

# Elegies of Futures Past - from haunted landscapes to adaptive futures

Aishwarya Shankar



**Past**  
Robert Havell 1866,  
Hudson River Valley School of Painting

**Present**  
Climate Change, flooding,  
infrastructure on edge

**Future**  
Adaptive Re-use, traces of history,  
climate justice

"Haunted Landscapes" is a concept title referring to not only the culture of Tarrytown, but also to the history of the place, including elements in the present that will become histories of the future. The concept is about a changing perception of the landscape of Tarrytown from Robert Havell's romantic painting, to the present day 'issues', to a changing perception of adaptive re-use for a more resilient and just future. How do we bridge our relationship with the landscape? Through ecological professions, i.e. Green Jobs – by creating opportunities for this through the design program and landscape interventions. This is also made possible through landscape connectivity, and cultural connectivity that can aid in highlighting a recognizable character of Tarrytown.

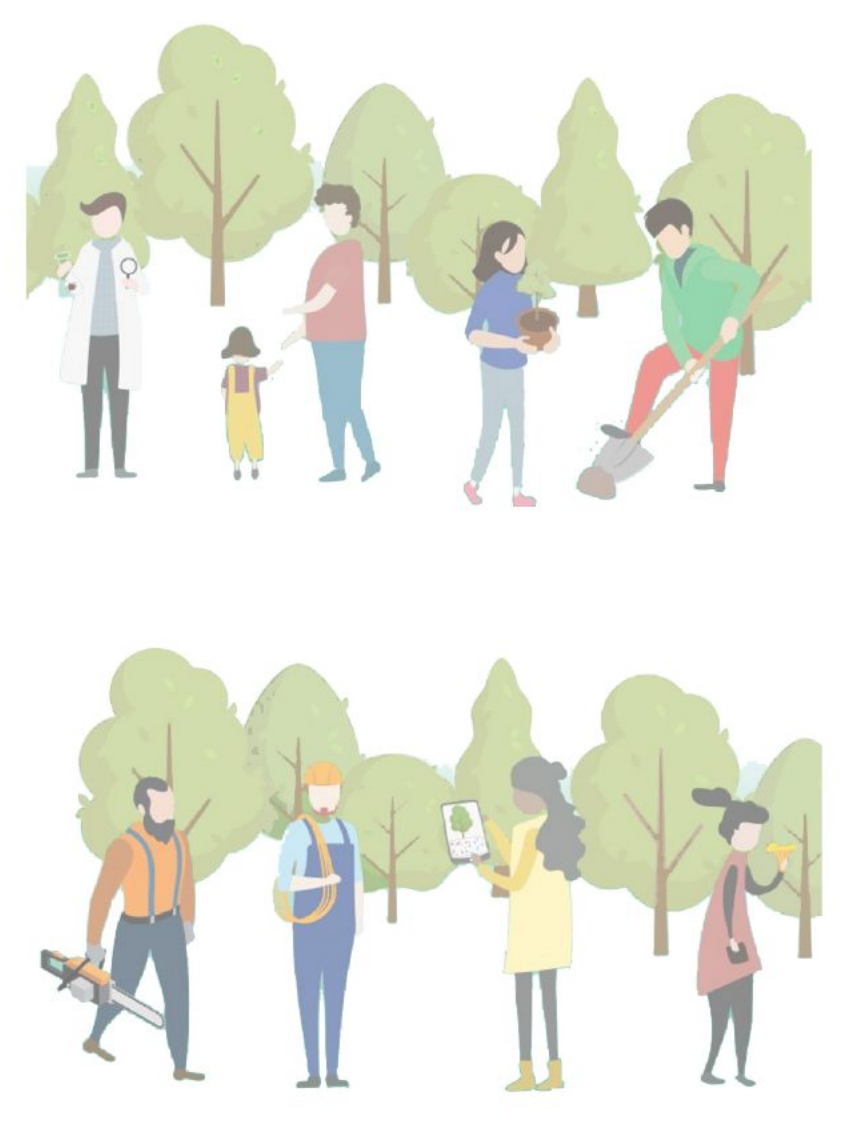
● Energy ● Residential ● Recreational ● 5 yr flooding



## Design Concept and Design Program

**Priority**  
Relocation and upward mobility of low-income groups (Franklin Courts and Franklin Towers)

Waterfront Maintenance X Education & Research



**GREEN JOBS**

- Schools
- Buildings
- Energy
- Transport
- Green Infrastructure



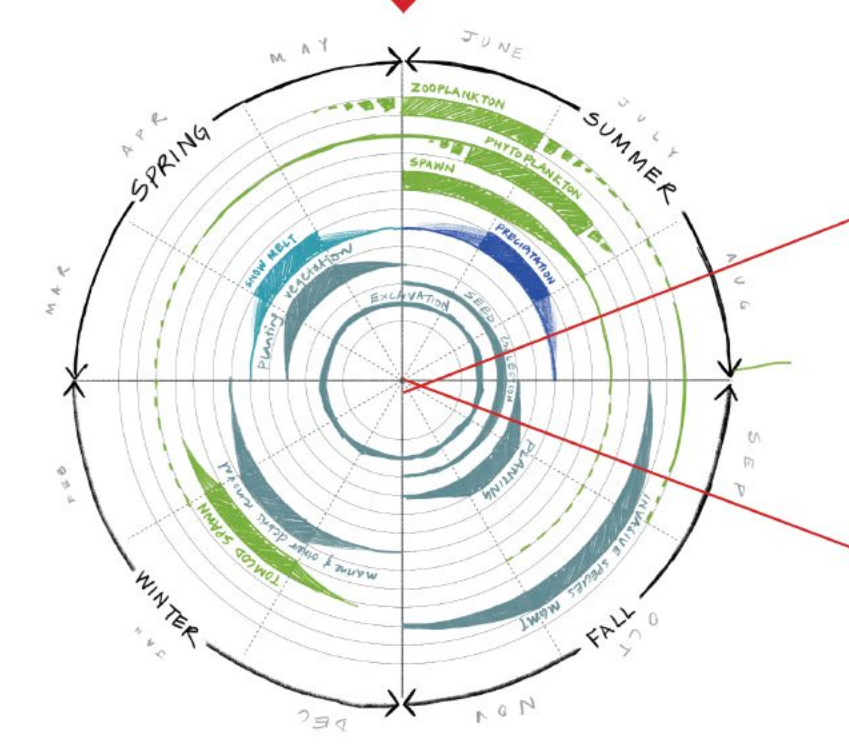
**OUTREACH**

- Local schools
- Fordham University Marymount
- Tarrytown Historical Society
- SUNY Wetchester Community College
- Vocational Colleges
- Cornell University



**Legal Framework**  
ENVIRONMENTAL BOND ACT

Here's how the 2022 bond act will be allocating it's \$4.2 billion in funds:  
 \$1.5 billion in climate change mitigation (which includes funds for zero emission school buses)  
 \$1.1 billion in restoration and flood risk reduction.  
 \$650 million in open space land conservation and recreation.  
 \$650 million in water quality improvement and resilient infrastructure.  
 \$300 million in unallocated funds.  
 The measure also dictates that 35% of the total funds must be spent in disadvantaged communities.



**Tarrytown Energy & Landscape Lab**

+

**Tarrytown Cultural Center**

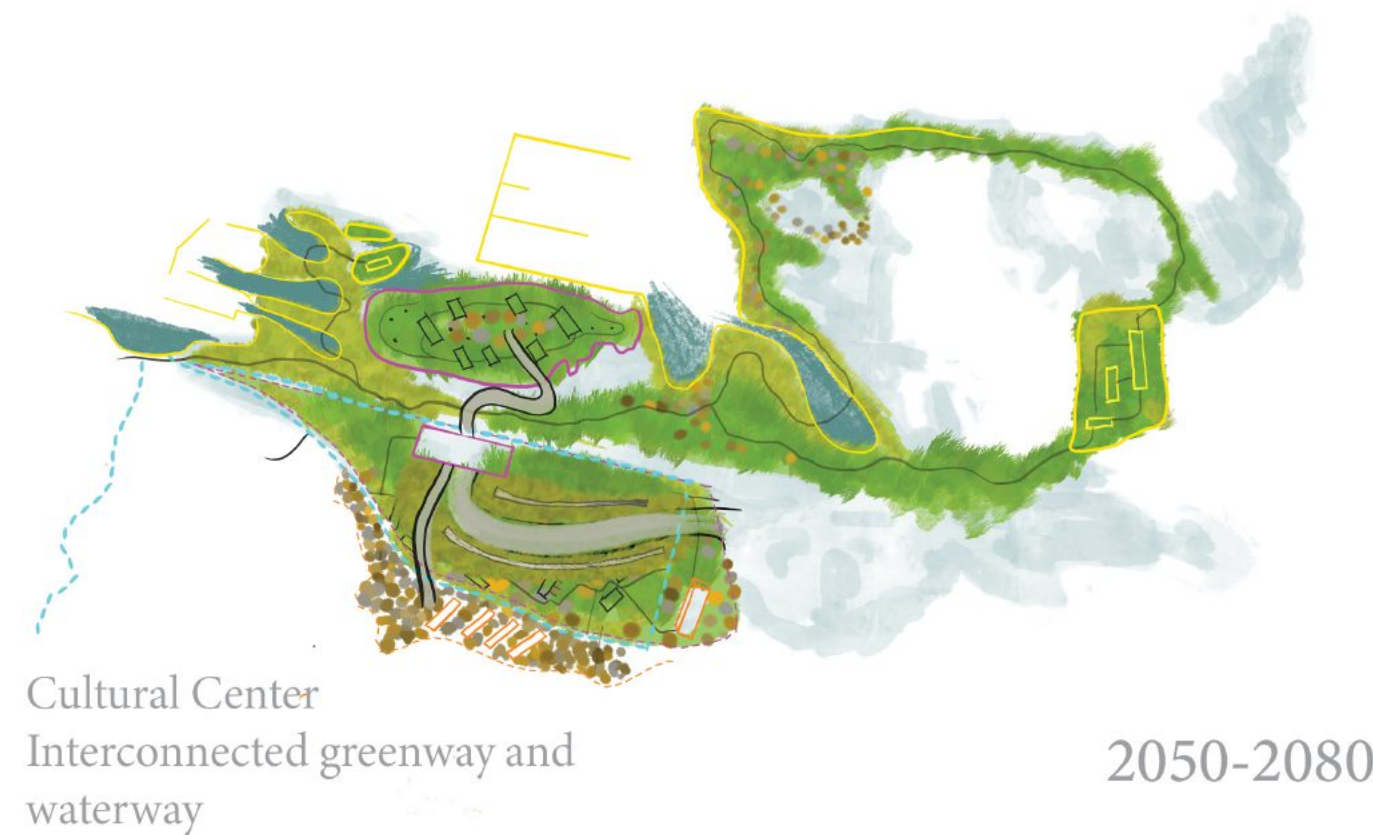
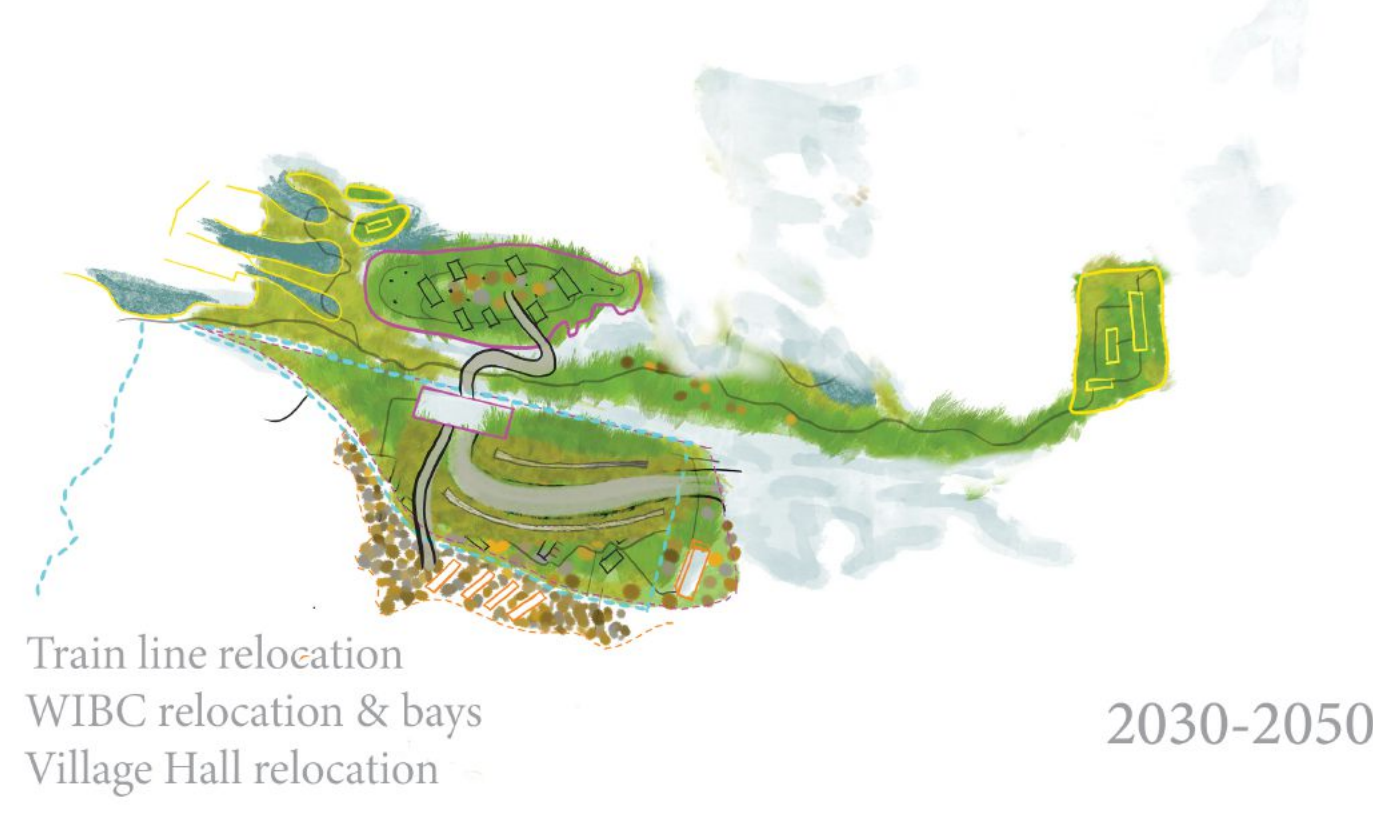
## Viewshed analysis



