



UNIVERSITY OF
GEORGIA

College of Agricultural and Environmental Sciences
Department of Plant Pathology

31st E.S. Luttrell Lecture

Wednesday, 12 May 2021, 1 - 2 PM

<https://zoom.us/j/97995288529?pwd=RXhtd0RzRm4vOVZZMGxJVzZrcldVdz09>

Meeting ID: 979 9528 8529

Passcode: 098718

Dr. Rodrigo Almeida

Professor & Hildebrand-Laumeister Chair in Plant Pathology
Department of Environmental Science, Policy, and Management
University of California – Berkeley

Plant disease epidemics as opportunities to reevaluate what you know, what you should know, and what may matter

Abstract: Plant disease epidemics can have dramatic economic, environmental, and social consequences. Yet, epidemics also provide unique opportunities for scientists and policymakers, among many stakeholder groups, to reevaluate and challenge established paradigms. Epidemics also represent opportunities to develop and test novel ideas and hypotheses that would not have been previously feasible due to the lack of interest, resources, or available technologies. I will use two recent epidemics caused by the vector-borne bacterium *Xylella fastidiosa* to illustrate how new research is leading to a reevaluation of established knowledge on the disease ecology of this pathogen in California, and how tools not previously available (whole genome sequence data) are being implemented to more accurately explain pathogen local, regional, and global population structure and dispersal pathways. Finally, I will depart from biology and discuss how I believe plant pathology would benefit from contributions from academics in the social sciences and humanities, particularly in the context of emerging diseases.

Biography: Rodrigo Almeida grew up in Brazil and obtained a degree in agronomy from the University of São Paulo. He obtained an MS in entomology from the same institution and a PhD in environmental sciences from UC Berkeley. After a 3-year tenure as assistant professor at the University of Hawaii at Manoa he relocated to UC Berkeley where he is professor in the Department of Environmental Science, Policy and Management. Almeida's research focuses on the ecology of emerging insect-borne plant pathogens, more recently focusing on the bacterium *Xylella fastidiosa*. He uses an array of approaches to study plant-pathogen-insect interactions and how pathogens spread in space and time; his interdisciplinary research incorporates field surveys and experiments, greenhouse and laboratory manipulations, and computational tools. He believes that holistic approaches are necessary to develop sustainable practices to manage insect-transmitted plant pathogens.

