


# Harmony of Human and Nature

Part 2

Ryo ABE

23rd Oct. 2023

A photograph of a row of colorful residential buildings in a town, with a motorcycle parked on the street in front of them. The buildings are in various colors including light blue, yellow, and white. The street is paved and there are some bushes and flowers in the foreground. The text is overlaid on the image.

**Proposal to the Future Vision of Krems and Lerchenfeld**  
**Accessibility to the Eco System Service, for the quality of life.**

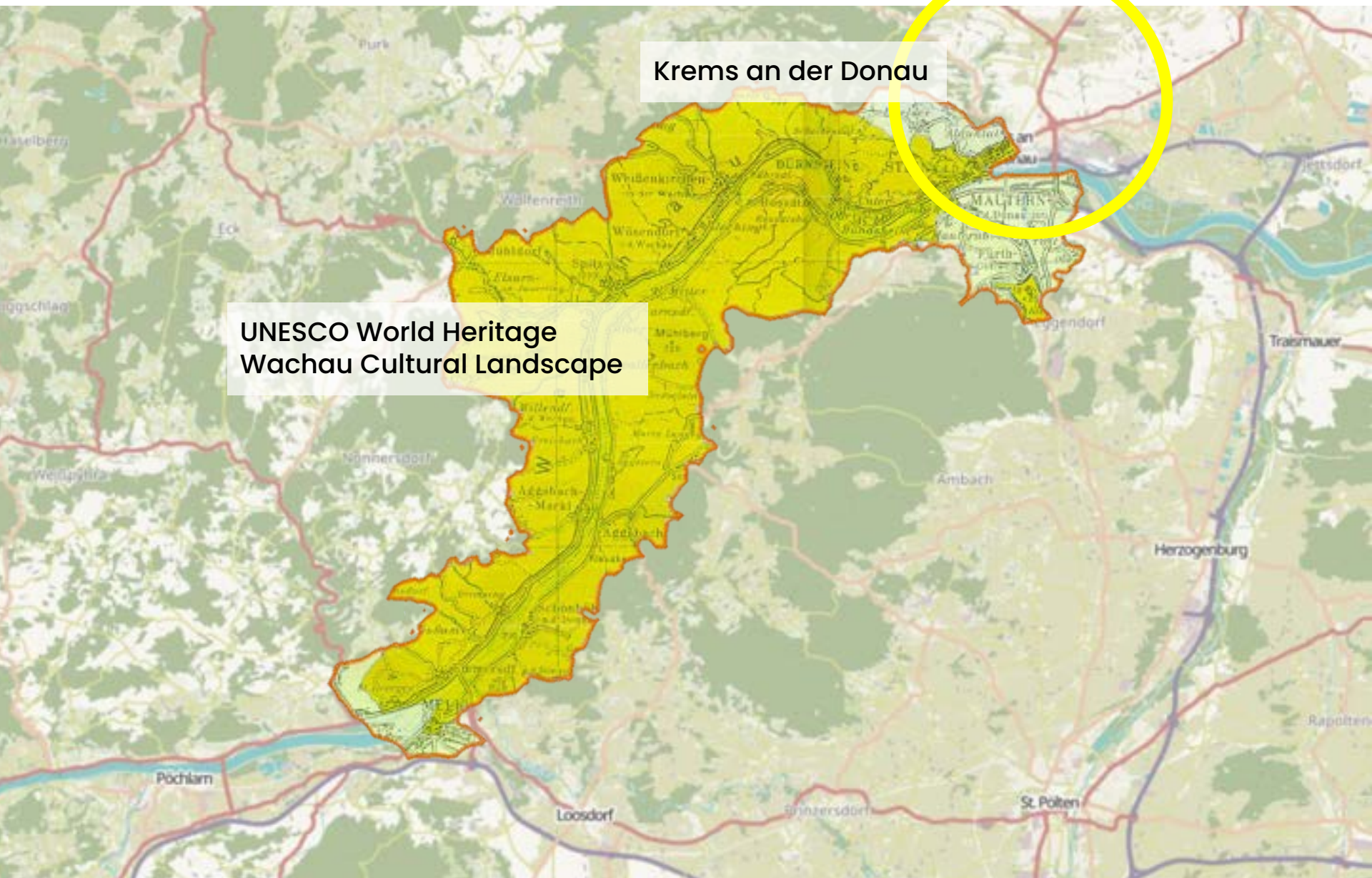
# Context: Krems, Wachau, Donau



Krems an der Donau

Krems an  
der Donau

# Context: Krems, Wachau, Donau



Krems an der Donau

UNESCO World Heritage  
Wachau Cultural Landscape











**Waterfront is the Hotspot for the Eco-system**



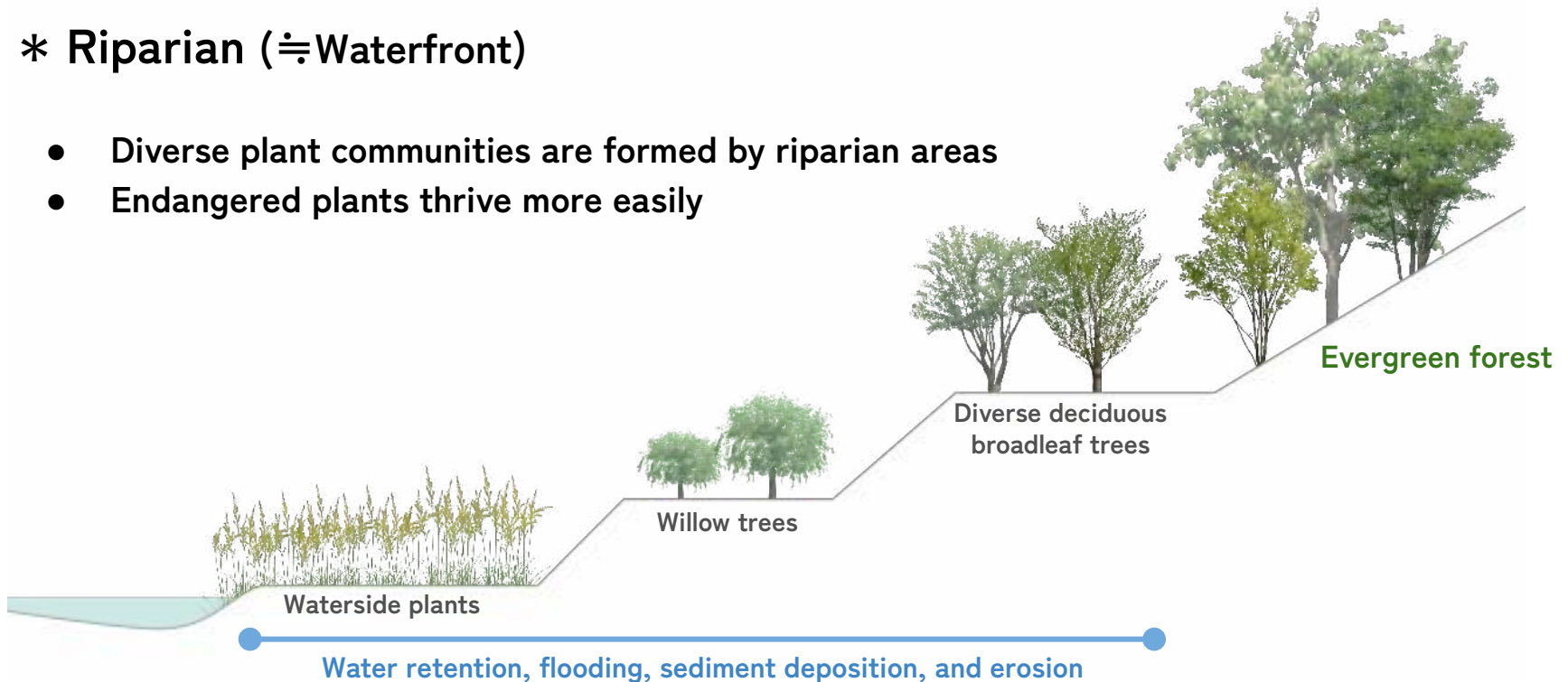




# Waterfront is the Hotspot for the Eco-system

## \* Riparian ( $\hat{=}$ Waterfront)

- Diverse plant communities are formed by riparian areas
- Endangered plants thrive more easily



## \* Riparian forests become ecological corridors

- Continuous riverside forests become migration corridors for wildlife
- They serve as corridors for the transportation of plant seeds by wildlife

# Waterfront is the Hotspot for the Eco-system

- \* Riparian ( $\hat{=}$ Waterfront) Buffer Strip  
can have effects on the downstream area.



## Fallen Trees

- Make complexity in river topography  
→ feeding, shelter, and spawning areas for fishes