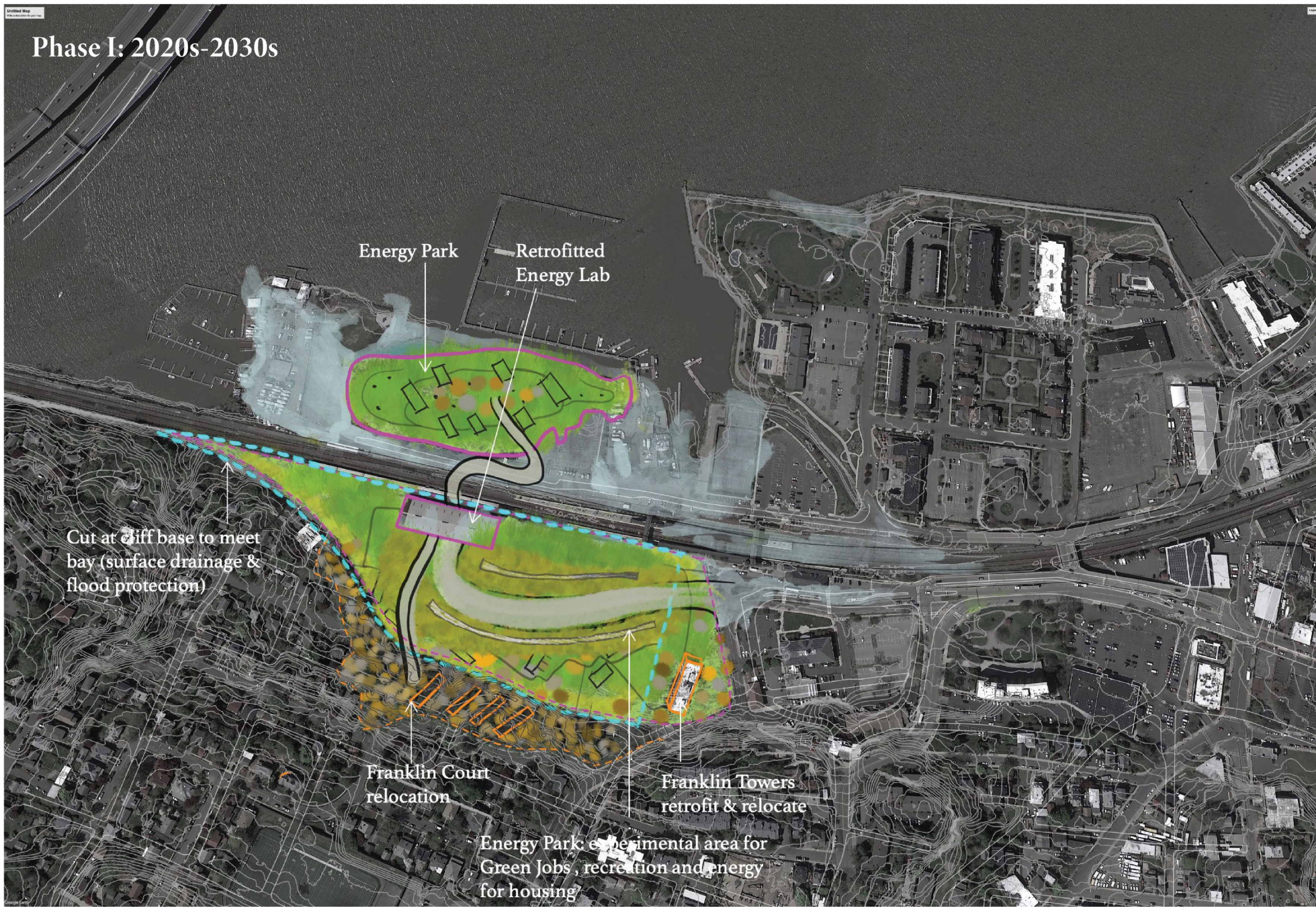
## Train line relocation 2030-2050s



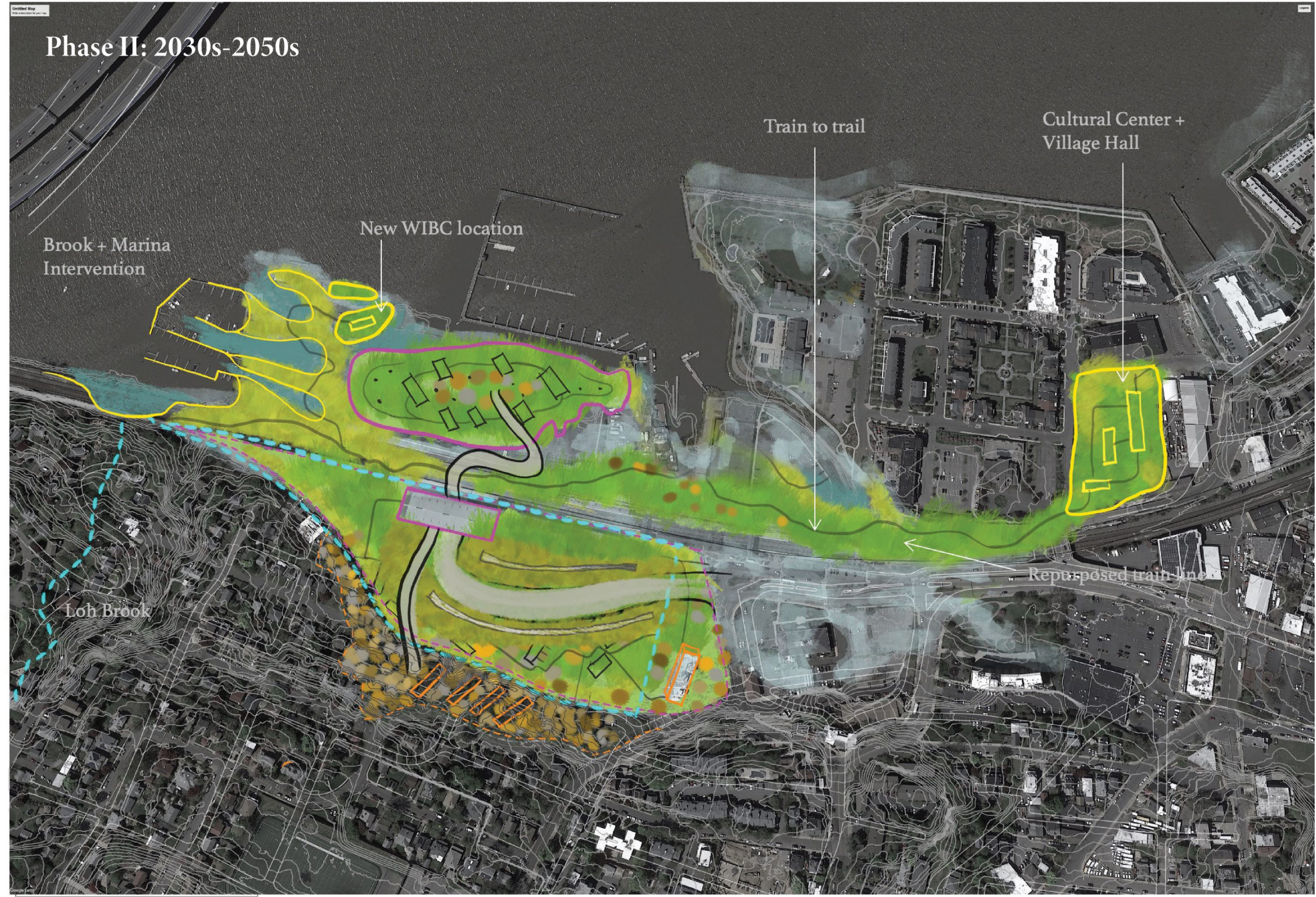
## Schematic plan over time



Phase I: 2020s-2030s



Phase II: 2030s-2050s

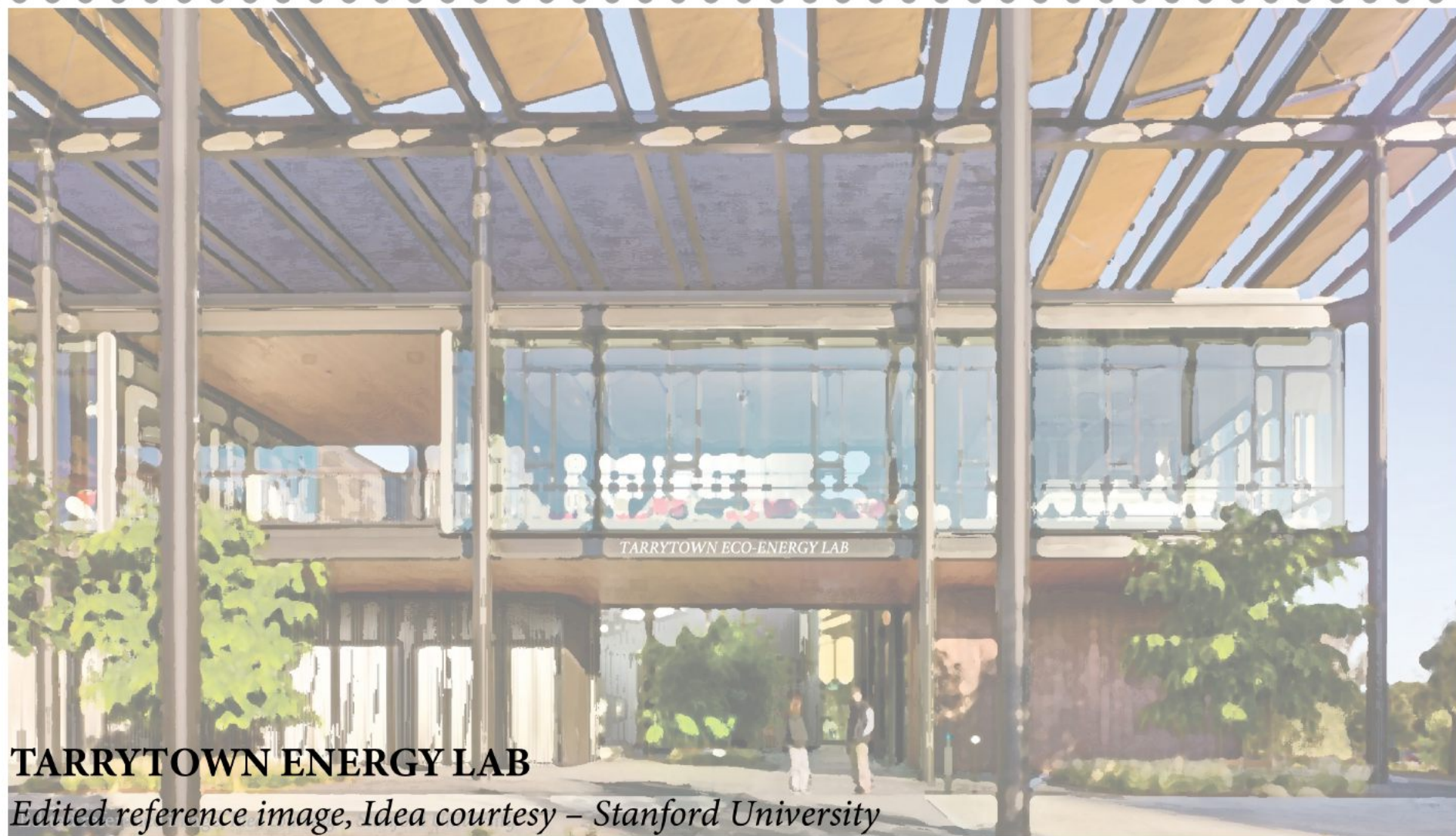


The most vulnerable areas that will be inundated/very frequently flooded are Losee Park, Washington Irving Boat Club (WIBC), Franklin Courts and parts of Franklin Towers and the American Independent Paper Company plots.

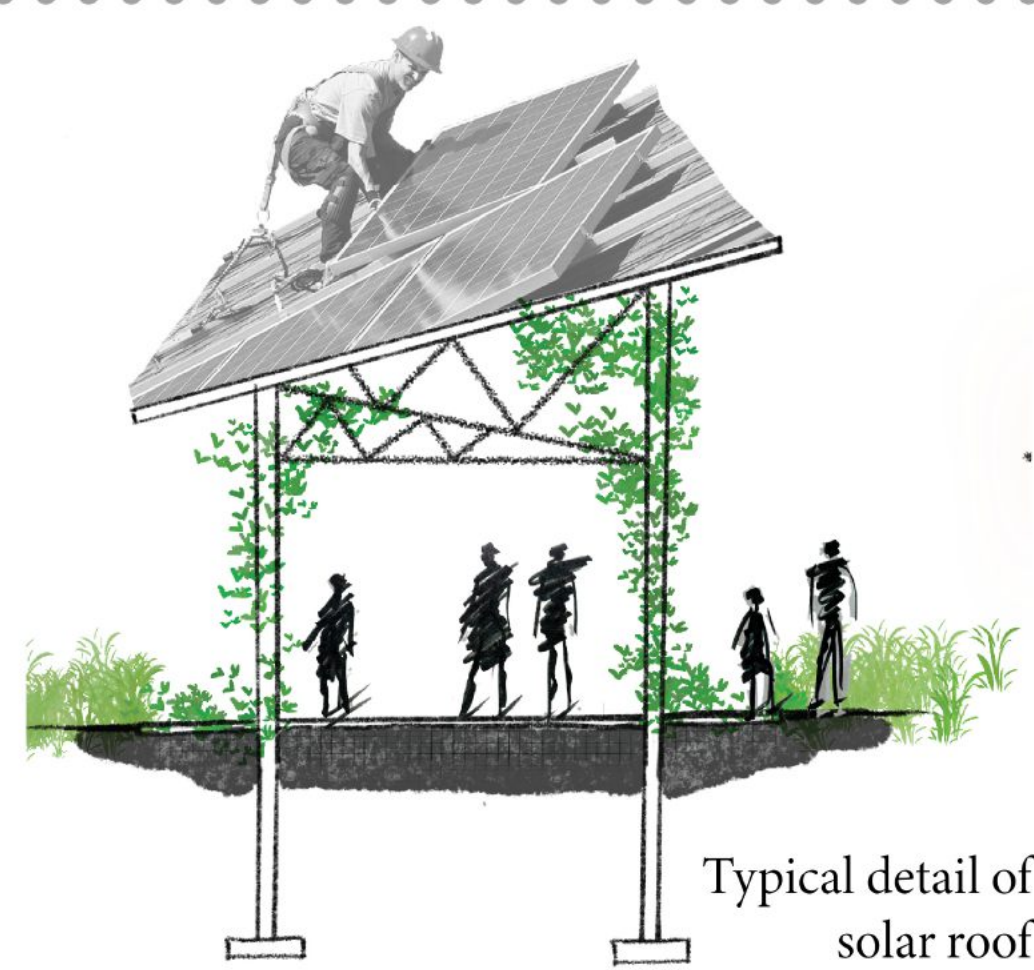
- Energy
- Residential
- Recreational
- 5 yr flooding (2050)

0 600 ft

ADAPTIVE RE-USE & CLIMATE JUSTICE

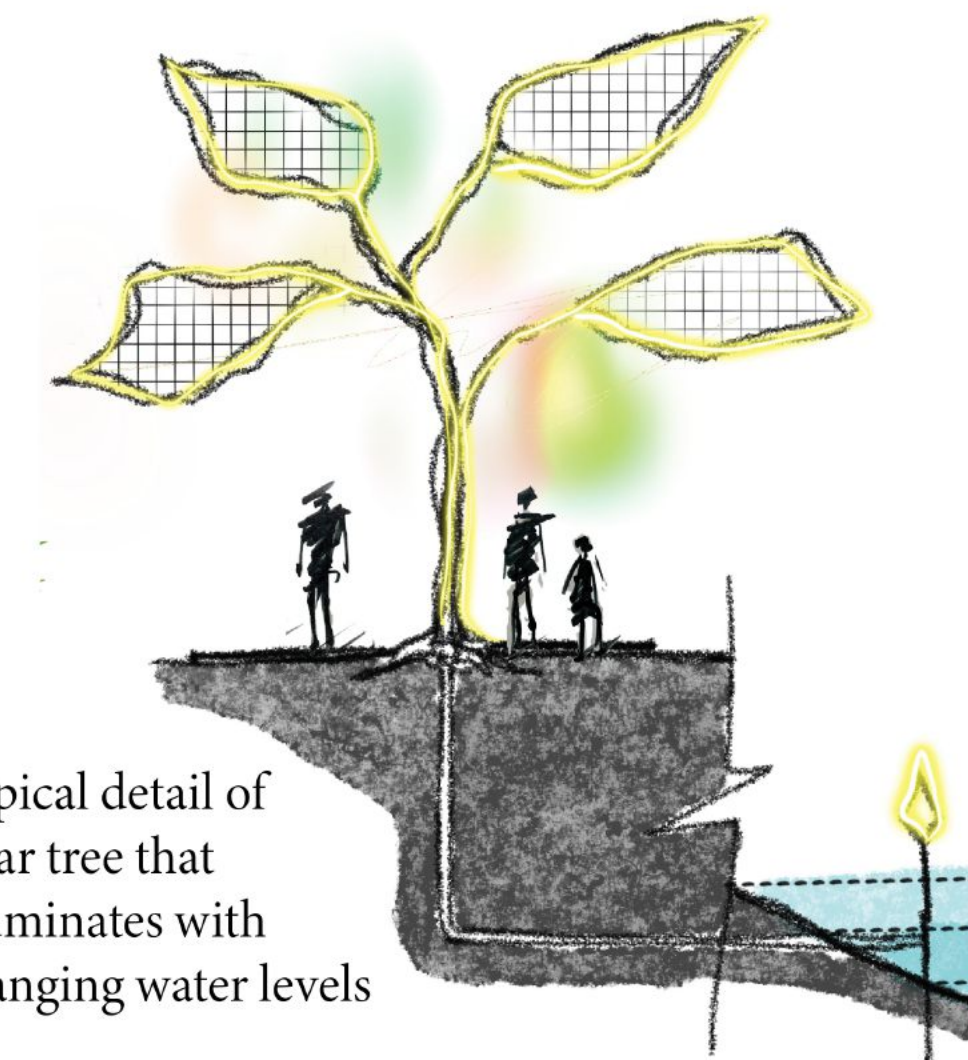


TARRYTOWN ENERGY LAB  
Edited reference image, Idea courtesy - Stanford University



Typical detail of solar roof

- i. The first opportunity is to relocate residents of Franklin Ct and Franklin Towers out of harm's way, on to higher ground that is available (as per topography) – giving the opportunity for upward mobility and collaborating to develop a valuable relationship to the waterfront. The towers are already fueled by geothermal energy, so the foundations for a solar energy park are possible.
- ii. The second is the islandification process that will be taking place at Losee Park, WIBC and the surrounding parking lots. This serves as an opportunity for cut and fill to stimulate and guide ecological remediation.
- iii. The third is the 2 structures of the American Independent Paper Company that have an opportunity for adaptive re-use of an experimental lab space.



