

Making Sense of California Milk Standards and Prices

by L.J. (Bees) Butler

The recent furor over California fluid milk prices has sparked a number of newspaper articles and TV news spots that, to many, are confusing and potentially misleading, and seem to perpetuate a widespread misunderstanding about milk standards and prices in California.

Dairying is important in California. We produce almost 20 percent of the total milk produced in the U.S. here with a wholesale value around \$4 billion. In dollar terms, milk is the number one agricultural commodity produced in California. What many people do not know is that California has long had standards for fat and solids content in fluid dairy products that differ from the rest of the country (see accompanying table). California standards require fluid milk to be fortified by replacing removed fat with solids-not-fat (either a powdered or condensed milk), such that total solids are at least 12%. As a result, California fluid milks are more consistent and richer in taste than those of other states where fat is removed without an equivalent amount of solids replacing it. Taste tests have shown that consumers prefer this richer, more consistent product resulting from California standards.

California milk standards were born out of a compromise between producers and processors in the early 1960s. At that time, processors wanted statutory authority to market a lowfat milk product (prior to 1962 only two fluid milk products were defined – whole milk and skim milk). But since producers were paid on the basis of the fat content of their milk, they were afraid of what reduced fat products would do to their Class 1 sales of milk fat. Obviously, if the extracted milkfat were not sold at Class 1 prices, it would be sold at the lower priced Class 4a (butter) or 4b (cheese) price. It was agreed therefore that producers would get paid on both fat and solids-not-fat (SNF) content (known as multiple component pricing, or MCP) and that the 12% standard (10%

SNF, 2% milk fat, or later 11% SNF and 1% milk fat) would become the standard for California milk.

However, among the many provisions of the Nutrition Labeling and Education Act (NLEA) of 1990 is a requirement that standards of identity be uniform in all states. This, in effect, preempted California milk standards, no longer allowing them to differ from those prescribed by the federal government. For a long time, many in the U.S. dairy industry have believed that the

Table 1. Federal and California Minimum Standards for Fluid Milk Products

Product	Federal	California
<u>Whole milk</u>		
Milkfat	3.25%	3.5%
Solids-not-fat	8.25%	8.70%
Protein	8 g	8 g
Calcium	290 mg	310 mg
Sodium	120 mg	130 mg
Calories	140 Kcal	150 Kcal
<u>Lowfat milk</u>		
Milkfat	0.5-2%	2%
Solids-not-fat	8.25%	10%
Protein	8 g	10 g
Calcium	290 mg	350 mg
Sodium	120 mg	150 mg
Calories	120 Kcal	140 Kcal
<u>Extra-light milk</u>		
Milkfat	0.5-2%	1%
Solids-not-fat	8.25%	11%
Protein	8 g	10 g
Calcium	290 mg	320 mg
Sodium	120 mg	160 mg
Calories	100 Kcal	120 Kcal
<u>Nonfat Milk</u>		
Milkfat	< 0.5%	<0.25%
Solids-not-fat	>8.25%	>9%
Protein	8 g	8 g
Calcium	290 mg	320 mg
Sodium	120 mg	130 mg
Calories	90 Kcal	80 Kcal

Source: National All-Jersey Inc., Equity Newsletter, Vol. XVI, No. 4, August 1991.

higher (more nutritious) California standards should become the national standard. However, processors in other states opposed this change when it was proposed in the 1990 Farm Bill.

California applied for an exemption from the lower federal milk standards in 1991, arguing that federal minimum nutritive (protein and calcium) standards are significantly lower for every fluid milk product, and the federal fat standard for nonfat milk is double the California standard. While the FDA has never ruled on the California exemption, the 1996 Farm Bill (FAIR Act of 1996) specifically exempts California from the federal milk standards and allows California to maintain its higher standards. These differences in milk standards have raised a number of issues that are both misleading and divisive.

