

FUNCTIONAL FOODS TASK FORCE REPORT

SPRING 2010

Background of the FFTF

For the past 12 years, Dairy Council of California (DCC) has been convening the “Functional Foods Task Force” (FFTF) annually as a way to track changes in our external environment that may affect the dairy industry. This 14-member task force is comprised of industry experts from around the country, representing research and development, academia, marketing, education and communications. The members come prepared to discuss nutrition and dairy research, public policy, regulations and consumer perceptions that impact dairy and to strategize around what DCC and the industry can do to optimize dairy’s positioning in our rapidly changing environment. The most recent meeting was held in March in San Francisco.

Priority areas addressed at the recent meeting included:

- The 2010 Dietary Guidelines to be released later this year ... and how these might impact dairy.
- The likelihood that the vitamin D recommendation will increase and the opportunity that this creates for milk and dairy products as the primary sources of this nutrient.
- Front-of-package and nutrient labeling systems and how the consumer might use these in making food choices.
- The growing research on health benefits of probiotics and the natural association of dairy as being the ideal “carrier” of these healthy bacteria.
- Sustainability and “carbon-footprint” concerns, which are becoming bigger factors influencing consumer food choices.
- The growing research around whey protein, which is especially strong in the sports-nutrition and weight-management arenas.
- Emerging research in milk’s bioactive components and related health benefits.

Opportunities and Vulnerabilities for Dairy Products

“Processed foods” a negative buzzword among consumers

Some health professionals and nutrition stakeholders—continually looking for a singular dietary caveat—have latched on to processed foods as the newest category to avoid for their fat, sugar, sodium and caloric content. Because processed foods span a spectrum from vitamin D-fortified milk (minimally processed) to pastry-like breakfast and snack foods (highly processed), the issue is not black and white, resulting in many foods that are considered healthy being placed under this negative umbrella. Indeed, almost all foods are processed to some extent. The terms “minimally processed” or “naturally processed” have not been defined, so the consumer has a hard time distinguishing between the degree of processing—and therefore, presumably, the healthfulness of individual foods.

With this new awareness, certain foods including processed cheese will be a target. The general wholesomeness of dairy foods will be to the industry’s advantage, and efforts to position dairy foods as minimally processed, healthy and natural will be well received. It was agreed that educational efforts informing consumers that processing is important for food safety, shelf-life, nutrient content, taste and efficiency of food production—and that consumers themselves ‘process’ foods in their own kitchens—will be helpful in this environment.





Sodium a target in the upcoming 2010 Dietary Guidelines

Discussions around the 2010 Dietary Guidelines indicate that sodium recommendations will be greatly reduced, from today's upper limit of 2300 mg to a new, lower level of 1500 mg per day (the average intake in the American population is currently 3400 mg). Many food manufacturers are already discreetly reformulating products to contain lower levels of sodium, with some concern that flavor—and therefore, consumer acceptance—will be compromised. Food safety, texture and shelf-life are other obstacles to low-sodium products. Restaurant offerings will also be impacted, as the industry aims to meet the demands of the public-health stakeholder and the consumer looking for low-sodium meals.

The American Heart Association (AHA) and other groups agree that such a drastic reduction in sodium intakes can only be accomplished gradually. There will undoubtedly be goals to reduce sodium levels of certain food products by pre-determined dates. For example, Institute of Medicine (IOM) suggests that by 2020, individual school meals should contain less than 740 mg. The task force expressed concern that these new levels may impact consumer perception and consumption of cheese and will pose production, flavor and food-safety challenges to the industry. Consumers will be looking for “reduced-sodium” and “low-sodium” products; yet will not want to compromise the flavor of their favorite foods.

Lactose intolerance—an obstacle or a misperception?

New research and public-health reports on lactose intolerance concur that many—in fact, the majority of—people worldwide lose the ability to digest the milk sugar lactose as they age, but that there are many ways to minimize symptoms while including dairy products in the diet. A recent National Institutes of Health (NIH) Consensus Conference on lactose intolerance encouraged those with varying degrees of lactose intolerance to continue consuming dairy, at least in small amounts and with other foods, for its content of calcium, magnesium, potassium, protein and other important nutrients.

Dairy is often the first food group to avoid when, for example, babies develop unexplained colic or adults complain of any type of intestinal distress. Whether or not this recommendation works and symptoms subside, often people do not return to dairy products after adopting the mindset that they are better off without them. Such habits can become lifelong and affect other family members as well, reducing overall dairy consumption and adversely impacting nutrient intakes and, eventually, health. The task force agreed that culturally sensitive education geared at both the consumer and the health professional—who is often the one making these recommendations—is needed to turn this perception around and inform people that lactose intolerance can be managed through strategic use of dairy products.



Concerns around sustainability, economics and animal agriculture are affecting consumer food choices

There is growing interest among consumers and stakeholders alike in the area of plant-based diets as the health and sustainability benefits of such diets are entering mainstream discussion. Increasingly vocal anti-animal agriculture advocates are supporters of plant-based lifestyles; animal-welfare concerns are another driver. The task force shared examples of how we are seeing this movement manifest on various levels. There is a push to make soy beverage more widely and easily available; for example in USDA's school lunch program as a replacement for cow's milk. Some hospitals offer “meatless Mondays” and restaurants increasingly offer vegetarian alternatives.

