



# LIVABLE OLD COMMUNITY

participative approach as a tool  
to promote community redevelopment

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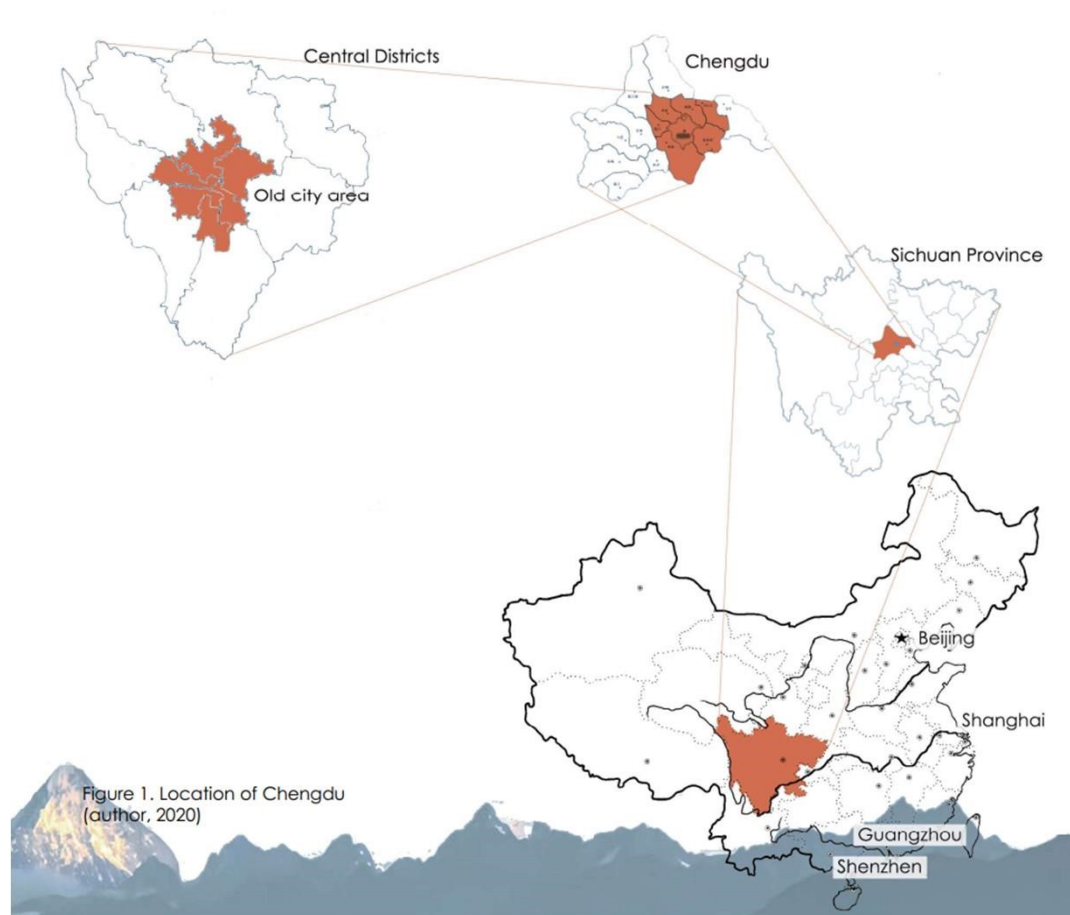
Master graduation project in Planning Complex Cities, Urbanism, BK,

TU Delft

P5

June, 2021

# Chengdu



# Chengdu



1980



1990



2000



2013



2020

## Redevelopment projects in Chengdu



Image 16. bird view of CAOJIAXIANG, 2012  
source: CCTV News



Image 18. the construction of high-rise community in CAOJIAXIANG, 2017



Image 17. The open market in street of CAOJIAXIANG  
Atu, 2013  
source: [https://lxrui.lofter.com/post/3436b3\\_29a8c4f](https://lxrui.lofter.com/post/3436b3_29a8c4f)

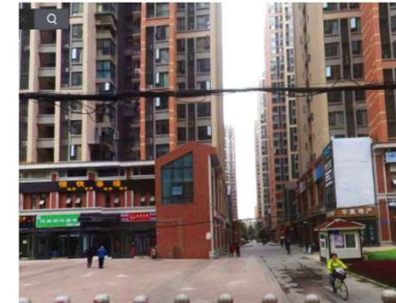


Image 19. The street view in CAOJIAXIANG, 2020  
source: Baidu Map

Current situation of old communities



Aging dangerous wall.



Aging buildings.



Lack of parking lot.



Aging drainage system.

Context

Research

Participative Process

Analysis

Scenario

## PROBLEM STATEMENT

### Current planning system

Demolition & reconstruction  
< Top – down >

- >> loss of culture
- >> public space eroded
- >> locals move away
- >> social segregation

### Old existing communities

Postponed redevelopment projects  
< inadequate living environment >

- >> In adequate infrastructure
- >> aging built environment
- >> out-dated function
- >> failed city reimage



## RESEARCH QUESTION

Main research question

How can a **strategic framework** in cooperation with the citizens promote the **urban redevelopment in old communities** in Chengdu, when making the **public space** vibrant and attractive to users?

## RESEARCH AIMS



1. PUBLIC PARTICIPATION



2. QUALITY OF LIFE



CITY IMAGE



SOCIAL COHESION



BUILT ENVIRONMENT

## Current urban redevelopment system:

Caojiaxiang: a community redevelopment project in 2012

### The SRC (Self-organized Redevelopment Committee)

- >> elected by residents
- >> negotiation platform
- >> no decision-making power



Image 20. The election of the SRC (CCTV News, 2013)

### Different actors

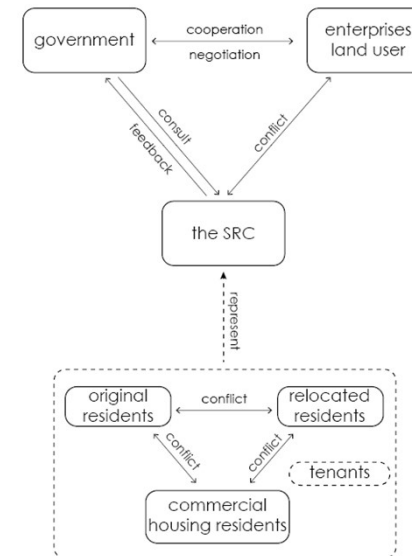


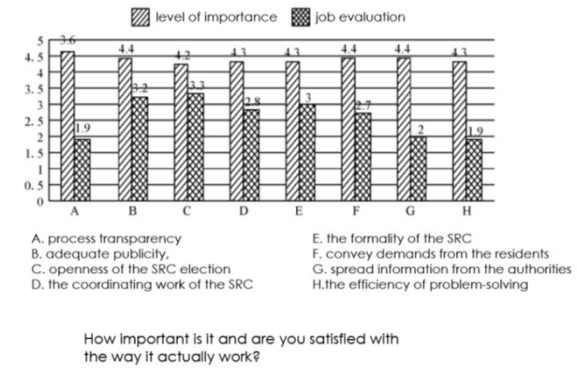
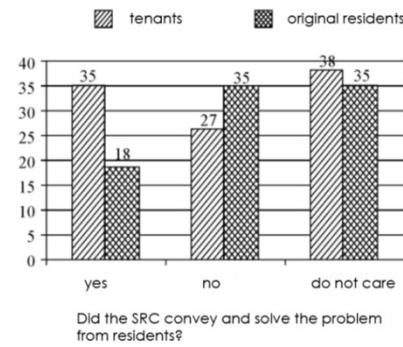
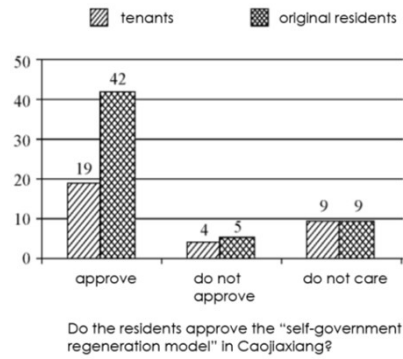
Figure 27. the relationship among key actors (Zhang, 2014. edited by author, 2020)

## Current urban redevelopment system:

Caojiaxiang: a community redevelopment project in 2012

### Feedback survey from residents

>>



## Current urban redevelopment system:

Caojiaxiang: a community redevelopment project in 2012

### Communication barrier

- >> lack basic literacy skills
- >> distrust the authorities



Some residents are not satisfied with the SRC.



2013.01.02  
The SRC is negotiating with the developer.



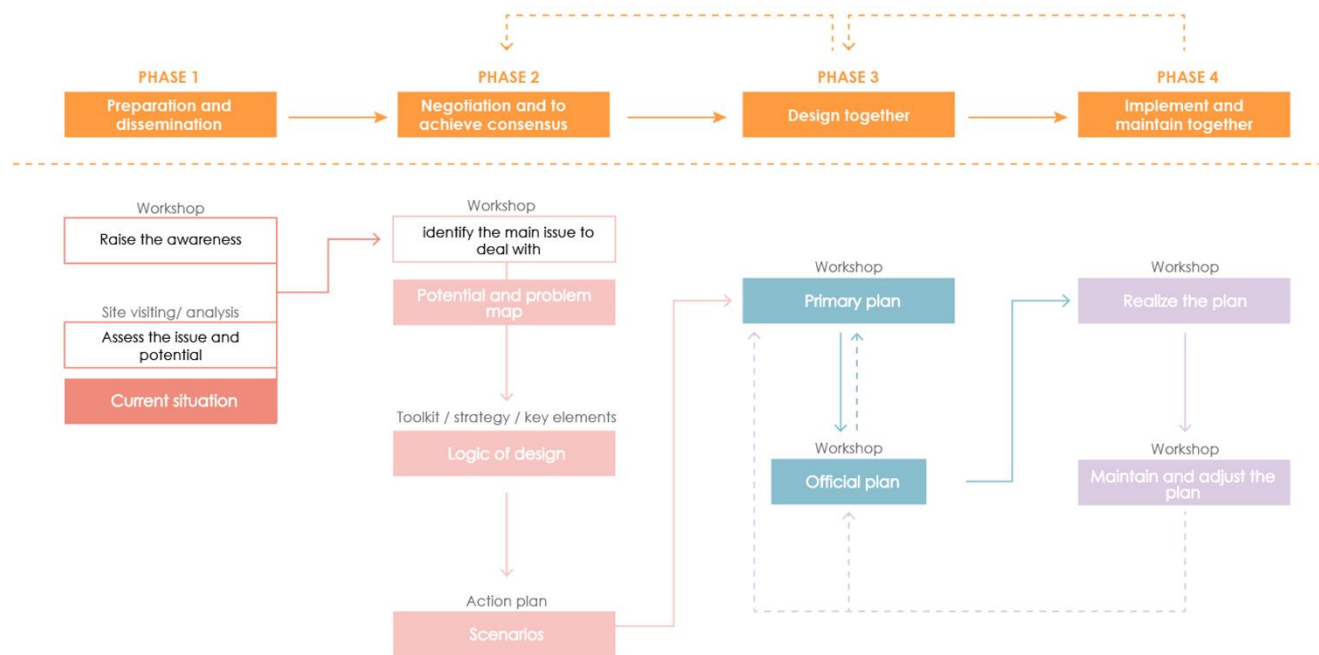
An old lady is trying to understand the preliminary plan on information board.



The SRC members are complaining of excessive pressure to quit.

