Ghosts of Nutrition Past

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Some say that progress moves in straight lines. Others suggest that progress waxes and wanes, so progress must be sinusoidal. To me, progress appears as a three-dimensional spiral: we revisit issues again and again, but always from new and enhanced perspectives.

One would be hard-pressed to contemplate today’s percolating issues regarding the “glycemic index” of foods without a twinge of déjà vu regarding the disastrous 2003–2004 “low carb” revolution. To revisit: one Dr. Atkins wrote a series of books purporting that diets low in digestible carbohydrates and rich in protein (even fat) would result in significant weight loss. Ergo, many of his admirers concluded that “carbs are bad.” This troublesome development was in direct contradiction to nutritional convention (admittedly, not necessarily a bad thing). In the United States, the “low-carb” trend took years to bubble up the food chain of consumer awareness before bursting upon the mainstream food scene in 2003. The eruption sowed widespread panic throughout the cereal foods industry as sales of breads, pastas, and other “carb” products slumped. Harried product developers stalked trade show floors and AACC International product-development workshops in search of “low-carb” solutions. Some cereal product manufacturers retreated into Chapter 11 bankruptcy protection. Fortunately for the industry, the low-carb “craze” passed rather quickly, and the cereal products industry nervously recovered its breath. Just last year, a leading American consumer food-trends guru, speaking at the World Grains Summit in San Francisco, felt emboldened to sneer that “low carb” foods could command the interest of “only” 10–20% of American consumers.

So, today, digestible carbs once again stir debate from a new perspective—that of “glycemic index.” Perhaps Dr. Atkins really was onto something. Perhaps his dietary insights opened the door to a new appreciation of how the digestibility rates of starches and sugars affect health in general. For me, it was never in question; as the father of a type-1 diabetic child, I could observe firsthand how blood sugars reacted vastly differently to, say, potatoes, depending upon how they were cooked, or to extrusion-puffed cereals versus granola clusters. It seemed obvious (to me, anyway) there had to be metabolic and health implications. Perhaps, with a renewed focus on the glycemic values of foods, we will develop a much better understanding of the underlying science that the Atkins diet frenzy obscured and of its long-term implications for heart disease, diabetes, kidney health, and cancer. And it will not be a moment too soon: the incidence of diabetes (types 1 and 2) is skyrocketing worldwide, and aging boomers and public health agencies increasingly feel the cumulative impact of this chronic disease state. We will first need understanding in order to find solutions. Not so fast, though. As Drs. Brand-Miller, DeVries, and Jenkins point out in their “glycemic index” on these pages, it should be obvious that these issues are far from clear. Dr. Julie Jones moves our guideposts for clarity forward by providing needed guidelines on glycemic terminology. No doubt, further revisitation of these issues will be in order in the future. Also very pertinent to the glycemic index debate are Jacqueline Beckley’s and Hollis Ashman’s strong insights into obesity’s psychological underpinnings of lifestyle, physiology, taste, and food choices. Obesity and glycemic index issues go hand-in-hand.

Cereal science and the cereal foods industry will revisit a number of old issues this year—fiber, sodium, and calcium are likely to capture new headlines. In the United States, issues of foodborne illness made a spectacular comeback in 2006. As our new columnist Richard Stier observes in his introductory column, cereal foods manufacturers can hardly afford complacency on the issue of food safety. Government regulators worldwide strive mightily to bring order and clarity to consumers’ understanding of food safety and nutrition in the public interest, but they never seem to hit quite the perfect note. Our Japan contributor, Dr. Kiyoko Kubomura, illustrates a case in point with her trenchant analysis of Japanese FOSHU regulations, de jure and de facto. Public health officials and regulators, too, need to revisit old issues from new perspectives. Our third new columnist, Dr. Rebeca Lopez-Garcia of Mexico City, meanwhile, revisits ancient grains long neglected by history but exhibiting renewed appeal in the modern marketplace. Our new R&D columnist, expert baker David Busken, revisits the fundamentals of industrial baking in the most practical of matters, as he will continue to do in future columns, issue by issue. Thus do we constantly renew our industry—through the continual application of new insights to old issues.

It is in this self-same spirit of renewal that AACC International and Cereal Foods World plan to sponsor a series of strategic product development workshops, beginning in June of this year. We will work with developers of pasta, bread, tortilla, cookie, and other cereal products to identify and develop practical solutions to today’s emergent issues. Keep your eyes peeled for our future missives regarding these forthcoming events—and keep your calendars clear! It should afford us all a splendid opportunity to revisit the most pressing product development opportunities in the most practical ways.