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## Post-industrial areas on the lens of systemic design towards flourishing urban resilience

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# POST-INDUSTRIAL AREAS ON THE LENS OF SYSTEMIC DESIGN TOWARDS FLOURISHING URBAN RESILIENCE

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DI TORINO

Dipartimento di  
Architettura e Design

Topic 4 - Territorial metabolism and flourishing economies

RSD7/ Relating Systems Thinking And Design 7 Symposium

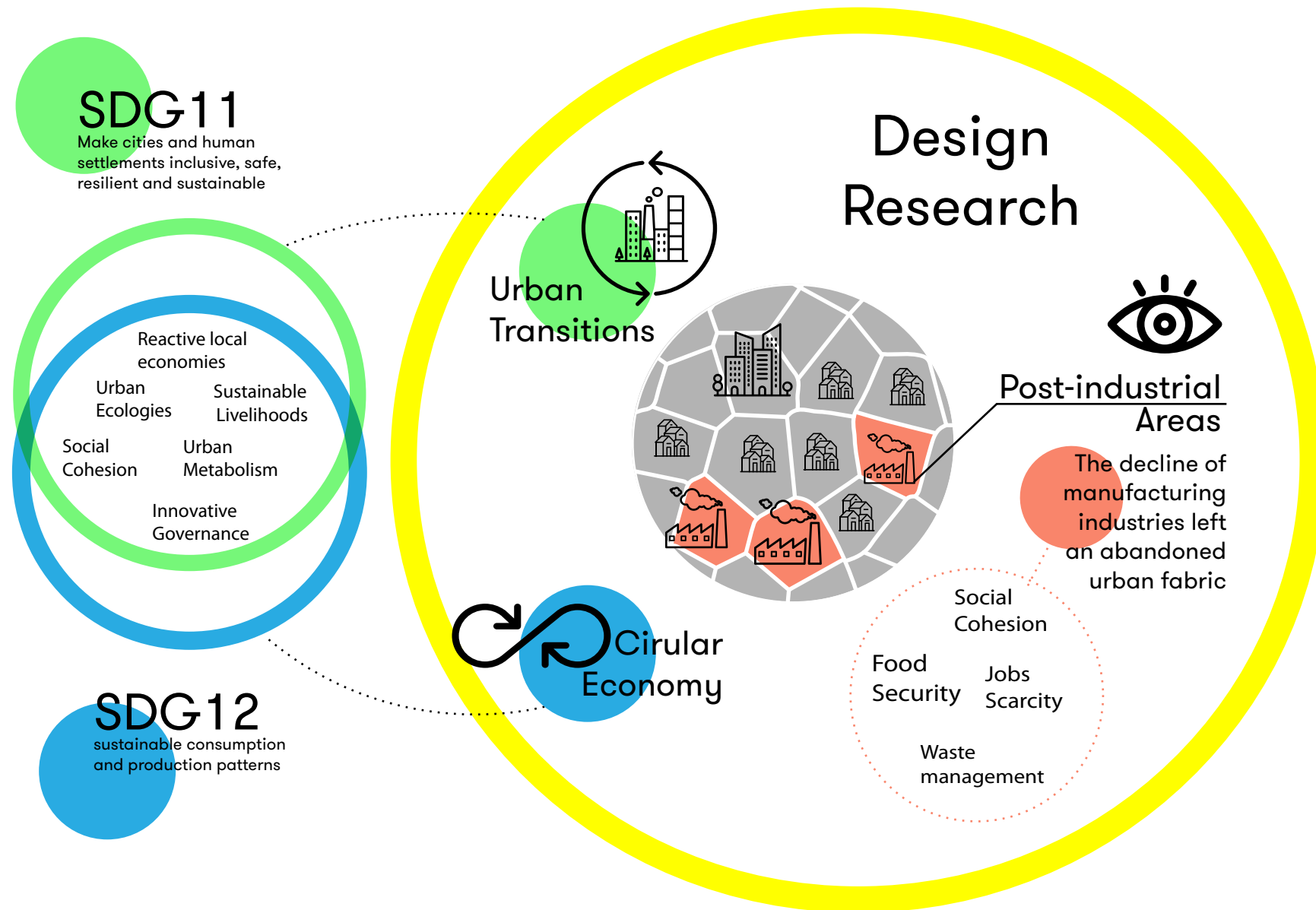
Politecnico di Torino, Lingotto Campus

Turin, 26th October 2018

How can we make resilient cities work?  
In the present and the future.