## Fallen Leaves

- Serves as food for aquatic life
- Insects fall into the water, becoming a food

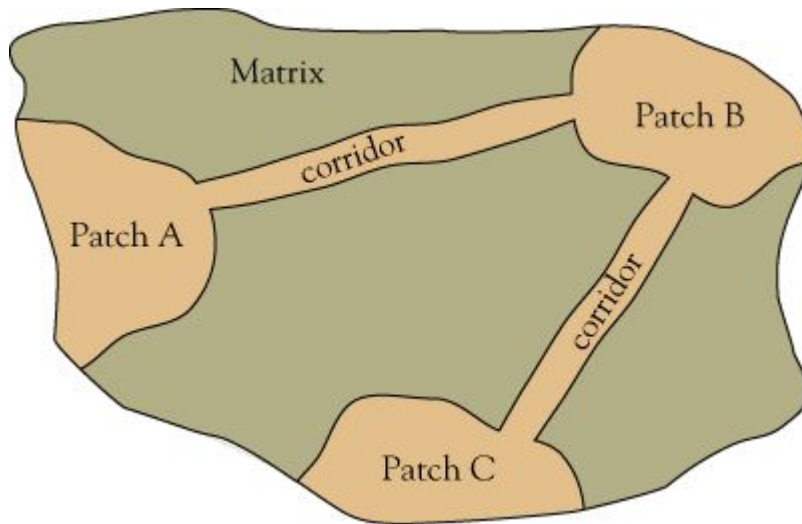
## The food chain and the flow of water

- Influence downstream areas of the river

Rivers supply organic matter to the sea  
= Forests are the lovers of the sea

# Green Corridor / Net work for the Eco-System

## \* Green corridor



No connectivity



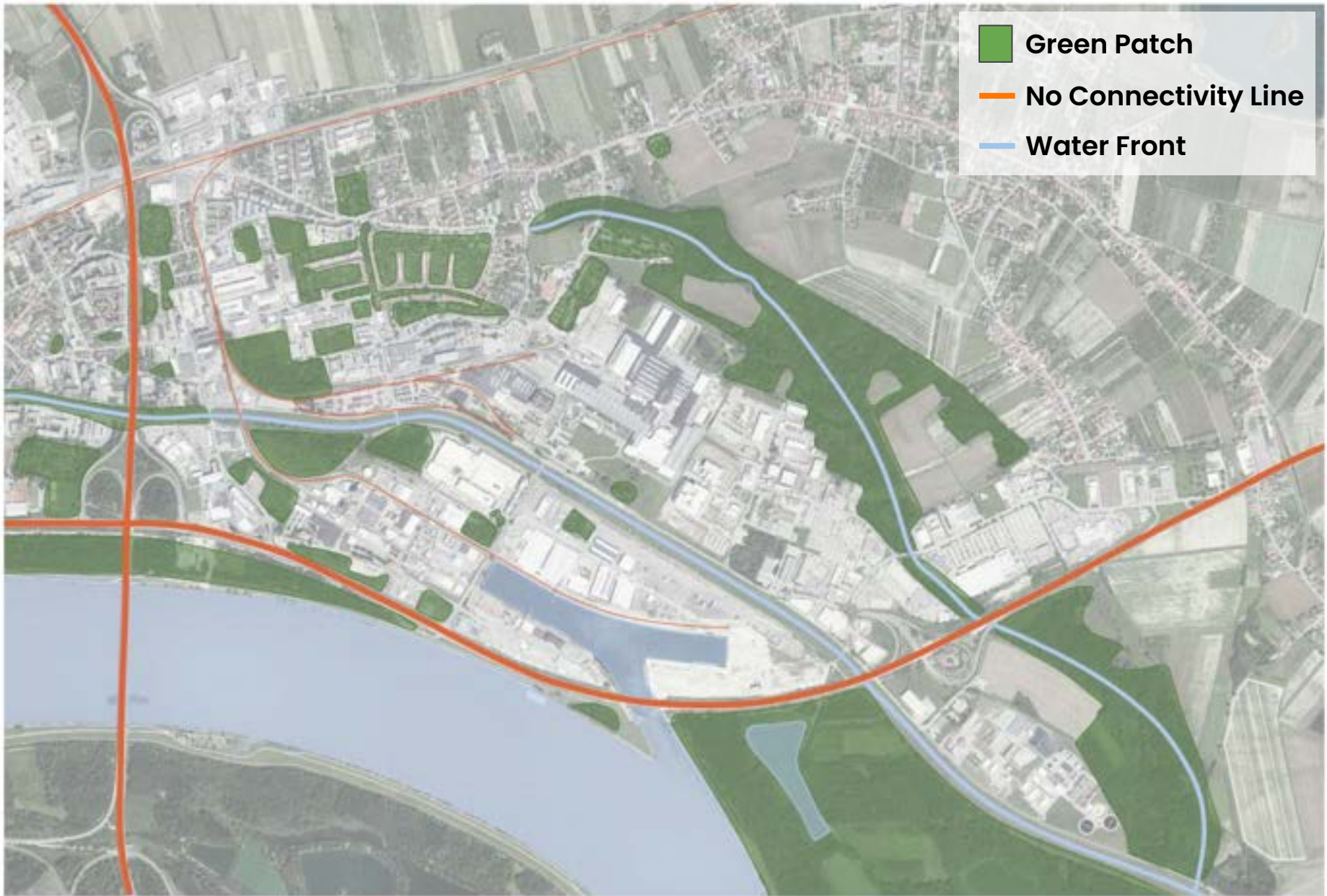
Connectivity via corridor



Connectivity via crossing

<https://blogs.stlawu.edu/conservationbiologyconceptnotebook/?p=204>

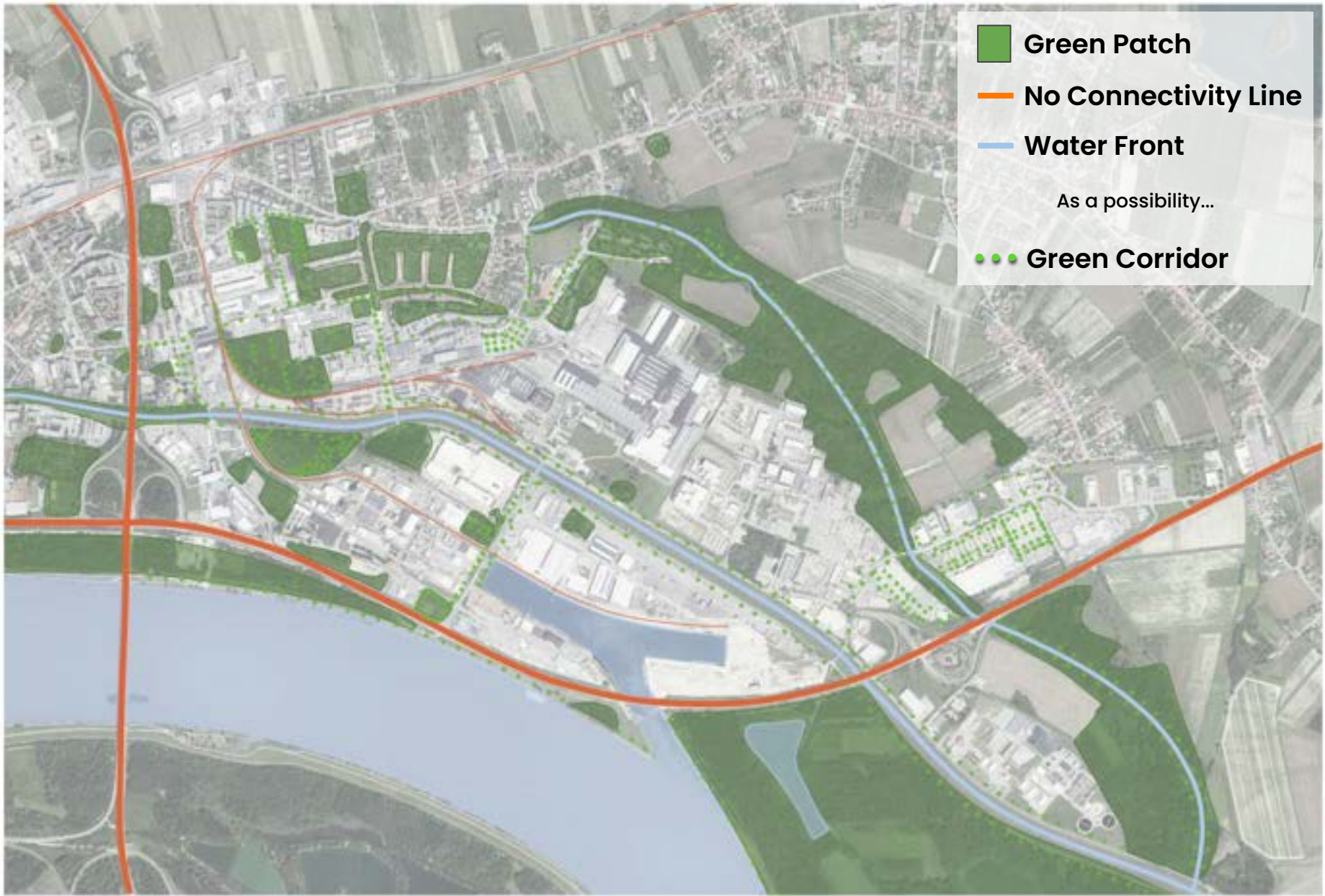
<https://largelandscapes.org/news/corridorvs crossing/>



- Green Patch
- No Connectivity Line
- Water Front

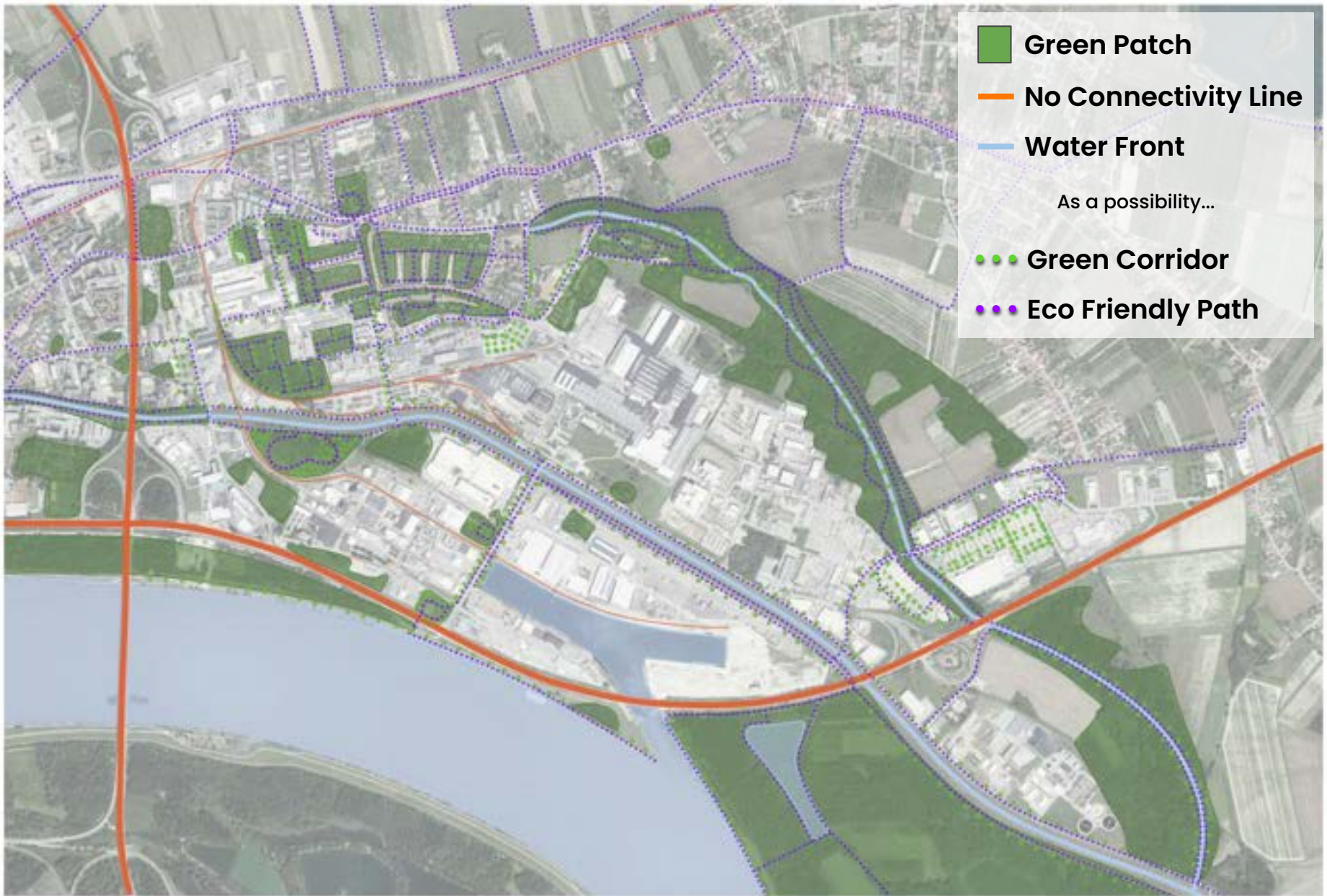






- Green Patch**
- No Connectivity Line**
- Water Front**
- As a possibility...
- Green Corridor**





# Green Infrastructure

- \* Green infrastructure is a type of water management practices in urban areas.
- \* Roadside plantings, absorbent gardens, rooftop gardens, etc.





# What's the "Eco-system Services" ?

## Provisioning Service

Products humans obtain from ecosystems

Food  
Water  
Fuel  
Fiber  
Chemicals  
Gene  
⋮

## Regulating Service

Services nature provides that regulate the environment

Air Quality  
Climate  
Water purification  
Disease control  
Flood control  
Detoxification  
⋮

## Cultural Service

Non-material benefits of nature for humans

Recreation, Tourism  
Aesthetic, Beauty  
Idea  
Education  
Mental, Physical Health  
Symbol  
⋮

## Supporting Service

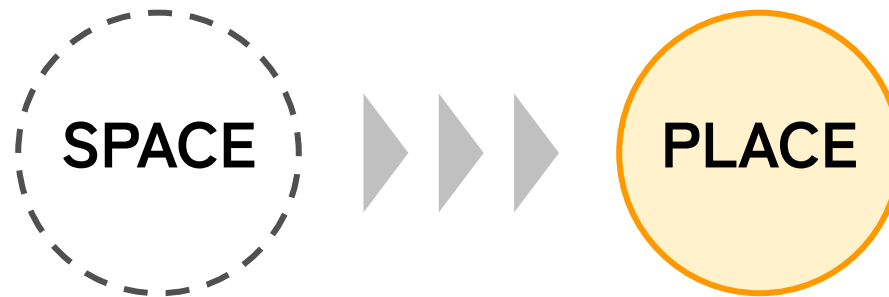
The underpinning services  
that enable all other services to function - encompasses both human and ecosystem needs

Soil formation · Mineral cycling · Primary production...

