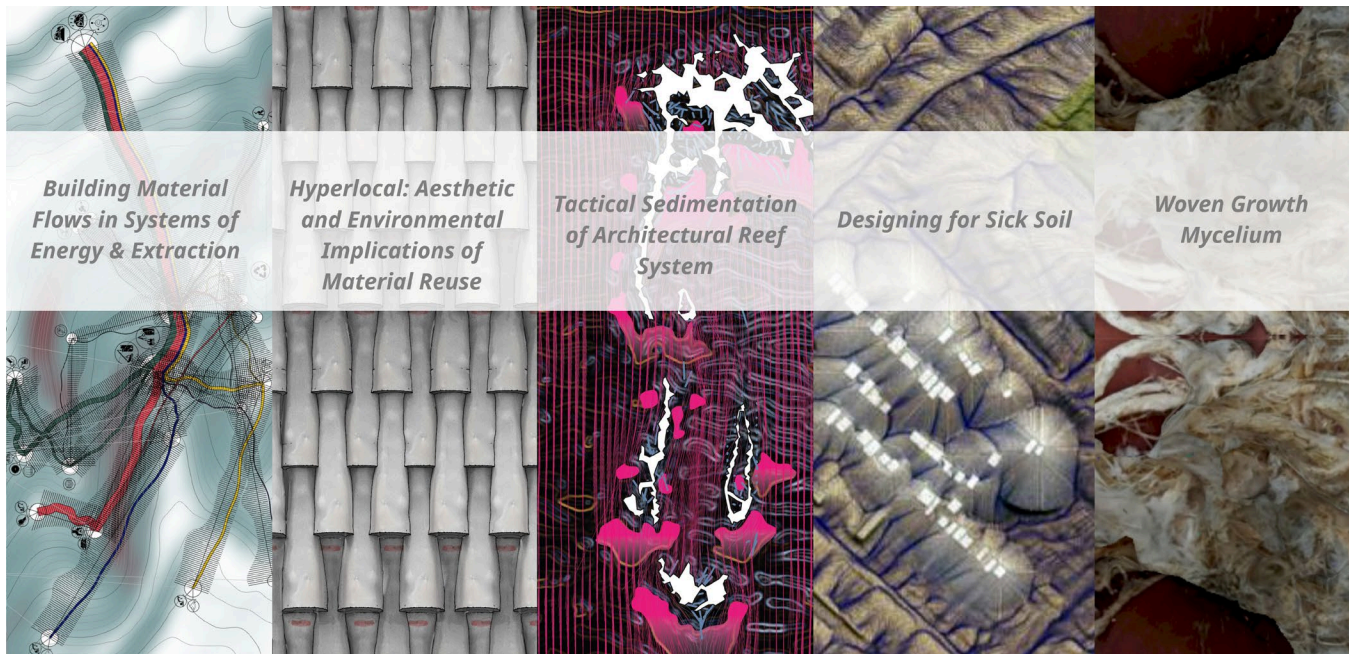


CARNEGIE MELLON —ARCHITECTURE



Carnegie Mellon Architecture MSSD Thesis Projects 2021-22 (Students: Louis Suarez, Kirman Hanson, Colleen Duong, Longney Luk, Tanvi Harkare)

48-732: Sustainable Design Synthesis

Units: 18 or 22

Instructor: Dana Cupkova

This is a culminating course of the Master of Science in Sustainable Design (MSSD) program, following the pre-requisite “48-731: MSSD Synthesis Prep.” The MSSD program is a post-professional research-based graduate program focused on expanding innovative design methodologies that position the built environment as a vehicle of environmental stewardship, centered on architecture’s response to climate change. Situated at the intersection of technology, environmental science, advanced manufacturing, computational design and analysis, the MSSD program leads students to discover new socio-ecological approaches to regenerative, evidence-based design frameworks that operate across scales, while focused on circular economies of landscape systems, production of new materials and more equitable material system assemblies. This course leads students through an independent thesis development, co-advised by wider CMU faculty to develop a complete yearlong design-research project. It is expected that the students establish all precedent work in their area of study, with critical excerpts organized and professionally cited, as well as define their new contributions through field work, simulation, analysis or prototyping.