How will we envision these urban systems to ensure enough water, food security for all, create quality jobs and income opportunities for millions of people in a more humane, sustainable and efficient manner?

# + Resilience in Post-industrial areas. What way to go?



on that complex scenario...

How to achieve an overall sustainable and cohesive urban transitions, that can reduce future economic, environmental and social costs, but at the same time strengthening economic competitiveness?

## + Conceptual framework of a circular city

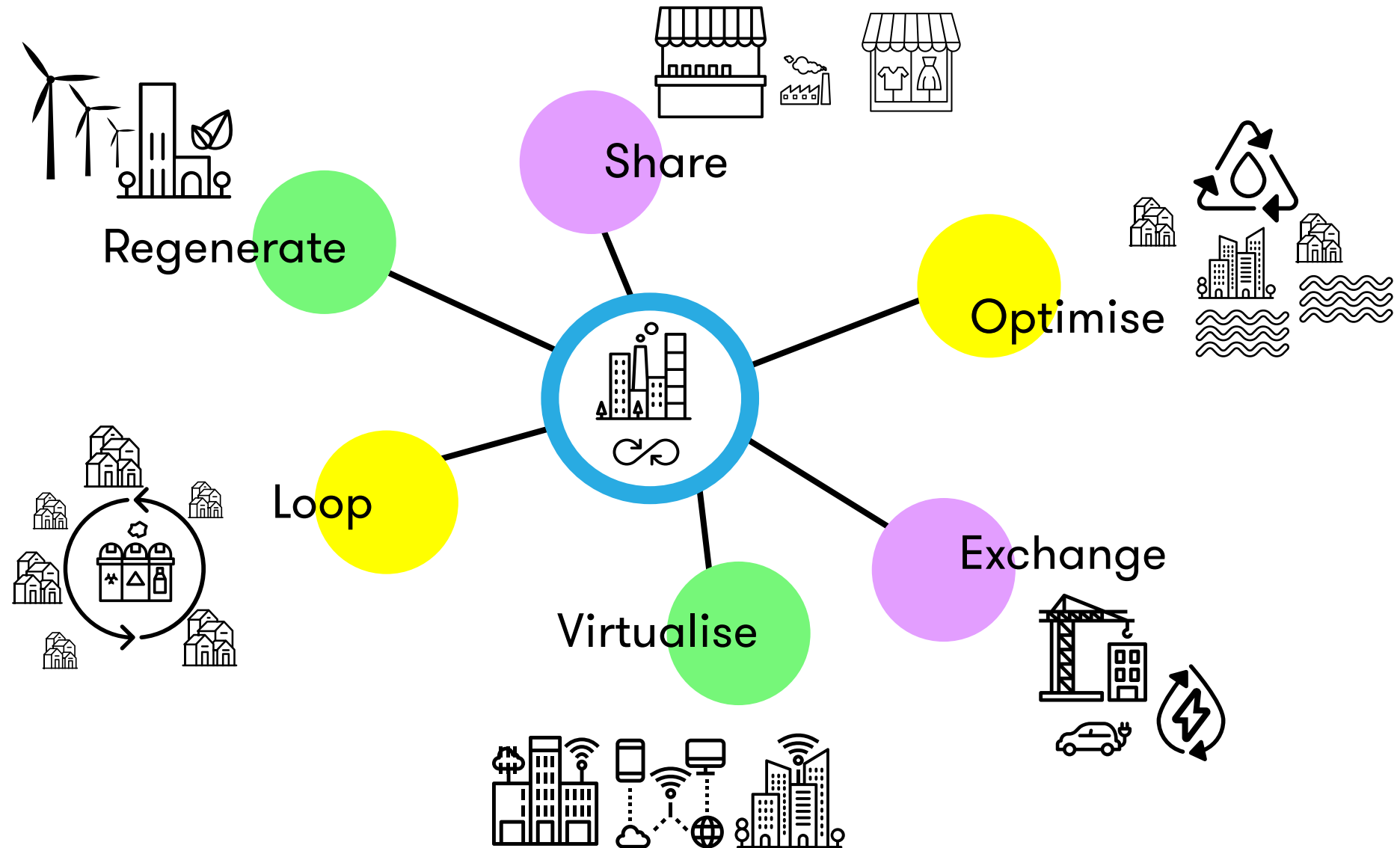


Fig. 1. The circular city framework, adapted from the ReSOLVE framework (EMF, 2015).