Typical detail of solar tree that illuminates with changing water levels



NEW FRANKLIN COURTS (solar cladding)  
Edited reference image, Idea courtesy - Solar Window Technologies

Energy and Landscape Lab

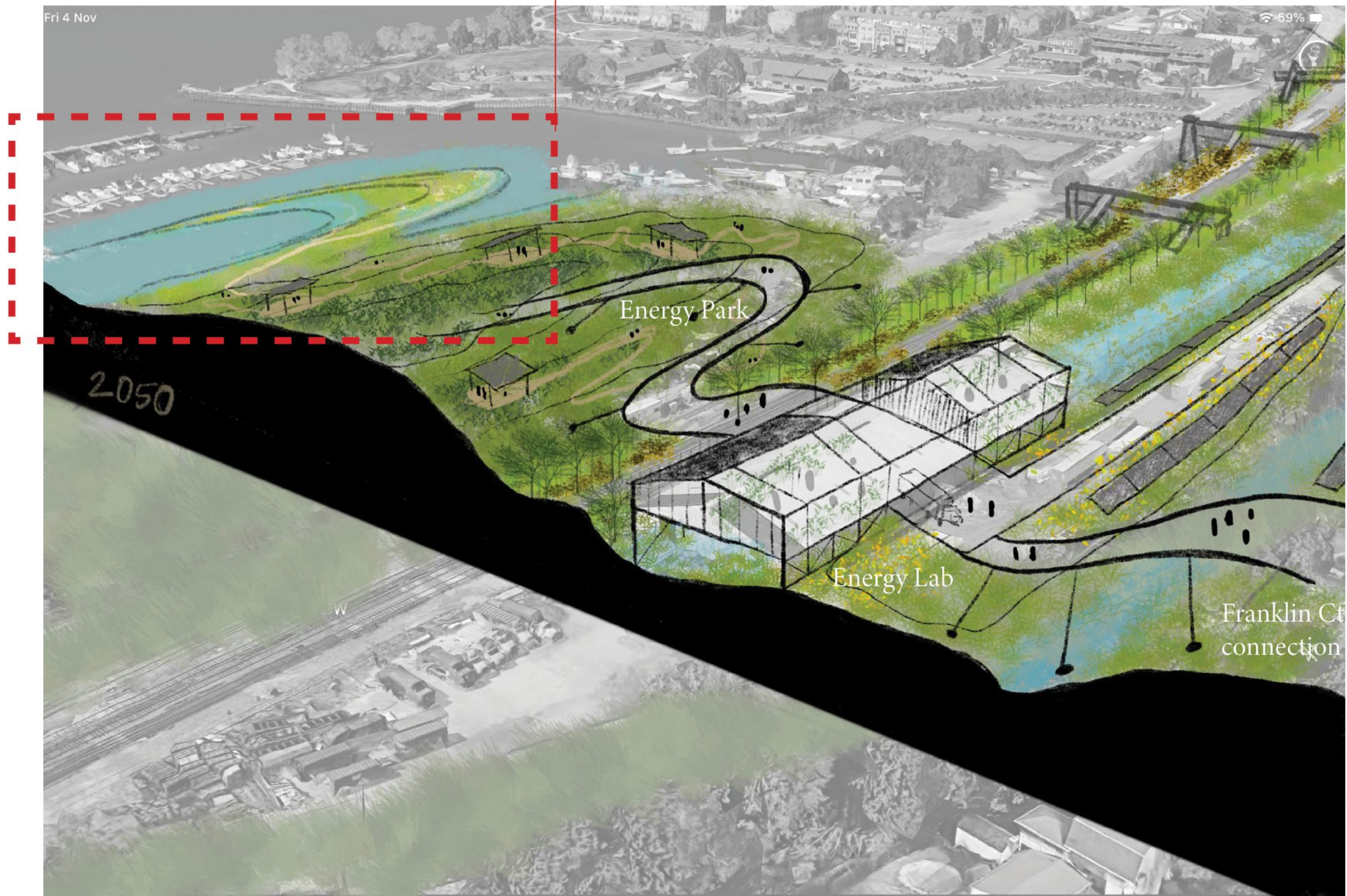
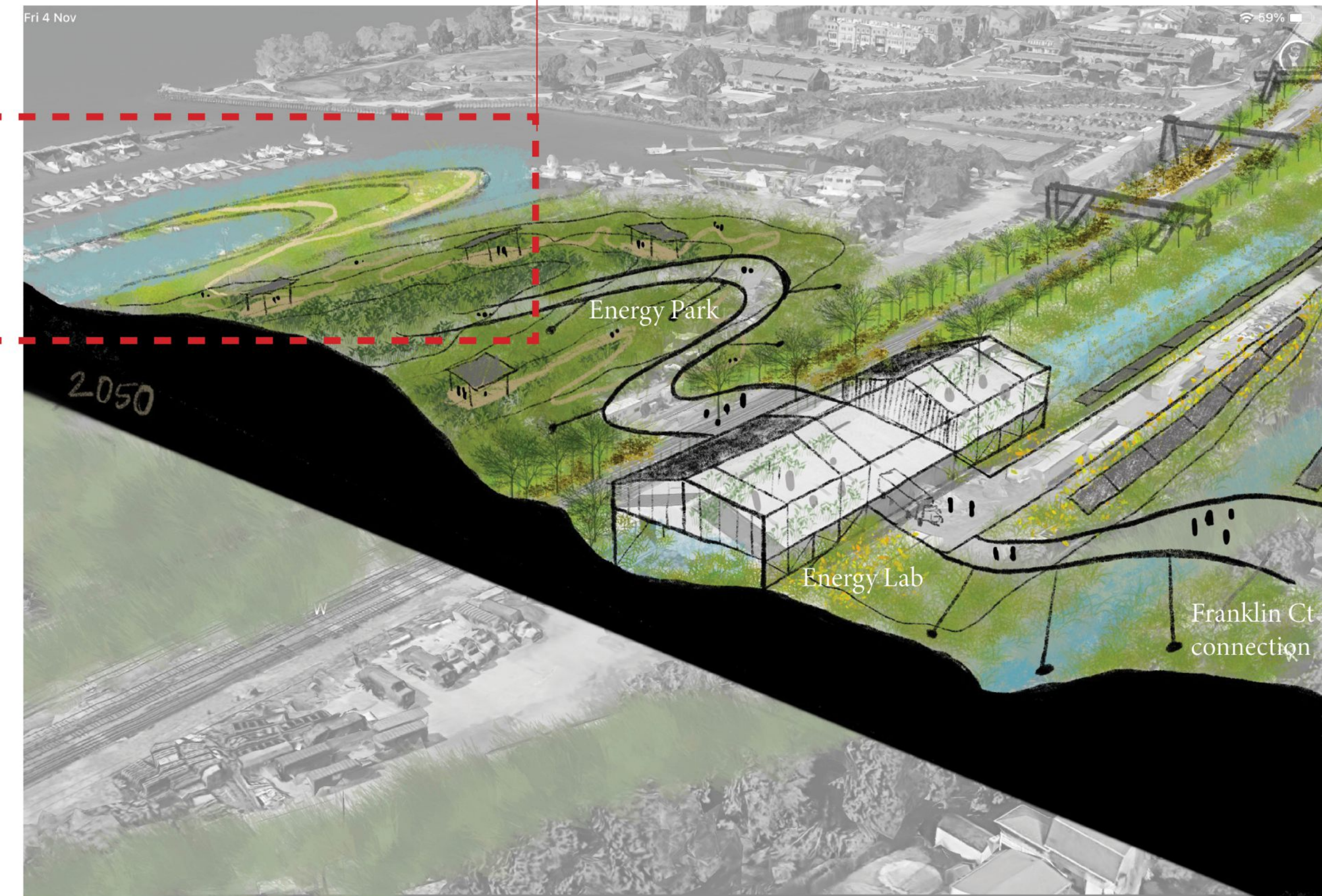
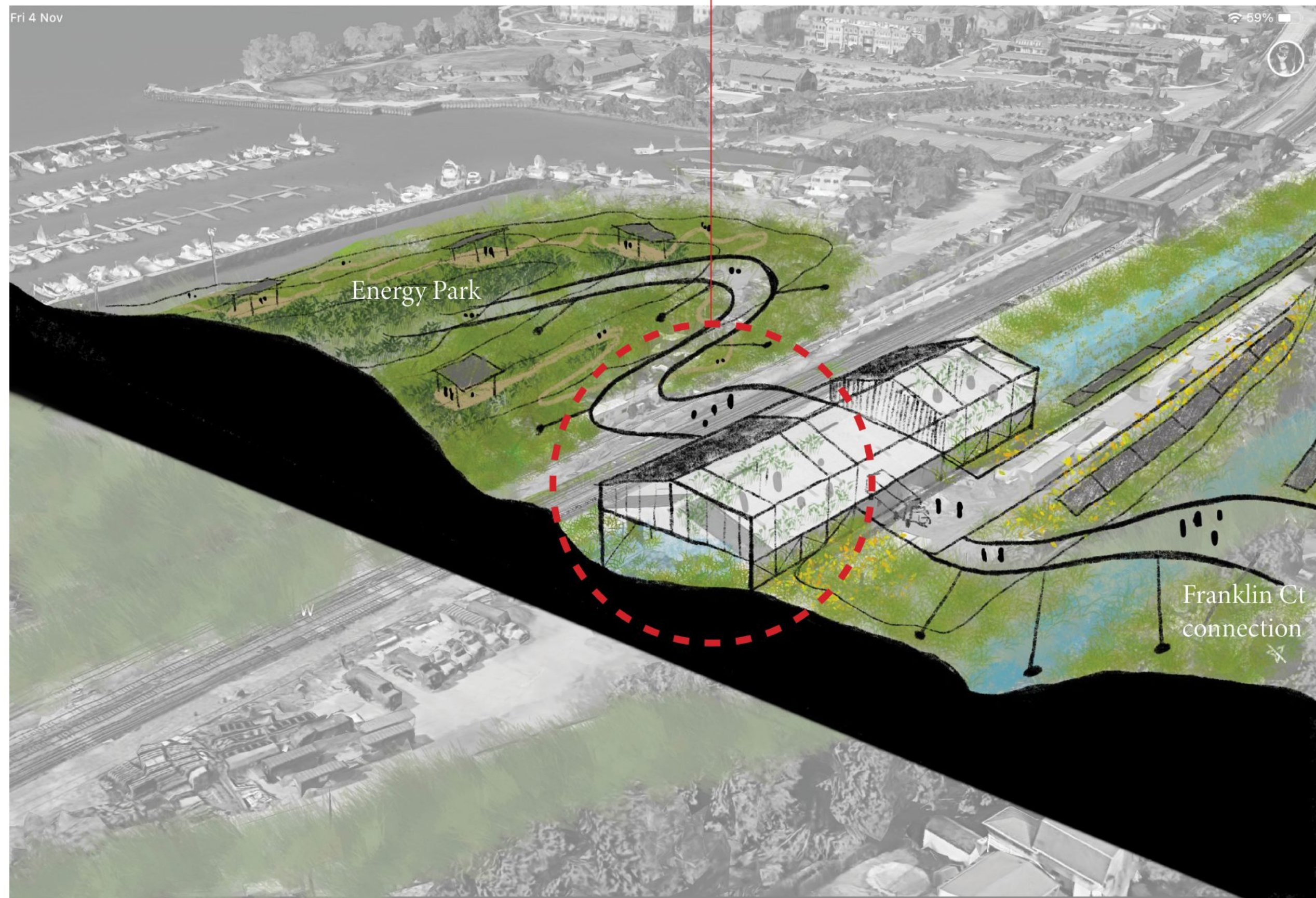
Energy Park 2020-2030s