Much USDA-funded research is centered on plant bioactives and their purported health benefits. The plant-based food industry is working diligently to improve the taste of products such as soy-based cheese and beverages. The best position for dairy, the task force suggested, is to make it clear that dietary patterns based on plant food sources can and should include milk and milk products.



There are also concerns about the health and nutrition of plant-based diets, however. Protein intakes can be compromised when consumption of animal products is minimized, which may be of concern in growing children and adolescents. There is some evidence that consuming too much soy may have some deleterious health effects on children's growth and development. Nutrients of concern when one consumes a plant-based diet are many, and include calcium, iron, magnesium, phosphorus, zinc, vitamin D and B12, as well as protein.

The dairy industry is evaluating the carbon footprint of milk production and investigating methods across the production lifecycle to reduce its footprint. As our worldwide population continues to increase and land for agriculture continues to decrease, efficiency of food production will be of utmost importance. The task force concurred that health and nutrition stakeholders and policy makers need to remember that, within the sustainability arena, ultimately it is the health of the individual that we need to keep as highest priority. This will mean choosing nutrient-dense diets—including dairy foods—to optimize health and minimize disease risk. When economics are factored into food choices, dairy also comes out ahead; new research shows that the most affordable foods with high nutrient density are dairy, eggs, beans, nuts, seeds and some fruits and vegetables.

More balanced research coming out around dietary fat and saturated fat

There was much discussion at the meeting on recent research on dietary fat, specifically saturated fat and its association with heart disease. Contrary to the previous paradigm that high intakes of saturated fat are a primary risk factor for heart disease, newer studies show little to no association. It is also becoming clear that the effect of different types of saturated fat—long-chain versus short-chain—may have different implications to health. This is in accordance with recent evidence showing that the deleterious effect of trans fats are isolated to those that are industrially produced, not naturally occurring (such as is found in dairy).

Unfortunately, research does not get translated immediately into application. Many stakeholders and policy makers are entrenched in the old paradigm and even making recommendations to reduce saturated fat intake to less than 7 percent of our daily calories (currently this recommendation is 10 percent) in the upcoming Dietary Guidelines report. The task force warned that these types of recommendations are what instigates public policy such as taxing foods with high amounts of saturated fat—something we have seen in other countries (Denmark) and are starting to see state-by-state in the United States.

In all this, we need to remember that taste and the pure pleasure of eating are part of the discussion and is a big factor in the choices that consumers make. Changing the paradigm and educating consumers and stakeholders that dietary fat may not be the demon once believed will not be easy. The task force cautioned against prematurely disseminating this newer research before it has been fully substantiated in areas beyond heart disease. The impact of saturated fat in cancer, diabetes and metabolic syndrome has yet to be verified. One of the charges of the Global Dairy Platform (GDP) is to collect and analyze the research on health effects of saturated fats and formulate plans to disseminate appropriate messages. It will be important for these messages to be unified across the dairy industry.



Strategies Identified for the Industry

- Leverage dairy's protein and other nutrient contributions to our diet in response to the movement to adopt more plant-based diets. Build value for the complex nature of milk nutrients that are delivered in the right ratio and bioavailable forms.
- Educate the consumer about the benefits of processed foods—stability, nutrient content, flavor, texture and safety—and on the wholesomeness of dairy foods.
- Monitor dietary recommendations on fat levels, specifically on saturated fat. Keep abreast of new research in this area. Provide information to the Dietary Guidelines Committee about the changing relationship between saturated fat and heart disease, emphasizing that the type of fat is of importance.
- Continue to support research on improving sustainable practices and reducing the carbon footprint of producing milk and other dairy products. Develop talking points for the health professional and consumer on how the dairy industry incorporates “green” practices and on animal welfare.
- Approach the issue of lactose intolerance head-on. Educate consumers about how much lactose is contained in different dairy products and provide strategies for how to incorporate these products into their diets while minimizing symptoms. Inform health professionals of the deleterious health effects of dairy-free diets; encourage them to work with patients to find ways to continue consuming this cornerstone to their diets. At the same time, remain sensitive to their issues and acknowledge that some people have real problems consuming lactose.
- Encourage industry efforts to develop probiotic nomenclature and standards within the industry for appropriate levels of probiotics and health-benefit claims.
- Consider promoting research on levels of bioactives in dairy and related health benefits; act rapidly to apply positive findings.
- Keep abreast of public policy and recommendations regarding sodium intakes. Continue to research and reformulate products to contain less sodium, yet still meet consumer expectations for taste and food safety.

Dairy Council of California

Since 1919, Dairy Council of California has been an innovator in nutrition education. Dairy Council's mission is to help consumers make food choices for optimal health that match individual values. We do so using a total-diet approach in which dairy is a cornerstone, through innovative learning programs, research and communications.



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