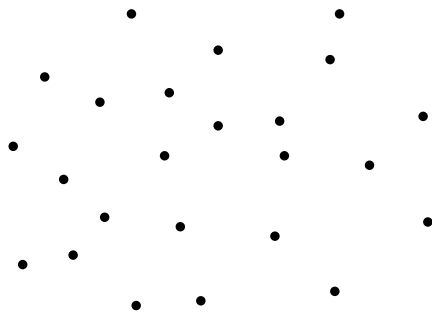
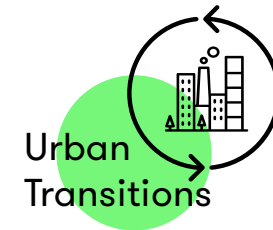
how can a territorial thinking in post-industrial areas foster frameworks to address the current environmental and economic challenges of society?



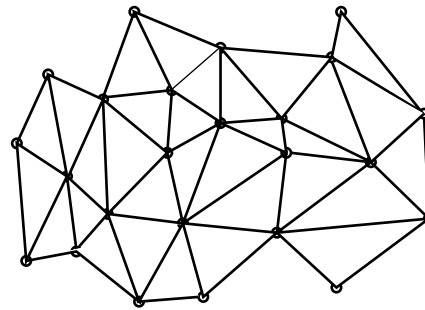
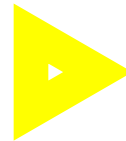
# + Systemic Design for Territorial Thinking



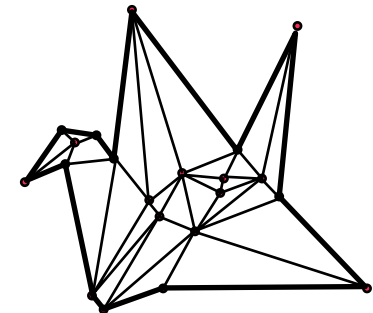
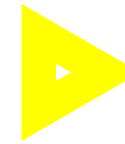
STRATEGIES



