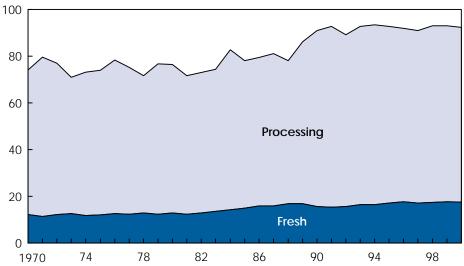
Briefs

U.S. Per Capita Tomato Use Surged Before Heading into the 1990's

Lbs. per capita



Farm-weight equivalent. 1999 preliminary; 2000 projected.

Economic Research Service, USDA

processed tomato products in the diet. Several medical studies in the 1990's linked diets rich in tomatoes and tomato products to reduced risk of various cancers and heart disease.

While domestic per capita consumption of processed tomato products surged heading into the 1990's, it leveled off as the decade progressed. Per capita use averaged just under 75 pounds in 1995-99, compared with an average 76 pounds in 1990-94. Total domestic use of processed tomato products decreased from 10.2 million tons in 1998 to 9.9 in 1999, but is expected to rise to 10.3 million tons in 2000. However, with strong export potential in the coming decade, slow growth (or even a slight decline) in domestic demand does not necessarily translate into no growth in long-term domestic production.

The U.S. has been the world's largest producer of processed tomato products for several decades, but only recently have exports become an increasingly important outlet for U.S. producers. Prior to 1989, exports of processed tomato products rarely accounted for more than 1 to 2 percent of total processed tomato supply (on a raw-equivalent basis). Since then, however, the value of U.S. exports of processed tomato products has nearly quadrupled—from \$60.1 million in 1989

to \$237 million in 1998—and the export share has steadily risen to 12 percent of total supply.

Although markets for Western-style cuisine served by American chain restaurants have already matured in Europe and the U.S., other markets—especially Asia and South America—continue to expand. The U.S. should remain well situated to continue increasing exports of processed tomato products.

Despite the long-term expansion potential for the processing tomato industry, the currently large domestic and international inventories of processed tomato products point to reduced output in 2000. With an expected cutback in processors' output, contract prices (between growers and processors) for the 2000 crop are likely to be significantly lower and contract acreage will fall. Some early estimates indicate a possible decline of 10-20 percent in planted acreage from a year ago, and early contract prices are about 9 percent below last year's average. Combined with average acreage abandonment and yields, this would put 2000 production of tomatoes for processing between 9.6 and 10.8 million tons.

Production at the upper end of this range would be unlikely to reduce processors' stocks significantly, because processors often buy their growers' quality production beyond the target tonnage. Large output, along with persistent large stocks, could lead to another acreage cut in 2001. However, with production at the lower end of the range, and with continued strong domestic and export demand, processors could reduce inventories to more comfortable levels and eliminate, or at least limit, the need for an acreage cutback again next year.

Charles Plummer (202) 694-5256 cplummer@ers.usda.gov

Risk Management

Crop & Revenue Insurance: Premium Discounts Attractive to Producers

S parked by \$400 million in premium discounts, farmers' participation in crop insurance, particularly at "buy-up" coverage levels, picked up in 1999. Total insured acres increased about 8 percent from the 1998 level, reaching 196 million, and acres insured at buy-up levels—where the premium discounts applied—increased by 19 percent.

The new premium discounts—funded under the emergency assistance package in the 1999 agriculture appropriations legislation (FY1999 Omnibus Consolidated

and Emergency Supplemental Appropriations Act)—supplemented existing crop insurance premium subsidies. The discounts, along with increases in the maximum allowable yield or revenue guarantee—from 75 percent of expected yield or revenue to 85 percent for some crops in some areas—were intended to address concerns about the adequacy of crop insurance coverage in helping farmers protect against yield and revenue risk.

Coverage and participation in the Federal crop insurance program have been shift-

Briefs

ing in recent years. A major reform enacted in 1994 increased overall insurance participation, primarily by offering a minimum catastrophic coverage (CAT) to producers at low cost—a fixed processing fee per crop instead of a risk- or actuarially based premium—and by requiring that producers obtain crop insurance in order to receive other farm program benefits. As a result, total insured acres increased greatly in 1995, with more than half of covered acreage insured at the CAT level.