remediation bays at low tide scenario

Energy Park 2050-2080s

remediation bays at high tide scenario

Energy Park 2050-2080s



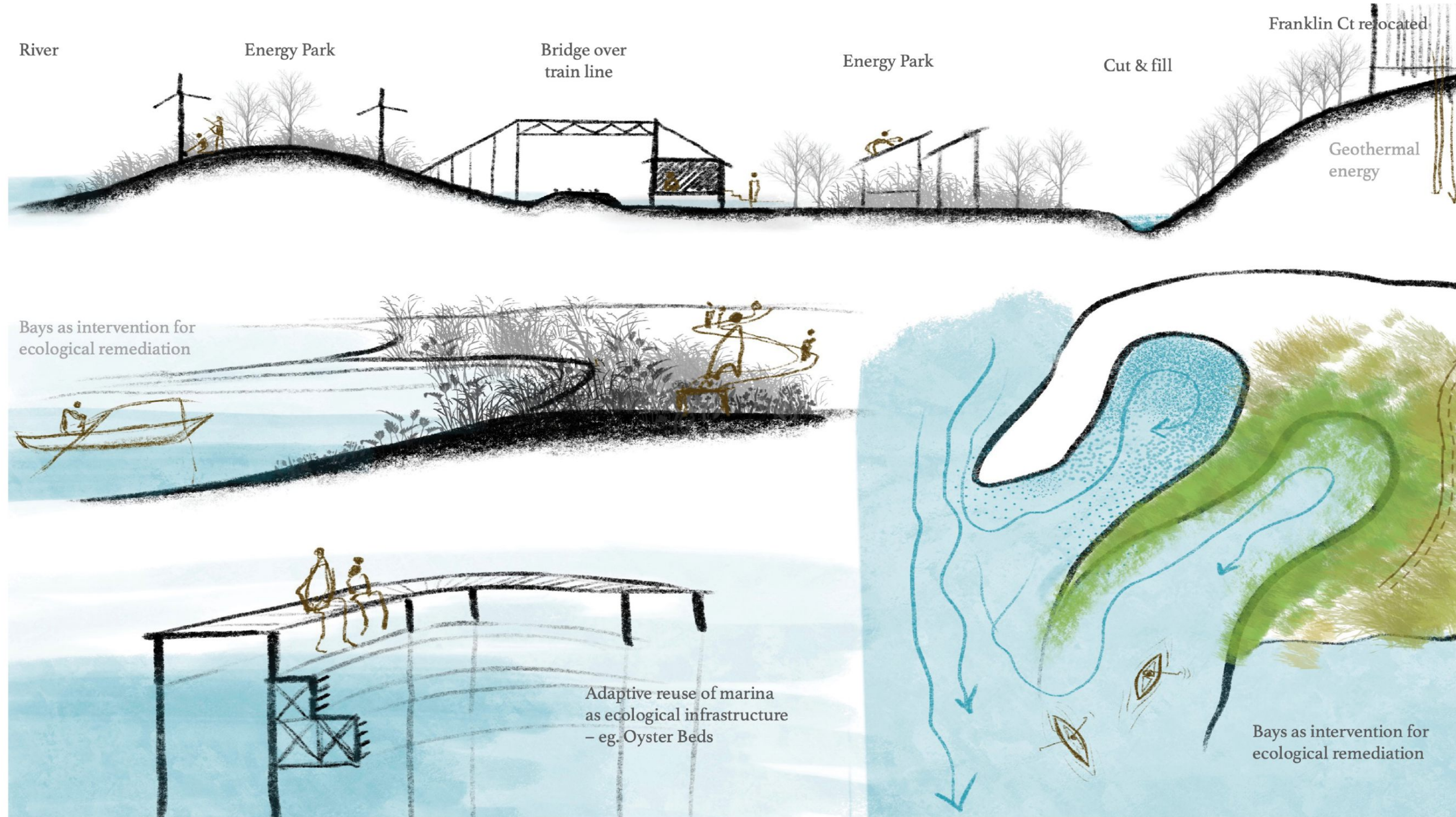
**DESIGN INTERVENTIONS**



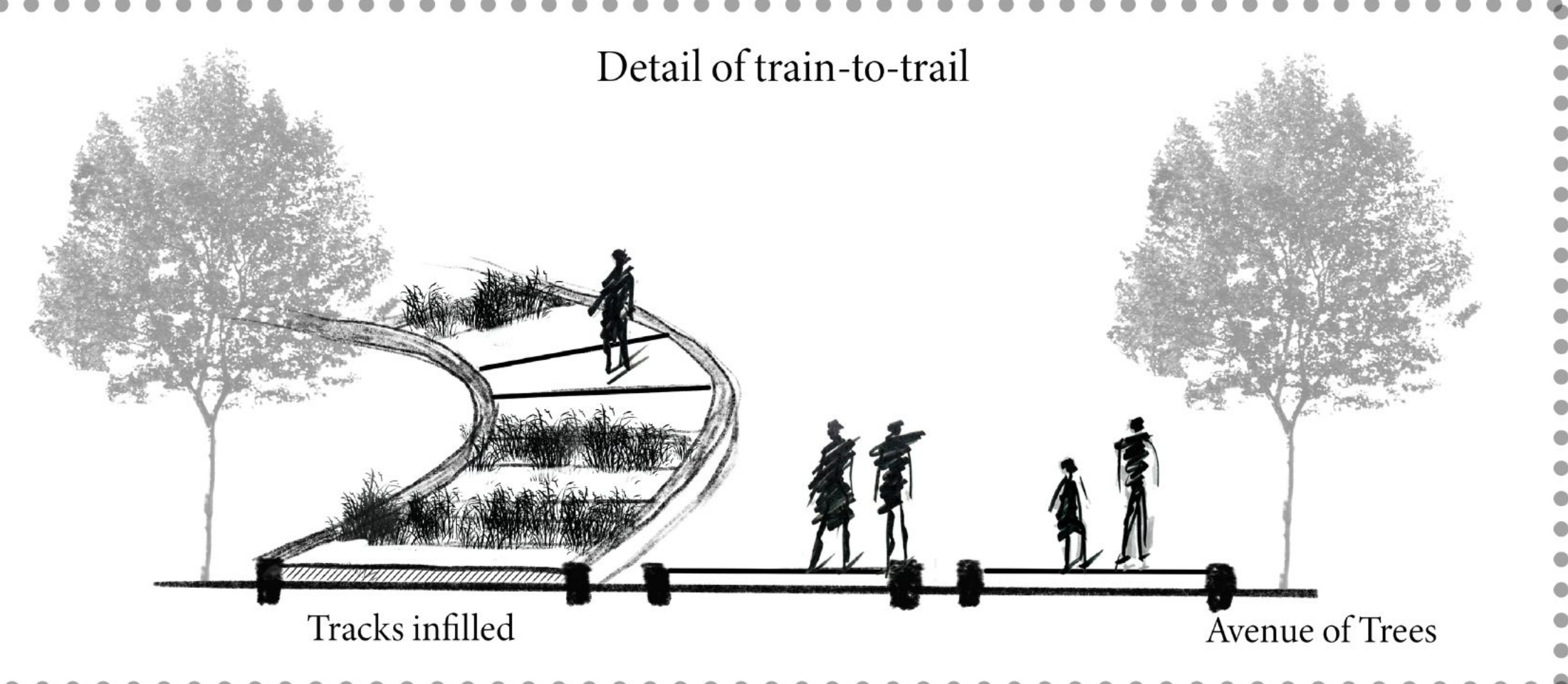
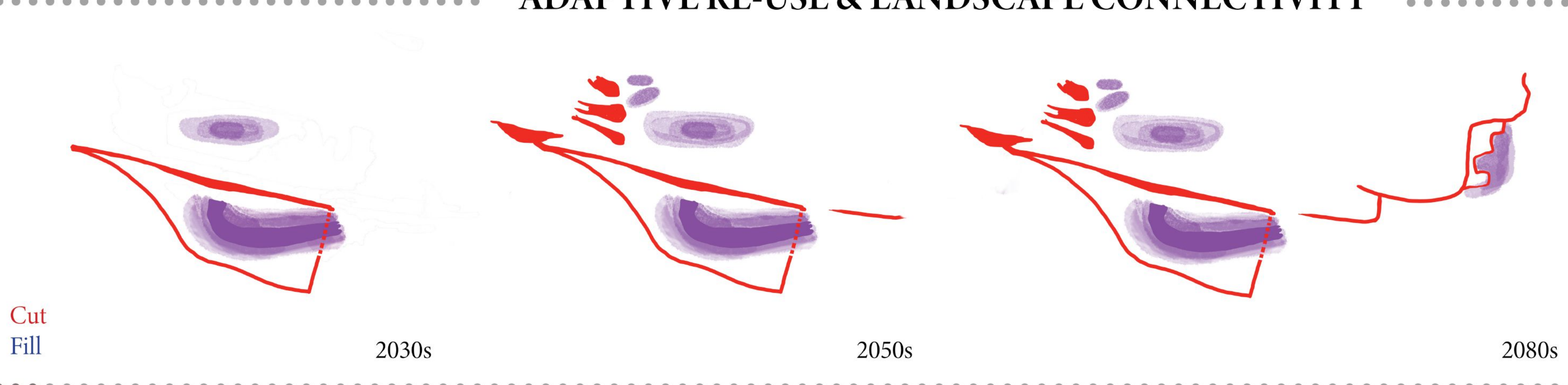
Bays are introduced as places where the flow of water can be slowed down that will enhance the growth of phytoplankton to stimulate ecological processes. In areas that are vulnerable to inundation near the WIBC, the form of the bays will work in conjunction with the repurposed marina structures for the creation of a complex ecology. Sedimentation processes might also be useful to develop this. Where Loh brook and the swale from the energy park meet at the train tracks will also be opened up as a bay – a place where freshwater and saline water meet to complicate the living shoreline.

The train line is assumed to be relocated by 2050 to the Sawmill road on the east of Tarrytown. This opens up possibilities for repurposing the station, track and over bridge infrastructures. Loh Brook that meets the train line can also now serve as a potential for design intervention.