context



complexity

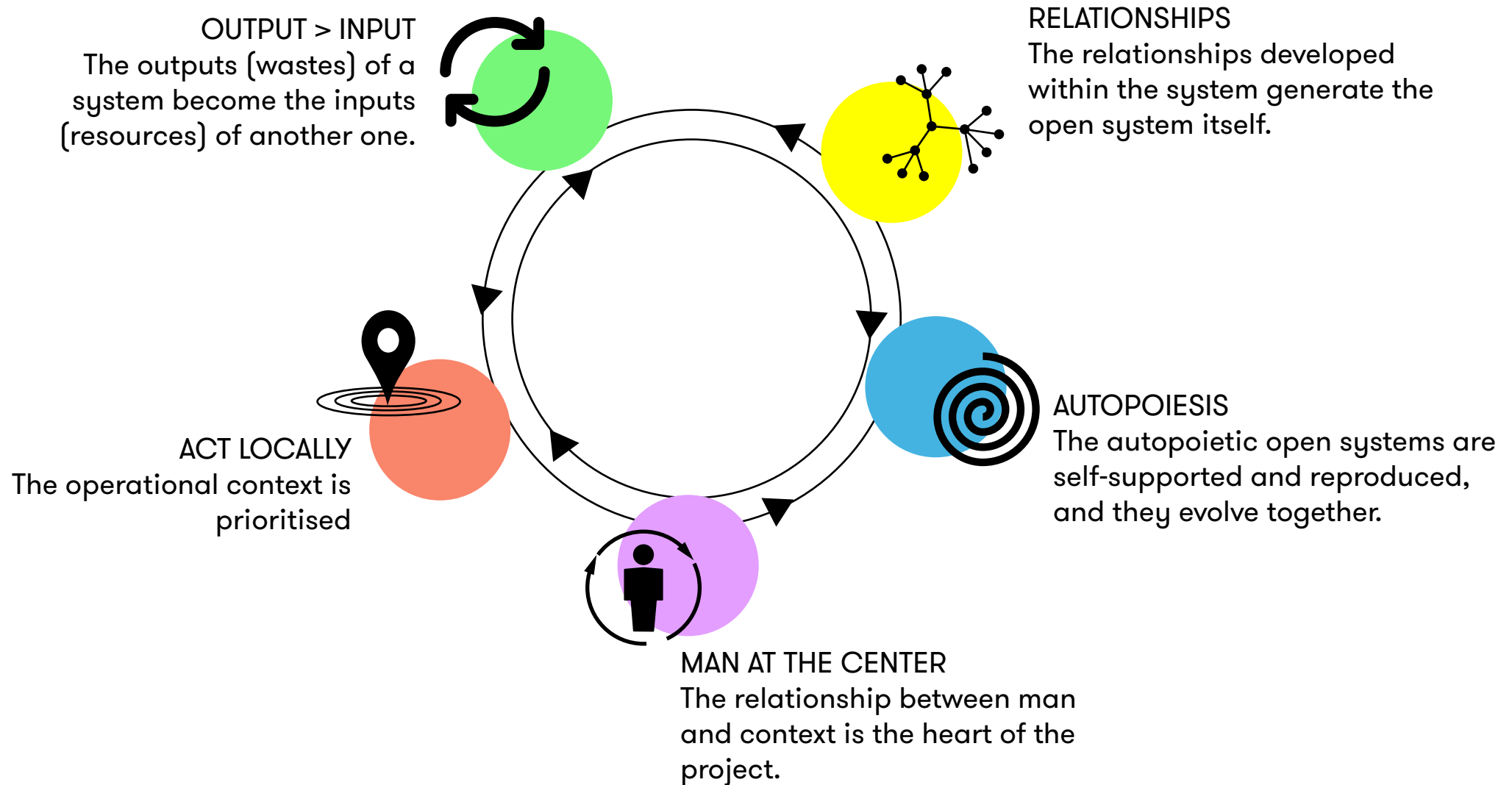


implementation

Systemic Design



# + Through which principles? Systemic Design

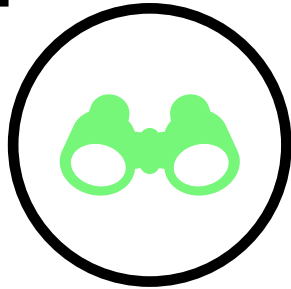


# How Systemic Design can enable the design Circular Economy strategies to promote sustainable urban transitions in post-industrial areas?

.... which are economically self-sustaining providing multiple benefits for the economic, ecological and social regeneration of deprived urban areas suffering from the consequences of deindustrialization.

