

Developing an Informational Infrastructure for Building Smart Regional Foodsheds

Smart and Connected Communities - Research Coordination Network (NSF Award SCC.RCN.1737573)

PROJECT GOAL: Develop an informatics framework for understanding and optimizing regional food systems (“foodsheds”)

This project will enable two foodsheds—the 6-county Sacramento, California region and the 7-county Columbus, Ohio region—to link multiple data types from multiple sources and convert it into usable information through data analytics approaches.

We will achieve this through three aims:

- host meetings with researchers and community stakeholders to discuss strategies for network development and data curation
- collect and curate cross-disciplinary data resources within and across two foodsheds (Sacramento and Columbus) and tackle specific informational gaps/challenges to be addressed by researchers in the network
- facilitate global collaboration for food, health and agriculture by hosting two foodshed informatics research network conferences

Research and community engagement plan:



*Initial research network and stakeholder participants will be drawn from two pools of individuals:

- attendees of the IC3-FOODS conference, held annually at UC Davis
- stakeholders key to the creation of the Sacramento and Columbus regions’ food action plans

Team composition:

University of California, Davis:
Thomas Tomich (PI), Agricultural Sustainability Institute (ASI)
Matthew Lange (co-PI), Food Science & Technology
Nina Amenta, Computer Science
Jim Quinn, Environmental Science & Policy (ESP)
Nick Anderson, School of Medicine
Allan Hollander (data liaison), ESP
Courtney Riggle (project manager), ASI

Sacramento Foodshed:
Robyn Krock, Valley Vision
Daphne Miller, Whole Family MD

The Ohio State University:
Casey Hoy (co-PI), Food & AgriCultural Transformation (InFACT)
Ayaz Hyder (co-PI), Translational Data Analytics Institute
Dorota Grejner-Brzezinska, Engineering
Jill Clark, John Glenn College of Public Affairs
Ingrid Adams, College of Medicine
Angela Latham, (project coordinator), InFACT

Columbus Foodshed:
Amirk Khalsa, Nationwide Children’s Hospital
Brian Estabrook, Columbus & Franklin Co Local Food Action Plan

Lawrence Berkeley National Laboratory:
Suzanna Lewis (co-PI), Environmental Genomics

Additional Collaborators (not on steering committee):
Gail Feenstra (UCD); Catherine Brinkley (UCD); SACOG; Yolo County Food Bank; Sacramento Farm to Fork; California Endowment; ECOS; City of Columbus; Franklin County; Midwest Big Data Hub; Kelly Kelleher (Nationwide Children’s Hospital); Pier Luigi Buttigieg (Alfred Wegener Centre for Polar and Marine Research); Barry Smith (U of Buffalo); Darren Drewry (NASA-JPL); GODAN; OBO Foundry.