

DRY BULB TEMPERATURE





Based on existing and projected climate patterns in Mannheim, evaporative cooling may be a valuable, low intensity method for both residential and urban scale interventions. By introducing moisture into low humidity air, latent heat is absorbed out of breezes and dry bulb temperatures drop. Sensor arrays housed within the totems will control evaporative cooling misters during optimal alignments of temperature, relative humidity, and wind speed. Under these specified conditions, pumps supply water to misting jets housed in panels on the back face of the photovoltaic array. Shade from the photovoltaic fins above, combined with weather-triggered evaporative cooling and the transpiration of dense plantings in the pedestrian channels will foster a uniquely comfortable and hospitable microclimate for pedestrians and cyclists passing

## **CURRENT NOTATIONS**

Mannheim is a city born from water. Remembering the landscapes which for so many thousands of years cradled the growth of the city, and accommodating the geography of the city to the rhythms of the floodplain, will help Mannheim face looming crises. The city should be understood as a continuum in time, a dynamic and reconfiguring site of geologic, hydrologic, biotic, and industrial transformations. CURRENT NOTATIONS proposes a design intervention which adapts the reclaimed Spinelli Barracks as a site of hybrid ecologies, reconfiguring the synthetic material of the barracks into new formations which recall the contours of the primordial landscape of the floodplain. The southern boundary of the Spinelli site is of particular symbolic significance: the steep embankment marks the former course of the Neckar River as it wound its way to a confluence with the Rhine.

CURRENT NOTATIONS introduces a syntax of berms (earthwork embankments), fins (linear photovoltaic arrays), and totems (battery storage towers) at four key cyclist and pedestrian intersections, which gently lift the meadow and inscribe a pattern of channels and berms. As the berms trace, hug, and pull away from the walkways in a dreamOlike recollection of the watercourses that once flowed freely through the meadow, they offer shade, respite, and wonder to those passing between their shady banks. CURRENT NOTATIONS responds to the ambitions of the BUGA23 festival, the Mannheim Klimopass masterplan, and the UN SDGs by focusing on climate-driven challenges to the water cycle. The abstracted riverbed landscape conceals a technical program of water collection, retention, and distribution, enabled by the electricity generated on site. The new landscape of berms acts as a collection bathtub, funneling stormwater to concealed cisterns for storage and redistribution. The meadow species of the long slope of the berm contrast with the ferns and mosses that thrive in the shadier, cooler and wetter biomes of tree-lines riverbanks. These species will be supported in verdant wall planter beds and grown in contained soil pods, which can be swapped out and brought home by visitors as a kind of transplant archive, providing opportunities to distribute regional species to home gardens around the city.

The sum effect of the installation is one of deep (literally) experience- walking through a new landscape which is simultaneously artificial, consisting of industrial aggregate and sinuous technical infrastructure, and intensely native, as prodigal ecosystems creep back into being. The proposal distills the many lives of the landscape into a coherent whole, where a former site of military discipline and rigor is handed back to the intuition and whims of the creatures sharing the landscape with the citizens of Mannheim.



