

Research Seminar

Assessment of Composting Latrines in Panama: Are Pathogens Reduced, are Latrines Used, and do Users Perceive Excrement as a Waste or Valued Resource?



James R. Mihelcic Samuel L. and Julia M. Flom Endowed Professor Department of Civil & Environmental Engineering University of South Florida

Date: Monday, February 12, 2018 Time: Noon to 1:00pm Location: SEEL 303 (Lab building of SEEC, 3rd floor)

Abstract:

There remains a large unmet need for access to sanitation throughout the world. Opportunities exist to employ ecological sanitation systems that require less water and can produce scarce resources embedded in human excreta. However, the ecological sanitation technology of a double vault urine diverting compost latrine may require a higher user interface and closer handling of feces compared to other sanitation technologies. There is also concern about whether the derived resources are "safe" in regards to protecting human health. This talk will present results of a long-term study that takes place in developing communities of Western Panama. The first part of this talk will assess the relationship between pathogen destruction and temperature, pH, desiccation, and user operation in active double vault urine diverting composting latrines. In the second part of this talk, results are presented of an assessment on the actual use of recently completed composting latrines and demographic factors that play a role in user perception of resource recovery from this sanitation technology.

Biography:

Dr. James R. Mihelcic is the Samuel L. and Julia M. Flom Professor of Civil and Environmental Engineering and Director of the International Development Engineering Program at the University of South Florida which allows graduate students to combine interdisciplinary training with extensive international training, service, and research with the Peace Corps and nongovernmental organizations as a water/sanitation engineer (in developing world settings). He also directs a Coverdell Fellows Program for returned Peace Corps volunteers. Dr. Mihelcic also directs the National Research Center for Reinventing Aging Infrastructure for Nutrient Management (RAINmgt). His teaching and research interests are focused on advancing knowledge on how global stressors such as climate, land use, and urbanization influence water resources, water quality, water reuse, and selection and provision of water supply and sanitation technologies.