Are Increasing Cash Rents Justified?

Verbal reports indicate that 2007 cash rents on some land tracts are increasing over 2006 levels. Portions of these increases likely result from projections of higher commodity prices. While futures contracts do suggest higher prices, there is considerable uncertainty whether higher prices actually will occur and whether they are sustainable. Given this uncertainty, caution seems warranted in increasing cash rents. Leases that allow rents to adjust or cash leases with short lease periods are appropriate in times of price uncertainty. Moreover, long-run increases in commodity prices do not automatically translate into farmers having long-run higher returns or risk reductions.

Historical and Expected Commodity Prices

Due to increases in export demand, corn prices increased and reached a higher plateau in the early 1970s. Between 1973 and 2005, corn prices exhibited considerable variability, reaching a season-average high for Illinois of $3.24 in 1995 and a season-average low of $1.50 in 1986 (see Figure 1). While exhibiting variability, corn prices did not trend up or down between 1973 and 2005 and averaged $2.35 per bushel.

Soybean prices exhibited similar historical trends as corn. Prices reached a higher plateau in the early 1970s. Between 1973 through 2005, soybean prices exhibited considerable variability but did not trend up or down. The average price in Illinois during this period was $6.08 per bushel.

Currently, there is a reasonable possibility that corn and soybean prices will be considerably higher than historical averages. Futures prices suggest that cash prices could average $3.20 for corn and $6.90 for soybeans over the next several years. Much of this increase is attributable to increased demand for corn in ethanol production. Good arguments can be made that biofuel uses may result in permanently higher prices, similar to the situation in the early 1970s. Conversely, it is also possible that crop production increases or reduced demands could result in commodity prices nearer historical levels.
Operator and Farmland Returns in an Uncertain Price Environment

All else being equal, higher commodity prices result in higher operator and farmland returns, hence providing the possibility of higher returns for both farmers and landowners. Operator and farmland return represents a return to pay for farmland and to provide the farmer a return. In a cash rent situation, an operator and farmland return of $180 per acre and cash rent of $150 per acre leaves a return to the farmer is $30 per acre ($180 - $150).

Potential impacts of higher commodity prices are illustrated central Illinois, high productivity farmland. Historic operator and farmland returns for grain farms are available from Illinois Farm Business Farm Management (FBFM). Between 1995 and 2005, yearly average operator and farmland returns exhibited variability, having a low return of $129 per acre in 1998 and a higher return of $230 in 2004 (see Figure 2). The average return over the eleven year period was $182 per acre.

Figure 2. Operator and Farmland Returns, Central Illinois

Returns for 2007 were projected using non-land costs of $258 per acre, direct payments implemented under the 2002 Farm Bill of $27 per acre, other farm receipts of $8 per acre, and trend-line yields of 178 bushel for corn and 53 bushel for soybeans. Corn had 55% of the acres while soybeans had 45% of the acre. Operator and farmland returns were estimated for three price scenarios.

The first scenario represents prices given current estimates made using current CBOT futures prices: $3.20 for corn and $6.90 for soybeans. These prices result in an operator and farmland return of $254 per acre, significantly above the $182 average return between 1995 through 2005. Under this price scenario, relatively high cash rents could be paid to landowners while maintaining positive returns to farmers.

The second scenario uses prices near their historical averages: $2.40 for corn and $6.10 for soybeans. These prices result in an operator and farmland return of $157 per acre, $25 below the $182 historical average return. The average prices give below-average returns for two reasons. First, non-land costs have increased in recent years. Projected 2006 non-land costs are $41 per acre higher than average non-land costs between 1995 and 2005. Second, the 2007 return projections do not include loan deficiency or counter-cyclical payments as prices at historical averages do not result in these payments. These payments have been a significant contributor to revenue in recent years.
In the third scenario, the historic-average prices were increased proportionally until operator and farmland returns equaled $182 per acre. This scenario quantifies how much equilibrium prices have to increase to counter cost increases and government payment declines. Prices resulting in a $182 per acre return are $2.56 for corn and $6.50 for soybeans. These prices are 6% higher than historical averages, suggesting that a portion of potential price increases are needed to counter cost increases and government payment declines.

**Summary and Suggestions**

Before the prospects of ethanol production caused an increase in expected prices, profitability of crop production in 2006 and 2007 was expected to be near average to slightly below average due to cost increases. Hence, commodity price increases were needed to maintain historic return levels. Current price expectations lead to higher expected returns. There is, however, considerable uncertainty about whether high prices will actually occur and whether high prices are sustainable in the long-run.

The potential of higher returns and uncertainty about whether those returns will actually occur leads to two recommendations concerning cash rents:

1. Use of lease arrangements that allow payments to landlords to adjust to return situations seem warranted. These arrangements allow landowners to share in higher returns if higher commodity prices actually occur in the next several years. If higher prices do not occur, payments to landowners are maintained at manageable levels. Lease arrangements in this category include share rent, share-rent with supplemental payments, and adjustable cash rent leases. The cash rent lease in the law and taxation section of farmdoc includes provision that allow the rent to be adjusted with changes in prices.

2. Increasing cash rents on the prospect of higher commodity prices should be undertaken with caution. If rents are increased as a result of commodity prices, the length of the lease should be kept short, perhaps only a year in length. Higher prices have a reasonable prospect of occurring in 2007. Higher prices in 2008 and beyond are less certain.

Finally, farmers will not necessarily sustain long-run increases in profits or reductions in risks if higher equilibrium prices actually occur. Suppose, for example, that corn prices over the next several years average over $3.00 per bushel. In this environment, cash rents likely will increase and absorb most, if not all, the increase in operator and farmland return. Hence, farmers will be in roughly the same profit situation with corn at over $3.00 per bushel as at $2.40 per bushel. Farmers gain returns under this scenario only to the extent that they own land. Moreover, year-to-year variability in prices likely will be as great at a higher equilibrium level as at historical levels. Hence, risks will not be reduced as cash rents increase. Risk management will continue to be important and pressures on Federal government responses will still exist.

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