

VALENCIA DE ALCÁNTARA / TEAM 3

HARVEST 4.0



European 13-14 Inter-Sessions Forum – Workshop

ARCHITECTURE TO THE RHYTHMS OF CITY AND NATURE

To arouse interactivity at the European level, European and the Junta de Extremadura invited the E13 winning teams (winners and runner-up) for 4 days to consider and design scenarios on the E13 session topic –“The Adaptable City”– applied to urban contexts in the Region of Extremadura. Three urban situations were proposed for the Workshop, all three located in 2 nearby towns – Olivenza (with 2 sites) and Valencia de Alcántara.

In a region like Extremadura, with almost 75% villages of less than 2,000 inhabitants, the city-nature relation is everywhere. Nothing can be done without considering the presence of the rural environment, which has generated enough activity for the urban poles to develop. Still, along the years, the influence of the countryside has gradually (if not drastically) vanished, impacting on the urban spaces which therefore were deserted. So how to regenerate the urban structure through the revitalisation of urban fragments? How to consider today the limit between city and countryside? And how to take back the urban space through new rhythms and uses?

**European
Junta de Extremadura
E13 Winning Teams**



VALENCIA DE ALCÁNTARA // USES & RHYTHMS

How Can Urban Rhythms Be a Motor for Urban Reappropriation?

“How Can Urban Rhythms Be A Motor For Reappropriation” was the question for Valencia de Alcántara, a rural town of roughly 6,000 inhabitants, 80 km West of Cáceres and North of Badajoz. The spatial opportunities were very clear, as the Junta de Extremadura asked for inspiring concepts for the city as a whole and especially for a number of vacant or largely underused buildings in the centre – a former slaughter house, a cultural centre, a foundation buildings almost in ruins, and the fortress that overlooks the town.

The rhythms were to be found in the imbrications of scales, from the architectural to the urban and regional, against the backdrop of elsewhere also well-known problems, such as a declining economy, the rural exodus, the demographic change and the question of the future of agriculture. The teams tried to engage dynamic interactions between the conceptual approach, the local situation and the different actors & stakeholders, and to transpose them in a storyboard, from macro to micro scale, and vice versa.



HARVEST 4.0

USES & RHYTHMS – URBAN REAPPROPRIATION



“Harvest 4.0” takes Valencia de Alcántara as a case study for a shrinking town in a rural environment. A new economic system, based on an alternative food production, takes the existing space resources to develop a toolkit for activation. The authors imagine new forms of production as a superimposition of additional layers on the existing, resulting in a sort of hybrid agricultural landscape, linking the topic of food with other economic or cultural activities. There is also an attempt to investigate in a specific local potential, mixing cutting edge technology and a rural environment: drones could for example help to harvest the cork to be used to develop innovative materials.

PARTICIPANTS

Tomas ASSVED HJORT (NO), Kari TØNSETH (NO),
Winner in Bergen (NO) with “Our City, Our Collective”
Jonathan CACCHIA (FR),
Runner-up in Marne-la-Vallée (FR) with “La Déprise”
Gloria CASTELLINI (IT),
Winner in Trondheim (NO) with “The False Mirror”

Carlos ZARCO (ES), Zuhair KOL (TR),
Winner in Zagreb (HR) with “Swap on the River”
Runner-up in Streefkerk (NL) with “Protodike”
Joana TRIL (ES),
Runner-up in Irún (ES) with “Ura Eta Natura”

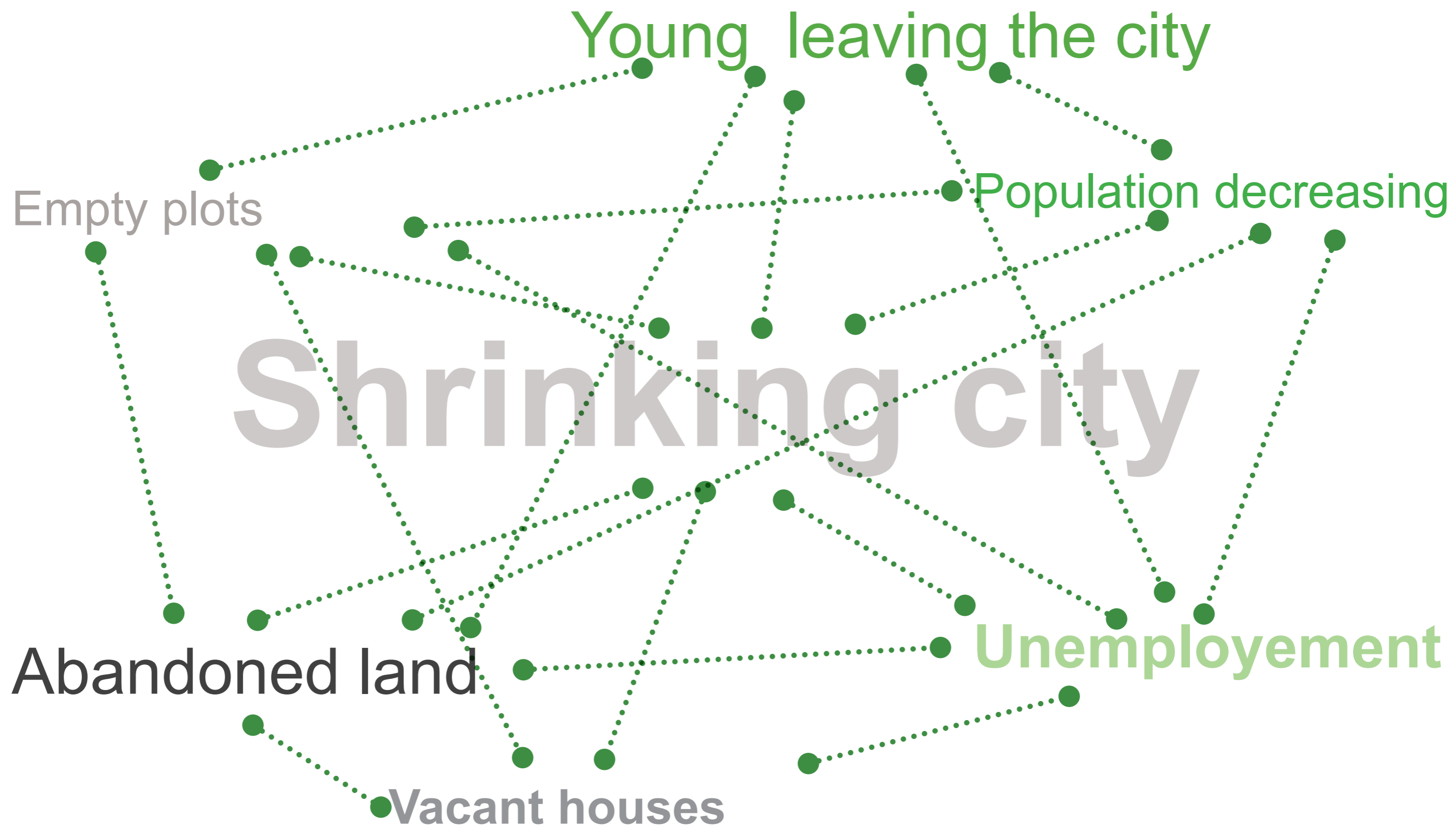
Francesca OGGIANO (IT)
Winner in St-Pölten (AT) with “Ju(mp) in the Water Kiss That Frog”
Runner-up in Azenha do Mar (PT) with “Second Lines”
COACH: Jens METZ (DE)

Harvest 4.0

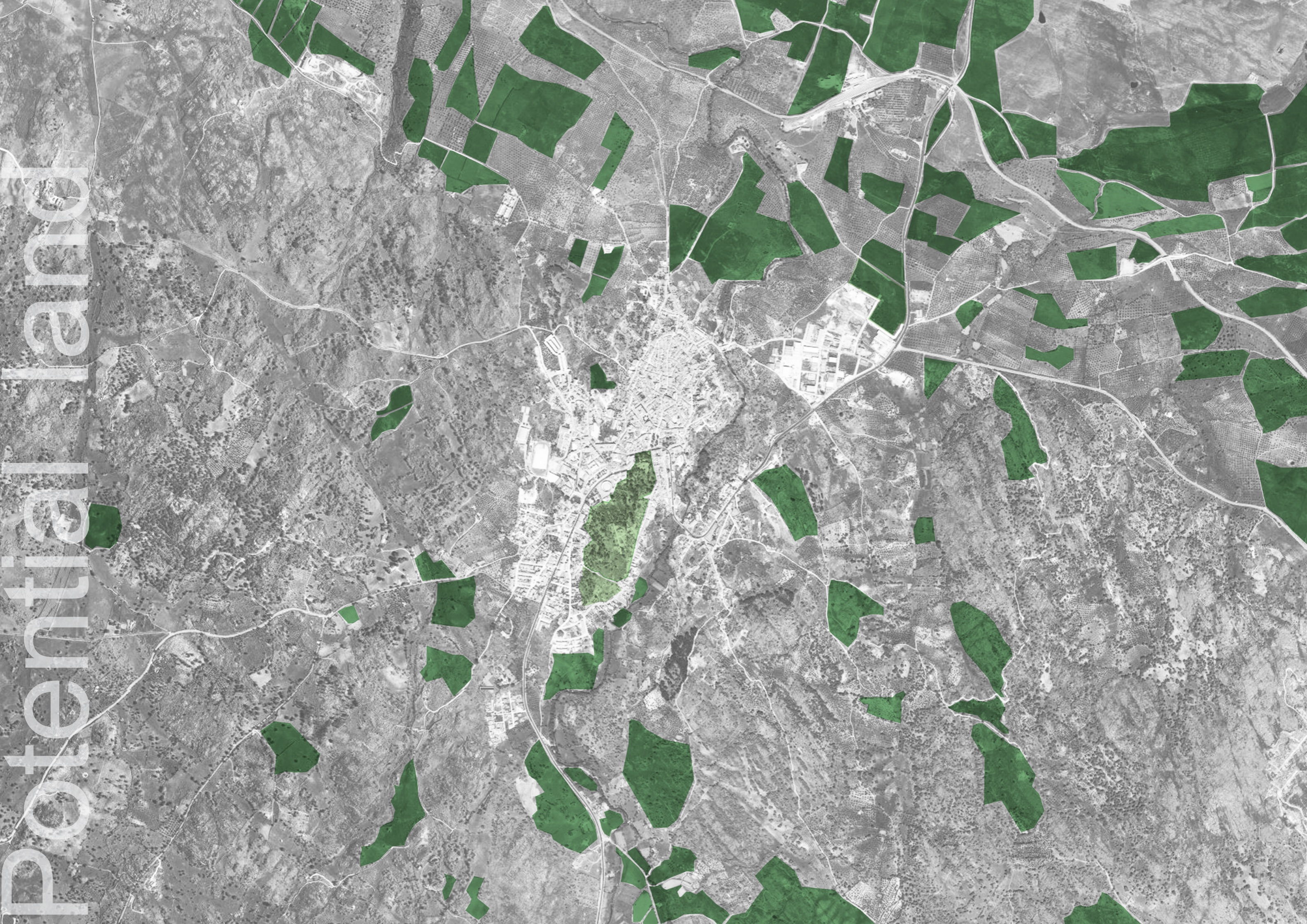
Valencia the Alcàntara as a case study of shrinking town



Problems



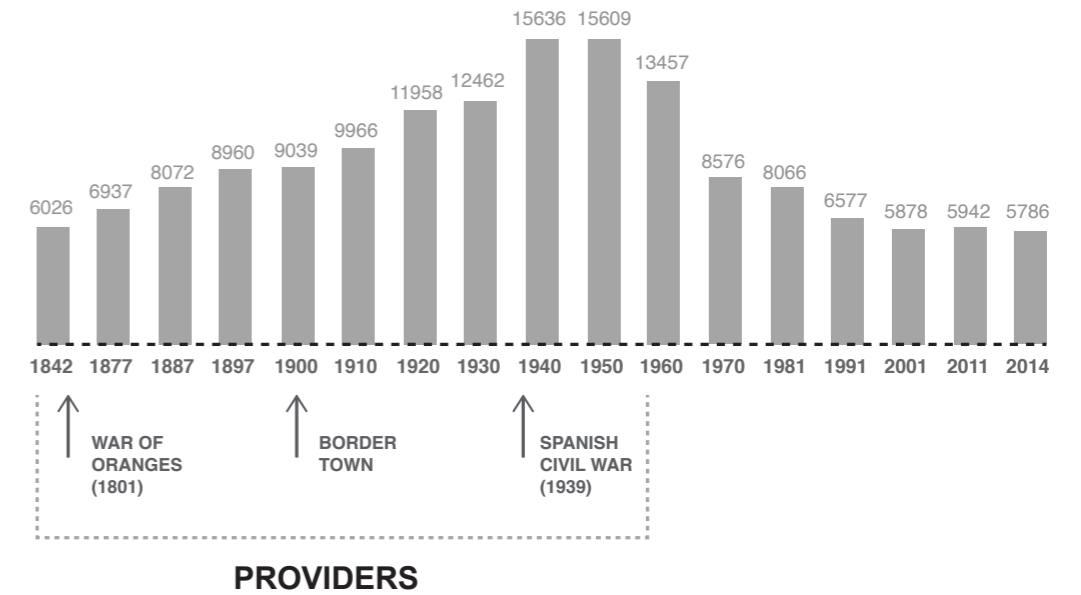
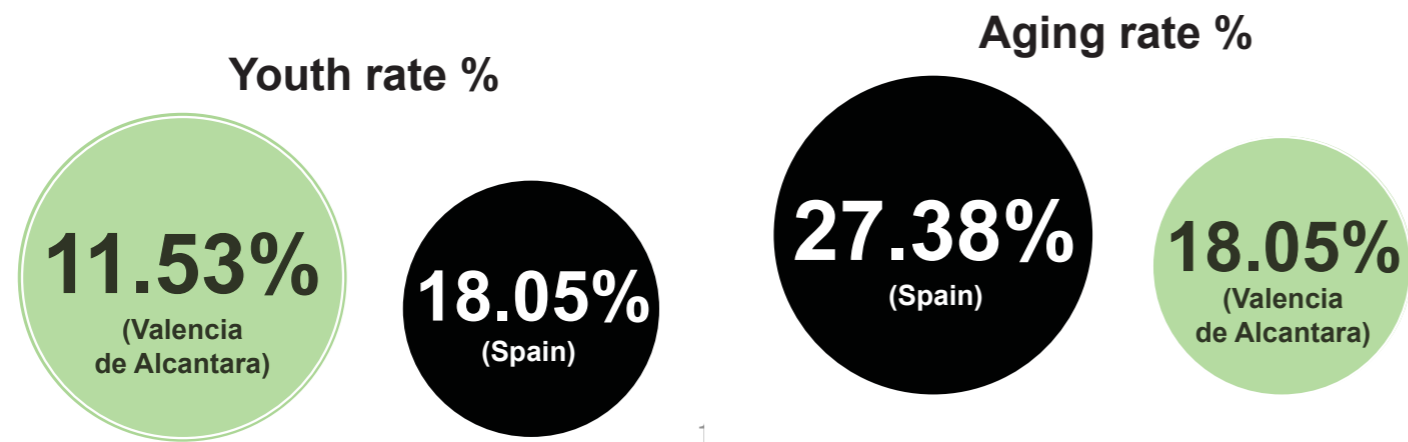
potential land