- Energy
- Residential
- Recreational
- 5 yr flooding (2050)

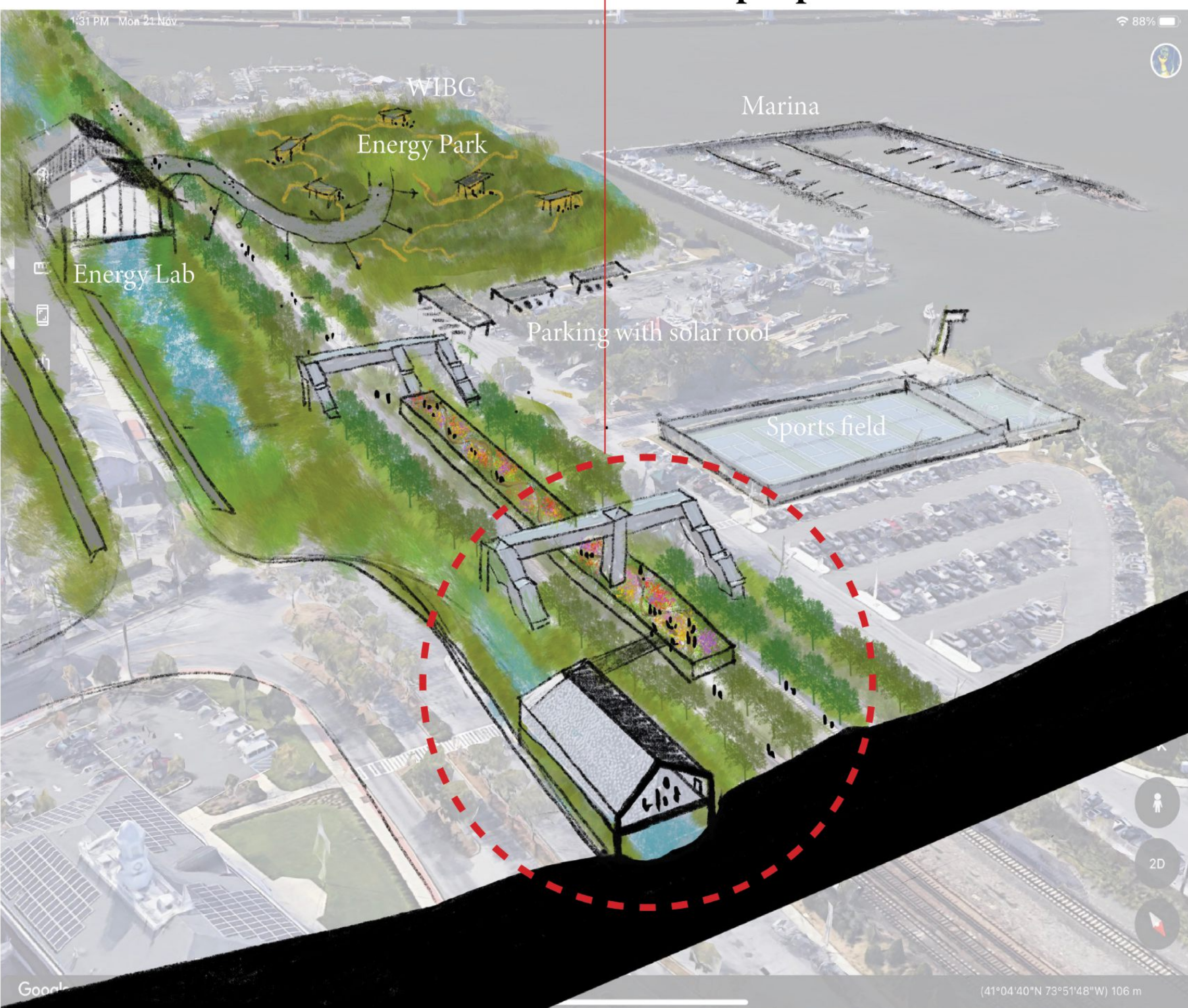


**ADAPTIVE RE-USE & LANDSCAPE CONNECTIVITY**



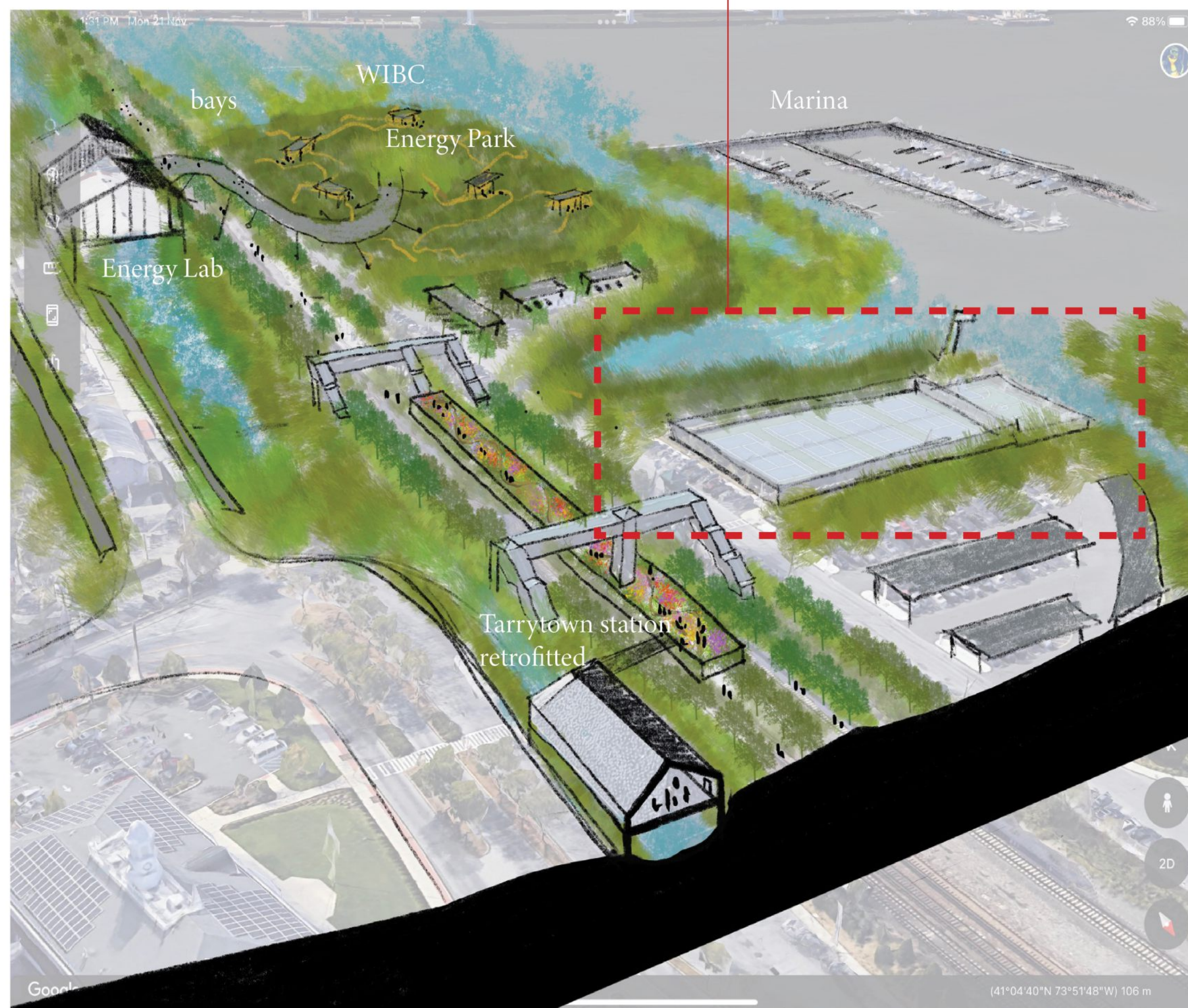
Adaptive re-use of train station & tracks

Repurposed Train line - 2050's



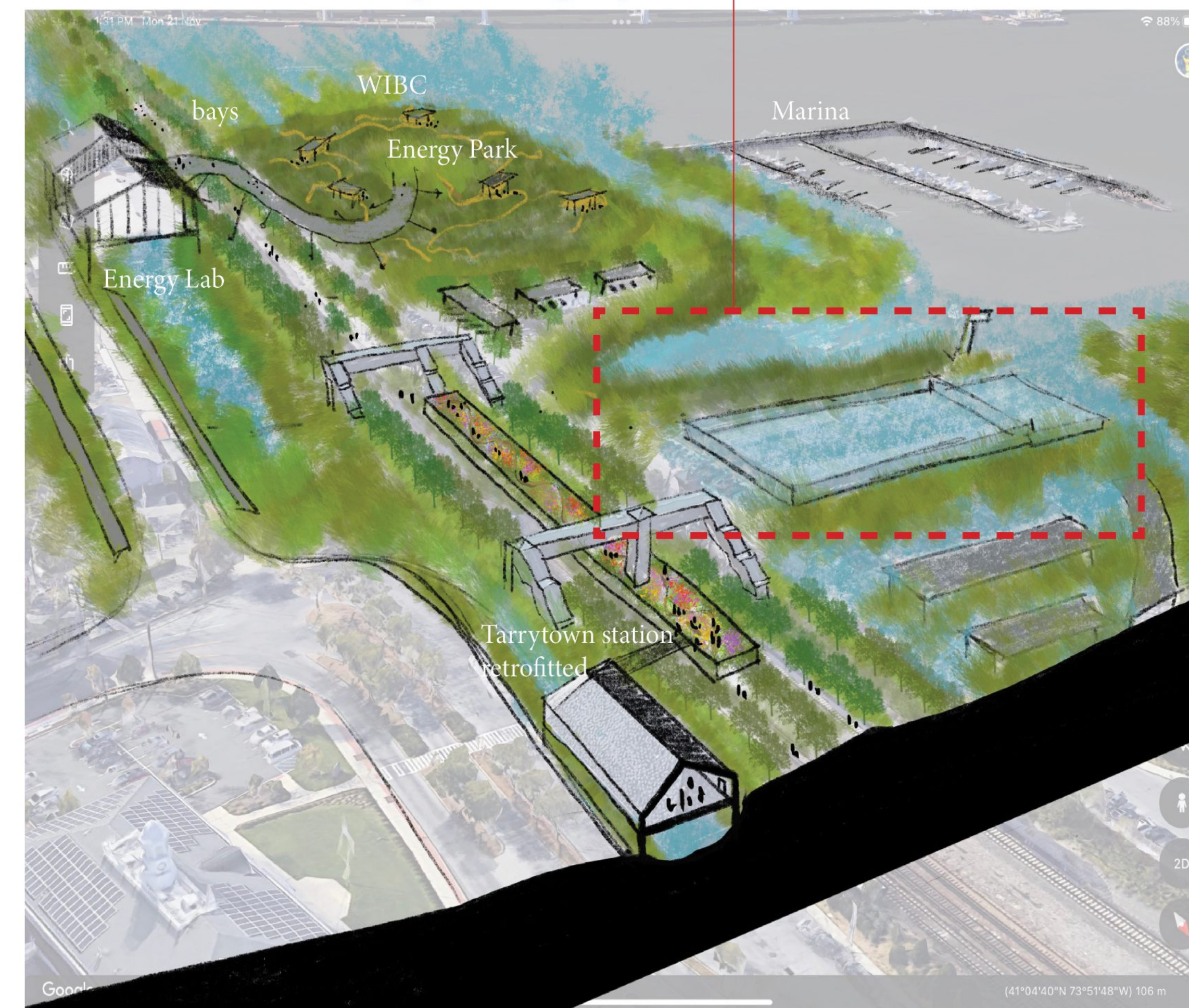
Floodable sports facility (low tide)

