PURDUE UNIVERSITY | Environmental and Ecological Engineering

EEE Research Seminar

Date: August 27, 2024, at 10:30AM
Location: POTR 234 (Fu Room)

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Environmental and Ecological Engineering
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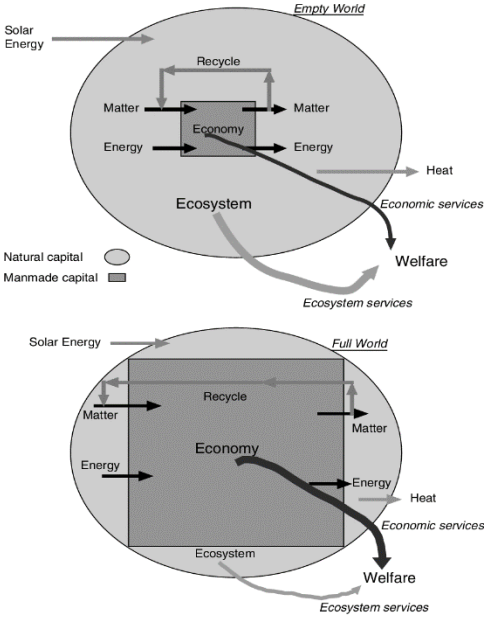
Exploring complexities of sustainability

Abstract

I hope to cover the projects that I had worked on during and after my PhD and present a sustainability landscape, aiming at bringing its complexities and sophistication. Particular emphasis will be given to tease questions such as: what is the type of economic activities that mostly align with environmental aspirations, pointing to the basic steady state framework that denotes economic activities as materials processed from nature and sinked at nature after use. I will bring examples of international flows (from shipbreaking activities), complex industrial product minerals (LED lamps), technological solutions to social problems (MSW) and technological solutions to continued consumption (Carbon Capture and Utilization). The presentation might offer them a ground to rethink their existing positions on the environmental sustainability paradigm.



Bio

Dr. Rahman is trained in interdisciplinary research in the interface of chemical engineering and environmental policy, with a focus on impact assessment of industrial processes and products. He has studied recycling systems extensively: systems that connect multiple nationalities and diverse stakeholders, employing a variety of social and engineering tools (Life Cycle Assessment, Techno-economic Analysis, Material Flow Analysis, Ethnographic Methods, Policy Gap Analysis) as well as diverse theoretical perspectives (Political ecology, Environmental policy, Ecological Economics). Dr. Rahman seeks to advance theoretical understanding of environmental and ecological connections of the industrial systems and is interested to understand the environmental, ecological, economic and social impacts of the AI system. Dr. Rahman enjoys leisure by cycling, participating in sports, and spending time with kids.