

Dr. Apollinaire Tsopmo Biography

Dr. Tsopmo is an Associate Professor in the Department of Chemistry at Carleton University, where he teaches in the Food Science and Nutrition Program. Since taking up his position there in 2008, he has worked on natural products chemistry, food chemistry, sensory analysis and the analysis of micro- and macro-nutrients of foods. He brings expertise in plant metabolism and natural products analysis to the team. His PhD thesis focused on the isolation and characterization of natural compounds - mainly polyphenols and alkaloids – from many plant species from both tropical and temperate regions of the world. As a postdoctoral fellow at Agriculture and Agri-Food Canada, he managed a project that involved studying the metabolomics of 10 cultivars and 100 germplasm accessions of lentils. In addition, he purified and characterized novel compounds in selected cultivars.

As a Research Associate at the University of Manitoba, Dr. Tsopmo determined the bioavailability of minerals and vitamins in milks and in animal tissues, found novel peptides in breast milk, and determined the antioxidant capacity and aroma of different breast milks using an “electronic nose”. As a Professor at Carleton University, Dr. Tsopmo has produced over 63 papers, and has supervised graduate projects on the sensory characteristics of breast milk and formulas supplemented with various amount of antioxidant peptides. He holds a patent on novel peptides for the alleviation of oxidative stress. Furthermore, he has been researching on the functionality of proteins extracted from cereals and the role cereal peptides and polyphenols in the reduction of oxidative stress and inflammation.