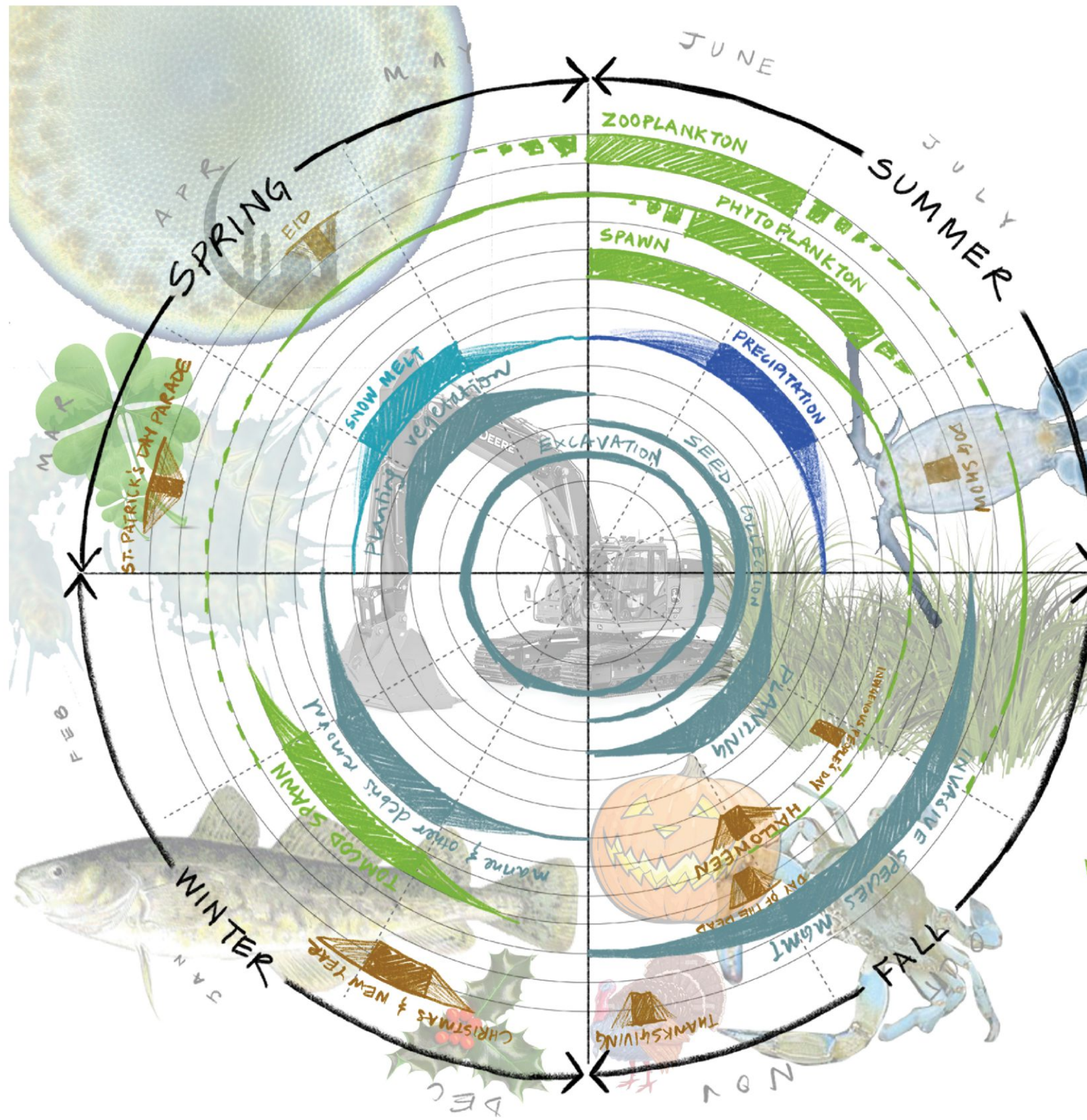
Train line trail - 2080's



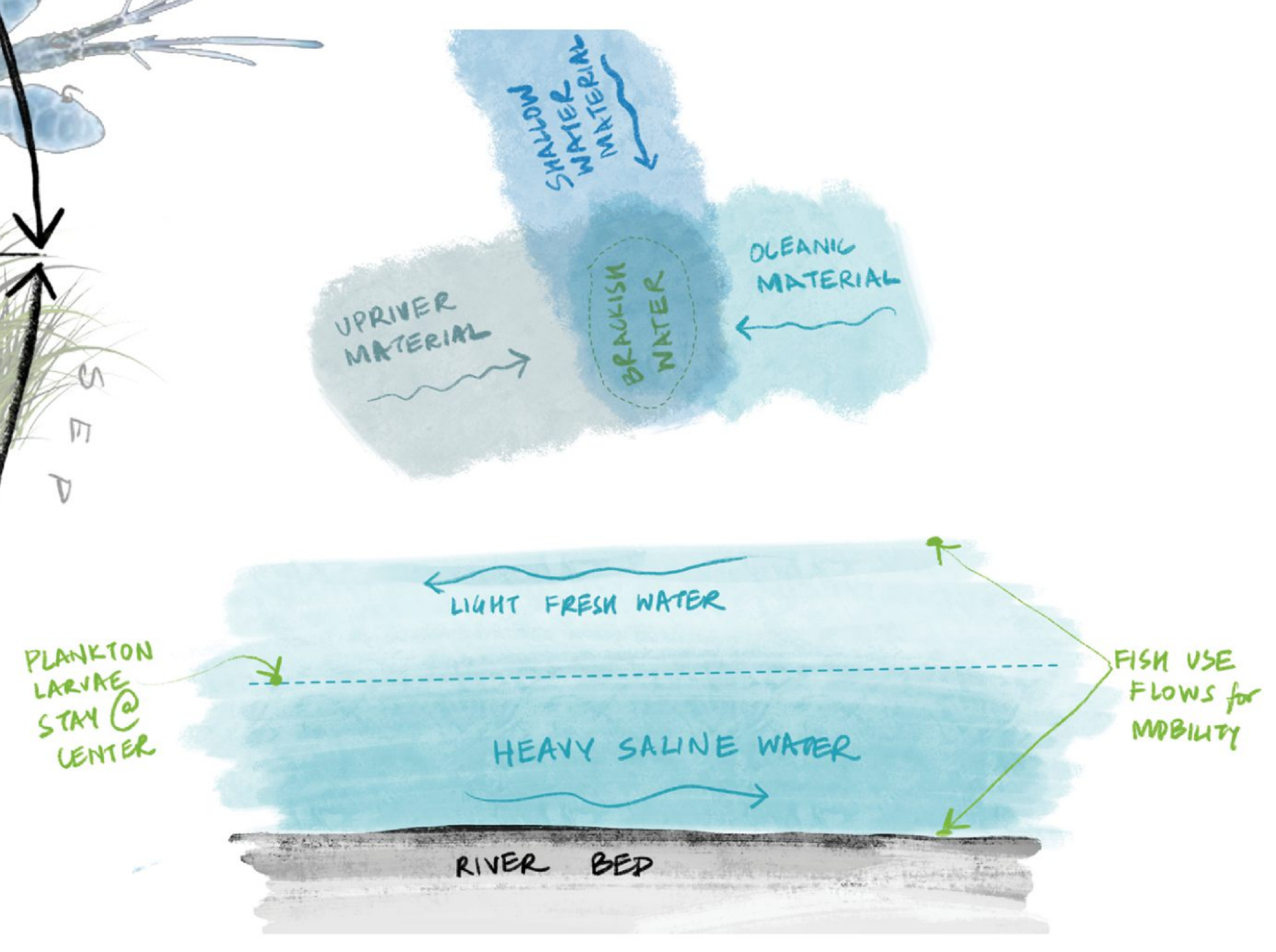
Floodable sports facility (high tide)

Train line trail - 2080's





**Seasonal Rounds for Tarrytown**  
 Systems diagram for timings of biocultural diversity, design interventions and seasonal change



**ADAPTIVE RE-USE & COMMUNITY ENGAGEMENT**



TARRYTOWN TRAIN-TO-TRAIL  
 Edited reference image, Idea courtesy - Ireland Trains

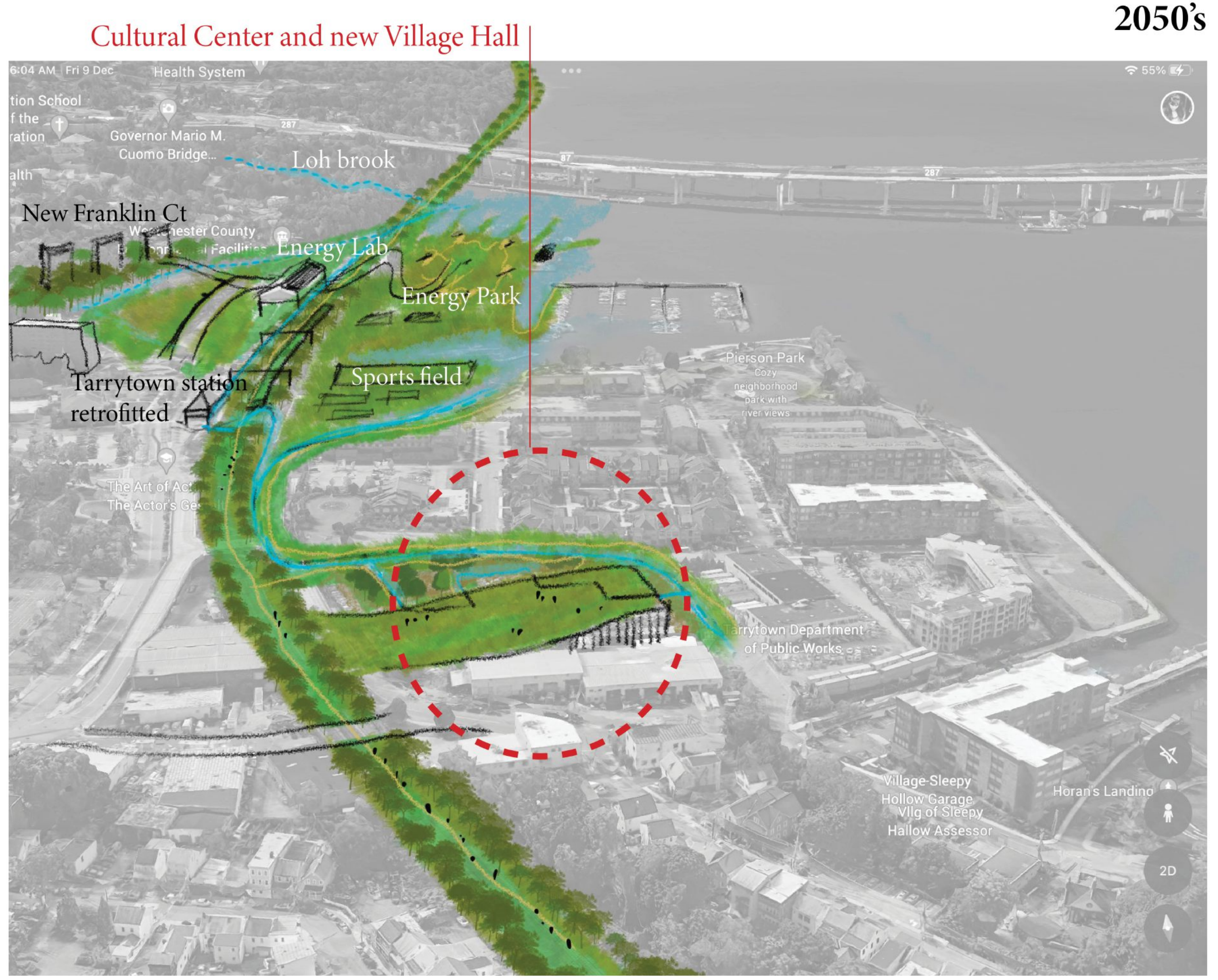
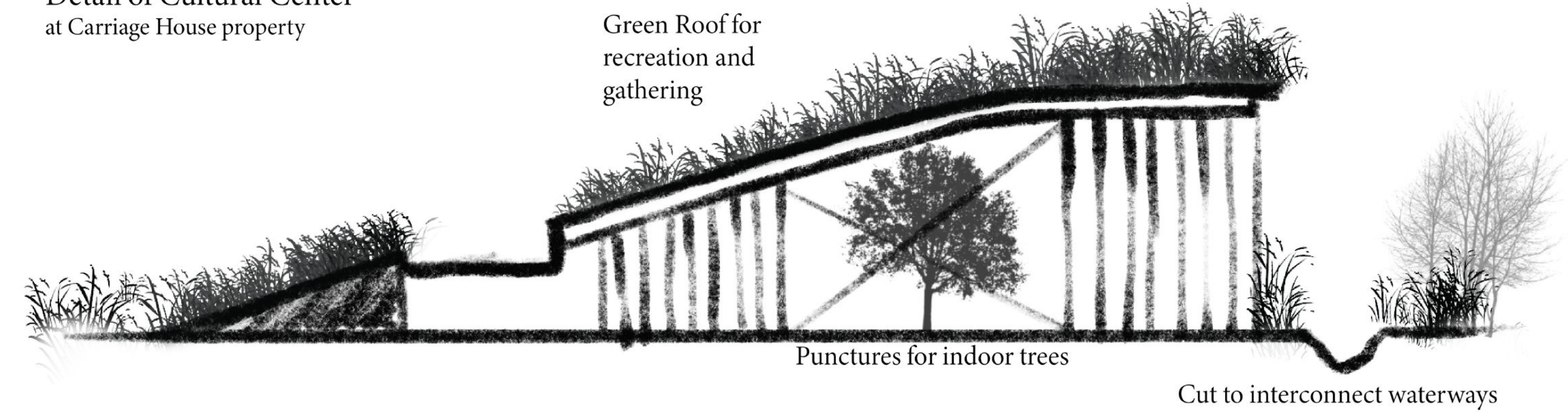
By 2050, I propose that the train line is relocated to Sawmill Road. The trainline on the waterfront now serves as an important connector between various proposed programmes and also ties into the loop of the Scenic Hudson trails. This trail can become the arterial characteristic marker and infrastructure of Tarrytown that works with recreation, tourism and connectivity. The loop will take one through important sites along the waterfront – the bays, the energy park, the cultural center, the markets, the new Pearson Park shoreline, the marina, etc.