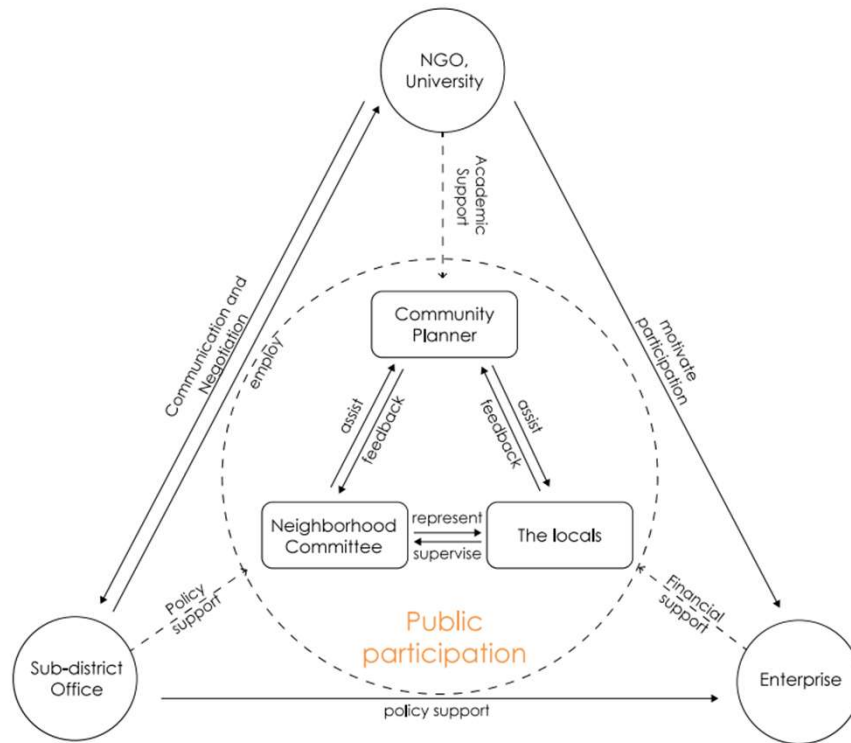
**Public participation**

Procedure of public participation in community redevelopment



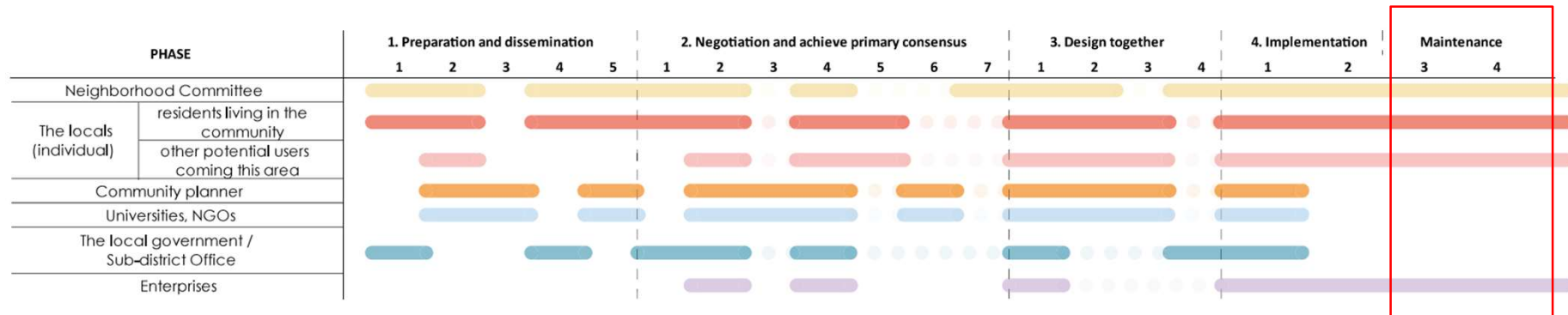
### Public participation

#### Relationship between actors

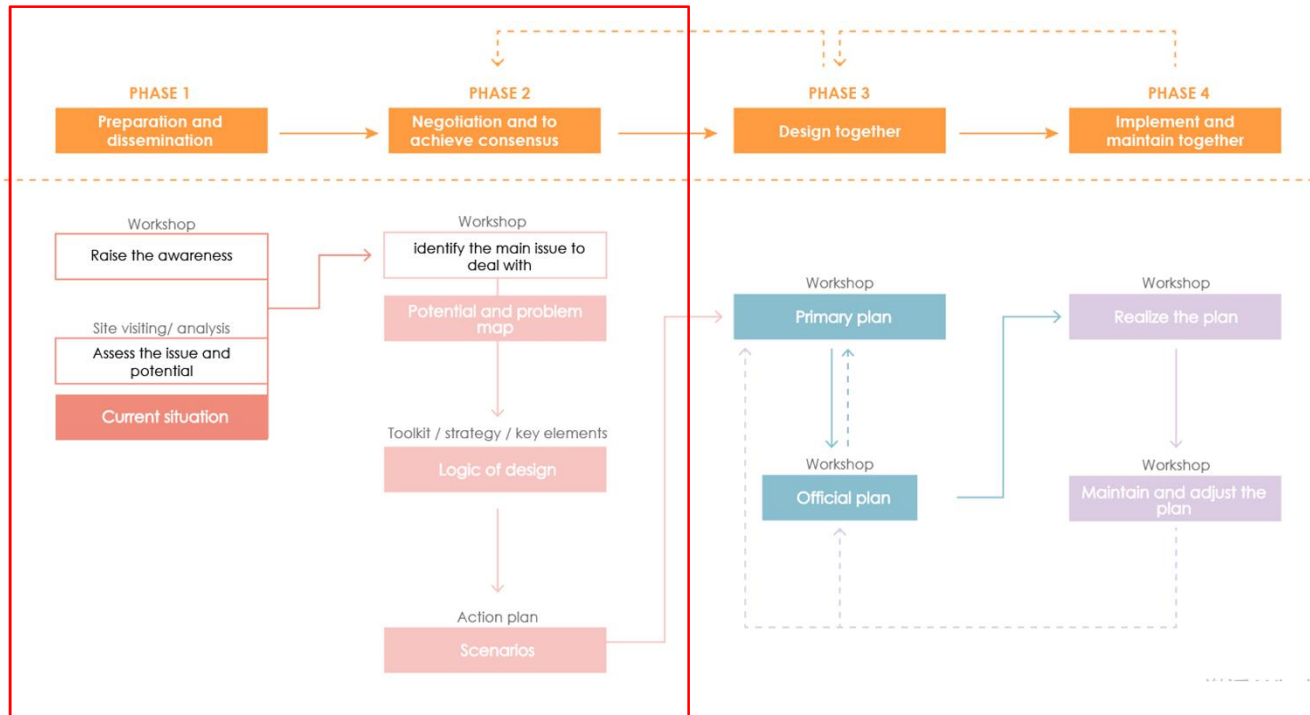


Public participation

ACTORS' INVOLVEMENT in different phases



Work as a COMMUNITY PLANNER

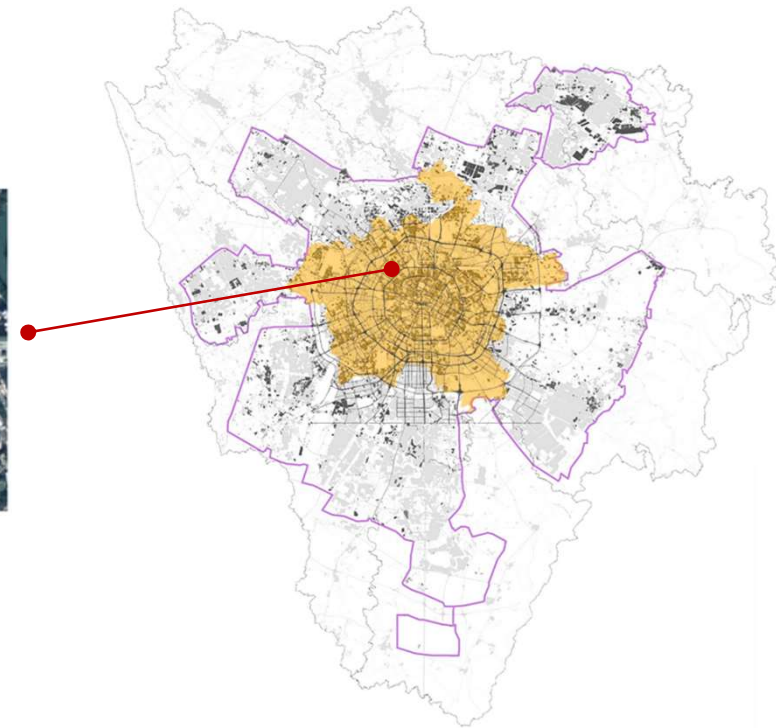
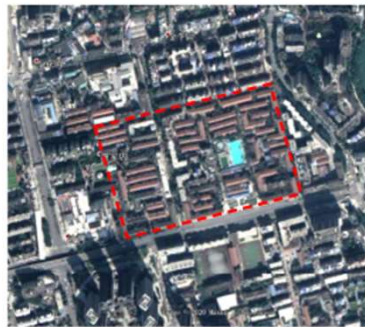


## SITE SELECTION

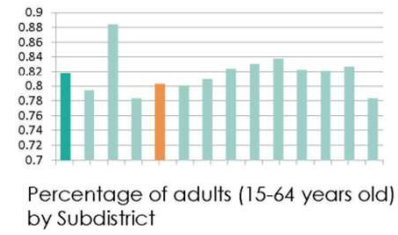
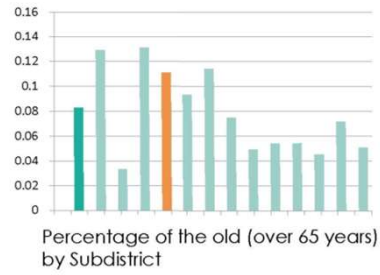
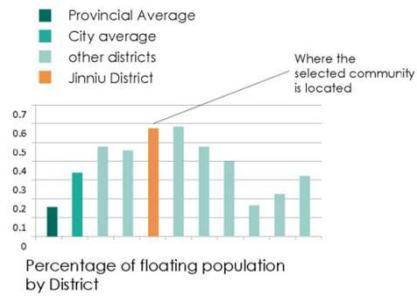
**SITE: Research & Design**

Railway new village:  
an old community rebuilt in the 1970s,  
where **the locals resist the redevelopment**,  
resulting in the postponement of the  
project.

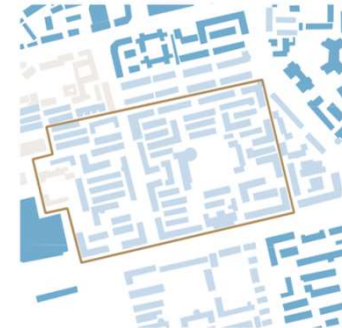
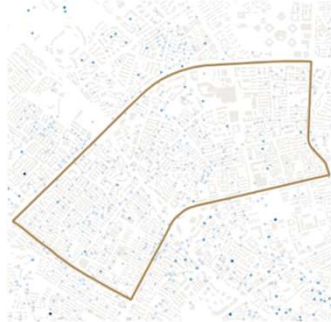
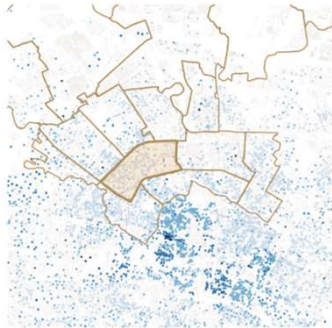
*\*New village refers to some  
communities built before the  
1980s in urban area.*



## Age of residents



## Housing price



### Legend

- 40000 - 100000
- 25000 - 40000
- 15000 - 25000
- 8000 - 15000
- 3500 - 8000

### Infrastructure



- Primary road
- Secondary road
- Tertiary road
- Residential street



- First Ring Road
- City road
- Neighborhood road
- End road
- Subway station
- Bus station



- Primary road
- Secondary road
- Tertiary road
- Neighborhood road
- Design area
- Sub district level
- Subway station



- Entrance
- Walls

Context

Research

Participative Process

Analysis

Scenario

**Resident  
- Retired worker**



**Ye**

**Resident  
- Kid**



**Wang**

**Resident  
- Tenant**



**Sun**

**Businessman**



**Zhao**

**Passers-by**



**Zhou & Mi**

## Map of current status





Kid

More place and facilities to play in.



