There and Back Again: A Return to Personalised Nutrition Advice

Biography

Prof. Sandra Capra is Emeritus Professor of Nutrition at the University of Queensland, Australia. Her professional career started with 15 years in practice as a clinical dietitian, manager and dietitian-in-charge of nutrition and food services. She then ventured into her highly respected academic career at QUT, the University of Newcastle and the University of Queensland. She was appointed Emeritus Professor of Nutrition at the University of Queensland in 2019. In 2003, she was appointed a Member, Order of Australia, for her contribution to nutrition and dietetics and community health. She is a Fellow and Life Member and a Past President of the Dietitians Association of Australia and was President of the International Confederation of Dietetic Associations from 2004-2016. She is currently the Executive Director of the International Commission for Dietitian-Nutritionist Education and Accreditation. In 2014, she was named as one of the 100 Financial Review/Westpac most influential women in Australia in the “global” category. She has served on the NHMRC committees which set the nutrient reference values and the dietary guidelines for Australia and has consulted to government on nutrition and foodservice as well as being an internationally recognized expert in dietetics education and practice. She has published over 200 written works and is regularly invited to speak at national and international conferences.

Abstract

As dietitian-nutritionists we set off on a journey many decades ago, and have now come full circle in many ways - but will we live happily ever after? In the days prior to advanced technology when medicines such as insulin were less effective, when functional foods did not exist, all dietary therapy was personalised and dietetics was taught. Indeed, some of our key leaders used to classify the calculations and manipulations within individualised diets as “dietetics”. But during our adventure, something changed.

In the 1980s we adopted much more of a “one size fits all” approach, possibly in the mistaken belief of efficiency without evidence of effectiveness to cope with high workloads. This was the era of content-free managers in health. The DAA’s Quality Assurance Committee’s processes in 1988 did not mention clients, outcomes, cost effectiveness or similar. The American Dietetic Association (now the Academy of Nutrition and Dietetics) included “research” in their 1986 Standards of Practice, but only one criterion was related to outcomes while the rest were process focused. Gone were the individual “diet sheets”, replaced with standard information sheets and plans, often now on the web. Now we are coming back again to individualised and personal services for medical nutrition therapies. Person-centred care has replaced the standard care for chronic disease management and the Nutrition Care Process introduced in 2004, replaces medical diagnoses and nutrition diagnoses. Fifteen years ago, writers such as de Busk promoted the use of genetic profiles of risk to tailor messages. However, the adoption by the profession has been slow, with caution and a lack of “evidence” often cited for non-adoption.
Much of the research into outcomes for individual dietary therapy focuses on altering prescriptions, format or presentation, but not challenging the fundamental paradigms in use. Students are primarily exposed to traditional approaches. Individual biological variation can account for the failure of many therapies in practice, rather than variation in motivation or understanding. We need a new paradigm as the “old” one does not uniformly work - working at the edges has not made any real difference and there is reputational risk - we need a new way of thinking. Personalisation can be seen as expensive, but the cost of inappropriate treatments is higher - it’s a matter of seizing opportunity when presented.

So now we are “back again” to tailored therapy, but this time with more tools, more understanding of nutrition science, biology, the environment, combining these with an understanding of the new foods, human behaviour to provide practical, personalised advice which is tailored so that outcomes are achieved and health and the system benefits. There is a clear benefit in understanding biological variability. We need to use tools based on biology and not just behaviour or nutrition science. The new paradigm is about understanding that biology determines responses to dietary therapy as much, or more than, the food chosen, knowledge or motivation and that this is now a critical tool for success. The challenge is to be bold in an environment of incomplete science. It is an opportunity and adventure not to be missed.