17.4 billion) and vegetable production (\$21.0 billion) stayed relatively constant in 2009. As will be discussed later, any increase in prices during 2010 is likely to depend on export markets (and therefore on the outlook for the recession) or unforeseen events.

The value of livestock production decreased from \$139.7 billion in 2008 to \$117.4 billion in 2009. The decline in dairy production (from \$34.8 billion in 2008 to \$23.9 billion in 2009) accounted for nearly 50% of the decline in the value of livestock production.

The value of meat animal production declined by \$7 billion to \$57.2 billion in 2009, and the value of poultry and egg production declined by \$4 billion to \$32.6 billion. As producers have reacted to the high feed costs of the 2007-08 period, animal herds in all major livestock industries began to contract. Though it appears that the rate of contraction will slow in 2010, prices and financial conditions in the sector do not appear to provide support for an expansion of production. Though there might be some modest recovery in export levels in 2010, uncertainty about the impact of the financial crisis on export demand and about the direction of exchange rates is likely to limit prospects for significant export growth or improvements in prices in 2010.

During the past two years, the differing income outlook for the crop and livestock sectors was determined by the impact of high feed grain and oilseed prices. Though

crop producers benefited from high commodity prices, driven in part by the high price of oil and its impact on ethanol, livestock producers were confronted by these same high prices as a significant increase in the cost of livestock or dairy production. For example, livestock and dairy producers paid \$41.9 billion for purchased feed in 2007 and a record \$46.9 billion in 2008. This trend showed a reversal in 2009, with feed purchases declining to \$43.4 billion, but this figure remains well above the 10-year average of \$30.4 billion spent on feed expenses. As oil prices decreased in late 2008 and early 2009, ethanol prices decreased, leading corn prices to retreat and providing some relief on the cost of feed purchases. If oil prices remain near current levels for 2010, which seems likely, feed costs are likely to stabilize near existing levels or lower. Again, however, it must be noted that unanticipated events (weather, worldwide income growth, exchange rates, or policy decisions) could affect grain prices.

At the same time, the worldwide recession is likely to lead to slow income growth on a worldwide basis. Slow income growth would likely result in slow growth in the demand for meat in some importing countries. If this occurs, slow demand growth for U.S. meat and dairy products would likely limit any increases in exports and prices of meat and milk products.

Fertilizer and lime costs decreased from \$22.5 billion in 2008 to \$16.3 billion in 2009, largely resulting from a significant decrease in the price of natural gas and in the prices of phosphorus and potassium. As the international recession and the credit crisis continues to put a limit on demand growth for these fertilizer inputs in 2010, fertilizer prices are likely to continue to be a bright spot in the 2010 outlook for farm income.

Similarly, producers purchased \$16.2 billion in fuels during 2008, compared to \$11.1 billion in 2009. Given the 10-year average of \$9.3 billion spent on fuels, and a continued moderate outlook for oil prices in 2010, fuel expenditures are likely to remain at or below 2009 levels, barring unexpected events. Alongside these reductions in fertilizer and fuel prices, it should be noted that the upward trend in seed prices appears likely to continue in 2010. Farmers spent \$17.2 billion on seed in 2009, an increase of \$2.1 billion from 2008. Given the increasing use of “stacked” genetic traits in most seed products, and the increased cost of such products, a similar increase should be anticipated for 2010.

The final factor in the farm income outlook for 2010 is likely to be land rental rates and interest expenses on land and on operating loans. In 2009, farmers paid \$10.5 billion in land rents to non-operator landlords, compared to \$9.3 billion in rent expenses during 2008. This increase is not unexpected, given the increases in commodity prices and crop income during 2007 and 2008, but it is unlikely that those land rents will be sustainable in the face of the decreases in farm income that occurred in 2009 and the likelihood that farm income will not rebound significantly in 2010. If land rents are not adjusted downward in 2010 and 2011 to reflect the recent decrease in farm income, the net farm income outlook for 2010 and 2011 will be adversely affected. Convincing landlords to face the new realities of farm income will be one of the largest challenges facing producers in 2010.

The greatest uncertainty in the farm income outlook for 2010 is the outlook for interest rates and credit availability. On the one hand, the Federal Reserve has held the federal funds rate at 0.25% to 0.0% for an extended period of time in an effort to support an economic recovery. Most analysts do not believe the Federal Reserve will increase

the federal funds rate until the second half of the year at the earliest. Consequently, Federal Reserve policy is unlikely to result in higher interest rates for 2010. At the same time, most signs suggest that a tightening of virtually all credit markets is continuing. In some cases, this tightening appears to be caused by a reduction in available credit. In other cases, the issue appears to be related to a decline in borrower creditworthiness in the eyes of lenders.

In any case, the global credit crisis will almost certainly continue during the entire year of 2010 and there appears to be little reason to believe that such factors will not affect the farm sector in 2010. At the least, borrowers are likely to face more demands for information, higher demands for collateral, or increased expectations for liquidity for the 2010 crop season. The credit crisis is likely to linger well beyond 2010, suggesting that credit availability will remain tight on a global level. Consequently, macroeconomic events in the economy are likely to be a critical factor for farmers during 2010.