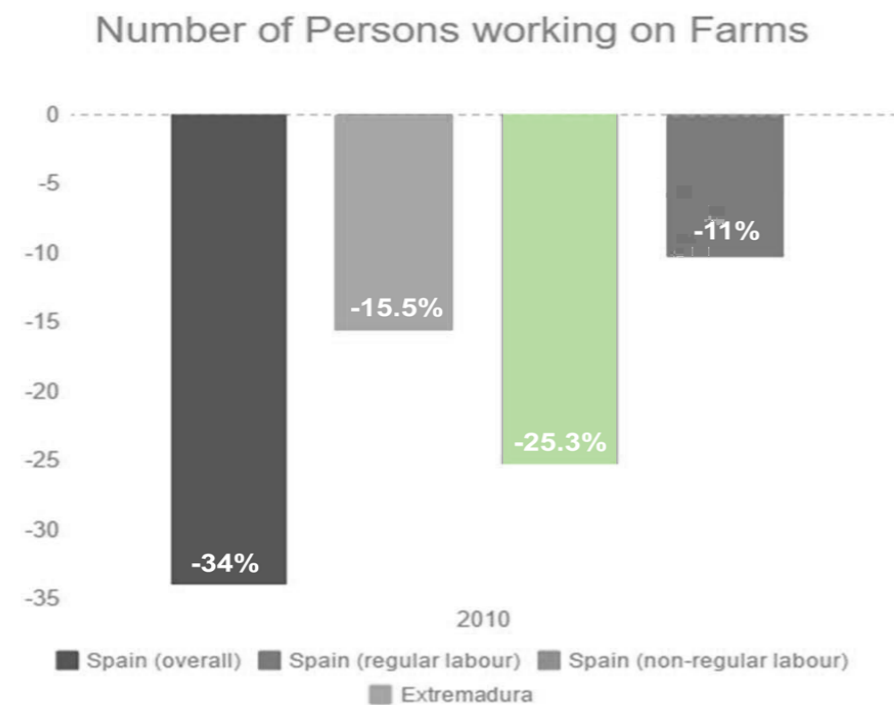
Vacant houses



Population

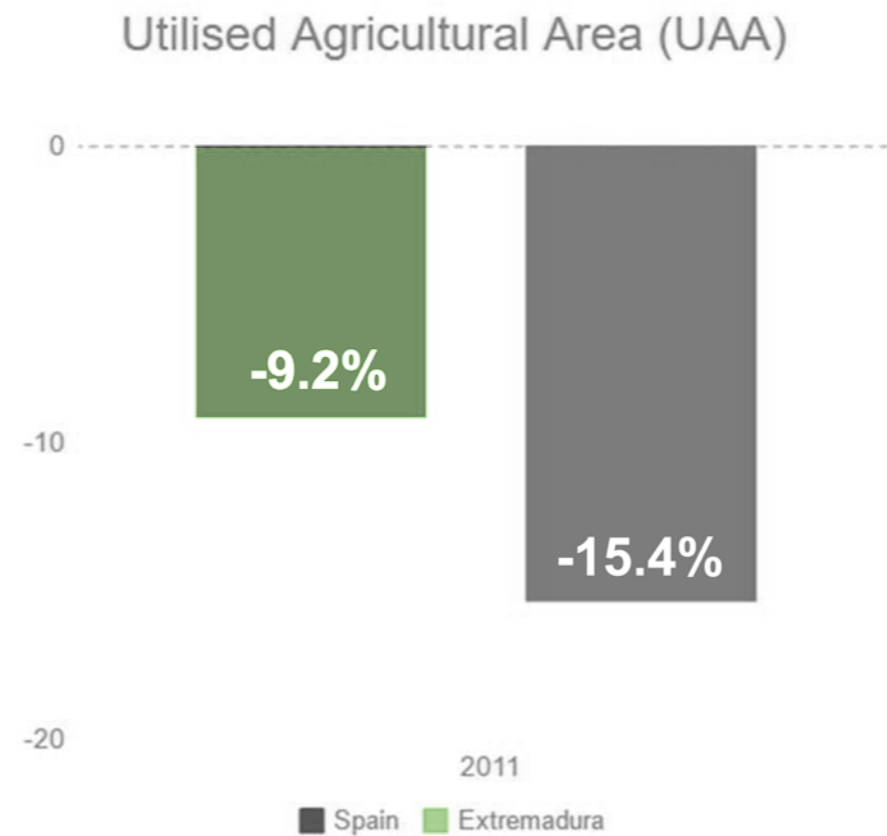
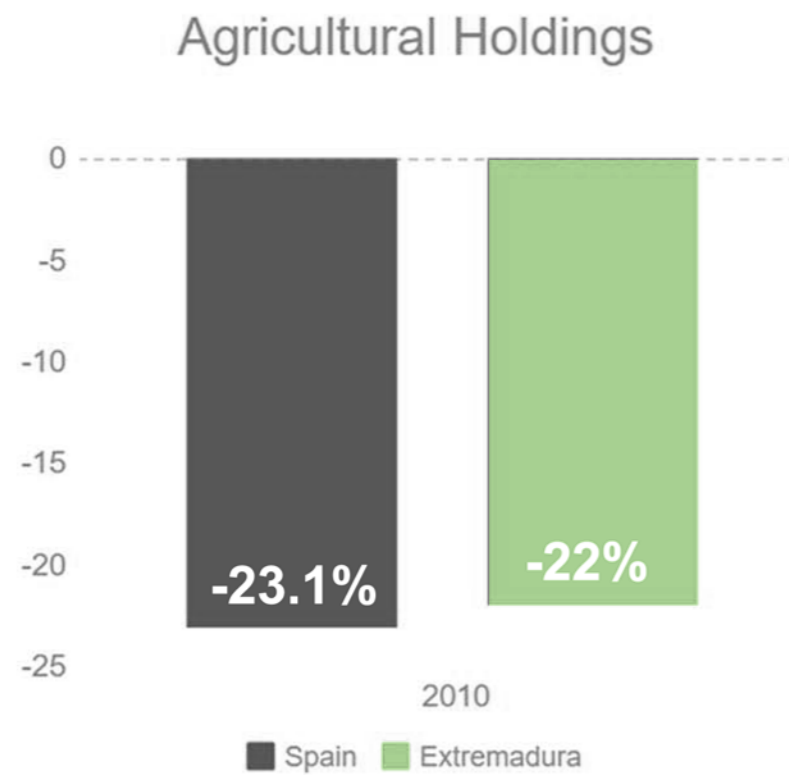


Unemployment

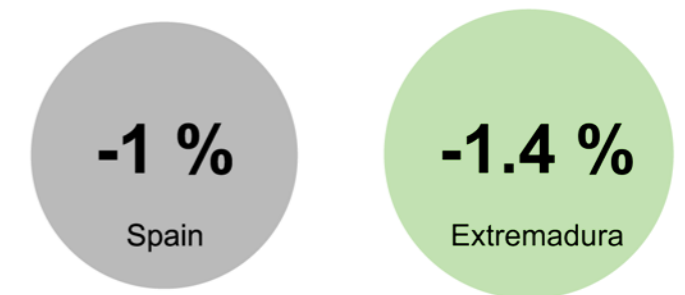


The number of persons working on farms has nearly halved in 'La Rioja' between 2000 and 2010 (-45.8 %); another four northern Spanish regions display decreases of between 30 % and 40 %. This decrease concerned both the regular labour force (-15.5%) and the direct labour force employed on a non-regular basis (-25.3 %).