# + Systemic Design research Method

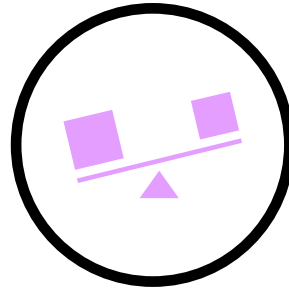
1



Holistic Diagnosis

Qualitative-quantitative analysis

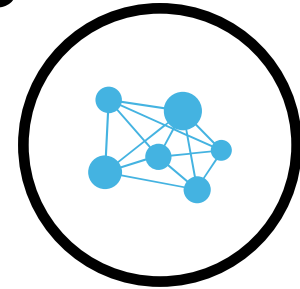
2



Potential and Criticism

framework of a circular city

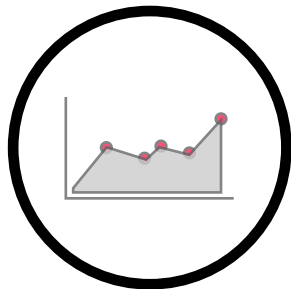
3



System Design

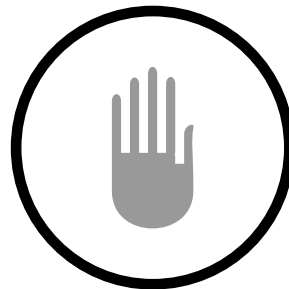
strategies

4



Analysis of  
possible results

5



Implementation

6

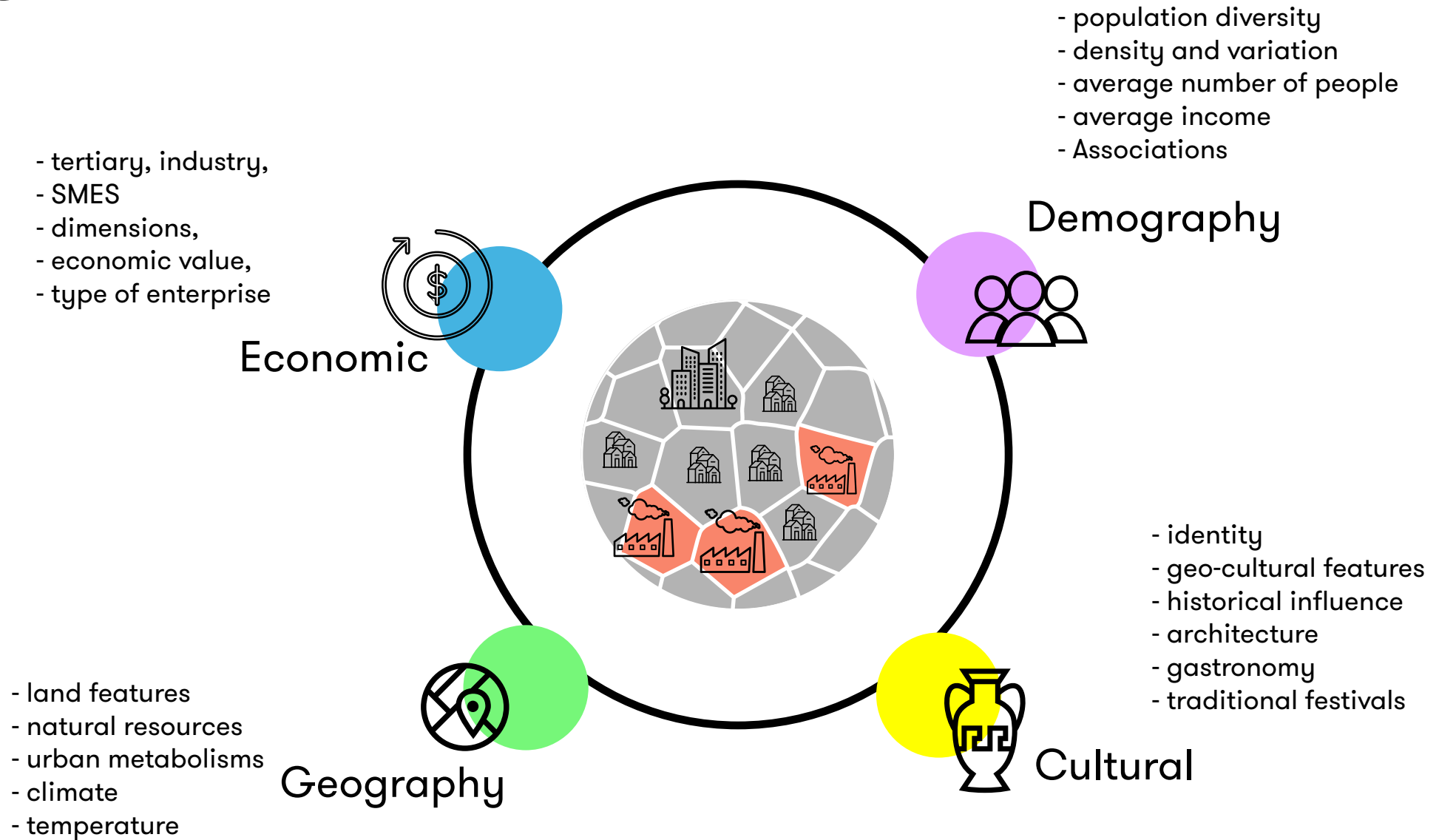


Results analysis  
and feedback



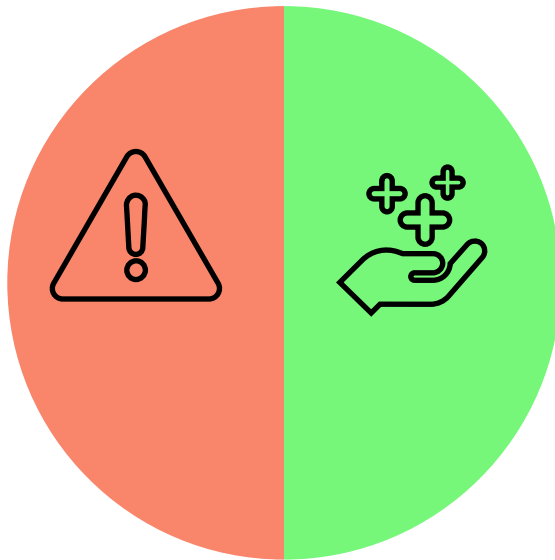
# + STEP 1 holistic diagnosis

+ RSD7 - Territorial metabolism and flourishing economies



# + STEP 2 Assessment potentialities & criticalities

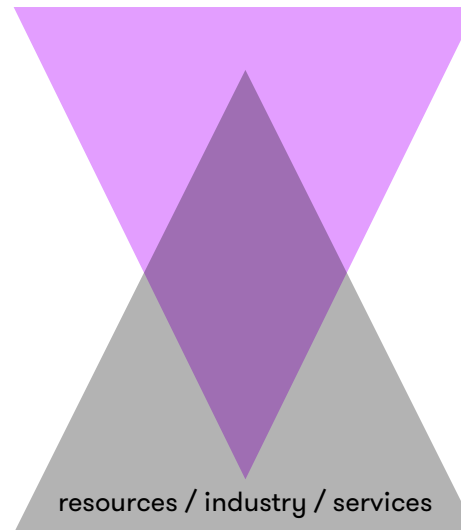
High value &  
sleeping asstes