Retail Milk Prices

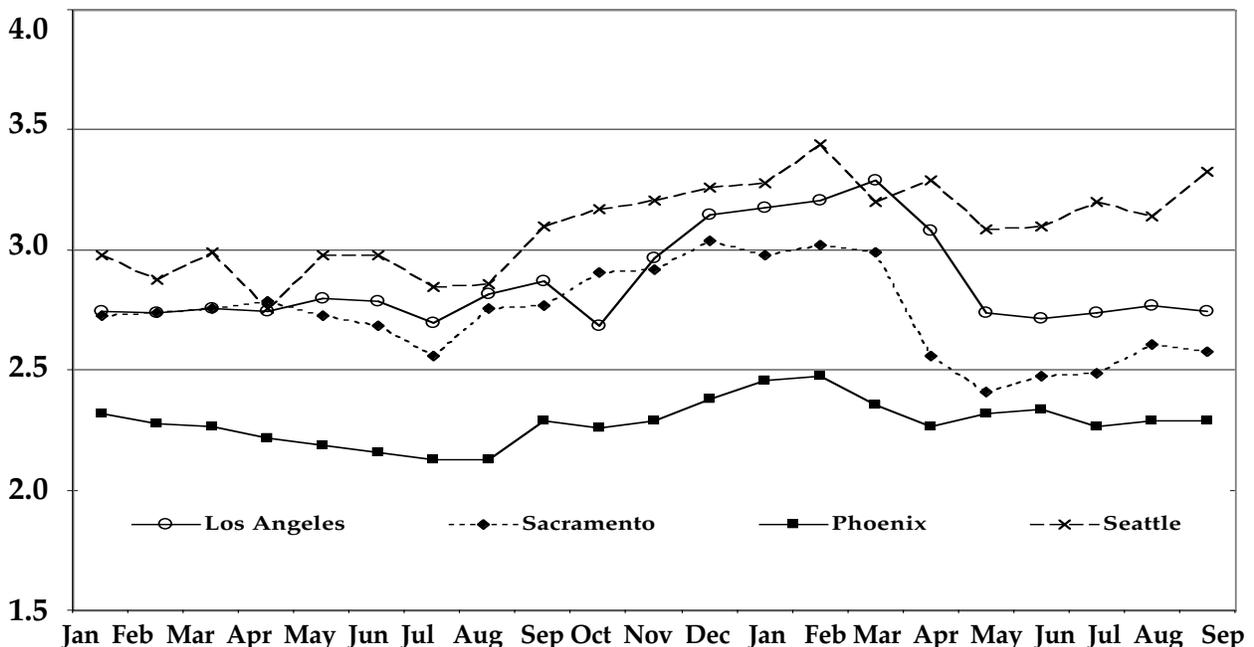
Many people have the impression that milk in California is more expensive than anywhere else in the U.S., and that much of this expense is due to the California fluid milk standards. One recent newspaper article (Los Angeles Times, December 9, 1999) argued that November California retail prices were \$0.60 - \$1.20 per gallon more expensive than the national average, and that this was due to California's higher milk standards.

First, as the accompanying graphic shows, California retail milk prices are far from the highest in the nation. While it is true that retail milk prices in Phoenix and Salt Lake City are often lower than California, milk prices in Portland, Seattle, New York, Miami and Washington D.C. are the same or much higher.

Second, since the fortification process involves the addition of extra solids to fluid milk, some fluid milks in California are naturally going to be slightly more expensive than non-fortified milk in other states. One can estimate from the California fortification allowances that it costs on average, about 16 - 20 cents per gallon to fortify milk to California standards. Some California consumer groups have argued that this added expense denies poor people the nutrition that milk affords them, and that out-of-state milk should be allowed to enter the state, or alternatively, that the state should change the standards. But the extra 16 - 20 cents per gallon for fortification is a relatively minor factor influencing fluid milk prices at retail.