Agriculture and livestock

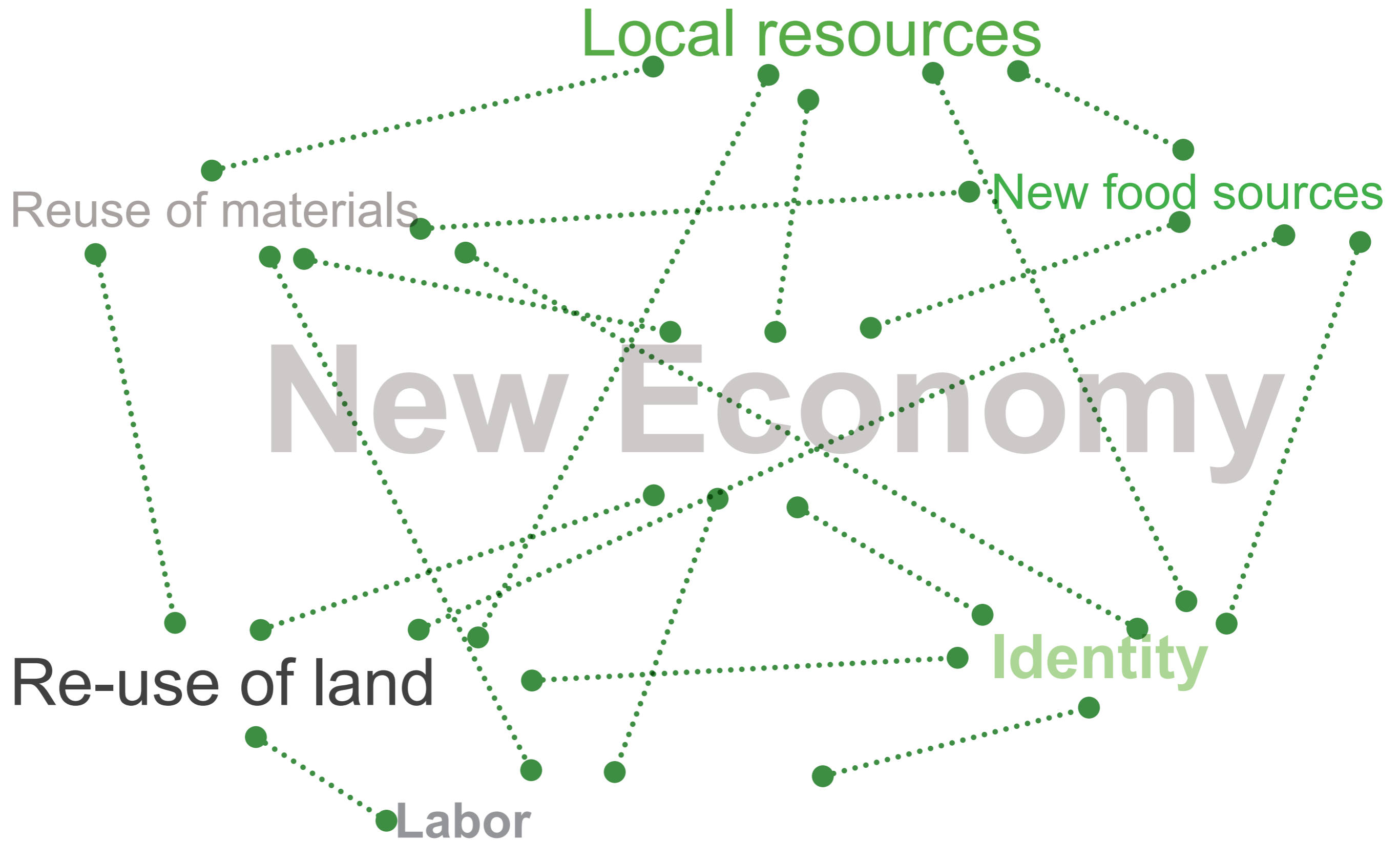


Livestock change

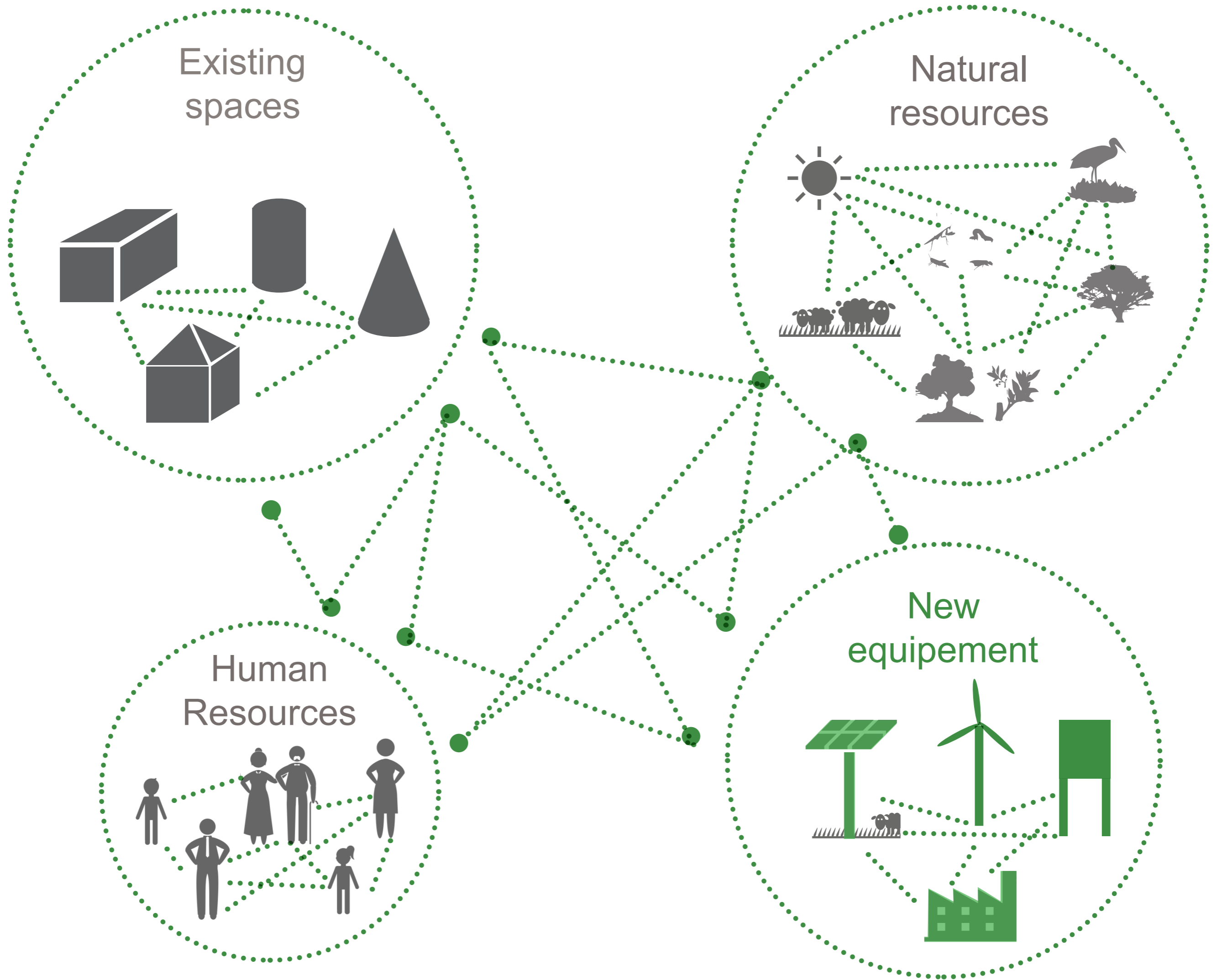


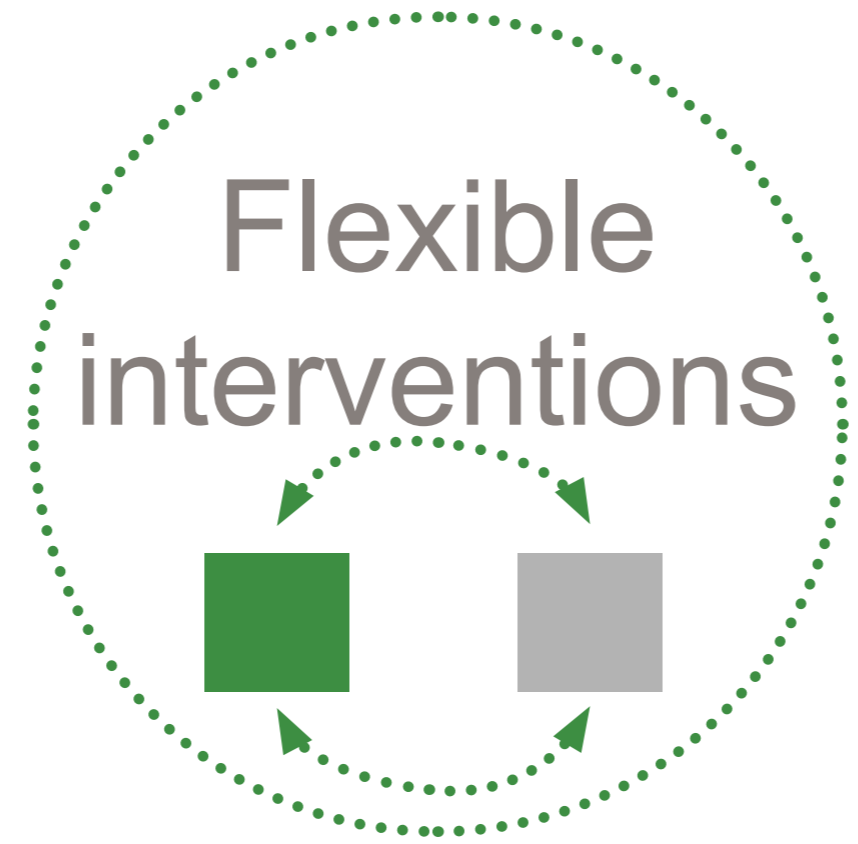
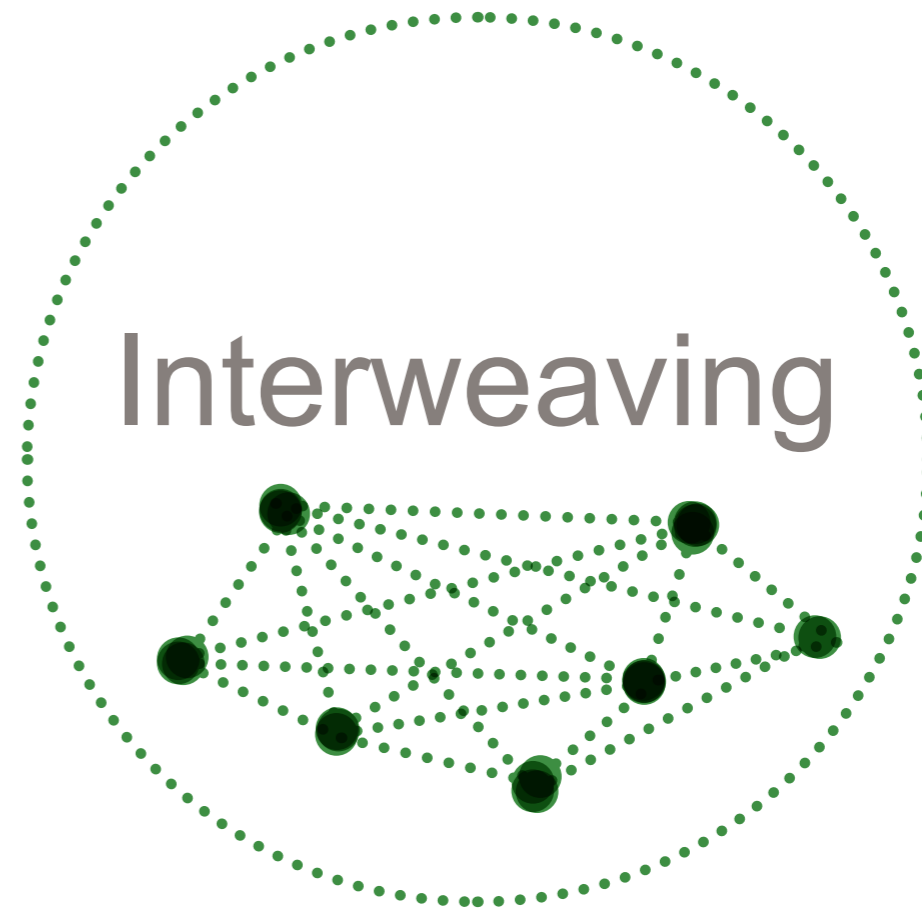
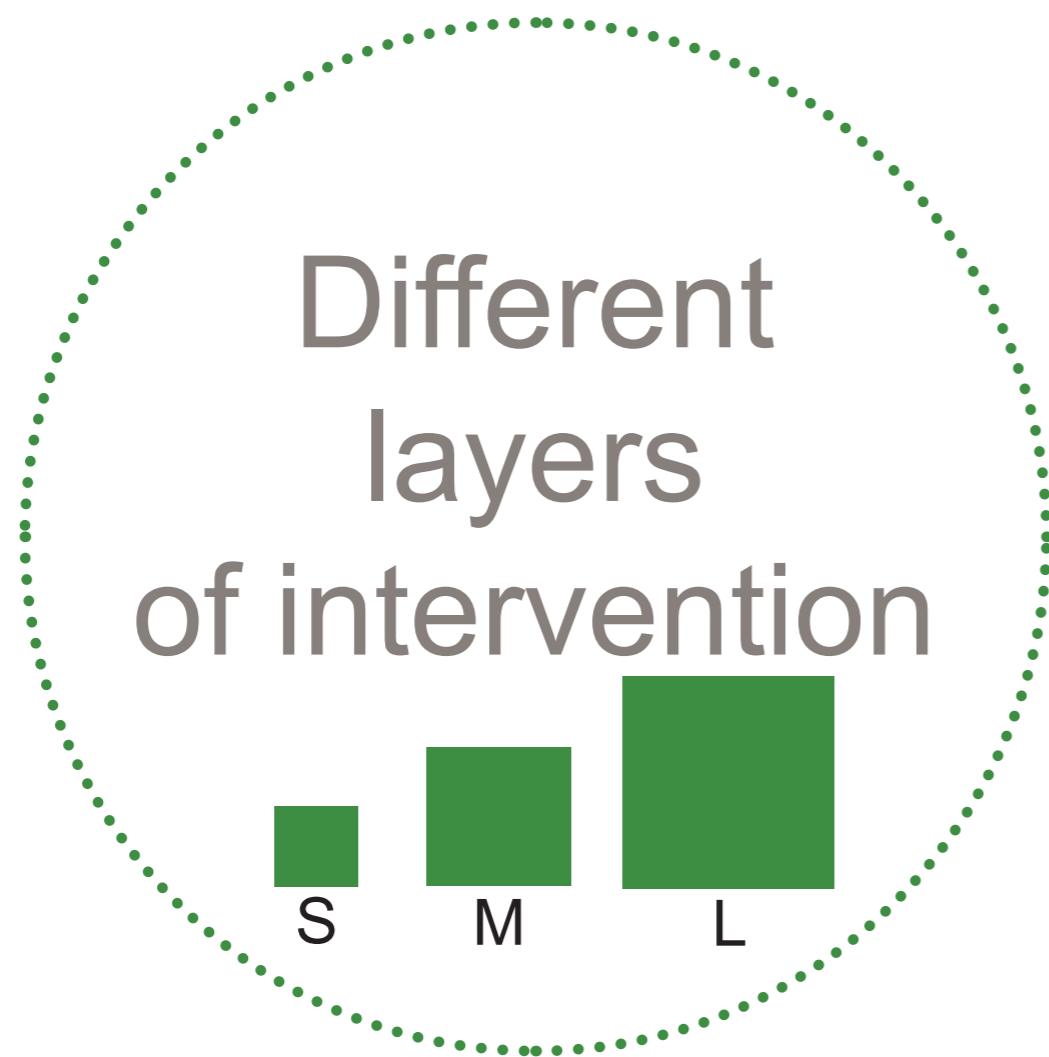
Although the Utilised Agricultural Area (UAA) in Spain experienced a decrease of 9.2 %, the overall Spanish livestock did only marginally change and amounted to 14.8 million LSU in 2010, a 1 % decrease when compared to 2000.

How?

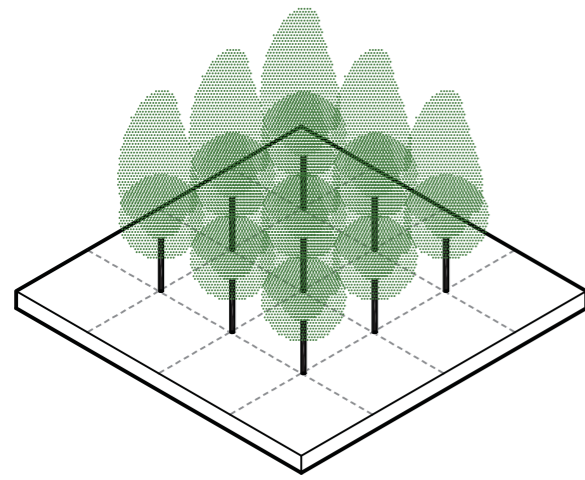


New economy

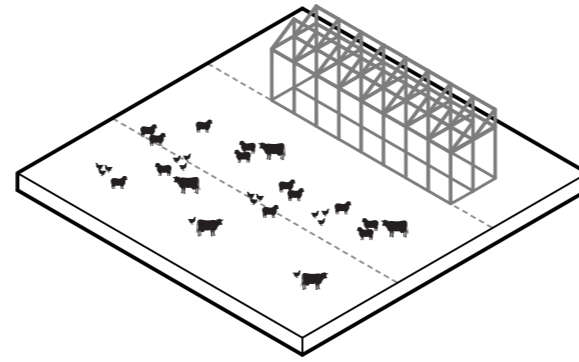




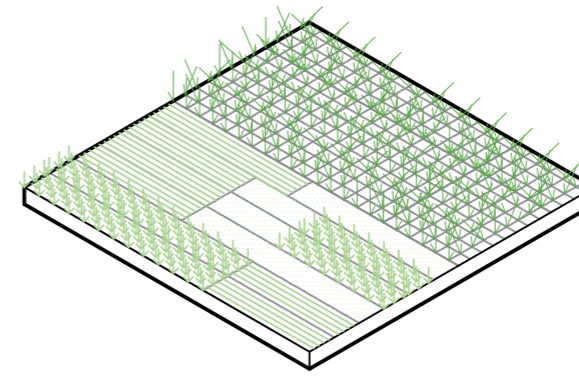
Existing
Landscape



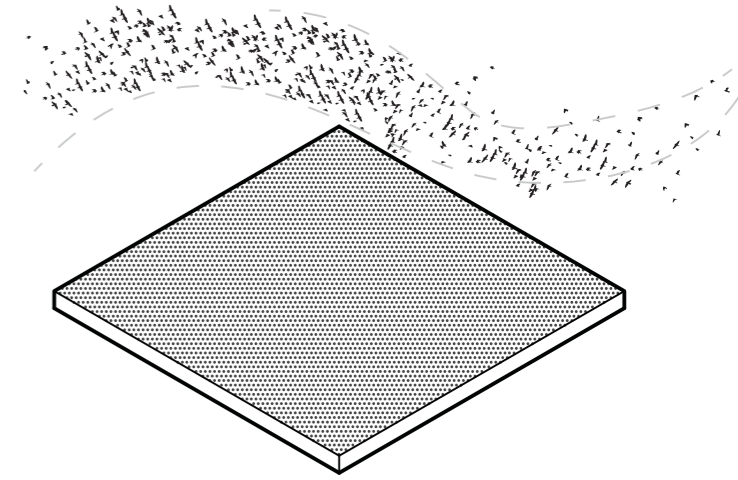
olive and cork fields



animal farming

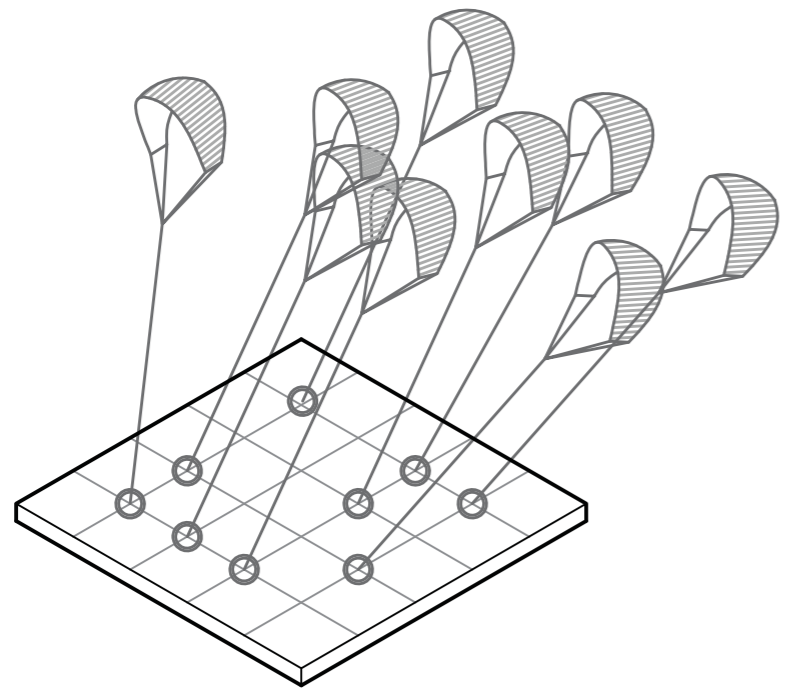


rice and maize fields

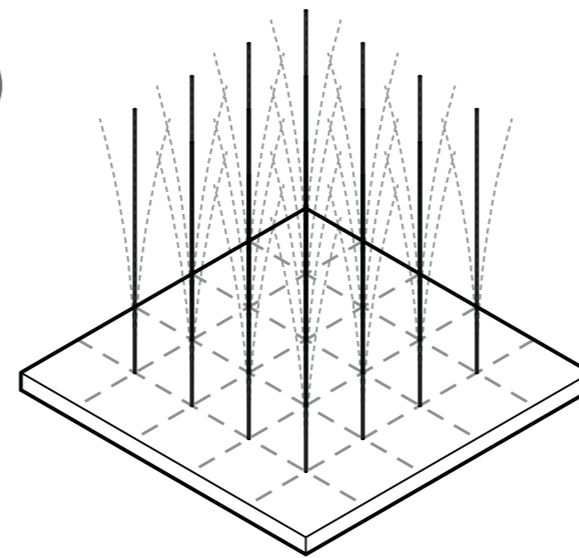


local/regional bird flocks

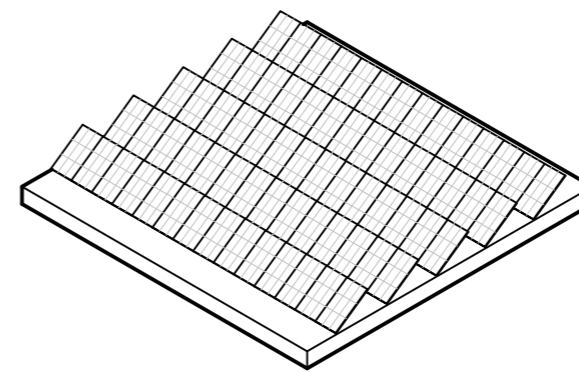
Productive
Landscape



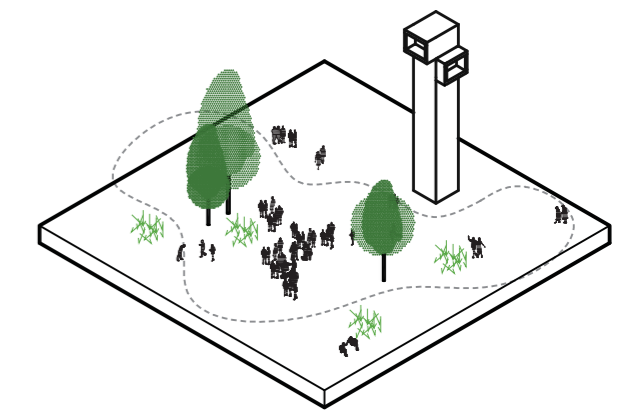
kite fields
(wind power)



stalk fields
(wind power)

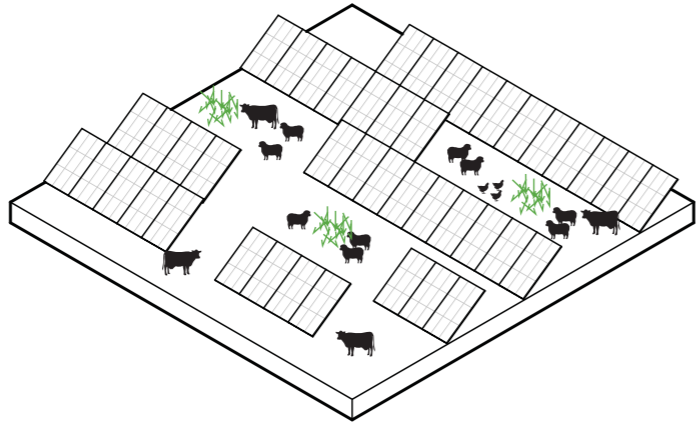


solar fields
(sun power)