After 1995, however, insured acres declined, dropping from 221 million in 1995 to 182 million in 1998. Producers choosing to drop CAT coverage accounted for the decline, particularly after mandatory crop insurance linkages with other farm programs were eliminated in 1996. Producers were then given the choice of obtaining crop insurance or signing a waiver of eligibility for disaster benefits. Between 1995 and 1998, CAT-insured acres dropped by about 45 percent.

A common complaint about CAT coverage is that, while low in cost, it provides little protection. During 1995-98, CAT coverage at 50 percent of the producer's expected yield and 60 percent of expected price (50/60 coverage) cost \$50 per crop (the processing fee). In 1999 and subsequent years, indemnification was reduced to 55 percent of expected price and the processing fee rose to \$60 per crop. Thus in 1999, the maximum CAT indemnity that would be paid out in the event of total crop failure was 28 percent of a producer's expected revenue.

While CAT coverage declined, acres insured at buy-up levels (any coverage level above CAT) grew modestly between 1995 and 1998. Many producers contended that buy-up coverage, particularly at top levels, was too costly. Because the premium subsidies are fixed amounts, the subsidy share of total premium declines as coverage level increases, except for a peak at the 65-percent yield or revenue guarantee level where the fixed amount jumps (AO August 1999). Since premium subsidies for revenue insurance are based strictly on the yield portion of an insurance contract, revenue insurance subsidies are generally a lower proportion of total premiums than their yield-based insurance counterparts.

Buy-up Acres Have Increased Since 1995, While Acres Insured at CAT Level Have Declined

	1995	1996	1997	1998	1999
	Million acres				
Total	220.6	205.0	181.9	181.7	196.1
Insurance types:					
CAT*	115.3	87.8	64.4	61.5	52.9
All buy-up	105.4	117.2	117.5	120.2	143.2
Revenue only	NA	11.7	25.4	27.1	52.8

NA = Not available.

* Minimum catastrophic coverage, i.e., 50 percent of expected yield and 55 percent of indemnity price. Economic Research Service, USDA

Insurance premium discounts included in the 1999 emergency assistance package made buy-up insurance coverage levels more affordable for crops harvested in 1999. The discounts—applicable to any federally supported crop yield or revenue insurance plan except CAT—dropped producers' after-subsidy premium costs for buy-up coverage about 30 percent, on average, across all buy-up levels.

Reduced costs for buy-up insurance led to widespread increases in participation in 1999. Buy-up acreage—including crop vield and revenue plans—increased in nearly every state, and climbed nationwide from 120 million acres in 1998, to 143 million in 1999. Among states with the largest amount of buy-up acreage in 1998, gains in 1999 were particularly strong in Illinois (up 28 percent), Texas (up 22 percent), and North Dakota (up 16 percent), increasing the buy-up share of insured acreage in each of the three states to at least 70 percent. The Mississippi River Valley and Delta region, which had little buy-up business in 1998, showed strong increases (at least 25 percent) in buy-up coverage, but still less than half of insured acreage in this region was covered at buy-up levels in 1999.

Buy-up acreage increased in 1999 for each of the crops with the largest insured acreage in 1998—corn, soybeans, wheat, and cotton. The rise in buy-up acreage was especially strong for cotton (a 35-percent increase), though cotton, compared with other major crops, continues to have the smallest proportion of insured acreage covered at buy-up levels.

In addition to increasing buy-up acreage overall, producers moved to higher guarantee levels within the buy-up category in 1999. While 65 percent of expected yield continues to be the most popular guarantee level, the share of acreage insured at this level declined as the shares of acreage insured at the 70- and 75-percent levels increased, likely indicating that producers substituted higher levels of coverage for lower.