Third, some people have criticized California milk prices because of the minimum below-cost retail price controls that exist. Minimum below-cost retail prices are based on a minimal markup of retail prices from farm prices. It is illegal to sell milk at retail below this minimal markup from the farm price.

Figure 1. 1998-99 Milk Prices at the Retail Level (\$ per gallon)



Minimum below-cost retail price controls are a consequence of previous minimum wholesale and retail price controls. Between 1937 and 1976, California, along with 19 other states, imposed minimum retail and wholesale prices for milk. According to the USDA (1955), the rationale for retail price controls are

to control price cutting and 'destructive' competition, to protect against producer price cuts and losses caused by dealers' bankruptcies; to protect a state's producers and distributors against competition from low-priced out-of-state milk, to maintain distributor margins that will enable the industry to pay reasonable prices to producers; to prevent price manipulation by distributors for the purpose of strengthening their competitive position, to check rebates and other advantages given customers with exceptional bargaining powers and to make determination of resale prices public rather than a matter for secret understanding.

(USDA-AMS, Report # 98, 1955).

Most states, including California, have discontinued such controls, but in 7 or 8 states, including California, minimum below-cost retail price controls still exist in State legislation. They are intended to prevent large supermarket chains from driving smaller competitors out the milk market through predatory pricing.

While minimum below-cost price controls are anachronistic, and do appear to be anti-competitive, the fact is that retail prices rarely get anywhere near the minimum markup. According to the California Department of Food and Agriculture (CDFA) the minimum below-cost rule was last enforced in 1989, and even then, the case was dismissed.

Finally, many people are under the illusion that milk prices are "set" every month by some entity associated with the CDFA. Some newspaper articles imply

that there is some person or persons at the CDFA who carefully analyze the milk situation in California each month and decide what the milk price will be, then "announce" the prices for that month! Nothing could be further from the truth.

Bearing in mind that milk prices must satisfy both milk producers (who want a higher price) and processors (who want a lower price), milk prices in California are established by formulae that are based on *national* markets for butter, nonfat dry milk powder and cheese. Thus, milk prices are determined by national commodity markets, not by some government entity that arbitrarily decides monthly milk prices.

Nutritive Value of Milk

The nutritive value of milk as a safe and healthy food suitable for the American diet has been recognized for decades and promoted as such by the U.S. government. However, recently, several special interest groups have challenged the notion that milk is a healthful food suitable for inclusion in the USDA's Food Guide Pyramid. Specifically, a group known as the Physicians for Responsible Medicine (although only 5,000 of their 100,000 membership are physicians, according to their Web site) have criticized the forthcoming U.S. Dietary Guidelines for "promoting the myth" that dairy foods play an important role in providing calcium for the American diet. They claim that there are other available sources of calcium and vitamins without consuming dairy products. While this may be true, according to the USDA, 75% of the available calcium in the food supply is found in dairy products. How do we reconcile this apparent confusion?

The fact of the matter is that although there are alternative sources of calcium and vitamins, they are not as available, and are not as convenient as the proponents of alternative sources would have us believe.

According to the Center for Food and Nutrition Policy at Georgetown University, alternative sources of calcium can be found primarily in 3 vegetables: kale, broccoli and collard greens. In order to meet the daily adequate intake of calcium for the general population (1000 mg), an individual would have to consume anywhere from 3- 7 cups of collard greens, 7-11 cups of broccoli, or 5 - 11 cups of kale per day.

As is clear in Table 2, while alternative sources of calcium exist, the sheer volume and fiber bulk in the quantities needed would likely discourage such an intake regimen. And compared to milk, the alternatives are not nearly as convenient.

Table 2. Calcium Sources, Content and RDA Requirements

Source of Calcium	Calcium content per cup	Cups required to meet RDA
Kale	94 - 179 mg	5.6 - 10.6
Broccoli	94 - 135 mg	7.4 - 10.6
Collard Greens	148 - 357 mg	2.8 - 6.8
Milk (Federal Std.)	290 mg	3.5
Milk (Calif. Std.)	310 - 350 mg	2.8 - 3.2

Sources: Center for Food and Nutrition Policy, Georgetown University, Washington D.C.

