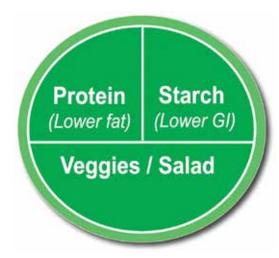
## **Enabling sustainable future health**

We attended the South African Association for Food Science and Technology (SAAFoST) Congress held from 7-9 September 2015, and the International Life Sciences Institute Post Congress Workshop. The congress, as well as the workshop, focused on enabling sustainable future health, and what we are going to do about our growing problem of noncommunicable diseases (NCDs). Dr Nelia Steyn, University of Cape Town, spoke on Food consumption by the South African population: challenges and opportunities. She mentioned that, according to research carried out so far, South Africans are eating too much starch. We suspect that they are also consuming too much fat, fatty meat, and thus excessive energy in relation to their requirements, and too few vegetables. Most restaurant meals predominantly contain protein, starch and fat (thus contributing further to excessive energy intake) and too little or no vegetables or salad. Richard Delate, Managing Director, John Hopkins Health and Education in South Africa, mentioned that the statistics for NCDs are looking similar to or worse than those on acquired immune deficiency syndrome (AIDS) in 1994, when huge anti-AIDS campaigns were implemented. Further, Lynne Moeng-Mahlangu from the Department of Health also spoke against restaurants encouraging overeating.

Sixty per cent of women, 30% of men and 20% of children in South Africa are overweight or obese, according to Prof Julian May, Director, Centre of Excellence in Food Security, who highlighted this during his presentation, *Food insecurity: Are we at risk and what can be done?*, delivered during the plenary session of the SAAFoST Congress in September this year. Thus, the change introduced in the food-based dietary guidelines (FBDGs) from "Make starchy foods the basis of most meals" to "Make starchy foods part of most meals" is most welcome. However, due consideration should be given to changing the current FBDG from "Make starchy foods part of most meals" to read "Make starchy foods part (one quarter of your plate) of most meals". Indeed, it would be an even greater improvement if the FBDG "Eat plenty of vegetables and fruit every day" was adapted to read "Fill half of your plate with vegetables and salad at every meal" (Figure 1).1

The proposed approach, and the saying "a picture is worth a thousand words", is even more applicable here in view of the large percentage of our population that is inadequately educated. This Plate Model is one of the key visual messages of the Smart Health Diet<sup>2</sup> of the Glycemic Index Foundation of South Africa (GIFSA). On GIFSA's Smart Health Diet website, there are links to the "Blue Zones" of the world – the Greek island of Ikaria, the Italian island



GI: glycaemic index

**Figure 1:** The Plate Model,<sup>1</sup> adjusted by the Glycemic Index Foundation of South Africa

of Sardinia, the Nicoya Peninsula in Costa Rica, Loma Linda in the USA, and Okinawa, Japan — five places in the world where people live for a considerably long time (> 100 years old), are healthy and experience a very low incidence of NCDs.<sup>3</sup> Although they consume whole grains [mostly low glycaemic index (Gl) or slowly digestible] in all of their meals, as well as some protein and mostly unsaturated fat, they also eat numerous vegetables, salad, herbs and fruit. Dr Jacques Rossouw,<sup>4</sup> who also spoke at the congress, emphasised that attention needs to be paid to dietary carbohydrate quality (Gl), in addition to consideration being given to fat quality and overall reduced energy intake. This can be more easily attained when the consumption of less energy-dense vegetables in every meal is promoted.

## Elizabeth Delport, RD(SA), MSc Dietetics

Executive Member: Research and Development Manager, Glycemic Index Foundation of South Africa (GIFSA)

## **References**

- Camelon KM, Hådell K, Jämsén PT, et al. The Plate Model: a visual method of teaching meal planning. DIAS Project Group. Diabetes Athersclerosis Intervention Study. J Am Diet Assoc.1998;98(10):1155-1158.
- Welcome to the Smart Health Diet. Smart health diet [homepage on the Internet]. c2015. Available from: www.smarthealthdiet.co.za
- Buettner D. The Blue Zones: lessons for living longer from the people who've lived the longest. The National Geographic Society, 2008.
- Rossouw JE. The diet-heart hypothesis, obesity and diabetes. S Afr J Clin Nutr. 2015;28(1):38-43.