## GRAIN MARKETS SENSITIVE TO EXPORTS, SOUTH AMERICAN

 WEATHEROctober, November, and the first 10 days of December were unusually dry over a large part of southern Brazil and the Argentine Corn/Soybean Belt. Currently, plantings are nearing completion, except for some double-cropping after the wheat harvest. The last week has seen widespread rain of 0.6 to 2.5 inches, although sizeable areas did miss much of this. Forecasts for the week of December 13 indicate similar amounts and coverage are likely before Christmas. These rains weakened prices for both soybeans and corn at the start of this week. Other contributing factors included: (1) slowing export sales, (2) aggressive farmer use of LDPs which eliminates the opportunity for CCC 9-month price support loans, and (3) modest precipitation in parts of the U.S. Grain Belt.

## Chart Technical Indicators

Currently, some technical traders view the $\$ 1.77$ low on the weekly corn futures chart (established last July) as a downside objective. That would be $\$ 0.185$ below the December 13 close of the March 2000 contract and $\$ 0.085$ below the $12 / 13$ low of the current December futures. A gap on January 2000 soybean futures at $\$ 4.4775$ was closed on December 13. On December 13, January futures dropped below the harvest low, an indicator that was considered slightly negative by technical traders. The life-of-contract low on January 2000 soybeans was $\$ 4.15$ last summer. A re-test of this is not anticipated.

## Update on LDP Activity

As of December 14, USDA reported that $63 \%$ of the 1999 U.S. soybean crop had received the LDP and was no longer eligible for CCC price support loans. For corn, the number was $50 \%$. Both likely substantially understate the actual amount having the LDP cashed-out, because of a backlog of not-yet-reported transactions. As these percentages climb, they continue to point to cautions and increasing downsiderisk in late winter, when farmer cash-flow needs reach a seasonal peak.Seven percent of both crops were sealed under CCC loans, thus being isolated from the market for up to nine months. For the entire 1998-crop marketing year, $58 \%$ of the U.S. corn crop had the LDP taken, along with $78 \%$ for soybeans. Percentages of the crop placed under CCC loan were 18 and $12 \%$, respectively. With the heavy use of LDP so far and backlog of unreported transactions, it looks like LDP use this year will substantially exceed the 1998-99 level.

## Export Shipments \& Sales

USDA's December 9 Export Sales report shows that export demand for corn's gain over a year earlier, as measured by exports to date and outstanding unshipped export sales, is gradually diminishing. The total through early December was $8 \%$ above a year earlier. No U.S. corn sales are reported for export to the European Union (EU), probably because of genetic modification concerns. After an earlier spurt, the total for soybeans has stabilized at $9 \%$ above a year earlier. Combined shipments to date and outstanding unshipped U.S. soybean export sales to the EU were down $4 \%$ from a year earlier. U.S. soybean exports to the EU in 1998-99 fell $28 \%$ from the previous year. Meal and oil sales continue to lag well behind last year, and are down $20 \%$ and $65 \%$, respectively. U.S. soybean meal exports and outstanding unshipped export sales to EU are down $90 \%$ from the same time last year. U.S. soybean meal exports to the EU in the 1998-99 marketing year that ended September 30 were down $77 \%$ from the previous year.Historically, the EU has been our largest export market for soybeans by a large margin, and a large market for soybean meal. The U.S. normally exports almost no soybean oil to EU.

## Marketing Alternatives

Alternatives for pricing 1999-crop corn and soybeans: unpriced storage with or without the CCC-loan depending on whether the LDP was taken, storage and hedging for later delivery, storage and forward pricing for later delivery, price-later contracts, and basis contracts. Returns for taking the LDP now and hedged storage, as shown, have declined sharply in the last few weeks, with falling futures and stronger basis. Potential net returns are shown for storage into June with LDP taken in December, with rising/falling prices, with/without put option purchases.The basis in our examples is slightly wider than normal for central Iowa for early summer-some basis risk is present in these strategies. Historically, basis variations of $3-5 ¢ / \mathrm{bu}$. in either direction from normal in early summer would have been expected to capture most of the basis risk.
Storage Hedge, 12/13/99

|  | Corn | Soybeans |
| :--- | ---: | :---: |
| July futures | $\$ 2.10$ | $\$ 4.70$ |
| Less expected basis | .30 | .34 |
| Less costs | .01 | .01 |
| Expected hedge price | 1.69 | 4.35 |
| Current new-crop bid | 1.60 | 4.12 |
| Gross storage return | .09 | .23 |
| Farm storage costs | .15 | .20 |
| Potential net storage | -.06 | .03 |
| LDP | .27 | 1.01 |
| Net gain over cash price | .21 | 1.04 |
| Effective net price | 1.81 | 5.16 |
| Expected mkt. Access pmt | .48 | .15 |

