Food From Thought

LEADERSHIP TEAM

Malcolm Campbell, vice-president (research) of the University of Guelph, is a distinguished scholar and an accomplished plant genome biologist. Formerly a faculty member at Oxford University and the University of Toronto, Campbell leads Food From Thought, ensuring that its projects align with the University of Guelph's priorities. As a plant geneticist, he will support research in crop production and ecosystem services.

Kari Dunfield holds the Tier 2 Canada Research Chair in Environmental Microbiology of Agro-Ecosystems, and is a professor in applied soil ecology at the University of Guelph. Within Food From Thought, Dunfield and her team will use DNA-based techniques to learn how farming affects the diversity of soil microbial communities and source water quality.

Jeffrey Farber is director of the Canadian Research Institute for Food Safety at the University of Guelph and coordinator of the Food Safety and Quality Assurance graduate program. He studies food-borne pathogens in meat, dairy, seafood and produce. Farber and his team use big data analytics to study the ecology, pathogenicity and control of pathogens to promote food safety and prevent food-borne diseases.

Evan Fraser will serve as scientific director of Food From Thought, and will explore the effects of big data and new agricultural technologies on global food security. Director of the Food Institute of the University of Guelph, Fraser holds the Tier 1 Canada Research Chair in Global Food Security. He is a Fellow of the Pierre Elliott Trudeau Foundation and a professor of geography at the University of Guelph.

Paul Hebert is an Officer of the Order of Canada and a Fellow of the Royal Society of Canada, and holds the Canada Research Chair in Molecular Biodiversity at the University of Guelph. For Food From Thought, Hebert will build on the largest biodiversity research program ever undertaken – the International Barcode of Life project – by leading the development of DNA-based identification systems and informatics platforms.

Bonnie Mallard is a professor of pathobiology in the University of Guelph's Ontario Veterinary College. Mallard has spent more than 25 years researching disease resistance in livestock and developing technologies to select animals with naturally improved immune responses. For Food From Thought, Mallard will study the effects of genetic regulation on livestock immune systems in order to improve animal health and use of inputs such as antibiotics.

Kevin McCann is a professor in the Department of Integrative Biology at the University of Guelph. By studying structure and function of food webs, McCann investigates how land management affects the sustainability and resilience of adjacent ecosystems including aquatic ecosystems and their fisheries. His Food From Thought team will create computer simulation models to explore interactions among agriculture, ecosystem services and ecology.

Jan Sargeant, director of the Centre for Public Health and Zoonoses, is a professor in the Ontario Veterinary College at the University of Guelph. She studies public health issues, especially zoonotic disease prevention and control, food and water safety, and the role of veterinary medicine. For Food From Thought, Sargeant will study food safety and livestock diseases in order to prevent zoonotic diseases that pass from animals to humans.

Clarence Swanton is a professor in the Department of Plant Agriculture. He studies weed ecology and develops integrated weed management systems for field and horticultural crops. He is a Fellow of the Canadian Society of Agronomy and the Canadian Weed Science Society. By increasing crop productivity and reducing environmental impact, his Food From Thought research will yield tools to help farmers grow more food while protecting biodiversity.

Tina Widowski is the director of the Campbell Centre for the Study of Animal Welfare and holds the Egg Farmers of Canada Research Chair in Poultry Welfare. She studies livestock housing and management to develop best practices in animal care. Within Food From Thought, Widowski's team will use big data and new agri-food technologies to help farmers improve animal welfare.