Biodiversity

# "Place making" ?

Space to Place







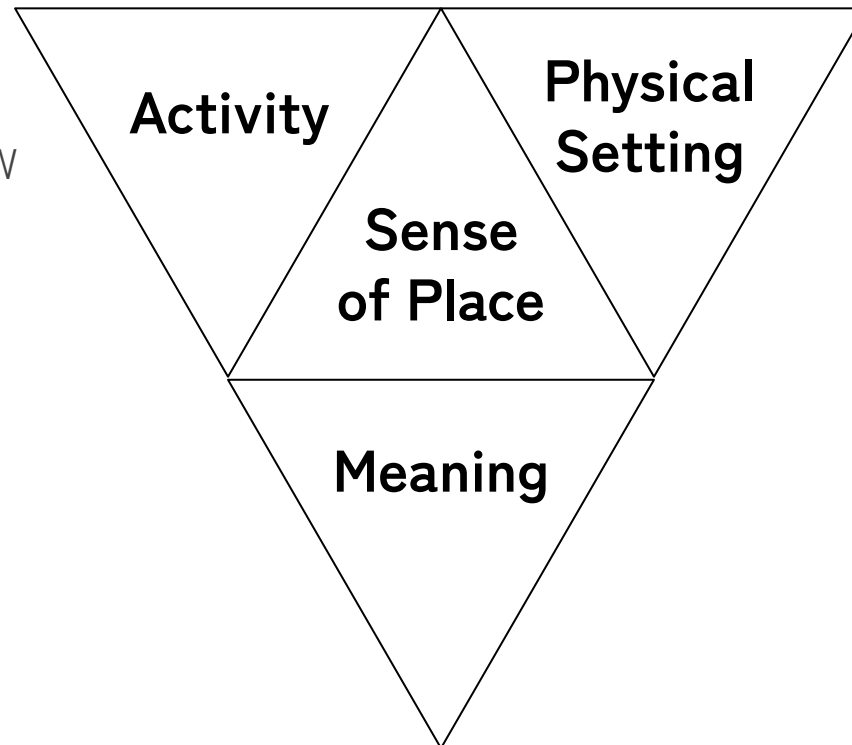






# Concept of the "Place making"

- LAND USES
- PEDESTRIAN FLOW
- BEHAVIOUR
- PATTERNS
- NOISE & SMELL
- VEHICLE FLOW
- ⋮



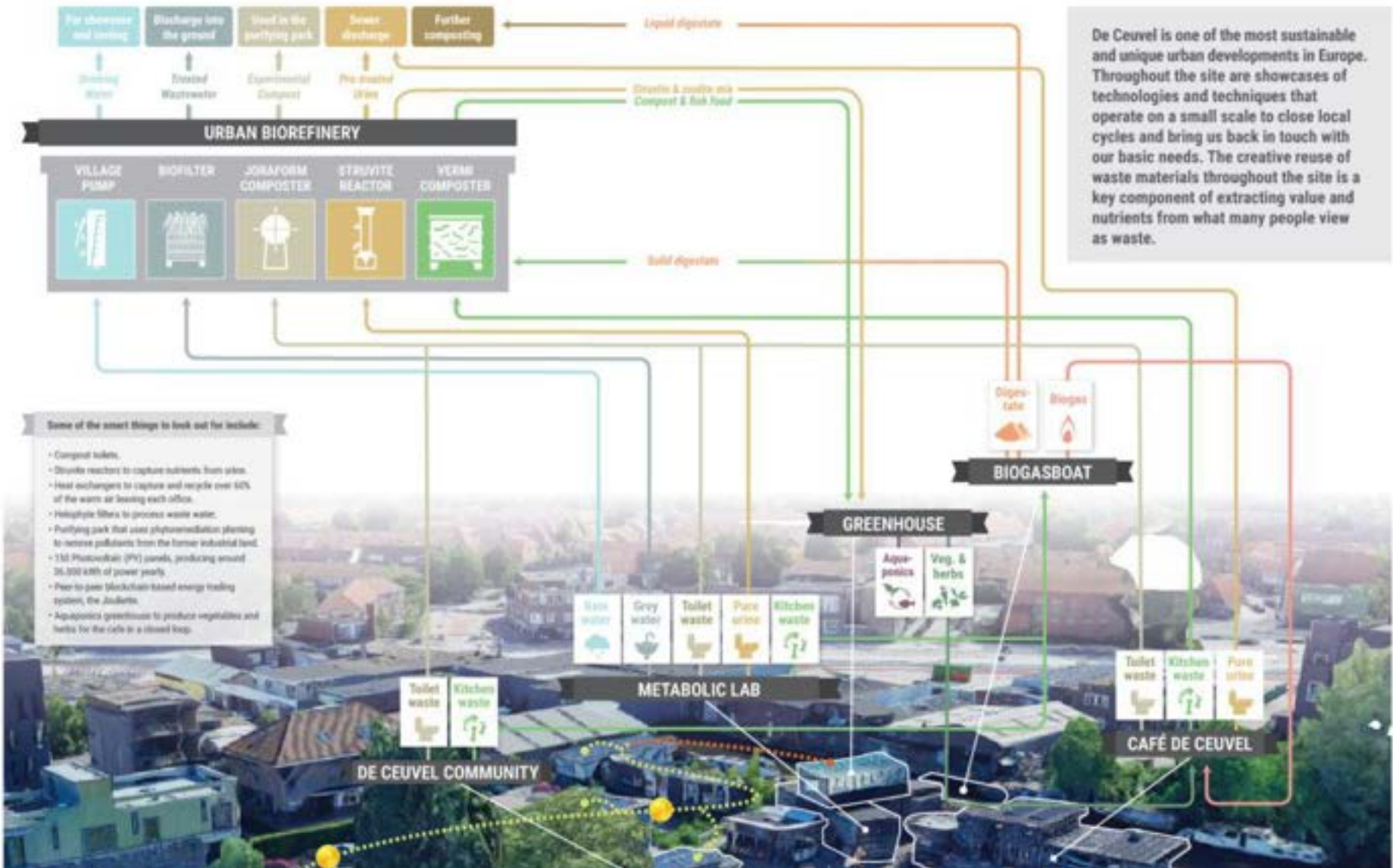
- TOWNSCAPE
- BUILT FORM
- PERMEABILITY
- LANDSCAPE
- FURNITURE
- ⋮

- LEGIBILITY
- CULTURAL ASSOCIATIONS
- PERCEIVED FUNCTIONS, ATTRACTIONS
- QUALITATIVE ASSESSMENTS
- ⋮

# De Ceuvel / Amsterdam, Nederland



*“We call De Ceugel a Cleantech Playground. The concept was developed to stimulate new ways of thinking about how we manage resources in our communities.”*



*“De Ceuvel is An experiment in which we make sustainability creative, accessible and fun for everyone.”*