Store \& Buy Put, 12/13/99

| Cash price | Corn | Soybeans |
| :--- | :--- | ---: |
| Expected June basis | $\$ 1.60$ | $\$ 4.12$ |
| July futures equiv. | .30 | .34 |
| Prem. July $\$ 1.90$ put | $.06^{*}$ | 4.46 |
| Min. price $\$ 1.60-\$ .06$ | 1.54 | .23 |
| *For put nearest futures equiv |  |  |
| Extra cost, next strike up | 0.04 | 0.03 |

To just break even from storage with the LDP taken now and put purchases as opposed to unpriced storage without puts, the futures prices would need to drop below the strike price into early summer by just the amount of the put purchase cost. In the soybean example, July soybean futures prices would need to drop to $\$ 4.27 / \mathrm{bu}(\$ 4.50-\$ 0.23$ ) from a current July futures price of $\$ 4.70 / \mathrm{bu}$. The cash price in the example would then be $\$ 3.93$, and the put would be worth just what you paid for it. If this combination of prices occurred, a storage hedge would have paid all costs of storage except a bin charge, and would have generated $03 \Phi$ more/bu than selling in mid-Dec. while storage with or without puts would have netted $39 ¢$ less than the current cash market. The potential advantage of put purchases is that upward price flexibility is retained; extreme downward risk is protected.

Store Corn \& Buy Puts, 12/13/99

| 6/20 cash price rises $\$ .45$ : July Fut. |  | $\$ 2.35$ |
| :--- | ---: | ---: |
| 6/20 cash price falls $\$ .15$ : July Fut. | $\$ 1.75$ |  |
| --Net result: Cash price | 1.45 | 2.05 |
| $\quad$ Less storage | -.16 | -.16 |
| Put value ( $\$ 1.90$ strike) | +.15 | .00 |
| Less put cost | -.06 | -.06 |


| Net | 1.38 | 1.83 |
| :--- | ---: | ---: |
| $\quad$ Plus LDP | .27 | .27 |
| Total | 1.67 | 2.10 |
| Net if sold 12/13 | 1.87 | 1.87 |
| Net if stored without put | 1.56 | 2.16 |
| Store Beans \& Buy Puts, 12/13/99 |  |  |
| 6/2 cash price rises $\$ .85: ~ J u l y ~ F u t . ~$ |  | $\$ 5.31$ |
| 6/2 cash price falls $\$ .35$ : July Fut. | $\$ 4.11$ |  |
| --Net result: Cash price | 3.77 | 4.97 |
| Less storage | -.20 | -.20 |
| Put value (\$4.50 strike) | +.39 | .00 |
| Less put cost | -.23 | -.23 |
| Net | 3.73 | 4.54 |
| Plus LDP | 1.01 | 1.01 |
| Total | 4.74 | 5.55 |
| Net if sold $12 / 13$ | 5.13 | 5.13 |
| Net if stored without put | 4.58 | 5.78 |

In choosing among alternatives, you have to make a judgment about the amount of downward price risk, and the chances of a strong price rally. Historically, unpriced corn and soybean on-farm storage into late spring and early summer has paid off about half of the time, with an average net gain from harvest prices of about $8 \Phi / b u$ on corn and $2 \Phi$ on soybeans. That's before deducting any charge for the bin. It has paid well in years of widespread drought or flooding in the Midwest, and those years have occurred about $20 \%$ of the time in the last half century.

Dr. Elwynn Taylor, ISU climatologist, indicates that with the low subsoil moisture over a large area and a strengthening La Niña, drought risk for 2000 is around $30 \%$. For those who have not yet taken the LDP, storage and use of the marketing loan is a lower-cost alternative for unpriced grain storage than buying puts. If local cash prices decline substantially, the LDP will increase, and if prices rise, the decreasing LDP offsets higher cash prices until prices move above the loan rate. For corn, central Iowa cash market strength of about $15 \$$ would put prices above the loan rate. For soybeans, a rise of about $\$ 1.06$ would be needed in most areas of Iowa to put cash prices above the loan rate.

Robert Wisner

## LIVESTOCK MARKET UPDATE

## Hog Market

Weekly hog runs that were even with year earlier levels from September through mid November have declined to levels projected by the September Hogs and Pigs Report. Prices set back modestly from late November prices and are expected to remain in a choppy sideways trend through the end of the year.

The markets this time of the year are affected by the holidays. The earlier price strength was linked to advanced bookings by buyers for holiday features, but that has now weakened. Buyers will wait to see how the product moves and how much they need to restock after the first of the year before getting aggressive on orders. One concern is that consumers may be stocking up on items ahead of January 1 in case Y2K problems arise. However, it would seem doubtful that
fresh or even frozen meat would be something to stockpile. In addition, the two holidayshortened workweeks in a row will lessen the demand for live hogs to process.

The market is also awaiting the next Hogs and Pigs Report that is due out December 28. The pre-report estimates have not been released at this writing, but should show a continued liquidation. Market hog inventories are expected to be lower than a year ago in all weight classes. The breeding herd may be down only 5-6 percent from the same period in 1998. However, December 1998 was the start of the liquidation and was 5 percent lower than December 1997.