Retired workers

Better living environment ...

Open space to dance...

Street

- commercial area
- public services



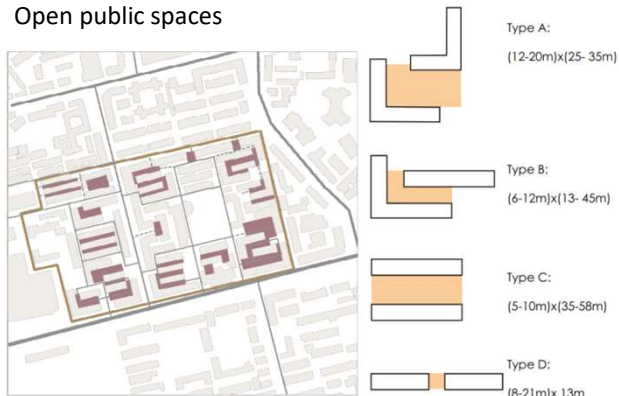
Type A



Type B



Open public spaces



Type C



Type D

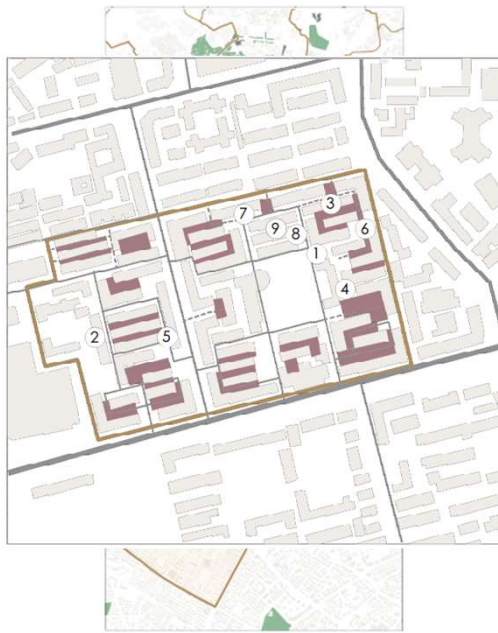




Retired workers

Place to plant some vegetables.. More flowers !

