November 1999 Issue | Dr. Vincent Marinkovich

http://jeffreybland.com/knowledgebase/november-1999-issue-dr-vincent-marinkovich/

DOWNLOAD AUDIO |

Welcome to *Functional Medicine Update*™ for November 1997. Our focus this month will be on gastrointestinal health and gastrointestinal physiology and their relationship to the immune system, the neurological system, and the gut inflammatory mediators.

First, I would like to review some of the Hot Breaking News topics of this month, beginning with the efficacy and safety of vitamins and minerals. The *American Journal of Clinical Nutrition* (1997;66:427) contains a review article titled "Vitamins and Minerals: Efficacy and Safety," by Dr. John Hathcock. Dr. Hathcock is a former member of the Food Nutrition Board, was later a director of the program on nutrient supplement safety with the Food and Drug Administration, and is currently on the Council for Responsible Nutrition in Washington, D.C. Dr. Hathcock reviews the safety and efficacy of nutritional supplements in both the vitamin and mineral families.

The term "efficacy" assumes a supplement has the ability to provide a health benefit, related either to prevention of a deficiency or reduction in the risk of chronic disease. There has been a long-standing debate as to whether nutritional supplements do have efficacy, or whether they just create "expensive urine."

In response to those who would use the words "expensive urine" to describe the relationship between nutrient intake and physiological function, I could compare it to the "wasteful practice" of drinking fluids. If we believe that taking nutritional supplements has no value because we urinate them all away, we should quit drinking fluids because we just urinate those fluids away anyway. We can all recognize the fallacy of that argument, because we know that fluid has value in hydrating the body and producing beneficial function. Therefore, it would be ridiculous to stop drinking water. We would die of dehydration.

Similarly, it is reasonable to assume that something of benefit happens from the time vitamins are consumed until they leave the body in the urine. That something of benefit is improved physiological function. In fact, if instead of urinating them away we stored all the vitamins we consume throughout our lives, we would, by the time we died, be a 70 kg mass of vitamins. Clearly, we have to take them in, use them, and excrete them. So I find the concept of expensive urine fallacious and naive.

INTERVIEW TRANSCRIPT

Vincent A. Marinkovich, MD, INC.
Allergy and Immunology
801 Brewster Ave., Suite 220
Redwood City, CA 94063
Phone: (650) 482-2800
Fax: (650) 482-2802

Introduction: Dr. Vincent Marinkovich

Over the past several years a number of premier clinicians have talked to us about their areas of interest and expertise. We have another such Clinician this month. The nearly 600 doctors who attended our Sixth International Symposium on Functional Medicine in Tucson, Arizona, in May 1999, rated Vincent Marinkovich, MD, as one of the best symposium speakers we have ever had. That says something about his clinical acumen, experience, and presentation style.

Dr. Marinkovich got his BS in physics from California Institute of Technology and his MD at Harvard. He is a specialist in both pediatrics and allergy/immunology. He is in private practice in Redwood City, California, and is a clinical associate professor at Stanford Medical School, a position he has held since before 1982. With his stellar background, he is the kind of doctor whose care you would seek if you had an allergy or immunology problem.

JB: Dr. Marinkovich, we hear a lot of debate about allergic-like reactions to foods. Not too long ago we had the chance to talk to Dr. Dean Metcalf at the National Institutes of Health, who is an expert in clinical immunology. He said that only about 2 percent of the population have true food allergy, but we see a lot more percentage than that with people who have atypical reactions to food. Could you help us understand why allergists say there is such a low prevalence of food allergy but we see many clinical food-related problems?

VM: Yes, I can. Generally, allergists accept by definition only those cases of food allergy in which there is a definite demonstrable (and generally demonstrable under double-blind, controlled conditions) presence of IgE antibody. IgE antibody is the same one that causes people to have allergies to their pet cat, to the pollen in the air during certain times of the year, or to house dust. That subgroup of the population probably numbers, at least in terms of significant allergic disease, about 20 to 25 percent in our modern society. Of that group, if one excludes everyone except people who specifically react to foods by an IgE mechanism, you find that in adults that number is about 2 percent. In children it rises to between 4 and 5 percent, but in adults it’s 2 percent.

From my own clinical experience I feel the immune system plays a far greater role in producing symptoms in patients from the foods they eat. But these patients are not identified by skin testing, which is the procedure traditional allergists use in making their diagnoses.

So the answer to the question is yes, Dr. Metcalf is correct. I accept his figures for IgE-mediated adverse reactions to foods. But I would add that by far the great majority of food reactions are mediated by other-than-IgE mechanisms, and many of them are mediated by other immunological mechanisms, which could fall under the category of allergy, except that by definition allergists want to exclude those. I call them hypersensitivity reactions.