Current strategies on the territory

TOP-DOWN  
policy

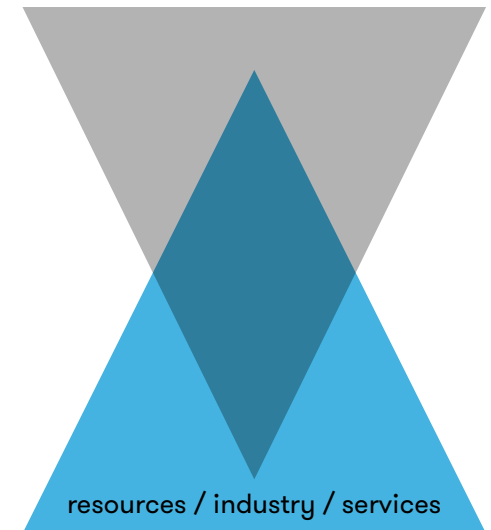
government



citizenship

BOTTOM-UP  
social innovation /  
entrepreneurial activities

government

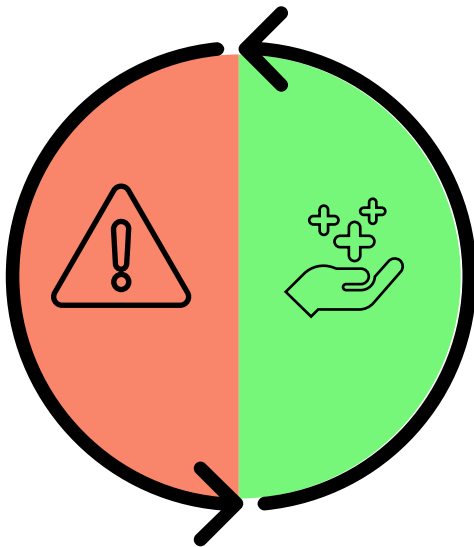


citizenship  
NGOs  
entrepreneurs

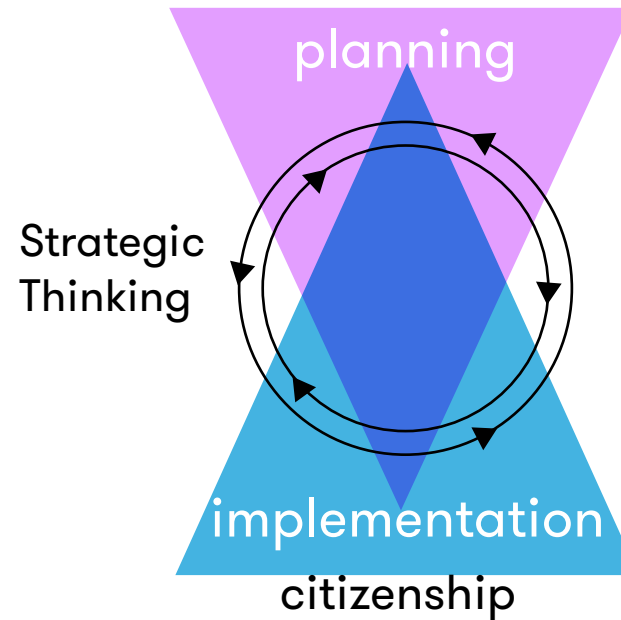
# + STEP 3 systemic design

+ RSD7 - Territorial metabolism and flourishing economies

CRITICALITIES  
INTO POTENTIALITIES



TOP-DOWN + BOTTOM UP  
government



CIRCULAR CITY  
FRAMEWORK



Systemic Design

# + Systemic Design exploration

## Turin, Mirafiori Sud District

- 400000 inhabitants on 12km<sup>2</sup>
- located on a periurban area along the river Sangone
- 1940 FIAT Industrial district
- 1960 working class district
- 2003 FIAT economic crisis