# Development and Change



1869-1887 Habsburgermonarchie - Franzisco-Josephinische Landesaufnahme

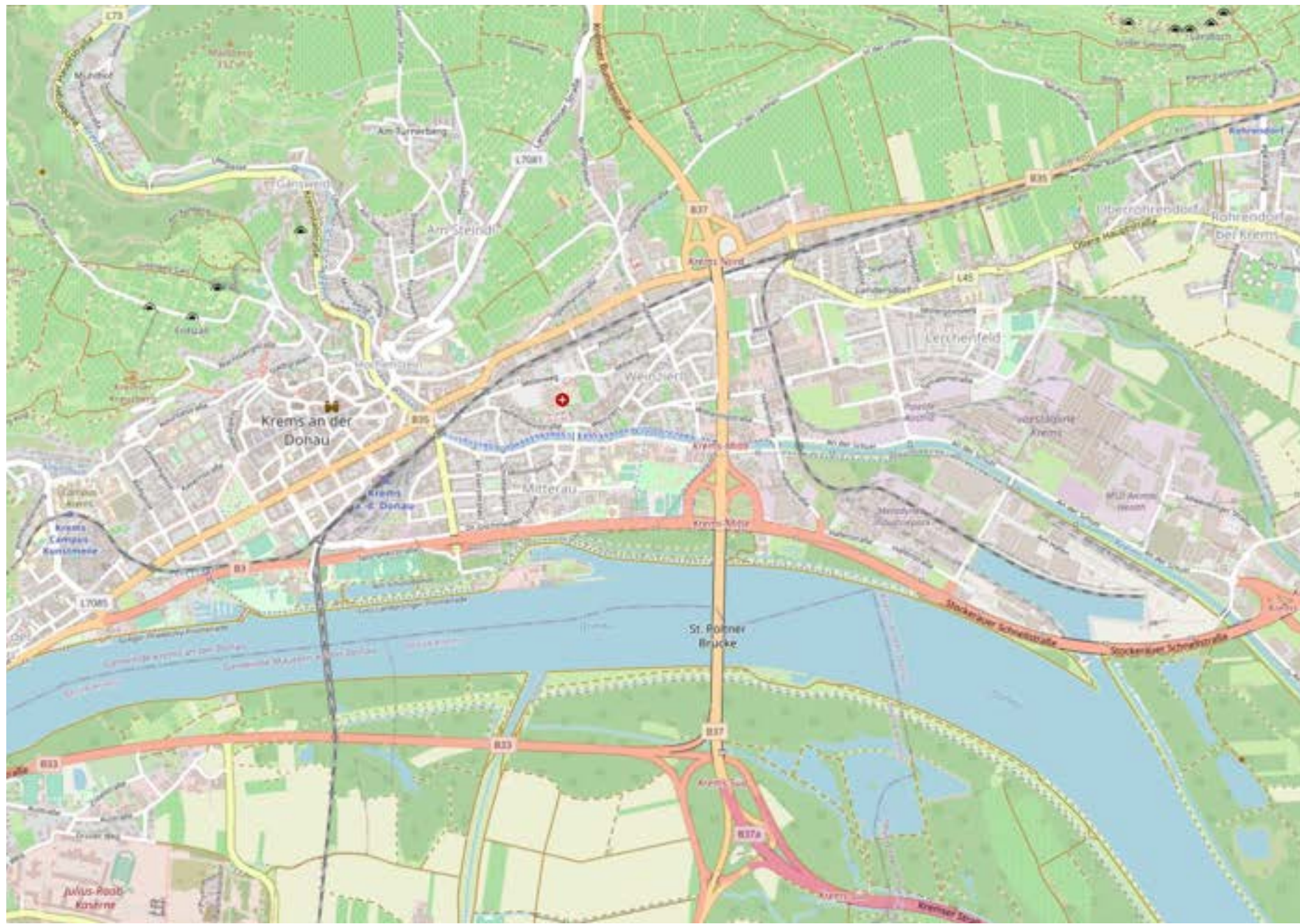




1942



1943



Present

# Living Heritage with Lively Gardens





KS 940 AY



















# Connection and Disconnection






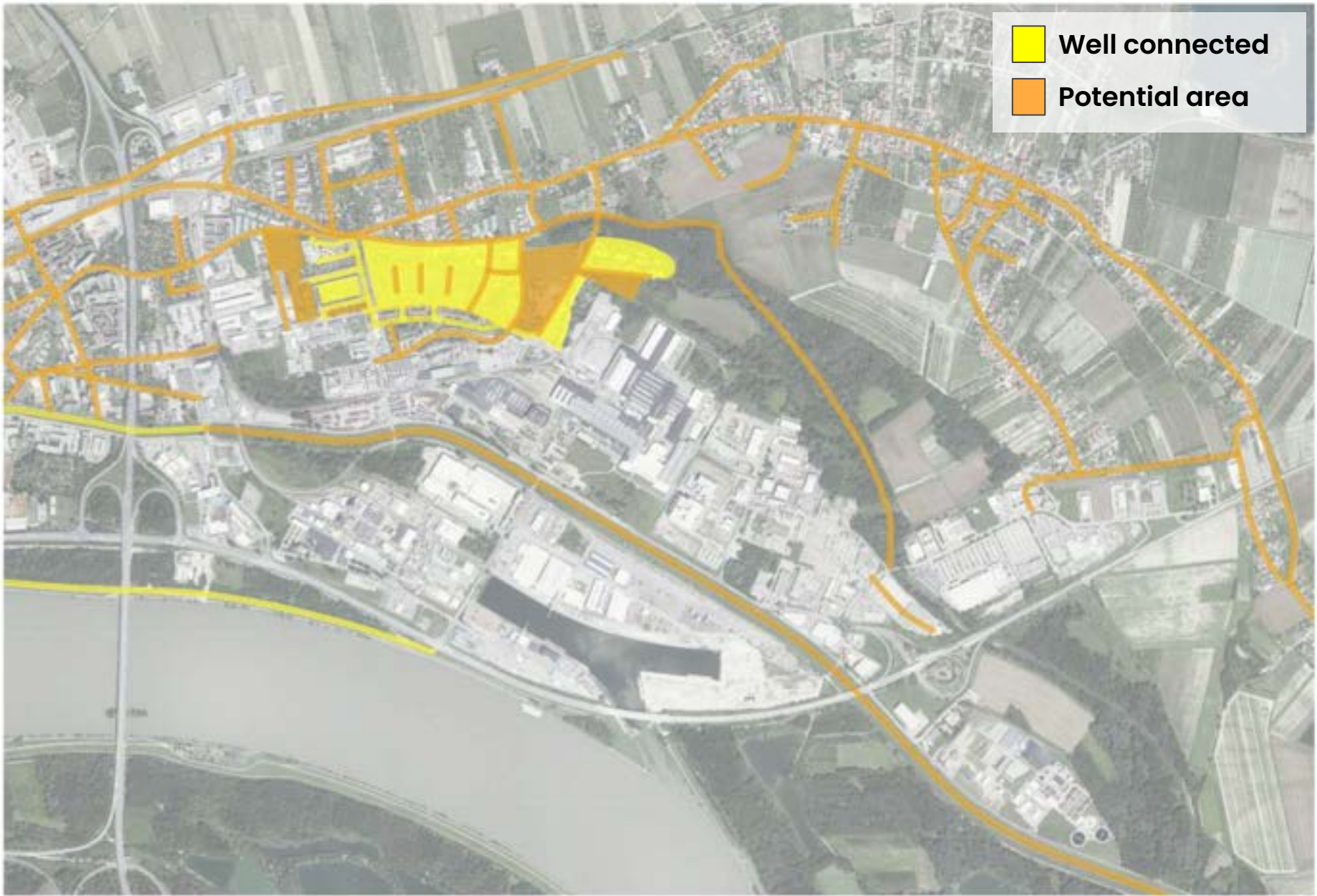






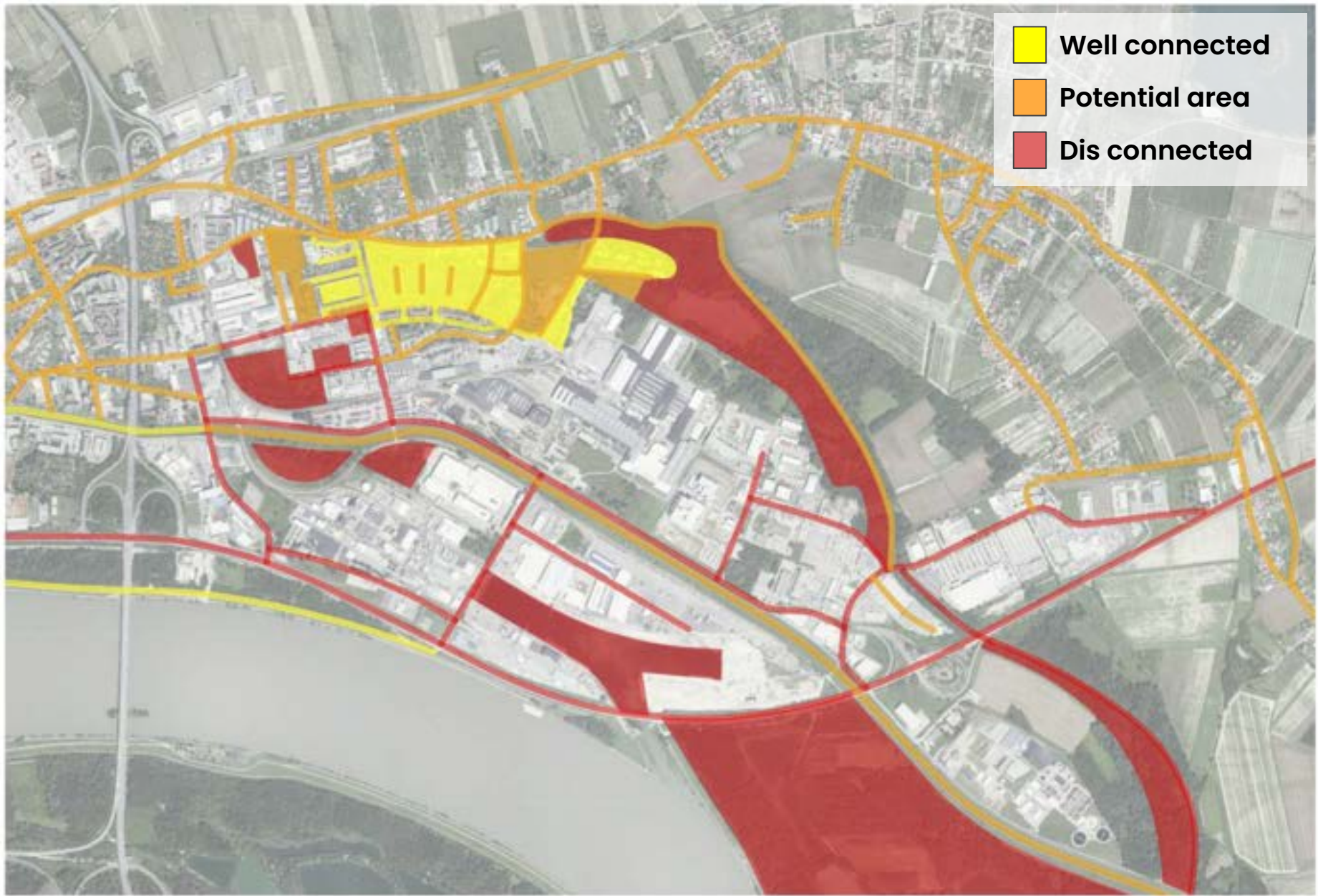
