



WEEKLY OUTLOOK



A joint publication of the Department of Agricultural Economics, College of Agriculture, Purdue University, West Lafayette, Indiana, and the Department of Agricultural and Consumer Economics, College of Agricultural, Consumer and Environmental Sciences, University of Illinois at Urbana-Champaign.

DECEMBER 4, 2000

USING HISTORICAL CORN AND SOYBEAN PRICE PATTERNS TO JUDGE CURRENT PROSPECTS

Cash prices of corn and soybeans in central Illinois are now at the highest level for the marketing year that began on September 1. The December corn basis has strengthened from an average of \$-0.38 during the first week of September to an average of \$-0.115 on December 1. The average farm level cash price in central Illinois was reported at \$1.985 on December 1, \$0.475 above the lowest price of the marketing year reported on September 19. The cash price range has been larger than normal for this time of year. Over the past 27 years, the range in the cash price of corn during the entire marketing year varied from \$0.445 (1990-91) to \$2.525 (1995-96). For the past four years, the range has varied from \$0.60 to \$1.515, and averaged \$1.00 per bushel.

Each marketing year has unique characteristics that require price prospects to be judged based on current market fundamentals. Historical price patterns, however offer some parameters within which those judgments can be made.

Over the past 27 marketing years, the highest cash price of corn in central Illinois has come in September seven times; October, November, and January one time; March and May two times; June and July five times; and August three times. The two years with a November or January price peak were "short crop" years (1980 and 1993). Based on historical price patterns, the current price peak probably does not represent the highest price of the year. The highest price for the current marketing year would be expected in the May through August time period.

Based on historical price ranges, and assuming the lowest price for the marketing year (\$1.51) has already been established, the highest cash price for the year has about equal odds of being below \$2.15, between \$2.15 and \$2.50, and above \$2.50. Prices at the higher level would require a rapid recovery in the rate of US exports during the last half of the marketing year and concerns about the 2001 growing season. Based on history, the odds of a cash price above \$3.00 are about 18 percent and would require a substantial shortfall in the US crop in 2001.

December 2001 corn futures traded to a high of \$2.75 in May 2000 and a low of \$2.2925 in August 2000. The trading range of \$0.4575 will likely be exceeded over the next year, with either higher or lower prices, or both. Since 1973, the life of contract trading range for the December contract has been less than \$.60 only twice (1987 and 1991). The trading range has exceeded \$1.00 in 12 of those years, but has exceeded \$2.00 only twice (1973 and 1974). The average range for the 1997 through 2000 contracts was \$.96.

The life of contract high for the December contract was \$2.80 or less in eight of the past 28 years (including 2000), between \$2.80 and \$3.00 six times, and above \$3.00 14 times. On the surface, past price patterns would suggest that the odds of December 2001 futures reaching a new high are about 70 percent. However, because futures trade so far in advance, events that push prices to high levels impact two years' prices simultaneously, so odds of new highs are likely overstated. Realistically, the odds of December futures exceeding \$2.80 are about 40 percent.

For soybeans, the average January basis in central Illinois strengthened from \$-.40 in late September to \$-0.16 on December 1. The average farm level price cash price was quoted at \$4.92 on December 1, \$0.505 above the lowest cash price in late October. Over the past 27 years, the range in cash prices for the marketing year varied from \$0.615 (1985-86) to \$5.205 (1976-77). For the past four years, the range varied from \$1.12 to \$2.325, and averaged \$1.90.

Over the past 27 marketing years, the average cash soybean price peaked six times in September; once in October; twice in November; once in January and April; four times in May and June; seven times in July; and once in August. Based on historical patterns, the odds are about 90 percent the highest cash price this year will occur in the May through July 2001 time period. Assuming the lowest price for the year has already been established, history would say the odds are about 30 percent for a cash price peak below \$5.75, about 40 percent for a peak between \$5.75 and \$6.90, and about 30 percent for a peak above \$7.00. Because of the rapid expansion in South American production, however, historical patterns may not be a good predictor of current price patterns. Large South American production tempers the price impact of demand surges and shortfalls in US production. For cash prices to move above \$5.75 this year would require all of the expected increase in European soybean meal demand to materialize and for some crop concerns to materialize. The odds of a price above \$7.00 are likely less than ten percent.

November 2001 futures have traded between \$4.93 and \$6.05. The range of \$1.12 is extremely low by historic standards, so that the range will likely be exceeded over the next year-with higher or lower prices, or both. Based on history, but tempered by the South American influence, the odds of November 2001 futures establishing a new contract high are near 75 percent. The odds of exceeding \$7.00 are likely less than 20 percent.

Issued by Darrel Good
Extension Economist
University of Illinois

U of I Extension Newsletter Service
University of Illinois
at Urbana Champaign
1917 South Wright Street
Champaign IL 61820