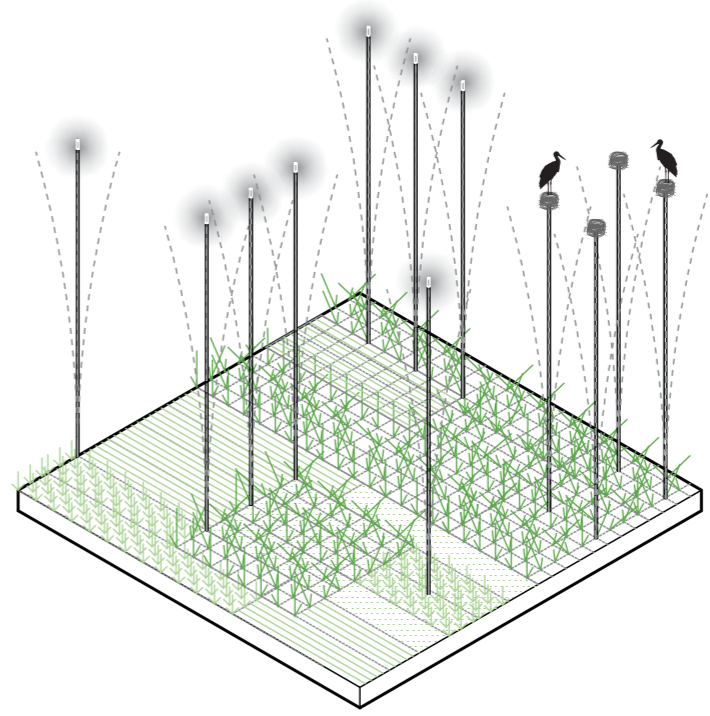


leisure activities

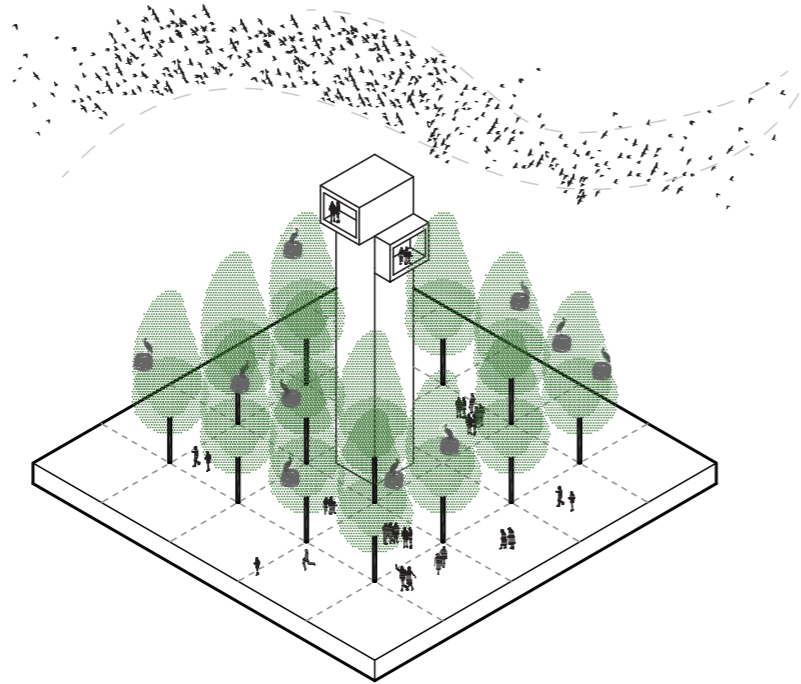
Hybrid Landscape



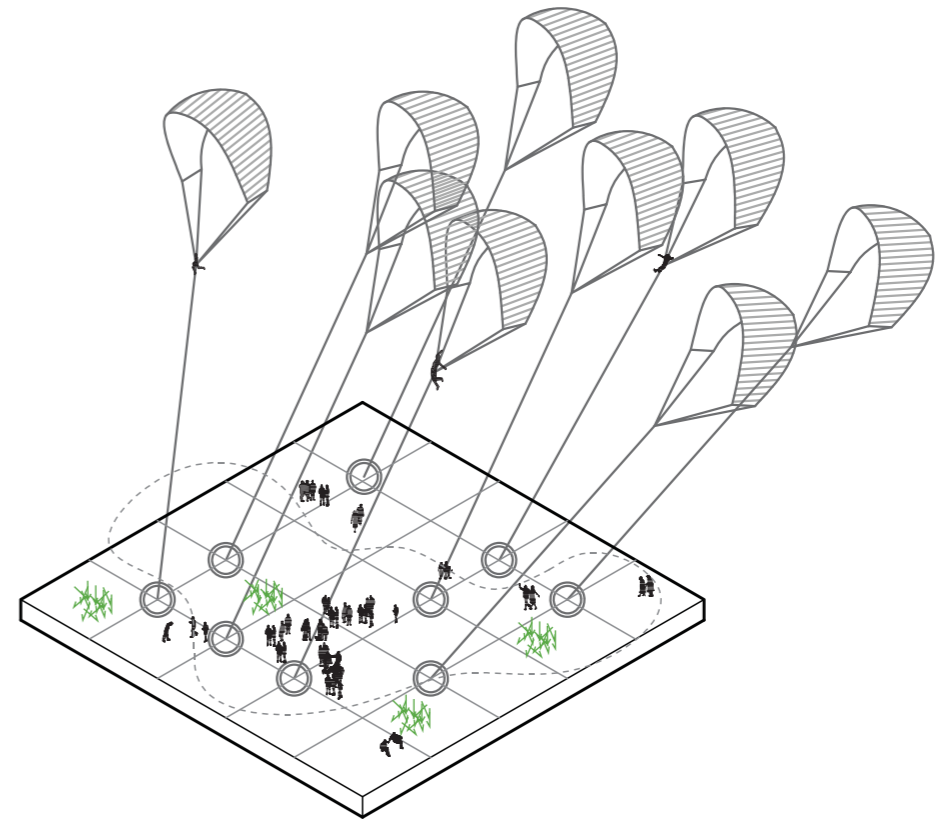
Solar farm
+
Animal farm



Rice and Maize fields
+
Windstalk fields
+
Bird nesting habitat



Solar farm
+
Animal farm



Rice and Maize fields
+
Windstalk fields
+
Bird nesting habitat

Hybrid Landscape

Pilot Land 2

Existing features:

Flexible flat area
Location on an air channel
Good sun exposure

Potential Implementations:

Wind & Sun energy production
Stork nesting
Animal farming
Rice & Maize fields

Pilot Land 3

Existing features:

Entrance to the city
Proximity to the industrial area
Location on an air channel

Potential Implementations:

Wind energy production
Public park
Kite fields

Pilot Land 1

Existing features:

Higher altitude
Nutritious sedimentation
Existing tree environment

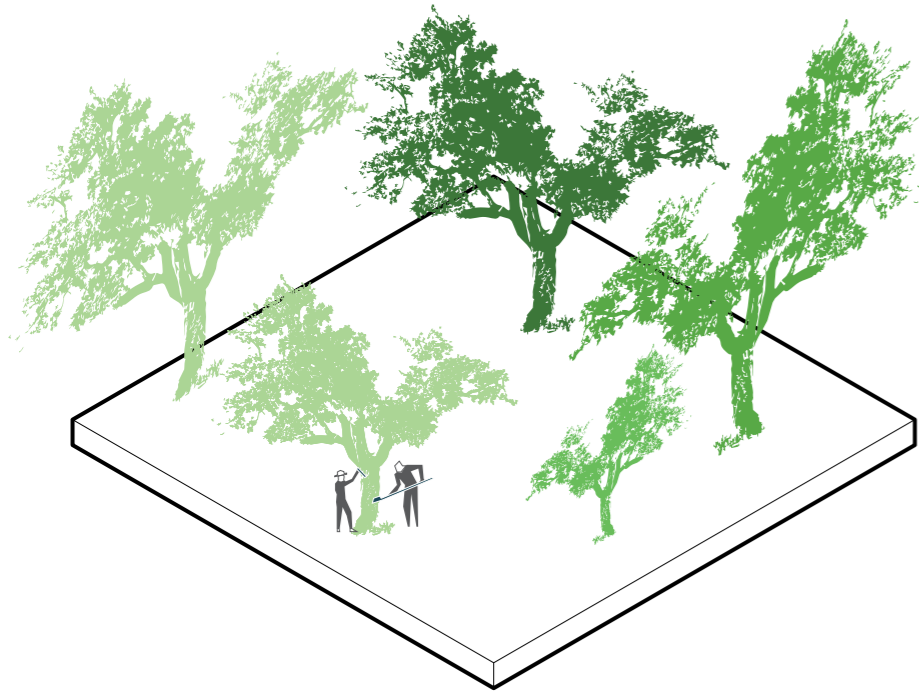
Potential Implementations:

Bird observation park
Cork & Olive production
Bird nesting

In-between Rural land

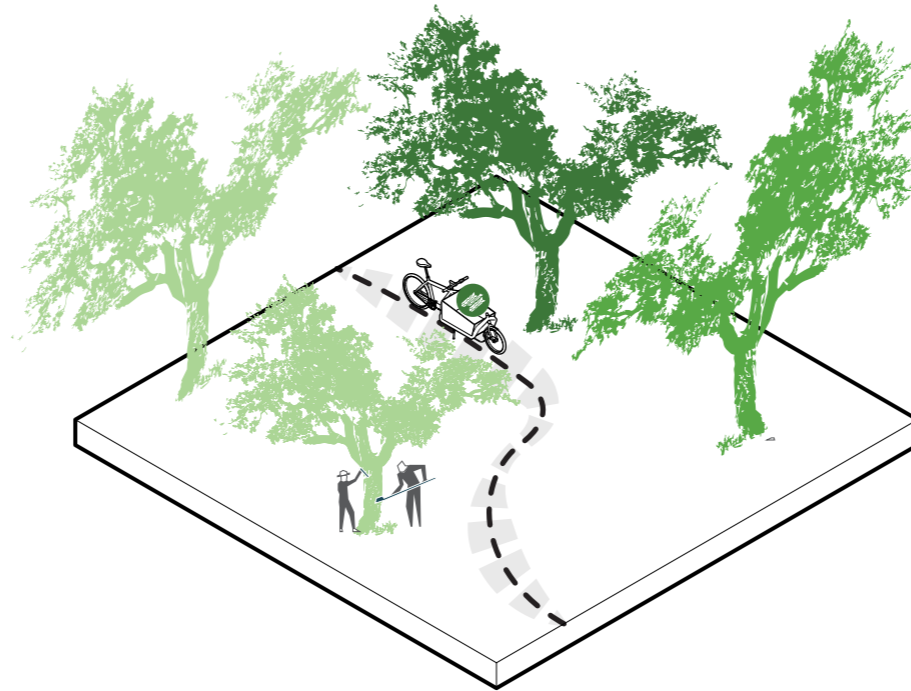
Cork production is regarded as an environmental friendly production of wood material with cork just being extracted from the tree without cutting the trees down, the extracting has a low carbon footprint being highly based on manual labour and the forests play an important role on the Iberian peninsula, preventing desertification and being home to several endangered species.

Today cork is mainly produced for the wine bottle market (60 %) maybe new innovative ways of using the cork can spark a new industry in Valencia de Alcántara?



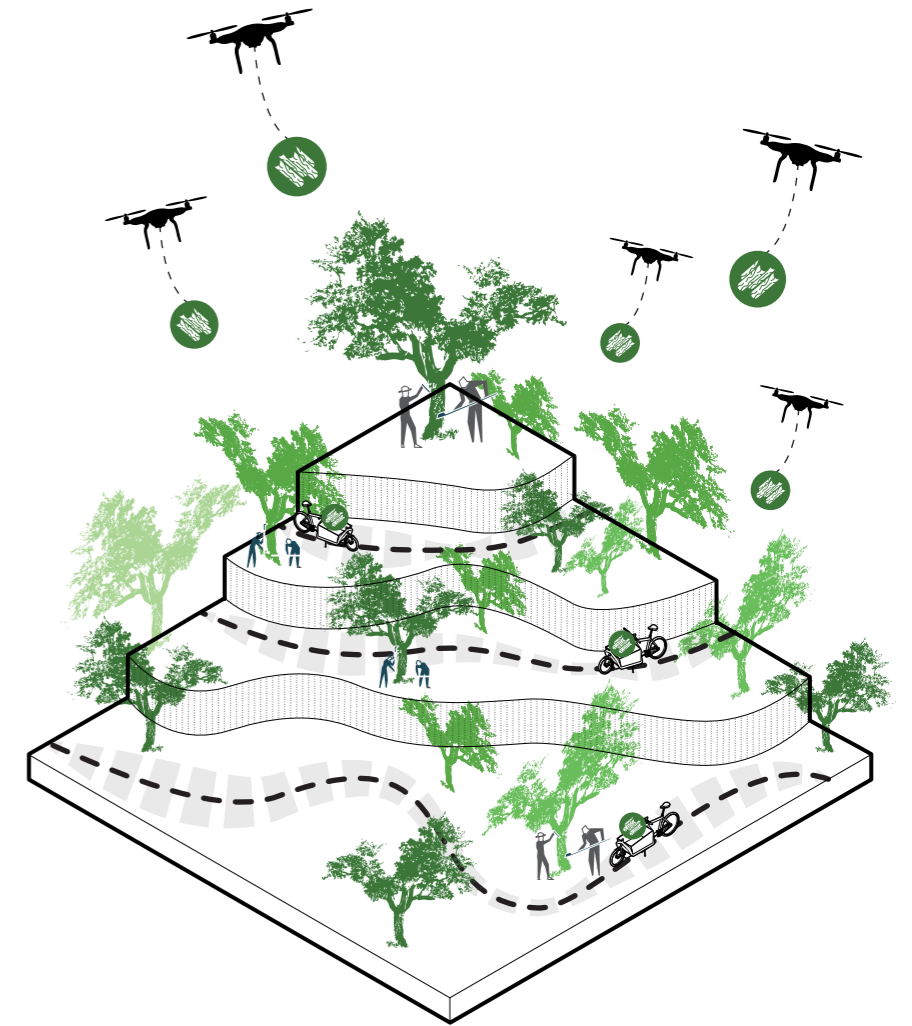
Cork harvesting:

Cork is manually harvested by skilled "extractors". A tree is harvested every nine years and can yield cork wood for up to 300 years. The extracting is labour intensive since the cork woods are not accessible to large technical vehicles and it requires a certain touch and skill to extract the cork without damaging the tree.



Introducing new helpers:

Maybe the cork extracting business could be available to a wider range of people with a little help from some automated friends. Like electric cargo bikes and drones could ease the transport of the cork material out of the woods and make it easier for the workers to travel into the woods.

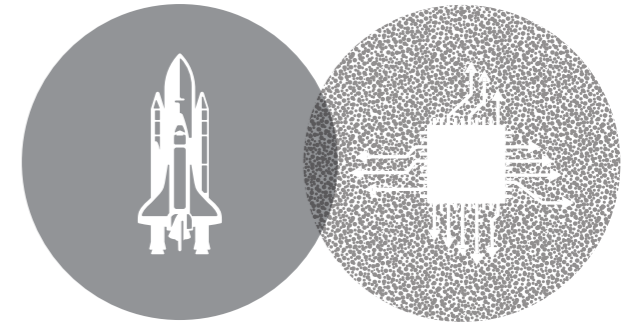


A new spring in the woods:

The new way of transport in and out of the cork woods could make cork production possible in more difficult terrain. Or even make it possible to cultivate the terrain in new topographic ways to generate more land surface for trees to grow. The new terrain could be adapted to make good habitats for species living in the cork woods as well.

In-between

Rural and urban

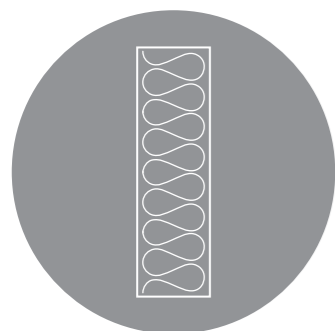


Putting the VdA cork on the map:

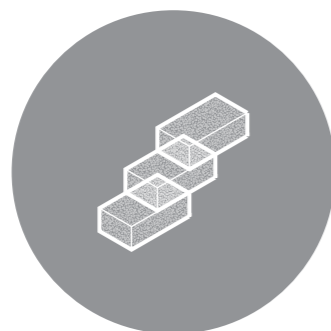
Cork has been carefully researched the last years as a material with extreme abilities like it's ability to repel water and to not deform when exposed to high temperatures. This has led to the making of composite materials containing cork to be used in components in space crafts. Maybe VdA could facilitate a factory/research centre exploring the high tech potential of the local cork and attracting a workforce with high competence.

Cork factory:

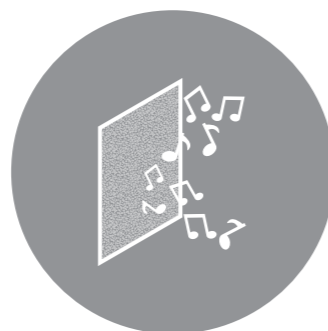
On the larger vacant lots within Valencia de Alcántara, there is a potential to establish small factories focusing on processing and refining **new** materials from the cork wood. Both materials wich can be used directly in VdA or high tech-materials which can be exported to the rest fo the world.