 Well connected





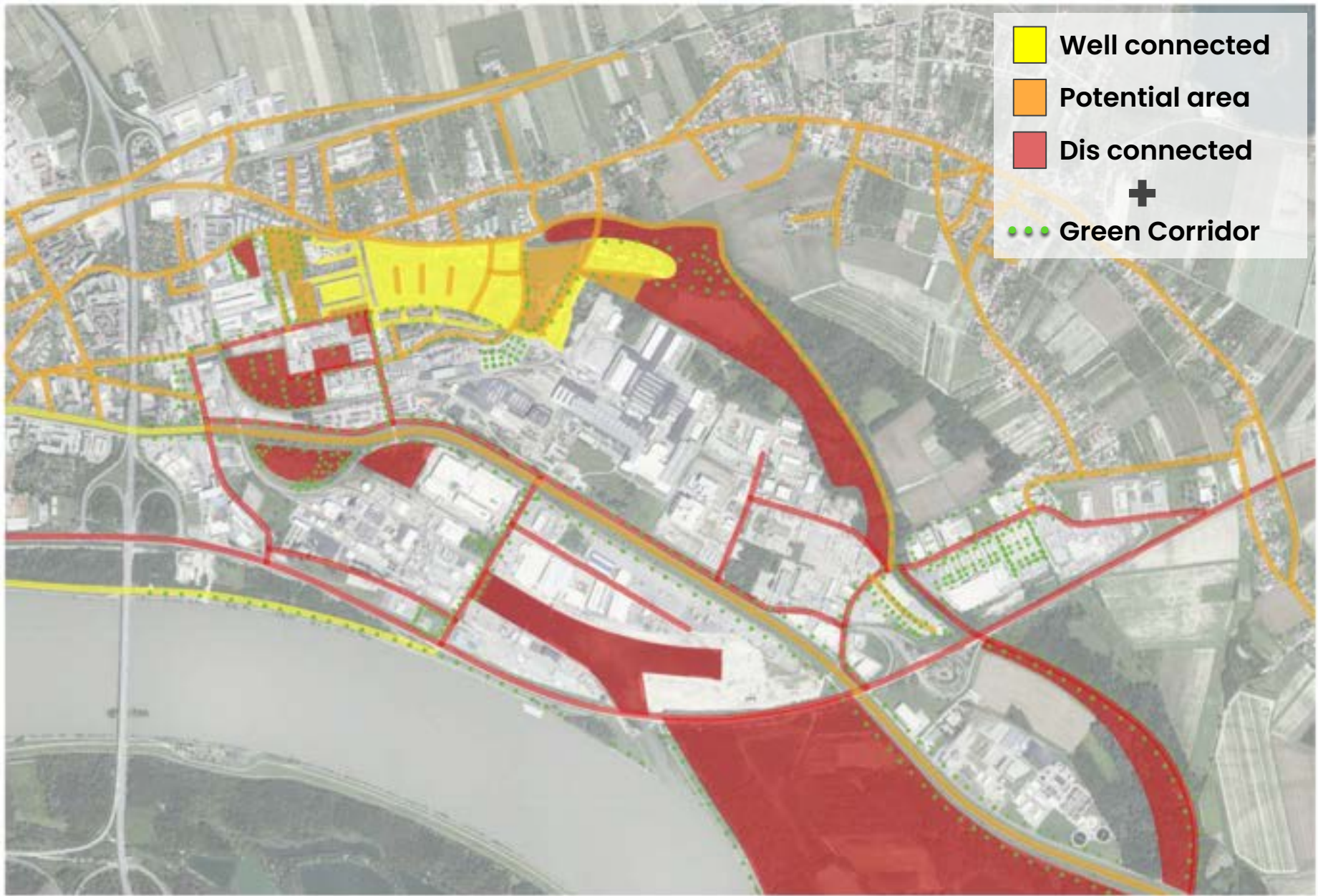
- Well connected
- Potential area

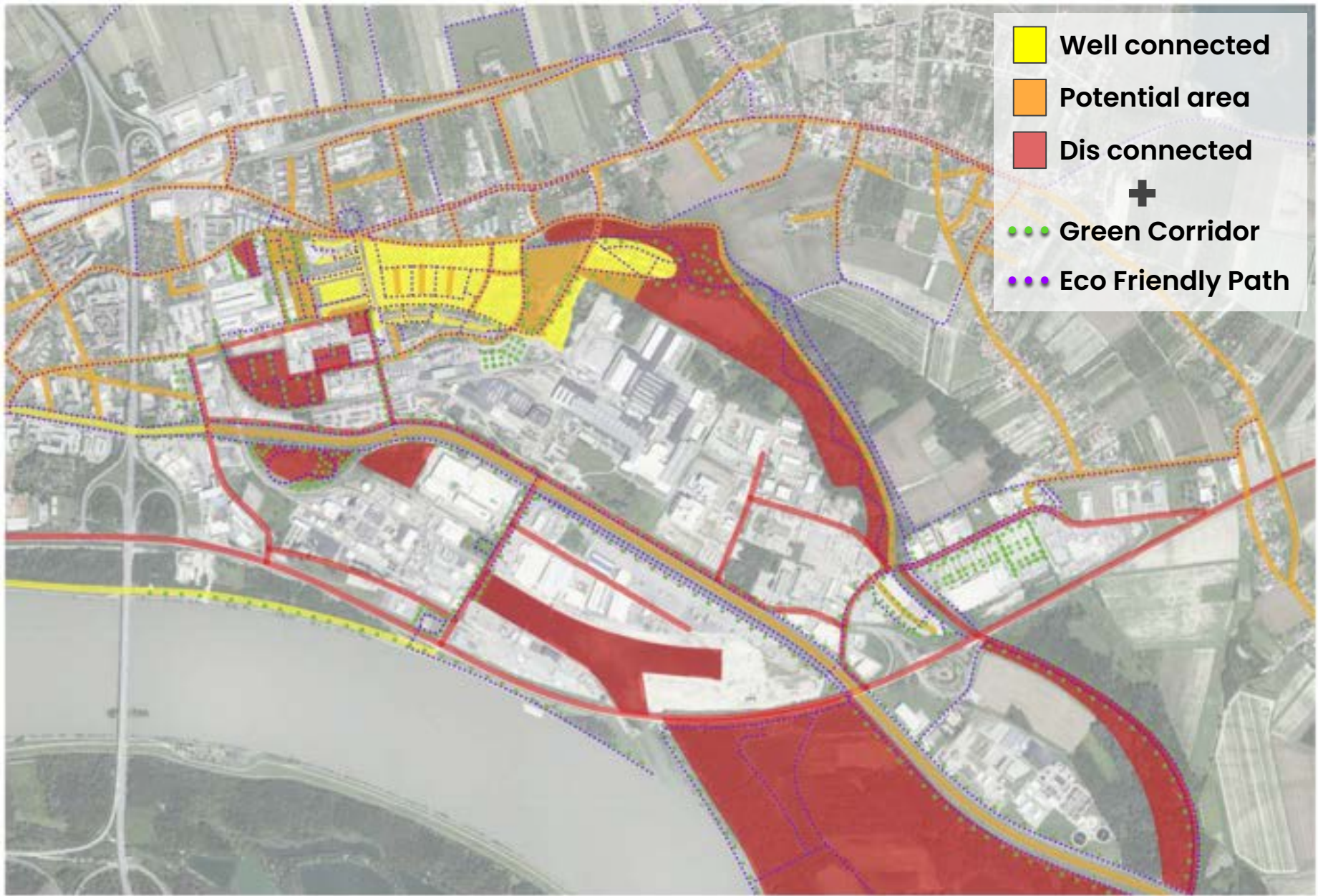




- Well connected
- Potential area
- Dis connected



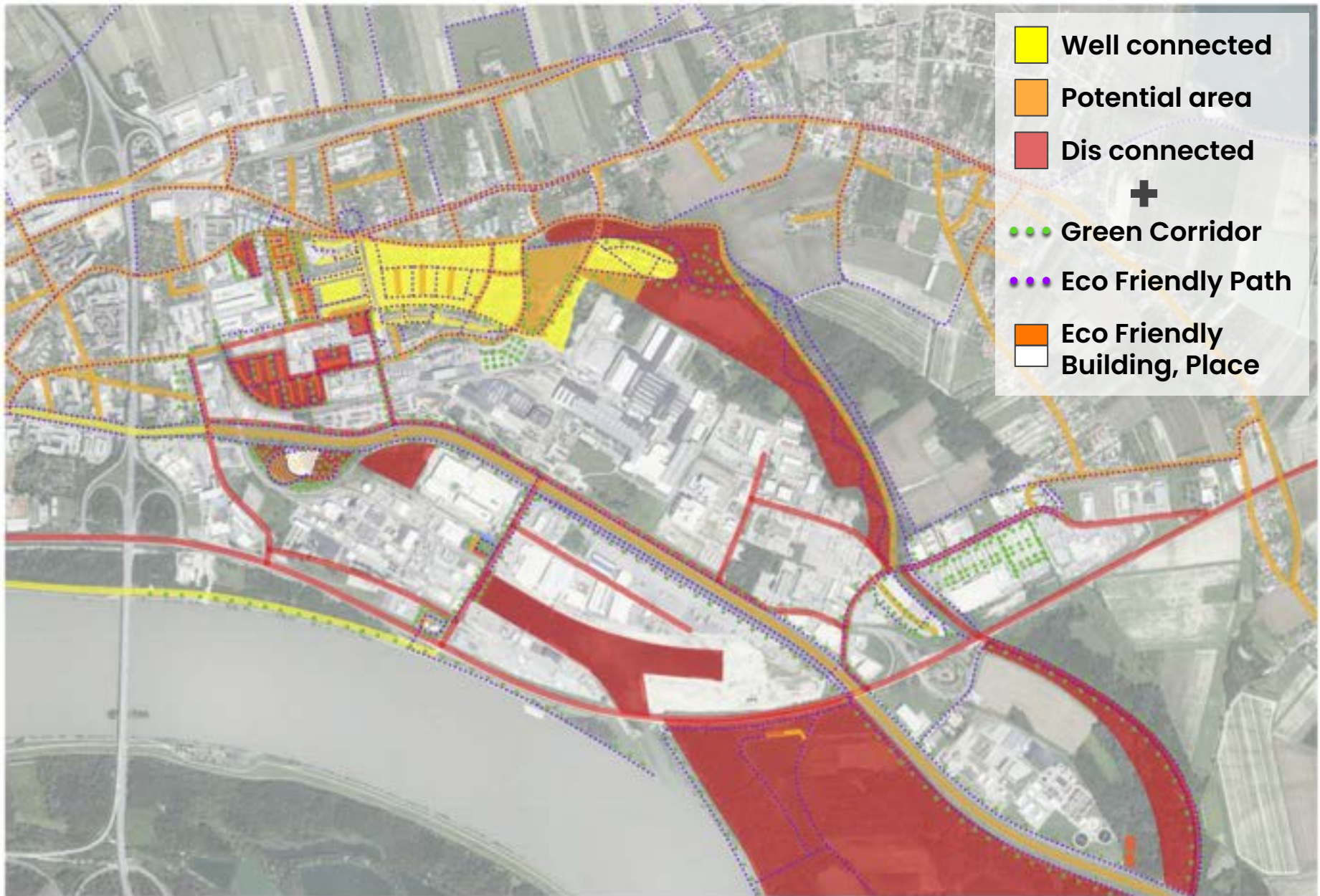


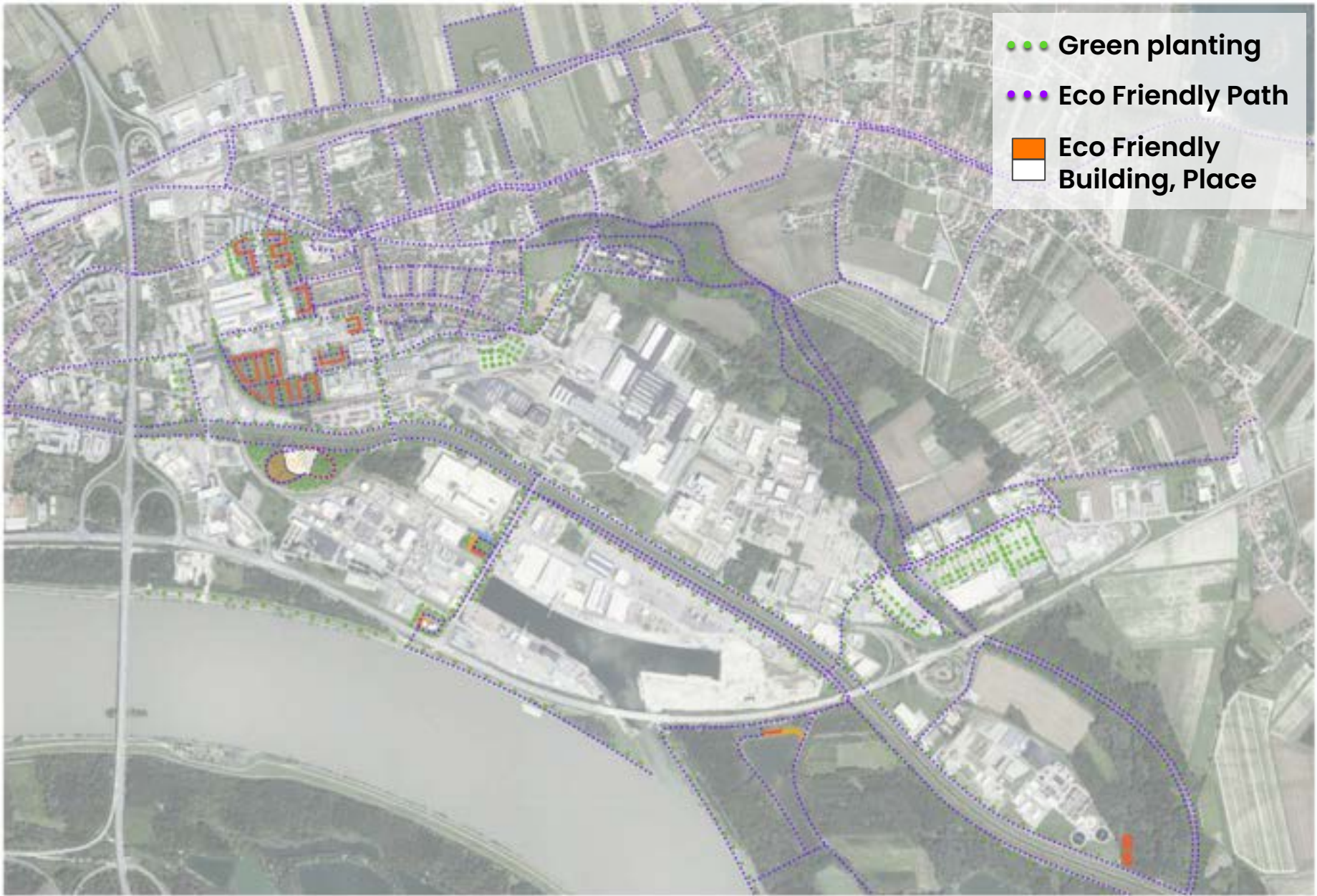


- Well connected
- Potential area
- Dis connected
- +
- Green Corridor
- Eco Friendly Path