# + Systemic Design exploration

## Mirafiori Sud



poverty



security problem.



social segregation



poor quality of urban environment  
(gray infrastructure )



social groups  
( Rom , Sinti , gypsies ).



empty  
post-industrial  
sites



predominant  
social housing



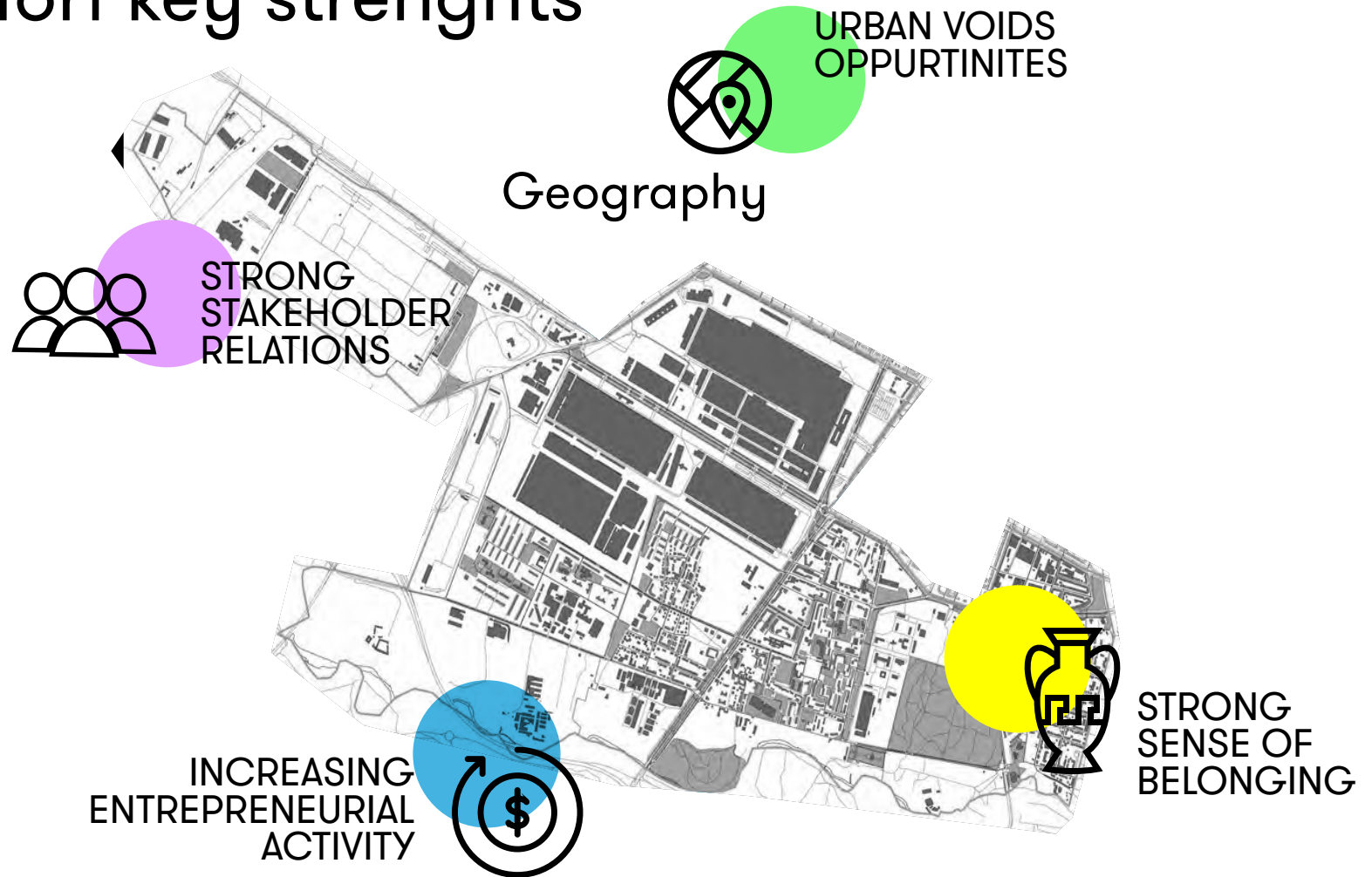
vast periurban  
area (toxic soil)



