## 1999 Cotton Management Economic Notes

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### Crop Insurance: Your Most Profitable Input?

On January 8, 1999 Agriculture Secretary Dan Glickman announced an estimated 30% premium reduction for producers from previous premium rates that were also subsidized. This reduction plus the newly available Crop Revenue Coverage (CRC), which has benefits if prices increase at harvest, means that everyone should probably change their current policy before the sales closing date of **February 28, 1999**. Contact your local Farm Service Agency for their most current list of sales agents available for your area. In short, some have described the situation as "freedom to farm has become freedom to insure."

It now appears that the crop insurance program has become the cornerstone of the U.S. agricultural policy agenda. One need only consider the following statements made by U.S. Secretary of Agriculture Dan Glickman during a radio address of December 28, 1998:

"Of course, this past year was about more than crisis management. We expanded crop insurance and experimented with innovative kinds of coverage, such as wholefarm coverage. It's no secret that I want 1999 to be the

Recent Prices	<u>February</u> <u>Upland</u>	/ 10, 1999 Pima (ELS)
	(¢/lb)	(¢/lb)
Spot - uncompressed	54.10	90.75
Mar '99 Futures	58.10	
Oct '99 Futures	60.15	
Dec '99 Futures	60.50	
Adj. World Price	42.39	

Note: Upland Spot for Desert SW grade 31-3, staple 35, add 300 points for compressed bales, Pima Spot for DSW grade 03, staple 46, 1/28/99.

'year of the safety net' ... a year in which we build a strong risk management system anchored in a strengthened crop insurance program."

### Narrow Sign-Up Window for Good Odds

The sales closing date for Arizona cotton is February 28, but the base price is determined using December 1999 NYCE Futures for the period of January 15 through February 14 – resulting in a narrow window. On average, crop insurance has been a fairly good bet when averaging over all crops and regions across the State. The accompanying table shows that for all policies in Arizona, producers have on average received a return of \$1.59 to \$3.59 for every dollar they have spent on premiums in the last four years. For Arizona cotton policies over this period the return has ranged from \$1.78 to \$3.37 for each dollar spent. However, as to be expected with "insurance," not every kind of policy, producer, or county has always reaped such good returns. For example, ELS cotton policies did not pay any indemnities for Maricopa in 1997 and 1998.

Historical Payout for Each \$1.00 of							
Producer Premium & SignUp Costs							
	<u> 1995</u>	1996	1997	<u>1998</u>			
AZ: All Crops	\$3.59	\$1.99	\$3.04	\$1.59			
AZ Cotton	\$3.37	\$2.19	\$2.78	\$1.78			
Maricopa County							
CAT: Upland			\$0.00	\$0.00			
BuyUp: Upland			\$3.19	\$3.45			
CRC Pilot: Upla	ınd		\$4.39	\$0.00			
CAT: ELS			\$0.00	\$0.00			
BuyUp: ELS			\$0.00	\$0.00			
Pinal County							
CAT: Upland			\$0.00	\$0.00			
BuyUp: Upland			\$2.30	\$0.77			
CAT: ELS			\$0.00	\$2.65			
BuyUp: ELS			\$0.47	\$3.69			

The Table to the right illustrates the impact of the planned 30% reduction in producer premiums and indemnities under different yield and price scenarios for Actual Production History (APH) and CRC policies. The example assumes an approved APH yield of 1,300 lbs. / acre in Maricopa County and a base price of 64¢/lb. Given recent price declines, this price could move lower. Although the planting base price for both APH and CRC should be close, they will not necessarily be equal as in the example. Note that APH policies only pay if actual yield falls below the insured yield. For example, the column of 50/100 (50% yield and 100% price protection) indicates that yield must fall below 50% of the approved yield before any payments can be made on yield less than 50% at the rate of 100% of the base price. CRC is based on a revenue guarantee (APH yield x Coverage Level x higher of Base Price or Harvest Price x Price Share) rather than just yield so that the 40% yield combined with a 20% price reduction triggers an indemnity payment of \$17/acre for the CRC 50/100 insurance option.

# Actual Production History(APH) and Crop Revenue Coverage (CRC) Comparison for an Acre of Upland in Maricopa County<sup>1</sup>

Yield/Price Coverage	50/55	50/100	65/100	75/100			
	50/55			73/100			
APH	<u>Planned Rates</u>						
Total Premium	\$7.55	\$13.73	\$24.88	\$43.68			
Grower Premium	\$60 Fee <sup>2</sup>	\$6.18	\$14.50	\$33.42			
Govt. Subsidy	\$7.55	\$7.55	\$10.37	\$10.26			
	30% Producer Discount						
Grower Premium	\$60 Fee <sup>2</sup>	\$4.32	\$10.15	\$23.39			
Govt. Subsidy	\$7.55	\$9.40	\$14.72	\$20.29			
<u>CRC</u>	Planned Rates						
Total Premium		\$16.66	\$31.99	\$57.21			
Planned Grower Premium		\$9.22	\$21.61	\$45.37			
Planned Govt. Subsidy		\$7.44	\$10.37	\$11.84			
		30% Producer Discount					
Grower Premium		\$6.45	\$15.13	\$31.76			
Govt. Subsidy		\$10.21	\$16.88	\$25.45			
Payout with a 40% Yield Shortfall and 20% Price Decline							
Liability Coverage	\$229	\$416	\$541	\$624			
APH Indemnity	\$0	\$0	\$42	\$125			
Revenue Guarantee		\$416	\$541	\$624			
CRC Indemnity		\$17	\$141	\$225			
Payout with a 40% Yield Shortfall and 25% Price Increase							
Liability Coverage	\$229	\$416	\$541	\$624			
APH Indemnity	\$0	\$0	\$42	\$125			
Revenue Guarantee		\$520	\$676	\$780			
CRC Indemnity		\$0	\$52	\$156			

<sup>1</sup>All scenarios and policies assume an approved APH yield of 1,300 lbs. in Maricopa County and a base price of 64¢/lb. Actual numbers for your farm will vary from this illustrative example. <sup>2</sup>Other than a signup fee, the entire premium for a farm-commodity is subsidized.

CRC pays the higher of the planting base price or harvest price so that insured yield losses are paid at a higher rate for CRC than APH when prices increase. For example, the indemnity payout of the 65/100 column for a 40% yield reduction combined with a 25% price increase results in a 25% greater payment for CRC than APH (i.e., \$42/acre payment for APH compared to the \$52/acre payment for CRC).

Note that total government subsidies were pretty much maxed for yields insured beyond 60% prior to the 30% reduction. But now total government premium subsidies continue to climb as yield and price insurance levels increase. However, this reduction could entice so many "upgrades" and new policies that the final percentage premium discount will be reduced below 30%.

### Direction of Crop Insurance

In response to increased political pressure, new insurance products like CRC have become an important part of the farm policy landscape. Other revenue insurance programs have or are being developed. For example, a new pilot program which will guarantee revenues on the basis of Schedule F tax return information over the preceding 5 years will be implemented in 1999 for Florida, Maine, Massachusetts, Michigan, and New Hampshire. Independent of the particular crop insurance program under development, as long as the political climate remains focused on unrealistic participation rates and subsequently attempting to attain those by continually increasing subsidies, government backed crop insurance programs will represent an increasingly good "bet" for producers.