

The Faculty of Biotechnology and Food Engineering

Special seminar

From Cell to Organism: The Link Between Micronutrient Dietary Deficiencies and Physiological Status, Intestinal Functionality and Microbiome



Assoc. Prof. Elad Tako

*Department of Food Science
Cornell, USA*

Abstract. Dr. Elad Tako and his research team conduct multidisciplinary research that links between the research fields of Food Science and Nutrition. The research is focused on various aspects of (a) dietary trace mineral deficiencies, cause and effects, with emphases on the physiological and nutritional factors and practices that influence the intestinal absorption of micronutrients, specifically iron (Fe) and zinc (Zn); and, (b) the characterization of the individual and interactive effects of dietary minerals (Fe/Zn), phytochemicals and prebiotics common to staple foods on the intestinal microbiome composition and function, and the duodenal brush border membrane (BBM) functionality and morphology. In this context, the team is using various and unique approaches that utilize both cellular and animal (*Gallus gallus*, both adult and embryonic) models to assess mineral bioavailability of staple food crops, and plant origin bioactive compounds. In his seminar, Dr. Tako will present and provide an overview of his team's research activities with emphasis on addressing Fe and Zn deficiencies across the globe, dietary challenges, strategies, and the development of a unique research approach (in vivo).

Wednesday, 03/03/2021, 15:00 – 16:00, Via zoom

Meeting ID: 912 9869 7841

<https://technion.zoom.us/j/91298697841>