### Greenery



Flower pot

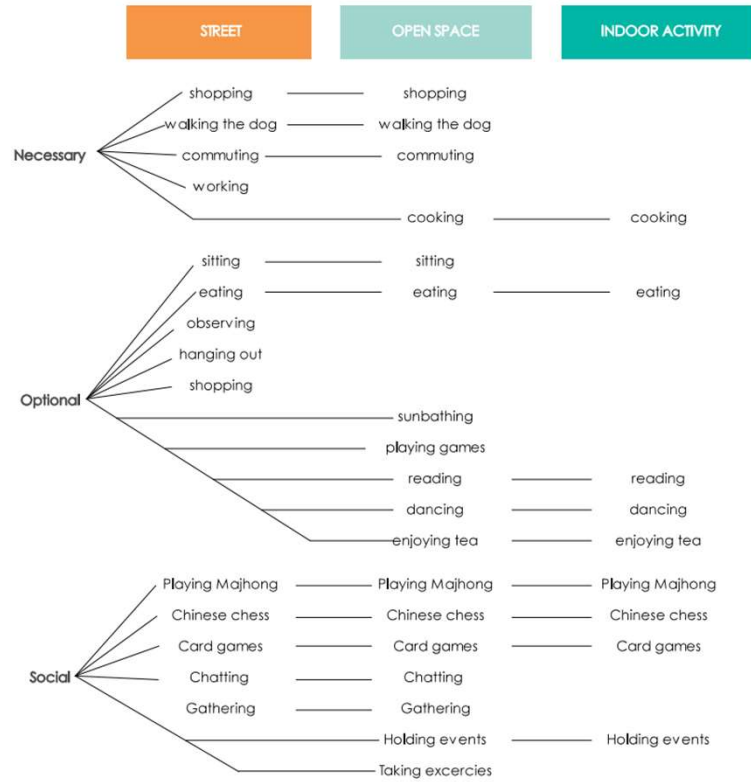


Vegetable garden

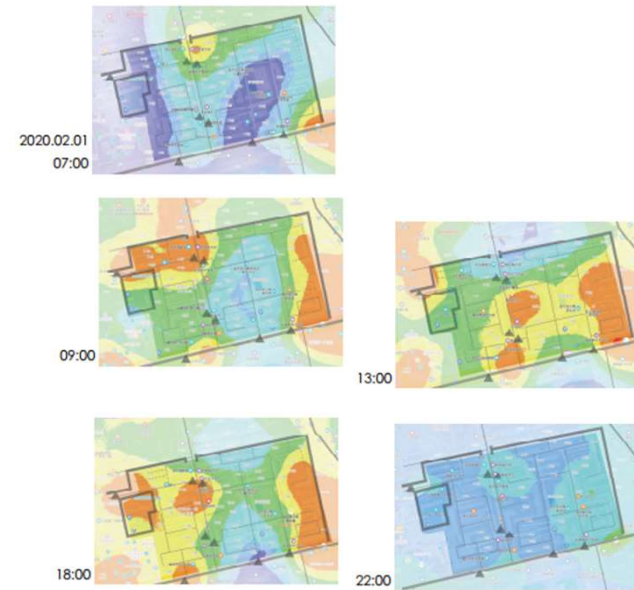


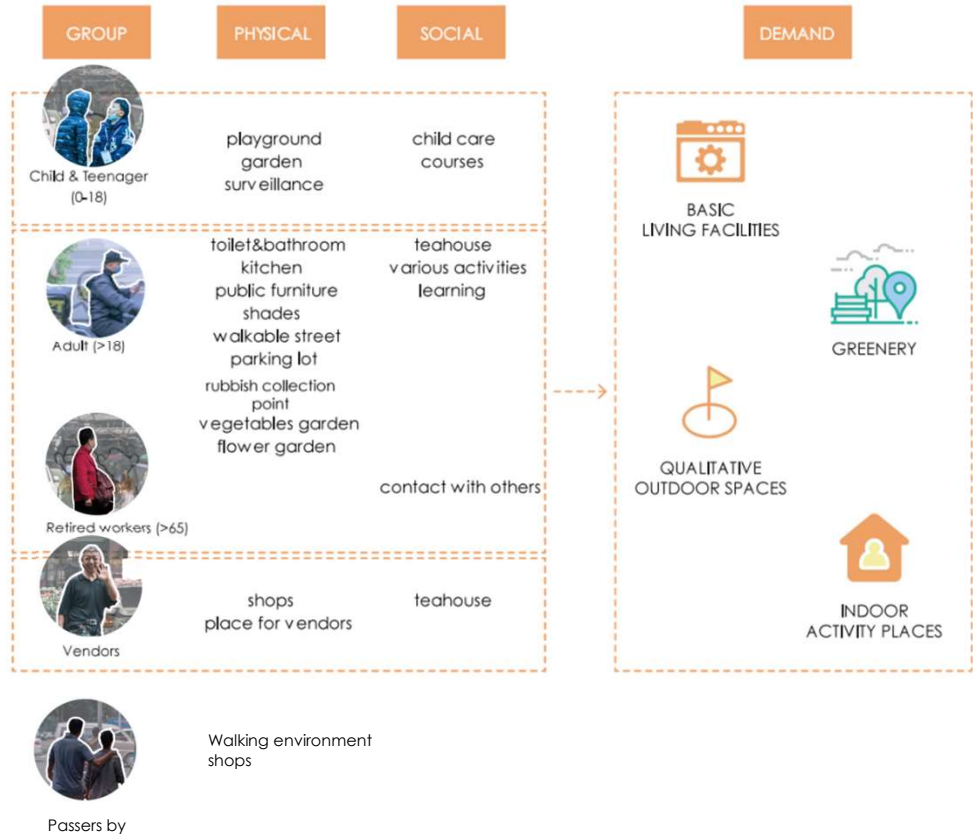
Underused grassland

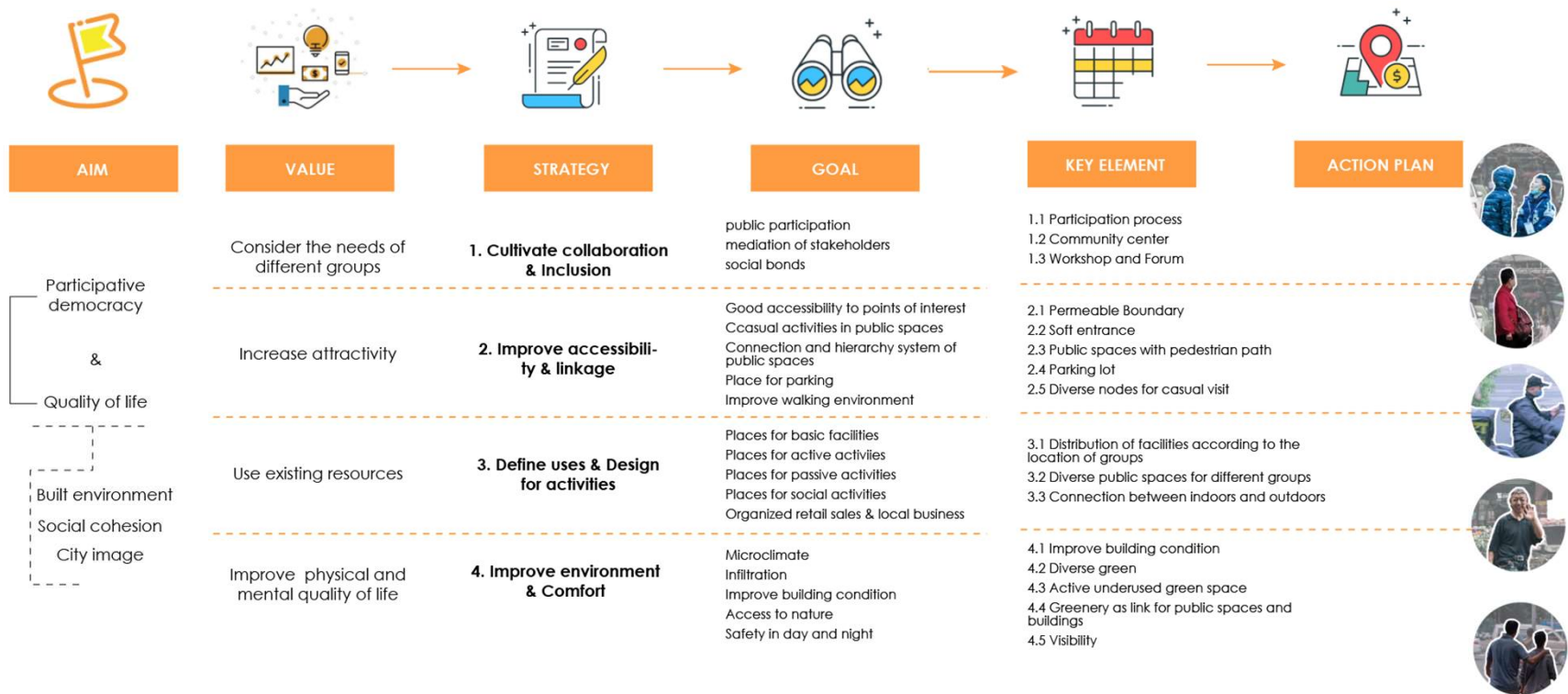




### Heatmap

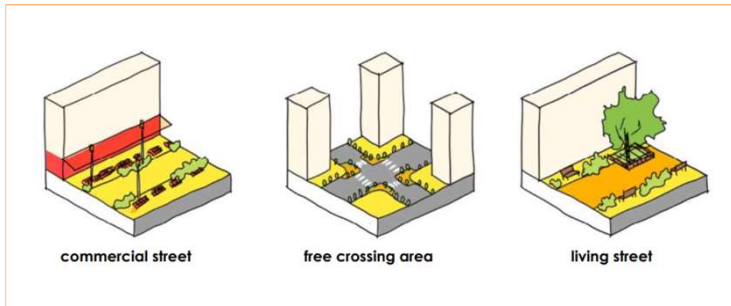




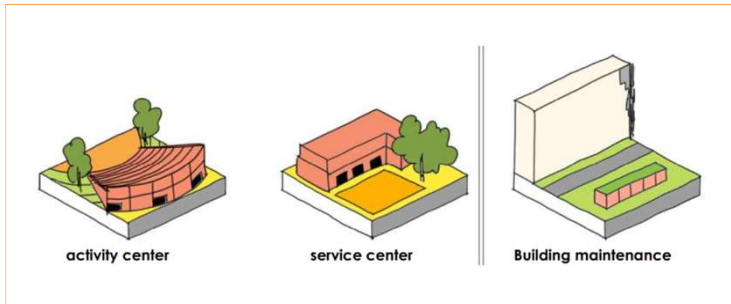


### TOOLKIT

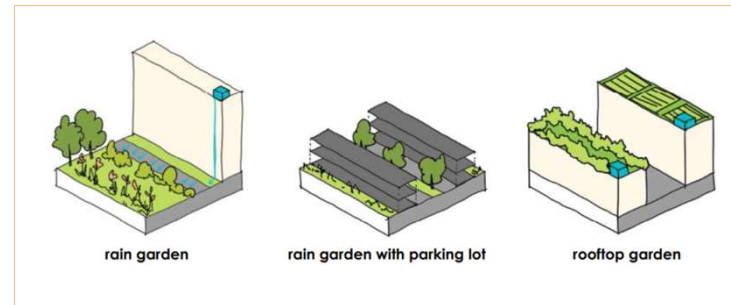
#### Accessibility & Linkage



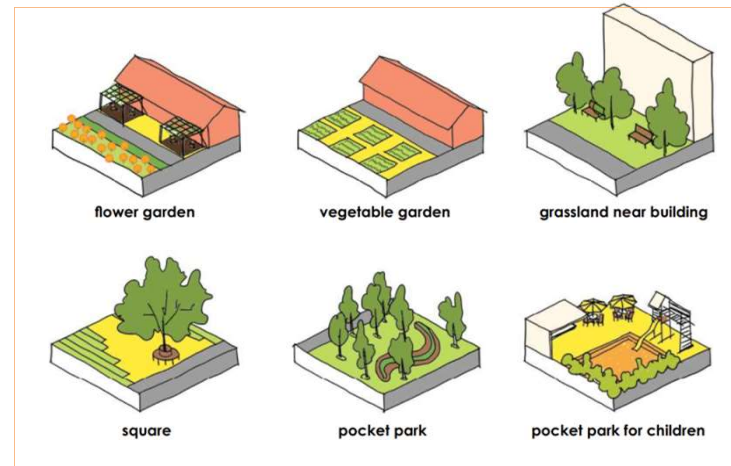
#### Uses & Activities



#### Environment



#### Uses & Comfort



### Scenario 1 . Economy development



### Scenario 2 . Social interaction



### Scenario 3 . Access to nature

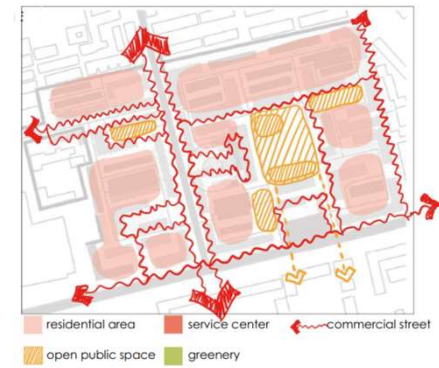


## Scenario 1 . Economy development

### Masterplan



### Function

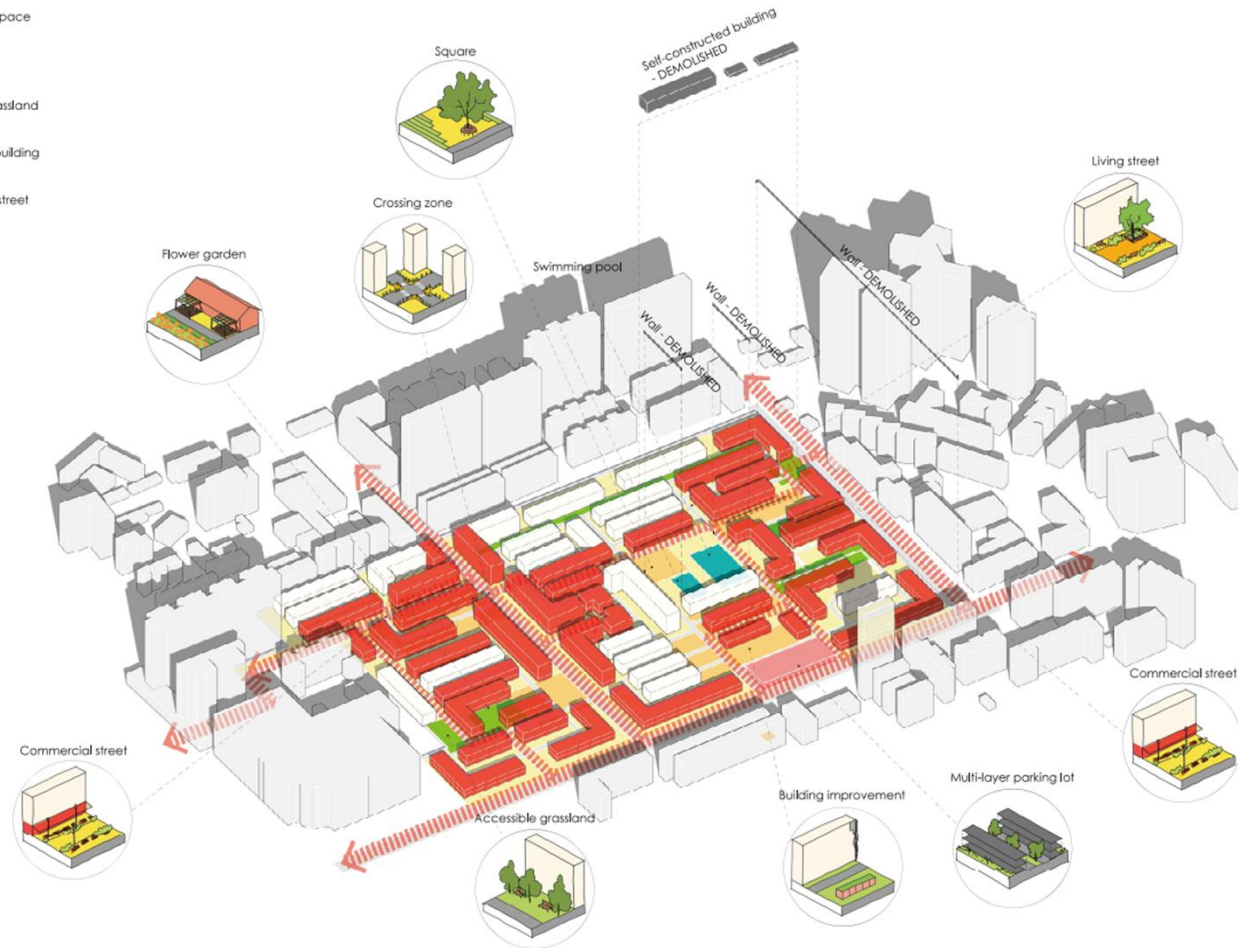


### Flow



**Scenario 1 . Economy development**

- Open public space
- Square
- Accessible grassland
- Commercial building
- Commercial street



### Scenario 1 . Economy development - entrance

#### Key elements



2.1 Permeable Boundary



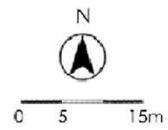
3.2 Diverse public spaces for different groups



3.3 Connection between indoors and outdoors



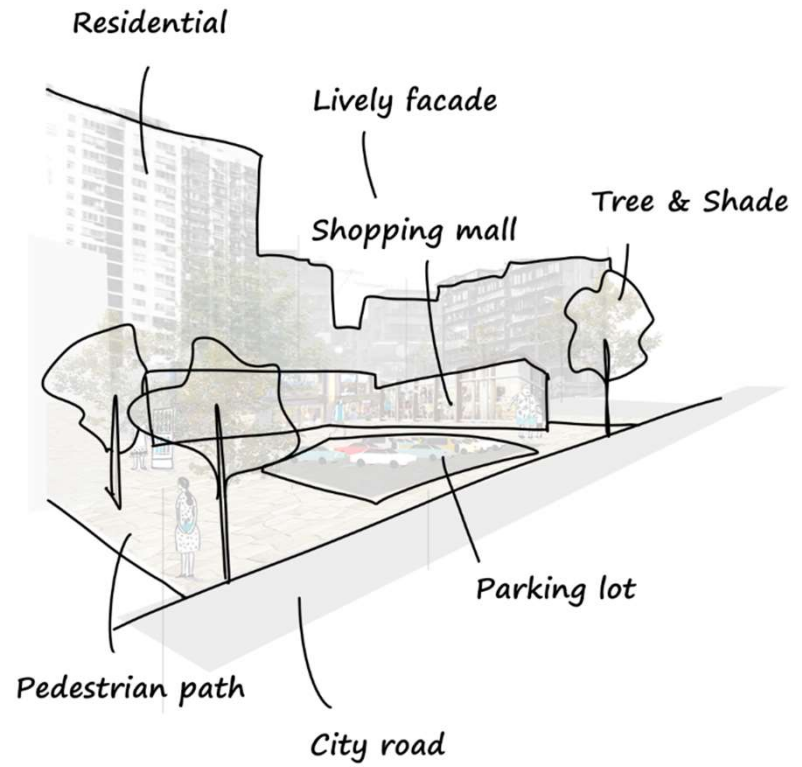
4.2 Diverse green



4.3 Active underused grassland



4.4 Grassland as link for public spaces and buildings



### Scenario 1 . Economy development – entrance – action plans



The scenario



The existing status

More customer



Businessman

Accessibility



Passers-by

#### Key elements



2.1 Permeable Boundary

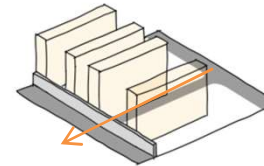


3.2 Diverse public spaces for different groups

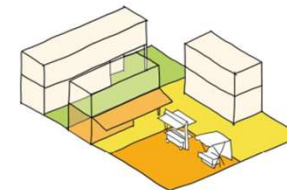


2.4 More places for parking

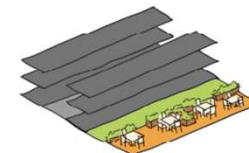
#### Action plan



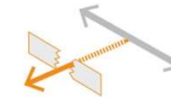
2.1 Break down the barrier



3.2 Divide the public spaces



2.4 Parking lot



New road with small entrance



#### Vendors

Users: all

Size: 0.5 x 1 m

Location: Almost anywhere



#### Raingarden

Function: collect extra rainwater

Users: all

Size: 50 x 2 m

Location: near the parking lot

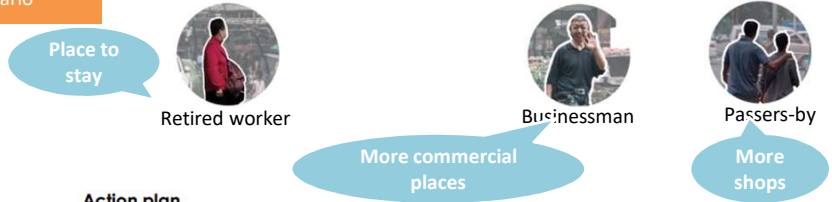
### Scenario 1 . Economy development – entrance – action plans