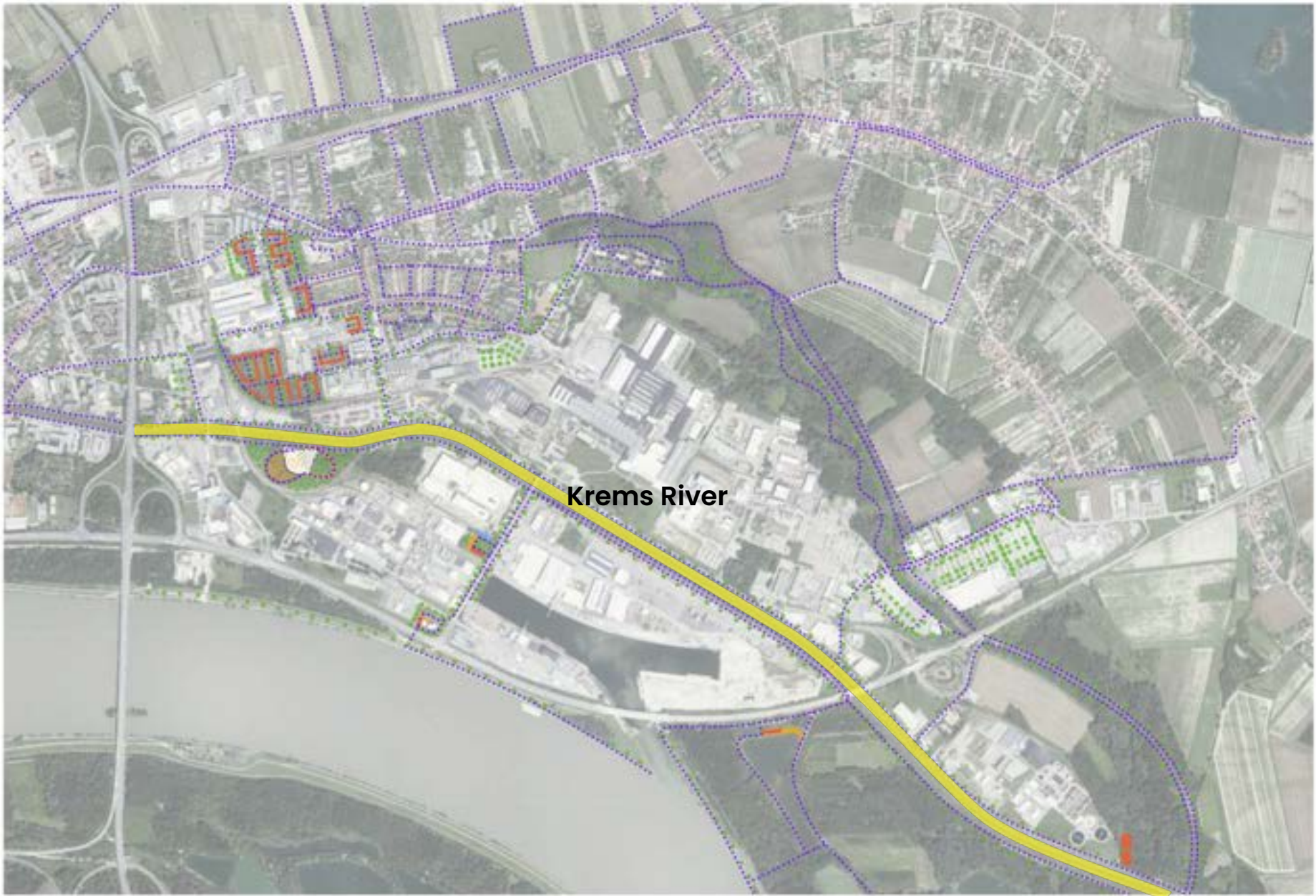




- ● Green planting
- ● Eco Friendly Path
- Eco Friendly Building, Place



**Our proposal**



Krems River



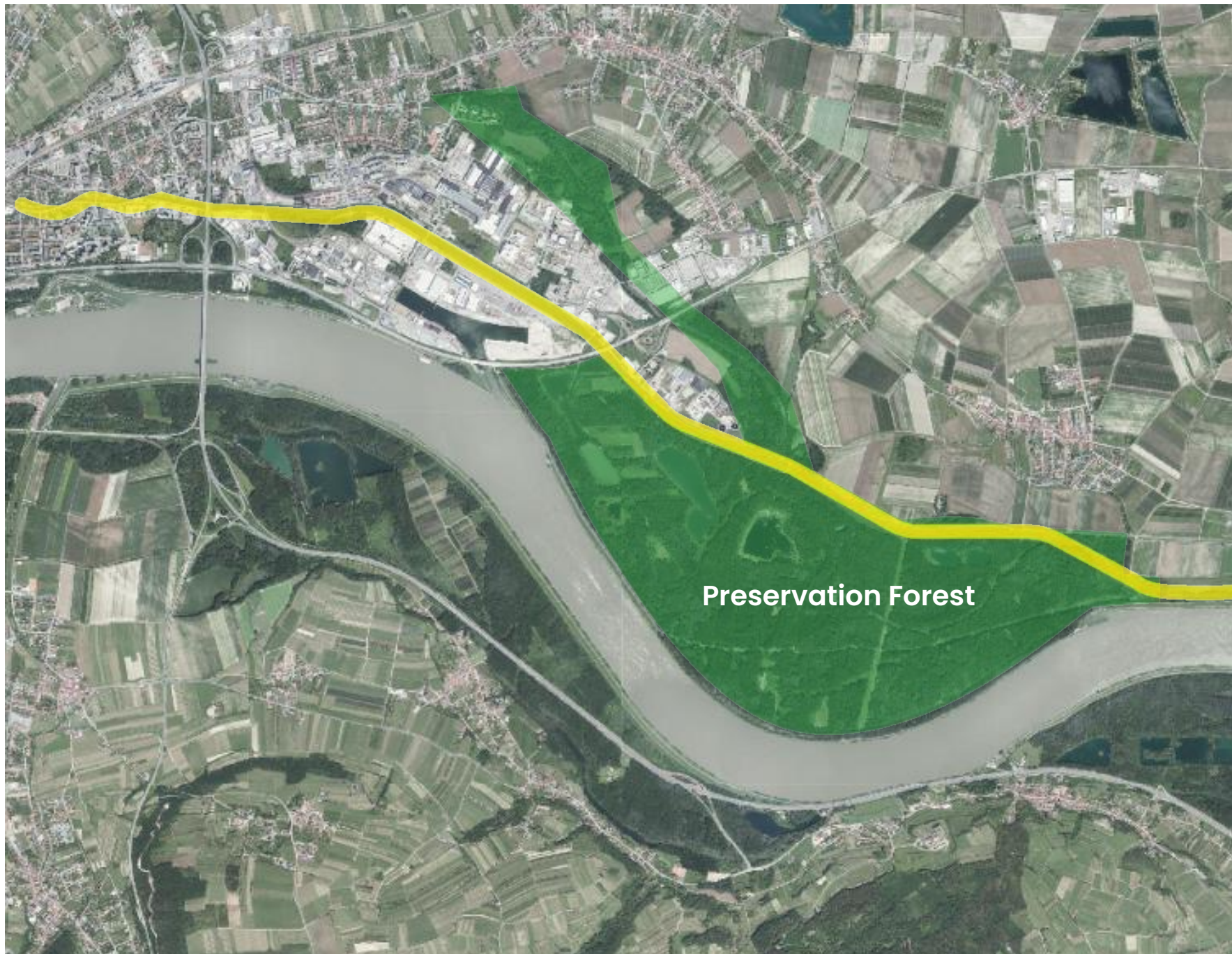












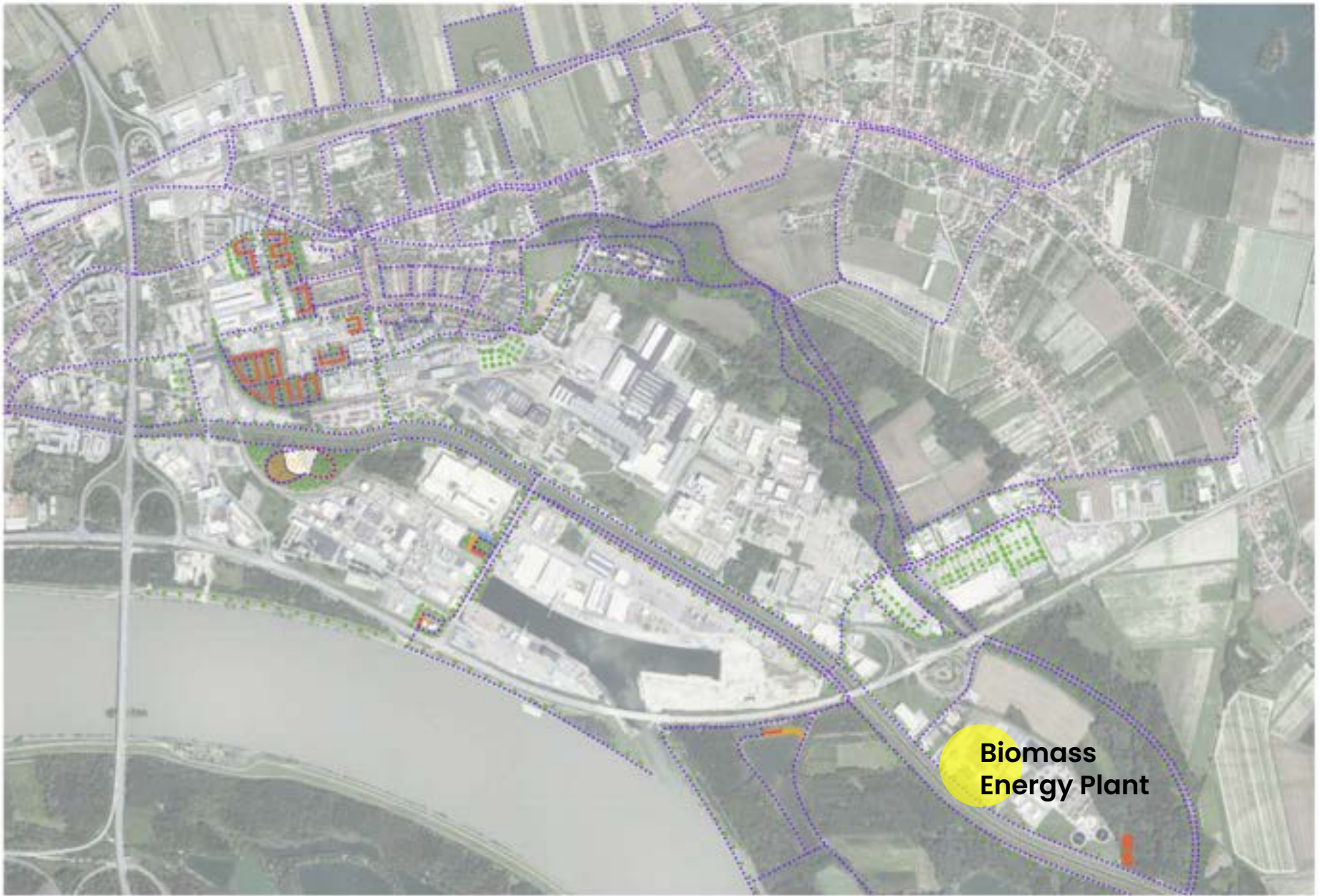
Preservation Forest



**Natura 2000 site**  
**Tullnerfelder Donau-Auen (AT1216V00)**

**Preservation Forest**





**Biomass  
Energy Plant**





The Spittelau incinerator (Vienna) / Friedensreich Hundertwasser



Natur-Energie  
für Krems  
**EVN**

**EVN**

**Biomasseheizkraftwerk Krems –  
Erneuerbare Energie aus der Region,  
für die Region**

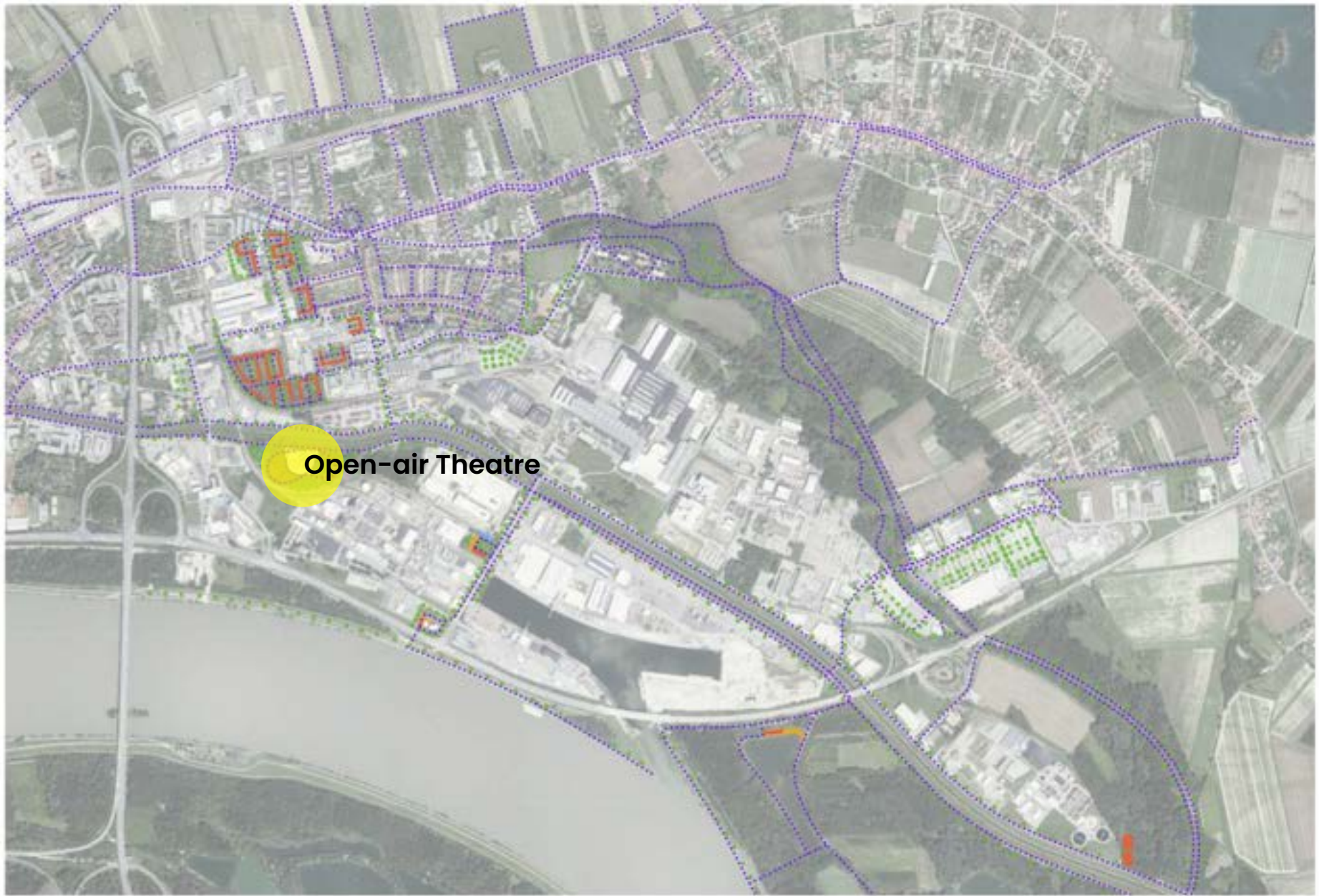
Wir sind stolz darauf zu berichten für 30.000 Haushalte umgeben  
und Ökostrom für 15.000 Haushalte erzeugt!



- Wasserkraftwerk (Kraft 200)
- Biomassekraftwerk (Kraft 30 MW, Biomasse)
- Gärungs- und Gärrestverarbeitung (Kraft 10 MW, Biomasse)
- CO<sub>2</sub>-Separierung (Kraft 20 MW, Biomasse)
- Biomasse-Verfahren
- Biomasse-Verfahren

