

Sustainable Land Lab Competition

Project title: GroundUP

Team: MLAWU

CONCEPT OVERVIEW

Site Chosen: Lot 2 / 2709 N. 14th Street

It has been estimated that up to 13% of the waste sent to landfills in Missouri is non-hazardous demolition waste. Such material, already screened and cleared for lead and asbestos, includes brick, concrete, dimensional lumber, tree stumps, plumbing pipes, steel members, drywall, and other reusable materials. In the context of the built fabric of St. Louis, the exporting of such material from demolition sites represents not just a waste of resources, but an erosion of the character of the city. Fortunately, projects like Bob Cassilly's City Museum have given us a strong local precedent for re-imagining waste to create new structures rooted in history.

The economic and environmental costs currently accompanying demolition can be saved by putting construction and demolition waste from St. Louis back to work in the neighborhood, reborn as new site furniture and amenities. Through working with a roster of locally involved recycling non-profits, including ReSource St. Louis and Habitat for Humanity's ReStore program, we propose to set up a sustainable urban ecology for re-colonizing empty lots and underused public space with high-quality interventions. With disposal reconfigured into a charitable contribution, the costs incurred by contractors for disposal are lessened, and the community benefits directly.

City-wide, materials can be gathered from demolished structures or construction operations in any neighborhood and repurposed in under-utilized areas nearby to satisfy each neighborhood's specific programmatic needs – playgrounds, parks, community garden plots, markets, and other programs. Through designing a library of forms that can be easily fabricated with common construction materials, new amenities can be constructed quickly and cheaply. Intact whole materials can be repurposed, as pipes become monkey bars, signage, and sculpture. Large quantities of demolition rubble can be encased in gabion forms and stacked to create demonstration gardens. Concrete and shingles can be ground on site to create new surfacing for lots and sidewalks, while tires can be ground to create a safe surface for play space.

So that members of every community can participate in building amenities to serve their neighborhoods, programs will be set up to involve residents in constructing these play and urban structures. Such programs could range from community construction days, where residents can work together on simple construction tasks, to more in-depth workshops that teach marketable carpentry and fabrication skills.

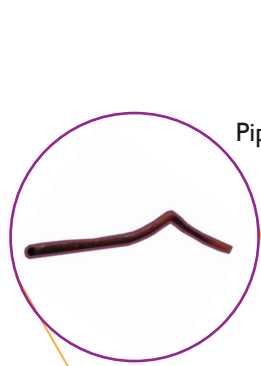
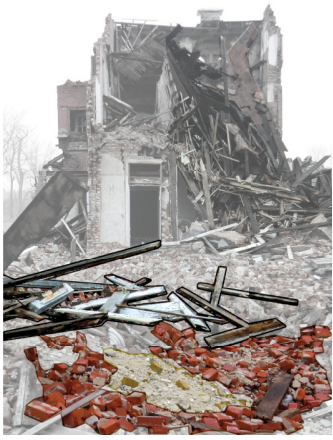
At 2709 N. 14th Street in the Crown Square area, the material can be best utilized as part of a playspace and public art garden for the adjacent St. Louis ArtWorks. As more material comes in from Old North St. Louis, it can begin to appear throughout the neighborhood as distinctive outdoor furniture, including bus stop shelters, benches, and café tables and chairs. These structures can turn the bones of St. Louis buildings into the bones of St. Louis public space.

TEAM QUALIFICATIONS

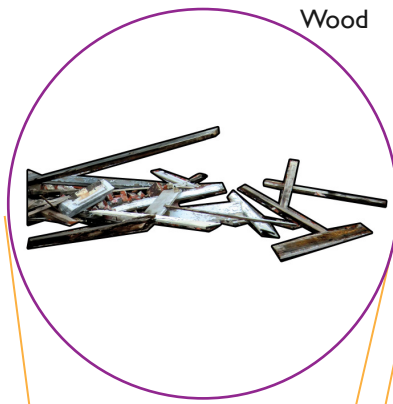
David Hilbert | Master of Landscape Architecture student | Washington University in St. Louis

Justin Scherma | Visiting Assistant Professor in Landscape Architecture | Washington University in St. Louis

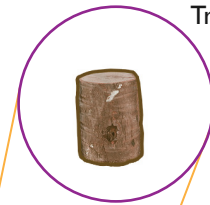
Joanie Walbert | Master of Architecture and Landscape Architecture student | Washington University in St. Louis



Pipe

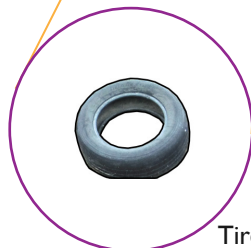


Wood

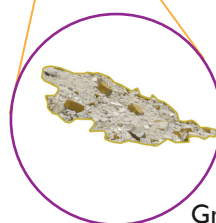


Tree trunks

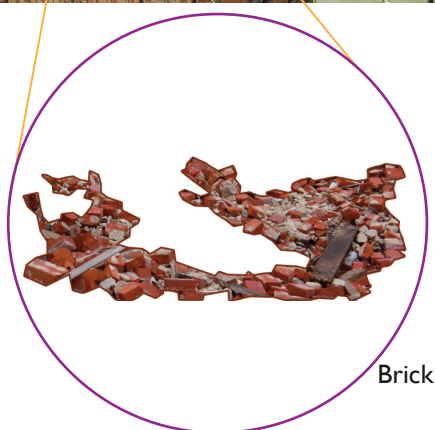
MLAWU \ GroundUP \ site 2



Tire



Gravel



Brick Rubble