The existing location of Village Hall and the Community Center is also susceptible to flooding. I propose a Cultural Center at the Carriage House property that combines all these programs into one location. The Center acts as a culmination of the interconnected loop. The loop is a combination of the train to trail line, and the rip-rap to living shore line edge. The train line can thus eventually connect to the Scenic Hudson trail down south all the way upto Lyndhursts Mansion. Tarrytown celebrates the St. Patricks Day Parade every year, the loop, especially along the train line can be a new location for this parade.

I propose the cultural center have a recreational green roof over it, that can also serve as a location for dog shows and other such community events.

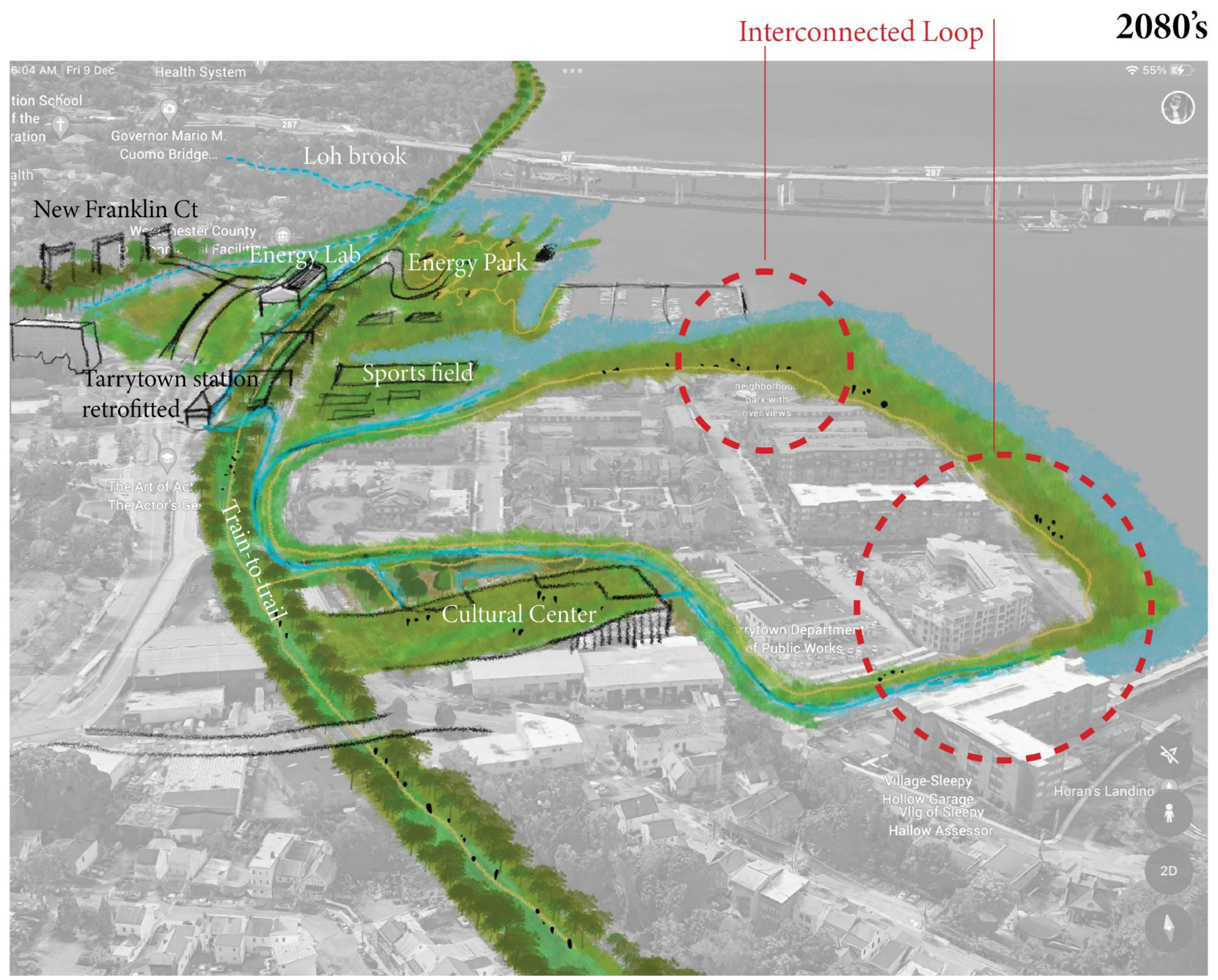
Detail of Cultural Center at Carriage House property

Green Roof for recreation and gathering



2050's

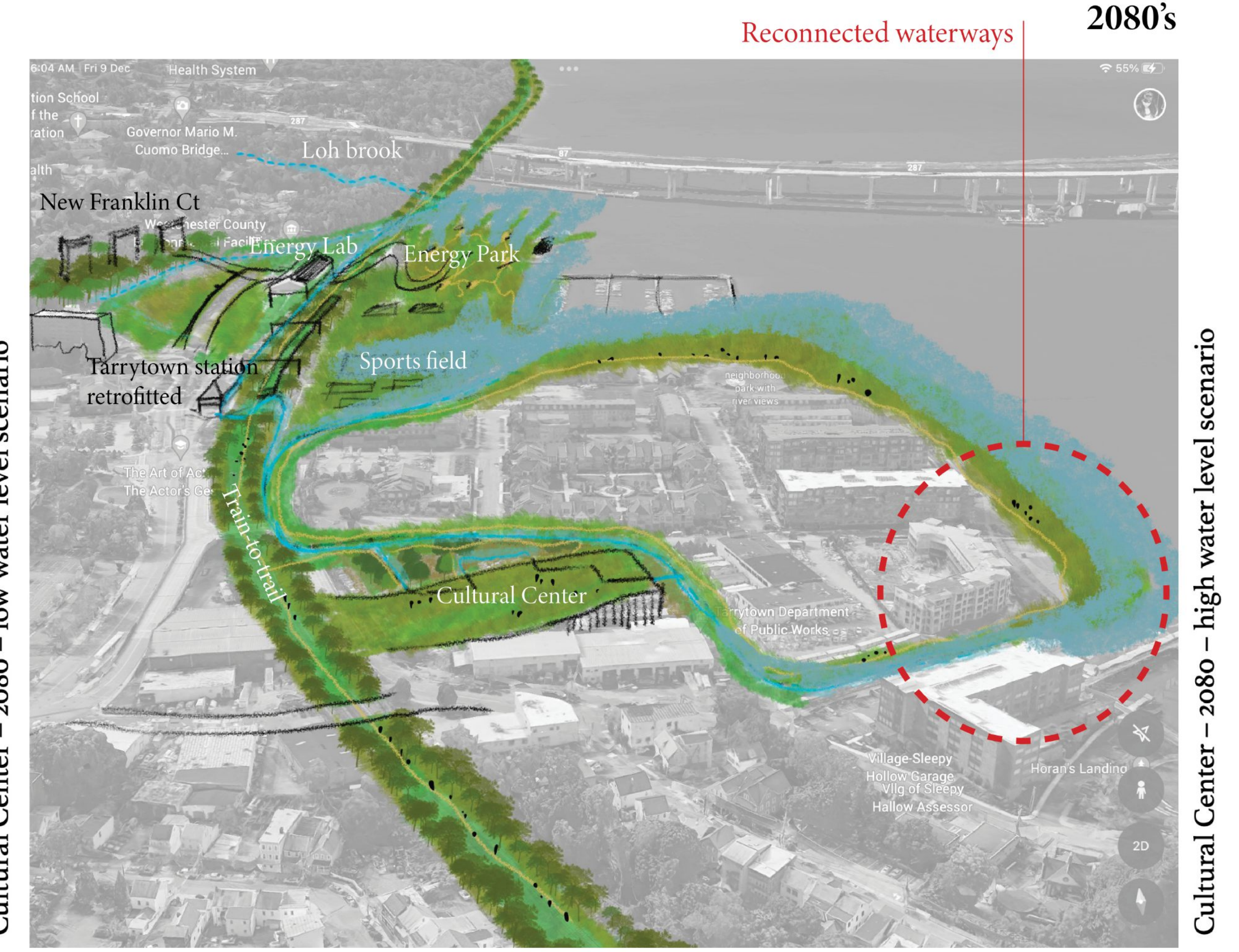
Cultural Center - 2050



Interconnected Loop

2080's

Cultural Center - 2080 - low water level scenario



Reconnected waterways

2080's

Cultural Center - 2080 - high water level scenario