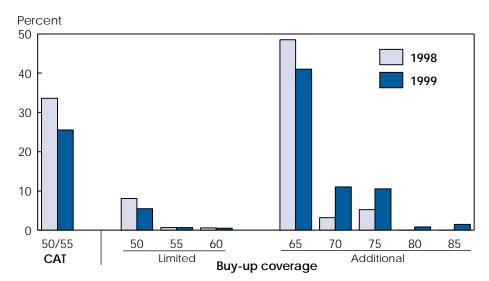
Increasing coverage levels is expensive, whether the cost is borne by producers or by the government. As coverage level increases, the likelihood that the insured will collect an indemnity increases, so each additional increment in coverage costs more than the previous increment. This increasing cost means, for example, that the total premium increases 78 percent going from 65 percent coverage to 75 percent, compared with an 81-percent premium increase going from 75 percent coverage to 85 percent. As a result of the rapidly ascending rate schedule, the \$400 million in premium discounts, which represents roughly 30 percent of total premium subsidies and discounts applied to buy-up coverage, leads to somewhat modest increases in coverage levels.

Premium discounts, along with concerns about declining commodity prices, have led many purchasers of buy-up coverage to choose revenue insurance products. Although revenue insurance—particularly the most popular product, Crop Revenue Coverage—is often more expensive than yield-only insurance, evidence suggests the newly available premium discounts may have brought the cost of revenue coverage within reach of more producers.

In 1999, the availability of revenue products increased—more crops, more counties—by about 30 percent, while the number of acres insured under revenue plans

Briefs

Share of Insured Acreage with Higher Crop and Revenue Coverage Rose in 1999

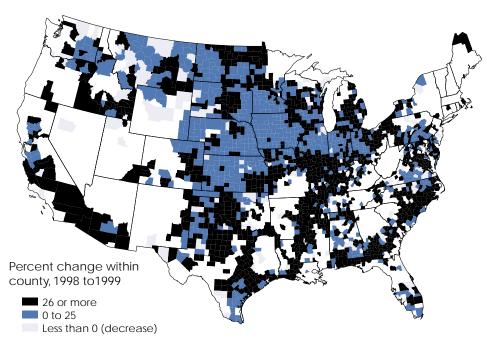


CAT = Minimum catastrophic coverage, i.e., 50 percent of expected yield and 55 percent of indemnity price. Purchaser of buy-up coverage selects a percent of yield (and percent of indemnity price up to 100 percent) or a percent of revenue. Maximum, fixed subsidy applies at 65-percent coverage level and above.

Based on data from USDA's Risk Management Agency.

Economic Research Service, USDA

Insured Acreage with Coverage of 65 Percent or Higher Showed Upswing In Many Areas in 1999



Counties with at least 500 acres insured at or above the 65-percent coverage level in 1998. Includes all yield and revenue products for all crops.

Based on data from USDA's Risk Management Agency.

Economic Research Service, USDA

grew by more than 90 percent from 1998. In many counties in the Corn Belt, revenue plans now account for more than half of buy-up insured acres.

How much did subsidies and discounts raise participation? If producers are generally unresponsive to premium changes, increasing government payouts for premiums could raise program costs dramatically while having little effect on overall participation. Last year's crop insurance experience, when large premium discounts were made available and many producers added or upgraded coverage, perhaps gives a good idea of how producers react to additional support for purchasing insurance protection.

Higher levels of buy-up participation are expected to continue in 2000. Although the 1999 legislation funded emergency assistance premium discounts for only 1 year, appropriations for fiscal year 2000 (the Agriculture, Rural Development, Food and Drug Administration, and Related Agencies Appropriations Act, 2000) included \$400 million in premium discounts for 2000. Estimates for 2000 point to a 20-25 percent producer premium discount for buy-up coverage (in addition to existing subsidies), depending on expected crop prices and the number of producers choosing to insure or to increase their protection.

Additional premium discounts for buy-up insurance coverage, similar to those included in the emergency assistance legislation for 1999 and 2000 crops, could become a permanent part of producer premium subsidies. In September 1999, the House of Representatives passed the Agricultural Risk Protection Act of 1999 (HR 2559), which would boost buy-up premium subsidies, and would reform other Federal crop insurance program provisions. Over the past several months, the U.S. Senate Committee on Agriculture, Nutrition and Forestry has seen bills introduced that would also boost insurance subsidies, as well as a bill that would provide direct payments to producers undertaking a variety of risk management activities. AO

Robert Dismukes (202) 694-5294 and Joseph Glauber (202) 720-6185 dismukes@ers.usda.gov joseph.glauber@usda.gov