This quarter will mark one year of the liquidation phase. Historically, the liquidation phase of the hog cycle will result in a year-over-year decline in the breeding herd for approximately 8 quarters. Commercial hog slaughter typically shows a year-over-year decline 3-4 quarters after the breeding herd declines and it lasts for 6-8 quarters.

While history is not a perfect predictor of the future, it is still a good educator. To date, this cycle has tracked previous cycles closely. If it continues as previous cycles, pork production should be smaller than year earlier levels through the summer of 2001. In the cycles where liquidation started in December 1988 and 1994, prices hit their peak approximately 18 months later in late May. If this pattern holds, prices in late May and early June could set the tone for the next two years. It also suggests that risk management strategies that allow the producer to take advantage of higher prices may out-perform strategies that lock in a fixed price.

However, the liquidations that started in 1983 and 1992 behaved differently. In 1983 a temporary price peak was hit 3 quarters after liquidation and then prices declined until 8 quarters later. The 1992 liquidation put in its highest prices of the cycle 3 quarters after the start of liquidation. The 3 -quarter mark this time would have been July-September 1999. It will not be the highest price this time as fourth quarter prices will be higher. Therefore keep an eye on MayJune 2000.

To learn more about past hog cycles and to get an analysis of the December 28 Hogs and Pigs Report later that day, check my web site at: http://www.econ.iastate.edu/faculty/lawrence/. John Lawrence

## VALUE OF IOWA FARMLAND DROPS 1.1 PERCENT IN 1999

AMES, Iowa - The average value of an acre of farmland in Iowa dropped to $\$ 1,781$ in 1999, the second year in a row that land values have decreased slightly, according to an annual survey conducted at Iowa State University.

The decrease averaged $\$ 20 /$ acre, or $1.1 \%$ statewide, said Michael Duffy, ISU Extension economist who directed the survey. He said strong farm income, comprised mainly of government payments helped land values remain nearly steady despite low commodity prices.

While the statewide average value declined, 39 counties showed increases in 1999, ranging as high as $9.2 \%$ in Clayton County in northeast Iowa. In the 60 counties where values declined, the largest percentage drop was in Hardin County in north central Iowa where the decline was 5.9\%.

Duffy said the 1999 survey shows an interesting pattern of changes in land values. "Values were lower in the northwest, north central, central and east central parts of the state. These areas
generally are considered to have the best soils in the state," he noted. Of the 19 counties in Iowa that border on the Mississippi or Missouri Rivers, 13 had increases.

Duffy said five factors were mentioned by more than $10 \%$ of the respondents as having positive impacts on land values this year. These factors were government program payments, mentioned by $26 \%$, interest rates ( $23 \%$ ), crop yields ( $21 \%$ ) and the supply of land available and demand by investors, each mentioned by $17 \%$. Four factors were mentioned as negative influences. They were low grain prices, mentioned by $42 \%$, low commodities prices (39\%), low livestock prices ( $20 \%$ ) and the overall poor ag economy and outlook, mentioned by $12 \%$.

Most buyers of Iowa farmland continue to be existing farmers who are increasing their holdings, Duffy said, but investors made $30 \%$ of the purchases this year. This percentage is the same as last year and a significant increase over 1997. Sales to investors were highest in SC Iowa at $60 \%$, while sales to existing farmers were highest in NC Iowa at $81 \%$. Thirteen percent of the survey respondents said there were more sales this year, $43 \%$ said the number of sales was about the same as last year, and $44 \%$ said there were fewer sales.

The highest land values by crop reporting district were reported in central Iowa where the average was $\$ 2,128$ per acre, down $2.9 \%$ from last year. The lowest average value was $\$ 981$ per acre in SC Iowa, up $3.5 \%$ from last year. The greatest percentage decline was in NW Iowa where the average value dropped $5.9 \%$ to $\$ 2,059$.

The highest estimated value was $\$ 2,970$ /acre in Scott County in EC Iowa, and the lowest was $\$ 752 /$ acre in Decatur County. Low grade land in the state averaged $\$ 1,045 /$ acre and showed an increase of $1.4 \%$ or $\$ 15 /$ acre. Medium grade land averaged $\$ 1,629 /$ acre and decreased $\$ 9$ or $0.5 \%$. High-grade land averaged $\$ 2,249 /$ acre and decreased $\$ 35$ or $1.6 \%$.

Iowa State University has conducted an annual survey of land values since 1941. The ISU survey is conducted on Nov. 1 each year and is the only survey that reports land values in all 99 Iowa counties.The survey is cosponsored by the Iowa Agriculture and Home Economics Experiment Station and ISU Extension.

For additional information on the survey and on surveys from prior years, visit the ISU Extension web site at: http://www.extension.iastate.edu.