The scenario



The existing status



#### Key elements

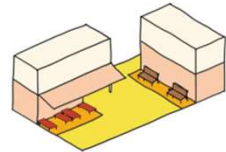


3.3 Connection between indoors and outdoors

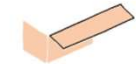


4.1 Improve building condition

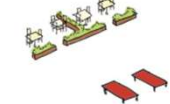
#### Action plan



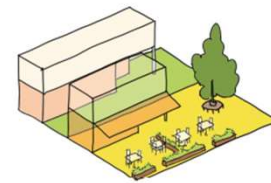
3.3 Street furniture



Shade  
Size: 1 meters wide



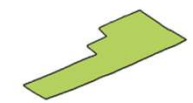
Outdoor commercial area  
Table + chairs + flower pot  
Exhibition area



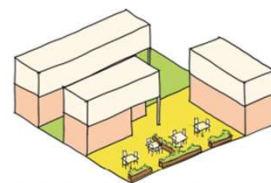
3.3 Accessible grassland



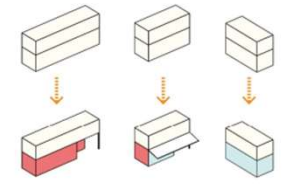
Tree with benches  
Size: > 2 x 2 m



Accessible grassland  
transformed from underused greenery



4.1 Refurnish old buildings



Groundfloor is transformed into public use

### Scenario 1 . Economy development - street

#### Key elements



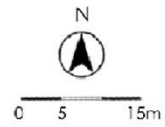
2.1 Permeable Boundary



2.2 Soft entrance



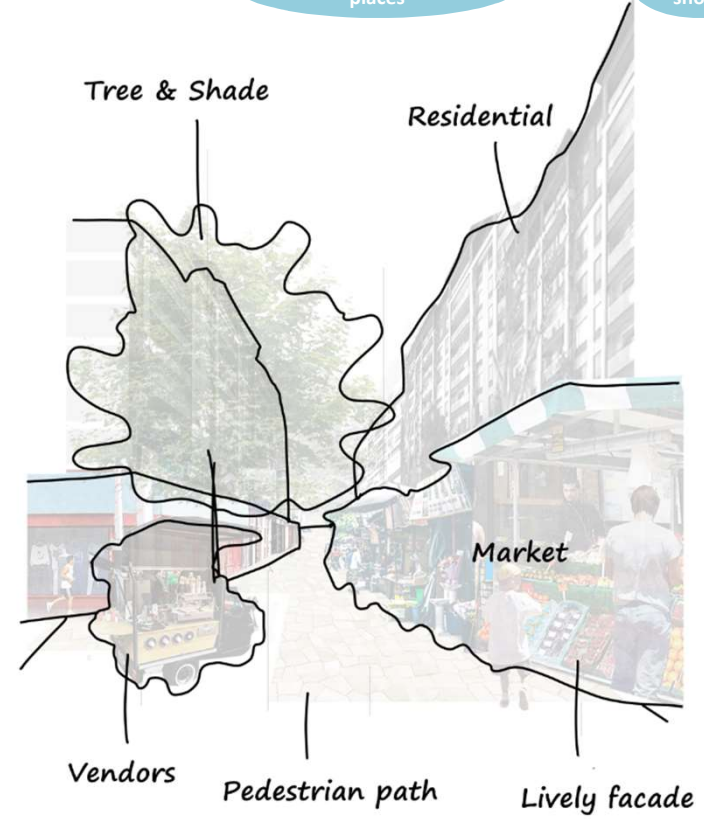
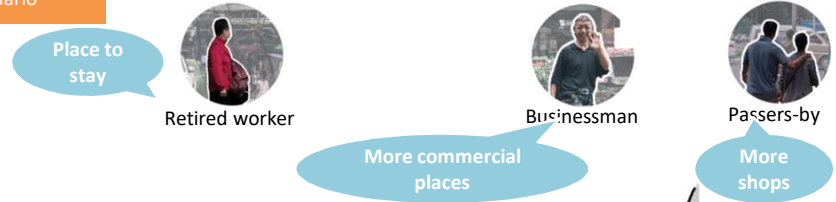
2.5 Diverse routes for casual visit



3.2 Diverse public spaces



4.2 Diverse greenery



### Scenario 1 . Economy development - square

#### Key elements



2.3 Public spaces linkage



3.1 Distribution of facilities



3.2 Diverse public spaces for different groups



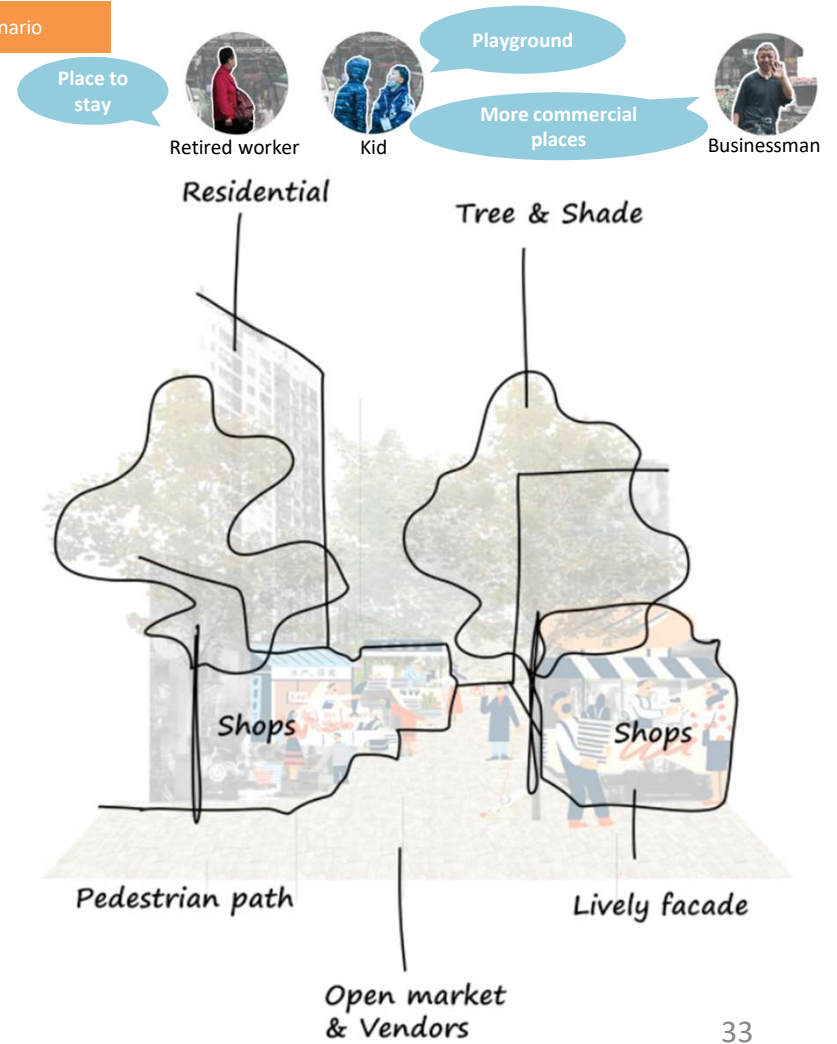
0 5 15m



3.3 Connection between indoors and outdoors



4.5 Visibility



		Actors	<b>Economy development</b>
<b>Pros</b>	household/ retired workers		Increasing rental income, Increasing community vitality, Easy shopping, Increasing community identity, etc.
	tenants		Increasing community vitality, Easy shopping, Increasing community identity, etc.
	business people		Commercial in come, Attracting people from outside, etc.
	passers-by		Easy shopping, Entertainment place etc.
<b>Cons</b>	household/ retired workers		Noise, Loss of privacy, Safety risks from strangers, etc.
	tenants		Rising rents Noise, Loss of privacy, Safety risks from strangers, etc.
	business people		Rising rents Safety risks from strangers, etc.
	passers-by		Walkability Safety risks from crowds etc.



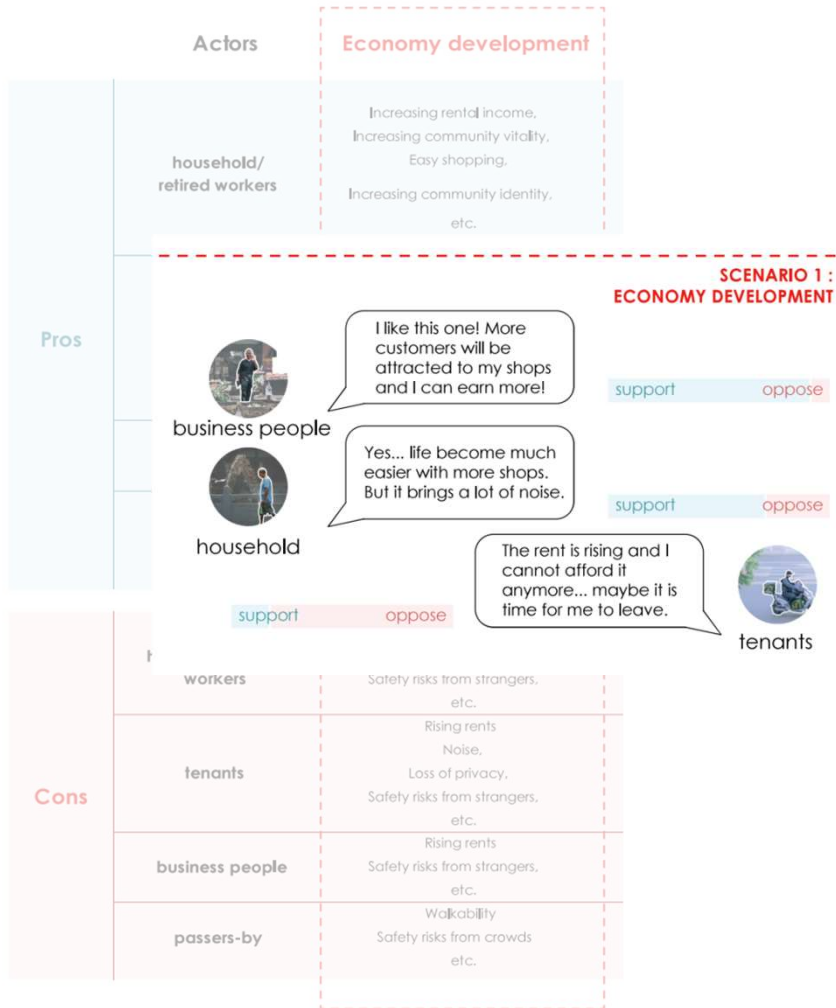
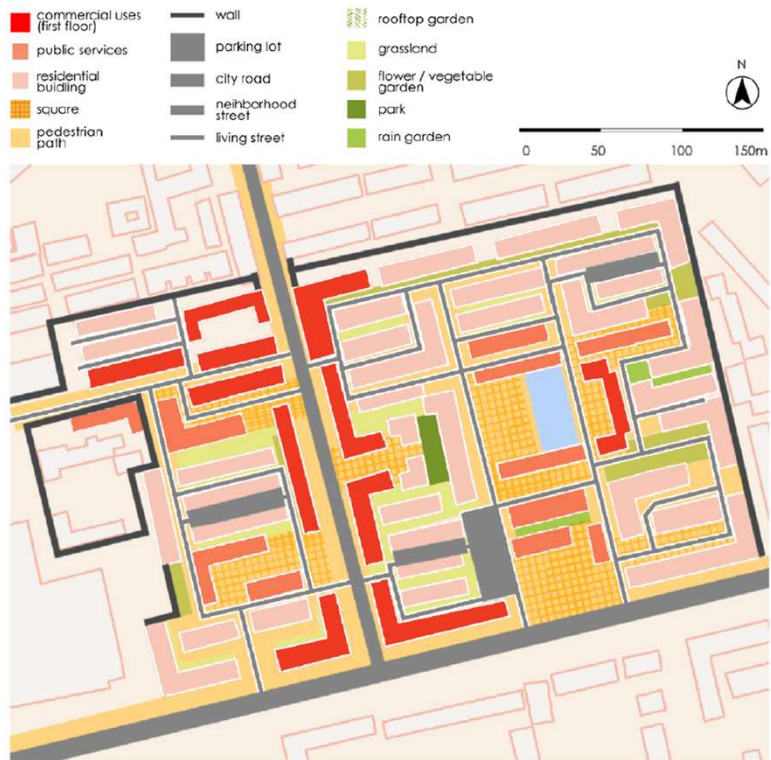