State Trade Barriers

A number of out-of-state fluid milk processors have attempted to sell fluid milk in California that meets the lower federal standards, but does not meet the higher California standards. They argue that the NLEA preempts California standards. Since the California standards are mandated by statute, the California Department of Food and Agriculture has had to order such milk to be withdrawn for sale in California. This, in turn, has prompted several court challenges to California's statutes and higher standards. Until recently, the courts have ruled in California's favor, and California has been able to maintain its higher standards for milk. However, in August 1999, a San Diego Appeals Court decided that California law could not ban federal standard milk from entering the state. State officials have asked the California Supreme Court to review the Appeals Court ruling.

This issue is a particularly tricky one for the California dairy industry. On the one hand, California standards for milk provide consumers with a richer, more nutritious and more consistent milk than do the lower federal standards. The fat and SNF content of milk changes seasonally and by geographic location. If it is not fortified then its consistency changes week-to-week, month-to-month, potentially leading to a loss of consumer confidence in milk. On the other hand, disallowing the sale of the lower federal standard milk from other states can be construed as an unfair trade barrier. Some state legislators have argued that consumers should have a choice of which milk they want to purchase, and that the increased competition created by allowing the lower federal standard milk to be sold in California would help boost consumption and result in an increased intake of calcium. Theoretically, these arguments are valid. But what would actually occur is unknown. There is no evidence that consumers are reducing milk consumption because of price, and certainly not because they prefer the lower standard milk. Nor is there any evidence that consumers would increase their calcium intake through increased competition in milk. Since the lower federal standard milk has less calcium, consumers would have to purchase *more* milk to meet their intake requirements. Nor is it clear that milk *or calcium* intake is highly price responsive. Numerous surveys carried out over the last few years have shown that milk prices vary between retail outlets (not just in California, but all over the nation) by as much as \$2.50+ per gallon. Lower-than-average priced milk is available in most cities and towns throughout the nation. What is clear is that most consumers do not take much notice of the price they pay for milk, as long as it is reasonable. Most

consumers do not go out shopping specifically for the cheapest milk available. They tend to purchase it at the supermarket along with the other staples they require.

Impacts

Should California's higher milk standards be abolished and replaced with lower federal milk standards? Abolishing the standards themselves would reduce prices, but not nearly by as much as some groups would have us believe. If milk were not fortified to California standards then we could expect prices to drop by about 16 – 20 cents per gallon. But the richer, more consistent and more nutritious milk would be gone, and the extra milk required to obtain the daily requirements of calcium and other nutrients would probably make the price reduction a wash.

Although it would not be illegal for California to continue to produce the richer milk that consumers prefer, the issue clearly poses a dilemma for the industry. First, approximately 50 million pounds of solids-not-fat used for fortification (worth about \$50 million), and a significant amount of fat (from the lower federal fat standards) would be displaced, which would flood dairy products markets. Most of this surplus would be purchased by the government run Commodity Credit Corporation (with taxpayer revenues) under the current price support program. Thus, taxpayers would foot a large chunk of the bill. Second, California consumers, it is estimated, would have to pay significantly more than this to obtain the nutrition equivalent to that offered in milk. Third, the effect of the displaced solids and fat would likely depress the price of milk for *all* U.S. dairy producers, and would be unduly burdensome to California producers. And finally, dual standards would likely create considerable confusion for consumers.

It would not be any great loss to processors if fortification of fluid milk were replaced by the lower Federal standards. This would reduce the cost of producing California fluid milk, resulting in California processors being more competitive with surrounding states. At the same time, a large volume of nonfat solids would be released onto the market, reducing the price of all milk in the U.S. And the losers would be California consumers and all U.S. producers.

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