BUILT FOR THE PEOPLE OF THE UNITED STATES: TVA Land Observatory and Energy Field Station

Chickamauga Dam, detail (1936-1940) on the Tennessee River near Chattanooga, Tennessee.

To improve the navigability and to provide for the flood control of the Tennessee River; to provide for reforestation and the proper use of marginal lands in the Tennessee Valley; to provide for the agricultural and industrial development of said valley; to provide for the national defense by the creation of a corporation for the operation of Governmental properties at and near Muscle Shoals in the State of Alabama, and for other purposes.

--Tennessee Valley Authority Act of 1933

In the early 1930’s the Tennessee Valley Authority sought to re-align the natural ecologies of the south-central United States through intensive infrastructural interventions. Rivers were tamed, flood-cycles managed, and coal fields exploited in an effort to regularize the wild variation that had, for so many years, created a condition of hardship in that mountainous region. These efforts succeeded in making agrarian life more predictable and productive, while also introducing electrically powered devices of modern life that had previously been remote to the valleys of Appalachia.

The recent interest in infrastructure prompts a questioning of how to approach the historic, heroic projects of the last century: monumental forms designed to intensively exploit the most visible differences in the landscape. For the mission of the Tennessee Valley Authority to be sustained into the next century, the TVA must develop a completely different model: the singular and massive must give way to distribution and extension. The project of this studio will be to design a TVA Land Observatory and Energy Field Station: a new programmatic typology that is part didactic device, part distribution node, part research facility and part information center and rest stop. These facilities will support the Tennessee Valley Authority’s campaign to implement an energy collection system operating over many distributed points, as well as a regulatory infrastructure connecting its various sites.

The unit of survival is not the breeding organism, or the family line, or the society...today a further correction of the unit is necessary. The flexible environment must also be included along with the flexible organism because...the organism which destroys its environment destroys itself. The unit of survival is a flexible organism-in-its-environment.

--Gregory Bateson, Steps to an Ecology of Mind

The old model of intensive exploitation and regulation of the Tennessee Valley region’s “resources” has reached its limit. The December 2008 disaster at the TVA Kingston Fossil Plant, where 1.1 billion gallons of coal fly ash slurry spilled and inundated 300 acres of surrounding land, demonstrates that cleaner energy models are desperately needed. To address this, the TVA Land Observatories will support an extensive deployment of small-scale energy systems. Small-scale hydroelectric devices, algae farms, wind-turbines and solar arrays will be researched and demonstrated, meant for distribution throughout the region, to be networked into a cohesive and responsive energy grid. A class trip to the Tennessee Valley region will form part of the research for this project.