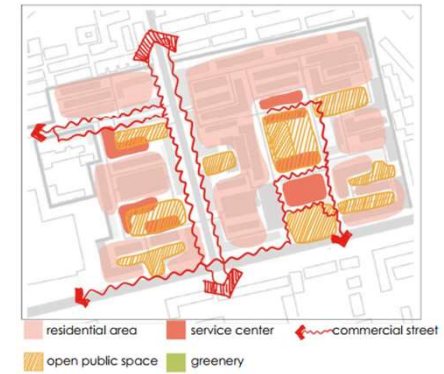
Image xx. Reference photo of the future in economy development scenario. (SUDANQ, 2013)

## Scenario 2 . Social interaction

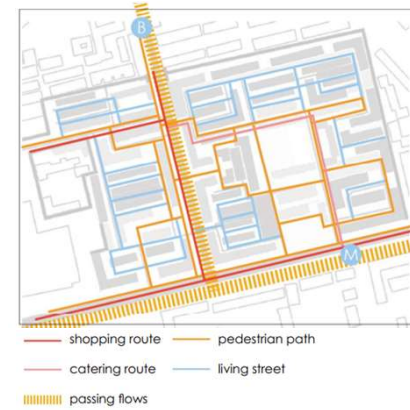
## Masterplan

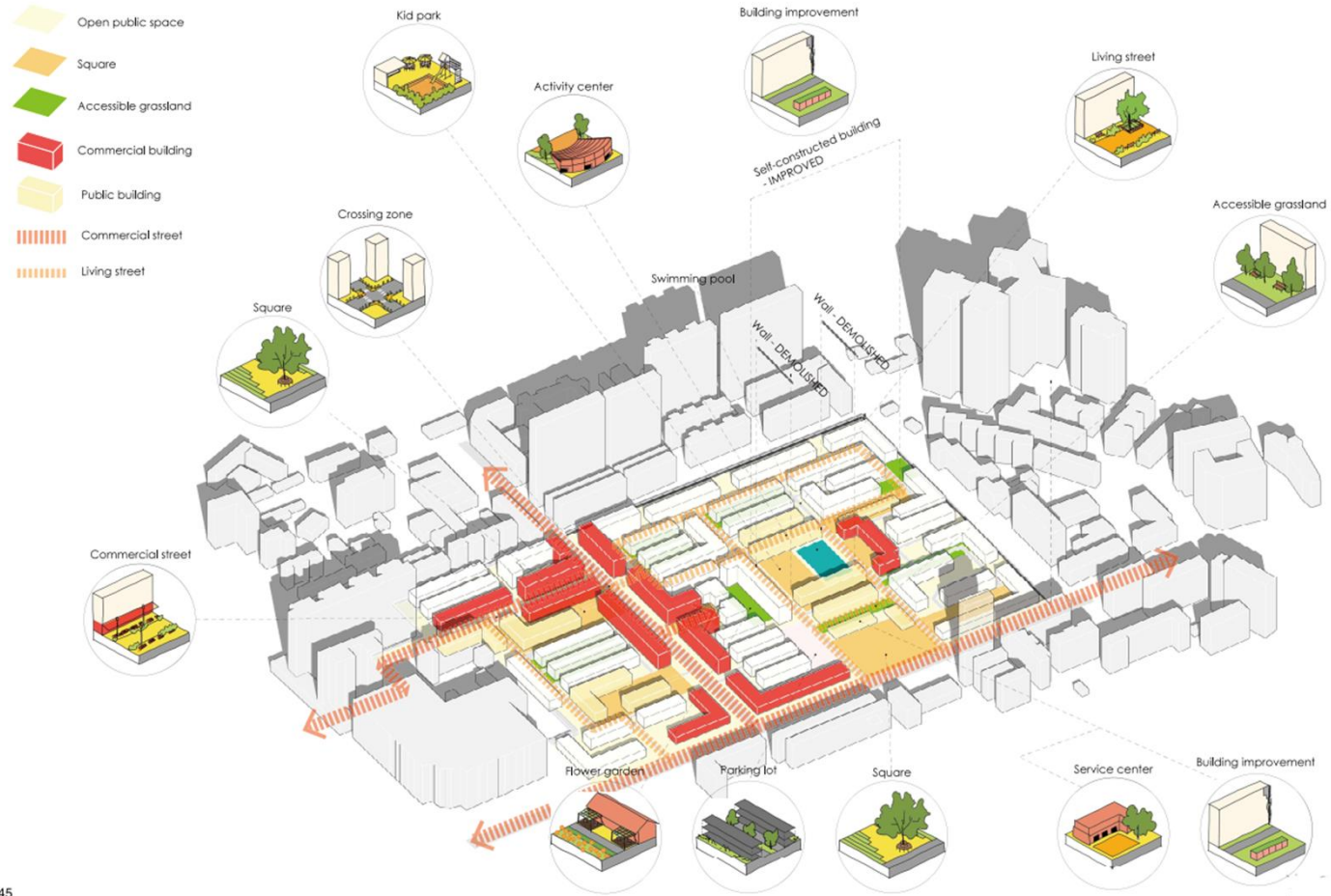


## Function



## Flow





### Scenario 2 . Social interaction - entrance

#### Key elements



1.2 Community center



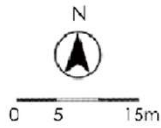
1.3 Workshop and Forum



2.2 Soft entrance



2.5 Diverse routes for casual visit



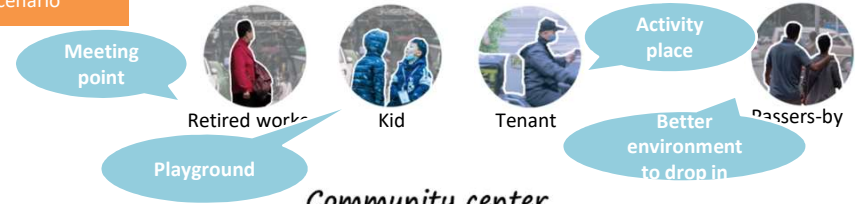
3.2 Diverse public spaces for different groups



3.3 Connection between indoors and outdoors



4.4 Greenery as link for public spaces and buildings



Community center & Service center

Tree & Shade

Residential

Flexible square

Flower pot

Street furniture

**Scenario 2 . Social interaction - street**

**Key elements**



2.2 Soft entrance



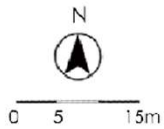
2.3 Public spaces linkage



3.2 Diverse public spaces for different groups



4.1 Improve building condition



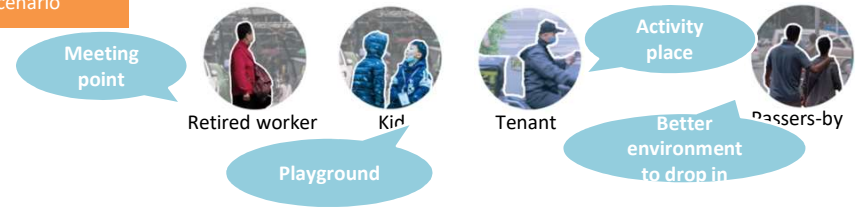
4.3 Active underused grassland



4.4 Grassland as link for public spaces and buildings



4.5 Visibility



**Scenario 2 . Social interaction - square**

**Key elements**



1.2 Community center



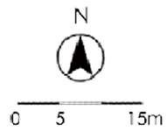
1.3 Workshop and Forum



2.3 Public spaces linkage



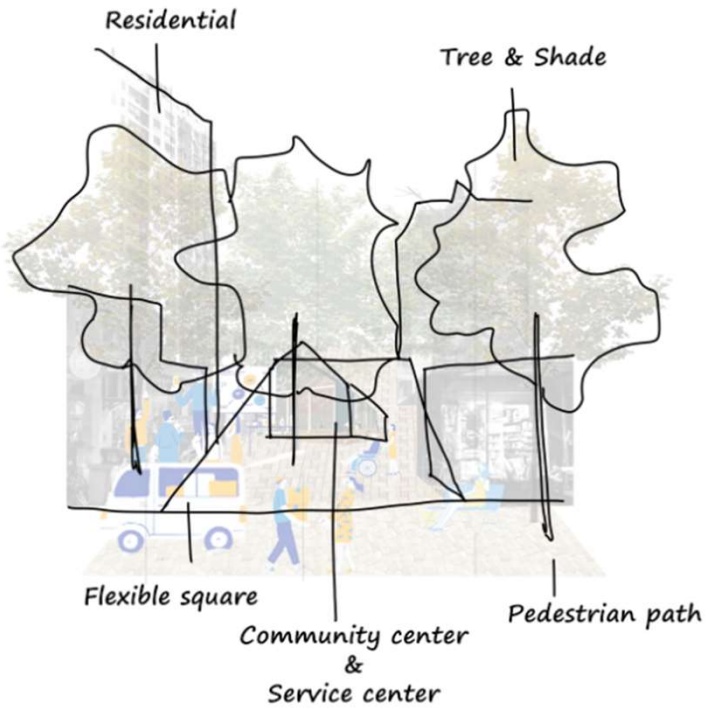
3.2 Diverse public spaces for different groups



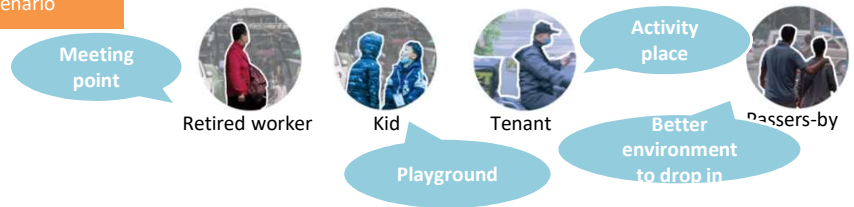
4.1 Improve building condition



4.2 Diverse green



		Actors	Social interaction
Pros	household/ retired workers		Increasing community vitality, Increasing community identity, More activity spaces, Facilitating communication between different groups of people, Physical and mental health of the elderly, etc.
	tenants		Increasing community vitality, Increasing community identity, More activity spaces, Community activities Workshops to learn new skills Communication between different groups of people, etc.
	business people		More potential customers etc.
	passers-by		Easily drop in and go around More activity spaces Walkability etc.
Cons	household/ retired workers		Insufficient variety of shops, Noise, Need organization to manage events, etc.
	tenants		Insufficient variety of shops, Noise, etc.
	business people		Less shops etc.
	passers-by		etc.



