PREFACE

When Advances in Food Technology and Nutritional Sciences – Open Journal invited me to write an editorial, I decided to assign it to my 2018-Biochemical Nutrition graduate students.

My students have diverse educational and cultural backgrounds and have been exposed to a variety of tech-based learning. However, research and thesis writing frequently involves the development of new complex reading skills associated with comprehension and synthesis of a tremendous volume of information, along with in-depth critical analysis, evaluation and elegant academic writing style.

For this purpose, I followed the “scaffolded” approach where I gave my students the creative freedom to pursue their passion and to funnel their topic. In this issue, my students highlighted the current progress related to diverse hot spot research area in both human and animals.

In the era of growth promoting antibiotics ban, Alison Ferver discussed in the first editorial the chemical mechanisms of antimicrobial activity of phytogenics and their potential use as future alternatives. In the second editorial, Danielle Graham et al. described the necrotic enteritis (NE) prevalence and its dramatic effects on poultry health and wellbeing which in turn resulted in heavy economic loss, and finally discussed the beneficial role of xylanase to reduce NE incidence. Lauren Thomas et al. elegantly reported, in the third editorial, a mechanistic understanding of antioxidant impact on cognitive function in canine species.

As obesity is a major health problem in the USA as well as worldwide, the last two student groups focused on this metabolic disorder. Samuel Walker et al. presented intermittent fasting as an effective strategy for preventing obesity and its associated-complications particularly type 2 diabetes mellitus. In the last chapter, Reagan Cauble et al. fine-tuned the role of leptin and NLRP3 inflammasome in obesity pathogenesis.

My goal here is to promote curiosity and to help my students understand complex questions, and to constantly question information and explore more sources. My overall hope is to promote critical and independent thinking and to create research- and question-mindsets. Finally, I really enjoyed interacting with my students and would like to thank them for their dedication, perseverance, and hard work.

— Dr. Sami Dridi