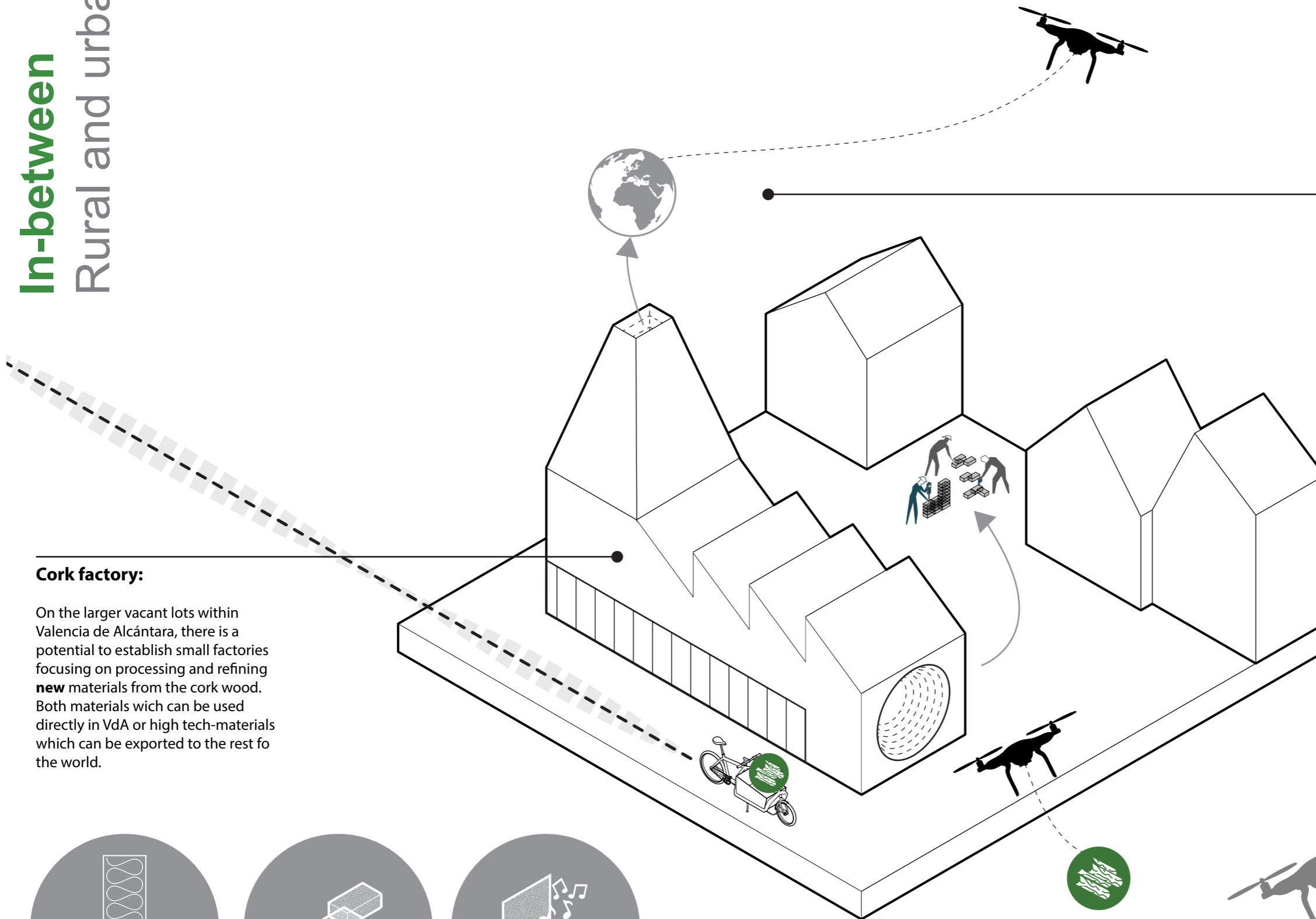
Clean,
environmental friendly
insulation



Lightweigh,
easy-to-handle
building bricks



Sound proof
wall cladding



Inbetween Rural

Pilot Land 5

Existing features:

Potential in-between land to establish production of the local resources in close relation to the city center

Potential Implementations:

Research facilities
Resource centers
Small scale production facilities

Pilot Land 4

Existing features:

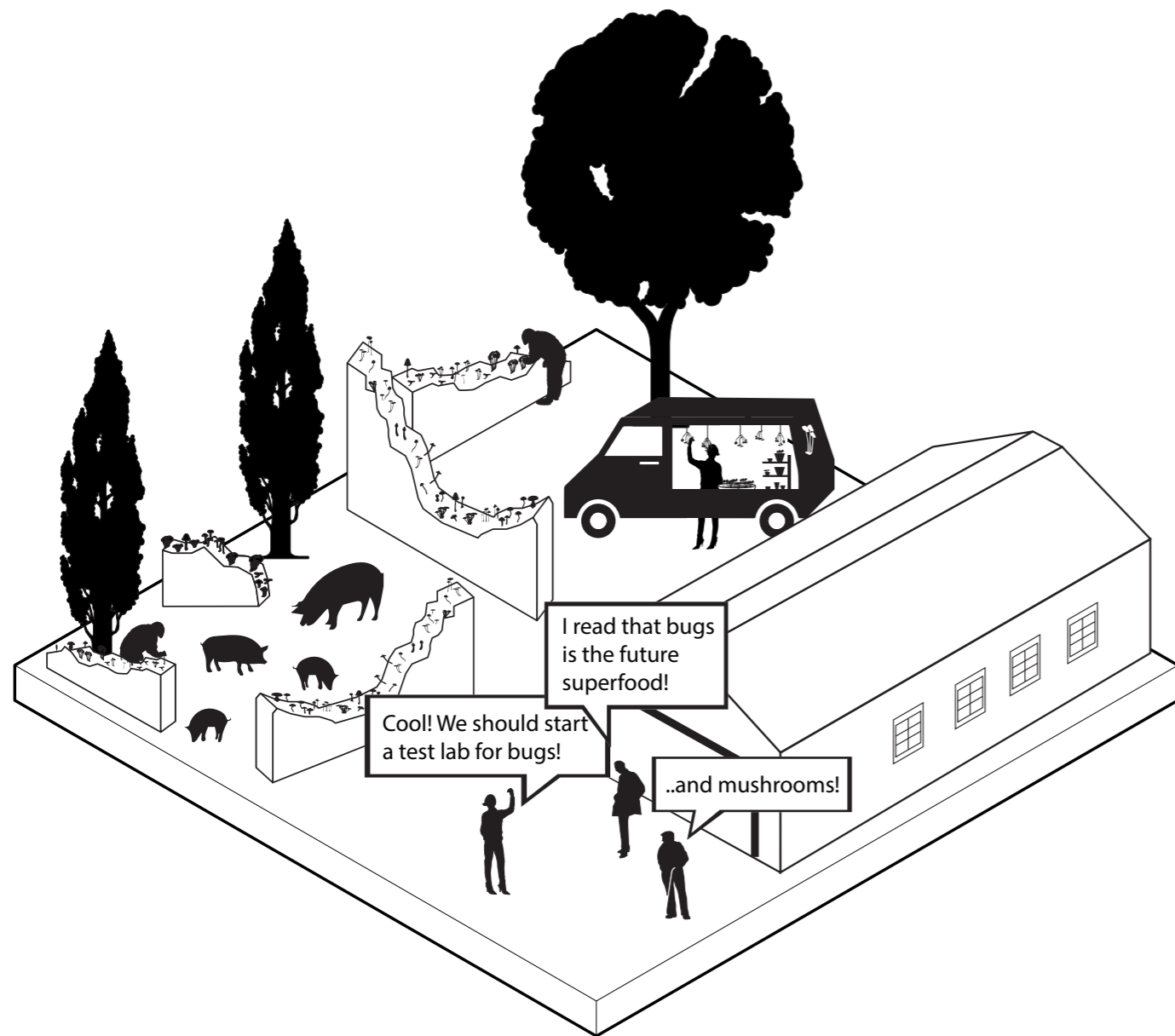
Entrance to the city
Proximity to the new industrial area
Located near city perimeters

Potential Implementations:

Cork Forests
Bike / Electric bike pathways
Animal habitat

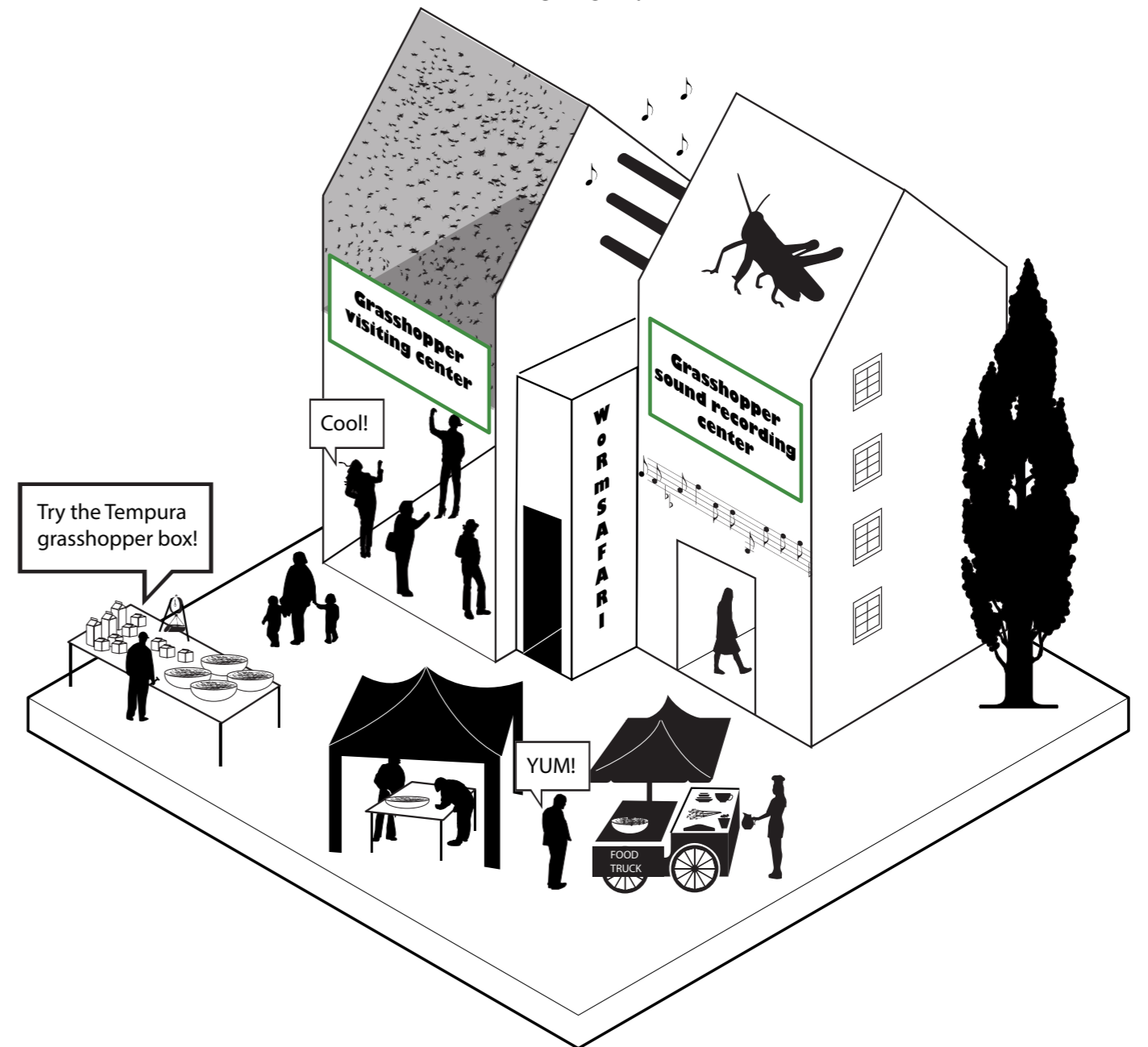
In-between Urban and rural

A NEED FOR NEW PROTEIN SOURCES!



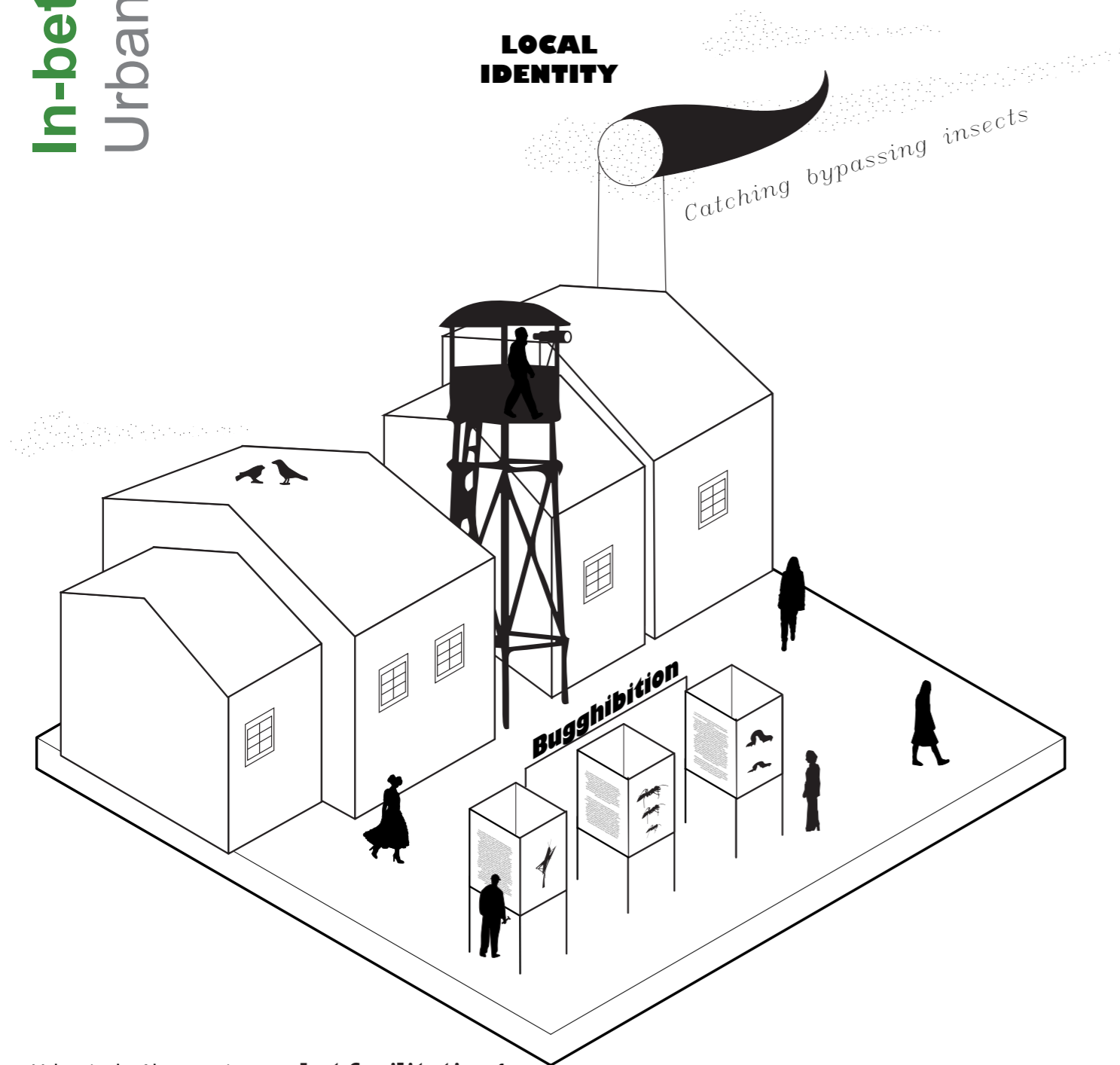
The **soil is dry and warm** in Valencia de Alcantara. The live stock industry is exhausting the land and the resources, **we need a new protein source!**

FROM YUK TO YUM!



Making something creepy to become **cool and trendy!** Pop-up restaurants, visiting centers and labour makes the insect industry super popular in all of Spain.

In-between Urban and rural



Valencia de Alcantara is **good at facilitating** for look out towers, hosting events, exhibitions and working with the **local identity** throughout the seasons.