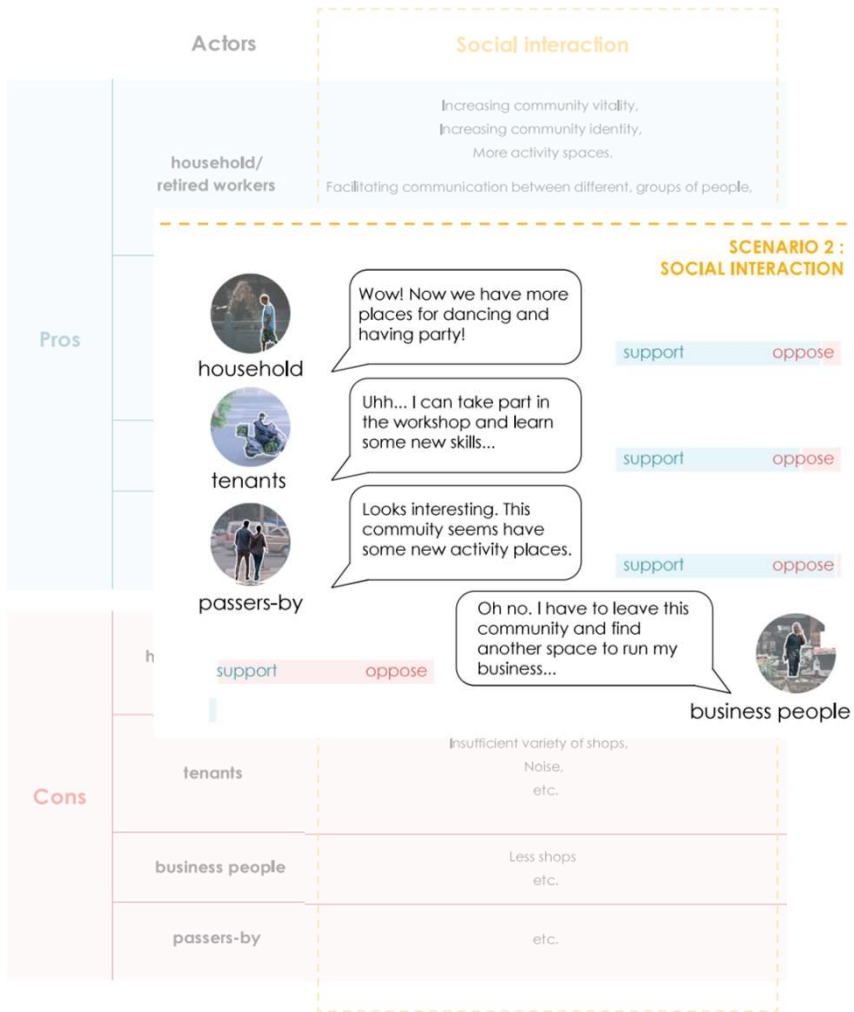


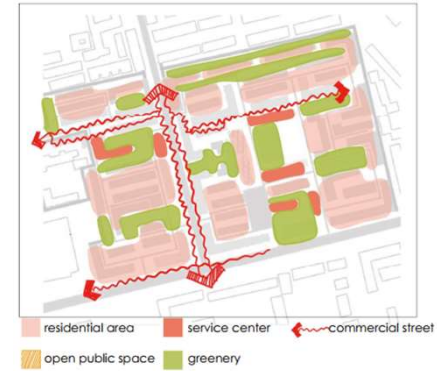
Image xx. Reference photo of the future in "social interaction" scenario. (SUDANQ, 2013)

## Scenario 3 . Access to nature

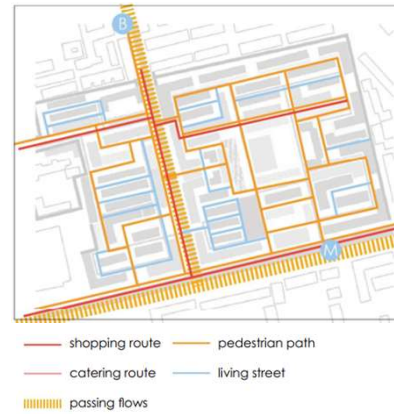
## Masterplan



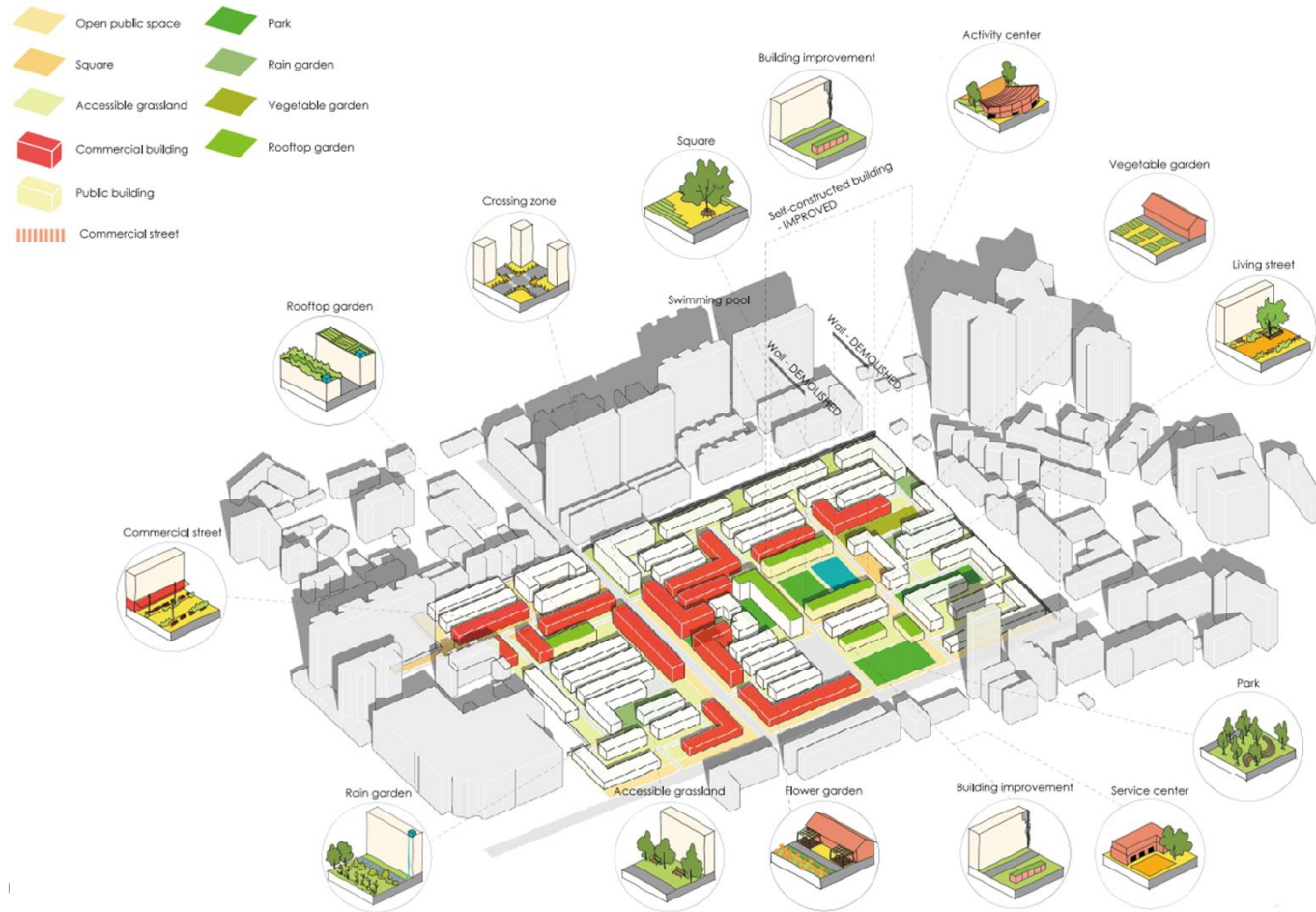
## Function



## Flow



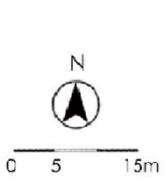
### Scenario 3 . Access to nature



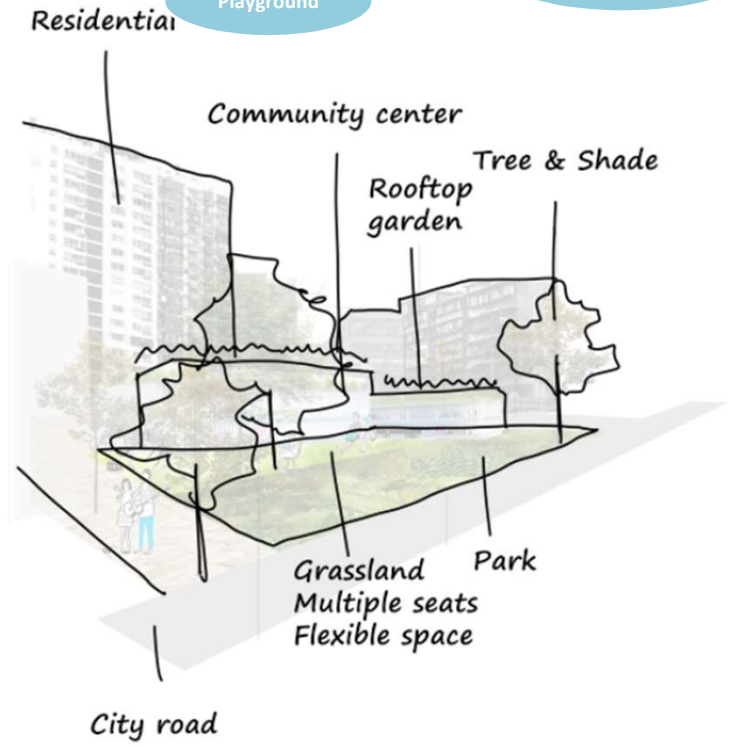
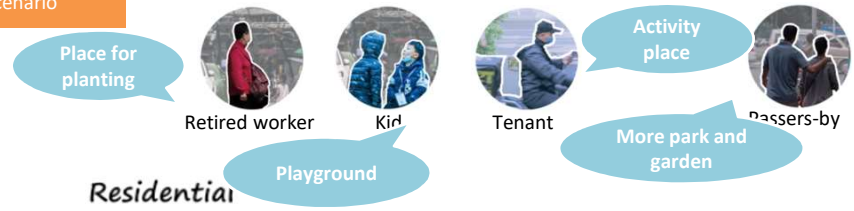
**Scenario 3 . Access to nature - entrance**

**Key elements**

-  1.2 Community center
-  1.3 Workshop and Forum
-  2.2 Soft entrance
-  2.5 Diverse routes for casual visit
-  4.1 Improve building condition