# + Systemic Design exploration

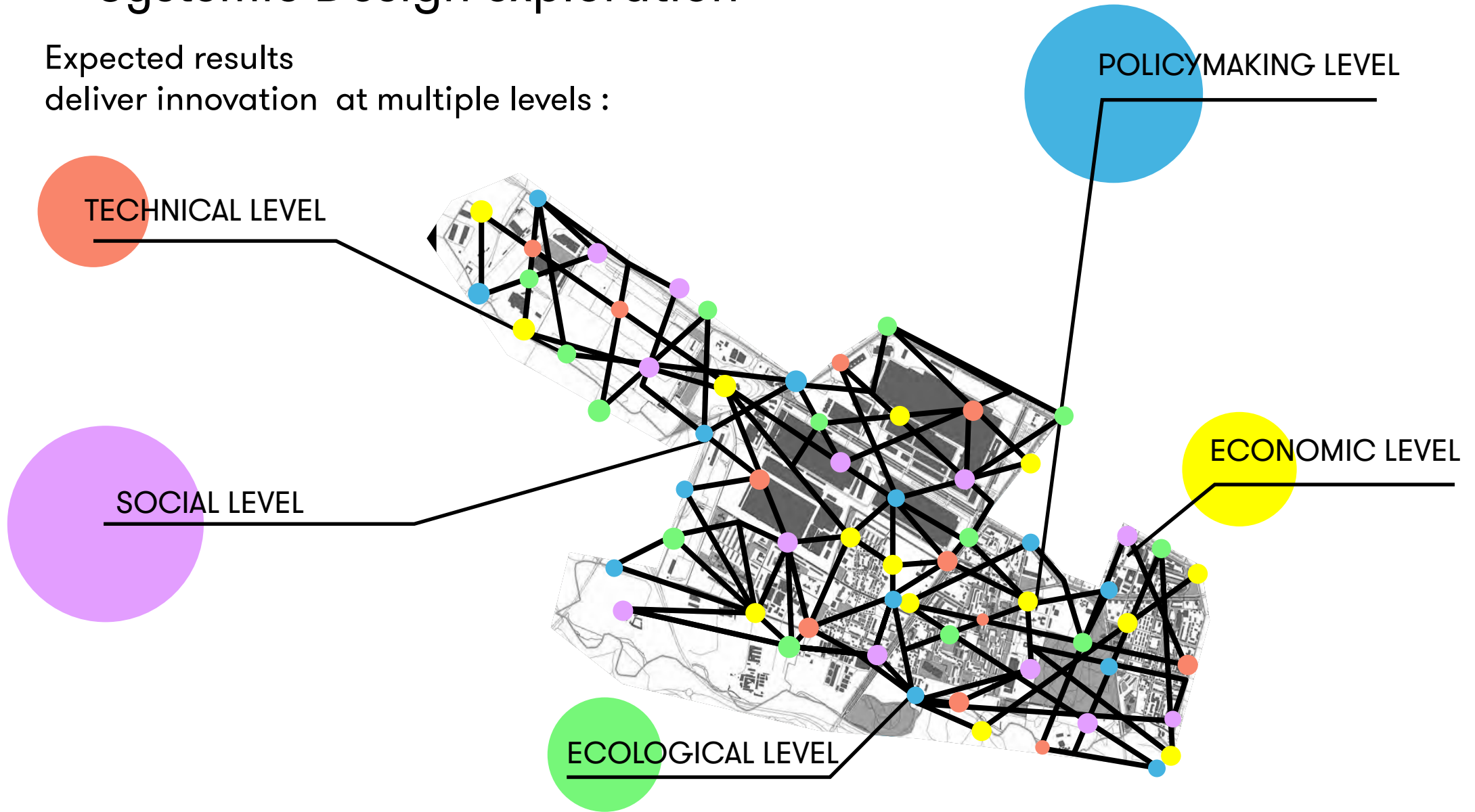


## Mirafiori key strenghts



# + Systemic Design exploration

Expected results  
deliver innovation at multiple levels :





# Thank You!

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