New economy



The new economy makes all the **local resources** come together, brings new ways to live and work to the table, and makes Valencia de Alcantara **THE place to live!**

Inbetween Urban

Urban in between

Existing features:

Vacant urban land
Proximity to the new industrial area
Locaed in the city

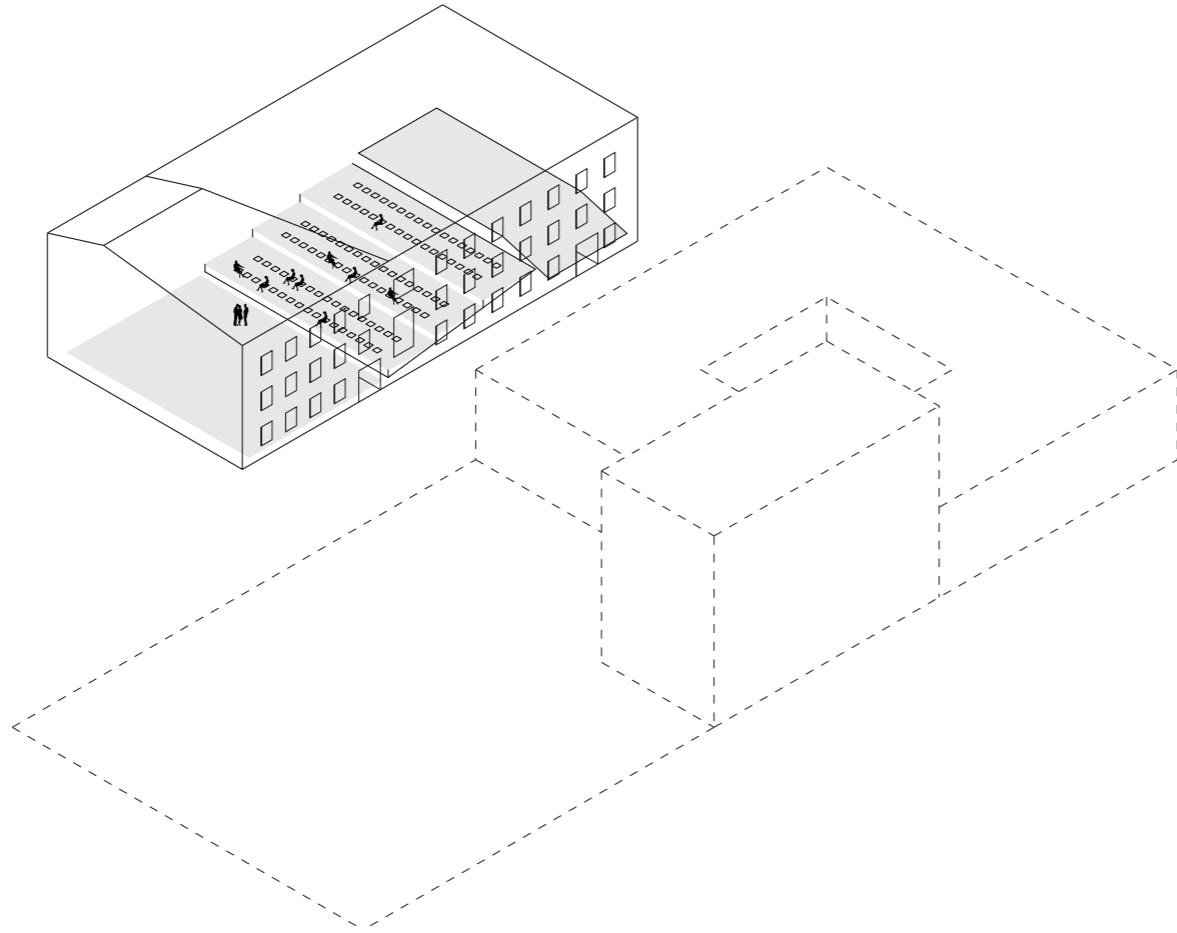
Potential Implementations:

Insect industry
Mushroom industry
Social meeting spaces
Visiting centers

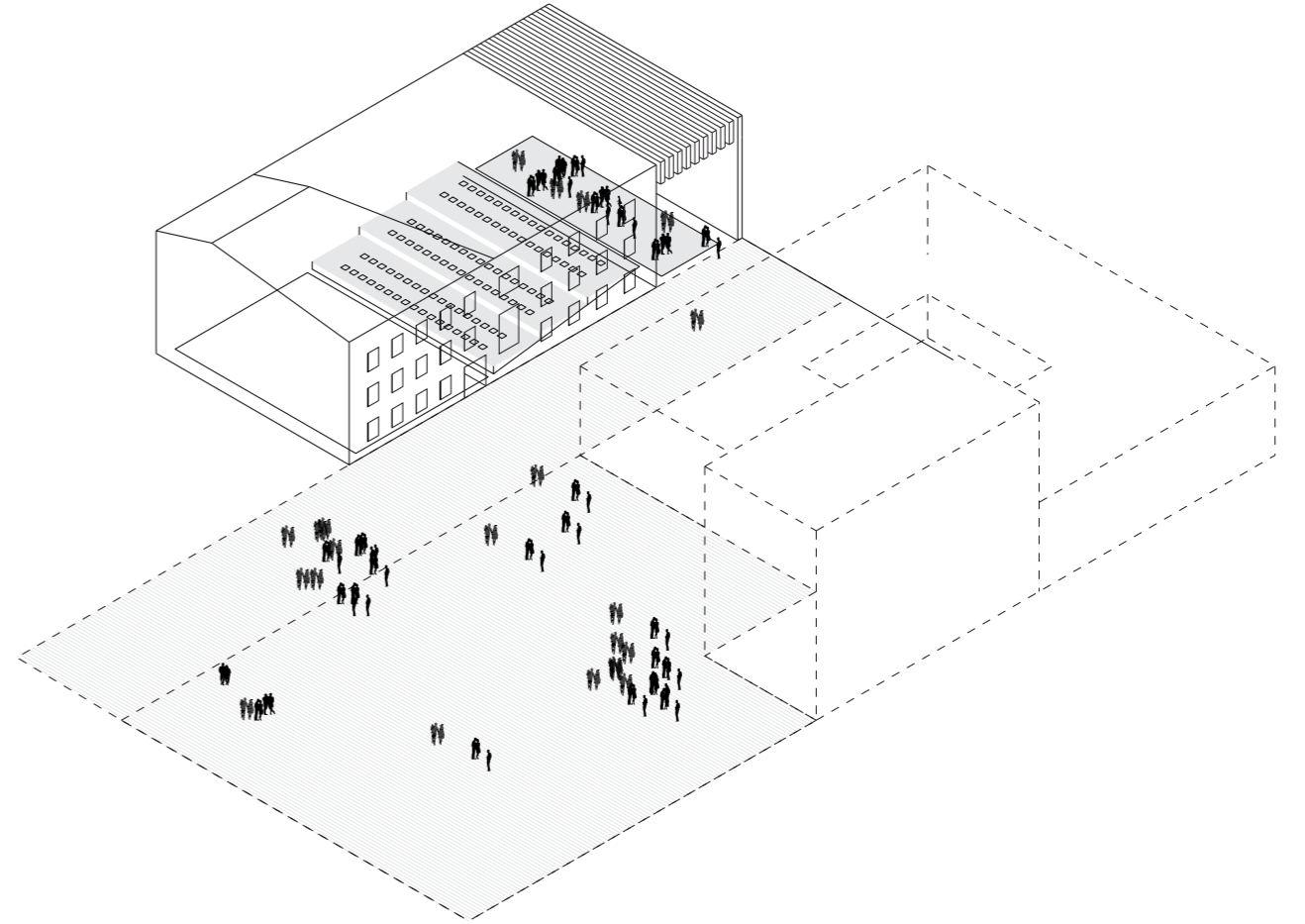


Existing Buildings

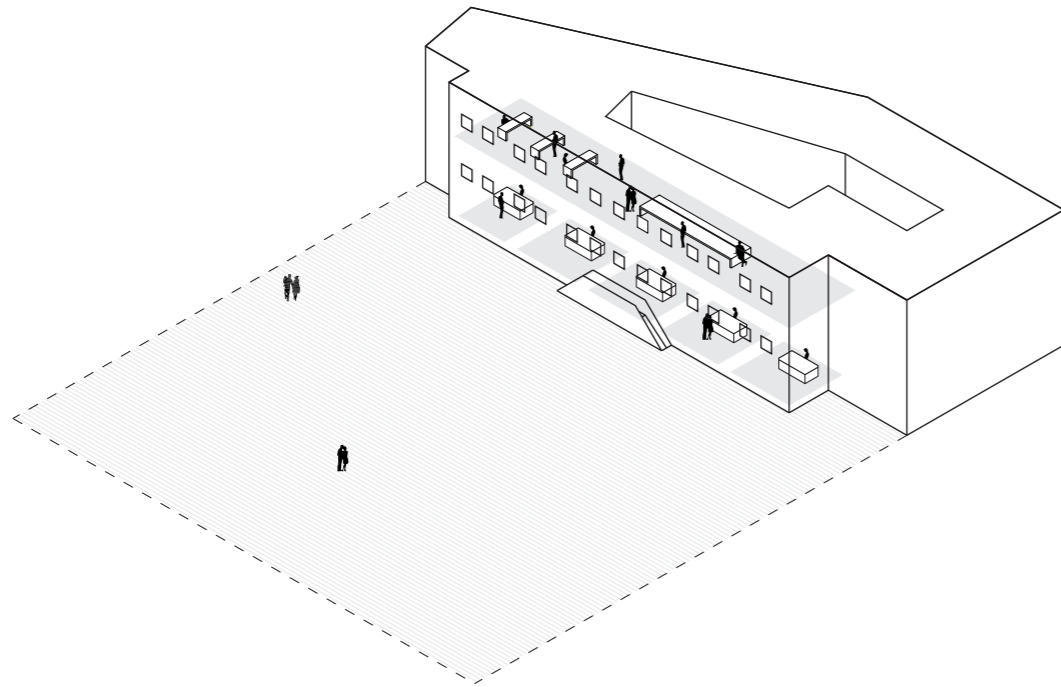
Strategical reuse



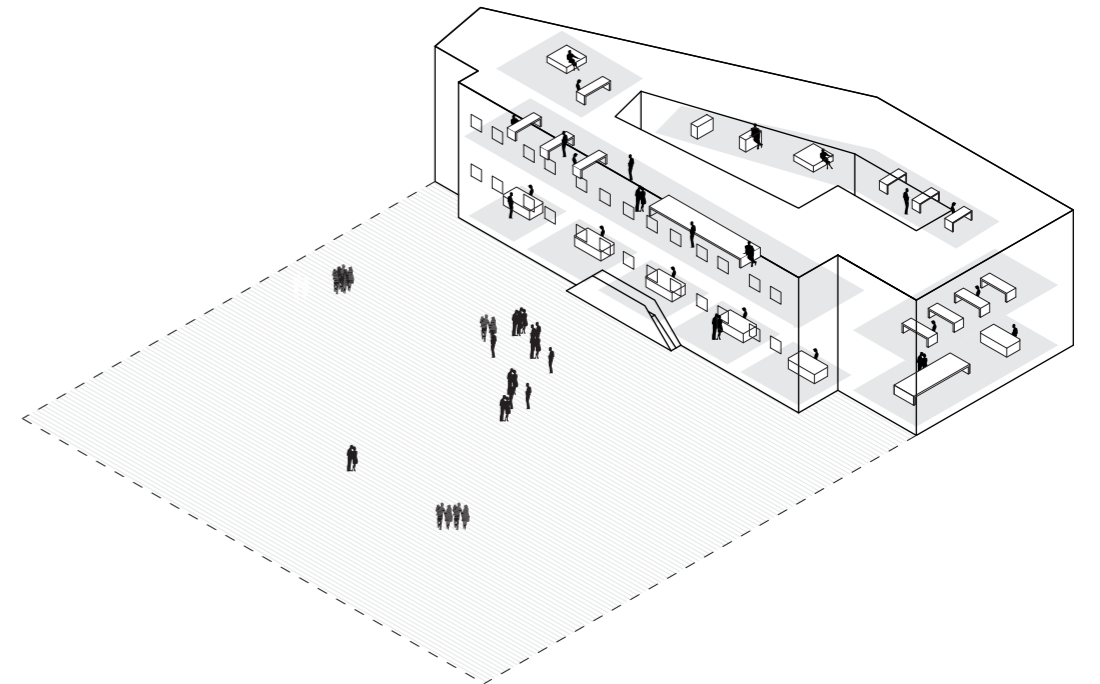
Conference Hall



Public in-between plaza



Market



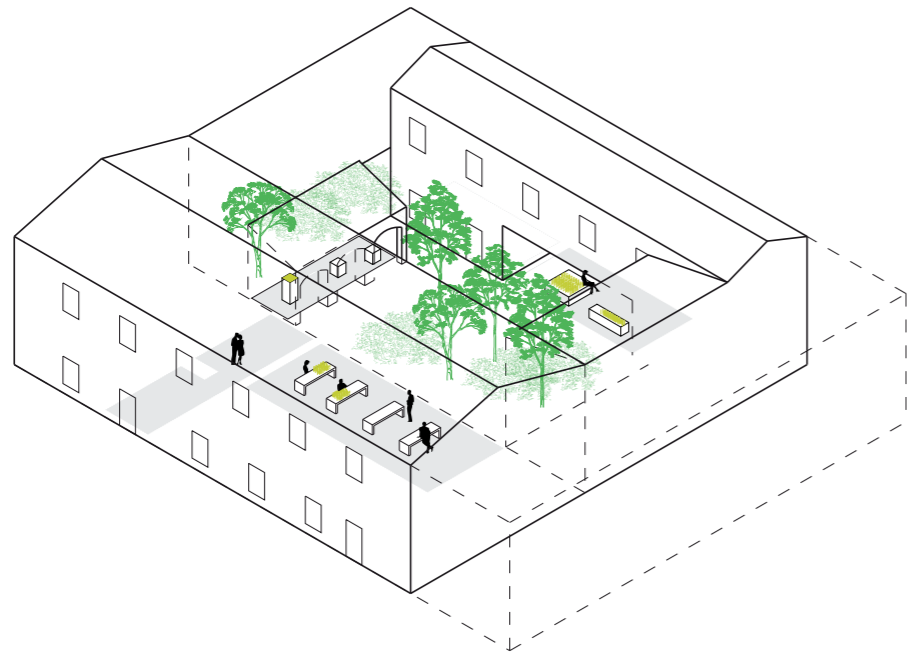
Market
+
Coworking

Existing Buildings

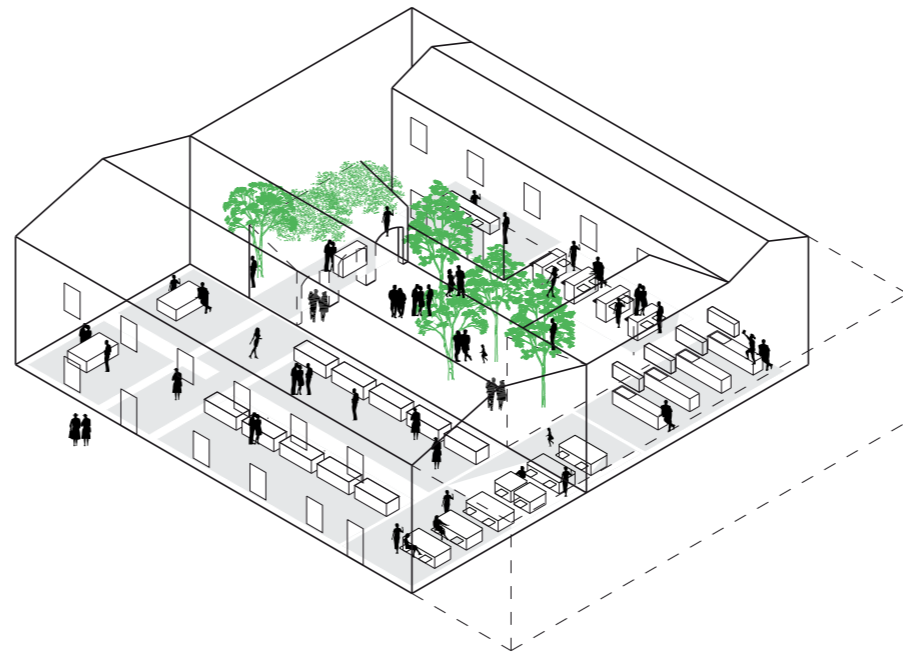
Strategical reuse

Existing Buildings

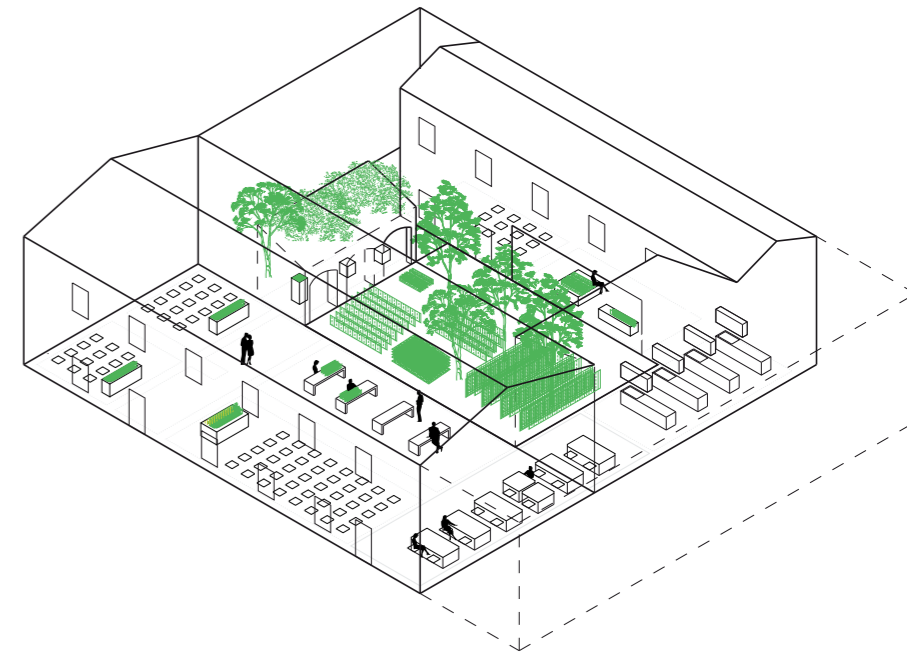
Strategical reuse



Research center



Restaurant
+
cooking



Cultivating
+
Educational

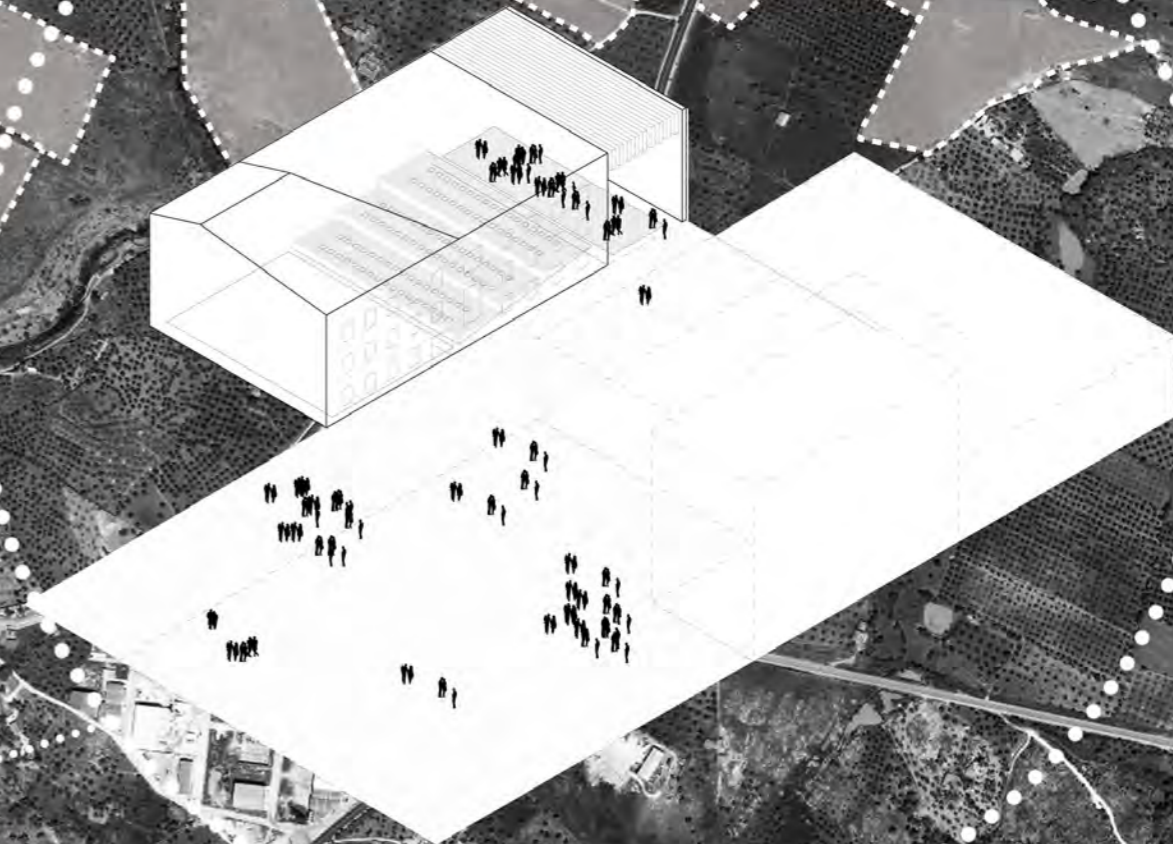
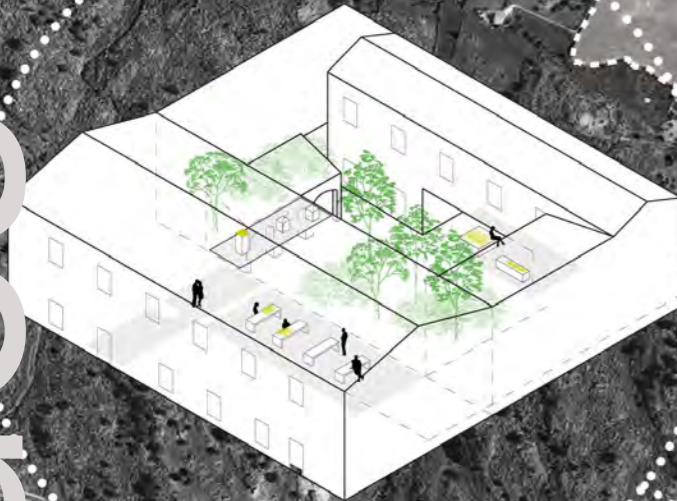
Philantropist's House

Existing features:

Spatial quality
Central location
Urban memory

Potential Implementations:

Flexible programming
Collective space
Cultivation labs
Experimental workshops



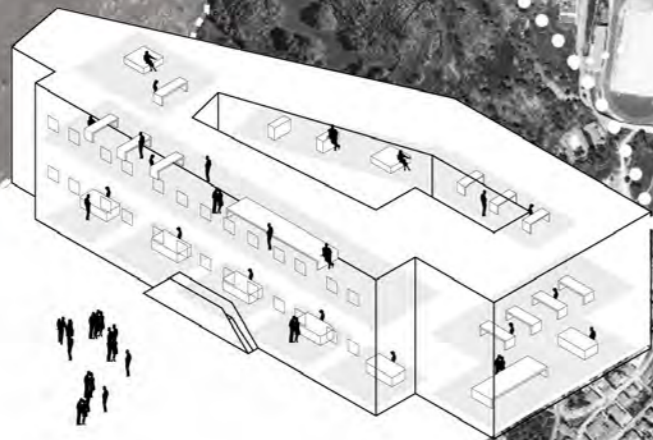
Urban Market

Existing features:

Public venue
Adjacency to the plaza

Potential Implementations:

Financial Support Organization
Co-working



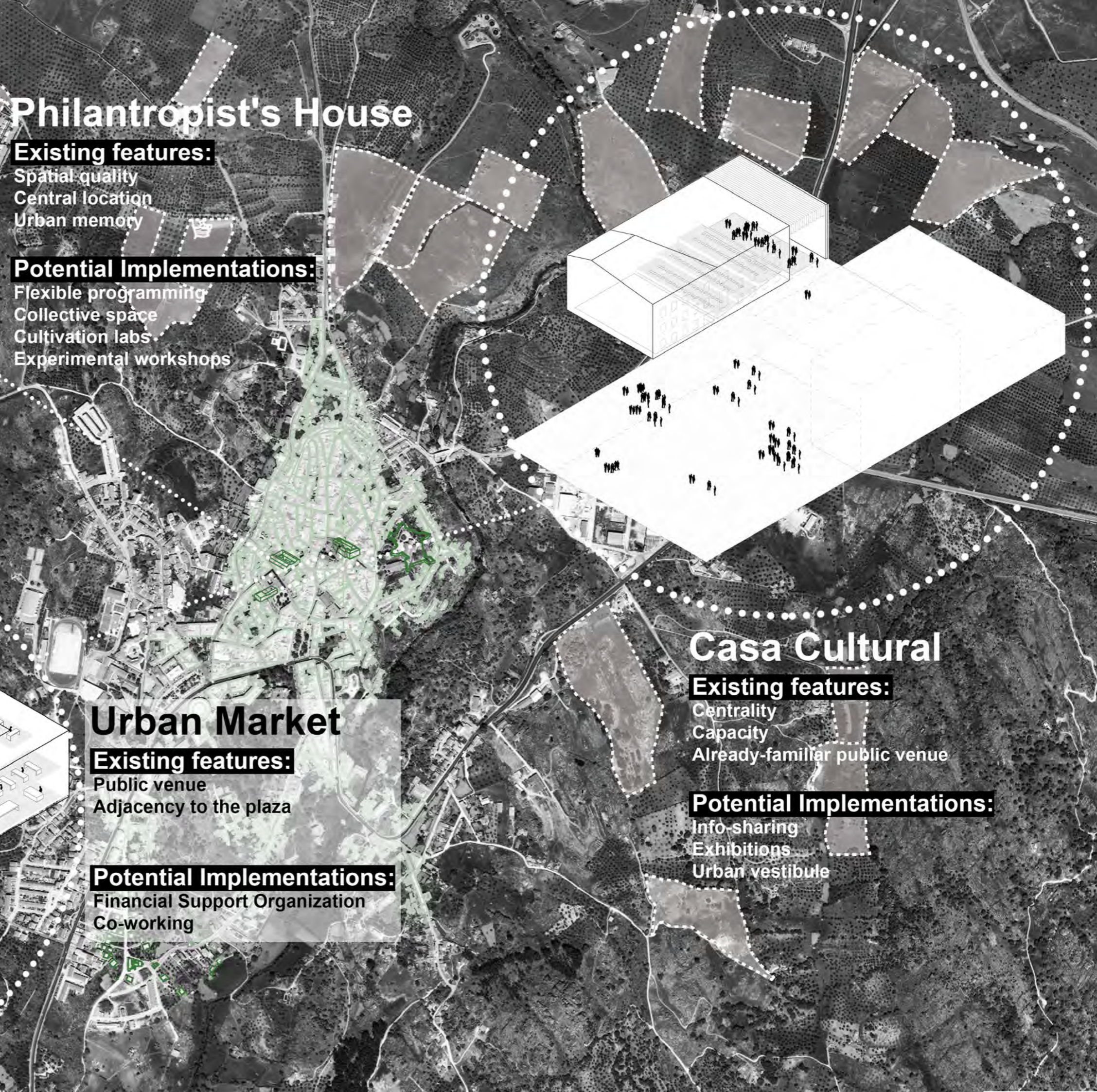
Casa Cultural

Existing features:

Centrality
Capacity
Already-familiar public venue

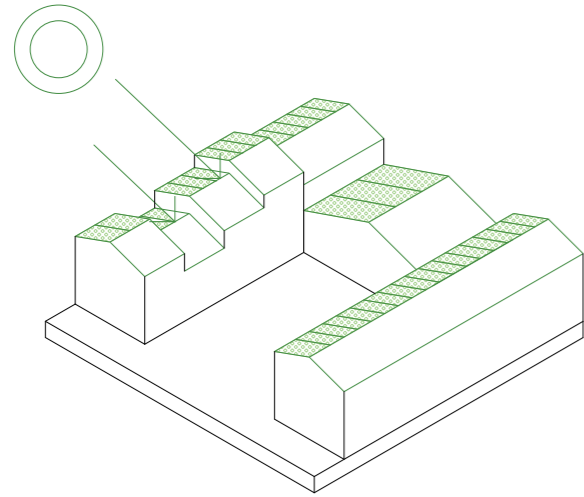
Potential Implementations:

Info-sharing
Exhibitions
Urban vestibule

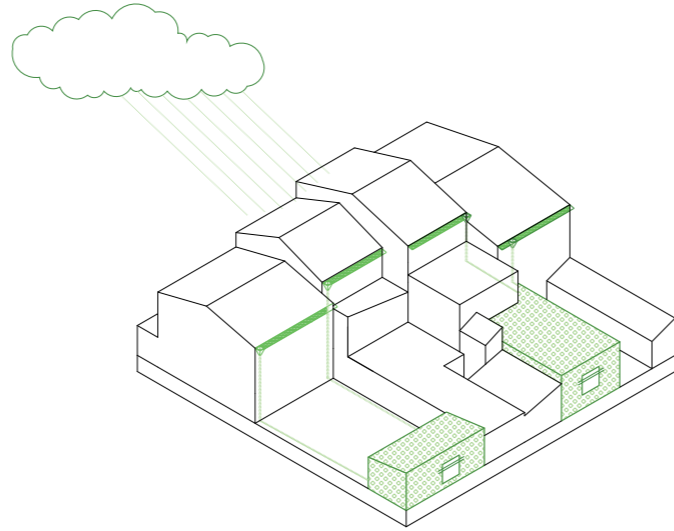


Vacant houses

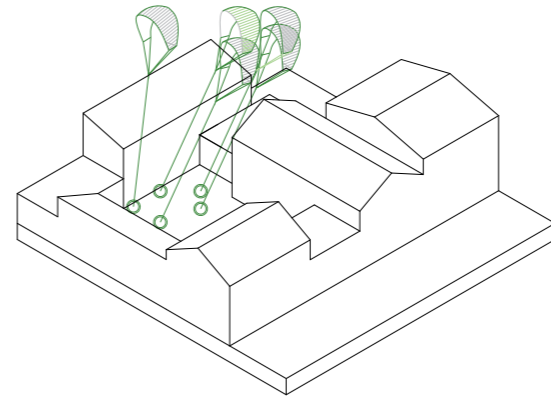
Natural resources



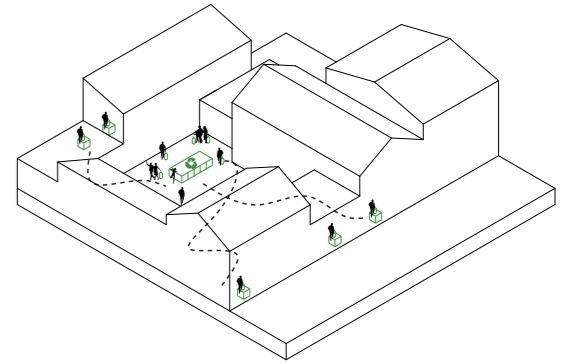
Solar collective panels



Water collection



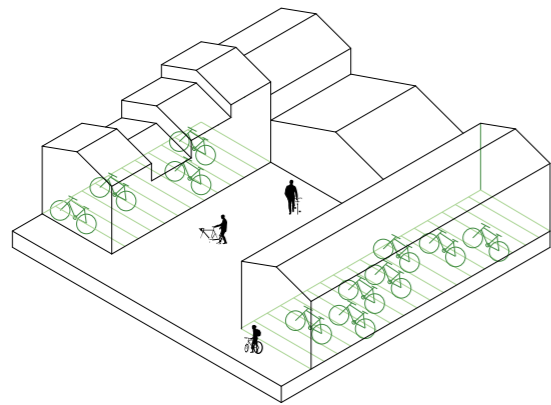
Wind energy



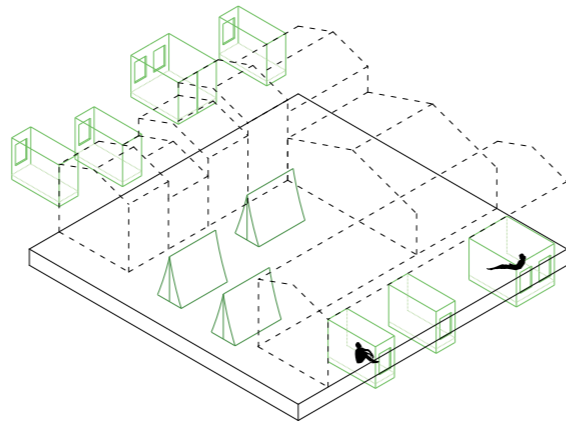
Collective fertilizer system

Vacant houses

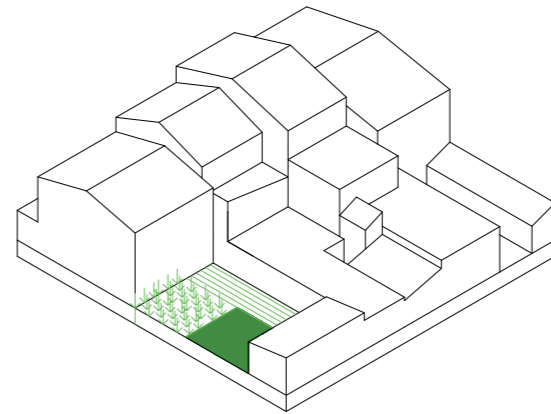
Collective spaces



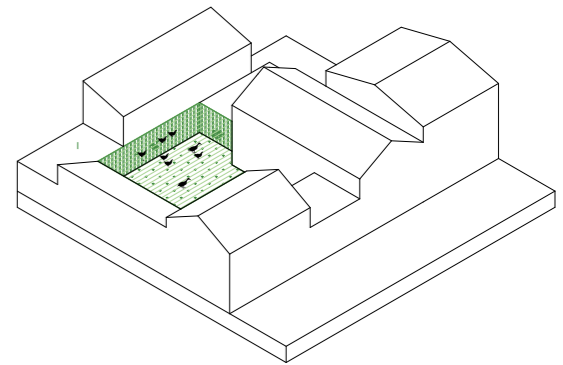
Byke parking



Temporary housing

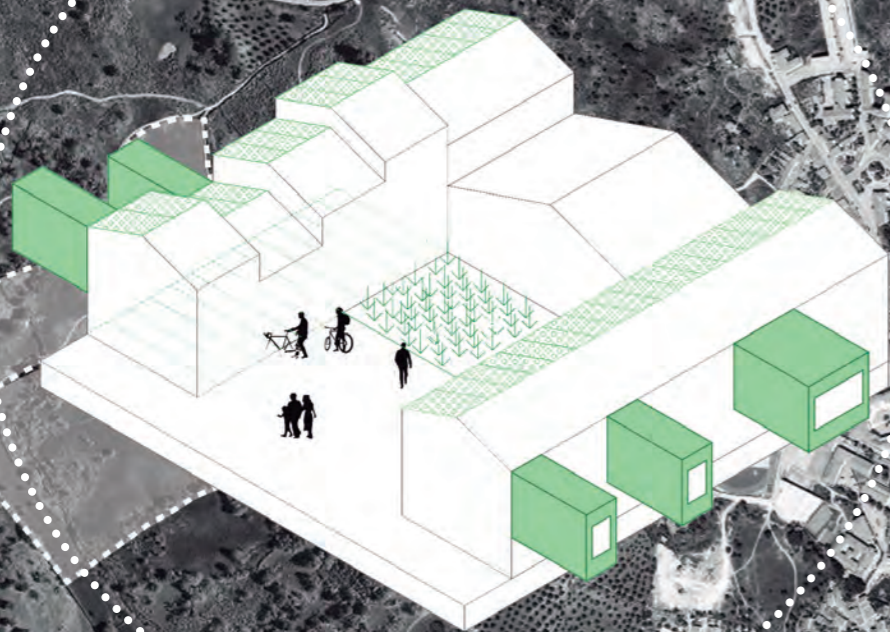


Domestic fields



Domestic livestock

Vacant Houses



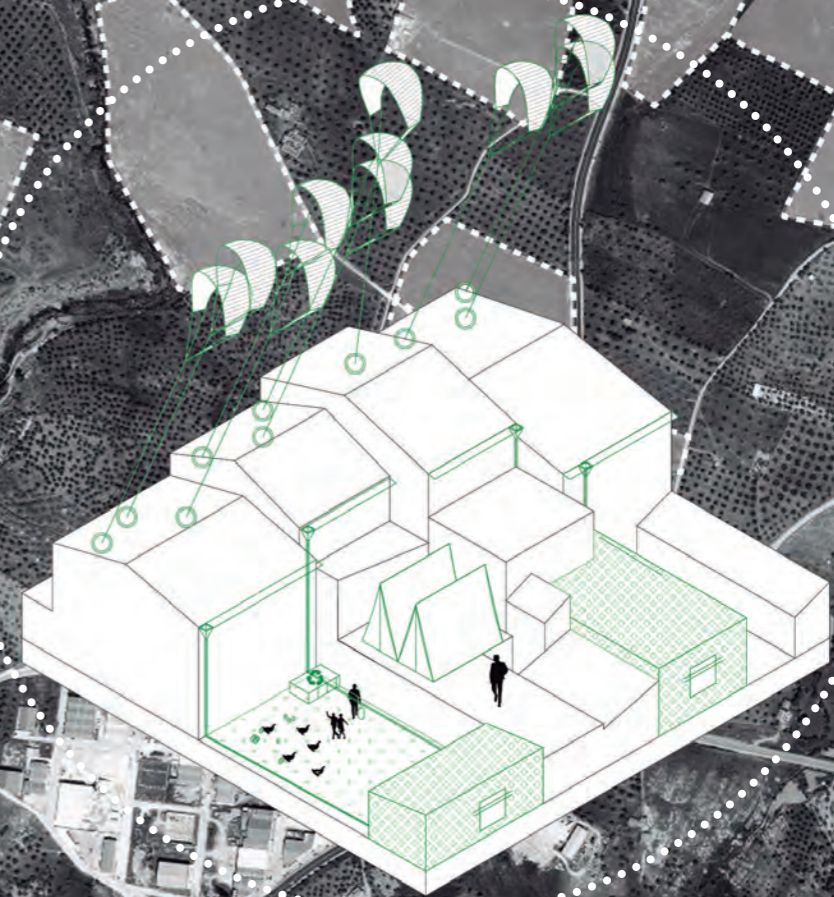
Pilot Infill 1

Existing features:

Unused spaces
Public spaces

Potential Implementations:

Temporary housing
Solar panels
Sustainable mobility
Collective gardens



Pilot Infill 2

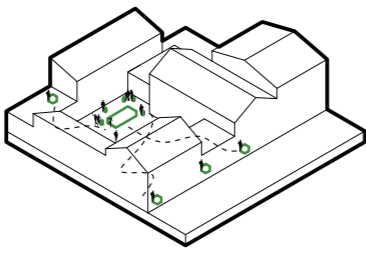
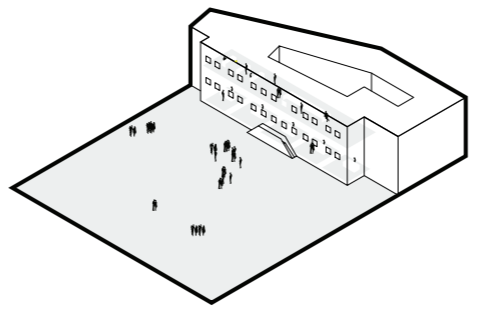
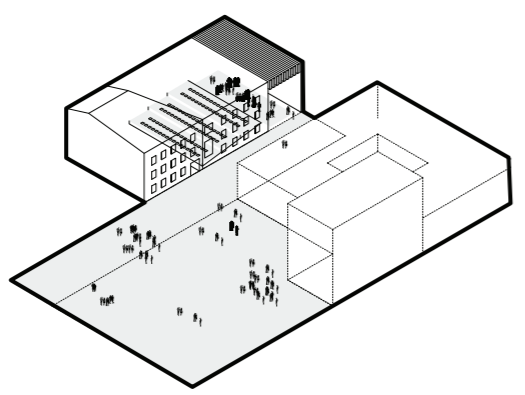
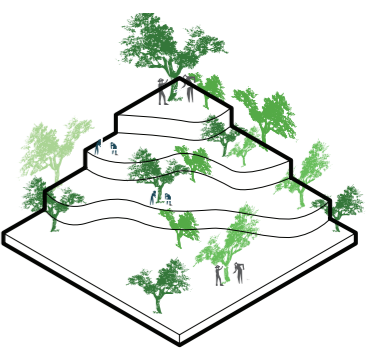
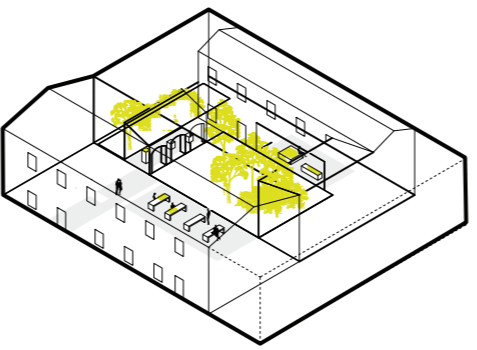
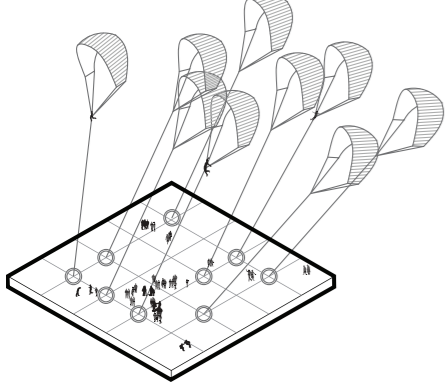
Existing features:

Unused spaces
Private gardens

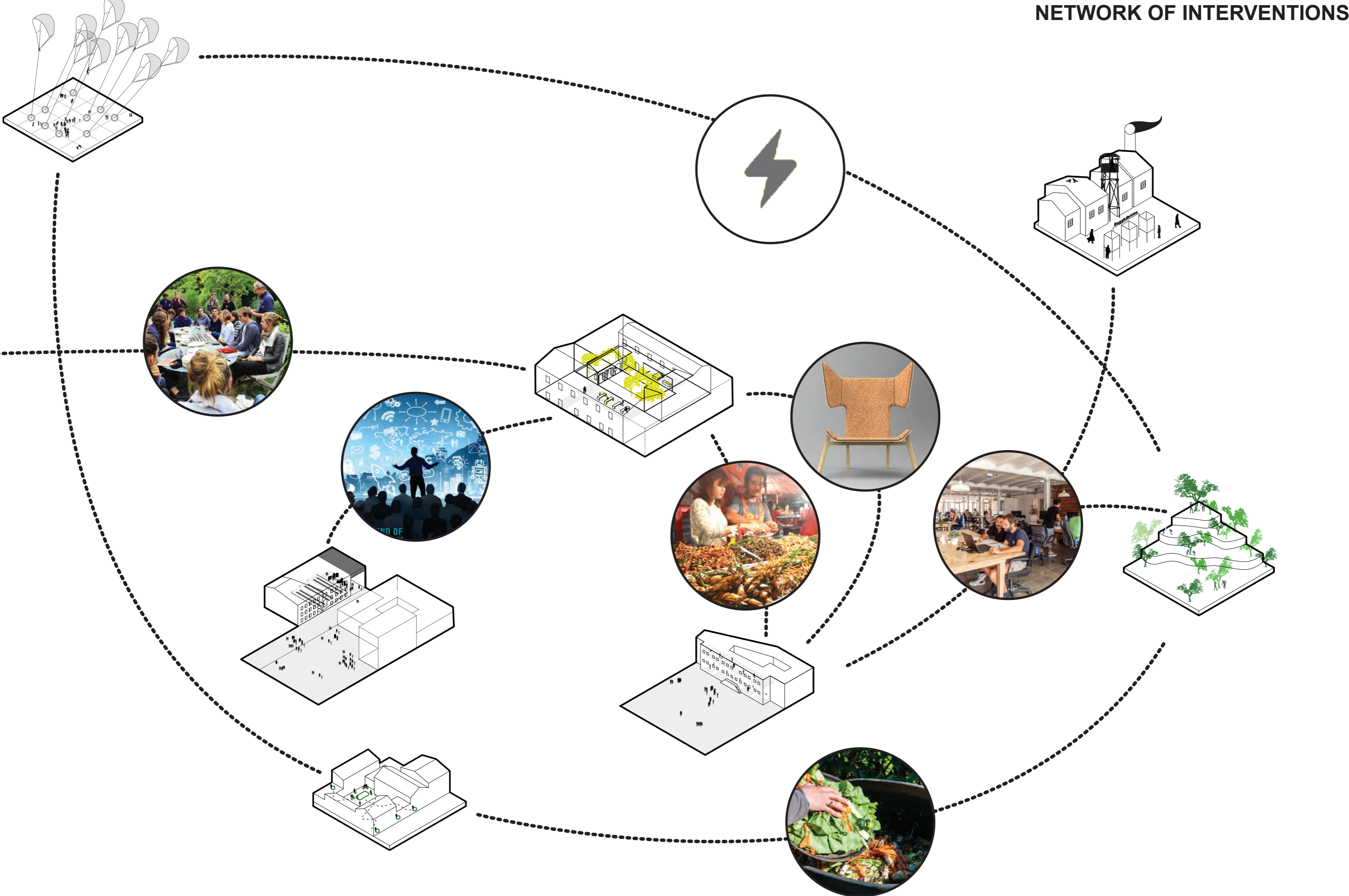
Potential Implementations:

Temporary housing
Wind energy production
Water tanks
Biomass

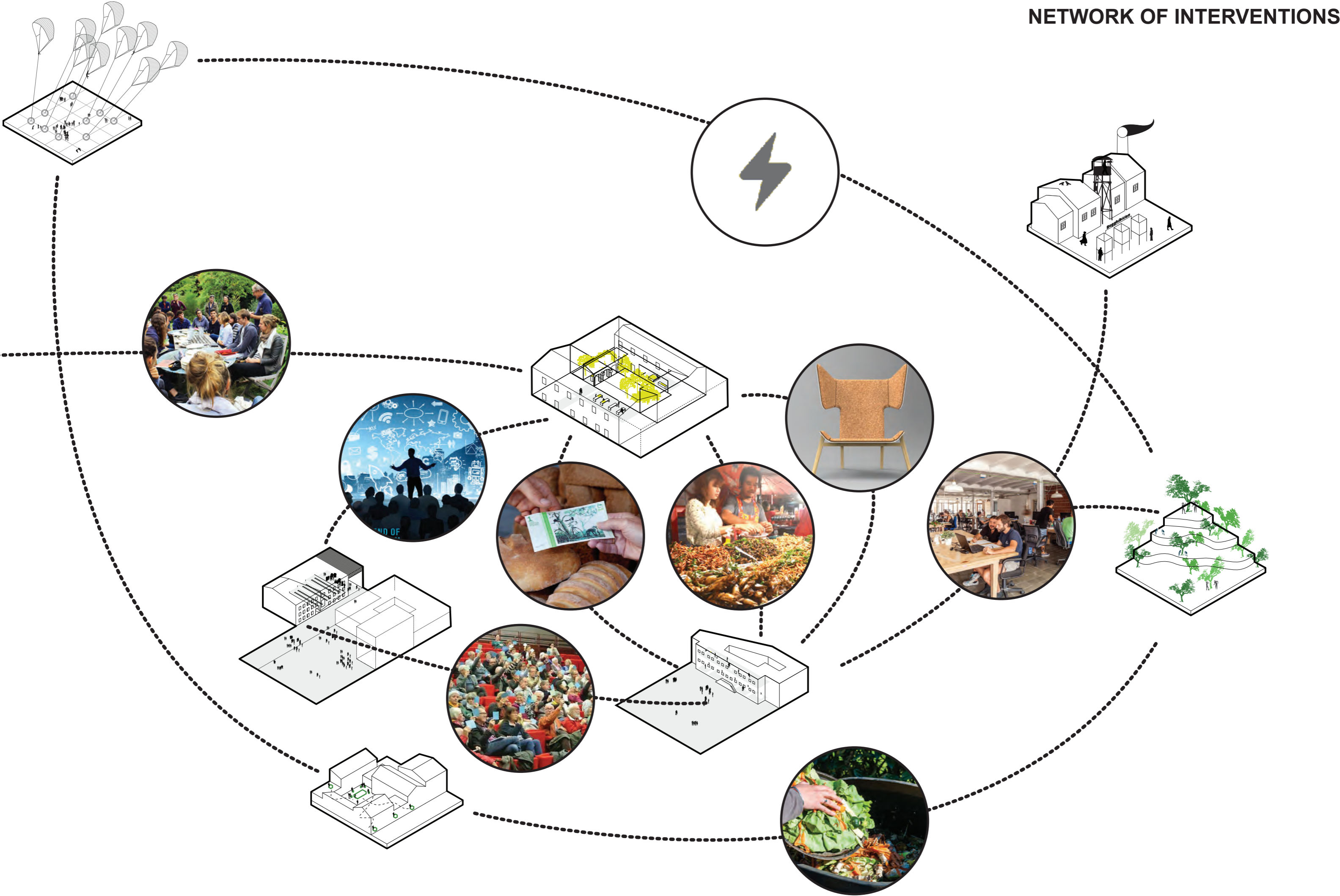
NETWORK OF INTERVENTIONS



NETWORK OF INTERVENTIONS



NETWORK OF INTERVENTIONS



NETWORK OF PEOPLE

