Attention Faculty, Staff and Students!

The Department of Epidemiology & Biostatistics cordially invites you to a seminar entitled:

“Challenges in Analyzing Dietary Quality Data”

Wednesday, Nov 29, 2017

2:00 PM – 3:00 PM

EPIB/MIEH Conference Room 2234CC

Seminar sponsored by the Biostatistics and Risk Assessment Center
For more information contact Mei-Ling Ting Lee: mltlee@umd.edu

Abstract:
Dietary quality data pose a number of changes including truncation of ratios of correlated observations, measurement errors and semi-continuity. Further challenges arise when dietary data are collected longitudinally as predictors of future health outcomes. In this talk I will address the necessity of properly dealing with semi-continuity in the design and analysis of intervention studies targeting dietary improvement. A joint two-part random-effect model is proposed to analyze multivariate hierarchical semi-continuous data characterized by excess zeros and more than one replicate observations at each measurement occasion. A cluster-adjusted rank-based testing procedure is also developed to evaluate intervention effects on improving dietary quality.

Biosketch:
Dr. Liu is currently the Acting Chief and a Senior Investigator of the Biostatistics and Bioinformatics Branch, Division of Intramural Population Health Research, Eunice Kennedy Shriver National Institute of Child Health and Human Development (NICHD), National Institute of Health (NIH). He received Ph.D. degree in Statistics in 1997 from the University of Rochester. Prior to his joining NICHD in February 2002, he was a faculty member at Georgetown University Lombardi Cancer Center. Dr. Liu is an elected fellow of the American Statistical Association, an elected member of the International Statistical Institute, and President-elect of the International Chinese Statistical Associations. His research interests include sequential methodology and adaptive designs with applications to clinical trials, analysis of repeated measurements and longitudinal data, and statistical methods for diagnostic biomarkers. He has authored/co-authored over 150 scientific papers that appear in peer-reviewed statistical and medical journal.