-  4.2 Diverse green
-  4.3 Active underused green space
-  4.4 Greenery as link for public spaces and buildings



### Scenario 3 . Access to nature - street

#### Key elements



2.2 Soft entrance



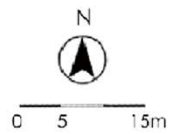
2.3 Public spaces linkage



4.1 Improve building condition



4.2 Diverse green



4.3 Active underused green space



4.4 Greenery as link for public spaces and buildings



4.5 Visibility



### Scenario 3 . Access to nature - square

#### Key elements



2.3 Public spaces linkage



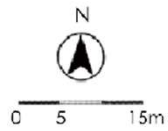
3.2 Diverse public spaces for different groups



3.3 Connection between indoors and outdoors



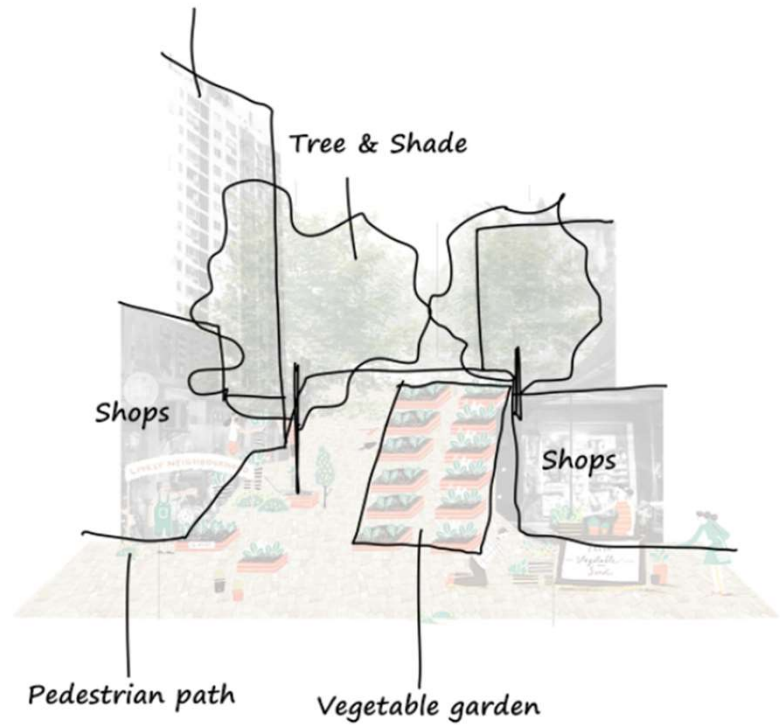
4.2 Diverse green



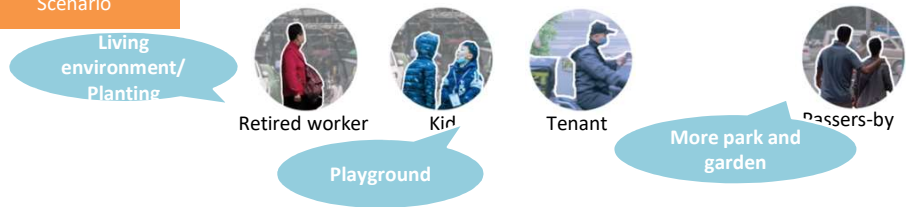
4.3 Active underused green space

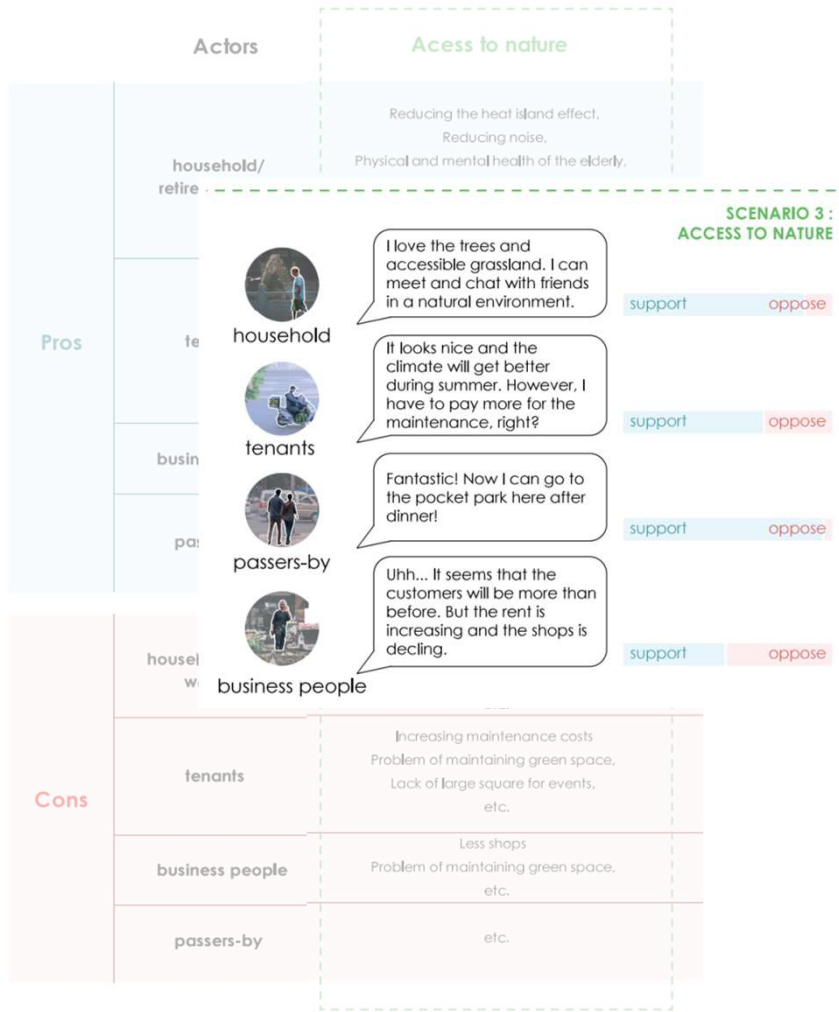


4.4 Greenery as link for public spaces and buildings



		Actors	Access to nature
Pros	household/ retired workers	Reducing the heat island effect, Reducing noise, Physical and mental health of the elderly, Preventing waterlogging, etc.	
	tenants	Reducing the heat island effect, Reducing noise, Physical and mental health of the elderly, Preventing waterlogging, etc.	
	business people	Qualified environment promoting consuming etc.	
	passers-by	More greenery for leisure Walkability etc.	
Cons	household/ retired workers	Increasing maintenance costs Problem of maintaining green space, Lack of large square for events, etc.	
	tenants	Increasing maintenance costs Problem of maintaining green space, Lack of large square for events, etc.	
	business people	Less shops Problem of maintaining green space, etc.	
	passers-by	etc.	





**SCENARIO 3 :  
ACCESS TO NATURE**



Image xx. Vision of the future in "access to nature" scenario. (SUDANQ, 2013)

### Scenario . Comparison

**SCENARIO 1 : ECONOMY DEVELOPMENT**

**business people**  
I like this one! More customers will be attracted to my shops and I can earn more!  
support oppose

**household**  
Yes... life become much easier with more shops. But it brings a lot of noise.  
support oppose

**tenants**  
The rent is rising and I cannot afford it anymore... maybe it is time for me to leave.  
support oppose

**SCENARIO 2 : SOCIAL INTERACTION**

**household**  
Wow! Now we have more places for dancing and having party!  
support oppose

**tenants**  
Uhh... I can take part in the workshop and learn some new skills...  
support oppose

**passers-by**  
Looks interesting. This community seems have some new activity places.  
support oppose

**business people**  
Oh no. I have to leave this community and find another space to run my business...  
support oppose

**SCENARIO 3 : ACCESS TO NATURE**

**household**  
I love the trees and accessible grassland. I can meet and chat with friends in a natural environment.  
support oppose

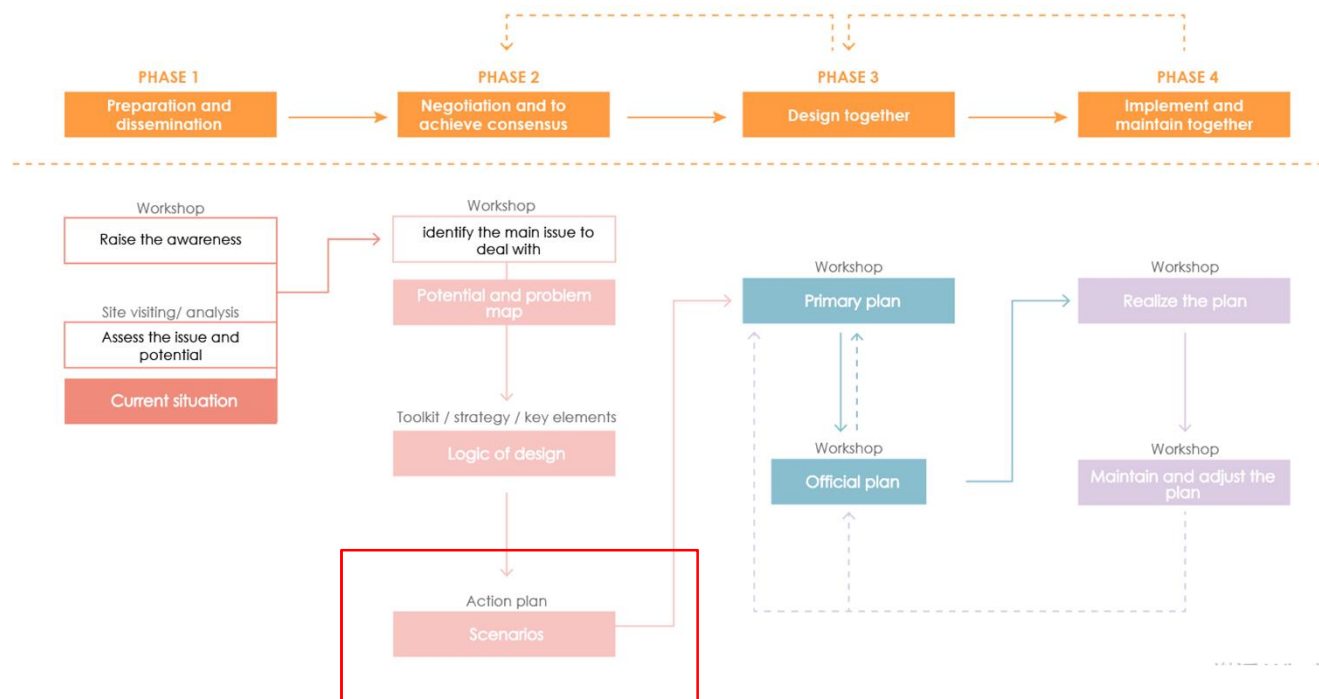
**tenants**  
It looks nice and the climate will get better during summer. However, I have to pay more for the maintenance, right?  
support oppose

**passers-by**  
Fantastic! Now I can go to the pocket park here after dinner!  
support oppose

**business people**  
Uhh... It seems that the customers will be more than before. But the rent is increasing and the shops is declining.  
support oppose



Procedure of public participation in community redevelopment



**Scenario 1 . Economy development**



**Scenario 2 . Social interaction**



**Scenario 3 . Access to nature**



**Future plan**



Neighborhood meeting and workshops

Scenario 1 . Economy development



Scenario 2 . Social interaction



Scenario 3 . Access to nature



Future plan



THANK YOU FOR LISTENING!



Neighborhood meeting and workshops