21





Open-air Theatre





# An der Schütt

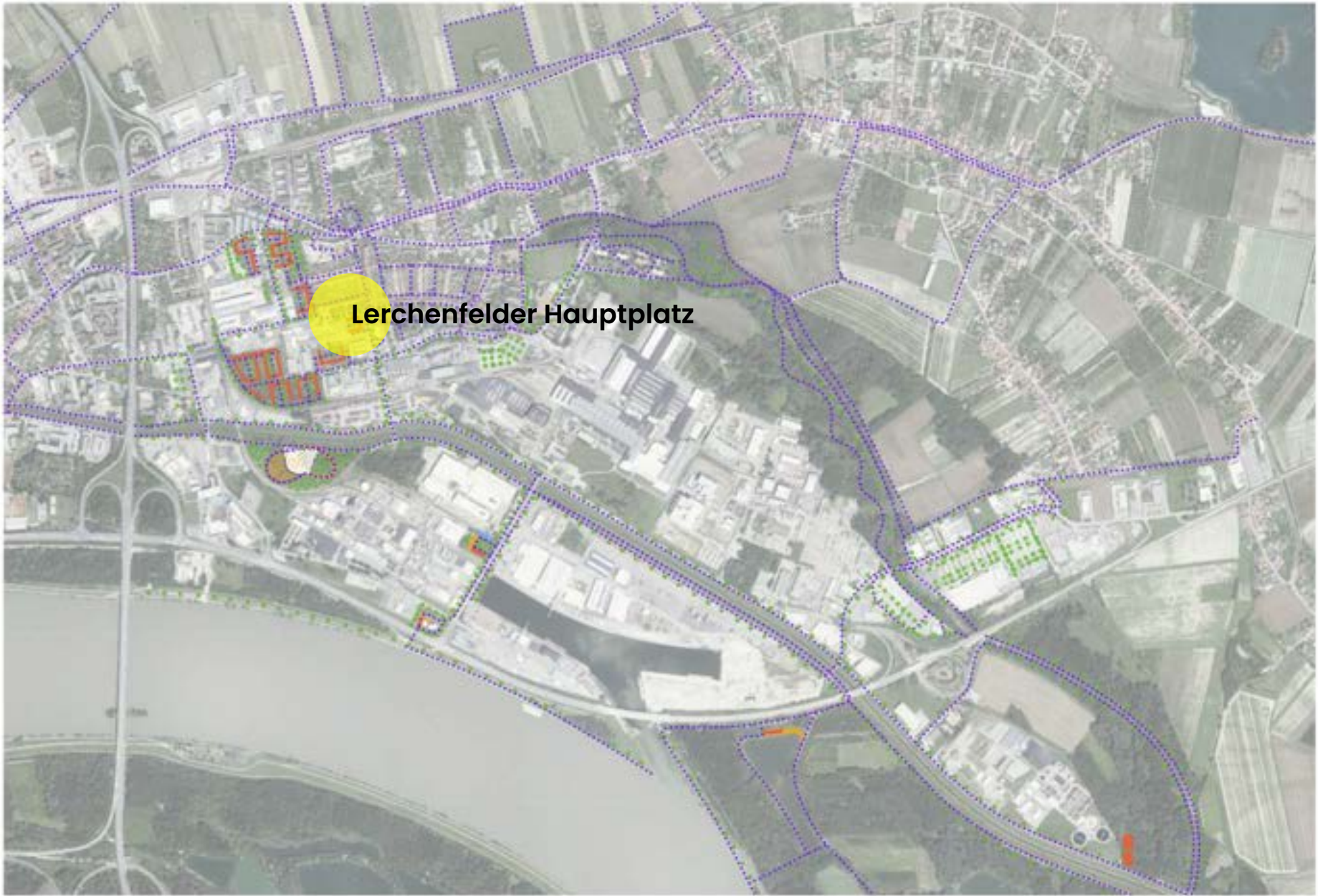












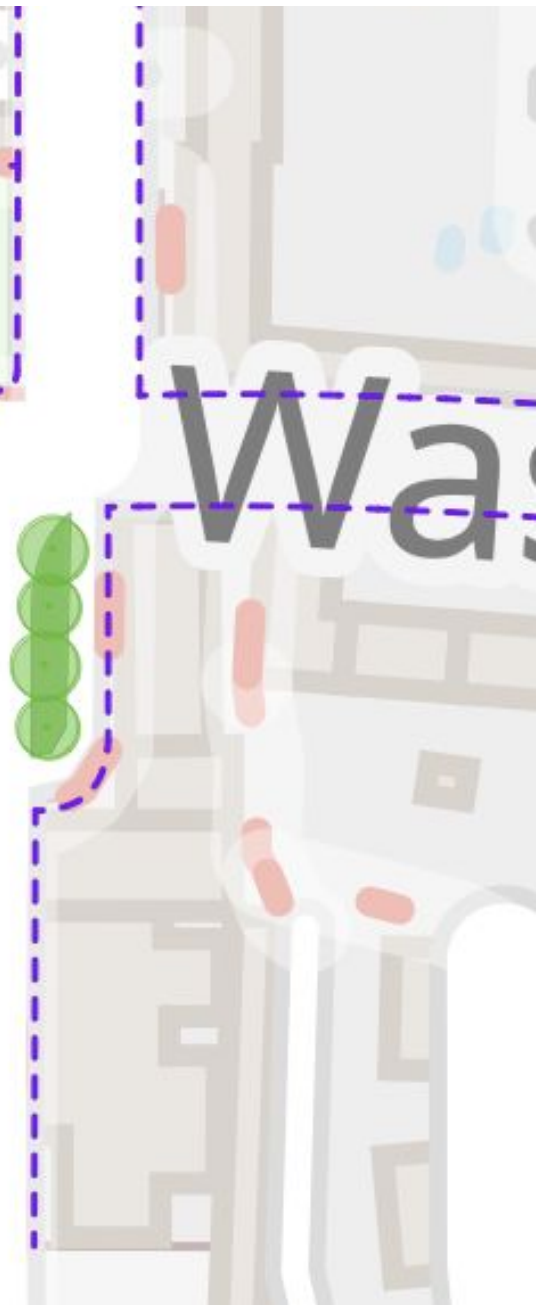
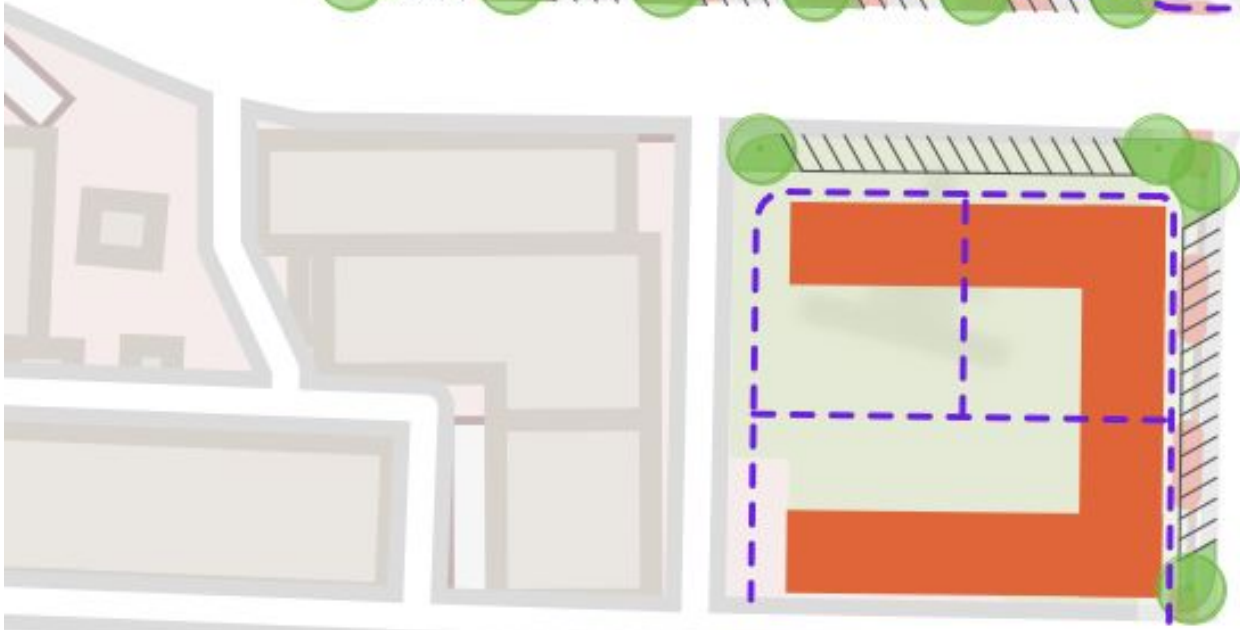
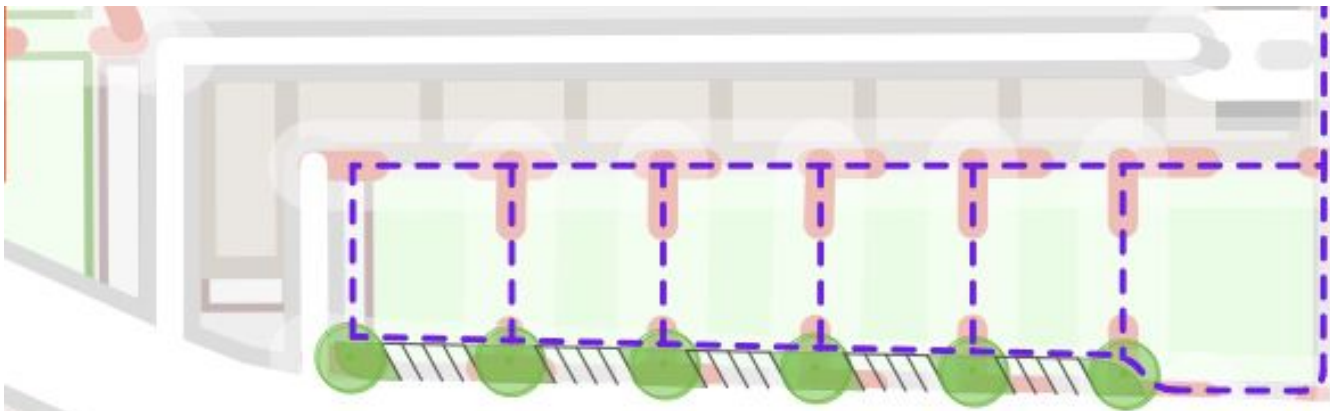
Lerchenfelder Hauptplatz





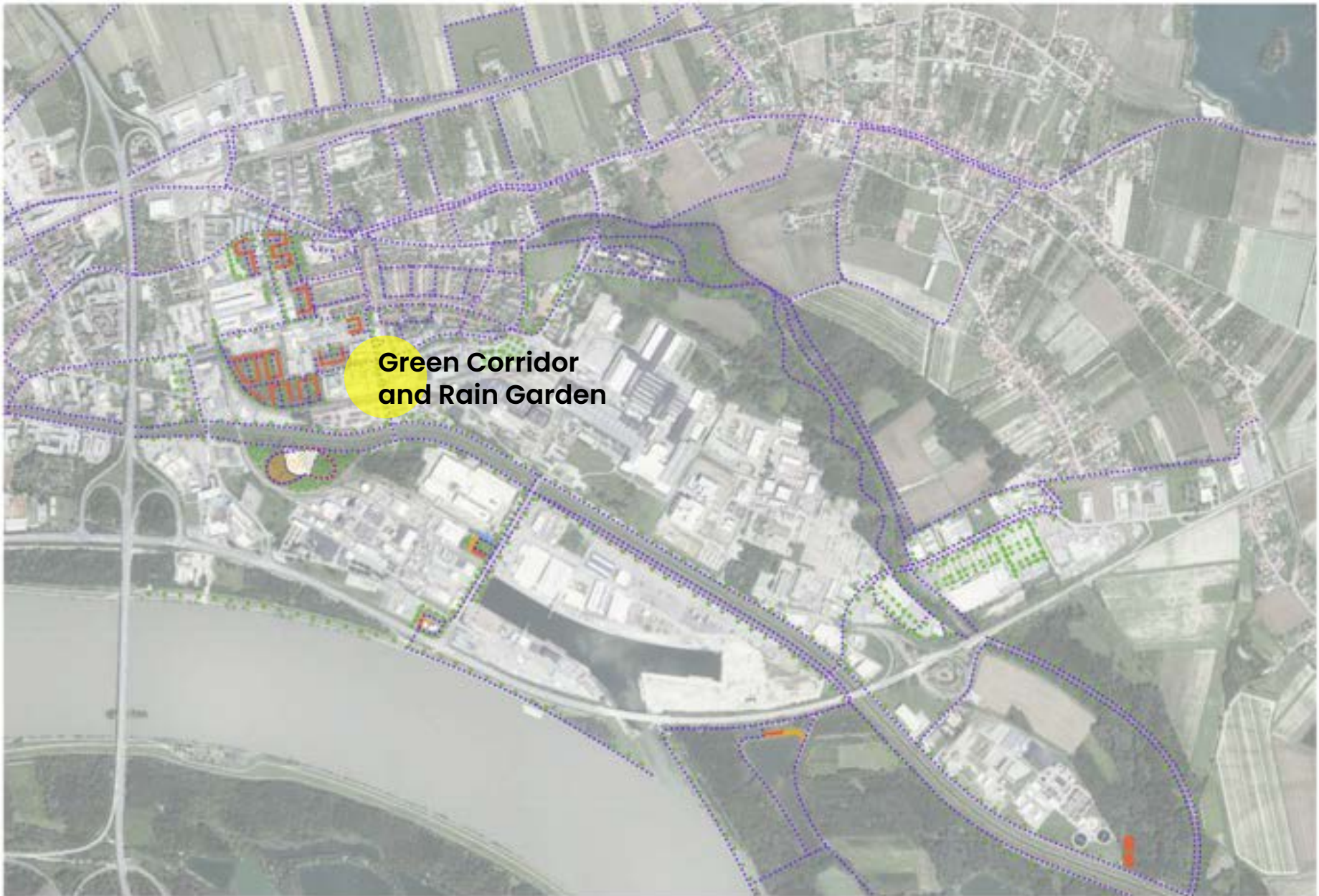












**Green Corridor  
and Rain Garden**







volkshilfe.

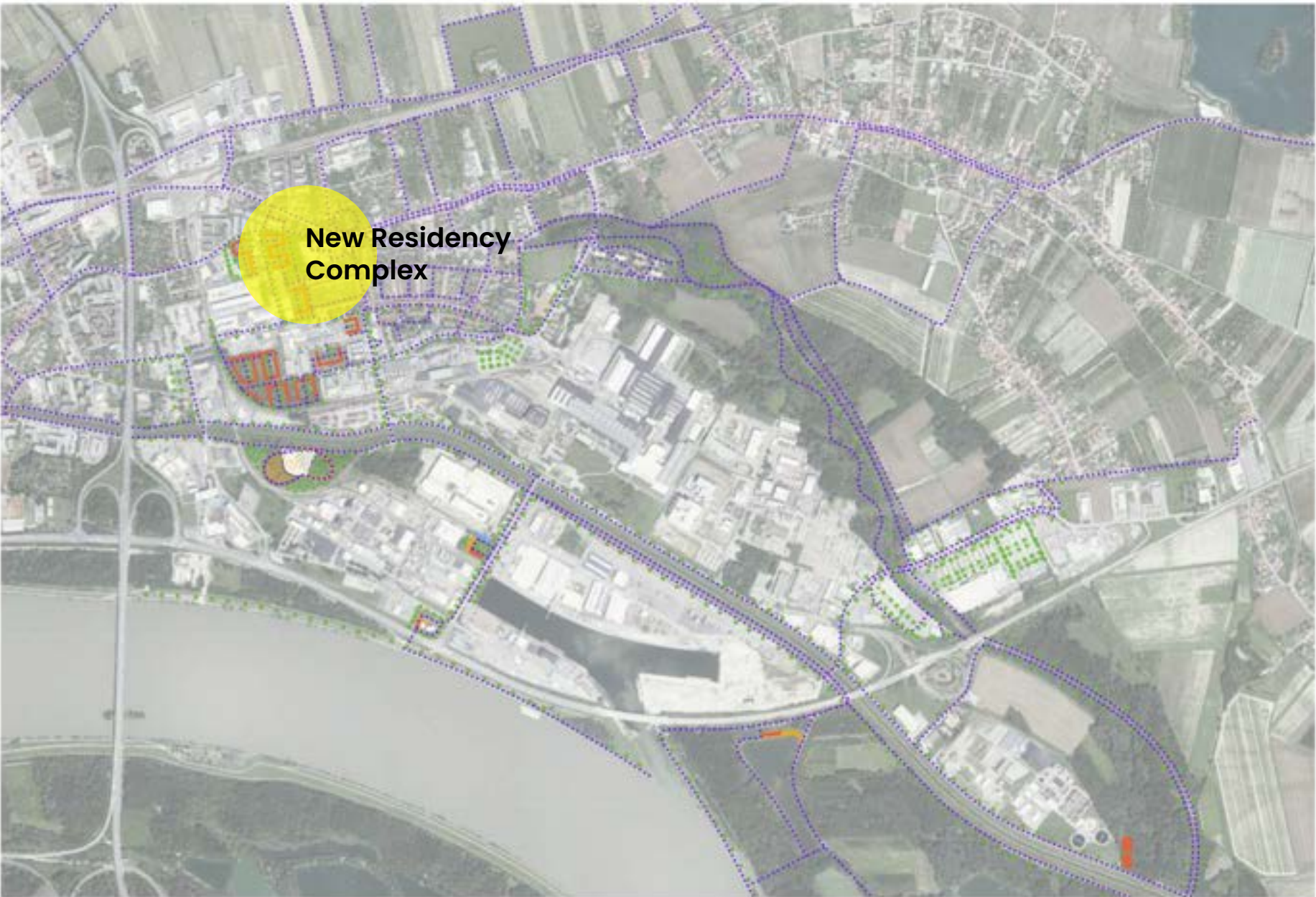
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**New Residency  
Complex**