BIBLIOGRAPHY

1. Bagga D, Capone S, Wang HJ, et al. Dietary modulation of omega-3/omega-6 polyunsaturated fatty acid ratios in patients with breast cancer. J Natl Cancer Inst. 1997;89(15):1123-1131.
2. Chandra RK. Food hypersensitivity and allergic disease: a selective review. Am J Clin Nutr. 1997;66(2):526S-529S.
3. Compston JE. Designer oestrogens: fact or fantasy? Lancet. 1997;350:676-677.
4. Drewnowski A, Henderson SA, Shore AB. Taste responses to naringin, a flavonoid, and the acceptance of grapefruit juice are related to genetic sensitivity to 6-n-propylthiouracil. Am J Clin Nutr. 1997;66(2):391-397.
5. Fuhrman B, Buch S, Vaya J, et al. Licorice extract and its major polyphenol glabridin protect low-density lipoprotein against lipid peroxidation: in vitro and ex vivo studies in humans and atherosclerotic apolipoprotein E-deficient mice. Am J Clin Nutr. 1997;66(2):267-275.
6. Hambly RJ, Rumney CJ, Fletcher JM, Rijken PJ, Rowland IR. Effects of high- and low-risk diets on gut microflora-associated biomarkers of colon cancer in human flora-associated rats. Nutr Cancer. 1997;27(3):250-255.
7. Hathcock JN. Vitamins and minerals: efficacy and safety. Am J Clin Nutr. 1997;66(2):427-437.
8. Heber D. The stinking rose: organosulfur compounds and cancer. Am J Clin Nutr. 1997;66:425-426.
9. Hileman B. Hormone disrupter research expands. C&EN. 1997;75:24-25.
10. Ishikawa T, Suzukawa M, Toshimitsu I, et al. Effect of tea flavonoid supplementation on the susceptibility of low-density lipoprotein to oxidative modification. Am J Clin Nutr. 1997;66(2):261-266.
11. Johnson MM, Swan DD, Surette ME. Dietary supplementation with y-linolenic acid alters fatty acid content and eicosanoid production in healthy humans. J Nutr. 1997;127(8):1435-1444.
12. Katiyar SK, Mohan RR, Agarwal R, Mukhtar H. Protection against induction of mouse skin papillomas with low and high risk of conversion to malignancy by green tea polyphenols. Carcinogenesis. 1997;18(3):497-502.
13. Kernèis S, Bogdanova A, Kraehenbuhl JP, Pringault E. Conversion by Peyer's Patch lymphocytes of human enterocytes into M cells that transport bacteria. Science. 1997;277(5328):949-952.
14. Kohlmeier L, Weterings KG, Steck S, Kok FJ. Tea and cancer prevention: an evaluation of the epidemiologic literature. Nutr Cancer. 1997;27(1):1-13.
15. Lavine JB. Vitamin B-12 fortification of folate-enriched grain products. Am J Clin Nutr. 1997;66(2):450-451.
16. Madara JL. The chameleon within: improving antigen delivery. Science. 1997;277:910-911.
17. Memon RA, Shechter I, Moser AH, Shigenaga JK, Grunfeld C, Feingold KR. Endotoxin, tumor necrosis factor, and interleukin-1 decrease hepatic squalene synthase activity, protein, and mRNA levels in Syrian hamsters. J Lipid Res. 1997;38:1620-1629.
18. Moore RA. Free PSA as a percentage of the total: where do we go from here? Clin Chem. 1997;43(9):1561-1562.
19. Pike MC, Peters RK, Cozen W, et al. Estrogen-progestin replacement therapy and endometrial cancer. J Natl Cancer Inst. 1997;89(15):1110-1116.
20. Pinto JT, Qiao C, Xing J, et al. Effects of garlic thioallyl derivatives on growth, glutathione concentration, and polyamine formation of human prostate carcinoma cells in culture. Am J Clin

Nutr. 1997;66:398-405.
21. Ramos MG, Bambirra EA, Cara DC, Vieira EC, Alvarez-Leite JI. Oral administration of short-chain fatty acids reduces the intestinal mucositis caused by treatment with Ara-C in mice fed commercial or elemental diets. Nutr Cancer. 1997;28(2):212-217.
22. Rangavajhyala N, Shahani KM, Sridevi G, Srikumaran S. Nonlipopolysaccharide components(s) of Lactobacillus acidophilus stimulate(s) the production of interleukin-1a and tumor necrosis factor-a by murine macrophages. Nutr Cancer. 1997;28(2):130-134.
23. Ruffin MT, Krishnan K, Rock CL, et al. Suppression of human colorectal mucosal prostaglandins: Determining the lowest effective aspirin dose. J Natl Cancer Inst. 1997;89(15):1152-1160.
24. Singh B, Halestrap AP, Paraskeva C. Butyrate can act as a stimulator of growth or inducer of apoptosis in human colonic epithelial cell lines depending on the presence of alternative energy sources. Carcinogenesis. 1997;18(6):1265-1270.
25. Singh J, Rivenson A, Tomita M, Shimamura S, Ishibashi N. Reddy BS. Bifidobacterium longum, a lactic acid-producing intestinal bacterium inhibits colon cancer and modulates the intermediate biomarkers of colon carcinogenesis. Carcinogenesis. 1997;18(4):833-841.
26. Sivam GP, Lampe JW, Ulness B, Swanzy SR, Potter JD. Helicobacter pylori--In vitro susceptibility to garlic (Allium sativum) extract. Nutr Cancer. 1997;27(2):118-121.
27. van Lieshout EM, Tiemessen DM, Peters WH, Jansen JB. Effects of nonsteroidal anti-inflammatory drugs on glutathione S-transferases of the rat digestive tract. Carcinogenesis. 1997;28(3):485-490.

p>