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Dairy Subtitle to the 2013 Farm Bill: Critical Issues and Options

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Multidisciplinary Review Team available on the FPRC Website.

Summary of Findings:

- 2013 House and Senate Farm Bills provide major reforms to federal dairy policy, re-orienting dairy safety net programs from supporting milk revenue to protecting dairy income over feed cost (IOFC) margins. Proposed 2013 House and Senate Farm Bills are likely to be very effective in providing catastrophic dairy margin insurance. If effective, the Senate stabilization program would reduce the duration of low-margin periods.[1] However, if the stability of net farm incomes is substantially increased, then milk supply response may result in reduced average IOFC margins.[4]

- Contrary to current Title I commodity programs, these dairy reforms impose no eligibility constraints with respect to farm size or adjusted growth income. As such, the new dairy policy in the 2013 Farm Bill is expected to increase the share of total program benefits accruing to large farm operations.[2,5] Under the Milk Income Loss Contract program (MILC), farms with less than 100 cows (76% of farms; 18% of milk production) account for 42% of net payments and farms over 1000 cows (2% of farms; 42% of milk production) account for 6% of net payments. Under the new policy regime farms with fewer than 100 cows will get 17-21% of net program benefits, and farms over 1000 cows will get 36-43% of benefits.[2]

- Expected costs of 2013 Farm Bill dairy policy proposals are found to be up to three times as high as the expected costs of continuing the 2008 Farm Bill dairy programs. The proposed Senate stabilization program may reduce costs of 2013 Farm bill programs between 5% and 30% relative to standalone margin insurance, with results highly sensitive to modeling assumptions regarding the program participation rate and elasticity of demand for dairy foods.[2]

- The ability to make annual coverage decisions immediately before the coverage period starts encourages dairy producers to use the new programs strategically. When forecasted margins are above average, the profit-maximizing decision for producers is to forfeit supplemental margin insurance. When forecasted margins are much below average, producers are likely to over insure, and buy very high margin coverage levels.[3] By instituting a six-months gap between a sign-up date and the beginning of the coverage period, participants' ability to forecast margins over the coverage period would be substantially reduced, and enrollment decisions would be based on the need for risk protection, rather than the opportunity for rent extraction. This change would preserve low and affordable premium levels, while reducing the expected program outlays by at least 20%.

Background

Historically U.S. federal dairy policy was based on milk price protection and, more recently, counter-cyclical revenue support for dairy producers when milk prices drop. Dating back to 1949 direct price support has been accomplished under the Dairy Product Price Support Program (DPPSP) and more recently, enacted with the Farm Security and Rural Investment Act of 2002, the Milk Income Loss Contract (MILC) program provided added income support. Designed for an environment with stable feed costs, these safety net programs are now viewed to be inadequate for the current volatile grain prices. Given that feed costs represent the largest single cost in milk production, the House and Senate 2013 Farm Bills propose several new safety net programs that emphasize government sponsored income-over-feed-cost (IOFC) margin insurance. Dairy subtitles in both House and Senate 2013 Farm bills discontinue MILC and DPPSP programs and institute a Dairy Producer Margin Protection Program (DPMPP). The DPMPP is a highly subsidized IOFC margin insurance program designed to pay an indemnity to a participating farm when the difference between the national average All-Milk Price and the formula-derived estimate of feed costs falls below a farmer-

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selected margin trigger. The Senate bill also includes the Dairy Market Stabilization Program (DMSP). The DMSP is a supply management-type program designed to enhance milk prices by limiting the rate of growth in U.S. milk production when IOFC margins satisfy predetermined triggers. Participating farms must either reduce the quantity of milk sent to market or face milk revenue penalties on milk shipped over their assigned production base.

IOFC Margin Insurance Programs

An actuarially fair insurance premium is the premium that equals expected payouts. When forecasted IOFC margins are below average, expected payouts are high, so a fair premium would be higher. However, both Senate and House Farm bills provide dairy IOFC margin insurance with fixed premiums. It follows that in some years, when forecasted margins are very low, expected payouts may be much higher than the pre-specified premiums. In other words, in those years, implied insurance subsidies will be very high. In other years, when forecasted margins are high, these fixed premiums may be too expensive relative to fair insurance premiums. Under the House and Senate programs producers can choose a different coverage level each calendar year. Assuming participating producers must decide by January 15 which coverage level to insure for the current calendar year, substantial incentives exists for strategic participation choices which will result in under-insuring when forecasted margins are high, and maximal coverage when margins are expected to be substantially below average. Fixed premiums in conjunction with no time gap between the date when the insurance decision must be made and the start date of the coverage period is likely to result in financially secure dairy producers choosing a coverage level not based on their risk management needs, but with the goal of maximizing indemnities from the government.

Table 1. Federal Agricultural Reform and Risk Management Act of 2013 (HR 2642): Premiums and Expected Indemnities under Dairy Producer Margin Insurance Program

		Current Proposal: No-gap				6-month gap	
Coverage	**Premium (4 million pounds)**	**Average Expected Indemnity**	**Average Expected Subsidy**	**Maximum Expected Indemnity**	**Maximum Expected Subsidy**	**Maximum Expected Indemnity**	**Maximum Expected Subsidy**
$4.00	$0.030	0.05	40%	0.21	86%	0.07	55%
$4.50	$0.045	0.08	45%	0.35	87%	0.12	63%
$5.00	$0.066	0.13	48%	0.54	88%	0.20	67%
$5.50	$0.110	0.19	42%	0.78	86%	0.32	65%
$6.00	$0.185	0.27	33%	1.04	82%	0.47	61%
$6.50	$0.290	0.39	25%	1.33	78%	0.66	56%
$7.00	$0.380	0.53	28%	1.65	77%	0.90	58%
$7.50	$0.830	0.70	-18%	1.98	58%	1.17	29%
$8.00	$1.060	0.91	-16%	2.33	54%	1.46	28%

Several options exist to reduce this problem. For example, if producers had to choose a single coverage level for the duration of the farm bill the average expected subsidy would be very similar to subsidies in crop insurance programs. Alternatively, the coverage period could be changed to correspond to fiscal years (Oct 1 – September 30 of each year) with the insurance decision date being the previous March 15. A 6-month gap spanning the crop growing season would substantially reduce "gaming" the program to maximize indemnities while minimizing premiums paid. As a result, the maximum expected subsidy for $8.00 coverage level is estimated to be reduced from 54% to 28%. Based on our research (see Table 1) we estimate the 6-month gap provision could reduce overall dairy policy costs by 20% while preserving low premiums and generous subsidies for those producers who will use this insurance for risk management purposes as it is intended.

References

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