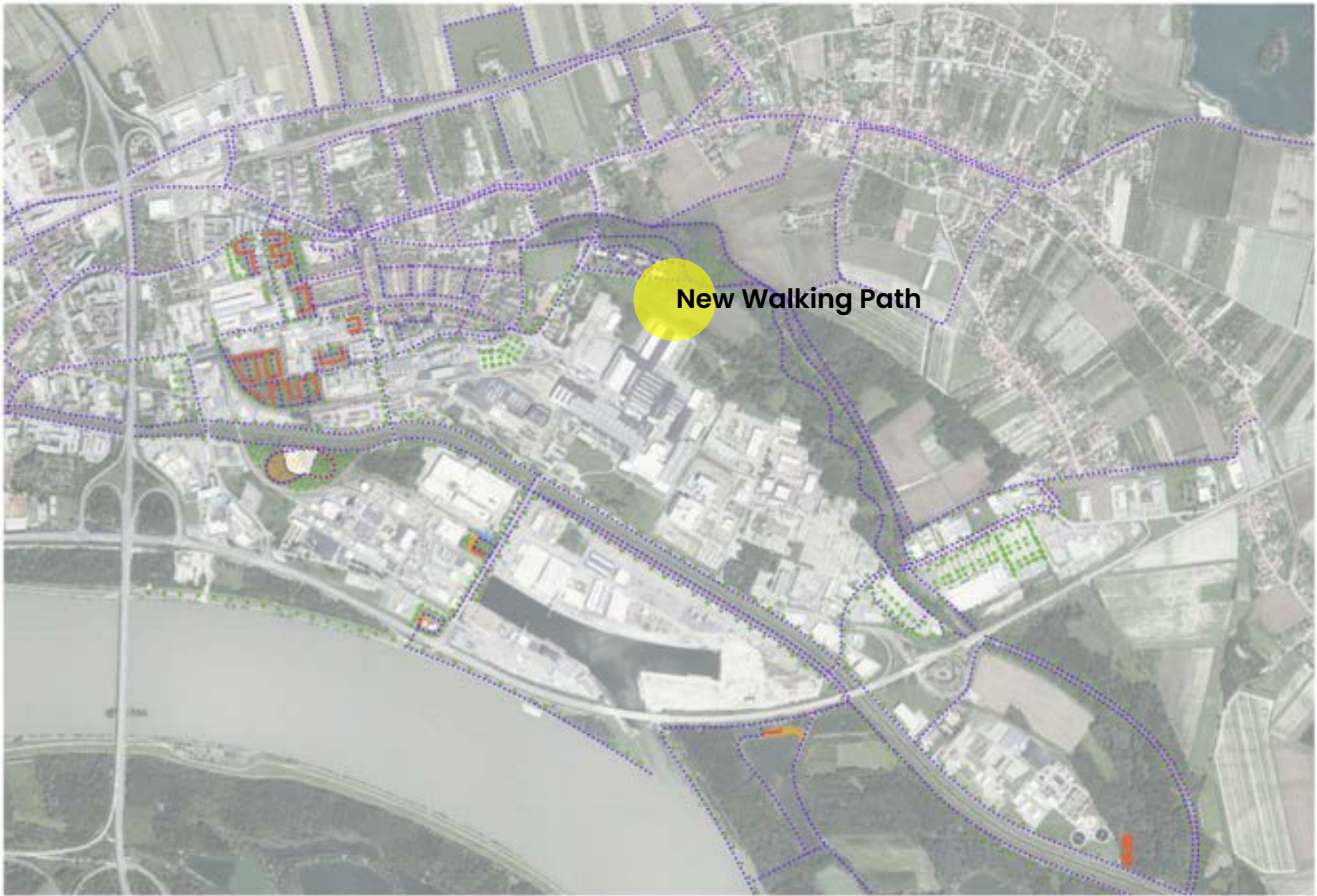




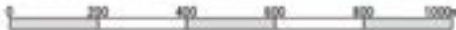








**New Walking Path**

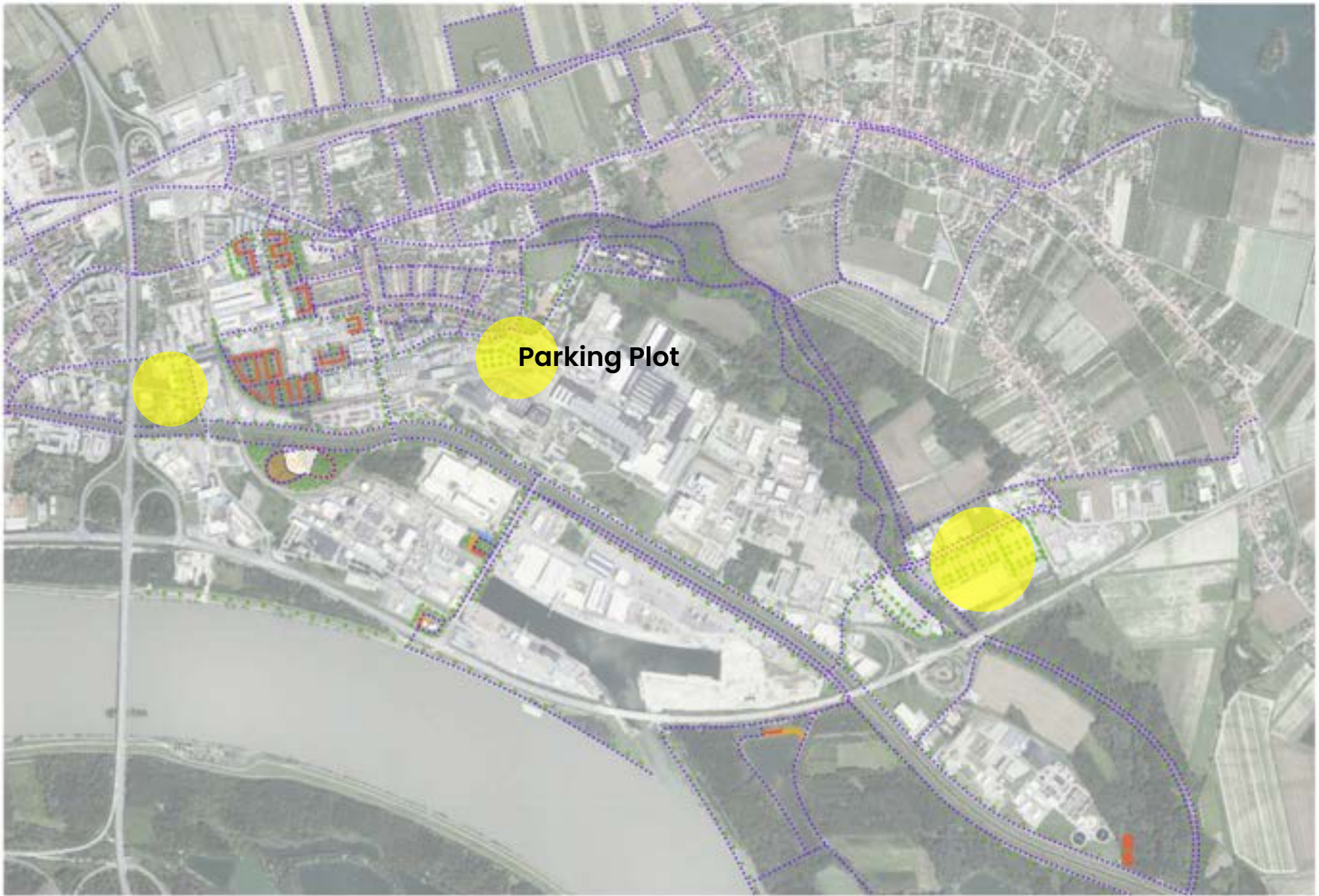










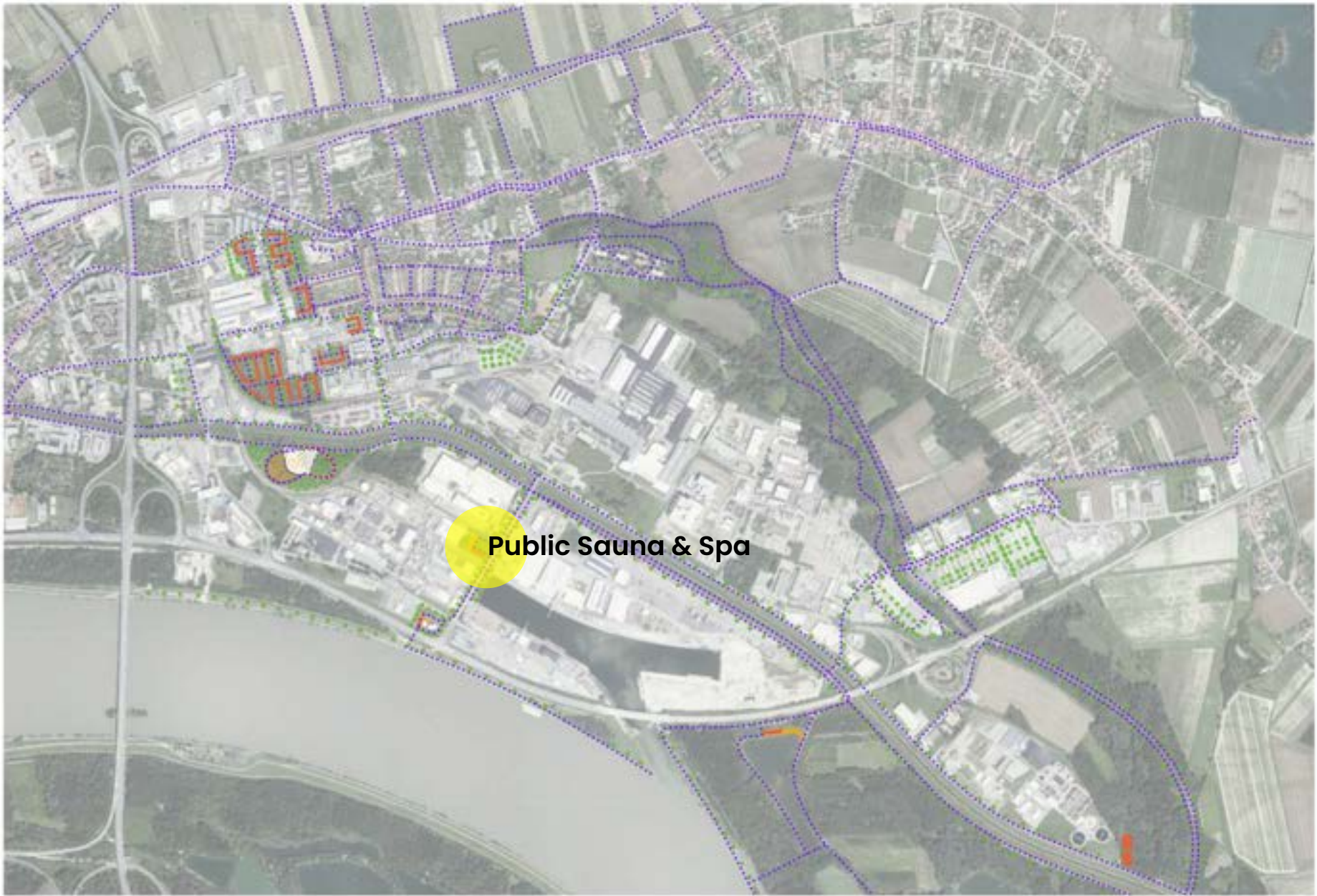


Parking Plot









**Public Sauna & Spa**

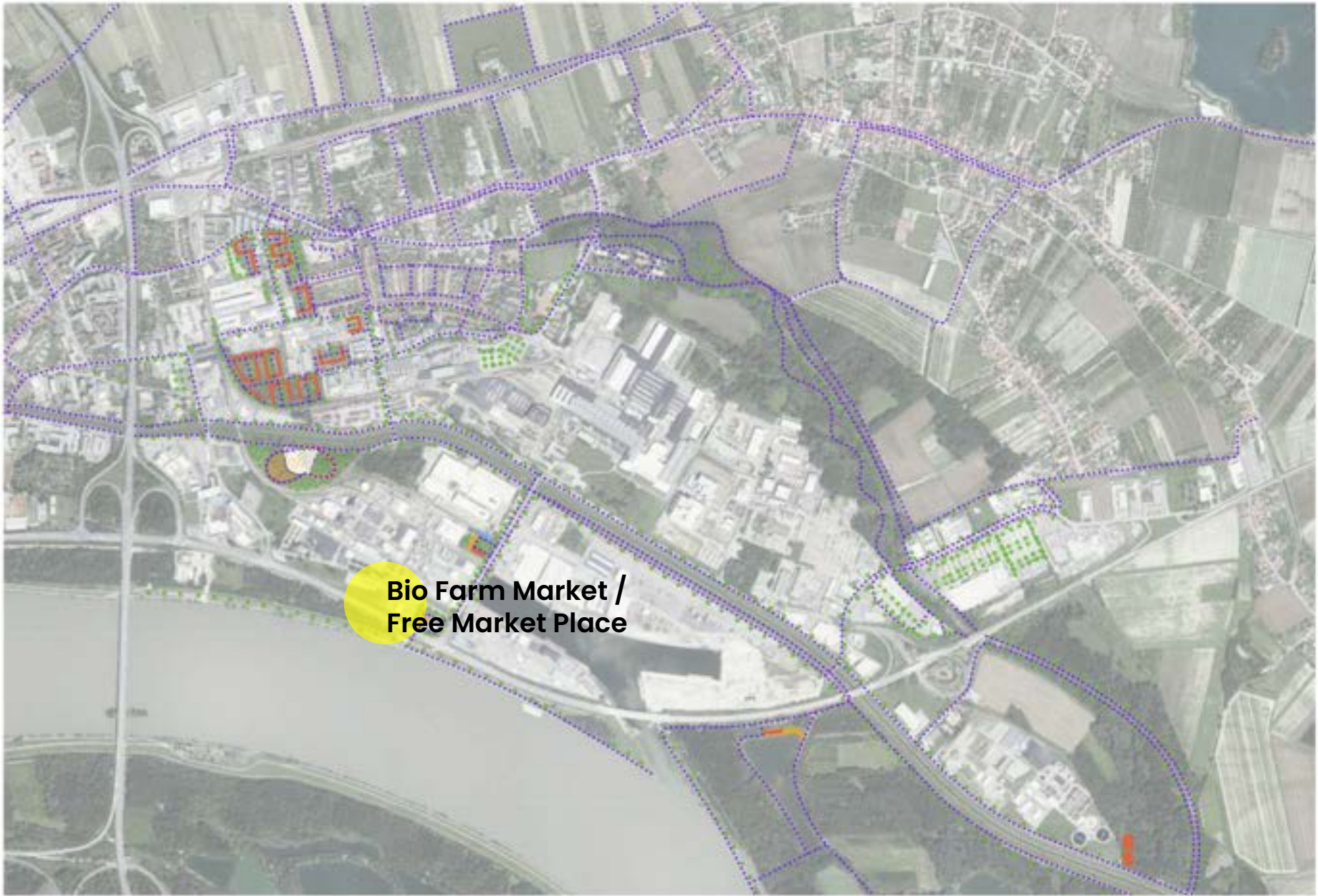












**Bio Farm Market /  
Free Market Place**









nstraße

Stoc

















## Conclusion





## Special Thanks

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**Ewald Sacher**      **Volkshilfe NÖ**

**..and his family**

**Doris Molnar**      **GEDESAG**

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